

LETTER FROM THE EDITOR



Clostridium difficile infection is known to be associated with the use of antibiotics, and a recent announcement by the US Food and Drug Administration (FDA) highlights the fact that *C. difficile*-associated diarrhea is also associated with the use of proton pump inhibitors (PPIs). In a Drug Safety Communication posted on February 8, 2012, the FDA warned of the association between PPIs and *C. difficile*-associated diarrhea and stated that it was working with manufacturers to include this information on PPI drug labels (<http://www.fda.gov/Drugs/DrugSafety/ucm290510.htm>). This announcement also stated that the FDA would be reviewing the risk of *C. difficile*-associated diarrhea in patients who are being treated with H₂-receptor blockers, suggesting that the risk of *C. difficile*-associated diarrhea may not be unique to PPIs.

To minimize the risk of *C. difficile* infection in patients taking PPIs, the FDA announcement recommended that patients use the lowest dose and shortest duration of PPI therapy appropriate for their condition. This FDA warning also advised clinicians to consider *C. difficile*-associated diarrhea as a diagnosis in PPI-treated patients who have diarrhea that does not improve.

While minimizing PPI use could help to reduce the risk of *C. difficile* infection, this condition has many other causes and will likely continue to be a concern among gastroenterologists. Fortunately, progress is being made in the treatment of this condition, with recent research focusing on the efficacy of both fidaxomicin (Dificid, Optimer Pharmaceuticals) and fecal transplantation as treatments for *C. difficile* infection.

A study that was published online ahead of print in *The Lancet Infectious Diseases* compared fidaxomicin versus vancomycin in patients with acute, toxin-positive *C. difficile* infection (Cornely OA, et al. *Lancet Infect Dis*. 2012 Feb 7). This multicenter, double-blind, randomized, noninferiority study enrolled 535 patients, with 270 patients assigned to receive fidaxomicin (200 mg every 12 hours) and 265 patients assigned to receive vancomycin (125 mg every 6 hours). Among the 451 patients in the per-protocol population, clinical cure was achieved in 91.7% of the fidaxomicin-treated patients and 90.6% of the vancomycin-treated patients, thus meeting the study's noninferiority criterion. The study also found that the occurrence of treatment-emergent adverse events was similar in both groups. While vancomycin is the current standard-of-care therapy for

C. difficile infection, the findings by Cornely and colleagues suggest that fidaxomicin is an effective alternative.

Another option for treatment of *C. difficile* infection is to perform a fecal transplantation procedure. As Lawrence J. Brandt discusses in the Advances in IBD column on page 191, studies have shown that fecal transplantation can cure *C. difficile* infection in over 90% of cases. In fact, Brandt reports a cure rate of 98% when patients received a fecal transplant followed by a course of vancomycin (with or without a second fecal transplantation procedure). Given this high degree of efficacy, patients with *C. difficile* infection are typically quite willing to undergo this procedure; in fact, a majority of the patients in the study by Brandt and colleagues stated that they would prefer to receive fecal transplantation as a first-line treatment if they experienced a recurrence of their *C. difficile* infection. Given these impressive results, both fecal transplantation and fidaxomicin appear to be effective treatments for *C. difficile* infection, and clinicians may want to consider these options in appropriate patients.

Turning to other topics, this issue of *Gastroenterology & Hepatology* offers 2 interesting features: an evidence-based protocol for management of acute liver failure and a study of the psychosocial factors that contribute to disease activity and quality of life in patients with inflammatory bowel disease. This month's columns address not only the use of fecal transplantation for the treatment of *C. difficile* infection but also the use of protease inhibitors in liver transplant recipients, quality indicators for colonoscopy, and the use of symptom indices for managing patients with gastroesophageal reflux disease. Finally, the current issue presents a case of subacute liver failure secondary to amyloid light-chain amyloidosis and a case of Cronkhite-Canada syndrome.

I hope you find these articles interesting, relevant, and edifying.

Sincerely,

A handwritten signature in dark ink, appearing to read "Gary R. Lichtenstein". The signature is fluid and cursive, with the first name being the most prominent.

Gary R. Lichtenstein, MD, AGAF, FACP, FACG