EUROPEAN JOURNAL OF BIOMEDICAL AND PHARMACEUTICAL SCIENCES
http://www.ejbps.com

ISSN 2349-8870
Volume: 11
Issue: 1
61-62
Year: 2024

EMPHASIZING THE IMPORTANCE AND IMPLEMENTATION OF PRESCRIPTION AUDITS IN HOSPITAL

[1]Dr. Shazia Naaz and [2]*Dr. Lakshmi Jyothi

[1]Assistant Professor, Department of Microbiology, ESIC Medical College and Hospital, Hyderabad.
[2]M.D. (Micro), Additional Professor, Department of Microbiology, AIIMS Bibinagar.

***Corresponding Author: Dr. Lakshmi Jyothi**
M.D. (Micro), Additional Professor, Department of Microbiology, AIIMS Bibinagar.

Article Received on 26/10/2023 **Article Revised on 17/11/2023** **Article Accepted on 07/12/2023**

ABSTRACT
Prescription audits in hospital settings play a vital role in clinical governance by ensuring the appropriate use of medications, enhancing patient safety, and optimizing therapeutic outcomes. This mini-review highlights the significance of prescription audits in identifying prescribing patterns, discrepancies, and areas for improvement. Medication errors, with a global cost estimated at $42 billion annually, underscore the importance of these audits. Implementation involves defining criteria for appropriate medication use, collecting, and analysing data, and implementing interventions, leading to improved prescribing practices. Prescription audits have been effective in reducing unnecessary antibiotic use and combating antimicrobial resistance. Clinical pharmacists play a crucial role in enhancing audit efficacy, and bridging theory and practice. The integration of technology, such as electronic health records and clinical decision support systems, further enhances the audit process. This mini-review emphasizes the indispensable role of prescription audits in patient care and calls for their diligent implementation and continual evolution in healthcare institutions to elevate medication safety and efficacy.

KEYWORDS: Prescription, Medication errors, Prescription Audits, Clinical Microbiologists, Clinical pharmacists, antimicrobial resistance.

MINI REVIEW

Prescription audits in hospital settings are a crucial component of clinical governance, aimed at ensuring the appropriate use of medications, enhancing patient safety, and optimizing therapeutic outcomes. These audits are defined as systematic evaluations of the prescribing, administering, and monitoring of medications within healthcare institutions. They serve to identify patterns, discrepancies, and opportunities for improvement in prescribing practices.

The importance of prescription audits is underscored by a wealth of literature pointing to the prevalence of medication errors and their impact on patient safety. According to a study by the World Health Organization (WHO), the global cost associated with medication errors has been estimated at $42 billion annually (WHO, 2017). Furthermore, Bates et al. (1995) highlighted that serious medication errors occur in approximately 2% of hospital admissions, with 7% of those having the potential to cause significant harm.

Implementation of prescription audits involves several steps: defining criteria for appropriate medication use, collecting and analysing prescribing data, and then implementing interventions based on these findings. The audit and feedback loop are described as a powerful tool by Ivers et al. (2012), who found that it can lead to moderate improvements in prescribing practices.

In practice, prescription audits have been found to improve the quality of prescribing, as evidenced by a reduction in the use of unnecessary antibiotics, thereby combating antimicrobial resistance (AMR) – a significant global health concern. Davey et al. (2017) conducted a systematic review and found that interventions, including audits and feedback, reduced the incidence of inappropriate prescriptions and the duration of antibiotic therapy.

However, the effectiveness of prescription audits can be hindered by several factors, such as the lack of standardization in audit processes and the underutilization of clinical pharmacists who are key in conducting these audits. Kaboli et al. (2006) emphasize the role of clinical pharmacists in improving medication use through direct involvement in medication therapy management and patient care, which enhances the audit process.

Incorporating technology, such as electronic health records (EHRs) and clinical decision support systems (CDSS), has been proposed to bolster the prescription audit process. EHRs facilitate the collection of prescribing data, while CDSS can provide real-time alerts and guidelines to prescribers. Ojeleye et al. (2013) suggest that these technologies when integrated with prescription audits, can lead to significant improvements in medication safety.

In summing up this mini-review, it is unequivocally clear that prescription audits hold a paramount role in the echelons of hospital settings. The meticulous process of auditing not only serves as a sentinel in the safeguarding of patient safety but also as a beacon guiding the optimization of therapeutic outcomes. With the potential to significantly reduce medication errors, a primary adversary in patient care, prescription audits are no less than a cornerstone in the edifice of clinical governance.

The incorporation of clinical pharmacists and Clinical Microbiologists into the audit teams enhances the efficacy of these audits, bringing to the table specialized knowledge that bridges the gap between theory and practice. The integration of ePrescription audits further amplifies this effect, harnessing technology to streamline processes, pre-empt potential errors, and pave the way for a new era of precision in medication management.

However, the true effectiveness of prescription audits is not inherent but rather contingent upon meticulous implementation, which demands commitment, interdisciplinary collaboration, and continual refinement of practices. As hospitals strive for excellence in healthcare delivery, the role of prescription audits becomes increasingly crucial, transcending beyond a mere procedural obligation to a fundamental component of patient care.

Thus, as this mini-review elucidates, the diligent implementation of prescription audits is indispensable. It is a clarion call to action for healthcare institutions to embrace, institutionalize, and continually evolve prescription audit systems. In doing so, hospitals will not only uphold the highest standards of patient care but will also forge a path toward an era of enhanced medication safety and efficacy, where the risk of harm is minimized, and the quality of care is perpetually elevated.

REFERENCES

1. World Health Organization. (2017). Medication Without Harm - WHO Global Patient Safety Challenge.
2. Bates, D. W., Cullen, D. J., Laird, N., et al. (1995). Incidence of adverse drug events and potential adverse drug events. JAMA.
3. Ivers, N., Jamtvedt, G., Flottorp, S., et al. (2012). Audit and feedback: effects on professional practice and healthcare outcomes. Cochrane Database Syst Rev.
4. Davey, P., Marwick, C. A., Scott, C. L., et al. (2017). Interventions to improve antibiotic prescribing practices for hospital inpatients. Cochrane Database Syst Rev.
5. Kaboli, P. J., Hoth, A. B., McClimon, B. J., et al. (2006). Clinical pharmacists and inpatient medical care: A systematic review. Arch Intern Med.
6. Ojeleye, O., Avery, A., Gupta, V., et al. (2013). The evidence for the effectiveness of safety alerts in electronic patient medication record systems at the point of pharmacy order entry: a systematic review. BMC Med Inform Decis Mak.