

Transforming Governance, Risk and Compliance (GRC):

Empowering the first line
of defense with cognitive
capabilities and enhanced
user experience (UXD)

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Introduction: The business challenges of risk and compliance

Today, business leaders in the financial services sector must not only deal with well-understood challenges— disruptive competitors and unrelenting market volatility—but also with increasingly complex regulations and the dangers of cyber-attacks and sophisticated financial crimes. So, firms are looking for governance, risk and compliance (GRC) solutions that are accurate in their risk reporting, flexible in adapting to regulatory change, and easy enough to use so that they can be deployed to large numbers of users without extensive training.

Next-generation GRC solutions offer the potential to ensure compliance with evolving regulations through transformative business capabilities. They can help organizations coordinate their GRC-related activities across diverse business operations and multiple geographies while ensuring adherence to company policies. The best of these solutions seamlessly integrate domain-specific content and technologies with artificial intelligence and advanced analytics, thereby enhancing efficiency, profitability and competitive advantage. And they offer ease of use that encourages their adoption by those employees who are closest to the customer and involved in the daily operational business decisions that directly impact the organization's vulnerability to risk—the organization's "first line of defense."

New challenges need new technologies

Many financial services organizations are struggling to manage their risk and compliance exposure in the face of ever-increasing challenges. Massive volumes of regulations are being developed across global financial market segments. The risks are varied, the data sources numerous and the relationships between entities are complex. It's simply too much for traditional processes and infrastructure to handle effectively.

The consequences of inadequate GRC monitoring and reporting introduce the risk of regulatory and board censure. Yet, as regulations become more numerous, and fraud schemes and cyber attacks become more sophisticated and more frequent, many organizations are not confident in their existing risk and compliance systems. That's especially true of international organizations that operate within multiple regulatory regimes.

Compliance challenges are monumental—and so are the risks of non-compliance.

- 300 million pages of regulatory content expected by 2020¹
 - Compliance spending by retail and corporate banks has increased more than 60 percent compared to pre-crisis levels²
 - Enforcement penalties total roughly \$321 billion (through the end of 2016) since the 2007–2008 financial crisis³
-

These organizations have difficulty capturing the data they need to fully understand their risk exposure. Traditionally, many firms have addressed the problem by simply adding more staff to their risk and compliance teams. But even with more eyes on the situation, these firms are not confident that they have a complete, accurate and timely view that reflects the full business context and the scope of their risks and regulatory obligations. Business leaders, from corporate boards to executive management, see resources that could be used to invest in new products, build shareholder value and grow the institution, are instead being diverted to processes and systems that ultimately prove to be inadequate.

Current risk and compliance processes are often inefficient and cumbersome, involving an inordinate amount of manual work with disconnected and varied results. Staff can be overwhelmed by the sheer volume of regulations and the number and variety of compliance responsibilities which also distracts from their core business functions. As a result, management has difficulty gaining the commitment and participation of those on the first line of defense, who have other business priorities.

Engaging the first line of defense

Not long ago, many industry leaders viewed GRC as little more than a necessary evil—a cost of doing business, which added little value. Risk teams consisted of a relatively small number of specialists in the organization who only engaged with people in the first line of defense periodically, typically within the context of an annual audit. The relationship was largely interview or questionnaire based, and treated as a “check box” exercise by many. GRC tasks were often seen by the first line of defense as an unwelcome distraction from their daily jobs. Risk software solutions available at the time were often meant for specialists, and focused on risk management use. In general, they were not practical for those on the first line of defense, even when they were available.

However, the attitudes of industry leaders as well as business professionals toward GRC have evolved substantially over the last decade. Organizations are now gaining better participation from those first line of defense stakeholders. As the scale of risk and compliance challenges has grown—along with the volume of data—so too has the number of business managers and subject matter experts who have taken on first line of defense responsibilities. First line of defense business users have increasingly come to realize that risk is not only everyone’s responsibility but also a key part of business operations today. Rather than protesting that they don’t have the time for this, they now fully acknowledge “I own this!”

Having gained this support, it’s incumbent upon organizations to provide the first line of defense with the tools that will enable them to identify risks and take appropriate action to mitigate or remediate those risks. Organizations with multiple, siloed GRC and supporting systems need to ensure that they can identify and manage regulatory obligations across multiple jurisdictions, sectors and regulators. They need to standardize and drive out cost, through process improvements and streamlined methodologies. Additionally, new deployment options such as cloud—which reduce up-front costs and are much more scalable than on-premises solutions—allow them to focus on these improvements without distraction of operationalizing the solutions.

Increasingly, businesses are seeing that with deeper engagement by the first line of defense they can realize value from GRC solutions beyond the immediate risk and compliance functions. The next generation of enterprise-scale GRC platforms offer visibility into the performance of internal controls and a centralized data repository from which to aid decision making for a range of business issues. And artificial intelligence (AI)-enabled GRC solutions bring next-generation machine learning technologies to provide guidance for business users in day-to-day decision making.

Why are financial institutions (FIs) turning to AI-powered compliance solutions?

Recent research indicates there are 3 main reasons why FIs are turning to AI for compliance solutions.

- **FIs’ technical demands are greater than ever.** Massive volumes of data and new regulations have forced them to develop new, often hugely complex systems. Processes around derivatives, valuation adjustments, accounting and AML have all become more demanding and complicated.
- To manage their compliance, **FIs have hired many full-time employees** to aggregate and report on the huge amounts of risk data surfaced daily within their organizations.
- **FIs are moving away from their initial panic in the face of regulation to more measured compliance processes.** After the financial crisis, the shortcomings of an industry riddled with inefficient legacy systems and heavily reliant on manual processes were laid bare. Investment is flattening and fewer major risk and compliance initiatives are being announced; **FIs’ focus has shifted from compliance to performance, and in particular to the efficiencies that automation promises.**

Source: Chartis Research 2018

How AI can transform compliance: Regulatory change management

Regulatory change management is one of the most costly, and resource-consuming challenges facing financial institutions (FIs). To successfully meet regulatory monitoring and reporting requirements, FIs often have to integrate content from thousands of regulatory publications each month. AI technologies offer FIs a range of diverse capabilities to meet this challenge.

As Figure 1 reveals, some AI processes are particularly effective for specific regulations. For example, FIs find Natural Language Processing (NLP) and Robotic Process Automation especially useful in meeting compliance requirements—with NLP being the mostly widely used AI process by far. Similarly, Scenario Comparisons are seen as essential for the Comprehensive Capital Analysis and Review (CCAR), Dodd-Frank, and European Market Infrastructure Regulation (EMIR) stress tests.⁴

Given not only the sheer complexity of regulatory compliance for FIs, but also huge penalties for errors and non-compliance, the ROI of AI for regulatory change management is undeniable.

Redefining GRC with IBM OpenPages with Watson

To help financial institutions meet their most challenging risk and compliance requirements, IBM is delivering the market’s only cognitive-driven GRC portfolio —IBM OpenPages with Watson. This platform provides core services and functional components that span operational risk, policy and compliance, financial controls management, IT governance, and internal audit. It delivers on the clear and present need in the marketplace for an integrated end-to-end solution that enables organizations to connect internal GRC policies and practices to the external regulatory environment.

OpenPages with Watson integrates the new IBM OpenPages 8.0 with IBM Watson Regulatory Compliance (WRC) and the regulatory expertise of Promontory Financial Group (an IBM Company). It employs cognitive capabilities such as natural language processing (NLP) and machine learning — informed by the deep regulatory expertise of Promontory Financial Group’s professionals. Natural language capabilities can ingest huge volumes of regulatory material, understand and learn, while cognitive technologies can help users more easily identify and act on shifting regulatory and compliance requirements. Watson is tasked to identify the obligations. Promontory expertise is used to train it. Then OpenPages maps obligations to the firm’s internal control policies and procedures.

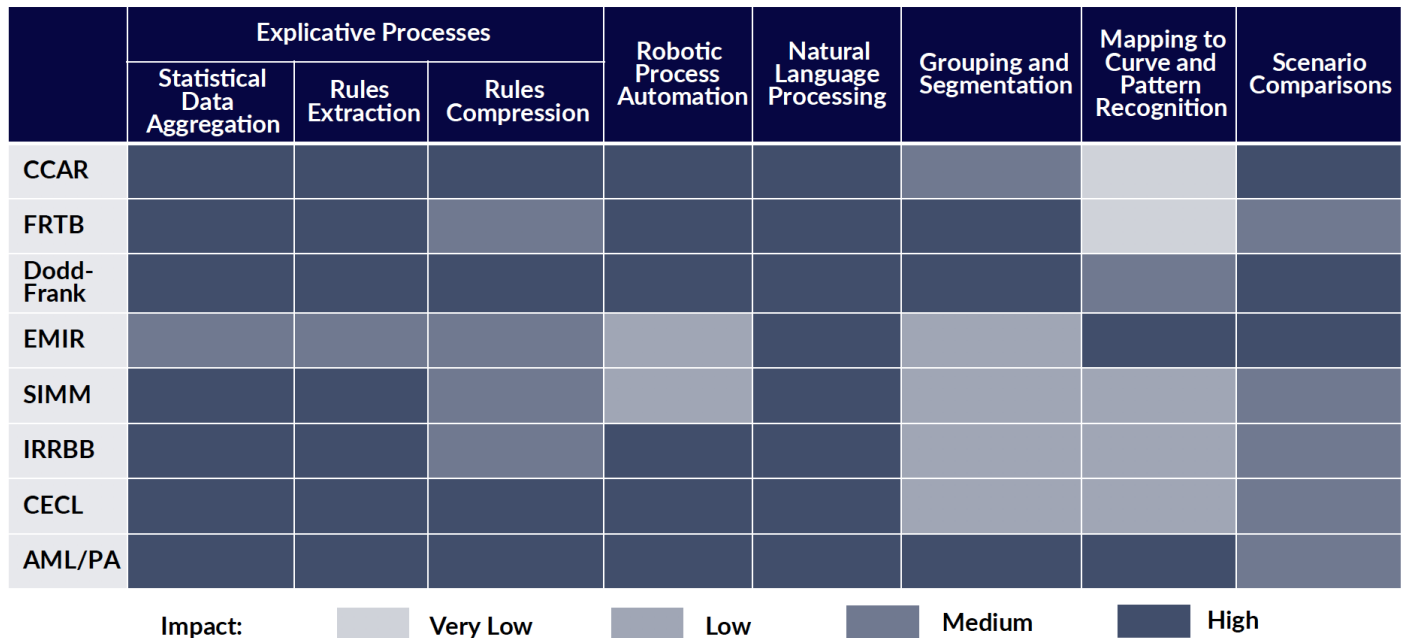


Figure 1: AI processes for specific regulations
Source: Chartis Research 2018.

With the launch of OpenPages with Watson, IBM is redefining GRC in three key areas:

I. Reimagined user interface (UI)

The platform's market-leading cognitive and analytics technology is infused with both IBM Cognos Analytics 11 and Watson Cognitive capabilities. The solution leverages Watson APIs, including Watson Natural Language Classifier (NLC), to classify text and make suggestions for tags. Watson Discovery Service (WDS) indexes documents and receives results for natural language queries. The solution can also be trained as a cognitive engine for regulatory compliance that improves over time through machine learning. This capability enables:

- A persona-based interface empowers first line of defense business users to clearly understand which tasks are required for completion, according to their job role, with all relevant information delivered. No special training is required.
- Task-based navigation and single-click, advanced actions improve consistency in data and accelerate time to value.
- Simplified, modernized views with access control, API, and self-service reporting enable business users to leverage the platform quickly and easily.
- The process-driven interface empowers users with Watson Regulatory Compliance, delivering a workflow for obligation management and OpenPages 8.0.

II. Cognitive and analytics driven

OpenPages with Watson offers an updated user interface to help users uncover data-driven insights. Its user friendly design was informed by end-user feedback to encourage broad-scale adoption across the enterprise—critical for solutions deployed to large numbers of people in positions that experience regular employee turnover.

- Change management: Leverages machine learning to send user alerts and update the internal database with information about new events as they occur.
- Cognitive search: Enables users to perform concept-based searching across internal and external documents and structured and unstructured data.
- Concept management: Enables users to develop and manage rules to identify concepts and topics within internal and external documents, based on standard industry terminology and company-specific terms.
- Obligation identification: Screens large documents to spot relevant obligations for inclusion in the obligation checklist.
- Controls identification: Suggests new controls to put in place, based on established benchmarks.
- Controls development: Recommends specific controls as soon as an applicable obligation is selected.

IBM OpenPages with Watson includes market-leading business intelligence (BI) capabilities, in the form of Cognos Analytics 11. This offers virtually any business user an interactive way to find, explore, and share data-driven insights about risk and compliance issues. Cognos Analytics 11 also enables business users to create and share sophisticated dashboards and perform self-service reporting without extensive training.

III. Rich regulatory content and change management

The Watson Regulatory Compliance component of OpenPages with Watson can examine thousands of regulatory documents in minutes to recommend actions to safeguard customer information and reduce risk exposure – all while lowering the cost of compliance.

It automates and streamlines the identification of potential regulatory obligations and enables sustainable management of controls. For example, many different regulations have similar requirements for IT and security. Identifying the similarities and reducing the number of times a compliance measure needs to be assessed and tested significantly diminishes the demand on the IT teams, saving companies time and money. It integrates all data, facilitates mapping and performs concept searches across federated platforms, enabling more transparent, actionable obligation and regulatory change management.

Watson Regulatory Compliance:

- Offers a single channel of regulatory content combined with cognitive capabilities to help compliance teams understand the applicability of changing regulations and ensure that appropriate controls are in place.
- Enables a collaborative process to facilitate the identification of obligations from a single channel of regulatory content, capturing requirements, definitions, criterion, conditions, exceptions and materiality.
- Recognizes changes to regulatory content as they occur and identifies which changes may impact internal controls. It can also be prepopulated with candidate obligations by expert practitioners from Promontory.
- Delivers content on best practice guidelines and controls from industry bodies such as the International Standards Organization (ISO), the Control Objectives for Information and Related Technologies (CoBIT) and others, as well as cybersecurity content through a partnership with C2C.

Conclusions

Today's constantly evolving regulatory environment for financial services firms – combined with the enormous amounts of new data being generated every second – demands a new approach to governance, risk management and regulatory compliance. OpenPages with Watson enables companies to stay abreast of changing regulatory and compliance requirements and build a culture of risk awareness and individual responsibility for identifying and mitigating risks—whatever their source. The platform helps companies understand where to deploy resources more efficiently, and make better decisions that ultimately improve profitability and growth.

By enriching these next-generation technologies with the deep expertise of the Promontory Financial Group, and their many years of experience with the world's largest and most successful financial services firms, OpenPages with Watson offers an unbeatable combination of technological power and domain expertise.

Finally, with the launch of OpenPages with Watson, IBM empowers the first line of defense as never before with intuitive GRC capabilities that can be deployed to all end-users – meaning people will do the one thing that increases any system's effectiveness – they'll use it!

About IBM Watson Financial Services

IBM works with organizations across the financial services industry to use IBM Cloud, cognitive, big data, RegTech and blockchain technology to address their business challenges. IBM Watson® Financial Services merges the cognitive capabilities of Watson and the expertise of Promontory Financial Group to help risk and compliance professionals make better informed decisions to manage risk and compliance processes. These processes range from regulatory change management to specific compliance processes, such as anti-money laundering, know your customer, conduct surveillance and stress testing.

For more information

To learn more about IBM solutions for regulatory compliance, visit ibm.com/RegTech

Source

1 John Kelly, Rethinking risk management in the age of cognitive computing, Risk, July 2017.

2 Deloitte, The Future of Regulatory Productivity, powered by RegTech, 2017. <https://www2.deloitte.com/us/en/pages/regulatory/articles/cost-of-compliance-regulatory-productivity.html>

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4 Chartis Research, Demystifying Artificial Intelligence in Risk and Compliance, 2018. <https://www-01.ibm.com/common/ssi/cgi-bin/ssialias?htmlfid=11016711USEN>

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Produced in the United States
of America, September 2018

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