

Chapter 6

St. Stephen's Hospital Hervey Bay: Study of Developing a Digital Hospital

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ABSTRACT

St Stephen's Hospital in Hervey Bay, Queensland, Australia, is a new 96 bed state of the art digital hospital that opened on a greenfield site on 13 October 2014. The eHealth project was responsible for providing a fully integrated electronic medical record. The authors explore the unique challenges presented by the project and the solutions deployed. Key components related to the success of the project are identified. The results of the intense two and half year project timeline culminated in a successful go-live and certification as the first hospital in Australia to achieve Stage 6 HIMSS designation.

INTRODUCTION

This chapter sets out to provide a case study of how UnitingCare Health (UCH) successfully launched a new fully integrated digital hospital in Australia, becoming the first hospital in the country to achieve Stage 6 certification by the Healthcare Information Management Systems Society (HIMSS) for its advanced Electronic Medical Record (EMR) system. Through an Australian Federal Government Health and Hospitals Fund (HHF) grant, UnitingCare Health received \$47 million in funding to develop a modern hospital with digital health care solutions at the forefront of Australian health care.

In less than three years the UCH team successfully launched the new digital hospital through extensive planning, clinician engagement and leadership strategies that fostered timely identification of challenges and the creation of effective solutions, allowing the \$96 million hospital to open on-time and on-budget on October 13, 2014.

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The case study will describe the eHealth journey including challenges and solutions related to the need for a new hospital in Hervey Bay, digital design parameters, technology components, management and organizational considerations, work redesign and clinical transformation, change management, go-live activities and benefits realization.

BACKGROUND

UnitingCare Queensland (UCQ) is the health and community service provider of the Uniting Church and supports more than 14,000 people every day of the year. With more than 15,000 staff and 8,500 volunteers in more than 400 geographic locations across Queensland, it is one of Australia's largest not-for-profit health and community service providers, with an annual turnover of approximately \$1.4 billion (UnitingCare Queensland, 2014).

In June 2000, UnitingCare Health (UCH) was formed to bring together the various hospitals owned and operated by the Uniting Church in Australia (Queensland Synod) into one organization within UCQ. The hospitals included: The Wesley Hospital, 536 beds in Brisbane; St Andrew's War Memorial Hospital, 250 beds in Brisbane; The Sunshine Coast Private Hospital, 190 beds in Buderim; and St Stephen's Hospital, 60 beds in Maryborough, which is part of Queensland's Fraser Coast region. UCH thus became one of the largest not-for-profit private hospital operators in Queensland, employing more than 4,000 staff, annually admitting more than 120,000 patients and undertaking nearly 80,000 surgical procedures (UnitingCare Queensland, 2014).

The Fraser Coast region is one of the fastest growing regional areas in Australia. In 2011 the population of the Fraser Coast region was 103,358 and projected by 2031 to reach more than 178,000. The region has a high proportion of older residents. In 2006, 19% of the population were aged 65 years or older, and this figure is estimated to increase to 23.4% in 2031 (Office of Economics Statistical Research, Queensland Treasury and Trade, 2012). Maryborough has been the traditional business, commercial and service center of the Fraser Coast. However, in recent years the major growth area has become Hervey Bay which between 2005 and 2010 experienced an average growth of 4.7% per year, the fastest growth rate in Australia's coastal regions (Australian Bureau of Statistics, 2012).

The unprecedented growth and shift in regional population settlement factors has had major impacts and redistribution pressures on the Fraser Coast region across many sectors and services. Health care has been no exception. The pressure on the public hospital in Hervey Bay has been profound with an occupancy rate of 94% in 2010 (Australian Medical Association Queensland, 2014). A major contributing factor has been that the region has been critically underserved in private hospital beds. In 2008, Australia had a ratio of 4.0 acute hospital beds per 1,000 members of the population, with a split of 2.5 public acute beds and 1.5 private beds (Australian Institute of Health and Welfare, 2011). Using this ratio, in 2008 the Fraser Coast population had access to only 60 private beds in Maryborough – while the level required to adequately service the demand was 150 private beds.

In addition to inadequate private bed numbers, medical specialists who had traditionally lived in Maryborough began relocating to Hervey Bay since the early 2000s. This movement followed the Queensland government's closure of the intensive care unit at the Maryborough Public Hospital and downgrading of its emergency department. At the same time, intensive care and emergency services were upgraded at the Hervey Bay Public Hospital which shifted the focus of the region's health services from Maryborough to Hervey Bay.

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