

Spotlight on Market risk management

Market risk management: standing up to increased scrutiny

The never-ending innovation of ever more complex financial products such as recent electricity, gas and fossil fuel options, has made risk management of the trading functions an ongoing challenge for banks as well as for large corporates, requiring considerable investments in human and technological resources. Moreover, modern risk management does not only focus on reducing the risks of suffering large unexpected losses, but it also encompasses for example the determination of the shareholders' risk appetite and plays an essential role in the improvement of returns and the creation of new business opportunities.

Summary case study

The issues

A multinational financial institution was concerned that an unexpected and significant loss on a trading portfolio could indicate wider issues within the market risk framework.

The approach

KPMG's Financial Services practice reviewed and benchmarked the trading and market risk functions, focusing on their interfaces and reporting lines as well as the policy underlying the identification, measurement, monitoring and control of market risks across all asset classes. Areas requiring improvement were highlighted and technical advice given on the issues to be addressed.

The benefits

Our client has been able to expand its trading business, confident that the underlying risk management framework is up to the challenge. The result has been the addition of further asset classes and a significant increase in trading profits.



The case study in more detail: benchmarking review delivers robust industry best practice

When a multinational financial institution suffered a significant and unexpected loss on a trading portfolio, senior management questioned how it had come about and whether it was an isolated incident or the result of wider issues within the market risk framework.

The experience to challenge perceptions of risk

KPMG's Financial Services practice was chosen by the Board to review the trading and market risk functions, focusing on the interaction between them, their reporting lines and the policy underlying the way in which market risks are identified, measured, monitored and controlled across all asset classes.

The engagement challenged the client's perception of their own risk appetite, while overcoming the internal tensions between the trading and risk functions. By assessing the risk management policies and quantitative methodologies, we were able to:

- compare the institution's market risk framework to its peers.
- highlight areas requiring improvement.
- provide technical advice on the issues to be addressed.

KPMG's Financial Services practice could achieve this because we were able to mobilize a global team, all of whom had hands-on experience of trading and risk management. We applied this real-life experience to produce a practical approach to the trading/risk dilemma.

Results: the confidence to expand the trading business

The benefits of our work for the Board included:

- a transparent articulation of risk appetite.
- more robust governance of risk management, with clearly defined reporting lines, roles and accountabilities.
- knowledge that the market risk framework is both appropriate for the current trading business and scaleable for future growth.
- a risk management environment that compares favorably with industry best practice.

The firm's client has subsequently been able to expand its trading business, confident that the underlying risk framework is capable of withstanding the challenge. The result has been the addition of further asset classes and a significant increase in trading profits.

KPMG's Financial Services practice: the practical experience to deliver effective strategies

KPMG member firms' market risk management professionals have considerable practical experience in trading, risk management and trading control gained in international investment banks and non-financial trading institutions. The practical knowledge of the team members that have worked as derivative traders, market risk managers or product controllers, enables KPMG member firms to offer a broad variety of effective strategies for banks, asset managers and insurance companies as well as corporate and public sector institutions including energy and commodity traders. Our range of services includes:

Front and middle office systems

We have consolidated experience in front office issues, both in terms of product coverage (plain vanilla and structured derivatives) or with respect to the features and functionalities of the main front and middle office systems. In this context, we have been able to offer assistance to our clients as a global advisor throughout the whole project with reference to all relevant aspects.

Risk management framework diagnostics and design

We evaluate existing risk management and trading control frameworks, suggesting appropriate benchmarks against which to compare them. We identify any weaknesses in these frameworks and, focusing on the specific nature of the business being conducted, offer practical and appropriate advice on how the controls could be strengthened.

Preparation for internal model approval

KPMG's Financial Services practice has extensive experience in helping institutions through the review process required to gain regulatory approval for using an internal Value-at-Risk (VaR) model to calculate regulatory capital. We can:

- provide a quality assurance or challenge role as part of the steering committee.
- perform a gap analysis between the existing operating environment of the VaR model and regulatory requirements, suggesting remedial actions to address the gaps.
- independently validate the VaR model.

Counterparty and issuer risk management

Thanks to our firms' teams of risk management professionals, combining effectively different types of skills, we are able to provide a comprehensive approach to counterparty risk management, covering both the functional and the implementation aspects. For management as well as for regulatory purposes, we not only estimate exposures due to OTC derivatives, SFT and LST transactions, but are also able to develop and implement the corresponding transaction limit systems and risk mitigation techniques. We also assisted several large financial institutions in estimating issuer risk both on debt and capital instruments, enabling them to determine the losses caused by unfavorable price swings due to issuer related factors (specific risk).

Financial performance analysis

We have a long-standing experience in financial performance analysis, assisting our clients with the development of models and methodologies for the measurement and attribution of performances and for the calculation of risk-adjusted performance indicators (RAPM). We also advise on the implementation of monitoring and RAPM reporting tools.

Quantitative model solutions

Our quantitative analysts perform independent validations of both VaR and derivative pricing models. These reviews test the assumptions behind the modeling techniques, giving users added comfort about the limitations of the model. We can also suggest ways of incorporating the review findings into relevant risk and pricing policies.



Pricing and valuation services

We offer financial engineering services to major financial and corporate and public sector institutions operating across such diverse sectors as commercial and investment banking, insurances, hedge and pension funds, multi-utilities, real estate, manufacturing, construction, distribution and services. We not only develop pricing functions and models for a broad range of financial products, including the traditional fixed income instruments and OTC derivatives, but also innovative products such as hybrid credit instruments or energy and fossil fuel linked products.

IAS 32 and 39 compliance

We offer advice on all mark-to-market and fair value appraisals. Using advanced pricing techniques and software we can independently value both single trades and portfolios across asset classes. In addition to assisting

clients with the financial engineering specifications for the implementation of fair value measurement systems, we also work with our Accounting Advisory team to prepare existing portfolios for hedge effectiveness testing to comply with IAS requirements.

Asset and liability management

We are able to provide a broad ranging framework for managing and controlling earnings sensitivity, liquidity risk and future market valuation arising from the balance sheet. We recognize that each client is unique and develop tailored approaches building on in-depth industry understanding, knowledge of the latest techniques and our extensive experience. Whenever we assist with the management and controlling of interest rate risk (based on an Asset and Liability Management approach), we often also implement a liquidity framework (see dedicated spotlight).

Please visit www.kpmg.com/financial_services to learn more about KPMG's Global Financial Services practice.

Contact

Jörg Hashagen

Managing Partner Advisory
Global Head Advisory Financial Services
KPMG in Germany
Tel: +49 69 9587 2787
e-Mail: joerghashagen@kpmg.com

Giuseppe Niolu

Partner
Advisory Financial Services
KPMG Advisory S.p.A.
Tel: +39 348 260 2407
e-Mail: gniolu@kpmg.it

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