CALCULATING RETURN

How To Estimate Productivity
BY PETER EDMONSTON

Time is money.

Whether it's a sales-automation application or a document-sharing system, most internal software projects get pitched as a way to trim labor costs and give employees extra time to generate more business for the company.

But in some cases, managers point to productivity without asking if the benefits of a new system really will justify the costs of installing and maintaining it. Part of the problem is that productivity is often considered a "soft" (read: unquantifiable) benefit that defies traditional return-on-investment (ROI) analysis.

"Admittedly, productivity can be hard to measure," says Tom Pisello, president and CEO of Orlando, Fla., ROI software vendor Alinean. Still, he and many other experts argue that productivity-enhancing projects should be vetted with the same ROI-based benchmarks as any other potential expenditure.

A company needs to consider an array of factors, including the number of employees affected by a project, how much each is paid, and the amount of time each is expected to save. Often neglected in such calculations, however, is a key aspect of human nature: the primordial urge to waste time. In the real world, employees are likely to fritter away a sizable chunk of any newfound productivity by taking more breaks, leaving early or bidding on eBay.

To compensate for such inevitable time-wasting, Pisello recommends slashing at least 50% from any raw savings forecast. Or, consult a correction-factor table, such as the one developed by Nucleus Research (see chart, below).

Companies also must understand that increased productivity alone won't fatten the bottom line. Corporate profits will improve only if added productivity generates higher revenue—for instance, allowing a law firm to handle more fee-paying clients with the same number of attorneys—or helps lower costs, which usually means job cuts.

Of course, job cuts are a delicate matter, and failure to follow through is a common reason for lower-than-expected project returns.

"At the end of the day, a company could easily discover they didn't make the cuts they were supposed to," says Pisello. "But if a project doesn't let you reduce head count or otherwise lower costs, where is the real impact?" ◀

TOOL: THE PRICE OF EFFICIENCY

Call it the mathematics of slack: For each hour gained through productivity-enhancing software, less than an hour of additional labor usually gets done. Or, as Rebecca Wettemann, director of research at Wellesley, Mass.-based Nucleus Research, puts it, "Time saved does not equal time worked." Based on its observations of many real-life project implementations, Nucleus has created a trademarked database of "correction factors" to account for how well various kinds of employees actually make use of productivity gains. Not unexpectedly, the most efficient workers are usually those whose output is concrete, such as a line worker, or whose pay is tied to commission.

How Real Are Projected Productivity Gains?

JOB DESCRIPTION	CORRECTION FACTOR
Line workers	**Nearly 100%**
Sales representatives	**70% to 90%**
Marketing personnel	**50% or less**

SOURCE: NUCLEUS RESEARCH

The formula below shows one way of using correction factors to adjust expected savings. In this example, a midsize packaged goods company plans to try out a knowledge-management system at a branch office. The company, using a straight, time-is-dollars equation, expects the system to save each marketing employee about four hours out of a 40-hour workweek (a 10% raw productivity gain). To perform this calculation online, visit WWW.BASELINEMAG.COM/PRODGAIN.

Truth in Productivity

EXAMPLE PROJECT									
Number of staff affected		Average annual compensation*		Projected productivity gain		Annual savings		Correction factor		True savings
20	X	**$54,000**	X	**10%**	=	**$108,000**	X	**80%**	=	**$86,400**
YOUR COMPANY										
	X		X		=		X		=	

*USING A FULLY LOADED COST OF 1.35 TIMES THE BASE SALARY