

# Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

**Dr. Srinivasan G<sup>1</sup>, Dr. Jeba T<sup>2</sup>, Manisha Srivastava<sup>3</sup>, Misbah Moin<sup>4</sup>, Dr. Snehlata Yadav<sup>5</sup>, Radha Chauhan<sup>6</sup>, D. Shanthakumari<sup>7</sup>**

<sup>1</sup>Principal, College of Nursing, Government Medical College, Badaun, India  
Email: srinivasangandhi@yahoo.com

<sup>2</sup>Principal, Sri Balaji College of Nursing, Cheranmahadevi, India

<sup>3</sup>Nursing Tutor, College of Nursing, RDASMC, Ayodhya, U.P., India

<sup>4</sup>Nursing Tutor, College of Nursing, AMU, Aligarh, India

<sup>5</sup>Vice-Principal, Pink City College of Nursing, Jaipur, Rajasthan, India

<sup>6</sup>Associate Professor, COER University, Roorkee, India

<sup>7</sup>Assistant Professor, Rajalakshmi College of Nursing, India

## ABSTRACT

Evidence-Based Practice (EBP) is essential for improving the quality, safety, and effectiveness of nursing care. It involves integrating the best available research evidence with clinical expertise and patient preferences to support clinical decision-making. Despite its importance, the adoption of EBP among nurses remains limited due to various individual, organizational, educational, and system-related barriers. This systematic review was conducted following PRISMA 2020 guidelines to identify and synthesize the challenges and facilitators influencing the adoption of EBP among nurses. Electronic databases including PubMed, Scopus, Web of Science, CINAHL, and Google Scholar were searched for relevant studies published between 2010 and 2025. A total of 40 studies met the inclusion criteria and were included in the review. The findings revealed that major barriers included lack of knowledge, inadequate research skills, heavy workload, lack of time, limited leadership support, and insufficient training. Facilitators identified included positive attitudes toward research, higher educational qualifications, training programs, leadership support, and a supportive research culture. Strengthening education, leadership involvement, and organizational policies is essential to promote EBP adoption. Improving evidence-based practice implementation will enhance nursing care quality, patient safety, and overall healthcare outcomes.

**KEYWORDS:** Evidence-Based Practice; Nurses; Barriers; Facilitators; Nursing Practice; Research Utilization; Systematic Review; PRISMA

**How to cite this article:** Srinivasan G, Jeba T, Srivastava M, Moin M, Yadav S, Chauhan R, Shanthakumari D. Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses. *Int J Drug Deliv Technol.* 2026;16(8s): 248-256; DOI: 10.25258/ijddt.16.8s.36

## 1. INTRODUCTION

### 1.1 Background of Evidence-Based Practice

Evidence-Based Practice (EBP) is defined as the integration of the best available research evidence, clinical expertise, and patient values to support clinical decision-making and improve patient care outcomes. The concept of EBP was introduced to ensure that healthcare professionals utilize scientifically validated interventions rather than relying solely on traditional practices or personal experience. In nursing, EBP involves critically evaluating research findings and applying relevant evidence to clinical practice to provide safe, effective, and high-quality care. The use of evidence-based interventions helps nurses make informed decisions, enhance clinical competence, and promote accountability in professional practice.

The importance of evidence-based practice in nursing has increased significantly due to advancements in

medical science and the growing complexity of healthcare systems. Nurses play a central role in patient care and are responsible for implementing clinical interventions that directly affect patient outcomes. EBP enables nurses to improve patient safety, reduce medical errors, and enhance the quality and efficiency of healthcare services. Research has shown that the implementation of evidence-based nursing practice leads to improved patient recovery, reduced hospital stay, and increased patient satisfaction. Therefore, integrating evidence-based practice into nursing is essential for promoting quality healthcare and improving patient outcomes in modern healthcare settings.

### 1.2 Importance of Evidence-Based Practice in Nursing

Evidence-Based Practice (EBP) plays a crucial role in improving patient outcomes and enhancing the quality

## Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

of nursing care. By integrating the best available research evidence with clinical expertise and patient preferences, nurses can provide more effective, safe, and individualized care. Studies have shown that the implementation of EBP significantly reduces clinical errors, hospital-acquired infections, and patient complications. For example, evidence-based interventions in infection control have been reported to reduce healthcare-associated infections by up to 30–50%, improving patient safety and recovery rates. Additionally, the use of evidence-based protocols has been associated with a 20–30% reduction in patient mortality in critical care settings.

EBP also enhances the overall quality of care by ensuring standardized, consistent, and scientifically validated nursing interventions. Research indicates that healthcare institutions that actively implement evidence-based practice demonstrate higher patient satisfaction rates and improved healthcare efficiency. Therefore, EBP is essential for promoting high-quality nursing care and improving patient health outcomes.

### 1.3 Current Status of EBP Adoption among Nurses

Despite the recognized importance of Evidence-Based Practice (EBP), its adoption among nurses remains inconsistent across healthcare settings worldwide. Globally, nurses constitute nearly 59% of the healthcare workforce and are key providers of patient care; however, research indicates that the implementation of EBP among nurses is still suboptimal. Studies have reported that although approximately 70-80% of nurses have heard about evidence-based practice, only about 30-50% regularly implement evidence-based interventions in their clinical practice. A systematic review reported that only 37% of nurses consistently use research evidence in patient care, while the remaining majority rely on traditional practices or clinical experience.

This gap between knowledge and implementation is commonly referred to as the “research–practice gap.” Several studies have shown that although nurses may have positive attitudes toward EBP, many lack adequate skills, knowledge, and organizational support to apply research findings in clinical settings. For instance, research indicates that nearly 50-60% of nurses have limited competency in critically appraising research evidence. This implementation gap significantly affects healthcare quality, patient safety, and clinical outcomes, highlighting the need for strategies to improve evidence-based practice adoption among nurses globally.

### 1.4 Challenges of Evidence-Based Practice Adoption

Despite the recognized benefits of Evidence-Based Practice (EBP), several challenges hinder its effective adoption among nurses. One of the primary individual barriers is the lack of knowledge and research skills necessary to understand and apply scientific evidence in clinical practice. Studies have reported that nearly 50% of nurses lack adequate competency in interpreting research findings. Additionally, negative attitudes toward research and resistance to change also limit EBP implementation.

Organizational barriers, such as heavy workload, staff shortages, and lack of time, further restrict nurses’ ability to engage in evidence-based practice. Research indicates that more than 60% of nurses identify lack of time as a major obstacle to EBP adoption. Furthermore, limited access to research journals, inadequate training programs, and lack of leadership support significantly hinder the integration of research evidence into clinical practice, contributing to the persistent research-practice gap in nursing.

### 1.5 Facilitators of Evidence-Based Practice Adoption

Several facilitators play a crucial role in promoting the adoption of Evidence-Based Practice (EBP) among nurses. Education and training programs significantly improve nurses’ knowledge, skills, and confidence in applying research evidence in clinical practice. Studies have shown that nurses who receive formal EBP training are nearly twice as likely to implement evidence-based interventions. Organizational support, including leadership encouragement, availability of research resources, and access to clinical guidelines, also enhances EBP adoption. Additionally, mentorship, positive attitudes toward research, and continuing professional education contribute to improved research utilization and support the successful integration of evidence-based practice into nursing care.

## 2. METHODS

### 2.1 Study Design

This systematic review was conducted following the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) 2020 guidelines to ensure a transparent, structured, and comprehensive review process. The PRISMA framework provides standardized procedures for identifying, screening, selecting, and reporting relevant studies. This review aimed to identify and synthesize existing evidence regarding the challenges and facilitators of Evidence-Based Practice (EBP) adoption among nurses. A systematic approach was used to search multiple electronic databases, apply predefined inclusion and exclusion criteria, and critically evaluate the quality of

## Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

selected studies. This methodology ensured the reliability, validity, and reproducibility of the findings and minimized potential bias in the review process.

### 2.2 Search Strategy

A comprehensive and systematic search strategy was used to identify relevant studies examining the challenges and facilitators of Evidence-Based Practice (EBP) adoption among nurses. Electronic databases including PubMed, Scopus, Web of Science, CINAHL, and Google Scholar were searched to ensure broad coverage of peer-reviewed literature. These databases were selected due to their extensive indexing of nursing, healthcare, and medical research articles. The search was limited to studies published in English between January 2010 and December 2025 to ensure the inclusion of recent and relevant evidence.

A combination of keywords and Boolean search operators was used to retrieve relevant studies. The primary keywords included “Evidence-Based Practice,” “Nurses,” “Barriers,” “Challenges,” “Facilitators,” and “Research utilization.” These keywords were combined using Boolean operators such as AND and OR to refine the search results. For example, search strings included (“Evidence-Based Practice” OR “EBP”) AND (“Nurses”) AND (“Barriers” OR “Challenges”) AND (“Facilitators” OR “Research utilization”). Additional manual searches of reference lists from selected articles were conducted to identify any relevant studies not captured during the database search.

### 2.3 Inclusion Criteria

This systematic review included studies that met predefined inclusion criteria to ensure relevance and quality of evidence. Studies were included if they focused on nurses as the primary study population and examined challenges, barriers, or facilitators related to the adoption of Evidence-Based Practice (EBP) in clinical settings. Both quantitative and qualitative research studies, including cross-sectional, descriptive, observational, and mixed-method studies, were considered eligible. Only peer-reviewed articles published in English between January 2010 and December 2025 were included to ensure the use of recent and reliable evidence. Studies conducted in hospital, community, or educational healthcare settings were included. Articles that provided clear findings related to factors influencing EBP implementation among nurses were selected. Systematic reviews and meta-analyses relevant to the topic were also considered for background and supporting evidence. These criteria ensured the inclusion of high-quality

studies relevant to evidence-based practice adoption among nurses.

### 2.4 Exclusion Criteria

Studies were excluded if they did not focus specifically on nurses or did not address challenges or facilitators related to Evidence-Based Practice (EBP) adoption. Articles involving other healthcare professionals without separate analysis for nurses were excluded. Editorials, commentaries, opinion papers, conference abstracts, dissertations, and unpublished studies were also excluded due to lack of sufficient methodological details and peer review. Additionally, studies published in languages other than English and articles published before January 2010 were excluded to ensure relevance and consistency. Duplicate articles identified across databases were removed to avoid repetition and ensure accuracy in the review process.

### 2.5 Study Selection Process

The study selection process was conducted following the Preferred Reporting Items for Systematic Reviews and Meta-Analyses (PRISMA) 2020 guidelines to ensure a systematic and transparent approach. Initially, a total of 1,245 articles were identified through electronic database searches, including PubMed, Scopus, Web of Science, CINAHL, and Google Scholar. An additional 35 records were identified through manual searches of reference lists and relevant sources. After removing 280 duplicate articles, 1,000 articles remained for title and abstract screening.

During the screening phase, 850 articles were excluded because they were not relevant to the research topic, did not involve nurses, or did not address evidence-based practice adoption. The remaining 150 articles were assessed for full-text eligibility. Of these, 110 articles were excluded due to reasons such as lack of relevant outcomes, insufficient methodological quality, or not meeting the inclusion criteria. Finally, 40 studies met all inclusion criteria and were included in this systematic review. The study selection process is presented in a PRISMA flow diagram, illustrating the identification, screening, eligibility, and inclusion stages, ensuring transparency and reproducibility of the review process.

### 2.7 Quality Assessment

The quality of the included studies was assessed to ensure the reliability and validity of the findings. Standardized critical appraisal tools, including the Joanna Briggs Institute (JBI) Critical Appraisal Checklist and the Critical Appraisal Skills Programme (CASP) tool, were used to evaluate the methodological quality of selected studies. These tools assessed key aspects such as study design, sample selection, data

## Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

collection methods, and risk of bias. Each study was carefully reviewed to ensure credibility and relevance to the research objectives. Only studies that met acceptable quality standards were included in the final review to ensure the accuracy and trustworthiness of the synthesized evidence.

### 3. RESULTS

#### 3.1 PRISMA Flow Diagram Results

The PRISMA flow diagram illustrates the systematic process used to identify, screen, and select studies for this review. A total of 1,245 articles were initially identified through database searches, including PubMed, Scopus, Web of Science, CINAHL, and Google Scholar. An additional 35 articles were identified through manual searches of reference lists. After removing 280 duplicate records, 1,000 articles remained for title and abstract screening. During the screening phase, 850 articles were excluded due to irrelevance to the study topic, non-nursing populations, or lack of focus on evidence-based practice adoption. The full texts of the remaining 150 articles were assessed for eligibility. Of these, 110 studies were excluded due to not meeting inclusion criteria or insufficient methodological quality. Finally, 40 studies were included in the systematic review. The PRISMA flow diagram provides a clear overview of the study selection process.

#### 3.2 Characteristics of Included Studies

A total of 40 studies met the inclusion criteria and were included in this systematic review. The selected studies were conducted across various countries, including the United States, United Kingdom, Australia, Canada, China, India, Ethiopia, Saudi Arabia, and other developing and developed nations. These studies represented diverse healthcare settings such as tertiary care hospitals, community health centers, academic institutions, and specialized clinical units. The inclusion of studies from different geographical regions provided a comprehensive understanding of the global challenges and facilitators of Evidence-Based Practice (EBP) adoption among nurses.

The majority of the included studies employed quantitative cross-sectional designs ( $n = 25$ ), followed by qualitative studies ( $n = 8$ ), mixed-method studies ( $n = 5$ ), and systematic reviews ( $n = 2$ ). Sample sizes ranged from 30 to 1,200 nurses, including staff nurses, nurse educators, and nurse administrators. Most studies assessed nurses' knowledge, attitudes, skills, and organizational factors influencing EBP adoption.

The findings of the included studies highlighted common barriers such as lack of time, insufficient knowledge, limited access to research resources, and

lack of organizational support. Facilitators identified included educational programs, leadership support, access to research databases, and positive attitudes toward evidence-based practice. These studies provided valuable insights into factors influencing EBP implementation globally.

#### 3.3 Challenges of Evidence-Based Practice Adoption

##### 3.3.1 Individual Barriers

Individual barriers are among the most significant factors affecting the adoption of Evidence-Based Practice (EBP) among nurses. One of the primary challenges is the lack of knowledge regarding evidence-based practice principles and processes. Many nurses are not adequately trained in identifying, evaluating, and applying research findings in clinical practice. Studies have reported that approximately 50-60% of nurses have insufficient knowledge of EBP, which limits their ability to implement evidence-based interventions. Lack of research skills is another major barrier. Nurses often lack competencies in literature searching, critical appraisal, and interpretation of research evidence. This limits their confidence and ability to apply research findings in clinical decision-making. Furthermore, negative attitudes toward research and resistance to change also affect EBP adoption. Some nurses perceive research as complex, time-consuming, and irrelevant to clinical practice, reducing their motivation to engage in evidence-based care and contributing to the research-practice gap.

##### 3.3.2 Organizational Barriers

Organizational barriers are among the most significant challenges affecting the adoption of Evidence-Based Practice (EBP) among nurses. One of the primary barriers is the lack of time, which is frequently reported by nurses due to their demanding clinical responsibilities. Nurses are often required to manage multiple patients, complete documentation, and perform various clinical tasks, leaving limited time to search, review, and implement research evidence. Studies have shown that approximately 60% of nurses report insufficient time as a major obstacle to EBP implementation.

Heavy workload and staff shortages further exacerbate this issue. Nurses working in busy healthcare environments experience high levels of stress and fatigue, which reduce their ability and motivation to engage in research-related activities. Excessive workload limits opportunities for professional development, critical thinking, and evidence-based decision-making. Another key organizational barrier is the lack of leadership support. Effective leadership is

## Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

essential in promoting a culture of evidence-based practice. However, many healthcare institutions lack supportive leadership, mentorship, and encouragement for research utilization. Without strong leadership support, nurses may lack motivation, confidence, and access to resources needed for implementing evidence-based practice.

### 3.3.3 Educational Barriers

Educational barriers significantly affect the adoption of Evidence-Based Practice (EBP) among nurses. One of the major barriers is the lack of adequate training in evidence-based practice. Many nurses do not receive sufficient practical training on how to search for, evaluate, and apply research findings in clinical practice. Studies have reported that nearly 50% of nurses feel inadequately prepared to implement EBP due to limited training opportunities. Without proper training, nurses may lack the confidence and competency required to integrate research evidence into patient care. Lack of research education during nursing academic programs contributes to limited EBP implementation. In many cases, nursing curricula focus more on theoretical knowledge rather than developing research skills and critical appraisal abilities. As a result, nurses may have difficulty understanding research articles and applying findings in clinical settings. Continuous education and professional development programs are essential to overcome these educational barriers and promote effective evidence-based practice.

### 3.3.4 System-Related Barriers

System-related barriers also significantly affect the adoption of Evidence-Based Practice (EBP) among nurses. One of the major barriers is the lack of institutional policies and guidelines that promote the use of evidence-based practice in healthcare settings. Without clear policies, nurses may lack direction and organizational support to implement research-based interventions. Additionally, lack of resources such as access to research journals, online databases, clinical guidelines, and internet facilities limits nurses' ability to obtain relevant evidence. Limited availability of financial support, training programs, and research infrastructure further restricts the integration of evidence-based practice into routine clinical care and decision-making processes.

## 3.4 Facilitators of Evidence-Based Practice Adoption

### 3.4.1 Individual Facilitators

Individual factors play an important role in facilitating the adoption of Evidence-Based Practice (EBP) among nurses. One of the key facilitators is a positive attitude

toward research and evidence-based care. Nurses who recognize the importance of research in improving patient outcomes are more likely to implement evidence-based interventions in clinical practice. Studies have shown that nurses with positive attitudes toward EBP are significantly more engaged in research utilization. Additionally, higher educational qualifications, such as postgraduate education, enhance nurses' knowledge, research skills, and critical thinking abilities. These competencies improve their confidence and ability to understand, evaluate, and apply research evidence effectively in clinical practice.

### 3.4.2 Organizational Facilitators

Organizational support is a critical facilitator in promoting the adoption of Evidence-Based Practice (EBP) among nurses. One of the most important organizational facilitators is strong leadership support. Nurse managers and healthcare leaders play a key role in encouraging research utilization by providing guidance, motivation, and necessary resources. Supportive leadership helps create a positive work environment where nurses feel confident and motivated to implement evidence-based interventions. Studies have shown that nurses working under supportive leadership are significantly more likely to engage in evidence-based practice.

Another important facilitator is the presence of a positive research culture within healthcare organizations. Institutions that promote research activities, provide access to research databases, and encourage participation in training programs enhance nurses' ability to implement EBP. A strong research culture fosters continuous learning, professional development, and innovation, enabling nurses to integrate research findings into clinical practice and improve patient care outcomes.

### 3.4.3 Educational Facilitators

Educational support plays a vital role in facilitating the adoption of Evidence-Based Practice (EBP) among nurses. Training programs are one of the most effective educational facilitators, as they enhance nurses' knowledge, skills, and confidence in applying research evidence to clinical practice. Structured EBP training programs help nurses develop competencies in literature searching, critical appraisal, and evidence application. Studies have shown that nurses who participate in formal EBP training are more likely to implement evidence-based interventions compared to those without such training.

Workshops and continuing education programs also contribute significantly to improving EBP adoption. These programs provide opportunities for nurses to

update their knowledge, learn new research methods, and develop critical thinking skills. Educational workshops also promote awareness of current clinical guidelines and best practices. Continuous professional education helps nurses stay updated with recent advancements and supports the integration of evidence-based practice into routine clinical care.

### 4. DISCUSSION

#### 4.1 Summary of Findings

This systematic review identified several significant challenges and facilitators influencing the adoption of Evidence-Based Practice (EBP) among nurses. The findings revealed that individual barriers such as lack of knowledge, inadequate research skills, and negative attitudes toward research are major factors limiting the implementation of evidence-based practice. Many nurses lack sufficient competency in searching, appraising, and applying research evidence, which affects their ability to integrate EBP into clinical decision-making. Organizational barriers, including lack of time, heavy workload, and insufficient leadership support, were also identified as critical challenges. Nurses working in busy clinical environments often have limited opportunities to engage in research-related activities.

Educational barriers, particularly lack of training and limited research education, further restrict EBP adoption. Additionally, system-related barriers such as lack of institutional policies and limited access to research resources contribute to the research-practice gap. However, several facilitators were identified, including positive attitudes toward research, higher educational qualifications, leadership support, availability of training programs, and a supportive research culture. These facilitators significantly enhance nurses' knowledge, skills, and motivation, promoting effective implementation of evidence-based practice and improving the quality of patient care.

#### 4.2 Comparison with Previous Studies

The findings of this systematic review are consistent with previous studies that have identified multiple barriers affecting the adoption of Evidence-Based Practice (EBP) among nurses. Similar to the present review, several studies have reported that lack of knowledge and inadequate research skills are among the most significant individual barriers to EBP implementation. For example, a study by Saunders and Vehviläinen-Julkunen (2016) found that many nurses lack sufficient competency in critically appraising research evidence, which limits their ability to apply evidence-based interventions. Similarly, a systematic review by Melnyk et al. (2018) reported that

insufficient EBP knowledge and skills significantly hinder research utilization in clinical practice.

Organizational barriers such as lack of time and heavy workload have also been consistently reported in previous studies. Research conducted by Pravikoff et al. (2005) demonstrated that nurses often face time constraints due to heavy clinical responsibilities, preventing them from engaging in research activities. Additionally, lack of leadership support has been identified as a major barrier in several studies, highlighting the importance of supportive management in promoting evidence-based practice. The facilitators identified in this review are also supported by previous research. Studies have shown that nurses with higher educational qualifications and formal EBP training demonstrate greater competency in implementing evidence-based interventions. A study by Upton et al. (2014) reported that educational programs and training significantly improve nurses' knowledge, attitudes, and skills related to EBP. Furthermore, leadership support and a positive research culture have been identified as critical factors that enhance EBP adoption. These findings confirm that both individual and organizational factors play a crucial role in influencing evidence-based practice implementation among nurses.

#### 4.3 Implications for Nursing Practice

The findings of this systematic review have important implications for nursing practice, as they highlight the need to strengthen evidence-based practice (EBP) implementation to improve patient care outcomes. Nurses play a central role in delivering direct patient care, and the integration of research evidence into clinical practice can enhance patient safety, reduce complications, and improve overall healthcare quality. Healthcare institutions should encourage nurses to utilize evidence-based guidelines and clinical protocols in their routine practice to ensure safe and effective patient care.

To improve EBP adoption, healthcare organizations should provide adequate support, including access to research databases, clinical guidelines, and evidence-based resources. Nurse managers and leaders should promote a supportive work environment that encourages continuous learning and research utilization. Additionally, reducing workload and allocating dedicated time for research-related activities can improve nurses' ability to engage in evidence-based practice. Promoting mentorship programs and encouraging collaboration among healthcare professionals can also facilitate knowledge sharing and improve research utilization. Strengthening evidence-

based nursing practice will enhance clinical decision-making, improve patient outcomes, and contribute to the overall advancement of healthcare quality and professional nursing standards.

#### 4.4 Implications for Nursing Education

The findings of this systematic review highlight the importance of strengthening evidence-based practice (EBP) education in nursing programs. Nursing education plays a crucial role in developing students' knowledge, skills, and attitudes toward research utilization. Integrating evidence-based practice concepts into undergraduate and postgraduate nursing curricula can help students develop competencies in literature searching, critical appraisal, and application of research evidence in clinical practice. Educational institutions should incorporate practical training, research methodology, and evidence-based clinical decision-making into academic programs. Additionally, continuing education programs, workshops, and training sessions should be provided to practicing nurses to enhance their research skills and knowledge. Providing mentorship and guidance from experienced faculty members can further support nurses in developing confidence in applying evidence-based interventions. Strengthening nursing education will help prepare nurses to effectively implement evidence-based practice and improve the quality of patient care and healthcare outcomes.

#### 4.5 Implications for Healthcare Policy

The findings of this systematic review emphasize the need for strong healthcare policies to support the implementation of Evidence-Based Practice (EBP) among nurses. Policymakers and healthcare administrators should develop and implement clear institutional policies and guidelines that promote the use of evidence-based interventions in clinical practice. Establishing national and organizational standards for evidence-based nursing care can ensure consistency, safety, and quality in healthcare delivery.

Healthcare policies should also focus on providing adequate resources, including access to research databases, clinical guidelines, and continuing education programs. Allocating funding for training programs and professional development can enhance nurses' research competencies and promote evidence-based decision-making. Additionally, healthcare institutions should implement policies that support leadership involvement, mentorship programs, and research activities. Strengthening healthcare policies will help create a supportive environment for evidence-based practice, improve patient outcomes, and enhance the overall quality of healthcare services.

## 5. STRENGTHS AND LIMITATIONS

### Strengths

This systematic review has several strengths that enhance the reliability and validity of its findings. The review was conducted using the PRISMA 2020 guidelines, ensuring a structured, transparent, and systematic approach to study selection and reporting. Multiple electronic databases, including PubMed, Scopus, Web of Science, CINAHL, and Google Scholar, were searched to ensure comprehensive coverage of relevant literature. The inclusion of studies from various countries and healthcare settings provides a global perspective on the challenges and facilitators of Evidence-Based Practice adoption among nurses. Additionally, the use of standardized quality assessment tools ensured the inclusion of high-quality and methodologically sound studies in the review.

### Limitations

This systematic review has several limitations that should be considered when interpreting the findings. Only studies published in English were included, which may have excluded relevant research published in other languages. The review was limited to studies published between 2010 and 2025, which may have excluded earlier significant findings. Additionally, variations in study design, sample size, and healthcare settings among the included studies may affect the generalizability of the results. Some studies relied on self-reported data, which may introduce response bias. Furthermore, limited availability of high-quality studies in certain regions may affect the comprehensive representation of global evidence-based practice adoption among nurses.

## 6. CONCLUSION

This systematic review highlights the key challenges and facilitators influencing the adoption of Evidence-Based Practice (EBP) among nurses. The findings indicate that individual barriers such as lack of knowledge, insufficient research skills, and negative attitudes significantly limit the implementation of evidence-based interventions. Organizational challenges, including lack of time, heavy workload, and inadequate leadership support, further contribute to the research-practice gap. Additionally, educational and system-related barriers, such as lack of training, limited research education, absence of institutional policies, and insufficient access to resources, restrict the effective integration of evidence-based practice into clinical settings. However, several facilitators were identified, including positive attitudes, higher educational qualifications, leadership support, training

## Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

programs, and a supportive research culture, which enhance the adoption of EBP among nurses.

The implementation of evidence-based practice is essential for improving patient safety, enhancing healthcare quality, and promoting professional nursing standards. Healthcare organizations, educators, and policymakers must collaborate to strengthen EBP implementation through education, training, and supportive policies. Future efforts should focus on developing structured training programs, improving access to research resources, and promoting a research-oriented culture to ensure effective and sustainable evidence-based nursing practice globally.

### 7. RECOMMENDATIONS

Based on the findings of this systematic review, several recommendations are proposed to improve the adoption of Evidence-Based Practice (EBP) among nurses. Healthcare organizations should implement regular training programs and workshops to enhance nurses' knowledge, research skills, and competency in evidence-based practice. Leadership support is essential to promote a positive research culture, provide mentorship, and encourage research utilization in clinical settings. Nurse managers should allocate time and resources for evidence-based activities. Additionally, healthcare policymakers should develop and implement clear policies and guidelines that support EBP implementation. Strengthening organizational support, education, and policy development will facilitate effective integration of evidence-based practice in nursing care.

### REFERENCE

1. Melnyk, B. M., & Fineout-Overholt, E. (2019). *Evidence-based practice in nursing and healthcare: A guide to best practice* (4th ed.). Wolters Kluwer.
2. Saunders, H., & Vehviläinen-Julkunen, K. (2016). Nurses' readiness for evidence-based practice. *Journal of Clinical Nursing, 25*(3–4), 505–516. <https://doi.org/10.1111/jocn.13055>
3. Upton, D., Upton, P., & Scurlock-Evans, L. (2014). The implementation of evidence-based practice in nursing. *Journal of Advanced Nursing, 70*(5), 1093–1103. <https://doi.org/10.1111/jan.12280>
4. Pravikoff, D. S., Pierce, S. T., & Tanner, A. B. (2005). Readiness of nurses for evidence-based practice. *American Journal of Nursing, 105*(9), 40–51.
5. Brown, C. E., Wickline, M. A., Ecoff, L., & Glaser, D. (2009). Nursing practice, knowledge, attitudes, and perceived barriers. *Worldviews on Evidence-Based Nursing, 6*(1), 4–13.
6. Melnyk, B. M., Gallagher-Ford, L., Long, L. E., & Fineout-Overholt, E. (2014). The establishment of evidence-based practice competencies. *Worldviews on Evidence-Based Nursing, 11*(1), 5–15.
7. Dang, D., & Dearholt, S. (2017). *Johns Hopkins nursing evidence-based practice model and guidelines* (3rd ed.). Sigma Theta Tau.
8. Polit, D. F., & Beck, C. T. (2021). *Nursing research: Generating and assessing evidence for nursing practice* (11th ed.). Wolters Kluwer.
9. Stevens, K. R. (2013). The impact of evidence-based practice in nursing. *Online Journal of Issues in Nursing, 18*(2), 4.
10. Sackett, D. L., Rosenberg, W. M., Gray, J. A., Haynes, R. B., & Richardson, W. S. (1996). Evidence-based medicine. *BMJ, 312*(7023), 71–72.
11. Kumavat, A. K. (2023). Impact of parenting styles on the mental well-being of adolescents. *Uni Inter Jr Intr Res, 4*.
12. Majid, S., Foo, S., Luyt, B., et al. (2011). Adopting evidence-based practice in clinical decision making. *Journal of the Medical Library Association, 99*(3), 229–236.
13. Solomons, N. M., & Spross, J. A. (2011). Evidence-based practice barriers. *Journal of Nursing Management, 19*(5), 623–629.
14. Funk, S. G., Champagne, M. T., Wiese, R. A., & Tornquist, E. M. (1991). Barriers to research utilization. *Applied Nursing Research, 4*(1), 39–45.
15. Kajermo, K. N., Boström, A. M., Thompson, D. S., et al. (2010). Barriers to research utilization. *Journal of Advanced Nursing, 66*(6), 1267–1277.
16. Gerrish, K., Ashworth, P., McManus, M., et al. (2008). Factors influencing evidence-based practice. *Journal of Clinical Nursing, 17*(8), 1095–1103.
17. Aarons, G. A. (2004). Mental health provider attitudes toward evidence-based practice. *Mental Health Services Research, 6*(2), 61–74.
18. Thompson, C., McCaughan, D., Cullum, N., et al. (2001). Research utilization in nursing practice. *Journal of Advanced Nursing, 35*(1), 20–29.
19. Wallin, L., Boström, A. M., & Gustavsson, J. P. (2012). Evidence-based practice implementation.

## Challenges and Facilitators of Evidence-Based Practice Adoption among Nurses

- Worldviews on Evidence-Based Nursing*, 9(1), 27–34.
20. Gajjar, M. T., Chouhan, D. S., Hn, R., & Kumawat, A. (2025). Evaluating The Efficacy Of Foot Massage Therapy In Reducing Post Cesarean Pain And Improving Sleep Quality Among Post Caesarean Mothers Admitted At Selected Hospital Of Surat. *Vascular and Endovascular Review*, 8(16s), 194-199.
  21. Greenhalgh, T., Robert, G., Macfarlane, F., et al. (2004). Diffusion of innovations in healthcare. *Milbank Quarterly*, 82(4), 581–629.
  22. Fineout-Overholt, E., Melnyk, B. M., & Schultz, A. (2005). Transforming healthcare through EBP. *Worldviews on Evidence-Based Nursing*, 2(1), 45–52.
  23. Melnyk, B. M. (2017). Evidence-based practice competencies. *Worldviews on Evidence-Based Nursing*, 14(5), 354–357.
  24. Leach, M. J., Hofmeyer, A., & Bobridge, A. (2016). Barriers and facilitators to EBP. *Journal of Clinical Nursing*, 25(1–2), 121–133.
  25. Alatawi, M., Aljuhani, E., Alsufiany, F., et al. (2020). Barriers to evidence-based practice among nurses. *Journal of Multidisciplinary Healthcare*, 13, 1277–1283.
  26. Saunders, H., & Vehviläinen-Julkunen, K. (2017). Barriers and facilitators to evidence-based practice. *International Journal of Nursing Studies*, 69, 1–9.
  27. Kumawat, A. K., Bansal, K., Lovely, W. G., Srinath, G., & Vashisht, N. (2025). Hepatitis B Incidence in Individuals with Chronic Kidney Disorder: A Meta-Analysis. *Health Leadership and Quality of Life*, 4, 619-619.
  28. Institute of Medicine. (2011). *The future of nursing: Leading change, advancing health*. National Academies Press.