

## Anidulafungin

### A Viewpoint by José A. Vazquez

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The incidence of serious fungal infections has increased dramatically over the last 20 years. Until recently, available treatment for serious fungal infections was comprised of amphotericin B and azoles that have significant limitations. Echinocandins are a new class of drugs that have shown promising results as antifungal agents in treating a variety of fungal infections. Anidulafungin is a novel echinocandin that appears to have several advantages over other antifungal medications. It is different because it slowly degrades in human plasma, undergoing a process of biotransformation rather than being metabolised, thus having a unique pharmacokinetic profile. In addition, it has *in vitro* activity against a broad group of fungi including azole-resistant strains, and excellent safety parameters. Additionally, anidulafungin does not require dosage adjustments for patients on the basis of age, gender, weight, disease state, concomitant drug therapy, or renal or hepatic insufficiency. Moreover, the pharmacokinetics are not affected by the coadministration of a variety of medications including cyclosporin (cyclosporine), voriconazole and amphotericin B.

Results of several clinical trials imply that anidulafungin is effective in treating oesophageal candidiasis, candidaemia, and invasive candidiasis. In a phase III randomised, blinded trial evaluating anidulafungin versus fluconazole for oesophageal

candidiasis, 97.2% of patients who received anidulafungin and 98.8% of patients who received fluconazole demonstrated evidence of cure or improvement.<sup>[1]</sup> Anidulafungin may also be beneficial in the treatment of candidaemia and candidiasis. An open-label study has shown success rates between 84% and 90% in patients with documented candidaemia.<sup>[2]</sup> A phase III pivotal trial comparing anidulafungin with fluconazole is currently underway to further investigate the use of anidulafungin in treating this infection.

Anidulafungin has also been shown to be effective in treating azole-refractory mucosal fungal infections in HIV-positive patients. Results of a noncomparative study in 20 patients with azole-refractory oesophageal candidiasis suggest a potential role for anidulafungin in this difficult-to-treat population.<sup>[3]</sup> Although limited clinical data are currently available from clinical trials, anidulafungin appears to have excellent clinical efficacy along with a good safety profile and should be an excellent addition to the antifungal armamentarium. ▲

## References

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