Enhancing Medication Safety and Care Transitions: A Systematic Review of Roles and Strategies in Healthcare Settings



Faisal Fahd Misfer Al-Qahtani ^{1*}, Turki Mohammed Al-Turaiki ¹, Sultan Safah A Alharbi ¹, Abdalurhman Abdulaziz Almubarak ¹, Ahmad Ayad M Anazi ¹, Abdullah Marzouq Alotaibai ¹, Adil Mubarak Alotaibi ¹, Saleh Kaytab Alshammari ¹, Bandar Khalid Suwailem Albaqami ¹, Fahad Abdulaziz Altuwaijri ¹, Badr Talhab Ayed Al-Anzi ¹, Mohammed Ahmed Bahanshel ¹

Abstract

Background: Medication reconciliation is a critical process for ensuring patient safety during transitions of care, particularly in preventing medication discrepancies that can lead to adverse events. Various healthcare professionals, including physicians, pharmacists, and nurses, play pivotal roles in this process. Studies highlight challenges and barriers in medication reconciliation, such as unclear role allocation, insufficient collaboration, and a lack of knowledge. Methods: A systematic review of existing literature was conducted, including studies from databases such as PubMed and Scopus, to assess the roles of healthcare professionals in medication reconciliation, identify discrepancies, and evaluate strategies to improve this process. Inclusion criteria focused on studies related to medication reconciliation during transitions of care, particularly in hospital settings, and involving interdisciplinary teams. Results: The findings revealed that physicians, pharmacists, and nurses have distinct but overlapping responsibilities in medication reconciliation.

Significance | This review highlights strategies and key roles in improving medication safety and reducing rehospitalizations across healthcare settings.

*Correspondence.

Faisal Fahd Misfer Al-Qahtani , Ministry of National Guard Health Affairs, Prince Mutib Ibn Abdullah Ibn Abdulaziz Rd, Ar Rimayah, Riyadh 11426, Saudi Arabia.

E-mail: akrmesmail2060@gmail.com

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Pharmacists were identified as essential in managing medication discrepancies, while nurses contributed significantly to communication and patient education. However, barriers such as role ambiguity, inadequate training, and lack of interprofessional collaboration hindered the effectiveness of the process. Successful strategies included structured medication reconciliation protocols, clear role definitions, and the involvement of pharmacists in routine transitions of care. Conclusion: Medication reconciliation is a crucial component of safe transitions of care, requiring the collaboration of multiple healthcare professionals. To enhance its effectiveness, role clarity, improved communication, and interprofessional education are essential. Future research should focus on refining these strategies and evaluating their impact on patient outcomes, particularly in reducing readmissions and improving medication safety.

Keywords: Medication Reconciliation, Care Transitions, Pharmacist Involvement, Patient Safety, Healthcare Collaboration

Introduction

Transitional care has become an essential aspect of patient management in healthcare systems globally. With shorter hospital stays and an increasing demand for post-discharge support, effective transitional care ensures that patients continue to receive necessary services as they move across different levels of care, from

Author Affiliation

¹ Ministry of National Guard Health Affairs, Prince Mutib Ibn Abdullah Ibn Abdulaziz Rd, Ar Rimayah, Riyadh 11426, Saudi Arabia.

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hospitals to home or other healthcare settings (Donald et al., 2015). The significance of this phase has grown due to the increased likelihood of adverse events during handovers between healthcare settings, a concern that makes transitional care one of the highest-risk stages in the patient care continuum (Kapoor et al., 2019; Tsilimingras & Bates, 2008). Transitional care is defined as a structured process designed to ensure the continuity and coordination of care across different levels, whether within the same healthcare institution or between different facilities (Naylor et al., 2011). Central to its effectiveness is the transmission of accurate, timely information regarding a patient's health status and care needs, as well as the transfer of responsibility for care across various settings (WHO, 2016).

Various factors hinder the seamless transfer of care, including inadequate training for patients or caregivers, poor communication among healthcare providers, inadequate medication management, and low health literacy (Aase et al., 2013; Dempsey et al., 2018). As such, ensuring the quality and safety of transitional care has emerged as a focal point of research, particularly in relation to medication safety, as medication errors are common during this period (Spinewine et al., 2013). Studies have shown that errors in medication management during transitions, such as incorrect medication reconciliation and inadequate follow-up, can result in preventable adverse drug events, which pose a significant threat to patient safety (Polinski et al., 2016; Rennke & Ranji, 2015).

2. Transitional Care: Pharmaceutical Oversight and Patient Safety

Facilitating effective transitional care across various healthcare environments is essential to ensuring patient safety and reducing the likelihood of hospital readmissions (Donald et al., 2015; Polinski et al., 2016). Studies have shown that effective transitional care can reduce the relative risk of readmission within 30 days post-discharge by as much as 50%, while also providing cost savings of \$2 for every \$1 spent (Naylor et al., 2011). Transitional care programs bridge the gap between pre- and post-discharge care, connecting patients with necessary interventions across multiple stages of their healthcare journey, from admission to primary care and ultimately back to their homes (Rennke & Ranji, 2015). Patient engagement, alongside the communication and collaboration among healthcare professionals, plays a pivotal role in this process (Lee et al., 2015).

A critical component of high-quality transitional care is medication management, which directly impacts patient safety (Vogelsmeier et al., 2013). The World Health Organization (WHO) emphasizes the importance of pharmaceutical safety during transitions of care, particularly in minimizing medication-related risks (WHO, 2007). Medication-related problems, including incorrect medication transfers, are significant factors affecting transitional care quality

(Setter et al., 2012; Spinewine et al., 2013). Ensuring the safe transition of a patient's medication regimen is vital to preventing adverse events and maintaining patient safety (Jencks et al., 2009). Transitional care programs can mitigate medication-related issues by improving access to medications, providing comprehensive counseling, and addressing gaps in post-hospital medication management (Dempsey et al., 2018). Patients transitioning between healthcare settings are vulnerable to medication errors due to various factors, including poor communication among providers, inadequate education, insufficient follow-up, and lack of patient involvement in medication management (Setter et al., 2012). Inadequate medication reconciliation, which involves verifying and documenting all medications a patient is taking, is one of the most common causes of such errors (Chhabra et al., 2012). In fact, 46%-56% of all pharmaceutical mistakes in transitional care are preventable adverse drug events, with inaccuracies in drug history at admission and discharge potentially causing harm to patients (Tam et al., 2005; Redmond et al., 2018).

Effective medication management during transitions of care requires a collaborative approach, involving nurses, physicians, and pharmacists, to ensure beneficial health outcomes and reduce practice errors (Vogelsmeier et al., 2013). This process is especially complex in both acute and chronic healthcare settings, including hospitals and nursing homes, where diverse healthcare professionals have overlapping responsibilities for optimizing patient care (Hellström et al., 2012; Gunadi et al., 2015). Nurses, in particular, are essential members of the transitional care team, with a critical role in assessing care plans, identifying issues, and addressing them to improve patient safety (Vaughn et al., 2016). Their involvement in medication management helps patients, particularly those at high risk of readmission or fragmented care, navigate the transition from hospital to home (Camicia & Lutz, 2016).

Despite the recognized importance of nurses in medication safety, there remains a gap in comprehensive understanding of their role in transitional care. Research has emphasized the need for further investigation into how nurses can contribute to medication management within transitional care settings (Choo et al., 2010). Collaborative efforts in transitional care, which emphasize medication reconciliation and patient education, hold the potential to significantly reduce the incidence of medication-related errors and improve patient outcomes (Cole et al., 2019; Storm et al., 2018).

3. Methodology

To gather relevant studies for this review, we systematically searched online databases, including PubMed (Medline), Web of Knowledge, Scopus, and CINAHL. The search covered articles published from 2010 to 2022 in peer-reviewed scientific journals. Key terms related to care transitions, medication management, and

nursing roles were used to identify relevant studies. Studies were selected based on their focus on the pharmacological management of patients during care transitions, with emphasis on the nurse's role in medication reconciliation and oversight across various healthcare settings.

4. Transitional Point of Care in the Selected Studies

The studies selected for review focus on pharmacological management during transitions across various healthcare contexts. These transitions include shifts from the emergency department to medical wards, from hospitals to long-term care facilities and home settings, between different hospital wards, from skilled nursing facilities to home, from hospital admission to discharge, and transitions from the emergency department to home hospice and nursing homes. Each of these transitions presents unique challenges in ensuring continuity and safety in medication management. Studies highlight the importance of thorough medication oversight during these periods to mitigate risks, prevent medication errors, and ensure optimal patient outcomes.

5. The Nurse's Function in Medication Oversight During Care Transition

Due to the diversity in methodologies, objectives, and outcomes across studies, a meta-analysis was not feasible. Instead, the findings were presented narratively. From the studies reviewed, three main components of the nurse's role in ensuring safe medication management during transitional care emerged: (1) collaboration with other healthcare providers, (2) provision of support to healthcare recipients, and (3) participation in the medication reconciliation process. These components were identified through a careful examination of the research findings (Figure 1). These three categories are interrelated, with nurses playing an essential role in facilitating communication among care teams, supporting patients through transitions, and overseeing the accuracy of medication lists and prescriptions (Table 1)

6. Pharmaceutical Reconciliation Protocol

The nurse's role in medication oversight, particularly in the medication reconciliation process, is pivotal during transitional care. The process involves reviewing a patient's current medication list against the medications they are prescribed in the new setting. This ensures that discrepancies are identified and corrected, contributing to patient safety. The nurses' responsibilities in this process were categorized as follows: (1) assessment of medication history, (2) identification of medication discrepancies, and (3) collaboration in medication reconciliation, all of which were essential to the care transition process (Chhabra et al., 2019; Lovelace et al., 2016; Prusaczyk et al., 2020).

7. Assessment of Pharmaceutical History

Nurses are heavily involved in obtaining medication histories when patients are admitted to healthcare facilities or when they transition between levels of care. For example, Chhabra et al. (2019) observed that clinical nurses participated in medication reconciliation during the admission process, with emergency nurses collecting initial medication histories and floor nurses performing follow-up assessments. Their study revealed that the time spent on medication history collection varied between different stages of admission but remained relatively consistent for the overall process. Nurses were found to take a more thorough approach to medication assessment once admission orders were issued, spending more time per medication. Chan et al. (2020) further emphasized the nurse's role in obtaining the most accurate medication history, particularly for patients admitted to high-risk areas like cardiology and critical care units.

Moreover, Lovelace et al. (2016) demonstrated the importance of medication reviews during the transition from hospital to home. Case management nurses performed comprehensive medication reviews during initial home visits or follow-up calls after discharge. This review was crucial for identifying potential medication issues, adjusting prescriptions, and renewing prescriptions where needed. Such interventions aim to minimize risks associated with polypharmacy and medication errors. Prusaczyk et al. (2020) highlighted the importance of medication reconciliation during the transition from hospital to long-term care facilities and home, with registered nurses performing a majority of the medication reconciliations. Their study also revealed that advanced practice registered nurses were particularly involved in reviewing and adjusting medications, especially for older adults with dementia, thus ensuring a safe transition.

8. Identification of Medication Discrepancies

Another significant responsibility for nurses during care transitions is identifying discrepancies in medication lists. Tjia et al. (2019) examined how nurses assist family caregivers in managing medications during the transition to home hospice care. The study found that nurses played a vital role in identifying discrepancies between medications listed in the hospital record and those the patient was actually taking at home. This included helping family caregivers understand which medications were necessary and which could be discontinued to reduce adverse drug reactions (ADRs) and polypharmacy. In home hospice care, nurses not only identified discrepancies but also guided family caregivers in medication administration and collaborated with physicians to ensure that any adjustments to prescriptions were made in line with the patient's needs.

9. Collaborative Role in Medication Reconciliation

Collaboration is another essential aspect of the nurse's role during care transitions. Nurses often act as the central link between different healthcare providers, ensuring that information about medications is accurately communicated across care settings. Vogelsmeier (2016) described how nurses in nursing homes played a central role in medication reconciliation, which involved reviewing transfer documents and communicating with both patients and their families to understand the medication history. This collaborative process helped in detecting discrepancies and ensuring that the transfer of care was seamless and safe for the patient.

Nurses' involvement in collaborative medication reconciliation is not limited to the healthcare team. In some cases, nurses also engage in active information-seeking behaviors, such as reviewing transfer documents or consulting with other caregivers, to ensure that medication histories are complete and accurate. However, Vogelsmeier (2016) also noted that time constraints and heavy workloads often hindered nurses' ability to detect medication discrepancies, underscoring the need for adequate support and resources to facilitate thorough reconciliation processes.

The studies reviewed underscore the critical role nurses play in managing medications during transitional care. Their responsibilities span several key functions, including medication history assessment, identification of medication discrepancies, and collaboration in medication reconciliation. Nurses are integral to ensuring that care transitions are safe and that patients receive appropriate medication management, thus reducing the risks of medication errors, ADRs, and hospital readmissions. Future research should continue to explore the impact of nursing interventions in medication management during care transitions, with a focus on improving processes and outcomes for patients across diverse healthcare settings.

10. Joint Accountability in Medication Reconciliation

Medication reconciliation is a crucial aspect of transitional care, aiming to prevent discrepancies and ensure medication safety as patients move between different care settings. Several studies highlight the collaborative role of nurses, physicians, and pharmacists in this process, emphasizing their shared responsibility in achieving accurate medication records during transitions.

Otsuka et al. (2019) conducted a study that explored the role of nurses in interprofessional post-acute care clinics. They found that medication reconciliation began with assessing patients' abilities to fulfill their prescriptions. This assessment was typically carried out via telephone calls to the patient or caregiver within two business days post-discharge. Nurses played an essential role in facilitating medication management during this period, working closely with

other healthcare providers to ensure accurate medication information was conveyed.

Al-Hashar et al. (2017) emphasized the collaborative role of nurses in medication reconciliation across various stages of patient care (Table 2). Nurses were found to be integral to the process from hospital admission to discharge. They were seen as second only to physicians in terms of responsibility, particularly due to their capacity to obtain an accurate medication history upon admission. Nurses also verified and corrected discrepancies between the medication history list and those prescribed at admission, and communicated the discharge medication list to subsequent healthcare providers. Despite this critical role, pharmacists and physicians tended to view nurses' contributions as less pivotal in the transfer of medication information to other providers (Al-Hashar et al., 2017). However, nurses still played a supportive role, assisting with medication instructions and counseling patients post-discharge.

11. Collaboration with Supplementary Healthcare Practitioners

Nurses are not only essential in medication reconciliation but also serve as key collaborators with supplementary healthcare practitioners during transitions in care. Studies have highlighted the importance of communication and teamwork among nurses, physicians, and pharmacists to ensure continuity and safety in medication management.

Manias et al. (2015) conducted a study examining the role of nurses in medication management during transitions from emergency departments to medical wards. The study revealed that nurses played a proactive role by addressing medication issues with doctors. They communicated essential clinical parameters to physicians, facilitating timely adjustments to therapy. Additionally, nurses continued to assist in medication modifications when patients were transferred to nursing homes through telephonic consultations with general practitioners.

Effective communication was identified as a critical factor in successful medication management. Nurses emphasized the importance of verbal communication for timely treatment decisions, although asynchronous communication, such as discharge summaries and referral letters, was also highly valued. The accuracy and clarity of documented communication were crucial in avoiding medication discrepancies during transitional care (Manias et al., 2015). Nurses recognized that written communication was particularly important in the context of a rapidly changing work environment, ensuring that all healthcare providers were aligned in their understanding of the patient's medication needs.

Lovelace et al. (2016) explored transitional care programs, focusing on the role of case management nurses in facilitating medication management. In one study, case management nurses collaborated

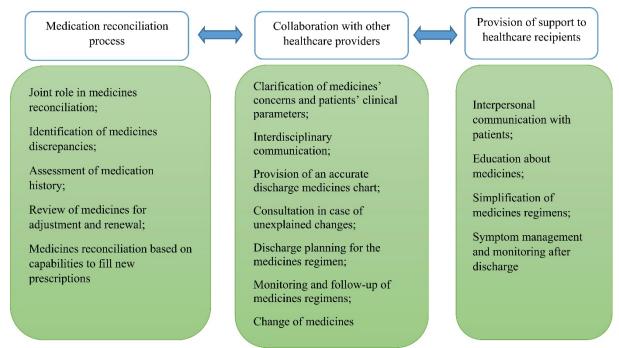


Figure 1. The nurse's role in medication management during transitional care.

Table 1. Roles of Nursing and Pharmacy in Medication Management During Transitional Care

Role	Nursing	Pharmacy	Impact on Medication Safety
Medication	Nurses ensure medication lists are	Pharmacists verify medication	Prevents medication errors by
Reconciliation	accurate and up-to-date during	lists, identify discrepancies, and	identifying discrepancies in drug
	transitions.	assist with medication	history.
		adjustments.	
Patient	Nurses educate patients about	Pharmacists provide counseling	Ensures patients understand
Education	new medications, dosages, and	on drug interactions, side effects,	their medication regimen,
	administration methods.	and safe usage.	improving adherence.
Monitoring	Nurses monitor patients for	Pharmacists assess drug	Early detection of side effects
Adverse Effects	potential adverse drug reactions	interactions and monitor for	prevents complications and
	post-discharge.	adverse drug reactions.	readmissions.
Collaboration	Nurses collaborate with	Pharmacists work closely with	Enhances communication and
	healthcare team members,	nurses to ensure seamless	reduces the risk of medication
	especially pharmacists, to	medication management.	errors during transitions.
	coordinate care.		

Table 2. Key Strategies for Improving Transitional Care and Medication Safety

Strategy	Nursing Role	Pharmacy Role	Effectiveness in Reducing
			Medication Errors
Medication	Ensure accurate medication lists	Perform medication	High; reduces medication
Reconciliation	at discharge and readmission.	reconciliation at transition	discrepancies and enhances
		points.	patient safety.
Interdisciplinary	Participate in care coordination,	Collaborate in medication	Moderate; improves
Collaboration	sharing patient history and	management, especially in high-	communication and ensures
	concerns.	risk cases.	timely interventions.
Patient Education	Educate patients and caregivers	Provide detailed counseling on	High; empowers patients to
	on medication management	potential medication interactions	manage medications effectively.
	during discharge.	and side effects.	
Post-Discharge	Monitor patients for adverse	Offer follow-up consultations to	High; early intervention reduces
Follow-Up	reactions and medication errors.	ensure correct medication use.	readmission rates and adverse
·			events.

Table 3. Research Studies on Transitional Care and Medication Safety

Study	Key Findings	Population/Setting	Impact on Transitional Care
Donald et al.	Nurse practitioners reduce	Community hospitals and patients	Demonstrated the effectiveness of
(2015)	readmissions and optimize	discharged to home care.	nurse-led transitional care
	transitional care.		interventions.
Vogelsmeier	Identified discrepancies during	Nursing homes and long-term care	Highlighted the critical role of
(2014)	medication reconciliation in	facilities.	medication reconciliation in
	nursing homes.		preventing errors.
Tjia et al.	Explored nurses' perspectives on	Hospitalized patients and their	Emphasized the importance of
(2019)	family caregiver medication	caregivers.	caregiver involvement in
	management.		medication management.
Kwan et al.	Medication reconciliation	General hospital patients	Demonstrated a significant
(2013)	reduces errors and improves	transitioning to home or other care	reduction in medication errors
	patient safety.	settings.	through reconciliation.

 Table 4. Barriers and Facilitators to Effective Medication Management in Transitional Care

Barrier	Impact on Medication Safety	Facilitator	Impact on Medication Safety
Lack of	Poor communication and fragmented	Interdisciplinary team	Enhanced teamwork improves
Collaboration	care lead to medication errors.	meetings and coordination.	medication accuracy and patient
			safety.
Insufficient	Nurses and pharmacists may lack the	Ongoing education and	Improved competencies lead to
Training	skills necessary for effective	training programs for	better patient outcomes and fewer
	medication management.	healthcare staff.	medication errors.
Inadequate	Lack of post-discharge monitoring	Post-discharge follow-up by	Regular follow-ups ensure
Follow-Up	increases the risk of adverse events.	nurses and pharmacists.	adherence and prompt detection of
			medication issues.
Ambiguity in	Confusion about responsibilities can	Clear role definitions and	Clarifies roles, ensuring that tasks
Roles	result in medication errors.	responsibilities.	like medication reconciliation are
			properly managed.

with pharmacists to ensure that discharge medication lists were accurate and communicated effectively. The nurses conducted home visits and followed up with patients or caregivers to identify medication discrepancies, working closely with the patient's primary care physician and the care manager to resolve any issues. This collaborative approach ensured that patients received a safe and accurate medication regimen post-discharge.

Vogelsmeier (2014) further investigated the collaborative role of nurses in nursing homes, where they were often the primary source of medication information for physicians. Due to the lack of familiarity with patients' medical histories, nursing home physicians relied heavily on nurses for medication management and recommendations. Nurses were responsible for assessing lab results and requesting examinations, ensuring that medication orders were appropriate for each patient's condition.

Reidt et al. (2016) focused on the interprofessional collaboration between nurses and pharmacists in skilled nursing facilities. Their study highlighted the joint accountability of nurses and pharmacists in ensuring accurate medication records. Pharmacists reviewed the patient's electronic health records, verifying over-the-counter medications and dietary supplements for safety and efficacy. In collaboration with the nurse practitioner, they adjusted medications as needed and ensured that necessary lab tests were completed before discharge. The nurse then worked with patients to monitor medication effects and provide follow-up care.

The collaboration between nurses and pharmacists was particularly crucial in the management of patients' medications during transitions between healthcare settings. As patients moved from hospital care to skilled nursing facilities and eventually back home, the nurse's role expanded to ensure continuity in medication management. Nurses not only conducted medication reconciliation but also monitored for adverse drug reactions and ensured that patients followed proper medication regimens.

12. Facilitation of Support for Healthcare Beneficiaries

This issue explores the pivotal role of nurses in facilitating drug management for healthcare users throughout transitional care across several healthcare levels (Table 4) The importance of medication management in transitional care cannot be overstated, especially in minimizing errors and ensuring patient safety. Tjia et al. (2019) investigated nurses' perspectives on their role in medication management for family caregivers, particularly during the transition to home hospice care. Nurses provided education and skill development for caregivers, with a focus on symptom management rather than drug administration. Their approach aimed to simplify the pharmaceutical regimen by minimizing medications, ultimately fostering trust and communication between patients, caregivers, and healthcare providers. The process of deprescribing was integral to this role, where nurses supported

the reduction of unnecessary drugs and carefully addressed any concerns raised by the patients and their families.

Prusaczyk et al. (2020) examined transitional care interventions involving various healthcare professionals for elderly individuals, including those with dementia, as they transitioned from hospitals to long-term care facilities or their homes. Nurses were central to educating patients about drug management and monitoring symptoms post-discharge. Advanced practice registered nurses also played a significant role in teaching patients how to manage their medications and observe symptoms, ensuring continuity of care beyond the hospital. Similarly, Al-Hashar et al. (2017) highlighted the essential role of nurses in providing medication counseling and instructions during discharge. This is consistent with findings by Manias et al. (2015), who emphasized the significance of interpersonal relationships between healthcare professionals, especially nurses, and patients for ensuring medication safety during transitions between healthcare settings.

The role of nurses in medication reconciliation is multifaceted. It includes tasks such as collecting medication history, assessing prescriptions, identifying discrepancies, and facilitating the deprescribing process. The medication reconciliation process begins with evaluating patients' ability to comply with new prescriptions, including collaboration with pharmacists and physicians to manage medications from admission to discharge. Nurses are typically the primary providers responsible for conducting medication reconciliation in nursing facilities, addressing discrepancies, consulting with pharmacists, and engaging in multidisciplinary communication with other healthcare providers to ensure medication safety. This collaborative approach supports medication education, streamlines prescription schedules, and encourages patient involvement in their medication management (Vogelsmeier, 2014). Furthermore, nurses engage in ongoing education and provide counseling about medications, symptom management, and medication safety, which is particularly important during transitions to ensure patient empowerment and reduce the risk of adverse drug events.

Research has consistently highlighted the crucial involvement of nurses (Table 3) in the medication reconciliation process across multiple transitional care phases (Almanasreh, Moles, & Chen, 2016; Krivanek et al., 2019). Medication reconciliation is a well-established procedure where healthcare practitioners collaborate with patients to ensure accurate and comprehensive medication information transfer during care transitions (Kwan et al., 2013). Several international patient safety organizations, such as the Institute for Health Improvement (IHI), the Joint Commission (TJC), and the World Health Organization (WHO), recognize medication reconciliation as essential for maintaining patient safety by identifying discrepancies, particularly during transitional care periods (WHO, 2019). Effective medication reconciliation requires

a coordinated approach, including role acknowledgment, multidisciplinary collaboration, effective communication, and enhanced monitoring to ensure patient safety during transitions (Vogelsmeier, 2014). However, a lack of understanding of medication management among healthcare personnel remains a significant challenge to achieving proper medication reconciliation, particularly due to inadequate training provided to nursing students on this crucial process.

As such, a clear need exists for comprehensive training on the medication reconciliation process within clinical environments, which should also be incorporated into nursing curricula (Krivanek et al., 2019). The two main responsibilities of nurses in medication management during transitional care are communication and collaboration with other healthcare professionals. Effective communication and cooperation between nurses, physicians, and pharmacists are critical to ensuring medication safety, especially during transitions between care settings (Tobiano et al., 2019). A systematic review of transition-of-care models in heart failure patients by Albert (2016) found that interdisciplinary cooperation was vital to patient safety and the prevention of rehospitalization. Bethishou et al. (2020) also demonstrated that collaborative efforts, such as pharmacist-nurse follow-up calls post-discharge, can significantly enhance the safety and quality of care for patients. Inadequate communication and collaboration among healthcare providers, including nurses, is a major barrier to successful medication management during transitional care. To address this, nurses must strengthen their communication skills and actively engage in collaboration with the interprofessional team to improve continuity and coordination of care (Vogelsmeier, 2014). Ozavci et al. (2019) showed that medication inconsistencies during transitional care in older patients were associated with insufficient nurse-patient contact, underscoring the importance of nursing

Further support for this approach is provided by a systematic review by Tobiano et al. (2019), which showed that nurses play a critical role in patient education during hospital admission and discharge. The review found that nurses provide essential counseling regarding medications, explain discharge medication plans, and conduct follow-up calls post-discharge to ensure continuity of care. This proactive approach to communication can significantly reduce the risk of medication errors and adverse events, thereby improving overall patient outcomes.

involvement in communication. Nurses' role in patient education and counseling during transitions, including medication

management and symptom observation, is crucial for minimizing

adverse drug-related events (Tobiano et al., 2019).

Nurses are central to ensuring safe and effective medication management during transitional care. Through education, collaboration, and communication, nurses play a vital role in preventing medication discrepancies, enhancing patient safety, and improving healthcare outcomes. The evidence strongly supports the need for continued emphasis on the role of nurses in transitional care settings and the importance of interprofessional collaboration in optimizing patient care during these critical transitions.

13. Conclusion

This study explored the critical role of nurses in medication management during transitional care, emphasizing their impact on patient safety. Through an integrative review approach, both qualitative and quantitative research findings were synthesized, offering a comprehensive understanding of the issue. The study underscores the need for stronger emphasis on degree-level education and in-service training for nursing professionals. Effective medication management, along with minimizing medication errors, requires clear role definition, interdisciplinary collaboration, and open communication among nurses, physicians, and pharmacists. By fostering joint decision-making and shared responsibilities, healthcare providers can enhance medication safety during transitions. Future research should further examine how nurses can deepen their involvement in medication management, particularly in relation to medication adherence, emergency department visits, and reducing readmission rates to long-term care facilities.

Author contributions

F.F.M.A. conceptualized and supervised the study. T.M.A., S.S.A., and A.A.A. contributed to data collection and drafting the manuscript. A.A.M.A and A.M.A. supported methodology and analysis. A.M.A. and S.K.A. provided critical revisions and project oversight. B.K.S.A. and F.A.A. assisted with data validation and manuscript preparation. B.T.A. and M.A.B. reviewed and finalized the manuscript. All authors reviewed and approved the final version.

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Competing financial interests

The authors have no conflict of interest.

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