Shift Handover Practices Among Nurses in Medical Wards: A Qualitative Interview Study

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ABSTRACT

Aim: To examine the shift handover practices in various medical wards in Brunei. Objectives were to examine shift handover practices between the nurses and between shifts, to identify supports to enhance handover effectiveness and to identify barriers of effective handover. **Background**: Handover practices is a routine activity, and ineffective handover practise constitutes a risk to patient safety. Evidence suggests that handover effectiveness is influenced by factors such as through standardised handover practice. **Design**: A descriptive qualitative study using content analysis. **Methods**: The study involved a series of individual interviews among a sample of nurses recruited from 6 medical wards in the largest hospital in Brunei. A total of 13 nurses took part in the interview. Data were analysed with qualitative content analysis method. **Results**: The analysis revealed three broad themes, namely "multiple handover style", "use of handover tool" and "handover distractions". The first theme indicates that there are several handover styles used in the medical wards, which may be related to the cultural and organisational factors. The second theme illustrates the use of a tool in handover practices, and the final themes describe perceived shift handover distractions which could potentially influence the effectiveness of the handover practices. **Conclusion**: The evidence in the current study suggests that several aspects of the multiple shift handover practices of nurses are not always consistent with best-practice evidence. The results show that nurses need to communicate accurate and concise information, which can be easily understood by both the giver and the recipient to ensure the quality and safety of patient care.

Keywords: Handover, Nurses, Medical wards, Shift, Report, Qualitative

INTRODUCTION

Nursing shift handover is one of the essential parts of everyday nursing activity (1), which requires effective communication to support the provision of safe patient care (2). It is a form of communication which allows nurses to plan and prioritise patient care, as well as to manage their workload (3). It encompasses the transfer of essential information relating to patient care among nurses during a shift changeover. Accurate information during the handover process is crucial for the continuity and safety of patient care (4). This accuracy is vital, as the link between poor communication and sentinel events during handover has caused alarm (5).

There always have variations in the handover practices applied globally. Handovers are performed in various ways in daily practice; some handovers are performed by nurses talking to each other (verbal transfer) (4). Others are done by reading patient medical notes made by other nurses. Handovers can also be performed through a combination of reading and communicating with each other. In some cases, the nursing handover was done at the patient's bedside, so that if desired, the patient could contribute (6).

Inefficient communication during the handover process was associated with irrelevant or repetitive information, the omission of critical information or information that may be misunderstood (7). These communication gaps may result in nurses spending extensive periods attempting to retrieve relevant and accurate information. Corresponding delays in the continuity of patient care result in compromised patient safety (8). It is recommended that nurses allocate 38 per cent of their daily working hours to a hospital ward to carry out the transfer process (9). However, nurses often worked to complete the handover after their shift-end (10).

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There have also been some situations in which communication failures during clinical handover resulted in reduced patient outcomes (11), unnecessary diagnostic delays, patients not receiving the necessary treatment, and medication errors (12), and this has been observed during clinical placement. Factors known to reduce the efficacy of nursing handover include telephone calls, interruptions and distractions, extraneous chit -chatting, and noise (13). Numerous intervention studies support the use of mnemonic methods to enhance the quality of handover and transfer of information, including the ISBAR tool, which has been shown to strengthen content as well as to promote effective communication (14,15).

Several studies have a look into the handover processes in emergency settings (16). In order to develop a better understanding of handover processes in medical wards and provide insights that will inform effective strategies to enhance patient care and safety, we undertook a qualitative study using semi-structured interviews. The broader goal was to explore handovers practices among nurses in various medical wards at RIPAS Hospital, which is the main hospital in Brunei. This objectives of the study were: to examine shift handover practices between the nurses and between shifts; to identify supports to enhance handover effectiveness and; to identify barriers of effective handover.

METHODS

Design

A qualitative approach with a descriptive design was chosen for the study to gain a deeper understanding of the nurses' experiences (17). Data were collected through individual semi-structured interviews and analysed by employing descriptive qualitative content analysis, inspired by Graneheim and Lundman (18).

Sample and recruitment

The study participants were recruited using a purposive sampling strategy, and the inclusion criterion was that the participants had to have had at least one year's work experience as a nurse in the medical ward to increase the probability of them having experienced shift handover. The participants were recruited from six medical wards in the largest hospital of Brunei. A series of recruitment briefings were held whereby a written participant recruitment sheet with information about the study was given to 35 nurses in total and, of these, 13 has agreed to participate. Nurses were also informed that the interviews would be audio-recorded. The participants were aged 25 – 46 years and included five-man and eight women, as well as they, had worked as nurses for between 1-23 years.

Data collection

Semi-structured individual interviews (19) were used to enable the participants to disclose shift handover practices from their everyday work as nurses. An interview-guide with semi-structured and open-ended questions were developed and discussed by all authors, based on previous research. The interviews started with the question: Tell me the practice of shift handover in your medical ward? Follow-up questions were asked about how they ensure effective handover and what the perceived barriers to effective handover are. Depending on the interview, further follow-up questions were used for clarification when needed, such as "Can you tell me more about that?" and "Can you give an example of a good handover?" The interviews were mostly conducted during January 2019 and the participants chose the date and place for the interviews, which were carried out at the participants' workplaces, lasted between 27-53 minutes and were audio-recorded and transcribed verbatim.

Data analysis

The data were analysed in a process inspired by the guidance of Graneheim et al. (19) and Graneheim and Lundman's (18) descriptions of qualitative content analysis. All the authors read the interviews several times to ensure that they had a clear grasp of their overall content. Then, meaning units, words or statements, which described nurses' experiences of how they practice shift handovers, were identified and abstracted by converting the nurses' expressions into total units. These total units were compared, and those with similar meanings or which dealt with the same topics were grouped. Groups with similar meanings were then gathered to form categories, which were named with content-characteristic words, as described by Graneheim and Lundman (18).

All of the authors participated in the analysis process there was a constant movement back and forth between the whole data material and the analysis pieces during the process and the total units, and the groups, as well as the final three themes, were discussed repeatedly amongst the research group to achieve consensus.

In the results section, these themes, which describe the core meaning of nurses' experiences of handover practices are presented first, followed by the categories describing further aspects and nuances in detail; these are illustrated with quotes from the interviews.

Rigour

The four aspects of trustworthiness in qualitative research, credibility, dependability, conformability and transferability (20) have been recognised and applied in this study. The nurses were guided through the interviews with semi-structured open-ended questions that allowed them the freedom to speak as much as they wanted regarding their experiences. The interviews strived for promoting dialogue and asked for clarification of the narratives to achieve credibility. Furthermore, the analysis process was conducted in a reflective dialogue between the researchers. To accomplish dependability, all of the researchers conducted the data analysis, that is, the recordings were transcribed verbatim, and quotes from the participants are presented in the findings for the conformability. The findings might be transferred to inform other nurses' understandings of multiple handover styles and perceived distractions in medical ward settings (20). However, the individual reader has to assess the suitability of transferring the results.

Ethical considerations

The Joint Ethics Committee approved the research at the Institute Health Sciences Research Ethics Committee (IHSREC) of the Universiti Brunei Darussalam and the Brunei Ministry of Health's Medical Education Research Ethics Committee (MHREC) with the reference number UBD/ PAPRSBIHSREC/2018/102. The four ethical principles of respect for autonomy, beneficence, non-maleficence and justice were considered. The heads of the hospital and medical wards gave their approval for the study. All participants were given both verbal and written information about the aim of the study, including its design, that their participation was voluntary, that they had the opportunity to withdraw their participation at any time and the confidential treatment of data. Written informed consent was obtained from all participants.

RESULT

Content analysis of the interviews resulted in three broad themes. Analysis of existing nursing handover procedures in the medical ward resulted in three significant themes being identified: multiple handover styles; use of handover tool; handover distractions. The themes are described in detail below. Quotes are used to exemplify the findings.

Multiple shift handover styles

This theme described the current practices of nursing shift handover amongst nurses in the medical ward, which were applied by the bay nurse in charge and the overall nurse in charge. A bay nurse in charge is a nurse who is responsible for the handover report for one bay, which consists of only six to nine patients throughout the shift. The nurse who is overall in charge is usually assigned as a shift leader, who is responsible for the handover report for all patients. Formal nursing handover usually happens three times a day, during a transition (morning to the afternoon shift, afternoon to a night shift, and night to morning shift). Shift handover practices differ from ward to ward, due to the preference for specific modes of handover and methods of knowledge transmission and receipt.

Nurses explained that the principal reason for a shift handover by the bay in-charge is to reduce the possibility of error. Errors may occur when only one overall in-charge nurse is responsible for receiving all patient report, and the nurse could potentially fail to handover vital information to the nurses on the next shift. This could impact the provision of safe care. One nurse said:

> *I find the handover style by the bay in-charge is more practical since I can manage in giving reports of a small group of patients. It is a burden if only one nurse to provide reports for all patients in the ward (Nurse 8).*

The nurses agreed that the bay nurse in charge helped to mitigate the workload they had been assigned, so they could concentrate more on the six to eight patients in each bay while ensuring patient safety.

> *If we divide and delegate the tasks, more coordination is needed, and we will know the patient well (Nurse 1).*

Nearly half of the nurses who practised the shift handover by overall in-charge during the night shift, however, claimed they were already adjusted to that style. According to them, typically, only two or three nurses are working on the night shift, and this lack of workers often affects handover style preferences. Because

patients mostly sleep at night, there is less disruption, and the overall in-charge focuses on reviewing the report, thus eliminating missing information. However, a few of the nurses reported that the ward manager does not entirely choose the handover style. Instead, handover activities are greatly influenced by the ward layout.

Those involved in transferring and receiving handover information are classified into two groups: off-going and on-coming nurses. During the handover process, off-going nurses involved in this study used official documents in the BruHIMS (Electronic Patient Record System) as guides to reading outpatient reports. In contrast, on-coming nurses were more concerned with taking notes on paper to use for reference, so that the information could be portable. Most of the nurses mentioned the off-going nurses should wait for the nurses to arrive. They felt responsible for transmitting the information face-to-face, mainly to mitigate there is any doubt or confusion about the patient's details.

> *Nurses should listen to verbal communication during handover. We must understand. We can then ask a question at the same time if we are not sure, especially when we received a new patient (Nurse 2).*

Use of handover tool

The results of the interviews showed that nearly half of the nurses regarded shift handover as structured daily contact between colleagues. It was identified as a means to update the oncoming team on the events of the previous shift and to forecast events for the next shift.

The majority of nurses agreed that the introduction of a handover tool called ISBAR tool in the medical ward. The ISBAR tool is a communication tool which refers to Introduction, Situation, Background, Assessment, Recommendation, and the nurses described that it had a positive effect and helped them coordinate the exchange of information during the shift handover period. The tool was considered to be critical where vital information, including background details, current patient status and care plan, were gathered and planned to be provided during nursing handover. Contextual information provided the demographic details on the name of the patient, bed or room number, diagnosis of the patient and the primary team member.

> *If we use ISBAR, it helps to organise the list of patients, and when we move the list, we can only read the ISBAR organise and observe it (Nurse 2).*

Nurses found that standardised methods for handing over were more successful when nurses communicated accurate and descriptive information that both the giver and the recipient could easily understand. In other circumstances, quality patient care would be difficult to obtain without a formal and systematic tool. However, the use of the tool during a proper nursing handover ensured the patient's health was assured.

> *With the proper endorsement of the information given by the correct patient, correct diagnostic findings within the report may affect patient care, particularly us [nurses] where we are the first line of patient handling (Nurse 13).*

Meanwhile, it was learned from the interviews that the information provided is often selective. Nurses frequently only stated critical information and prioritised what was shared during the handover. When knowledge is incomplete, nursing care or targets cannot be accomplished, and this can result in a gap in the treatment of the patient.

> *My colleague told in one handover that a patient had been on a blood transfusion since midday. Once we did the round, we found that the blood was not transfused (Nurse 6).*

Another participant further confirmed that missing details could also compromise patient safety.

> *A patient can have a fever for a long time. Doctors can order a blood culture, but the barcode is not available. If the nurse did not tell the next shift nurse to alert the doctor of this barcode, the blood culture would be forgotten. If they do not get proper care from us, it will affect the patient well-being (Nurse 3).*

Handover distractions

This theme describes interruptions and disruptions that are typical during the shift handover, occurring in almost every medical ward. Most of the nurses in this study identified interruptions as one of the factors that impede successful nursing handover, mainly when they happened in an open setting, such as the nurses' station. The atmosphere in which shift changes took place left them especially vulnerable to interruptions like phone calls or requests from patients. When called, nurses felt obligated to

attend to the patient's need. The physical climate during the handover period also often contributed to the distractions. The majority of nurses who practised handover by bay nurse in-charge believed it could get noisy when handover was done simultaneously in one location. Nurses shared that essential patient knowledge appears to be lost during a handover process with regular interruptions and disturbances.

Meanwhile, shift handover is perceived by most nurses as transferring patient information to ensure continuity of care. However, some nurses do informal chatting, such as personal life or gossiping about the patient, during handover, which may delay handover processes. Nurses agreed that chit-chatting could extend the handover time.

> *The only concern is that they take too long to chit -chat, and the handover will be postponed. I do not blame them if they want to talk around. However, if possible, it [story] should be discussed later after the handover has been completed (Nurse 8).*

Furthermore, some nurses indicated that delay in completing the handover would cause harm to the patient. According to one nurse, a patient may have a sudden deterioration in his condition by the time nurses' complete the handover:

> *We never know. Often healthy patients will also undergo abrupt changes if handover takes a long time because continuity of treatment has been interrupted (Nurse 10).*

Apart from this, if one of the on-going nurses is late for a shift, the off-going nurse must also carry on with the handover so the other on-going nurses can start their job immediately. This is important because it would take more time to wait for all the on-going nurses to come. Thus, patient care will be delayed, particularly for a patient who needs urgent treatment.

> *It depends on every nurse's dedication, but when we come early half an hour before we begin our job, there is no harm. The explanation is that after receiving the report, we can care for our patient immediately (Nurse 3).*

The off-going nurse would consider other means of transmitting the information, such as writing critical information on paper or sending the documentation to the other nurses coming in. Several nurses in this study have reported that the sharing of information via the phone or text message as an alternative is often done in a very informal way.

Meanwhile, most nurses in this study reported that they would re-read a patient's report if they missed any crucial details before beginning the interruption-related mission. Late-coming nurses often supported reading back the patient report in the BruHIMS (electronic health record) and did not rely solely on the details provided by the second person. One nurse remarked:

> *As a recipient, we should double-check the notes in the BruHIMS after doing a ward round, as there is more detail in the notes. Often, we skipped mentioning the details due to a noisy atmosphere, or sometimes patient or relatives called for help during the handover (Nurse 1).*

DISCUSSION

This study reveals that an essential practice of effective shift handover is the exchange of accurate and detailed information about the patients. The study results show that nurses' practices to nursing shift handover procedures are inconsistent. That is because not every medical ward uses the same methods, even though it is within the same medical department. Singapore has established bedside handover as the most preferred method for handover operations (21). Bedside handover has been seen as strengthening and encouraging patient-centred treatment by involving a patient (5). Bedside handover allows nurses to have a patient visual reference, which allowed them to concentrate more on crucial patient information during the handover process (22).

An interesting finding from this analysis is that two handover styles are being used in the medical unit: the overall manager and the bay nurse in charge. Some units use both styles. In this report, most nurses agreed with the style of handover, which determined the ward manager's choice as their standard practice rather than introducing bedside handover. Similar studies, such as Giske et al. (23) and Bourne (24) supported the findings of this study. The majority chose to use bay nurse in charge; their reason for choosing this style was to curb the workload among nurses. It shows that heavy workloads also affected the individual choice of the nurses in this study, irrespective of the style practised in each medical ward. The handover style helped to reduce the workload for most nurses so that they could focus on preparing the nursing report and include detailed patient information. Thus, by reducing uncertainty and eliminating gaps in patient knowledge during the handover process, the bay in charge style can

improve patient safety and increase the efficiency of information transmission (23). In this study, nurses preferred quick handover and reduced workload in preparing the nursing report.

In addition, some nurses mentioned in the literature find bedside handover time-consuming and vulnerable to regular interruptions by patients, family members, other healthcare providers and the noise environment (25). Bedside handover could confuse patients with the medical jargon used and that patients felt excluded during the handover process, as nurses perceived that nurses were interacting with each other without involving the patients (26). A study suggested that nurses were more worried about questions of patient confidentiality than the patients themselves (27).

In this study, the choice of handover style was often influenced by ward structure. Some nurses disagreed about the bay nurse in charge style, particularly those who came from a single-room formal hospital. This was because the resulting documentation would not be coordinated by using bay nurse in charge. Therefore, they tended to use the overall in-charge style, which was what they had encountered in their own experiences at a formal single-room hospital. In addition, they concentrated on only 12 to 15 cases, and an overall in charge was sufficient for them. Some wards also applied both models, bay nurse and entirely in charge. Patients had rested through the night shift. Therefore, there were fewer interruptions, and the bay nurse could focus on updating the report, and the nurse in charge.

Another trend arising from this analysis is the use of organised transferring methods. In this study, the nurses indicated that updating the nursing report by using standardised resources would help nurses provide more coordinated patient information that could eliminate missed information. A similar qualitative study in the United States, which proposed that end-of-shift reporting described the need for a structured and standardised handover to eliminate information omissions and lengthy or disorganised reporting (28). Reflecting the results of the report, the introduction of ISBAR in medical wards has reflected the arguments that a structured and systematic way of transferring information is vital to minimise the complexity of the transfer. They have also made an excellent recommendation for enhancing the handover process. However, in this study, most nurses encountered difficulties in the initial implementation of the ISBAR, as it was not possible for all involved in the transfer to receive the information to be planned, coordinated and standardised. Poor instruction in using the ISBAR resulted in nuanced knowledge being placed between assessment and recommendation. These issues were resolved once nurses learn to use the ISBAR, as they ultimately found it easier to use.

Complete and correct transmission of information between nurses is the basis for the continuity of patient care (12). The findings of this report show that the introduction of ISBAR has allowed this to happen. Due to the hierarchical structure in which they operate, can provide full and accurate information during nursing handover. Bad records may lead to uncertainty among nurses about a patient's clinical condition and proper care (12), which may, in turn, hinder efficient communication during the handover. Nurses in this study encountered similar results – not just uncertainty, but also cases in which the same procedure was performed unnecessarily on the same patient multiple times. Other than that, unstructured and vague details could lead to circumstances that could put patients in danger. Most nurses' recorded insufficient information was transmitted at the end-of-shift report, leading the recipient to spend more time looking for valuable information from each patient record (28). Half of the nurses in the current study indicated that redundant information might also be an obstacle to successful transmission, as unnecessary or obsolete information increased the time needed for transferring. This redundancy could also lead to a delay in delivering nursing care to a patient who needed urgent attention. In this study, nurses confirmed that the nurse station is the most popular place to do the nursing handover.

Nevertheless, environmental disturbances, such as high ambient noise levels during handover, frequently occur in open areas such as the nurses' station (29). Similar results were also reported in this study, and due to these other conditions, there was no place for nurses to do the handover. Nurses in this study also indicated that with the constant interruptions and disturbances during the handover period was often viewed as causing the loss of vital information to be transferred. Therefore, they typically found a way to use a quiet area where interruptions and disturbances could be reduced, such as a treatment room or other area away from bay nurses.

Meanwhile, a quantitative study done in Australia reported that the team leader, along with other nurses, is expected to attend the nursing handover process (30). The presence of nurses during the handover cycle has not been widely discussed but

was addressed in the current study. An exciting finding is that the nurses encouraged all nurses to attend nursing handover. Some respondents stressed the need, not only for the nurses to be physically present but also for them to be active. They felt responsible for moving the information directly from one side to another. Nurses wanted to have a face-to-face chat, which helped them to ask for clarification if any issues occurred. A similar finding showed that the optimal method of successful handover is through face-to-face verbal contact and the use of a uniform handover format (29). Such practices are possible if nurses with errors in knowledge are removed, and patient complications are minimised (31).

In addition, it was found that after the handover is implemented, there are reductions in errors which involve face-to-face verbal interactions (32). Reduced errors included prescription mistakes, late attendance orders and incomplete paperwork. Verbal handover provided more details than the written handover (33). A randomised controlled study (34) proposed that if the outgoing nurse were worried about a piece of information, nurses would be more likely to recall specific details from handoff, a piece of information that was in the health record or both. The nurses, however, argued that they did not have to be there physically because they could still read a description of a patient via BruHIMS. Nonetheless, the present findings show that the nurses recognise the importance of effective shift handover, which is the cornerstone of safe nursing practice.

LIMITATION

This study's major limitation is that it was performed only inside the medical environment. There are also limits on how much it is possible to generalise the results to other clinical specialities. Another drawback is that the researcher is unaware of a formal medical ward that consists of an open ward and organised a single-room ward that uses various types of handover practices. When the researcher just looks at one organised ward, it will be very straightforward. Other than that, the nurses' language preferences were not included in the inclusion and exclusion considerations, as the researcher was bilingual. Some nurses, therefore, chose to do bilingual interview sessions, and the words they used could have acquired different meanings during the translation process. Finally, only one data collection method was used. The addition of patient interviews might have broadened the utility of the study but would have meant that more time was required to analyse nurses' practices to nursing handover activities.

CONCLUSION

This study illustrated existing nursing shift handover procedures in six separate medical wards at RIPAS hospital. The results show that nurses' practices of handover procedures are inconsistent. The ward manager determined the preference for handover styles to help minimise the workload of nurses, and both styles have their positive impacts and limitations. Structured ward and staff shortages also affect handover design choice. Implementation of the ISBAR method in medical wards has a positive impact on information exchange. Nurses need to communicate accurate and concise information, which can be easily understood by both the giver and the recipient to ensure the quality and safety of patient care. The clinical handover was decided mainly at the nurses' station, which made participants especially vulnerable to interruptions. This suggests the need for implementation of shift handover process training, and particularly instruction on transferring and receiving documentation needs to be stressed not only to registered nurses but also to pre-registered nurses to improve the handover practices. Based on this study's results, the researcher proposes expanding related research set in Brunei to other departments or hospitals to broaden the applicability of the findings.

CONFLICT OF INTEREST

The authors declare no conflict of interest.

REFERENCES

1. Eggins S, Slade D. Communication in clinical handover: improving the safety and quality of the patient experience. Journal of Public Health Research. 2015; 4(3).

2. World Health Organization. Patient safety solutions: Communication during patient handover. 2009; Geneva, Switzerland: WHO Press.

3. Chaboyer W, Mcmurray A, Wallis M. Bedside nursing handover: A case study. International Journal of Nursing Practice. 2010; 16(1):27–34.

4. Smeulers M, Lucas C, Vermeulen H.

Effectiveness of different nursing handover styles for ensuring continuity of information in hospitalised patients. Cochrane Database of Systematic Reviews. 2014

5. Spinks J, Chaboyer W, Bucknall T, Tobiano G, Whitty JA. Patient and nurse preferences for nurse handover--using preferences to inform policy: a discrete choice experiment protocol. BMJ Open. 2015; 5(11).

6. Whitty JA, Spinks J, Bucknall T, Tobiano G, Chaboyer W. Patient and nurse preferences for implementation of bedside handover: Do they agree? Findings from a discrete choice experiment. Health Expectations. 2016; 20(4):742–50.

7. Manias E, Geddes F, Watson B, Jones D, Della P. Communication failures during clinical handovers lead to a poor patient outcome: Lessons from a case report. SAGE Open Medical Case Reports. 2015; 3.

8. Kilic SP, Ovayolu N, Ovayolu O, Ozturk, MH. The approaches and attitudes of nurses on clinical handover. International Journal of Caring Sciences, 2017; 10(1): 136-145.

9. Spanke MT, Thomas T. Nursing Assistant Walking Report at Change of Shift. Journal of Nursing Care Quality. 2010; 25(3):261–5.

10. Bruton J, Norton C, Smyth N, Ward H, Day S. Nurse handover: patient and staff experiences. British Journal of Nursing. 2016; 25(7):386–93.

11. Porteous JM, Stewart-Wynne EG, Connolly M, Crommelin PF. iSoBAR — a concept and handover checklist: the National Clinical Handover Initiative. Medical Journal of Australia. 2009; 190(S11).

12. Malekzadeh J, Mazluom SR, Etezadi T, Tasseri A. A standardised shift handover protocol: improving nurses' safe practice in intensive care units. Journal of Caring Sciences, 2013; 2(3), 177–185. DOI:10.5681/ jcs.2013.022.

13. Anderson J, Shroff D, Curtis A, Eldridge N, Cannon K, Karnani R, et al. The Veterans Affairs Shift Change Physician-to-Physician Handoff Project. The Joint Commission Journal on Quality and Patient Safety. 2010; 36(2).

14. Mannix T, Parry Y, Roderick A. Improving clinical handover in a paediatric ward: implications for nursing management. Journal of Nursing Management. 2017; 25 (3):215–22.

15. Thompson JE, Collett LW, Langbart MJ, Purcell NJ, Boyd SM, Yuminaga Y, et al. Using the ISBAR handover tool in junior medical officer handover: a study in an Australian tertiary hospital. Postgraduate Medical Journal. 2011; 87(1027):340–4.

16. Kwok ESH, Clapham G, White S, et al. Development and implementation of a standardised emergency department inter shift handover tool to improve physician communication. BMJ Open Quality 2020; 9:e000780.

17. Patton MQ. Qualitative research & evaluative methods: Integrating theory and practice. Thousand Oaks, CA: SAGE Publication Inc., 2015.

18. Graneheim UH & Lundman B. Qualitative content analysis in nursing research: Concepts, procedures and measures to achieve trustworthiness. Nurse Education Today, 2004; 24(2):105-112

19. Graneheim UH, Lindgren BM & Lundman B. Methodological challenges in qualitative content analysis: A discussion paper. Nurse Education Today, 2017; 56: 29-34

20. Polit DF & Beck CT. Study guide for essentials of nursing research: Appraising evidence for nursing practice. Philadelphia, PA: Wolters Kluwer, 2018.

21. Roslan SB, Lim ML. Nurses' perceptions of bedside clinical handover in a medical-surgical unit: An interpretive descriptive study. Proceedings of Singapore Healthcare. 2016; 26(3):150–7.

22. Wise MP, Morgan MP, Hingston CD, Watkins HL. Bedside handover of critically ill patients. Critical Care. 2012; 16(2):419.

23. Giske T, Melås SN, Einarsen KA. The art of oral handovers: A participant observational study by undergraduate students in a hospital setting. Journal of Clinical Nursing. 2018; 27(5-6).

24. Bourne C. Intershift report: a standard for handovers. Nursing Times Research 2000;5 (6):451-9.

25. Mitchell A, Gudeczauskas K, Therrien A, Zauher A. Bedside Reporting is a Key to Communication. Journal of Healthcare Communications. 2017; 03(01).

26. Poh CL, Parasuram R, Kannusamy P.

Nursing inter-shift handover process in mental health settings: a best practice implementation project. International Journal of Evidence-Based Healthcare. 2013; 11(1):26–32.

27. Anderson J, Malone L, Shanahan K, Manning J. Nursing bedside clinical handover - an integrated review of issues and tools. Journal of Clinical Nursing. 2014; 24(5-6):662–71.

28. Welsh CA, Flanagan ME, Ebright P. Barriers and facilitators to nursing handoffs: Recommendations for redesign. Nursing Outlook. 2010; 58(3):148–54.

29. Yang X, Park T, Siah T, Ang B, Donchin Y. One size fits all? Challenges faced by physicians during shift handovers in a hospital with high sender/recipient ratio. Singapore Medical Journal. 2015; 56(02):109–15.

30. Manias E, Geddes F, Watson B, Jones D, Della P. Perspectives of clinical handover processes: a multi-site survey across different health professionals. Journal of Clinical Nursing. 2015; 25(1-2):80–91.

31. Birmingham P, Buffum MD, Blegen MA, Lyndon A. Handoffs and Patient Safety. Western Journal of Nursing Research. 2014; 37(11):1458–78.

32. Drach-Zahavy A, Hadid N. Nursing handovers as resilient points of care: linking handover strategies to treatment errors inpatient care in the following shift. Journal of Advanced Nursing. 2015; 71(5):1135–45.

33. Johnson M, Sanchez P, Suominen H, Basilakis J, Dawson L, Kelly B, et al. Comparing nursing handover and documentation: forming one set of patient information. International Nursing Review. 2013; 61(1):73–81.

34. Lee H, Cumin D, Devcich DA, Boyd M. Expressing concern and writing it down: an experimental study investigating transfer of information at nursing handover. Journal of Advanced Nursing. 2014; 71(1):160–8.