

An Examination of Instruments for Measuring Patient Satisfaction with Telemedicine

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Abstract

Telemedicine is the use of telecommunication and information technologies to provide clinical health care at a distance. Telemedicine can provide a number of benefits, such as eliminate distance barriers and improve access to medical services. Hospitals are increasingly using telemedicine to the extent where business analysts expect the market to grow to \$34 billion by 2020. Patient satisfaction plays a key role in the adoption and outcomes of telemedicine services. However there are no systemically developed and tested instruments for measuring telemedicine satisfaction. It is also often not clear what exactly is shown by measures of satisfaction with telemedicine as the term satisfaction can be open to various interpretations and influenced by different factors.

This research aims to develop a comprehensive and reliable instrument to measure patient satisfaction using a grounded theory approach and following the procedure recommended by MacKenzie et. Al 2011. Specifically, we develop the instrument based on a review of 167 empirical studies on telemedicine satisfaction. In total, 20 constructs have been identified from the questionnaires that can contribute to measuring patient satisfaction with telemedicine. Constructs vary from those representing patient / provider interactions to those that are concerned with patient convenience and medical outcomes. Following the instrument development, we will test the validity and reliability using data collected from a major northeastern hospital. The preliminary findings will be discussed in the presentation. This work will provide a comprehensive conceptualization of an instrument of patient satisfaction with telemedicine. This instrument can be used in future research to understand the adoption and outcome of telemedicine. This instrument can also guide the design of telemedicine systems as well as services models.

The authors seek to engage the audience in a discussion about technology satisfaction while obtaining feedback from the audience and sharing knowledge gained from the initial findings of this research. The authors can benefit from the feedback provided by audience members about their experiences with examining satisfaction and the measurements they used, along with challenges and opportunities in developing similar instruments.