

Background

At Texas Children's Hospital (TCH), approximately one child per day is diagnosed with diabetes mellitus. The time period surrounding the diagnosis is a challenging time for the entire family. Education is an important component of the inpatient stay and remains critical for self-management after discharge. Historically, the inpatient model at TCH involved a 3 day hospital stay with basic skills instruction done by a bedside nurse followed by confirmation of education with a 4 hour multi-family seminar led by a certified diabetes educator (CDE).

Also, management of Diabetic Ketoacidosis (DKA) was completed in the critical care setting and then the patient awaited transfer to an acute care bed for ongoing diabetes management and education.

Project Aims

The mission was to develop a comprehensive, multidisciplinary, and integrated Diabetes Care Unit (DCU) to improve and enhance inpatient education and care for diabetes patients at TCH, along with successful maintenance of DKA. The single setting for DKA management and education enhances continuity of care, decreases length of stay (LOS), enhances patient throughput and improves patient satisfaction.

Methods

A transformation in the care delivery model was prepared and implemented. The DCU was opened to create specialized care delivery for diabetic patients and their families with the following specific interventions:

- The Diabetes/Endocrine medical service split in two teams, for focus with patients with diabetes
- DCU opened on March 17, 2014
- 6 beds dedicated for patients with diabetes
- 22 Core Diabetes Nurses trained, via didactic, observation, return demonstration, and simulation, to provide 24/7 education and clinical management
- Family centered rounds, inclusive of the entire multidisciplinary team are conducted daily
- DKA management with insulin drips initiated on October 1, 2014

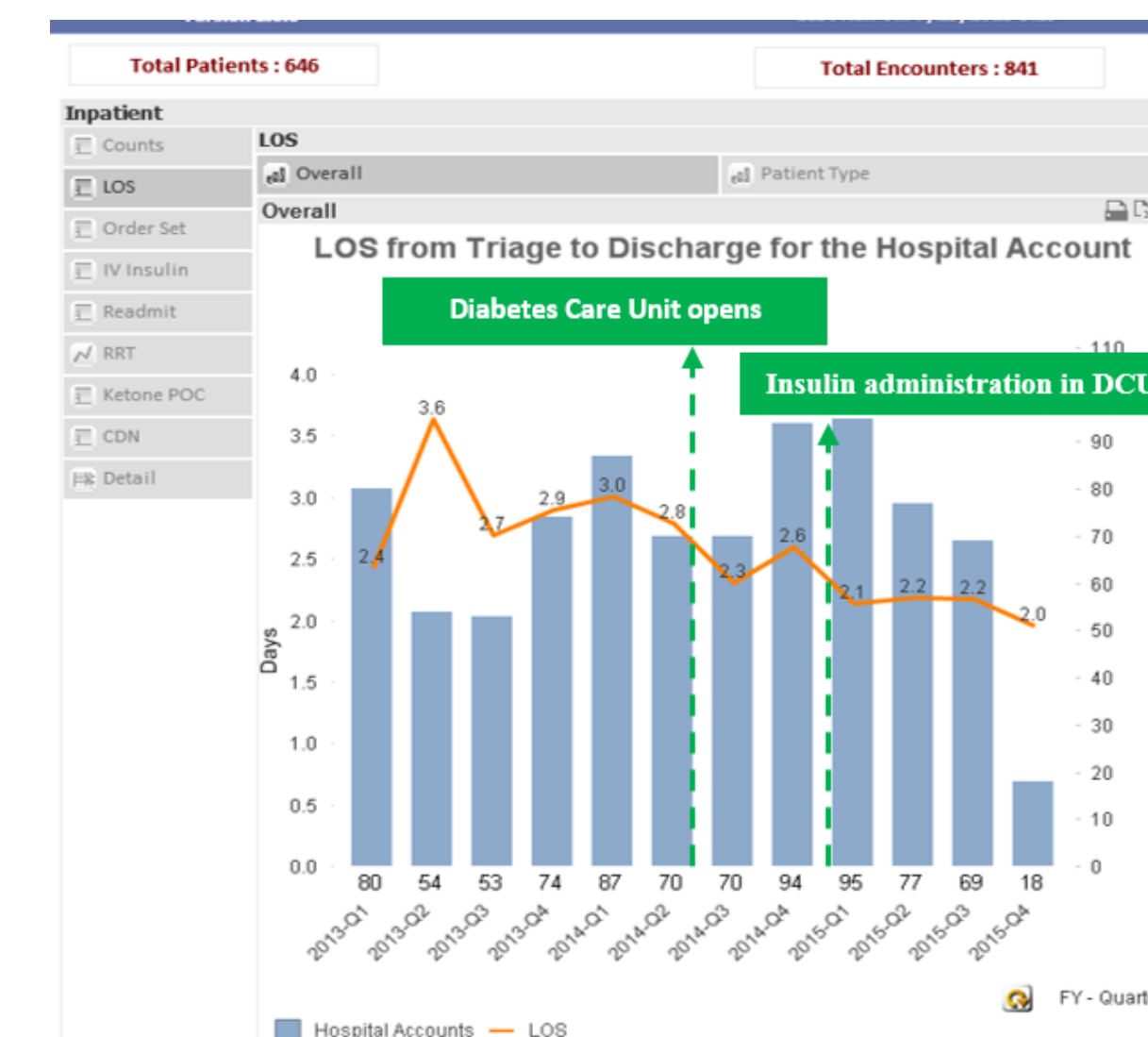


DCU Ribbon Cutting: Pediatric Endocrinologists (attending, fellows), Practice Administrator, Nursing leadership, Nurse educators, Care management, Certified Diabetic Educators, Bedside nursing (RN), Registered Dietitians (RD), Social Workers, family representatives

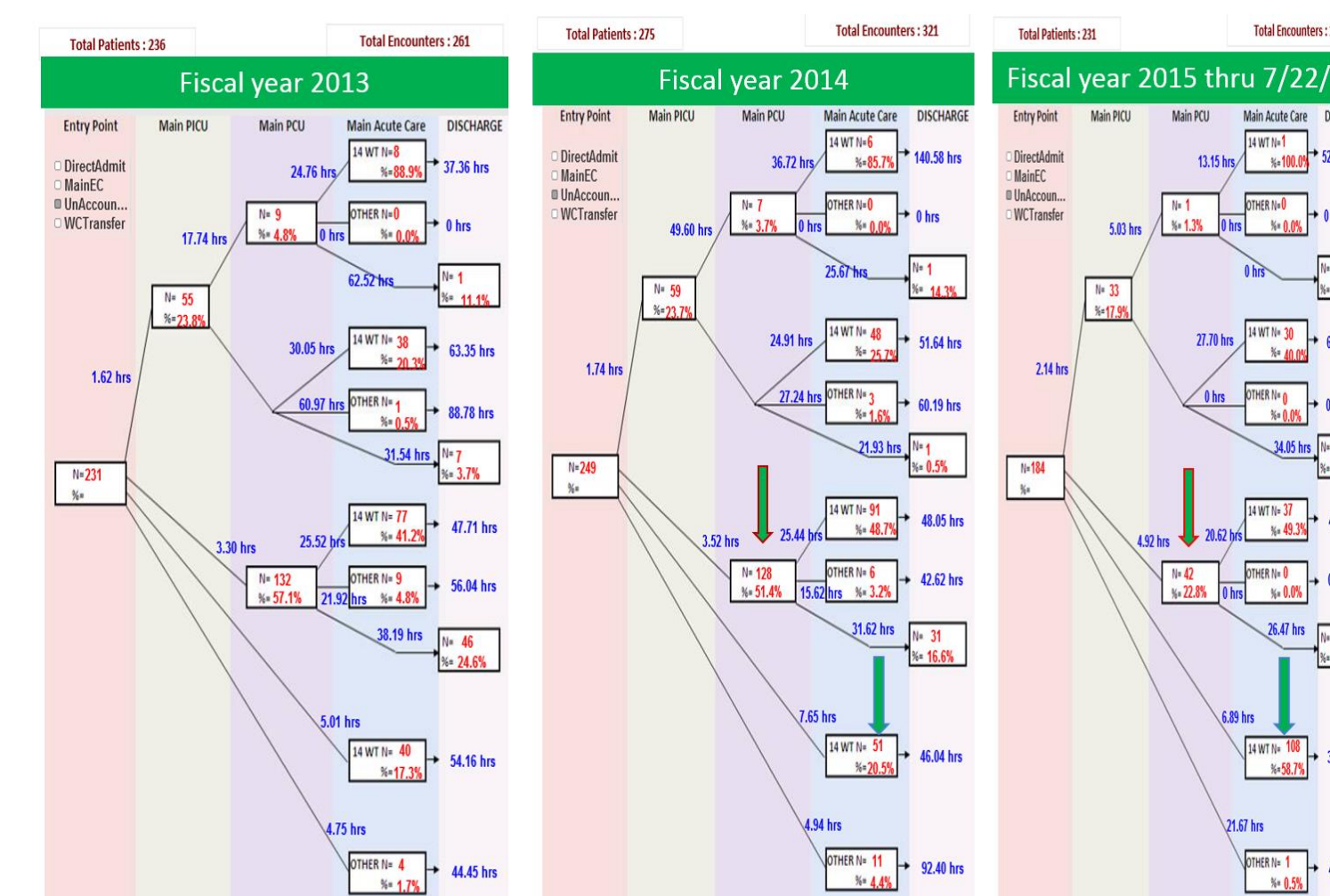
Results

A continual drive to improve the outcomes and experiences of the Type 1 diabetic patient has resulted in a transformation from segmented, incomplete care to comprehensive, high quality care, including:

- Decreased LOS

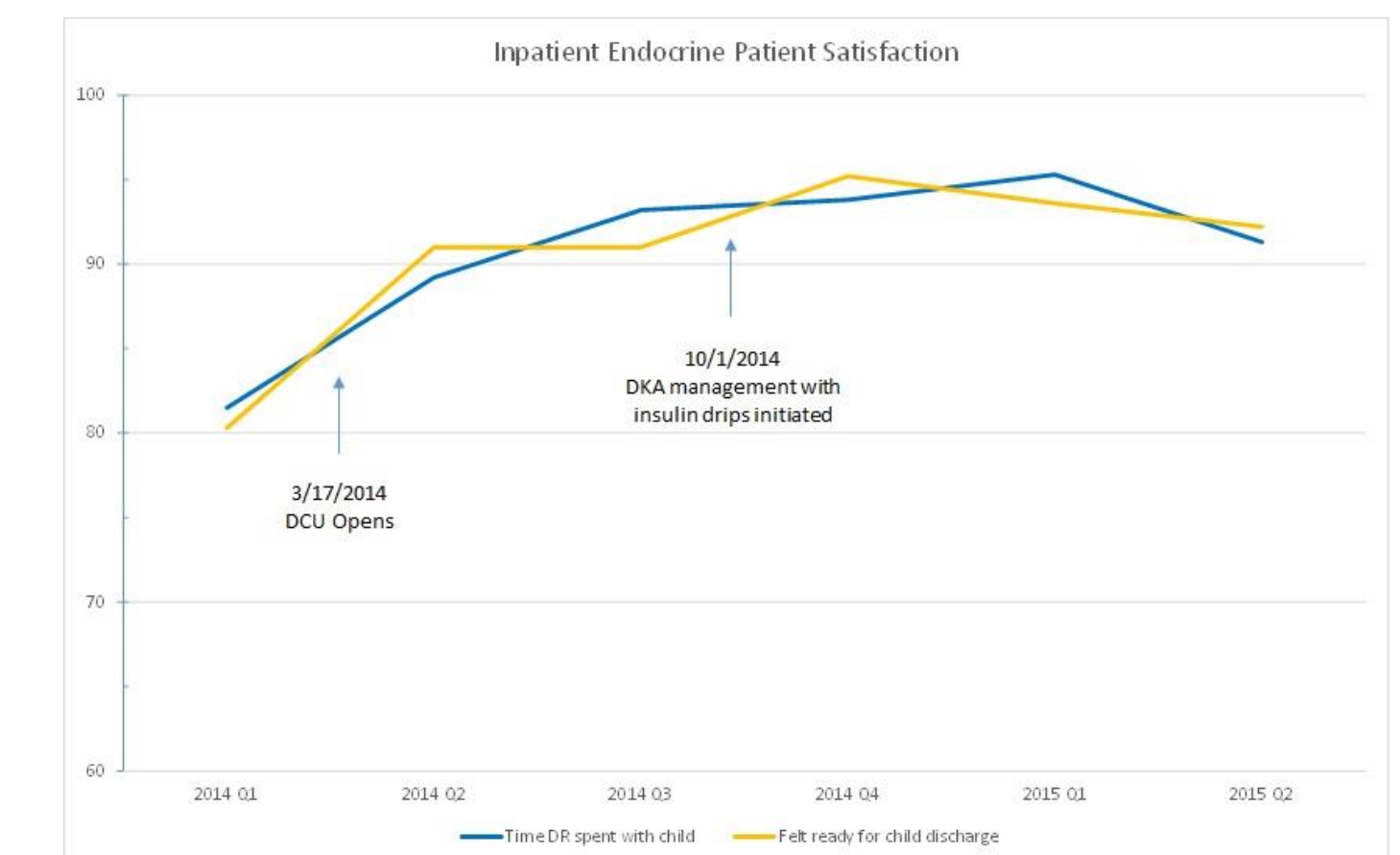


- Enhanced patient throughput



Results Continued

- Improved patient satisfaction



Discussion

The transformation in the care delivery model for pediatric patients has proven successful.

- Spread to other campuses within the Texas Children's system and assure consistent standard of care
- Spread of the care delivery model to other disease processes
- Expansion of Core Diabetes Nurse team
- Implement quality leadership structure to monitor
- Evaluate the project outcomes and describe lessons learned.