EP16EO – Culture of Safety

EP16EO: Provide one example, with supporting evidence, of an improved patient safety outcome associated with clinical nurse involvement in the evaluation of patient safety data at the unit level.

- *Patient outcome data must be submitted in the form of a graph with a data table***.**

Example: Decrease in Medication Errors in the Surgical Unit Resulting from an Enhanced Medication Reconciliation Process

Problem

Medication reconciliation is an essential patient safety standard. As a Joint Commission accredited organization, medication reconciliation is identified as a key performance indicator by the Quality Management Department as a patient safety strategy to minimize the chances of medication errors.

Medication reconciliation is a process in which a patient's medications are reviewed and prescribed with timeliness and accuracy at transitional points of care, including admission, transfers, and upon discharge from the hospital. On May 30, 2021, Pharmacist Murooj Shukry met with Rio Flores, BSN RN, Nurse Clinician Surgical unit, and clinical nurse Kristine Gubat, BSN RN, Staff Nurse 1 (SN1), Surgical unit, to review and analyze medication errors data.

It was determined and reported to the Surgery unit that the rate of medication errors was 6.1 per 1000 patient days in May 2021.

Goal Statement

Reduce the rate of medication errors per 1000 patient days in the Surgery unit at KFSHRC-J.

Participants

Table EP16EO.1: Participants Involved on the Interprofessional Team

Name & Credentials	Job Title	Department
Murooj Shukry	Medication Safety Officer, **Team Leader**	Clinical Support Pharmacy
Rio Flores, BSN RN	Nurse Clinician	Surgical

Kristine Gubat, BSN RN	SN1, Clinical Nurse	Surgical
Veronica Filipinas, MAN RN	Nurse Systems Manager	Nursing Practice and Research
Gabrielle Hutchens, MAppMgmt (Nurs) RN, CPHIMS, CPHQ, CSSGB	Nursing Quality Improvement Coordinator	Nursing Practice and Research
Haytham Alabbas, M.D.	Associate Consultant, General and Oncology Surgery	Surgery Department
Wejdan Alghamdi, M.D.	Medical Resident	Surgery Department
Najla Sabbagh	Health Informatics Analyst	Operations & Support Services Division
Amal Awad	Senior Health Informatics Analyst	Operations & Support Services Division

Description of Intervention

A performance improvement (PI) project was initiated in June 2021, utilizing the KFSHRC General Organization IACT methodology described in the Performance Improvement Plan (see OO2.3). Murooj, in her role as Medication Safety Officer, led the project. Two nurses from the Surgical unit were invited to be members, Rio and Kristine. During the intervention phase, between June to July 2021, the PI team met bi-weekly to review the data and follow up on the action plan.

Implementation and education

Rio and Kristine were actively involved in interventions in the Surgical unit between June and July 2021 by facilitating nurse education in collaboration with the Healthcare Information Technology Affairs (HITA) team on the medication reconciliation process and encouraging nurses to complete the medication history for all patients within 12 hours of admission. These actions would assist in improving medication reconciliation and assist in reducing medication errors in the unit.

Fifty clinical nurses were trained in two sessions. Feedback on the review of clinical nurses' practice in medication reconciliation included close monitoring of non-compliance with the new process introduced. Reminders to staff were completed by the Rio and Kristine, and reinforcement of the medication reconciliation process was done as needed.

Collaboration and Education of Physicians

Through the advocacy of the PI team, the Medical Quality Committee approved to mandate education for all current physicians in which an education module had to be completed in iLearn, an electronic education platform with free access to all employees

of the organization. The HITA team also enabled restrictions for prescribing medications to all new on boarding physicians until the online module was completed.

In addition, the PI team streamlined the process of medication reconciliation upon patient admission adding a clear role for nurses to initiate medication history documentation. This resulted in improved accuracy and in shortening the cycle time to complete admission reconciliation by the physician, see Figure EP16OE.1 below.

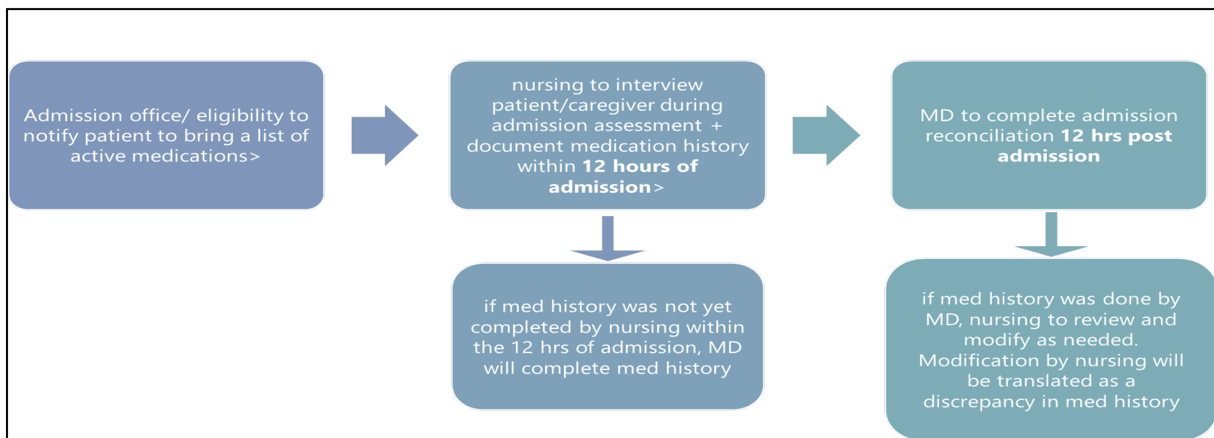
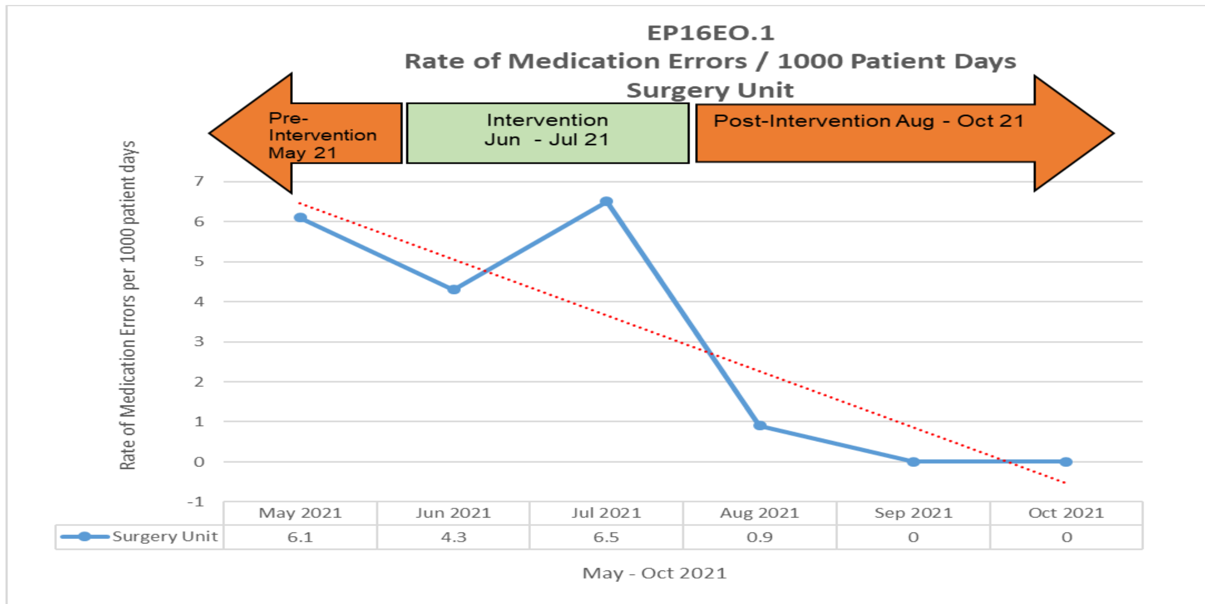


Figure EP16EO.1: Medication Reconciliation Process on Admission

All interventions were completed in June and July 2021.

Outcome

With the participation of clinical nurse Kristine in this project and the evaluation of medication error data and action plans implemented, the team was able to have a positive result in reducing medication errors. Results showed a reduction in medication errors post-intervention, as seen in the graph with data table EP16EO.1 below.



Graph EP16EO.1: Rate of Medication Errors/1000 Patient Days in the Surgery Unit May-October 2021