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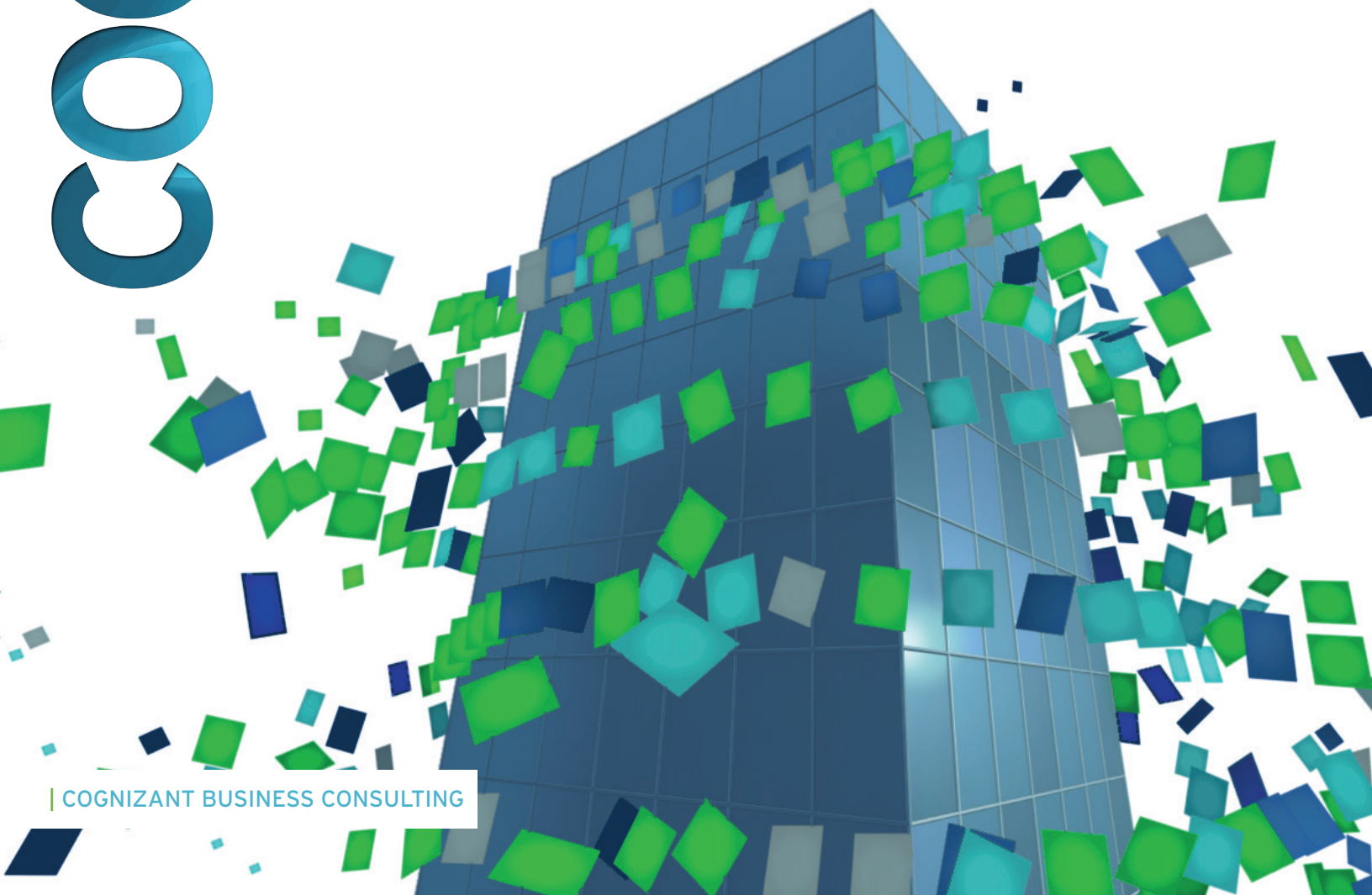
The Future of Work Has Arrived: Time to Re-Focus IT

As organizations slowly emerge from the global recession and re-examine every aspect of their businesses, they must address the unrelenting forces of globalization, demographic change, virtualization and cloud computing that are reshaping the corporate operating model. Doing so will enable CIOs to look beyond ongoing cost containment and re-focus IT on a new set of business capabilities that unlock innovation and support new ways of working that embrace and extend virtualized value networks.



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Executive Summary

As the second decade of the 21st century dawns, organizations worldwide are contending with four unrelenting and inter-related forces that were once peripheral but are now critical to their very existence. These forces — accelerating globalization, changing demographics, expanding virtualization and evolving cloud-enabled collaboration technologies — are causing organizations across industries to seriously re-think not only how they are organized and operate, but also how information technology should be utilized to unlock innovation that enables greater operational efficiency and business effectiveness.

Getting there will be easier said than done.

For starters, organizations must dramatically revamp the mandate of the IT department to enable the "Future of Work." Over the last decade, IT's charter was to reduce business and technology costs by optimizing existing IT assets and processes. Creating a new IT charter will help organizations successfully navigate these four forces and put in place the vital processes and infrastructure required to operate in the emerging virtual network value chain.

While there is still demand for asset optimization and process efficiencies, organizations the world over are now seeking innovative breakthroughs from their IT departments in the areas of the virtualization of work and the ways and means to accommodate the consumerization of technology. In many cases, the CIO is expected to lead these breakthroughs, both from a championing and execution point of view.

About the Study

Cognizant recently completed a survey of C-level business and technology leaders in the U.S. and Europe, to gain insight on five key themes:

- Operational efficiency, effectiveness, innovation and virtualization
- IT clout and perceptions
- Attributes of a services partner
- Portfolio management
- Measuring the business value of IT

The respondents were carefully chosen to represent a wide range of industries (banking, financial services, insurance, healthcare, manufacturing, entertainment, etc.), as well as a range of organizational size. The 2009 revenues of respondents ranged from $1 billion to $70 billion, with IT budgets ranging from $30 million to $4 billion.

We received responses from 98 executives in the U.S., of which 23% were CEOs, CFOs and COOs, and 76% were CIOs and CTOs. In Europe, 30 respondents were included in the survey — among them, 30% were COOs and CFOs, and 70% were CIOs and CTOs.

To fully understand these imperatives, Cognizant Business Consulting conducted a survey of CXOs from leading organizations across various industries in the U.S. and Europe that reveals several enlightening observations:

- Most companies expect IT to play a greater role in competitive differentiation and be a stronger agent for changes to the corporate operating model than in the past.
- As globalization accelerates, companies are seeking new ways to advance the business through collaboration and virtualization, and the CIO is seen as executive champion for these developments.
- However, companies are equally keen to achieve the benefits of innovation without increasing their overall IT spend, by funding innovation and differentiation through IT cost management and operational efficiencies.
- Mission-critical initiatives can be funded, however, by finding new ways to achieve operational efficiencies, such as through virtualization of enterprise assets and processes.

For IT, this means moving beyond its operational mindset and working closely with the business in defining core vs. contextual components of the value chain, mapping out critical moments of customer engagement, and creating new platforms of organizational collaboration in a virtualized corporate operating model that supports new value networks. Rather than "align" and "support," the new IT directive has, therefore, become "advance the business" and "enable meaningful change."

In this paper you will learn why:

- IT must change its "delivery and operations" mindset to be a sustainable agent for innovation and change, particularly in the way people and organizations perform work.
- Collaboration and adoption of virtualization technologies is the key for organizations to create competitive differentiation and establish more innovative ways of working, using new tools.
- CIOs need to re-assess their approach to managing the IT portfolio to meet the triple objectives of change leadership, championing innovation in the corporate operating model and IT cost control.
- The business and IT must find new ways of providing IT services more efficiently if IT is to enable new and more competitive business models and approaches.

Advance the Business

From Managing IT Assets, to Managing Business Outcomes: The New Role of IT

Over the last decade, corporate IT has not always been viewed as a hotbed of innovation, let alone a major champion for embracing new ways of work. The perceived role of IT in many industries was to ensure systems kept humming and were updated and upgraded according to demand-managed complaints, suggestions and feedback from end-users. Simultaneously, the costs associated with the IT function were expected to be kept under control, tightly managed and, if possible, even diminished.

The Great Recession compelled organizations to rethink every aspect of their corporate operating models. Globalization of markets, shifting demographics, emerging new technologies and virtualization of value networks are predominant forces of change that corporate strategies must embrace. This strategy — which Cognizant refers to as the "Future of Work" — must take into consideration the impact of these forces on the various elements of the corporate operating model:

- Serving new millennial employees and customers globally, with demands for co-creation and improved customer experience.
- Vying with new competitors from emerging markets, who can deliver faster, better or cheaper (or all of these).
- Enabling virtual teams — working across borders, time zones, language and cultural barriers — with collaborative tools.
- Weaving global business service providers into the company's value network after a thorough core vs. contextual value chain assessment.

No longer content with having IT play a supporting role focused on keeping the lights on, leading companies award the job of adapting the corporate operating model to the IT function, with the CIO in a leading role.

Many organizations are also changing the nature of their IT services and how IT services are delivered, as well as the mix of IT activities performed both within the company walls and by third-party partners. In addition, the responsibilities for and expectations from IT are also changing. No longer content with having IT play a supporting role focused on keeping the lights on, leading companies award the job of adapting the corporate operating model to the IT function, with the CIO in a leading role.

Results from our recent study conducted with the Economist Intelligence Unit demonstrate that a majority of companies at the forefront of introducing a new corporate operating model favor the CIO over the CEO as the executive best qualified to help lead the transition.[1] This preference is based on the long-standing collaborative approach of IT operations (using global service providers and cross-border teams) and the intertwined nature of IT with the company's business operations.

Clearly, it's time for IT to dramatically extend its capabilities and reinvent itself. No longer is it enough to just meet the current needs of the business; IT needs to position itself as the enabler for continual adaptation of the corporate operating model to ongoing waves of change. Some existing IT methods and structures are still very effective. Others are fraying at the edges after years of working to do more with less.

Many conventional IT methods and structures either require serious adaptation or are beyond repair, since they are simply no longer relevant to IT's new role.

To contend, IT must find new methods and structures to enable business growth and sustainable competitive advantage, as new opportunities and ways of working emerge. The CIO must find alternative ways to express the benefits of IT investments in business growth and must devise a manner to calculate the return on investment for projects that enable new ways of working. Managing the business outcome of IT investments will be the number-one objective for successful CIOs. As such, the IT function will truly shift from a cost center that manages IT assets, to an enabler of new ways of doing business, measured through identifiable outcomes. The future of work is no longer on hold, and it's up to IT to usher it in.

Enable Meaningful Change

CIOs Lead the Design and Implementation of Fundamental Changes in the Corporate Operating Model

After years of enduring budget cutbacks, efficiency increases and doing more with less, CIOs are looking for clarity on where and how to lead IT in this new era. Based on our survey, several observations emerge:

- **Finding 1: Most companies expect IT to be a greater competitive differentiator and agent for change than in the past.**

  One third of U.S.-based respondents stated that IT is the primary enabler for business innovation. Half of all respondents indicated that IT should be focusing on non-traditional IT domains, such as helping the company improve its end-customer experience, extend its global reach, or optimize revenue generation. At the same time, many business executives express doubts about IT's ability to deliver on these expectations.

  The CIO must play a leading role in making IT change its "delivery and operations" mindset to be a sustainable agent for innovation and change, particularly in the way people and organizations perform work. While IT's credibility has improved in recent years, the survey revealed that skepticism still exists among business stakeholders about IT's ability to deliver sustained business innovation. CIOs must, therefore, do a better job of managing expectations and offer ways to express benefits achieved in a business-like manner (such as ROI, time to market and increased customer satisfaction).

The CIO must play a leading role in making IT change its "delivery and operations" mindset to be a sustainable agent for innovation and change, particularly in the way people and organizations perform work.

- **Finding 2: Companies are seeking new ways to advance the business through collaboration and virtualization.**

  A majority of respondents in both the U.S. and Europe said they considered virtualized organizations as somewhat or significantly enhancing collaboration between the business and IT. A first step toward creating a virtual organization consists of deconstructing business process value chains and having the resulting steps executed by teams hailing from a location (or an outside organization) where the

necessary knowledge and relevant expertise is most easily obtained. Introducing a collaborative platform with a business process management tool, chat and blog functions, as well as document storage and sharing repositories, could be a logical next step to facilitate these virtual business teams. Both are business virtualization initiatives that the CIO should start, lead and manage.

The CIO should focus on the adoption of collaboration and virtualization tools, technologies and hardware as the key for organizations to create competitive differentiation and establish more innovative ways of working.

The "consumerization of IT" describes how the introduction of new technology first used at home has taken hold in the workplace. In reality, many in the workforce have quite a different "home vs. work" technology experience. Whereas they can and will use all publicly available social media tools on their iPads, laptops or smartphones during the weekend at home, Monday morning in the office they stare at a black screen with green letters on a monitor attached to a client/server desktop that has no or limited Internet connectivity. The CIO should focus on the adoption of collaboration and virtualization tools, technologies and hardware as the key for organizations to create competitive differentiation and establish more innovative ways of working.

- **Finding 3: Companies want to become "Future-of-Work proof" without dramatically increasing related IT budgets.**

  While there is evidence that some IT budgets will increase — albeit modestly — in the near term, the majority of respondents indicated that IT budgets will be flat or increased for inflation adjustment only. CIOs must therefore continue to be creative budgeters to allow IT to prepare their companies for the Future of Work. Whereas none of the respondents revealed magic tricks for doing more with the same budget, some guidance is provided from recent Forrester research data: Forrester predicts flat growth rates of 3% through 2016 for IT investments in current-generation technology, and double-digit growth rates for IT investments in so-called smart computing applications, infrastructure and technology solutions.[2] This next-generation technology uses predictive analytics, business process management tools, collaboration platforms and integrated applications in order to define a set of suggested next steps or iterations in a business process.

  CIOs must therefore shift IT dollars away from maintaining or upgrading existing systems of record to creating and running new systems of engagement.

  Without extra budget in 2011 or 2012, CIOs will need to re-assess their approach to managing the IT portfolio to meet the triple objectives of change leadership, championing innovation in the corporate operating model and IT cost control. Innovation will not be found in existing systems that register and hold transactional data but in smart systems that take this data and use it to enhance customer experience at key moments of engagement. CIOs must, therefore, shift IT dollars away from maintaining or upgrading existing systems of record, to creating and running new systems of engagement.

- **Finding 4: CIOs must continue to look for higher operational efficiencies through virtualization in order to fund IT initiatives.**

  Without substantial budget increases, business and IT must find new ways of providing existing IT services more efficiently to enable new and more competitive business models and approaches. This calls for a diligent review of all existing IT functions and services, followed by an honest and realistic core vs. contextual assessment of IT's role and responsibilities. Contextual IT services should be contracted out to third-party IT service providers that will – over time – be able to perform these services better, faster and hopefully cheaper.

  Organizations such as Procter & Gamble have already run this gamut, and now employ a model where all of the "mundane IT services" have been farmed out to IT service providers, allowing savings of $800 million over the last seven years. This leaves ample maneuvering room and budget for P&G's IT department and its CIO to focus on business revenue growth issues.[3] Other CIOs should follow suit and virtualize existing IT service delivery as much as possible to free resources for technology-driven innovation that powers a more potent corporate operating model.

Contextual IT services should be contracted to third-party IT service providers, who will – over time – be able to perform these services better, faster and hopefully cheaper.

To meet these new challenges – in a compressed period of time – IT will require a whole new set of skills, organizational structures, governance structures, project workflows and sourcing strategies. Simply increasing efficiency, our survey suggests, will be inadequate. If collaboration and adoption of virtualization technologies is the key for organizations to create competitive differentiation and establish more innovative ways of working using new tools, then IT must change its "delivery and operations" mindset to be a sustainable agent for innovation and change – particularly in the way people and organizations perform work.

As a consequence, the business and IT must together find new ways of providing technology services more efficiently if IT is to enable new and more competitive business models and approaches. Cognizant's going-forward perspective can help IT and CIOs re-focus on the future.

Recommendations

Re-Focusing IT for the Future Corporate Operating Model

As organizations undergo significant change to remain relevant and competitive today and tomorrow, IT and the new technology capabilities it will deploy and manage will play a key role in powering and sustaining new, more collaborative operating models. However, technology by itself can only provide the ability to support a more seamless operation that drives competitive advantage; the competition will catch up sooner or later (usually sooner). To create a sustainable competitive advantage, business and IT will need to come together and think beyond adoption of innovative technologies – together, they will need to design innovative operating models, as well.

Also, as organizations increase the service components of their increasingly global businesses, this too will impact basic business models. The age of globalization means companies can now leverage expertise anywhere and everywhere it resides.

In this new era, IT has to apply laser focus to changing the way their organizations think and operate. It is our perspective that CIOs need to lead this renewal. CIOs must shift from reactively supporting business needs, to spearheading the structural and cultural change needed within the IT organization to drive innovations that enable the entire corporate agenda. The first steps of altering IT are crucial, as valuable momentum and organizational energy can be wasted if early initiatives don't gain traction.

Going forward, the IT organization will need to re-focus its capabilities along the following dimensions:

1. **Shifting to provide and support knowledge and collaboration:** Historically, IT has been about providing transaction systems and systems of record. However, the emphasis has now shifted to "platforms of collaboration" that enable knowledge sharing and teamwork across the enterprise. In fact, the "knowledge, collaboration and technology" department could be a more appropriate nomenclature for the IT department of the future. However, it is easier to change the name of a function than to enable these new roles.

2. **Emphasizing a collaborative solution orientation:** IT cannot deliver knowledge, insights and platforms of collaboration to the business without access to people who deeply understand the real needs of the business (including those of the customer). CIOs need to put an end to the stereotypical view of IT as a team of engineering-oriented specialists in specific technology domains who think only in linear and process-oriented models, far removed from the unpredictable marketplace in which businesses compete. While a process orientation will continue to be important for business, it is also necessary for IT staff to add elements of creativity, adaptability and end-user orientation to each and every system that is developed and deployed. CIOs will need to embrace tools and processes required by their teams to acquire the right skills, collaboration capabilities and accountability to optimize the business effectiveness of new IT solutions.

3. **Enhancing proximity to end-customers:** In the past, IT's only customers were internal users; today end-users can be true customers through Web-enabled channels. As such, it has now become important for IT to enable business insights based on customer preferences and behavior. IT must also address the "always connected" expectations of the millennial generation and the social networks they rely on for making informed decisions. Social networking and mobile technologies will bring organizations closer to the customer, and IT will need to step up with enhanced collaboration tools to help innovate and create market differentiation.

4. **Defining virtualized operating models and ways of working:** A broad array of virtualization technologies, approaches and services is emerging. Virtualized models of collaboration are enabling real-time teamwork among project members regardless of time or place. Software as a service (SaaS), cloud computing and Web 2.0-based collaboration technologies are enabling new ways of working. IT needs to identify avenues for realizing efficiencies and innovation based on these technologies. Moreover, IT will need to become adept at working on virtual teams and providing a seamless experience across disparate IT landscapes to customers, channel partners and staff. Finally, IT will need to engage in social networking to distribute workloads and share collective knowledge among subject-matter experts.

These new tasks for IT do not mean that its custodian role for the IT assets is over. On the contrary, this role will remain important as well, but will evolve over time. The CIO should therefore focus on:

1. **Keeping IT manageable:** As alternative delivery models emerge, and virtualization of platforms, infrastructure, applications and processes evolve, it is critical that IT remain secure and manageable. If IT architecture becomes a conglom-

eration of virtualized point solutions with the underlying knowledge, service assurance and change control resident in the individual points, it will quickly become unmanageable.

2. **Developing partnerships for co-innovation:** By definition, innovation cannot be achieved single-handedly by IT. To create a sustainable model of providing innovation and competitive differentiation, CIOs will need to be the prime sponsor for an "innovation ecosystem" involving all internal stakeholders (business and IT) and external stakeholders (partners and end-customers). This will allow organizations to hone their value proposition in response to the needs of the market.

CIOs will need to be the prime sponsor for an "innovation ecosystem" involving all internal and external stakeholders.

3. **Re-focusing on core IT asset portfolio management and portfolio investment management:** Traditionally, organizations have considered the IT systems they built and maintained to be core IT assets. However, they haven't been managed as core assets but as a discontinuous stream of one-off, targeted investments. Resources must be dedicated to the rationalization of these core assets, which must be made more efficient and less complex if they are to support the next generation of IT-enabled services. IT tools and approaches will also need to be greatly enhanced. Learning a new way of working, while also engaging in new types of projects with far-reaching outcomes, will only be possible by designing and adopting new frameworks for IT investment portfolio management (such as activity-based costing) to identify, evaluate and prioritize the most important initiatives of the future.

4. **Measuring business value:** The increased emphasis on IT-enabled innovation has not translated into corresponding changes in how organizations measure the value of IT. To get true recognition for their contributions, CIOs will need to sit with their business counterparts to define the goals for IT beyond cost management and service levels around technology assets. CIOs will, in turn, need to translate these goals into measurable targets for their team to help the business with customer experience and revenue enhancement strategies.

Bottom Line: While some companies may still be on the sidelines, others are ratcheting up the competitive stakes by renewing their investment in technology and focusing on how IT can be re-tooled to concurrently maintain cost efficiency, while delivering higher levels of sustained innovation through the use of more virtual and collaborative ways of working.

The era of IT delivering business value through traditional means is in the past, as a new era of closer business-IT collaboration has begun. It is time to re-focus IT, as the future of work has arrived.

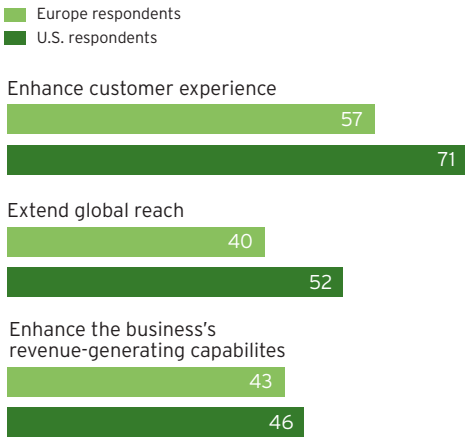
Appendix

FINDING 1:

Most companies expect IT to be a greater competitive differentiator and agent for change than in the past.

One of the biggest challenges facing organizations is the changing consumer. The millennial mindset is revamping everything from communication to innovation, driving new social and operating norms. Thanks to widespread mobile computing

Chart 1 Changing Business Expectations



Sample Size: 98 from U.S., 30 from Europe

Percent of respondents who named each factor as an expectation of IT.

and social networking tools, consumer expectations of their business interactions are quickly changing. Most companies have yet to fathom the depth and scale of the change millennials will bring.

IT can and should play a central role in shaping customer experience strategies, ensuring cross-channel capabilities and enabling new ways to collaborate — both within and outside the organization — through increased process virtualization and cloud computing platforms.

Therefore, it is incumbent upon IT to embrace new forms of innovation that power new business models to elevate customer satisfaction through enhanced customer experience, break down the barriers to collaboration, increase yields and give rise to new products and services that enable the company to infiltrate new markets. In our survey, one out of every two respondents said they wanted IT to help in enhancing customer experience, extending global reach and improving revenue-generating capabilities (see Chart 1).

Furthermore, companies across the U.S. and Europe plan to increase their emphasis on innovation and business differentiation through IT. One-third of executives (34% in U.S. and 30% in Europe) named "innovation" as a high priority, and more than a third (37%) in the U.S. said IT was the primary enabler of innovation. As one respondent — the COO of a global manufacturing company — stated, "IT needs to partner with the business not only through technology, but also through technology-enabled business innovation."

While these demands have existed in more IT-intensive industries for some time, such as in banking and financial services, the need for IT to play a key role in advancing the business, introducing innovation and spearheading change is now widely seen across nearly all industries. IT-enabled innovation is now fundamental to ensuring that limited resources are applied to the right opportunities for creating a sustainable competitive advantage.

What is troubling about this shift in expectations is that the resources of most IT organizations are already stretched, leaving CIOs to eliminate some current initiatives, seek low-resource alternatives and find additional investments to fund innovation. Indeed, the first hurdle for IT innovation is often securing the support of business leaders, many of whom still express doubt about IT's ability to deliver. In the survey, respondents revealed a gap between IT and business leaders' confidence in IT and overall favorable perception of IT. U.S. business executives were twice as likely as technology leaders to identify two limitations on IT's ability to contribute to the business: The credibility of IT (50% vs. 23%) and proven ROI on previous IT efforts (46% vs. 23%). While IT credibility has improved in recent years, skepticism still exists among business stakeholders about IT's ability to deliver sustained business innovation.

While IT credibility has improved in recent years, skepticism still exists among business stakeholders about IT's ability to deliver sustained business innovation. Managing the business outcome of IT investments will be the number one objective for successful CIOs.

For one CIO respondent, IT has taken on a very visible role in promoting innovation by creating internal wikis for employees to suggest new ideas. IT staff is also encouraged to research other industries to seek out cross-fertilization ideas it can apply to its own organization.

Bottom Line: IT must change its "delivery and operations" mindset to be a sustainable agent for innovation and change, particularly in the way people and organizations perform work.

FINDING 2:

Companies are seeking new ways to advance the business through collaboration and virtualization.

To meet new challenges, it is no longer enough for IT to focus on enabling more efficient business processes; IT needs to transform its entire culture and standard work practices. For many organizations, this means adopting more collaborative ways of working and new operating models that rely on virtualization technologies to enable business process and supporting platforms to operate "as a service." This reduces the need for organizations to sink limited cash into new hardware, software, development resources and support. In this model, collaboration is no longer constrained by the need for co-location. Each step of a process, as well as each contribution from a team member, can be conducted in the most economical location, and then woven together through a set of connected systems via a workflow engine.

In the survey, 63% of respondents in both the U.S. and Europe said they considered virtualized organizations as somewhat or significantly enhancing collaboration between the business and IT. U.S. respondents are more likely to focus on new approaches, such as enterprise virtualization, innovative IT processes and alternative delivery methods to accomplish their objectives. Technology leaders in the U.S. are somewhat more bullish than their business counterparts about virtualization, however, with 68% vs. 46% expecting this technology to result in some or significant improvement. Embracing more innovative approaches is also a way for organizations to move beyond traditional measures of cost reduction, such as vendor price pressure and consolidation.

Compared with Europe, the U.S. is slightly more open to exploring new ways to achieve IT cost reduction and efficiency. Approximately 53% of U.S. respondents (compared with 48% in Europe) are using new approaches such as technology and resource virtualization, agile development processes and alternative models for delivery of software, processes and infrastructure services (see Chart 2). To remain viable and relevant, organizations must also embrace new social networking tools

Chart 2 IT Approaches for Realizing Operational Efficiencies

Method of Realizing Efficiencies	Percent of Respondents U.S.	Percent of Respondents Europe
New Approaches	**53%**	**48%**
Virtualization	23%	20%
Innovative IT processes	19%	18%
Alternative delivery (PaaS, SaaS, cloud)	11%	10%
Traditional Approaches	**47%**	**52%**
Pressure on vendor pricing	21%	19%
Reductions in resources/facilities	14%	14%
Reductions in duplicate products/services	12%	19%
Total	**100%**	**100%**

- *Percentage of respondents indicating each method for realizing efficiencies.*
- Sample Size: 98 from U.S., 30 from Europe

to enable more personalized experiences and meaningful interactions. Anyone with access to the Internet — particularly millennials who have grown up in the Internet age — has a 24x7 link to product and service information, comparisons and feedback from other consumers, through blogs, Twitter, social networking sites and other newly emerging social channels. Similarly, business partners will place demands on each other for more transparent and real-time forms of communication, including the sharing of unstructured insights on blogs and other forms of social networking, as well as more collaborative capabilities bolted onto traditional systems of record.

Consequently, the kinds of activities in which IT is being asked to engage today are often profoundly different from before. For instance, implementing a system of record (e.g., an ERP system) is a top-down effort vs. creating collaborative systems, knowledge repositories, integrated communications and social networks, which are bottom-up and cross-directional initiatives. To succeed, IT must focus on enhancing the experience of customers (both internal and external) and increasing the company's global reach, while minimizing its technology footprint. It will also be charged with providing business insights to identify new markets or to help fine-tune the business.

This is already happening for one survey respondent, where IT is actively involved in redesigning the operating model at the organization, as well as helping to standardize the business model on a regional and global basis, while rolling out a new ERP system. It is helping to drive revenue growth by enabling product developers and the sales force to collaborate globally. "We have a clear picture of 'IT without borders' to drive global processes and standards," the respondent says.

Survey respondents highlighted a diverse set of mandates that they would like IT to explore:

- **Use of collaborative capabilities to create competitive differentiation.**
  - A survey respondent from a glue manufacturing company reported that his company was looking to improve collaboration among its global researchers, to make greater advances in product differentiation. If it could reduce its glue drying time to 30 seconds vs. a competitor's offering that dries in three hours, it would provide a significant competitive advantage.
  - Another respondent from an entertainment company mentioned the need to collaborate with IT to create more meaningful viewer surveys, questions and polls. This would enable more timely and accurate data collection and information aggregation.
- **Use of mobile computing to deliver services to internal and external customers.**
  - A survey respondent from a healthcare company said his company would like to implement critical care monitors, tablet PCs for electronic medical records, point-of-care technology, and a new online medication authorization application for physicians to get prior authorization from health plans for medications. This would greatly enhance the efficiency and effectiveness of these processes.
  - Another company is launching a "Next Generation Employee Productivity" project, using wireless networks, mobile devices, internal knowledge-sharing systems and videoconferencing to enhance employee productivity across the organization.

- **Use of Web tools to empower customers.**
  - A survey respondent from a manufacturing company said his organization was incorporating a self-service tool for customers to configure products themselves. The tool would incorporate rules and selection criteria from its existing manufacturing and engineering systems, which would free its internal engineering and sales associates to work on issues of higher value, such as product innovation, vs. answering routine configuration questions. It also wants to develop collaborative engineering capabilities to design new products in conjunction with its business partners.

Bottom Line: Collaboration and adoption of virtualization technologies is the key for organizations to create competitive differentiation and establish more innovative ways of working using new tools.

FINDING 3:

Companies want to become "Future-of-Work proof" without dramatically increasing related IT budgets.

Every era of innovation has primarily been brought about by advances in technology that support new ways of working. For example, technological innovations in ERP platforms enabled businesses to invest in supply chain integration. Similarly, the arrival of the Internet led to a surge of Web-enablement investments that is still ongoing. As organizations prepare for the next wave of innovation related to the Future of Work, the question remains as to whether — or when — business leaders will commit the required technology investment. The survey points out that organizations are struggling to find additional capital for IT investments, with IT budgets that were expected to increase by 5.8% on average in the U.S. and remain flat in Europe during 2010. Given ongoing economic uncertainties, organizations are keen to keep IT budgets under control.

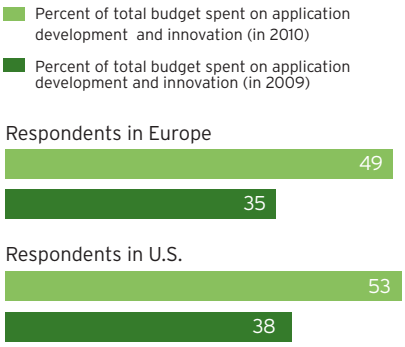
At the same time, organizations are now dedicating a higher proportion of their IT budgets to building innovative capabilities that enhance the top line vs. enabling run-the-business activities. Clearly, the desire to foster innovation has gone beyond just the consideration phase. In both the U.S. and Europe, the proportion of IT budget spent on application development and innovation increased significantly from 2009 to 2010 (see Chart 3) and this trend is likely to extend into the immediate future. Among all U.S. respondents, the proportion of budget for these two activities has increased from 38% in 2009 to 53% in 2010 — a 39% increase in budget activity. Among European respondents, this proportion has increased from 35% to 49%.

Interestingly, the emphasis on innovation has not translated into changes in how businesses measure the value of IT, with the majority of respondents in the U.S. (62%) and Europe (60%) measuring IT's business value in terms of cost. Cost management and reduction are expected to continue to be dominant themes for measuring IT value, until economic stability and confidence is restored both locally and globally.

While there are key areas where judicious IT investments will be needed, caution will be the order of the day. With the global economy still in a fragile state, failed IT investments of the past will be a stark reminder of the need for due diligence and careful evaluation prior to approving new capital outlays, as well as active governance and control while IT projects are being implemented.

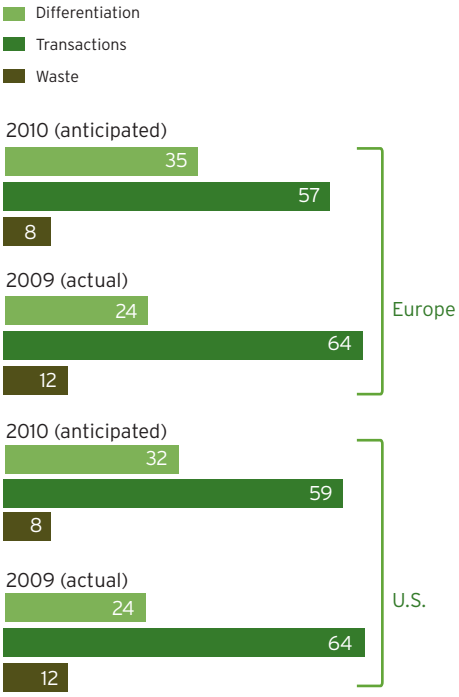
Bottom Line: CIOs need to re-assess their approach to managing the IT portfolio to meet the triple objectives of change leadership, championing innovation in the corporate operating model and IT cost control.

Chart 3 Application Development, Innovation Budgets Increase



Sample Size: 98 from U.S., 30 from Europe

Chart 4 IT Budgets Shift Toward Business Differentiation



Sample Size: 98 from U.S., 30 from Europe

FINDING 4:

CIOs must continue to look for higher operational efficiencies through virtualization in order to fund IT initiatives.

In a nutshell, the critical challenge for organizations emerging from the prolonged economic downturn is how to fund business-driven IT initiatives. While only 6% of U.S. respondents mentioned that funding for such initiatives should derive from existing IT budgets, approximately 35% of respondents from Europe felt similarly. So the pressure on IT to do even more with less is likely to increase significantly, particularly in Europe.

Seeking out further IT efficiencies is a major challenge, given that IT waste has dramatically decreased over the past several years. Perceived IT waste was identified as high as 40% in the early part of the last decade, but it dropped to 12% in 2009 and just 8% in 2010, according to survey respondents. A key question then becomes how should IT fund innovation and differentiation? The survey revealed that organizations expect to derive these funds by reducing waste and optimizing spend on transactional activities. U.S. respondents expected to increase spend on innovation/differentiation from 24% of their IT budget (in 2009) to 32% of their IT budget (in 2010). Among European respondents, this component was anticipated to rise from 24% to 35% (see Chart 4).

In essence, organizations are urging IT to concurrently take a microscopic view, to scrutinize every element of operational efficiency, as well as a telescopic view to prepare for the future. As the CIO of a healthcare company said in the survey, "Operational efficiency is the opportunity for further investment."

Consider the example of a Wall Street brokerage firm engaged in high-speed algorithmic trading. In such processes, every millisecond of network and computer latency can have a material impact on business performance. So, the firm consolidated its data centers and created a virtual desktop infrastructure. The business case was justified by a significant reduction in infrastructure costs and the competitive advantage offered by greater operational efficiencies of the trading platform.

To capture the business value of information technology, organizations need to move beyond their long-standing myopic view of IT as a function whose most important consideration is cost control. CIOs will need to work closely with the business to design a strategy that achieves IT cost optimization, while also ensuring innovation and higher operational efficiency of business.

Bottom Line: The business and IT must find new ways of providing IT services more efficiently if IT is to enable new and more competitive business models and approaches.

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Footnotes

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