



MANGALORE UNIVERSITY
DEPARTMENT OF MARINE GEOLOGY
MSc GEOINFORMATICS

GIP 456: GEOGRAPHIC INFORMATION SYSTEMS AND DBMS (LAB S)

Course Outcome:

CO1: The knowledge gained in the field of GIS can be used to integrate various kinds of spatial and non spatial data.

They will get jobs in many Govt. agencies like ISRO, IIRS, NRSA, WIPRO and lot of private companies of GIS in Bengaluru and Mangalore. And also can join teaching field in degree or engineering colleges

Georeferencing – image rectification based on co-ordinate system. Onscreen digitization

GIS and Remote Sensing data integration: Integration of vector and raster data (linking of spatial and non - spatial data)

Extraction of Thematic maps: preparation of thematic layers-onscreen from toposheets, images- Road, Settlement, Drainage, LULC

Map composition and presentation of results Overlay and proximity analysis- clip, erase, intersect, union, buffer

Edge matching/ spatial adjustment Calculation of slope in degrees and percentages. Calculation of area, perimeter and distance using ArcGIS

Creation of 3D maps: TIN, Hillshade, slope, Aspect with ArcGIS

Outlines of DBMS and Application of DBMS in Geoinformatics.

Introduction to SQL and its application in Geoinformatics. SQL Queries (Alter, Insert, Update, Delete).

Outlines of Visual Basics 6 and application with data storage in Geoinformatics.