



IBM Institute for Business Value

# Analytics: The new path to value

*How the smartest organizations are embedding analytics to transform insights into action*

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## Overview

The combination of an increasingly complex world, the vast proliferation of data, and the pressing need to stay one step ahead of the competition has sharpened focus on using analytics within organizations. To better understand how organizations are applying analytics today, prioritizing their future investments, and transforming insights into action, *MIT Sloan Management Review* in collaboration with the IBM Institute for Business Value, surveyed a global sample of nearly 3,000 executive managers and analysts. Based on our analysis of survey results, combined with interviews with academic and subject matter experts, this study offers recommendations on how organizations can bolster their analytics capabilities to achieve long-term advantage.

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At organizations in every industry, in every part of the world, senior leaders wonder whether they are getting full value from the massive amounts of information they have within their organizations. New technologies are collecting more data than ever before, yet many organizations are still looking for better ways to obtain value from this data and compete in the marketplace. Questions about how to best achieve value persist; it is no longer adequate to know what happened and why. Whether focused on growth, efficiency or innovation, organizations need to know what is happening now, what is likely to happen next and, what actions should be taken to get the optimal results. By embedding information and insights into every day operations, it is possible to provide that value.

Among our key findings: top-performing organizations use analytics five times more than lower performers. Overall, our study found widespread belief that analytics offers value. Half of our respondents said that *improvement of information and analytics is a top priority in their organizations*. And more than one in five said they were under intense or significant pressure to *adopt advanced information and analytics approaches*.

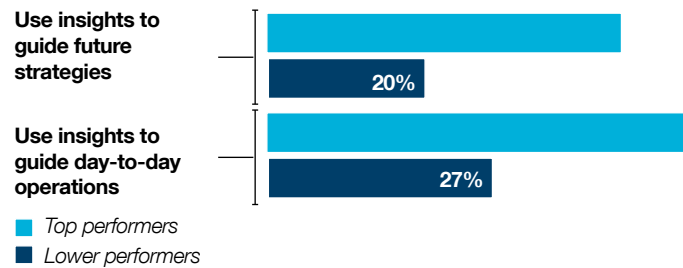
While our findings showed that organizations tend to wait until they have gained some experience before they apply analytics to growth objectives, this may be more a common practice than a “best practice.” Our experience indicates that analytics, applied wisely to an organization’s operational capabilities, can be used to accelerate a broad range of business objectives, even at the earliest stages of analytics adoption. Top performing organizations put analytics to use in the widest possible range of decisions, large and small. They were twice as likely to:



use analytics to guide future strategies, and twice as likely to use insights to guide day-to-day operations (see Figure 1).

## Organization itself is the biggest obstacle

Insights to drive business decisions



Note: Respondents were asked to rate how well their business unit or department performed the noted tasks. Chart represents answers from those who selected "very well" using a five-point scale from "not well at all" to "very well."  
Source: Analytics: The New Path to Value, a joint MIT Sloan Management Review and IBM Institute for Business Value study. Copyright © Massachusetts Institute of Technology 2010.

Figure 1: More than twice as many top performers as lower performers used analytics to guide day-to-day operations and future strategies.

Despite popular opinion, getting the data right is not a top challenge organizations face when adopting analytics. Only about one out of five of respondents in our study cited *concern with data quality* or *ineffective data governance* as a primary obstacle.

The adoption barriers organizations face most are related to management and culture rather than data and technology. The leading obstacle to widespread analytics adoption is lack of understanding of how to use analytics to improve the business, according to almost four of ten respondents. More than one in three cite lack of management bandwidth due to competing priorities. Organizations that use analytics to tackle their biggest challenges are able to overcome seemingly intractable cultural challenges and, at the same time, refine their data and governance approaches.

Executives want better ways to communicate complex insights so they can quickly absorb the meaning of the data and take action on it. Over the next two years, executives say they will focus on supplementing standard historical reporting with emerging approaches that make information come alive. These include data visualization and process simulation, as well as text and voice analytics, social media analysis, and other predictive and prescriptive techniques.

## Making analytics pay off

It takes big plans followed by discrete actions to gain the benefits of analytics. But it also takes some very specific management approaches. Based on data from our study, IBM's engagement experience, case studies and interviews with academics and experts, we have identified a new framework for successfully implementing analytics-driven management and for rapidly creating value:

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**Pick your spots.** Search for your organization's biggest and highest priority challenge. Change is hard for most, so select an initiative worthy of sustained focus that can make the biggest difference in meeting your most important business goals.

**Prove the value.** Use reason and benchmarks for initial executive sponsorship, but use a proof-of-value pilot to keep sponsors engaged. Employ embedded analytics techniques to illustrate and prioritize the types of organizational changes that are needed to achieve the value. Pull it all together using an implementation roadmap with a clear starting point and a range of options for future opportunities.

**Continuous value delivery.** Reduce your rework by using business analytic and process management tools that you have selected for the long haul – information governance, business analytics and business rules. As you make progress, don't forget to analyze feedback and business outcomes to determine where your analytics model and business vision can be improved.

Over time, data-driven decision making branches out across the organization. As experience and usage grow, the value of analytics increases and business benefits accrue more quickly.

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## How can IBM help?

IBM can help your organization transform its use of information through the following services:

- **Business analytics and optimization strategy** – Drive big ideas and realize business objectives faster with less risk and at a lower cost by defining the approach and value case to putting insights into action.
- **Business intelligence and business performance management** – Improve decision making with relevant, actionable and timely information.
- **Advanced analytics and optimization** – Improve operational efficiency through the use of analytics, data mining and statistical models.
- **Enterprise information management** – Achieve data integration between disparate systems to improve business processes, decision making and total business performance.
- **Enterprise content management** – Reduce processing cycle time, improve customer service and compliance, and establish agility and flexibility with the technology and processes to capture, manage, store, preserve and deliver unstructured content

To request a full version of this paper, e-mail us at [iibv@us.ibm.com](mailto:iibv@us.ibm.com)

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December 2010  
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