

GIS Strategy

2014 - 2017



1. Introduction

The GIS (Geographic Information System) Strategy 2014-17 replaces the previous strategy from 2008 and sets the use and development of GIS over the next three years. It will help provide more transparent information about council owned assets and service standards for customers.

The strategy sets out how the council will use GIS to enable digital access to information and data, and how it can be used to improve service productivity and performance, enabling staff to work efficiently through the use of desktop and mobile systems. Business intelligence from the use of GIS will support day to day operational management of services and inform decisions on resource planning.

Further development of GIS will provide geographical insight through the use of digital mapped information based on ward, parish and neighbourhoods such as planning, licensing and fly tipping service requests.

The GIS Strategy will support the implementation of both the council's ICT Strategy 2014-17 and Digital Strategy 2014-17.

2. What is GIS?

A Geographic Information System (GIS) integrates hardware, software, and data for capturing, managing, analysing, and displaying all forms of geographically referenced information.

It allows us to view, understand, question, interpret, and visualise data in ways that reveal relationships, patterns, and trends in the form of maps, globes, reports, and charts.

It helps answer questions and solve problems by looking at data in a way that is quickly understood and easily shared. GIS technology can be integrated into any enterprise information system framework.

3. Benefits of GIS

The web is rapidly changing the face of GIS. Web services and new tools make it easier to develop geospatial applications for the web, share geographic content and collaborate on projects. The use of GIS also makes conducting research easier and helps with resource planning.

There is a growing awareness of the economic and strategic value of GIS. The benefits generally fall into five basic categories:

- cost savings and increased efficiency
- better decision making
- improved communication
- better record keeping
- managing geographically

The exposure of real time information online presents some risk to the council. The need to update, maintain and protect the integrity of council data is of paramount importance. By not keeping information current, the council risks using incorrect information in its decision making and providing inaccurate information to its residents.

4. GIS Technology

Currently, the council has the following GIS Technologies in place:

- ArcView Desktop –provides the basis for data collection, editing, map production.
- ArcSDE – provides secure storage of corporate datasets
- ArcEditor – allows certain users to edit datasets stored in ArcSDE
- ArcPAD – allows mobile data collection via GPS device
- ArcGIS Server – allows development and provision of web maps for internal use, both for information sharing and editing of datasets without the need for a full ArcEditor licence.
- ESRI Local View Fusion – allows provision of web mapping for Internet and internal use, and online services for development using Javascript API, Flex API etc.
- ESRI GIS Online and Developer toolkit – allows access to online data held by ESRI
- All council mapping used within the GIS systems is provided by Ordnance Survey via the Public Sector Mapping Agreement (PSMA).

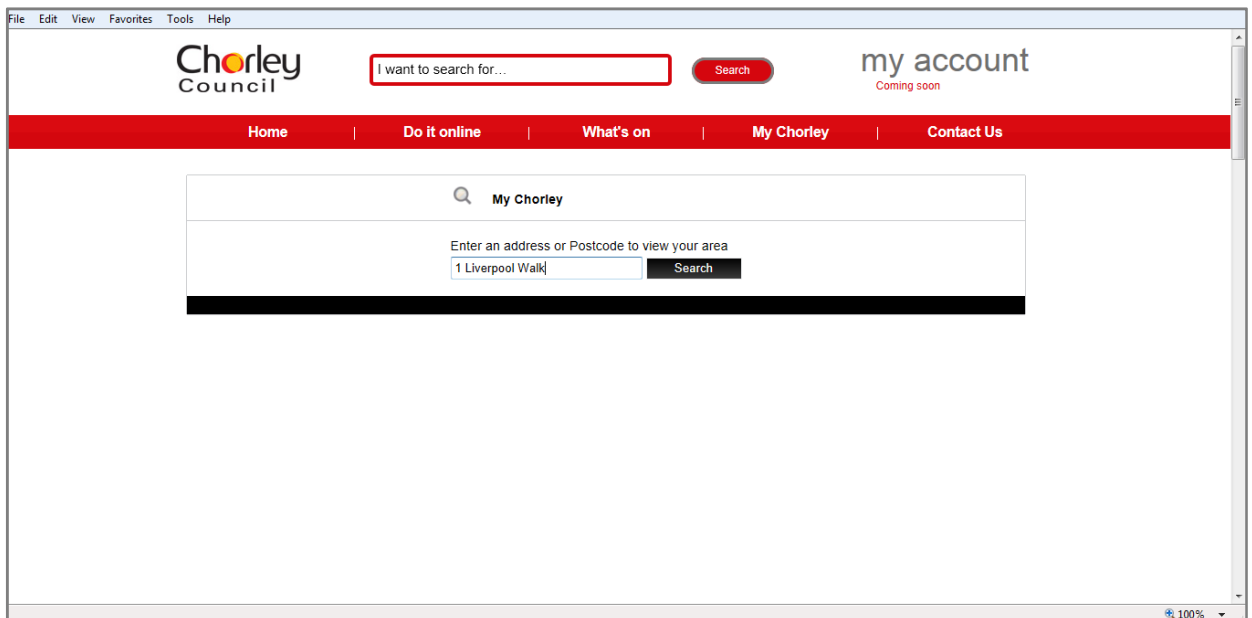
5. Future Development using GIS Technology

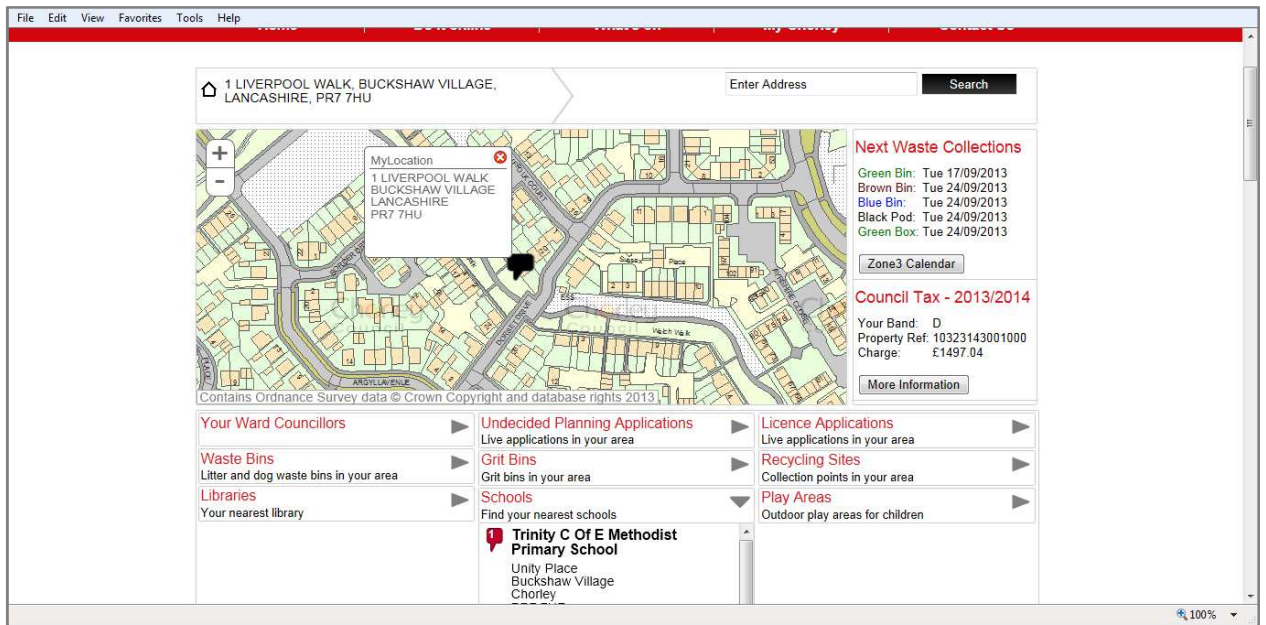
A number of key projects and solutions that have recently been developed have made use of GIS technology. For example:

a. MyChorley

MyChorley is already available online through the council's website and provides citizens with information about their property and services surrounding it. Customers are asked to enter their address or postcode (in the future this will pre populate for registered MyAccount users). The map opens centred on that location, providing a wealth of information about council and local service provision and details of the councilors in their local area. Some datasets provide links to external websites for further information. For instance, a link to a school's Ofsted report is provided, so users can see how the school is performing. Directions from the property chosen to local schools and grit bins are provided using Google Maps. Planning & Licensing application details can be obtained via a link to the council's IDOX Public Access system.

This application has been developed using ESRI Local View Fusion.



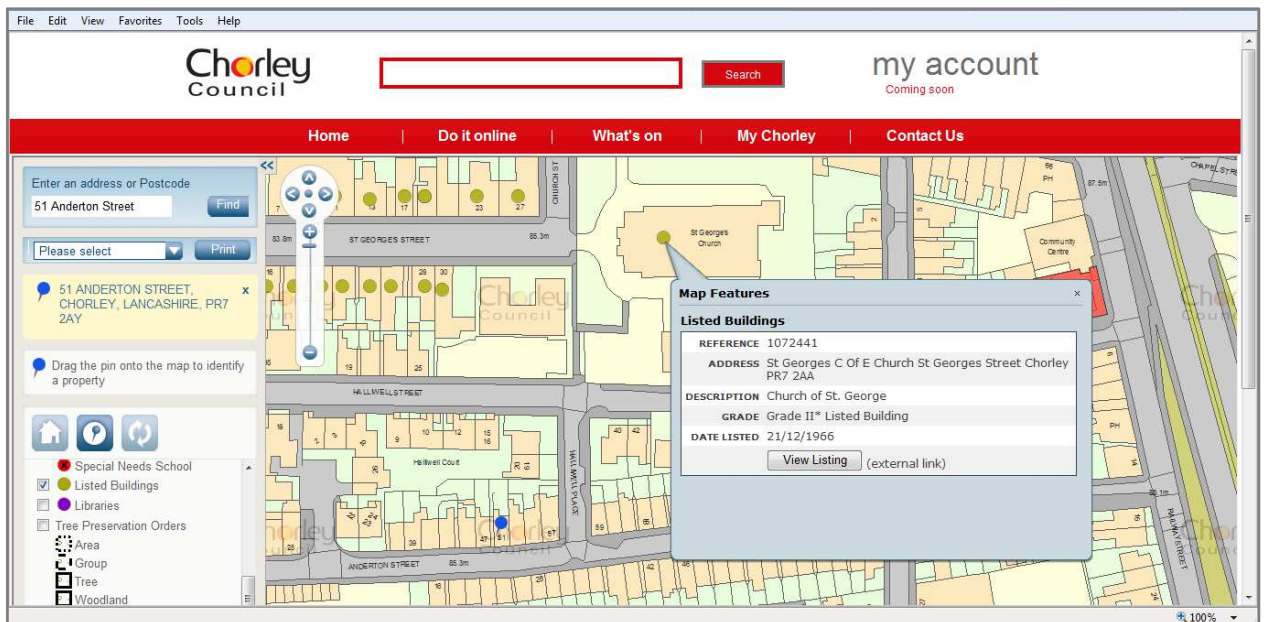


b. MyMap

MyMap is an extension of MyChorley and is available online through the council's website, providing general information over a larger geographical area. MyMap has been developed to provide citizens with more information and transparency about service standards. The same information systems are also used internally for example within Customer Services.

Some datasets provide links to external websites for further information. For instance, the Listed Building dataset contains a link to the English Heritage website which provides the full listing detail for the property or monument.

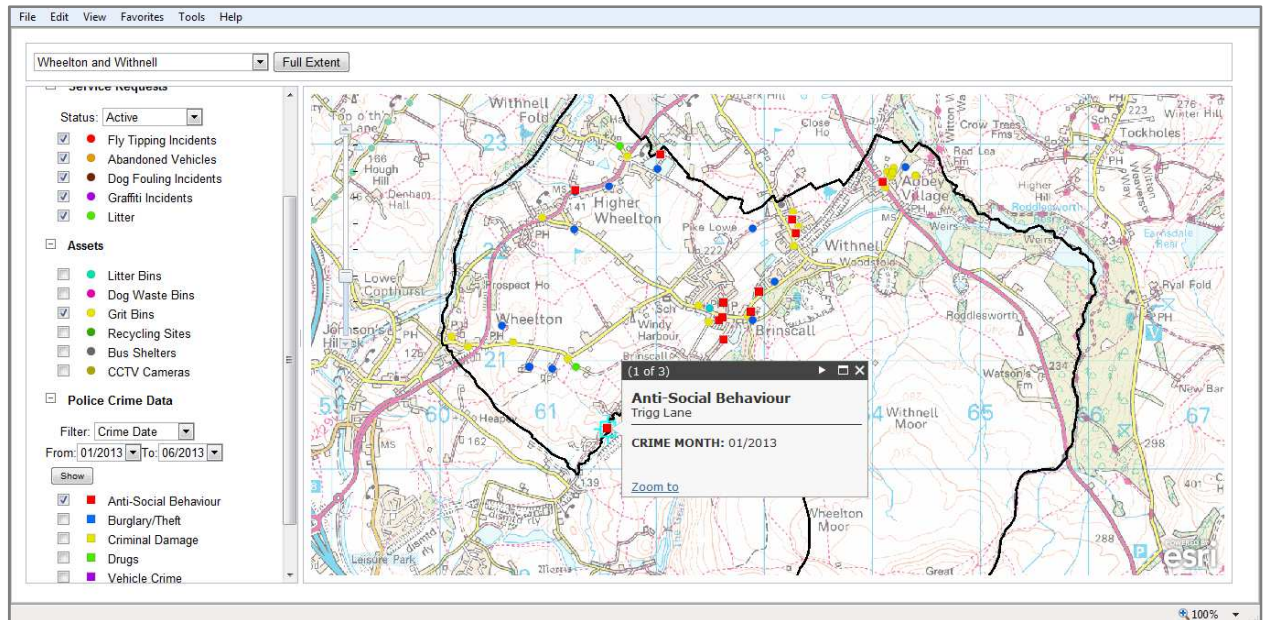
This application has been developed using ESRI View Fusion.



c. MyWard

MyWard is an application available online through the council's website and is designed to provide information relevant to ward areas such as Planning & Licensing applications, customer service requests and crime data. It can provide councillors with specific insights about ward areas. Data can be retrieved using various filters to show information based on the status of the case or date ranges.

This application is in early stages of release and continues to be enhanced. It has been developed using ESRI developer tools and Arc GIS Server using Java code.



d. Street Scene Services

This project is currently under way. It will provide software for the operational management of assets and service requests quickly and efficiently through the use of tablet and smartphone devices using GIS datasets. It will provide information and tools to improve the management of council assets, provide performance information and help with resource planning.

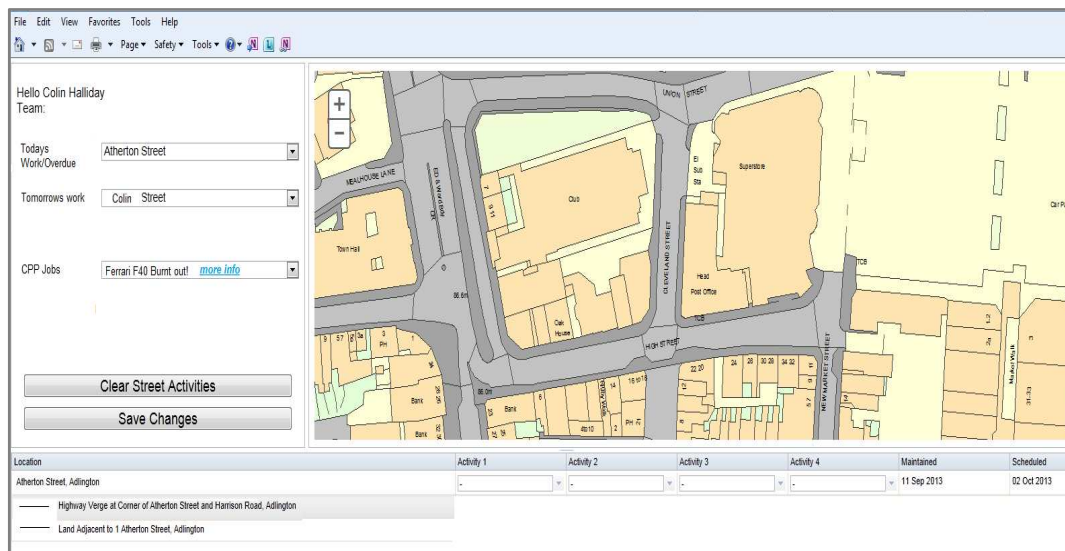
Both scheduled work and ad-hoc jobs that are requested via Customer Services will be recorded and completed via this application.

Information will be edited in real time and will update when land and assets owned by the council have been maintained and the type of work completed providing significantly greater transparency and service standards to customers. Information captured will also be published online via the council website through the MyWard application.

The project extends to capture additional asset based information such as litter bins, park benches and planters etc. There are in excess of 43 asset types with approximately 9,000 individual assets. This information will be captured either via desktop or using a GPS device.

The application has been built using ESRI Developer tools and Arc GIS Server using the ArcGIS Java Script API.

An early view of the application below for illustration purposes only:



e. Customer Service Desktop

The current Customer Service desktop is due to be replaced with software developed by the council. The replacement system will use GIS maps and data to provide customers and staff with up to date service information that will also be published online.

Service forms via the MyAccount/GIS applications will empower customers to report incidents that will automatically be presented to the relevant teams for processing.

Significant enhancement in real time service related information will help keep customers informed about the expected delivery of services and ownership of council assets.

The application will be developed using ESRI Developer tools and ArcGIS Server using the ArcGIS Java Script API.

f. Cemetery/Burial Records

This project will map the location of all grave plots in Chorley and Adlington cemeteries. It is intended that the use of GIS will improve and streamline the management of the cemetery service and provide digital information online via the council website.

The application will use a combination of applications already developed or in the pipeline.

g. MyParish

Based on the MyWard application, MyParish will provide similar information on Parish boundaries. Development of the application is dependent on the capture/supply of Parish based assets.

This application will use ESRI developer tools and Arc GIS Server using Java code.

6. Objectives and Key Actions Overview

The objectives and key actions overview of the GIS strategy are summarised below:

Objective 1 – Strong infrastructure and well-used systems

Objective 2 – Easily accessible and high quality information

Objective 3 – Develop applications to support effective service delivery

Objective 4 – Use GIS to support the council's Digital Strategy

Key actions overview

Objective 1: Strong Infrastructure and well-sued systems

- 1. Maintain up-to-date technology: once released and with clear business benefits**
Understand developments in GIS technology, including existing and other suppliers
- 2. Research the market : through the life of the strategy**
To work with our suppliers/partners to ensure our GIS software and associated technology is up-to-date in order to provide the best GIS experience for our staff and customers

Objective 2: Easily accessible and high quality information

- 3. Launch MyWard: by December 2013**
An application designed and developed internally. MyWard compiles and presents information for based on ward boundaries; ranging from service requests to planning applications and litter bin provision. Following the pilot the application will be made available online and developed further to provide reports and statistical information
- 4. Cemetery/burial records : by December 2014**
This work will make use GIS to map burial plots and capture burial records so that they can be used in service management and make information easily accessible to customers and other stakeholders. It will also help with management of future plots. This links to key actions (5) and (23) of the ICT Strategy 2014-17.
- 5. Provide an agreed method of creating and updating asset data: by September 2014**
An agreed method of creating new datasets and updating existing ones needs to be in place in order to ensure accurate and current information is provided to Customers and staff.
- 6. Update of GIS Catalogue: Ongoing**
Update and maintain GIS Catalogue, to provide a current list of data held in GIS format.

Key actions overview

Objective 3: Develop applications to support effective service delivery

7. Customer Service Desktop: by April 2014

The replacement system will use GIS maps and data to provide customers and staff with up to date service information that will also be published online and available through MyAccount.

8. Asset data capture: by September 2014

Working closely with services, work schedule information will be captured and mapped using GIS. This will make it easier to manage service delivery as well as making information available for customers. The application will concentrate on Street Scene services initially. In addition, other key business information on the empty property database will be captured through GIS to facilitate timely inspections of empty properties for Council Tax billing. This is linked to key actions (1) and (21) of the ICT Strategy 2014-2017.

9. Street Scene Services - Management of Grounds Maintenance: by April 2014

To develop an application that will capture and record information to help improve the management of Council assets. This will enable a “live” feed of up to date information regarding scheduled and ad hoc asset maintenance for customers, Customer Service Advisors and managers via web mapping applications.

Objective 4: Use GIS to support the council's digital strategy

10. Provide training to staff and members: by March 2015

Staff and members developing or using the GIS applications will have the necessary skills to use and interpret the published information.

11. Increase use of online service provision (such as Consultee Access, PALC for Land Charge searches) by customers: increase in baseline from 2014

External bodies should be encouraged to use online services (such as Consultee Access, PALC for Land Charge searches) by targeted communication of the benefits of a more efficient customer experience. Training on the systems should be offered in order to facilitate migration to online services.