VIEWPOINT

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Telephone Follow-Up After Cardiac Surgery: A Strategy to Reduce Readmissions and Unnecessary Emergency Visits

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Abstract

Hospital readmission after cardiac surgery imposes substantial clinical and financial burdens, particularly in resource-limited countries such as Nepal. Recurrent readmissions and unnecessary emergency visits create significant emotional, physical, and economic stress for patients and caregivers while increasing healthcare utilization and hospital stay. Inadequate discharge counselling and incomplete understanding of postoperative instructions further contribute to high revisit rates. Structured telephone follow-up may provide a simple and cost-effective strategy to bridge the gap between hospital discharge and recovery. It can reinforce adherence to medications, facilitate early identification of warning signs, and help to prevent avoidable emergency visits. International evidence supports its role in improving patient satisfaction and reducing readmissions. However, evidence from South Asia remains limited. Tailored implementation of structured telephone follow-up may serve as a practical strategy to improve postoperative outcomes after cardiac surgery in Nepal.

Key words: Cardiac Surgical Procedures; Follow-Up Studies; Patient Readmission; Telephone Follow-Up.

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Introduction

Advances in patient safety and postoperative care have made minimizing surgical readmissions a major priority.[1] Despite this, limited research has explored the causes of rehospitalisation after cardiac surgery.[2] Approximately 10–20% of cardiac surgery patients are readmitted, most within two weeks of discharge, resulting considerable clinical and economic burdens.[3–5]

Telephone-based postoperative follow-up has emerged as an effective strategy to improve medication adherence, reinforce home-care instructions, identify warning signs early, and limiting unnecessary emergency visits. [6] In addition to clinical support, follow-up calls provide reassurance to patients and caregivers during recovery. Minor postoperative concerns such as swelling, medication confusion, or anxiety can often be managed over the phone, reducing outpatient overcrowding and avoidable hospital visits.

Recent studies from Nepal and Pakistan have highlighted considerable early readmission rates among cardiovascular and post-cardiac surgery patients, emphasizing the need for structured postoperative follow-up in South Asia. [7,8]

Although cardiac surgery has been practiced in Nepal for over 25 years, routine telephone follow-up has not yet been widely implemented. Structured tele-follow-up may help reduce unnecessary emergency visits and readmissions while improving postoperative recovery. Further randomized controlled trials are needed to evaluate its effectiveness in the Nepalese context.

The Problem: Readmission after Cardiac Surgery

Postoperative complications including infections, arrhythmias, heart failure, and fluid imbalance remain major causes of early readmission after cardiac surgery.[3] Most readmissions occur due to cardiac, pulmonary, gastrointestinal, thromboembolic, saphenous vein harvest-site, sternal wound, or metabolic complications.[9] Recent studies have identified heart failure and medical complications as increasingly predominant causes of readmission, surpassing purely surgical complications.[10,11]

These events place substantial physical, emotional, and financial burdens on patients and healthcare systems. [12] Socioeconomic disparities, poor follow-up, and fragmented continuity of care further increase the risk of rehospitalisation. [13] Many early readmissions are potentially preventable, highlighting the necessity for improved postoperative support. Beyond direct costs, readmissions also strain hospital capacity, reduce bed availability, and increase caregiver burden, resulting in indirect economic losses. [14]

Role of Telephone Follow-Up

Telephone base follow-up is a simple and cost-effective strategy to reduce unnecessary hospital visits after cardiac surgery. Structured post-discharge calls help identify warning signs early, reinforce medication and wound-care instructions, and address patient concerns before clinical deterioration occurs. Studies have shown that telephone follow-up improves patient adherence, engagement, and satisfaction while reducing early readmissions. Broader telehealth approaches have also demonstrated benefits in postoperative recovery and continuity of care. [15]

Opportunities and Barriers

In Nepal, telephone follow-up offers a practical solution to challenges related to geography and limited healthcare access. However, barriers such as lack of trained staff, absence of standardized protocols, language barriers, cognitive limitations, and financial constraints hinder implementation. Structured follow-up tools, staff training, and collaboration with community health workers may help overcome these challenges.

Future Directions

Structured telephone follow-up should be integrated into routine standard postoperative care as part of patient-centered healthcare. Future multicenter studies in Nepal are needed to evaluate its clinical and economic benefits. Policymakers and hospital administrators should also consider telephone follow-up outcomes as quality indicators to improve accountability and reduce avoidable readmissions. Large population-based studies show that readmissions remain common, and factors such as care coordination and hospital linkage significantly influence outcomes, highlighting the importance of structured follow-up strategies. [16]

Practical Implementations

The initial follow-up call should ideally be conducted within 2–3 days after discharge by a trained healthcare professional, with subsequent calls scheduled as clinically indicated. A structured questionnaire should be utilized to evaluate recovery progress, medication adherence, wound status, symptoms, and warning signs to ensure safe postoperative recovery.

Conclusion

Reducing hospital readmissions after cardiac surgery is essential to improve outcomes and lowering healthcare costs. This viewpoint highlights the substantial burden of largely preventable readmissions and unnecessary emergency visits. Structured telephone follow-up is a practical, affordable, and scalable strategy to reduce the gap between discharge and normal recovery. Its integration into routine postoperative care may improve recovery, reduce avoidable complications, and strengthen patient-centered cardiac surgical care in Nepal.

Limitations

This viewpoint article is based primarily on existing literature and observational evidence, with limited data specific to the Nepalese context. Further prospective and randomized studies are required to establish the feasibility and effectiveness of structured telephone follow-up after cardiac surgery in Nepal.

Conflict of Interest

None.

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