Cornerstone ADVISORS

Improving Your Financial Institution's
Data Execution Quality (EQ)

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Executive Summary

This report reveals the findings of an expanded framework that assesses how well banks and credit unions use data (their Data Execution Quality, or Data EQ) in four functional areas—strategic planning, sales and marketing, credit analysis, and operational delivery—as well as the effectiveness of their data access and analysis capabilities. From a Data EQ perspective:

- **Community-based financial institutions are a little more than halfway to where they need to be.** The total average Data EQ score (out of a possible 500) was 241. If an institution averaged 80 points in each of the five categories, it would be characterized as "established and operational," a respectable level of capability.

- **Credit analysis is the most advanced function from a data utilization perspective.** With an average score of 51 (out of a possible score of 100), even credit analysis has a lot of room for improvement.

- **Sales and marketing is the lowest-scoring function.** Two-thirds of the financial institutions in the analysis scored below 50 in sales and marketing, meaning their use of data was below the level of "developing and/or improving."

- **The larger the FI, the higher the Data EQ score.** This probably isn't surprising. There is one outlier, however: FIs in the $500 million to $1 billion asset range didn't score as highly as FIs below $500 million in assets.

- **Credit unions outscore banks.** It isn't even close.

Data Is Useless If You Don't Use It

In early 2025, Cornerstone Advisors conducted a study of mid-size banks and credit unions to assess the quality of their data management capabilities. We were frustrated with the level of discussion around data management. Advice and recommendations regarding data management were often bromides—e.g., "unify your data across systems" or "clean and standardize your data." In addition, discussions about data ignored the type of data being discussed.

So, we developed a framework that assessed FIs' use of customer data, market data, transaction data, and operational data—and the data governance policies dealing with those types of data—and fielded a survey of more than 100 banks and credit unions to measure their "Data IQ."

Looking back at the results of our assessment, we realized we had only done half the job. What was missing? How financial institutions used the data they were collecting and managing.

Measuring Data Execution Quality (Data EQ)

This report reveals the results of an expanded framework that assesses how well banks and credit unions are using data (Data Execution Quality, or Data EQ) in four functional areas—strategic planning, sales and marketing, credit analysis, and operational delivery—as well as the effectiveness of their data access and analysis capabilities.

For each of the five assessment categories, 10 unique attributes (or capabilities) were identified and scored by survey respondents along the following criteria (with the corresponding score allocation): 1) no capability (0 points); 2) ad-hoc and/or inconsistent (3 points); 3) developing and/or improving (5 points); 4) established and operational (8 points); and 5) optimized and strategic (10 points). Table D in the Appendix illustrates the detailed framework.

The Impact of Data EQ on AI

According to Cornerstone's 2025 What's Going On In Banking study, in 2025, 35% of community-based financial institutions had already deployed chatbots, 26% had implemented machine learning, and 25% were using generative AI tools. Looking to 2025, 21% planned to deploy chatbots, 20% expected to introduce machine learning models, and 28% said they would be using generative AI, all for the first time.[1]

> Community banks and credit unions stand to benefit significantly from AI—but only when their data infrastructure is up to the task.

Their efforts hinge on their Data IQ and Data EQ scores. Community banks and credit unions stand to benefit significantly from AI—but only when their data infrastructure is up to the task. AI can have a significant impact on:

- **Strategic planning.** AI models can simulate financial scenarios, forecast loan demand, and identify new markets. But such models rely on a steady stream of internal data—deposit flows, branch performance, loan delinquency rates—as well as external data on demographics, interest rates, and economic trends. A robust data warehouse and a well-managed business intelligence layer are essential.

- **Sales and marketing.** Financial institutions can use AI to personalize product recommendations, segment customers, and target campaigns. But these efforts are only as good as the underlying customer data. Does the institution have a unified customer profile? Are marketing engagement metrics integrated with transaction data? Can the institution differentiate between a small and medium-sized business (SMB) and a sole proprietor based on behavioral signals? AI marketing tools are powerful, but they amplify existing weaknesses if the customer data is messy or fragmented.

- **Credit analysis.** AI can improve underwriting by incorporating more data points—cash flow, bill payment history, real-time payroll deposits—into credit decisions. This opens the door to serving more borrowers, especially thin-file or gig economy workers. However, banks need to re-architect their credit models to accept non-traditional data. They also need robust governance to ensure explainability and fairness. This means FIs must get serious about alternative data pipelines, model validation processes, and regulatory disclosures—all of which stem from a disciplined data strategy.

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- **Operational delivery.** AI can boost back-office efficiency—e.g., automating reconciliations, routing documents, flagging errors in real time. But these models rely on granular process data. A chatbot can't route a loan application if the system does not know what stage the application is in. Predictive staffing models will fail if teller transaction volumes are not accurately tracked. Many operational AI applications assume that core systems and digital channels are already integrated, and that metadata is being captured systematically. That's not the case in most community banks and credit unions, however.

Community banks and credit unions should be excited about the potential of AI—but they must approach it with discipline. Without a strong data strategy, even the best AI tools will underperform or backfire.

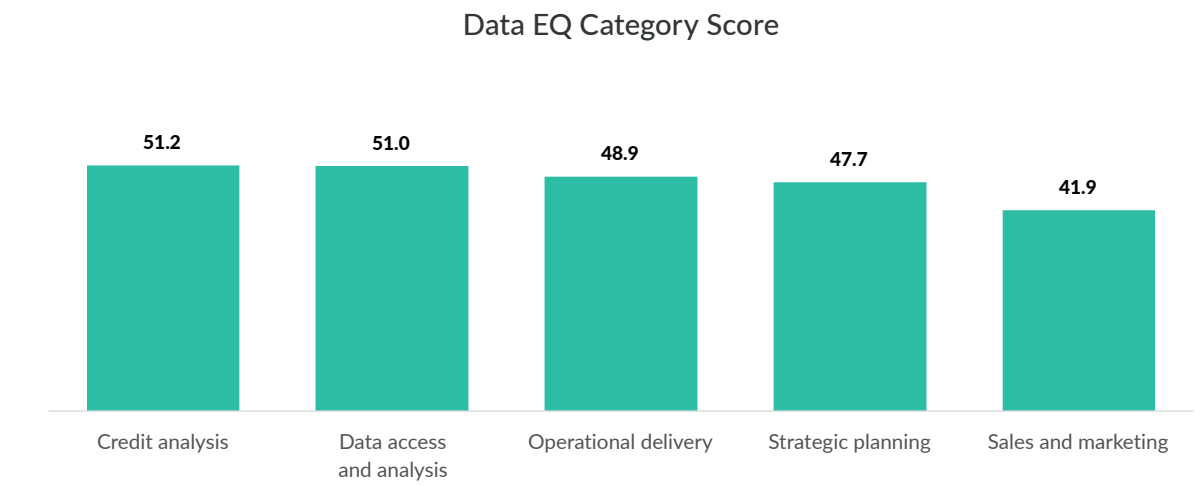
About the Data

To help financial institutions benchmark their own data capabilities against the data assessment framework, Cornerstone Advisors surveyed senior executives from 124 financial institutions about their data management practices and capabilities in August 2025. Seven in 10 respondents were either senior vice presidents or executive vice presidents or had chief in their titles. Half of the respondents were from institutions with assets between $1 billion and $5 billion, 11% were from FIs with $5 billion to $10 billion in assets, and 29% were from FIs with $250 million to $1 billion in assets.

The Data EQ of Banks and Credit Unions

On average, three of the five categories—credit analysis, data access and analysis, and operational delivery—were rated at the developing and/or improving level (Figure 1). Strategic planning came in just below that level, and the sales and marketing function struggled the most with a rating about halfway between "ad-hoc and/or inconsistent" and "developing and/or improving."

FIGURE 1:
Data EQ Scores by Function

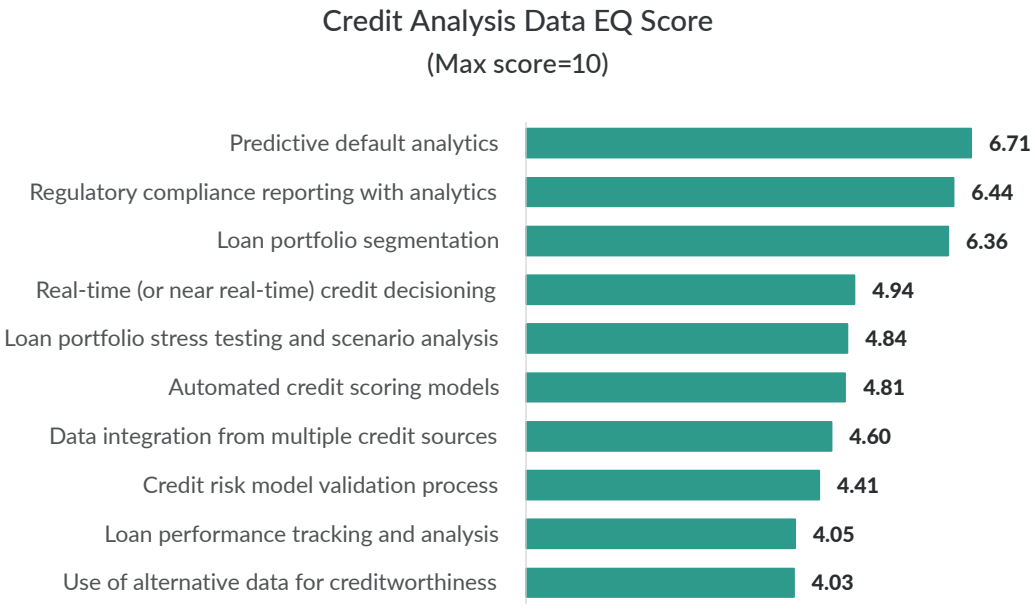


Source: Cornerstone Advisors

Credit Analysis

Bank and credit union executives rated credit analysis the highest among the functions evaluated. Three capabilities—predictive default analytics (i.e., using models to forecast loan defaults, analytics-driven regulatory compliance, and loan portfolio segmentation (by risk band, geography, product, etc.)—stood out among the 10 attributes. Weaknesses to be addressed, however, include the use of alternative (i.e., non-traditional) data sources for measuring creditworthiness and loan performance tracking and analysis (Figure 2).

FIGURE 2:
Credit Analysis Data EQ Score

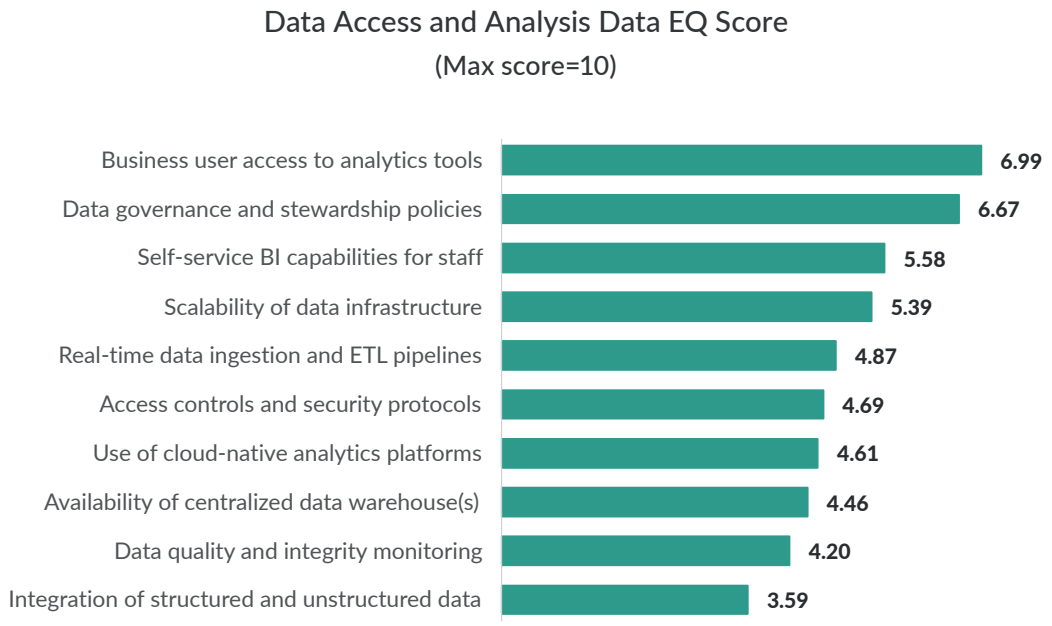


Source: Cornerstone Advisors

Data Access and Analysis

Across the 50 capabilities assessed, business user access to analytics tools received the highest rating—23% of executives rated their organizations at the "optimized and strategic" level. Also scoring highly were data governance and stewardship policies, which many executives believe are established and operational (or better). At the other end of the spectrum, data quality and integrity monitoring is a shortcoming, as is the integration of structured and unstructured data (Figure 3).

FIGURE 3:
Data Access and Analysis Data EQ Score

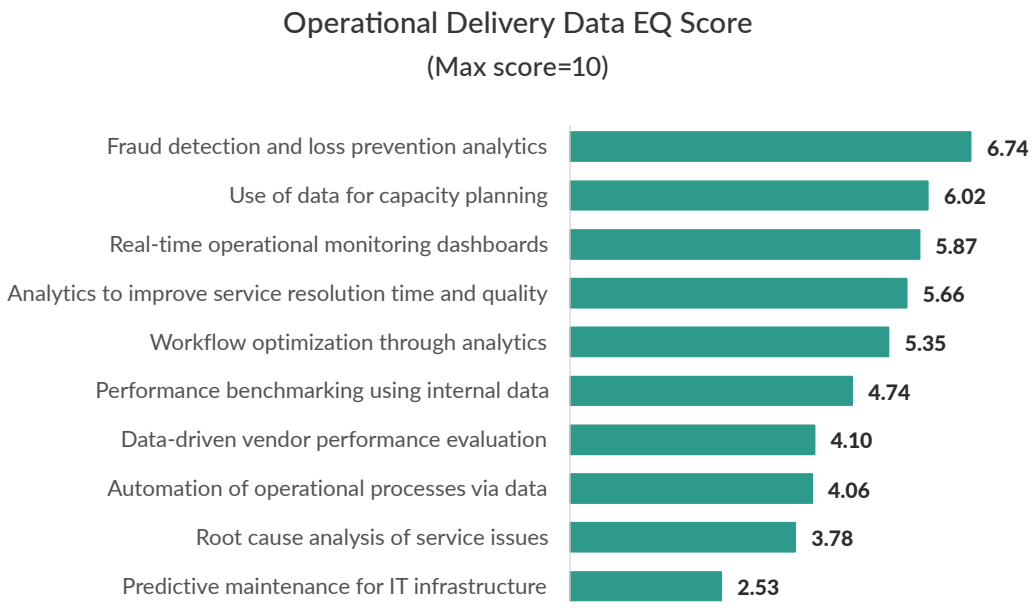


Source: Cornerstone Advisors

Operational Delivery

Fraud detection and loss prevention analytics are a strong point in many banks and credit unions, with 22% of survey respondents rating the capability as “optimized and strategic.” Root cause analysis of service issues and predictive maintenance for IT infrastructure are areas needing improvement within the operational delivery function (Figure 4).

FIGURE 4:
Operational Delivery Data EQ Score

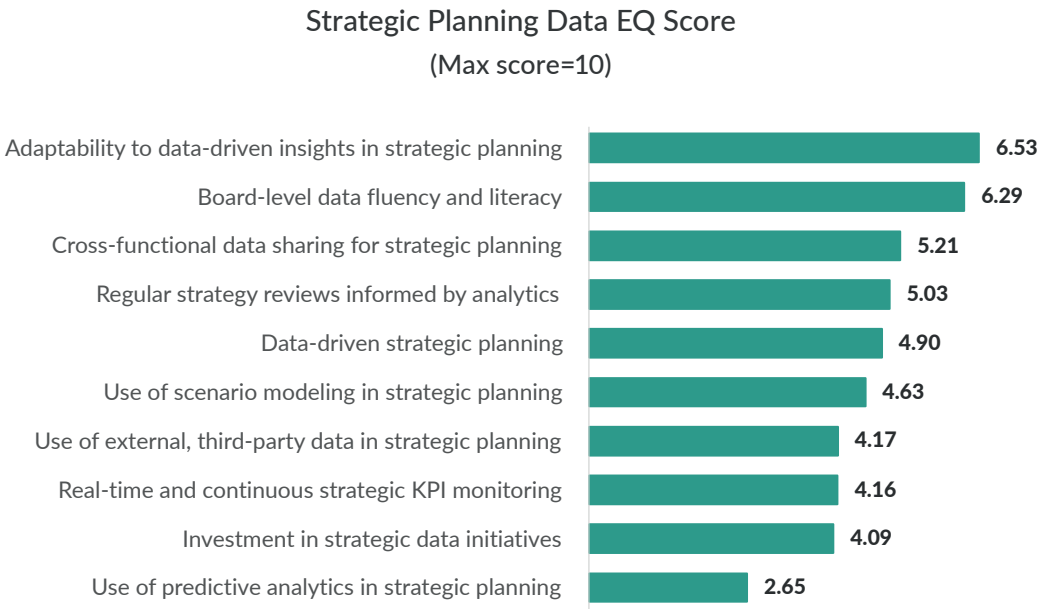


Source: Cornerstone Advisors

Strategic Planning

Many bank and credit union executives believe their organizations adapt to data-driven insights in their strategic planning efforts. In addition, many indicate that their board members have achieved a strong level of data fluency and literacy. The use of predictive analytics in strategic planning is lacking, however, as this capability was the second-lowest among the 50 attributes (Figure 5).

FIGURE 5:
Strategic Planning Data EQ Score



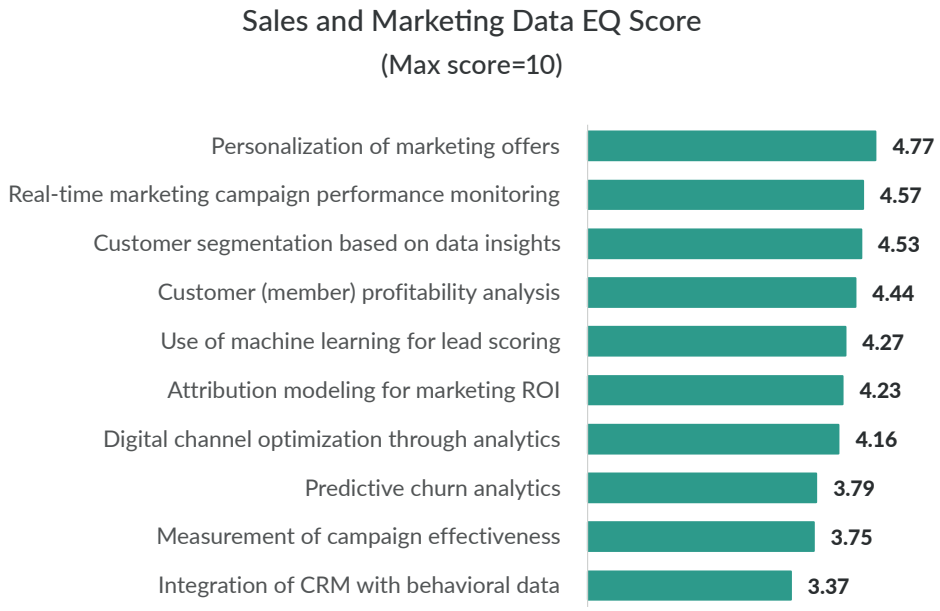
Source: Cornerstone Advisors

Sales and Marketing

The lowest-scoring function among the five rated, the highest-rated sales and marketing capability is personalization of marketing offers. Overall, the various marketing analytics-related capabilities consistently received low ratings (Figure 6).

FIGURE 6:

Sales and Marketing Data EQ Score

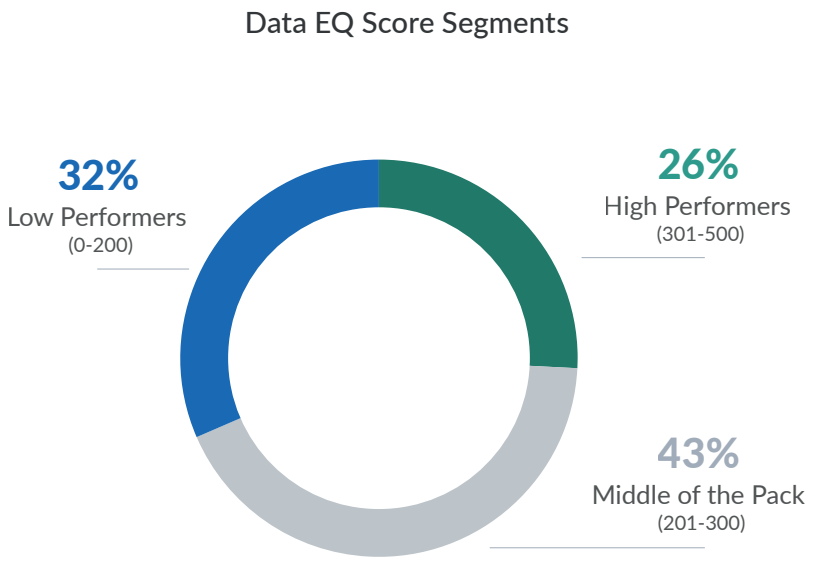


Source: Cornerstone Advisors

The Hallmarks of Data EQ High Performers

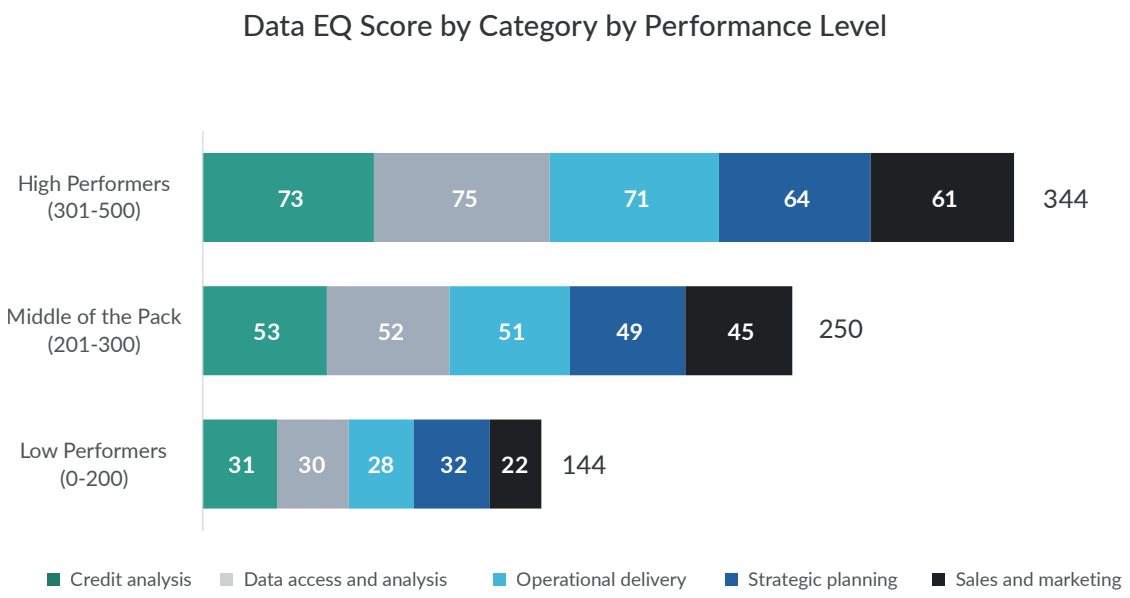
To understand what distinguishes the high Data EQ institutions from the rest of the pack, we segmented survey respondents into three groups based on their Data EQ score (Figure 7). High performers had an average Data EQ score of 344, in contrast to 250 for the middle of the pack FIs, and 144 for the low performers (Figure 8).

FIGURE 7:
Data EQ Segments



Source: Cornerstone Advisors

FIGURE 8:
Data EQ Scores by Segment



Source: Cornerstone Advisors

Beyond the 50 capabilities across the five functional areas, high performers distinguish themselves in cultural and procedural—i.e., non-technical—ways (Table A):

- **Information is considered a strategic asset.** Nearly three-quarters of high performers consider information a strategic asset, in contrast to 30% of middle of the pack institutions, and just 3% of low performers.
- **Data is a key driver of strategic decision-making.** More than half of high performers said data is a key driver of strategic decision-making, in contrast to 21% of middle of the pack institutions, and none of the low performers.
- **A culture is fostered around data usage.** Almost half of the high performers said their organizations foster a data usage culture, in contrast to 9% of middle of the pack institutions, and none of the low performers.
- **Data strategy is reviewed regularly.** Four in 10 high performers regularly review data strategy, in contrast to 21% of middle of the pack institutions, and none of the low performers.

TABLE A:

Characteristics by Data EQ Score Segment

		High Performers (301-500)	Middle of the Pack (201-300)	Low Performers (0-200)
Information is considered a strategic asset	Mostly/completely describes us	72%	30%	3%
	We show signs of this	25%	60%	31%
	Does not describe us	3%	9%	67%
Data is a key driver of strategic decision-making	Mostly/completely describes us	56%	21%	0%
	We show signs of this	41%	55%	44%
	Does not describe us	3%	25%	56%
A culture is fostered around data usage	Mostly/completely describes us	47%	9%	0%
	We show signs of this	44%	47%	10%
	Does not describe us	9%	43%	90%
The organization's data strategy is reviewed on a regular basis	Mostly/completely describes us	41%	21%	0%
	We show signs of this	56%	49%	23%
	Does not describe us	3%	30%	77%
Real-time data across the organization is clean, structured, and scalable	Mostly/completely describes us	28%	6%	5%
	We show signs of this	47%	40%	8%
	Does not describe us	25%	55%	87%

Becoming a Data EQ High Performer

Everybody wants to be an A student and get a perfect grade. In the case of Data EQ, a perfect score of 500 is virtually impossible, and not even practical. A financial institution can't be "optimized and strategic" on all 50 capabilities. Instead, a score of 400—averaging 8 points on the 50 attributes—is the top score an institution can reasonably expect to achieve.

Bromides like "break down data silos" and "define data governance policies" won't help an FI get an A grade. FIs that are serious about improving their Data EQ (which should be all FIs) will need to make some difficult decisions and choices about their:

- **Current Data EQ.** It may sound self-serving, but FIs should benchmark themselves on our Data EQ assessment framework (or another framework if they find one) to understand their Data EQ strengths and improvement areas. Without a baseline assessment, investments in improving Data EQ will go to the squeakiest wheel. It took survey respondents just 10 minutes to complete the survey, but an executive team review to grade its institution's Data EQ is well worth the few hours it will take to have the discussion.

- **Impeders.** Executive team members and functional heads all have their individual strengths and weaknesses. The "impeders" are the executive team members and functional heads who: 1) don't believe that data is a strategic asset; 2) don't foster a culture of data usage; and 3) don't drive their functional areas toward higher Data EQ.[2] The impeders won't admit they don't do these things—the CEO and the rest of the executive team must recognize them (by their behavior) and assess whether they can change or if they need to be replaced (or supported).

- **Organizational skill gaps.** It was no surprise to us that, from a functional perspective, sales and marketing scored the lowest on the Data EQ assessment. Many marketers in mid-size FIs are strong in branding and advertising, but not strong in database marketing and analytics. Asking them to optimize digital channel spend or develop predictive churn models is likely to be a wasted effort.

- **Strategic planning process.** It was a surprise, however, that strategic planning scored as highly as it did. The average score for "data-driven strategic planning" was 4.9, which, we'd guess, is because many execs believe economic trends (i.e., data) are used. The 4.63 score for scenario modeling in strategic planning seems way too high, however. Our take: In too many banks, strategic planning is really just a budgeting exercise, and in credit unions, just an aspirational exercise. The 2.65 score for the use of predictive analytics in planning tells the real story.

- **AI strategy.** FIs are obsessed these days with defining their organization's AI strategy. We'll assert that if an organization's Data EQ score is less than 60 for a given function, AI efforts related to that function will fail. Stated differently: There is no AI strategy without a Data EQ strategy.

- **Technology vendors.** Any tech vendor can tell you how its product stands up from a feature/functionality perspective. But it's harder for them to demonstrate how they can help drive organizational change and how their offerings can help a financial institution improve its Data EQ. Executive teams should task functional heads with assessing their key technology vendors on these aspects.

Getting Data Ready for AI

Quantitative data gets all the AI love. But qualitative data—think customer feedback, call center transcripts, chatbot logs, survey responses, employee notes, policies, procedures—is a goldmine for training large language models. The problem is that many financial institutions treat qualitative data like that weird uncle at Thanksgiving: there, but nobody knows what to do with it. Here's what they can do to improve the accuracy, quality, and utility of their qualitative data for AI efforts:

- **Standardize the collection process.** If every branch, call center, or support agent collects qualitative data differently, your AI is being fed chaos. **Action steps:** 1) Create templates or structured forms for capturing customer comments and service interactions; 2) Implement consistent tagging frameworks across customer feedback channels (e.g., "loan experience," "digital frustration," "product confusion"); 3) For open-text fields, prompt employees or customers with structured questions to generate more actionable inputs; and 4) Treat qualitative data like quantitative inputs: define the "schema" even if it's language.

- **Improve transcription accuracy for voice data.** Voice-of-customer data (calls, voicemails, in-branch interactions) is often a treasure trove—but garbage transcripts kill its value. **Action steps:** 1) Use AI transcription tools fine-tuned for financial services vocabulary (e.g., "ACH," "CD," "routing number"); 2) Include speaker labeling in multi-person conversations to differentiate agent vs. customer sentiment; and 3) Review and spot-check transcripts regularly to flag misheard terms that skew downstream analysis.

- **Clean—but don't over-sanitize—the data.** Financial institutions often over-correct for compliance and redact so much of the data that the meaning is lost. You can't analyze qualitative data that's been stripped of emotional or contextual nuance. **Action steps:** 1) Redact only personally identifiable information (PII), not customer intent or sentiment; 2) Use entity anonymization tools, not blunt-force deletion; and 3) Preserve context (dates, branch names, channels used) when it adds analytical value.

- **Detect and filter noise before training.** Not all qualitative data is useful. Some of it is repetitive, low-signal, or just spam. **Action steps:** 1) Implement pre-processing filters to exclude vague, abusive, or off-topic responses; 2) Use clustering algorithms to group similar comments and identify high-signal feedback; and 3) Score feedback based on actionability or specificity and prioritize for training and analysis.

Improving Data EQ

Financial institutions should take the following steps to improve their Data EQ:

- **Task functional leaders with improving Data EQ.** It's tempting to appoint a chief data officer and make that person accountable for improving the organization's Data EQ. While having a CDO might be useful or necessary, a CDO shouldn't have to shoulder the burden for improving a functional area's Data EQ.

- **Identify the sources of truth.** There's a popular meme in the industry that FIs should find the "source of truth" in their data. This is questionable advice. Reality: Data from different sources might not agree with each other, but one source isn't *universally* better than another. Identifying the *sources* of truth requires functional managers and the executive team to have discussions about why different data sources disagree and make decisions about which sources are better for different types of decisions.

- **Find the stories in the data.** Another popular, and questionable, industry meme exhorts FIs to "turn data into insight." That's not the goal. The goal is to find the stories that the data is telling about what's happening and what the FI should do about it. Execs shouldn't be asking for "data"; instead, they should be asking their colleagues: "What's the story?" It makes people in the organization think through what the data means, and not just being a data messenger.

A Deeper Dive Into the Data EQ Data

Generally speaking, the larger the FI, the higher the Data EQ score (Table B). This isn't surprising, but there is one outlier: FIs in the $500 million to $1 billion asset range didn't score as highly as FIs below $500 million in assets. Our explanation for this is organizational complexity: FIs in the sub-$500 million asset range typically deal with a smaller set of products and a more limited geographical footprint than FIs in the $500 million to $1 billion asset range. As FIs grow from the sub-$500 million level to more than $500 million, the organizational processes relating to Data EQ don't keep pace. They don't scale effectively to match the new scope of the organization.

TABLE B:
Data EQ Score by Asset Size

	<$500 million (n=23)	$500 million to $1 billion (n=23)	$1 billion to $5 billion (n=61)	$5 billion to $10 billion (n=14)
Credit analysis	48	46	52	58
Data access and architecture	48	45	52	59
Operational delivery	49	39	51	52
Strategic planning	46	44	49	49
Sales and marketing	36	34	44	51
TOTAL	**227**	**209**	**248**	**268**

Source: Cornerstone Advisors

Splitting the survey sample by type of financial institutions reveals that credit unions far outscore banks in every functional area (Table C). One possible reason for this: Compared to credit unions, community banks are often more focused on the commercial vs. the retail side of the business, and they rely more on personal relationships than on data-driven processes.

TABLE C:

Data EQ Score by Type of Financial Institution

	Banks (n=64)	Credit Unions (n=57)
Credit analysis	45	57
Data access and architecture	45	57
Operational delivery	42	56
Strategic planning	43	53
Sales and marketing	36	48
TOTAL	**211**	**271**

Source: Cornerstone Advisors

Appendix

TABLE D:
Data EQ Assessment Framework

Capability	Definition
Strategic Planning	
Data-driven culture in executive decision-making	The extent to which executive leadership relies on data and analytics to make strategic decisions
Use of predictive analytics in strategic planning	Applying statistical models to anticipate trends and inform future strategies
Integration of external data into strategic decisions	The use of third-party or market data to enhance internal decision-making
Scenario modeling and forecasting capabilities	The ability to model different future scenarios and evaluate possible outcomes
Real-time performance monitoring tools	Dashboards or platforms that track business KPIs continuously
Cross-functional data sharing for strategy alignment	Data is consistently shared across departments to align strategy and operations
Regular strategy reviews informed by analytics	Strategic reviews use current and retrospective data to guide course corrections
Board-level data fluency and literacy	Board members' ability to interpret and question data presented for decision-making
Adaptability to data-driven insights	Willingness to pivot strategy in response to new data
Investment in strategic data initiatives	Allocation of budget and resources to long-term data programs

Sales and Marketing	
Customer segmentation based on data insights	Grouping customers using behavioral, transactional, or demographic data
Personalization of marketing offers	Tailoring offers based on user data and predicted preferences
Real-time campaign performance monitoring	Tracking marketing campaigns as they unfold to optimize or pause them
Attribution modeling for marketing ROI	Assigning credit to channels and touchpoints that drive conversions
Use of AI/ML for lead scoring	Using machine learning to score prospects based on conversion likelihood
Digital channel optimization through analytics	Improving digital performance using analytics (click paths, drop-offs, conversions)
Integration of CRM with behavioral data	CRM tools use data from digital activity and transactions
Customer lifetime value (CLV) analysis	Estimating future revenue from customers based on behavior and tenure
Predictive churn analytics	Identifying customers likely to leave using behavioral signals
Measurement of campaign effectiveness	Evaluating outcomes versus expectations with data

Credit Analysis	
Data integration from multiple credit sources	Combining bureau, application, and behavioral data for lending decisions
Use of alternative data for creditworthiness	Incorporating non-traditional data to assess borrower risk
Automated credit scoring models	Use of algorithmic models to automatically score applicants
Real-time credit decisioning capabilities	Systems enable instant or near-instant lending decisions
Loan performance tracking and analysis	Monitoring and analyzing loan KPIs for delinquency, charge-offs, and prepayment

Stress testing and scenario analysis	Modeling loan portfolio performance under adverse scenarios
Granular portfolio segmentation	Detailed slicing of loan portfolio by risk band, geography, product, etc.
Regulatory compliance reporting with analytics	Analytics supports required for fair lending, CRA, or 1071 reporting
Credit risk model validation process	Formal periodic validation of credit scoring models
Predictive default analytics	Using models to forecast loan defaults

Operational Delivery	
Use of data for capacity planning	Using volume forecasts to allocate staffing and infrastructure
Real-time operational monitoring dashboards	Using dashboards to show performance and service status live
Automation of operational processes via data	Data triggers RPA or workflow automation
Root cause analysis of service issues	Using data to investigate the source of failures or complaints
Performance benchmarking using internal data	Comparing internal processes across regions or branches
Workflow optimization through analytics	Using analytics to streamline operations
Fraud detection and loss prevention analytics	Monitoring for patterns that indicate fraud
Customer service analytics for resolution	Analyzing customer interactions to improve resolution time and quality
Predictive maintenance for IT infrastructure	Forecasting failures and preemptively maintaining IT systems
Data-driven vendor performance evaluation	Using SLAs and performance metrics to assess vendors

Data Access and Analysis	
Availability of centralized data warehouse	A unified system that stores and organizes organizational data
Data governance and stewardship policies	Formal rules and roles around data ownership and quality
Access controls and security protocols	Security measures to manage who can access what data
Real-time data ingestion and ETL pipelines	Systems that bring in and process data continuously
Business user access to analytics tools	Non-technical staff have tools to query and use data
Integration of structured and unstructured data	Capability to process logs, PDFs, chat transcripts, and other non-tabular formats
Self-service BI capabilities for staff	Teams can independently explore data and generate insights
Scalability of data infrastructure	Data systems scale with increased volume and users
Data quality and integrity monitoring	Ongoing checks for errors, missing values, and inconsistencies
Use of cloud-based analytics platforms	Platforms are cloud-native, flexible, and enable advanced analytics

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Ron Shevlin heads up Cornerstone Advisors' fintech research efforts and authors many of its studies. He has been a management consultant for over 30 years, working with leading financial services, consumer products, retail, and manufacturing firms worldwide. Before joining Cornerstone, Shevlin was a researcher and consultant for Aite Group, Forrester Research, and KPMG. He is the author of the book Smarter Bank, writes the Fintech Snark Tank blog on Forbes, and hosts the What's Going On in Banking podcast. Shevlin is ranked among the top banking and fintech influencers globally and is a frequent keynote speaker at banking and fintech industry events.

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About Cornerstone Advisors

For over 20 years, Cornerstone Advisors has delivered gritty insights, bold strategies, and data-driven solutions to build smarter banks, credit unions, and fintechs. From technology system selection and implementation to contract negotiations, vendor management, performance improvement programs, strategic planning, merger integration, and enterprise program management, Cornerstone combines its expertise with research and proprietary data to help financial institutions thrive in today's challenging environment.

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About KlariVis

KlariVis® is the only data analytics platform built by former community bank executives to help financial institutions turn their data into actionable insights. By consolidating and simplifying data from across the bank into interactive dashboards and reports, KlariVis empowers teams to make informed decisions that drive growth, efficiency, and customer impact. Built on a modern technology stack, KlariVis eliminates the need for manual reporting, allowing banks to focus on strategy, performance, and innovation. To learn more, visit KlariVis.com.

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Endnotes

[1] What's Going On In Banking 2025, Cornerstone Advisors

[2] klarivis.com/insight/article/disrupting-your-data-culture-how-banks-can-win-by-opening-access-to-information/

Have questions regarding this report?

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