

At a time when companies can not manage the numbers without ever-more-potent information systems and technology, management is facing an enormous price tag for the work that needs to get done. Pouring money into information technology (IT) may feel like a having a thorn the size of a telephone pole permanently implanted in one's side, yet it's crucial to develop a core competency in IT. Questions abound. Are you spending your technology budget on the right things? Is your IT staff up to its required tasks? Are you able to recruit, manage and retain qualified people?

Those are critical questions against a background of sharply rising costs. During the 1990s, information management costs per employee rose 57.9 percent, while employee wages and salaries increased 40.5 percent, according to InfoWorld.com. Research firm Gartner Inc. projects that IT departments' work volume will increase 50 percent by 2005.

Given the need for current IT skills, certification provides a way to "prove" to employers — specifically CFOs and controllers — that a job candidate or employee has the competency it takes to make a worthwhile contribution. As the demand for qualified IT professionals has grown, so, too, have the number of IT certifications.

An Information Technology Association of America (ITAA) study puts the 2001 national IT workforce at 10.4 million. Even with a weakened economy and the recent dot-bomb debacle, demand continues to outpace supply for knowledgeable and skilled technology workers. This year



IT Certification Pays Off

By
Susan Schott Karr

alone, companies hope to hire an additional 900,000 IT workers (versus 1.6 million in 2000). Nonetheless, due to a lack of available technical and non-technical skills, employers anticipate a shortfall of 425,000 (versus 850,000 last year).

The benefits of employee certification accrue to both the employer and the employee. For the company, certification provides a clear meas-

urement of specific abilities. It improves competence, increases productivity and adds value to on-the-job training, as well as generating better morale and increased employee loyalty. Training costs are lessened, cutting longer-term college tuition-reimbursement fees. For their part, employees benefit from training and the resulting competence that leads to higher salaries and promotions. Increased credibility, self-confidence and a sense of empowerment may follow.

In response to the demand for qualified technology workers, IT certification programs have proliferated. Primary vendors such as Microsoft Corp., Oracle Corp., Cisco Systems, Sun Microsystems and Novell Inc. have developed a certification process that provides a new vehicle for benchmarking IT competence. The IT certification pool continues to grow as the various players — vendors, training companies, industry associations, testing firms and certification agents — add their respective pieces. As of early 2001, the high-tech industry had awarded 2.4 million credentials worldwide.

As CFOs continue to press for more revenue growth, customer satisfaction and employee productivity, it's critical that companies shift to a knowledge-based workforce.

William E. Sabre, CEO of Knowledgeworkers.com, a consulting company that makes strategic hiring and management decisions for corporate clients, says it's important to "effectively manage human capital" and "focus on the employee as a valuable asset to the organization." Indeed, IT workers are the lifeblood

◆ ◆ ◆ ◆ ◆

Major technology vendors are among the providers of advanced training programs. What's in it for companies? More competent and more loyal employees.

How Companies Benefit From Employee Certification

1. Gain clear measurement of specific abilities and benchmarks
2. Leads to best practices
3. Provides a screening device for hiring
4. Improves competence
5. Increases employee loyalty to the company
6. Adds value to on-the-job training
7. Offers employees a perk
8. Boosts morale
9. Increases productivity
10. Cuts cost of training (vs. college tuition)

of many businesses.

Fifty-five percent of the U.S. workforce hold jobs related exclusively to information processing, says Paul Strassmann, former chief information officer of Kraft and General Foods and a specialist in measuring the effectiveness of information management.

Numbers underscore two current trends: a continuing demand for qualified IT professionals, and a persistent gap between supply and demand. American universities are churning out 25,000 IT college graduates a year, but that's not enough to fill all of the openings for technology-oriented jobs. Some schools are now offering joint accounting/IT majors. This shift comes at a time when companies are merging their accounting and financial management with computerized management information systems, creating an increasing need for competency in technology across accounting and finance positions.

What types of information technology positions are needed most? Northwest Emerging Center for Technologies (NWCET) has defined eight job clusters:

- + technical support
- + database development and administration
- + programming/software engineering
- + network design/administration
- + technical writing
- + enterprise systems integration
- + digital media
- + Web development and administration

Combined, technical support and network administration comprise 50 percent of high-tech work. IT jobs are dependent on a strong skill set, particularly given an ever-increasing rate of technology change. In the 1980s, technologists were forced to cope with having to learn new fundamental skills every five years. Now, new developments can occur within months. The ever-faster pace of change has created a learning

curve that is constantly shifting to accommodate new technologies.

Traditionally, IT pros have had varied backgrounds, perhaps culled from on-the-job training or degrees in computer science. Nowadays, the concern that IT education may be outdated by the time of delivery continues to nag employers.

Clifford Adeleman, a senior research analyst at the U.S. Department of Education, noted in his article, *A Parallel Universe, Expanded: Certification in the Information Technology Guild*: "While hardly any of us in higher education noticed, a new, parallel universe of post-secondary credentials sprung up in the 1990s. You see it now in job advertisements, on the Web and in the IPO market: an educational and training enterprise that is transnational and competency-based, confers certifications, not degrees, and exists beyond government's notice or control. And it is much bigger than you think."

But this is a workforce very much in flux. "This is an industry that doesn't sit still long enough to be measured. It is also an industry in which technical professionals don't sit still, either," says Adeleman. Only 40 percent of this group has

college degrees.

Yet, IT certification has become a phenomenon that is challenging higher education. At the American Council on Education, Jo Ann Robinson, director of corporate programs, says phones are ringing off the hook as certificate holders call to see if the certificates they hold have been evaluated for college credit. Between March 2000 and February 2001, the ACE Transcript Service reports an increase of more than 100,000 participants. Certifications do not replace degrees or experience, Robinson says. "Both the degree and the certificate are valuable; they're not mutually exclusive," she says. However, certifications are developing a credible presence on resumes and in the office.

One point at issue is the need for employers and employees to verify IT certifications in terms of qualifications and authenticity. At present, no central authority exists to validate certifications, and the validation burden falls on the employer, who needs to check with training providers. Microsoft stands out as the only vendor with a feedback mechanism for employers, who can check certifications at Microsoft's Web site.

Sabre agrees that managements do not necessarily realize that they will need a way to check on certifications to ensure that they are as current and valid as the technological information they represent. Just as passing the bar or the CPA exam speaks to a core level of competency, the individual who passed IT certification exams also had to jump through hoops. These exams are gaining recognition and credibility in the field. As Robinson has stated, "Certifications speak to quality." They are becoming one of the IT industry's formal benchmarks for competency.

Susan Schott Karr is a freelance writer in Chatham, N.J. She can be reached at susankarr@wordsuite.com.