

The Longitudinal Elder Initiative: Helping Students Learn to Care for Older Adults

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ABSTRACT

This paper describes an educational innovation called the Longitudinal Elder Initiative (LEI), which was developed by a BSN program to improve students' knowledge about the health needs and nursing care of older adults. In the LEI, new nursing students are paired with older adults in the community and develop a relationship with them over the duration of the nursing program. Students complete a variety of assignments designed

to facilitate learning gerontological nursing concepts. They also complete specific assessments designed to target common problems in aging. Students develop nursing care plans and interventions during the course of the project and monitor progress toward goals over time. Through the LEI, students develop relationships with older adults in the community and view their health changes longitudinally. In addition, students can observe how social, financial, and health-related factors affect health and well-being over time.

2004). Even with statistics like these, we were not including geriatric nursing concepts in our clinical experiences. To address these problems, the authors developed a plan to examine both theory and clinical teaching in our program and to infuse it with gerontology content. This plan was initially supported by a grant from the American Association of Colleges of Nursing (AACN) and the John A. Hartford Foundation.

A lack of gerontology content has been identified in many nursing programs, with only 25% of BSN programs offering a separate course on geriatric nursing (Mezey, Fulmer, & Fairchild, 2000). The AACN and Hartford Foundation have stated that the ideal way to teach gerontology concepts is in a stand-alone geriatric nursing course (Thornlow, Latimer, Kingsborough, & Arietti, 2006). Like many nursing programs, our program has an integrative philosophy, emphasizing health throughout the lifespan. Therefore, we needed to develop a way to teach gerontology content throughout our program in an integrative manner.

To determine our current educational efforts in gerontology across the curriculum, we first integrated the AACN and Hartford Foundation publication, *Older Adults: Recommended Baccalaureate Competencies and Curricular Guidelines for Geriatric Nursing Care* (2000) into our existing curriculum blueprint. These are specific competencies that all BSN-prepared nurses should exhibit to provide quality care to older adults. They are tied directly to the *Essentials of Baccalaureate Education for Professional*

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The United States is expected to experience record growth in population aging during the next 50 years (Federal Interagency Forum, 2000). In the next 15 years, almost 20% of our population will be older than age 65. As a result, nursing programs are being challenged to include appropriate geriatric content in their curricula to meet the needs of the aging community. This article describes an initiative taken by a BSN program with the goal of improving its gerontology content.

In 2001, we identified a lack of gerontology content in our nursing program. Students and faculty could identify clinical experiences in pediatric, psychiatric, community, and acute care nursing, but none could identify a place in the curriculum for principles of gerontological nursing. Older adults accrue over 50% of all hospital days, 60% of primary care visits, 70% of all home care visits, and 85% of nursing home days (Centers for Disease Control and Prevention,

Nursing Practice (AACN, 1998). Using these competencies, the grant team worked with faculty to identify missing and disconnected gerontology content. Competencies then were mapped to specific courses throughout the curriculum blueprint. For example, one sophomore-year course, titled Self Health and Wellness was expanded to include a self-analysis of lifestyle factors that are likely to affect successful aging.

After mapping the theoretical content to the current courses, we determined that the clinical area needed substantial revision. We had students learning in many acute care and community settings, but we were not teaching gerontology concepts (e.g., fall risk or polypharmacy) in a cohesive way. Also, faculty had a strong desire to impart a positive view of aging. We wanted students to build relationships with older adults that were positive and reciprocal and to focus on the fact that older adults have much to offer society. In addition, we desired student involvement in older adults' lives so they could see how factors such as finances, social opportunities, and living situations could influence health and well-being. Finally, we wanted students to participate in the older adults' every day lives to see a holistic view of the clients that is not possible in acute care settings.

The Longitudinal Elder Initiative

To meet these goals, we decided to place students with older adults in the community. The goal was to have students work with older adults over a long period so that students could see adaptations that occurred in older adults' lives from illnesses, as well as positive changes from nursing interventions suggested by the students and from healthy choices made by the older adults. The Longitudinal Elder Initiative (LEI) was developed to accomplish these goals. In this project, students are paired with an older adult in the community during their first clinical course and visit that individual throughout the remaining three consecutive courses over 1.5

years (students attend school year round in our program). This experience is counted in their clinical hours and considered to be a part of each consecutive clinical course, with specific LEI objectives for each semester.

In the LEI, older adults are recruited by faculty who visit senior apartments and continuing care retirement communities. Apartment managers and administrators who want the LEI project in their buildings help with recruitment by encouraging attendance at an informational meeting by posting flyers throughout the building. In addition, one newspaper article in the local community listed our contact information for individuals who wished to participate. Finally, we rely on word-of-mouth referrals from other older adults who participate in the project. We have attempted to recruit socioeconomically and culturally diverse individuals.

The criteria for participating in the LEI is that individuals must be age 65 or older, cognitively intact or only mildly cognitively impaired, and live independently in the community. To date, we have relied on the administrators to help us identify the residents who may be too cognitively impaired to participate fully in the project. At this time, we have 260 students matched with 260 community-dwelling older adults.

After older adults agree to participate in the LEI, they are assigned to a first-semester junior nursing student, who is responsible for setting up appointments in the client's home. During the first nursing course, students initially visit their assigned older adults in pairs to ensure comfort and safety and to critique each other in the use of therapeutic communication. Faculty meet with the students initially after each LEI visit to discuss their findings and help develop a nursing care plan. Students visit the older adult three or four times each consecutive semester. Students communicate with their clinical instructors about any specific client needs via face-to-face meetings and postconference discussions. They also complete a journal that is given to their clinical faculty after each client visit,

so faculty can be aware of any issues that develop as they occur. At the end of the four semesters of the LEI project, the older adults have the option of being reassigned to a new nursing student immediately, taking a break from the LEI for a few semesters, or ending their LEI experience.

Student Assignments

Each of the four clinical nursing courses has different themes and objectives. For each course, students are required to perform a health assessment; use certain specialized geriatric assessment tools; and develop, implement, and evaluate ongoing nursing care plans with mutually agreed on goals. Throughout the LEI, students work with the older adults to maintain or improve their health. In addition, during each semester, students participate in a reminiscence project called the LEI Timeline. In their last clinical course, students present a creative representation of the life of the older adult using information gleaned from the Timeline. Some examples of the LEI Timeline project include short stories, poems, slides set to music, and handmade works of art.

The first clinical course focuses on the theme Who Am I? In this course, students interact with the older adults as individuals with a past, present, and future. Students take the older adults' health history and complete a physical assessment. Then, on the basis of their findings, students develop, implement, and evaluate a teaching-learning care plan with the older adults.

In the second clinical course, the LEI assignment theme is What If? Students are asked to consider "what if" certain health events happened to their older adult clients, and then to anticipate the health care needs that might occur. To identify risk factors and preventive actions, students assess their older adult's nutritional status, mental status (cognition and the presence of depression), functional health status, and financial ability to pay for health care needs. On the basis of their assessment findings, the students update their care plans and add a new nursing diagnosis, if

appropriate. Therefore, the focus of this semester is to determine which factors might place an older adult at risk for future health problems and to determine measures to reduce these vulnerabilities.

The LEI theme in the third clinical course is titled *Living With*. This semester, students focus on nursing implications for clients with chronic conditions. Students assess common problems associated with aging, such as sleep, pain, falls, and polypharmacy. After completing all of their assessments, students update their care plans and add another nursing diagnosis, if appropriate. For students to more fully understand the complex problems associated with chronic illness, they complete a concept map—a pictorial description of relationships among and consequences of the various issues the LEI client faces.

The LEI theme for the final nursing course is *Aging-In-Place*. During this semester, students focus on caregiver issues, resources in the community, anticipating future needs as the older adult ages, and maximizing independence over time. Students assess caregiver strain, the potential for older adult abuse or neglect, and their older adult's ability to perform activities of daily living. In this last course, students synthesize and evaluate their entire plan of care and determine whether client goals were met.

Learning Portfolio

To track progress and view the older adult during a continuum of experiences, we developed the LEI assignment in a portfolio. A portfolio is "a focused purposeful collection of student work that documents evidence of traditional and nontraditional sources of student learning, progress, and achievement over time" (Wenzel, Briggs, & Puryear, 1998, p. 209). There are four main advantages of using a portfolio for the LEI project:

- It encourages and documents student learning over time.
- It provides a mechanism for student-faculty interaction about the clinical experience.
- It facilitates critical thinking as

the student looks at the older adult in a holistic manner.

- It provides a comprehensive assessment of student achievements regarding the LEI objectives.

Because of the nature of geriatric nursing, viewing the older adult in a context of change over time is essential. Students can use their portfolios to document changes that occur during the four semesters and to look back and reflect on reasons why health improves or declines. Factors such as socialization, mobility, and illness are seen as a process, not an acute exacerbation. In addition, the relationship between the older adult and the student can be nurtured and developed so that a true, trusting relationship can be built.

In the LEI, the portfolio is a tool for critical thinking as students gather assessment data, make nursing diagnoses, implement interventions, and evaluate the success of the nursing care plans over time. In addition, the longitudinal nature of the project allows for interaction between the faculty and student, promoting questions and alternative solutions to problems. Students are required to maintain a journal about their experiences with the older adults and to reflect on what goes well or poorly in their interactions. This structure encourages the principles of critical thinking, including reasoning, evaluation, and reflection (Brunt, 2005; Wenzel et al., 1998).

Portfolios are designed to "encourage various levels of collaboration between the student and faculty" (Wenzel et al., 1998, p. 209). As faculty review the students' interactions with the older adults, they can discuss older adults in the context of nursing, community, health, and aging. Students have the opportunity to get individual feedback about their performance from semester to semester. In addition, faculty can use the portfolio as a method to customize student learning experiences and mentor students individually. Although clinical faculty for the LEI change each semester, they have access to the entire LEI portfolio when working with the student and read the portfolio

to determine the needs of both the student and the older adult. Clinical faculty from each course complete an evaluation tool summarizing how the LEI objectives (regarding the course objectives) were met. This evaluation becomes a part of the portfolio so that subsequent clinical faculty know how the student has progressed.

Portfolios are often used to evaluate program or course objectives (Williams, 2001). Portfolios allow for assessment of student performance over time and the use of an evaluation method other than standardized testing and direct observation (Lettus, Moessner, & Dooley, 2001; Wenzel et al., 1998). Each semester, the LEI portfolio assignment lists specific requirements that students must meet, including the performance of certain geriatric assessments. The students' ability to perform these assessments is one kind of evaluation. However, a more important evaluation includes whether the students draw appropriate conclusions from their assessments; whether they develop and prioritize nursing care plans that include the client's goals, needs, and abilities; and whether they appropriately implement and evaluate the plan. The highest level of evaluation comes from whether students recognize the need to change the plan of care on the basis of client feedback and needs over time.

Student and Faculty Resources

The longitudinal assignment was designed to use several newly developed methods to help students meet their goals. One new resource is an intranet site on Blackboard®, called "Longitudinal Elder Initiative (LEI)." Assessment tools and geriatric resources are posted on this site for student and faculty use. Links to the Hartford Foundation Web site are provided, which has a series of assessment tools students can access (John A. Hartford Foundation, n.d.). We also posted other tools, including a fall risk assessment (adapted from University of Kansas School of Medicine, n.d.), and a visual analogue scale to assess fatigue at various times during the day. In addition,

when relevant instruments were not available, we developed our own assessment tools including a polypharmacy assessment and a financial resources assessment.

Initial Evaluation of the LEI Project

We have several methods to evaluate the success of the LEI. We developed a 22-item assessment tool based on the LEI objectives. The tool asks students to rate their perceived competence, using a 4-point Likert scale, in caring for older adults who have common geriatric conditions or syndromes. We used this survey to determine whether there were differences in perceived competence in 80 students who completed the LEI and 81 students who completed the program prior to the LEI (human subjects approval was obtained). The students who completed the LEI rated themselves more competent than did students who did not complete the LEI in areas specific to geriatric assessment, including:

- Nutritional status ($t = 2.534$, $p = 0.012$).
- Depression and anxiety ($t = 4.32$, $p < 0.0001$).
- Financial issues ($t = 3.12$, $p = 0.002$)
- Sleep problems related to aging ($t = -4.346$, $p < 0.0001$).
- Polypharmacy ($t = -4.007$, $p < 0.0001$).
- Support systems' effects on helping the older adult maintain independence ($t = -1.999$, $p = 0.047$).
- Community resources to help maintain the older adult's independence ($t = -2.491$, $p = 0.014$).

Therefore, students who completed the LEI clinical experience felt more competent than did those who did not complete it in several key areas. We were encouraged by these data because the areas in which the LEI students rated themselves as more competent were critical areas in caring for aging clients.

In another evaluation, a focus group was conducted to obtain direct feedback from the first group of LEI students. They reported that the best

aspects of the LEI were opportunities to be more independent, form a relationship with an older adult, see changes in health over time, and communicate more effectively. Students reported that they could be creative in how they provided nursing care. For example, one student wanted to teach her LEI client about proper nutrition, yet the client could not read. The student devised a creative method for teaching the client without using written materials. This project took several semesters to implement. An experience like this would be less likely to occur in an acute care setting.

The students least liked the scheduling problems that occurred with their older adults, who were often busy or forgetful. In addition, students found that they were often not sure whom to go to for questions. They indicated that some faculty were less engaged in the LEI project, at least initially. Finally, students stated that the lack of a set structure in the LEI clinical visits made it difficult to acclimate.

Conclusion

We have conducted a more formal review of the LEI project. We analyzed the portfolio data of a selected sample of portfolios, in which older adults and students agreed to participate, to determine the characteristics of the LEI population, the nursing interventions used, and client outcomes. We have also conducted focus interviews with students and older adults involved with the LEI project. The results of this work have affirmed the value of this program in helping students understand critical competencies in caring for older adults. In addition, we have discovered that many of the older adults and students value the relationship they develop over the course of the LEI, and consider the experience to be a reciprocal learning experience in which both benefit. Our conclusion is that it is possible to create a beneficial clinical experience in which student nurses develop a relationship with community-dwelling older adults over the course of an integrated nursing curriculum.

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