Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

## **NEWSLETTER I**

Index

The project

The Working Team

### Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

#### The Project

The framework of our project is the promotion and the enhancement of the dialogue between science and society in order to get a knowledge society where democracy is guaranteed from one side, and to set up a reserve of professionals, which will be able to contribute to the knowledge-based economic development from the other side.

In this background EUCLIDES – Enhancing the Use of Cooperative Learning to Increase Development of Science studies – was planned as a Comenius Multilateral project, financed by the European Commission in the framework of Lifelong Learning Programme.

The project wants to experiment an innovative teaching and training methodology, based on the Constructivism approach and on the Problem-Based Learning (PBL), through the use of ICT instruments. This methodology will be thought and developed for the study of scientific subjects and, during the project activities, it will be experimented in some European secondary schools, involving in the project: teachers, trainers, students, facilitators and tutors.

In Problem-based Learning, the traditional teacher and student roles change. The students assume increasing responsibility for their learning, giving them more motivation and more feelings of accomplishment, setting the pattern for them to become successful lifelong learners. Students involved in Problem-based Learning acquire knowledge and become proficient in problem solving, self-directed learning, and team participation. Studies show that PBL prepares students as well as traditional methods. PBL students do as well as their counterparts from traditional classrooms on national exams, but are in fact better practitioners of their professions. For these reasons the aims of the project are:

- → to elaborate an innovative training methodology, inspired to the Constructivism approach, focusing on Problem-based Learning (PBL), to make science studies more attractive
- → to create, develop and promote a new pedagogical and teaching approach for science studies, in which, after the introduction of a science argument, students should still be decision makers working together to address such tasks as:
- ⇒ determining claims and counterclaims
- ⇒ finding commonplaces
- ⇒ developing shared definitions
- ⇒ creating resource banks
- ⇒ sharing and articulating perspectives
- ⇒ engaging in exploration of claims and counterclaims
- ⇒ evaluating results
- → to implement science programs in many forms, such as:
- ⇒ learning materials
- ⇒ science curricula
- ⇒ online events and courseware
- → to provide teacher and students new tools and instruments (ICT) to teach science through PBL
- → to promote into the institutions and into the educational systems of the involved countries a new pedagogical approach for the study of sciences, based on the Collaborative learning method and on the PBL through the use of ICT. Some of the project expected results will be:
  - 1. A Report on the constructivist method and PBL with the definition of the application criteria in sciences
  - 2. A Technical report on the planning of the learning environment with software
  - 3. The Online virtual learning environment for PBL activities
  - 4. The two Curricula "Environmental science: an approach to the climate modification" and "Natural science: trend analysis of natural resources"
  - 5. The Teacher's Guidelines to adopt PBL method in class
  - **6.** A Video Documentary on the diffusion of the results of the project

All those products will be downloadable or reachable through the project web-site www.edu-projects.eu/euclides

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

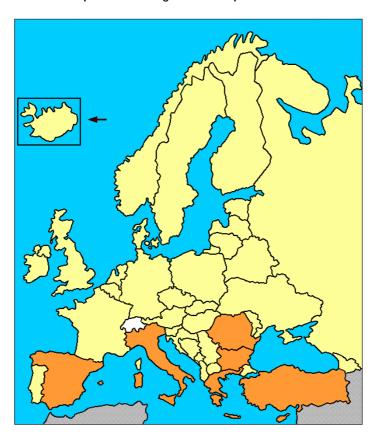




This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

## The Working Team

The EUCLIDES consortium is made of 11 partners coming from 7 European countries.



Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

#### **Project Coordinator**

Centro Studi e Formazione Villa Montesca - CSFVM

Città di Castello, Perugia – Italy



Centro Studi e Formazione Villa Montesca is a non-profit organisation which develops innovative educational initiatives and offers a broad spectrum of multi-disciplinary research expertises and training activities. The Centre is located in Città di Castello (Perugia), in the central Italy and has an international reputation for excellence for research and training in the following areas: environmental economy, management, accountability and policy, training for trainers, ITC; education in the context of European integration and regional co-operation, co-operation in the field of education and culture on local, regional and European level. For these reasons, the Centre plays a key role in the field of education and culture on local level, expecially for its experiences in school management and evaluation of the teaching and learning processes; in the national management of interdisciplinary research and training in co-operation with the Universities; in the field of international research and vocational training, expecially because the Centre has established a school and university networks and has advanced partnerships with many institutions to promote and implement European and international projects. The Centre provides the infrastructure support to encourage and co-ordinate interdisciplinary research and training projects in partnership with Universities (University of Perugia, University Cà Foscari of Venice among the others). It has extensive experience of managing inter-disciplinary project teams with researchers from within the University and also from external bodies.

### Role in EUCLIDES - main tasks:

- Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- ⇒ Realization of the Research study on the PBL
- Realization of the Research study on the definition of the ODL On-line Environment
- ⇒ Definition of the ODL on-line learning environment
- Realization of the guidelines for the teachers (on-line and paper based version)
- Realization of the e-curricula PBL based
- ⇒ Experimentation and dissemination of the guidelines
- Experimentation and dissemination of the E-curricula with the students
- Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives
- ⇒ Organization of a project meeting

WEB-SITE www.montesca.it

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

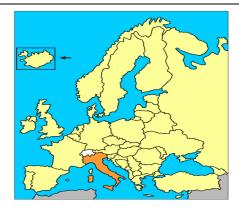
134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

### Partner Provincia di Perugia

### Perugia - Italy



The Province of Perugia is located in the centre of Italy and is the bigger one of the two provinces of the Umbria Region. Its territory extends for 6334 kmg, and in its surface resides 73,4% of Umbrian population: 606.000 inhabitants.

The Province of Perugia is a Local Authority with statutory, normative, organisational, administrative and financial autonomy. At the present the Provincia has 968 employees. Its final budget for the 2004 is 195.924.000,00 euro.

It is an organization intermediate between Region and 59 Municipalities. It has a complex organisation and divides in six areas coordinated by a General Direction. The areas are concerned with: building; road conditions; environment; economics, cultural and social activities; work, training, education and internalization of factories; staff, communication, budget and financial services. Very important are the competences and the duties in the field of vocational training.

#### Role in EUCLIDES - main tasks:

- Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- ⇒ Realization of the guidelines for the teachers (on-line and paper based version)
- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- ⇒ Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives

WEB-SITE www.provincia.perugia.it/formazione

### Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



his project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

#### Partner Centre for Educational Initiatives Association (CEI)

## Sofia – Bulgaria



Center for Educational Initiatives (CEI) is a non-governmental, non-profit association aimed at enhancing innovative educational initiatives and facilitating educational reforms through co-operation between institutions on regional and European level. The main objectives of the CEI are: (1) To assist in the improvement of the quality and cost-effectiveness of the educational reform process in Bulgaria on civil and public administration level in the context of European integration and regional co-operation initiatives in the region; To support the development of educational instituting into enhanced contributors to societal building, especially with regard to democracy, human rights, and minority rights; (2) To elaborate and implement different initiatives promoting the restructuring and modernization of curricula and syllabi, methodology, school management and evaluation of the teaching and learning process; (3) To facilitate co-operation in the field of education and culture on local, regional and European level, acting as a clearing house to provoke dialogue and enhance co-operation between the state, society, NGOs and school actors on all levels, including the establishment and enlargement of school and university networks.

The field of expertise of CEI is: (1) Analysis of textbooks; (2) Development of curricula; (2) Training and consultancy; (4) Organization of conferences, seminars and workshops; (5) Informational campaigns; (6) Developing of teaching / learning materials; (7) Educational surveys; (8) Promotion of innovative practices; (9) Approbation of teaching materials and developed curricula; (10) Organization of public discussions and debates; (11) Intercultural activities and initiatives.

#### Role in EUCLIDES - main tasks:

- Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- ⇒ Realization of the Research study on the PBL
- Realization of the Research study on the definition of the ODL On-line Environment
- ⇒ Definition of the ODL on-line learning environment
- Realization of the guidelines for the teachers (on-line and paper based version)
- ⇒ Realization of the e-curricula PBL based
- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- ⇒ Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives
- ⇒ Organization of a project meeting

WEB-SITE http://uni-sofia.bg/faculties/diuu/index.html

### Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

Partner Department of Information and In-Service Training of Teachers – DIUU

Sofia – Bulgaria



The Sofia University Department of Information and In-service Training of Teachers (DIITT) has more than 50 years of experience in research into different areas of education, design and delivery of all sorts of high quality innovative in-service training courses for teachers. It is specialised in syllabus design and delivery of in-service courses for teachers of all subjects from all types of pre-primary, primary and secondary schools in the country. The training in question aims to:

- ⇒ develop the professional competence of pedagogical staff;
- orient teachers in the common tendencies of educational strategies in the European countries;
- help teachers and school principals assume new responsibilities as well as master and apply new modern educational technologies;
- respond to personal and professional interests of pedagogical staff and assist their professional development.

It provides continuing training in modular, face-to-face or distance format and a highly interactive and creativity-provoking mode of delivery through programmes for updating and upgrading teachers' professional competences and skills in all subjects taught at Bulgarian schools. It trains 12000 teachers annually.

The DIITT consists of four chairs:

- ⇒ Humanities and Civic Education Chair
- ⇒ Natural and Mathematical Sciences and Technologies Chair
- ⇒ Pre-school and Primary Education Chair
- ⇒ Pedagogy, Psychology and Education management Chair

The training staff at DIITT consists of 61 people, 23 of which have an academic rank (Professor, Assoc. Professor or Assist. Professor).

The DIITT has several information resources:

- ⇒ Pedagogical Library
- Resource Center for Preparation and In-service training of Teachers of English founded by the British Council
- Francophone Center for Documentation and Information (CFDI) founded with the help of the French Cultural Institute

### Role in EUCLIDES - main tasks:

- ⇒ Realization of the Research study on the PBL
- Realization of the guidelines for the teachers (on-line and paper based version)
- ⇒ Experimentation and dissemination of the guidelines
- Experimentation and dissemination of the E-curricula with the students
- Monitoring and evaluating of the project activities
- Realization of the national report on the projects results
- Dissemination and exploitation of the project results and objectives

WEB-SITE http://uni-sofia.bg/faculties/diuu/index.html

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



his project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

### Partner Università degli Studi di Perugia – SSIS Perugia

## Perugia – Italy



SSIS of Perugia is a University School of Specialization, instituted by MURST (Ministry of University, of Scientific and Technological Research) in 1998.

The mission is to professionally train secondary school teachers. This is realized by following those rigorous qualitative criteria that have been developed overall European Institutions with an expertise in training scholastic staff at their first working experience.

SSIS, in line with its professional competence, supplies post-degree students with the necessary legal requirements that entitle them to enter the scholastic world: the Specialization Diploma, achieved with the Final Exam, allows students to legally practice the teaching profession – with it, SSIS students can enrol themselves at the permanent teaching list of the Education Ministry with an acknowledgement of 30 marks (DM February 12th 2002).

SSIS on-line project started on 2000. The on-line courses are based on a blended model (presence and on-line lessons), characterized by interactivity and collaborative didactic model.

Every virtual classroom is made up by 25 students, assisted by a tutor. On-line teaching is based on three different models, in according to the specifications of the subject: SELF-LEARNING MODEL, ASSISTED LEARNING, COOPERATIVE LEARNING.

#### Role in EUCLIDES - main tasks:

- Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- Realization of the Research study on the PBL
- Realization of the Research study on the definition of the ODL On-line Environment
- ⇒ Definition of the ODL on-line learning environment
- Realization of the guidelines for the teachers (on-line and paper based version)
- Realization of the e-curricula PBL based
- ⇒ Experimentation and dissemination of the guidelines
- Experimentation and dissemination of the E-curricula with the students
- Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives

WEB-SITE www.unipg.it

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

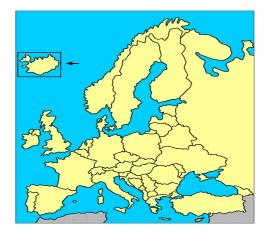
134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

### Partner IMCS Intercollege Ltd

Nicosia - Cyprus



Intercollege (www.intercollege.ac.cy) is the largest private institution in Cyprus with over 5000 students. It is an independent, coeducational, equal opportunity institution of higher education, which offers a wide range of programs to students from around the world. The College offers undergraduates studies in business, science, education and the liberal arts, as well as professional programs. Postgraduate programs have a strong social science emphasis and are currently offered in international relations, psychology, sociology, education, special education and business. International in philosophy, the College hosts students from all over the world, in a multicultural learning environment, promoting friendship, cooperation and understanding. The College pursues excellence in education through research and high teaching standards, in a continually improving academic environment. The College is adopting a dynamic and proactive strategy on research and wishes to reach out to all its stakeholders and to work with them in developing ideas for academic and applied research to better the Cyprus community, country and region. Within these parameters and taking a proactive role in research the college is involved both at the EU and local level.

#### Role in EUCLIDES - main tasks:

- Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- ⇒ Realization of the Research study on the PBL
- ⇒ Realization of the Research study on the definition of the ODL On-line Environment
- ⇒ Definition of the ODL on-line learning environment
- Realization of the guidelines for the teachers (on-line and paper based version)
- Realization of the e-curricula PBL based
- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives

WEB-SITE www.intercollege.ac.cy

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

## Partner Confederacion Española de Centros de Enseñanza

## Madrid - Spain



The CECE is a non-profit employers' organization founded in 1977 that represents an ample educational sector in Spain. It has branches all over the Autonomous Communities via Federations and Associations in numerous provinces of Spain. Each one of the federations represents teaching centres within regulated and non-regulated sectors.

The ITE-CECE is an investigation and management institute. This Institute was created by an agreement in co-operation with the Ministry of Education to provide training for all the staff implicated in the Educational sector. It comprises the following departments to respond to the necessities of the sector: Training, Quality, ICT and European

The main ambition of the training department of the ITE of the CECE is to provide continuous training to different levels of private education sector: Maternity, Primary, Secondary, Professional education and non regulated education.

CECE provides training for teachers in very concrete and different subjects

### Role in EUCLIDES - main tasks:

- ⇒ Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- ⇒ Realization of the Research study on the PBL
- Realization of the Research study on the definition of the ODL On-line Environment
- ⇒ Definition of the ODL on-line learning environment
- Realization of the guidelines for the teachers (on-line and paper based version)
- ⇒ Realization of the e-curricula PBL based
- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives

WEB-SITE WWW.CECE.ES

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

Partner Grup Scolar Tehnic de Transporturi Cai Ferate



lasi - Romania

The Technical High School of Railway Transports is situated in north-eastern Romania, in lasi and was founded in April 1970. In 1987, only 86 students graduated our high school. 13 years later, in 2000, 201 students graduated from the high school and 88 from the vocational school. In its first year, the Technical High School of Railway Transports offered a limited number of specializations for the railway: engine driver for the maintenance of wagons and railways engines, engine driver for the maintenance of the railway equipment. Nowadays, our school offers courses in the electrotechnics, transportation and telecommunications fields. The Technical High School of Railway Transports offers 3 levels of training in the technical field:

- A. Vocational High School (telecommunication technician, IT technician, construction design technician)
- B. Vocational School (electro mechanic and mechanic worker)
- C. Postgraduate School (auto mechanic foreman)

The Technical High School of Railway Transports is one of the 12 technical high schools of railway transports in Romania. Our students come from all over the eastern Romania. There are 1000 students, 70 teachers, 38 auxiliary personnel. There are 1000 students, 70 teachers, 38 auxiliary personnel. Besides the school building, there are also 2 student hostels, a refectory, a gym hall and the school workshops. In the main building, there are 36 classrooms including 2 Computer Science labs, 5 transports labs, 2 Physics labs, a Chemistry lab, a Biology lab and Mediatech room.

Our students have won over 100 prizes in technical and general contests and competitions, 20 prizes in sports competitions (football, handball, basketball, volleyball, and chess).

We participated in 16 European projects (Leonardo da Vinci, Comenius 1.1, Comenius 1.2, Comenius 1.3, Comenius 2.1 projects) having partners from all over Europe and we won 3 prizes for the final products of Comenius 2.1 and Comenius 1.3 European projects.

Finally from 22 April 2008 we have the European School Certificate, accorded by Ministry of Education in a official festivity in the Parliament Palace for all our activity in our projects.

#### Role in EUCLIDES - main tasks:

- ⇒ Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents
- ⇒ Realization of the Research study on the PBL
- ⇒ Realization of the Research study on the definition of the ODL On-line Environment
- ⇒ Definition of the ODL on-line learning environment
- Realization of the guidelines for the teachers (on-line and paper based version)
- Realization of the e-curricula PBL based
- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- Monitoring and evaluating of the project activities
- Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives

WEB-SITE http://liceulcfr.is.edu.ro/

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



his project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

### Partner Casa Corpului Didactic Iasi

lasi - Romania



Casa Corpului Didactic Iasi (Teacher Training Centre) is a centre of resource, innovation and examination in the continuous formation of the didactic staff, center of development and implementation of preuniversitary teaching reform through specific means, initiation center and organizing scientific and cultural activities, editing.

CCD has 1 branch office, 31 centers of information and documentation and a publishing house:

- The branch office of CCD in Pascani ensures the continuous formation of the teachers in the area of Pascani. In the institution also functions an information/documentation centre which offers schools programs, new publications and books for different specialties.
- Information /documentation centers in 31 villages in the county of lasi throughout which we offer the teachers from the area the possibility to have access to modern and new informative materials.
- "Spiru Haret" Publishing House, specialized in pedagogy books and school bibliography, publishes papers that satisfy the interest of teachers, of pupils, of students, of parents and of everyone interested in this field of activity.
- The magazine "Univers Didactic", edited in collaboration with the County Schools Inspectorate of Iasi, publishes in its pages materials on the theme of the educational reform (national priority), pedagogical research, innovations and studies.

#### Role in EUCLIDES - main tasks:

- ⇒ Realization of the Research study on the PBL
- Experimentation and dissemination of the guidelines
- Experimentation and dissemination of the E-curricula with the students
- ⇒ Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives

WEB-SITE www.ccdis.ro

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



his project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

## Partner Bolu II Milli Egitim Müdürlügü

Bolu -Turkey



Our institution, Bolu Province Directorate of National Education works under the Turkish Education Ministry and conducts the services of administration, personnel, education, in-service training of teachers and other staff, the training of teacher candidates, budget, investments, investigation and guidance in educational institutions that are subsidiaries of the Ministry of Education. The main departments of our institution are Education and Student Affairs, Computers and Examination Services, In-service Training, Culture, Appointment, Apprenticeship and Mass Education, Budget- Investments and Facilities, Employee and Record, Private Schooling and Guidance, Civil Defence Services, Preschool Education, Physical Education and Sports, Service for Teachers and Social Operations, Scholarships, Health Issues, Mass Education, Investigation-Planning and Statistics, Educational Tools and Equipment, Archive and Administration, Press and Public Relations. The department to conduct the project is In-service training department, who has done "Intel Education for the Future Program, Microsoft Education of Teachers, Website Design Courses, Test Bank Project and SBEP (Support to Basic Education Program)." Our city is 12th city in Turkey in approved EU projects. - Recognition analysis of the best practices on the sector of the Problem Based Learning and on the development of ICT contents

### Role in EUCLIDES - main tasks:

- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- ⇒ Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives
- ⇒ Organization of a project meeting

WEB-SITE http://bolu.meb.gov.tr

Enhancing the Use of Cooperative Learning to Increase Development of Science studies

134246-LLL-1-2007-IT-COMENIUS-CMP



This project has been funded with support from the European Commission. This publication reflects the views only of the author, and the Commission cannot be held responsible for any use which may be made of the information contained therein.

## Partner University of Crete - Natural History Museum of Crete

Iraklion - Crete - Greece



The Natural History Museum of Crete (NHMC) was established as a department of the Faculty of Science of the University of Crete. NHMC pursues interest in:

- basic and applied research for the protection and conservation of the natural environment, of its biodiversity and of its endemic or rare forms of life. NHMC has spread its main scientific research in Greece and also all over the eastern Mediterranean area.
- management and conservation of the Greek natural ecosystems, especially of those that are threatened by human impact. In NHMC's library, complete databases on the Cretan and Aegean natural environment are available, while in its photographic archive, rich slide and printed material is housed.
- development of botanical, zoological, geological and paleontological collections.
- life long learning for public environmental awareness and sensitivity. In the Museum permanent exhibition halls and under a regular basis, several educational activities are carried out, such as special interactive programs for schools, children, youth, families and adults, seminars for teachers, lectures, art and crafts and workshops. In parallel, printed and electronic material, exclusively for the environmental education of the elementary and secondary school, is produced today.

In the new installations of Museum's permanent halls, in the city of Iraklion, a Discovery Center for children and the Hall of Temporary exhibitions are open now to the public. In 2008 all the other exhibition halls of the Museum will open. In these halls realistic models of ecosystems, and plenty of animal and plant collections, will be exhibited. In the fossil, rock and mineral galleries, one will be informed on the impressive geological past of Crete and the Mediterranean area, while in two other special halls, the evolution of mankind and the ancient Minoan environment, will be also demonstrated.

#### Role in EUCLIDES - main tasks:

- ⇒ Experimentation and dissemination of the guidelines
- ⇒ Experimentation and dissemination of the E-curricula with the students
- Monitoring and evaluating of the project activities
- ⇒ Realization of the national report on the projects results
- ⇒ Dissemination and exploitation of the project results and objectives
- Organization of a project meeting

WEB-SITE www.nhmc.uoc.gr