Ready for takeoff?

Overcoming the practical and legal difficulties in identifying and realizing the value of data

The COO perspective

Building a better working world

The COO perspective - at a glance

Your time is precious. In order to give you the insights you need as quickly as possible, we designed The COO perspective – a series of short executive briefing papers that provide a quick overview of the main findings of recent EY reports, with a particular emphasis on the relevance for the COO.

The role of the COO is hugely diverse, changing markedly from one company to another and across varying industries. Accordingly, in compiling The COO perspective, we have sought to highlight insights of relevance to one or more of the six fundamental components of the COO role, as illustrated by our wheel model that we believe collectively encompasses the full extent and potential of the COO role.

What is Ready for takeoff? about?

In a sentence: market-leading businesses hope to use big data technologies to drive competitive advantage, but first they must analyze the information they hold and work out how to use it to generate value and actionable insights, while proactively anticipating and confronting emerging risks.

COOs at organizations all around the world share their businesses' ambitious plans for unlocking the huge potential of big data and analytics that can help generate top-line and bottom-line value. In this report, EY identifies the challenges standing in the way of those plans and sets out a road map for overcoming them.

So far, progress in realizing strategic value from data has been limited. Few organizations have been able to quantify that value or establish comprehensive frameworks for extracting it – or assess the risks and barriers ahead.

Nevertheless, the prize is too valuable for organizations to be deterred. Four in five businesses (79%) believe that big data will boost revenues² – in sectors such as retail and manufacturing alone, it is estimated that the adoption of better analytics tools would increase output globally by US\$325 billion, as one example.3

Structured and unstructured data are growing exponentially. Already, the world has 2.7 billion internet users, 4 covering 39% of the global population. And developments such as the "internet of things" will further accelerate the data growth – and rapidly increase the size of the opportunity for organizations able to turn this information into actionable insight.

COOs will play a crucial role in overcoming the practical and legal obstacles that stand between their organizations and the prize on offer, helping to establish business-wide processes and frameworks for safely exploiting the information they hold. Companies that successfully use data can fly ever higher – research suggests they already outperform their peers by up to 20% ⁵ – but those that fail to embrace this opportunity will be left behind on the runway.

¹Ready for takeoff? Overcoming the practical and legal difficulties in identifying and realizing the value of data, EY, 2014.

³ Game changers: Five opportunities for US growth and renewal, McKinsey & Co, 2013. ⁴ World Telecommunication/ICT Indicators database 2013, ITU, 2013.

Preparing for takeoff

The maturity of organizations' big data initiatives varies enormously from business to business, as well as from industry to industry, but EY's work suggests a clear sequence for companies to follow in order to drive value. COOs can play a vital role in steering their businesses along this path, ensuring that the entire company works together more effectively and securely to deliver the benefits that data offers while managing the risks.

1. Setting the goals

The starting point for exploiting the value of a business's data is to decide what questions the organization needs answering – not, as might seem more obvious, to begin scrutinizing the data held. COOs will be at the center of this process, facilitating board-level discussions about the potential objectives for the company, and then working with different functions to begin harnessing the power of data to deliver on these targets.

Sticking to the process will require the discipline and structure that COOs so often bring to an organization. The aim should be to build hypotheses for the decisions that the business needs to take – and then to use the data to prove or disprove these hypotheses.

Ultimately, the success of these initiatives will be judged on the benefits produced – higher sales, improving margins or lower costs, for example. COOs will need to work with their C-level executives to develop metrics for measuring these benefits and to ensure performance measurement processes are built into big data and analytics endeavors. Equally, they can help to showcase the benefits of successful initiatives to the business.

2. Bringing functions together

In order to get as much value as possible from data and analytics, organizations will need to find new ways of working, led from the top by the C-suite. The challenge is to transform the business so that its strategic functions work much more closely together. COOs will operate as enablers and supporters of this transformational shift.

Much of the work will be process driven. Is the company working in a way that enables it to share data and generate actionable insights together? Do functions have the technologies they need to maximize these opportunities, or the know-how to work together to harness them? Have executives been empowered to push for data-driven decision-making? Does the company have the talent it needs, whether data scientists and visualization experts at one extreme to business intelligence analysts at the other, as well as procedures for identifying and resolving skills shortages?

Risk management is a crucial part of this transformation. COOs will need to ensure their organizations have processes in place for recognizing and mitigating risks ranging from data privacy to cybersecurity. Working with other functions, including IT, it will be necessary to use scenario planning and training exercises to build risk awareness throughout the organization.

3. Operating holistically

EY's research suggests that a silo approach to data, in which business units and functions work independently of one another, will not extract maximum value. The challenge for COOs is to develop processes and systems capable of ensuring that insights are disseminated throughout the organization — and to ensure it is possible to share results and compare best practice.

However, these processes will require flexibility and sensitivity. A centrally driven data strategy will need to be delivered locally and functionally, with leaders throughout the organization given the opportunity to embrace data-driven decision-making individually. Local sales staff, for example, may protest at being told how to do their jobs by data scientists based in an office 3,000 miles away. COOs will need to help to deliver this flexibility while avoiding the silo approach.

Ensuring in-flight safety

The standout risk for organizations seeking to exploit the value of their data is the depth and breadth of the legal issues they will have to confront. The nature of these issues is diverse and will vary from country to country, but a data strategy that does not address the question of legal risk will expose the organization to the potential for regulatory sanction and reputational harm.

Working closely with the organization's legal executives and leaders such as the CMO and CIO, COOs have a responsibility to ensure these dangers are recognized throughout the organization and that processes are in place to minimize them.

Developing an enterprise-wide view of legal risk

Multinational businesses face legal issues in multiple jurisdictions, so only an enterprise-wide approach to legal risk is acceptable – otherwise, behaviors that are compliant in one market but not in others put the whole organization at risk. For COOs, the challenge here is not to identify all of these legal issues, but to ensure the organization operates as one in confronting them, with processes for mitigating risk that are embedded in its culture.

The centers of excellence that many organizations have built to exploit big data and analytics, a high proportion of which are working alongside business services centers often reporting to COOs, may be one vehicle for delivering these processes.

Data security, while the primary responsibility of the CIO, is a related issue here. COOs will need to work with their CIOs to ensure the organization's working practices do not expose it to undue risk of a data breach.



2. Identifying problematic data

Data storage and management are important elements of the big data phenomenon, with technological advances in both areas offering organizations much greater opportunities to retain, organize and access huge volumes of structured and unstructured information. Getting this wrong not only hinders a firm's ability to maximize the potential of data, but also leads to higher operating costs within the business.

The challenge is partly a practical one. Although led by the CIO, COOs will support any efforts aimed at ensuring information management practices and processes are sufficiently robust to give the organization the best possible chance of staying on top of its data – and in the most efficient manner. But there is a legal issue too: many organizations hold outdated, unnecessary or even incorrect data. Some of that information may be legally questionable, or raise compliance concerns if it is held in the wrong jurisdiction.

Professional information practices will mitigate these risks while making it easier for the organization to turn its data into actionable insights. They should also help with cost management, another key priority for the COO.

3. Staying one step ahead of trouble

The legal risk environment is changing rapidly. And so are the attitudes of consumers: 49% say they will be less willing to share their personal information in the next five years. For COOs, it is important to ensure that the organization has systems that are flexible enough to respond to these sorts of changes, as well as practices that ensure the business does not miss out on customer engagement and consumer-focused insights.

Some of that work will be process driven – ensuring that data practices incorporate steps built in to safeguard and support customers' interests rather than being solely focused on the organization's needs. As one example, this might require closer ties between sales and marketing, and any related loyalty schemes that reward consumers for sharing their data. It could mean building checks and balances into the system so that organizations reappraise initiatives that may prove unpopular with customers. It will certainly require COOs to work with, and continually develop, all functions to identify potential weak links in the chain.

⁶ The Big Data Backlash, EY, 2013.

The COO's big data checklist	
How does your company set analytical objectives and coordinate the efforts of different business functions in order to look at what insights data	☐ What does your company consider to be the legal challenges of big data and how do these apply in different areas of the company?
might generate? What processes has your company developed for applying analytics to its data and where in the business are these	What processes does your company have in place to mitigate other potential risks, including cybersecurity issues related to big data?
processes being used? Has your company's senior leadership shown its support of analytics initiatives and how are these executives taking a	What efforts have you made to integrate work on big data and analytics on a global basis and prevent a silo-based approach?
lead on them?	What change management programs and processes are in place that will help your
What technology tools are distributed around your company in order to enable analytics capabilities within every	company effectively embed big data and analytics throughout the business?
function and how do you assess whether functions have what they need?	How has your company established whether skills shortages in areas such as analytics – in any part of the business –
What best practices and unified processes has your company established for analytics across the business?	might hold back its efforts to exploit big data?

Further reading

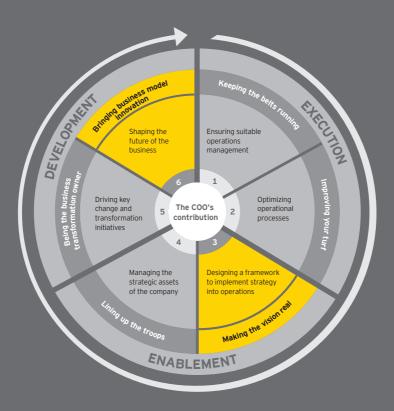
- ▶ Big risks require big data thinking, EY, 2014.
- ► Sustaining digital leadership, EY, 2014.
- ▶ The Big Data Backlash, EY, 2013.
- ▶ Big data and enterprise mobility, EY, 2013.

For a copy of the full report, please visit ey.com/ready-for-takeoff.

Other insights for the COO

Ready for takeoff? Overcoming the practical and legal difficulties in identifying and realizing the value of data is one in a series of EY studies that provide insights relating to the role of the COO, as shown within the wheel below.





For more on these insights, please go to ey.com/coo, email to coo@ey.com or contact your local EY representative.

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