7.5: Lean

Lean arose from the Toyota success story of the 1960s. It is a management strategy used to evaluate organizational processes, identifying those that add value to the business, eliminating waste, and improving the flow with a focus on creating better value for time and money (Crema & Verbano, 2015; Johnson, Smith, & Mastro, 2012). Crema and Verbano (2015) maintain that this strategy emphasizes standardization of process in order to facilitate the identification of unexpected events that can be fixed quickly.

The Lean approach has been used in the following areas of health care: recruitment and hiring, nursing informatics, laboratory functions, patient care environment, radiology, patient safety, trauma care, and cost reductions. In addition, Lean has contributed to process improvements with regards to clinical procedures, appointment compliance, patient flow, referrals, wait and discharge times, and re-hospitalizations. Johnson, Smith, and Mastro (2012) highlight the fact that Lean is being used more and more frequently as a system-wide operating framework.

The Lean approach was introduced to all Saskatchewan health care organizations in 2010 by the provincial government as a quality improvement approach. Lean has faced many challenges over the past years. However, despite these challenges, it has continued to provide health care leaders with excellent tools and processes that support continuous QI.

Essential Learning Activity 7.4.1

To see an example of Lean in action, watch this YouTube video "Advanced Lean in Healthcare" (3:08) from Lucile Packard Children’s Hospital at Stanford, then answer the following questions:

1. What does Lean aim for?
2. How is patient flow improved?
3. Who or what is at the centre of Lean?

Lean focuses on resource optimization rather than on excellence or quality of patient care. Concerns have been voiced about the Lean emphasis on “doing more with less” and the need for significant changes. There also has been evidence of anxiety within the health care community regarding misplaced priorities and the safety of patients in a Lean health care environment.

Provision of patient-centred care comes from the specialized knowledge base in concrete ways that nurses practise in their varied roles, from management to direct care. While Lean methods of improving efficiency and cost-cutting strategies are important for hospitals and governments, some health care leaders and researchers believe that Lean methods ignore the actual work of nurses (Wagner, Brooks, & Urban, 2018, p. 22).

However, many researchers, such as Simons et al. (2015), believe that Lean management has the potential to contribute to a patient safety culture. Lean, with its inherent philosophy of quality management, places the patient at the centre and Lean tools are used to motivate employees and increase the efficiency of the organization while also improving patient care quality and patient safety. Other researchers, such as Crema and Verbano (2015), suggest that Lean, a business management strategy with an ability to analyze, design, and manage processes, is an excellent tool to strengthen medical error avoidance. Finally, Kaplan, Patterson, Ching, and Blackmore (2014) emphasize that Lean tools are not the sole answer to an organization’s concerns and are best employed as part of a comprehensive management system with commitment to organizational change and innovative leadership.

Johnson, Smith, and Mastro (2012) advocate that nurses are the ideal leaders of groundbreaking Lean and QI work. Nurses combine experience leading interdisciplinary teams, systems knowledge, and strong assessment skills with a focus on patient advocacy and a commitment to quality patient care. These combined attributes are required to steer an organization toward QI changes that are focused on both cost efficiency and maintenance of a strong patient safety culture. Health care requires nurses, with their versatile skills, knowledge, and experience, to take leadership of QI innovations.