

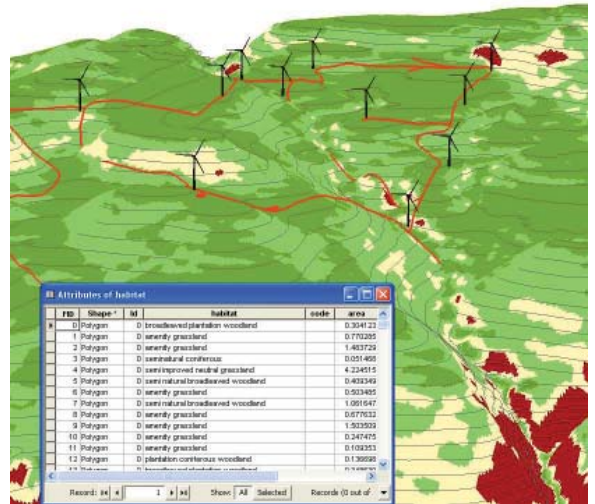
# Geographical Information Systems (GIS)

EnviroCentre have an in house team of highly qualified GIS specialists experienced in undertaking a wide range of GIS analysis and mapping projects including: modelling contaminated land; wildlife habitat mapping; hydrological assessment; air quality assessment; land zoning for development and wind farm layout; and, peat stability assessment. This can include 3D analysis, database management and design and integration with other environmental modelling software.

EnviroCentre can create customised GIS systems for clients using our GIS programming and development capabilities. The development of these systems is supported by technical staff with expertise in ecology, hydrology, civil engineering and contaminated land.

## Key Services:

- Habitat mapping and analysis
- Land contamination modelling and investigation
- Wind farm peat slide risk assessment and turbine siting.
- Historic land use and contamination investigations
- Zone of Visual Influence (ZVI) studies
- 3D Visualisation, animated fly through and terrain analysis
- Contaminated land monitoring
- Flood Inundation Mapping
- Catchment modelling
- Network/Route Analysis
- GIS systems and GIS data for clients
- Provide geographic data that can be viewed on Google Earth or free GIS viewers
- GIS Training and technical support



## Key Projects:

**Baillieston/Carmyle Development Area:** GIS analysis and add-on software was used to model air quality and noise relating to roads, map ecological habitats, and assess land contamination and geology. This was part of a larger project that combined a wide range of data sets to assess the suitability of land for housing developments.

**Kirkintilloch Link Road:** Mapping existing ecological habitats in relation to a new road link and using GIS to suggest conservation solutions.

**Midlothian historic land contamination:** Using GIS as an analysis information system to assess historic and present land use, overall project assessed contaminated land based on fieldwork by contaminated land specialists.

**Spey Fisheries Board:** Using GIS to model water resources impact on fisheries management. Examining the effect of obstructions, discharge and abstractions on fish populations in the River Spey.

## GIS Technologies:

- GIS programming and customisation using Visual Basic and ArcObjects
- Database Design and Analysis
- GPS and Mobile GIS surveying using a Trimble GPS with ESRI's ArcPad
- Integration with non-spatial databases
- ESRI ArcGIS, 3D Analyst and Spatial Analyst

