

Expedition Mapping Unit

- GISci for fieldwork & expeditions
- Key weblinks

Information

About GIS: from ESRI.

<http://www.gis.com/whatisgis/index.html>

About remote sensing -

<http://rst.gsfc.nasa.gov/>; see also: <http://www.rspso.org>

"Where in the World are we?" – one of the clearest guides to map datums and co-ordinate systems.

<http://www.linz.govt.nz/docs/topography/projects-and-programmes/newsletter/witwaw.pdf>

Free GIS Tools: Website with many handy GIS tips and tricks covering a wide range of software and data packages.

<http://freegeographytools.com/>

Software

GPS Utility: download / upload data with most GPS units, save in a variety of formats, basic map viewing, re-projection and datum transformation. Free basic version, £40 registration fee for unlimited version.

<http://www.gpsu.co.uk> (1.5 Mb)

<http://www.gpsy.com/> (similar, for Macintosh)

ArcGIS Explorer: lightweight GIS data viewer, to display many raster and vector file formats, perform data queries, and create thematic maps. ESRI. Free. Replaces ArcExplorer

<http://www.esri.com/software/arcgis/explorer/index.html>

ERDAS ViewFinder: Free image viewing tool with basic manipulation features; of particular interest is that it can re-project imagery. ERDAS. Free.

<http://www.erdas.com/Products/ERDASProductInformation/tabid/84/currentid/2537/default.aspx>

3DEM: neat utility to import, visualize and export DEM data, including SRTM files. Free. No longer supported by the Author.. Now only available via <http://freegeographytools.com/category/3dem>

MultiSpec: image processor with several useful features: contrast stretching, classification (choice of algorithms) and image-stacking. Free.

<http://cobweb.ecn.purdue.edu/~biehl/MultiSpec/>

Data

GLCF: Global Land Cover Facility - the best site for freely downloadable geographic data, including: Landsat, Modis, Aster, derived land-cover products and the IUCN/UNEP Protected



Areas Database

<http://glcf.umiacs.umd.edu/data/>

ASTER PAA - Thousands of LANDSAT, ASTER and IKONOS images for protected areas. Visualisable and downloadable at <http://www.ambiotek.com/paa>

SRTM: Shuttle Radar Topography Mission - high-resolution global digital elevation model

<http://srtm.usgs.gov> (as of May 2004, global coverage is incomplete)

Best quality SRTM V4 Global Database provided by CGIAR - Consortium for Spatial Information (CGIAR-CSI) <http://srtm.csi.cgiar.org/>

NGA Raster Roam: US National Geospatial-Intelligence Agency – global raster datasets, including 1990 10 metre SPOT mosaic, Vector Map of the World, and scanned maps (if you can navigate the interface!).

http://geoengine.nima.mil/geospatial/SW_TOOLS/NIMAMUSE/webinter/rast_roam.html

Digital Chart of the World: 1:1,000,000 vector data, global coverage, downloadable by country.

(VMAP is the updated version DCW, but is only available in continent-sized tiles, each over 200 Mb.) WARNING – Database is dated 1991/92

<http://www.maproom.psu.edu/dcw/>

About GPS

<http://gpsinformation.net/>

<http://www.pocketgpsworld.com/howgpsworks.php>

<http://www.trimble.com/gps/index.shtml>

RGS-IBG Expedition Mapping Unit
www.rgs.org/mapping

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