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## Knowledge, Attitudes, and Practice Behaviors of Oncology Advanced Practice Nurses Regarding Advanced Care Planning for Patients With Cancer

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ancer is the second-leading cause of death in the United States (American Cancer Society [ACS], 2009). Unfortunately, many Americans with advanced cancers are dying with unmet needs, and they spend their last days of life in physical, psychological, emotional, social, and spiritual pain (Robert Wood Johnson Foundation, 2002). Nationally, an increasing trend has been seen in hospitalizations and intensive care unit admissions toward the end of life in patients with cancer (Earle et al., 2004, 2008; Sharma, Freeman, Zhang, & Goodwin, 2008). Eighteen to 20% of patients with cancer are given toxic chemotherapy during their last two weeks of life (Earle et al., 2004, 2008), and 14% of patients had new chemotherapy initiated during the last month of their lives (Braga et al., 2005). On the other hand, only 20%–40% of dying patients received hospice services (Earle et al., 2008; McCarthy, Burns, Ngo-Metzger, Davis, & Phillips, 2003). For those receiving hospice care, the average hospice stay was rather short (around 16 days) (Darwish-Yassine, Towns, & Finn, 2008; Temel et al., 2008), and many hospice referrals were made within three days of death (Earle et al., 2008).

Advanced care planning is a patient-centered communication process during which clinicians gently explore patients' values, goals, and preferences regarding their future care needs, particularly concerning end-of-life care needs, to ensure their wishes are met should they lose capacity to make decisions (Kass-Bartelmes, Hughes, & Rutherford, 2003; Teno, 2000). For definitions of terms, see Figure 1. A study by Zhang et al. (2009) indicated that only 31% of patients with advanced cancer reported having baseline discussions about end-of-life care issues with oncology clinicians. However, 60%–70% of Americans are willing to discuss advanced care planning if asked by clinicians (Eidsness, Schellinger, Young,

**Purpose/Objectives:** To establish initial reliability and validity of a Web-based survey focused on oncology advanced practice nurses' (APNs') knowledge, attitudes, and practice behaviors regarding advanced care planning, and to obtain preliminary understanding of APNs' knowledge, attitudes, and practice behaviors and perceived barriers to advanced care planning.

**Design:** Descriptive, cross-sectional, pilot survey study.

**Setting:** The eastern United States. **Sample:** 300 oncology APNs.

**Methods:** Guided by the Theory of Planned Behavior, a knowledge, attitudes, and practice behaviors survey was developed and reviewed for content validity. The survey was distributed to 300 APNs via e-mail and sent again to the 89 APNs who responded to the initial survey. Exploratory factor analysis was used to examine the construct validity and test-retest reliability of the survey's attitudinal and practice behavior portions.

**Main Research Variables:** Respondents' demographics, knowledge, attitudes, practice behaviors, and perceived barriers to advanced care planning practice.

**Findings:** Exploratory factor analysis yielded a five-factor solution from the survey's attitudes and practice behavior portions with internal consistency using Cronbach alpha. Respondents achieved an average of 67% correct answers in the 12-item knowledge section and scored positively in attitudes toward advanced care planning. Their practice behavior scores were marginally positive. The most common reported barriers were from patients' and families' as well as physicians' reluctance to discuss advanced care planning.

**Conclusions:** The attitudinal and practice behaviors portions of the survey demonstrated preliminary construct validity and test-retest reliability. Regarding advanced care planning, respondents were moderately knowledgeable, but their advanced care planning practice was not routine.

**Implications for Nursing:** Validly assessing oncology APNs' knowledge, attitudes, and practice behaviors regarding advanced care planning will enable more tailored approaches to improve end-of-life care outcomes.