A better way to estimate technology’s impact on enterprise value

Technology enables business value. But some organizations are missing the potential value of their tech investments. Here’s how CXOs can link tech investment decisions to enterprise value measures.
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Introduction

Leaders understand that technology is more than just a set of tools—it’s a critical catalyst for business performance and competitiveness in a world of continuous change. Nearly 90% of CSOs agree that advanced technologies are a fundamental strategic enabler. Despite its consequence, recognizing the full value of tech remains frustratingly opaque; only 6% of surveyed managers believe their company is deriving maximum return from digital investments.

Changing this dynamic is easier said than done, as organizational inertia complicates matters. Only 52% of surveyed companies have a tech investment decision-making process that’s jointly owned by IT and the business, and only 35% have a clear process for prioritizing IT investments at all. New data from our 2022 Global Boardroom survey underscores it all. When asked on the challenges leaders face in framing tech value, the inability to link tech investment to growth, an over-index on ROI over long-term value measures, and fragmented reporting across business and technology groups, rose to the top. Neal Sample, former CIO of Northwestern Mutual, a financial services company based in Milwaukee, Wisconsin, says it’s because organizations struggle to articulate the value story, and the business impact of IT is not naturally understood. “Companies are really good at cost accounting but not as good at value accounting,” he says.

Solving for this is as much an art as it is a science. It requires CXOs to build a discipline that connects the broad-strokes, big-picture enterprise view of value with the nuanced complexities of digital transformation. To do so, organizations should think of value in two new frames. First, adopt a wide-angle perspective to create a link between enterprise value and new digital investments. This is a major gap that exists today in understanding the total value from a future tech investment. Second, closely examine the potential value that remains hidden in the existing “technology estate” (assets, talent, and ways of working) and beyond. This allows CXOs to balance the need for quick wins with long-term digital transformation strategies.

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The wide-angle view

Before zooming in on the intangibles, leaders need a wide-angle perspective. The first step is often to create a holistic frame that accounts for the many ways a company creates value. Leadership can then use that frame to craft a more complete narrative around how each tech investment affects all possible value levers, not just the part of the business that funds or uses the technology. Patrick Campos, chief strategy officer of Washington, D.C.-based blockchain market infrastructure technology company Securrency, explains: “Most organizations hunt for an internal business sponsor to legitimize tech spend, then an external customer to prove the value, and they get stuck in a loop. That thinking comes at the expense of thinking holistically. Every business becomes an island, and tech spend becomes fragmented. We think, instead, about how to make the entire [organization] more efficient so everyone benefits.”

One such frame is an enterprise value map (EVM) and the “value language” it establishes. The EVM has been used by organizations for years. Though not a new concept, its purpose is to tie investments to enterprise outcomes and value. As technology has become ubiquitous and more central to every aspect of how organizations run and grow, EVMs have increasingly helped executives tell a complete story around its value. Simply put, extending an EVM down to the technology estate can make the relationship between investment decisions and value clearer (figure 1).

In the figure, we can trace from an overarching source of value (revenue growth) to the drivers employed to realize that value (acquire new customers). Those drivers are influenced by business capabilities. Those capabilities, in turn, would be impacted via the technology estate that supports them.

Figure 1

The end-to-end value map

<table>
<thead>
<tr>
<th>Enterprise value</th>
<th>Revenue growth</th>
<th>Operating margin</th>
<th>Asset efficiency</th>
<th>Expectations</th>
</tr>
</thead>
<tbody>
<tr>
<td>Outcomes</td>
<td>Volume</td>
<td>Price realization</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Drivers</td>
<td>Acquire new customers</td>
<td>Retain and grow usage by current customers</td>
<td>Strengthen pricing</td>
<td></td>
</tr>
<tr>
<td>Capabilities</td>
<td>Sales &amp; marketing</td>
<td>Customer management</td>
<td>Supply chain</td>
<td>Pricing</td>
</tr>
<tr>
<td>Technology estate</td>
<td>Tech assets</td>
<td>Talent</td>
<td>Ways of working</td>
<td></td>
</tr>
</tbody>
</table>

Source: Deloitte analysis.
Forming the map is no mean feat. Value drivers may be clear and well-known, but do we know the degree to which a business capability or technology really influences them? How does that differ across the enterprise? A technology inventory may be available, but do we understand which technologies are true anchors for a business capability? What if a technology supports multiple capabilities? The goal is not to create an “A-Z” map in which each value driver can be fully traced. Rather, the benefits come from the mapping journey itself. This work can help you clarify why certain decisions were made, where traceability gets tenuous, and spotlight when leaders are making educated guesses on the promise of digital investments.

Once the map is in hand, it can be paired with likely digital investment objectives (which are not mutually exclusive):

- **Optimize.** Involves deploying technology to run the business at efficient scale and is one of the most typical digital transformation objectives. This includes digitizing workflows to reduce cycle time, enabling the business to improve product quality, and leveraging platforms to democratize development (figure 2).

- **Preserve and protect.** Focuses on using technology to build resilience in the business and safeguard against risk through improved monitoring, always evolving security measures, more certifications, and better compliance. Cyber of course plays a big part, with investments protecting against intrusion and erosion of public trust.10

- **Create and expand.** Leverage tech to make new capabilities, build new products, or reinvent within a market. One example could be leveraging digital reality to bring a retail experience to remote customers and completely reimagine the storefront by extension.

Source: Deloitte analysis.
Leaders can use these three digital objectives and an EVM to dramatically simplify decision-making and value estimates.

When organizations adopt this wide-angle perspective, they can not only better estimate enterprise value but also capture the opportunity cost of investments that they decline to make. They become more confident in their decisions and can defend investments to any stakeholder in the organization, including shareholders.

Abhishek Singh, chief digital officer of RGE, a resource-based manufacturing company headquartered in Singapore, says, "When large, private companies want to transform, they have to set the agenda and intent at the shareholder level. RGE’s decision to invest in technology was less about cost efficiencies and more about the potential value that could be created through digitization. We are a for-profit business. There needs to be a clear ROI."

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Digital transformation doesn't always require net new products and platforms. One's existing technology estate holds substantial potential value. Taking a closer look, with a lens on constraints and unnecessary complexities, may yield returns on even shorter horizons. For example:

- **Determine what’s holding you back.** Technical debt comes in many forms—software, code, infrastructure—and with it, considerable opportunity cost. Engineers spend, on average, 33% of their working days addressing this debt, which degrades innovation and performance. For the enterprise, disaggregated, high-latency technology impacts customer experiences and retention. On-premises asset sprawl impacts provisioning and maintenance cycles. Unnecessarily complex architectures cap integration potential. The list goes on. What matters is not throwing good money after bad, but instead, addressing these challenges before making bigger and bolder investments.

- **Repurpose assets to realize their full promise.** Core platform or emerging technology investments are often done with one objective in mind; for instance, a new Enterprise Resource Planning (ERP) solution for efficient scale, or a new lead-to-order solution for advanced pricing. In some cases, the incremental cost of extending these assets to new domains pales in comparison to the net value. For example, Tyson Foods Inc., based in Springdale, Arkansas, applied computer vision technology—originally envisioned for point-of-sale solutions—to better manage inventory and food quality. The net effect was an “estimated 20% improvement over manual processes.”

- **Unlock the full potential of the workforce.** How an enterprise leverages talent can have a significant impact on business outcomes. Decisions related to organization structure, training, and the judicious use of a global vendor ecosystem can directly impact the value realized across the workforce ecosystem. For example, a company that increases collaboration and engagement productivity with cross-functional teams, invests in building truly differentiating digital skills, and uses its vendor ecosystem to accelerate non-differentiating change can achieve greater value potential.

With this close-up mindset, one can objectively appraise whether the technology estate is leveraged to the fullest extent possible. Like the EVM, what matters is building this discipline and giving potential value opportunities an equal weight in the digital investment portfolio.
A common and consistent framing for how we measure technology value can help companies align technology measures with enterprise value ambitions, understand their unique technology value potential, and project beyond any single planning cycle.

And as we’ll explore in our future research on tech value, a consistent value frame has additional benefits. It can clarify which circumstances lead to enterprise value, and where organizations can focus to better understand and optimize this value.

Tighe Wall, chief digital officer of New Zealand-based Contact Energy, explains, “We’re moving away from a business focused on short-term ROI and establishing more leeway for efforts intended to provide return in later years.” He says, “When assessing digital self-service adoption among our customers, we base our expectations not only on this financial year, but three years from now—a mindset shift that could benefit other organizations as well.”

This recalibration would likely require an incremental but marked shift, and when done right, it can become a true competitive differentiator. It can also arm the C-suite with all the justifications needed to make the big, bold plays this digital future demands.

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Endnotes

01. Rich Nanda et al., *The exponential enterprise: Fortifying the ability to win through the capacity for change*, Monitor Deloitte, October 2020.


05. The Economist Intelligence Unit, *IT's changing mandate in an age of disruption*, May and June 2021.


07. Ibid.


17. Susanne Hupfer and Gopal Srinivasan, *Strong vendor engagement helps drive customer success with everything-as-a-service: Highly consultative vendors can be key to higher levels of competitive advantage and better outcomes*, Deloitte Insights, November 18, 2021.


19. Gerald C. Kane et al., *Teaming your way through disruption: Digital tools and capabilities have been credited with helping many organizations weather the COVID-19 disruption, but there’s also an analog source of innovation and adaptability in trying times: cross-functional collaboration*, Deloitte Insights, October 26, 2021.


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