



How Direction Software LLP provided Solution for Managing the Product Information, Pricing, Promotion and Placement under one roof

For more information contact:
+ 91 (22) 6152 5000 | info@direction.biz | www.direction.biz

Client

This Company is an office supply retailing company. It has e-commerce sites and a business-to-business sales organization.

Summary

- The scope of this application is to get Product (SKU) from various office systems into the application, manipulate the data as required and then provide the data as output to other systems of the company
- This application brings Product, Pricing, Promotion and Placement in one single roof
- Stakeholders receive Product (SKU) information via excel, which is out of date as there is no link to the source systems. So, imported Product Information via interface in this application from their various office systems, to save user's time and efforts
- This application ensures data in the reports generated have no duplication and data integrity is also maintained
- This Solution is a Merchandising system for creating pricing and promotions

Challenges

- To import Product (SKU) Information which was held across many systems via interface
- SKU Lifecycle maintenance in this application
- To maintain different types of Pricing country wise in this application with export /import functionality
- Configuration of user authentication
- Implementation of user authorization, Roles, Modules and Product Manager Area wise for access restriction
- To ensure single application should run on one machine
- Provision for users to work parallels in multiple screens
- Creation of user specific Dashboard

Solutions

- Desktop Application is created using DevExpress Winforms control library (for UI) and SQL server 2016 (for database)
- Configured user authentication using LDAP which is the process of validating a username and password combination with a directory server such MS Active Directory
- User authorization was implemented roles and modules wise, so that logged in user can access only those modules for which he/she has rights
- Users are also mapped to Product Manager Area and therefore have rights for restricted data. Provision to give temporary access of Product Manager Area to users for specific no. of days is also given
- Developed interfaces to import Product (SKU) data from STEP, EDW, Compsys, SAP, AS 400, Prime into this application using file system (.csv)
- Maintained SKU lifecycle as per given predefined business rules:
 - Flagging of products, which needs to be discontinued
 - Replacement / substitution of the product
 - Display of Parent Component relationship
- Using Mutex classes achieved Single application on one machine requirement
- Client wanted the provision for users to work parallelly in multiple screens, achieved this solution using asynchronous process

- Created user specific Dashboard that visually tracks, analyzes and displays summarized Product (SKU) information, Tasks, Issues and Promo Placement Overview for the logged in user to monitor the business or specific process. And also provided links to access other screens
- This application provides a facility for grouping the products under a Product Family name and a product is linked to only one Product Family
- They used to create Pricing in excel which was time consuming, so in this application created Pricing module for creation of different types of Pricing such as STD, Online Flex, Promo. This saves user time and is more efficient way. User can export/import the pricing data
- Promotions are created and mapped to the slots on various online activities by Merchandisers here
- Various layouts required for Online (e.g. like Slots on Home page) and Offline (like Page and blocks in catalogue) activities is created in this application
- In this application, tracking of the changes done by the user for related fields are available
- Notifications / Emails are send to the users with attached output reports through this application
- Outputs required by other systems of this company are provided by this application

Technologies and Tools used

- .Net Winforms C# desktop application
- .Net Framework 4.6.1
- ADO.Net
- LINQ
- Devexpress 18.1 Winforms control library
- EPPlus 4.1 for Excel import/export operations
- NLog 4.4.6 for logging errors/exceptions/database related operations
- Tortoise SVN - Version control
- TSQL
- SQL CLR Assembly
- SQL Server 2016 Standard Edition
- Slow-Cheetah 3.0.61 - for configuration Management Style Cop (1.0.2)
- Git - Version control for 4P Interface.
- Pentaho-kettle 4.0 - ETL tool to import data from step system.
- UWINSCP - file transfer .csv file of Step system to Linux server.
- Putty - command line interface to Linux server to run Pentaho job

About DIRECTION

We are a software services firm, specializing in developing & implementing Internet strategies for businesses & providing high-end software development services including Custom Programming & Offshore Development.

With 17,000 sq. ft. of space in a modern building in central Mumbai the hub of all business activities in Mumbai, Direction Software LLP is fully equipped with state-of-the-art infrastructure and networked with redundant high speed, dedicated internet access from different providers.

Our vision is to be a trusted IT partner, leveraging our knowledge of tools and technologies to provide simple, integrated and innovative solutions that result in maximum customer satisfaction.