

University of California, Berkelev

New Designs for Staffing and Staff Development for Secondary and Postsecondary Education

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Executive Summary

Many secondary and postsecondary schools in the United States are undergoing major changes as they seek improvements in access, responsiveness, performance, and efficiency. The changes include increased integration of subject-matter areas, closer coordination of school- and community-based learning, and improved articulation among educational levels and systems. These changes, in turn, call for new roles and responsibilities for those who staff secondary and postsecondary schools. The purposes of this project were to develop (1) a conceptual framework for the new roles and responsibilities of staff who will lead and support educational change, (2) a list of the competencies needed by staff in their new roles, and (3) recommendations on how the competencies might best be developed in preservice and inservice staff development programs. This development is grounded in the plans and experiences of high schools that have applied New Designs for the Comprehensive High School (NDCHS) and community and/or technical colleges that have applied New Designs for the Two-Year Institution of Higher Education (NDTYI), both previous works of the National Center for Research in Vocational Education (NCRVE), as well as a broader review of research and best practices in staffing and staff development in high schools and community / technical colleges across the country.

The method of study included several activities relating to both staffing and staff development: (1) a review and revision of the recommended design features of high schools and colleges originally proposed in NDCHS (Copa, Beck, & Pease, 1992) and NDTYI (Copa & Ammentorp, 1997), (2) a review of research and best practices for staffing and staff development for high schools and community / technical colleges, and (3) a conference / workshop of researchers and practitioners with expertise in staffing and staff development for high schools and community / technical colleges.

Recommendations were made to improve professional practices in schools and colleges, policies guiding staffing and staff development, and further research on this topic. The recommendations include (1) broadening the traditional meaning of staff to add others who contribute in significant ways to the learning experience (e.g., students, family, and mentors); (2) expanding the framework for needed competencies beyond teaching by adding competence in leading, partnering, counseling, designing, and learning; (3) recognizing the importance of staff development for all categories of staff and all areas of competence to achieving successful educational reform; and (4) envisioning learning environments that lead to effective and efficient development of the competencies required of all staff to facilitate educational improvement in high schools and community / technical colleges.

This project was part of a two-part project funded by the NCRVE on "Redesigning Education of Instructional Staff for High Schools and Community Colleges."

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Introduction

Across the United States, major educational changes are being implemented to improve the effectiveness of K-12 and postsecondary schools. These innovations include the integration of curriculum areas (i.e., academic and vocational), the coordination of school- and community-based learning (i.e., school-to-work, service learning), and the articulation of learning experiences among educational levels and systems (i.e., secondary to postsecondary). The purpose of this project was to develop (1) a conceptual framework for the new role of staff at institutions in which these changes are taking place, (2) a list of the competencies needed by staff in their new roles, and (3) recommendations on how the competencies might be developed in preservice and inservice staff development programs. For our purposes, staff includes teachers, off-site mentors, counselors, and administrators. The framework is grounded in the development and applications of New Designs for the Comprehensive High School (NDCHS) (Copa, Beck, & Pease, 1992) (this publication has an extensive bibliography on staffing and staff development for K-12 schools) and New Designs for the Two-Year Institution of Higher Education (NDTYI) (Copa & Ammentorp, 1997) (this publication has an extensive bibliography on staffing and staff development for postsecondary institutions). The project expands and extends the development of design specifications for the staffing and the staff development process in new or transformed schools and colleges.

New Designs for Learning

A major premise of this project is that the design specifications for staffing and staff development need to be consistent and aligned with the design specifications for the following elements of the design-down process developed and applied in NDCHS and NDTYI:

 Learning Context. What are the unique assets, problems, opportunities, and aspirations of the school or college under consideration? In general, assets are the features of the school or college that are working and should be preserved in the new design; problems are features that are not working and need to be fixed; opportunities are features that cannot be taken advantage of at the institution as it is currently operating; and aspirations are the hopes and dreams of the school or college.

Assets might include cooperative faculty-student relationships, strong parental support, or existing school or college facilities. Problems might involve lack of success among certain groups of students, little feeling of community among students and staff, or isolation of the various school

or college departments. Opportunities could include developing partnerships with the community or other educational institutions, taking advantage of new learning technology, or planning an entirely new school or college facility. Aspirations might include formulating new high school or college graduation requirements in the form of learning expectations, increasing the availability of equitable and culturally sensitive learning opportunities, or contextualizing learning by relating it more closely to real-life applications.

The product of the learning context element of the design process is usually in the form of a set of design criteria, which serves to guide and monitor the remaining elements of the design process.

- Learning Audience. Whom is the school or college to serve? Traditionally, high schools serve only school-age youth and colleges are planned for 19- to 22-year-olds. Today's new schools and colleges need to serve a broader group—from early childhood through adults. A clear understanding of the potential audience for the educational institution and all its needs is essential in the design of the institution's organization, staffing, partnerships, technology, and facilities.
- Learning Signature. What is to be special and unique about the school or college under design? While most school or college planning processes consider mission, vision, values, and logo, these components are rarely linked together into a compelling and meaningful signature for the educational institution. The literature on and experience with effective schools and colleges concludes that a special focus provides coherence, consistency, and spirit to the school or college and thereby adds to the quality of the learning experience and accomplishments. If the learning signature is real and meaningful, one should be able to ask anyone involved in the institution—teacher, student, trustee, custodian, or secretary—what is special about the school or college and get the same basic answer.

Usually, design groups are asked to develop a symbol, picture, phrase, story, or object that embodies what will be special about the new school or college. A shared signature for the institution is collectively developed from personal signatures through a process of sharing, reflection, compromise, and consensus seeking. For example, the learning signature for a New Designs school that was focused on environmental studies was a "living wall" made up of plants. A "social gathering place" became the learning signature for a new K-12 school involving a partnership of nine districts that used the downtown of a major city as a learning setting. "Education for employment and a lifetime of learning" was selected as

the signature for orienting a technical college to its next 25 years of operation.

- Learning Expectations. What is the school or college promising in terms of learning results or outcomes? Educational institutions have used a variety of terms to address the competencies students will need to demonstrate upon high school or college completion: outcomes, results, goals, standards, and essential learning. Learning expectations represent the students' accomplishments promised by the school or college in exchange for the students' and public's investment in the learning process.
- Learning Process. How shall learning projects be identified and designed to result in the desired learning products that demonstrate that the learning expectations have been achieved? In place of traditional curricular and instructional approaches and structures, the learning projects naturally and strategically link assessment, curriculum, and instruction—assessment is continuous, curriculum is interdisciplinary, and instruction is more "construction," as learners are active participants building their own personal knowledge. This strategy necessarily and naturally integrates subject-matter areas and both values and closely coordinates learning inside the school and in the community. In addition, learning is viewed as a continuous process requiring seamless transitions all through early childhood and youth—preschool, elementary school, middle school, high school, and postsecondary.
- Learning Organization. How shall the time schedule, learners, staff, learning process, decisionmaking, technology, and learning settings be organized to best support the learning process? Learning organization specifications can include the following types of statements: (1) organize learning time to provide just-in-time flexibility to the learning process, (2) organize staff to encourage integration of subject-matter areas, (3) organize learners to support individual and cooperative group learning, and (4) organize learning settings to closely link school-based and community-based learning.
- Learning Partnerships. Who needs to be involved in making the learning organization and learning process work in order to reach the learning expectations? Many partners, both internal and external, may be needed. What are the desired characteristics of the partners? What resources and services might be shared? The sharing of resources is a two-way process in which resources and services flow in both directions between the educational institution and the external partners.

Schools and colleges are encouraged to form a network of strategic alliances, both formal and informal, long term and short term. Partners must be given recognition and a voice in the learning experience. Examples of significant learning partnerships include (1) jointly scheduling and maintaining a school auditorium with community organizations and agencies; (2) locating a school on the grounds of a state agency, with shared staffing, learning settings, and heating/cooling services; (3) contracting out the food service to community businesses that are expected to provide work-based learning opportunities for students; and (4) sharing college facilities with businesses for training purposes during afternoons, evenings, and weekends.

- Learning Environment. How will technology, equipment, and facilities be structured to facilitate learning? The learning environment extends well beyond the school or campus buildings to include all of the learning settings used by learners (e.g., workplace, home, public library, community). Smaller learning environments placed strategically around the community optimize use of partnerships. The close blending of school or college and community ensures that learning is rigorous and relevant. Designing a supportive learning environment begins with a detailed review of the learning process, organization, and partnerships.
- Learning Celebration. How are the changes in learning and the operation of schools and colleges being recommended by New Designs to be communicated and reinforced? Annual graduation ceremonies, quarterly competitive grades, and sport trophies may not be aligned with learning expectations that focus on preparing students for lifelong learning. Learning celebrations should reinforce the design specifications for all elements of the design process, particularly the learning expectations and learning signature. Learning celebrations might include displays of student learning products throughout the educational organization and in many places in the community, closed-circuit television screens around the school or college showing the names and contributions of all the learning partnerships working on a given day, and teams of students being recognized by community-based organizations for their solutions to important community problems.
- Learning Finance. What are the costs and revenues associated with building and operating a new or restructured school or college? Achieving the goal of bringing the New Designs school or college into place and operating it at no higher cost than for an average existing institution may require trade-offs among technology, staffing, and partnerships. New sources of revenue may be sought for the institution as a partner in the social and economic development of a community.

Working on the learning finance element has led to developing a new financial portfolio for the institution and a plan for obtaining community and political support.

• Learning Accountability. Who is responsible for implementing the recommendations and honoring the commitments of an educational institution's stakeholders as set forth in the new designs? When and how will there be a reporting back on how the implementation is progressing?

The project drew heavily from the experiences of K-12 and postsecondary schools that have applied either the NDCHS or NDTYI design process to the transformation and rejuvenation of their institutions.

Major Activities

The method of study included the following activities: (1) review and revise design specifications for learning context, learning audience, learning signature, learning process, learning organization, and learning partnership elements in the New Designs process based on applications, scanning of latest research, and review of best practices; (2) review research and best practices in staffing and staff development for K-12 and postsecondary education; (3) review and revise design specifications for learning staff based on previous steps and experiences at NDCHS and NDTYI application sites and other sources of information noted previously; (4) review and revise design specifications for staff development (preservice and inservice) based on previous steps and experiences at NDCHS and NDTYI application sites and other sources of information noted previously; (5) draw implications (i.e., conceptual framework, learning expectations, learning process and organization) for vendors of staff development (preservice and inservice) for K-12 and postsecondary education. During the project, we interviewed key individuals, met with groups at NDCHS and NDTYI application sites, and consulted with experts in staffing and staff development for schools.

Linkage to Overall Project

The project was one part of a two-part project directed by the NCRVE to address the redesign of staff development for high schools and community colleges in light of the demands of educational reform. One part of the overall project was to continue and strategically expand (adding attention to the community college setting) the work of selected universities in the NCRVE consortium in redesigning their preservice teacher education programs. This part of the project is described in another published report, *Reforming Preservice Preparation Programs for Secondary and Postsecondary*

Instructors (MDS-1301). The second part of the project, which is the focus of this report, was to develop a conceptual framework to give greater coherence and depth to the redesign of staff development programs. The two parts were linked to keep each other informed and to enhance their mutual contribution to the field.

Part one of the overall project focused on continuing the development of the redesign of preservice teacher education programs for high school teachers at two of the NCRVE consortium universities—University of California, Berkeley and Virginia Polytechnic and State University (Virginia Tech). In addition, the redesign of teacher education programs for community colleges was initiated at the University of Illinois, Champaign-Urbana. During 1999, attention was focused on implementing redesign efforts, describing processes and results, and synthesizing lessons learned for use in other sites contemplating the redesign of teacher education.

The two parts of the project fed into each other to their mutual benefit. Part one provided insights into and lessons on the challenges and opportunities involved in the redesign of an important segment of staff development for high schools and community colleges—the preservice teacher education program. This part of the project was grounded in the context and realities of present staff development structures, organization, processes, and policies. At the same time, part two of the project supplied insights and lessons from new and significantly advanced designs for the operation of high schools and community colleges. Part two looked to the future—that staffing and staff development needed to break away from traditional ways of operating high schools and community colleges. Together, the two parts of the project provide a sense of vision, a grasp of present reality, and constructive ways to confront and reduce the creative tension between the two in the preparation of instructional staff.

Design Features for New Designs Institutions

In *New Designs for Learning* (Copa, 1999), the desired features of educational institutions are projected as a set of design specifications for the elements of learning discussed in the introduction. Because this project focused on staffing and staff development, the design specifications for the elements except Learning Staff and Staff Development were updated first. This project then responded to the following two questions:

- 1. Given the updated design specifications for the other design elements, what should be the design features for the learning staff? In particular, who are the staff?, what competencies should the staff possess?, and what conceptual framework describes and communicates the staff competencies?
- 2. Given the design specifications for the other elements and for the learning staff (in response to Question #1), what should be the design features of the professional development for staff? That is, what should be the content of the staff development, and how should the staff development be provided?

We first list the design specifications for each of the design elements in New Designs for Learning based on the initial research and development (Copa & Ammentorp, 1997; Copa et al., 1992) and subsequent applications of the New Designs process in K-12 and postsecondary educational institutions in a wide variety of settings. Because the design specifications were very similar for high schools and community / technical colleges, they were combined to form one set of specifications for each element. We then present the form of the design specifications for learning staff and staff development. The major objective of this project was to improve and extend these design specifications for learning staff and staff development in order to better guide staffing and staff development for high schools and community / technical colleges who were applying the recommendations of New Designs for Learning.

Design Features for Elements Other Than Staffing and Staff Development

The draft design specifications for each of the elements of New Designs for Learning, except for learning staff and staff development, are presented here because they define the work of the staff and, thus, subsequent staff development.

Learning Context

- Responds to learners by increasing focus on their needs and their success as learners
- Searches for synergy and connectiveness by increasing and developing new forms of partnerships and collaboration with families, business and industry, labor, education, and community-based organizations
- Builds shared vision by developing clear and focused direction that is deeply shared by stakeholders
- Enhances public perception and credibility by creating and maintaining a more positive public image
- Encourages pride and joy in the learning experience on the part of staff and learners
- Enhances global perspective by embedding learning in an international context
- Works with the community to plan and operate the learning experiences
- Pays attention to the challenges and opportunities of personal, work, community, and family life
- Is a component of and promotes lifelong learning
- Is up-to-date and vibrant in response to an ever-changing context
- Increases and enhances use of learning technology
- Improves accountability
- Finds the resources needed for the educational institution to be effective
- Is cost-effective and sustainable

Learning Signature

- Aligns with the learning context and reinforces the design criteria
- Confirms a worthy identity for the institution that is morally and intellectually justifiable
- Creates an accurate image of the institution in terms of its true aims, operation, and accountability
- Provides a unique character that highlights the distinctiveness of the institution and distinguishes it from other institutions
- Gives focus and coherence to all components of the institution to unite all elements of the institution in a common purpose
- Communicates powerfully the promise of the institution
- Includes and affirms all learners (e.g., young and old, female and male, poor and rich, and all ethnic backgrounds)
- Develops a common understanding of the institution by all stakeholders, including students, staff, and the wider community
- Promotes a sense of shared ownership by all institutional staff, students, and supporters
- Is an integral and visible part of the operation of the institution

Learning Expectations

- Align with the learning context and signature
- Survive challenges from key internal and external stakeholders for the educational institution and are supported by students, staff, and the wider community
- Focus on all customers of the educational institution
- Address key roles and responsibilities of personal, work, family, and community life
- Represent balanced attention to all areas of human talent and development—vocational, cognitive, aesthetic, and social
- Communicate clearly and concisely the results or standards expected of and promised to learners
- Direct attention toward meeting the changing context and challenges of work, family, and community life as we enter the 21st century
- Prepare learners to be active agents of change in order to improve the future quality of life in our society
- Reach for the highest and most rigorous benchmarks of what it means to be an educated person, even beyond what is easily measured
- Represent goals for all learners regardless of age, gender, socioeconomic status, and ethnicity and culture
- Contribute to lifelong learning by enhancing competence to continue to learn, integrating new learning with past learning, and planning and encouraging further learning

Learning Process

- Aligns with the learning context, signature, and expectations (the design specifications for previous design elements)
- Results in learning products that are valued by the wider community
- Links to internal and external standards (e.g., skills needed to continue learning at other educational institutions and occupational skill standards)
- Applies continuous and multiple forms of assessment and feedback to improve learning
- Is tailored to the unique situation and experiences of each learner, with the learner at the center of the planning process
- Provides multiple pathways to reach learning outcomes
- Builds the self-esteem of each learner
- Is managed by learners in consultation with learning staff as mentors, facilitators, and role models
- Employs collaborative (small group or team) learning in problem solving
- Builds a close and caring relationship among learners
- Engages the learner in inquiry (research) and knowledge construction for inclusion in a portfolio of accomplishments
- Excites and energizes the learner

- Stimulates personal responsibility for learning by teaching and encouraging students to plan and manage their learning experiences
- Links to global information networks (e.g., Internet)
- Is guided by experienced navigators who are very familiar with using information networks
- Uses real projects drawn from the needs of the community as a context and content for learning
- Integrates curriculum, instruction, and assessment to form a more holistic learning experience
- Integrates the subject-matter disciplines and professional fields of study by bringing together contributions of various disciplines and fields of study in learning experiences
- Includes learning and teaching in multiple settings within and outside the educational institution
- Integrates effective application of learning technology to enhance learning

Learning Organization

- Aligns with the design specifications for the previous design elements
- Personalizes learning by involving the learner in the planning process, assessing the prior experiences the learner brings to the learning process, and building on this assessment in planning subsequent learning experiences and support services
- Supports the formation of strong learning communities by providing opportunities to work in teams and to learn informally
- Supports integration of general and technical subject-matter areas and collaboration between the institution and the community by breaking down separations between general and technical subject matter, institution and community, formal and informal learning, and local and global perspectives to form a coherent learning experience
- Supports flexibility in time organization (e.g., just-in-time, variable-schedule, and learning in breadth and depth) essential for learners to engage in more experiential, project-based (constructivist) learning focused on producing products valued by the community
- Builds staff organization that supports becoming very knowledgeable about learners, building strong learning communities, using the community as a learning context, and integrating subject matter
- Provides to all learners ready access to information and technology so it is decentralized and personalized
- Supports learning in multiple and diverse settings and settings that adapt quickly to the needs of the learning process
- Supports decisionmaking by those most affected by consequences of the decision by keeping learners, staff, and other stakeholders informed

- about and involved in resolving issues and concerns affecting them and the institution
- Supports continuous institutional responsiveness to the needs of society, the local community, and learners to ensure the institution's vitality and to nurture quality learning experiences

Learning Partnerships

- Align with and reinforce the design specifications for previous elements
- Include a broad set of internal partners (e.g., students, staff) and external partners (e.g., business and industry—both large and small, organized labor, government, families, religious organizations, other educational institutions, alumni, foundations, professional associations, special-interest groups, and community-based organizations) to provide diversity in functions, program areas, locations, and cultures
- Enrich the learning experience by providing authentic opportunities to integrate subject-matter areas; enabling access to up-to-date technology; developing relationships with future coworkers; opening up new sources of knowledge; and smoothing the transition from education to work, family, and community life
- Provide and, in turn, benefit from synergy developed through the partnership activities
- Involve all stakeholders and take assertive action to ensure representation across age, gender, socioeconomic, geographic, and cultural categories
- Bridge cultures by developing an understanding of the values, policies, and practices of all partners and ways they can work together effectively
- Leverage resources to achieve greater results
- Provide many ways of contributing to the learning experience such as sharing risk, communicating standards, teaching and mentoring, providing support services (e.g., childcare, transportation, subsidized income, or tutoring), donating equipment, and giving scholarships
- Build a supporting infrastructure by opening up opportunities for clear communication, establishing trust, involving all staff, setting clear expectations, respecting boundaries, providing ongoing training on partnerships, removing policies and practices that act as disincentives for partnerships, engaging in continuous quality improvement of partnerships, encouraging both formal and informal agreements, and ending partnerships graciously
- Reflect the dynamics of the entire community with local, state, national, and international dimensions

Learning Environment (Technology)

- Aligns with the design specifications for previous design elements
- Includes all forms of technology that enhance learning (e.g., computers, multimedia, tools, and models)

- Covers all applications of technology to the learning experience (e.g., teaching and learning, management and administration, accounting, recordkeeping, climate control, and scheduling)
- Is integrated into the learning experience as a natural part of the experience
- Provides bases to learn future technology by enhancing the competence of learners to adapt to and use new, emerging, and continuously changing forms of technology
- Facilitates access to learning resources in terms of cost, location, time, prior learning, and learning style
- Is user-friendly and easy to use for the purposes intended
- Includes training, technical assistance, and maintenance of equipment and software
- Is up-to-date and easily updated and expanded to keep current with standards in the workplace and community
- Provides immediate high-quality feedback to learners and staff on progress of learning
- Is personalized and distributed according to the needs of each learner
- Connects learning to authentic applications in work and community settings and supports the production of knowledge, products, and services
- Supports active, interdisciplinary learning
- Enhances both individual learning and small- and large-group learning
- Encourages creativity, imagination, and innovation in learning experiences and expectations
- Enhances connectivity in learning experiences by linking learning experiences in the past, present, and future and inside and outside the educational institution
- Develops responsible use of technology from both legal and ethical perspectives
- Is cost-effective in adding value to the learning experience beyond its costs

Learning Environment (Facilities)

- Aligns with the design specifications for previous design elements
- Includes multiple settings that can support the desired learning experiences
- Dissolves borders between learning settings
- Develops a coherent yet flexible network of learning settings for effective learning experiences
- Adapts quickly to accommodate a variety of learning experiences (multipurpose) in the same space and time
- Promotes a sense of learner identity sometimes associated with place but increasingly linked with the learning signature and with what is learned and how it is done

- Enhances social interaction and a feeling of community among learners and staff
- Responds to differences in learners' age, socioeconomic status, cultural background, prior learning experiences, full-time versus part-time status, and learning style
- Supports use of learning technology by providing ready access to technology to support learning
- Provides settings conducive to development of both general and specialized competence in order to reach learning outcomes
- Encourages informal learning and the interaction and mutual benefits of informal and formal learning
- Includes places for staff development in ways that model learning experiences that staff are being encouraged to deliver
- Enables and provides for continuous renovation and change in order to stay up-to-date in a changing context

Learning Celebration

- Aligns with the design specifications of previous design elements to form a meaningful and coherent whole
- Recognizes and lauds growth in and lifelong learning for all learners
- Attends to all areas of talent and human potential and recognizes multiple ways to contribute to community
- Emanates from, as well as creates, learning cultures that lead to growth and renewal in the educational institution in ways that connect the past, present, and future
- Completes the design cycle and connects back to learning context and learning signature to form a continuous, coherent, and self-improving loop
- Strengthens and builds commitments and engagements with the learning experience by a diversity of learners
- Generates pride and satisfaction in the learning experience
- Connects and publicly recognizes all participants in the learning experience (e.g., students, staff, partners, and stakeholders) whether within the institution's community or in the larger community surrounding it
- Integrates and is integrated within the learning experience so that celebration becomes an automatic, spontaneous, organic part of the whole learning experience
- Makes use of technology to enhance its effectiveness
- Includes constant display of learning projects and products
- Recognizes external standards and benchmarks
- Occurs frequently and continuously

Learning Finance

- Aligns with the design specifications for previous design elements
- Aggressively seeks resources from a wide variety of sources through effective marketing, student retention, grants and contracts, foundations, sales of product and service, leasing as well as buying, and holding joint ownership
- Integrates local, state, national, and international goals, planning, and resources to enhance flexibility in use of resources
- Communicates openly regarding key financial information and the process of resource allocation to involve all stakeholders in the educational institution (e.g., staff, students, partners, families, and community)
- Links risk, responsibility, performance, and reward by ensuring constant and early accountability, closely relating performance to rewards, and encouraging entrepreneurship and innovation
- Supports reengineering and innovative actions by encouraging flexibility, autonomy, process documentation, and courage to experiment with and redesign institutional processes
- Uses partnerships as a standard way of doing business to control costs and enhance revenues
- Allocates resources based on value-added to ensure the most efficient use of resources in terms of learning outcomes
- Stabilizes funding patterns to provide a continuous and dependable flow of resources with both a short- and long-term view

Design Features for Staffing and Staff Development

In view of the preceding design specifications for other elements of New Designs for Learning, the following design specifications for learning staff and staff development were derived from the original work on NDCHS and NDTYI and subsequent applications to high schools and colleges.

Learning Staff

- Align with the design specifications for all previous design elements
- Include all those who contribute to the learning experience, including
 those typically employed by the educational institution (e.g., full- and
 part-time teachers, administrators, student services providers, office
 workers, custodial workers, paraprofessionals, and aides), volunteers,
 mentors, families, and students
- Individually and collectively model the learning expectations held for students
- Demonstrate competence in their specialized areas of work

- Ensure that each learner is known and served well by providing the "wrap-around" support (e.g., academic, social, psychological, and physical) needed by each learner
- Manage constructivist learning that produces learning products valued by the learner and the wider community, involves extensive project-based learning, integrates subject-matter areas, and uses and closely connects community-based learning with school-based learning
- Handle just-in-time learning design and execution of learning experiences that are very responsive to the needs of learners and the context in which learning is taking place
- Build learning communities by using teamwork, understanding and valuing diversity, establishing trust, balancing freedom and responsibility, and being supportive
- Find, develop, and maintain partnerships with others inside and outside the educational institution to enhance the learning experience
- Take an entrepreneurial stance to seek opportunities and resolve problems in creative and innovative ways
- Commit to the value of diversity and operate effectively with a diversity of learners and partners
- Operate as information navigators and give priority to developing competence in using information systems
- Are skilled in integrating the educational functions of learning, research, and service to enhance the learning experience and contributions to community
- Apply continuous quality improvement processes to the learning experience with expectations of excellence that are constantly updated, performance that is continually assessed, and rewards and recognition that are closely linked to meeting expectations
- Continue to learn, recognize the value of lifelong learning for all staff, view lifelong learning as a shared responsibility of individual and institution, provide renewal opportunities in multiple formats, and commit resources (e.g., time, substitutes, and space) for staff development

Learning Staff Development

- · Aligns with the design specifications for all other design elements
- Models the design specifications for staff by demonstrating the knowledge and skills expected of the learning staff
- Includes all staff by addressing the educational needs of all those making a contribution to the learning experience
- Is closely coordinated with the needs and plans of the educational institution and is accessible when and where needed
- Promotes sharing of good practices among learning staff
- Involves staff and students in identifying needs, planning learning experiences, and assessing results

- Is ongoing and continuous, with needed follow-up to support improvements in practice
- Keeps abreast of best practices and the latest research
- Includes best use of a variety of education and training resources
- Provides incentives for learning and is aligned with performance and reward systems for staff

The preceding list of design specifications served as the basis for the following project activities.

Review of Research and Best Practice

The second major activity in this project was to review the research and best practices in staffing and staff development in exemplary secondary schools and two-year institutions of higher education. To accomplish this activity, two papers were commissioned: one focusing on high schools, the other on community/technical colleges. An *exemplary school* is defined as one that has several of the design specifications developed in the NDCHS and NDTYI projects.

The individuals who were commissioned to prepare the review and synthesis papers were selected because they (1) are directly involved in staffing and staff development in exemplary learning organizations and (2) have a working knowledge of the research and best practices in staffing and staff development in exemplary learning organizations. The individuals selected were Dr. Burton Cohen and Mr. Peter Hilts, School of Environmental Studies, Apple Valley, Minnesota, for high schools, and Ms. Marie Nock, Miami-Dade Community College, Miami, Florida, for community/technical colleges.

The task assigned to these individuals was not to review all of the literature on staffing and staff development. Rather, they were asked to focus on three questions: (1) What other competencies should be considered for staff? (e.g., what are the existing and emerging frameworks for staff characteristics and competence? How do they compare with the design specifications for staff developed through New Designs for Learning? What might be added to the design specifications for staffing in New Designs for Learning?), (2) What subcompetencies would lead to competence in each of the staffing design specifications (and any additions) recommended by New Designs for Learning?, and (3) How are these competencies and subcompetencies best developed (the staff development process)? Staffing was interpreted broadly to include all of the participants involved in the learning process (e.g., teachers, counselors, administrators, support staff, parents, partners [as, for example, mentors], and other students). The commissioned papers are presented below.

Staffing and Staff Development in Exemplary High Schools¹

Optimal professional development programming, opportunities, and expectations are among the key factors determining success in a New

¹This section was prepared as a commissioned paper by Burton Cohen and Peter Hilts, School of Environmental Studies, Apple Valley, Minnesota. The paper has been edited by the project staff.

Designs school. The following are the four critical characteristics of an optimal professional development program:

- 1. Coherency and alignment with the vision, mission, and principles of the organization
- 2. Authenticity of the learning and its applications
- 3. Collaboration among all stakeholders
- 4. Use of research that respects the interactivity of known results and the ongoing research in the New Designs school

Coherency and Alignment with the Vision, Mission, and Principles of the Organization

Professional development exists to support a coherent vision of the comprehensive high school. As the vision of a school informs the operations of the school, so the professional development programming helps build optimal performance of all individuals to reach that vision. A tightly designed professional development program functions as a support system that builds professional capacity throughout the organization. As clearly stated in the New Designs context descriptors, learning context requires the development of a clear and focused direction that is deeply shared by all stakeholders. The learning context that supports this process is a coherent professional development program.

As part of the visioning process, principles of purpose or beliefs are designed to enable effective work within the organization. Appropriate professional development is grounded in these principles of purpose. Guided by these statements of working relationships, the professional development programming embeds the contexts and culture of the organization and, therefore, respects the individuals participating in the learning activities. These principles of purpose also mirror the work experiences and relationships within the organization, making it easier for learning to become a part of daily practice. The principles of purpose in a New Designs school pay close attention to aligning with all other design specifications. In this way, they support a coherent learning program in the professional development experience. They also focus on how those experiences are applied in the school's desired best practices.

The long and rich history of research on professional development, combined with innovative practice, informs continued professional learning and applications. As the New Designs elements speak to learning in a variety of ways, so must the professional programming. The traditional "sit and get" and "one-shot" approaches should give way to a more balanced approach in which participants actively apply perspectives through action research or other appropriate methodologies. The combination of research and best practices, especially the best practices of the local site, demands more depth and breadth of ideas and methodologies.

The rigor of accepted research designs has helped establish the standards for research practice. In the same context of rigor, professional development applies meaningful standards in a variety of ways. There certainly are learning standards based on building the skill capacity and content knowledge of the participant. Learning standards need to be clearly defined and stated to bring a coherence and focus to professional learning as well as to develop a vocabulary necessary for optimal functioning within the school. There are also applied performance standards that frame learning in terms of its authenticity and applicability for the school and for the individuals participating and are based on visible, connected, and meaningful performances. A New Designs school is filled with exemplars of staff demonstrating their knowledge and skills. The professional dialog is embraced and expected as a result of the learning. Rubrics, checklists, and samples of applied learning are available for sharing, redesign, and application.

As the New Designs elements consider the total coherency of the learning experience, the professional opportunities must provide connected experiences that model this design concept for the comprehensive high school. The overall attention to accomplishing the vision focuses on professional development experiences that are able to visibly connect the essential pieces of daily operations with desired futures.

In its planning and delivery, optimal professional development includes links between new learning and opportunities for application in daily practices. It avoids events and prefers ongoing processes. Individuals learn best by engaging with the ideas and concepts, seeing models in operation when available, and then using them on-site. This enables the participant to clarify the concepts, observe multiple approaches to application, and then internalize the strengths and realize the limitations. The underlying idea is to develop the appropriate expertise for best practice application.

Evaluation completes the learning cycle of conceptual learning, modeling, and application. Everyone involved in learning is capable of evaluating and, in turn, is responsible for evaluating the application of learning in daily practice. The title "New Designs" implies attitudes and practices that challenge current thought and previous learning. Individuals and organizations must constantly assess practice to be sure that a best practice is, in fact, a best practice. While people rely on past experiences, past and new knowledge, and current experiences, they also need to recognize intuition as an assessment tool. A coherent professional development program for a New Designs school has a solid evaluation component that considers the individual, the school, the larger organization, the professional development program itself, and external communities as appropriate.

In supporting coherent learning experiences and a coherent organization, the professional development program establishes the value of process

conventions as practical models. The approaches to learning in a constructivist framework, the way resources are accessed and combined, the connectivity of the professional development curriculum, the evaluation process, the best practices, the program design process, the collaborative atmosphere of the work, the use of technology, and the constant attention to consciously align with the vision are but a few of the ways in which a New Designs professional development program demonstrates and focuses its conventions and models toward coherence. It is essential that every portion of professional learning be connected in meaningful ways for each individual and for the organization. What people see and experience is usually what they will bring to their own practice. New Designs professionals draw from internal and external environments by effectively integrating their learning into the roles and responsibilities they accept. Optimal professional development programs provide the framework and the infrastructure processes to make this happen in a coherent context.

The optimal professional development program supports a consistently positive school climate for learning. This applies to all facets of the school's operation: the conscious attention to how people feel about their "place" within the school, the welcoming attitudes of all involved, the personal civility shared in relationships, and the freedom to take calculated risks within the areas of responsibility in the organization. It is imperative that the professional development program design, apply, and model through application of its own curriculum. Alertness to a positive school climate and learning context helps build pride and joy in everyone's learning experience, a design element for a New Designs school.

Authenticity of the Learning and Its Applications

The professional development program must aim for a high degree of authenticity. Optimal professional development programs build authenticity into all learning by connecting professional learning to work settings and experiences. This requires a sophisticated familiarity with the daily responsibilities of all kinds of educators at all levels. Without that familiarity, professional development planners will be unable to include elements that make the new learning highly valued. By building their fluency in the language of daily practice, professional development planners develop the ability to craft programs that feel a part of daily practice, rather than an add-on or artificial experience. Authenticity is as much a feeling of "rightness" on the part of the participants as it is a planning characteristic. We will know that programs are authentic when evaluations of professional development affirm that the new learning can be easily translated to classroom or other work settings.

It is even possible to create a culture of professional development that permeates daily practice. This occurs when every opportunity, formal or casual, planned or spontaneous, is seen as an opportunity to build professional capacity. Since this requires a common vocabulary and mindset on the part of educators, it is important that the professional development leaders intentionally equip educators to connect their insights in practice with new concepts and wisdom.

To be fully authentic, professional development planning must first identify the needs and priorities of individuals and the organization. It is not enough to know what teachers and administrators want and need. This must be balanced by a big-picture sense of what the organization needs. Effective planners, then, are good listeners, readers, and systems analysts. They must first go to the educators who are receiving the training and help them identify the most critical aspects of their daily work. Those tasks, which are central or make up the bulk of the workload, should have top priority. Helping staff accomplish their work more efficiently or with more purpose will create appreciation for the professional development and amplify its effectiveness. In addition to asking educators about their daily practice, professional development planners should look for patterns or repetitive tasks that could be streamlined or unified. This combination of interview and observation will give the clearest picture of what individuals need and what patterns of individual need extend across the organization. This new perception of individual needs must be balanced by a clear understanding of organizational vision, mission, and principles. Within that larger guiding framework, it will be possible to select those initiatives that not only support individuals, but also reinforce the identity and priorities of the organization. If there is a discrepancy between what teachers want and need and the organizational foundation, then professional development planners have identified a systemic problem that must be addressed. If they find harmony, then the planning will serve its dual purpose of supporting individuals while advancing the purposes of the organization.

The interview and observation combination raises the stakes for professional development planners. If they ask members of the organization to engage in the planning process, even at its earliest stages, they are imposing a burden on time and energy. That imposition can breed resentment and resistance if it is not seen as leading to program modification. To be optimal, professional development must respect identified needs and priorities by targeting delivery of professional learning programs to those areas. Only by linking planning to the earlier examination can the organization validate the concerns of individuals. This is also the most natural way to ensure that the learning opportunities will enjoy primary support from the participants. If educators are asked what they need and then are given opportunities to meet those needs, much of the normal criticism about wasted time can be preempted. In addition, the direct improvement in daily practice is much more likely to occur if participants know that the professional learning is designed to equip them to perform

well on critical and substantive daily tasks. It is wise to make this connection explicit by publishing the results of interviews and observations, and then using them as a justification for program choices.

As they begin to design instruction, planners should make certain that professional development instruction models the targeted learning for each program area. The value of modeling comes from the ability of learners to see a comprehensive presentation of the whole. Most of the skills and strategies leading to effective learning are not simple or one-dimensional. By modeling them in a real setting, planners and instructors can make some sense of the complexity. For example, the development of an interdisciplinary assessment is a complex task related to resources, people, schedules, developmental level of students, and so forth. By creating real parameters and designing an actual assessment in real time, the instructors move quickly past abstract theory to practical application. This gives the participants a common reference point, which makes their work together much more meaningful. The skillful instructor of professional development must be an expert in the particular skill or strategy set that is being presented. It is not enough to have text-based examples and research. These must be brought alive through modeling by a skillful presenter.

Because modeling presents a successful application of the target skills and strategies, it will spark confidence and a desire to try it out on the part of the participants. The best way to take advantage of that impulse is to make sure that professional development programs customize curriculum and instruction by using participants' experience to provide products and processes to practice new learning. The practice experience, guided by skillful presenters and coaches, allows individuals to personalize and lock in the new learning. Practice is also a safe environment to identify misunderstandings or ineffective applications before they create problems in the actual work setting. Practice is valuable, but all practice is not equal. Just as the initial presentation models the effective application of a new strategy, the practice must link the new learning to actual work. This is why each participant should be asked, before the learning session, to bring several tasks, lessons, or planning assignments that are amenable to the skill or strategy set that is the current focus. By using actual work as the medium for new learning, the participants immediately see the connection between the professional development opportunity and the work that it is designed to support.

The modeling and initial practice are effective ways to build confidence and competence, but further success in professional development requires the timely application of new learning in the natural professional setting. From observation of a model application, through guided practice, to personal implementation, the sequence of optimal professional development is purposeful and respectful. It assumes that educators want to improve in daily practice and that effective professional development

will equip them to do so. The return from training is where many professional development programs break down. Between training and teaching there is a risk that new learning will evaporate under time and planning pressures. Accomplishing some of the preliminary planning during the professional development session reduces this risk and makes it easy for the participant to make minor adjustments at the work site and to apply the new skills or strategies in an authentic manner. While it is possible for successful implementation to follow a long delay after training, it is much less likely that the participant will be as energized or effective as when the model and the practice are still fresh in his or her mind.

The participants may be concerned about the quality and precision of the implementation in their work settings. Their recognition that their implementation of the strategy was not as efficient or effective as the original model may lead to a lack of confidence and could derail further implementation. To deal with this potential obstacle, optimal professional development provides for on-site observation and feedback from a colleague who has participated in the same session of the professional development program. This not only affirms the concept of professional development as part of daily practice, but also adds a reflective loop to the training that is invaluable as a source of program and personal adjustment. Placing a peer in the observer role shifts the tone from one of evaluation to one of support, especially when a group of colleagues engages in reciprocal observation and discussion. Because the quality of the feedback can make or break the evaluation, effective professional development programs must emphasize the development of basic vocabulary and techniques for giving meaningful feedback. If practiced with an attitude of supportive collegiality, the observation and feedback event can build the participants' confidence while affirming the value of the specific professional development program. Because the observation and feedback event has such high potential to have a positive impact, it makes sense to plan for this event during the initial training. One model on which to build this commitment might be to have small groups of participants plan and contract together to implement and observe within a defined timeframe.

If the observation and feedback event fails, partners will not follow through and resentment will fester. To prevent this from happening, educators must value the application and observation feedback by adjusting implementation based on insights shared by the participant observers. It is helpful if participants use a common set of criteria during the observation and feedback. These criteria, and the vocabulary embedded in them, lend clarity to the adjustment phase and can be provided or developed during the initial learning session. They also provide a consistent language to use when requesting more insight from the program instructors. It is important that the instructors be available to provide follow-up support. This availability may be in the form of a second session, or it may mean access

over communications systems such as voicemail, e-mail, or mail. Because the implementation may be time-constrained, the instructors must be available to respond promptly. This also supports the overall principle that a New Designs school is committed to professional development not as an event, but as a process.

In a New Designs school, professional development planners value the collegial application-observation-feedback process as a practical source of evaluative feedback for the overall professional development program. Because the design is based on an assumption of professional competency rather than deficiency, program assessment must be emphasized as a way to improve service to the end user. The dual beliefs that educators are motivated to build their capacity and that they are capable of doing so lead program planners to make adjustments based on what the participants report. The content of the observation and feedback event should be made fully available to the professional development program planners. They should also solicit insights from participants about how to make the initial training more effective in generating applications in the professional setting. This also completes an organizational cycle by returning to the source of the insight that launched the specific programs to begin with. If programs are designed in response to input from educators, it is sensible and respectful to refine them based on subsequent feedback. This builds support for the programming and enhances the confidence of all stakeholders that professional development programs are supportive of the vision, mission, and principles of the organization.

Collaboration Among All Stakeholders

New Designs schools possess a powerful sense of shared purpose. That purpose is the center of all work, including the collaborative elements of professional development programs. In fact, professional development exemplifies collaboration by creating a community that resonates with shared learning. Because professional development planning begins by respecting the educators' needs, continues by respecting their application, and refines by respecting their insights, it is only natural to respect each educator as a source of additional learning. When educators see themselves as agents and providers of professional learning, they develop an enhanced level of appreciation for each other. Since interaction with colleagues is a daily constant, it can be one of the most persistent sources of new learning and ongoing support.

Because collaboration is a broad concept, professional development in a New Designs school defines and differentiates the best applications of individual, group, and team approaches to support learning. Many tasks are best accomplished by individuals. These include classroom work, administrative responsibilities, and routine management. Other work can be completed by groups—collections of individuals called together to

accomplish a specific task. Groups have a limited lifespan and, as such they are not as focused on building relationships as they are on producing a specific outcome. In other situations, teams should be formed and nurtured over time. Teams have a dual purpose: (1) they accomplish tasks and (2) they build internal capacity by developing relationships and collaborative learning over time. A professional development program in a New Designs school recognizes the distinct purposes of individuals, groups, and teams and plans development programs accordingly. Some programs are targeted at individuals; others aim to build group or team capacity.

Professional development adds value to individual efforts by developing systems to communicate individual challenges, accomplishments, and insights. This reinforces the respectful approach of professional development planners to the work and insights of people in the organization. It also ensures that all members of the organization learn from each other. Because many individuals have similar or even identical responsibilities, the experiences and insights of one might be instructive to many. Although the professional development planners are not the source of that insight and experience, they do facilitate its distribution around the organization. This is aided by the development of a common vocabulary and consistent systems to communicate experiences and insights.

Professional development optimizes the work of groups by building individuals' capacity to work productively in group settings. Just as individuals have work to do, groups form, dissolve, and reform to make the organization successful. Optimal professional development recognizes the distinct value of group work and equips all individuals to function effectively in that setting. By developing and modeling the values of clearly defined tasks, productive roles, and effective norms, professional development programs can raise individual and organizational capacity to collaborate productively. This is a critical element in a New Designs school because there are many situations caused by the community nature of the school which require the application of effective group work strategies.

Professional development energizes the organization by crafting and unleashing true teams. The work of individuals and groups is vital to the success of the organization, but it does not provide the overall leadership and visionary direction that comes from true teams. True teams go beyond a purposeful composition; they are trained to understand the importance of both their mission and their members. In a true team, people are as concerned about protecting healthy team relationships and patterns as they are about producing effective products and processes. Professional development planners function as a team and must develop training to support other teams within the organization. This ensures both a consistent experience of teaming on the part of individuals and consistently productive results when individuals are called to team together.

In a New Designs school, the call to teaming must never be restricted to formal employees of the learning organization. The best professional development accesses all potential contributions of every stakeholder by offering team membership to all those who support learning. Every concerned member of the immediate and extended community is a potential source of information, funding, insight, or participation. The depth of the relationship between the organization and its members determines the richness and variety of offerings available to all learners. It is especially gratifying to educators to know that their mission is worthy of support and training from those who have honed their skills in other professional settings. Involving community experts and organizations in professional development programming sends the strong message that the whole community resonates with a coherent purpose.

Because the principle of inclusiveness leads to more and varied participants in professional development programs, it is imperative to ensure that all participants share a common dedication to the organization and its vision, mission, and principles. For that reason, professional development offers membership in the learning community based on an explicit commitment to the learning principles of the school. The professional development planners are responsible for verifying that individuals, organizations, and their offerings are harmonious with the organization's principles of purpose. This filtering doubly values both the principles and the participation of the broad community of stakeholders. It also offers the insights of the education professionals to the extended community, creating a reciprocal sharing of insight and resources that models the essence of productive collaboration.

Because many members of the community will be joining in a variety of work settings, it is vital that the coordinators of this adventure lead with clarity. Toward that end, the planners of professional development must equip and direct the work of all individuals, groups, teams, and organizations. To support productive grouping and teaming, the professional development staff must teach, model, and facilitate effective norms and roles for collaborative work. The development of these norms should not be directive, but should be a model of collaboration itself. When a group or team first comes together, the individuals will not have the necessary skills or background to generate roles and norms from scratch, so they need to be guided into an appropriate process. At the conclusion of this process, groups and teams will be freed from internal obstacles so that they will be able to accomplish their own objectives more successfully. It is in the definition of productive group roles and consensus group norms that the group or team ensures its future success.

Research that Respects the Interactivity of Known Results and the Ongoing Research in the New Designs School

As a foundation and guide for continuing development, research secures and solidifies design, development, and implementation of professional development programming. In New Designs schools, professional development pursues and uses information from formal research studies, exemplary individuals and organizations, and the collective wisdom of practitioners. As participants in the learning process constantly seek to increase their capacity as professionals, learning opportunities based on both quantitative and qualitative research approaches form the steppingoff points for appropriate professional development content, strategies, and processes. Where there is no current research base, the New Designs participants conduct original research to add information for themselves and for the larger learning community. This means that professional development programming should pay attention to the results and provide supportive learning for participants. There needs to be a feeling of comfort and excitement about discovering and applying the new possibilities that this concept can provide. A rich research practice within the New Designs school can enhance the public perception and the credibility of the implementations—a necessary consideration for bringing the larger community into the school. It also gives a contemporary view of progress and of areas that need attention by individuals and by the organization. Used appropriately, research processes are part of the embedded professional development that is the goal of New Designs professional learning. Research is one of the elements of lifelong learning that integrates all practices and sources toward the vision and the attainment of coherent learning experiences. Energy and creativity from the multiple sources accessed and the wisdom of experience come together to best serve learning in all its facets.

As an optimal professional development program is being designed for the needs of its participants and of the organization, consideration for the appropriate "fit" for those involved is of primary importance. Professional development research is a response to those needs of individuals, groups, and teams within the learning organization. The program may also extend to looking at the needs of community and family life if appropriate to the organization and its vision. The school, therefore, needs to extend the research element to include these contexts for learning as well. Research also provides the opportunity to view, analyze, and report on all areas of accountability such as the individual student, classroom, teacher, and organization. The challenge is to be sure that research is aligned with and serving the needs of the populations involved with the project. Decisionmaking about the research inclusions, strategies, and conventions should model "fitting" the research to the participants. It should also be thorough enough and provide multiple views to the research questions,

thus giving people many views and vantage points with which to make decisions from the analyzed results. Professional development opportunities should guide the participants in process, problem solving, alternative approaches, validity, analysis, and reporting techniques so that the useful results become the focus point. If the results help New Designs professionals meet their needs, then the professional development programming has met the challenge and has become almost invisible to the work result of research. Professional development research as a response to a population's needs is respectful and resides in a context of searching for the right reasons—reasons that the practitioners and stakeholders have declared from their own experiences and curiosities. This deepens the commitment of all involved to the New Designs goal of lifelong learning. A great challenge for the New Designs school is to move beyond the current research base to constantly question learning content, methodological practices, learning applications, school structures—both physical and organizational—and the means by which we view progress.

Optimal professional development programs value ongoing research as an extension of the contemporary knowledge base. New Designs schools place great weight on acquiring new perspectives, processes, skills, and attitudes. What makes a New Designs school more exciting and invigorating is the fact that it will not stop at *managing* the current base. It is constantly looking to *lead* into the unknown by viewing its own practice and carefully shaping its future, its vision, by the research questions it needs to answer for optimal performance. A dynamic and flexible organization that is responsive to ever-changing contexts is vital to this learning approach. Valuing the extension of the research base is a necessary characteristic that the professional development programming must support, champion, and weave throughout its curriculum and service components. All authentic practices also need to reside in a context of collaboration. Staff should be weaving the research element into their practice and their professional development experiences.

The ongoing engagement with investigation values past findings as the foundation for current research efforts. Grounding the current research work within the historical information base strengthens and contextualizes both process and results. The New Designs school values past practices and information as much as it does the new directions proposed by its concepts. It also challenges the past in a positive context that constantly looks at innovations over time, compares the new practices with the old, and adjusts the results of the comparison for future actions. The full scope of past and present research practices informs and connects the New Designs school in longitudinal and circular processes of information gathering, data analysis, and results that embed themselves in daily practice. Effective professional development always informs itself with past research as it challenges itself with future needs.

From both the individual and organizational point of view, the professional development program aligns itself with the particular mission of the learning organization. Through this lens, the program holds together and focuses all stakeholders on attaining the vision.

A research-based professional development program also seeks exemplars from other sources, ideally from implementations in progress. This research strategy saves time by tapping into others' experiences, perspectives, and insights. For example, viewing an existing interdisciplinary program, regardless of its structure, curriculum, or organizers, can stimulate a dialog that helps both current practitioners and future implementers. The dialog may cover planning strategies, teaming structures, assessment policies and procedures, scope of the project, linkage to the vision, and many other practices and experiences that may apply to the new implementation.

The success of the New Designs school is in part tied to the rigorous pursuit of knowledge about internal operations to complement information from external research. Knowing the internal applications provides for smoother adjustments in a more timely manner. Professional development programming will take the needed adjustments and design new learning, training, models, and applications in a series of experiences to enhance the overall success of the innovation. This dynamic characteristic energizes the New Designs concepts. It accounts for learning expectations that have been examined and are supported by students, staff, and the wider community of the institution. It also directs attention toward the everchanging context and challenges of life.

Research results should be made available not just internally but also to the larger community. Professional development is responsible for contributing to the body of professional wisdom through publication of the organization's experiences. Just as the New Designs school accessed previous research, so too will other organizations want to know about the successes and challenges of a particular innovation, strategy, or application. The act of publishing also adds to testing the organization's operations against its vision. Publishing the research embedded in a professional development program with integrity is a way of ensuring the institution's vitality and nurturing the quality of the learning experience. Best practices are built on the latest research. This information will not be available unless New Designs schools have clear expectations that professional development values research-based learning and practices.

A school operating according to the New Designs specifications is an exciting place to be. Without optimal professional development, however, that excitement can quickly turn into frustration. By paying attention to the four critical characteristics of coherence, authenticity, collaboration, and research, professional development programs can help a New Designs school realize its full potential.

Staffing and Staff Development in Exemplary Community/ Technical Colleges²

This paper reviews and synthesizes the research and best practices that focus on staffing and staff development in two-year institutions of higher education. The focus of the research and best practices is an exploration of exemplary applications of the design specifications and competencies developed through the NDTYI. The review extends beyond the boundaries of New Designs institutions to identify models and practices that would fit the New Designs specifications and competencies.

The process used to develop this paper consisted of a review of recent literature on staff development in the two-year institution, a review of Web sites of two-year institutions, interviews with people active in staff development in two-year institutions, and reflections upon firsthand experience and involvement with practices and staff development practitioners in two-year institutions in the United States and Canada. Unfortunately, many of those involved in staff development tend to do it but not write about it. Thus, much of the paper is based on experience, practice, and reflection on this experience in light of the New Designs specifications and competencies.

This paper first notes some of the shifting patterns in two-year institutions and highlights some existing and emerging frameworks for staff competencies. Design specifications for learning staff and staff development in NDTYI are then discussed. The paper concludes with suggestions for additional competencies for staff.

Shifting Patterns in Two-Year Institutions

There are a number of shifting patterns that are indicators of the internal changes taking place within two-year institutions. Some of the changes were initiated by the institutions, and some are responses to external forces. All of them have implications for staff and organizational development needs.

Shifting Patterns Related to the Intake of Students:

- From automatic intake into Associate of Arts programs to serving each learner
- From clear lines that differentiate credit or noncredit *to* blurred lines that integrate different types of programs
- From competitive institutions to partnerships

²This section was prepared as a commissioned paper by Marie Nock, Miami-Dade Community College, Miami, Florida. The paper has been edited by the project staff.

 From assessment for academic placement to assessment for success in college

Shifting Patterns Related to Teaching and Learning:

- From process to outcomes to accountability
- From teaching college to learning college
- From teacher-centered to learner-centered
- From lecture / discussion *to* learning communities, constructivist learning, and online learning
- From distance education via course-in-a-box to Web-based curriculum
- From time bound to asynchronous

Shifting Patterns for Faculty and Administrators:

- From sink-or-swim to induction and orientation of new faculty and administrators
- From advancement based on length of service and graduate credits to advancement based on performance
- From faculty member as chairperson *to* administrator as chairperson

Existing and Emerging Frameworks for Staff Competence

Two-year institutions of higher education are realizing the importance of defining quality performance or excellent performance. Going beyond a job description to a delineation of how one is expected to perform in a given role promotes organizational understanding of job behaviors that are valued by the institution. The individual supervisor and staff member, department chairperson and faculty member, and administrator and professional elaborate on this understanding through the departmental and individual goal-setting process. At the point of setting individual goals, individual competence is assessed to determine whether all skills, knowledge, and abilities needed to do the job are possessed and, if not, what training or professional development is needed. At this point, an individual development plan is initiated or another performance goal is written to ensure that essential training will occur in a time-based sequence.

Training and development frameworks recommend that performance standards be identified for all roles and that training components be linked to each standard. Without specificity, imagine the miscommunication that could occur when computer competency is expected from an English professor and from a department secretary. The English professor's specified competence could be to use word processing software, to use presentation software such as PowerPoint, to have Web researching skills sufficient to prepare students to access information through the Internet for use in a required research paper, and to maintain an individual Web page with course syllabus and class notes. The department secretary's computer competence might focus on the ability to use word processing, database,

and spreadsheet software as well as the campus e-mail system. This specificity is now lacking, but could be helpful for everyone. In the teleconference, "Innovative Uses of the Web To Enhance Learning," sponsored by Florida Community College at Jacksonville on April 16, 1999, one of the presenters lamented that faculty members who use Web-based courses, in addition to having expertise in the subject matter, are being forced to become educational technologists.

As human resource development becomes more institutionalized in twoyear institutions, practices will become more closely aligned with institutional mission, goals, and priorities. Most institutions have job descriptions and use annual performance planning processes to identify individual goals or objectives. There is some movement toward defining performance standards for various roles, but that is often on the front end and is used in hiring decisions.

Design Specifications for Learning Staff and Staff Development

Aligns with Other Elements of New Designs Learning

To be of value to the two-year institution and its faculty and staff, the staff development program must be aligned with the institutional mission and priorities. The nature of the organizational function of staff development is a staff function, not a line function. It is an enabling function that supports the development of the organization as well as the individuals within the institution.

Central Lakes College (CLC), Brainerd, Minnesota, patterned its staff development program on the New Designs specifications. Their program emphasizes commitment to the CLC mission and values, and it is attentive to the needs of both the organization and the individuals within it (Central Lakes College Design Group, 1998).

Ensures that Each Learner Is Known and Served Well

Ensuring that each learner is known and served well by the two-year institution begins with the intake process and depends on the competence of the intake staff. Depending on the clarity of the mission and values of the institution, practices could be in place that unwittingly favor the credit program of the institution over the noncredit program, or the Associate of Arts program over the Associate of Science program, despite what might be in the best interests of the student. It is essential that managerial staff ensure that intake staff have full knowledge of the features and benefits of all programs, the crosswalks between them, ways to assess and interpret students' needs and interests, and implications of each choice for the student's educational and/or career path. Any gaps in the skills and knowledge of the intake staff can be addressed via mentors, cross-training, or formal training.

When strategies that promote belonging, recognition, and respect are used throughout the institution—classrooms, library, tutoring labs, office visits to faculty—the likelihood that the student will finish the term and reenroll in the future is greatly enhanced. The student benefits and so does the institution. Performance-based funding requirements in some states are a catalyst for providing high-quality services to students. In some instances, staff development on strategies to improve student retention works.

It should be said that when individuals are not doing something in their job that is desirable, it is not always a training need. Often training is the first option that supervisors turn to. An old maxim from training and development lore is that "if an individual could do X if his life depended on it, and isn't currently doing it, it's not a training need." There could be organizational barriers, or it could be that the rewards or consequences aren't sufficient to induce the desired behavior.

Faculty need to understand and respect students' diversity, cultures, needs, competencies, learning styles, and aspirations. They need to know when learning is occurring and when students are having difficulties. They need to know how to use a variety of strategies in the learning process to promote and enable learning. They need to know about campus resources that provide support to students outside the classroom. New faculty, fresh from graduate school or the workforce, enter the institution armed with the knowledge of their discipline or field. If they have never promoted learning before, they will rely on professorial models from their past experience. Many two-year institutions now focus on bringing in their new faculty with expectations of the desired performance and with staff development through preservice orientation sessions, mentors, classes or workshops on learning styles, classroom assessment techniques, instructional strategies, and ongoing training sessions.

Support staff are often the first people that students encounter in the two-year institution. The staff's ability to represent the institution well in their communications with the student or potential student has major implications for enrollment and retention. Having up-to-date information and knowledge of the institution is critical to the success of the staff. One off-the-shelf training program developed specifically for colleges and universities is the three-part customer service program developed by Noel Levitz. The first part, "Connections," is intended to help support staff serve the institution well while serving others. This program was so popular and well-received across the country that an "Advanced Connections" program was developed to reinforce the learning from "Connections" and appeal to an audience beyond the support staff. The third program, "Partners," is a customer service training program directed at the student employee. This program enables student employees to see the importance of their roles in the broad scheme of things at the college, as well as the

importance of providing good service in the course of doing their jobs. These programs have become a routine part of the training and development schedules at many institutions so that support staff and students working on a part-time basis understand not only how to serve students well but also why that service is so important.

The college leadership sets the tone for the culture of the campus as well as the ways in which the faculty and staff engage in all other activities. The importance of everyone embracing the institutional mission and goals cannot be overemphasized. The maxim "What gets recognized, gets done" is also an important one for the leadership. If things are going well, recognition of the factors and people that keep things moving in the right direction is vitally important.

A wonderful example of a two-year institution ensuring that each learner is known and served well is the Community College of Denver. In 1986, the community college undertook a change process to assure a climate for learning for all students and to assure that the college would serve an ethnically diverse urban population. They established a common core of values, and they designed and implemented a careful assessment of students that included the identification of barriers external to the college that could interfere with success. Faculty were alerted to high-risk students to provide needed support. Feedback on student progress was provided early enough so that assistance could be provided to students who needed it. Student success was measured annually and made public; individual faculty were provided with information specific to their students. Accountability and planning were embedded in the system. Byron McClenney, the president of the Community College of Denver, credits their staff development programs with enabling the faculty and staff to create, implement, and assess the new programs that resulted in unmatched success with student retention, academic achievement, and graduation.

The May 7, 1999, Chronicle of Higher Education featured the Community College of Denver and its success with minority students needing remedial education. Because the community college has had so many visitors from other community colleges wanting to learn how they achieve the results they do, it is planning a staff development conference on remedial education for others in two-year institutions.

Manages Constructivist Learning

In Opening Windows on Learning, Pat Cross (1998) states that constructivism . . .

provides the foundation for currently popular forms of learning that are labeled "student centered," in which the intention is to move the activity of learning away from the provision of authoritative answers by the teacher toward student construction of knowledge. Constructivism contends that learning is a process in which learners construct understanding. Learning, properly understood, is transformational rather than additive. New learning interacts with what we already know to transform and deepen our understanding. (pp. 12-13)

The desired outcome of constructivist learning is for two-year students to make learning connections to new information and progress in their intellectual development from learners dependent on an expert for the "right" or "only" answer to learners who critically analyze an issue to determine the importance of the context to the answer. Cross goes on,

Let the innovations bloom, but remember what research and practice tell us about the nature of learning. No one can place an idea or a concept intact into the mind of another. No matter how brilliant the message delivered, it does not result in learning until it is integrated into a unique mental structure. Passive learning is an oxymoron; there is no such thing. (p. 21)

Most faculty in two-year institutions arrive at their new positions not knowing how to design or facilitate learning experiences. If they are to be effective in designing problem-based learning and experiences that engage learners in critical thinking and in creating learning, they need to be trained; otherwise, they will continue to emulate the ways in which they themselves were taught, not realizing the alternatives available to them.

New faculty members are not the only ones who need to have this information and opportunity to develop skills in this area of constructivist learning. Adjunct faculty, who are teaching an increasingly larger percentage of courses in two-year institutions, have the same need. Many veteran faculty, too, are looking for better, more effective ways to promote learning.

Many two-year institutions in California and the provinces in western Canada use the *Instructional Skills Workshop* as a way to prepare new faculty and reinvigorate veteran faculty. Two-year institutions commonly open all staff development activities to adjunct faculty as well as full-time faculty.

One of Kouzes and Posner's (1995) principles in *The Leadership Challenge* is to model the way. To teach faculty and staff to use and value constructivist learning with their students, staff development in this realm should provide the experience of (1) assessing student learning to determine what kind of intellectual development is occurring; (2) assessing the impact of the learning experience by reviewing the process of what worked, what didn't, and why; and (3) planning modifications to reach higher levels of intellectual development.

Most faculty at Florida Community College at Jacksonville have been trained in cooperative learning, and they are using it with students.

According to reports from this community college, students are more successful academically, more satisfied, and more likely to be retained because of the use of this constructivist strategy. The many two-year institutions using learning communities (identified later in this paper) are experiencing the same success.

Many times staff development is not enough to implement constructivist learning. There may be organizational barriers such as an inflexible class schedule. In such cases, a planned change effort in the organization would be required to move the staff development effort from concept to action.

Handles Just-in-Time Learning Design

Studies of adult learning have shown that adults prefer learning what they need to know to do something. The staff development programs that have had the greatest impact are those that have been developed in response to a felt need by the group receiving the training.

Technology has advanced the just-in-time capability of staff development efforts. In Florida, for example, the Distance Learning Consortium recently convinced the state legislature to fund a five-year agreement with NetG to provide opportunities for staff development in all 28 community colleges in Florida. NetG provides Web-based training on more than 500 applications software programs and network administration. When an individual logs on to learn an application, the system gives a series of assignments, diagnoses the way the individual responds to these assignments (by artificial intelligence), and then tailors a training program to the unique needs of the individual. No time is wasted on teaching what the student already knows.

Metadata—training that is delivered via the Web—can be just-in-time, based on the needs of the learner and customized to the individual's learning style:

Metadata refers to collections of materials. Over the years, we have produced education in a linear fashion—books, lectures, videos. They all have a beginning, middle, and an end. Using metadata, you can take a piece of the beginning, for example, and use it in a wide variety of ways. Metadata will structure the information you need. It creates a Web page on the fly to dispense the information to you. (Lane, 1999, p. 6)

The National Oceanic and Atmospheric Administration maintains a website that explains how metadata can be used. It is also possible to download the ArcView 3.0 Metadata Collector Extension to create metadata files (www.csc.noaa.gov/metadata).

Staff development activities need to model training approaches by being just-in-time and just-in-place. This is happening more in two-year technical

programs that are closely aligned with their industries. Also, as administrative systems in two-year institutions move to an online environment, the staff development in these arenas will reflect just-in-time design.

Builds Learning Communities

Learning communities have been successful in promoting student academic success, increasing student satisfaction, and raising student retention rates. Many two-year institutions were engaged in providing learning communities years ago before the research was so convincing. In 1986, the board of directors of the American Association of Community and Junior Colleges (AACJC) established the Commission on the Future of Community Colleges to assess the past and present and make recommendations to enable the then 1,224 community, junior, and technical colleges to successfully shape their future. The commission's report, *Building Communities: A Vision for a New Century*, delivered in 1988, envisioned dedicated teaching as the catalyst for building community. The recommendation focused on building community in six interlocking ways:

First, partnerships for learning, the students and teachers. Second, the curriculum to be taught. Third, the community created by the classroom. Fourth, the quality of campus life. Fifth, connections beyond the college. And, finally, the leadership required by community colleges to meet successfully the challenges of the year 2000 and beyond. (p. 8)

This report has had a dramatic impact on two-year community/technical colleges.

Student Learning Communities

Many two-year community/technical colleges have instituted student learning communities since 1988. LaGuardia Community College, New York; Daytona Beach Community College, Florida; Seattle Central Community College, Washington; and Jackson Community College, Michigan, are but a few of the many successful models of student learning communities. The type of learning community may range from a couple of linked courses to an entirely integrated, multidisciplinary, team-taught, coordinated studies program.

Both staff development and organization development are involved for the two-year community / technical college wanting to institute successful student learning communities. Faculty need to learn about the various structures for learning communities and the advantages and disadvantages of each. Depending on their past teaching experiences, they may need to learn how to implement cooperative learning or other collaborative strategies. If they decide to offer a theme-based coordinated studies program in which the various disciplines come together around the theme of the program and each instructor functions as a member of a teaching team, they may need to learn team-building skills as well as conflict resolution skills.

Administrators, too, need to learn a new set of skills so that they can understand the value of learning communities for the students, faculty, and institution, and so that they can recognize and reward such efforts. Too often, one hears of the department chair going into the classroom to observe a faculty member engaged in cooperative learning. If it's going well, student groups are taking responsibility for assuring that all group members are mastering the learning objective. This may be lost on the chair, however, who says to the faculty member, "I'll come back another time when you're teaching something." The department chair needs to be aware of how difficult it is to structure a successful cooperative learning lesson and the time it takes to build the necessary trust, individual accountability, social skills, interdependence, and group processing skills into the student experience. The additional time that it takes faculty members to use teaching approaches that foster a learning community must get recognized. Organizationally, administrators need to ensure that advisement and registration procedures do not work against learning communities that are trying to form.

Student services personnel also need to know the advantages of learning communities, how the specific offerings within the college relate to learning styles, and additional skills such as team skills and their relevance to success in today's workforce. As they advise students, student services personnel must be prepared to explain the features and benefits to the student so that the student can make an informed choice on whether or not to participate in a learning community.

The use of cooperative learning can create a learning community within a classroom. The research results on student success, satisfaction, and retention parallel those for learning communities. Cooperative learning, however, can be done by one faculty member in his or her class. In 1993, recognizing the potential power of this strategy to promote learning, the Fund for the Improvement of Post-Secondary Education (FIPSE) funded a grant to establish the Southeastern Center for Cooperative Learning based at Florida Community College at Jacksonville (FCCJ). Since that time the Southeastern Center has trained not only FCCJ faculty to use cooperative learning in their classes, but also faculty from other community colleges and universities from across the country. The training is based on the Johnson and Johnson model developed by the Cooperative Learning Center at the University of Minnesota. The grant ended in 1996, but the Southeastern Center was institutionalized by action of FCCJ's Board of Trustees with a budget funded through FCCJ's Staff and Program

Development appropriation. FCCJ offers incentives to faculty who learn to use cooperative learning. After a faculty member completes 120 hours of professional development, his or her baseline salary is permanently increased by 1%. There are three levels of training—(1) foundations, (2) advanced, and (3) leadership—and each level is a 35-hour program. Ongoing groups at the College provide support and promote the exchange of materials and ideas. Of the 400 faculty at FCCJ, 234 are currently using cooperative learning with their students.

The Southeastern Center for Cooperative Learning conducts national training institutes each year and also provides training at other colleges on a consultation basis. Guilford Technical College in Greensboro, North Carolina, and Miami-Dade Community College have begun to incorporate cooperative learning as a result of having their faculty trained by consultants from the Southeastern Center.

Faculty can be prepared to use student learning communities in a variety of ways, but the implementation of student learning communities on a campus is often the result of planning, staff development, and organization development. Evergreen State College in Washington has been the acknowledged leader in the successful use of student learning communities for years. They have shared their approach through publications, consultations, and conference presentations. In 1997, FIPSE awarded a threevear grant to promote staff development on learning communities. The University of Miami, in conjunction with the League of Innovation, sponsored a National Conference on Learning Communities. Planning for 150 participants, they were stunned when three times that number registered. Evergreen State College and William Rainey Harper College in Illinois planned similar conferences for the summer of 1999. Visits to institutions by teams of faculty and administrators also provide the information and insights needed for successful implementation of student learning communities.

Academic and student services administrators need to be part of the planning process with faculty because many institutional practices need to be modified to ensure that the institutional structure is flexible and does not set up unnecessary barriers. Some of the issues that administrators need to address are block scheduling, advisement, and registration; team teaching; interdisciplinary approaches; class size; reduced class load for faculty during the trial run; expectations of faculty for nonteaching time; planned assessment of effectiveness; and methods for dealing with student issues such as drops and attendance.

Faculty need to plan as a team, and they may become a faculty learning community in the process. At Evergreen State College, when faculty work together as a team to provide a student learning community, they exchange their office spaces to be near one another. According to Roberta Matthews, Associate Dean for Academic Affairs at LaGuardia Community College in

New York, "Participation in a learning community is a faculty development activity" (Matthews, 1994, p. 188). Faculty working on an interdisciplinary team adopt a new perspective toward their disciplines, and the teamwork promotes collegiality and a stronger academic culture. Because faculty are accustomed to working as individuals, they may need some training in effective team skills, group processes, and conflict resolution skills.

When initiating student learning communities, institutions need to make sure that faculty have enough time to plan and support the endeavor. Paying an additional stipend, which many institutions do when more work is involved, is often not valued as much by the faculty as providing them with release time so they can attend to the unforeseen issues that will arise during the initial trial. Keeping the rest of the academic community informed about what is happening in the learning community as it is instituted not only recognizes the efforts of those involved, but also stimulates interest among other students and faculty who may wish to get involved in the future. Reviewing student success and assessing effectiveness on an ongoing basis to adjust the initial plans is as essential as celebrating successes. In this way, the planning, staff, and organizational development efforts put into student learning communities will become institutionalized.

Faculty Learning Communities

Lenning and Ebbers (1999) state that as of 1999, there is nothing in the literature that discusses faculty learning communities (p. 97). Nonetheless, faculty learning communities are formed on a regular basis as faculty undertake disciplinary, committee, or team initiatives that are new, welcomed, and often self-initiated. They are also created through staff development efforts such as instructional skill workshops, master teacher seminars, disciplinary or institutional retreats, user groups, summer institutes, or any other effort that enables the formation of an effective temporary community. Faculty and administrators participate in many such learning communities during their careers; however, the duration of each may be rather short.

Virtual Learning Communities

Virtual learning communities that enable students, faculty, and others to communicate online in virtual classrooms or other meeting spaces are proliferating in higher education. They began at Maricopa Community Colleges in Arizona and its many campuses about nine years ago. Maricopa faced the same dilemma that most colleges have in dealing with a 50-minute teaching hour. Just when students understood enough about the subject to engage in critical thinking through discussion or problem solving, the class was over. So, they offered students an electronic bulletin board, sometimes with posed questions, sometimes not. They found that when students were

given the opportunity to engage one another and/or the faculty member online, they did so with such gusto that course writing-across-the-curriculum requirements were quickly exceeded. Providing electronic learning forums (ELFs) is now relatively common for classroom-based courses.

Miami-Dade Community College provides ELFs to its faculty, students, and staff. Specific electronic forums can be set up around a topic or course, and membership can be open or limited to just those students enrolled in one sequence of a course. Most faculty using ELFs use them to augment their courses. Students with computers at home or work communicate from there, but the campuses provide access to computers so that all students are able to participate.

Faculty are being prepared to use virtual learning communities in a variety of ways. Workshops that train faculty to use e-mail and the Internet often include a component of a virtual community so that novice faculty can experience the benefits of communicating asynchronously and, thus, become willing to try a forum with their classes. Support throughout this endeavor is very important so that the faculty member doesn't have to fear becoming a victim of technology by not knowing what to do or how to do it. Many faculty are taking graduate courses via the Web to learn more about online distance education. Their virtual communities are truly global. For example, a technology trainer at Miami-Dade Community College is currently enrolled in Nova Southeastern University's doctoral program in educational technologies. In her cluster of about 50 people are four others from two-year institutions around the world: two from the United States, one from The Netherlands, and one from Taiwan. They are connected daily through their virtual community on the Web, yet come together four times a year for meetings. The trainer states that her virtual community is as responsive to her as are her colleagues within the college.

One of the awardees of the U.S. Department of Education's Technology Innovation Challenge Grants is the "Alliance+: Improving Professional Development Through Technology." This partnership involves 36 entities: universities, community colleges, school districts, and organizations providing specialized services such as evaluation or development. The grant is undertaking the professional preparation of K-12 teachers to use the Internet in unique and compelling ways with students in a science- and math-based curriculum. It uses a train-the-trainer model through the community colleges in the various school districts. Stevens Institute of Technology, Hoboken, New Jersey, directs the project. Staff development in the Alliance+ focuses on using e-mail, searching the Internet, making bookmarks, learning to use real-time data available on the Internet in instruction, learning about Internet safety issues, developing a Web page, and using the science-math-based curriculum. Participants in the 30-hour training program are amazed at what they have accomplished by the end

of the program. Thousands of teachers and hundreds of thousands of students will be involved in this program. Connecting these people without virtual learning communities would be impossible. Connections are made by students who are working on collaborative projects throughout the district, the state, the nation, or the world. Teachers are connected with one another and are expanding the possibilities of the learning experience with one another. Mentor teachers are connected with their students, with one another, and with their core trainers and others involved in the project. If a problem surfaces, the resources for providing support to solve it are abundant. The discovery of learning generates such excitement and is celebrated throughout the network. People feel the connections even though they are created through virtual communities. Without the virtual connections, the achievements would have been slower to come and more limited.

Sinclair Community College in Dayton, Ohio, has been a technology leader in its region. In exploring the possibilities of distance education for its institution, Sinclair noted a continuum in the migration of faculty toward virtual communications. Their counsel, provided at the League for Innovation's Technology Conference, was to support faculty to use as much Web-based technology in their courses as they and their students were comfortable with. They found that it was unusual for a course to become entirely Web-based, without any contact in a classroom. They stated that Web-based instruction was more likely to be adopted if faculty were not forced to only use the virtual environment.

Lenning and Ebbers (1999) in *The Powerful Potential of Learning Communities* note that the major issues that need to be addressed with virtual education are how to ensure that student-faculty interaction is occurring, and how to overcome student isolation. Virtual communities do not automatically form with virtual education. Faculty need to have staff development experiences that enable them to address these challenges.

Virtual colleges exist in almost every state: In Arizona, every community college district has a virtual branch campus; Oklahoma's community colleges participate in the Electronic Community College; and the Community College Distance Learning Network joins community colleges in Arizona, California, Florida, Iowa, Ohio, and Texas.

In *Building Learning Communities in Cyberspace*, Palloff and Pratt (1999) argue that the virtual learning community is essential if learning is to occur:

The principles involved in the delivery of distance education are basically those attributed to a more active, constructivist form of learning—with one difference: In distance education, attention needs to be paid to the developing sense of community within the group of participants in order for the learning process to be successful. (p. 29)

Members depend on one another for support, activity, and learning.

In training faculty to develop effective virtual communities, part of the developmental process must include the experience of actually belonging to a virtual community. To know firsthand what worked for them and what worked for others is essential for faculty to be able to design and implement learning processes that include virtual communities. The experience itself is not enough, however. Faculty must understand enough about the hardware and software to use it effectively; they need to understand the power of the virtual community and how to structure "high touch" with "high tech"; and they need to learn how to translate their curricula to an electronic medium. This process takes time. At Miami-Dade Community College, such a workshop was structured for 30 hours over a period of ten weeks. Faculty had to spend a minimum of 30 hours working online and translating curriculum materials into an online format. This was just a beginning, but upon completion of the program, faculty felt ready to embark on developing their own online courses that would include the creation of virtual communities.

As Lenning and Ebbers (1999) summed up their research on learning communities,

Colleges and universities need to become committed to selecting the model(s) best [suited] for their students and their situation, and learn how to implement it for optimum effectiveness. Cross fertilization among two or more quite different learning communities provides a rich opportunity for enhancing learning through group activities. Only when a college or university is a true learning organization and contains true faculty learning communities can it expect to create faculty learning communities and student learning communities that will optimize students' learning and create other positive outcomes. (p. 108)

Operates as Information Navigator

Another area for staff development is preparing two-year institution staff to access information via the Web on their institution, their community, their disciplines, grant or foundation funding sources, support services and online help for students, practices at other institutions, and related topics. Preparing staff to assess the quality of the information obtained via the Web is a skill that needs to be developed at the same time.

This training can take a variety of directions such as focusing on Web searching skills, establishing a Web page on which individuals maintain links to frequently visited sites, asking librarians to train individuals on specific research skills, and asking the grant director to conduct sessions on surfing the Web for funding opportunities. For these skills to be usable, it is important for the institution to provide Web access for faculty, staff, and students.

Includes Competence in Research and Service Functions

Faculty and staff at two-year institutions do not typically engage in traditional research as their university counterparts do. Two-year institutions consider themselves to be teaching institutions and have focused on teaching excellence in the classroom. Faculty in two-year institutions have been rewarded for teaching well and have not had to function in a "publish-or-perish" environment to receive tenure. Research needed by the institution to determine the success of graduates upon transfer to a university, the success of students in college-level courses upon completion of required developmental courses, or other relevant topics that could help the two-year institution become more effective is conducted by college departments of institutional research. Faculty and staff, unless engaged in a research study for a dissertation, do not typically conduct research; however, when researchers introduced the concept of *classroom research*, two-year institution faculty were given a tool to see how well they were reaching their students. Action research for the classroom made sense.

Thus, staff development that focuses on research in two-year institutions is typically focused on gathering information that will be useful to the institution or to the individual. The results of the research most likely will be used within the institution or by the individual to address the issue or learning circumstance. Typically, individual research is not published, which makes it difficult to conduct research on two-year institutions based on other formal research.

Service learning can be an extracurricular activity, or it can be an integral part of the learning experience, enabling students to serve the community, to process the experience to make some hypotheses about the issue, and to research the issue to support or refute their hypotheses. The successful service learning initiatives in two-year institutions across the country have integrated staff development activities into their structure to prepare faculty to incorporate service as a learning strategy. The training focuses on the reflective process that occurs before, during, and after the service learning experience that enables students to learn from the experience.

Employs Continuous Quality Improvement

Staff development must support individuals in becoming proficient to meet the performance expectations of their roles, or in developing new competencies for identified future roles. If a performance management model is used in the institution, it enables an ongoing assessment of performance and training needs that is linked to the achievement of goals and objectives. Thus, the best way to determine an individual's training needs is to assess his or her mastery of the essential competencies before undertaking a new endeavor. If the individual lacks some essential competencies, training should be provided. If the individual has the competence and begins the assignment only to begin to fall short, the

individual and the manager need to review the situation to see whether additional training is needed or whether advice and counsel will be adequate. Perhaps something else in the organization is impeding progress, but it is out of the control of the individual to address it. An important part of supervisory development at every level is knowing how to use a performance management model in (1) setting clear and realistic performance expectations; (2) providing timely, accurate feedback; and (3) obtaining periodic assessments from those involved—the individual, those served, peers, and the supervisor.

Important features of a performance management system include continuing contracts or institutional tenure, promotion in academic rank, contract renewal, excellence awards, and faculty endowed chairs. Whatever reward system is in place, it is important that it be linked to excellent or quality performance.

In the teaching and learning arena, it is important that faculty and other instructional staff be prepared to use classroom assessment techniques and classroom research to ensure that students are learning. For example, Parkland College in Champaign, Illinois, has developed a Classroom Assessment and Research Initiative that trains faculty in the areas of classroom assessment and research. In addition, this initiative provides ways for faculty to pursue areas of particular interest such as diversity, technology, or classroom research. Miami-Dade Community College requires all new faculty to successfully complete a three-credit graduate course on "Teaching, Learning, and Assessment in the Community College." This course enables participants to use classroom assessment techniques, consider learning styles when developing learning experiences, and develop effective assessment measures.

A number of two-year institutions have incorporated quality initiatives and a systems perspective in their planning and transformations. The quality improvement work at Sinclair Community College in Dayton, Ohio, enabled that institution to transform itself to a learning college. Two-year institutions planning a transformation to a New Designs College would do well to institutionalize principles of quality improvement and of learning organizations.

Continues To Learn

For over twenty years, two-year institutions have recognized the need for ongoing learning and professional development of faculty and staff. Faculty and staff have also recognized their needs for continuous learning. The shifting patterns mentioned at the beginning of this article have created some of the needs; shifting technology both within and outside the institutions has created the others.

The ways that institutions have shared this responsibility for providing continuous learning opportunities with individual employees have varied

greatly. Every institution that has a staff development program should tailor it to the needs of its faculty, staff, and professionals. The range of staff development programs in two-year institutions is considerable. Some serve the entire population; some serve only faculty. Some are ongoing throughout the year; others are limited to a few staff development days a year. Some are so individualized that they are based on the individual development plans of the staff; others are for the entire college population whether or not they need it. Some programs rely exclusively on tuition reimbursement and travel opportunities; others focus on delivering the needed training within the institution. Some two-year institutions have teaching and learning centers focused primarily on the teaching and learning process; others address all training needs. Some, especially technical institutions, have developed summer internships in business and industry so that faculty can stay current in the field; others have partnered staff development with business and industry and have become regional centers for staff development for everyone, not just the college population.

Two-year institutions with faculty and staff who are resistant to learning current or better practices may find it helpful to link institutional rewards to the desired development and resulting performance. Establishing merit incentives, providing opportunities for recertification under new guidelines with a financial incentive, and developing recognition programs such as awards for excellence or endowed chair programs are ways to encourage development and changed practice. The more that staff development is institutionalized—aligned with mission and need and linked to the reward system—the more that staff will align their choices for development with institutional need.

Other Recommended Competencies

In addition to the New Designs competencies for a learning staff, the following specifications are recommended for inclusion. Some link directly to other design specifications; others address the leadership and management of a New Designs two-year institution, which were not addressed in the New Designs specifications.

Integrates Technology into the Curriculum

Competence in technology is at present impossible to define for faculty, staff, and administrators in the two-year institution because the competence needed is not common across the board. Because regional accrediting boards are requiring graduates of two-year institutions to meet a computer competence level, institutions are defining a minimum level of student competence. This may begin a process to identify essential competencies for two-year institution employees. This will need to be done on a role-by-role or job-by-job basis. Identifying competencies for some jobs will be easy—for example, jobs that require certification such as "Certified Novell

Engineer" or "Microsoft Certified Support Engineer." Are faculty to be required to use technology in the learning process? Are administrators to be technologically competent to retain their contracts? and What technological competence should support staff possess? All of these questions need answers.

Two-year institutions have had to struggle to amass the revenues necessary to equip faculty, staff, administrators, and students with the essential wiring, hardware, and software to compete in today's technological environment. These accourtements alone, however, do not make a difference. Countless examples have been cited of institutions that have purchased the hardware only to have it become obsolete—shelved in a closet because training in its use was not provided.

In two-year institutions, the population of employees can be divided into a few groups that require different approaches to develop or further their competence in technology.

Many newly hired employees fresh from high school, college, university, or graduate school grew up with technology and have used it in a variety of ways—doing their schoolwork, playing games, designing their own Web pages, even earning money on the side in some aspect of technology (e.g., installing, word processing work, developing Web pages, developing animated graphics). They are used to learning about technology by trying it, talking with friends, going on the Web to appropriate URLs for FAQs, and contacting software companies to resolve glitches. They are proficient in troubleshooting hardware and approach problems that arise as a natural part of working in a wired environment. They are challenged by difficult problems and increase their competence and that of others by solving these problems and sharing the results with their associates, real or virtual.

Another group of employees were the early adopters, who embraced technology in the early 1980s. They learned programming, and they learned to use applications in word processing, databases, spreadsheets, and grade books through workshops or on their own. They also began to look for applications to use with students. As advances were made in technology, they eagerly attended workshops and learned multimedia applications that integrated sound, pictures, and quick-time movies into interactive, curriculum-based courseware that could be put on a videodisk or, later, a CD. This group enthusiastically approaches the integration of technology into the teaching and learning process. They have become role models for others, and they enjoy sharing with one another as well as with those who are less technologically competent. As new opportunities arise to develop distance education courses, artificially intelligent tutorials, or departmental Web pages, this is the group that will be involved. They advance their competence by taking on projects and figuring out how to approach them by using all the resources available to them.

Another group is still approaching that imaginary plateau where they will become self-sufficient learners. They are eager to take workshops and seem to prefer these to tutorials. They may even take the same workshop a few times on their paths to competence. This group can develop an understanding of how to use applications software to complete tasks or how to use instructional courseware in a learning situation, but they are not in a development mode. Developing their competence to this point takes a lot of support. It may mean having staff developers go into their classrooms once or even a few times to conduct a lesson on "Conducting Research on the Internet," for example, until they develop the confidence to do this lesson on their own. They appear to lack the confidence, not the competence, to do it on their own. Staff development activities for this group must attend to not only the knowledge and skills needed but also the affective dimension of using technology. More time is required, but when these individuals are ready to fly solo, they will. The majority of employees in two-year institutions—staff, faculty, and professionals—fall in this category.

The last group verges on antitechnology, seeing voicemail and e-mail as intrusive and computers as the downfall of humanity and of "teaching as we know it." This is a very small group, and without institutional requirements of technological competence for faculty, their technological competence will be very difficult to address. A few institutions that have required their faculty to teach computer-based curricula or to teach online have been taken to court by the faculty: "So far the courts are in agreement with the faculty. Faculty cannot be required to learn or use the new instructional technology" (Baker, 1998, p. 8). When staff do not want to learn to use technology, it becomes difficult for them to perform their jobs satisfactorily without it, so the problem eventually is resolved. For a tenured faculty member whose institution does not require technological competence, the matter will be solved upon retirement.

Planning to upgrade the technological competence of faculty is more than a staff development issue; it is an organizational development issue as well. Certainly staff development is involved, but without other components that support a planned change effort, the resulting performance will fall short.

A two-year institution embarking on a transformational planning process for becoming a New Designs College, for becoming a distance education leader, or for integrating technology into the curriculum, needs to begin the process with a vision of the desired result. What will be the required performance of those involved in the change? Do they have the skills, knowledge, and abilities to perform adequately, or are there areas in which training is needed? Once faculty and staff have the requisite training, are there organizational barriers that will impede their performance? Do they have adequate time, support, and hardware for the task? How is this effort

being managed and communicated to others in the institution? What provisions are there for recognizing those involved, for learning from what is going on, for giving feedback, for making changes, and for continuing to go for the finish line? What kinds of measures are being used to track progress? How will this effort become institutionalized? Are changes in policy or procedure needed? What permanent staffing will be required? Are office space and equipment needs being addressed? Many other issues are involved, but these questions, as examples, demonstrate that staff development or technology training should not stand alone. It must be linked to institutional mission, goals, and priorities.

Model staff development programs which are focused on integrating technology into the curriculum are in place in a number of two-year institutions. The programs at Maricopa Community Colleges, Miami-Dade Community College, Sinclair Community College, and Delaware County Community College are exemplars.

Gives Importance to the Induction of New Staff

Because most two-year institutions were founded in the 1960s and 1970s, faculty members hired at that time are preparing for retirement over the next few years. Although hiring has occurred as two-year institutions grew, the numbers have not been as large as they were in the 1970s until very recently. When large numbers of faculty are brought into a single institution, there is a tremendous opportunity to plan for their induction into the value system embraced by the institution. It is important not to lose what has been so positive for two-year institutions and to enable new faculty and staff to build upon what they inherit. As Robert McCabe, president of Miami-Dade Community College, said after hiring 80 new faculty, "new faculty stand on the shoulders of those who went before them to take the college into its new future."

When individuals begin employment with a new organization, they are ready to embrace that organization and meet its expectations for their performance. Orientation for new employees needs to focus on giving them the kind of information that will enable them to be successful, not just their options for health and dental insurance.

Many new faculty, especially in the technical or health sciences areas, do not have a teaching background or knowledge of how adults learn and how to facilitate that learning. They are experts in their disciplines or fields. When an institution hires new faculty, it has a good opportunity to plan for the future and make changes because new faculty are not yet accustomed to the existing system.

We have learned much in the 25 or 30 years since most two-year institutions opened. The institutions have changed as well, and new faculty and staff need to be made aware of the current conditions: the majority of students are underprepared; the institution is wired for the Internet; the

institution is increasingly accountable for its results; funding is more and more performance-based; and there is more competition than ever for students. It is no longer enough to give new faculty their textbooks, a list of courses that they will be teaching, and an office key and expect them and their students to be successful.

New faculty and staff need to understand the mission of the institution they are joining, its value system, and how it links with the community. They need to know some of the history of two-year institutions in this country and what the vision of the future holds. They need to learn about the faculty and staff that they are joining, about the student body within the institution, and about the support services the institution provides to the faculty and students. They need to know how to make successful referrals; they need to bond with other new faculty who are entering at the same time so that they can support each other when challenges present themselves; and they need a mentor who can show them the ropes and how things work within the institution. They need to learn about the programs and courses in the institution so that they can appropriately advise students, and they need to hear about opportunities for professional development within the institution. They need to learn how to write a syllabus and how important that syllabus is. They need to observe other faculty in action. They need information about extracurricular activities and about the institution's connections to the community and expectations of them for service. They need to understand their contract requirements and how they can advance to continuing contract or tenure. They also need to know about programs that recognize exemplary faculty so that they can set their sights high.

All this can be achieved through a comprehensive orientation program that may take a year to complete. Some of it may come in preservice days under special contract; some of it may be online. Mentors need to be trained in their roles and be available to work on a one-on-one basis for the first year of employment. New faculty need to meet periodically throughout the first year to reinforce their learning and to support one another. Chairpersons need to be actively observing and giving feedback to the new faculty members. Staff development experiences should be tailored to the needs of the new faculty but can be guided, initially, by needs identified by previously new faculty. Thus, for example, plans can be made to offer training programs on teaching adult learners, on developing strategies for facilitating learning, on integrating technology into the curriculum, and on assessing and evaluating learning.

Other guidelines need to be put in place by the institution to help assure the success of the new faculty member. Sometimes the newest faculty member is given multiple preparations, while veteran faculty get just one or two. This should be reversed. New faculty in their first term should ideally have no more than two preparations. Fairness should be exercised to assure that new faculty are assigned schedules that are as desirable as the schedules assigned to veteran faculty.

Some of the new faculty may have been teaching for the institution as adjunct faculty members before their full-time appointments. Unless the institution provided an orientation and staff development program to them as adjunct faculty, they bring only experience in the classroom with students, during which time they taught as they had been taught and learned from their experience what was successful and what they needed to change.

Two-year institutions are increasingly relying on adjunct faculty. In 1992, adjunct faculty outnumbered full-time faculty by almost two to one, and in 1993, they taught between 30-40% of the full-time-equivalent contact hours (Roueche, Roueche, & Milliron, 1995, p. 3). Students rarely know whether their professor is a full-time faculty member or an adjunct member. To enable their students to be successful, two-year institutions must provide the same or similar staff development experiences to their adjunct faculty as they do for full-time faculty. Ignoring the needs of adjunct faculty can undermine the success of students and the institution. As Roueche et al. put it, "All faculty, part-timers included, should be provided with the means to grow and develop as teaching professionals, to be involved in continuing efforts to help [them] shape their teaching to the needs and goals of the institution and focus on achieving the learning outcomes considered important" (p. 120).

Adjunct faculty are frequently paid at a much lower rate than full-time faculty. To ensure that the adjunct faculty will complete essential training, institutions may want to make future teaching assignments contingent on completion of certain orientations or training programs; however, they should compensate the adjunct faculty for attending such sessions.

Prepares Leaders To Build a "Leadership Community"

Little has been said of the in-house staff development of the executive leadership of the two-year institution. The professional development of the chancellor, president, provosts, and board members has traditionally occurred elsewhere, outside the institution itself, such as in doctoral programs, in special programs for college leadership such as Harvard's Summer Institute for New Presidents, at designated conferences, or through fellows programs of professional associations. Certainly, these avenues provide a rich preparation and an enduring network of colleagues for the executives involved and are key to their development of leadership attributes and skills.

Within their institutions, leaders need to (1) unite the faculty and staff around the central vision and mission of the enterprise; (2) empower faculty, staff, and professionals as full members of an interdependent team; (3) ensure open communications; (4) foster innovation; (5) build ownership and accountability; (6) promote growth and development; and (7) celebrate

success. By themselves, leaders cannot accomplish these activities. These are all processes that require people to be engaged with one another. Not only are they processes, they also are learning processes that can be improved through feedback, reflection, and group input and ownership.

Executives who learn to trust and value the process and the people, and to trust themselves to be authentic leaders, create a leadership community. Too often, control issues or fear on the part of the leader restrict the ability of the leadership community to reach its potential.

Mentors or consultants can help during the process of building a leadership community, but the executive must review actions taken and what reactions they stimulated, ask for feedback on the process from those engaged, and use this feedback and reflection to modify strategies on an ongoing basis. Being willing to make errors and learn from them is essential and freeing.

The learning experiences that students have when they are engaged in constructing learning are often the best. Faculty and students both learn when faculty are engaged in using a strategy to promote learning such as cooperative learning. Staff, when they apply their learning experiences to develop a new database or to crosstrain another, are learning as well. So it is for the executives. They need the freedom to learn about the processes of leadership while engaged in those very processes with the individuals from their institutions. These types of learning take time, trust, reflection, a willingness to grow, authenticity, and risk.

Imagine a leadership community, a community of colleagues dedicated to envisioning the future, planning ways to implement that vision, dedicating team energies to become the vision, questioning to make things better, and building in feedback and accountability in a process facilitated by an executive or the executive leadership. Learning about the processes of leadership in a leadership community can only strengthen the leadership community.

Prepares the Academic Manager as Coach

Academic managers in the two-year institution are the department chairs and directors who have supervisory responsibility for faculty and staff and the managerial responsibility to meet departmental goals and objectives. Sometimes individuals in these roles are faculty who assume the role on a rotating basis, possibly through election. In other institutions, they are academic administrators who do not have tenure as faculty. There are probably as many configurations of this as there are states.

The staff development of these academic managers has been rather haphazard and has relied for the most part on external training. Since Gary Filan began the Chair Academy as part of the Maricopa Community Colleges eight years ago, hundreds of academic managers, not only from two-year institutions in the U.S., but also from institutions throughout the world have improved their practice as a result of participating.

Institutions themselves, through internal staff development programs, should also be addressing the staff development needs of their academic managers within the context of the institution's unique mission, vision, values, and culture. George Baker (1998), when asked what he saw as the critical issue with academic leadership in the two-year institution, said,

The key to change in the community college is the front line academic leader (including department heads and chairs). The expectation is that these individuals can influence faculty behavior and assist the transition from teacher-centered instruction to student-centered and active instruction. The critical problem is that the typical front-line academic leader has had little training in leadership development and has not been empowered with the leadership and management tools necessary to do the job. I find it most perplexing that organizations who have a mission to prepare others for careers take such little interest in developing their own human resources. (p. 4)

Helping department chairs see themselves as coaches, engaged in shaping the performance of faculty, is a major challenge. In most two-year institutions, most department chairs see the performance review process as something they wish they could avoid, and many approach it in a compliance fashion. A chairperson might be conducting as many as 20 to 30 faculty performance reviews, and if you placed the reviews side by side, it would be difficult to tell them apart. Further, they would be identical to those written the previous year. According to Seagren, Creswell, and Wheeler (1993), "Although evaluation creates anxiety for both the chair and the faculty member, it provides the platform for in-depth communication and the occasion to shape the direction of the department and the priorities of the faculty member" (p. 45).

Systematic staff development programs need to be instituted within colleges for the academic managers. Managers need to understand how to work in teams in order to set departmental goals and individual expectations; to observe performance in light of individual and departmental goals; to give helpful feedback, counsel, or advice; to deal with conflict; to recognize and reward contributions; to recognize when negative consequences can shape performance; and to conduct reviews. They need to know how the college operates: the budgeting process, program planning processes, college policies and procedures, and recruiting and hiring policies. They need to understand progressive discipline and termination. They need to become familiar with legal issues that have an impact on their institution. They need to know how new programs can be

instituted and the community/technical college's decisionmaking process and committee structure. And most of all, they need to understand the mission and vision of the community/technical college and the important role they play in bringing that vision into reality.

In most cases, this development of academic managers is left to happen on its own. National academies and institutes, newsletters, and journals provide some support, but it is too important to leave unaddressed by an institution, even if it means contracting with an external consultant to provide training designed to meet the needs of the academic managers in the specific institution.

Celebration

Celebration is one of the strategies used to promote organizational change. To promote change initiatives, it is important to know when to celebrate an achievement or milestone, how to celebrate, who to involve in the celebration so that it is meaningful, and what the next steps will be so that those in the celebration can be part of the next initiative. O'Banion (1997), in *A Learning College for the 21st Century*, states, "It is important not to celebrate a short-term achievement as the final victory, declaring the war won. The premature victory celebration stops momentum and provides opportunity for traditional forces to regain territory. Each celebration should be planned as an opportunity to leverage new plans" (p. 249).

Unique and appropriate types of celebration need to be used, and planners need to ensure that the efforts of the celebration do not undermine other initiatives. Celebrations need not be expensive. They should allow creativity to flow.

For example, when faculty have been involved in developing multimedia courseware or distance education modules, a festive showcase in which they can demonstrate the product to their colleagues and administrators launches the next step of getting others in the department excited about the accomplishments and how they can be used with students. It is also motivating to others to see what their colleagues have done, and they begin to think of what they themselves can do in terms of using the materials or teaming in new development efforts. After a particularly long and rigorous staff development program, graduations can be held with activities that acknowledge not only achievements but also commitments to apply the new skills and knowledge in the immediate future. In virtual celebrations, lists of individuals, teams, and achievements can be posted on Web pages complete with pictures and links to more detailed information. Some twoyear institutions have a "Wall of Fame" of photographs of celebrated individuals, and many two-year institutions have instituted an endowed chair program that often partners with the community in celebrating exemplary faculty members.

Review of Classification Schemes and Standards for High School and Community/Technical College Teachers

In order to examine the New Designs draft design specifications for staffing and staff development in the context of existing staff certification and licensing and professional development standards, the existing professional frameworks for staff competencies and staff development attributes were identified. Several states were then selected, and their standards for teacher licensure were analyzed. The states were chosen to include states that were undergoing major educational reform. After these materials were collected, the competencies or features from each source were classified in relation to the draft design specifications for staffing and staff development. Separate analyses were done for staffing and staff development. The comparisons of classification schemes are presented in Appendix A.

The following conclusions were reached after reviewing the preceding classification of the competencies required of learning staff in the context of educational reform/New Designs for learning:

- There is consistent attention to the importance of two design specifications: (1) Demonstrates competence in the specialized area of work, and (2) Ensures that each learner is known and served well.
- There was less, but fairly consistent attention to the design specification: Partners with others.
- Two design specifications were cited in only one source: (1) Demonstrates the learning expectations held for students and (2) Includes all those making a contribution to the learning experience.
- Two design specifications were never cited: (1) Handles just-in-time learning and (2) Operates as information navigator.
- Missing from the list of New Designs specifications, but included in seven of the sources was assessment or evaluation of staff, often specified as evaluating student learning. Missing from the New Designs list, but included in four of the sources was ensuring that students meet curriculum standards. Two others missing from the New Designs list but included in at least two sources were (1) personal qualities (e.g., positive attitude, resourceful, leadership) and (2) teaches from a critical social perspective.
- It was difficult to classify items into the design specification "Demonstrates competence in the specialized area of work" because it could be interpreted to include more than subject-matter/content expertise. Perhaps this specification needs to be reconsidered with consideration given to separating pedagogy and specific subject-matter/content expertise.

The following conclusions were drawn after reviewing the analysis relating to staff development:

- The patterns were not as evident as they were for learning staff.
- The design specifications that received the least attention were (1) Models the design specifications for staff and (2) Includes all staff.
- All other design specifications were mentioned several times.
- Missing from the design specifications but included in one or more of the sources were evaluation or assessment of the value of staff development activities, competency in subject-matter content, and funding for staff development.
- The classification process was fairly straightforward for the design specifications.

Conference/Workshop with Practitioners and Researchers

As a culmination to the activities of the project, a conference/workshop was held to discuss and begin to form recommendations for advancing the design specifications for staffing and staff development in high schools and community/technical colleges implementing New Designs for Learning/educational reforms. The purpose and results of the conference/workshop are described in the following sections. Appendix B includes a copy of the conference/workshop program, guidelines given to the presenters, and a list of participants.

Purpose

The specific purpose of the conference/workshop was to revise the draft design specifications for staffing and staff development that emerged from the initial activities in the project. The benefits to participants were to stimulate thinking, gain new perspectives, and build momentum for continued improvement in staffing and staff development supportive of New Designs for Learning and educational reform. The conference/workshop was specifically designed to involve 20-30 individuals with some familiarity with New Designs for Learning at the secondary and postsecondary levels and who represented both practitioner and researcher perspectives.

The learning experience in the conference/workshop included the following components: (1) a briefing on New Design theory and applications, (2) a review of research and best practice, (3) a national leadership vision, (4) a tour of practice, (5) a discussion among a panel of experts with different vantage points, and (6) interaction among workshop participants in a variety of formats.

Results

The results of the conference/workshop were captured in several ways. First, a conference/workshop notebook was provided to each participant and contained materials for the conference (e.g., papers, Power Point slide presentations, draft design specifications) and a place to keep their notes. Participants were also given pens and markers to use in editing the draft design specifications and for communicating with other participants throughout the conference/workshop. The notes and editing were particularly useful in the workshop session at the end of the program, which involved small-group interaction, and in forming specific recommendations

for improving the draft design specifications for staffing and staff development. As the conference/workshop's culminating activity, the participants presented their notebooks to the conference directors for use in preparing the final project report. These notebooks were subsequently photocopied and returned to the participants. Each participant received a hardhat to recognize his or her contribution and involvement in extending and refining the New Designs specifications for staffing and staff development. The specific suggestions made by the participants have been incorporated into the recommendations presented in the next section of the report.

Recommendations

Staffing

Our recommendations address the three questions posed for the project in terms of staffing: (1) Who are the staff? (2) What competencies do the learning staff need? and (3) What conceptual framework represents the needed competencies of learning staff?

Who Are the Staff?

We recommend that "the staff" be defined to include all those who are involved in the teaching and learning process and are therefore responsible for the success of educational reform. Thus, the staff includes the following groups of people:

- Typical employees of educational organizations such as teachers / faculty, counselors, administrators, secretaries, custodians, paraprofessionals, and aides
- Mentors, volunteers, advisors, and board members/trustees (because they guide and oversee learning)
- Family (because they support the learning of students)
- Students (because they are involved in formal and informal peer teaching)

Successful educational organizations must take account of and support the contributions and interdependence of each of these categories of individuals—the learning staff.

What Competencies Do the Learning Staff Need?

The recommended competencies required by the learning staff in the context of New Designs for Learning and educational reform include the following:

- Aligns with design specifications for learning context, signature, expectations, process, organization, and partnerships. Learning staff competencies must be closely aligned with the design specifications for other elements of New Designs for Learning.
- Demonstrates the learning expectations. Learning staff individually and collectively model the learning expectations that students are to accomplish.

- Ensures that each learner is known and served well. Learning staff take time to get to know each learner (including his or her prior learning) and provide for the "wrap-around" and advocacy support (e.g., academic, social, psychological, and physical) needed by each learner in an integrated fashion.
- Enables learners to construct knowledge. Learning staff support learning
 that produces products valued by the learner and wider community,
 involves extensive project-based learning, integrates subject-matter areas,
 and uses and closely connects community-based learning with schoolbased learning.
- Demonstrates just-in-time learning design. Learning staff are flexible, resourceful, and innovative and can effectively manage the design and execution of learning experiences, both formal and informal, that are very responsive to the needs of learners and the context in which learning is taking place.
- Demonstrates competence in a subject-matter area (if appropriate to their role).
 Learning staff know a specialized area of subject matter or content if it is needed for their role and responsibilities in the design and delivery of learning experiences.
- Builds learning communities. Learning staff facilitate the development of strong learning communities, using skills such as organizing and leading teams, understanding and valuing diversity, establishing trust, balancing freedom and responsibility, being supportive, and building and maintaining a positive attitude.
- Handles multiple roles. Learning staff know their roles and responsibilities
 and are competent and willing to contribute to the learning experience
 in a variety of ways (e.g., teacher, counselor, mentor, leader, follower,
 supporter, resource manager).
- Partners with others. Learning staff are skilled at identifying, establishing, and maintaining collaborative partnerships with others inside and outside the educational institution to enhance the learning experience.
- *Takes leadership for learning*. Learning staff take the initiative to seek opportunities and resolve problems in creative and innovative ways.
- Values diversity. Learning staff understand, value, and can operate
 effectively with a diversity of learners and partners.

- Operates as information navigator. Learning staff effectively select, design, and make use of information systems and technology and guide others to do the same.
- Leads in and uses continuous quality improvement. Learning staff apply continuous quality improvement (e.g., plan, act, collect data, reflect) to the learning experience with expectations of excellence that are constantly updated, performance that is continually assessed, and rewards and recognition that are closely linked to meeting expectations.
- Continues to learn. Learning staff recognize the value of lifelong learning
 for all staff, view lifelong learning as a shared responsibility of the
 individual and the institution, value and contribute to regular assessment
 of their practice, participate in renewal opportunities, and commit
 resources for staff development.

What Conceptual Framework Represents the Needed Competencies of Learning Staff?

A conceptual framework that represents the competencies needed by staff in implementing New Designs for Learning/educational reform focuses on the multiple roles and responsibilities of the learning staff. Many of these roles and responsibilities are new or have an increased importance for all categories of staff in an environment of educational reform. This conceptual framework is as follows (refer to the preceding section for elaboration of the competencies listed):

1. Teacher

- Enables learners to construct knowledge
- Operates as information navigator
- Demonstrates competence in a subject-matter area

2. Learner

- Leads in and uses continuous quality improvement
- · Continues to learn

3. Leader

- Takes leadership for learning
- Handles multiple roles
- Demonstrates the learning expectations

4. Partner

- Partners with others
- Values diversity
- Builds learning communities

5. Counselor

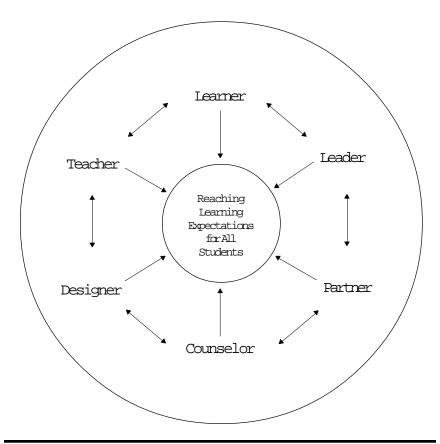
• Ensures that each learner is known and served well

6. Designer

• Demonstrates just-in-time learning design

These six roles and responsibilities for learning staff are displayed in Figure 1. The aim, portrayed in the center, is to have all students reach the learning expectations set forth by the educational organization.

Figure 1. Roles and Responsibilities for Learning Staff in the Context of Educational Reform and New Designs for Learning



Staff Development

Our recommendations regarding staff development address the question, "What are the desired features of the staff development process?"

The recommended design specifications for effective staff development in the context of educational reform are as follows:

- Aligns with design specifications for learning context, signature, expectations, process, organization, partnerships, and staffing. Learning staff development pays close attention to the design specifications for other elements of New Designs for Learning.
- Models the design specifications for staff. Learning staff development demonstrates and models the knowledge and skills expected of the learning staff.
- *Includes all staff.* Learning staff development responds in a coordinated and consistent way to the educational needs of all those making a contribution to the learning experience and builds educational capacity and the idea of a learning leadership community throughout the organization.
- Integrates with operation of educational institution. Learning staff
 development is closely coordinated, coherent, and embedded with the
 mission, vision, needs, values, priorities, plans, and constraints of the
 educational organization; is accessible when and where needed; and is
 supported and modeled in the organization's leadership.
- Promotes sharing and collegiality among staff. Learning staff development views all categories of staff as assets, builds on the strengths of the staff, and encourages sharing of good practices among the staff (e.g., staff teach other staff, make tacit knowledge more explicit, publish and present effective theories and practices).
- *Involves all categories of staff in planning*. Learning staff development involves all categories of staff in identifying needs, planning learning experiences, and assessing results.
- Attends to the special needs of new staff, staff with new responsibilities, and staff who are leaving. Learning staff development provides the needed support and training for new staff, new responsibilities, job changes (e.g., crosstraining and advancement), and transition to work positions in other organizations or life plans/roles.

- Includes formal and informal learning experiences. Learning staff development encourages networking, collegiality, mutual support, and deep individual and collective reflection among the staff.
- Supports a culture of innovation and experimentation. Learning staff development encourages creativity and questioning, discovery of new solutions, and building of new knowledge about teaching and learning as a part of daily practice in the organization.
- *Renews and sustains the energy of staff.* Learning staff development maintains, rejuvenates, and enhances the energy of the staff.
- Attends to individual, group, and team learning. Learning staff development provides learning opportunities for individual learning, group learning, and team development and learning.
- Provides funds, time, and space. Learning staff development provides the funds, time, and place for training and development for all categories of staff and is sensitive to the timing needs and constraints of those involved.
- Is ongoing. Learning staff development is continuous, systematic, and based on long-term plans, with needed follow-up to support improvements in practice.
- Is up-to-date and research-based. Learning staff development is current with best practices and sound research (e.g., formal studies, action research).
- Includes a variety of sources. Learning staff development includes creative
 and best use of a variety of approaches to, sources of, and ways of
 delivering education and training.
- *Provides incentives for learning*. Learning staff development is aligned with performance and reward systems for staff, both intrinsic and extrinsic.
- Improves performance of staff. Learning staff development applies rigorous standards that are authentic for the organization, visibly connects new learning to the culture and everyday practice of the organization, and expects results in improved learning for students.
- Uses continuous quality improvement. Learning staff development seeks and uses assessment and feedback on its performance to continuously improve its responsiveness and effectiveness.

Implications

The recommendations presented in the previous section have implications for professional practice, policy, and further research.

Professional Practice

The most salient implications for professional practice are as follows:

- Think beyond the typical categories of staff and recognize their interdependence. The success of New Designs for Learning depends on the performance of all categories of staff and the recognition of their interdependence; therefore, the selection, orientation, training, direction, assessment, and incentives of all staff must be valued and coordinated in planning and implementing New Designs for Learning.
- Think beyond the typical competencies of staff. The competency areas of teacher, learner, leader, counselor, designer, and partner all must be addressed in the selection, orientation, training, direction, assessment, and incentives for learning staff to ensure success in planning and implementing New Designs for Learning.
- Think beyond the typical framework for staff development. The framework for staff development must address the needs of all learning staff, all competency areas, and all design specifications for staff development for it to be effective in supporting the planning and implementation of New Designs for Learning.

Policy

The following implications seem most important for guiding educational policy and supporting New Designs for Learning/educational reform:

- Consider the interdependence of staffing and other design elements. Educational policy must address the interdependence of staffing with the other design elements in New Designs for Learning to support successful planning and implementation.
- Consider the interdependence among categories of staff. Educational policy
 must recognize and support the interrelationships among all categories
 of staff to maximize the chances of success for New Designs for Learning.

Consider the criticality of staff development. Educational policy must affirm
the strategic importance of staff development for all categories of staff if
educational reform is to have even a modest chance of success.

Further Research

Further research to refine and verify the design features of staffing and staff development in the context of New Designs for Learning / educational reform should include the following:

- Identify learning products and projects that lead to developing and exhibiting
 the performance implicit in the competencies required of learning staff. Further
 research should be conducted to identify the kinds of learning products
 that staff might produce and the projects in which they might engage
 that have the best chance to develop their competence in each of the
 desired competency areas.
- Design learning environments that lead to effective and efficient development of the competencies required by learning staff. Further research should be conducted to describe the features of the learning environment (e.g., technology, staffing, facilities) that best support the production of the learning products that have been identified as conducive to the development of the desired competencies.

Bibliography

- Baker III, G. A. (1998, March). The future of academic leadership in the community college. *Academic Leadership*.
- Baldwin, R. G. (1998). Technology's impact on faculty life and work. *New Directions for Teaching and Learning*, 76, 7-21.
- Beane, J. A. (Ed.). (1995). *Towards a coherent curriculum*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Boyer, E. L. (1995). *The basic school: A community for learning*. Menlo Park, CA: Carnegie Foundation.
- Buday, M. C., & Kelly, J. A. (1996). National board certification and the teaching profession's commitment to quality assurance. *Phi Delta Kappan*, 78(3), 215-219.
- Caine, R., & Caine, G. (1994). *Making connections: Teaching and the human brain*. Menlo Park, CA: Addison Wesley.
- Central Lakes College Design Group. (1998). *Designs for the future: Executive summary of Central Lakes College strategic planning*. Brainerd, MN: Author.
- Colling, J. C., & Porras, J. (1996). Built to last: Successful habits of visionary companies. New York: Harper Business.
- Commission on the Future of Community Colleges. (1988). *Building communities: A vision for a new century.* Washington, DC: American Association of Community and Junior Colleges.
- Consortium for Policy Research in Education. (1995, June). *Professional development today* (CPRE Policy Brief: Helping teachers teach well: Transforming professional development). Available online: www.ed.gov/pubs/CPRE/t61/t61c.html>.
- Copa, G. H. (1999, August). New designs for learning. *CenterPoint* (6). Berkeley: National Center for Research in Vocational Education, University of California, Berkeley.
- Copa, G. H., & Ammentorp, W. (1997). *New designs for the two-year institution of higher education* (MDS-1109). Berkeley: National Center for Research in Vocational Education, University of California, Berkeley.

- Copa, G. H., Beck, R. H., & Pease, V. H. (1992). *New designs for the comprehensive high school* (MDS-282). Berkeley: National Center for Research in Vocational Education, University of California, Berkeley.
- Copa, G. H., & Plihal, J. (1999, March). *New designs for staffing and staff development*. Paper presented at the meeting of the National Center for Research in Vocational Education, Minneapolis.
- Cross, K. P. (1997). *Developing professional fitness through classroom assessment and classroom research* (The Cross Papers, No. 1). Mission Viejo, CA: The League for Innovation in the Community College.
- Cross, K. P. (1998). *Opening windows on learning* (The Cross Papers, No. 2). Mission Viejo, CA: The League for Innovation in the Community College.
- Darling-Hammond, L. (1997). *Doing what matters most: Investing in quality teaching.* (ERIC Document Reproduction Service No. ED 415 183)
- Diez, M. E. (1998). Changing the practice of teacher education: Standards and assessment as a lever for change. Washington, DC: American Association of Colleges for Teacher Education. (ERIC Document Reproduction Service No. ED 417 157)
- Di Petta, T. C. (1998). Community on-line: New professional environments for higher education. *New Directions for Teaching and Learning*, 76, 53-66.
- Kouzes, J. M., & Posner, B. Z. (1995). *The leadership challenge*. San Francisco: Jossey-Bass.
- Kraft, N. P. (1999). *Strategies for professional development*. Available online: www.rmcdenver.com/visionfr/pdstrt.html.
- Lane, C. (1999, February). Metadata. Technology for Learning.
- Lenning, O. T., & Ebbers, L. H. (1999). The powerful potential of learning communities: Improving education for the future (ASHE-ERIC Higher Education Report, 26[6]). Washington, DC: George Washington University, Graduate School of Education and Human Development.
- Little, J. W. (1994). *Teachers' professional development in a climate of educational reform*. Available online: <www.ed.gov/pubs/EdReform Studies/SysReforms/little1.html>.

- Matthews, R. S. (1994). Enriching teaching and learning through learning communities. In T. O'Banion (Ed.), *Teaching and learning in the community college* (pp. 179-200). Washington, DC: Community College Press.
- McKenzie, J. (1999). *Staff development for the information age*. Available online: <magic.usi.edu/educ568/staff.html>.
- Moore, J., & Benton, J. (1998). *New teacher standards and learner diversity: Ideas for authentic assessment*. Paper presented at American Association of Colleges for Teacher Education. (ERIC Document Reproduction Service No. ED 418 060)
- National Association of Secondary School Principals. (1996). *Breaking ranks: Changing an American institution*. Reston, VA: Author.
- National Board for Professional Teaching Standards (1990). Toward high and rigorous standards for teachers. *Education Digest LV*, (5), 6-8.
- National Council for Accreditation of Teacher Education (1999). *NCATE standards*. Available online: <www.ncate.org/about/stdintro.html>.
- National Staff Development Council. (1999, July). *NSDC standards for staff development*. Available online: <www.lnsdc.org/list.html>.
- O'Banion, T. (Ed.). (1994). *Teaching and learning in the community college*. Washington, DC: Community College Press.
- O'Banion, T. (1997). A learning college for the 21st century. Phoenix: Oryx Press.
- Ohio State Department of Education. (1997). *Teacher education and licensure standards: Administrative code chapter 3301-24 as Adopted October 15, 1996*. (ERIC Document Reproduction Service No. ED 417 187)
- Oklahoma State Commission for Teacher Preparation. (1994). *Educator preparation and professional development report*. (ERIC Document Reproduction Service No. ED 402 281)
- Palloff, R. M., & Pratt, K. (1999). *Building learning communities in cyberspace*. San Francisco: Jossey-Bass.
- Roueche, J. E., Roueche, S. D., & Milliron, M. D. (1995). *Strangers in their own land*. Washington, DC: Community College Press.

- Seagren, A. T., Creswell, J. W., & Wheeler, D. W. (1993). *The department chair: New roles, responsibilities and challenges.* Washington, DC: George Washington University, School of Education and Human Development.
- Senge, P. (1995). The fifth discipline. New York: Doubleday.
- Snowden, J. B., Shapiro, B. C., & Streeter, K. R. (1993). The National Board for Professional Teaching Standards: Making a profession. *Middle School Journal*, 68-71.
- Sylwester, R. (1995). *A celebration of neurons*. Alexandria, VA: Association for Supervision and Curriculum Development.
- Teachers Standards and Practices Commission. (1998a). *Oregon administrative rules*. Standards for program approval: Objectives for initial teacher license, Div. 017, 4-5.
- Teachers Standards and Practices Commission. (1998b). *Oregon administrative rules*. Standards for program approval: Objectives for continuing teacher license, Div. 017, 7-8.
- U.S. Department of Education. (1996). *High-quality professional development supports education reform* (Improving America's Schools: Newsletter on Issues in School Reform). Available online: <www.ed.gov/pubs/IASA/newsletters/profdev/hqprodev.html>.
- What research is saying about professional development. (n.d.). Available online: <ra.terc.edu/alliance/TEMPLATE/regional_networks/cia/profdev/pdmemo.html>.
- Wisconsin State Department of Education. (1997). Restructuring teacher education and licensing in Wisconsin: Final report of the work groups on teacher assessment, license stages and license categories (Bulletin No. 97306). Madison: Department of Public Instruction. (ERIC Document Reproduction Service No. ED 415 210)

APPENDIX A

Tables

Table 1. Comparison of New Designs Specifications for Learning Staff with Competencies of Existing Professional Frameworks

New Designs	NCATE (National Association for the Accreditation of Teacher Education)	NBPTS (National Board for Professional Teaching Standards)	National Commission on Teaching and America's Future
Aligns with design specifications for fearning context, signature, expectations, process, organization, and partnerships.			
Includes all those making a contribution to the learning experience.		Thinks systematically about their practice.	
Demonstrates the learning expectations held for students.			
Demonstrates competence in their specialized area of work.	Demonstrates mastery of content area, professional and pedagogical knowledge, and skills.	 Knows the subject to be taught and how to teach the subject to students. Commands specialized knowledge of how to convey a subject to students. 	
Ensures that each learner is known and served well.	Has a positive effect on student learning at levels expected by the profession and state.	 Commits to students and their learning. Is responsible for managing student learning. Recognizes that there are multiple paths to knowledge. 	
Manages constructivist learning.			
Handles just-in-time fearning design.			
Builds learning communities.		Belongs to learning communities.	
Partners with others.		Collaborates with other professionals, parents, and community partners.	Adopts shared standards for student learning that become the basis for common efforts of teachers, parents, and the community.

Table 1 (cont.)

Nost Position	NCATE (National Association for the	NBPTS (National Board for	National Commission on Teaching and
Takes an entrepreneurial stance.		Recognizes individual differences in students and adjusts practices accordingly.	
Commits to value of diversity.	Includes persons of racial, ethnic, gender, socioeconomic status, language, and religious diversity, including persons with disabilities and persons from different regions of the country and world.		
Operates as information navigator.			
(Assessment)	Uses a variety of assessment practices to evaluate student learning as well as their own effectiveness.	Regularly assesses student progress.	
(Standards)	Meets standards (professional, state, and institutional).		Demonstrates ability to teach to standards.
(Use of research)		Draws on education research and scholarship to improve practice.	
(Critical social perspective)	Uses a critical social perspective in working with others.		

Table 1 (cont.)

New Designs	Outcomes for Professional Teacher Education Programs	National Staff Development Council)
Aligns with design specifications for learning context, signature, expectations, process, organization, and partnerships.		
Includes all those making a contribution to the learning experience.		
Demonstrates the learning expectations held for students.		
Demonstrates competence in specialized area of work.	Understands the nature of the disciplines and the content knowledge.	
Ensures that each tearner is known and served well.	Effectively facilitates maximum learning for all students.	
Manages constructivist learning.	Promotes student construction and acquisition of new knowledge.	
Handles just-in-time learning design.		
Builds learning communities.		
Partners with others.		Obtains continuing support that motivates all staff, school board members, parents, and the community to be advocates for continuous improvement.
Takes an entrepreneurial stance.		
Commits to value of diversity.	Teaches to the democratic ideals of a diverse society.	
Operates as information navigator.		
(Assessment)	Uses a variety of assessment strategies to evaluate and improve teaching and learning in the classroom.	
(Personal and professional)	Uses a variety of assessment strategies to evaluate and improve teaching and learning in the classroom.	Requires strong leadership skills.

Table 2. Comparison of New Designs Specifications for Learning Staff with Competencies of Existing State Standards for Licensure

New Designs	Ohio	Kentucky	Оківінопія
Aligns with design specifications for learning context, signature, expectations, process, organization, and partnerships.			
includes all those making a contribution to the learning experience.			
Demonstrates the fearning expectations held for students.			 Models training and collaboration. Models the democratic principles of freedom, diversity, and tolerance.
Demonstrates competence in specialized area of work.	Has thorough understanding and knowledge of subject matter.	 Plans instruction. Implements and manages instruction. Possesses knowledge of content. 	 Demonstrates knowledge of subject matter. Demonstrates ability to think critically. Demonstrates competence in family, technology, school law, and career education.
Ensures that each learner is known and served well.	Understands bow students learn and develop. Creates opportunities for each student's academic development.	Creates and maintains Jearning climates.	 Ensures that teachers identify and develop talent and potential in students. Provides a variety of learning experiences.
Manages constructivist learning.	Encourages active, engaged learning and self-motivation.		
Handles just-in-time teaming design.			Incorporates job-related experiences refevent to the candidate's teaching field.
Builds learning communities.			

Table 2 (cont.)

New Designs	0pp	Kentucky	Oklahoma
Partners with others.	Works with parents and other family members, school colleagues, and community members to support student learning and development.	Collaborates with colleagues, partners, and others.	 Involves the community in cducation. Works with parents and partners. Fosters collaboration and teamwork within and among schools, including vocational-technical schools, two- and four-year colleges, and other job-training programs.
Takes an entreprencurial stance.			
Commits to value of diversity.	Understands differences in how students learn. Provides instruction to accommodate diversity.		 Interacts effectively with diverse students. Possesses competencies in multiculturalism.
Operates as information navigator.			
(Creates learning environment)	Creates a learning environment that encourages active, engaged learning, positive interaction, and self-motivation for all students.		
(Assessment)	Uses formal and informal assessment strategies to evaluate student progress.	 Assesses and communicates learning results. Reflects on and evaluates teaching and learning. 	Demonstrates the ability to ortique, construct, and use appropriate assessment techniques.
(Initiates professional development)	Analyzes past experiences and pursues professional development opportunities to improve future performance.		
(Standards)			Has ability to teach to standards.

Table 2 (cont.)

New Designs	Wisconsin	Oregon
Aligns with design specifications for learning context, signature, expectations, process, organization, and partnerships.		
Includes all those making a contribution to the learning experience.		
Demonstrates the learning expectations held for students.		
Demonstrates competence in specialized area of work.	Shows evidence of content and pedagogical knowledge and their application.	Plans instruction that supports student prugress in learning and is appropriate for the developmental level
Ensures that each learner is known and served well.		Establishes a classroom climate conducive to learning.
Manages constructivist learning		Engage students in planned learning activities.
Handles just-in-time learning design.		
Builds learning communities.		
Partners with others.		
Takes an entrepreneurial stance.		
Commits to value of diversity.		
Operates as information navigator.		
(Assessment)		Evaluates, acts upon, and reports student progress in learning.
(Standards)		Incorporates district and state standards into learning experiences.
(Use of research)		Uses emerging research on teaching, learning, and school improvement to enhance practices as a professional educator.
(Critical social perspective)		Uses a critical social perspective in working with others.
(Professional and ethical behaviors)		Exhibits professional behaviors, ethics, and values.

Table 3. Comparison of New Designs Specifications for Learning Staff Development with Competencies of Existing Professional Frameworks

New Designs	NCATE (National Association for the Accreditation of Teacher Education)	National Commission on Teaching and America's Future	Outcomes for Professional Teacher Education Programs
Aligns with learning context, signature, expectations, process, organization, partnerships, and staffing.			
Models the design specifications for staff.			
Includes all staff.			
Integrates with operation of educational institution		Embeds professional development in teachers' daily work through joint planning, study groups, and peer coaching.	
Promotes sharing among staff.		Embeds professional development in teachers' daily work through joint planning.	
Involves staff and students in planning.		Analyzes past experiences and pursues professional development opportunities to improve future performance.	
Is ongoing.	Promotes continuing professional development.	Embeds professional development in teachers' daily work.	Is a lifelong learner.
Is up-to-date and research-based.	Includes study and application of current research findings about teaching and learning.	Embeds professional development in teachers' daily work through research.	
Includes a variety of sources.			
Provides incentives for learning.		Encourages and rewards knowledge and skill.	
(Diversity)	Includes experiences with diverse audiences and course content related to diversity that connects with classroom experiences.		
(Standards)		Is organized around standards for students and for teachers.	

Table 3 (cont.)

New Designs	NSDC (National Staff Development Council)	CPRE (Consortium for Policy Research in Education)	Designing Professional Development for Teachers of Science and Mathematics
Aligns with learning context, signature, expectations, process, organization, partnerships, and staffing.			
Models the design specifications for staff.	Prepares educators to demonstrate high expectations for student learning.	Models constructivist teaching.	
Includes all staff.	Increases staff knowledge and practice of interdisciplinary team organization and instruction.		
Integrales with operation of educational institution.	 Aligns with school's and district's strategic plan and is funded by a line item in the budget. Provides adequate time during the workday for staff members to learn and work together to accomplish the school's mission and gods. 	Stimulates and supports site-based initiatives.	Provides links to other parts of the educational system.
Promotes sharing among staff.	Requires staff members to learn and apply collaborative skills to conduct meetings, make shared decisions, solve problems, and work together.	 Demonstrates respect for teachers as professionals and as adult learners. Draws on the expertise of teachers and takes into account differing degrees of teacher experience. Works regularly with others in the field. 	
Involves staff and students in planning.		Supports teacher initiatives.	
Is ongoing.	Requires and fosters a norm of continuous improvement.		

able 3 (cont.)

New Designs	NSDC (National Staff Development Council)	CPRE (Consortium for Policy Research in Education)	Designing Professional Development for Teachers of Science and Mathematics
Is up-to-date and research-based.	 Uses content that has proven value in increasing student learning and development. Prepares teachers to use research-based teaching strategies appropriate to their instructional objectives and their students. Is an innovation in itself that requires study of the change process. Is based on knowledge about human learning and development. 	Is grounded in knowledge about teaching.	Addresses the pedagogical content knowledge of math and science. Is driven by a clear, welldefined image of effective classroom learning and teaching.
Includes a variety of sources.			Uses a comprehensive approach that assues that all aspects (policy, assessment, curriculum, instruction, and parent involvement) are working together.
Provides incentives for learning	Provides adequate time during the workday for staff members to learn and work together to accomplish the school's mission and goals.	 Offers intellectual, social, and emotional engagement with ideas, materials, and colleagues. Provides for sufficient time and follow-up support for teachers to master new content and strategies and to integrate them into their practice. Is accessible and inclusive. Is accessible and inclusive. Is viewed as an integral part of teachers' work rather than as a privilege granted. 	Supports trachers to serve in leadership roles.

Table 3 (cont.)

New Designs	NSDC (National Staff Development Council)	CPRE (Consortium for Policy Research in Education)	Designing Professional Bevelopment for Teachers of Science and Mathematics
(Parinerships)	Obtains continuing support that motivates all staff, school board members, parents, and the community to be advocates for continuous improvement. Facilitates staff collaboration with and support of families for improving student performance.		
(Content and pedagogy)	 Provides knowledge, skills, and attitudes regarding organization development and systems thinking. Enables educators to provide challenging: developmentally appropriate curricula that engage students in integrative ways of thinking and fearning. 		
(Assessment)	Requires an evaluation process that is orgoing, includes multiple sources of information, and focuses on all levels of the organization. Prepares teachers to use various types of performance assessment in their classrooms.		Ensures continuous staff self- assessment and improvements to ensure pusitive impact on teacher effectiveness, student learning, leadership, and the school community.
(Diversity)	Addresses diversity by providing awareness and training related to the knowledge, skills, and behaviors needed to ensure that an equitable and quality education is provided to all students.		
(Service)	Prepares educators to combine academic student learning goals with service to the community.		
(Benefit for students)			Improves student learning.

Fable 3 (cont.)

New Designs	Teachers' Professional Development in a Climate of Educational Reform by Judith Warren Little (1994)	Staff Development for the Information Age by Jamieson McKenzie (1999)
Aligns with learning context, signature, expectations, process, organization, partnerships, and staffing.	Is oriented toward principles, not programs or specific practices.	
Models the design specifications for staff.		
Includes all staff.		
Integrates with operation of educational institution.	Pays close attention to the focal context.	
Promotes sharing among staff.		
Involves staff and students in planning		 Responds to teachers' appetites, concerns, and interests. Engages the perspectives of the teachers.
Is ongoing.		:
Is up-to-date and research- based.	Aligns with subject-matter reforms (e.g., shifts to authentic assessment, whole language, and literature-based approach; new mathematics standards; integrated science curricula).	
includes a variety of sources.	Allows teachers to study classroom practices in ways that sometimes lead to more systemic changes at the school level.	Is experience-based, with learning resulting from doing and exploring.
Provides incentives for learning.	Requires professionalization: extended assistance to new teachers, expanded career opportunities for experienced teachers, and experiments in site-based decisiontraking.	
(Assessment)	Assists teachers in nature, extent, and use of student assessment	
(Diverse populations)	Is aimed at altering both demonstrated achievement and school completion rates of the lowest achieving groups (rather than remedying student deficiencies).	
(Benefit for students)		 Offers immersion and transformation. Considers feelings, fears, and auxicioes of the learners. Appeals to learners at a variety of developmental stages.
(Funding)		Is properly funded.

Table 4. Comparison of New Designs Specifications for Learning Staff Development with Competencies of Existing State Standards for Licensure

New Designs	Ohio	Oklahoma	Wisconsin
Aligns with learning context, signature, expectations, process, organization, partnerships, and staffing.			
Models the design specifications for staff.			
Includes all staff.			
Integrates with operation of educational institution.			
Promotes staring among staff.		Enables staff to collaborate with colleagues during professional development.	
Involves staff and students in planning.	Enables staff to analyze past experiences and pursue professional development opportunities to improve faure performance.		
is ongoing.			
Is up-to-date and research-based.			
Includes a variety of sources.		Enables staff to experience business and industry simations through summer institutes and work study programs, or with menuns.	
Provides incentives for learning.			
(Human relations)			Enables staff to show evidence of effective human relation skills and appropriate dispositions for teaching.

Table 4 (cont.)

New Designs	Oregon	U.S. Department of Education
Aligns with learning context, signature, expectations, process, organization, partnerships, and staffing.		
Models the design specifications for staff.		
Includes all staff.	Enables staff to participate in designing, evaluating and and improving apportunities for teaching and learning in an educational institution.	Focuses on teachers as central to student learning, yet includes all members of the selvol community.
Integrates with operation of educational institution.		Focuses on individual, collegial, and organizational improvement.
Promotes sharing among staff.	Enables staff to collaborate with colleagues to enhance job performance and advance teaching as a profession.	
Involves staff and students in planning.	Enables staff to participate in designing, evaluating and improving opportunities for teaching and learning in an educational institution.	Is planned collaboratively by those who will participate in and facilitate that development.
Is ougoing.		 Promotes continuous inquiry and improvement embedded in the daily life of schools. Is driven by a coherent long-term plan
Is up-to-date and research-based.	 Assists staff in implementation of instructional plans that use research-based educational practices that reflect how students learn. Uses energing research on teaching, learning, and school improvement to enhance staff practices. 	Reflects the best available research and practice in traching, learning, and leadership.
Includes a variety of sources.		
Provides incentives for learning.		 Respects and nurtures intellectual and leadership capacity of teachers, principals, and others in the school community. Requires substantial time and resources.

Table 4 (cont)

New Designs	Oregon	U.S. Department of Education
(Content and pedagogy)	Enables staff to design instructional plans that	Enables teachers to develop further expertise in subject
	incorporate knowledge of students' developmental	content, teaching strategies, uses of technologies, and
	levels, interests, and abilities consistent with content	other essential elements of teaching to high standards.
	goals and district standards.	
(Assessment)	Enables staff to assess knowledge and skill of	Is evaluated ultimately on the basis of its effects on
	students in relation to content goals and district	teacher instruction and student learning, and uses this
	standards. Enables staff to document and report	assessment to guide subsequent professional
	progress of students in achieving content goals and	development efforts.
	district startdards.	
(Diversity)	Supports the implementation of instructional plans	
	that are sensitive to individual differences and	
	diverse cultures.	

APPENDIX B

Conference/Workshop Program

New Designs for Staffing and Staff Development

Conference and Workshop May 13-15, 1999

Doubletree Guest Suites Minneapolis, Minnesota

Time	Event	Speaker/Principal
1:00-2:30	Welcome New Designs for Learning Briefing	Jane Plihal University of Minnesota George Copa Oregon State University
2:30-2:45	Break	
2:45-4:00	Staffing and Staff Development: A Review of Research and Best Practices for High Schools	Burton Cohen and Peter Hilts School of Environmental Studies Apple Valley, MN
	Discussion	
4:00-4:15	Break	
4:15-5:30	Staffing and Staff Development: A Review of Research and Best Practices for Two-Year Institutions of Higher Education	Maria Nock Miami-Dade Community College
	Discussion	
5:30-6:00	Break	
6:00-6:45	Dinner	
6:45-7:30	After-Dinner Conversation with Patricia McNeil	
7:30	Adjourn	

Time	Event	Speaker/Principal
7:30-8:00	Assemble: Continental Breakfast "To Go"	
8:00	Board Bus for Tour	
8:00-8:30	Briefing en route	George Copa and Dan Bodette
8:30-10:30	Tour and Briefing New Designs in Practice School of Environmental Studies	Host Dan Bodette, Principal
10:30-11:00	Briefing en route	George Copa and Sharon Grossbach
11:00-11:30	Brunch	Hennepin Technical College Eden Prairie Campus
11:30-1:30	Tour and Briefing New Designs in Practice Hennepin Technical College	Host Sharon Grossbach, President
1:30-2:00	Debriefing en route	George Copa
2:00-2:30	Return to Hotel	
2:30-4:00	Expert Panel	Jane Plihal, Moderator
4:00-5:30	Workshop Advancing New Designs for Staffing and Staff Development	George Copa and Jane Plihal
5:30	Adjourn	
Saturday, N	fay 15	
Time	Event	Speaker/Principal
8:00-8:30	Continental Breakfast	
8:30-10:00	Hard-Hat Tour and Briefing New Designs in Practice	
	Downtown School Minneapolis, MN	
10:00-1:00	Workshop Advancing New Designs for Staffing and Staff Development	George Copa and Jane Plihal
1:00	Conference Close Celebration	George Copa

"New Designs" Hard Hats

Guidelines Provided to Conference/Workshop Presenters

The following guidelines were given to the authors of the review of research and best practice (Burton Cohen, Peter Hilts, and Marie Nock): This is to be a working conference and your remarks should be provocative and lead to discussion among the other conference participants. Drawing on the results of your review of research and best practice, address the following questions: (1) How did you go about the development of your paper? (2) What did you find and what are you recommending about staffing features to be effective in implementing major educational reforms such as those incorporated into New Designs for Learning? (3) What did you find and what are you recommending about the features and strategies of staff development processes that are likely to be effective in developing the needed staff features? and (4) What are some of the major issues/challenges confronting the improvement of staffing and staff development in the context of implementing educational reform?

The following guidelines were given to the panel members (Debra Bragg, Phyllis Hudecki, Bonnie Longnion, and Karen Seashore Louis): This is to be a working conference and your remarks should be provocative and lead to discussion among the other conference participants. Drawing on your experiences, address the following questions: (1) What are the competencies needed by staff to be effective in implementing major educational reforms? (2) What are the features and strategies of staff development processes that are likely to be effective in developing the needed competencies? and (3) [If you have time] What are some of the major issues / challenges confronting the improvement of staffing and staff development in the context of implementing educational reform?

The following guidelines were given to the hosts and tour leaders (Dan Bodette and Sharon Grossbach): My suggestions for the briefing/tour are as follows: (1) overview of your institution (e.g., mission, values, vision, history, and scope of operations), (2) briefing on features of New Designs in practice at your institution (this could be a tour of learning environment, interaction with learners and/or staff, interaction with partners, formal presentation of some features that you think would be of interest and that you feel good about, or some combination of these approaches), and (3) informal conversation with you about challenges of implementing New Designs concepts and implications for staffing and staff development. This is to be a working conference and your remarks should be provocative and lead to discussion among the other conference participants.

The following guidelines were given to the keynote speaker (Patricia McNeil): We would like this to be more of an opportunity for informal conversation with you than a formal presentation. Perhaps you could start by sharing your thoughts and experiences regarding staffing and staff development in the context of K-12 and community/technical college

reform. You might organize your remarks in response to the following questions: (1) What are the major changes (policy initiatives) that need to be accomplished in K-12 and community/technical colleges (e.g., more rigorous standards, preparation for both college and careers, integrating the curriculum, linking secondary and postsecondary education, learning in the community)? (2) What are the new competencies needed by staff to effectively implement these changes? (3) What are the features and strategies of staff development processes that are likely to be effective in developing the needed competencies? and (4) What are some of the major challenges confronting the improvement of staffing and staff development in the context of educational reform?

Conference/Workshop Participants

The participants were selected to represent practitioners and researchers with interest and expertise in staffing and staff development in secondary and postsecondary education. The practitioners had direct experience with the New Designs for Learning process, either in direct application to their institutions or in a training context. Representatives of several other high schools and community/technical colleges that have applied the New Designs process were also invited but could not come because of scheduling conflicts. The project directors for the contextualized teaching and learning initiative of the U.S. Office of Vocational and Adult Education and the directors of the NCRVE project relating to reform in preservice teacher education were also invited but were unable to attend because of scheduling conflicts. Those individuals who attended the conference/workshop are listed below:

K-12 Institutions

Chetek Area Schools, School District of Chetek, Chetek, Wisconsin Al Brown, Superintendent Jim Adams, Teacher

Lifework Learning Center, Minnesota Department of Children, Families, and Learning, Roseville, Minnesota Duane Strand, Division of Lifework Development

Interdistrict Downtown School, Minneapolis, Minnesota Barb Shin, Principal

School of Environmental Studies, Apple Valley, Minnesota Dan Bodette, Principal Burton Cohen, Associate Administrator Peter Hilts, Teacher

Postsecondary Institutions

Central Lakes College, Brainerd, Minnesota Tina Royer, Director of Planning

Hennepin Technical College, Brooklyn Park, Minnesota Sharon Grossbach, President Carol Tulinkangas, Vice President for Academic and Student Affairs

North Harris Montgomery Community College District, Houston, Texas Bonnie Longnion, Associate Vice Chancellor for Curriculum and Instruction

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