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Get Prepared for the SGH Post Anaesthesia Care Unit (PACU) Critical Care Service

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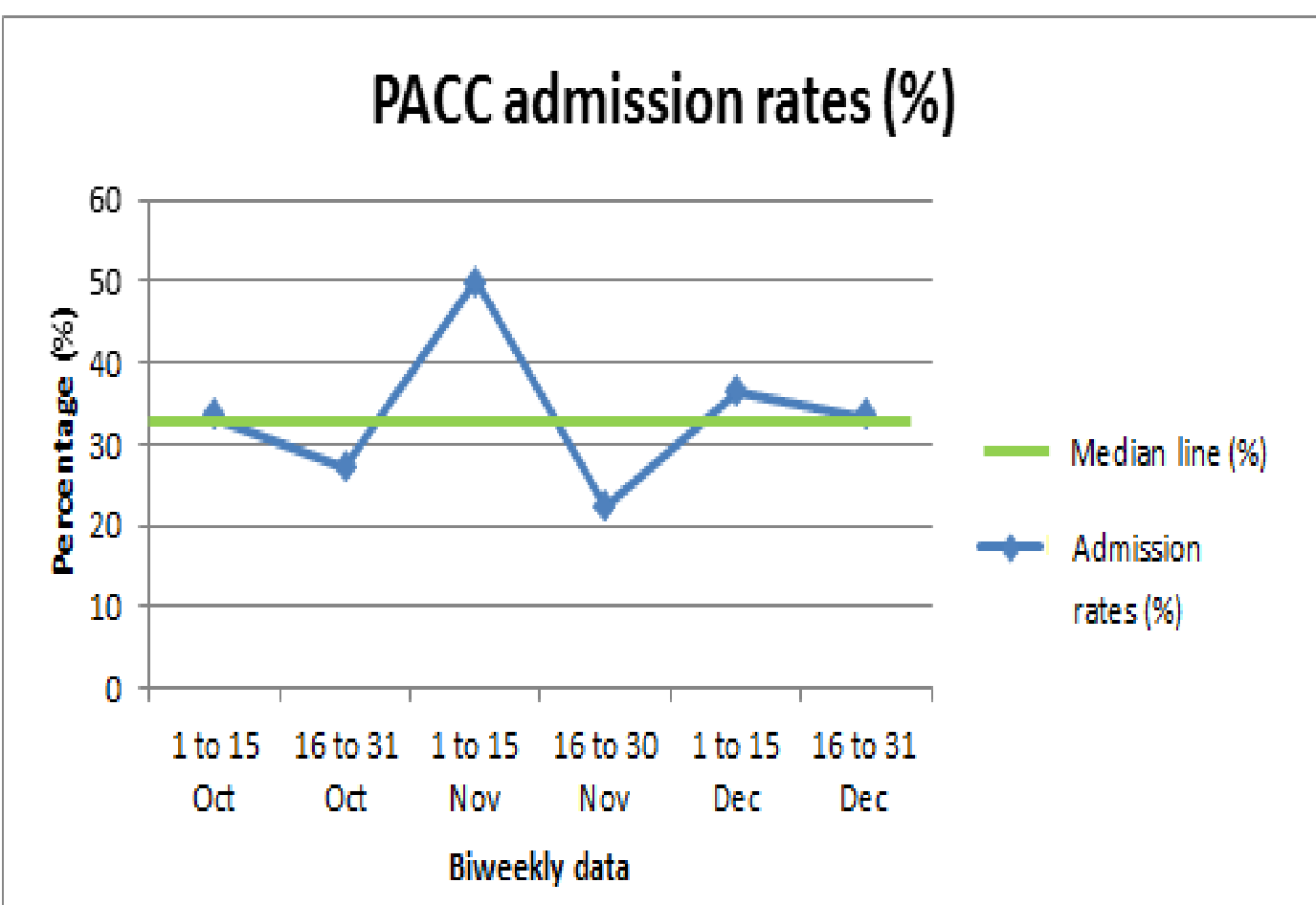
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INTRODUCTION

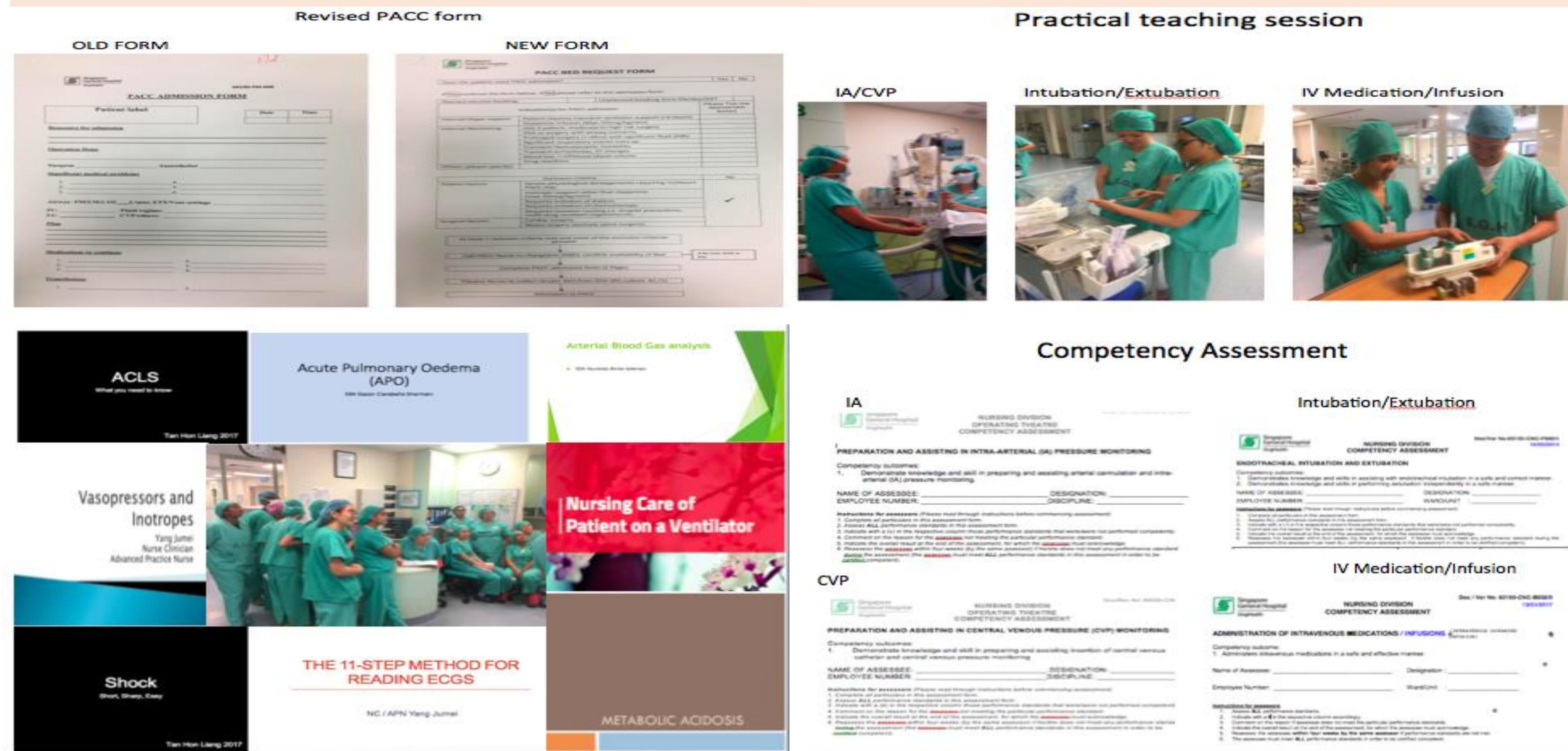
Given the heterogeneous patient population and varying complexity of surgeries, patients in the Post-Anesthesia Care Unit (PACU) undoubtedly require different degrees of monitoring and care. The PACU Critical Care (PACC) service was thus initiated within PACU to offer closer monitoring and treatment of selected moderate-to-high-risk post-operative patients with the view of the high-dependency (HD) or the intermediate care area (ICA) as the final disposition. This service is provided at the request of the principal anaesthetist and is co-managed by senior nurses who have received additional special training in critical care. Of note of data from Oct to Dec 2015, only 20-35% of patients who fulfil PACC criteria were recruited into this service.



In view of the upcoming Sengkang Hospital, some of the more experienced nurses had been relocated and thus manpower limitations may affect admission rates until more nurses receive special training in critical care. Moreover, the goal of increasing admissions needs to be balanced with concerns of over-utilization in view of limited resources and manpower.

INTERVENTIONS

In order to improve nurses competency and confidence towards nursing PACC patients, efforts had been made to increase their awareness. A total of twelve teaching sessions on both theory and practical with competency assessment were conducted. For doctors easy assess of patients' criteria, the PACC admission form was revised with the criteria attached to the first page.



OBJECTIVES

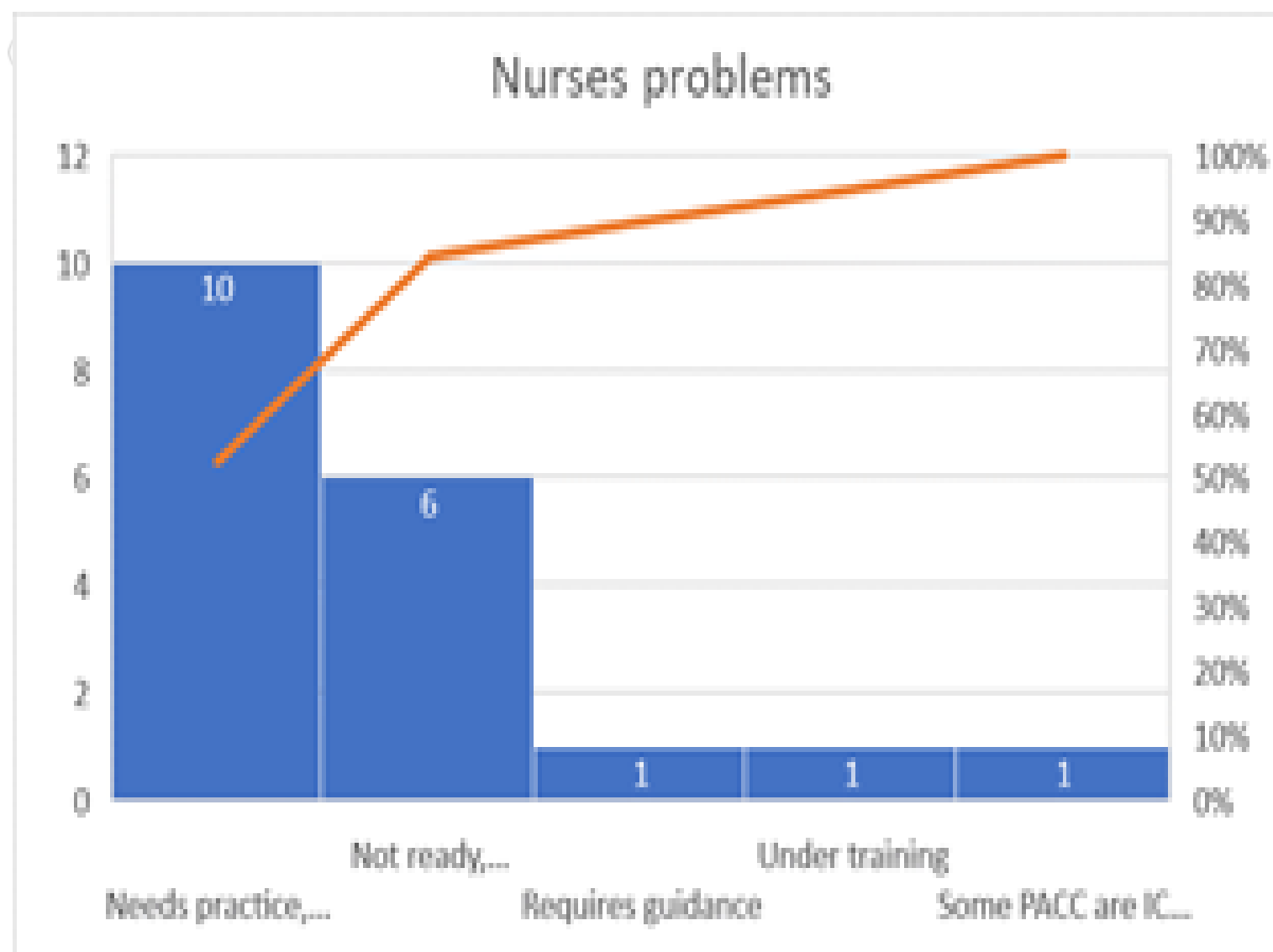
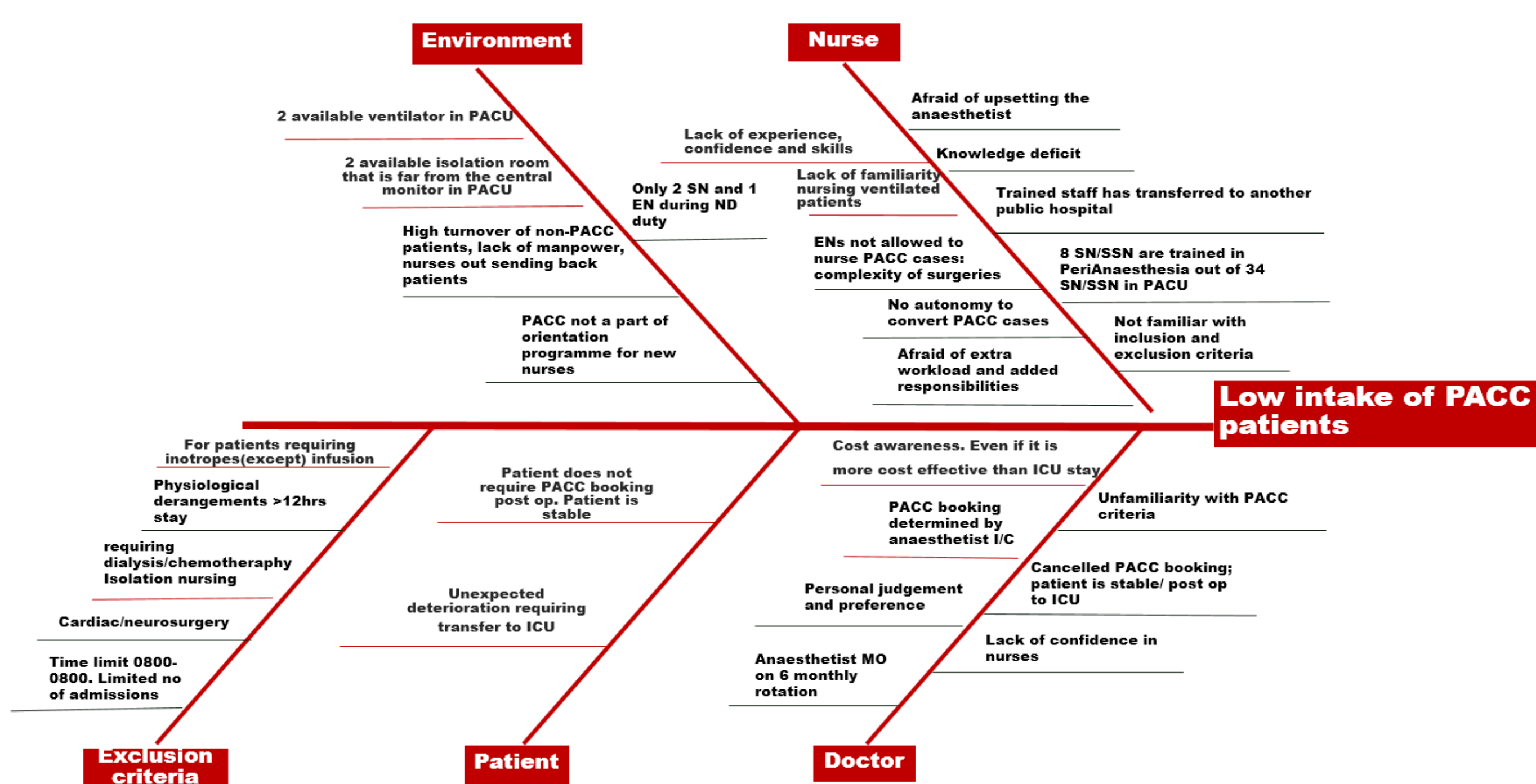
The two objectives are:

- To achieve 80% Post Anaesthesia Care Unit Registered Nurses competency rate to care for a PACC patient within 1 year.
- To maintain at least 1 patient per day admission rate to PACC care 6 months after the project

METHODS

Root Cause Analysis

Several factors contributing to low intake of PACC patients were identified. Further analysis of the environment, patients, doctors, and nurses issue are presented using the Ishikawa Diagram.



Pareto chart

To determine the nurse's perceptions in relation to PACC care, as well as baseline medical knowledge, a survey was handed out to all registered nurses in PACU. Opinions were varied, with majority of the nurses cited lack of confidence managing a PACC status patient.

RESULTS

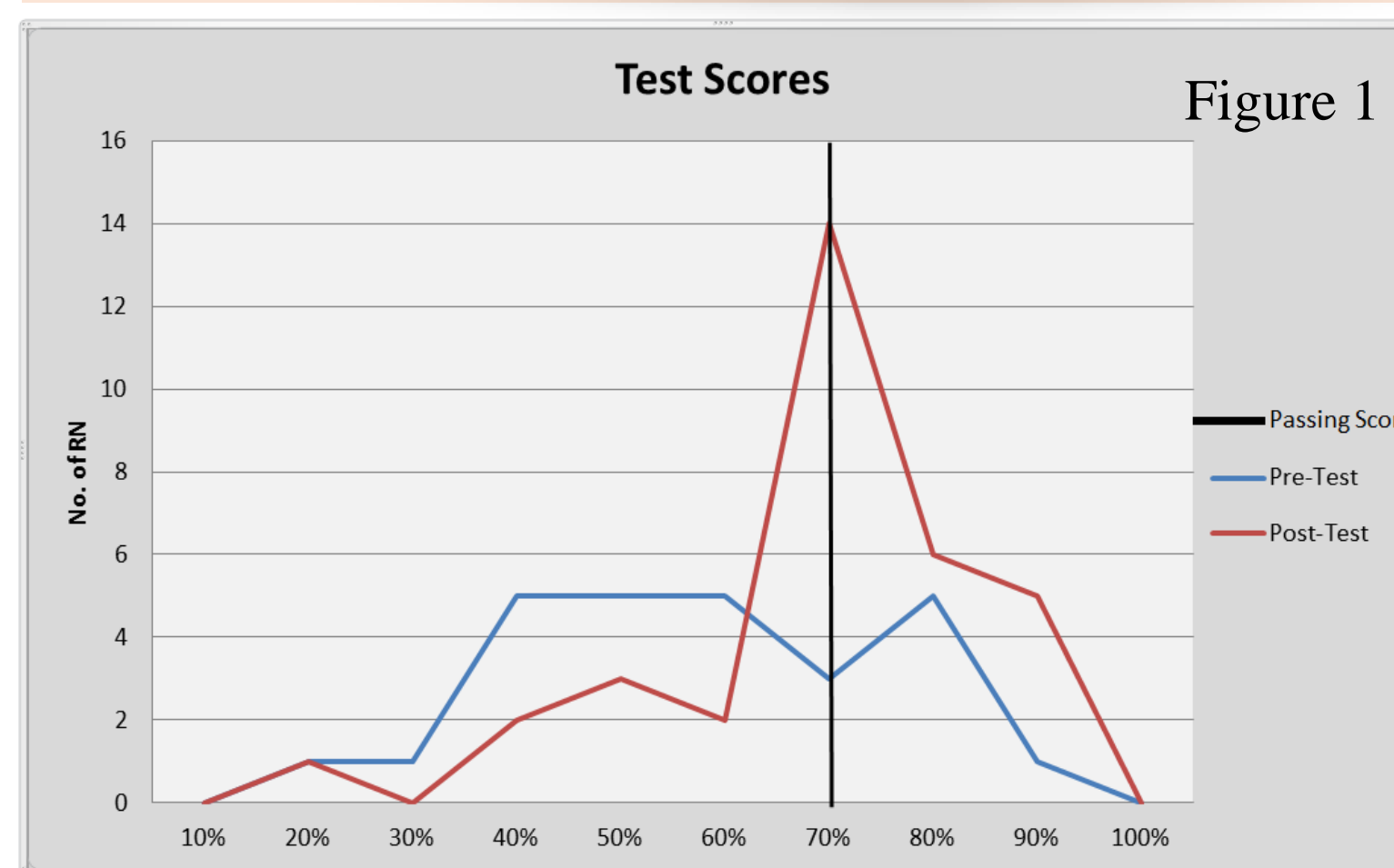


Figure 1

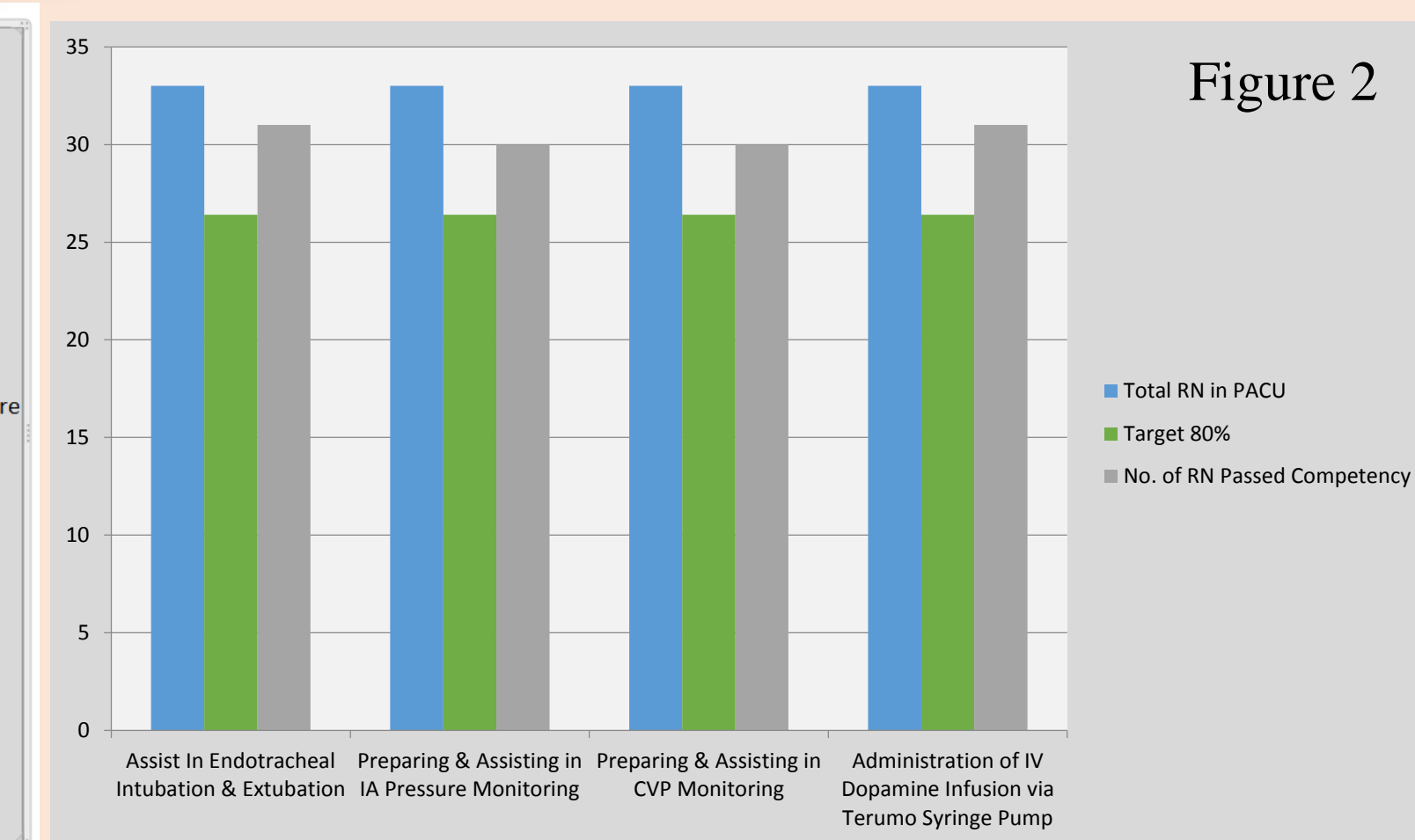


Figure 2

In figure 1, more Registered Nurses (RNs) were able to meet the 70% passing score after the lectures were given as compared to the pre-test. Figure 2 shows that more than 80% of RNs are competent with skills competency.

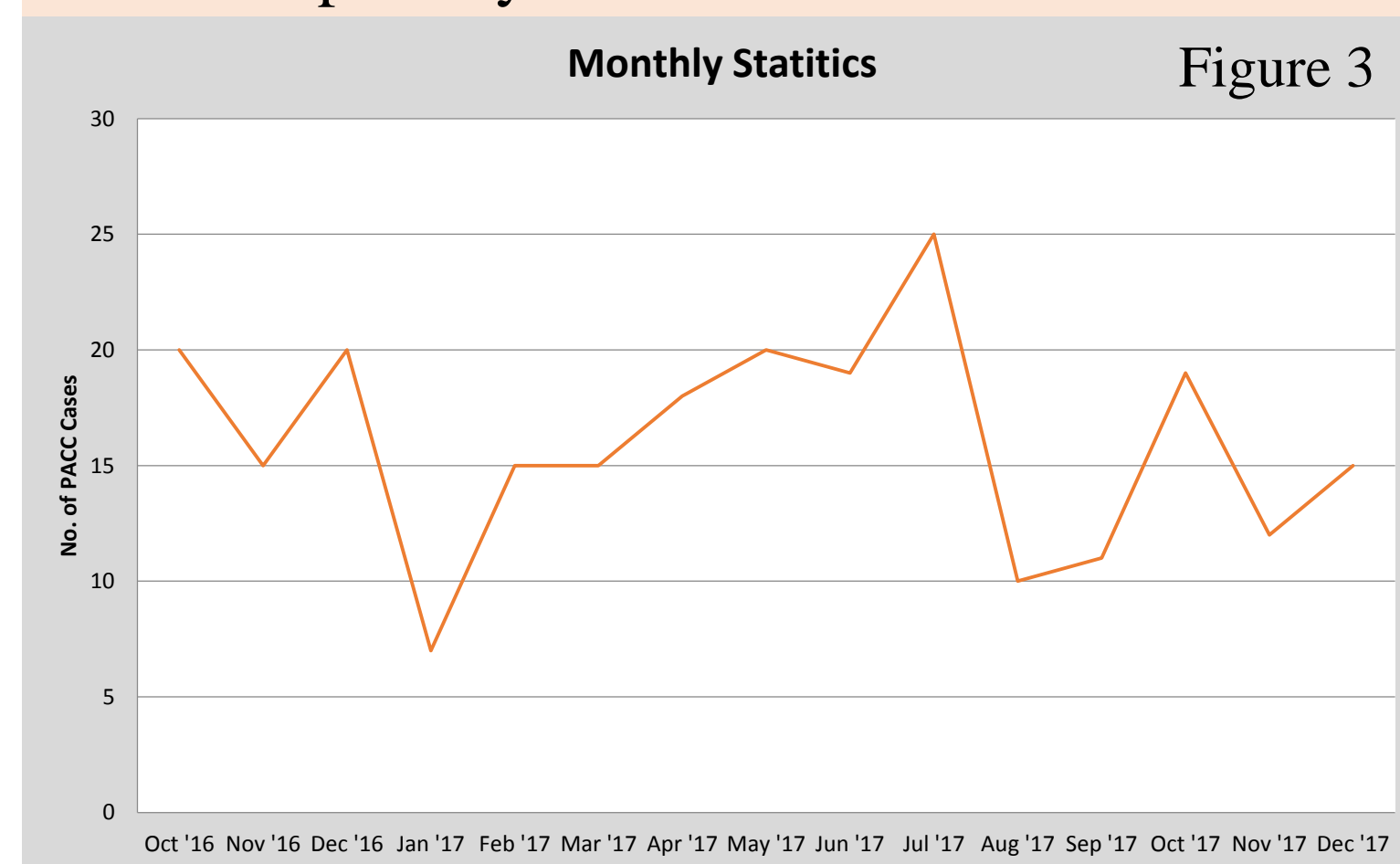


Figure 3

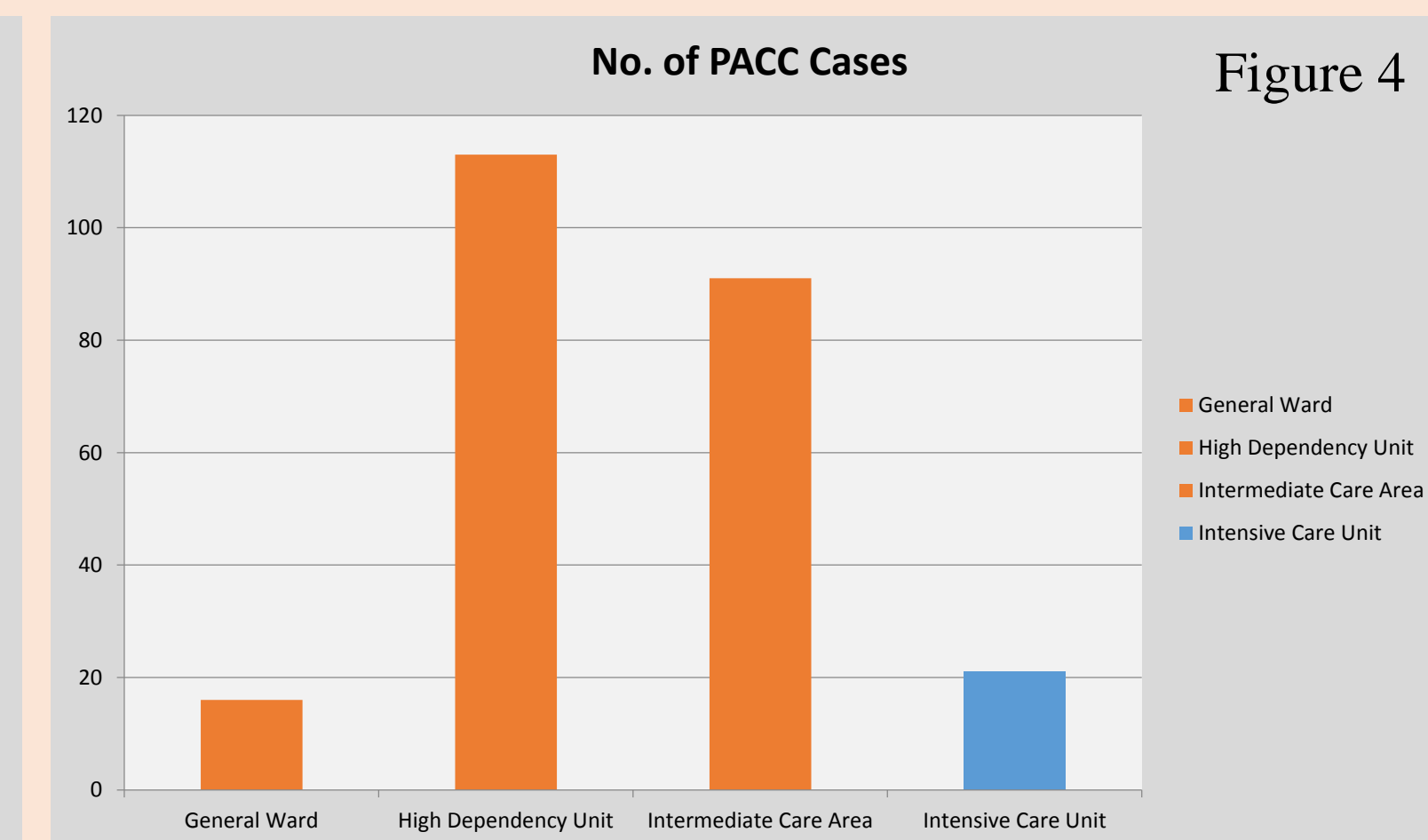


Figure 4

Figure 3 shows the PACC admission rate from Oct 2016 to Sept 2017. Figure 4 shows 220 PACC cases that were stepped down to General Ward, High Dependency and Intermediate Care Area versus 21 PACC Cases escalated to ICU status.

Cost of PACC per admission	Cost of ICU care (Average per day)	Differences in cost
\$480	\$1025.06	\$545.06

The table shows the difference between PACC cost and ICU cost which can significantly help cost saving of S\$545.06.

SUSTAINABILITY

To ensure sustainability of practices, the anaesthetists and senior staff nurses will continue to conduct teaching and practical guidance to the staff. Novice nurses with a minimum of 2 years experience are targeted to care for PACC patients after training.