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Palliative and end-of-life care training during the surgical clerkship

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ABSTRACT

Background: In 2000, the Liaison Committee on Medical Education required that all medical schools provide experiential training in end-of-life care. To adhere to this mandate and advance the professional development of medical students, experiential training in communication skills at the end-of-life was introduced into the third-year surgical clerkship curriculum at Wright State University Boonshoft School of Medicine.

Materials and methods: In the 2007–08 academic year, 97 third-year medical students completed six standardized end-of-life care patient scenarios commonly encountered during the third-year surgical clerkship. Goals and objectives were outlined for each scenario, and attending surgeons graded student performances and provided formative feedback.

Results: All 97 students, 57.7% female and average age 25.6 ± 2.04 y, had passing scores on the scenarios: (1) Adult Hospice, (2) Pediatric Hospice, (3) Do Not Resuscitate, (4) Dyspnea Management/Informed Consent, (5) Treatment Goals and Prognosis, and (6) Family Conference. Scenario scores did not differ by gender or age, but students completing the clerkship in the first half of the year scored higher on total score for the six scenarios (92.8% ± 4.8% *versus* 90.5% ± 5.0%, $P = 0.024$).

Conclusions: Early training in end-of-life communication is feasible during the surgical clerkship in the third-year of medical school. Of all the scenarios, "Conducting a Family Conference" proved to be the most challenging.

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1. Introduction

In 2000, the Liaison Committee on Medical Education (LCME), the national accrediting authority for education programs in allopathic medical schools in the US and Canada [1], required that all medical schools provide the opportunity for experiential training in end-of-life care throughout all 4 medical school years. In spite of this requirement, few schools have developed a comprehensive educational program spanning the 4-y curriculum, including the mandated component of experiential training [2]. Since the American Board of Medical Specialties recently designated Hospice and Palliative Care as a medical subspecialty in eleven medical practice areas, including surgery, further impetus was added for medical schools to develop strong clinical palliative care training for medical students [2]. Recent studies have shown that palliative medicine and structured communication between physicians and patients and/or their family members in the surgical and trauma intensive care unit result in decreased length of stay and earlier consensus on the goals of care, without increasing mortality [3,4]. Thus, it is important to provide structured training in palliative and end-of-life care as part of the professional development of physicians, especially medical students [5–8].

The Objective Structured Clinical Examination (OSCE) provides an effective method for developing communication skills. This innovative format was introduced in 1979 as an approach for improving clinical experiences in medical education and places learners in situations where they perform a standard physical examination on a trained patient while being directly observed and scored by faculty examiners [9]. Training in ethical decision-making training in the OSCE format has also been pioneered. A landmark study has demonstrated inter-rater reliability, content validity, and construct validity when faculty evaluate the ability of internal medical residents to address commonly encountered clinical-ethical dilemmas during internal medicine training [10]. Since that time, several studies have attempted to quantify moral reasoning as it relates to advances in medical technology, respect for patient preferences, concern for quality of life, and understanding contextual issues such as cultural/religious beliefs, in all medical subspecialties [11,12]. In 1998, the American College of Surgeons published end-of-life care guidelines to assist with commonly encountered ethical and palliative care needs in surgical patients [13]. Given the LCME requirement to teach and evaluate competency in medical professionalism and the paucity of data regarding the teaching of palliative and end-of-life care during the surgical clerkship [14], the study described in this paper is timely.

This paper discusses the approach and results obtained when six OSCEs in palliative and end-of-life care were introduced during the 2007–08 academic surgical clerkship year at the Wright State University Boonshoft School of Medicine (WSU-BSOM). This curriculum component complies with recent LCME requirements and complements the existing didactic end-of-life care curriculum in the preclinical years. The primary objective of this experiential study/learning opportunity was to ensure exposure to the communication skills needed to effectively manage complex palliative and end-of-life care scenarios commonly encountered during each surgical clerkship rotation. Instruction focused on (1) finding and utilizing best-practice guidelines in palliative care, (2) practicing effective communication skills, and (3) understanding the ethical, legal, and psychological components of patients' preferences in palliative and end-of-life care.

The primary goal of the pilot study was to evaluate the student's performance as he/she addressed common surgical dilemmas likely to mirror those encountered during rotations on the Trauma, Intensive Care Unit, Transplant, and Surgical Oncology clinical services. The secondary goal was to evaluate comprehension, effective communication, and problem-solving during the simulated patient encounters.

2. Materials and methods

During the 2007–08 academic year, all third-year medical students were enrolled in this study during their surgical clerkship. This study was approved by the WSU-BSOM Institutional Review Board and only de-identified data were utilized. Each surgical clerkship was 8 wk in duration, and there were six clerkship rotations in the academic year. Each student was presented with six palliative/end-of-life care case scenarios for which educational materials and best practice guidelines were readily available online via the following websites: (1) End of Life/Palliative Education Resource Center, Medical College of Wisconsin, USA [2], (2) Bioethics Series for Clinicians, Canada [15], and (3) Ethics for Clinician, USA [16]. In addition, the End-of-Life/Palliative Education Resource Center (EPERC).org Palliative Care Education: 18 Essential Topics in Adult Palliative and Hospice Care (Medical College of Wisconsin), an educational CD containing teaching modules, was downloaded onto the WSU-BSOM medical student surgical clerkship website for student access. The case scenarios were from the EPERC.org website, with special permission granted for use of the Pediatric Hospice case scenario. Each scenario was modified to reflect surgical patients and conditions commonly encountered during the third-year surgical clerkship: (1) Adult Hospice discussion for a standardized patient with metastatic colon cancer, (2) Pediatric Hospice discussion with a standardized family member of a dying child, (3) Do Not Resuscitate (DNR) discussion with a standardized health care power of attorney (family member) of a transplant patient, (4) Dyspnea Management/Informed Consent for a standardized patient with metastatic breast cancer, (5) Treatment Goals and Prognosis for a standardized patient (and wife) with metastatic pancreatic cancer, and (6) Family Conference with two standardized family members for a patient with traumatic brain injury. The students utilized the web-based resources to investigate and understand the role of patient preferences and contextual issues, such as cultural/religious beliefs, as they related to end of-life-care decision-making.

The standardized patients and/or family members were selected from the pool of participants in the WSU-BSOM Skills and Assessment Training Center (SATC). The WSU-BSOM SATC, founded in 1999, currently employs a full-time patient trainer, a full-time OSCE coordinator and approximately 50 persons trained as standardized patients. To ensure