Oncology Rehabilitation Outcomes Over Time: A Mixed-Methods Approach

Elizabeth J. Predeger, PhD, RN, Maureen O’Malley, PhD, RN, Thomas Hendrix, PhD, RN, and Nadine M. Parker, PhD, RN

According to the Centers for Disease Control and Prevention ([CDC], 2012a), the incidence of breast cancer from 1999–2008 decreased by 1.2% and the mortality rate fell by 2%. During the same timeframe, colon cancer incidence and mortality among men was unchanged but, among women, incidence fell by 2.4% and mortality fell by 2.9% ([CDC], 2012b). Similarly, the incidence of prostate cancer reduced by 1.6% and mortality fell by 3.6% ([CDC], 2012c). Cancer survivors are living longer with a disease that has become, for an increasing number of Americans, a chronic condition. Therefore, longer lifespans lead cancer survivors to strive for the highest possible quality of life through improved physical and emotional functioning. In response, rehabilitation programs have emerged that strive to promote optimal physical, sensory, intellectual, psychological, and functional levels of health ([World Health Organization], 2013). Specifically, cancer rehabilitation provides specialists to help those living with cancer to be as independent as possible ([American Cancer Society], 2013).

Historically, oncology rehabilitation is a relatively new field of study; however, a significant body of quantitative research exists regarding the short-term benefits. When measured at program completion, individualized cancer rehabilitation programs have demonstrated improvements in patients’ physical functioning ([Jones & Alfano], 2013; [McEwen, Elmi, Waldman, & Bishev], 2012; [Spence, Heesch, & Brown], 2010). Meta-analyses have confirmed that a change in physical activity had either a large-to-moderate positive effect ([Formica et al.], 2011) or made a clinically important difference ([Fong et al.], 2012) on physical functioning measures. Similar meta-analyses have shown that oncology rehabilitation results in positive effects on health-related quality of life, psychological outcomes, and symptoms ([Conn, Hafdahl, Porock, McDaniel, & Nielsen], 2006; [Farin & Nagel], 2013; [Fong et al.], 2012). About two-thirds of the of 82 independent clinical studies systematically reviewed by Jones and Alfano (2013) found that exercise therapy is well tolerated and safe for cancer survivors.