Loans Trading Support System

The Client
Corporate and Investment Bank (CIB) Group Division of a leading global investment bank.

Industry
Financial Services, Corporate and Investment banking.

The Business Challenge
The main business challenge was to streamline derivatives trading desks operations and increase transparency of Risk and P&L associated with transactions.
Main business challenges are:

- To provide flexible way of capturing wide variety of derivative trades with new products constantly emerging on the market
- To automate coordination of loans sales deals between Trading, Deal Management and Middle Office participants
- To provide seamless integration with Portfolio Management and Deal Management business workflows as part of loans pricing and mandatory hedge execution processes
- To allow monitoring of diverse credit and market risk metrics both on transactions level and aggregated (i.e. by counterparty, region, industry etc)
- To provide Mark-to-Market P&L associated with executed transactions on a daily basis as well as estimated prediction and what-if analysis based on up-to-date market data

Project Facts:

- Functional area

  Trading

- Technology set

  Oracle, Data Warehousing, J2EE, EJB, Struts, AJAX, Flex

- User profile

  Front office (trading desk), middle office

- Number of users

  10+

- Relationships status

  Ongoing ODC; 2-monthly releases; T&M basis

- Services provided

  Business analysis, development, maintenance, production and development support, QA

- Team size

  6 team members

- Duration

  4+ years

The Solution
Starting from a small support team Luxoft was able to take over the existing system and build up a comprehensive yet flexible solution to address quickly changing business needs. Luxoft has established proper communication and development processes required for the projects of this magnitude.
A number of new mission critical applications were delivered:

- Application for capturing derivative trades and maintaining them through lifecycle. The solution contains a variety of templates for capturing standard types of transactions (single-name default swaps, CDS Indices, Options) as well as exotic ones (CDS Index Tranches). Also, the system allows capturing non-standard transactions in a flexible way. The application is integrated with Portfolio Management system which allowed establishing seamless communication between PMs and Traders for executing mandatory hedge requirements.
- Application for capturing deals on secondary loans market. The solution provides the way to co-ordinate negotiating and conducting of loan sales deals by various participants (Traders, Deal Managers, Middle Office) as well as capturing/maintaining transaction details. The developed application is tightly integrated with Deal Management system which allows both systems to operate with up-to-date information on loans portfolio and provide productive feed-back (i.e. for shortfall rebate).
- System for estimating loans hedging price by Traders as part of loans pricing process. The system streamlines communication between Private (Deal Management) and Public(Trading) sides of loans pricing process and provides Traders with a convenient way to fulfill DMs quote requests as well as to store historical quotations for future re-use as benchmark values.
- Application for monitoring and analysis of Risks and P&L associated with transactions. The solution is based on Data Warehousing framework for aggregation of Risk/PNL metrics provided by multiple valuation engines on daily basis. The front-end application is designed to provide maximum flexibility in aggregation/breakdown of Risk/PNL information and allows full customization on user-level.
- Application for real-time data delivery from market-data providers and valuation engines. The solution was integrated as a part of data feeds stack which allowed real-time data delivery with no manual intervention required due to infrastructure issues in upstream systems. A comprehensive data checks mechanism was introduced to validate quality of data being provided and alert support team in case of any issues identified.

Luxoft has built highly available and scalable solution that meets ambitious goals set by the bank. The application is currently used in all bank locations across Americas, Europe and Asia. The system is currently being used by over 600 users.