

Xenomorph Case Study

Landesbank Baden-Württemberg

LBBW employs TimeScape to ensure data consistency, control and compliance.

"We needed a data management solution which was capable of handling large data volumes and could scale with our business needs.

With the number of instruments we are managing set to increase further, Xenomorph's TimeScape provides us with a flexible, centralised data management platform. It enhances our risk and reporting processes giving us greater transparency across the different departments and higher data consistency."

Peter Westphal, Project Manager - Risk Control Team, LBBW

EXECUTIVE SUMMARY

Country/Region: Germany

Industry: Sell side – Investment Bank

Customer Profile:

With total assets of EUR 374 billion and some 13,000 employees (as of 31/12/2010), LBBW is one of Germany's largest banks and is the most important by far in its core Baden-Württemberg market.

Business Situation:

At LBBW, centralizing market data processes and market data management was becoming a more important issue to the whole bank.

Solution:

Xenomorph's TimeScape has provided LBBW with a high performance data management system that supports large volume, multi-source and complex data sets in an easy-to-use and transparent manner, delivers validated market data based upon consistent validation processes and in so doing enhances data quality for regulatory compliance.

BENEFITS

- **Increased accuracy** in data processing and validation
- **Greater data transparency** across business processes
- **Increased data quality and consistency** for high quality risk management
- **Reduced data costs** through consolidation
- **A comprehensive audit process** for full regulatory compliance
- **Increased capacity** to centralise, store and consolidate multiple data sources

INTRODUCTION

As one of Germany's largest banks, data volumes at LBBW were set to expand further. The market data management project was initiated to improve LBBW's internal model for Market Risk calculations and to support the demands of the business through:

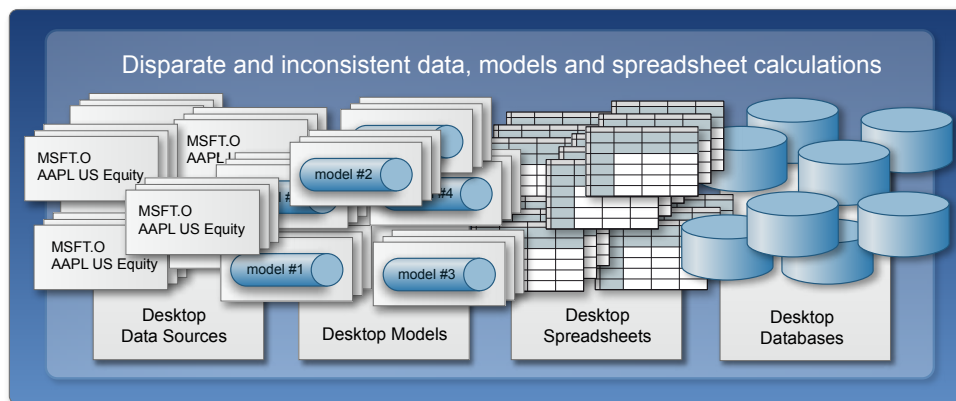
- **Automated Data Validation** – automating data validation allows a move away from the time-consuming, manual manipulation of data which can lead to inefficiencies and increased operational risk.
- **Higher Data Quality** – improving data quality through a centralised and automated approach to managing data and analytics, leading to greater data consistency and quality.
- **Enhanced Audit Trail** – providing a comprehensive auditing process to increase data transparency and assist in regulatory compliance.
- **Increased Data Control** – adding multi-user (4-eyes) approval processes and data control to further reduce operational business risk and increase control.

“Xenomorph’s TimeScope analytics and data management system allows us to deliver validated end of day data for several systems. TimeScope comes with many out-of-the-box tools and built-in functionality that have enabled us to see results quickly in the project. At the same time, it gives us the flexibility to customize the solution for our particular business processes and needs.

TimeScope is also fully documented with over 6,000 pages of help files, which provide comprehensive information on the system and example usage cases for all applications.”

Sebastian Weedermann, IT Project Manager, LBBW

The project's aim was to enable risk, back office and accountancy departments to manage market data at a group level. This required a consolidated approach to the management of data in order to support future business plans and successful growth.



LBBW was faced with decentralized market data systems

SITUATION

LBBW was looking for a centralised analytics and data management platform which could enhance risk management, deliver validated market data based upon consistent validation processes and ensure regulatory compliance.

The business drivers for higher quality data were the move to an internal model for VaR (rather than the standard model) and the need for higher quality valuations for accountancy purposes.

The requirement was therefore threefold:

- A single integrated data management system that would support automated data validation and provide data transparency across the different departments.
- The timely delivery of a single set of consistent, quality data of all types.
- A flexible framework which could scale with business processes.

“High quality risk management is based on the principles of transparency, consistency and auditability of data. We are delighted to have enhanced LBBW’s risk management and compliance capabilities through the implementation of TimeScape, our high performance, future-proof analytics and data management solution.”

Brian Sentance, CEO, Xenomorph

SOLUTION

LBBW implemented TimeScape to import, normalise, validate and distribute different types of data from different sources, including equities, indices, FX and interest rates, bonds, warrants, credit spreads, options and futures, volatilities, credit and yield curves.

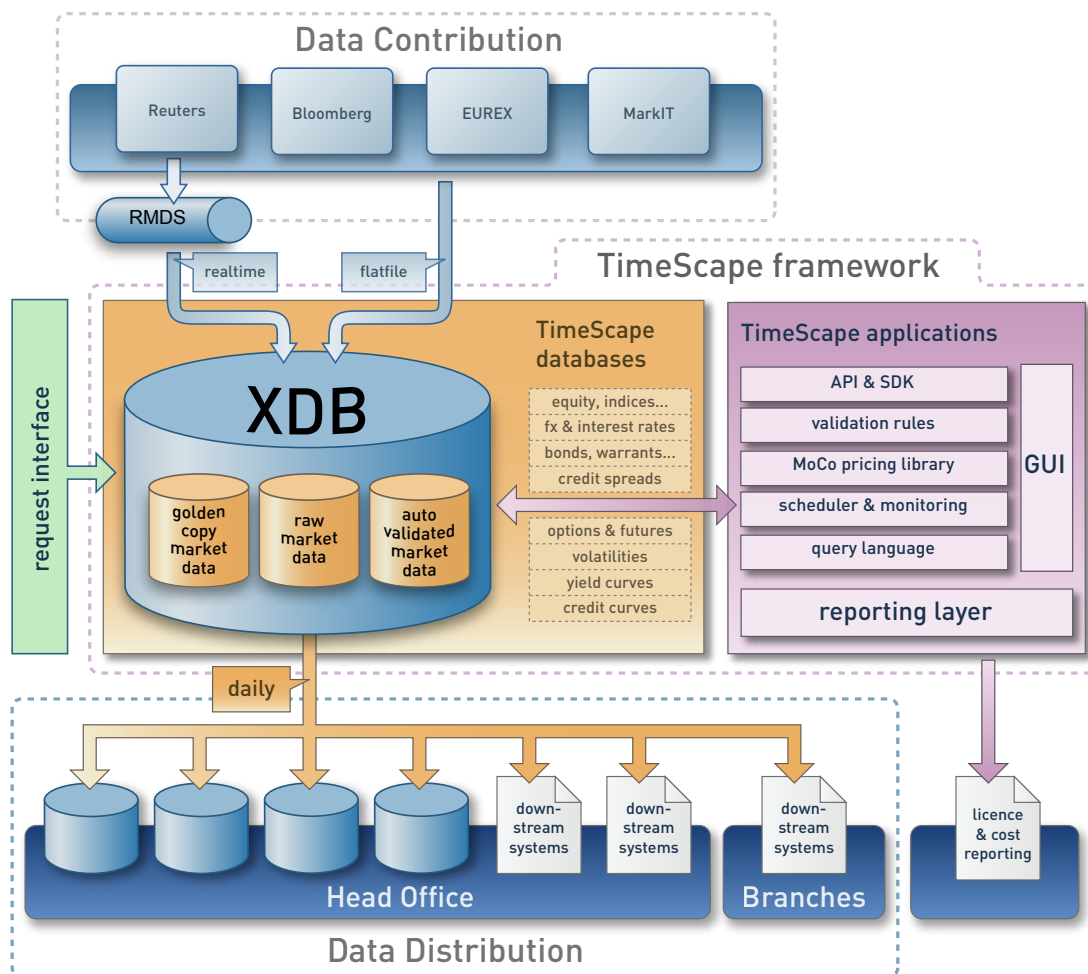
Although the initial expectation was to manage data for 120,000 instruments, the number had expanded to 160,000 by the end of the project and is now running at 210,000. It includes on average around 30 to 40 fields per instrument, and when more instrument detail is required the number of fields can rise to 200 or more (Commercial Paper, Bonds etc). Additionally, data for options, volatilities and tenor points is stored and validated as individual time series, as well as being validated at the composite level, when volatility surfaces and yield curves are created and compositions defined.

The data is cleansed, stored, validated and then distributed to downstream systems, enabling consistent and efficient risk reporting and analysis. TimeScape allows the management of multiple Golden Copies for risk, back-office and accountancy, and enhances data consistency and transparency across the different departments. Moreover, LBBW has implemented complex data validation rules within the TimeScape framework so that data can be easily accessed to create both new instruments and the reporting on them required by market risk.

By using TimeScale, LBBW has optimised its validation processes to meet strict daily timelines for data delivery. The transparency of, and ease of access to, instrument data, market data and calculations within TimeScale have helped LBBW successfully implement its internal model for risk and regulatory reporting.

LBBW has an increasing number of users for the Market Data Platform and plans to expand the use of reference market data across more systems, leading to a growing data universe and data volume within the platform.

It is currently conducting pre-production testing on TimeScale Version 4, which will combine standards-based database management tools with Xenomorph's time series/vector storage capability. This new release will allow data volumes to extend further as new departments access core data, and enhance auditability for full transparency across all business units.



LBBW's configuration: a flexible analytics and data management system

BENEFITS

LBBW based its decision to select TimeScape on the following criteria:

- **Data model** – TimeScape’s data model allows many thousands of instruments to be added quickly and in a centralised manner, empowering LBBW to take control of its data.
- **Flexibility** – Within TimeScape it is easy to add new instruments and cross reference data. LBBW’s risk control team has the flexibility to create bespoke validation tests quickly, increasing productivity not only within the risk department but across the whole organisation.
- **Customisability and ease of use** – The TimeScape system is easily understandable by both business users and technologists alike, and as such customisable and extensible by LBBW itself. This ease of customisation avoids a situation where the client is dependent upon the system vendor to make changes to the system data model.
- **Programming APIs and layered design** – All of the system and end-user functionality of TimeScape is available through a programming interface (API), allowing the system to be extended easily and quickly as business needs change.
- **Documentation Quality** – With over 6,000 pages of help, TimeScape is one of the best documented solutions in the financial markets, with usage examples for all applications and APIs.
- **Validation capability** – TimeScape’s extensive validation capabilities increase data consistency across the business and reduce manual intervention, thus freeing up staff to focus on more important activities and reducing data costs and operational inefficiency.
- **Regulatory compliance** – A comprehensive auditing process allows LBBW to be fully aligned with compliance requirements.

ABOUT XENOMORPH

Xenomorph provides trusted data management solutions to many of the world's leading financial institutions.

The company has more than two decades' experience managing large volumes of complex data and analytics.

Over that time, we have consistently reinvested in our technology, culminating in our latest generation enterprise data management platform TimeScope EDM+.

Our software is built to be future-proof. With our rules-based single-stack architecture, flexible data model, easily configurable workflow engine and integrated feature updates, TimeScope EDM+ empowers you to address any future requirements. It can be operated by business users without any prior programming expertise, which means it offers a truly agile and cost effective solution to address evolving business, regulatory and technology trends.

The platform also excels at managing and validating model-derived data, thereby enabling firms to address their model risk management challenges by making sure inputs and outputs of business critical models are always validated and kept in sync.

For more information on Xenomorph, our clients, services and solutions, please see www.xenomorph.com.

Landesbank Baden-Württemberg (LBBW) is an international commercial bank, as well as central banking institution to savings banks in Baden-Wuerttemberg, Saxony and Rhineland-Palatinate. With total assets of EUR 374 billion and some 13,000 employees (as of 30/12/2010), LBBW is one of Germany's largest banks and is the most important by far in its core Baden-Wuerttemberg market.

In addition to its private customer business and its client-oriented capital markets business with banks, savings banks and institutional investors, LBBW focuses on providing comprehensive service to small-to-medium sized enterprises and corporations in order to meet all of their financing needs. Together with its regional retail banks, Baden-Württembergische Bank (BW Bank), Rheinland-Pfalz Bank and Sachsen Bank, LBBW serves more than one million private customers and 27,000 corporate customers – long serving as primary banking institution for many - in its over 200 branch offices. For small-to-medium sized enterprises, receiving support in the tapping of international markets, as well as having access to expertise in innovative and complex financing, is crucial. In order to carry this out, LBBW maintains a network of 26 offices worldwide. Specialised subsidiaries - such as in the areas of leasing, factoring, real estate and asset management - complete the LBBW group's in-house range of products and services.

www.lbbw.de