

Post Discharge Telephone Follow up Reduces Early Hospital Readmission in Patients after Congenital Heart Surgery

Entela B. Lushaj, MD, PhD, Kari Nelson, APNP, Kate Amond, APNP, Eugene Kenny, PA, Abbasali Badami, MD, Petros V. Anagnostopoulos, MD

Background

Research shows many adverse events happen within the first 72 hours of discharge in patients after congenital heart surgery (CHS). We established a system of post discharge telephone follow-up (TFU) interview in 2012 to identify potential post discharge complications in CHS patients before they would escalate.

Methods

Structured phone calls were made 1-4 days post discharge, by senior surgical practitioners. Demographics and clinical outcomes of pediatric patients receiving a TFU from 2012 to 2014 were assessed. FFIEC Census Report (<http://www.ffiec.gov/Geocode/default.aspx>) was used to assess socio-economic status. Patient population consisted of 43 neonates, 61 infants and 61 children.

Results

There were 196 total phone calls with 1-4 phone calls per patient. A total of 34 health problems were identified in 32 patients. Of those, 47% (n=15) were identified in infants, 28% in children and 25% in neonates ($p>0.05$). Patient's severity of disease as expressed by RACHS score, hospital length of stay, presence of GI/nutritional complications after surgery, preoperative genetic abnormality, and socio-economic status was not associated with TFU identified problems. The majority of problems were identified in middle-class patients (52%). Nine of the problems identified were GI complications that were resolved with minor interventions at home. Eighteen patients had adjustments of medications as a result of the TFUs. Six TFUs resulted in earlier than scheduled post-op clinic visits. Total 30-day readmission rate was 17.5% (n=29). There were 4 unplanned hospital readmissions of patients with identified problems at TFU. All of them were after the first post-op clinic visit. There were 25 readmissions of patients with no problems identified at TFU; 7 (24%) of these readmissions were before the first post-op clinic visit.

Conclusion

Timely post-discharge TFU is a useful tool in identifying post-discharge complications and modifying discharge instructions. We could not identify factors associated with the development of early post discharge problems. TFU appears to reduce hospital readmissions before first post-op clinic visit. We believe TFUs are helpful, as a supplement standard of care to help identify adverse events that could otherwise escalate.