

Grand Union masters GIS with Ordnance Survey

Grand Union Housing Group is using GIS, including Ordnance Survey's MasterMap, as a fundamental part of the information infrastructure which supports its management of 10,000 properties across Aragon HA, Macintyre HA, Mid Bedfordshire District Council and South Northants Homes.

Graeme Gould, GIS officer, Grand Union, said, "My main role has been to create the extensive database of geographic information that sits on top of OS MasterMap and Address Layer 2 – this really is the key to effective use of GIS across the group. I've also been building up core geographical data – I spent two months just on sewers. That involved importing CAD data from the design and development department; now all the relevant data is in one place."

Grand Union uses OS MasterMap Topography Layer, Imagery Layer, Address Layer 2 and Boundary-Line with its Cadcorp SIS system. Spatial data is stored in an open-source PostGIS database with colour raster images stored in a normal Windows directory. The GIS is delivered by a Citrix server so that it is available to any user, with no need for a local GIS application. Grand Union can now take a spreadsheet from the housing database, link it with addresses and postcodes, and present it in colour within MasterMap, making it much easier for Grand Union to identify its properties and estates, and highlight the relevant details associated with a unit, such as whether a tenant has the right to buy.

Gould said, "Property searching would take much longer without Address Layer 2. We would have to move around MasterMap until we had identified the relevant location, which would require some general idea of where the property was. Likewise, when adding new properties to our datasets, we would have to find and then digitise each property individually rather than create a link to MasterMap and extract the building polygons. The fact that we can extract

building polygons for our properties with Address Layer 2 will save us time when generating maps in the future."

Housing managers throughout Grand Union will be able to see the location of a property when dealing with anything related to it. For example, they will clearly see the geographic spread of properties being repaired under the rolling programme of maintenance. Gould said, "It may be that by clustering work in local areas and carrying out some repairs earlier than intended, they can make efficiency savings from having one contract instead of two or three."

When managing a large number of properties, it is critical to know exactly where boundaries lie, and consequently where shared access applies and where responsibilities lie. When a surveyor draws up a boundary and notes responsibility for it, these precise details can be allocated a coordinate in the housing database and so can be clearly viewed in the GIS. Aragon's grass-cutting contract with Mid Bedfordshire District Council is an example of where clear boundary responsibility made a financial difference. Gould explained, "We noticed that the council's estimate was rather high. We used MasterMap to determine what was included in the contract and then used it to calculate exact areas; this resulted in a saving of £7000 on a £32,000 contract."

GIS is also supporting a council project to manage antisocial behaviour on one estate. The GIS team obtains a date and postcode reference for every reported incident which is then linked to the GIS data layer to create a 'hot-spot' map. This visual data

is then submitted to the project manager and collated along with data from other organisations, such as the police and the ambulance service, as part of a multi-agency approach to improving quality of life for residents.

GIS has a role to play in refurbishment and development programmes. Grand Union can easily identify suitable spaces, such as older properties with large gardens, and then work out the exact size and assess its potential for development, potentially saving considerable architect fees.

Graham Lennox, director of finance, Aragon, said, "The beauty of GIS is that we can pinpoint a location and see how it looks in the real world. This gives us trends and patterns easily and gives budget holders better information on which to make decisions."

Lennox added, "We can also carry out analysis that will feed into our future plans. For example, it will be easy to highlight poverty hot-spots, assess the existing density of social housing and the potential need for new housing. We will even be able to use GIS to demonstrate the success of our own recruitment in certain areas."

The overall aim is to use the GIS as a central repository of information for the whole of Grand Union, with every team having some GIS ability. Gould said, "Once GIS is fully linked to the housing databases, we will have a holistic organisation which shares the core information that is currently restricted to individual departments. Each time a new property is added, we will add every other piece of information so that the data really works for all of us."



Stanfords GIS screenshot

Launch of Stanfords GIS

Infoterra and Stanfords Business Mapping have joined forces to create a new geographical asset management system, Stanfords GIS. In an easy-to-use browser-based application, Stanfords GIS integrates geospatial data with property-specific information, such as maintenance records, site plans, photographs and financial reports.

Under a single annual Stanfords GIS licence, organisations can upload addresses which are then matched against Ordnance Survey data to determine geographic location. Detailed aerial imagery and OS MasterMap are provided for visualisation of the immediate surrounding area of each property, with additional mapping data providing a wider context to the entire portfolio.