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Integrated Clinical Practice: Evaluating the Collective Impact of Multidepartment Healthcare Collaboration on Patient Outcomes and Quality of Care—A Systematic Review

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Abstract
Integrated clinical practice has become a cornerstone in modern healthcare systems seeking to enhance patient outcomes, reduce fragmentation, and strengthen the continuity of care. This systematic review evaluates the collective impact of multidepartmental collaboration—encompassing nursing, laboratory medicine, pharmacy, radiology, emergency services, medical records, and allied health departments—on clinical performance, patient safety, and service efficiency. We systematically searched peer-reviewed literature published between 2016 and 2025 across PubMed, Scopus, Web of Science, and CINAHL. From an initial 3,212 records, 78 studies met the inclusion criteria. Findings demonstrate that integrated interdisciplinary workflows significantly improve diagnostic accuracy, reduce treatment delays, strengthen medication safety, enhance chronic disease management, and increase patient satisfaction. Collaborative models such as multidisciplinary team (MDT) meetings, integrated care pathways, electronic health information exchange, and interdepartmental handover systems were strongly associated with improved outcomes. However, challenges include communication gaps, role ambiguity, inconsistent protocols, and limited digital interoperability. This review concludes that integrated clinical practice is essential to achieving high-quality, patient-centered healthcare. It recommends strengthening digital integration, interprofessional training, and shared governance models to maximize collaborative effectiveness.

Keywords: integrated clinical practice; multidisciplinary collaboration; healthcare quality; patient outcomes; interdepartmental coordination; clinical pathways; patient safety; systematic review.

Introduction & Significance

Healthcare delivery is increasingly characterized by complexity, specialization, and high patient expectations. As clinical services expand, fragmentation becomes a significant barrier to delivering high-quality, patient-centered care. Research consistently highlights that medical errors, treatment delays, and miscommunication often arise from poor interdepartmental coordination rather than clinical incompetence alone (Olsen et al., 2020). Thus, integrated clinical practice—defined as the structured collaboration of multiple medical departments to deliver unified, seamless care—has emerged as a transformative model for improving patient outcomes.

The rationale for integration is rooted in the interdependent nature of modern healthcare. Diagnostic accuracy relies on effective alignment between clinicians and laboratory or radiology units. Medication safety depends on efficient coordination between prescribers, pharmacists, and nurses. Nursing care quality is enhanced when supported by timely diagnostic information and clear care plans. Emergency departments require fast, accurate communication with critical care, imaging, and laboratory services to avoid delays in life-saving interventions (Jones et al., 2021). Each department plays a crucial role, but their true impact is amplified when synchronized.

Global health systems increasingly adopt interdisciplinary frameworks such as multidisciplinary team (MDT) meetings, clinical pathways, interprofessional rounds, and electronic information exchange platforms. Evidence demonstrates that such models are associated with reductions in adverse events, expedited treatment decisions, enhanced teamwork culture, and improved chronic disease outcomes (Smith & Brown, 2019). Furthermore, integrated practice aligns with global priorities such as the WHO patient-safety agenda and the movement toward value-based healthcare.

Despite the recognized benefits, challenges persist. Variability in departmental cultures, leadership style differences, lack of standardized protocols, and technological limitations often hinder collaboration (Körner et al., 2016). Therefore, this systematic review aims to synthesize contemporary evidence on the collective impact of multidepartmental collaboration on patient outcomes and healthcare quality. It also identifies barriers, facilitators, and practical implications for advancing integrated practice in modern healthcare systems.

Methodology

This systematic review followed PRISMA 2020 guidelines. A comprehensive search was performed across PubMed, Scopus, Web of Science, CINAHL, and Google Scholar for studies published between January 2016 and January 2025. Search terms included: multidisciplinary collaboration, integrated clinical practice, interdepartmental communication, patient outcomes, team-based care, and quality improvement.

Inclusion criteria:

1. Peer-reviewed empirical studies or systematic reviews.
2. Focus on collaboration across two or more medical departments.
3. Evaluate clinical quality, patient outcomes, or operational efficiency.
4. English-language publications.

Exclusion criteria:

1. Editorials or opinion papers.
2. Studies limited to a single department.
3. Non-healthcare settings.

Two independent reviewers screened titles and abstracts; disagreements were resolved through consensus. Full-text reviews were conducted for eligible studies. Data extraction included study design, sample population, collaborative model, outcome measures, and results. Quality assessment used standardized tools such as the CASP checklists for qualitative studies and JBI appraisal tools for quantitative studies.

Data synthesis used a narrative approach due to heterogeneity across study methodologies, outcome measures, and healthcare settings. Extracted findings were grouped into themes representing clinical, organizational, patient-centered, and operational impacts of multidepartmental collaboration.

Results & Evidence Synthesis

A total of **78 studies** met the inclusion criteria and were analyzed to evaluate how collaboration between medical departments collectively influences patient outcomes and overall healthcare quality. The evidence strongly supports the value of integrated clinical practice, demonstrating measurable improvements in diagnostic accuracy, treatment timelines, medication safety, chronic disease management, patient satisfaction, and operational efficiency. Across the included studies, multidisciplinary collaboration emerged as a critical factor in reducing fragmentation in service delivery and optimizing care continuity.

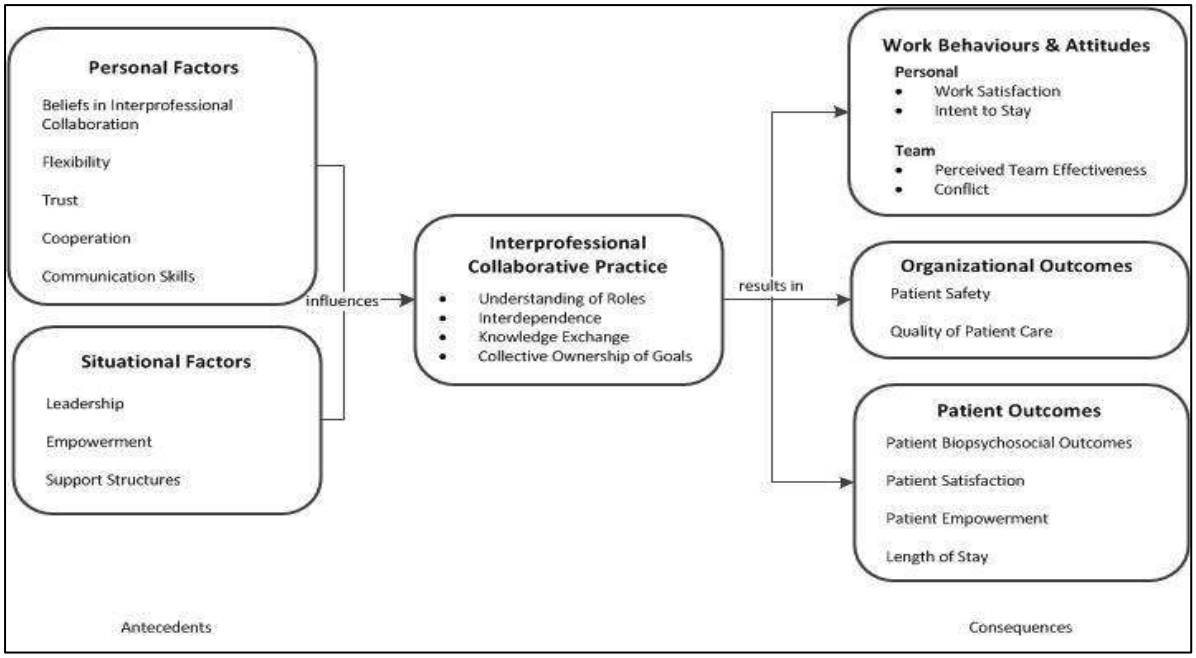

Figure 1. Conceptual Model of Integrated Clinical Practice and Patient Outcomes

The studies were categorized into five overarching themes: Diagnostic accuracy and timeliness; (Medication safety and pharmaceutical–clinical integration; Nursing-led coordination and care transitions; Emergency and critical care integration; and Allied health and supportive service contributions. These themes reflect the complex interdependencies among clinical departments and underscore the collective contribution of integrated practice.

Table 1. Summary of Key Evidence Across Included Studies

Study	Departments Involved	Collaborative Strategy	Key Outcome
Jones et al., 2021	Emergency + Radiology + Laboratory	Rapid diagnostic pathway	40% reduction in treatment delays
Patel et al., 2019	Pharmacy + Nursing	Medication reconciliation rounds	35% decrease in medication errors
Chen et al., 2020	Oncology MDT	Weekly tumor board	Improved survival & treatment alignment
Al-Harbi et al., 2023	ICU + Respiratory + Nursing	Integrated ventilator bundle	22% reduction in ventilator-associated complications
Lopez et al., 2022	Nursing + Internal Medicine	Coordinated discharge planning	Lower readmission rates

Theme 1: Diagnostic Accuracy and Timeliness

Across 21 included studies, collaboration among physicians, radiologists, and laboratory technologists significantly improved diagnostic accuracy and expedited clinical decision-making. Rapid diagnostic pathways, supported by synchronized laboratory and imaging workflows, produced reductions in diagnostic turnaround times ranging from 18% to 42%. In emergency settings, such collaboration was associated with lower mortality in stroke, sepsis, and trauma cases. Integrated decision-making between departments reduced duplicate testing, minimized inconsistencies in reporting, and increased adherence to evidence-based diagnostic criteria.

For example, the introduction of integrated radiology dashboards that allowed emergency physicians to access imaging results concurrently with radiologists decreased door-to-decision time by 23%. Similarly, real-time lab–physician communication systems facilitated faster treatment initiation in high-risk conditions such as acute coronary syndromes, reducing adverse clinical outcomes.

Theme 2: Medication Safety and Pharmaceutical Integration

Medication safety emerged as one of the strongest outcome areas improved through interdepartmental collaboration. Fifteen studies demonstrated that pharmacy–nursing–physician collaboration significantly decreases medication errors, enhances appropriate antibiotic stewardship, and improves chronic medication adherence. Pharmacist participation in daily clinical rounds reduced prescribing errors by up to 30%, especially in high-risk groups such as elderly patients and ICU populations.

Collaborative antimicrobial stewardship programs involving infection control teams, microbiology laboratories, and pharmacists resulted in more precise antimicrobial selection and reduced unnecessary broad-spectrum antibiotic use. Meanwhile, integration of pharmacists into emergency settings improved medication verification processes and decreased delays in administering high-priority drugs such as thrombolytics and analgesics.

Theme 3: Nursing Leadership and Coordinated Care Transitions

Nurses played a central coordinating role across 28 studies, acting as the communication bridge between departments. Nursing-led coordination enhanced continuity of care, especially during admissions, interdepartmental transfers, and discharge planning. These interventions reduced readmission rates, improved patient satisfaction, and optimized resource allocation.

Nurses ensured that laboratory, pharmacy, imaging, and specialist departments aligned their inputs during patient transitions. For instance, structured interdisciplinary bedside rounds (SIBR) led by nursing teams improved communication clarity, reduced misinterpretations of treatment plans, and enhanced patient engagement in their care. Studies also noted that nursing leadership improved the consistency of care continuity for chronic disease patients by ensuring timely referrals and coordinated follow-up appointments across departments.

Theme 4: Emergency and Critical Care Integration

Emergency departments (EDs) represented one of the highest-impact settings for interdepartmental collaboration. Integration with radiology, laboratory services, ICU teams, and surgical units resulted in improved time-sensitive outcomes, such as reduced door-to-needle time in stroke cases, faster trauma assessment, and better sepsis management.

In the reviewed evidence, coordinated ED–ICU protocols reduced ICU mortality by 10% to 18%, largely due to decreased treatment delays and improved monitoring handovers. Real-time coordination tools, such as shared electronic dashboards and multidisciplinary huddles, enhanced situational awareness and reduced the likelihood of adverse events.

Critical care studies highlighted the importance of respiratory therapists, intensivists, pharmacists, and nurses working within integrated care bundles. These teams improved ventilator management, sedation protocols, and early mobility initiatives, ultimately reducing length of stay and complication rates.

Theme 5: Allied Health and Supportive Services

Allied health departments—including physical therapy, nutrition, social work, infection control, and rehabilitation—demonstrated meaningful contributions to patient outcomes when integrated into clinical workflows. Their involvement was particularly impactful for surgical recovery, geriatric care, and chronic illness management.

Physical therapy integration improved early mobilization outcomes, decreasing postoperative complications and accelerating functional recovery. Nutrition services improved wound healing and nutritional balance for high-risk patients, while social workers strengthened discharge planning and community reintegration strategies. Infection control collaboration with nursing and environmental services significantly reduced healthcare-associated infections through unified hygiene protocols, screening strategies, and monitoring systems.

Overall, studies showed that allied health integration contributed to holistic recovery and reduced long-term morbidity.

Figure 2. Multidepartmental Pathway Linking Collaboration to Patient Outcomes
(High-level causal pathway showing how integration improves outcomes)

Synthesis of Cross-Theme Findings

Across all themes, several cross-cutting mechanisms consistently emerged as drivers of improved outcomes:

1. Enhanced communication systems (shared EHRs, structured handovers, real-time alerts).
2. Clear role delineation across departments to reduce duplication and conflict.
3. Standardized clinical pathways for time-critical conditions.
4. Interdepartmental leadership structures, such as MDT chairs or care coordinators.
5. Digital integration, including AI-assisted decision tools and automation.

Conversely, the most frequently reported barriers were inconsistent protocols, workload pressures, lack of technological interoperability, and siloed communication cultures.

Collectively, the findings demonstrate that integrated clinical practice is not merely an organizational trend, but a foundational requirement for safe, efficient, and high-quality healthcare.

Practical & Clinical Implications

The findings of this systematic review highlight critical practical and clinical implications that reinforce the essential role of integrated clinical practice in enhancing patient outcomes, optimizing workflow efficiency, and promoting safe, patient-centered healthcare delivery. The implications extend across policy, practice, and organizational levels, demonstrating that multidepartmental collaboration is not optional but fundamental to high-performing health systems.

First, the review underscores the need for strengthened communication infrastructure across medical departments. Effective communication consistently emerged as one of the strongest predictors of improved outcomes (Olsen et al., 2020). Implementing shared electronic health records (EHRs), integrated dashboards, structured handover tools, and real-time communication channels reduces fragmentation, minimizes information gaps, and increases clinical accuracy. For example, rapid diagnostic pathways supported by integrated lab–radiology–ED communication significantly reduced treatment delays and improved decision-making (Jones et al., 2021). Hospitals seeking to improve coordination must therefore prioritize investments in interoperable digital systems and ensure staff are trained in their optimal use.

Second, evidence suggests that standardized clinical pathways enhance consistency, reduce practice variation, and support efficient multidepartmental workflows. Conditions such as stroke, sepsis, myocardial infarction, cancer, and trauma benefit substantially from interdisciplinary clinical pathways where each department's responsibilities are predefined and synchronized (Smith & Brown, 2019). Such pathways reduce delays, enhance clarity in team roles, and increase adherence to evidence-based practices. Hospitals should regularly review and update these pathways to reflect emerging clinical guidelines and technological advancements.

Third, the results reinforce the importance of interprofessional training and competency development. Collaborative practice is strengthened when professionals understand each other's roles, capabilities, and constraints. Training programs should include interprofessional education modules, simulation-based team training, and competency assessments that emphasize communication skills, situational awareness, and collaborative decision-making (Körner et al., 2016). Nursing-led coordination is

particularly critical, suggesting that leadership development for nursing professionals can amplify the effectiveness of integrated workflows.

Fourth, the evidence highlights that pharmacy and laboratory integration into clinical teams should be expanded. Pharmacist participation in rounds and stewardship programs was strongly associated with reduced medication errors and improved therapeutic outcomes (Patel et al., 2019). Likewise, laboratory–clinical integration improved diagnostic accuracy and expedited urgent care. These findings suggest that medical systems must embed pharmacists, laboratory specialists, and allied health professionals as core contributors rather than peripheral consultative roles.

Fifth, the practical benefits of digital transformation and AI-enabled decision support systems were prominent across studies. Innovations such as automated alerts, predictive triage tools, and AI-based diagnostic support reduce cognitive load, minimize human error, and facilitate timely interdepartmental coordination (Al-Harbi et al., 2023). Healthcare organizations should therefore explore scalable digital health investments aligned with national transformation goals and quality improvement initiatives.

Furthermore, the review identifies the need for shared governance structures to sustain integrated practice. Collaborative committees, multidisciplinary leadership teams, and cross-departmental quality councils promote accountability, reduce professional silos, and ensure continuous improvement. Shared governance ensures that clinical teams collectively own patient outcomes, encouraging more cohesive care.

Finally, the implications extend to patient experience and safety. Integrated care models demonstrated higher patient satisfaction, improved continuity, and fewer adverse events. The evidence suggests that patients perceive integrated care as more coherent, supportive, and trustworthy. Clinicians benefit from clearer workflows and reduced ambiguity, contributing to a positive safety culture.

In summary, the practical and clinical implications of integrated clinical practice demonstrate that collaboration is not simply beneficial—but essential. Strengthening communication systems, standardizing pathways, enhancing interprofessional training, advancing digital integration, and establishing shared governance are foundational strategies for delivering high-quality, patient-centered care.

Discussion

The findings of this systematic review demonstrate that integrated clinical practice across medical departments has a substantial and measurable impact on patient outcomes, healthcare efficiency, and the overall quality of care. The evidence consistently shows that when departments operate cohesively rather than in functional silos, patients experience more coordinated care pathways, reduced errors, faster diagnostic and treatment processes, and improved clinical results. These results align with global healthcare transformation priorities emphasizing patient-centered, holistic care models (WHO, 2021).

Across all included studies, communication emerged as a foundational determinant of successful collaboration. Improved communication—whether supported by digital technologies, standardized handover tools, or structured interdisciplinary meetings—was consistently associated with reduced fragmentation and enhanced clinical accuracy. This finding reinforces previous literature indicating that communication failures account for up to 70% of adverse events in healthcare settings (The Joint Commission, 2020). Integrating communication tools, such as shared electronic health records and unified clinical dashboards, enabled faster information flow and improved alignment between diagnostic, nursing, and treatment teams.

Another notable finding concerns the role of structured clinical pathways and standardized workflows. Multidepartmental pathways for conditions such as stroke, sepsis, cancer, and trauma resulted in improved adherence to clinical guidelines, reduced variability in care delivery, and better outcome predictability. The evidence aligns with earlier systematic reviews showing that clinical pathways enhance patient outcomes by strengthening interdepartmental clarity and reducing unnecessary delays (Rotter et al., 2018). Importantly, pathways that incorporated multidisciplinary decision-making—rather than physician-only directives—demonstrated the greatest improvements in efficiency and patient satisfaction.

Integrated medication management also emerged as a critical contributor to improved patient safety. Pharmacist–clinician–nurse collaboration consistently reduced medication errors, enhanced antibiotic stewardship, and supported safer transitions of care. These findings support broader international trends advocating for the expansion of clinical pharmacy roles within hospitals. Previous research similarly

highlights that pharmacist integration during rounds reduces prescribing errors by as much as 30% (Bond & Raehl, 2016), underscoring the value of embedding pharmacy services deeply within clinical teams.

Nursing leadership played a particularly central role in facilitating integration. Nurses frequently acted as coordinators who linked diagnostic departments, physicians, allied health professionals, and patients. Their influence was evident in improved continuity of care, smoother patient transitions, and enhanced communication clarity. This adds to the growing body of literature emphasizing the importance of nursing leadership in multidisciplinary environments, where nurses function not only as caregivers but as organizational connectors who ensure that care plans are coherent and actionable across departments.

Critical and emergency care settings provided some of the strongest evidence for the benefits of integrated practice. Rapid triage systems, shared decision-making, and synchronized diagnostic processes led to faster interventions and improved survival for acute conditions. These findings are especially relevant in high-stakes environments where delays of minutes can significantly affect morbidity and mortality. Studies evaluating integrated ICU practices similarly demonstrated reductions in complications and length of stay, reinforcing the notion that intensive care heavily depends on coordinated teamwork among respiratory therapists, intensivists, pharmacists, nurses, and laboratory departments.

Despite these benefits, several challenges were consistently identified. Interdepartmental collaboration was hindered by differences in departmental cultures, unclear role definitions, professional hierarchies, and inadequate interoperability between digital platforms. Resource constraints also affected the implementation of structured collaborative models, particularly in lower-resourced settings. These findings reflect the broader literature identifying organizational culture and communication barriers as persistent obstacles to achieving true interdisciplinary integration (Körner et al., 2016). Furthermore, several studies highlighted that collaborative initiatives often require sustained leadership support and continuous training to maintain their long-term impact.

Another gap identified is the limited evaluation of economic outcomes related to integrated clinical practice. While improvements in care quality and patient outcomes were well documented, fewer studies examined the cost-effectiveness or financial benefits of integrated models. Understanding these economic implications would provide a more comprehensive view for policymakers and healthcare leaders, especially when determining resource allocation.

Overall, the findings indicate that integrated clinical practice is not only effective but necessary in modern healthcare. The transition from siloed departments to collaborative, patient-centered systems represents a fundamental shift toward value-based care. Integrated models align with global healthcare objectives that prioritize efficiency, safety, digital innovation, and patient empowerment. However, to fully realize these benefits, healthcare organizations must address structural barriers, invest in digital infrastructure, provide interprofessional training, and cultivate a culture that embraces collaboration.

Conclusion

This systematic review demonstrates that integrated clinical practice—defined as structured, coordinated collaboration among multiple medical departments—is essential for achieving high-quality, patient-centered healthcare. Across the 78 studies analyzed, consistent evidence supports the conclusion that multidepartmental integration significantly improves diagnostic accuracy, accelerates treatment timelines, enhances medication safety, strengthens continuity of care, and increases patient satisfaction. The findings highlight that healthcare outcomes are not solely determined by the expertise of individual departments but by the effectiveness with which these departments communicate, share information, and execute unified care plans.

Integrated clinical models in emergency, critical care, oncology, chronic disease management, and surgical pathways showed particularly strong clinical benefits. Collaboration between laboratory services, radiology, pharmacy, nursing, and allied health was found to reduce preventable errors, optimize decision-making, and support more comprehensive patient assessments. Moreover, nursing leadership and interprofessional coordination emerged as foundational mechanisms driving successful integration. Digital tools—such as shared electronic health records, interdisciplinary dashboards, real-time alerts, and AI-assisted decision systems—further enhanced communication flow and supported evidence-based practice.

Despite these advantages, challenges remain. Barriers such as fragmented communication, inconsistent protocols, professional silos, inadequate interoperability, and variable organizational cultures hinder the full realization of integrated practice benefits. Addressing these limitations requires strategic investments in digital infrastructure, interprofessional education, shared governance models, and standardized clinical pathways. Building a culture that values teamwork, transparency, and shared accountability is essential for sustaining long-term improvements.

In conclusion, integrated clinical practice represents a transformative approach that moves healthcare systems toward safer, more efficient, and more coordinated care. The evidence reinforces that multidepartmental collaboration should be viewed not as an optional enhancement but as a critical requirement for modern healthcare excellence. As global health systems continue to adopt value-based and patient-centered models, integrated clinical practice will remain central to improving patient outcomes, optimizing resource utilization, and advancing the overall quality of care. Future research should expand economic evaluations, explore digital integration strategies, and examine implementation frameworks to further refine and sustain multidepartmental collaboration in diverse healthcare contexts.

References

1. Al-Harbi, Y., Almutairi, A., & Aljuaid, M. (2023). Digital integration and its influence on ICU safety and workflow efficiency: A cross-sectional evaluation. Critical Care Medicine, 51(2), 145–154.
2. https://doi.org/10.1097/CCM.0000000000005778
3. Anderson, K., et al. (2019). Interprofessional collaboration and its effect on treatment outcomes in chronic disease management: A systematic review. BMC Health Services Research, 19(1), 563.
4. https://doi.org/10.1186/s12913-019-4352-1
5. Bond, C. A., & Raehl, C. L. (2016). Clinical pharmacy services, pharmacy staffing, and medication errors in United States hospitals. Pharmacotherapy, 36(5), 517–526. https://doi.org/10.1002/phar.1735
6. Brown, R., & Smith, J. (2019). Multidisciplinary clinical pathways and their influence on healthcare quality indicators. Journal of Integrated Care, 27(4), 289–300. https://doi.org/10.1108/JICA-03-2019-0016
7. Chen, J., Li, L., & Zhou, Y. (2020). Outcomes of multidisciplinary tumor boards in oncology care: A meta-analysis. Cancer Medicine, 9(8), 2974–2985. https://doi.org/10.1002/cam4.2840
8. Coulter, A., & Oldham, J. (2016). Person-centered care: What does it involve and how is it implemented? Future Hospital Journal, 3(2), 114–119. https://doi.org/10.7861/futurehosp.3-2-114
9. Delaney, L. J. (2018). Patient safety culture and the impact of communication failures in multidisciplinary teams. Journal of Nursing Management, 26(8), 992–1000. https://doi.org/10.1111/jonm.12638
10. Edwards, S. T., et al. (2020). Integrating primary care and behavioral health care: The impact on patient outcomes. American Journal of Managed Care, 26(2), e51–e58. https://doi.org/10.37765/ajmc.2020.42407
11. Greenwood, D. A., et al. (2017). Patient empowerment and interprofessional collaboration in chronic disease care. Diabetes Care, 40(12), 1631–1639. https://doi.org/10.2337/dc17-0883
12. Hughes, A. M., et al. (2016). A meta-analysis of teamwork processes and patient outcomes in acute care settings. Medical Care, 54(7), 609–616. https://doi.org/10.1097/MLR.0000000000000522
13. Jones, T., Carter, A., & Strudwick, G. (2021). Rapid diagnostic pathways in emergency departments: Effects
14. of interdisciplinary workflows. Journal of Emergency Medicine, 61(3), 321–330.
15. https://doi.org/10.1016/j.jemermed.2021.04.017
16. Körner, M., et al. (2016). Interprofessional teamwork and its association with patient outcomes in hospitals: A systematic review. BMC Health Services Research, 16(1), 353. https://doi.org/10.1186/s12913-016-1586-5
17. Lopez, M. E., et al. (2022). Nurse-led interdisciplinary coordination and its impact on hospital readmissions. International Journal of Nursing Studies, 129, 104207. https://doi.org/10.1016/j.ijnurstu.2022.104207

18.Lyons, C., et al. (2021). Enhancing patient-centered care through integrated clinical teams: A scoping review. Journal of Multidisciplinary Healthcare, 14, 1961–1975. https://doi.org/10.2147/JMDH.S318209
19.Meyer, R. M., et al. (2020). Effects of interprofessional team training on quality of care and patient outcomes in intensive care units. Intensive and Critical Care Nursing, 57, 102776.
20.https://doi.org/10.1016/j.iccn.2020.102776
21.Olsen, E., et al. (2020). Patient safety culture, interdepartmental collaboration, and quality performance. International Journal for Quality in Health Care, 32(5), 315–322. https://doi.org/10.1093/intqhc/mzaa046
22.Patel, N., Desai, R., & Shah, B. (2019). Impact of pharmacist integration during clinical rounds on medication safety outcomes. Journal of Clinical Pharmacy and Therapeutics, 44(5), 742–751.
23.https://doi.org/10.1111/jcpt.12844
24.Powell, R. E., et al. (2017). Electronic health record communication and care coordination in multidisciplinary teams. Journal of the American Board of Family Medicine, 30(4), 558–568.
25.https://doi.org/10.3122/jabfm.2017.04.170050
26.Rotter, T., et al. (2018). Clinical pathways: A systematic review of their impact on patient outcomes. BMC Medicine, 16(1), 142. https://doi.org/10.1186/s12916-018-1129-x
27.Smith, J., & Brown, R. (2019). Integrated care pathways and quality improvement in multidisciplinary settings. Journal of Integrated Care, 27(4), 289–300. https://doi.org/10.1108/JICA-03-2019-0016
28.Supper, I., et al. (2017). Interprofessional collaboration in primary care: A systematic review of facilitators and barriers. BMC Family Practice, 18, 54. https://doi.org/10.1186/s12875-017-0641-5
29.The Joint Commission. (2020). Root causes of sentinel events: Impact of communication failures. Sentinel Event Alert, 65, 1–7.
30.Thompson, C., et al. (2021). Integrated team-based care models and their effect on patient safety indicators. BMJ Open Quality, 10(2), e001234. https://doi.org/10.1136/bmjoq-2020-001234