Transforming Pediatric PeriAnesthesia Care:
Insights from the Flow Lean Improvement Project for Patients/Parents and Providers, and the PeriAnesthesia Optimization Project

Caitlin McGugan - Program Manager, BScN. RN, Kathleen Cosby - PAC Coordinator, BScN. RN,
Genevieve Auray RN, BScN, Everan Michalchyshyn BSc, Natasha Mills NP, MN, Maria Mohareb NP, MN, Leslie Reynolds RN, BScN, Jessica Tang RN, MN, Marc Trinidad RN, BScN *Acknowledgements: Barbara Couper RN, MN, Alida Orr, Megan Parry RN, MSc, James Robertson MD, Nicole Bell Webster RN, MPEd*

Background

- Surgical preparation processes at The Hospital for Sick Children (SickKids) were inconsistent and variable
- Redundant documentation and fragmented workflows were common
- Communication gaps and manual processes in the Pre-Anesthesia Clinic (PAC) contributed to:
  - Delays and cancellations
  - Inefficient care coordination
- Staff experienced workflow burden and reduced satisfaction
- Families reported confusion and anxiety due to limited pediatric focused information and support

Objectives

- Standardized education for patients and parents/caregivers
- Better communication, better coordination
- Digital-first access to perioperative information
- Fewer same-day cancellations
- Smarter, more efficient pre-op workflows

Methods & Implementation

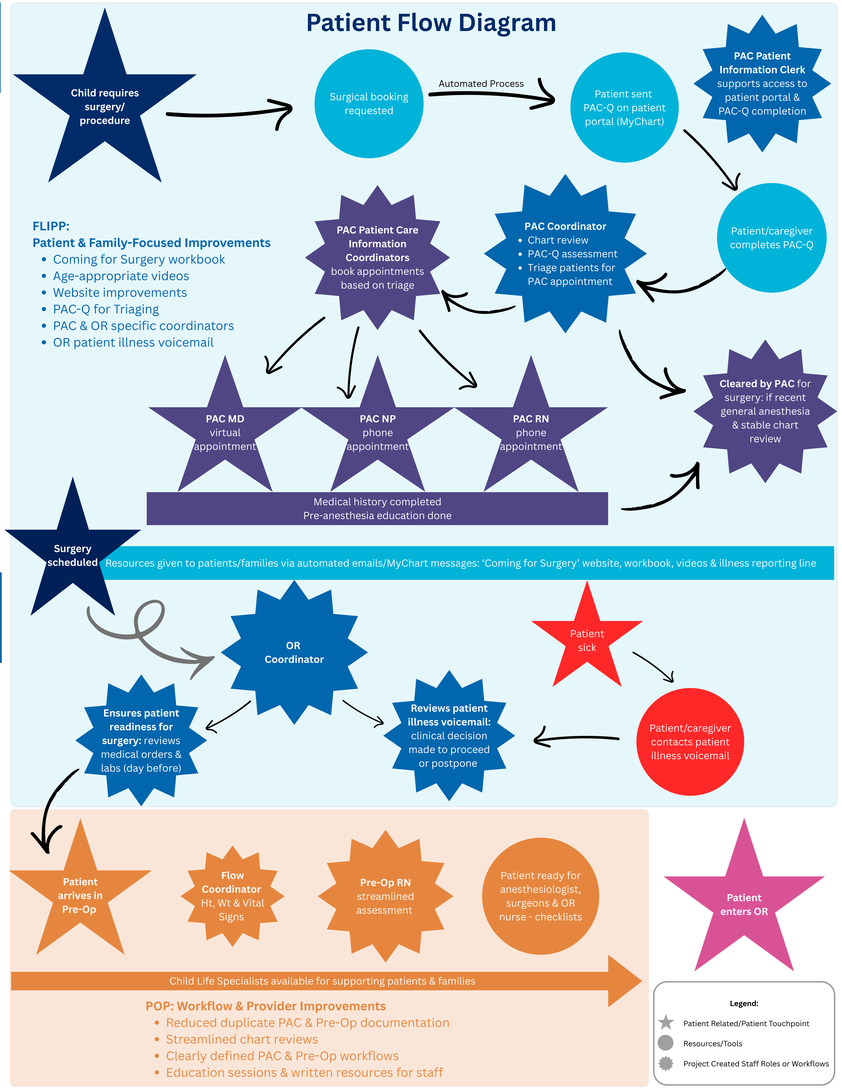
FLIPP (Flow Lean Improvement Project for Patients/Parent and Providers) enhanced pediatric surgical preparation through:

- Development of the Coming for Surgery workbook and refreshed online resources, including age-appropriate videos, checklists, and interactive tools
  - Co-designed with interdisciplinary teams and patient advisors
- Implementation of the Pre-Anesthesia Clinic Questionnaire (PAC-Q) via the online patient portal (MyChart) to support acuity-based PAC triage
- Introduction of RN Coordinator roles to centralize assessments, communication, and triage
- Launch of an OR patient illness voicemail to proactively reduce same-day cancellations

POP (Perianesthesia Optimization Project) improved perioperative flow by:

- Streamlining workflows between PAC and Pre-Operative teams
- Optimizing existing Epic® electronic health record (Epic Systems Corporation, Verona, WI, USA) functionality
- Supporting acceptance through education sessions, just-in-time training, and written resources

Patient Flow Diagram



Statement of Successful Practice

FLIPP and POP transformed the pediatric surgical journey into a streamlined, efficient, and family-centred experience.

Key outcomes included:

- Better prepared and more **confident patients and parents/caregivers**, supported by clear education and digital tools
- Stronger **perioperative coordination,** improving team efficiency and continuity of care
- The PAC Coordinator role, PAC-Q, and Epic optimization **reduced duplicate documentation** and minimized time spent on **chart review**
- Improved workflows enabled nurses to **support understaffed perianesthesia areas** more effectively

11%

reduction in **pre-operative nursing work-up time** was achieved following implementation

65%

of unwell patients were identified **before surgery** through the **illness voicemail; significantly reducing same-day cancellations**

Implications for Advancing PeriAnesthesia Nursing

These initiatives highlight **PeriAnesthesia Nurses as leaders in innovation**

- Advancing patient education
- Digital health integration
- Seamless care coordination

By centering families and leveraging technology, nurses meaningfully improve outcomes and experiences for pediatric surgical patients.