Project title	Management of the Mediterranean & Black Sea Basins							
Name of legal entity	Countries	Overall project value (EUR)	Proportion carried out by candidate (%)	No of staff provided	Name of Client	Origin of Funding	Dates [start/end]	Name of partner(s) [if any]
Epsilon International SA	GREECE, TURKEY BULGARIA, EGYPT, GERMANY	2,300,000	40 %	12	European Commission	European Commission	Jan 1999 – Dec 2003	NTUA (GR), TUM (D) PBS (D), UNV. IZMIR (TR), UNV. ALEXANDRIA (EG)

Project Description

Type of Services Provided [Outlined]



The Mediterranean & the Black Sea Basins research project:

- (1) Establishes a network of Mediterranean & Black Sea scientific organisations on state-of the-art GIS technologies as remote sensing and mathematical modelling integrated in a GIS database for the control and surveillance of Mediterranean & Black sea basins and the estimation of NPS pollution impacts,
- (2) Establishes a methodology assisting in integrated coastal zone management for the sustainable use of water resources in the relevant countries.
- (3) Delivers a GIS s/w for the extension of the existing database and provides technology transfer Non EC Member Mediterranean & Black sea countries.
- Major deliverables of NPS project are: (1) A software package in standard ARC/INFO GIS format to the EC for the extension of existing databases, (2) A software platform and ARC/INFO for test areas of partners, (3) MED-NPS methodologies and technologies used in an extended format for Mediterranean application, (4) Dissemination and information material.
- GIS MED mathematical modelling: ARC/INFO (raster & vector, GRID module) on PC and UNIX workstation; application and calibration of hydrodynamic models; calculation of total runoff loads.
- Database development, data storage and delivery: Data stored in a database and linkage to ARC/INFO. Remote sensing analysis (SPOT, TM, ERS-1) analysis that precisely defines land-use types, runoff parameter, water quality parameters etc. vectored as input to the database. Models and software interacted with database.
- Quality parameters database: Identification, definition and quantification of eight dominant water quality parameters such as total suspended soils, total nitrogen, total phosphorus, BOD, faecal colliform, total organic carbon etc. Design of a relational database.
- Land-use recognition & classification via remote sensing: Test of methodology in selected watersheds using satellite data and field data; total climatic and water quality data analysis for the watersheds. Land use pattern recognition, classification and simulation in watershed and coastal zone via digital satellite image processing.
- Workshops, training, networking, dissemination: Seminars and workshop organisation in different countries involved and information dissemination.
- Control measures, surveillance and closure: Formulation of strategies and control measures for sustainable use of water resources, design database extension.

Tasks

- Monitoring and modelling
- Production of hydrodynamic and other information
- Cataloguing of the information for future use and planning
- Provision of flood inundation maps for visualising flooding
- Analyses in an integral way large catchment basins and Mediterranean waters
- Contribution to other integrated Mediterranean management actions (MAP-UNEP, MEDNET etc.) and EC programmes (MEDSPA, MED CAMPUS, MED URBS).
- Dissemination of information