

MALNUTRITION AND OPIOID USE DISORDER (OUD) ARE ASSOCIATED WITH HIGHER 30-DAY READMISSION RATES IN PATIENTS INITIALLY ADMITTED FOR ULCERATIVE COLITIS

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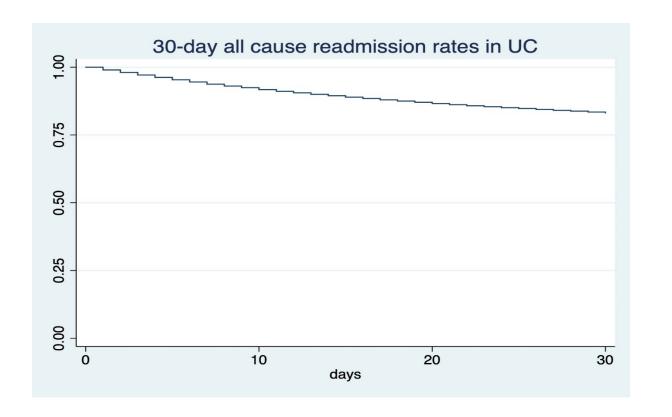
BACKGROUND

Ulcerative colitis (UC) is a chronic disorder that predisposes patients to multiple complications. Readmissions to the hospital pose a burden to patients and health-care systems. Preventing readmissions is important for quality of care and quality of life of patients with UC. We aim to identify the incidence of 30-day readmissions and its predictors.

METHODS

Retrospective review of the 2018 National Readmission Database (NRD) of adult patients readmitted after an index admission of UC. ICD-10CM/PCS codes were used to identify UC, other comorbidities and procedures. We identified the most common causes for readmission and independent risk factors for readmission were identified using Cox regression analysis.

Variable	N (%)
Female	(52.8)
Age in years	53.2 (52.9-53.5)
Insurance provider	(
Medicare	(41.3)
Medicaid	(14.5)
Private	(40.3)
Uninsured	(3.7)
Median Income in patient zip code	
\$1 - 42,999	(23.1)
\$43,000-53,999	(27.1)
\$54,000-70,999	(26.5)
\$≥71,000	(23.3)
Patient residence	
Large metropolitan area with at least 1 million residents	(59.9)
Small metropolitan areas with less than 1 million residents	(33.8)
Micropolitan areas	(4.9)
Not metropolitan or micropolitan (nonurban residual)	(1.3)
Charlson Comorbidity Index Score (%)	
0	(42.1)
1	(21.1)
2	(12.5)
≥3	(24.1)
Hospital Bed size (%)	
Small	(17.5)
Medium	(26.7)
Large	(55.6)
In-hospital procedures (%)	
Parenteral nutrition	(1.5)
Colonoscopy	(17.7)
Partial colectomy	(0.4)
Total colectomy	(1.6)
lleostomy	(1.7)
In-hospital complications (%)	
Acute kidney injury	()
SIRS	()
Mechanical ventilation	(1.5)
Shock	(1.6)
Other Comorbidities (%)	
Alcohol use disorder	(4.7)
Tobacco use disorder	(0.8)
Cannabis use disorder	(2.5)
Opioid use disorder	(2.4)
Malnutrition	(11.8)
Obesity	(13.7)
Clostridium difficile	(5.7)
Primary sclerosing cholangitis	(0.2)
Primary biliary cirrhosis	(0.2)
Non-alcoholic steatohepatitis	(2.8)
Teaching hospital (%)	(73.8)
Urban hospital (%)	(80.0)



RESULTS

- A total of 68,889 index admission (IA) patients were identified, out of which 16.5% (n=11,411) were readmitted within 30-days of discharge.
- 8.3% of readmissions were secondary to sepsis.
- Readmitted patients had higher rates of in-hospital mortality (3.4% vs. 2.1%; P< 0.01).
- Independent predictors of readmission were CCI of \geq 3 (aHR 1.95; 95% CI [1.78- 2.13]), undergoing ileostomy during IA (aHR 1.39; 95% CI [1.06-1.82]), increasing LOS (aHR 1.00; 95% CI [1.00-1.01), malnutrition (aHR 1.29; 95% CI [1.17-1.43]) and OUD (aHR 1.45; 95% CI [1.26-1.68]). Private insurance (aHR 0.78; 95% CI [0.72-0.85]), female gender (aHR 0.92; 95% CI [0.87-0.98]) and younger age (aHR 0.99; 95% CI [0.99-0.99]) were associated with less odds of early readmission.

CONCLUSIONS

The 30-day readmission rate for UC in 2018 was 16.5%. Readmission is associated with higher mortality and are associated with risk factors such as malnutrition and OUD.