

Postoperative Handover Protocol

Smita Oswal
Carolyn Ingham
Andy Sykes

Authorised: Dec 2018
Review Date: Dec 2021

Contents

1. SBAR Summary	3
2. Introduction	5
3. Handover procedure	5
4. Handover from anaesthetist	6
5. Handover from scrub practitioner	7
6. Discharge protocol	7
7. Handover to ward practitioner	8
8. Handover of paediatric patients	8
9. Handover of patients to HDU/ICU	9
10. Handover of patients having operation under local anaesthesia	9
11. References	10

Post-Operative Handover Protocol

SBAR Summary (Situation, Background, Assessment, Recommendations)

A) Patient handover from anaesthetists to recovery practitioner:

Situation	Patient name, age, Occupation (if relevant) Details of operation Theatre number Anaesthetic technique
Background	ASA grade Allergies Co-morbidities
Assessment	Intra-operative issues or concerns related to Surgery and anaesthesia Vital signs Analgesia Antiemetics Antibiotics IV fluids Postoperative plan - Analgesia, Antiemetics, Investigations, Any immediate concerns IV lines flushed & documented on anaesthetic chart (Hard copy) Documentation on EPR
Recommendations	Name and contact details for queries or problems ICU/HDU/ward/discharge home

B) Patient handover from scrub practitioner to recovery practitioner

Situation	Patient name, age Details of operation performed Theatre number
Background	Allergies Anaesthetic technique Diabetic

Assessment	Any complications encountered during the procedure. Details about removal of any items (e.g. NGT, packs, drains, catheter) left in situ Skin closure, type of dressing used. Any local anaesthetic given during or after the operation.
Recommendations	Any other specific post-operative instructions given by the surgeon.

C) Handover from recovery practitioner to ward practitioner:

Situation	Patient name, age Details of operation performed
Background	Allergies Anaesthetic technique
Assessment	Type of anaesthetic given - general, regional or a combination of both; local Patient's observations of vital signs, blood sugar level Any analgesia or antibiotics given perioperatively IV lines flushed and documented Details of prescription on EPR including Oxygen. If any drains in situ, type of drain, wound dressing used. If any problems have occurred during the post-operative phase
Recommendations	Any other specific post-operative instructions given by the surgeon

Post Operative Handover Protocol

Introduction:

Patient handovers, defined as “the transfer of information and professional responsibility and accountability between individuals and teams”. Effective handover plays a key part in ensuring the continuity, quality and safety of patient care [1]. Hence, standardisation of the handover process can improve patient care and staff should comply with the local standardised handover processes. Handover of patient care is a critical process.

A structured approach to communication between health care professionals contains **S**ituation; **B**ackground; **A**ssessment and **R**ecommendation (SBAR). SBAR is an evidence-based best practice communication technique. SBAR is easy to remember and encourages staff to think and prepare before communicating. These are the key building blocks for communicating critical information that requires attention and action – thus contributing to effective escalation and increased patient safety. It can make handovers quicker yet more effective, thereby releasing more time for clinical care. Handover should be structured to ensure continuity of care [2].

Handovers should be both verbal and written and should be documented. On rare occasions, the immediate urgency of a procedure may mean that there is only time for a verbal handover. Under these circumstances, documentation can be retrospective.

Handover failures are common and can lead to diagnostic and therapeutic delays and precipitate adverse events.

In order to ensure the safe care of patients in the Post Anaesthesia Care Unit (PACU), recovery staff should have competencies in monitoring, measurement, interpretation and prompt response to the acutely ill patient, appropriate to the level of care they are providing. To this end education and training should be provided to ensure staffs achieve these competencies [3].

Handover procedure:

Before the transfer to PACU, the patient should be physiologically stable on departure from the operating theatre and the anaesthetist must decide on the need for standard monitoring and oxygen during transfer. A qualified theatre practitioner will accompany the patient and anaesthetist into PACU, ensuring that the patient remains covered to protect their dignity at all times during the transfer. Guidance released in 2002 by the Association of Anaesthetists of Great Britain and Ireland (AAGBI) states that anaesthetists must formally handover the care of the patient to a trained member of staff from recovery [4].

Care in PACU:

On arrival in PACU, the recovery practitioner will provide holistic and individualised care for the patient and be responsible for the comprehensive and effective handover of the care to the ward practitioner.

Handover of a patient who had general anaesthesia and/or regional anaesthesia consists of 3 parts after transferring to PACU:

- A) Handover from anaesthetist to recovery practitioner
- B) Handover from scrub practitioner to recovery practitioner
- C) Handover from recovery practitioner to ward practitioner

A) Handover from anaesthetist to recovery practitioner:

On arrival of patient in PACU, depending on the oxygen requirement, supplemental oxygen is provided either through the existing airway or facemask/nasal cannula. Simultaneously monitoring of the vital signs of the patient is started. The commonly monitored vital signs are oxygen saturation, respiratory rate, heart rate, blood pressure, an electrocardiograph temperature and level of consciousness. Capnography if the patient has a tracheal tube, supraglottic airway device in situ, is deeply sedated. It should be continued until the patient is alert, responding to commands and speaking [5]. Nerve stimulator and glucometer should also be readily available.

Patients frequently exhibit abnormal vital signs during recovery from general anaesthesia and in only a minority of cases this requires intervention. The incidence of abnormal vital signs in the first 24 hours following return to the ward from the recovery unit was 3% [6]. Observation of wound, drains, any bleeding or any abnormal observations should be noted and immediately reported to the relevant person who could be a surgeon or an anaesthetist.

Emergence from anaesthesia is potentially hazardous, with patients requiring close observation until recovery is complete. The responsibility of anaesthetists for the care of their patients extends into the postoperative period until their discharge from recovery or handover of care to another clinician such as an intensivist. Until the patient is able to maintain their own airway, has regained respiratory and cardiovascular stability and is able to communicate, continuous individual observation and care of each patient should be performed on a one-to-one basis. All post-anaesthesia care units should be staffed to a level that allows this to be routine practice. A minimum of two members of staff should be present (of whom at least one should be a registered practitioner) when there is a patient in the post-anaesthesia care unit who does not fulfil the criteria for discharge to the ward. If this level of staffing cannot be assured, an anaesthetist should stay with the patient until satisfied that the patient fulfils discharge criteria [7].

According to the “Raising the Standards” by The Royal College of Anaesthetists (RCoA), 100% of handovers should include; patient name, operation, operating theatre, relevant past medical history, allergies, anaesthetic technique, analgesia, antiemetics, any specific instructions for postoperative period and plans for invasive monitoring [8].

Following the recent NPSA alert, incidents have been reported of cardiac arrest, respiratory arrest following residual drugs left in the IV cannula & extension lines,

it is the responsibility of the anaesthetist to make sure all the IV lines are flushed with normal saline before leaving the operating theatre, documented on the anaesthetic chart, prescribed saline flush on the drug chart as well as handed over to PACU practitioner [9,10]. The NPSA states: 'Good practice suggests that after intravenous administration, the anaesthetist should ensure that the cannulae have been flushed through to remove any residual anaesthetic drug before children are returned to recovery wards or wards where they may be given further fluids, antibiotics or pain relief intravenously' [11].

B) Patient handover from scrub practitioner to recovery practitioner

The anaesthetic handover will be followed by the scrub practitioner to PACU staff. It should include patient's name, allergy status, details of operation performed, any complications encountered during the procedure, any items (e.g. packs, drains, packs, catheter) left in situ that will require removal at a later date, skin closure used, type of dressing used, any local anaesthetic given during or after the operation, any other specific post-operative instructions given by the surgeon.

All other relevant patient care should also be handed over, such as pressure area problems or any skin conditions. This will then enable the PACU practitioner to document any further concerns which then can be handed over to the ward staff.

Discharge protocol:

Discharge from recovery should occur in a timely fashion and to an appropriate destination in order to maintain patient safety and comfort whilst maximising efficient use of services. Discharge protocols are used to assess the fitness of patients to return to the ward or other clinical areas. Factors which may affect discharge of patients are age, ASA status, operating procedure, type of anaesthetic including regional blocks, pain and nausea scores on arrival, grade of anaesthetist, recovery practitioner or person taking responsibility for discharge.

Discharging patients from PACU is dependent on many factors and varies with each individual:

1. Are the patient's observations of vital parameters (National Early Warning Score (NEWS) within acceptable limits? If not, does it need any intervention or review by anaesthetist or surgeon?
2. Following additional observations are necessary for specific procedures in ENT theatres which will be discussed by scrub practitioner at the time of handover, (e.g. Facial nerve, orbital observation).
3. Is the patient comfortable? Any prescribed analgesia, antiemetics given as necessary, and documented on the patient's care plan, anaesthetic or prescription chart.
4. The wound site is not bleeding excessively.
5. The drains have no excessive drainage.
6. Patients who receive post-operative analgesia eg Morphine, will remain in recovery for a minimum of 20 minutes after the final dose due to side effects of morphine.
7. After giving the IV drugs – eg. analgesics, antiemetics, the IV lines are flushed with normal saline and documented in the patient's care plan on EPR.

The importance of post-anaesthesia recovery facilities in ensuring patient safety has been stressed by the Royal College of Anaesthetists (RCoA), the Association of Anaesthetists (AAGBI), and in National Confidential Enquiry into Perioperative Deaths (NCEPOD). The RCoA and AAGBI advice that agreed criteria for discharge of patients from the recovery room to the ward should be in place. Regular revision and audit of standards of care, guidelines and protocols are essential in the development and improvement of post-anaesthetic patient care.

Return to the ward is based on all observations within normal parameters for that patient. Once the decision has been made, between the anaesthetist and the recovery staff, that the patient is well enough to return to the ward, they will handover the care of the patient to the ward practitioner.

C) Handover from recovery practitioner to ward practitioner

A ward practitioner will be called to collect their patient from the recovery room. Consideration needs to be given to other patients being cared for in the recovery room and accordingly, the ward practitioner should ascertain that it is appropriate to enter recovery with the parent or carer. The handover takes place with the recovery practitioner who has been caring for the patient post-operatively, at the patient's bedside. An anaesthetic record and record on EPR should be used in the handover process to assist in the effective handover. If any problems have occurred during the post-operative phase these will be discussed with the ward practitioner.

The recovery practitioner will then proceed to verbally handover the care of the patient to ward practitioner with name of the patient, allergy status, type of operation performed, type of anaesthetic given - general, regional or a combination of both or local, any analgesia or antibiotics given intra-operatively should be recorded and discussed. Any prescribed oxygen in PACU & ward should be commenced. Where infusion pumps are prescribed and in use, they are clearly labelled, visually and verbally checked against the prescription on EPR with the receiving practitioner. Any analgesia given in the recovery room should be clearly recorded on peri-operative care plan on EPR as well as on anaesthetic chart if appropriate. IV lines should be flushed before discharge from the recovery room and documented. Patient Controlled Analgesia (PCA) and epidural analgesia information, including time commenced and amount delivered, should also be recorded.

All observations including NEWS score should be recorded on the patients care plan when leaving recovery. This gives the ward practitioner a physiological assessment baseline for the continuation of post-operative observations on the ward. Where any physiological measurements are outside the normal parameters, these will be highlighted to the ward practitioner verbally, stating medical team's awareness and attention should be drawn to continued management plans.

Other specific post-operative instructions should be given and explained e.g. if any drains in situ, type of drain, wound dressing used, postsurgical plan of care, post-operative observations of limbs, for example, limb elevation.

Handover of paediatric patients:

Recovery of paediatric patients is very challenging. As the physiological parameters change with age, Paediatric Advanced Warning Scores (PAWS) variation from term to children above 12 years. In addition to the vital signs monitored in adults, Capillary Refill Time (CRT) and AVPU (Alert, Voice, Pain, Unresponsive) are also measured.

Thus, when a child enters the recovery room from operating theatre unconscious, which is a transient state, they will score minimum PAWS of 10 because of their unresponsive state. A score of 10, as per algorithm, will require escalation immediately. Recovery practitioners need to utilise their professional judgement about all observations taken on a child at this point in the recovery room as to whether escalation is required or not. An anaesthetist must stay with the patient till airway is safe & secured, Vital signs checked and PACU staff happy to continue care of the patient. Normally, as a child wakes up their score will immediately improve. It is important to note that the PAWS taken on discharge back to the ward will determine their subsequent post-operative care.

The National Reporting and Learning System (NRLS) continue to receive reports of severe harm due to anaesthetic drugs remaining in IV lines, particularly in children.

If a child on waking from their anaesthesia is very active and, therefore, undertaking all the required physiological observations is difficult, it is recommended that these observations are undertaken and PAWS calculated, once the paediatric ward practitioner has arrived in the recovery room.

If the situation is such that even with the ward practitioner present, a score is unable to be taken. In the absence of all physiological readings, the recovery practitioner and ward practitioner will make a joint clinical decision that the child is safe to be discharged to the ward and will document their decision in the perioperative care plan. When a child is to be returned to the ward, the parent or carer will accompany the ward practitioner to collect their child.

Handover of patients to HDU/ ICU practitioners:

Recovery practitioners will follow the same handover protocol used for all other patients. Stable patients, not on any ventilatory support can be transferred to ICU /HDU by the recovery practitioner. The anaesthetist will usually escort the patient with ventilatory support along with the recovery practitioner to ICU. The anaesthetist will handover to the ICU anaesthetist and the recovery practitioner will handover to the ICU practitioner allocated to that patient.

In case of lack of ICU bed, patient requiring ventilatory support till ICU bed is made available, the recovery practitioner will commence writing down of vital parameters & other observations on EPR. Where infusion pumps are prescribed and in use, they are clearly labelled, visually and verbally checked against the prescriptions on EPR. Please follow the local protocols.

Handover of patients having operation under local anaesthesia:

Patients undergoing local anaesthesia will usually have one full set of observations taken in recovery. Providing they are all right, the patient will then return to the ward.

Health Care Assistants (HCAs) who have been trained as escort practitioners are allowed to return minor cases back to the ward.

HCAs who are trained on the 'escort after intervention course' and then assessed as being competent in the role, can transfer patients who have had GA.

Restrictions apply on type of transfer- for example, the escort course recommends that HCAs don't transfer any patient with a syringe driver in situ, but the situation is complicated by different wards having slightly different criterias on who their escort HCAs can transfer. The suitability of the escort person will be determined by the recovery practitioner before discharging the patient from recovery.

Once the handover has been completed and both the recovery practitioner and ward practitioner are confident that the patient is in a sufficiently stable condition to return to the ward environment, a porter is called who will take the patient back to the ward. If oxygen therapy is prescribed for the patient during transfer to the ward & in the ward, then oxygen therapy is given with a portable oxygen cylinder to provide continuous treatment throughout the transfer to the ward.

References:

1. Interprofessional handover and patient safety in anaesthesia: observational study of handovers in the recovery room.
Smith AF, Pope C, Goodwin D, Mort M.
[Br J Anaesth. 2008 Sep; 101\(3\):332-7](#)
2. <https://www.england.nhs.uk/improvement-hub/wp-content/uploads/sites/44/2017/11/SBAR-Implementation-and-Training-Guide.pdf>
3. <https://www.england.nhs.uk/wp-content/uploads/2015/09/natssips-safety-standards.pdf>
4. Immediate post anaesthetic recovery. AAGBI, London 2002
<http://www.aagbi.org/sites/default/files/postanaes02.pdf>
5. www.aagbi.org/sites/default/files/Standards_of_monitoring_2015pdf
6. A comparison of an evidence-based regime with the standard protocol for monitoring postoperative observation: a randomised controlled trial.
Fernandez R, Griffiths R.
[Aust J Adv Nurs. 2005 Sep-Nov; 23\(1\):15-21.](#)
7. www.rcoa.ac.uk/system/files/GPAS-2018-04-POSTOP.pdf
8. http://www.rcoa.ac.uk/system/files/CSQ-ARB-2012_1.pdf
9. https://improvement.nhs.uk/documents/1922/Patient_Safety_Alert_-_Confirming_removal_or_flushing_of_lines_and_cannulae_of_EVC1Yb2.pdf
10. National Patient Safety Agency Alert – Stage One: Warning Residual anaesthetic drugs in cannulae and intravenous lines - NHS/PSA/W/2014/008
<http://www.apagbi.org.uk/sites/default/files/images/psa-residual-anaesthetic-drugs.pdf>
11. <http://www.aagbi.org/sites/default/files/images/PATIENT%20SAFETY%20UPDATE%20-%20Mar%202012.pdf>