



February 2007

Document **E19**

RESEARCH NOTE

INDIRECT BENEFITS: THE INVISIBLE ROI DRIVERS

THE BOTTOM LINE

Nucleus case studies reveal that, on average, indirect benefits account for half of technology ROI. Clearly, every organization attempting to calculate ROI from a proposed IT investment should recognize indirect returns like productivity. Taking a structured approach to measurement and employing concepts like productivity correction factors are the first steps to accurately measuring indirect returns.

It would be difficult to point to a technology that generates no indirect returns. In fact, the results from the sum of case studies that Nucleus has conducted over time reveal that, on average, indirect returns account for 50 percent of technology ROI.

UNDERSTANDING INDIRECT BENEFITS

What Is an Indirect Benefit?

An indirect benefit is a return that cannot be directly observed but is nonetheless realized — as opposed to direct benefits like reduced headcount or increased sales that are more easily quantified. Worker productivity is the best example of an indirect benefit from a technology; greater efficiency doesn't always lead to the removal of an existing expense item but is realized in the sense that it enables employees to perform their jobs better and faster.

Quantifying indirect returns requires a structured approach and the application of some basic but important concepts like productivity correction factors and the inefficient transfer of time (see Nucleus research note *C41, Quantifying Productivity Gains*). Because quantifying indirect returns often requires educated assumptions, testing the validity of your estimates against a sample population is always recommended. Further, projecting a best-case and a worst-case scenario based on most conservative and least conservative estimates helps add another layer of confidence to the ROI range.

Direct Returns: Only Part of the Equation

On average, only half of technology ROI in Nucleus case studies results from direct returns such as reduced headcount, increased revenues, or similar gains that show up as line items on financial statements. The other half is attributable to indirect improvements that aren't accounted for in the same way but that are still critical in driving business value. For example, there is clear business value in giving hundreds of employees the ability to perform their jobs in less time or avoiding the

RELATED RESEARCH

- E19 Indirect benefits -
The invisible ROI
drivers
- D26 Lies, Damn Lies, and
Average ROI
- C51 Manifesto:
Separating ROI fact
from fiction.
- C41 Quantifying
productivity returns
- A21 The strengths and
weaknesses of TCO
- A11 Payback and Risk
- A10 Maximizing ROI
- A4 Human factors and
ROI

hire of additional employees through greater efficiency. Therefore, companies overlooking productivity gains when looking at the ROI from a potential solution could very well end up foregoing a competitive advantage.

On average, direct returns make up only half of technology ROI. For example, Nucleus's benchmark study on document management found that 84 percent of companies had seen measurable increases in user productivity, whereas less than half recorded direct returns.

A groupware application enabling better communication between attorneys and clients at a law firm may not lead to fewer attorneys, but it can significantly improve the quality of service to clients while letting attorneys focus on value-added tasks (see Nucleus case study D27, *Hummingbird ROI Case Study: McGuireWoods*). A firm that ignores these indirect returns and chooses not to buy a collaboration system will ultimately deny itself the ability to stay at par with competitors with similar technology.

WHAT DRIVES INDIRECT BENEFITS

If you are trying to estimate the proportion of indirect benefits from a proposed implementation, you should consider three key factors: the kind of technology in question, the areas to which you plan to apply the technology, and your current IT environment and assets.

Companies should consider three key factors when estimating the proportion of indirect benefits from a deployment: the technology itself, the way it is being applied, and the organization's existing IT environment.

The Technology

While all technologies deliver indirect value, some solutions tend to generate more indirect than direct returns. The following are a few examples:

- Supply chain. Supply chain planning, forecasting, and other logistical applications are most commonly implemented to boost such metrics as inventory and transportation expenses. These systems can certainly improve productivity, but the lion's share of the payback usually lies in such direct returns as reduced inventory or transportation logistics costs.
- Collaboration and portals. E-mail, groupware, and portal applications are designed primarily to simplify interaction among workers and normally have the biggest impact on worker productivity by reducing the time it takes to share information, coordinate meetings, and execute other group-oriented tasks.
- Content management. Content and document management systems generate many indirect returns, such as faster filing and decreased retrieval times through search, version control, and audit trail functions. Nucleus's benchmark study on document management found that 84 percent of companies interviewed had seen measurable improvements in user productivity, whereas less than half the sample had recorded direct cost savings (see Nucleus Research Note D9, *Benchmark Study: Document Management*).

How the Technology Is Being Applied

The technology is not the sole factor dictating the extent of indirect returns a company can expect. The specific way in which the company chooses to deploy the technology and the areas of operations the company targets will also influence the impact on the individual company's bottom line. Here are two cases in point:

- A business intelligence dashboard could generate more indirect or direct benefits, depending on how it is deployed. Time savings will be the primary benefit of a finance dashboard deployed to analysts needing quicker access to weekly metrics. Deploying the same dashboard to a logistics manager promises direct cost savings if it allows the manager to better monitor and control transportation and freight costs.
- An integration technology could generate more direct returns if it is used to automate data exchange with customers, hence attracting more revenues through increased ease of doing business. By contrast, an integration platform used primarily for speeding deployment of internal applications may bring mostly indirect returns by boosting developer productivity.

A technology for collaboration is likelier to bring a higher percentage of indirect returns than, say, a supply chain system. The difference lies in the way the technology impacts operations; groupware will impact employee efficiency first, whereas supply chain will likely generate directly measurable results, such as reduced inventory costs.

The IT Environment

Often, the magnitude of indirect benefits will depend on how much of a delta, or change, is triggered by the implementation of the new technology on the existing IT environment and assets. A company that has relied largely on manual collection of time for hourly employees will see significant direct benefits if it moves to an automated time and attendance application by reducing the number of timekeepers. But if the company already has an automated process for time and attendance and is upgrading to a new version of the timekeeping system with new auditing and reporting features, the ROI from that upgrade will be driven largely by indirect efficiencies through time savings.

CONCLUSION

Many companies will find that direct returns from technology could pale in comparison with indirect returns once they start quantifying the impact of other returns that are indirect but equally impressive in terms of the business value generated. In fact, more than 82 percent of the case studies Nucleus has published over time have included some form of measurable indirect return, with 50 percent of the technology ROI being attributed to indirect returns.

Certainly, user disappointment with customer relationship management, knowledge management, and other solutions that leaned on "soft" benefits has made many CFOs wary of counting indirect benefits when estimating ROI. But a benefit that isn't directly observed could still be generating significant business value because the problem lies not in the benefits but in the way they are counted. To estimate the extent of indirect returns, companies should take a structured approach to measurement, employing such concepts as productivity correction factors and

taking into consideration the technology in question, its application, and the firm's IT environment.

Nucleus Research is a global provider of investigative technology research and advisory services. Building on its unique ROI case study approach, for nearly a decade Nucleus Research has delivered insight and analysis on the true value of technology and strategies for maximizing current investments and exploiting new technology opportunities. For more information or a list of services, visit NucleusResearch.com, call +1-781-416-2900, or e-mail info@NucleusResearch.com.