

The top 12 Qlik[®] solutions in financial services

See the whole story that lives within your data



Top 12 solutions in financial services:

- 1. Sales performance
- 2. Profitability attribution
- 3. Loan portfolio performance
- 4. Credit pipeline analytics and forecasting
- 5. Branch performance
- 6. New business volume and pricing
- 7. Limits and exposures
- 8. Scenario modeling and stress testing
- 9. Counterparty credit risk and CVA
- **10.** Claims management and analytics
- **11.** Regulatory submissions
- **12.** Underwriting and pricing rating factor analysis

The top 12 solutions in financial services today

For more than 15 years, Qlik has been used by the world's largest financial services firms to build solutions to some of their most challenging business problems.

Olik's Visual Analytics Platform is now in use across thousands of companies in different parts of the financial services supply chain, from retail banks, brokers, wealth managers and agents, through to investment banks, exchanges, insurers, central banks, and regulators.

Olik apps are used by teams in head-office functions like group finance or risk, and also out in the field by sales teams, insurance claims agents, and bank branch managers. Given Olik's wide-spread use it was difficult to compile a list of top 12 solutions — we actually started with a list of more than 60, and then carefully filtered it down to some of the solutions that are the most popular, and offer the greatest business value.

The solutions featured on the following pages are examples of applications we have seen time and time again, deployed by numerous customers in different markets all over the world. In many cases we see regional variations of these solutions — designed specifically for a local market, local product, or local regulator. With offices in all of the major global financial centers we are able to offer solutions appropriate for any local requirements, and advise on how other firms have solved similar problems.

A selection of sample applications are available at **sense-demo.qlik.com/** and your local Qlik office can give advice on how to get started.

Citigroup, Inc. sees faster and more confident decision-making, cost reduction, reduced risk, and more cross-departmental use of data from their use of Qlik. **JJ**

 Christopher Powers, Vice President, Citigroup, Inc. Source: TechValidate. https://www.techvalidate.com/tvid/7DE-354-958

Sales performance

The business challenge

Customer and prospect lists often count in the thousands, presenting sales staff and advisors with the overwhelming challenge of determining which call to make and which product or service to pitch. With often aggressive sales quotas to reach each period, sales managers are tasked with coaching staff, in helping identify, explore, and execute on opportunities. Instances of miss-selling have led to increased regulatory oversight into product suitability and product performance. Such pressure adds to the fine balance between maximizing wallet share while pitching products that match client risk and product suitability profiles.

Qlik's approach with the customer

Olik's associative model empowers sales staff and leadership with the answer to the core question, "Which customer or prospect should I be speaking to?" By connecting data from diverse data sets (e.g., product holdings, customer demographic / life stage, market movement, or company announcements), advisors can explore a list of relevant facts from which to base a conversation, deepening their trusted advisor status with their customer, and ultimately transacting when relevant ideas are pitched. By selecting a subset of qualified clients (risk profile / product suitability), advisors can quickly identify call lists of those clients with potential for cross sell, and product fit. Olik's unique comparative analysis capability enables sales leaders to model activities of high performing sales staff to provide an objective coaching dialog across their teams. Rather than the mindless creation of periodic reporting decks, Qlik's storytelling functionality, along with automated data sourcing and preparation, ensures that sales meetings require minimal preparation and that findings can be explored and resolved during the meeting and acted upon without delay.

The business value delivered

By applying Qlik's visual analytics platform to their financial advice business, Australia's BT Financial Group (part of the Westpac group) attributed a 96 per cent improvement in sales productivity in a single year. Rather than simply consuming static sales call listings, advisors are encouraged to question, explore, and interact with these living applications, teasing out the clients who represent the biggest opportunity on any given day.



Example: Qlik being used to monitor volumes being traded vs. margins.



Example: Qlik being used to monitor variance in various measures across a sales team.

With Qlik, CaixaBank overcame challenges related to seeing and making sense of their data. Now, Qlik supports many of their data analysis needs.

 Xavier Gonzalez Farran, IT Director, Caixa Bank Source: TechValidate. https://www.techvalidate.com/tvid/21E-1C1-A8E

Profitability attribution

The business challenge

Most firms can give you accurate information on their profitability as it is a fundamental part of their operations. However, if you ask the business leaders which regions, products, teams, or individuals are the biggest contributors to their profit margin, then they can often struggle to produce credible answers. This is because, although they have good data on the number of units or days sold — often by region, team, or product — it is uncommon to have accurate data on all of the costs of a specific product or service, particularly when operating in multiple regions. Calculating profitability comprehensively would require a clear picture of both costs and sales, consolidated in a single place in order to make comparisons. Firms who operate in different countries, often with different systems for managing CRM and finance, have the biggest challenge.

Qlik's approach with the customer

This is exactly the challenge faced by one of the largest global banks. With more than 30 CRM systems, and 16 Finance systems, the idea of calculating profitability attribution seemed like a distant dream. The initial step was to use Olik to bring together the sales data from all of the CRM systems and produce a consolidated view of customer data - joined together by some common keys. The CRM data was live after only 12 weeks, and a number of apps were built to start to track sales performance. At the same time a similar project to join the finance data together was kicked off. This had similar challenges, but was made harder by the fact that some finance systems store granular data where as others only store aggregate information. Once the finance data was in place, an initial app was built which allowed the user (in this case the group CFO) to select a region, business unit, sales manager, product group, or individual product or sales person - and get a detailed view of the contribution that the selected made to the overall P&L of the business. This was an enlightening experience which initially resulted in some surprises for the senior management - sufficient that they were able to make wholesale changes to some of their business units. After a short period of testing with senior management, a version of the profitability app was rolled out to more than 300 sales managers who now use this information to conduct their 1:1 sales reviews.

The business value delivered

The business value delivered by this project has been substantial. Sales managers now have very detailed data to use during their sales reviews and sales reps can understand how they are contributing to the business (or not) and are able to make changes quickly when a strategy is not working. Marketing teams are able to make strategic decisions on which products should be marketed in each region, and are able to achieve much higher conversion ratios. Most importantly, the senior management of the firm can see a high level picture of what is working, and where — and they can use this to make strategic plans for hiring, pricing, marketing, and distribution. The information delivered by this app is critical to the overall strategy of the company, and is an approach we would recommend to any customer.



Example: Linking sales data to a P&L is essential when measuring profitability.



Example: Tree-maps can be used to highlight profitable areas within a portfolio.

⁶⁶ HDFC Life attributed 17% overall business growth over 2 years to Qlik while at the same time saving \$400,000 and deploying in less than 4 weeks. **JJ**

HDFC Life



Loan portfolio performance

The business challenge

Analyzing the performance of a loan and leasing portfolio is complicated by the multiple distribution centers, legacy systems, ubiquitous funding structures, unique product attributes, multiple currencies, and disparate call / collection center management structures.

From the day-to-day call center priority matrix to the strategic purchase and disposition analysis, the firm needs an accurate, complete, and timely view of the performance of the portfolio. These data sets include yield, matched rate cost of funds, non-interest income delinquencies, charge-offs, allocated capital, and even the full cash flow projection of every instrument.

Without a modern analytics platform that consolidates these factors and provides complete visibility throughout the portfolio, the organization puts itself at un-necessary risk of making incorrect decisions.

Qlik's approach with the customer

Olik's approach is to eliminate the delays and provide all of the data necessary from loan and instrument accounting systems. This complete picture transforms the organization's decision making process by providing meaningful, actionable insights to every department and every level of an organization.

Qlik's ability to consolidate multiple data sources into one application is second to none and this historical view provides a clearer picture to the forecast process.

The business value delivered

Several examples of Qlik Financial Services customers achieving success in this space include:

- A top US Regional replaced the static 200+ page Quarterly Credit Review with Qlik, and demand for 1st Generation BI systems have tumbled.
- A Top 5 Global Bank applied Basel II and Basel III capital to its entire Commercial Loan book at the instrument level, which provided visibility to impact of regulatory changes and was later utilized to measure Return on Risk Weighted Capital for each instrument and aggregated at every conceivable combination of business dimensions.
- A mid-market Financing organization enabled collaboration between Sales, Credit, Operations, and Finance groups through a single app that analyzed delinquencies, non-accruals, and risk concentrations through vintage and expiration analysis. This information was provided on a daily basis as opposed to the prior process of waiting 5-7 days at the end of the month to close the books.
- A global bank delivered daily visibility on more than 2 billion positions to thousands of credit analysts across the globe.

Traditional bottlenecks created by legacy BI systems have been removed and replaced with a fully transparent and timely view of the business. Removing the janitorial process of extracting the data and creating a "shadow IT" is now a requirement, not an option.



Example: A Qlik app showing the concentration of risk within a consumer credit book.



Example: Showing lines of credit on a scatter plot allows managers to find low risk customers with the highest margin.



Example: Examining the cumulative charge-off losses from loans of different vintages.

We saw the speed with which Olik allows interrogation of data as the key to better decision making and improved intelligence.

 Mark Tansley, Portfolio Management Information Manager, Nationwide Commercial

Credit pipeline forecasting

The business challenge

Growth in profitable originations and the ability to properly manage the risk of a credit portfolio is traditionally done through static reporting and spreadsheets, at aggregated levels built in siloes and delivered with unacceptable delays. This fact has led organizations to make critical credit and pricing decisions based on an incomplete picture, or worse — gut instinct. Credit officers need to work with their sales managers to monitor the pipeline of inbound deals. It is essential to monitor not just the size of the deals, but the credit quality — and track that credit quality over time. It is important to see the credit quality at a detailed level, and to be able to find the root cause of a downward trend.

Qlik's approach with the customer

Olik's approach is to eliminate the delays and provide all of the data necessary from origination, credit, and pricing data sources. This complete picture transforms the organization's decision making process by providing meaningful, actionable insights to every department and every level of an organization.

Qlik's ability to consolidate multiple data sources into one application is second to none and this historical view provides a clearer picture to the forecast process.

The business value delivered

Several examples of Qlik Financial Services customers achieving success in this space:

- A top US Regional significantly reduced the credit decision time with Olik that resulted in both a significant one-time pull through of business volume and an improved perception by the mortgage broker market.
- In the first week of using Qlik, a global bank found that 10 percent of the deals in the pipeline were not properly assigned to a Credit Officer due to a flawed spreadsheet process. This flaw was immediately addressed and the spreadsheets were replaced by the Qlik platform and rolled into a production environment in 45 days.
- An Equipment Leasing firm recognized negative trends in their approval ratios and adjusted their credit decision models accordingly for the purpose of avoiding adverse selection. This adjustment led to a better relationship with the dealer network and ultimately higher conversion ratios as well.

The mastery of data and insights in pipeline management leads to a master in pipeline forecast management. Not only allows for actionable analysis to be put in front of the entire organization in a timely manner, but done in a way that allows the organization greater visibility in future results.



eads by Statu

Example: Using Qlik to monitor the credit quality of the pipe.



Example: Looking at LTV vs. FICO scores in the mortgage book of a private bank.

Overseas-Chinese Banking Corporation Limited improved their decision-making agility by 50% – 74% with Qlik. JJ

 Ken Wong, Vice President, Overseas-Chinese Banking Corporation Limited
Source: TechValidate. https://www.techvalidate.com/tvid/996-CCC-45C

Branch performance

The business challenge

Since the advent of automatic teller machines (ATM), internet banking, and most recently bank apps, the nature of the branch network has undergone significant transformation. Next generation branches are often built around the vision of deepening customer relationships through advice on wealth planning and larger commitments such as business and home lending, all while still providing cash and transaction facilities. As branch interactions are the only opportunity for bankers to meet their customers face-to-face, they present a unique opportunity to provide advice, update client profiles, and educate them accordingly on products to meet their life-stage. Banking executives need transparent, consistent performance insights across their network to underpin objective coaching with branch managers, measure effectiveness of local/ global marketing campaigns, and to offer training to staff in order to increase product penetration and product referrals.

Qlik's approach with the customer

Olik's associative model affords branch staff and leadership with transparent, consistent performance measures across their branch network. Olik's visual analytics platform encourages exploration, enabling branch management to examine product referrals by teller staff, to foster training and modelling around successful branches and staff through comparative analysis.

Through visibility of client life-stage, transaction history, and product holdings, teller staff and advisors can quickly identify opportunities to educate customers on products to protect (insurance) or to plan for the future (financial planning). By using transparent leaderboards across and within branches, bank executives can incentivize productive staffers by sharing their success, and institute healthy competition across the network. By visually exploring product risk / complexity with client holdings and sales patterns, bank executives and compliance staff can quickly identify and remediate any miss-selling and retrain staff where needed.

The business value delivered

By examining transaction patterns of its customers, teller staff can be prompted to enable customers on digital channels for high cost / low revenue interactions such as bank transfers and account balance enquires. Through interactive visibility of core bank processes and customer effort / net promoter score, branches can reduce time to product approvals and settlement, simplify application steps, and ultimately write more business, through continuous focus on application progress.



Example: Measuring the relative performance of field sales teams.



Example: Analyzing bank branches within a short drive from a location.



Example: Looking for price sensitivity in a loan portfolio.

Glik's associative model helps me see the whole story within my data so I can make better, more informed business decisions. **JJ**

 Steve Walker, BI Domain Lead - Reporting & Analytics, ANZ Bank

New business volume and pricing

The business challenge

Analyzing new business volume begins with looking back at the pricing and volume history. The complexities of understanding the projected lifetime profitability go well beyond Interest Income and AUM to take into other key factors such as Funds Transfer Pricing, Estimated Credit Loss, Allocations of expenses, and perhaps most importantly the allocation of Economic & Regulatory Capital. This risk adjusted view is the only way to understand the true trends of the business and gain visibility into pricing performance.

Different geographic, product, and legacy system siloes create inconsistencies, errors, and an incomplete view of the total pricing position of an organization. Further, the challenge of combining the results with external competitors to truly optimize pricing performance adds a new opportunity for inconsistent practices.

Qlik's approach with the customer

Olik's approach is to eliminate the delays and provide all of the data necessary from origination, credit and pricing data sources. This complete picture transforms the organization's decision making process by providing meaningful, actionable insights to every department and every level of an organization.

Qlik's ability to consolidate multiple data sources into one application is second to none and this historical view provides a clearer picture to the forecast process.

The business value delivered

Several examples of Qlik Financial Services customers achieving success in this space:

- A top global bank delivered an FX pricing dashboard that combined the pricing and profitability matrix with the conversation ratios to its sales staff. This led to specific targeting of new business opportunity and resulted in increased revenue and improved operating ratios.
- A dealer finance organization incorporated the pricing equation at the deal level to determine opportunities in its Economic Capital structure. Clear visibility to underutilized capital and specific, actionable insights pushed the sales organization to achieve higher volumes and higher Return on Capital.
- A leading Financial Services organization utilized the Olik platform to create accurate and timely analysis of the impact on pricing discounts to the client hurdle rate. This was presented in a "What If" format at the time of pricing the product and resulted in higher profitability per customer and \$3.0 million increase in yield.

Pricing data drilling all the way through the Return on Equity and Capital Utilization metrics is complicated, but Qlik's leading visual analytics platorm has provided Financial Services organizations the ability to increase volume, increase profitability, and understand the impact of risk based pricing decisions to achieve growth and higher profitability.



Example: Using machine generated narratives to comment on credit distributions.



Example: Using a scatter matrix to measure multiple measures and dimensions in context.

Glik has helped us reduce the number of custom reports. Now, users have direct access to the information they need and can analyze it from many different aspects. **J**

Xavier Gonzalez Farran, IT Director, Caixa Bank
Source: TechValidate. https://www.techvalidate.com/tvid/728-B10-76D

Limits and exposures

The business challenge

Investment banks need to keep a close watch over their trading books for all asset classes. They need to understand how well capital is being utilized by traders, and how close they get to limits which are set for each desk / trader. They need to know if capital is being under-utilized so that they can lower the limits and allocate the capital more effectively elsewhere. Conversely, they also need to know if limits are being breached, so that limits can be increased if necessary, or traders disciplined. Greater agility in capital allocation can lead to a higher return on capital.

As well as limits, it is important to understand exposures, and these need to be measured by a number of different dimensions these include: Geography, Book, Desk, Asset Class, Counterparty, Credit Rating Band, or bucketed by Return on Equity (RoE) or Return on Assets (RoA), or Utilization.

Firms with good historical data also like to compare Expected Potential Exposure (EPE) across different time periods — to see how a portfolio's risk profile trends over time. Having frequent access to this information can help a COO to allocate capital more effectively. It is also essential when working with risk managers to make sure risk is distributed in line with a firm's risk appetite.

Retail banks have a similar need to manage Limits and Exposures. They need to analyze the retail or commercial credit book to see how well capital is allocated, and tend to filter the credit book on a different set of dimensions. These often include: Credit Manager, Credit Officer, Geography, Probability of Default (PD) basket, RoE, RoA, % Utilization, and Economic Group. This is made harder by the fact that firms always have a large volume of data, and that it is usually stored in multiple systems, with varying levels of data quality. The data needs to be joined, aggregated, and clean before it becomes useful.

Qlik's approach with the customer

Olik has worked with numerous firms to build Limits and Exposures apps - it is one of the most frequent challenges we are asked to address. For the trading book, risk managers need to identify where concentrations occur, grouped by counterparty, business sector, product line, collateral, netting set, or region. It is an essential tool for identifying where risk is concentrated, and can assist in many decisions such as hedging, or limit setting. Traditionally it has been difficult for risk managers to get this kind of information, but with Olik's associative model it is possible to perform aggregations on-the-fly, and answer any question that occurs during the trading day.

For the credit book, Qlik apps normally allow the users to obtain an holistic view of the book, and often contains a tree-map, helping users to quickly identify which credit managers have the best utilization of capital and which do not. Lines of credit with poor utilization stand out, and it is easy for the user to know who to talk to about the problem. It is also easy to see loans by credit quality basket, and see which credit grades are performing.

Credit managers can see which customers are eligible for limit extensions - often because they are making a high return with an acceptable level of risk. Conversely, it is also easy to spot poor performing lines of credit, or those with a low RoE based on their risk profile - and can find out who is

responsible and act accordingly. Apps like this are very useful for determining which employees are responsible for customers with the highest profit relative to their credit score. This information can also prove valuable when determining compensation.

The business value delivered

The business value of managing limits and exposures is significant. It is fundamental to a bank's profitability. Improvements include better allocation of capital, higher returns with a lower risk profile, reduced concentration risk in the trading book, higher hedging accuracy, more balanced counterparty exposure, and improved collateralization.



Example: Looking for under-utilized credit in the commercial banking book.

¹¹ Thanks to Qlik, customer data is now available to us more quickly, more clearly, and more comprehensibly than before. This transparency is a significant prerequisite for the efficient organization of our customer relations. **JJ**

 Markus Zwyssig, Member of the Board, Berenberg Bank in Switzerland

Qlik Q | Financial Services

Scenario modeling and stress testing

The business challenge

Banks and insurers have to complete stress tests both as part of their every day trading operations, and as part of their compliance with a range of different regulations in different regions - these regulations include Basel III, Dodd-Frank (CCAR), and Solvency II, along with many others. They are all quite similar in concept; the company has to define a series of different scenarios that it might be subjected to during its business operations, and then test how the company would cope with a range of different external stresses, based on the portfolio of assets it currently holds, or in the case of an insurance company, the risks insured.

The objective of the tests is to understand the sort of market conditions that would break their business. These scenarios are run through a simulation process, which tests each scenario with a range of different values. Often this entails testing thousands of scenarios against hundreds of different stress conditions, and has traditionally taken a long time to conduct. The reason this takes so long is that the data needed usually comes from a multitude of sources, and so complex data modelling and aggregation is required.

Once the data is complete, the models need to be produced — and are normally complex. The scenario construction is also complex, and the actual tests are compute-intensive and typically take many hours to run. If you measure the entire process, stress tests often take many months to conduct.

Qlik's approach with the customer

Olik has built stress testing infrastructures for a number of banks and insurers and is used in multiple ways: a) To capture, aggregate, and clean up data from the multitude of sources needed to construct a stress test. These include positions, market data, pricing vectors, legal entities, and portfolio data. b) To model the different stress conditions, and the range of different parameters to be tested. c) To model, build, and execute the stress testing models required to complete the tests. d) To compare the thousands of results produced by the tests to understand the conditions under which the business would fail. Olik then takes these results and visualizes the output, which makes it easy for risk managers to understand the results, and highlight where changes need to be made. The key here is that Olik's associative model allows the data to be prepared quickly — and it allows the data and risk aggregations to take place instantly, supporting a flexible approach to modelling, and dramatically reducing the time required to run a stress test.

The business value delivered

The business value achieved here is simple; the time taken to define, build, and run the stress tests is dramatically reduced — from months to weeks to build the infrastructure, and risk managers can move to an agile, more ad hoc mode of operation. Once the infrastructure is in place, tests can be varied and run on demand, sometimes taking just a few minutes — enabling intra-day stress tests to be conducted as portfolio risks change. Compliance can be met more easily, but more importantly firms become agile — and can change their risk appetite as market conditions change.



Example: Smart Data Compression is being used here to show a heat map of a massive scatter diagram with millions of data points.

Deloitte Consulting improved their decision-making agility by more than 75% with Qlik.

 Ashwin Admala, BI Architect, Deloitte Consulting Source: TechValidate. https://www.techvalidate.com/tvid/755-A13-537

Counterparty credit risk and CVA

The business challenge

Following the global issues stemming from the credit crisis of 2008, deal makers have placed greater emphasis on the risk associated with a counterparty failing to make good on contracts. The field of counterparty credit risk explores this exposure through complex interaction between a counterpart's probability of default, exposure at default, and ultimately loss given default. A range of statistical techniques such as Monte Carlo simulation, concentration analysis, and correlation analysis are used to estimate this exposure, and in turn appending additional risk premium to deals (known as Credit Value Adjustment or CVA). CVA losses during the 2008 crisis exceeded actual losses, and have become the focus of greater attention.

Qlik's approach with the customer

Qlik's associative model affords traders and deal makers the ability to model counterparty exposure to a number of emerging threats, either on a single name or portfolio basis. Olik customers commonly use Olik's search functionality to explore the exposure to a counterpart where they may be:

- · Associated with a struggling economy or where geopolitical tension arises.
- Suffering from an industry in decline (resources for example).
- Exposed to adverse trading conditions (housing downturn, prolonged unfavorable foreign exchange rates).

Counterparty exposure is also conducted across a portfolio to explore limits and concentration against single names, industries, or geographies.

The business value delivered

As data is loaded into the Qlik platform incrementally, risk managers can view the evolution of the portfolio overtime, attributing the changes to trading activity or that of the market exposures. Counterparts with accelerating concentration can be examined more closely, with review to their associated CVA. By associating pricing - trade ratios, risk managers can gauge the likely impact of adjusting a client's CVA, so that trading revenue impacts can be modelled for.



Example: Looking at CVA attribution against the trading book of a large investment bank.

Glik has enabled us to operationalize our data in a visual way, which was impossible when we used Excel as our main tool for reporting.

- Julie Molnar, Senior IT Manager, Westpac Banking Corporation Source: TechValidate. https://www.techvalidate.com/tvid/333-44E-753

Claims supplier management and analytics

The business challenge

The insurance industry is currently under significant pressure from a market where premiums are falling, claims are increasing, and fraudulent activity continues changing its shape. Margins are very tight and insurers are under pressure to streamline their claims departments.

One of our large International Home and Motor Insurance customers needed to take action to reduce their claims costs, both internally and externally. They didn't know which claims suppliers provided the best value for money and whether they were being charged too much for the service. They also had too many claims suppliers on their books and were not able to provide incentives to the best or weed out the worst. The Insurer also suspected a growing trend in claim inflation by claimants but couldn't bring together the required data to look for the trends and patterns.

Qlik's approach with the customer

Olik worked with the customer to build a prototype which pulled together the required data into a data model that the claims analysts could begin to interrogate. Using Olik Sense[®], the first discovery for the analysts was regarding the quality of their data. They realized that they had many duplicate records for suppliers, incomplete records, and incorrect data. Knowing that it would take a long time to correct the source records, they initially used the Olik data load process to correct and compensate for as many of the data quality issues as they could. Next, the analysts began to group their claims suppliers into different categories and were able to identify the high and low performers. Over the course of several weeks they created a Olik app that provided the claims supplier management team with an accurate and up-todate view of all the claims suppliers across both home and motor.

The business value delivered

The Claims Supplier Analysis allowed the claims department to reduce the number of claims suppliers on their books by 37 percent. It also initiated a data clean-up project to ensure that the data in the source system was accurate, complete, and valid. The app also allowed the supplier management team to identify unfavorable terms and conditions with their suppliers and to negotiate better rates and deals for both themselves and their customers. For example, they were able to concentrate on a smaller number of claims law firms that offered a superior service, success rates and at competitive rates. In the first country that used the app, the insurer estimated savings of more than \$3 million in the first year and considerable future savings. The insurer is now rolling out the app to the claims departments in other key countries.



Example: Looking at loss ratios in a specific region.



Example: Reviewing loss ratio trends and drilling down to the underlying risk factors.

To compete in a very competitive market, we needed a solution that harnessed all of our data, presented it in a timely manner, and provided greater insight and operational effectiveness for our company. Qlik is a critical decisionsupport solution for Lockton, delivering reports and analysis in minutes and putting information at our brokers' fingertips. **J**

- David Robinson, CIO, Lockton Insurance

Regulatory submissions

The business challenge

The worlds largest banks (GSIBs) are now required to meet the principles defined by BCBS239 — Principles for Effective Risk Data Aggregation and Risk Reporting. BCBS239 requires banks to be able to mostly "automate the aggregation of risk data in order to minimise errors." And the risk data needs to be available in such a way such that the bank can meet a broad range of reporting and ad hoc analysis activities. Meeting these standards can be challenging, expensive, and utilize the time of many staff within a large bank. Banks are under continuous pressure as the regulatory demands increase, and the requirements evolve over time.

Qlik's approach with the customer

Qlik software is used by many of the worlds largest banks to help meet the requirements of BCBS239 and is used in a number of different ways.

Firstly it is used by some banks to act as a repository for the aggregated risk data. This is achieved through the use of modelled QVD (Qlik Data) files. They can take advantage of Qlik's powerful data management features, and are able to consolidate data from multiple data sources, which generally use a multitude of different formats to store the data.

Secondly, Qlik is used to perform some or all of the risk data aggregation itself. This is achieved using Qlik's Associative Model, which allows custom aggregations to be calculated on the fly, giving risk managers the flexibility to ask any questions of their data as the demand arises through the use of automatically generated hierarchies.

Thirdly, Qlik is used to present the results of the risk data aggrgegation to management through dashboards or guided analytical apps. And finally, the Qlik NPrinting[™] report production product is used to distribute paper, XBRL, MS Office, or pdf-based reports when required.

The business value delivered

By introducing Qlik software into the BCBS239 process, our customers have been able to achieve compliance with the principles without the need for expensive and time consuming data warehouse based solutions. Equally, where the bank has an extensive data warehouse in place, Qlik software has been used to help combine data from the EDW and other risk data sources (e.g. Governance, Risk, and Compliance systems) to provide a single repository for all risk data and associated analysis and reporting. For the first time, some banks have been able to combine and visualize risk data from across their Credit, Market, Liquidity, Operational, and Compliance based data sources. And this has been achieved across multiple business divisons and geographies.



Example: An FDIC report for selected banks in the US.

The innovative in-memory design of Qlik means that we can now generate inquiries and analyses in the shortest response times, which in turn means that even large quantities of wideranging data can be processed in near real time.

 Roger Dürig, Chief Operating Officer, Finter Bank Zürich

Qlik Q Financial Services



Underwriting and pricing rating factor analysis

The business challenge

A leading European insurer was looking to identify new data that could help to improve their Underwriting and Pricing models. As with many Property and Casualty Insurer's, our customer was struggling to differentiate themselves in the market and wanted to be able to offer their customers more relevant products, terms, and prices. They needed to attract lower risk customers without resorting to the traditional standard stereotypes that defined insurance pricing. They were also keen to make use of external data to influence their pricing models.

Qlik's approach with the customer

The customer selected Olik Sense based on its ability to easily blend data from multiple internal and external data sources. Another key factor was Olik's associative model, which allowed Underwriting Analysts to see their data in a new way and to better understand the relationships between the rating factors. The customer wanted to take the pricing curves produced by the pricing engine, and monitor the accuracy of their models. By constantly monitoring the delta between forecasted and actual losses it becomes possible to gain a much better understanding of model performance, as well as to understand when a model requires re-calibration.

The business value delivered

The Qlik Sense app is now being used by the Underwriting and Pricing Analysts and is now being further extended across different product lines. The app has initially helped to make subtle improvements to the existing pricing scorecards with more radical modelling and analytics being planned for the future. Feedback has been extremely positive with users now able to answers questions that they had been struggling with for some time. The customer is using this new Qlik based analytical approach to increase new business acquisition rates, drive a better conversation with customers around risk mitigation, and better understand customer sentiment from social media.



Example: Analysing pricing and premium trends.

⁶⁶ Qlik has quite simply helped every user from all corners of the organization do their job better. The amount of information and visibility Qlik has armed our employees with has been extremely beneficial to our business processes and efficiencies. **99**

 Tim Shaheen, Vice President, Pacific Life Insurance Company, Life Division

See your whole story in financial services with Qlik®

Qlik provides intuitive solutions that enable companies to better visualize and explore information, generate insight, and make better decisions. Qlik has more than 39,000 customers worldwide, including 47 of the top 50 financial services firms listed in the Forbes 2000 for the Americas and EMEA.

Additional resources:

Thank you for reading this far. Outside of the top 12 we have an extensive library of other solutions within all aspects of financial services, and we would love the chance to show you. Please contact us any time for more information.

For more information, visit qlik.com/financial-services.

Olik[®] (NASDAQ: OLIK) is a leader in visual analytics, providing an intuitive platform that allows users to see the whole story that lives within their data. Approximately 39,000 customers worldwide rely on Olik solutions to explore the hidden connections within their data that lead to insights that ignite good ideas, including 47 of the top 50 financial services firms listed in the Forbes 2000 for the Americas and EMEA.

Online content includes:

Qlik Community is an online community of more than 100,000 members who discuss all aspects of Qlik, and is a great source of inspiration: https://community.glik.com/welcome

We have an active group of FS professionals on Linkedin with more than 500 members:

https://www.linkedin.com/groups/8228694

We are active on twitter: @QlikFS @duncanash1 @PaulVanSiclen @StuartPWard @Kirbsda

We also blog regularly: http://global.qlik.com/us/blog/topics/business-functions/financial-services

Please look at the demo section on Qlik.com: http://sense-demo.qlik.com/

There are also numerous Qlik FS videos on YouTube. Please use our online resources and contact us with any questions you might have about how Qlik can help your business.

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