



Critical Storage, Access and Dissemination for Government Data Agency

A Data Warehousing Breakthrough

Overview

Faced with managing and distributing a tremendous amount of information, a government data agency reached out to Acumen Solutions for reliable, adaptable data warehousing. Acumen Solutions delivered a system that improved immediate data management, access, and distribution while also ready to meet inevitable increasing demand.

Challenge:

The organization needed to store, manage, and reliably access and distribute a near-incomprehensible amount of information.

Solution:

Acumen Solutions designed and deployed a data warehousing solution that accommodated immediate organization demand, and remains ready to meet future needs – transferring all data from legacy systems with zero compromise to existing information.

Results:

The agency is enjoying remarkable improvement to data release timeliness and accuracy. User access has more than quadrupled thanks to the successful implementation of the new data warehousing system and supporting web-based access.

“Acumen Solutions delivered a robust, reliably accessible data warehouse for the agency capable of managing terabytes of information without compromising reliable system performance and ready information access.”

Business Challenge

The mission of the government agency goes far beyond maintaining an accurate account of its data. Along with a couple of key organizations, a specific division of the agency shares responsibility for obtaining and maintaining massive amounts of data. It is this department in particular that is responsible for disseminating the data from all of these organizations to the public.

Dealing with an almost incomprehensible variety of information, the department needed:

- a central data warehouse delivering accuracy and consistency across the agency
- a website, available 24-hours a day, seven days a week, to broadcast data to the public
- a reliable means of timely data distribution to relevant organizations and outlets



Solution

To streamline the broadcast of the the agency's economic data to the public, the department turned to Acumen Solutions for data modeling, database design and implementation, and data migration to support a massive, multi-terabyte Oracle data warehouse that could more effectively manage the seemingly overwhelming amount of information. This warehouse also integrated data for a consistent, single-point of data dissemination for the agency.

To ensure the success of this expansive initiative, Acumen Solutions took charge of:

1. Migrating data from existing data sources, without system outages, to the data warehouse using proven Extract, Transformation and Load (ETL) processes
2. Mapping source data files to the physical data model using ETL procedures to validate and load the data from the source files to the data warehouse
3. Designing and deploying a relational Oracle database, which defined the base tables and data elements of the warehouse, and served as entry point for the application to query and report on data

Acumen Solutions also provided web development support to the agency's website. To support the site, the Acumen Solutions team also assisted in the creation of a customized content management system, which gave non-technical users the ability to post content to the web site without modifying the underlying application code.

Return on Investment

Thanks to Acumen Solutions, the agency is experiencing major improvements in data release timeliness and accuracy. In fact, no data has been recalled due to data loading errors. Furthermore, whereas new data could previously only be deployed quarterly, new data is now deployed to the site on a weekly basis. This improvement in speed and accuracy has fueled an increase in site users from approximately 200,000 to more 1,000,000 visitors a month.