Effectiveness of Prewarming to Prevent Inadvertent Perioperative Hypothermia (IPH) for Patients undergoing General Anaesthesia

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Introduction
Inadvertent Perioperative hypothermia (IPH) is a common occurrence found in patient undergoing general anaesthesia (GA). Research indicated that the incidence of Surgical Site Infections tripled if a patient became hypothermic in surgery. Although active intraoperative warming has been implemented routinely at our department, it is noted that some patients still present with IPH. Hence, our Evidence-based Nursing Team carefully analyses the research articles by Roberson et al., Brito Poveda et al., and Hom et al. to evaluate the efficacy of preoperative warming. These studies provide an evidentiary foundation that practicing an active preoperative forced-air warming may promote normothermia in patient undergoing GA.

Objectives
We aimed to evaluate the effectiveness of preoperative forced-air warming to maintain GA patient postoperative normothermia

Methodology
A comparison survey was carried out to evaluate the outcomes before and after the implementation of prewarming. A preoperative baseline temperature and the first temperature upon admission to the post-anaesthesia care unit were recorded. A retrospective analysis was performed to obtain baseline data on GA patients who were in PACU from Jan 2015 through Jun 2015

Result
The first 3 months before implementation (1 Jan 2015 - 31 Mar 2015), 1408 patients were reviewed. 92.1% of patients were normothermic (≥ 36 °C) immediately post-op. During the following 3 months after implementation (1 Apr 2015 - 30 Jun 2015), 94.5% of the 2324 patients entered PACU normothermic. The peer-reviewed journals supported the implementation of active preoperative warming to prevent IPH and the study also concluded that 15-30 minutes preoperative forced-air warming demonstrating effectiveness to maintain GA patient postoperative normothermia.