

Asset Management: *Transformation Is Already Here*

The Industry's Data-Driven Future Has Arrived



Data Determines Destiny

As sources and types of data have proliferated, the ability to interpret data and convert it into usable, relevant information has become a key differentiator in the asset management industry. Having a mountain of data and being able to utilize it effectively, however, are two very different things.

In the overview section of “Asset Management: Transformation is Already Here,” we described the broad context of asset managers’ thinking about the future. From theme to theme, our survey reveals a clear sense that pressures on the industry have passed a point of no return.

This chapter in our series provides an understanding of how asset managers perceive the challenges and opportunities presented by harnessing, governing and analyzing data to fuel growth.

Margin compression across the industry is increasing the need for operational efficiencies. At the same time, firms are pursuing market and product expansions to compete and grow. Effective and efficient data management is the key to solving these two (sometimes competing) priorities.

“Asset management firms are looking to turn data into useful insights. This cannot be done unless there is more reliance on newer analytics models and functions. Teams will need to undergo training, but the end result will be worthwhile.”

—France-based Chief Investment Officer

The hunger for new and greater sources of data is driven primarily by the front office as it looks to keep up with investor demands in areas such as ESG and customizable Separately Managed Account offerings. The global pandemic has simultaneously increased pressure to digitize operations and highlighted the inefficiencies most firms have in the data supply chain supporting their middle and back offices. Data capabilities will transform nearly every area of the business, from corporate functions and product development to distribution, sales, and marketing.

In parallel, asset management service providers have evolved their data capabilities to better support their clientele. Data management software, delivered through both private and public clouds, continues to develop rapidly. Operational support to optimize data utilization has long been a part of the offerings delivered by outsourced providers. What has changed is their new focus on providing data that enables a wider range of analytical capabilities, providing clients the capability to unlock strategic value from data as an engine of growth. Innovation across the fintech world has also fueled a new crop of tools and technical prowess that add to the capabilities of the industry.

At the same time, the asset managers in our survey clearly recognize that achieving the value of the data opportunity requires dedication to data strategy, specialized management, technical skills and investment in technology.

Process inefficiencies and systems limitations make it difficult to pursue data ambitions. In many ways, survey respondents told us that they fear the growth potential of data capabilities may be out of their reach. However, their responses and comments also help point the way to a successful data-driven future.

Data Will *Reshape the Industry*

The majority of asset managers, when asked in which parts of their organization they plan to deploy data and analytical tools, stated they plan to do so in every core process of their business, as indicated in the chart on page 5. Even for the lowest-ranking function, product development, a majority (53%) reported plans to increasingly leverage data as a strategic tool.

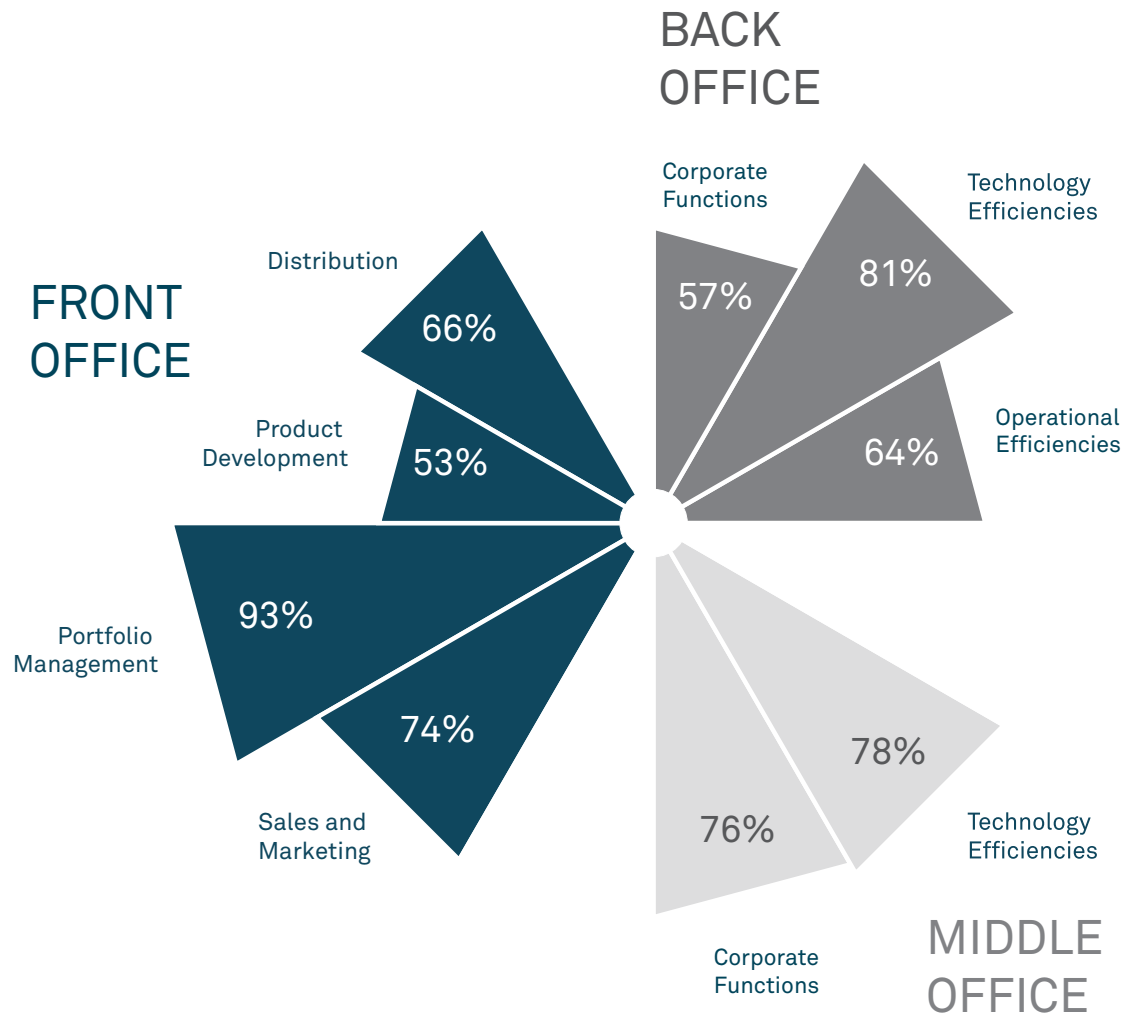
Nearly all asset managers (93%) indicated plans to expand the use of analytics and insights in portfolio management, indicating many of their growth strategies rely on leveraging advanced data and analytics. This response highlights the importance of data to these firms, as informed investment decisions are the fundamental value that asset managers deliver to their investors.

As data reshapes the role of central portfolio management, these changes flow through to every other part of an asset manager's business model as well. Sales and marketing (74%) and distribution (66%) also are likely to see impacts from data capabilities.

While front-office responses indicate a desire to increase data-based decision-making, the middle- and back-office responses indicate the work being done on costs, revealing that front offices plan to deploy data analysis and insights to achieve efficiencies.



Asset Managers plan to deploy data analysis and insights in all areas of their business.



“Data is the connective thread across the front, middle and back office. It must be integrated in a way that allows our clients to find what they need, mine it and generate new insights from it.”

—Mal Cullen, Head of BNY Mellon OMNI Digital Services

Why Portfolio *Management*?

In considering the top use cases for data analysis and insight, portfolio management rises to the top of asset managers' data priorities for good reasons.

First and foremost, data can support more robust investment analyses, decreasing costs to generate alpha or generate beta. With the proliferation of data sources, the volume and complexity of data is increasing exponentially. Effectively integrating new types and volumes of data can help managers identify opportunities, make more informed investment decisions and monitor performance.

These needs drive the rapid development of tools to visualize increasingly granular information such as predictive analytics dashboards and artificial intelligence-driven heatmaps. Meanwhile, cloud-based technologies support the scaling requirements of data growth as new database capabilities allow for the inclusion of both structured and unstructured data types.

Our survey responses reflect these trends. The top use cases for deploying data analytics are performance and risk management (45%) and asset selection and allocation (43%). Identification of new client profiles (37%) also make a strong showing and, even in the front office, operational efficiencies are still important (41%). In other words, data analysis touches on the use cases by which investment managers are able to deliver more value to investors, optimize their costs and expand their investor base.

In a competitive world where transparency, efficiency and finding new growth opportunities dominate asset managers' strategic agendas, these top use cases demonstrate how data analysis can determine a firm's destiny.

In addition to experiencing difficulties in managing data, asset managers further described challenges in extracting meaningful insights from it. The most common responses appearing in respondents' top four barriers to gaining insights included the complexity of data (54%) and the obsolescence of existing data management platforms (54%), closely followed by a lack of analytical tools to cover unstructured data types (52%) and the complexity of the analytical tools (49%).

The primary use cases for data analysis intend to allow asset managers to deliver more value to investors, optimize their costs and expand their investor base.



Challenges in Climbing *the Data Mountain*

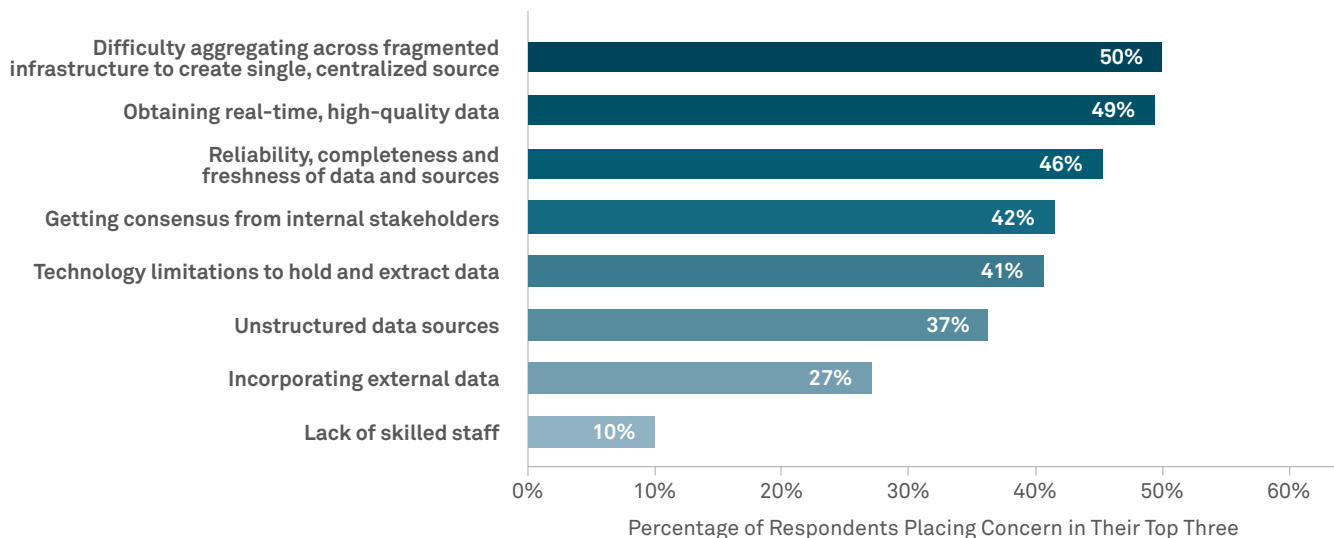
Industry consensus reflects the importance of flexibility and scale to manage the variety and growth of data. Our survey respondents also clearly acknowledged the challenges in keeping up with these changes. Meaningful data tends to be stored across disparate systems and functional silos, making it challenging to aggregate, catalog and interpret in a timely manner.

The most common challenge respondents cite in effectively managing data is aggregating it across fragmented infrastructure to create a single, easily accessible source to serve the enterprise's needs. One-half of respondents placed that barrier in their top three challenges. Reflecting the demands of front-office portfolio management, other challenges that respondents cited among their top three included obtaining real-time, high-quality data (49%) and the reliability, completeness and freshness of data and sources (46%).

Finally, 19% of respondents reported data aggregation as their single most important barrier to managing data and extracting insights, followed by unstructured data sources (18%). Unstructured data sources can include documents that come in PDF formats, such as analyst reports, but it can also include satellite data, tweets and other social media, and myriad other newly mined sources.

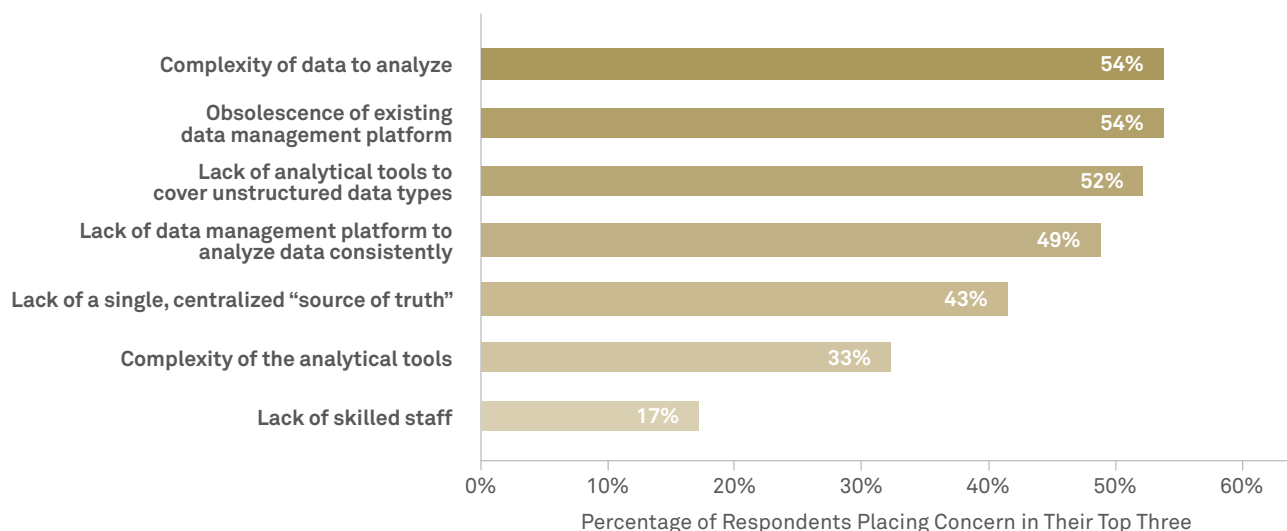


Industry consensus reflects the importance of data but also acknowledges the challenges of managing it.



Beyond merely accessing the data, asset managers described further hurdles in extracting meaningful insights from it. The most common are the complexity of data and the obsolescence of existing data management platforms (54% each), closely followed by a lack of analytical tools to cover unstructured data types (52%) and the complexity of the analytical tools (49%). Because the consumers of data are not just data scientists but portfolio managers, client-facing teams and others across the organization, it's critical to offer intuitive, readily available tools in order to leverage the power of aggregated data.

Asset managers also identified challenges with extracting meaningful insight from their data.

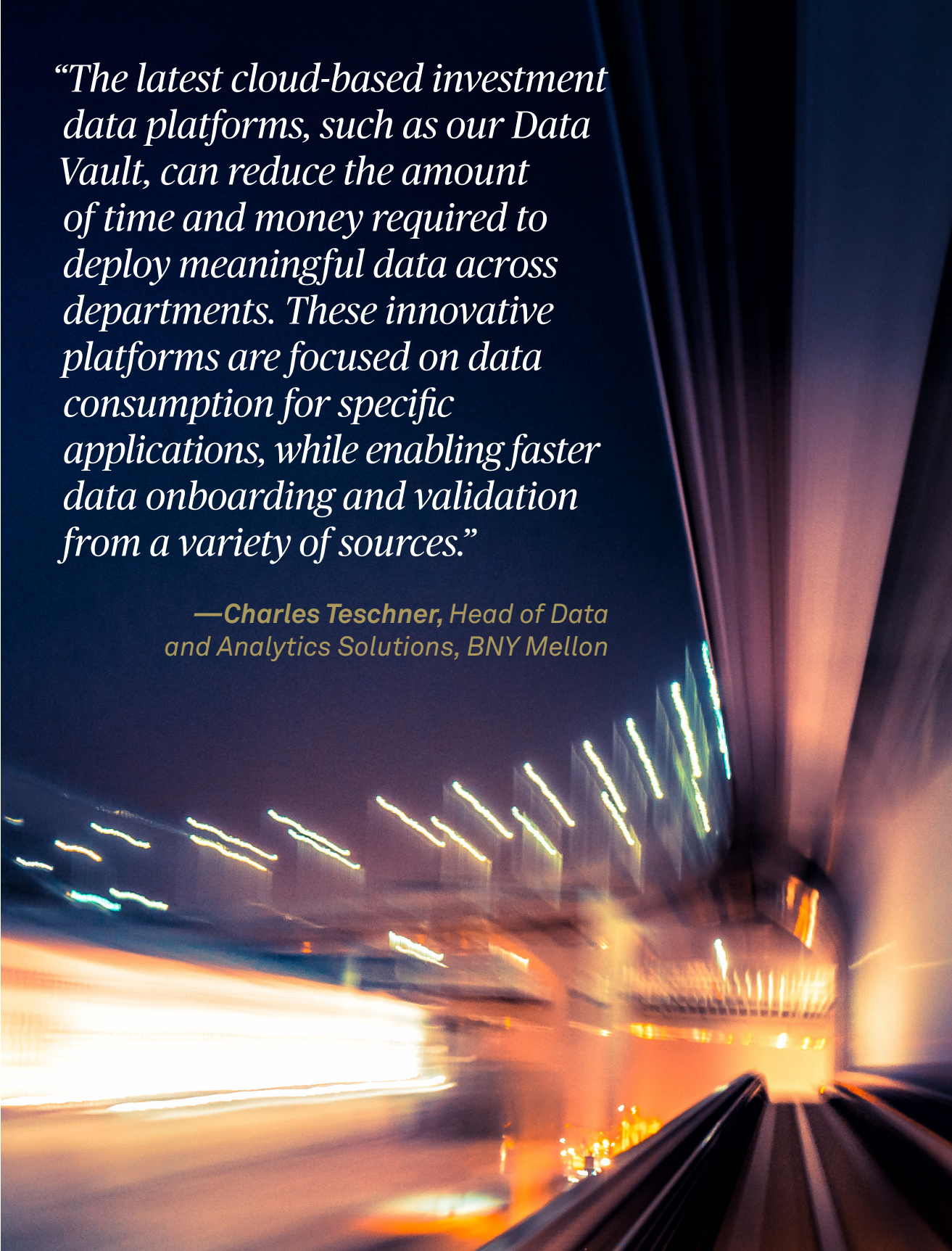


The Right Equipment *for Mountain Climbing*

Technological advances in data management are starting to make inroads into the challenges the survey calls out. The scale required by an ever-increasing volume of data, uncertainty in future volume and a need to keep operational costs low lead directly to the door of cloud-based solutions. These platforms address scaling concerns while delivering needed resiliency. They also provide the ability to invest in infrastructure only as it is needed, at a lower overall cost for storage and computing power. In fact, our survey results show that 96% of respondents are already using cloud technologies, making them almost ubiquitous today.

Database technologies also continue to evolve rapidly, no longer forcing users to predict how data will be used or in what format it must be delivered. The ability to load data in an “as is” format and convert data to required formats reduces the need to duplicate data for different purposes, reducing costs and increasing the efficiency of the supply chain.

Finally, artificial intelligence (AI) and machine learning tools continue to make advances in their speed and ability to consume data of all types. Coupled with improved accessibility and usability, no longer are AI engines solely the purview of PhDs.



“The latest cloud-based investment data platforms, such as our Data Vault, can reduce the amount of time and money required to deploy meaningful data across departments. These innovative platforms are focused on data consumption for specific applications, while enabling faster data onboarding and validation from a variety of sources.”

—Charles Teschner, Head of Data and Analytics Solutions, BNY Mellon

Sourcing *Data Talent*

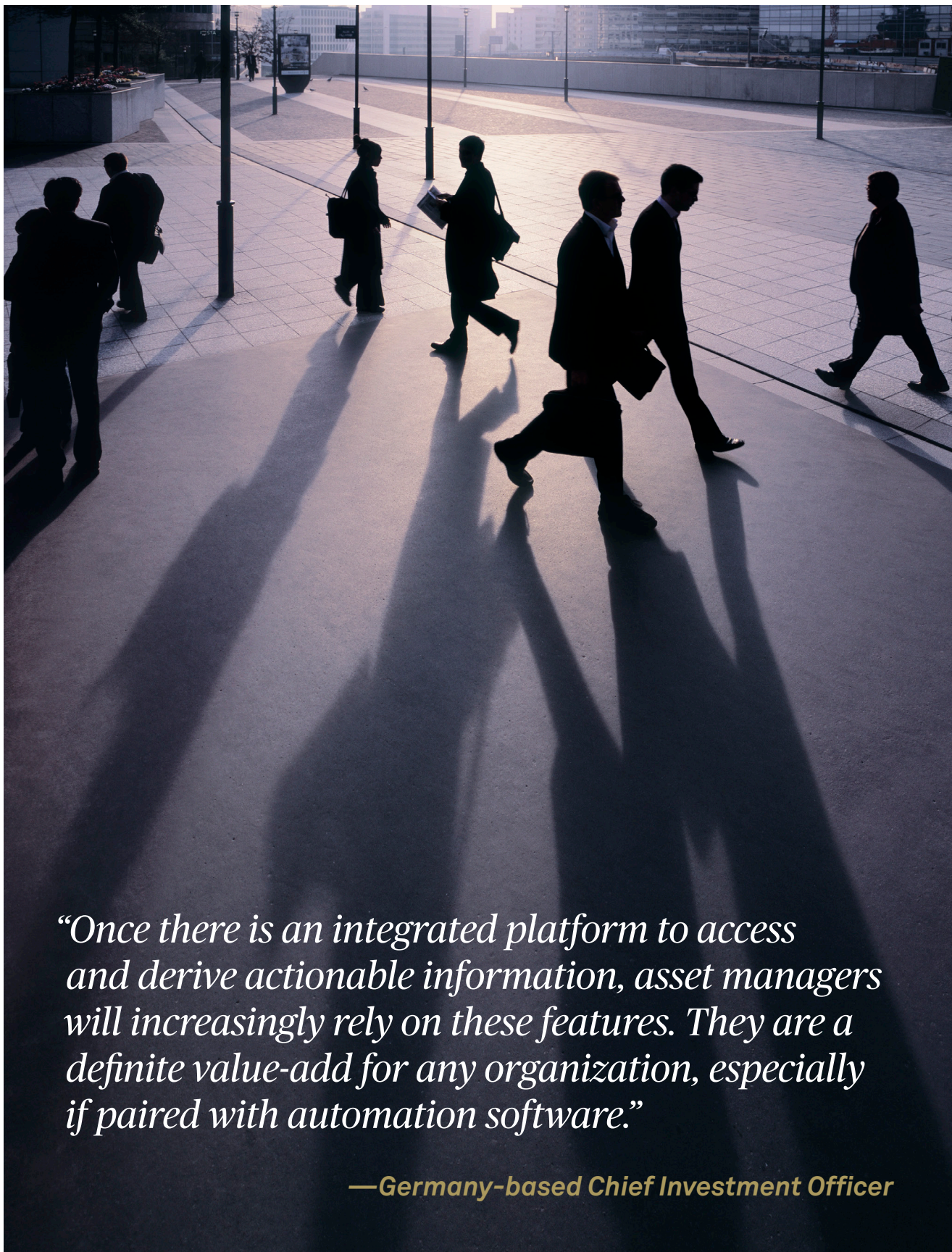
Creating a base level of data literacy, including the use of new tools related to data management and analysis, will be as vital for asset managers as integrating those tools into the firms' everyday operations. Success will demand high levels of collaboration between different teams. Firms will need to draw on functional knowledge as well as data science techniques to create and proliferate needed capabilities.

Collaboration with service providers also is essential. Given the importance and complexity of data management, it is not surprising that companies are seeking external expertise. In the [overview section](#) of this series, we highlighted that 97% of respondents looking to outsource over the next three years will consider doing so with data management infrastructure.

Data operations also are set for further outsourcing, mentioned by 78% of respondents. These responses reflect the difficulty in acquiring the skills and technology required, coupled with cost pressures and the increasing need for asset managers to focus on their core value proposition.

Transitioning these systems and processes to third parties will pave the way for further streamlining of investments. Asset managers have choices along a spectrum from building the technology themselves, to buying the technology and building the processes, to fully outsourcing their data management.

The next section in this series will focus on the broader digital imperatives for asset managers and their technology choices. The sections that follow will provide further detail on how the industry sees product innovation and distribution and the impacts of data in those areas. The final section will focus on the trend of rethinking in-house functions to focus on the core while collaborating with service providers.



“Once there is an integrated platform to access and derive actionable information, asset managers will increasingly rely on these features. They are a definite value-add for any organization, especially if paired with automation software.”

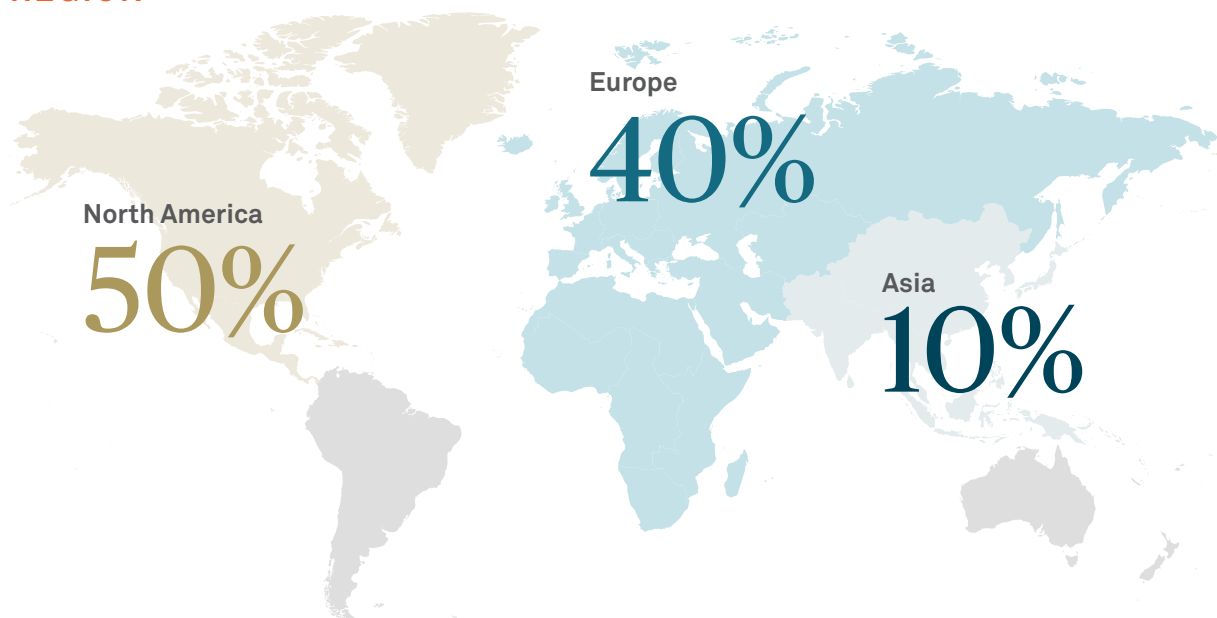
—Germany-based Chief Investment Officer

Appendix:

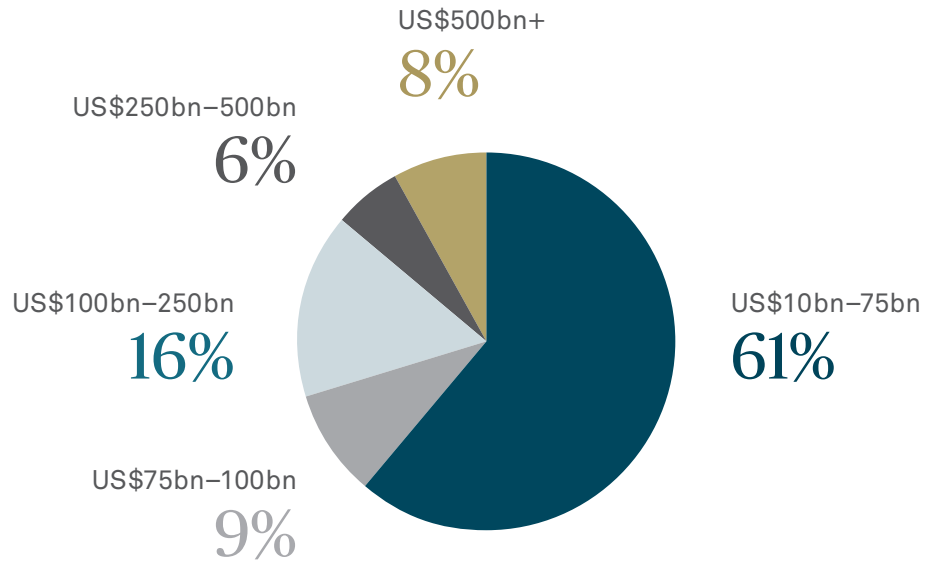
Methodology

In the third quarter of 2020, 200 asset managers from around the world participated in an in-depth study of trends and concerns in the asset management space. C-level executives (job titles: Chief Executive Officer, Chief Operating Officer, Chief Data Officer, Chief Investment Officer, Chief Information Officer, and Chief Technology Officer) from firms with at least US\$10 billion in AUM participated in the survey. All responses and participant comments are anonymous. Data is presented in aggregate.

REGION



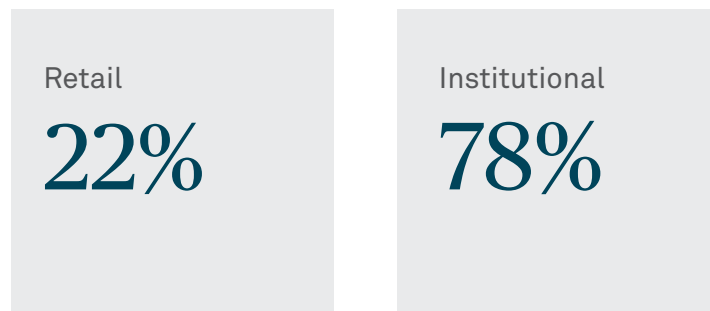
ASSETS UNDER MANAGEMENT



TYPE OF FIRM



CLIENT BREAKDOWN





In Case You Missed It

Here is what we covered in previous chapters of our wide-ranging study.

- **Overview:** Fundamental changes in the asset management industry have been building for some time. Our Overview chapter provides the key findings of our research study covering 200 asset managers around the globe. One clear message emerged – these changes have reached a point of no return.

Coming Attractions

Over the next few months, BNY Mellon will release the detailed findings from this wide-ranging study. Each chapter offers deeper insights and strategies to help you thrive in a data-driven world.

- **Digital imperatives dominate:** Breaks down which digital imperatives are transforming asset management and demonstrates why most companies won't take them on alone.
- **The product lineup is realigning:** Highlights the pressures that are reshaping asset management firms' product lineups.
- **The distribution game has new rules:** Shows how the distribution mix is making it more complex to compete and survive.
- **Focus on the core is key:** Illustrates the industry's most promising future, with streamlined operations and a focus on the core.

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