

Chapter 16

Evaluating Your School or District's Technology Plan

OVERVIEW

After your technology plan is in place, how will you and the community know it's working? This chapter provides criteria for technology program evaluation, strategies for using evaluation data to strengthen and refine the program, and tips for keeping the implementation process on track.

Setting the Evaluation Criteria

Evaluating the progress of your school or district's technology plan at least once every 12 months will help you chart its progress and keep the plan on target. Monitoring incremental progress also helps you know what's working and what needs improvement. Your technology plan should include an evaluation section that identifies the criteria on which you'll evaluate progress toward your goals. Establishing an evaluation rubric upfront leads to greater consensus among your stakeholders later.

What should those criteria be? In Chapter 4, "Planning the Technology Program," you translated your goals into technology requirements. Revisit those goals, and set evaluation criteria that relate directly to them. Make sure the goals are as measurable as possible. For example, did you set an objective for every student, teacher, and administrator to use the computer system? If so, then include that in your evaluation criteria and set a specific time frame by which you expect to accomplish that objective.

The evaluation of the technology plan should address the following types of questions:

- Is the plan meeting the school or district's defined educational objectives?
- Has technology made a positive difference in the teaching and learning process?
- Are teachers and students motivated to use technology?
- How have home-school-community communications been affected?
- How has technology improved administrative functions?
- Have test scores or other indicators of achievement improved?
- Are current tools and techniques being used correctly?
- Are professional development opportunities adequate and meaningful?
- Can improvements be made in the plan or the implementation?

Evaluating the Success of Your Program

How do you measure computer literacy? On the *administrative* side, you can measure success by looking at the automation of student records. Are these records being accessed electronically or still by paper? Has the conversion to electronic student data records increased accuracy and access to this information? Has the communication of this information improved? If not—why?

On the *instructional* side, the computer literacy of students is easy to measure with classroom assessments, surveys, and tests. At Liberty High School in Issaquah, Washington, for example, students are required to submit their reports via computer (sufficient computers are available in the classrooms), making it easy to confirm basic computer literacy. In determining computer literacy, questions to ask include:

- Are students using the software and communications tools to think critically, to research, analyze, sort, and present information more effectively?
- Do students access the online information resources (for example, CD-ROM reference materials)?
- Do students know how to use the Internet to retrieve information?

At Maxwell Middle School in the Tucson, Arizona, Unified School District, the School of the Future pilot project was carefully evaluated on a range of criteria, including rates of enrollment, absenteeism, and withdrawal; academic performance as measured by student test scores on reading, writing, language use, and mathematics (compared to comparable classes without computer instruction); and surveys of students, parents, and teachers to gauge their own assessments of the technology implementation.

Fine-tuning Your Program

After you have assessed the status of your school or district's technology plan, it's important to look at the aspects of the program that have worked and those that have not. This feedback mechanism provides the data needed to make the fine adjustments in the program.

Evaluate progress. Take stock of the progress made in relation to the original timeline. Look at your staff development plans, timeline, budget, and acquisition plans. Have you been able to accomplish all you had planned in the time allotted? You may have surpassed your original plans in some areas and lagged behind in others. Adjust the plan and timeline to reflect the progress made in year one. You will want to begin next year with plans that reflect where you currently are on the technology journey and where you need to go.

Reexamine your needs. Use your evaluation process as an opportunity to determine whether your school or district's technology needs have changed in any area since the original drafting of the plan. If they have, this is the appropriate time to adjust the plan accordingly. Discard components of the plan that do not work, and add objectives that meet your present needs. This process keeps your plan relevant to current conditions in your school or district and in the technology field.

Be aware of emerging technologies. Take a look at the impact emerging technologies will have on your plan for subsequent years, adjusting equipment requirements, budget, and staff development plans if necessary to incorporate them.

Be aware of any new district, state, and federal grant initiatives. Funding sources continually change. Constantly research, reassess, and expand your list of potential funding sources, planning when and how to access them.

Keeping Everyone on Track

To manage the implementation process successfully, your technology team must stay involved. This becomes more difficult once the plan moves from the drawing board into the schools. Develop specific strategies to keep everyone engaged, including the following:

- Continue to hold regular status meetings.
- Communicate progress to your constituents.
- Continue to provide quality staff-development workshops.
- Invite representatives from technology companies, universities, and the media to discuss emerging technologies.
- Celebrate your successes.

Chapter 17

Realizing the Vision

All of our students deserve well-trained teachers, Internet access, and appropriate educational technology in order to help them learn, to help them get to college, and to help them succeed in 21st-century jobs. This will probably require a greater investment of public funds and an even greater effort from private industry.

—U.S. Secretary of Education Richard C. Riley, September 2000

Leading the Charge

In 1996, the President and Congress established the goal of connecting every classroom in the nation to the Internet. A September 2000 study shows that the 1996 E-Rate program, which has helped to fund that goal, distributed nearly \$4 billion in its first two years, with that money going to help connect 13,000 school districts and 70,000 public schools to the Internet.⁴

In addition, the Federal Communications Commission created the Universal Service Fund to subsidize Internet access for schools. The \$2.25 billion annual fund, financed by telecommunications companies, provides discounts on telecommunications services for schools and libraries. And the Technology Literacy Challenge provides additional technology grants to state education agencies and local school districts.

Never before has there been such a financial commitment to digital technology at the federal, state, and local levels. The challenge now is for communities, schools, and families to work together to achieve a Connected Learning Community and to reach the national technology goals.

Doing Your Part

By planning and implementing a comprehensive technology program in your school or district, you are taking the first step on the journey toward realizing the Connected Learning Community.

Throughout *Technology Roadmap*, we have attempted to provide you with practical advice in the two domains we believe are key to the success of the integration of technology and education—technical understanding and leadership. It is our hope you will use the information and strategies provided to pave the road to achieving your community's education goals. Reaching that destination will happen only through adequate planning, vision, professional development, evaluation measures, and new institutional structures.

Microsoft's Part

Over the past 20 years, the keys to Microsoft's success have been developing great software, promoting innovation, listening to what people want, and taking a long-term approach. To fulfill our vision for the use of technology in education, we pledge to use those same priorities in helping to build the Connected Learning Community.

For information about Windows family products, see <http://microsoft.com/education/product/windows.asp>.

For Microsoft Office, see <http://microsoft.com/education/product/office/asp>.

For server products, see <http://microsoft.com/education/product/backoffice/asp>.

Ongoing development. First and foremost, Microsoft is focused on creating excellent software. We are researching and developing operating systems and platforms for voice recognition, interactive television, and on-demand video access that will help connect the education community. We'll continue to build great systems software introduce new products designed to make it easier for schools to implement networks, establish electronic mail connections, and use the Internet.

To learn more about Microsoft Encarta encyclopedia, see <http://encarta.msn.com/>.

⁴ <http://www.ed.gov/Speeches/09-2000/000911.html>

To learn about The Magic School Bus, see <http://www.microsoft.com/kids/msb/>.

We'll also continue to create content-rich educational multimedia products—such as Microsoft Encarta® multimedia encyclopedia and Scholastic's The Magic School Bus™ series—with teacher guides to help integrate technology in the classroom, and to put those guides and more on the Internet so that teachers can easily use them.

For information on the Global SchoolHouse, see <http://www.gsh.org>.

Fostering industry partnerships. At Microsoft, we are committed to working with industry partners to help build the Connected Learning Community. We are working with independent solution providers, telecommunication companies, and hardware manufacturers to help create the solutions that schools need. With the Global SchoolHouse we are sponsoring the development and organization of educational resources on the Internet.

Microsoft K–12 Connection can be found at <http://www.microsoft.com/education/schools/signup.asp>.

Microsoft TechNet for Education can be found at <http://www.microsoft.com/education/technet>

Leading the way. Microsoft is making a company-wide commitment and challenging our marketing, manufacturing, sales, and support organizations to speed the development of the Connected Learning Community. We have increased the educational expertise in our field offices, established new toll-free information lines, and created the *Microsoft K–12 Connection* Web site to provide information about new software solutions and innovative practices. The Microsoft TechNet for Education Web site offers new technical white papers and case studies each month on the use of technology in education.

We're moving rapidly toward the day when the Connected Learning Community can be realized. Microsoft is committed to leading the way and doing all we can to make it happen. With the cooperation of businesses, educators, families, and the community as a whole, we can turn the Connected Learning Community from vision to reality and give our children the educational opportunities they'll need to succeed in the 21st century.

The Road Ahead

It is difficult to foresee the full impact technology will have on our lives—and those of our children—in the years to come. With vast amounts of information at their fingertips, our young people are changing the way they learn, and in the process, changing the world. In a world where access to information is universal and learning is not bound by the constraints of time or place, how will our concept of learning and schools change? How well will the technology revolution go? Will it be good for everybody? Will we achieve technology's promise for learning? The answers to those and many other questions will come only with time. However, each of us has a part in shaping this future. As Vice President Gore said, technology is the language of the new millennium, and it is up to us to develop and master this language together.

About the Authors

Joan Kuperstein is president and founder of C.A.S.T.L.E. Technology Consultants, Inc., which provides K–12 schools with leadership and technical expertise in the planning and implementation of education technology programs.

Prior to founding C.A.S.T.L.E., she served as an elementary school teacher, magnet lead teacher, curriculum specialist, grant writer, technology coordinator, and mathematics, science, and technology district consultant. As a result of her diverse experience, she brings to *Technology Roadmap* a strong practical knowledge of what works in the classroom and a unique first-hand understanding of the needs of schools in implementing technology-based programs.

Mrs. Kuperstein was a speaker at Microsoft's 1997 Education Summit and frequently contributes to *Microsoft K–12 Connection*. She can be reached at joan@castletechnology.com or through the C.A.S.T.L.E. Web site at <http://www.castletechnology.com>.

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Appendix A

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K-12 Connected Learning Community Technology Roadmap
Microsoft Corporation
One Microsoft Way
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Fax: (425) 936-7329

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