

# UTILISING GIS TO MEET THE EXPECTATIONS OF THE LOCAL COMMUNITY

Anna Spiteri and Dirk De Ketelaere  
 Integrated Resources Management (IRM) Co Ltd., Malta

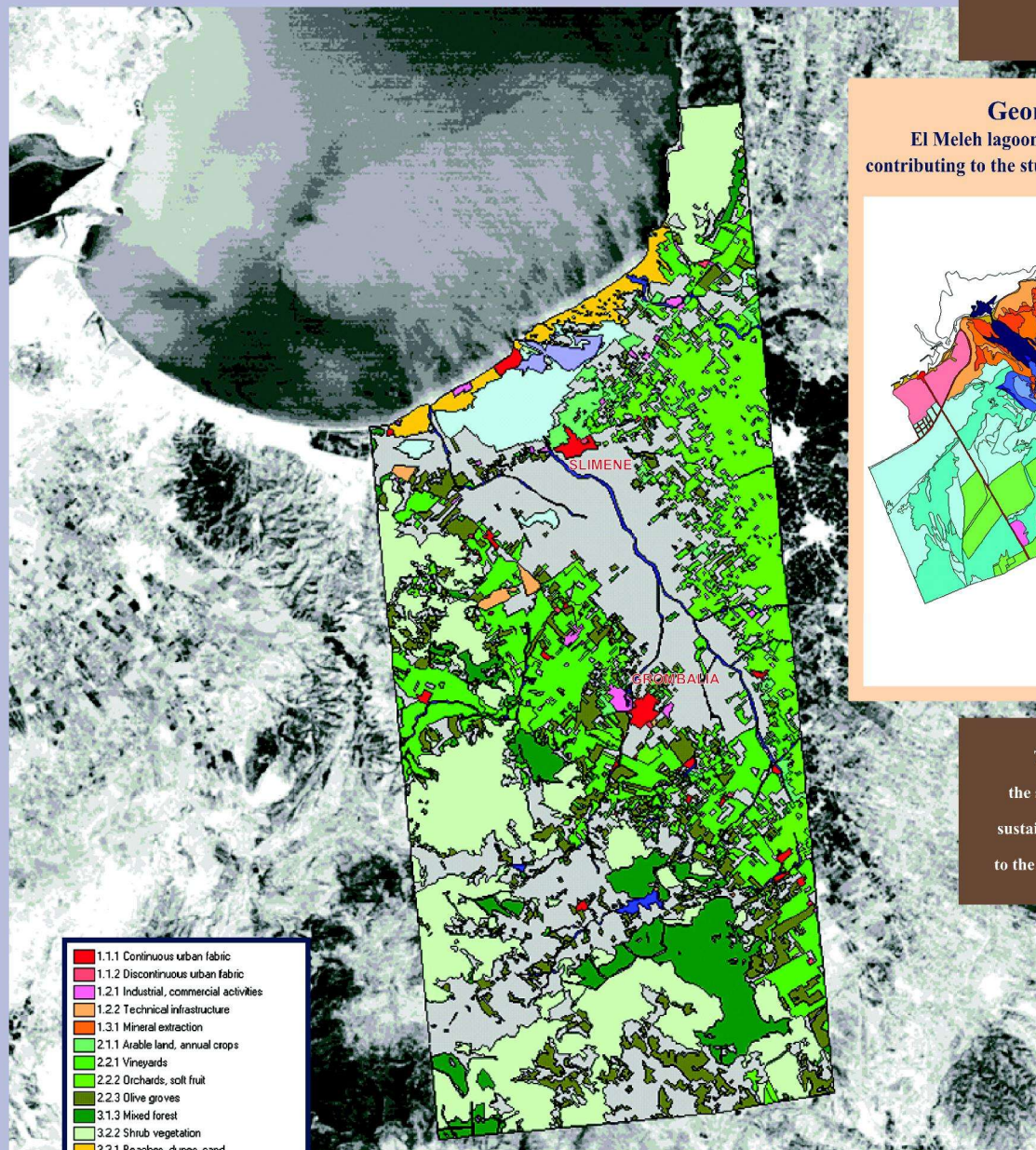
Scientific Coordinators of COLASU<sup>1</sup>, an EU sponsored FP5 research project

## Poster 1: El Meleh Lagoon, Tunisia / Poster 2: Nador Lagoon, Morocco

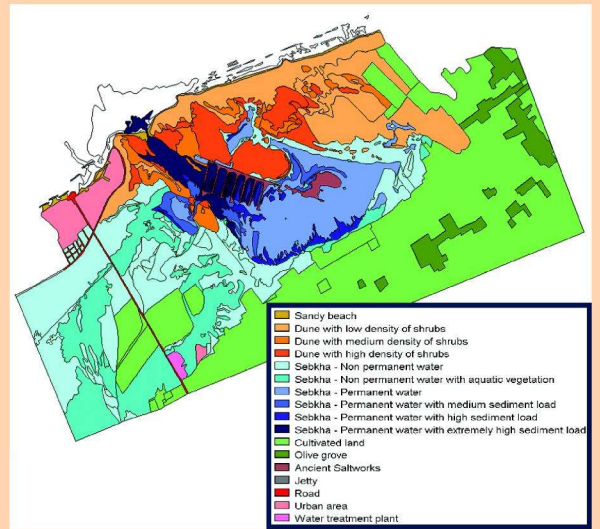
### Corine Level 3 Landuse-Landcover

Oued El Bey catchment based on 1:25000 Topographic Maps, 1983 and coastal dynamics from Landsat7 ETM, band 1 equal linear avg3x3, 19 June 2002

Field and desk data on El Meleh lagoon established links between anthropogenic activities, the occurrence of heavy metals and their harmful effects on the ecosystems.

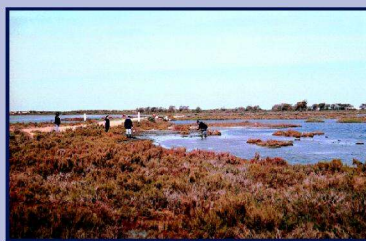


### Geomorphology base map El Meleh lagoon from 1:10000 Aerial Photographs, 1996 contributing to the study of future evolution scenarios of the lagoon



The GIS database enabled interpretation at the site specific and the catchment scale, leading to sustainable management recommendations of interest to the municipality of Slimene, and other stakeholders.

- 1.1.1 Continuous urban fabric
- 1.1.2 Discontinuous urban fabric
- 1.2.1 Industrial, commercial activities
- 1.2.2 Technical infrastructure
- 1.3.1 Mineral extraction
- 2.1.1 Arable land, annual crops
- 2.2.1 Vineyards
- 2.2.2 Orchards, soft fruit
- 2.2.3 Olive groves
- 3.1.3 Mixed forest
- 3.2.2 Shrub vegetation
- 3.3.1 Beaches, dunes, sand
- 3.3.2 Open spaces with little or no vegetation
- 4.2.1 Salt marshes
- 5.1.1 Watercourses
- 5.2.1 Coastal lagoons



	CAMPAIGN	SAMPLE TYPE	SITES	SAMPLES
E	Summer 2002	Lagoon water	17	17
		Lagoon sediments	9	18
M	Winter 2003	Lagoon water	34	34
		Lagoon sediments	14	20
		Soils	9	17
		Organics	9	9
E	Summer 2003	Microfauna	14	20
		Lagoon water	24	24
H	Summer 2004	Lagoon sediments	8	8
		Microfauna	8	8
	Summer 2004	Lagoon water	6	6

(<sup>1</sup>) Sustainability of Mediterranean coastal lagoon ecosystems under semi-arid climate INCO-Med Project ICA3-CT-2002-10012 (2002-2005) www.colasu.com

