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A loop closure Audit on Quality of Handover for Patient care to the Post-Anaesthetic Care Unit (PACU)

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Abstract

Aim

Effective handover of a patient's care in the recovery room is essential for the continuity, quality and safety of patient care. Each handover has the potential for poor communication that may jeopardize patient safety.

Methods

This audit was done in Post Anaesthesia Care Unit (PACU) of the main operation theatre complex of Letterkenny University Hospital. It was a Prospective Audit and was done over 4 weeks in April 2017. Data from 72 handovers was collected by PACU staff in the day time from 9am to 5pm excluding weekends. In the 2nd cycle of the audit, data from 52 handovers was collected by PACU staff over 4 weeks.

Results

In the 1st cycle of audit, quality of handover was poor. The information mostly lacking in handover in the 1st cycle of audit was ASA status: 71% Yes and 29% No; duration of anaesthesia 36% Yes and 64% No; allergy information 62.5% Yes and 37% No; past medical history 73.61% Yes and 26.39% No. In the 2nd cycle of audit after introduction of checklist of standard handover there was significant improvement in quality of handover. ASA status 80% Yes and 20% No; duration of anaesthesia 63% Yes and 37% No; allergy information 86% Yes and 14% No; past medical history 96% Yes and 4% No.

Discussion

There was a lack of information handed over to PACU staff. Most commonly missed information was ASA status, Duration of anaesthesia, Information about allergy. Patient's name and age. Overall 70% of information was provided and 30% was deficient. A loop closure re-audit was done

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after the introduction of checklist with standard handover was provided and there was significant improvement in quality of handover.

Introduction

Effective handover of a patient's care in the recovery room is essential for the continuity, quality and safety of patient care. Each handover has the potential for poor communication that may jeopardize patient safety. The Association of Anaesthetists of Great Britain and Ireland(AAGBI) guidelines state that 'the anaesthetist must formally hand over care of a patient to a recovery room nurse or other appropriately trained member of staff'.

Royal College of Anaesthesia (RCOA) UK proposed a standard or target for best practice is that 100% of handovers should include the patient's name and age, operation, ASA status, past medical history, allergy information, anaesthetic technique used including airway management, peri-operative course and any complications. The patient's medical notes should be available including medication, fluids and analgesia. Post-operative plan documented including any immediate concerns that need to be addressed, along with any plan for continuing invasive monitoring if required.

Methods

This prospective audit was performed in Post Anaesthesia Care Unit (PACU) of the main operation theatre complex Letterkenny University Hospital in a set of questionnaire was given to PACU staff and Quality of handover was documented. We selected 3 PACU staff who were trained about the Audit questionnaire. Data collected from March 10th to April 10th 2017. Data from 72 handovers was collected in the 1st round by Post Anaesthesia Care Unit(PACU) Staff in day time 9am to 5pm excluding weekends and public holidays.

In the 2nd round, after introduction of checklist of standard handover, data from 52 handovers was collected over 4 weeks by PACU staff in day time from 9am to 5pm over weekdays excluding weekends and public holidays.

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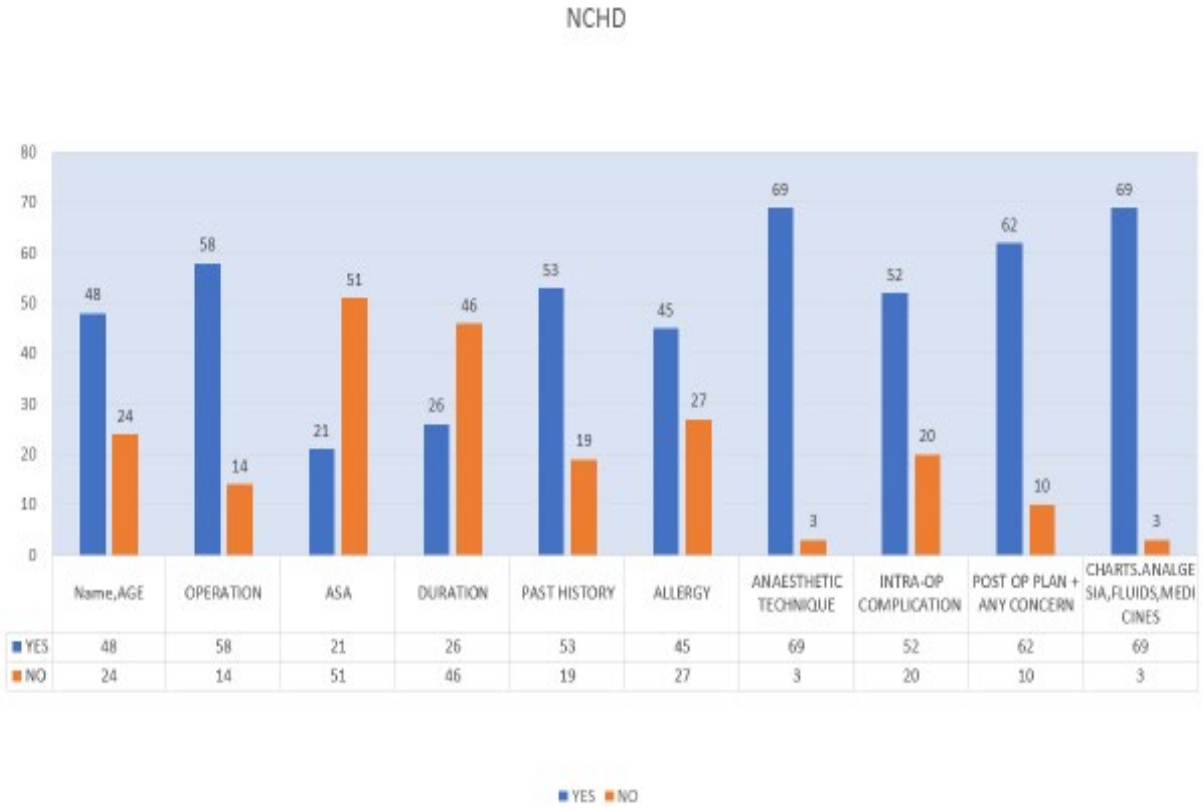
Result 1st round:



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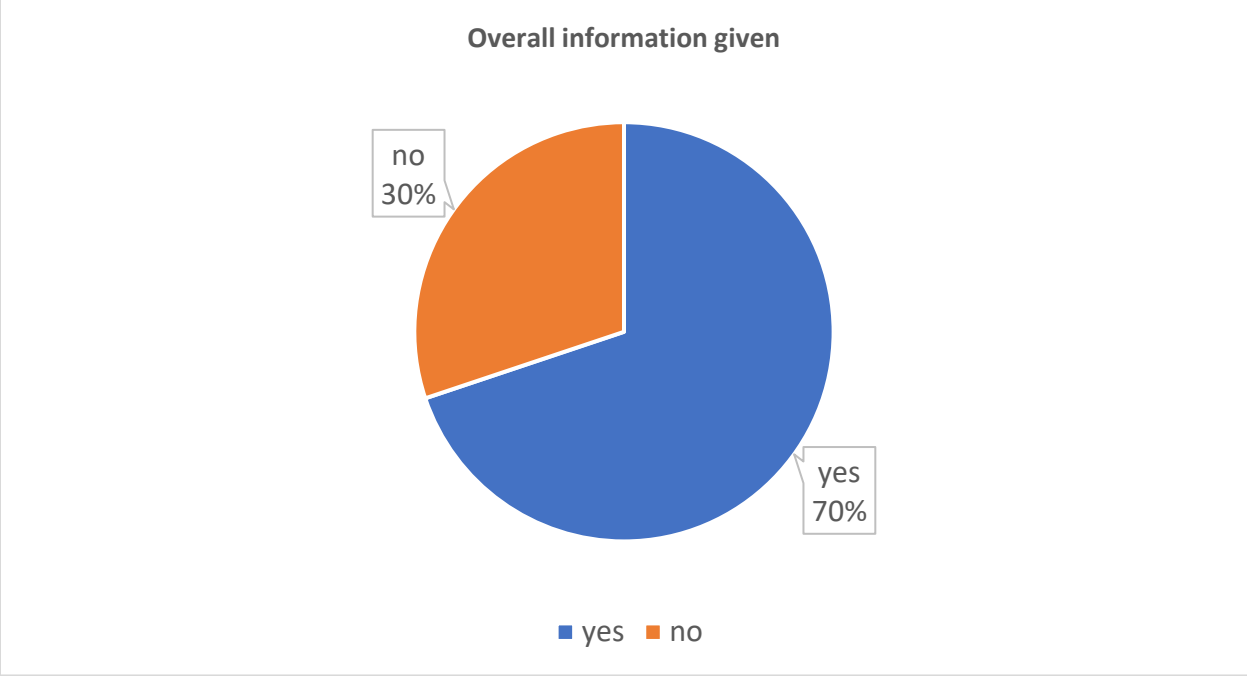

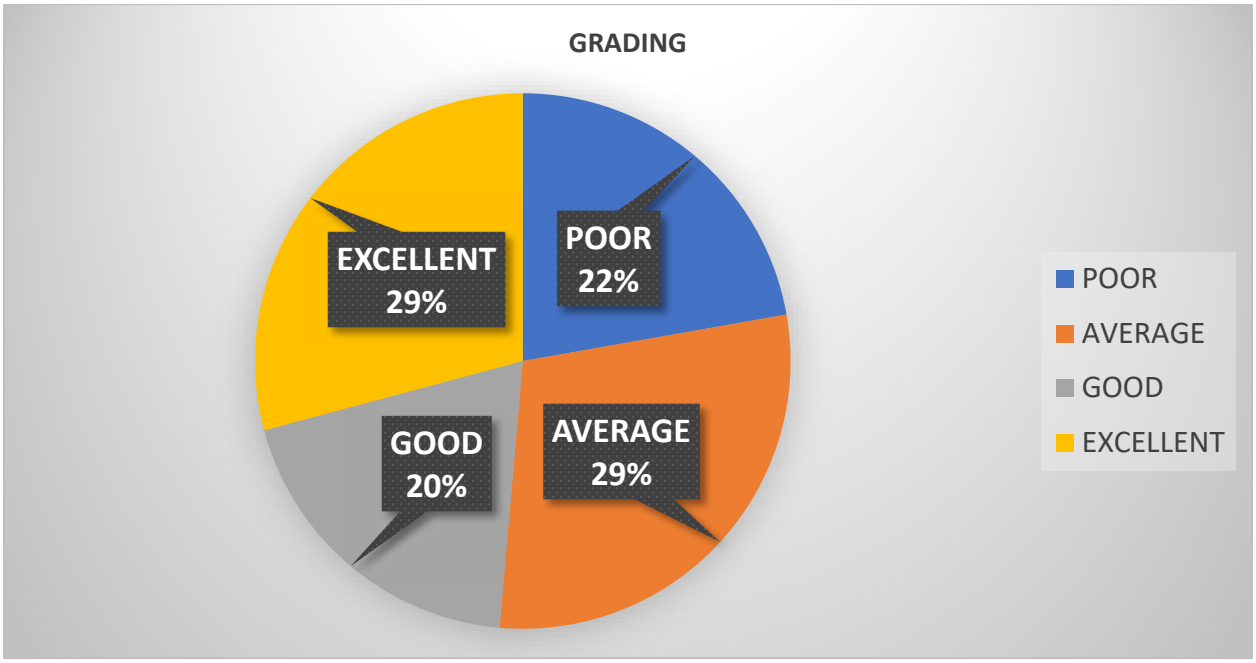

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There was a lack of information handed over to PACU staff. Most commonly missed information was ASA status, duration of anaesthesia, allergy information, patient's name and age. 70% of information was provided and 30% was not provided by NCHD during handover. Almost 22% handover given by NCHDs were of poor quality while 29% were average and 20% were good handovers. Royal College of Anaesthesia (RCOA) UK proposed a standard or target for best practice in handovers. The standard is that 100% of handovers should include: Patient's name and Age, Operation type, ASA status, Past medical History, Allergies, Anaesthetic technique used including airway management, Perioperative course and any complications, Charts available including medication, fluids and analgesia, Post-operative plan documented including any immediate concerns that need to be addressed. Most information handed over was about type of operation Anaesthetic technique Information about charts for medicines, fluids and analgesia.

These results were presented to the anaesthetic and recovery staff at an audit meeting. Following this, checklist of standard handover was posted in the operation theatres and in the recovery room. A re-audit was performed.

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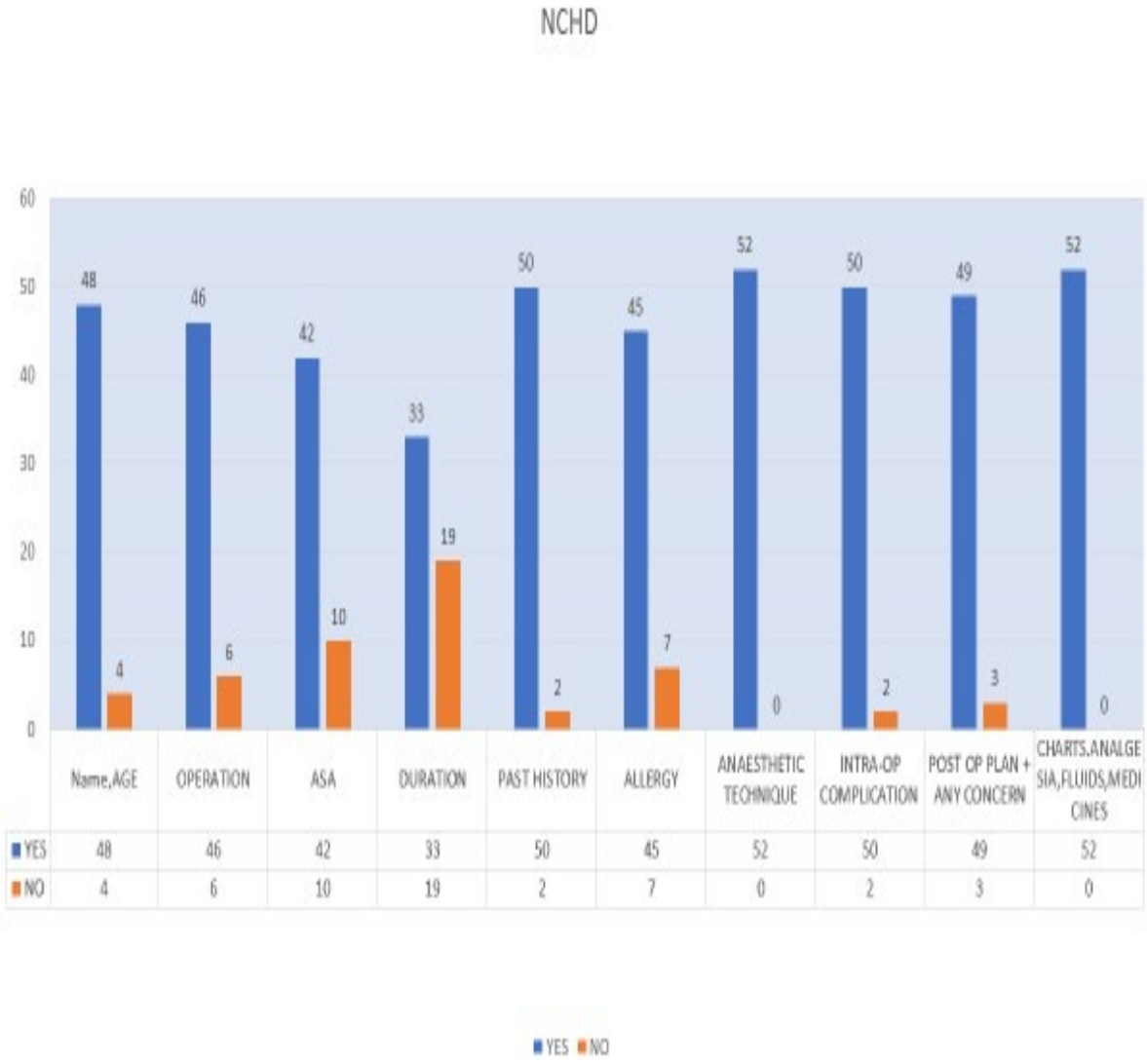
2nd Round Result:



In the 2nd round after introduction of checklist of standard handover there was significant improvement in the quality of handover of patient care. Proper Information regarding patient age and name, duration of anaesthesia, ASA status, Allergy detail, Anaesthetic technique and post op plan including post op charting was given.

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Discussion

The main goal of patient handover is accurate transfer of information about the patient's state to ensure the safety and continuity of patient care. Moreover, handover is also one of the most frequent and influential moments of the patient's passage through hospital as it plays a vital role in determining the management plan of the patient. Anaesthesia is considered as one of the leading specialties in healthcare in terms of securing patient safety. Postoperative patient handover from operation theatre to recovery room is one of the core aspects patient care provided by anaesthetists.

After the introduction of standard handover checklist posted in recovery, in 2nd round there was significant improvement in handover of patient care given to PACU staff. We suggest that regular training on postoperative patient handover needs to be provided for both graduate and qualified anaesthetists. Moreover, regular re-auditing is required until the anaesthetists meet the standards and to ensure patient safety in the course of postoperative patient care.

Declarations of Conflicts of interest:

None declared.

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References:

1. Safe handover. Safe patients. Guidance on clinical handover for clinicians and managers, Australian Medical Association. 2006.
2. Guidance on safe handover. Guidance from the working time directive working party. The Royal College of Surgeons of England. 2007.

3. Safe handover. Safe patients. Guidance on clinical handover for clinicians and managers, British Doctors Committee. 2004.
4. Clinical handover guideline. Sydney South West Area Health Service. 2007.
5. Handover/communication tool guidance for staff. Hampshire community health care. 2010.
6. National Clinical Handover Initiative. Nursing and medical handover in general surgery, emergency medicine and general medicine at the Royal Hobart Hospital. Overarching Standardised Operating Protocol. 2008.
7. Manser T, Foster S. Effective handover communication: An overview of research and improvement efforts. *Best Pract Res Clin Anaesthesiol*. 2011;25(2):181–191.
8. Kalkman JC. Handover in the perioperative care process. *Curr Opin Anesthesiol*. 2010;23(6):749–753.
9. The handover of responsibility during an Anaesthetic. The Hong Kong College of Anesthesiologists. 2002.
10. Guideline on the handover of responsibility during an Anaesthetic. Australian and New Zealand College of Anesthetists. 2004.
11. Catchpole RK, Deleval RM, Mcewan A, et al. Patient handover from surgery to intensive care: using formula 1 pit-stop and aviation models to improve safety and quality. *Paediatr Anaesth*. 2007;17(5):470–478.
12. Gaba DM. Anesthesiology as a model for patient safety in health care. *BMJ*. 2000;320(7237):788–791.
13. Rose M, D Newman S. Factors influencing patient safety during postoperative handover. *AANA Journal*. 2016;84(5):329–338.