This study’s purpose was to identify risk factors for ED visits during OPAT and risk factors for hospitalization among patients with ED visits” Shrestha et al (2018).

Abstract:

OBJECTIVES: Patients receiving outpatient parenteral antimicrobial therapy (OPAT) may require emergency department (ED) visits to manage complications. This study’s purpose was to identify risk factors for ED visits during OPAT and risk factors for hospitalization among patients with ED visits.

METHODS: All OPAT courses initiated between 1 January 2013 and 1 January 2017 at Cleveland Clinic were identified. The first OPAT course per patient was included. For these, ED visits within 30 days were identified. Reasons and risk factors for these visits were sought, as were risk factors for hospitalization among patients visiting the ED.

RESULTS: Among 8263 patients on OPAT, 381 (4.6%) had at least one ED visit, an additional 1133 (14%) were hospitalized and an additional 50 (0.6%) died, within 30 days. One hundred and ninety-three ED visits (51%) were OPAT related. In a multivariable subdistribution proportional hazards competing risks regression model, prior ED visit (preceding year) was most strongly associated with ED visits (HR 2.29, 95% CI 1.76-2.98, P = 8.1 × 10-10). Eighty-five visits (22%) led to hospitalization. Compared with non-OPAT-related reasons, visits for vascular access complications were associated with lower odds of hospitalization (OR 0.36, 95% CI 0.14-0.83, P = 0.022) and visits for worsening infection with higher odds (OR 18.95, 95% CI 5.50-79.85, P = 1.2 × 10-7).

CONCLUSIONS: Compared with patients without, patients with prior ED visit have a 2.3-fold higher hazard of an ED visit within 30 days of OPAT initiation. Visits for worsening infection are much more likely to result in hospitalization than those for vascular access complications.

Reference: