

Azole antifungal resistance in candida albicans and candida glabrata isolated from vulvovaginal candidiasis patients

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Abstract:

Background: Vulvovaginal candidiasis (VVC) is the most frequent fungal disorder in healthy and normal women. Objectives: The aim of this study was to evaluate the in vitro antifungal susceptibility of clinical isolates *Candida albicans* and *Candida glabrata*, the two most common candida species in Iranian patients with VVC. Methods: One hundred and eight clinical isolates of candida, including; *C. albicans* (n = 77) and *C. glabrata*: (n = 31) were isolated from the 108 patients with VVC. The in vitro activity of caspofungin (CAS), amphotericin B (AMB), voriconazole (VRC), itraconazole (ITC), fluconazole (FLC), and nystatin (NYS) were determined according to the CLSIM27-A3 and CLSIM27-S4. Results: Our results were shown 8 (25.8 %) and 6 (7.8 %) *C. glabrata* and *C. albicans* isolates resistance to FLU, respectively. Furthermore, resistance to VRC and ITC were observed in 8.4%, and 3.7% of all isolates, and six isolates (5.6%) had intermediate MIC to CAS. Conclusions: We reported 8 (25.8 %) and 6 (7.8 %) *C. glabrata* and *C. albicans* isolates resistance to FLU, respectively. Furthermore, resistance to VRC and ITC were observed in 8.4% and 3.7% of all isolates, respectively.

Keywords: Antifungal Susceptibility, *Candida albicans*, *Candida glabrata*, Vulvovaginal Candidiasis