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Title
Post-Acute Sequelae of COVID-19 Infection: Risk of New Hospitalization for Non-
COVID-19 Conditions

Priority 1 (Research Category)
COVID-19

Presenters
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Abstract
Context: Reports of post-acute sequelae of COVID-19 continue to emerge, but it remains unclear how
the severity of a patient’s COVID-19 infection affects risk for future hospitalizations for non-COVID-19
problems. Objective: To examine in a 6-month cohort the risk of a hospitalization among patients
infected with COVID-19. Study Design, Setting, and Participants: This retrospective cohort study
assessed University of Florida Health adult patients (n=10,646 patients) who were PCR validated to be
COVID-19 positive or negative and followed them for 6 months using electronic health records. The data
were left censored for 30 days to exclude readmissions. Outcome Measures: Hospitalization for any
cause and for conditions that could be seen as complications of COVID-19 (cardiovascular, respiratory,
and clotting diagnoses). The 6-month risk of a new hospitalization was assessed in both unadjusted and
adjusted Cox regressions. Results: Of the 10,646 patients, 114 had severe COVID-19, 211 had
mild/moderate COVID-19, and 10,321 were COVID-19 negative. After adjustment for potential
confounding variables, there was no significantly increased risk in future hospitalization for any
condition for patients who were COVID-19 positive versus those who were COVID-19 negative (HR 1.31;
95% CI 0.98, 1.74). In adjusted analyses, individuals with severe COVID-19 had an increased risk of
hospitalization for potential complications compared to both mild/moderate COVID-19 (HR 2.20; 95% CI
1.13, 4.28) and COVID-19 negative patients (HR 2.24; 95% CI: 1.52, 3.30). Conclusions: Patients with a
severe COVID-19 episode were at greater risk for future hospitalizations. This study reinforces the
importance of preventing infection in patients at higher risk for severe COVID-19 cases.