Regulatory Reporting in 2025:
A New Era of Standardization

In 2023, Chartis and **Regnology** collaborated on the theme of bringing back tech to the RegTech universe, spotlighting the transformative role of technology in compliance. Our 2024 collaboration on the cost of regulatory reporting offered a practical framework to help financial institutions assess their compliance expenditure while modernizing their regulatory reporting infrastructure.

In 2025, Chartis and Regnology offer a new collaboration, sharing more timely perspectives on the evolving regulatory reporting landscape. This year's focus areas are the current state of the regulatory reporting market, the persistent data management challenges faced by institutions, and the imperative for standardized regulatory reporting architectures for both regulated entities and regulators.

We also provide our perspective on the varying levels of regulatory certainty across jurisdictions and explore how these dynamics are accelerating the shift toward structured, scalable and resilient data architectures. Our analysis spans a wide spectrum of financial institutions, including tiered banks, credit unions, challenger banks, broker-dealer firms and insurance companies. We offer insights into how each is adapting to regulatory complexity in an era defined by data, digitalization and strategic transformation.

Regulatory reporting: at the crossroads of geopolitics, economics and digital transformation

Since the 2008 global financial crisis, the banking and financial services industry has experienced a steady expansion in regulatory obligations and associated reporting requirements. A similar regulatory surge followed the 2020 pandemic, catalyzing developments across domains such as liquidity risk; environmental, social and governance (ESG); climate risk; artificial intelligence (AI) governance and prudential frameworks, including Basel III/IV, the Fundamental Review of the Trading Book (FRTB) and International Financial Reporting Standard (IFRS) 9. A clear industry trend has emerged: a shift toward more granular, data-intensive and increasingly real-time reporting.

Today, however, the geopolitical and economic landscape is exerting unprecedented influence on how regulatory reporting frameworks evolve globally. Inflationary pressures, energy insecurity, shifting geopolitical power dynamics and the resurgence of deregulatory sentiment, especially in the US, are all shaping what financial institutions are required to report, and how quickly they must do so.

Until recently, many market participants expected that regulation in areas such as AI, climate risk and ESG would continue to tighten and converge globally. But current market signals suggest otherwise. The pace of implementation of these emerging regulations has slowed, driven by political shifts, regulatory fatigue and lobbying from financial and industry stakeholders.

Chartis and Regnology believe that this marks a structural shift in the regulatory landscape, one with implications that could last through the decade. While the US is clearly leading the deregulatory charge, it is not alone. Changes in the US are likely to trigger lobbying pressure in other regions, particularly the European Union (EU), where there will be mounting resistance to regulatory asymmetry that disadvantages local institutions.

Still, Europe (including the UK) remains one of the most mature regulatory environments globally, where regulated entities are well-versed in a broad spectrum of regulatory regimes. These include financial reporting, statistical and prudential disclosures, IFRS 9 compliance, and transaction and tax reporting, among others. However, even within Europe, signs of pushback are evident. These include the postponement of the European Central Bank's (ECB's) Integrated Reporting Framework (IReF) to 2029, which reflects hesitancy in harmonizing the ECB's statistical frameworks across all EU member states.

Meanwhile, the Middle East and North Africa (MENA) and Asia-Pacific (APAC) markets continue their progress toward maturity, with regulators such as the Monetary Authority of Singapore (MAS), the Australian Prudential Regulation Authority (APRA) and the Hong Kong Monetary Authority (HKMA) increasingly adopting data-driven, digitally enabled regulatory architectures. Many of these jurisdictions are aligning with European frameworks, using them as benchmarks in designing and scaling their own supervisory models.

Core data management challenges

For regulated entities and regulators

Effective regulatory data management is foundational to the success of the regulatory reporting ecosystem – yet remains one of its most complex challenges. Both **regulated entities** (such as banks, broker-dealers and insurers) and **regulators** (such as central banks and supervisory authorities) face similar yet distinct hurdles in sourcing, transforming, validating and consuming regulatory data (see Table 1 on page 3).

Challenges and issues exist throughout the regulatory reporting landscape. On the regulated entities' side, these include:

• Data sourcing across various upstream systems.

• Aggregating the data.

• Performing regulatory data validations.

• Managing data workflows.

• Developing logical data models based on the type of reporting for a given jurisdiction.

• Performing regulatory calculations (including scenario analysis and stress testing).

• Complying with BCBS 239 and equivalent frameworks around data governance and data lineage.

• Generating reports and submitting them to regulators.

Regulators have similar challenges in collating data from various regulated entities, performing data validations, aggregating data and consuming it for analysis.

Table 1: Regulators and regulated face similar data challenges

Core data management challenges	Regulated entities	Regulators
Data volume and duplication	Different departments within financial institutions (including risk, finance, treasury and compliance) are using different systems and data definitions, resulting in inconsistent data across reports. For example, the same data points (such as counterparty exposure and collateral) are reported differently across regimes. This results in redundant data reconciliation processes, along with manual workarounds.	Sharp growth in data submissions (including daily liquidity, trade and stress reports with millions of records) is causing difficulties in processing high-frequency submissions (such as those for EMIR, SFTR and liquidity risk) and in dealing with inconsistent reporting formats across firms, markets and jurisdictions. Further overlapping reporting regimes (ECB, EBA, EIOPA and ESMA in the EU, for example) lead to duplicated and misaligned data collection.
Lack of standardized data models	Most financial institutions are still struggling to have a standardized data model. They face challenges in aligning with regulatory dictionaries (such as BIRD and DPM) and in moving toward newer initiatives like CSRD and IReF.	Diverse interpretations of definitions and calculations by firms (such as for LCR and RWAs) mean it becomes difficult to compare entities with exactly similar parameters. This requires regulators to perform additional data cleaning and mapping before the actual analysis.
Poor data quality and validation failures	Incomplete, inaccurate or outdated data entering reporting workflows, resulting in validation failures by regulators.	One of the biggest challenges for regulators is dealing with errors, omissions and inaccurate input from regulated entities, resulting in frequent data resubmissions and delays in supervisory decisions. This further impacts the regulators' confidence in analytics, stress test outcomes or early-warning signals.
Gaps in data lineage and governance	Challenges around tracking data origin, transformation and aggregation logic, in order to comply with BCBS 239 and equivalent frameworks.	Often regulators receive only the output data, without clarity on sourcing or transformation logic. This makes it difficult to trace back abnormalities or assess risk model integrity.
Legacy data architecture and corresponding workflows	Legacy core banking, general ledger and data warehouse systems are not designed for agile regulatory change, resulting in high costs of adapting to new regulations (such as Basel IV, SFDR and DORA). Moreover, this makes it difficult to integrate new risk types (such as ESG, cyber and AI model risk).	Legacy supervisory platforms (SupTech) with limited scalability, automation or data analytics capabilities result in higher costs and less potential to monitor regulated entities. This causes delays in policy feedback or the publication of systemic insights for market participants.

Source: Chartis Research

The 'standardization' of regulatory reporting architecture

What 'standardization' means

For regulated entities

Standardization refers to the adoption of flexible, automated and scalable RegTech architectures that can:

- Manage complex, multi-jurisdictional compliance requirements.

- Enable consistent data models, reporting workflows and technology frameworks across entities and geographies.

- Improve data quality, reporting efficiency and regulatory engagement.

- Facilitate traceability and governance in line with principles such as BCBS 239 and equivalent frameworks.

- Support scalability as regulations evolve.

For regulators

Standardization means building robust and scalable SupTech systems that can:

- Ingest data from diverse regulated entities in uniform formats and harmonized taxonomies.

- Perform automated validation, data aggregation and analytics more effectively.

- Enable the comparability, timeliness and quality of reported data across the financial ecosystem.

- Streamline supervisory processes and improve decision-making with data-driven oversight.

Why is 'standardization' required?

Chartis and Regnology strongly believe that the key forces behind the goal of standardizing the regulatory reporting architecture are:

- **Data quality and traceability**. Standardized architectures help ensure accurate, data-governed reporting that complies with BCBS 239 and equivalent frameworks.

- **Regulatory expectations**. Authorities across the globe (like the ECB, EBA, PRA, Fed, MAS and APRA[1]) are pushing for consistent, granular, high-quality data.

- **Risk management**. Standardized architectures enable more integrated views of exposures and systemic risk.

- **Cost and efficiency**. Standardized architectures reduce the duplication of reporting efforts across different teams and regulatory requirements.

- **Faster onboarding of new regulations**. Modeling the data logically saves considerable time when onboarding newer regulations and deriving their reporting requirements.

- **Strategic data reuse**. A golden source of derived data enhances the performance of advanced analytics and stress testing.

- **Easier adoption of advanced technologies** (such as AI, machine learning [ML] and robotic process automation [RPA]) to achieve an automated regulatory reporting workflow on top of standardized regulatory data management processes.

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[1] *European Central Bank, European Banking Authority, Prudential Regulation Authority, Federal Reserve System, Monetary Authority of Singapore, Australian Prudential Regulation Authority*

'Next-gen' standardized regulatory reporting architecture

The future of regulatory reporting lies in an integrated, end-to-end digital ecosystem that connects regulated entities and regulators through a unified, intelligent and adaptive architecture that leverages elements such as shared taxonomies, real-time data exchange and AI-enhanced supervision (see Figure 1).

Figure 1: Standardizing the future of regulatory reporting
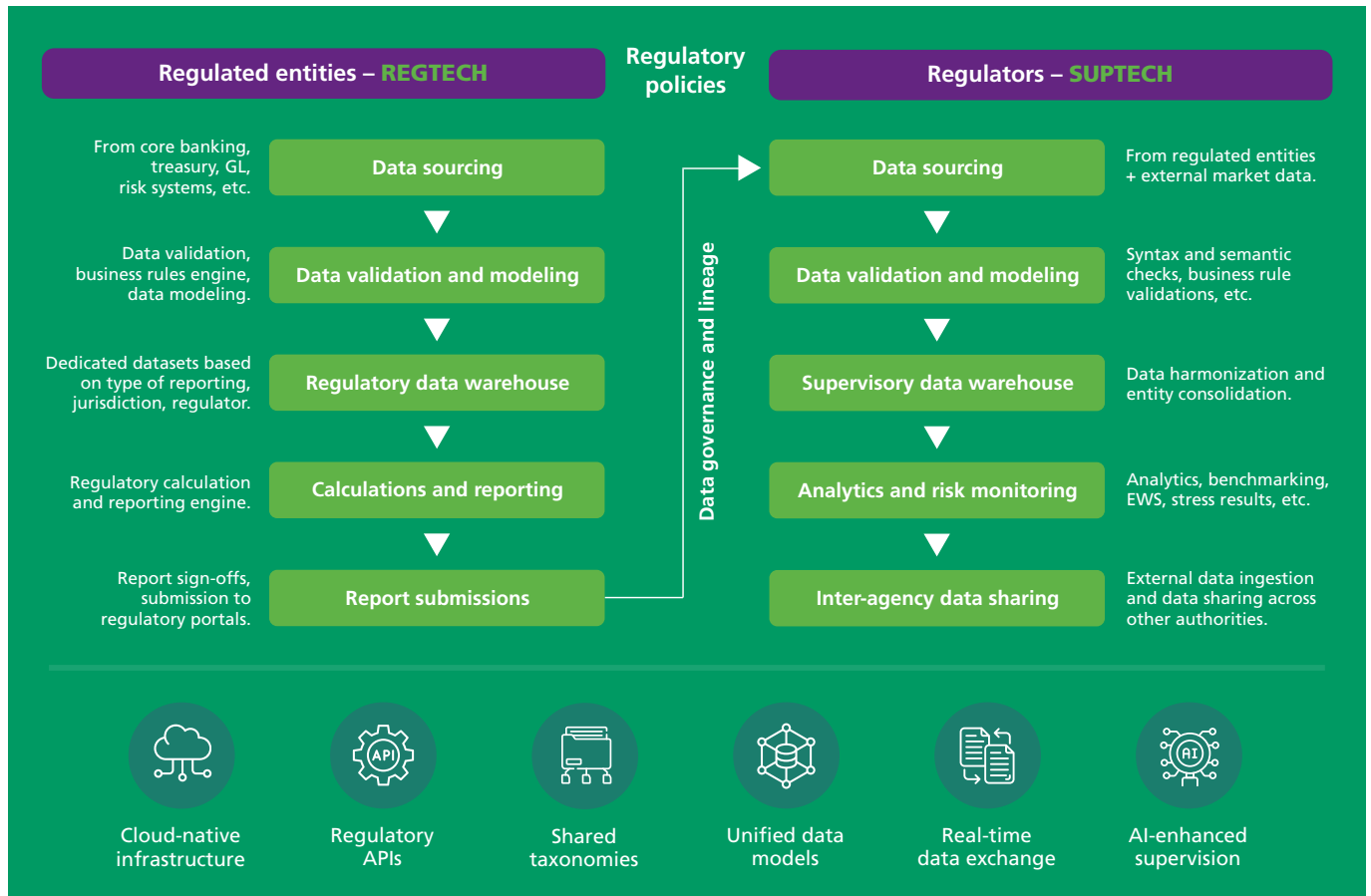
Source: Chartis Research

Chartis and Regnology have identified the following key components as essential to building this future-ready, standardized architecture:

- **Regulatory policies** are a foundational element of the regulatory reporting lifecycle. They are formal directives issued by regulators that define the parameters under which financial institutions must report data. These policies govern several critical aspects:

  ○ *How should data be modeled and interpreted*? Regulatory data point models, taxonomies and messaging structures linked to policies and guidelines.

  ○ *What data must be reported?* Regulatory guidelines define the scope of financial, risk and operational data that financial institutions are required to capture and disclose.

  ○ *How must it be calculated?* Financial institutions must perform regulatory calculations in line with prescribed methodologies, including capital adequacy, credit risk, liquidity metrics and other prudential ratios.

- *What format must be used for submission?* Regulatory authorities specify standardized submission templates and formats, such as XBRL, XML and CSV, ensuring consistency, comparability and automation.

- *When must it be submitted?* Reports must be compiled, validated and submitted within predefined frequencies (e.g., daily, monthly, quarterly, etc.), as mandated by regulators.

  Investing in a regulatory reporting system that natively embeds and adapts to regulatory policies is a critical priority for financial institutions, for several reasons: to ensure financial stability, promote financial transparency and achieve market confidence, to enable strategic planning for capital allocation, to ensure adequate risk mitigation and compliance with regulatory rules to avoid penalties, and to ensure a robust data governance and lineage framework.
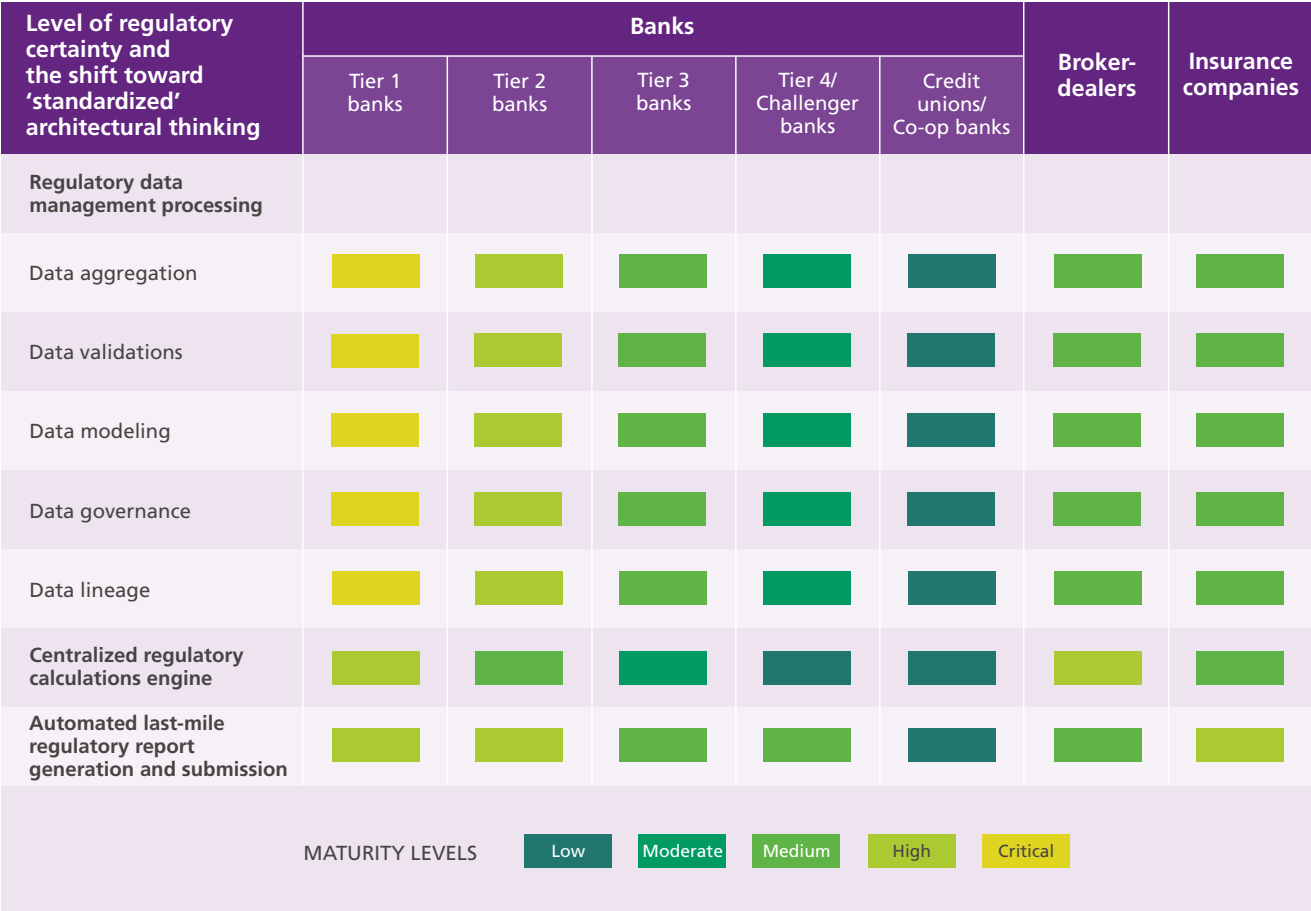
- **RegTech and SupTech platform architectures**, based on similar principles, to bridge the data management gaps between regulated entities and regulators. This should also help regulators consolidate data across entities and perform macroeconomic analyses.

- **Cloud-native infrastructure** deployment, by both regulated entities and regulators, to help firms scale and automate models, and develop strong capabilities around analytics.

- **Regulatory application programming interfaces (APIs)** to achieve real-time submission via shared taxonomies.

- **Unified data models** (such as the Banks' Integrated Reporting Dictionary [BIRD], Data Point Model [DPM] and ISO 20022) for data consistency.

- **Data lineage** tools to ensure traceability from source to submission.

- **Metadata management** to help firms tag and reuse regulatory data for improved efficiency.

- **AI/ML analytics layer** for predictive supervision and stress scenario modeling.

Regulatory certainty vs. a shift toward 'standardized' architectural thinking

The level of regulatory certainty is a critical factor influencing how regulated entities implement standardized regulatory reporting architectures. In a world where regulatory landscapes are becoming more volatile due to geopolitical influence, economic cycles and technological shifts, regulated entities are evolving their data and reporting strategies toward structured and scalable regulatory reporting architectures. Standardized regulatory reporting frameworks are becoming a strategic asset and not just a compliance-related cost. Regulated entities that invest early in architectural maturity frameworks are more resilient to future regulatory shifts and better aligned with supervisory expectations.

Chartis and Regnology have jointly researched and studied the banking market across industry tiers, including challenger banks, credit unions, co-operative banks, broker-dealer institutions and insurance companies in the North American, European (including the UK), MENA and APAC markets. Figure 2 and Table 2 (on page 8) provide a snapshot of the regulatory maturity of the various types of regulated entity, and the strategies they are adopting as they move toward 'standardized' regulatory reporting architectures.

Figure 2: Regulatory maturity of regulated entities

Level of regulatory certainty and the shift toward 'standardized' architectural thinking	Banks					Broker-dealers	Insurance companies
	Tier 1 banks	Tier 2 banks	Tier 3 banks	Tier 4/ Challenger banks	Credit unions/ Co-op banks		
Regulatory data management processing							
Data aggregation	Critical	High	Medium	Moderate	Low	Medium	Medium
Data validations	Critical	High	Medium	Moderate	Low	Medium	Medium
Data modeling	Critical	High	Medium	Moderate	Low	Medium	Medium
Data governance	Critical	High	Medium	Moderate	Low	Medium	Medium
Data lineage	Critical	High	Medium	Moderate	Low	Medium	Medium
Centralized regulatory calculations engine	High	Medium	Moderate	Low	Low	High	Medium
Automated last-mile regulatory report generation and submission	High	High	Medium	Medium	Low	Medium	High

MATURITY LEVELS: Low | Moderate | Medium | High | Critical

Source: Chartis Research

Looking ahead

In the forthcoming articles in this series, we will explore targeted perspectives on the progression of standardized regulatory reporting data architectures across banks and broker-dealer institutions. Each article will focus on key geographic markets, including North America, Europe (including the UK), MENA and APAC, highlighting their current data infrastructure, regulatory priorities and progress toward standardized, scalable and agile reporting architectures.

Table 2: Regulatory maturity – characteristics and strategies

Regulatory maturity	Key characteristics	Strategy for reporting architecture
Low	Deregulation trends, political reversals, undefined rules (such as the AI Act and ESG/climate risk reporting in the US).	Regulated entities think about reusing existing frameworks or looking for workarounds, rather than investing in a strategic platform.
Moderate	Where the requirements for a given jurisdiction are well-defined and less complex (such as in the secondary markets of APAC and LATAM).	Regulated entities look to invest in point solutions from local vendors with a simple framework that allows them to configure templates easily.
Medium	Where regulators introduce incremental changes or include regional divergence (such as for ESG, climate disclosures, liquidity risk ratios and capital adequacy).	Regulated entities invest with a medium-term strategy to build modular, jurisdiction-focused architectures.
High	Stable frameworks in which updates on regulatory reporting requirements are predictable (such as Basel III/IV roll-out, FRTB, DORA and SFTR).	Regulated entities invest, with a medium- to long-term strategy to implement a robust platform with a key focus on data management, automation and scalability.
Critical	Advanced frameworks (keeping in mind bigger initiatives such as IReF/BIRD and equivalent frameworks) to achieve granular as well as real-time reporting.	Regulated entities invest, with a long-term strategy to build a regulatory data warehouse/data lake based on type of reporting by jurisdiction and regulator. A key focus is on data management, standardized data models, automation, scalability and the adoption of use cases for advanced technologies (such as AI, ML and RPA), to make the workflow more efficient.

Source: Chartis Research