



Industry

- Education, Public Sector

Products

- Microsoft Analysis Services
- Microsoft Integration Services
- Microsoft Reporting Services
- Microsoft SharePoint
- Microsoft SQL Server
- ProClarity Web Professional and Analytics Server

Challenge

The South Orange County Community College District hired Neudesic to re-write their legacy Student Information System in 2006. In addition, the District management team needed to have a true Enterprise Data Warehouse developed in order to support operational, State/ Federal, and ad-hoc reports

Solution

By implementing an entire Microsoft based Enterprise Data Warehouse/ Business Intelligence solution, the South Orange County Community College District was able to reduce the costs associated with system management, improve data accuracy, and provide end-users with accurate reports.

Benefit

- With concise reporting, executives can make precise decisions
- Ability and flexibility to access the cleansed and pre-aggregated data using various methods
- Eliminates multiple data stores
- Overhead required to maintain the EDW is much less and significantly reduces ongoing system management costs

Enterprise Data Warehouse

The South Orange County Community College District (SOCCCD), founded in 1967, is one of 72 community college districts in California. It is a multi-campus district comprised of Saddleback College in the City of Mission Viejo, Irvine Valley College in the City of Irvine, and the Advanced Technology & Education Park (ATEP) in the City of Tustin. Saddleback College and Irvine Valley College are accredited, offering associate degrees and providing academic major prerequisites that are transferable to four-year colleges and universities. Career and technical education programs, continuing education courses, and cultural opportunities are also available at each campus. ATEP is the newest SOCCCD campus which offers technology-oriented courses. SOCCCD currently serves over 37,000 students each semester and employs more than 2,300 faculty and staff.

South Orange County Community College District turns to Neudesic's SQL/Business Intelligence team to build an Enterprise-wide Data Warehouse, reducing system management costs, improving data accuracy, and providing end users with accurate reports.

Project Highlights

- Integration Services was used to develop the ETL and consolidate distributed data elements
- Analysis Services was used to create the multi-dimensional cubes, specifically structured for query
- Customized Enrollment and State/ Federal reports were developed using Reporting Services
- Report Builder, ProClarity Web Professional, and Excel provided the flexibility for ad-hoc reporting and analytics
- SharePoint was implemented as the central portal for the new EDW/BI intranet site
- The EDW has become the new platform for all operational, college, district, and State/Federal reports



Enterprise Data Warehouse



The Challenge

The SOCCCD Information Technology department consists of a number of legacy systems which are used throughout the district. These systems (such as the Student Information System, Class Scheduling System, Admissions and Records, Human Resources, and Finance, etc.) were designed to collect and process data for daily operations. However, the nature of the transactional data structures and limited analytical tools made it inadequate for reporting purposes. Data was being maintained in various formats and locations which increased the IT maintenance and support costs. District executives and college researchers needed information delivered quickly and accurately to produce internal management reports, State/Federal reports, and to also provide ad-hoc analytics across all the colleges. Overall, the increased data volume and system complexity provided limited decision support capabilities.



The Solution

For years, the district Information Technology department discussed the need for a true Enterprise Data Warehouse (EDW) to resolve their challenges. The timing of the project was partially in response to the development of the new Student Information System and Neudesic quickly utilized Microsoft's SQL Server platform of Business Intelligence (BI) tools the ETL and consolidate distributed data to architect and develop the EDW. Integration Services was used to develop elements. Analysis Services was used to create the multi-dimensional cubes, specifically consolidate distributed data to architect and develop the EDW. Integration Services was used to develop elements. Analysis Services was used to create the multi-dimensional cubes, specifically structured for querying. Customized Enrollment and State/Federal reports were developed using Reporting Services, while Report Builder, ProClarity Web Professional, and Excel provided the flexibility for ad-hoc reporting and analytics. Finally, SharePoint was implemented as the central portal for the new EDW/BI intranet site.



The Benefit

By utilizing Microsoft's powerful Data Warehouse and Business Intelligence set of tools, college and district researchers are now able to produce accurate reports and executives can make precise decisions. The EDW has become the new platform for all operational, college, district, and State/Federal reports.

End-users have the ability and flexibility to access the cleansed and pre-aggregated data using various methods such as

By utilizing Microsoft's powerful Data Warehouse and Business Intelligence set of tools, college and district researchers are now able to produce accurate reports and executives can make precise decisions.

Microsoft Excel, Report Builder, or ProClarity Web Professional. From the Information Technology departments' perspective, consolidating related transactional data into the Data Warehouse helps eliminate multiple data stores. In turn, the overhead required to maintain the EDW is much less and significantly reduces ongoing system management costs.