Advisory Services

BCBS 239 Compliance

Understanding the key challenges

October 13th, 2015
■ Pursues the **improvement of risk data architecture and reporting systems** as a fundamental prerequisite for strong **risk management practices and decision-making processes**.

■ For the first time, the regulator implies **specific requirements for IT Architecture and data management in banks**. Its objective is to enable a comprehensive view on risk data and processes.

■ Apart from substantial IT implications this regulations, will also have **effects on organizational and operational structure** of the entire risk function in banks.

■ Banks must review their management concept and set **quality standards** regarding risk data, reporting as well as **responsibilities** for compliance on executive level.

■ The second progress report (January, 23, 2015) raises concern of compliance dates and suggests the difficulty for a number of firms to fully comply by 2016.
The regulation calls for more active involvement of the board of directors, which is seen as a practice of good corporate governance.

The board is responsible for oversight while senior management is responsible for daily operations including risk and controls.

The regulation requires the board to not only understand the content of risk reports but to ensure that it receives comprehensive information which is pertinent and accurate to the risks of the firm.

The board should also challenge and review risk appetite and business plans and be assured of the risk controls in place for critical business.
2. The Challenges
Enhancing Existing (and new) Capabilities

The regulation calls for the implementation or enhancement of capabilities such as an “independent validation & quality”, automated reconciliation and other functions which are critical to the production of risk reports that accurately represent the aggregate risks across the enterprise.

The definition of new functions with specific IT, data and reporting knowledge will impose extra costs and operational complexity for the banks.

Similarly, “automated reconciliation” with single source of data requires consolidation of data sources, which cannot be easily achieved in the context of the current regulatory changes.
The regulation calls for enhanced capabilities within the banks to manage the data quality of the risk reports, so that the data is materially complete, with any exceptions identified and explained.

Along with other requirements for on demand reporting and ad-hoc reporting, this will require a flexible infrastructure and an operational environment that can meet demands for high-frequency reporting during crises.

Establishing such a framework necessitates significant change in banks’ operating models that embed a series of control points (e.g. data management controls and forward looking capabilities).
2. The Challenges
Control Framework & Governance (again..)

Data Quality Governance

Deployment of a member per significant data area to the DG Committee:
- Total Data Quality Management responsibility
- Decision preparation for the Risk Committee
- Decision regarding necessary DQ measures and managerial authority regarding their implementation
- Possibility of escalating an issue / problem to the Risk Committee

Central guidelines for the decentralized implementation of a DQ framework with regards to:
- Measurement and analysis of DQ escalation
- Controlling and Reporting (tools, templates)
- Consolidation / monitoring of technical DQ requirements / standards
- Monitoring of processes

Decentralized responsibility in the assigned product / functional areas:
- Data Quality & correctness
- Cause analysis in the case of DQ problems
- Corrections and adjustments
- Coordination of the operative unit

Organizational structure based on a 3 layer model
The regulation calls for an implementation of the principles by 2016, a timeframe which is demanding when considered within the context of other regulations banks are currently implementing and the multiple areas needing change.

The challenge is further compounded by “simultaneous adoption” or the need to apply the principles on a consistent basis across a group.

The deadline for IT implementation falls within deadlines for other regulations, making significant demands on existing bank resources.
2. The Challenges
Technology Infrastructure & Skills

The enhancement of banks’ IT and infrastructure capabilities may require investment, new skills and change management.

This may include, Data Quality / Management solutions, Data Analytics tools, other Risk Reporting tools, the required base Infrastructure, etc.

The cooperation of the new functions necessary and the IT department must be close and new skills (e.g. data quality officers, data management officers, data stewards) must be developed or acquired immediately.
2. The Challenges
Technology Infrastructure & Skills

Advanced Functionality Interface

Standard Functionality Interface

Publication Service
(Channel for Standard Pre-Defined Reports)

Business Intelligence (BI) / Data Analytics Application
(Core Application to Facilitate Data Analysis and Information Viewing)

Data Warehouse
(Services / Solution to Deploy and Manage the Data Warehouse)

Data Preparation and Loading
(Data Preparation Tool)

Operational Data Store
(Integration Layer)

ETL / Data Integration
(Process to Extract Transform Load and Keep Data Updated)

Data Source 1

Data Source 2

Data Source N

Core Banking System

Other Source Applications

Supporting Business Applications
(e.g. Consolidation, Planning and Budgeting)
3. Suggested Approach

The Topic Areas

14 principles of data aggregation and risk reporting in BCBS 239

1. Governance
2. Data architecture & IT infrastructure
3. Accuracy and Integrity
4. Completeness
5. Timeliness
6. Adaptability
7. Accuracy
8. Comprehensiveness
9. Clarity and usefulness
10. Frequency
11. Distribution
12. Review
13. Remedial actions and supervisory measures
14. Home/host cooperation

A. Topic area "IT Architecture"

- **A1**: Risk data models unified or automatically reconcilable across banking group with unified naming conventions
- **A2**: Unified level of detail of data across the group to enable fully flexible reporting
- **A3**: Risk and accounting data to be reconciled
- **A4**: High degree of automation for risk data aggregation, manual steps as an exception only
- **A5**: Strive for single source of risk data per risk type

B. Topic area "Data Quality Framework"

- **B1**: Effective data quality management including automated measurement methods and escalation procedures
- **B2**: Comprehensive data governance for risk data including data owners from business and IT
- **B3**: Documentation of reporting and reconciliation processes
- **B4**: Automatic and manual quality checks in the reporting process

C. Topic area "Risk Reporting Process"

- **C1**: Adaptable and ad-hoc reporting capability with drill-down into various risk dimensions, stress testing
- **C2**: Comprehensive, timely, dependable and adaptable risk reporting capability across all units and all material risks

D. Topic area "Organizational and IT Management"

- **D1**: Risk reporting and aggregation to be mapped into IT strategy / implementation roadmap
- **D2**: Independent validation of standard compliance
- **D3**: Full business continuity capability for risk reporting
3. Suggested Approach

Implementation Approach

- The complex initiative dictates a **phased approach** that comprises an initial Analysis & Design phase (including a diagnostic gap analysis), the implementation of Short-Term and Medium-Term Actions and Monitoring of the Progress and implementation of Long-Term Actions:

### Phase 1: Analysis and Design
- Current State Gap analysis
- Review and alignment of ongoing projects/initiatives
- Project initialization

### Phase 2: Short- and Medium-Term Actions
- A: IT Architecture
  - Design of strategic target architecture
  - Definition of incremental roadmap to transition to target state
  - Definition of controls/data model
- B: Data Quality Framework
  - Analysis, recording & documentation
  - Design & implementation completeness/consistency
  - Design & implementation objectives/planning/quality
  - Definition & implementation governance & processes
- C: Risk Reporting
  - Benchmarking, analysis of risk management
  - Development of risk framework & risk radar
- D: Organizational and IT Management
  - Adjustments to IT strategy and implementation plan
  - Management of individual initiatives

### Phase 3: Monitoring
- Transformation of IT architecture step I
- Implement integrated (risk) reporting
- ... step II

### Phase 4: Long-Term Actions
- A. Strategy & Governance
- B. People & Organization
- C. Processes and Controls
- D. Risk Reporting Process
- E. IT Technology & Architecture
3. Suggested Approach
Implementation Approach

Phase 1: Gap Analysis and Solution Design

1. Gap Analysis of current state based on best practices and regulatory requirements
   - A. IT Architecture
   - B. Data Quality Framework
   - C. Risk Reporting Process
   - D. Organizational and IT Management
     *Aligned to each Organization requirements

2. Solution Design Recommendations
   - Identification of gaps
   - Definition of solution and design recommendations per review area
3. Suggested Approach
Implementation Approach

Phase 2: Planning and Short / Medium-Term Actions
Implementation Support and definition of the required Long Term Actions
(Suggested approach based on experience and what are considered to be the core elements to achieve compliance)

3. Planning and Leading Implementation of a Data Quality Framework

- A – Development of a Data Governance Framework
- B - Development of Data Quality process and practices
- C - Development of Data Management processes
- D - Development of the first version of a Data Catalogue and data definitions
- E - Overall support and supervision of implementation activities

4. Planning and Assisting with the Design of the Required IT Architecture

- A - Development a flexible Data Analytics and Business Intelligence (IT) architecture
- B - Overall support and supervision of implementation activities
3. Suggested Approach
Implementation Approach

Phase 2: Planning and Short / Medium-Term Actions Implementation Support and definition of the required Long Term Actions (Suggested approach based on experience and what are considered to be the core elements to achieve compliance)

5. Planning and Supervising the Implementation of the Risk Reporting Processes
   - A - Overall support and supervision of implementation activities

6. Planning and Supervising the Implementation of Organizational and IT Management elements
   - A - Overall support and supervision of implementation activities
What we have seen in practice is that the following are key for success of such a project:

1. Initiative Ownership
2. Management Commitment
3. Governance Decision Making Process
4. Resources
5. Implementation Program Ownership
KPMG has extensive experience in all relevant topics of the risk data aggregation and reporting requirements covering the four areas of BCBS 239. The illustration below provides an overview of the projects the project team has done for clients for BCBS 239 compliance.
Questions and Answers

THANK YOU
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