

**WORK PROGRAMME 2008**

***CAPACITIES***

**PART 1**

***RESEARCH INFRASTRUCTURES***

***(European Commission C(2007)5759 of 29 November 2007)***

**Capacities Work Programme: Research Infrastructures**

The work programme presented here provides for two calls for proposals in addition to other activities:

- 1) Pages 15: Introduction of the Call FP7-INFRASTRUCTURES-2008-1 for "Integrating Activities", "ERA-NET" and "support measures (studies, conferences, and coordination actions)".
- 2) Page 17: Introduction of the Call FP7-INFRASTRUCTURES-2008-2 for ICT based e-Infrastructures

<b>PART 1</b> .....	<b>1</b>
<b>I. CONTEXT</b> .....	<b>4</b>
<i>Policy context</i> .....	<b>4</b>
<i>Approach</i> .....	<b>4</b>
<b>II. CONTENT OF CALLS IN 2008 AND OTHER ACTIVITIES</b> .....	<b>7</b>
<b>1.1 Support to existing research infrastructures</b> .....	<b>7</b>
1.1.1 Integrating Activities .....	7
1.1.2 ICT-based e-Infrastructures.....	8
<b>1.2 Support to new research infrastructures</b> .....	<b>10</b>
1.2.1 Design Studies .....	10
1.2.2 Construction of new infrastructures (or major upgrades) .....	10
<b>1.3 Support for policy development and programme implementation, including support to emerging needs</b> .....	<b>12</b>
<b>1.4 Other activities</b> .....	<b>13</b>
<b>III. IMPLEMENTATION OF CALLS</b> .....	<b>15</b>
<b>3.1. Call 3 (call identifier: FP7-INFRASTRUCTURES-2008-1)</b> .....	<b>15</b>
<b>3.2. Call 4 (call identifier: FP7-INFRASTRUCTURES-2008-2)</b> .....	<b>18</b>
<b>IV. INDICATIVE PRIORITIES FOR FUTURE CALLS</b> .....	<b>20</b>
<b>V. COMPLEMENTARY INFORMATION</b> .....	<b>21</b>
<b>5.1. Integrating Activities under the targeted approach</b> .....	<b>21</b>
<b>5.2. The Integrated Infrastructure Initiative (I3) model</b> .....	<b>23</b>
<b>5.3. Evaluation for criteria Integrating Activities and ICT based e-Infrastructures</b> .....	<b>25</b>
<b>5.4. Risk-Sharing Finance Facility</b> .....	<b>26</b>

**The overall objective of the Research Infrastructures part of the "Capacities" specific programme is to optimise the use and development of the best research infrastructures existing in Europe, and to help to create in all fields of science and technology new research infrastructures of pan-European interest needed by the European scientific community to remain at the forefront of the advancement of research, and able to help industry to strengthen its base of knowledge and its technological know how.**

## **I. CONTEXT**

### *Policy context*

Research infrastructures play an increasing role in the advancement of knowledge and technology and their exploitation. For example, radiation sources, data banks in genomics and data banks in social science, observatories for environmental sciences, systems of imaging or clean rooms for the study and development of new materials or nano-electronics, are at the core of research and innovation processes. By offering unique research services to users from different countries, including from the peripheral and outermost regions, by attracting young people to science and through networking of facilities, research infrastructures help structuring the scientific community and play therefore a key role in the construction of an efficient research and innovation environment. Because of their ability to assemble a ‘critical mass’ of people and investment, they contribute to national, regional and European economic development. They are therefore at the core of the knowledge triangle of research, education and innovation.

The development of a European approach with regard to research infrastructures, including computing and communication based *e*-infrastructures, and the carrying out of activities in this area at a European level, can make a significant contribution to boosting European research potential and its exploitation, as well as to reinforce European research communities. Indeed, since such infrastructures are expensive and need a broad range of expertise to be developed, they should be built, used and exploited on a European or even larger scale.

While Member States remain central in the development and financing of infrastructures, the Community can and should play a catalysing and leveraging role by helping to ensure wider and more efficient access to, and use of, the infrastructures existing in the different Member States. The Community actions should also stimulate the coordinated development and networking of these infrastructures, and foster the emergence of new research infrastructures of pan-European interest within a medium to long term vision.

### *Approach*

Within the scope of this Community action, the term “research infrastructures” refers to facilities, resources and related services that are used by the scientific community to conduct top-level research in their respective fields. This definition covers: major scientific equipment or set of instruments; knowledge based-resources such as collections, archives or structured scientific information; enabling ICT-based infrastructures such as Grid, computing, software and communications; any other entity of a unique nature essential to achieve excellence in research. Such research infrastructures may be “single-sited” or “distributed” (a network of resources).

This Community action will only consider the optimisation, or emergence, of research infrastructures with a clear European dimension and added value in terms of performance and access. These infrastructures must contribute significantly to the development of European research capacities. The activities to be supported are identified under three main lines of actions as described below.

### ***1 - Support to existing research infrastructures***

The objective is to optimise the use and development of existing research infrastructures, in all fields of science and technology, including ICT-based infrastructures, and to ensure the access of research teams from across the EU to these infrastructures. This line of action represents the majority of the efforts (more than 60% of the operational funds) to be carried out under this part of the Specific Programme. Support will be provided for:

- *Integrating Activities*: to ensure that European researchers may have access to the best research infrastructures to conduct their research by supporting the integrated provision of infrastructure related services to the research community at a European level and at international level when appropriate. Integrating activities should also aim at structuring better, on a European scale, the way research infrastructures operate, and at fostering their joint development in terms of capacity and performance. Emphasis should be given to the efficient and coordinated implementation of trans-national access and service activities.

This action will follow both a bottom-up and a targeted approach:

- *bottom-up* to respond to the needs of the scientific community in all fields of science and technology, without any preference for one field over another;
  - *targeted* to respond to the strategic research needs of the thematic priority areas and thereby strengthen the consistency of actions within FP7.
- *e-Infrastructures*: e-Infrastructures aim at developing a new research environment, building upon the ICT capabilities of existing infrastructures, in which all scientists have an easy-to-use controlled access to unique or distributed scientific facilities, regardless of their type and location in the world. Such an environment requires the emergence of "communities of practice" involving scientific users together with the computing and communication technologists to make the infrastructure layer transparent and adequately serving cross-disciplinary needs. e-Infrastructures foster the emergence of new working methods, based on the shared use of resources across different disciplines and technology domains. Therefore, a major benefit of the e-Infrastructure concept is the strengthening of more intense collaboration between research centres and their researchers in "virtual research communities", enabling worldwide sustainable partnerships in all e-Science fields. The e-Infrastructures activity supports the further development and evolution of high-capacity and high-performance communication (GÉANT) and grid empowered infrastructures, including the reinforcement of world class distributed supercomputing facilities, data storage and advanced visualisation facilities. Furthermore, this activity will open the path to the deployment of a scientific data infrastructure resulting from the coordination, at pan-European level, of data storage, archiving, access, management and curation activities. Finally, it aims at fostering the adoption of e-Infrastructures by user communities where appropriate, enhancing their global relevance and increasing the level of trust and confidence from their users.

## **2 - Support to new research infrastructures (or major upgrades of existing ones)**

The aim is to help to create in all fields of science and technology new research infrastructures of pan-European interest needed by the European scientific community in order to remain at the forefront of the advancement of research, and be able to help industry to strengthen its base of knowledge and its technological know-how. This action would also examine the opportunities to exploit the potential for scientific excellence of the convergence and outermost regions through new infrastructures. This line of action represents about one third of the total financial resources available for this part of the Specific Programme.

Support will be provided for:

- *Design Studies*: to contribute to conceptual design studies for new research infrastructures, that demonstrate a clear European dimension and interest.
- *Construction of new infrastructures (or major upgrades of existing ones)*: to provide a catalytic and leveraging support for the construction of critical new facilities building primarily upon the work conducted by the European Strategy Forum on Research Infrastructures (ESFRI)<sup>1</sup>. This activity will follow a two stage-approach:
  - *Stage 1 - support to the preparatory phase*: This first phase will involve, in particular, the finalisation of the legal organisation, of the management and multi-annual financial planning. Some technical work could also be considered.
  - *Stage 2 - support to the implementation phase*: this phase involves the actual construction, building on the technical, legal, administrative and financial agreement achieved during the preparatory phase between all stakeholders.

Community support will concentrate on the preparatory phase.

Only projects which have sufficiently progressed in the preparatory phase could proceed to the Stage 2. Community financial support for the implementation phase will be limited to cases where there is a critical need for such a support. Decisions for a Community financial support to the implementation phase of these projects (Stage 2) will be taken through the periodic revision of this work programme, where the projects, the form of support and beneficiaries will be identified.

## **3 - Support for policy development and programme implementation, including support to emerging needs**

To enhance the effectiveness and coherence of national and Community research policies, international cooperation and the analysis of emerging needs in the field of research infrastructures.

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<sup>1</sup> <http://cordis.europa.eu/esfri/home.html>

## II. CONTENT OF CALLS IN 2008 AND OTHER ACTIVITIES

### 1.1 Support to existing research infrastructures

#### 1.1.1 Integrating Activities

Integrating Activities aim to provide a wider and more efficient access to and use of, the research infrastructures existing in the different Member States, Associated States and third countries when appropriate. This will ensure that European researchers may have access to the high performing research infrastructures they require to conduct their research, irrespective of the location of the infrastructure. Integrating Activities also aim to structure better and integrate, on a European scale, the way research infrastructures operate and to foster their joint development in terms of capacity and performance. The main characteristic of an Integrating Activity will be its capacity to mobilise a comprehensive consortium of stakeholders in a given class of infrastructures. In this way, operators of similar infrastructures should find it easier to develop synergies and complementary capabilities in such a way as to offer an improved access to researchers. Likewise, infrastructure operators and users should be in a better position to tackle new or unexpected developments in their field, for instance in relation to state-of-the-art instrumentation, with a more co-ordinated approach. More generally, a closer interaction between a large number of scientists active in and around a number of infrastructures will facilitate cross-disciplinary fertilisations and a wider sharing of knowledge and technologies across fields and between academia and industry. Normally, an Integrating Activity is expected to include several research infrastructures providing access. Exceptionally, the consortium may include only one facility providing access, if this facility is of a truly unique nature. An Integrating Activity shall combine, in a closely co-ordinated manner, following the FP6 Integrated Infrastructures Initiatives (I3) model: (i) *Networking activities*, (ii) *Trans-national access and/or service activities* and (iii) *Joint research activities*. All three categories of activities are mandatory as synergistic effects are expected from these different components. Further details about the I3 model is provided in section V.

**Funding scheme:** A combination of *Collaborative projects* and *Coordination and support actions*.

**Expected impact:** The main objective is to have a structuring impact on the European Research Area and on the way research infrastructures operate, evolve and interact with similar infrastructures and with their users. This should optimise the functioning and development of research infrastructures, on a European scale, and improve the services provided to researchers. This should also optimise the consistency of the Community actions between the "Capacities" and the "Cooperation" Specific Programmes.

Integrating Activities may address the following topics:

- **INFRA-2008-1.1.1: Bottom-up approach: Integrating Activities in all scientific and technological fields.** Open to all fields of science and technology without any preference for one field over another. The specific topics defined under the targeted approach below are excluded from this topic.
- **INFRA-2008-1.1.2: Targeted approach: Integrating Activities to support the specific needs of thematic priority areas.** Integrating Activities to be considered under this topic should correspond to strategic research needs of the thematic priority areas of the Cooperation specific programme, as defined in section V.

### 1.1.2 ICT-based e-Infrastructures

The e-Infrastructures activity supports a number of interrelated topics designed to foster the emergence of a new research environment in which "virtual communities" share and exploit the collective power of the European landscape of scientific and engineering facilities. Such topics include further development and evolution of the world leading pan-European research network GÉANT; deployment, extension in time and evolution of core e-Science Grid infrastructures; expansion of e-Infrastructures to address the specific needs of new scientific and engineering communities (including in the area of social sciences and humanities); coordinated deployment of scientific digital repositories, leading to the deployment of a European scientific data infrastructure; launching of socio-economic impact studies, development of common policies and cooperation with similar initiatives in other continents. Furthermore, the innovative vertical integration of advanced layered services in support of specific virtual research communities, exploiting, amongst other aspects, the benefits of intensive simulation and common workspaces, maximises the efficiency of the scientific process.

e-Infrastructures will ensure a further breadth and depth to the collaboration amongst researchers in Europe (and beyond) by the provision of a new generation of more sophisticated and reliable global infrastructures, in close articulation with national initiatives. By hiding the complexity of the underlying computing and communication layers, researchers can concentrate on their scientific and engineering domains, having a transparent access to a panoply of relevant research facilities of all kinds (such as communications, computing, instrumentation, applications, data). Facilities not located in Europe can be integrated in the e-Infrastructures when there is a clear value added for Europe. e-Infrastructures implement, therefore, a more efficient way for all scientists to work on global research challenges that would otherwise be difficult to address, rationalising at the same time the investments in expensive resources and fighting digital divide. If the provision of such e-Infrastructures requires the engagement of the broad ICT community and operators of specific infrastructures (such as the National Research and Education Networks or the operator of Computing of Grid support Centres), the beneficiary communities should be as widespread as possible, tackling all scientific and engineering domains (including the research community on ICT). These "communities of practice", exhibiting the right blend of scientific communities providing and benefiting from e-Infrastructures, implement a virtuous cycle of innovation in which new scientific and technological paradigms can emerge, shape and stabilise.

Activities of an "*e-Infrastructure*" project are centred on the provision of data and/or computing and/or communication infrastructures and services to the research community at the European level. The project must implement (i) *Networking Activities*, (ii) *Service Activities* and (iii) *Joint Research Activities* under a unified management (see section V).

**Funding scheme:** combination of *Collaborative projects* and *Coordination / support actions*.

*e-Infrastructure* projects may address the following topics:

- **INFRA-2008-1.2.1: GÉANT.** This topic supports the further deployment and evolution of the pan-European high-capacity and high-performance communication network (GÉANT), in close articulation with the National Research and Education Networks (NRENs), building upon the current world leadership and addressing the ever growing requirements of advanced scientific communities. GÉANT should reinforce the provision of end-to-end connectivity and services (user-to-user) by ensuring a high level of cohesion and



coordination of priorities amongst the interconnected NRENs. GÉANT should represent an instantiation of the “Internet of the future” by making timely use of state-of-the-art communication technologies and considering solutions that may emerge from innovative research done in the context of "Experimental Facilities".

GÉANT should strive for world leadership by undertaking the necessary technical research activities and reinforce Europe's position as a hub for global research networking, by promoting intercontinental connectivity. *(NB: given the specific objective of this topic, the proposal must be collectively submitted by legal entities operating the NRENs. Legal entities created by the NRENs to contribute to the deployment of connectivity and services on a pan-European scale (e.g. DANTE, TERENA, NORDUnet) can also participate).*

**Expected impact:** This topic will be the fundamental underlying enabler for the realisation of e-Science and the European Research Area. The advanced communication capabilities of GÉANT and the associated NRENs will foster new paradigms of collaborative research across Europe and globally. This topic will strive to provide a harmonised and pan-European e-Infrastructure bridging the digital divide and enabling all scientists in Europe to participate in collaborative work on equal terms independent of their location.

- **INFRA-2008-1.2.2: Scientific Data Infrastructure.** This activity supports the deployment of a broad European multidisciplinary scientific data infrastructure able to be easily federated with other knowledge infrastructures in other parts of the world, building upon the achievements of network and grid infrastructures and opening its benefits to other potential research areas such as e-health, e-learning and others. This activity addresses the rapidly increasing use of digital content in research and in the generation and dissemination of scientific and technical knowledge. The increasing availability of primary sources of data in digital form (e.g. experimental raw data, social sciences data) has the potential to shift the balance away from research based on secondary sources (such as publications), thus positioning data as the central element in the scientific process. This activity should provide an integrated set of services exploiting the middleware and grid capabilities to federate data in an eco-system of digital resources. These services should enhance the ability of researchers to extract further meaning from masses of data stored in institutional, national or community repositories, by supporting the deployment of standardised mechanisms to store, archive, authenticate, access, transfer, preserve, curate, certify and interpret scientific data. Furthermore, the deployed scientific data infrastructure will require adaptation in cultures and new approaches and competences, given the intrinsic relation between data and associated software to read, interpret and process it.

**Expected impact:** This topic will increase the scale of federation and interoperation of digital repositories, consolidating synergies with the underlying e-Infrastructures. The widespread implementation of strategies for curation and preservation will lead to more robust data infrastructures profiting from the interconnection and access to distributed and high-end computing and storage resources. The adoption of common management strategies will reduce costs, increase the users' base and bridge across multidisciplinary communities, enabling cross-fertilisation of scientific results and favouring innovation.

## **1.2 Support to new research infrastructures**

### **1.2.1 Design Studies**

The aim is to support conceptual design studies for new research infrastructures, which are of a clear European dimension and interest. Such studies should address all key questions which will help to assess the scientific and technical and financial feasibility of the proposed new facility. Major upgrades of existing infrastructures may also be considered, when the end result is intended to be equivalent to, or be capable of replacing, a new infrastructure. All fields of science and technologies could be considered. This activity would also foster the emergence of new organisational models designed to consolidate a sustainable approach to e-Infrastructures, in particular in the domain of grids and data repositories, facilitating new service provisioning schemes, more application neutral and open to all user communities and resource providers.

The next call for proposals for "Design Studies" is expected to be published at the end of 2009.

### **1.2.2 Construction of new infrastructures (or major upgrades) - preparatory phase**

The purpose of this activity is to provide catalytic and leveraging support for the preparatory phase leading to the construction of new research infrastructures or major upgrades of existing ones. The preparatory phase aims at bringing the project to the level of legal and financial maturity required to implement the project. This preparatory phase may also include technical work. Project consortia should involve all the stakeholders necessary to make the project move forward, to take decision and to make financial commitments before construction can start (e.g. national/regional ministries/governments, research councils, funding agencies). Operators of research facilities, research centres, universities, and industry may also be involved whenever appropriate. During this preparatory phase the European Commission may act as a "facilitator", in particular with respect to the financial engineering needed for the construction phase. This preparatory phase could include (non exhaustive list):

- Legal work, i.e. (1) for the construction and operation of the research infrastructure; and (2) the draft agreement, in the form of a "signature-ready" document for the actual construction.
- Governance and logistical work, i.e. (1) plans, in terms of decision-making, management structure, advisory body, IPRs, access rules for researchers, etc.; (2) planning (timing, resources) of staff recruitment to operate the new facility; (3) organisation of the daily support for researchers, including informatics, etc.;
- Strategic work, i.e. (1) the plan to integrate harmoniously the new infrastructure in the European fabric of related facilities in accordance, whenever appropriate, with the Community objective of balanced territorial development; (2) to create or consolidate centres of excellence; (3) the identification of the best possible site to set up the new facility(-ies) and its next generations; (4) the planning of research services to be provided at international level;
- Financial work, i.e. (1) the financial arrangements for the construction, operation and decommission of the facility, using notably the complementarities between national and Community instruments (such as the Structural Funds or the European Investment Bank); (2) studying new mechanisms, e.g. pre-commercial procurement processes, by which public authorities may develop new approaches for financing innovative solutions;

- Technical work, i.e. (1) the draft engineering plans for the construction, as well as final prototypes for key enabling technologies and implementation plans for transfer of knowledge from existing prototypes to the new research infrastructure; (2) the technical work to ensure that the beneficiary scientific communities exploit the new facility from the start with the highest efficiency, including the introduction of new processes or software.

The next call for proposals for "Construction of new infrastructures - preparatory phase" is expected to be published at the end of 2009.

### **1.3 Support for policy development and programme implementation, including support to emerging needs**

The aim is to support, in the context of building up the European Research Area, the coordination of national and/or regional policies and programmes in the field of research infrastructures, as well as the work of ESFRI and e-IRG (e-Infrastructure Reflection Group). This will help providing the necessary conditions for pooling talent, maximising resources, and ensuring the best outcome of rationalised research investments in Europe. While it is vital for Europe to strengthen and consolidate intra-European co-operation, it is also essential to do so with a global perspective in mind, so that European science can have an impact on, and contribute to, world class scientific achievements.

- **INFRA-2008-3.1: ERA-NET supporting cooperation for research infrastructures in all S&T fields.** In line with the objectives of the ERA-NET scheme, projects to be supported under this topic should aim at developing and strengthening the cooperation and coordination of national and/or regional and programmes for research infrastructure. This topic is open to all fields of science and technology. An ERA-NET may be specific to a type of research infrastructures or generic. Eligible partners are only programme owners, which are typically national/regional ministries/governments responsible for defining, financing or managing research programme and programme managers such as research councils or funding agencies.
- o **INFRA-2008-3.2: Studies, conferences and coordination actions supporting policy development, including international cooperation, in all S&T fields.** The monitoring and further development of a European policy for research infrastructures needs in 2008 the development of specific actions, such as:
  - studies on the regional impacts of research infrastructures,
  - impact studies related to the ERA green paper.

This helps to take stock of the advancement of activities in the various areas covered, as well as of the development of access and IPR policies for pan-European research infrastructures.

**Expected impact:** Support measures are expected to strengthen the development of a European policy for research infrastructures and to address specific needs for international cooperation in this field, thus achieving critical mass and driving global policies. Furthermore, support measures in the field of e-services are expected to contribute to the emergence of sustainable approaches for the provision of cross-disciplinary research services.

**Funding scheme:** *Coordination and support actions.*

## 1.4 Other activities

- **Grants to named beneficiaries: Conferences on Research Infrastructures**

In the context of the rotating Presidency of the Union, the Research Infrastructure action would support in 2008 two major European conferences on research infrastructures. These events, to be jointly organised with the European Commission, are outside the scope of call for proposals. They will be supported using Coordination and Support Actions (support actions). The general eligibility, selection and award criteria are those set out in annex 2 to this work programme. The beneficiaries of the grants will be the legal entities specified below<sup>1</sup>:

- *for the Slovenian Presidency Conference*: Ministry of Higher Education, Science and Technology, 1000 Ljubljana, Slovenia. The conference will take place in March 2008, in or near Ljubljana. It should be a two days event for around 250 participants. The rate of co-financing will be up to 75 % for a maximum EC funding of EUR 130,000. The objectives expected to be fulfilled are: (1) to analyse the role of RIs (including e-infrastructures) for the regional development, including the consideration of the meta-regions (e.g. baltic, balkans, alpine regions, etc.); (2) to analyse the role and strategies of regions in the setting-up of identified facilities; (3) to help developing a possible action plan allowing efficient interactions between the development of research infrastructures and of regions.
  - *for the French Presidency Conference*: Société Civile Synchrotron SOLEIL, L'Orme des Merisiers, Saint-Aubin, BP 48 91192, Gif-sur-Yvette Cedex, France. The conference will take place in December 2008 in the Versailles Palais des Congrès. It should be a two days event for around 500 participants. The rate of co-financing will be up to 75 % for a maximum EC funding of EUR 170,000. The objectives expected to be fulfilled are: (1) to explore means of structuring and strengthening the European Research Area with respect to research infrastructures, and to better coordinate between countries, policies, instruments and funding mechanisms; (2) to increase the efficiency of creating new facilities, focusing e.g. on legal and managerial issues, or on specific past experiences at European level; (3) to continue and intensify the exchange of views between decision-makers at international level.
- **External expertise**
    - The use of appointed external experts for the evaluation of project proposals and, where appropriate, for the reviewing of running projects.
    - The set up of groups of external experts to advise on or support the design and implementation of Community research policy.
  - **RSFF**: There will be a follow-up of RSFF activities although no financial commitment is foreseen in 2008.

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<sup>1</sup> In compliance with Article 14(a) of the Rules of Participation and Article 168 of the Implementing Rules of the Financial Regulation.

**Indicative budget for the 2008 Work Programme**

	<b>Budget 2008* EUR million</b>
<b>Call 3 (FP7-INFRASTRUCTURES-2008-1 see page 15)</b>	90.08 **
<b>Call 4 (FP7-INFRASTRUCTURES-2008-2 see page 17)</b>	20.00 **
<b>Other activities</b> <ul style="list-style-type: none"> <li>• Independent experts (EUR 0,90 million)</li> <li>• Grants to named beneficiaries: <ul style="list-style-type: none"> <li>- Slovenian Presidency Conference on Research Infrastructures (EUR 0,13 million)</li> <li>- French Presidency Conference on Research Infrastructures (EUR 0,17 million)</li> </ul> </li> </ul>	1.20
<b>Estimated total budget allocation</b>	<b>111.28</b>

\* Under the condition that the preliminary draft budget for 2008 is adopted without modifications by the budget authority.

\*\* An amount from the 2009 budget is expected to be added to this call for which a new financing decision to cover the budget for that year will be requested at the appropriate time.

### III. IMPLEMENTATION OF CALLS

#### 3.1. Call 3 (call identifier: FP7-INFRASTRUCTURES-2008-1)

- Date of publication<sup>1</sup>: 30 November 2007
- Deadline<sup>1</sup>: 29 February 2008, at 17.00.00, Brussels local time.
- **Indicative budget**<sup>2</sup>: EUR 90.08 million<sup>3</sup>
- Topics called

Line of action/Activity	Topics called	Funding scheme(s)	EUR million indicative
1.1 Support to existing research infrastructures			
1.1.1 Integrating Activities	INFRA-2008-1.1.1: Bottom-up approach: Integrating Activities in all scientific and technological fields.	Combination of Collaborative projects and Coordination and support actions (CP/CSA)	81.08
	INFRA-2008-1.1.2: Targeted approach: Integrating Activities to support the specific needs of thematic priority areas.		
1.3 Support to policy development and programme implementation			
INFRA-2008-3.1: ERA-NET <sup>4</sup> supporting cooperation for research infrastructures in all S&T fields (in coordination and accordance with the terms of call FP7-ERANET-2008-RTD)		Coordination and support actions (CSA-CA)	4.00
INFRA-2008-3.2: Studies, conferences and coordination actions supporting policy development, including international cooperation, in all S&T fields.		Coordination and support actions (CSA)	5.00

- Evaluation procedure:
  - The general eligibility, selection and award criteria are set out in Annex 2 to this work programme.

<sup>1</sup> The Director-General responsible for the call may publish it up to one month prior to or after the envisaged date of publication. Also, at the time of the publication of the call, the Director-General responsible may delay this deadline by up to two months.

<sup>2</sup> The final budget awarded to this call, following the evaluation of projects, may vary by up to 10% of the total value of the call. All budgetary figures given in this call are also indicative. The repartition of the sub-budgets awarded within this call, following the evaluation of projects, may vary by up to 10% of the total value of the call.

<sup>3</sup> Under the condition that the preliminary draft budget for 2008 is adopted without modifications by the budget authority. An amount from the 2009 budget is expected to be added to this call for which a new financing decision to cover the budget for that year will be requested at the appropriate time.

<sup>4</sup> Complete and detailed information on funding scheme, special eligibility criteria and expected impact of ERA-NET and ERA-NET Plus can be found in Annex IV of the Cooperation work programme.

- Specific selection and award criteria for topics 1.1.1 and 1.1.2 are set out in section V.5.3 replacing those of annex 2 to the Capacities work programme.
- A one stage submission procedure will be followed.
- Proposals may be evaluated remotely.
- Indicative evaluation and contractual timetable:
  - Evaluation results: estimated to be available within some 4 months after the closure date;
  - Contract signature: it is estimated that the first contracts related to this call will come into force before the end of 2008.
- Consortia agreements: Participants in topics 1.1.1 and 1.1.2 are required to conclude a consortium agreement.
- Particular requirements for participation, evaluation and implementation:
  - The minimum number of participating legal entities required, for all funding schemes, is set out in the Rules for Participation.
  - For activity 1.1.1 (Integrating Activities) the project duration would be up to 48 months maximum. The requested EC contribution is expected to be in the range EUR 3 000 000 to 10 000 000. A higher EC contribution is possible only in well justified cases (e.g. facilities serving very large communities of users). In any case it is not foreseen that the EC contribution would be more than EUR 15 000 000.
  - For the topic "3.1 ERA-NET", the project duration is expected to be 24 to 36 months with a requested EC contribution in the range EUR 1 000 000 to 2 000 000.
  - ERA-NETs are aimed at developing and strengthening the cooperation and coordination of national and/or regional and programmes for research infrastructures. Activities eligible for funding should correspond to: (1) information exchange, (2) Definition and preparation of joint activities and (3) Implementation of joint activities (for more details on these activities please look at Annex 4 of the 2008 "Cooperation" Work Programme). Eligible partners are only programme owners, which are typically national/regional ministries/governments responsible for defining, financing or managing research programme and programme managers such as research councils or funding agencies. For the evaluation of ERA-NET the general criteria and thresholds applicable to Coordination and Support Actions given in Annex 2 are supplemented by the following sub-criteria and thresholds:
    1. *Scientific and/or technological excellence - Quality of coordination (Threshold 4/5 instead of 3/5)*
      - The management should be supported by a suitable governance structure involving the participating organisations at an appropriate level.
    2. *Quality and efficiency of the implementation (Threshold 3/5)*
      - In reference to the applicable work programme, does the proposed ERA-NET / ERA-NET Plus action pool the necessary resources between national programmes and the Community and does it represent the most appropriate type of public funding for this pre-defined area?
    3. *Potential impact (Threshold 3/5)*
      - The participants should be the key actors within their national or regional research systems.



*FP7 Capacities Work Programme: Infrastructures*

- The ERA-NET activities should lay the foundations for a durable cooperation between the partners involved.
  - Is there a clearly identified and agreed European added value through a variable geometry approach?
- For the topic "3.2 Studies, conferences...", the project duration is expected to be 12 to 24 months with a requested EC contribution in the range of EUR 200 000 to 1 000 000.
- A reserve list may be produced of projects that pass the evaluation but fall below the available budget in case additional budget becomes available.
  - The forms of grant and maximum reimbursement rates which will be offered are specified in Annex 3 to the Capacities work programme.
  - In case the budget of EUR 4 000 000 for the topic "INFRA-2008-3.1: ERA-NET" and of EUR 5 000 000 for the topic "INFRA-2008-3.2: Studies, conferences and coordination actions..." ...can not be consumed (totally or partially) the corresponding budget will be transferred to the Activity "1.1.1 Integrating Activities".

**3.2. Call 4 (call identifier: FP7-INFRASTRUCTURES-2008-2)**

- Date of publication<sup>1</sup>: 6 May 2008
- Deadline<sup>1</sup>: 11 September 2008, at 17.00.00, Brussels local time.
- **Indicative budget**<sup>2</sup>: EUR 20 million<sup>3</sup>
- Topics called

Line of action/Activity	Topics called	Funding scheme(s)	EUR million indicative
1.1 Support to existing research infrastructures			
1.1.2 ICT based e-Infrastructures	INFRA-2008-1.2.1: GÉANT	Combination of Collaborative projects and Coordination and support actions (CSA)	20.00
	INFRA-2008-1.2.2: Scientific Data Infrastructure		

- Evaluation procedure:
  - The general eligibility, selection and award criteria are set out in Annex 2 to this work programme.
  - Specific selection and award criteria are set out in section V.5.3 replacing those of annex 2.
  - A one stage submission procedure will be followed, with possible hearings.
  - Proposals may be evaluated remotely.
- Indicative evaluation and contractual timetable:
  - Evaluation results: estimated to be available within some 4 months after the closure date.
  - Contract signature: it is estimated that the first contracts related to this call will come into force early 2009.
- Consortia agreements: Participants are required to conclude a consortium agreement.
- Particular requirements for participation, evaluation and implementation:
  - The minimum number of participating legal entities required, for all funding schemes, is set out in the Rules for Participation.
  - Given the specific objective of the topic INFRA-2008-1.2.1: GÉANT, the proposal must be collectively submitted by legal entities operating the NRENs (National Research and Education Networks). Legal entities created by the NRENs to contribute to the deployment

<sup>1</sup> The Director-General responsible for the call may publish it up to one month prior to or after the envisaged date of publication. Also, at the time of the publication of the call, the Director-General responsible may delay this deadline by up to two months.

<sup>2</sup> The final budget awarded to this call, following the evaluation of projects, may vary by up to 10% of the total value of the call.

<sup>3</sup> Under the condition that the preliminary draft budget for 2008 is adopted without modifications by the budget authority. An amount from the 2009 budget is expected to be added to this call for which a new financing decision to cover the budget for that year will be requested at the appropriate time.

*FP7 Capacities Work Programme: Infrastructures*

of connectivity and services on a pan-European scale (e.g. DANTE, TERENA, NORDUnet) can also participate.

- The forms of grant and maximum reimbursement rates which will be offered are specified in Annex 3 to the Capacities work programme.
- A reserve list may be produced of projects that pass the evaluation but fall below the available budget in case additional budget becomes available.

#### IV. INDICATIVE PRIORITIES FOR FUTURE CALLS

The table below provide information about calls already published and indicative priorities for futures calls. Dates indicated for future calls are tentative call closing date.

<b>Activity</b>	<b>Call 1 (02.5.07)</b>	<b>Call 2 (20.9.07)</b>	<b>Call 3 (29.2.08)</b>	<b>Call 4 (11.9.08)</b>	<b>Call 5 (Autumn 2009)</b>	<b>Call 6 (Spring 2010)</b>	<b>Call 7 (Spring 2012)</b>
<b>Integrating activities</b>			81,1			X	X
<b>e-Infrastructures</b>	42	50		20	X	X	X
<b>Design studies</b>	31					X	
<b>Construction – support to the preparatory phase</b>	146,7					X	
<b>Support to policy development and programme implementation</b>	8	14	9		X	X	X
<b>Budget (M€)</b>	227,7	64	90,1				

Call N° 5 and 6 in 2009/2010 will address the following topics:

- INFRA-2009-1.2.x ICT based e-Infrastructures (grid infrastructures, virtual research communities)
- INFRA-2009-3.2 Studies, conferences and coordination actions supporting policy development, including international cooperation, for e-
- INFRA-2010-1.1.1 Integrating Activities in all scientific and technological fields
- INFRA-2010-1.1.2.x Integrating Activities to support the specific needs of thematic priority areas
- INFRA-2010-1.2.1 ICT based e-Infrastructures (scientific data infrastructures)
- INFRA-2010-2.1.1 Design Studies for research infrastructures in all S&T fields
- INFRA-2010-2.2.1.x Preparatory phase for research infrastructures
- INFRA-2010-3.1 Studies, conferences and coordination actions supporting policy development, including international cooperation, in all S&T fields

More detailed information will be provided in the 2009 edition of this work programme expected to be adopted during autumn 2008.

## V. COMPLEMENTARY INFORMATION

### 5.1. Integrating Activities under the targeted approach

Integrating Activities are implemented through a targeted approach to respond to the strategic research needs of the thematic priority areas of the Cooperation specific programme. They follow all the objectives and characteristics described under section II.1.1.1.

A consortium whose proposal falls under one of the priority topics listed below should apply under the targeted approach. All other topics are covered within the bottom-up approach. Integrating Activities should be comprehensive on a European scale. Therefore, competing proposals are not expected under the same topic. However, there will be competition between the various priority topics. This list of topics will be revised before future calls in subsequent editions of this work programme.

*Health-related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services, including e-services:

- **INFRA-2008-1.1.2.1:** providing access to human genotyping facilities;
- **INFRA-2008-1.1.2.2:** providing access to hadron therapy facilities for particle therapy research;
- **INFRA-2008-1.1.2.3:** providing access to high performance imaging (PET, MRI, SPECT) applied to clinical research on human pathologies;
- **INFRA-2008-1.1.2.4:** providing advanced support for the development of new vaccines;
- **INFRA-2008-1.1.2.5:** for the production of mouse Knock-Out mutants;
- **INFRA-2008-1.1.2.6:** based on databases and resources on cellular differentiation / developmental gene expression in mammals in support of systems biology approaches.

*Food, Agriculture and Biotechnology-related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services:

- **INFRA-2008-1.1.2.7:** enabling investigation of impacts of food on health, including development of tools for cross compatibility and networked usage, of standards and codes of practice;
- **INFRA-2008-1.1.2.8:** European diagnostic / test / validation infrastructure for animal diseases (including zoonoses);
- **INFRA-2008-1.1.2.9:** Biological Resources Centres (BRCs) for micro-organisms;
- **INFRA-2008-1.1.2.10:** Aquaculture facilities (inland, coastal, offshore), fisheries research vessels, equipments, data bases.

*Information and Communication Technologies-related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services, including e-services:

- **INFRA-2008-1.1.2.11:** for ICT experience and application research, based in particular on methods, tools and platforms to involve the user early in the R&D process;
- **INFRA-2008-1.1.2.12:** for nano-electronics and integrated micro-/nano-systems research, based in particular on networking of and trans-national access to clean rooms;
- **INFRA-2008-1.1.2.13:** for embedded systems research based in particular on sharing methods, tools and platforms for design, evaluation and testing.

*Nanosciences, Nanotechnologies, and Materials- related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services, including but not limited to the characterization, exposure and toxicology (human and environmental) of nano-materials:

- **INFRA-2008-1.1.2.14:** for nano-bio-technology, in particular for simulation, design and control of biomaterial structure and reactions at nano-level;
- **INFRA-2008-1.1.2.15:** for nano-materials research, linked with the European nanotechnology Action Plan, and in the context of a broad international cooperation.

*Energy-related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services, including the provision of advanced simulation models when appropriate:

- **INFRA-2008-1.1.2.16:** aiming at the development of the next generation bio-fuels;
- **INFRA-2008-1.1.2.17:** integrating European testing and analysis research infrastructure for hydrogen and fuel cell energy-chains;
- **INFRA-2008-1.1.2.18:** for ocean energy research;
- **INFRA-2008-1.1.2.19:** for concentrating solar power research;
- **INFRA-2008-1.1.2.20:** for research on Smart Energy networks, to develop advanced electricity networks architectures and/or for testing of power components.

*Environment (including Climate Change)-related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services, including e-services:

- **INFRA-2008-1.1.2.21:** establishing an European e-Infrastructure for earth system's understanding and modelling;
- **INFRA-2008-1.1.2.22:** for seismic engineering research and testing infrastructures;
- **INFRA-2008-1.1.2.23:** establishing an efficient network of hydrological observatories, river basin networks and databases, for water resources research;
- **INFRA-2008-1.1.2.24:** integrating, for efficient polar research, existing observation and monitoring stations in both Arctic and Antarctic regions;

*Transport-related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services:

- **INFRA-2008-1.1.2.25:** enhancing the test capabilities, quality and productivity of European wind tunnels of strategic importance;
- **INFRA-2008-1.1.2.26:** to establish a European capability on in-flight testing and research suitable to meet the RTD requirements for the next generation of air transport.

*Socio-economic Sciences and Humanities – related specific 2008 objectives:* to bring together existing research infrastructures to support the efficient provision of essential research services, including e-services:

- **INFRA-2008-1.1.2.27:** promoting European wide access to microdata sets of official statistics for research and leading to a European statistical system open to researchers;
- **INFRA-2008-1.1.2.28:** through the development, harmonisation and optimal use of indicators and data for economic and innovation research;
- **INFRA-2008-1.1.2.29:** developing improved access to historical archives and cultural collections for research purpose.

## 5.2. The Integrated Infrastructure Initiative (I3) model

Integrated Infrastructure Initiatives (I3) should combine, in a closely co-ordinated manner: (i) *Networking activities*, (ii) *Trans-national access and/or service activities* and (ii) *Joint research activities*. All three categories of activities are mandatory as synergistic effects are expected from these different components.

(i) *Networking activities*. To foster a culture of co-operation between the participants in the project and the scientific communities benefiting from the research infrastructure. Networking activities could include (non exhaustive list):

- joint management and pooling of distributed resources;
- strengthening of virtual research communities;
- development of common standards, protocols and interoperability, benchmarking;
- development and maintenance of common databases for the purpose of networking and management of the users and infrastructures;
- spreading of good practices;
- provision of consultancy and training courses to new users;
- foresight studies for new instrumentation, methods, concepts and/or technologies;
- promotion of clustering and coordinated actions amongst related projects;
- coordination with national or international related initiatives and support to the deployment of global approaches to science;
- dissemination of knowledge;
- internal and external communication.

(ii) *Trans-national access and/or service activities*.

*Trans-national access activities*. To provide trans-national access to researchers or research teams to one or more infrastructures among those operated by participants. These access activities should be implemented in a coordinated way such as to improve the overall services available to the research community. Access may be made available to external users, either in person ("hands-on") or through the provision of remote scientific services, such as the provision of reference materials or samples or the performance of sample analysis.

Community financial support should never exceed 20% of the annual operating costs of the infrastructure to prevent it from becoming dependent on the Community contribution and should not include capital investments. This financial support will serve to provide access "free of charge" to external users, including all the infrastructural, logistical, technological and scientific support (including training courses, travel and subsistence for users). Access costs will be defined on the basis of "user fees" related to the operating costs of the infrastructure.

The research infrastructures must publicise widely the access offered under the contract to ensure that researchers who might wish to have access to the infrastructure are made aware of the possibilities open to them. They must maintain appropriate documentation to support and justify the amount of access reported. This documentation shall include records of the names, nationalities, and home institutions of the users within the research teams, as well as the nature and quantity of access provided to them.

The selection of researchers or research teams shall be carried out through an independent peer-review evaluation of their research projects. The research team, or its majority, must

come from countries other than where the operator of the infrastructure is established (when the infrastructure is composed of several research facilities, operated by different legal entities, this condition shall apply to each facility) except in the case of a distributed set of resources or facilities offering remote access to the same services. Only research teams that are entitled to disseminate the knowledge they have generated under the project are eligible to benefit from research services to the infrastructure under the contract. The duration of stay at a research infrastructure shall normally be limited to three months.

*Service activities*

To provide specific research infrastructures related services to the scientific community. This may include:

- scientific services freely available through communication networks (e.g. databases available via Internet). Only services widely used by the community of European researchers will be supported. In such case, projects of potential users would not normally be subject to peer review. However, in such cases, the services offered to the scientific community will be periodically assessed by an external board.
- procurement and upgrading communication infrastructure, network operation and end-to-end services;
- Grid infrastructure support, operation and management; integration, test and certification; services deployed on top of generic communication and computing infrastructures to build and serve virtual communities in the various scientific domains;
- deployment, quality assurance and support of middleware component repositories;
- data and resources management (including secure shared access, global scheduling, user and application support services) to foster the effective use of distributed supercomputing facilities; federated and interoperable services to facilitate the deployment and wide use of digital repositories of scientific information.
- vertical integration of the different services in support of specific virtual research communities, including virtual laboratories for simulation and specific workspaces.

*(iii) Joint Research activities.* These activities should be innovative and explore new fundamental technologies or techniques underpinning the efficient and joint use of the participating research infrastructures. To improve, in quality and/or quantity, the services provided by the infrastructures, these joint research activities could address (non exhaustive list):

- higher performance methodologies and protocols, higher performance instrumentation, including the testing of components, subsystems, materials, techniques and dedicated software;
- integration of installations and infrastructures into virtual facilities, innovative solutions for data collection, management, curation and annotation;
- innovative solutions for communication network (increasing performance, improving management, exploiting new transmissions and digital technologies, deploying higher degrees of security and trust) and introduction of new end-to-end services (including dynamic allocation of resources and innovative accounting management);
- novel grid architecture frameworks and policies, innovative grid technologies, or new middleware solutions driving the emergence of high level interoperable services;
- advanced Service Level Agreements and innovative licensing schemes, fostering the adoption of e-Infrastructures by industry;
- innovative software solutions for making new user communities benefit from computing services.



### 5.3. Evaluation criteria for Integrating Activities and ICT based e-Infrastructures

#### 1. *Scientific and/or technological excellence (relevant to the topic addressed by the call) (award)*

- Soundness of concept and quality of objectives
- Progress beyond the state-of-the-art
- Quality and effectiveness of the methodology to achieve the objectives of the project, in particular the provision of integrated services.
- Quality and effectiveness of the Networking Activities and associated work plan. : The extent to which the co-ordination mechanisms will foster a culture of co-operation between the participants, and enhance the services to the users.
- Quality and effectiveness of the Trans-national Access and/or Services, and associated work plan. The extent to which the activities will offer access to state-of-the-art infrastructures, high quality services, and will enable users to conduct high quality research.
- Quality and effectiveness of the Joint Research Activities and associated work plan. The extent to which the activities will contribute to quantitative and qualitative improvements of the services provided by the infrastructures.

#### 2. *Quality and efficiency of the implementation and the management (selection)*

- Appropriateness of the management structure and procedures.
- Quality and relevant experience of the individual participants
- Quality of the consortium as a whole (including complementarity, balance, critical mass).
- Appropriate allocation and justification of the resources to be committed (budget, staff, equipment), by work package and participant.

#### 3. *The potential impact through the development, dissemination and use of project results (award)*

- Contribution at the European level towards structuring the European Research Area and optimising the use and development of the best research infrastructures existing in Europe.
- Appropriateness of measures for the dissemination and/or exploitation of project results and knowledge, for the management of intellectual property and for spreading excellence

#### Notes:

- Evaluation scores will be awarded for each of the three criteria, and not for the sub-criteria. Each criterion will be scored out of 5. No weightings will apply. The threshold for individual criteria will be 3. The overall threshold, applying to the sum of the three individual scores, will be 10.
- The second criterion corresponds to the **selection criteria** in the meaning of the financial regulations (OJ L248 16.9.2002, pl., article 115). It will be the basis for assessing the 'operational capacity' of participants. The remaining criteria and sub-criteria correspond to the **award criteria**.

#### **5.4. Risk-Sharing Finance Facility**

In accordance with Annexes II and III of the Specific Programme, the Community will provide a contribution to the European Investment Bank (EIB). This support will contribute to the Community's objective to foster private sector investment in research, technological development and demonstration (RTD) as well as innovation through a Community contribution to the Risk-Sharing Finance Facility (RSFF), a new financing instrument established by the European Investment Bank with the support of the EC.

Private investment in research and innovation in Europe is below the level necessary to achieve the ambitions of the Lisbon agenda and the Barcelona objective. In addition to grants, other mechanisms are being increasingly used to leverage private investment by firms, to mobilise the financial markets and to diversify funding sources for European RTD actions, including research infrastructures.

Improving access to loans for RTD actions requires public support to overcome market deficiencies for the financing of riskier European RTD actions.

#### **Approach**

Within the framework of a maximum contribution of EUR 1 billion for the period 2007-2013, the Community has provided its first contribution (Coordination and Support Action) to the EIB for RSFF for a maximum amount of EUR 200 million for the period 2007-2008, EUR 40 million of which coming from the Research Infrastructures Programme. The Bank is the sole beneficiary of this Community action. Pursuant to a decision by the EIB Board of Directors, endorsed by the Bank's Governors on 9 June 2006, the EC contribution will be matched by an equivalent amount from the EIB (up to EUR 1 billion). The Governors approved the immediate appropriation from the Bank's surplus of EUR 250 million for RSFF operations.

The level of the Community risk coverage for each operation shall depend on the financial risk evaluation carried out by the EIB. The level of total provisioning and capital allocation for the majority of RSFF operations is expected to fall within the range of 15%-25% of the nominal value of such operations. In no case shall the level of total provisioning and capital allocation amounts of the Community contribution exceed 50% of the nominal loan or guarantee value. There will be risk sharing under each operation, according to the methodology established in the Agreement to be concluded between the Commission and the EIB. The percentage of risk covered by the Community contribution for each operation will be variable and will depend, inter alia, on the risk grading of such operation as well as its maturity.

The co-operation agreement between the European Community (EC) and the European Investment Bank (EIB) in respect of the Risk-Sharing Finance Facility (RSFF) – the RSFF Co-operation agreement – was approved by the Commission (Commission Decision C(2007)2181 – 25/05/2007) and signed on 5 June 2007 by Commissioner Janez Potočnik and President Philippe Maystadt.

This Agreement, defines terms and conditions related to RSFF and, in particular, to the use of the Community contribution in RSFF, the risk-sharing methodology, the indicative annual budget, the reporting conditions, the governance, the rules for establishment of network of financial intermediaries in all Member States and associated countries and its relating conditions, etc.

As the interest builds up and financing applications emerge, the EIB has launched the appraisal of potential projects according to its usual rules and criteria.

### ***International Co-operation***

In accordance with the provisions of the Specific Programme, the EIB may only use the Community contribution to RSFF to cover risk of operations limited to those borrowers or beneficiaries of guarantees from legal entities from third countries other than Associated countries who participate in FP7 projects and whose costs are eligible for Community funding or, in the case of Research Infrastructures, if the beneficiary is able to demonstrate that either the infrastructure(s) ownership or operation(s) (will) involve independent legal entities in at least three Member States or Associated Countries, or the infrastructure(s) services are (will be) used or requested for use by research communities from at least three Member States or Associated Countries.

### ***Dissemination actions***

Throughout 2007 the EIB has carried out an intensive awareness raising campaign which has been launched with the Community financial assistance in 2006 (FP6 SSA). Awareness raising will continue, with special focus on the most research intensive sectors in Europe and, in the case of Research Infrastructures, on the ESFRI Roadmap.

RSFF will involve development of financial engineering solutions adapted to the needs of European research infrastructures. Such solutions will be implemented and tested by the EIB and its financing partners. Case studies of such solutions, i.e. risk-sharing arrangements with financing partners and new products developed specifically for RSFF will be published on the EIB dedicated RSFF web-site.

A workshop for representatives of the banking sector in Member States and Associated countries has been held in July 2007 to disseminate such financial engineering solutions and seek other co-operation opportunities. Initiatives of this kind will be continued in 2008, both at European and national level.

### ***Contacts with potential clients***

The launch of RSFF dedicated website and other awareness raising activities started in 2006 are expected to result in applications for financing from promoters of European research infrastructures. In parallel, the EIB loan officers will launch contacts with research infrastructures explaining the existence of new financing options made possible by RSFF.

RSFF will be offered in all Member States and Associated Countries in order to ensure that all legal entities, irrespective of size (including SMEs and research organisations, including universities) in all Member States and Associated Countries, may benefit from this facility for the funding of their activities in eligible actions. This will entail the identification by the EIB of at least one financial intermediary partner active in each Member state and Associated Country. While there is no reason to anticipate any difficulty in this regard, the attention of the Member States and Associated Countries is drawn to the fact that, in case of such difficulty arising (meaning, no financial intermediary partner interested to join EIB network for RSFF purpose), there will be a dependence on the best efforts of the Member states and Associated Countries themselves to ensure that there is no consequential damage to the interests of participants in their countries.

### ***Governance***

RSFF is managed by the EIB in accordance with its own rules and procedures, with due regard to terms and conditions of the RSFF Cooperation Agreement between the Commission and the Bank. RSFF implementation and in particular the use of the Community Contribution will be

supervised by a Steering Group, consisting of at least four representatives, at the Director level, from the Commission and the Bank respectively.

The Commission will continue to closely monitor the effective use of the Community Contribution, including ex-post assessments of the successful features of the action, and to regularly report to the Programme Committee. In addition, the Commission will include main findings in this respect to the annual report on research and technological development activities which it will send to the European Parliament and the Council pursuant to Article 173 TEC. In addition, and in compliance with the mid-term evaluation referred to in Annex II of the Framework Programme, the Commission will provide at that time a report containing information on the participation per type of legal entities, the fulfilment of the FP7 selection criteria, the kind of projects supported and the demand for the instrument concerned, the duration of the authorization procedure, the project results, and the funding distribution.

### **Selection of Projects for Financing and the Eligibility Criteria**

The EIB has been recognised as a beneficiary of the Community action in the Council and Parliament decision adopting the 7<sup>th</sup> Framework Programme. In accordance with the principles established in the Specific Programme the EIB will use the Community contribution on a "first come, first served basis," as provisions and capital allocation within the Bank to cover part of the risks associated with its operations supporting eligible research infrastructures.

The development of research infrastructures funded by the Community shall be automatically eligible. Other research infrastructures, located within or outside the territory of the European Union, shall be eligible if they demonstrate that their ownership or operation (will) involve entities in at least three Member states or associated countries and that their services are used or requested for use by research communities from at least three Member states or associated countries.

The EC contribution to RSFF may only be used to support activities which can be classified as "fundamental research", "industrial research" or "experimental development" as defined in the Community Framework for State Aid for Research and Development and Innovation. Prototypes and pilot projects, which are part of "experimental development", may be eligible if they fulfil the conditions specified therein. Innovation activities intended to prepare the commercial use of research results (such as training, technology management and transfer) are eligible if they are linked to and complementary to research, technological development and demonstration activities, the later constituting the bulk of any eligible European RTD action. Other innovation activities of a commercial nature are eligible for RSFF only via the use of the EIB's own contribution.

The RSFF Cooperation Agreement with the Bank comprises a list of investment costs consistent with the above mentioned definitions in the Community Framework for State Aid for Research and Development and Innovation.

The RSFF Cooperation Agreement with the Bank also comprises a list of exclusions from financing with support of the Community contribution, reflecting political agreement between the Commission; the Member States and the European Parliament as documented in the Seventh Framework Programme and the Specific Programme "Capacities".

### **The Commission Right to Object to the Use of the Community Contribution**

The Commission has a right to express its opinion on each and every financial operation proposed by the EIB to its Board for decision under (Article 21 of the EIB Statute). Where the Commission delivers an unfavourable opinion, the EIB Board may not grant the loan or guarantee concerned, unless it votes unanimously in its favour, the Commission nominee

abstaining. Should the Bank proceed with financing despite the Commission's negative opinion the Community contribution to RSFF may not be used. In accordance with Rules of Participation, the Commission may object, in duly justified cases, the use of the Community contribution for provisioning and capital allocation against a loan or a guarantee proposed by the EIB. If such a case arises the Commission may conduct an independent, internal or external, review of such a case.

Under the Capacities Programme, only the Research Infrastructures actions contribute to RSFF. In compliance with Annex II to the 7<sup>th</sup> Framework Programme, the Community financial contribution to RSFF from the Research Infrastructures actions of the Capacities Programme will be of an amount of up to EUR 100 million until 2010. This planning will be revised, and, if appropriate, adapted each year, taking into account the evolution of demand for RSFF operations and the results of the evaluation of the Council and the European Parliament under the procedure described in Article 7(2) of the 7<sup>th</sup> Framework Programme on the basis of a report by the Commission containing information on the participation of SMEs and universities, the fulfilment of the FP7 selection criteria, the duration of the authorisation procedure, the project results, and the funding distribution. The Community financial contribution to RSFF from the Research Infrastructures actions of the Capacities Programme may reach a maximum amount of EUR 200 million for 2007-2013.

### **Community Contribution to RSFF in 2007 and 2008**

In order to send a strong signal of the Community commitment to RSFF in line with the mandate from the Council the Commission has committed, in 2007, an amount of EUR 160 million for the period 2007-2008, of which EUR 40 million coming from the Research Infrastructures Programme. The first payment to the EIB was launched at the beginning of the summer 2007 for an amount of EUR 50 million, EUR 36 million of which coming from this Programme. In compliance with the provisions of the RSFF Co-operation agreement, an additional payment may be carried out before the end of 2007 according to the level of the demand. As far as the Research Infrastructures Programme is concerned the remaining payment appropriations for the period 2007-2008 is equal to EUR 4 million.

From 2009 on it is foreseen to proceed annually with an equal amount of commitment and payment of the Community contributions to RSFF, based on an the EIB's activity and forecast report and its request for the amount of the contribution estimated necessary for the following year. Following mid-term evaluation, however, the payment may be made in (several) instalments to ensure the maximum match between funds paid to the EIB and used for provisions and capital allocation.

### **Process for Recovering and Reallocating Unused Community Funds**

In order to mitigate the risk of accumulation of unused funds the multi-annual planning will be adjusted on the basis of reports including pipeline report (summary of information on projects considered for financing) and demand forecasts. Amounts committed but not paid to the EIB – i.e. not used for the operations of RSFF – will be reallocated to other activities of the contributing themes. The mid-term evaluation will include an external assessment of the impact of the RSFF.

Notwithstanding the above and unless the Council adopting the 8<sup>th</sup> Framework programme decides otherwise the Commission will recover from the Bank any unused funds of the Community contribution (including interest and income) which on the 31 December 2013 have not been used or committed to be used or are required to cover eligible costs.