

Association between operational positive depression symptom screen scores on hospital admission and 30-day readmissions

Danny Lee, Rachel Fridman, Michelle S. Keller, Joshua Lee and Joshua M. Pevnick
Cedars-Sinai Medical Center, USA

Background: Positive scores on inpatient depression symptom screens have been found to be associated with readmissions, yet most studies have used depression screens collected as part of research studies.

Objective: We evaluated whether the relationship between depression severity and readmission persisted when depression screening data was obtained for operational purposes.

Design: Retrospective analysis studying prospective use of PHQ data.

Setting: Large academic medical center.

Intervention: Ward nurses obtained depression screens from patients soon after admission. Patients who answered 'yes' to at least one Patient Health Questionnaire (PHQ)-2 question were screened using the PHQ-9. main outcomes and measures: We examined the association between depression severity and 30-day readmissions using logistic regression, adjusting for known predictors of hospital readmission.

Results: From July 2014-June 2016, 18,792 discharged adult medicine inpatients received an initial depression screen (PHQ-2) and 1,105 patients (5.90%) had at least one positive response. Of this group, 3,163 patients (6.32%) were readmitted within 30 days. 1,128 patients received the PHQ-9. Compared to patients with no depression, patients with moderately-severe depression had 3.03 higher odds (95%CI: 1.44-6.38) and patients with severe depression had 1.63 higher odds (95%CI: 0.70-3.78) of being readmitted, after adjusting for known predictors of hospital admission. Adding PHQ-9 results did not significantly improve the predictive power of a readmissions model.

Conclusions: Our mixed results call into question whether PHQ data obtained for operational purposes may differ compared to data obtained for research purposes. Differences in training of screening staff or patient discomfort with discussing depression in the hospital could explain our findings.

Biography

Danny Lee, MD has a strong passion in serving individuals who struggle with a mental illness. He has conducted multiple cross-sectional studies in the past studying stigma behind mental illness. His most recent study looked at how hospital PHQ data can impact hospital readmissions. He has volunteered extensively in the past with the Didi Hirsch Suicide Prevention Center, providing crisis counseling to the people of Los Angeles County. Now as a family practice physician, he hopes to help the most vulnerable people in the community navigate our complicated health care and mental health care system.