

Sussex County Improves the Enterprise Collaboration through GIS

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The budget challenge faced by State, County, and Municipal Governments is forcing a comprehensive review of business process at all levels. There are tremendous opportunities to improve operational efficiencies and reduce costs through the use of proven information management technologies. However, success is dependent on establishing a well defined enterprise data architecture that can serve as a practical guide to ensure information is effectively shared among diverse systems and across organizational boundaries. Sussex County is moving forward with a GIS implementation plan based on these objectives.

HIGHLIGHTS:

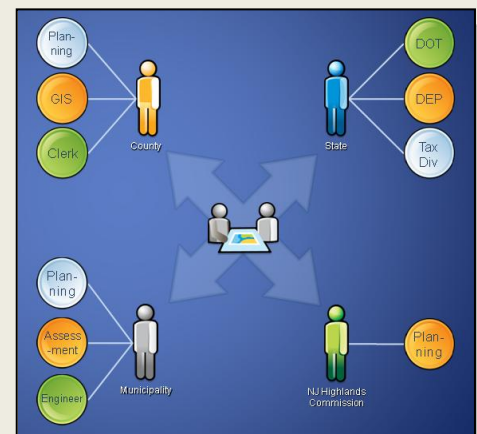
- **AN APPROACH TO IMPROVED OPERATING EFFICIENCIES THROUGH MANAGING LOCAL GOVERNMENT'S INFORMATION.**
- **BUSINESS-PROCESS REENGINEERING REVAMPS WORK PROCESSES TO ELIMINATE NON-VALUE ADDED ACTIVITY AND REDUNDANCY.**
- **REVISE LEGISLATIVE REGULATIONS IN A WAY THAT SUPPORTS ENTERPRISE DATA MANAGEMENT PRACTICES AND EMBRACES AVAILABLE INFORMATION TECHNOLOGIES**

Their efforts have already provided many examples of how this approach can deliver tangible results. The key to effective local governments is collaboration. Local departments and agencies generate large volumes of information in which other local government entities have a need or desire to consume or utilize as part of their day-to-day workflow activities. These department and agencies may or may not be part of the same governmental unit or they may be municipal, county, or regional agencies all collaborating together within the same or another enterprise.

Local governments manage activities that occur on a particular piece of property, or on a certain roadway segment or bridge. Available technologies such as GIS play a vital role in being part of the current enterprise. The challenges many local governments face are inefficient retention and retrieval of information due to the lack of a global information management plan.

The County of Sussex, New Jersey has embarked on an initiative which integrates GIS technology as an integral part of an overall enterprise management strategy to improve operating efficiencies, eliminate non-value added activities and implement a common infrastructure for local government.

A good example of how GIS can dramatically impact the decision process was demonstrated during a public meeting when the Board of Chosen Freeholders were interested in identifying properties within the county for potential redevelopment. Using ArcInfo, the Office of GIS was able to perform a spatial



Collaboration between various levels of government can reduce redundancy and eliminate non-value activities.

analysis in a few short hours which identified 20 parcels out of the 78,000 parcels, eliminating the non-value added activities and unnecessary costs of gathering information from all twenty four municipalities. Since local governments manage property-based activities, the GIS must utilize the most current parcel data available. In New Jersey, land record management is a municipal-based activity managed by individual local municipal tax assessors while the GIS parcel data are largely maintained and managed within county governments. In order to maintain a dynamic data layer such as parcels, collaboration between local planning agencies, tax assessors, county tax board, county clerk's offices, and GIS offices is essential. In 2009, the Sussex County Office of GIS received a grant from the New Jersey Highlands Council to develop a strategy for the implementation of an enterprise collaboration strategy to enhance the procedure, communication, and information retrieval to parcel modifications.



The life cycle of land records management involves many local, regional, and state agencies. Understanding this workflow is the first step in applying the appropriate technologies to streamline the process.

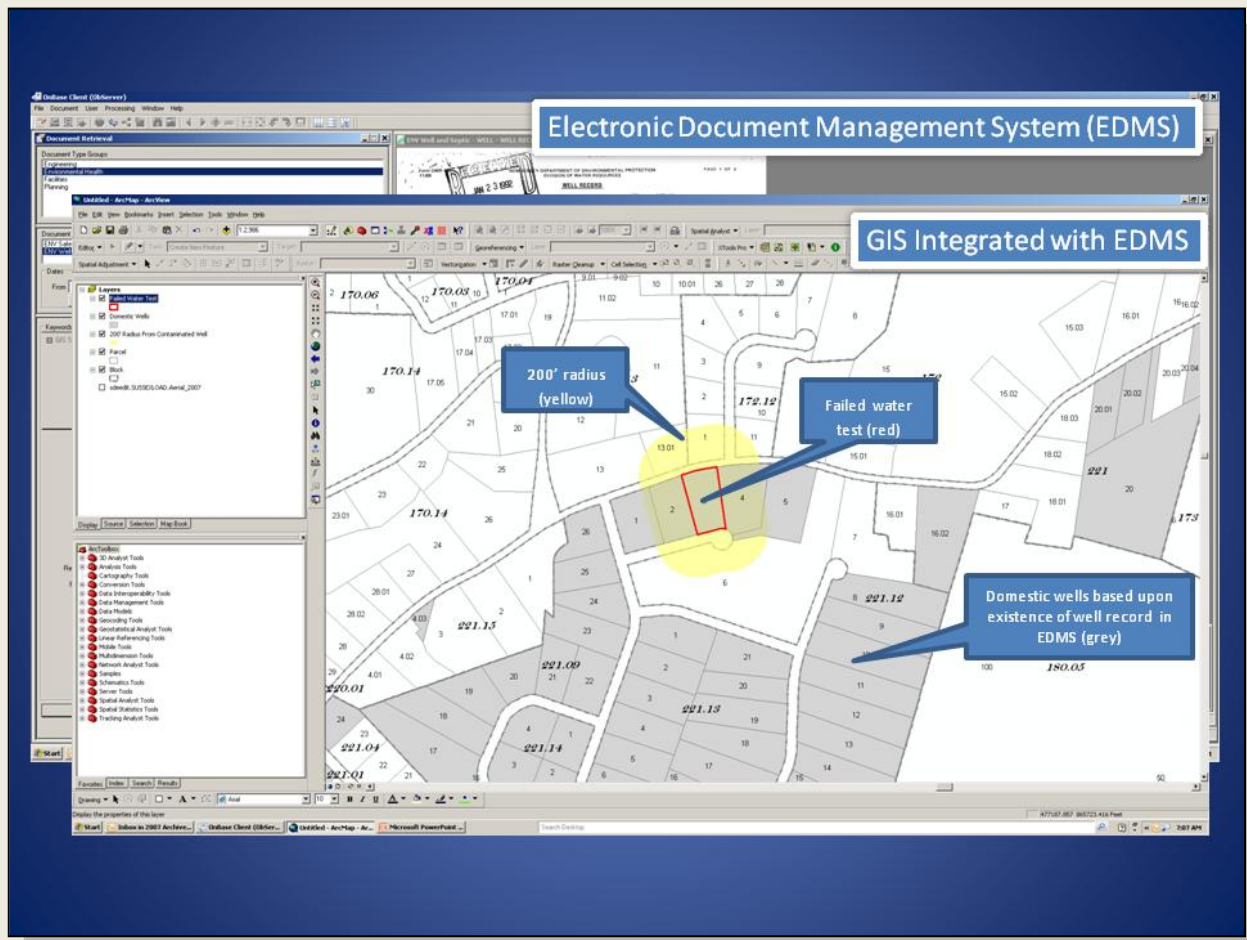
The County of Sussex teamed up with Civil Solutions, a division of ARH, an ESRI Business Partner, to define the processes by which land division information is obtained, by whom, and how it is stored. The findings were used to determine key points as which data can be captured without added unneeded burden to existing processes, but that may allow for creation of a comprehensive database of land division changes. The document "Sussex County Collaboration Strategy for the Maintenance and Management for Land Records" is available by contacting the author.

While Sussex County is focused on establishing GIS as one of its core enterprise technologies, they also realized that their global information management strategy must encompass all data and records regardless of system, source or format. This is ***not an insignificant challenge*** and goes to the heart of why a clear vision and hands-on participation at the operations level is so critical. Much of their planning has focused on this difficult issue which is reflected in their growing list of successes.

A practical example of our enterprise strategy in action is a key project implemented for the Health Department. In this case we integrated several elements:

1. **Case Management/ Business Application** – This provides a data collection tools for inspectors working in the field via a laptop.
2. **Back Scan of Legacy Documents** – Over 1 million document pages consisting of all Municipal Block & Lot files have been scanned and indexed by the County's Imaging Center.

3. **Electronic Document Management System (EDMS)** – All of the back scan documents as well as day-forward documents are indexed and managed within the EDMS eDocument repository.
4. **GIS** – They have implemented GIS tools within the Case Management application. Also all data and eDocuments include GIS indexing values allowing them to deliver the full power of a GIS enabled solution.
5. **Single User Interface** – The Case Management application, GIS technology and EDMS records repository have been seamlessly integrated into a single user interface.



By integrating core technologies, users can perform spatial analyses by creating a domestic well layer based upon the existence of a well record within the electronic document management system.

The success of this project is demonstrating the power of a well structured enterprise information management strategy and the value it can deliver to government agencies struggling to reduce costs while still delivering quality services.

One of the other challenges facing governmental agencies is how to evolve legislative regulations in a way that supports enterprise data management practices. It takes a lot of work to get all the stake

holders pointed in the same direction, and yet another effort to find the political support to move changes through the legislative process.

Examples of how Sussex County is providing leadership in this area are by sitting on the New Jersey Division of Taxation's Digital Tax Mapping Committee which began meeting in 2006. The committee identified the need to establish a standard digital information submission process based on geographic information technology to facilitate the sharing of core land information. The main focus of this group is to develop a digital tax map standard, develop and implement a digital tax map approval process, and revise the current tax map regulations to accommodate digital tax maps. In addition, Sussex County is an active member of the New Jersey Geospatial Forum's Digital Subdivision Standards task which developed a model municipal ordinance for municipalities to accept digital subdivisions which will allow for an almost seamless update to the digital tax map and GIS system.

Although State and Local governments are facing difficult budget issues we believe it can be a positive force for change. Effectively managing information is a primary responsibility of every government agency, it is essential that we find ways to leverage technology, reduce costs, and improve our ability to provide efficient access to information for all of our constituents.

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