

# Nursing Telemedicine Educational Encounters: Improved Patient Satisfaction in Radiation Therapy Clinics

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**BACKGROUND:** Nurse-led education can improve patient satisfaction, and telemedicine has increased patient access during the COVID-19 pandemic.

**OBJECTIVES:** The aim of this article was to investigate how nursing telemedicine educational visits influence patient satisfaction.

**METHODS:** Patients receiving standard of care in-person education for breast cancer radiation therapy (RT) between January 2019 and June 2019 comprised the preintervention cohort. After July 2019, patients received the same information virtually and represented the postintervention cohort. Press Ganey surveys were used to evaluate patient satisfaction, t tests were performed to differentiate satisfaction scores, and f tests were calculated to determine differences in the variances of response.

**FINDINGS:** Patient satisfaction increased in the postintervention cohort for what to expect during RT, how to manage side effects, and nurses' attentiveness to patient questions and worries. There was decreased variance in patient satisfaction in the postintervention group for quality of care received from nurses and caring manner of nurses.

## KEYWORDS

nursing education; patient satisfaction; telemedicine; radiation; patient education

## DIGITAL OBJECT IDENTIFIER

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**PATIENTS FREQUENTLY WANT A HIGH LEVEL OF INFORMATION** after a diagnosis of cancer. Enhanced patient education can improve patients' satisfaction because patients can be more involved in treatment decision-making, better understand treatments and potential toxicities, and become more equipped to cope with psychological disturbances (Wongkietkachorn et al., 2018; Yeh et al., 2018). Nurses can provide patients with useful information and play an important role in patient education. Nursing interventions can significantly improve adherence to therapies, mitigate treatment side effects, enhance patient education and satisfaction, lessen stress and anxiety, and contribute to desirable clinical outcomes (Apor et al., 2018; Chang et al., 2020; Cuevas et al., 2019; Mertz et al., 2017; Rice et al., 2018; Tonapa et al., 2021; Wu et al., 2020; Yackzan et al., 2019).

Telemedicine has proven to be satisfactory and effective for use in clinical oncology, and benefits include increased access and convenience for the patient, as well as decreased costs (Hamilton et al., 2019; Sirintrapun & Lopez, 2018; Wu et al., 2020). There has been steady increase in the use of telemedicine solutions; however, the COVID-19 pandemic drastically accelerated the use of telehealth services because of in-person restrictions (Andrews et al., 2020; Elston Lafata et al., 2021; Loeb et al., 2020; Ohannessian et al., 2020; Royce et al., 2020). Patients and healthcare providers both reported high levels of satisfaction with telehealth during the COVID-19 pandemic, and many expressed willingness to use telehealth after the pandemic (Andrews et al., 2020; Ramaswamy et al., 2020). Satisfaction with telehealth was comparable to in-person visit satisfaction and was observed in many fields, including radiation oncology (Chang et al., 2021; Dinuzzi et al., 2021; Layfield et al., 2020; Mustafa et al., 2021; Shaverdian et al., 2021; Tenforde et al., 2020). Although it is generally demonstrated that most telemedicine oncology care conducted by doctors has comparable patient satisfaction, the same has not yet been demonstrated for nursing telemedicine interventions, particularly in patient education.

With the increasing role of telemedicine in cancer care, it is important to evaluate the effects and satisfaction of nursing telemedicine interventions. Patient satisfaction is recognized as an integral part of quality care delivery, and there are various validated metrics and surveys in oncology to measure patient satisfaction (Davis et al., 2017). Patient satisfaction studies