MODERN MDM: THE HUB OF ENTERPRISE DATA EXCELLENCE

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Report Highlights

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Business users are most challenged by data complexity and disparity brought on by data "silos."	Companies using MDM are more than twice as likely to be satisfied with data quality and speed of delivery.	71% of Best-in-Class companies have a process in place for sharing data across business functions.	Top companies are twice as likely to rate their decision speed as "strong" or "highly effective."

Master data management (MDM) may have started as an IT-centric toolset for managing single data domains, but the technology has evolved. This report explores a Best-in-Class approach to MDM that centralizes the management of data, but also creates more fluidity in its distribution, supports more oversight of its accessibility, and generates more business value from its usage.

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> Companies are seeing a wider variety of business users with an increased level of activity, not just with the consumption of data-driven insight, but with their level of direct interaction with data.

Definitions:

This report draws on findings from Aberdeen's 2017 Big Data Survey of 342 organizations.

The survey included responses from **149 companies** using some form of master data management (MDM) processes and/or technology.

A Growing Urgency for Better Data Management

It would be hard to pinpoint a time in recent years when effective data management wasn't a priority for any large organization. However, the last three or four years have seen an uptick in the urgency for better data, for two main reasons. First, the variety of data that the typical organization seeks to manage has expanded. While traditional structured data still constitutes the bulk of information under management, a host of other data types have grown in prominence and demand better oversight. External third-party data, unstructured social data, and machine-generated IoT data have become more important to more decision makers.

In a classic chicken-and-egg scenario, the second major shift has to do with the users that interact with this expanded foundation of data. Companies are seeing a wider variety of business users with an increased level of activity, not just with the consumption of data-driven insight, but with their level of direct interaction with data. As such, the challenge of data disparity has reached critical levels for these Line-of-Business (LoB) users (Figure 1).

Figure 1: Data Disparity Tops the List of LoB Challenges

Executives / LoB
IT Staff

% of Respondents   n = 342
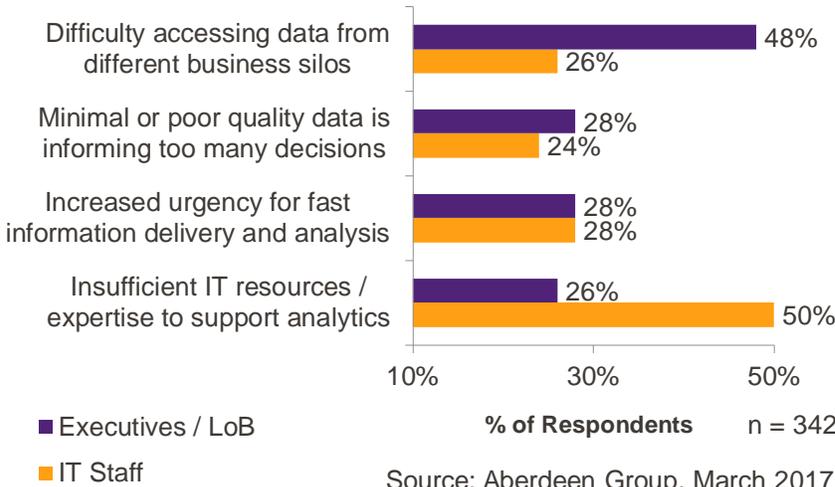
Source: Aberdeen Group, March 2017

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➔ Related Research
*MDM without Limits:
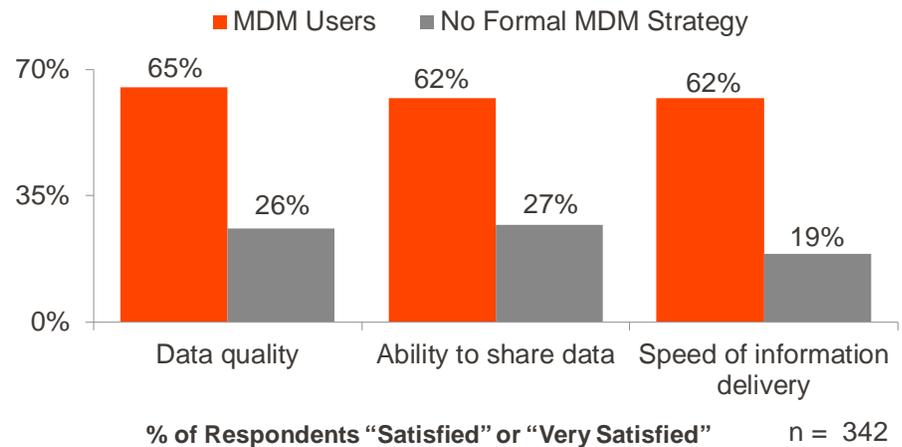Connecting Data,
Crafting Insight,
Mastering Results*

➔ Related Research
*Data Preparation:
The New Normal, the
Now Necessary*

Following logically with the top LoB challenge, IT departments see the same challenge through a different lens. Supporting an enhanced level of analytics is just as much about improving accessibility and quality of data as it is about delivering more reports and dashboards. As the typical user base expands and becomes more diverse, the need to mitigate these challenges around data disparity and poor quality, cited by business users, becomes even greater. These challenges drive more companies today to enhance their MDM capabilities and make their data more portable and consumable.

MDM in Action: Empowering User Curiosity

While the need for MDM is arguably stronger than ever before, plenty of organizations are still slow to adopt, even those with a user base thirsty for data. The research demonstrates that the presence of a formal MDM strategy can have a demonstrable impact on user satisfaction (Figure 2).

Figure 2: MDM Users Enjoy a Satisfied and Engaged User Base

■ MDM Users ■ No Formal MDM Strategy

	Data quality	Ability to share data	Speed of information delivery
MDM Users	65%	62%	62%
No Formal MDM Strategy	26%	27%	19%

% of Respondents "Satisfied" or "Very Satisfied"   n = 342

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Companies with formal, technology-backed approach to MDM keep a closer watch on their data, standardize and centralize its management, and accelerate its flow among different departments.

As mentioned before, the concepts of data quality and portability are critical for users, as is the notion of expediency. Companies with a formal, technology-backed approach to MDM keep a closer watch on their data, standardize and centralize its management, and accelerate its flow among different departments. As a result, these companies enjoy a more satisfied user base when it comes to these critical areas of data quality, portability, and expediency.

What Makes a Top Performing Company Tick?

Certain companies stand out as top performers in their usage of MDM. While pinpointing the real ROI can be tricky, leading companies seek to capture the right data, transform it into insight, and leverage that insight to generate a real business impact. With these ideas in mind, Best-in-Class companies were defined by their ability to perform against the following three key performance metrics, listed below along with the weighted average performance against these metrics:

➔ **Data quality.** With more users in a greater variety of job roles requiring access to a broader array of data, the ability to maintain a high degree of data quality is paramount.

79% of Best-in-Class companies report being "satisfied" or "very satisfied" with data quality, compared with 47% of Average companies and 27% of Laggards.

➔ **Organizational trust in data.** Closely tied to the concept of data quality is the prevailing sense of trust in the data used to make decisions. With the breadth of data sources now accessible for analysis, users need to know that they're using the right data to support their most critical decisions.

54% of Best-in-Class companies report that their organizational trust in data is "strong" or "highly

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effective", compared with 44% of Average companies and only 2% of Laggards.

➔ **Business efficiency / cost reduction.** An efficient flow of clean and usable data throughout the organization offers a multitude of opportunities to identify and act upon ways of doing business better.

Best-in-Class companies, on average, saw a 28% year-over-year reduction in operating cost, compared with a 6% reduction for Average companies and an 8% increase in operating cost for Laggard organizations.

The research strongly suggests that the key to elevated performance is marrying technology with the right kind of internal efficiency and maturity to deliver results. Top companies share a variety of capabilities that help them achieve that performance. Internally, the Best-in-Class put a variety of procedures in place that help them empower users with the right data.

Share and Share Alike

Part of the reason that data portability is important is the enhanced data-driven attitude of so many users today. For example, marketers looking to tailor a campaign to a specific set of customers for cross-selling and up-selling purposes will likely require information that resides outside of the marketing automation platform they interact with on a regular basis. Enabling this type of curiosity requires a greater level of cross-functional data accessibility. Additionally, in the throes of such an analysis, a marketer might decide that she needs information from an application or other data source that her department has never connected with. Best-in-Class companies are more likely to have

processes in place that support the sharing of information across business functions, essentially removing unnecessary barriers to information exchange. Moreover, these companies are also more likely to have procedures in place to facilitate users connecting with new data sources (Figure 3).

Figure 3: Maturity in the Data Infrastructure

% of Respondents "Satisfied" or "Very Satisfied"   n = 149

Source: Aberdeen Group, April 2017
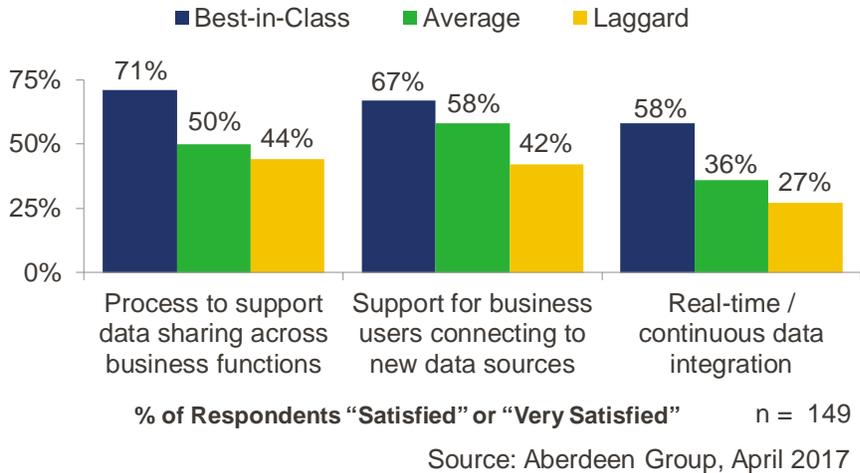
Best-in-Class companies are more likely to have enhanced maturity when it comes to data integration as well, working as the technology backbone for the aforementioned activities. The research shows that 96% of Best-in-Class companies have a formal technology-backed approach to data integration, as opposed to manual code-based procedures used on an ad hoc basis.

Additionally, top companies are more likely to respect the time element of data integration as well. Sometimes a batch-oriented approach to integration is sufficient when the time urgency isn't as strong, such as making longer-term strategic decisions. Other times, data from multiple sources needs to be incorporated into an analysis on a continuous or even real-time basis. Best-in-Class companies are more likely than All Others to have the ability to
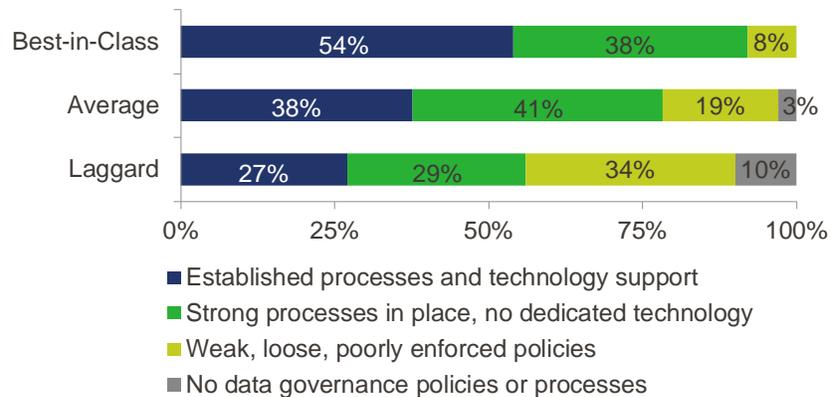
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Some might associate data governance with bureaucratic red tape that impedes the flow of information across a company, but a Best-in-Class approach is one that enhances data quality while making it more portable as well.

integrate data from multiple sources on a real-time or continuous basis.

Oversight Leads to Insight

Despite the elevated level of attention that companies are paying to their data environments these days, there is still a marked level of dissatisfaction among users. According to the research, 60% of companies are neutral or dissatisfied with their ability to share information within the organization, and 62% are dissatisfied with data quality. These two factors are significant driving forces behind the need for data governance in organizations.

Figure 4: A Judicious Approach to Data Governance

Best-in-Class: 54% Established processes and technology support, 38% Strong processes in place, no dedicated technology, 8% Weak, loose, poorly enforced policies

Average: 38% Established processes and technology support, 41% Strong processes in place, no dedicated technology, 19% Weak, loose, poorly enforced policies, 3% No data governance policies or processes

Laggard: 27% Established processes and technology support, 29% Strong processes in place, no dedicated technology, 34% Weak, loose, poorly enforced policies, 10% No data governance policies or processes

■ Established processes and technology support
■ Strong processes in place, no dedicated technology
■ Weak, loose, poorly enforced policies
■ No data governance policies or processes

% of Respondents   n = 149, Source: Aberdeen Group, April 2017

Some might associate data governance with bureaucratic red tape that impedes the flow of information across a company, but a Best-in-Class approach is one that enhances data quality while making it more portable as well. Many MDM platforms have data governance capabilities built in, although they can be deployed as separate functionality. Either way, Best-in-Class companies are more likely to have the right processes and procedures in place for

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Users' Attitudes Toward Data:

Rated "indifferent" or "dissatisfied":

- Sophistication / firepower of data systems – 66%
- Speed of information delivery – 65%
- Ease-of-Use of data systems – 64%
- Data quality – 62%
- Self-service data access – 61%

(% of All Respondents)

Nowadays, data environments are much more interconnected and interdependent than ever before, and many companies turn to MDM to help navigate this enhanced complexity.

data governance, and to have dedicated software technology in place to help support these governance efforts.

Producing Superior Results

A major demonstrable difference between MDM technologies today and those deployed 10 or 15 years ago is their ultimate purpose. On the heels of Sarbanes-Oxley and other regulations aimed to formalize a better approach to data management, companies started to enhance their data infrastructure mainly for the purposes of storing information. Nowadays, the premium has shifted to one that espouses utilizing this information. Therefore, Best-in-Class companies leverage MDM as a springboard toward more effective analytical activity and enhanced business performance. The research shows that top companies are successful in producing data and decision efficiency, leading to superior business results (Figure 5).

Figure 5: Best-in-Class Convert Data into Performance

n = 149
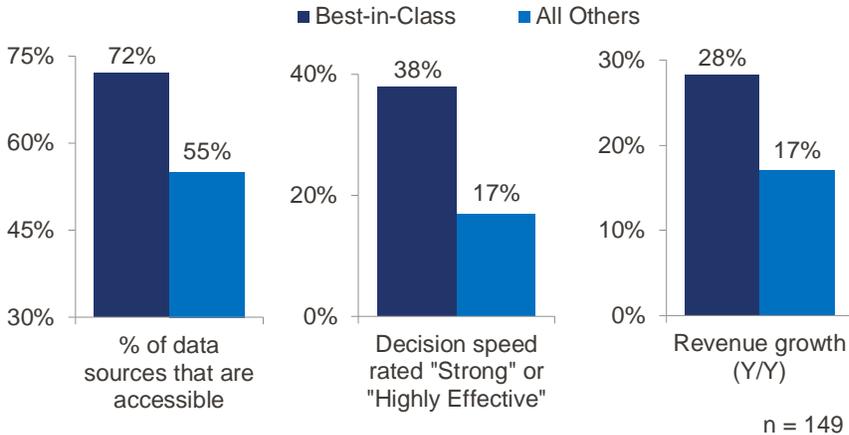
Source: Aberdeen Group, March 2017

The Best-in-Class commitment to organizational and technology maturity enables access to more data for the purpose of analysis, and a smoother flow of data across the organization. For the LoB

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decision makers depicted in Figure 1 at the beginning of this report, this means that their challenges of data disparity and low quality are mitigated to a large extent. This high-performing data environment offers the ability to recognize and act upon ways of doing business better, and top companies answer the call with substantially larger year-over-year growth in revenue.

Key Takeaways

Companies or departments with an intensified need for managing one specific data domain (such as customer data or product data) would historically gravitate toward MDM as a way of ensuring one version of the truth and higher quality data within that domain. Nowadays, data environments are much more interconnected and interdependent than ever before, and many companies turn to MDM to help navigate this enhanced complexity. For organizations contemplating a net-new deployment of MDM or an enhancement to an existing approach, the following key takeaways should be considered:

➔ **Data complexity and disparity aren't just an IT problem.** Today's users are upping their analytical game and looking to be more active in accessing and utilizing data to support their key decisions. As users look to incorporate more data into their decision processes, they look for greater accessibility across business silos and fewer unnecessary barriers to data exchange. Best-in-Class companies look to unite IT and business users toward a shared goal of enhanced data accessibility, quality, and expediency.

➔ **A formal MDM approach solidifies the data infrastructure and empowers users.** Companies using MDM as a dedicated suite of technology and process are also more

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likely to invest in complementary technologies. On the data side, top companies utilize a formal approach to data integration to incorporate more data into their analyses faster. Additionally, Best-in-Class companies are more likely to leverage tools like interactive visualization and predictive analytics. As these leading companies build out a foundation of cleaner and more trustworthy data to support these analytical activities, they enjoy a happier and more satisfied user base as well.

➔ **Top companies treat MDM as a hub of data excellence**. Much in the same way that analytics has become more of a mindset for data-driven companies than a suite of technologies, MDM has evolved in a similar way. Best-in-Class companies marry MDM with technologies for data integration, data governance, and analytics in order to spread insight to more users and generate richer insights. This technology maturity, in concert with internal competency, help produce results for the Best-in-Class in the form of decision efficiency and business execution.

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Related Research
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MDM without Limits: Connecting Data, Crafting Insight, Mastering Results; January 2017   Empowering Analytics: IT and Business Partnerships for Success; November 2016

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