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FRAILITY, COMORBIDITY, AND RISK OF HOSPITAL READMISSION: A 2025 COHORT STUDY IN A SUBURBAN HOSPITAL WITHOUT INTERMEDIATE CARE FACILITIES

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Background. Thirty-day hospital readmission is a key quality indicator in Internal Medicine. Administrative tools like the Charlson Comorbidity Index (CCI), LACE index, and Hospital Frailty Risk Score (HFRS) estimate post-discharge risk, but their performance in hospitals lacking Intermediate Care facilities remains unclear.

Materials and Methods. This retrospective observational study included 851 adult patients admitted to a suburban general hospital in 2025. In-hospital deaths and elective admissions were excluded. The primary outcome was unplanned 30-day readmission. Associations between readmission and CCI, LACE, HFRS, length of stay (LOS), and discharge destination were assessed using univariate and multivariate analyses.

Results. Thirty-day readmission occurred in a minority of cases. $HFRS \geq 5$ was significantly associated with readmission, identifying a high-risk subgroup; no readmissions occurred among patients with $HFRS < 5$. Conversely, CCI, LACE score, LOS, and discharge destination showed no significant association with readmission. In multivariable analysis, frailty measured by HFRS demonstrated the strongest association with readmission risk.

Conclusions. In a suburban hospital without intermediate care units, HFRS outperformed traditional comorbidity and readmission scores in predicting 30-day readmission. Frailty-based tools may better support discharge planning and risk stratification in similar healthcare settings.