

INFORMATION SUPPORT SYSTEM FOR RESEARCH PROJECTS IN THEMATIC AREA SUSTAINABLE DEVELOPMENT, GLOBAL CHANGE AND ECOSYSTEMS

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Abstract: The paper presents a review of the sustainable development issue, concerning the scientific research programmes, in Romania - MENER and in the European Union – Fp6 SUSTDEV priority. The authors focused on the information services offered by the CORDIS web page, destined to sustain writing successful project proposals, by interested groups of researchers from member states and candidate countries in EU. It was given a brief description of a Romanian web portal, ready to complete the existing information with local specific aspects, to host thematic forums and to contribute in creating a SUSTDEV research network in Romania, in the wider context of European Research Area.

1. INTRODUCTION

The concept of “sustainable development” is like motherhood and apple pie – everyone finds it a good thing. This is no surprise: How can one possibly be against economic and human development that meets “the needs of the present without compromising the ability of future generations to meet their own needs”?

The United Nations Conference on the Human Environment, held at Stockholm in 1972, was the first major international discussion of environmental issues. The meeting marked a polarization between the priorities of economic growth and environmental protection. This polarization has dominated the debate between rich and poor countries and between interest groups within countries for many years and – given the results of the Kyoto Climate Conference in December 1997 – is still not fully resolved.

The World Conservation Strategy promoted sustainable development in 1980, as did “The Global 2000 Report to the President” prepared under President Jimmy Carter. The concept eventually achieved world-wide recognition and credibility with the publication of “Our Common Future” (known as the Brundtland Report) in 1987, giving rise to an international consultation process that peaked in the 1992 U.N. Conference on Environment and Development in Rio de Janeiro.

The present paper presents an information system, like an instrument to sustain the access of Romanian researchers to the European financial funds, destined to accomplish the important goal of implementing a sustainable development model for human society.

2. SUSTAINABLE DEVELOPMENT IN ROMANIA

One important part of the Romanian National Research – Development and Innovation Plan is MENER – Environment, Energy and Resources. It is oriented to new technologies, systems and instruments for protecting and rational use of natural capital, in order to better achieve efficiency in production, distribution and use of energy and use of natural resources. The specific programmes are: Environment and climate factors; Risk management; Renewable, new and conventional energy; Nuclear energy; Mineral resources.

The total budget of MENER is about 1.2 mil. €

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Few representative SUSTDEV projects from MENER Programme are presented below:

1. Techniques drawing up and performing of measure, stocking and transmission of real time data automated equipment, also dedicated software for monitoring of air quality (radioactive and noxes at national and local level);
2. Micro division into zones of highly populated areas;
3. Ecological incinerating/ co-incinerating installation for wastes of elastomers, plastics, organic liquids, including municipal wastes;
4. Integrated seism metrical technologies of reinvestigation of detail morph-structures of common salt accumulations.

3. SUSTAINABLE DEVELOPMENT IN FRAMEWORK PROGRAMME 6

Within the Sixth Framework Programme (2002-2006) for research, technological development and demonstration (RTD), non-nuclear energy research is mainly funded under the "Sustainable Energy Systems" (SES) thematic sub-priority. The SES programme is implemented in two complementary parts:

- Research activities having an impact in the short and medium term. *The focus here is on integrated demonstration-type actions with a typical research component of up to about 20% and including, where appropriate, pre-normative research, energy technology integration, dissemination and technology transfer activities. The risks to be addressed are mainly technological and might include market related and financial issues. Projects funded under this part of the programme are managed by DG Energy and Transport;*
- Research activities having an impact in the medium and longer term. *The focus here is on research and development activities (including pre-normative and socio-economic research and the validation of technical and economic feasibility in pilot plants and prototypes), research-related networking activities, training and dissemination activities. The main risks to be addressed are scientific and technological rather than market and financial. Projects funded under this part of the programme are managed by DG Research.*

In the previously mentioned 6th Framework Programme, environmental research is mainly funded under the "Global Change and Ecosystems" (GCE) thematic sub-priority. Most of the research activities funded in the framework of "Global Change and Ecosystems" are building on previous and still ongoing activities supported within the Environment and Sustainable Development (ESD) Programme as part of the 5th Framework Programme.

The enlargement of the European Union in 2004 gives also the opportunity to enlarge the scientific cooperation. In fact, cooperation with East and Southeast European countries is essential to tackle topics in environmental research with a wider regional dimension such as climate change, biodiversity and water.

4. NATIONAL CONTACT POINTS FOR "SUSTDEV" PRIORITY

The NCP network is the main provider of advice and individual assistance in all Member States and Associated States. NCPs are national structures, established and financed by governments of the 25 EU member states and the states associated to the framework programme. NCPs give personalized support on the spot and in proposers' own languages. The NCP systems in the different countries show a wide variety of architectures, from highly centralized to decentralized networks, and a number of very different actors, from ministries to universities, research centers and special agencies to private consulting companies. This reflects the different national traditions, working methodologies, research landscapes and funding schemes. As the NCPs are national structures, the type and level of services offered

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may differ from country to country. In general, the following basic services will be available in accordance with the Guiding Principles agreed by all countries:

- Guidance on choosing thematic priorities and instruments;
- Advice on administrative procedures and contractual issues;
- Training and assistance on proposal writing;
- Distribution of documentation (forms, guidelines, manuals etc.);
- Assistance in partner search .

The NCP in Romania is, as mentioned using the search engine of the web site <http://www.cordis.lu/fp6/ncp.htm>:

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Sustdev NCP	Record Control Number: 17854 Update Date: 2004-08-25
Comment: Energy and Environment	
University 'Politehnica' Bucharest 313, Spl. Independentei RO-060032 Bucharest ROMANIA	Tel: +40-21-4029731 Fax: +40-21-4029675 Email: alex_marin@energy.pub.ro Programme acronym: FP6-SUSTDEV

5. INFORMATION SERVICES FOR WRITING PROJECT PROPOSALS

The Fp6 support services consist mainly on:

- **Commission Infodesks** The European Commission has set up dedicated infodesks by thematic priorities and research areas to supply information and assistance on FP6-related issues;
- **IGLO - Informal Group of RTD Liaison Offices** IGLO is an informal association of Brussels-based non-profit R&D Liaison Offices. The aim of IGLO is to facilitate and enhance the interaction, information exchange and co-operation between Members of IGLO, their national research systems and the European institutions on issues related to EU R&D, in particular, the Framework Programmes;
- **CORDIS Mini-Guide** makes the most of the service's many benefits.

Although Bulgaria, Cyprus, the Czech Republic, Estonia, Hungary, Latvia, Lithuania, Malta, Poland, Romania, Slovakia, Slovenia and Turkey have very good research capacities at their disposal, the building up of collaborations between EU researchers and their counterparts in the candidate countries has not yet reached a sufficient level. Part of the problem is believed to be the lack of sufficient knowledge in the research community. Closing this knowledge gap can help EU researchers to achieve a better integration with research capacities in the new Member States during the preparation phase for the next call.

For this reason the European Commission is offering a " Find-a-Partner Service ", which allows to better identify other researchers with complementary interests and also to advertise the own collaboration interests to others. More information can be obtained from the National Contact Points of these countries.

In order to help consortia to better understand research capacities in the candidate countries it was started creating a library with presentations, which have kindly been made available to the Commission. For the time being the library includes the following presentations:

- Jana Cejkova: Czech RTD landscape: Environmental issues.(PDF) ;

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- Eduardas Budrys: Environmental research in Lithuania: Priority topics, infrastructures, trans-national collaborations.(ZIP/PowerPoint, ~3.3Mb) ;
- Moira Dillon: Environmental research capacity in Malta;
- Joanna Basztura: Polish environment and research: Present state and enlargement challenges.(PDF) ;
- Viorel Vulturescu: Romanian RTD system and environmental research in Romania.(PDF) ;
- Ales Gnamus: Environmental and sustainable development research capacity in Slovenia.(PDF).

The CORDIS Partners Service is a free on-line tool designed to help organizations locate suitable partners for both EU funded and/or private collaboration.

The Partners working area is a storage unit in which can be stored profiles not yet submitted to the live service. The partners Service management fields contains:

Field Name	Field Content
Quality Validation Date	The date that the information was checked prior to loading on the host.
Record Control Number	A unique reference number for this record. It should be noted in the event of queries to the CORDIS Help Desk when these relate to a specific record. RCN= 40453
Update Date	The date this record was last updated.

A powerful search engine is available:

Sort order: by most recent first

Enter search term(s):

View and Select FP6 Activity Codes

Instrument*:
 Network of Excellence
 Integrated Project
 Specific Targeted Research Project
 Specific Targeted Innovation Project

Profile Type*:

Country*:
 Any Country
 Austria
 Belgium
 Cyprus

Search only organizations registered as SME

* Keep the control key pressed to make more than one selection

Search Clear

Details about how to use these services and about how to be informed in real time are given as follows:

Partners Service

- :: [Advertise your partnering needs by publishing your own online profile](#)
- :: [Update your existing profile online](#)

**Email Alert**

:: Use our [Email Alert Services](#) to be notified each time a profile relevant to your area of expertise is added to the Partners Service.

6. SOFTWARE IMPLEMENTATION OF THE INFORMATION SYSTEM

Following the general rules for creating software instruments for disseminating information, hosting forums and offering complementary services, we created and soon will be on-line a Romanian web site portal, looking as below:

**RO-Eco-Portal - The Environmental Sustainability.Info Source**

Home : Sustainability : Sustainable Development

the entire directory
 only this category
 [More](#)
[search options](#)

Categories:

Land Use Planning and Smart Growth@ (20)

Links:

- **NEW** [SciDevNet](#) - the Science and Development Network provides news, views and information about science, technology and the developing world (Added: Sun Sep 05 2004 Hits: 15 Rating: 0.00 Votes: 0) [Rate It](#)
- **HOT** [Encyclopedia of Sustainable Development](#) - is a one-stop source of information on sustainable development (Added: Mon Feb 18 2002 Hits: 1807 Rating: 7.00 Votes: 3) [Rate It](#)
- [Novartis Foundation for Sustainable Development](#) - aims to improve the quality of life of the poorest people in developing countries through programs & contributions to development policy discussions (Added: Mon Feb 25 2002 Hits: 113 Rating: 0.00 Votes: 0) [Rate It](#)
- [Planetizen](#) - a planning and development network providing news and information on jobs and events (Added: Wed May 12 2004 Hits: 30 Rating: 0.00 Votes: 0) [Rate It](#)
- [World Business Council for Sustainable Development](#) - a coalition committed to sustainable development; the organization pursues this goal via the three pillars of

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Headlines**

- 24/9/2004 -- [Russia takes first step on Kyoto ratification](#), International Herald Tribune
- 23/9/2004 -- [CALIF: Stakes High as State Targets Greenhouse Gas From Cars](#), LA Times
- 23/9/2004 -- [China puzzles over mountain of waste appliances](#), Reuters
- 23/9/2004 -- [Deforestation Exacerbates Haiti Floods](#), Associated Press
- 23/9/2004 -- [Despite bumper harvest, world's cupboard grows bare](#), Christian Science Monitor
- 23/9/2004 -- [EPA's chief under Nixon rips Bush on environment](#), Capital Times
- 23/9/2004 -- [Gene-Modified Grass Spreads Far, US Study Finds](#),

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economic growth, environmental protection and social equity
(Added: Wed Jan 03 2001 Hits: 290 Rating: 8.00 Votes: 4) [Rate It](#)

- [EUTP Environment and Sustainable Development \(ESD\)](#) - focuses on the interactions between human activities and the natural environment and their implications for the sustainable management of natural resources (Added: Sat Feb 23 2002 Hits: 845 Rating: 10.00 Votes: 1) [Rate It](#)
- [Sustainable Development Communications Network](#) - seeking to accelerate the implementation of sustainable development through broader, integrated information and communications about what we know (Added: Sun Feb 17 2002 Hits: 498 Rating: 5.67 Votes: 3) [Rate It](#)

Reuters
● 23/9/2004 -- [New UN Talks Bid to Save Fish, Plants and Timber](#),
Reuters
● 23/9/2004 -- [No sacrifice in power for Accord Hybrid](#), Globe and Mail
● 23/9/2004 -- [To boost US security, an energy diet](#), Christian Science Monitor

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The content of the web site will be improved with specific romanian interesting information, i.e. SUSTDEV R&D situation in Romania and perspectives until 2020.

7. CONCLUSIONS

Unless research activities and policies are stepped up to cut greenhouse gases and better promote the deployment of renewable energies, the world will have a huge energy and environmental crisis on its hands by 2030, predicts a study carried out by an EU consortium of research teams. The report entitled, “world energy, technology and climate policy outlook” (WETO) assesses the impact of individual energy projections, energy technology progress and climate change indicators on the future of global energy systems. The report estimates that if nuclear and renewable energies were implemented on a larger scale, the costs incurred in order to meet Kyoto targets could be reduced by 30 per cent. However, by 2030, nuclear and renewable energies will represent less than 20 per cent of EU energy supply, the report notes. In an effort, to turn this figure around, the new EU framework programme for research is driving forward initiatives focusing on renewable energy sources, fuel cells and hydrogen technologies. Indeed, over two billion euro has been allotted for research into sustainable development, global change and ecosystems over the next four years. The information system presented above will strongly sustain the access of Romanian researchers to these important financing resources and encourages them to integrate in the SUSTDEV European Research Area.

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- [1] The World Commission on Environment and Development: Our Common Future. Oxford University Press 1987, p. 8;
- [2] The Global 2000 Report to the President. Entering the Twenty-First Century. A Report prepared by the Council on Environmental Quality and the Department of State. Blue Angel Inc., Charlottesville 1981;
- [3] The World Commission on Environment and Development: Our Common Future. Oxford University Press 1987;
- [4] World Bank: Five Years after Rio. Innovations in Environmental Policy. Environmentally Sustainable Development Studies and Monographs Series No. 18, Washington, D.C. 1997, p. 21—50;
- [5] <http://fp6.cordis.lu/fp6/home.cfm>
- [6] http://www.environmentalsustainability.info/Sustainability/Sustainable_Development/