Transforming Healthcare Education: An Interprofessional Approach to Prevention, Health Promotion and Wellness
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ABSTRACT:
Jefferson Medical College (JMC) of Thomas Jefferson University (TJU) was the recipient of an AAMC/Josiah Macy Foundation grant to improve Chronic Illness Care Education in 2006. Recognizing the need to train medical students in team-based care, an interprofessional team of faculty representing six clinical professions trained at Jefferson assembled to create a new curriculum. This team developed the Jefferson Health Mentor Program (HMP), a longitudinal patient-centered team-based curriculum which builds on senior mentor programs created to deliver geriatric education to medical students and uses the Wagner Chronic Care Model as the conceptual framework.

The two year HMP curriculum consists of four key modules, plus orientation sessions at the beginning of each year. These modules include: 1) obtaining a comprehensive life and health history, 2) preparing an interprofessional wellness plan, 3) assessing patient safety, and 4) self-management support and health behavior change. Concepts of teamwork and professionalism are interwoven throughout. Each module concludes with a faculty-facilitated interprofessional debriefing session comprised of five to eight teams. Assignments evaluate achievement of module-specific and program objectives. Individual reflection papers assess what students’ value and personally learn from their participation. Self- and peer-evaluations assist in measuring professionalism. Module 2: Preparing an Interprofessional Wellness Plan is discussed in this case-study.

EDUCATIONAL METHODS OR APPROACHES USED:
As described in attached curricular material, a multifaceted educational design was used for this module. Educational methods included: individual preparation, a “hands-on” approach with a patient interview, practice of team interviewing skills, informal team debriefing and a faculty-facilitated interprofessional small group session. Measurement of objectives was assessed through completion of a team assignment, an individual reflection assignment, peer and self evaluation, and participation in small group sessions. Additional, formative and summative evaluation is provided to the students in the small group sessions and through grading of both team and individual assignments.

Student teams visit with their Health Mentor and perform an interview addressing prevention, health promotion and specific dimensions of wellness (i.e. Physical, Nutritional, Self Care, Safety, Social, Emotional Awareness, Sexuality, Intellectual, Occupational, and Spiritual). Following the team interview, student teams actively evaluate their Health Mentor’s wellness and develop an interprofessional Evidence-Based Wellness Plan with their Health Mentor. The team Evidence-Based Wellness Plans are presented and discussed in faculty-facilitated interprofessional small group sessions consisting of 15 to 20 students from all 6 disciplines. Student teams develop patient-centered wellness goals, search the literature and incorporate evidence-based medicine in their wellness planning, and identify specific strategies/behaviors and barriers/facilitators for the Wellness Plan. Students also identify healthcare team member(s) who may best support or meet Health Mentor’s wellness needs. The small group session provides students with an opportunity to reflect on and value the areas which make up personal wellness, to discuss the basic elements of an interprofessional wellness plan, to recognize strategies and
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behaviors for pursuing wellness, and to define how each interprofessional team member may empower a person with a health condition/impairment in developing his/her personal wellness.

**PROJECT DESCRIPTION:**
The Health Mentors Program (HMP) is a longitudinal, interprofessional mentorship curriculum, which is required for all first and second year medical, physical therapy, occupational therapy, couples and family therapy, nursing, and pharmacy students. As part of this curriculum, interprofessional teams of 4 to 5 students meet with a volunteer Health Mentor, a community-dwelling adult with one or more chronic conditions or disabilities, and complete 4 modules centered on team-based, chronic illness care over a 2 year period. The Health Mentor is identified as a teacher as well as a team member.

Initial Funding for the HMP came from The Association of American Medical Colleges (AAMC)/ Josiah Macy Foundation Grant for Chronic Illness Care Education at Jefferson Medical College which supported faculty and student teams for one year. Faculty were charged with developing the initial curriculum and evaluation plan. In addition, the Grant supported a coordinator for Year 1 implementation. The program has been sustained by funding from The Senior Vice President of Academic Affairs and Deans of Jefferson Medical College (JMC), Jefferson School of Nursing (JSN), Jefferson School of Pharmacy (JSP), and Jefferson School of Health Professions (JSHP), who provide funding for the “academic home” of HMP, Jefferson InterProfessional Education Center (JCIEP). A Geriatric Academic Career Development Award from HRSA has also provided some support for the Program Director for HMP.

Initially conceived by a team of faculty and student champions in 2007, HMP gained approval from the Curriculum Committees of each profession. Content is embedded within a specified course for each discipline, a total of 22 courses over the two year period. Each year, interprofessional faculty and student working groups review, evaluate and revise curricular content. Monthly interprofessional faculty and student liaison meetings are held to approve curricular revisions and develop appropriate implementation strategies. The curricular module for this case study, “Preparing a Wellness Plan,” takes place in the Spring Semester of Year One and is a required module for all enrolled students. As of August 2011, 2250 students from 6 disciplines have completed the program and an additional 600 new students will be enrolled this fall. Module 2 is completed in the spring semester of Year One of the program and is a required component for all students enrolled in the HMP. The success of the HMP requires coordination, recruitment and training of health mentors, and evaluation and assessment of HMP program goals/objectives. Implementing HMP across the University requires coordination among 22 individual courses within six complex and crowded professional curricula. Further, coordination occurs between the varying academic calendars of JMC and the Schools of Health Professions, Nursing, and Pharmacy. Key to success has been the willingness of faculty from each discipline to learn together and from each other. Communication, mutual respect, flexibility, and an unwavering commitment to the ideal of interprofessional person-centered education have become the hallmarks of HMP.

Health Mentors are community volunteers, adults living with one or more chronic health conditions or disabilities. They are recruited from diverse sites including physician practices, senior centers, rehabilitation programs, and community-based organizations. Supplemental community recruitment sessions include written and web-based materials. Potential Health Mentors receive one-hour of training that includes a detailed description of the HMP, makeup of the team, program goals and objectives for students, explanation of the Health Mentors’ role as teacher, not patient, HMP logistics, and time commitment. After recruitment, Health Mentors sign a commitment statement and receive regular communications including details of team visits and a bi-annual newsletter.

Program objectives drive HMP evaluation. Process and outcome evaluation has been ongoing since program initiation. Process evaluation occurs through regular formal course evaluations, student focus
groups, and informal feedback from student liaisons and health mentor faculty. The HMP curricular team updates and modifies the curriculum based on process evaluation results. Outcome evaluation includes both quantitative and qualitative methods. Quantitative evaluation tools are used to gather data at baseline and at year end. Data analysis leads to identifying future program improvements.

Jefferson InterProfessional Education Center (JCIPE), founded in 2007, is the academic “home” for the Health Mentors Program. JCIPE provides both coordination and convening home for the HMP faculty team, course coordinator, student liaisons, and evaluation support in collaboration with existing evaluation teams at JMC and other schools. The success of this program rests on the collaboration of 6 disciplines at TJU (including 22 courses, 30 faculty, and 1100 students), 250 volunteer Health Mentors, and more than 10 community organizations, including public health agencies, local senior centers, senior housing facilities, and retirement communities who help to recruit volunteer Health Mentors.

**HEALTHY PEOPLE OBJECTIVE ADDRESSED:**
ECBP-12-16: "to increase the inclusion of core clinical prevention and population health content in health professions education."

**PROGRAM OR COURSE GOALS:**

**Number of students enrolled/participating in 2010-2011 school year:** 1100

The Health Mentors Program began as a 2-year required curriculum for all entering medical, physical therapy, occupational therapy, and nursing students. Pharmacy and couple and family therapy (CFT) students were added in the second year. As of August 2011, 2250 students from 6 disciplines have completed the program and an additional 600 new students will be enrolled this fall. Module 2 is completed in the spring semester of Year One of the program and is a required component for all 1,100 students who participate in the 2-year curriculum.

**Did you conduct a needs assessment as part of your planning process?**

[X] Yes  [ ] No

As part of our initial needs assessment in the planning process of the HMP in 2006, we found that health professions’ students were often trained in silos, lacked a common language across disciplines, focused on the management of acute exacerbations of chronic disease, and misunderstood the importance of patient self-management, clinical prevention and health promotion. Incorporating the findings from our needs assessment in the design of Module 2, Preparing a Wellness Plan, we asked students to work as part of an interprofessional team, use the World Health Organization’s International Classification of Functioning, Disability, and Health (ICF) as a common language for discussing wellness, to focus on facilitators for prevention, and to use evidence-based practice in health promotion (i.e. incorporating data on the value of specific wellness strategies such as self-management, exercise, nutrition, social and occupational health).

**PROFESSIONS INVOLVED:**
The Health Mentor Program, including Module 2 (Preparing a Wellness Plan), has successfully accommodated all matriculating students from Jefferson Medical College (JMC), Jefferson School of Nursing (JSN), Jefferson School of Pharmacy (JSP), and Jefferson School of Health Professions (JSHP). The Health Mentor Program Steering Committee consists of more than 30 faculty members, representing each of the 6 disciplines at Jefferson.

**LESSONS LEARNED/EVALUATION RESULTS:**

Since implementation in 2007, HMP Module 2 (Preparing a Wellness Plan) has been highly rated in course evaluations from each of the 6 disciplines and therefore serves as a model for HMP curricular design. As evidenced in student reflection essays, student response to the wellness content of this
module has been particularly favorable. One observed benefit of this program is the shift in student values regarding the provision of health care. In the written reflections, faculty have noted a culture change from wanting to “fix” a patient’s chronic condition to attempting to better understand the context of the person’s life experiences before and after diagnosis of one or more chronic conditions. Students describe adopting a new perspective of caring for patients with chronic conditions, shifting their focus from management of acute exacerbations to prevention of disease and health promotion and focusing on patients’ ability and strengths, rather than his/her disabilities or participation restrictions. Collaboration has naturally developed within interprofessional student teams. Students from various programs are brought together to complete HMP visits and assignments, they establish relationships with peers across disciplines which rarely occurred in previous years. Students’ written reflections reveal emergent awareness of and respect for the scope, rigor and demands of their fellow team members’ training, practice, and expertise.

After each semester, the content of student reflections, feedback, and evaluation of the HMP has provided a positive, unexpected education for the HMP faculty. Each new group of students has highlighted new benefits related to this IPE endeavor. A noticeable shift in campus culture has resulted in students now expect to work with peers from other professional programs, where this may not have happened in the past. Current first year students are surprised to learn that faculty attribute this shift in expectations directly to the HMP; they simply cannot believe the culture was ever different. Further, graduating students who have completed the HMP are including this experience in their resumes and personal statements as a highlight of their education. An unexpected benefit observed at TJU has been collaboration among faculty from the four schools/colleges and six departments. Indeed, HMP faculty have adopted the principles of interprofessional practice in their work, and role model the benefits of this behavior for students and other faculty. Frequently, interprofessional faculty working groups form and volunteer to complete requested tasks related to the HMP and new IPE activities. These collaborations have led to increased faculty satisfaction and tremendous scholarly activity, with 37 peer reviewed presentations and 8 peer reviewed publications stemming directly from the HMP.

The literature documents a range of challenges to implementing IPE and to educating health care professionals about disease prevention and health promotion. Particular challenges with broader HMP curriculum include logistics, student perceptions, and the Health Mentors themselves. During the development phase, it was critical that HMP modules did not contribute to curriculum overload or repetitiveness in any particular program. Module content was designed to meet curricular objectives for all participating disciplines and was integrated into the existing discipline specific courses. However, faculty has realized that revising learning objectives for individual modules may have unintended impact on the ability to meet discipline-specific content needs, so these are regularly reassessed.

Logistics of coordinating each discipline’s academic and examination schedules with scheduling dates for orientation, mentor visits, assignment due dates and interprofessional team debriefing sessions are an ongoing challenge. The faculty now begins the scheduling process 6 to 12 months before the start of the academic year. In addition, use of “university time”, a 2-hour time block during which no classes are scheduled, has become an important reminder to students and faculty that this time has been set aside each week specifically for the HMP. Students’ negative perceptions of chronic conditions and willingness to accept added logistical burdens for a new IPE program were early concerns. Health Mentors who are successfully managing multiple chronic conditions and taking multiple medications are often viewed by students as not being “sick enough.” Evidence for patient-centered, interprofessional team care as a way of improving health outcomes and patient safety is now presented at orientation. A facilitated panel discussion allows students to see how different professions depend upon and utilize each other in real-world practice settings and to hear Health Mentors describe their expectations for patient-centered interprofessional care.
The primary challenge for Module 2 includes asking students to shift their perspective from chronic illness to wellness and from acute care to prevention and health. This challenge was addressed by providing clear directions on how to accomplish a wellness interview, with sample interview questions provided for 10 dimensions of wellness; by providing a completed wellness plan as a reference; and by instructing students on how to incorporate evidence from the literature into their plans. In addition, by incorporating the International Classification of Functioning (ICF), Disability and Health framework into this module, students use a new common language allowing them to classify elements of the person’s wellness history and to better understand the interaction of the person with his/her conditions, social roles, and environment. The ICF framework helps students think about how the environment and society interact with the Mentor’s health conditions and to critically analyze their team suggestions for wellness to determine which strategies are most feasible and realistic for the mentor to implement.

CONCLUSION:
Since process and outcome evaluations are incorporated as key elements of the overall HMP assessment plan, the HMP team has been able to ensure continuous quality improvement. Specific changes to the curriculum include improved scheduling logistics and streamlining the program to include educational modules with the greatest impact across all participating disciplines. Both changes have improved overall program effect and efficiency, as noted by faculty and students. These curricular changes have allowed the HMP to meet recommendations and accreditation standards that call for IPE and collaboration for participating disciplines. Engaging student leadership was central to the success of this module. Student course liaisons from each discipline played a key role in re-engineering this Module over the last 3 years, encouraging increased use of technology, such as adoption of Team Wiki sites and establishing and updating a program-wide online discussion board for posting and responding to evidence-based articles on wellness. By expanding this Module to include language endorsed by the ICF foundation, students are better able to define a person’s abilities, disabilities and activities/participation restrictions, and identify strategies for health promotion taking into consideration both personal and environmental factors. Evidence following the two-year mentor experience has shown that students are beginning to shift their thinking beyond the patient's diagnosis and pathology to the impact of their impairments on their daily lives and larger social and community interactions.

COMPANION MATERIALS: (Course syllabi, resource lists, tests, website, etc.)
See Table 1: Health Mentor Curriculum Content, and JCIPE and HMP websites for additional information: http://jeffline.jefferson.edu/jcipe/ (JCIPE) and http://jeffline.jefferson.edu/jcipce/hmp/ (HMP)

PUBLICATIONS:
Please see attached Figure1. Selected Jefferson Interprofessional Scholarly Activities

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