

## Comparing two methods of antibiogram by using the effect of two drug on microorganism acinetobacter spp. in bahonar hospital of Kerman

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**Background and Aims:** As antimicrobial susceptibility testing of Acinetobacter spp. providing guidance for appropriate treatment, there is a need for simple reliable and cost effective methods of susceptibility testing. The present study was aimed to determine the resistance pattern of Acinetobacter spp. to ciprofloxacin and ceftazidime antibiotics by two methods of disk diffusion and E-test and comparing results together.

**Methods:** This research was performed on nosocomial infections of Acinetobacter spp. in Bahonar hospital of Kerman with cross-sectional methods from 2010 to 2011. Resistance pattern was studied with E-test and disk diffusion methods for ciprofloxacin and ceftazidime antibiotics. The results were then analyzed and compared.

**Result and discussion:** Respectively, the most common infections caused by this organism are pneumonia (62%), urinary tract infection (21%), primarily septicemia (10%), abdominal infections and meningitis (4%), and wound infections (3%). In disk-diffusion method results showed that 85% of bacteria were resistant, 4% of them were semi-sensitive, and 11% of bacteria were susceptible to ciprofloxacin, but in E-test method 95% of bacteria were resistant, 5% were susceptible to this antibiotic. In addition, in disk-diffusion method results showed that 75% of bacteria were resistant, 15% of them were semi-sensitive, and 10% of bacteria were susceptible to ceftazidime, but in E-test method 93% of bacteria were resistant, 4% were semi-sensitive, and 3% were susceptible to this antibiotic. This work demonstrated through analysis and comparison of two results that the two methods of disk diffusion and E-test have almost the same value.

**Keywords:** Bacterial resistance; Acinetobacter; Disk diffusion; E-test