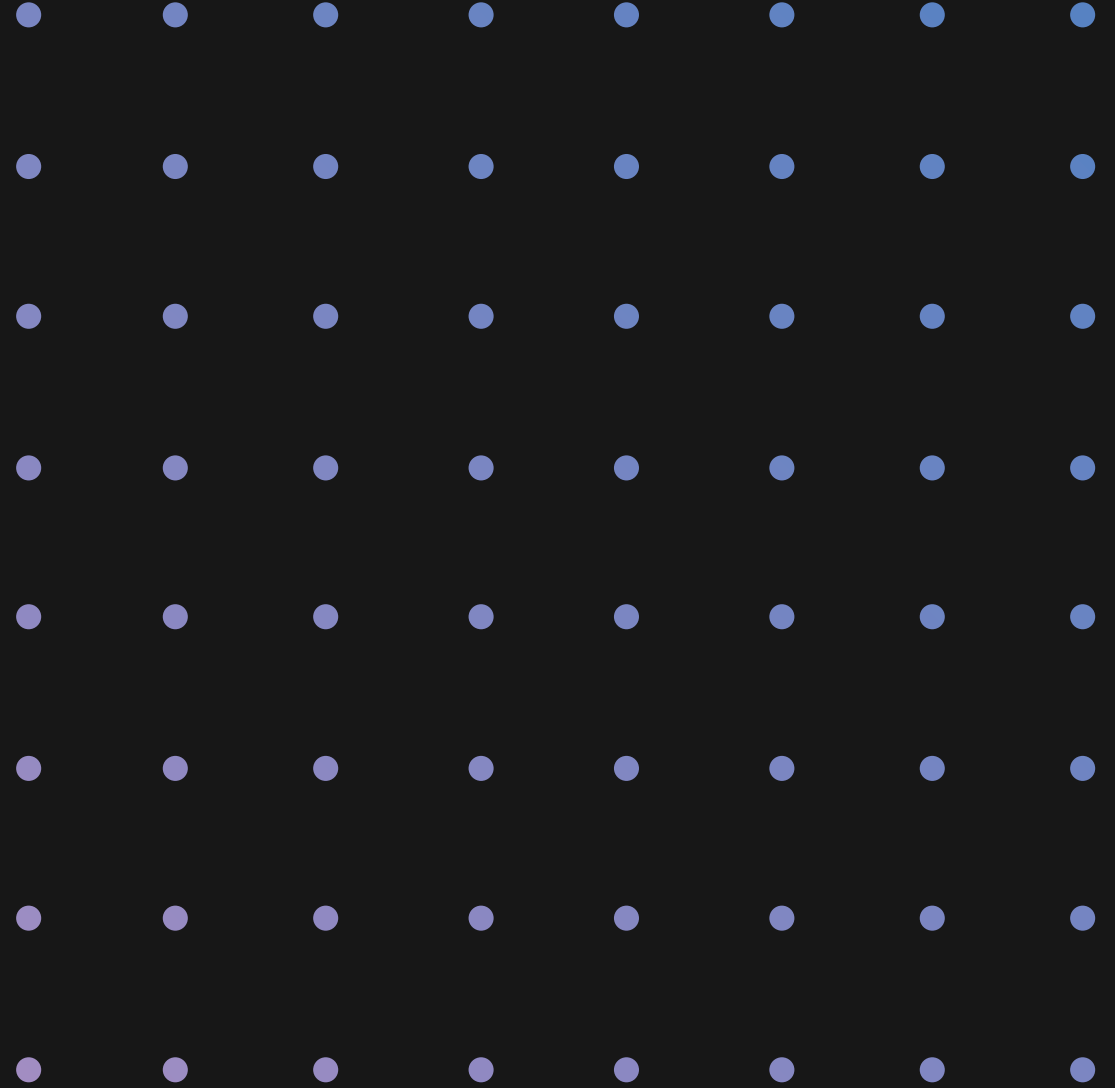




IBM OpenPages: A fully integrated governance, risk and compliance platform

Foster an organization wide culture of total compliance, fast adapt to regulatory changes and empower your first line to make more risk-aware decisions



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Chapter 01

Overview

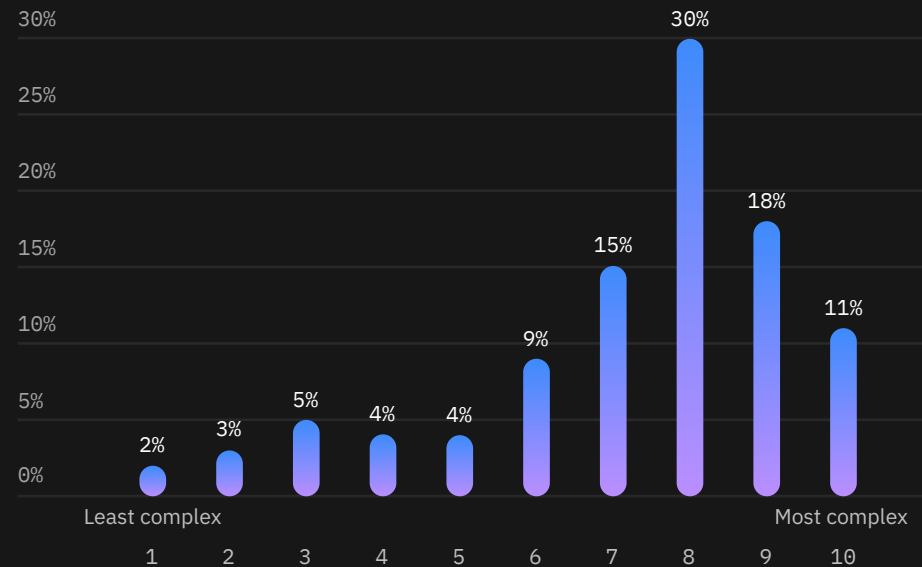
With many organizations ending up paying massive fines for non-compliance, most businesses are actively seeking to redefine their Governance, Risk and Compliance (GRC) strategy.

There is a growing need for next-generation platforms that can consolidate GRC activities and help tackle the pressure of larger, more severe penalties. This change of attitude is because the financial services sector, among others has undergone a massive transformation in the recent years. Firms are facing increased complexity, particularly in relation to sustained market volatility and ever-changing regulations.

To explain this context further, Risk.net partnered with IBM and published a whitepaper in April 2019 called, [The evolution of GRC: New tools for the first line of defence](#). It explored the rapidly changing global financial markets and the role of next-generation GRC solutions in empowering organizations to make more risk-aware decisions. According to one of its surveys, three-quarters of professionals rated the complexity of the current regulatory compliance environment at 7 or above on a scale of 1 to 10.¹

¹The evolution of GRC, New tools for the first line of defence, April 2019

Rank the complexity of the regulatory compliance challenge your organisation faces



How complex do professionals find the regulatory compliance environment?
image source: <https://www.ibm.com/downloads/cas/5QGBKWDB>

The above-shown plight has called for a newer and more structured approach to GRC activities. Tier 1 financial institutions are now looking for an improved GRC system to acknowledge, understand and adhere to a constantly increasing and changing list of guidelines.



Chapter 02

GRC is everyone's business

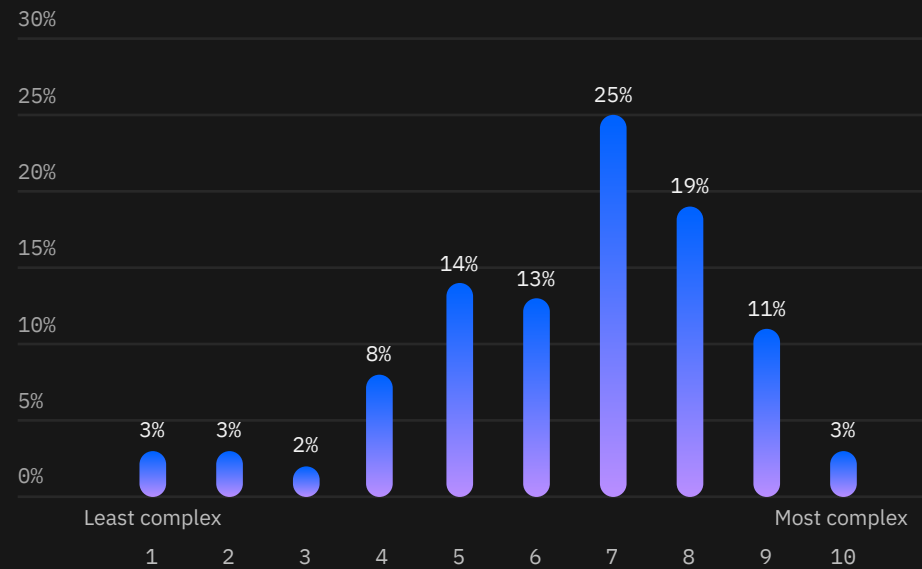
To tackle rapid regulatory change and graver penalties, most financial institutions have updated their GRC management systems with multiple tools and have added more manpower to their teams. However, has that really helped?

Surprisingly, this increased level of investment in GRC technology hasn't done much for financial firms. They are still struggling to manage compliance with regulations and internal policies.

Another survey in Risk.net whitepaper substantiates this fact where 30 percent of the risk and compliance professionals have rated their organization's GRC responsiveness as 5 or below on a scale of 1 to 10.²

Rank the effectiveness and efficiency of your organisation at coping with the complexity and pace of regulatory change

Effectiveness



How effective are organizations in tackling regulatory changes?
image source: <https://www.ibm.com/downloads/cas/5QGBKWDB>

²The evolution of GRC, New tools for the first line of defence, April 2019

End-to-end GRC solution for all lines

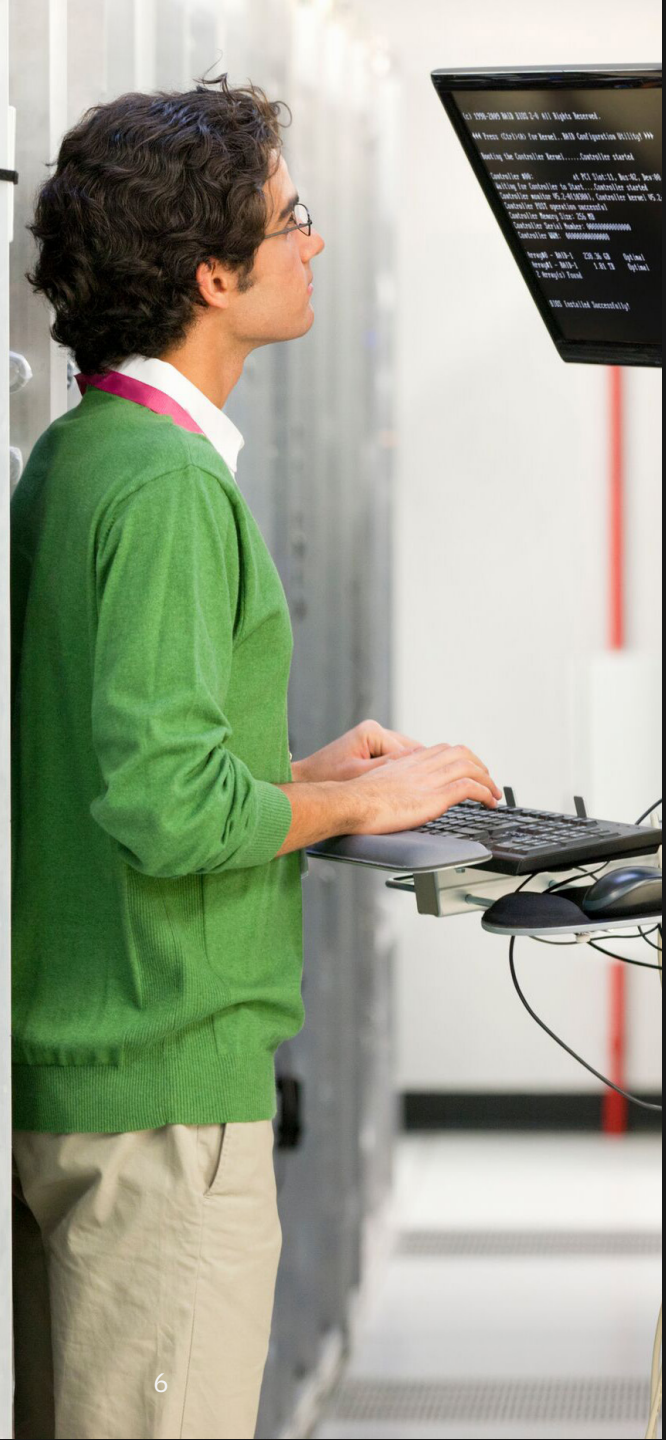
Frequent regulatory changes require a coordinated, unified and streamlined GRC approach. No longer can GRC be treated as a standalone section but rather as an integrated activity that involves realignment of resources and software around the ‘three lines’ model.

Organizations struggle to be regulatory compliant because their GRC investments burden their first line with complex tools of inconsistent capabilities. These systems are largely directed towards the convenience of the second line . Consequently, first line business users find these systems unmanageable.

The approach: One for all

A user-focused, end-to-end GRC solution is required that fosters complete participation in GRC activities across the organization. Using the tool, risk and compliance professionals can come together, prioritize critical tasks and empower the organization to make well-informed, risk management decisions.

An end-to-end solution will play a key role in streamlining risk and compliance management. Unlike standalone solutions that deal with specific elements of the regulatory change lifecycle, this solution will consolidate all GRC activities under one umbrella for more effective management. This in turn will drastically reduce the time and effort needed to perform GRC activities and simplify the implementation of GRC accountability and security across all departments.



Chapter 03

Putting Artificial Intelligence (AI) to work

Traditionally, GRC initiatives have been solely about protecting business from liability. However, gradually the importance of GRC has increased and today, the impact of non-compliance isn't limited to just hefty fines but also lesser market credibility and shaken customers and stakeholders' trust.

The need of the hour is to build an intelligent GRC model through an AI-based tool that can identify potential new patterns of risk and help mitigate them. A business that has a robust AI-infused GRC solution can improve agility, transparency and the overall performance of the risk and compliance team. The tool can use machine learning and AI technology to generate actionable insights, which can be leveraged for managing the key aspects of GRC activities.

Role of AI in GRC

The infusion of AI capabilities into the GRC framework makes it undeniably smarter. AI-based tools eliminate the manual process of reviewing organizational charts and spreadsheets. Instead, they use language-based or rule-based software to automatically understand texts and provide timely insights to risk and compliance professionals.

Organizations that embrace the growing trend of AI-based risk and compliance tools are at a greater advantage of preventing major incidents and face minimal danger of falling behind the competition.

A report from Chartis and IBM named, [AI in RegTech: A quiet upheaval](#), provides an in-depth view of this topic. Based on surveys and interviews with more than 100 risk and technology professionals, it has highlighted the fact of AI being extensively used in RegTech solutions, across Financial Risk, Financial Crime Risk Management (FCRM) and Governance, Risk and Compliance (GRC) domains.

One of its survey reveals that more than half of the respondents have admitted to using AI tools for enterprise GRC, particularly Operational Risk Management (OpRisk)³.

³AI in RegTech: a quiet upheaval, 2018

Use of AI tools in GRC



Source: Chartis Research

Use of AI tools in GRC

image source: <https://www.ibm.com/downloads/cas/NAJXEKE6>

Benefits and challenges

As the current risk and compliance management scenario pushes financial firms on the path of an AI-driven GRC framework, what are the main challenges and potential benefits of implementing the same?

Benefits

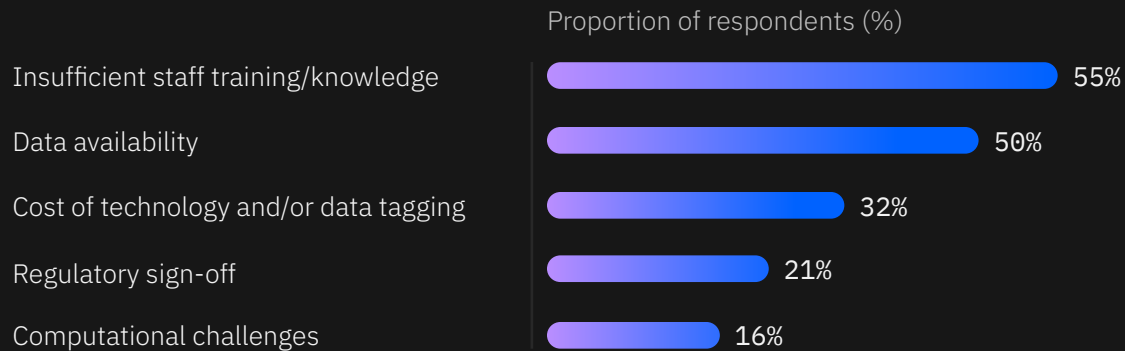
Data classification: Precise classification of data enables its efficient usage across the organization and simplifies risk management and compliance processes. Manual data classification, however, is not only prone to errors but training employees to do so can be extremely time consuming. AI eliminates this hassle by improving the speed and accuracy of data classification. Natural language processing (NLP) understands and categorizes data automatically that helps organizations save time.

Control mapping: NLP reduces the chances of duplicate controls in relation to specific obligations within a regulation. It helps compliance teams detect whether an existing control can be mapped to record the organization's compliance with the rule. This reduces the time spent on understanding the applicability of new rules or regulatory changes.

24/7 internal virtual assistant support: IBM watsonx Assistant uses natural language understanding to recognize, automate, and improve responses to user inquiries for support.

Automatic translations: Watson Language Translator translates up to 52 languages into a user's default language.

Main challenges to implementing AI for GRC



Source: Chartis Research

Challenges in implementing an AI-based GRC tool

image source: <https://www.ibm.com/downloads/cas/NAJXEKE6>

Challenges

Lack of user skills: The success of an AI-infused GRC application depends on how dedicatedly the risk and compliance teams use, understand and interact with it. Irrespective of how advanced the tool is, it needs to have an enhanced user-experience design to appeal across all three lines. A user-focused GRC application doesn't have the issue of a steep learning curve. This automatically reduces the need of extensive training and fosters complete user adoption.

Data availability and quality: Data is at the heart of AI. The two most prevalent AI techniques (Machine Learning and Natural Language Processing) require a large amount of historical data that can be analyzed to generate accurate insights. Therefore, to successfully implement an AI-infused GRC application, it's imperative that the tool is supported by a robust data infrastructure that feeds it with high-quality data in the right format and scale.

AI implementation in GRC: Best practices

Chartis Research in collaboration with IBM has addressed the issue of implementing AI in GRC. In the report, [Demystifying Artificial Intelligence in Risk and Compliance](#), it states that the hype around AI can be misleading for many financial institutions.

To leverage the true potential of AI in GRC activities, it's essential to look beyond the buzzwords and deploy tools and techniques in the right way. In what follows are three key steps to a successful implementation of AI in risk and compliance management:

- Identify the right statistical algorithm and its related processes
- Define the problem and its associated use case
- Choose the right technology to support the AI tool



Chapter 04

IBM OpenPages: Providing a unified vision

In the process of meeting compliance requirements, financial firms often end up spending on a bunch of GRC solutions. However, what they fail to understand is that these standalone solutions are inflexible and each of them only addresses a specific risk process or regulation. Eventually, financial institutions are left to deal with siloed data that makes it difficult to comprehend the potential impact of risks across all processes.

To keep pace with the changing regulatory landscape, what's required is an integrated GRC platform for an end-to-end compliance management program across the enterprise.

IBM OpenPages stands tall as the only AI-driven, integrated GRC portfolio in the market that breaks all silos and ensures that no risk and compliance professionals work in watertight compartments. Unlike a rigid, legacy GRC system, it provides an enterprise-wide view of risk, including all business units, business partners and suppliers. It fosters a collaborative approach where compliance becomes an organization-wide responsibility and no department fails to adhere with requisite standards.

Main differentiators

- Task-focused user interface designed for ease of use
- AI, NLP and ML capabilities within a UI developed with IBM Enterprise Design Thinking
- Dynamic dashboards, charts and dimensional reporting for root cause risk analysis
- Extensible to different business processes across risk and compliance domains
- Smooth data integration and aggregation with IBM's comprehensive REST APIs
- Integration with key technologies, such as IBM Cloud for faster data accessibility and IBM Cognos Analytics for crucial data insights
- Strategic partnerships with Promontory Financial Group, Thomson Reuters, Ascent, Reg-Track, SecurityScorecard and Wolters Kluwer
- Scalable, flexible, single model architecture supporting more than 20 thousand users
- Available as a cartridge on IBM Cloud Pak for Data
- Use conversational AI to streamline compliance incident reporting

[Deep dive more into the differentiators of IBM OpenPages.](#)

Key GRC complexities

IBM OpenPages addresses three key problems of the global regulatory environment (low visibility, disparate GRC systems and limited reach) through the following ways:

- Provides an accurate, timely view of all obligations and the associated end-to-end responsibilities
- Breaks down silos and complex systems; provides a holistic view of risk and compliance across all units and risk types
- Uses the business intelligence capabilities of Cognos Analytics to uncover hidden insights
- Highlights obligations relevant to business units and maps them to internal controls
- Provides automated regulatory alerts through partnerships with leading third-party regulatory data sources
- Avoid potential compliance fines with IBM watsonx Assistant for Incident and Loss Event Reporting

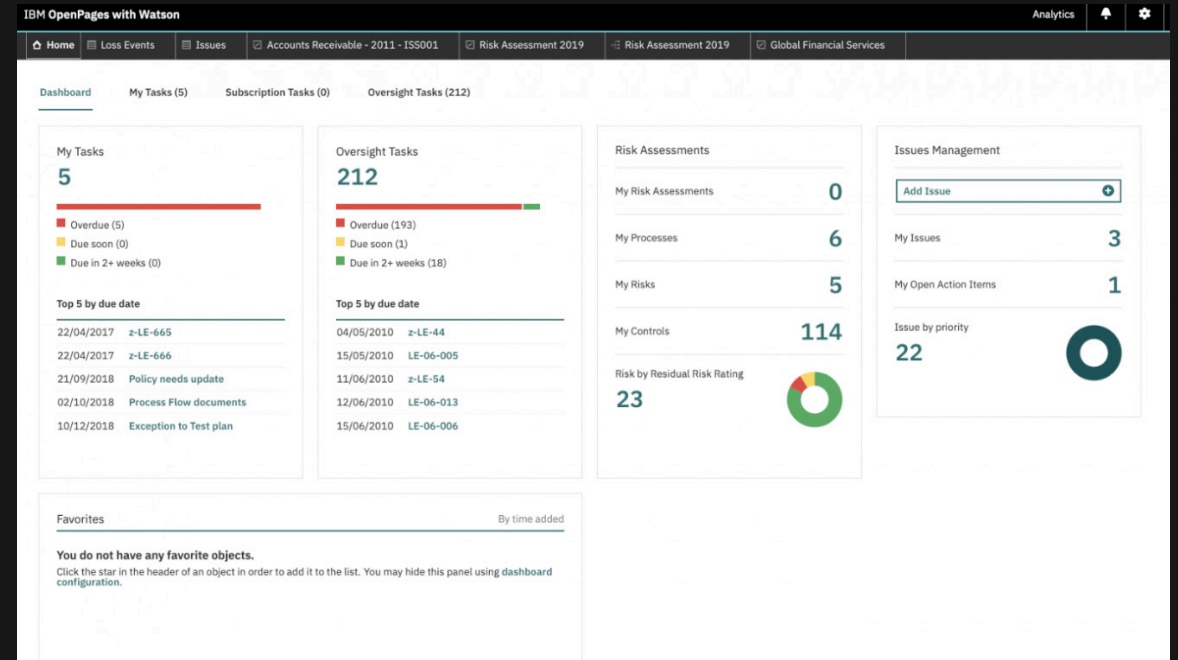
Watch the video to learn more on how IBM OpenPages is enabling firms to better manage risk and regulatory challenges.

Risk-aware culture

The current GRC landscape demands risk to be treated as everyone’s responsibility. IBM OpenPages ensures active engagement from all levels in the business (especially the first line) through a user-focused interface integrated with compelling features.

Examples include:

Workspace that can be easily customized through adding, removing or hiding panels



Visual cues, validation messages and classification recommendations for easy and accurate information capture by the first line

New Issue (Cancel Save)

Priority: Not Determined

Issue Type: [Dropdown] Domain: [Dropdown]

Deficiency Details

Issue Owner * [Search users] Issue Approver [Search users]

Identified By Individual [Search users] Identified By Group [Search users]

Probability: Not Determined Impact: Not Determined

Due Date * [m/d/yyyy]

What is this Issue related to?

New Issue (Info icon)

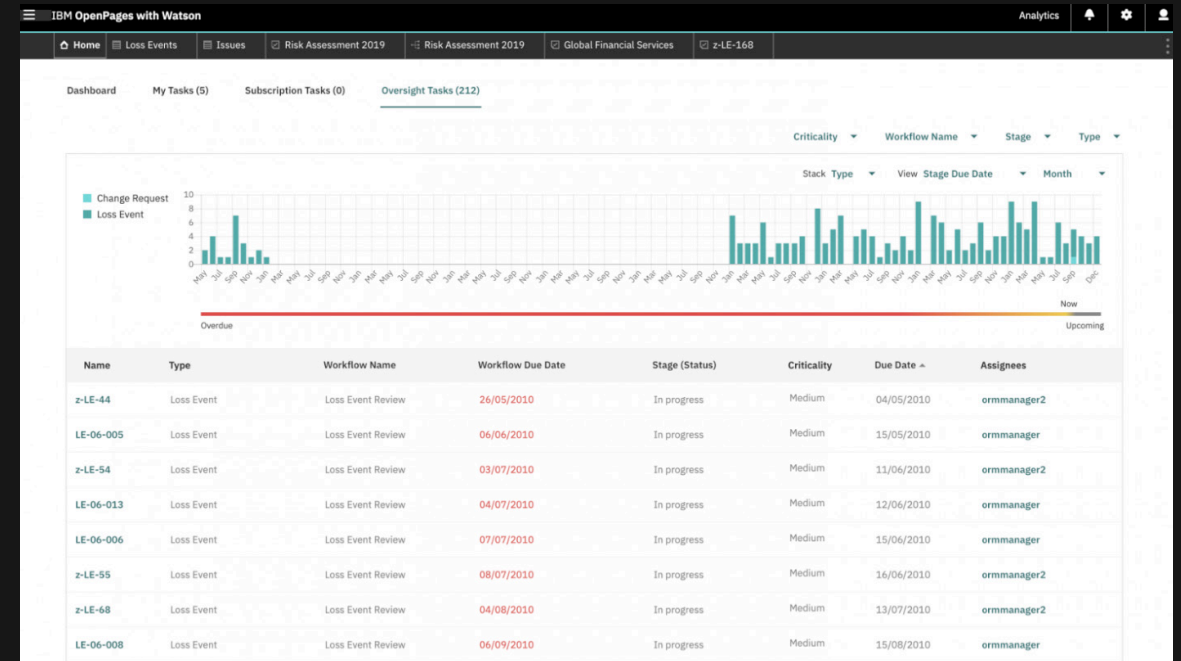
To create an Issue, provide information for all the required fields. Fill in the other fields as much as possible to help the next person working on this Issue. To save the Issue, you must also indicate what this Issue is more

3 items require attention.

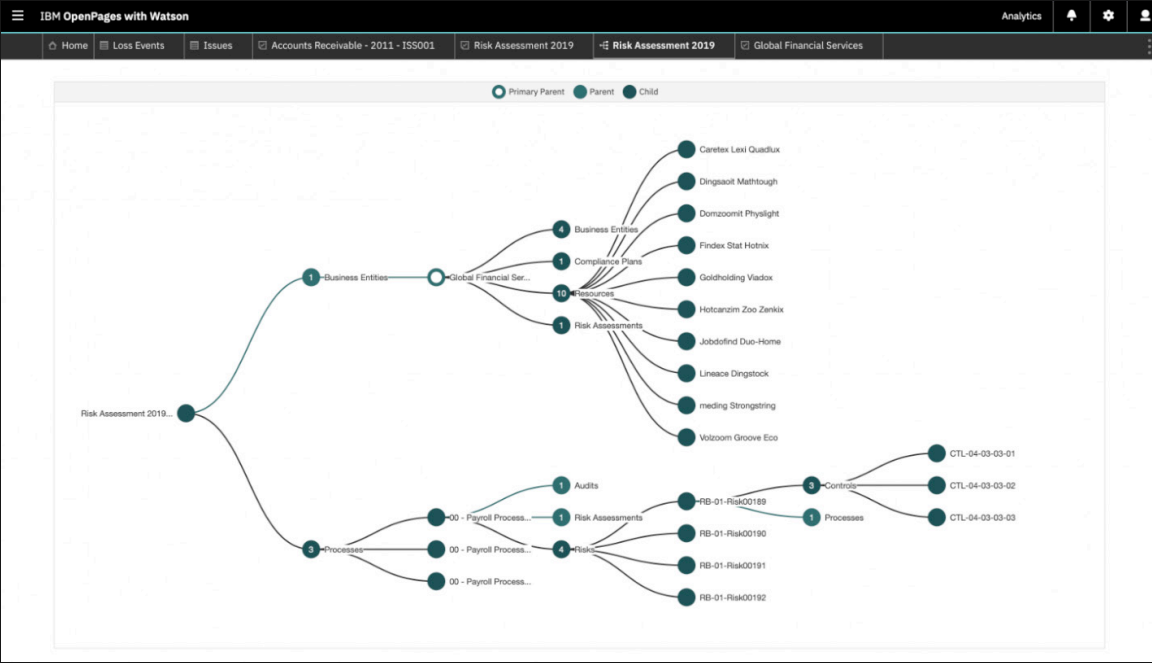
All Key Items (9)

- Issue Name *
- Description
- Issue Type
- Issue Owner *
- Issue Approver
- Identified By Individual
- Identified By Group
- Due Date *
- A parent is required *

Quick view of individual and team tasks to ensure proper monitoring of risk activities



Interactive tree maps to depict how assessments, business entities, processes, resources, products and controls are connected in the organization



Zone or count-based embedded heat maps and charts to determine areas of focus and impact

Process Name	Description	Status
00 - Payroll Processing - Manage Database Internal Audit > ITAud > ITAud 1 > NA Firewalls - 2008	Global Three contains HR data for employees	Awaiting Assessment
00 - Payroll Processing - Outsourced Vendor Internal Audit > ITAud > ITAud 1 > NA Firewalls - 2008	ADP	Awaiting Assessment

Overall, IBM OpenPages lays emphasis upon ‘GRC is Everyone’s Business’ strategy by establishing a risk and compliance culture that promotes inclusiveness, consistency and transparency.

IBM OpenPages

To tackle managing compliance and risk exposure, IBM OpenPages continues to incorporate innovation into its platform. The latest software release includes the following:

- Personalized dashboard enhancements
- Task-focused UI enhancements
- Calculation engine
- Scheduler engine
- IBM watsonx Assistant integration
- New IBM OpenPages Data Privacy Management solution
- More use cases in GRC workflow
- IBM OpenPages Regulatory Compliance Management enhancements
- Enhancements to IBM OpenPages Financial Controls Management
- IBM OpenPages now available on IBM Cloud Pak for Data
- Watson Language Translator integration
- Inline edit for Office documents

All these additions stem from constant collaboration with clients and partners. To learn more, visit our product page at: <https://www.ibm.com/openpages> and visit our product documentation at: <https://www.ibm.com/docs/en/opw>



Chapter 05

IBM OpenPages: A combination of nine GRC solutions

Being on the right side of risk and compliance requirements is an overwhelming exercise because it involves looking into a wide gamut of areas. IBM OpenPages simplifies this process by offering a comprehensive, enterprise GRC solution that includes a customizable platform with a modular set of solutions for every risk and compliance domain.

This benefits financial institutions as they aren't bogged down by siloed, archaic processes. Data is consolidated and not scattered across spreadsheets, emails, phone calls and other standalone tools.

IBM OpenPages provides businesses with the advantage of deploying GRC modules as needed with a scalable, forward-looking architecture that can grow with their evolving needs.

1. IBM OpenPages Operational Risk Management

[IBM OpenPages Operational Risk Management](#) is an automated tool that helps to identify, evaluate and manage operational risks. It provides a single repository to store all risk data, such as risk and control assessments, internal and external loss events and key risk indicators. Consolidated risk documentation enables risk managers to track loss incidents and determine root causes. Also, its advanced reporting feature provides an accurate insight into the state of risk across the organization.

2. IBM OpenPages Regulatory Compliance Management

[IBM OpenPages Regulatory Compliance Management](#) combines software, process automation, data feeds and expertise. It enables institutions to have a more complete, accurate and timely view of their regulatory compliance risks. Supported by a centralized data model, OpenPages Regulatory Compliance Management is designed to transform the compliance process and drive both confidence and efficiency.

3. IBM OpenPages Business Continuity Management

[IBM OpenPages Business Continuity Management](#) prepares enterprises to continue operations and protect employees in the face of disruptive events. The solution enables organizations to centralize data related to business continuity management in one location and implement a standardized approach across the enterprise. Users can visualize data relationships to identify dependencies and gain quick access to needed information.

4. IBM OpenPages Policy Management

[IBM OpenPages Policy Management](#) simplifies the entire process of complying with industry, privacy and government regulatory mandates. It uses watsonx cognitive suggestions to map policies to regulatory obligations and highlights the new updates as regulations and obligations change. On-demand, actionable reporting helps financial institutions gain a holistic understanding of all compliance risks to mitigate them and ensure full adherence to necessary policies and procedures.

5. IBM OpenPages IT Governance

[IBM OpenPages IT Governance](#) aligns IT operations management with corporate business initiatives, strategy and regulatory requirements. It automatically notifies and routes IT-related activities, tracks all relevant IT incidents and facilitates root cause analysis. Financial firms can identify IT risks, remediate issues, enforce corporate IT governance policies and sustain compliance across several best- practice frameworks, such as COSO, COBIT, ITIL and ISO.

6. IBM OpenPages Internal Audit Management

[IBM OpenPages Internal Audit Management](#) uses core shared services and open architecture to automate internal auditing procedures. It offers a centralized library of electronic workpapers and can automate workpaper review and approval process. The tool is smoothly integrated with all other risk domains and gives auditors a holistic view of enterprise-wide compliance status across disparate policies and procedures.

7. IBM OpenPages Model Risk Governance

[IBM OpenPages Model Risk Governance](#) helps address the challenges of model risk management. It creates and maintains a comprehensive model inventory to remove siloed data, bring transparency and foster collaboration among key stakeholders, such as model developer, owner, validator and business unit executive. The tool also offers interactive dashboards and dynamic reports for greater visibility into model performance metrics.

8. IBM OpenPages Third Party Risk Management

[IBM OpenPages Third Party Risk Management](#) assists in identifying, evaluating and managing third-party compliance and risk issues. It brings greater transparency and visibility into vendor-related operational and security activities. Financial institutions can streamline vendor management process by classifying the criticality of vendors as low, medium, or high and managing their contracts in an organized way. The tool uses standard risk assessments to help monitor and mitigate any risk exposure resulting from third-party suppliers.

9. IBM OpenPages Financial Controls Management

[IBM OpenPages Financial Controls Management](#) supports financial institutions in complying with Sarbanes-Oxley and other key financial reporting regulations. Firms can refer to a single repository for all financial controls and compliance documentation. They can automate the ongoing control testing, risk assessment and issue remediation process for better financial controls management. The tool also offers interactive dashboards and dynamic reports for complete visibility into the state of financial reporting and compliance across the organization.

10. IBM OpenPages Data Privacy Management

[IBM OpenPages Data Privacy Management](#) supports organizations in complying with data privacy regulations such as GDPR, CCPA and LGPD. It enables firms to maintain a central inventory of all of the private data assets in use across their organization, including data used for building AI models. Privacy professionals can work with data owners to complete privacy assessments on these assets and maintain a record of completion to demonstrate compliance to regulators. The product supports integration with Watson Knowledge Catalog, which helps to centralize and automate private data reporting to improve accuracy. Privacy compliance is now an enabler for your business, allowing data scientists and model developers to trust that the data they need to build models can be used in compliance with the relevant regulations.



Chapter 06

A Leader in Gartner 2020 Magic Quadrant

IT Risk Management Solution

Gartner has named IBM a leader in [2020 Magic Quadrant for IT Risk Management](#). Based on a robust evaluation matrix, it has assessed the positioning of all vendors in this field and displayed each of their strengths and weaknesses.

IBM has gained leadership by uniquely unifying enterprise-wide risk and compliance initiatives into a single management system, thereby helping organizations to make risk-aware decisions.

It continues to transform the GRC landscape through AI and analytics, User Experience Design (UXD), regulatory content and unparalleled domain expertise and advisory services.

Strengths highlighted

In-depth market understanding: IBM OpenPages stands out in the market due to its strong alignment with user needs. It understands the risk and compliance challenges of financial institutions and offers compelling features that directly solve the pain points of GRC professionals. Few examples include:

- Data classification and control mapping recommendations
- End-user dashboards and onboarding guidance
- Embedded Cognos Analytics and watsonx

Complementary solutions: IBM offers a set of complementary solutions to help organizations build a robust IT risk management model:

- Cognos Analytics
- watsonx
- i2 Enterprise Insight Analysis
- QRadar SIEM



Chapter 07

Forrester Total Economic Impact™ of OpenPages

Recently, IBM commissioned Forrester Consulting to conduct the Total Economic Impact (TEI) study that evaluated the financial impact of IBM OpenPages on organizations and find out how IBM OpenPages, an AI-driven integrated GRC platform, can cut license and implementation costs and drive savings due to regulatory fine and penalty avoidance, reduced risk management effort and legacy system costs.

The TEI study showed that the cost savings and business benefits enabled by IBM OpenPages, over three years, include:

- 218% in ROI
- \$5.1 million in benefits
- \$3.5 million in NPV

You can register [here](#) to read the full study.



Chapter 08

Client success stories

General Motors

General Motors (GM) faced a major challenge in risk management when they relied on four separate systems to manage their governance, risk and compliance activities. Each of these legacy tools addressed a specific regulation or risk process and hence provided a vertical view of the company's risk profile.

To improve their GRC approach, GM needed an integrated platform that could consolidate their audit, risk and control processes and procedures. That's when they made the switch to IBM OpenPages.

The platform has enabled the organization to gain a comprehensive view of risks, controls and issues across the company. Using the platform, GM has realized the following benefits:

- Centralized audit, risk and control data
- Standardized GRC processes
- Reduced risk and compliance management cost

Overall, IBM OpenPages has empowered GM to proactively monitor and mitigate potential risks that could disrupt the smooth functioning of its process. Unlike before, audit, risk and control departments don't work in silos but have a collaborative approach, making it easier to identify risks and analyze their impact across the organization.

[Read the full case study](#) to learn more.

SCOR SE

Global reinsurance provider, SCOR SE, struggled in handling operational risk challenges due to low user adoption of their internal control management system. To enhance user participation in operational risk mitigation, SCOR SE decided to upgrade their existing GRC approach and make it more user-focused. So, they moved from a rigid, aging internal control management tool to the automated, user-friendly IBM OpenPages.

The company's fully implemented OpenPages solution includes:

- IBM OpenPages Operational Risk Management for performing assessments, managing all internal control processes, addressing data quality management requirements and documenting processes
- IBM OpenPages Loss Event Entry for addressing related compliance concerns
- IBM OpenPages Policy Management for managing the complete internal guidelines lifecycle

Post implementing the tool, SCOR SE has witnessed a major transformation in the following functions:

- Assessing and managing all internal control processes
- Addressing data quality management requirements and documenting processes
- Addressing compliance concerns
- Managing the complete internal guidelines lifecycle

IBM OpenPages has catered to the needs of SCOR SE that was looking for a comprehensive, flexible and user-friendly GRC solution. The IBM platform has easily adapted to the organization's internal controls method and has gained optimum user adoption from teams across the world.

[Read the full case study](#) to learn more.

Chapter 09

IBM and Thomson Reuters join forces: How and why

When it comes to GRC, a persistent issue has been the continually growing number of regulatory alerts. Staying on top of fast-changing regulatory compliance demands is difficult because the process of reviewing them is tedious and manual.

IBM has partnered with Thomson Reuters to help organizations tackle regulatory compliance burden. Together, they have come up with a powerful combination of technology and real-time regulatory insights that streamlines the entire process of understanding and managing new and changing regulations.

How does it benefit the users?

IBM OpenPages users can now subscribe to Thomson Reuters Regulatory Intelligence data feed (TRRI) to receive automated alerts from a large database of global regulators.

This means:

- No time spent on sifting through vast amounts of irrelevant information
- Accurate track of important regulatory developments that impact the organization
- Quick access to thorough and reliable data for making informed decisions
- Faster implementation of relevant regulatory changes within the organization
- Better management and mitigation of risks with no major regulatory change missed

In addition to TRRI, IBM OpenPages incorporates the expertise of Promontory Financial Group that helps users to create a centralized library of regulatory requirements and map them to internal controls. This further simplifies the process of gathering, monitoring and analyzing regulatory data in an efficient manner.

How to cut through regulatory complexity

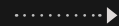
Request access to a 30-day trial edition of IBM® OpenPages® Regulatory Compliance Management (RCM). Take a no-cost, interactive guided journey and learn how to cut through the complexity and sheer volume of regulatory content. Get direct access to Thomson Reuters Regulatory Intelligence (TRRI) Data Feed and API to gather, monitor and analyze regulatory data to meet the demands of a rapidly changing environment.

Request OpenPages RCM trial

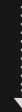
<https://www.ibm.com/account/reg/us-en/signup?formid=urx-49549&bpid=6uatg>



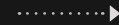
Thomson Reuters
Regulatory Intelligence
(TRRI) data feed sends
alerts to OpenPages



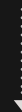
OpenPages RCM
– Creates Regulatory Events
from the TRRI data feed
– Maps TRRI tags to client's
taxonomy



Regulatory events run through
rules engine centralized
routing rules
– Client-driven Applicability
and Criticality



Workflow initiated within
OpenPages notifies Subject
Matter Experts (SMEs) and
subscribers of regulatory
events needing assessment



Exception items that cannot be
assigned to specific SME(s) are
routed to manual review

Example of how TRRI works with IBM OpenPages



Chapter 10

The IBM difference

IBM OpenPages transforms the way risk and compliance professionals work. By providing core services and functional components on a scalable platform that spans operational risk, model risk, third party risk, regulatory compliance, IT governance, business continuity, internal audit, policy and financial controls management, IBM OpenPages delivers a holistic view of risk and regulatory responsibilities across the enterprise.

IBM OpenPages merges the AI capabilities of IBM watsonx and the expertise of our extensive partner network to help risk and compliance professionals make more informed decisions to manage risk and compliance processes. It delivers on the marketplace demand for an integrated end-to-end solution that enables organizations to connect internal GRC policies and practices to the external regulatory environment. To learn more, visit our product page at: <https://www.ibm.com/openpages>



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