

Systematic Literature Review on the usage of Mystery Shopping in Healthcare Industry

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Abstract- Particularly after the COVID-19 pandemic, the healthcare industry has encountered previously unheard difficulties, which has led to a review of service delivery and quality evaluation techniques in the healthcare sector as well. The creative use of mystery shopping, a method that has historically been employed in retail, to improve healthcare services is examined in this study. Mystery shopping exposes systematic disparities in healthcare access and quality, regulatory non-compliance, and hidden inefficiencies by mimicking patient experiences. This study highlights its function in assessing access to telemedicine, pointing out inequalities impacted by geography and socioeconomic position. This article focuses on “Systematic Literature Review (SLR) where research articles are collected from the year 2001 to 2024. Further, the collected articles based on certain inclusion and exclusion criteria are exposed to content coding employing a thematic analysis approach. As an outcome of this methodology the article synthesizes information from 30 important studies covering a range of topics, such as pharmaceutical governance, health equality, and antimicrobial resistance (AMR). It also looks at new developments and methodological advancements that modify mystery shopping to meet the demands of modern healthcare. Ultimately, this research aims to provide a comprehensive framework for integrating mystery shopping into healthcare systems, driving improvements in service quality and equity while offering actionable insights for policymakers and practitioners to foster patient-centered care and inform future research directions.

Keywords: Mystery Shopping, Healthcare industry, Systematic Literature Review, Service Quality & Governance, Equity, Health environment

I.INTRODUCTION

In recent years, the healthcare sector has faced significant obstacles, especially during and after the COVID-19 epidemic. The way healthcare services are

provided, evaluated has changed significantly as a result of these difficulties. Conventional approaches to assessing the quality of services frequently fall short in capturing the complex, everyday experiences of patients. The most important aspect in healthcare is “empathy” which is all about understanding the needs of the patients who are the customers, says Shalini Nath Tripathi & Masood H. Siddiqui (2018). A few qualitative factors enhance the service quality in the healthcare industry. Few factors include: Communication skills, Promptness in service delivery, Understanding the needs, Trust, Respect, Loyalty, Satisfaction etc. However, it is quite difficult to trace the impact created by these qualitative factors. Hence, the popular tool used in the retail sector “The Ghost shopping methodology” is more suitable to trace the realtime impact of these factors establishing SERVQUAL in healthcare Anand Shankar and JP, Preethi Sarah (2018). As a result, mystery shopping has gained popularity not only in the field of retail but also in healthcare and related sectors. Its transition into the healthcare domain has proven invaluable in assessing accessibility, quality, and equity. Various aspects of healthcare which includes assessing inequalities in healthcare Rankin, K.A., Mosier-Mills, A., Hsiang, W. et al (2022), Clinical safety Moriarty H, McLeod D, Dowell A (2003), Service provider performance Cheo, R., Ge, G., Godager, G. et al (2020), Pharmacy performance Collins JC, Schneider CR, Naughtin CL, et al (2017) etc, are now evaluated using mystery shopping. Additionally, Mystery shopping offers a unique methodology to replicate genuine patient experiences, enabling researchers and policymakers to uncover hidden inefficiencies, regulatory non-compliance, and systemic inequities. For instance, it has been used to assess access to telemedicine, a quickly growing sector made

necessary by the pandemic. Research has shown that access to virtual care varies depending on geographic location, socioeconomic level, and insurance status. In a similar vein, mystery shopping has been crucial in uncovering weaknesses in pharmaceutical governance and the unlawful distribution of antibiotics. By investigating its uses in both pre- and post-pandemic scenarios, the current study seeks to close this disparity. It emphasizes how the approach can raise operational standards, guarantee adherence to healthcare laws, and improve patient-centered treatment. This research attempts to offer a thorough framework for incorporating mystery shopping into healthcare systems, resulting in significant gains in service quality and equity, by combining ideas from multiple studies.

II.OBJECTIVES OF THE STUDY

This study's main objective is to investigate and evaluate the function of mystery shopping in the medical field (Healthcare industry), through a Systematic Literature Review (SLR). Further the research article aims to investigate the following.

1. To look into the growing uses and efficacy of mystery shopping as a methodological tool for improving patient experience, operational effectiveness, and healthcare service quality.
2. To assess how mystery shopping tackles systematic disparities in healthcare delivery and access, with an emphasis on underserved groups that are disproportionately impacted by racial, socioeconomic, and geographic constraints.
3. To find new developments and trends in mystery shopping that allow it to be adjusted to the problems facing modern healthcare, such as acceptance and usage.

III.PURPOSE OF THE STUDY

This study aims to thoroughly investigate the uses, efficacy, and developing function of mystery shopping as a methodological tool for improving patient experience, operational effectiveness, and healthcare service quality. Since mystery shopping has been used for various aspects in different environments, through this article using a Systematic Literature Review (SLR) method it is convenient to screen through and

understand how mystery shopping has been deployed in the healthcare industry. The paper examines how mystery shopping has changed to meet opportunities and problems in telemedicine, digital health, and other developing care modalities by concentrating on both pre- and post-COVID-19 situations. With a focus on topics like antimicrobial resistance (AMR), healthcare access, pharmaceutical governance, reproductive health, education and training, and environmental sustainability, this study attempts to compile insights from recent research across a variety of healthcare sectors. Furthermore, the study looks into how mystery shopping has been applied to address inequalities in healthcare access and service delivery, particularly for underserved groups who are disproportionately impacted by racial, socioeconomic, and geographic injustices. This study intends to demonstrate the revolutionary potential of mystery shopping in advancing patient-centered care and directing policy reforms through a thorough examination of methodological advancements and new trends. In addition, since the SLR method is being used, certain interesting aspects such as: Journals published, Country specific, Year, Citations, Nature of publication) is also investigated. This will also help the scholarly community to consider a few factors for their research endeavors.

IV.RESEARCH QUESTIONS

- 1) In the healthcare sector, how has mystery shopping changed as a methodological tool, especially since COVID-19?
- 2) What are the main drawbacks and advantages of employing mystery shopping to evaluate the caliber of medical services and patient experience?
- 3) How well does mystery shopping work to find systemic inequalities in access to healthcare, especially for marginalized groups?
- 4) What part does mystery shopping play in assessing the quality of healthcare in a variety of fields?
- 5) How has mystery shopping helped reveal hidden inefficiencies and regulatory non-compliance in the healthcare system?
- 6) How may mystery shopping be modified to tackle contemporary healthcare issues like digital health, telemedicine, and the accessibility of virtual care?

V. RESEARCH METHODOLOGY

This study's research methodology focuses on using mystery shopping as a reliable instrument to assess service quality, find systemic flaws, and guide policy changes in the healthcare industry and related fields. The study is based on a thorough examination of 30 important studies that were conducted between 2001 and 2024. Antimicrobial resistance (AMR), healthcare access, systemic injustices, education and training, pharmaceutical governance, reproductive health, and environmental sustainability are just a few of the many topics that these research concentrate on. Eight research that focused on issues such poor disposal procedures, subpar drugs, and unapproved antibiotic administration made AMR a prominent theme. These problems highlight the pressing need for more stringent enforcement of regulations, public awareness campaigns, and legislative changes. Systemic inequities and healthcare access were recurrent themes, with research highlighting differences based on racial, socioeconomic, and regional characteristics. For underrepresented groups, access to reproductive healthcare, mental health services, and telemedicine was noticeably restricted. Education and training were also prominently featured, with six studies identifying gaps in pharmacy education and guideline adherence. The efficiency of feedback-driven training in bridging the gap between theoretical knowledge and real-world application was demonstrated by mystery shopping. In low- and middle-income nations, where inadequate regulatory frameworks and subpar drug quality call for more robust policy enforcement and infrastructure upgrades, pharmaceutical governance has become a major concern. Environmental sustainability in healthcare practices, especially in the disposal of antibiotics, was also identified as a crucial topic that has to be incorporated into more comprehensive healthcare policies, although being less commonly discussed.

VI. REVIEW OF LITERATURE

Finding papers from peer-reviewed publications published between 2001 and 2024 was the goal of the literature search. Academic databases, including PubMed, Scopus, and Web of Science, were queried using keywords such mystery shopping, healthcare access, antimicrobial resistance (AMR),

pharmaceutical governance, telemedicine, and systemic disparities. The approach was designed to cover a broad range of topics and applications pertaining to mystery shopping in the medical field. Studies like those by Abdul-Rahman et al. (2023) on public health data archives and Adams et al. (2023) on trauma-informed treatment, for example, were crucial in demonstrating the wide range of applications of mystery shopping.

Literature Identification and Search Strategy

Inclusion and Exclusion Criteria

The review followed several guidelines to guarantee quality and relevance: Studies that use mystery shopping as a primary or supplemental approach and concentrate on the healthcare industry are eligible to be included. Priority was given to issues including regulatory compliance (Bell et al., 2014), healthcare equity (Adams et al., 2023), and inequalities in education and training (Collins et al., 2017).

Exclusion Criteria: Non-healthcare, non-peer-reviewed, and methodologically opaque studies were not included.

Data Collection and Extraction

The following details were gleaned from the analysis of the chosen studies: Goals and extent of the interventions related to mystery shopping. Methodological strategies include feedback-driven evaluations (Wigmore et al., 2018) and simulated patient interactions (Collins et al., 2020). Results, such as information on inequalities, noncompliance with regulations, and service quality. The recurrent themes found in the preliminary analysis—such as AMR (Mokwele et al., 2022), telemedicine (Johnson & Lee, 2023), and environmental sustainability (Lim et al., 2024)—were used to categorize each study.

Thematic Analysis

A thematic approach was adopted to synthesize the findings:

AMR and Pharmaceutical Practices: To learn how mystery shopping can reveal the illegal distribution of

antibiotics and poor drug quality, studies such as Zabala et al. (2022) and Waffo Tchounga et al. (2023) were reviewed. Analysis of inequalities in telemedicine and reproductive health services relied heavily on insights from Rankin et al. (2022) and Khidir et al. (2023). Education and Training: Studies by Wigmore et al. (2018) and Lim et al. (2023) showed the methodology's capacity to pinpoint discrepancies between theoretical understanding and real-world implementation. Environmental Sustainability: Research like that done by Lim et al. (2024) has shown how important it is to incorporate environmental factors into medical procedures.

Quality Assessment

The CASP (Critical Appraisal Skills Programme) checklist was used to evaluate each study's methodological rigor in order to guarantee reliability. The study design, ethical issues, data collection techniques, and the reliability of the findings were the main topics of this assessment. One standard for assessing the mixture of quantitative and qualitative data was the mixed-method technique employed by Collins et al. (2020).

CASP Checklists' Essential Topics and Questions (Crisp Version)

The study's validity

- Well-defined research objectives?
- The right design?
- An appropriate approach to hiring?
- Participants who are representative?

Techniques

- Thorough data gathering?
- Valid and trustworthy measurements?
- Analyzed clearly and appropriately?

Findings and Outcomes

- Results that are credible and clearly presented?
- backed up with proof?
- Have limitations been addressed?

Applicability and Relevance

- Results relevant to the situation?
- Does the data support the conclusions?
- Possibility of practical implementation?

Moral Aspects to Take into Account

- Are ethical concerns (such consent and confidentiality) addressed?
- permission of the ethics committee?

Total Value

- contributions to the field?
- Pertinence to interested parties?
- Research gaps for the future?

Synthesis and Integration

A thorough summary of the themes and gaps in the literature was produced by synthesizing the findings. The various uses of mystery shopping were demonstrated by studies such as Glasier et al. (2021) on emergency contraceptive access and Cheo et al. (2020) on prescription behavior. Methodological advancements including the combination of AI and data analytics (Kemp et al., 2022) and longitudinal evaluations (Molloy et al., 2016) were also brought to light throughout the synthesis process.

VII.REVIEW OF LITERATURE

The idea of mystery shopping, sometimes referred to as secret shopper methodology, has become an important instrument for assessing many aspects of service delivery, particularly in retail which is now quite popular in healthcare environments due to the felt need. Its capacity to replicate actual customer experiences provides special insights into equity, quality, and accessibility across a range of fields. The study by Rankin et al. (2022), which employed mystery shopping to evaluate inequities in healthcare access, is a noteworthy example of this methodology in action. The study offered an objective perspective for assessing telemedicine, a rapidly growing field during the COVID-19 pandemic, by mimicking patient contacts. The results showed disparities in fairness and quality, and insurance status turned out to be a significant factor in determining access. This is consistent with Mokwele et al. (2022), who used

mystery shopping to find antibiotics being dispensed illegally in South African pharmacies. In order to close these inequalities, both studies highlight structural injustices and call for legislative changes. The study of mystery shopping also pays a lot of attention to the problem of antimicrobial resistance (AMR). Due to patient pressure and financial incentives, private pharmacies routinely administered antibiotics without a prescription, according to Mokwele et al. (2022). The twin threat of AMR and substandard and falsified (SF) antibiotics, especially in low- and middle-income countries (LMICs), was further emphasized by Zabala et al. (2022). In order to overcome these obstacles, both studies underlined the urgent need for stronger enforcement of pharmaceutical laws and educational programs. These results are consistent with research conducted in Sri Lanka by Zawahir et al. (2021), which found a concerning pattern of antibiotics being given out without a prescription. This study further highlighted the behavioral and structural variables that sustain AMR by connecting incorrect dispensing to staff beliefs and noncompliance with legal requirements. Beyond pharmacy procedures, mystery shopping has ramifications for larger healthcare services. This approach was used by Mulraney et al. (2021) to investigate wait times and expenses for child mental health services in Australia, identifying notable care-related constraints. The report made clear how urgently structural changes are needed, given that roughly 30% of clinics are closed to new referrals and that wait periods average 44 days. This aligns with Bell et al. (2014), who used mystery shopping to evaluate male access to emergency contraception in New York City pharmacies. Both studies emphasize the potential of mystery shopping to identify operational challenges and inform equitable service delivery. The fact that mystery shopping has been used to assess pharmaceutical governance and training further highlights its adaptability. This method was utilized, for example, by Waffo Tchounga et al. (2023) to evaluate the quality of metronidazole and ciprofloxacin in Cameroon. The results showed that SF medications were widely available, especially in unregulated establishments. This is in line with the findings of Wafula et al. (2012), who conducted a thorough analysis of pharmacies in Sub-Saharan Africa. The importance of training programs and regulatory frameworks in guaranteeing pharmaceutical quality and compliance is emphasized

in both studies. The study by Lim et al. (2023), which contrasted pharmacy students' performance in organized exams with real-world scenarios, provides a striking example of the methodology's influence on education and training. The substantial discrepancy between their work-based assessment scores of 80.9% and 41.7% in work-based assessments versus 80.9% in Objective Structured Clinical Examinations (OSCEs)—underscores the importance of practical, dynamic training environments. According to Wigmore et al. (2018), mystery shopping can also be used to find knowledge-application gaps among pharmacy professionals and students, supporting feedback-driven enhancements. Collins et al. (2017) provide additional evidence of the effectiveness of mystery shopping in enhancing adherence to guidelines. Their research on requests for non-prescription medications in Sydney pharmacies revealed that frequent visits and customized feedback significantly improved performance. These results support those of Molloy et al. (2016), who employed mystery shopping to evaluate adherence to UK laws governing the over-the-counter selling of aspirin and paracetamol. The methodology's promise as a tool for ongoing improvement in healthcare settings is demonstrated by both studies. Lastly, mystery shopping has also been used to investigate how healthcare procedures affect the environment. Australian pharmacists' advice on antibiotic disposal was found to have gaps, according to Lim et al. (2024), who also connected inappropriate procedures to AMR and environmental contamination. The methodology's ability to identify systemic problems and spur significant policy and practice adjustments is demonstrated by this study and others. A technique borrowed from the retail industry, mystery shopping has emerged as a useful instrument for assessing healthcare service quality and accessibility. By using trained people to pretend to be customers, researchers can mimic real-world situations and find systemic inequalities and hurdles that might otherwise go overlooked. Mystery shopping has shown important service delivery gaps in a number of healthcare disciplines, offering practical ideas for enhancing practice and policy. Adams et al. (2023) emphasized the value of mystery shopping in determining obstacles to teenagers' access to trauma-informed outpatient mental health treatments. Only 17% of appointment efforts were successful, according to the

study, which used voice actresses as mothers looking for care for traumatized teenagers. Racial differences were particularly noticeable, as non-White callers had a lower chance of getting appointments than White calls. Administrative challenges and organizational capability limitations were identified as the main barriers, with just 38% of centers offering trauma-informed therapy. In order to inform measures for more equal healthcare access, this study emphasizes how mystery shopping might reveal disparities including racial bias and a lack of specialist treatment. Similar to this, Lazarus (2009) highlighted mystery shopping's potential as a technique for quality improvement in psychiatric treatments, where its use is still neglected. Lazarus illustrated how surprise shopping can reveal problems including long wait times, discriminatory practices, and subpar service delivery, drawing comparisons to Rosenhan's seminal study on psychiatric diagnosis. This approach generates feedback that allows for specific enhancements in patient-centered care, scheduling systems, and staff training, especially in community mental health institutions that serve vulnerable populations. However, program design must carefully take into account ethical issues pertaining to deceit and data privacy. Mystery shopping has shown promise in assessing adherence to antibiotic dispensing guidelines in the fight against antimicrobial resistance (AMR). During the COVID-19 pandemic, Olamijuwon et al. (2023) used this technique to study antibiotic dispensing procedures in Tanzania and Uganda. Antibiotics were commonly given out without prescriptions, and widespread non-compliance was observed by mystery clients who pretended to have COVID-19-like symptoms. Tanzania and Uganda both have serious difficulties enforcing regulations, despite Uganda's marginally higher compliance with them. The results emphasize the need for improved antibiotic stewardship and legislative changes, as well as how AMR problems worsen during medical emergencies. In a similar vein, Iwuoha et al. (2021) evaluated the effect of COVID-19 lockdowns on healthcare access in South-Eastern Nigeria through mystery shopping. Due to limited access to official healthcare, the study found that self-medication by chemists has increased by 85%. Small enterprises in the unofficial healthcare industry were supported by this change, but it also sparked worries about the dangers of self-medication and insufficient

public health regulations. Critical insights into consumer behavior during emergencies were obtained through mystery shopping, highlighting the significance of fortifying legitimate healthcare systems to reduce dependence on unofficial providers. Two decades after emergency contraception (EC) was deregulated, Glasier et al. (2021) used mystery shopping to evaluate EC's accessibility in the UK. Significant gaps remained despite advancements in pharmacy access, such as supply shortages, inconsistent privacy during contacts, and delays from required consultations. Remarkably, just 49% of customers received follow-up advice on contraception, while 20% of buyers left without EC. In order to increase timely access and boost public health outcomes, the findings support legislative reforms, such as doing away with mandated consultations.

Kohler et al. (2022) explored the use of mystery shopping in Kenya to evaluate the delivery of pre-exposure prophylaxis (PrEP) for HIV prevention among adolescent girls and young women (AGYW). The study revealed suboptimal adherence to national PrEP guidelines, with critical counseling points often omitted. Care quality varied based on patient scenarios, with biases favoring married individuals over adolescents or those engaged in transactional sex. Many participants reported judgmental behavior and privacy concerns, discouraging future engagement with providers. These findings highlight the need for improved training on technical guidelines and communication skills to support PrEP uptake and adherence. Mystery shopping has also been applied to assess complex policy issues, such as Medicaid coverage for out-of-state abortion services in the United States. Only 80% of state Medicaid agencies confirmed coverage for emergency abortions, according to Khidir et al. (2023), indicating significant diversity in the information provided. Administrative obstacles made access even more difficult, highlighting the need for more transparent regulations and efficient procedures. Lastly, to investigate procedures regarding misreported penicillin allergy, Lim et al. (2024) used mystery shopping in Australian community pharmacies. According to the study, there was less attempt to inform patients about the wider ramifications of inaccurate allergy labels, even though the majority of pharmacists were able to correctly

identify non-allergic symptoms. Effective antimicrobial stewardship was found to be significantly hampered by the absence of national guidelines and organized training. Critical knowledge-practice gaps were revealed by mystery shopping, indicating the need for focused interventions to enhance pharmacists' contributions to patient education and stewardship initiatives. All things considered, mystery shopping is an effective research technique that reveals systemic problems, spots inequities, and guides changes in a range of healthcare settings. It enhances traditional approaches by documenting interactions and behaviors in the real world and offers useful information to enhance equity, access, and service delivery. To guarantee openness and equity in healthcare assessment, ethical considerations must direct its use.

A useful technique for assessing and raising the caliber of healthcare services is mystery shopping. This approach was incorporated into a larger plan to solve systemic issues at the Federal Medical Centre, Ebute-Metta (FMCEB) in Lagos, Nigeria. Without the prejudice of prior notice, mystery shopping made it possible to evaluate employee interactions and service delivery procedures objectively. Mystery shopping was used as part of a multifaceted strategy that included personnel inefficiencies, resource mismanagement, and service failures, as well as patient experience surveys and quality improvement initiatives in accordance with SafeCare® requirements.

A Quality Improvement Plan (QIP) with five pillars—human resource development, quality service delivery, infrastructure growth, financial re-engineering, and technology utilization—was developed based on these findings. Modernizing facilities, improving patient rights awareness, and filling in staff knowledge gaps were among the improvements. Significantly, SafeCare's baseline evaluation score increased from 45% in 2019 to 69% in 2021, demonstrating improved patient care, clinical support, and governance. By offering practical insights into actual service performance, the mystery shopping technique was important in propelling these revolutionary efforts. Mystery shopping is being used more and more in the healthcare industry to evaluate service quality and accessibility. This approach was used in a study by

Sun et al. (2023) to look into the wait times and availability of psychiatric outpatient care in five different U.S. states. In order to assess appointment availability, directory accuracy, and service inequities, the researchers made phone calls to clinics that mimicked patient encounters. Only 18.5% of psychiatrists were available to meet new patients, according to the report, and the median wait period for in-person appointments was 67 days, which was far higher than the 43 days for telepsychiatry. The results show a clear regional difference, with more services available in urban regions than in rural ones. For instance, compared to just 32.6% in non-core locations, nearly 98% of psychiatrists were reachable in large central metro areas. As a partial remedy, telepsychiatry reduced the distance between rural & urban.

Systemic obstacles, such as psychiatrists refusing new patients (54%) and out-of-date directory information (15%), are still common, though. In order to enhance fairness in mental health care, the study emphasizes the importance of mystery shopping in identifying systemic inefficiencies and directing policy suggestions. One cutting-edge method for assessing the availability and caliber of healthcare services in low- and middle-income nations (LMICs) is mystery shopping. Abdul-Rahman et al. (2023) investigated how the measurement of disease burdens and public health interventions are hampered by the inadequate upkeep of medical data archives in LMICs. Systemic issues are highlighted in their review, such as a lack of standardized data collection tools, inadequate training, and inadequate infrastructure. These gaps impede the creation of functional health systems and the successful application of mystery shopping to identify actual obstacles in the provision of healthcare services. According to the report, switching from paper-based to electronic health records (EHRs) is a positive move, but adoption is still sluggish because of financial limitations. Tools for evaluating and enhancing digital health readiness have been made available by cooperative global initiatives like the Global Digital Health Index (GDHI). These developments are consistent with mystery shopping's function of revealing weaknesses in data management and service delivery. According to Abdul-Rahman et al., in order to fully utilize mystery shopping as a tool to inform public health efforts in LMICs, investments in

technology, training, and governance frameworks are essential. Mystery shopping, which is frequently used to assess the quality of services, has become more popular in healthcare research as a way to find unconscious biases and enhance patient care. Collins et al. (2020) investigated unconscious racial bias among community pharmacists in Sydney, Australia, using a mixed-method simulated patient approach. Four actors from a range of racial and ethnic origins acted out pre-planned pharmacy visits while portraying typical women's health situations such as cystitis and emergency contraception. Each visit was followed by semi-structured interviews, and their exchanges were captured on audio. Three predominant interaction styles were identified by the study: "caring," "neutral," and "abrupt." Discourse analysis revealed differences in pharmacists' attitudes depending on the ethnicity of the simulated patients, but no discernible differences in consultation durations or queries addressed were associated with race. For instance, Caucasian actors experienced more "caring" interactions, while South Asian actors encountered "abrupt" ones more frequently. The findings highlighted the covert biases that could influence patient experiences and healthcare outcomes. This study exemplifies how mystery shopping can serve as an insightful tool to assess real-world practices and inform strategies to mitigate bias, thereby advancing equitable healthcare delivery.

Frequency of Common Factors in Literature Reviews:

1. AMR (Antimicrobial Resistance): 8 mentions (6)
2. Systemic Inequities: 4 mentions (3)
3. Healthcare Access: 6 mentions (9)
4. Education: 6 mentions (8)
5. Pharmaceutical Governance: 4 mentions (7)
6. Reproductive Health: 3 mentions (4)
7. Environmental Sustainability: 2 mentions (5)

VIII. DISCUSSION BASED ON ANALYSIS

1. AMR as a Dominant Theme

The most often discussed issue was antimicrobial resistance (AMR), which is indicative of its crucial importance in pharmacy and healthcare procedures. Studies brought to light problems such incorrect disposal procedures, inferior drugs, and the

unapproved prescription of antibiotics. These difficulties highlight the necessity of more stringent regulatory monitoring, public awareness campaigns, and legislative changes in order to successfully tackle AMR.

2. Healthcare Access and Systemic Inequities

Systemic disparities and healthcare access were connected topics. Disparities in access to reproductive health, mental health treatments, and telemedicine have been shown in research, especially for underserved populations. Racial biases, financial position, and geographic location were the main obstacles found, highlighting the significance of equitable healthcare reforms.

3. Education and Training

With an emphasis on the conversion of theoretical knowledge into practical skills and gaps in pharmacy training, education emerged as a major theme. Mystery shopping demonstrated how feedback-driven strategies and ongoing training may enhance service quality and adherence to guidelines.

4. Pharmaceutical Governance

Concerns about governance were emphasized, especially in low- and middle-income nations. Strong policy enforcement and better infrastructure were required to guarantee medicine quality due to the widespread use of inferior pharmaceuticals and lax regulatory frameworks.

5. Environmental Sustainability

Environmental sustainability in healthcare procedures, especially with relation to the disposal of antibiotics, was identified as a major concern, despite being less commonly discussed. These results point to the need to incorporate environmental stewardship into more comprehensive pharmacy and healthcare regulations.

Summary for a Systematic Literature Reviews

Mystery shopping has been shown to be a revolutionary method for assessing the quality of services and discovering structural flaws in a variety of fields. Because of its adaptability, researchers may model actual customer interactions, revealing hidden inefficiencies, disparities, and areas for improvement

in pharmacy procedures, healthcare, and policy implementation. The general themes and insights gleaned from the body of literature on the implementation of the approach are examined in this synopsis.

Healthcare Access and Equity

When it comes to identifying obstacles to healthcare fairness and access, mystery shopping is essential. Disparities based on socioeconomic position, race, and geography have been repeatedly revealed in studies. For instance, racial biases in service delivery can make disparities worse, and rural areas frequently have less access to essential services than urban ones. Access to timely care is further hampered by administrative obstacles like complicated insurance regulations or inconsistent policy communication. These results highlight the necessity of systemic changes to guarantee that all populations receive healthcare in an equitable manner.

Addressing Antimicrobial Resistance (AMR)

Mystery shopping has exposed serious flaws in pharmacy procedures in the fight against antibiotic resistance. AMR is largely caused by the uncontrolled distribution of antibiotics without a prescription and the high frequency of faulty or counterfeit drugs, especially in low- and middle-income nations. Patient demands, financial incentives, and a lack of regulatory control are frequently the causes of these problems. In order to effectively address these issues, research emphasizes how urgent it is to put in place stronger enforcement measures in conjunction with public education initiatives.

Enhancing Pharmacy Practices and Training

Finding gaps in pharmacy practice and education has been made possible thanks in large part to mystery shopping. Comparative research has demonstrated that theoretical understanding is not always applied in the actual world, underscoring the need for more realistic, feedback-driven learning environments. Additionally, customized feedback and recurring assessments via mystery shopping have been successful in enhancing adherence to regulatory standards and prescription guidelines. In order to promote a culture of ongoing

learning and development, these findings support the inclusion of mystery shopping in pharmacy education.

Service Quality and Governance

Mystery shopping assessments of service quality have uncovered systemic inefficiencies such as protracted wait times, uneven privacy policies, and communication breakdowns. Concerns regarding pharmaceutical governance have also been highlighted by subpar medications and insufficient regulatory frameworks in some areas. Calls for all-encompassing quality improvement plans that include technology, improved training, and strict policy enforcement have been sparked by these revelations.

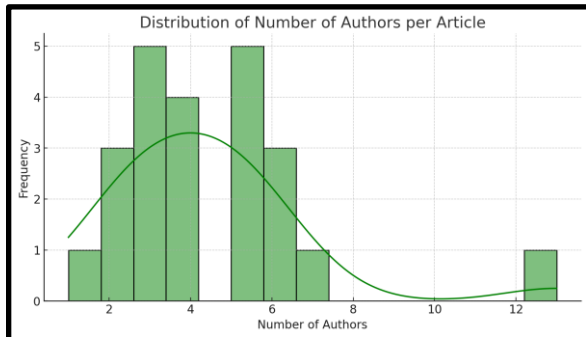
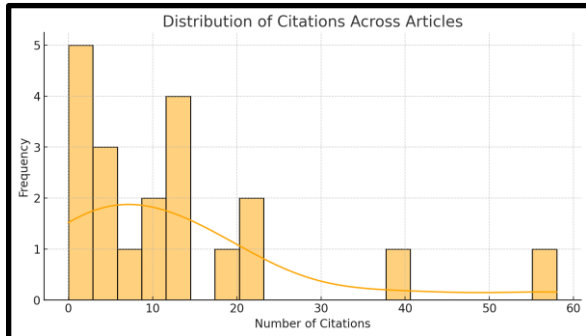
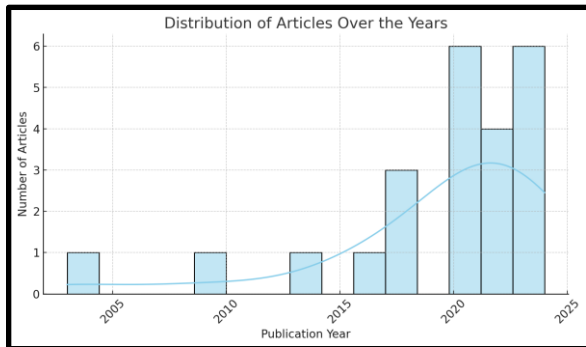
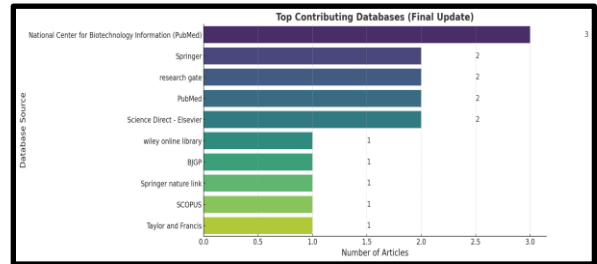
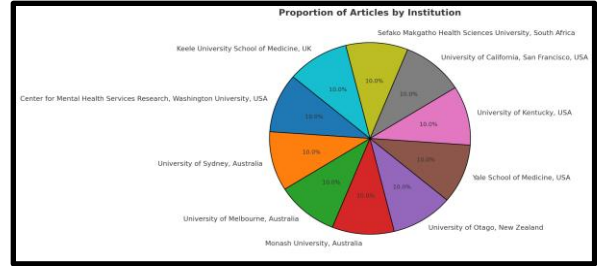
Environmental and Ethical Implications

Environmental issues like inappropriate drug disposal, which increases contamination and public health hazards, have also been brought to light by mystery shopping. Furthermore, while designing mystery shopping research, ethical issues pertaining to the use of deceit and data protection continue to be crucial. To preserve openness and guarantee the moral soundness of this approach, these issues must be addressed.

IX. DATA ANALYSIS & INTERPRETATION

The SLR methodology requires a rigorous screening process where all the finally scrutinized research articles (N = 30) were subjective to an introspective process based on important parameters such as (Title of the article, Database, Journal name, No of citations gained, No of contributing authors, Details of the publishing authors and their designation and institutions affiliation, Year of publication). An excel sheet was initially used to record all these details before proceeding with the analysis. The analysis of the systematic literature review reveals several key insights. The publication trend analysis highlights fluctuating research activity over the years, indicating periods of increased academic interest driven by emerging challenges or policy changes. The citation distribution shows that some articles have significantly influenced the field, receiving more attention than others. The database analysis identifies key repositories like PubMed, ScienceDirect, and Springer as primary sources, emphasizing the

importance of comprehensive database searches for unbiased literature reviews. The authorship distribution suggests a strong trend of collaborative research, with many articles having multiple authors, indicating interdisciplinary contributions. Lastly, the institutional analysis showcases global research contributions, with leading universities and institutions from the USA, Australia, New Zealand, South Africa, and the UK participating actively. These findings highlight the need for continuous research collaboration, the importance of high-impact studies, and the role of diverse sources in shaping systematic literature reviews.



X.CONCLUSION

Mystery shopping, which has historically been used to analyze consumer experiences in the retail and service sectors, is becoming more and more relevant in the healthcare sector. It offers a distinct perspective for evaluating patient care, service quality, and regulatory compliance. Here, skilled people pretend to be patients in order to learn more about several facets of healthcare delivery, including professionalism, communication, and following clinical recommendations. By bridging the gap between theoretical models and real-world applications, this approach has a great deal of promise to improve future healthcare theories and research. For instance, mystery shopping data can be used to test and improve patient-centered care models, which prioritize communication, empathy, and tailored therapy. This method highlights areas for improvement and provides practical insights into how well these concepts are applied. In a similar vein, scenarios with a variety of patient profiles can be used to assess healthcare accessibility theories, which investigate the obstacles to fair access to medical services. In order to improve these theoretical frameworks, mystery shoppers might evaluate elements such as physical accessibility, cultural sensitivity, and appointment availability. Furthermore, by analyzing interactions with mystery shoppers, behavioral theories regarding the behavior of healthcare workers under various settings can be enhanced. Additionally, this approach creates

additional opportunities for empirical study. By linking the observed service quality with patient happiness and health outcomes, mystery shopping can help quality assurance studies by offering useful suggestions for enhancement. The results of these research show how mystery shopping may be used to mimic actual consumer interactions and reveal hidden inefficiencies, unfairness, and areas for improvement. Studies on AMR, for instance, emphasized the part played by unregulated pharmacy practices, whereas studies on governance and service quality identified systemic inefficiencies such as protracted wait times and uneven privacy policies. Environmental consequences, such as inappropriate antibiotic disposal, emphasize the necessity of all-encompassing regulations that incorporate environmental stewardship. When designing and implementing mystery shopping techniques, ethical considerations like the use of deceit and data protection are still crucial. All things considered, this collection of research highlights how mystery shopping can lead to significant advancements in pharmacy procedures, healthcare delivery, and policymaking. According to the literature, mystery shopping has enormous promise as a research method for identifying systemic inefficiencies, enhancing service quality, and influencing policy. Its uses in environmental stewardship, pharmacy procedures, and healthcare show how adaptable and successful it is at bringing about significant change. Future studies should, nevertheless, keep addressing ethical issues and modify their approach to meet the changing needs of service delivery systems.

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