Nursing Education Research Conference 2018 (NERC18)

The Lived Experience of Making a Medication Administration Error in Nursing Practice

Seema Lall, PhD

harriet Rothkopf heilbrunn School of Nursing, Long Island University, Brooklyn, NY, USA

Medication administration is an important task performed daily by nurses and is one of the key aspects of safe patient care. The multiple and varied roles of nurses, complexity of workplace, chaotic and technical nature of the work environment may result in cognitive overload that may overwhelm nurses, which may possibly lead to medication errors. All medication errors committed are considered serious events but some may consequently be harmful to patients. Research indicates that when medication errors occur the concern is usually for the patients involved in the incident. However, making a medication administration error has a lasting effect on the nurse as well as the patient (Schelbred & Nord, 2007; Treiber & Jones, 2010).

This study examined what it was like to make a medication error for eight registered nurses through indepth and focused face to face interview using the descriptive phenomenological approach rooted in the philosophical tradition of Husserl. Two interviews were carried out with each participant and the research data were generated from a total of sixteen interviews and field notes. The transcripts were analyzed using the seven-step methodological guidelines developed by Colaizzi for data interpretation to understand the meaning of the nurses lived experiences of making medication errors.

Five theme categories emerged: *Immediate Impact: Psychological and Physical Reactions; Multiple Causes within Chaos: Cognitive Dimensions; Embedded Challenges: Healthcare Setting; Organizational Culture: Within the Place/Within the Person; Dynamics of Reflection: Looking Forward.* The essential structure of the phenomenon of making a medication administration error included the realization that a profound experience had happened to them. This resulted in physical and emotional upheavals, a threatened professional status, with low self-esteem and confidence. An overwhelming workload, a stressful work environment and ill-treatment by peers were descriptions of the cause of the errors. Nurses did offer ways to improve the system but felt their concerns were often not valued. Implications for nursing practice to improve patient outcomes, and for nursing education, to radically change the teaching of medication administration were formulated.

Title:

The Lived Experience of Making a Medication Administration Error in Nursing Practice

Keywords:

Medication Errors, Patient safety and just culture and contributing factors in underreprting of medication errors

References:

Barnsteiner, J., & Disch, J. (2012). Just culture for nurses and nursing students. *Nursing Clinics of North America*, 47(3), 407-416.

Bates, D., Spell, N., Cullen, D., Burdick, E., Laird, N., & Peterson, L. (1997). The costs of adverse drug events in hospitalized patients. *Journal of the American Medical Association*, 277, 307-311.

Buchini, S., & Quattrin, R. (2011). Avoidable interruptions during drug administration in an intensive rehabilitation ward: Improvement project. *Journal of Nursing Management*, 1-9. http://dx.doi.org/10.1111/j.1365-2834.2011.01323.x

Classen, D., Pestotnik, S., Evans, R., Lloyd, J., & Burke, J. (1997). Adverse drug events in hospitalized patients: Excess length of stay, extra costs, and attributable mortality. *Journal of American Medical Association*, 277, 301-306.

Cousins, D., Dewsbury, C., Mathew, L., Nesbitt, I., & Warner, B. (2007). Safety in doses: Medication safety incidents in the NHS. *National Patients Safety Agency, London*.

Institute of Medicine. (2000). To err is human: Building a safer healthcare system. National Academy Press, Washington, DC.

Institute of Medicine of the National Academies. (2007). Preventing medication errors. Washington DC: The National Academies Press.

National Medicines Information Centre. (2001). NMIC bulletin on medication errors., 7(3) (1-4).

Schelbred, A., & Nord, R. (2007). Nurses' experiences of drug administration. *Journal of Advanced Nursing*, *60*(3), 317-326.

Treiber, L. A., & Jones, J. H. (2010). Devastatingly human: An analysis of registered nurses' medication error accounts. *Qualitative Health Research*, *20(10)*, 1327-1342.

Joint Commission on Accreditation of Healthcare Organizations. (2006). National patient safety goals. Retrieved from http://www.jcaho.org/PatientSafety/NationalPatientSafetyGoals/npsg

Joolaee, S., Hajibabaee, F., Peyrovi, H., Haghani, H., & Baharani, N. (2011). The relationship between incidence and report of medication errors and working conditions. *Clinical Issues*, 37-44.

Rand Health. (2005). Assessment of the national patient safety initiative: Context and baseline evaluation report 1. Santa Monica, CA: Rand Corporation.

Vogelsmeier, A., Scott-Cawiezell, J., Miller, B., & Griffith, S. (2010, October-December). Influencing Leadership Perceptions of Patient safety Through Just Culture Training. *Journal of Nursing Care Quality*, 25(4), 288-294.

Abstract Summary:

Participants will appreciate the importance of nurses' responsibility in medication administration process, and the accountability towards patients (first victim) and self (second victim) in terms of error/s occurrences. Additionally, participants will be encouraged to delve deeper for a just rationale, create a clinical culture of support for nurses, educate students accordingly.

Content Outline:

Introduction: One of the key roles of providing safe quality care to patients is safe medication administration. Nurses understand that safe medication administration is an individual responsibility and that the accountability ultimately rests with the person who administers the medication. It is noteworthy that the specifics of accurate medication administration are well embedded not only in nursing education but also in the nursing profession and explicitly understood by practicing nurses. Nurses are usually apprehensive of committing medication errors due to the fear of violating the ethical aspect of non-maleficence in terms of patient welfare and

as a potential threat to self in terms of blame, loss of a position and more. Nonetheless, one must understand that despite the error occurrences, nurses continue to care for patients and simultaneously deal with their personal feelings on a daily basis. Research indicates that these errors may have a devastating effect on those nurses who are involved in making one or more medication errors and therefore, may be considered second victims. Safety of patients has been and continues to be a matter of concern for nurse leaders and organizational leaders. To this end more than a decade ago, the Institute of Medicine (IOM) started a movement by releasing their first report entitled 'To Err Is Human: Building a Safer Healthcare System'. This report initially called attention to the high rates of negative patient outcomes, some of which cost the patients their lives. Research and subsequent IOM reports over a period of time have highlighted that medication errors are the leading and the most common predictable cause for adverse events in healthcare facilities of which, administration errors are the most common identifiable medical errors in the USA.

Background: It is evidence based through research that perceptions regarding patient safety and/or how to build a safe environment for patients in healthcare facilities vary among healthcare organizations. This is related to evidence which suggests that different viewpoints exist amongst leaders and staff nurses in relation to culture of safety in organizations. It is also known that making errors is a part of the human experience and nurses as human beings may commit medication errors, as do other health professionals. There has been a long-standing history of the culture of blame where individual practitioners were and may still be held accountable for errors or near misses. This inadvertently leads to concealing and/or failure to report errors for fear of repercussions such as criticism by peers /superiors, disciplinary action or termination from their work. Therefore, to afford a positive change and establish just culture, there is a need to reflect upon the processes leading to the error rather than blaming individual nurses who committed the error.

According to a study published in the United States about medical errors, annual deaths from medication errors accounted for 7000 out of the total number of 48,000–98,000 deaths due to drug complications. Due to the high incidence in medical errors, the Agency for Healthcare Research and Quality (AHRQ) was designated to forge a patient safety research and development initiative to assist health care personnel to reduce the incidence of errors and improve patient outcomes. The Joint Commission on Accreditation of Healthcare Organizations (JCAHO) developed the first National Patient Safety Goals (NPSG) to assist healthcare organizations to improve patient safety. There were six goals developed initially of which three goals specifically addressed medication safety.

Literature reviewed provides evidence that medication errors occur frequently in hospitals, and may not only be fatal for patients but may increase the cost of care which impacts healthcare facilities at large. Studies conducted in various hospitals indicate that about 2% of patients experience preventable adverse drug events (ADEs). These ADEs increase the hospital costs by approximately \$4,700 per admission or nearly \$2.8 million annually for a 700-bedded teaching hospital and if these findings could be generalized then the preventable ADEs are costing the country approximately \$2 billion per year. Furthermore, a study that reviewed admissions in a large teaching hospital from 1990-1993 indicated that 2.43 of the admissions out of 100 admissions were complicated due to an ADE which led to an increase in the length of stay (LOS) of these patients by 1.91 days escalating the cost to the hospital by \$2, 262. In addition to increasing the hospital cost, ADEs (some of which are a direct result of medication errors) may also be significant in contributing toward the indirect costs for loss of productivity, disability and other costs related to care. Meanwhile, due to underreporting, medication errors are often undetected and may lead to inaccurate accounts of medication errors, which may result in inaccurate documentation and/or lower numbers of medication errors being reported.

Despite multiple efforts made by healthcare facilities and organizational leaders to reduce the incidence of medication errors, administration errors to this day account for approximately 59% of all medication errors and one out of every three adverse drug event (ADE) is related to medication errors. Therefore, a descriptive phenomenological research study to understand the meaning of the lived experiences of those nurses who committed medication errors and to gain insight and prevent further medication errors was conducted.

Conclusion: Research suggests that even though healthcare organizations have diligently worked towards improvement of existing systems, medication errors are the highest among all medical errors of which administration errors continue to be the highest among all medication error occurrences. This poses a vital question which calls for the organizational and nursing leaders to delve beyond the surface to identify the concrete causes of medication errors that exist within individual organizational setups and develop unique ways to resolve these issues. This study identifies important issues that are relevant to medication errors and recommends ways to reduce medication error incidents through the description of lived experiences of nurses that were involved in medication error occurrences for a safer patient care environment. This study may also provide a framework to assist, develop and support professional growth in those nurses who have made medication errors. This study aimed to ultimately build upon the existing research on medication errors and inform the body of knowledge related to this area of nursing science, to improve nursing practice, enhance nursing education and influence nursing policy.

First Primary Presenting Author

Primary Presenting Author

Seema Lall, PhD Long Island University Harriet Rothkopf Heilbrunn School of Nursing Assistant Professor of Nursing Brooklyn NY USA

Professional Experience: Certified medical surgical nurse. Previous work Experience (India): OR nurse 1 year. Public Health nurse 1 year. Nurse educator 4 years. Work experience in the USA: bedside medical surgical nurse (15 years)1992-2007. OR nurse NYU (1 year) 2007-2008. Nurse Manager Mount Sinai hospital (1 year) 2008-2009. Nurse Educator Long Island University (9 years) 2009-present. Nurse Educator Saint Paul's school of Nursing (5 years) 2010-2015.

Author Summary: Dr. Lall is a registered nurse of 32 years, having practiced in India and United States. She started her career in the USA as a bedside medical-surgical nurse at Victory Memorial hospital, Brooklyn, NY. She also worked as an OR at NYU Medical Center, NY and a Nurse Manager at Mount Sinai hospital, NY. Dr. Lall finally entered academia in 2009 and is currently a Professor of Nursing at Long Island University Brooklyn, NY.