

SMALL STEPS TO BIG CHANGES

EVERY PATIENT DESERVES A WARM WELCOME BEFORE SURGERY

Preoperative Warming of Patients

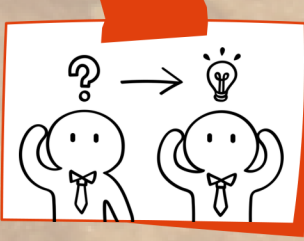
Nurses @ Operating Theatre & Administration

CHALLENGES

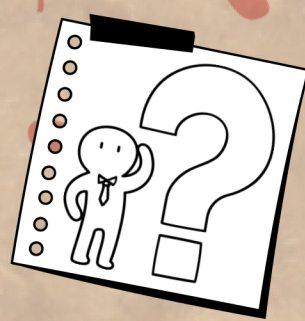
- In June 2023, 11 out of 30 (36.7%) patients who underwent long orthopaedic surgeries (>2hrs) under General Anaesthesia (GA) developed **Intra-operative Hypothermia**.
- The surgical environment is compounded by various factors, including differences in surgical procedures, preferences among anaesthetists and surgeons, and limited knowledge of experience among junior staff.

Hypothermia

is a medical condition when the body loses heat faster than it can produce it, resulting in dangerously low body temperature.



IMPLEMENTATIONS



BEFORE

Current interventions for preventing Hypothermia include:

- Continuous warming
- Covering of patients (as much as possible)
- Adjustment of temperature
- Use of warm fluid/irrigation
- Underbody warmers
- Continuous temperature monitoring

Improved Process

AFTER

- Operating theatre (OT) reception nurse to screen through patient listing
- Identify cases listed under GA that will take longer than 2 hours
- Ensure the warming machine is available and functioning
- Prepare the correct size of warming blanket according to the table reference
- Upon patient's arrival at OT reception, check patient's temperature
- Apply the warming blanket and connect to the warmer till patient is wheeled to the operating room
- Continue to use the same warming blanket during surgery

Patients received **BOTH** intra-operative & postoperative warming

Change in Patient Care Processes, coupled with Staff Training

Ensuring that preoperative warming is provided as a **standard of care** for all surgical patients undergoing General Anaesthesia

Identify the **different types** of surgeries that require preoperative and postoperative warming

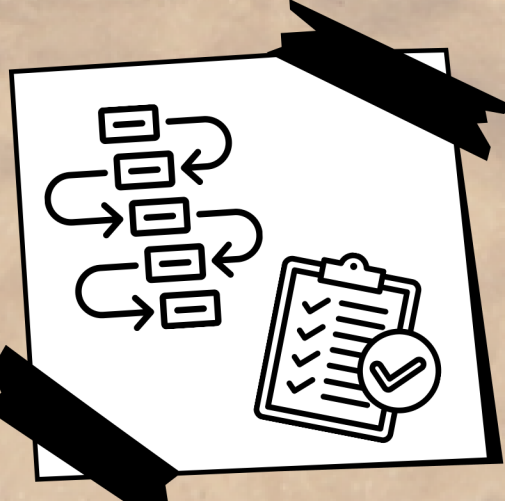
Be aware of the **different sizes** of blankets available

Blanket size	Nature or Type of Operation
Half body	Total Knee Replacement
	Total Hip Replacement
	Spine cases
Full body	ENT cases > 2-3 hours

Providing staff with training and table of reference for standardisation

OUTCOMES

- NUMBER OF PATIENTS WHO **DEVELOPED HYPOTHERMIA** WAS **REDUCED BY HALF**
- NUMBER OF PATIENTS WHO **SHARED FEEDBACK THAT THEY FELT COLD** WERE ALSO **REDUCED BY HALF**
- STANDARD PRACTICE ON PRE-WARMING WAS IMPLEMENTED FOR THE NURSING TEAM



KEY

Standardised Patient Care Processes & Presence of Table of References

THANK YOU FOR SHARING!
Ms Liu Guoai,
Nurse Clinician,
Operating Theatre



SMALL STEPS TO BIG CHANGES

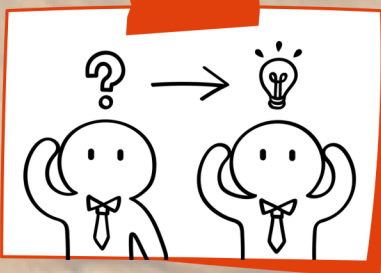
FROM MRI HURDLES TO HARMONY: MAKE EVERY MOMENT COUNT

Improvement in MRI Sedation Workflow

Orthopaedic Surgery & Radiology

CHALLENGES

- Late or no confirmation on TigerConnect, the secure messaging platform, from doctors who requested for MRI slots, resulting in an oversight of scheduling sedation appointment for patients.
- Absence of a qualified doctor to carry out sedation during the actual appointment. At times, assigned doctors are not qualified for the medical procedure.
- Patients end up being turned away despite the long wait.
- Having no other options, patients' appointments need to be rescheduled resulting in a delay in treatment and follow-up review.



IMPLEMENTATIONS

Ensure that all resources are available and in good working condition

Radiology, team managing MRI will schedule and inform patients of their scheduled appointments, and subsequently to inform the secretary of Orthopaedic Surgery



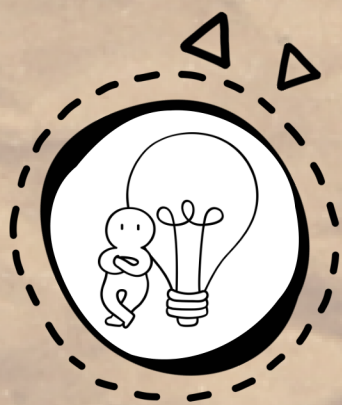
Well-Prepared

Ensure that all orthopaedic doctors are trained and certified to carry out sedation procedure

Doctors assigned by Radiology are to arrive 10 to 15 mins before the patients' appointments while the patients are being prepared for the procedure

OUTCOMES

- All orthopaedic doctors assigned for patients' appointment are qualified to sedate patients.
- Delegating the scheduling and rostering of doctors to the clinical department's secretary has significantly enhanced efficiency, putting in place timely availability of doctors for sedation administration.
- Patient satisfaction has increased as their scans were completed as scheduled, allowing for timely treatment, resulting in win-win situation for both patients and hospital staff.
- Implementation resulted in smoother workflow, alleviating the burden on the staff and promoting efficiency.
- No wastage of MRI slots



KEY

Refine processes,
tick off mandatory training

Time for a power boost!

THANK YOU FOR SHARING
Ms Kelvinder Kaur
Senior Assistant Manager,
Orthopaedic Surgery

Ms Waheeda Binte Ahmad
Assistant Nurse Clinician,
Radiology Department

