

UNITING STATES Sharing Strategies

Editor's note: This is the third in a series of articles describing a public and private collaborative effort coordinated by the Center to Champion Nursing in America at AARP to redesign nursing education to prepare the future nursing workforce.

Oregon Takes the Lead in Addressing the Nursing Shortage

A collaborative effort to recruit and educate nurses.

According to a 2001 Northwest Health Foundation report, in less than a decade the shortage of RNs in Oregon could exceed 20%.¹ Spurred by this dire warning, the Oregon Nursing Leadership Council, a coalition of five major nursing organizations in the state, developed a strategic plan to address Oregon's nursing shortage.

The council's initial plan, developed in 2001, had the ambitious goal of doubling nursing education program enrollment by 2004.² Although this goal was not met in 2004, the state's nursing school enrollment more than doubled in less than a decade, and by 2008, more than 3,100 students were participating in state programs to become RNs.³

Many of these programs differ from those of a few years ago. The Oregon Consortium for Nursing Education (OCNE) has completely redesigned the nursing curriculum and standardized nursing education in eight of the 15 community college nursing programs and the multicampus Oregon Health and Science University (OHSU) School of Nursing. Today, students can complete course work for a bachelor of science in nursing (BSN) from OHSU without leaving their home community.

These changes came about because nurses, educators, and other major stakeholders set their differences and individual agendas

aside and worked together to improve education programs and expand nursing capacity in Oregon.

Now, through the collaborative work of the Center to Champion Nursing in America (CCNA), Oregon is sharing its experiences with other states. For example, 11 of 30 state teams receiving ongoing technical assistance from the CCNA met in Oregon in October 2009 to share innovations in nursing education redesign. Slides from the conference are available on the OCNE Web site at <http://bit.ly/9QIYAa>.

RECRUITING NURSES OF THE FUTURE

The Northwest Health Foundation report indicated that Oregon was not developing a homegrown nursing workforce. The modest increase in nurses in the 1990s

resulted from migration to the state. Compared with their prevalence in the state's population, nonwhite ethnic groups were underrepresented in the nursing workforce. So were men, who accounted for only 12% of the state's nurses.¹ Furthermore, nursing was not attracting young people. In 1999, the average age of Oregon's baccalaureate nursing program graduates was 28 years, and the average age of associate's degree program graduates was 32 years.

Men and minorities. To address the nursing shortage, the Oregon Nursing Leadership Council created the Oregon Center for Nursing. One of the center's first efforts was to encourage more men and ethnic minorities to consider nursing as a career.

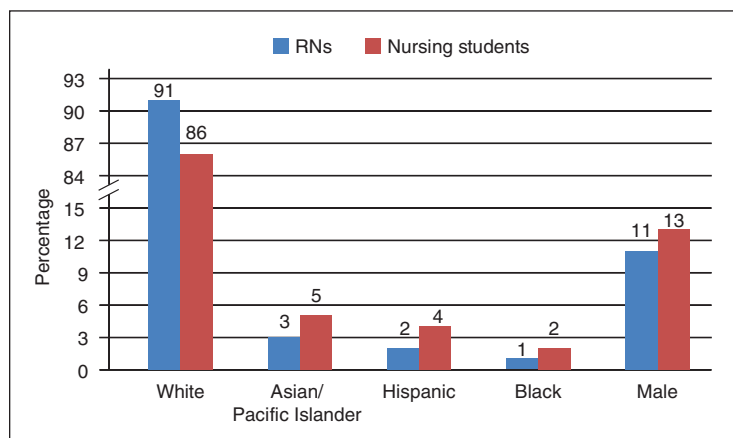


Figure 1. Demographic characteristics of licensed RNs in Oregon and students enrolled in associate's degree in nursing or bachelor of science in nursing programs, 2008.⁵

Two posters were developed and sent to all middle schools, high schools, and community colleges in the state. The first poster, produced in 2002, posed the question “Are you man enough to be a nurse?” The second poster, produced two years later, targeted minorities with the headline “Caring knows no boundaries.”⁴

These efforts may be starting to pay off. According to an Oregon Center for Nursing report, the percentages of minority and male students currently enrolled in nursing schools in Oregon are slightly higher than the percentages of minority and male licensed RNs in the state (see Figure 1).⁵

Youth recruitment. In 2000, 60% of the RN workforce in Oregon was 45 years of age or older, and the age at which students graduated from nursing programs suggested that nursing was often a second career choice.¹

Attracting young people into Oregon’s nursing pool has become a priority. Targeted efforts to recruit high school students, especially students of high scholastic aptitude or with an interest in the sciences, are one focus of the Oregon Center for Nursing.

These young people may be considering other professions, unaware that nursing can be a rewarding long-term career. The Oregon Center for Nursing has offered programs to interest teenagers in nursing: the three-day Adventures in Nursing camp and Saturday Academy, which consisted of six nursing classes for middle school and high school students.⁴

Perhaps as a result of these efforts, 8% of students enrolled in associate’s degree in nursing or BSN programs in 2008–2009 were younger than 20.⁵ More than half (52%) of enrollees were 20 to 29.

EDUCATION REDESIGN

Simply educating more nurses won’t solve the nursing shortage. An increasingly older patient population that lives longer with more illnesses, as well as technologic advances that constantly change the health care environment, mean that new nurses must have a different type of education and develop different competencies than their predecessors.

Standardized curriculum.

Through a collaborative effort, the

OCNE has created a standardized curriculum that’s seamlessly shared by eight community colleges and five OHSU campuses.

To develop the new curriculum, representatives of each campus met twice a month for two years. They determined the competencies needed (OCNE competencies) and outlined a four-year competency-based curriculum. Faculty of all campuses participating in the consortium approved the curriculum in December 2005. Within a few months, it received the approval of the Oregon State Board of Nursing, the Oregon Department of Education, and the Oregon University System.⁶

In the first year of the nursing program, students take prerequisites and electives. The next three years consist of nursing courses designed to develop the competencies (see Table 1). Rather than take courses in subject areas such as pediatrics or obstetrics, the nursing students study broad subject areas such as chronic illness, acute care, and epidemiology. The curriculum emphasizes evidence-based practice and patient-centered care. Core case studies enable students to develop several

Table 1. Standardized Curriculum for Oregon Nursing Students

	Year 1	Year 2	Year 3	Year 4
Fall term	<ul style="list-style-type: none"> Prerequisites 	<ul style="list-style-type: none"> Health promotion 	<ul style="list-style-type: none"> Acute and end-of-life care 	<ul style="list-style-type: none"> Population-based care Epidemiology Leadership and outcomes management
Winter term	<ul style="list-style-type: none"> Prerequisites 	<ul style="list-style-type: none"> Chronic illness management Pathophysiology Pharmacology 	<ul style="list-style-type: none"> Chronic illness and end-of-life care 	<ul style="list-style-type: none"> Leadership and outcomes management Integrative practicum Theory focused on specific population
Spring term	<ul style="list-style-type: none"> Prerequisites 	<ul style="list-style-type: none"> Acute care Pathophysiology Pharmacology 	<ul style="list-style-type: none"> Population-based care Epidemiology Integrative practicum (for students working toward an associate’s degree) 	<ul style="list-style-type: none"> Integrative practicum Theory focused on specific population

competencies simultaneously. The standardized course materials are shared throughout the consortium through the Internet.⁶

At the end of their third year, students at the community colleges have a choice of earning an associate's degree and taking the national licensing exam to become an RN or continuing course work with OHSU faculty. Through distance learning, students can complete the last year without leaving home.

Clinical experiences. The centerpiece of the OCNE clinical education model is the design of clinical learning activities, which are included in every term of nursing education. The model is currently being evaluated on four campuses, with funding support from the U.S. Department of Education's Fund for the Improvement of Postsecondary Education.

The recent surge in nursing school enrollment has spawned creative methods of ensuring enough settings for supervised learning that guarantee patient safety. One solution is simulation. The Oregon Simulation Alliance develops clinical learning opportunities with "high-fidelity simulators" (patient dummies) and virtual reality software to give nursing students, as well as practicing nurses and other health care professionals, the opportunity to develop and practice clinical skills, wherever and whenever they want.

At some point, however, students must have clinical experiences with real patients and in actual health care settings. To address this the Oregon Center for Nursing developed StudentMAX, a centralized clinical placement software system that has greatly increased the efficiency and effectiveness of finding clinical placements throughout Oregon and southwest Washington State. Ten other states now have

licenses to use StudentMAX for clinical placements in their regions.

Another innovation is the dedicated education unit. The first such unit came into being in 2003 through the collaboration of faculty, staff nurses, and nurse executives. There are now six dedicated education units in three affiliated hospitals. On these patient care units, staff nurses become instructors and mentors to the nursing students. Early results show high levels of satisfaction among both students and nurses.⁷

Results. The first group of students completed the associate's degree program using the new nursing education model in spring 2008, and students from that cohort who continued in the program earned their baccalaureate in spring 2009. Because the experience is so recent, outcomes data are limited.

The goal was for most students to continue studying for their BSN, but that hasn't been the case so far. Only 25% of students in the first cohort received a BSN. Analysis of the low fourth-year continuation rate revealed the lack of a part-time option for the final year of the curriculum was a drawback for students who needed to work to support themselves or their families. Changes for the second cohort included a part-time option and faculty time dedicated to advising students on careers. As a result, 40% of the second cohort made the transition to the baccalaureate program.⁸

Anecdotal reports suggest that the education redesign is creating nurses who will be well qualified to meet the care demands of the 21st century. People who have worked with these students in clinical settings have made comments such as, "I never saw students think so well on their feet."⁸

The OCNE model has been recognized nationwide as an exemplar for the redesign of nursing education. More than 25 states have contacted the consortium to learn about it, and some have entered into formal agreements with the OCNE for consulting services.

ADDRESSING FACULTY SHORTAGES

Problems. A major problem associated with the rapid growth in nursing school enrollment is the shortage of faculty to educate the new students. The number of students per faculty member was 3.6 in 2001, but it soared to 6.8 in 2008.³ Because faculty size hasn't kept pace with the expansion in student enrollment, faculty workloads have increased dramatically.

As a group, the faculty workforce, like the nursing population overall, is rapidly approaching retirement. The average age of a nurse educator in Oregon is 52, and faculty typically plan to retire at 64.³ An estimated 48% of current nurse faculty will retire by 2025.

Solutions. The dedicated education units provide a short-term solution, enabling staff nurses to partner with faculty in educating and mentoring student nurses. In 2008, the OCNE initiated training for 600 clinical teaching associates (staff nurses who guide students) to help them create positive clinical learning environments and develop new competencies in clinical judgment and evidence-based practice.^{6,8}

Long-term solutions often require changes in policy, but unfortunately, the Oregon state legislature meets only every other year. Collaboration of nursing groups, educators, and lawmakers resulted in a major victory in 2007, when the state legislature declared a nursing and nurse faculty shortage in Oregon and



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named the Oregon Center for Nursing as an adviser to education and workforce groups. The same bill allowed public employees who are nurses (which includes most nursing faculty) to continue working full time and not lose retirement benefits. In addition, the bill expanded health care benefits for part-time employees.

Two years later, the state legislature passed a bill authorizing loan repayments for nurse educators—up to 20% of qualifying loans or \$10,000 for three years for those with a master's degree and for five years for those with a doctoral degree.⁹ Considering that the annual cost of tuition for a graduate degree in nursing is \$18,500, the loan repayment program should encourage more nurses to pursue an advanced degree, a prerequisite for most faculty positions.³

CHALLENGES

One of the biggest challenges nurses, educators, administrators, and other stakeholders face as they attempt to increase nursing capacity is the long history of independent work in their respective domains. From the beginning, the response to the nursing shortage and the complete overhaul of the nursing education system in Oregon was a collaborative process. The Oregon Nursing Leadership Council, the group that spearheaded the project, brought together leading nursing organizations in the state. Committee members from each campus worked closely with fellow faculty to obtain consensus and approval for every change. Collaboration continues with informal mechanisms like Web-based sharing of course materials and formal structures like the Oregon Simulation Alliance and with national initiatives like that of the CCNA.⁶

Tracking the success of nurse recruitment and retention efforts requires reliable data. The Nursing Student Admissions Database pilot project aims to collect accurate baseline data on the number and demographics of applicants and students in Oregon's nursing schools and then to track their progress over time. The initial work of this project has already yielded valuable information, revealing that previous reports overestimated the number of nursing school applicants because prospective students often applied to more than one school. Whereas previous methods of collecting data had indicated 3.6 applicants per available nursing school seat, the new, coordinated database revealed that there are 2.3 applicants per seat.⁵

The pilot project revealed both encouraging and discouraging news about the diversity of the future nursing pool. On the positive side, qualified applicants from racial and ethnic minority groups were admitted at a similar rate as white students. However, applicants from minority groups were less likely to meet admission criteria.⁵ Determining why more minority applicants aren't qualified and developing a nurse workforce more representative of the population of Oregon remain challenges.

The stresses of the nursing workplace are perhaps the biggest challenge to attracting more nurses and resolving the nursing shortage, not just in Oregon but throughout the nation. In a 2004 survey of nurse employers in the state, 36% reported that the turnover rate among RNs was less than 5%, but 34% reported a turnover rate exceeding 20%.¹⁰ Turnover rates in long-term care facilities were two to four times higher than in other settings, suggesting that the demands of caring for elderly patients with multiple

ailments will continue to make retention of nurses problematic as the population ages. ▼

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