P1816

Abstract (poster session)

Comparison of antimicrobial susceptibility of Acinetobacter baumannii from European inpatient and outpatient isolates: TEST 2007-2011

M. Hackel*, S. Hawser, B. Johnson, R. Badal, S. Bouchillon, J. Johnson, M. Dowzicky (Schaumburg, US; Epalinges, CH; Collegeville, US)

Background: Acinetobacter baumannii has been recognized as an important opportunistic pathogen responsible for pneumonia, septicemia, urinary tract infections and meningitis, and is often associated with nosocomial outbreaks. Due to their capacity to acquire and accumulate resistance determinants, clinical isolates of A. baumannii are often multi-drug resistant and difficult to eradicate. The Tigecycline European Surveillence Trial (TEST) has been monitoring antibiotic susceptibilities in Europe since 2007. This study investigated the activity of tigecycline and comparator antibiotics against clinical isolates of A. baumannii from in-patients (IP) and outpatients (OP) in Europe originating from multiple infection sources collected during 2007 - 2011. Methods: All isolates were collected from European countries during the TEST surveillance program. MICs were performed at each site following CLSI guidelines and interpreted according to EUCAST guidelines where available. CLSI breakpoints were used where EUCAST breakpoints do not exist. Results: Results are shown in the following table (MIC50/90 in mg/L, %S=% susceptible). Conclusions: Tigecycline and minocycline exhibited the highest in vitro activity against A. baumannii, with MIC50/90 values for tigecycline of 0.5/2 mg/L (OP) and 0.25/2 mg/L (IP), and minocycline values of <=0.5/8 mg/L (IP) and <= 0.5/4 mg/L (OP). Minocycline was the only compound tested with susceptibility greater than 80% for both IP and OP. All compounds exhibited a significant difference (p>.001, Fisher's exact test) in %S between IP and OP isolates.

	In-patient (n=3403)			Out-patient (n=278)		
	MIC ₅₀	MIC ₉₀	%S	MIC ₅₀	MIC ₉₀	%S
Amikacin	8	>64	55.1	4	>64	75
Cefepime	16	> 32	49.3	8	> 32	66
Ceftazidime	16	> 32	42.6	≤8	> 32	62
Ceftriaxone	64	>64	23.4	16	>64	32
Levofloxacin	4	>8	41.2	0.25	>8	63
Meropenem	2	>16	57.2	1	>16	73
Minocycline	≤0.5	8	84.5	≤0.5	4	91
Pip Tazo	128	>128	40.9	16	>128	54
Tigecycline	0.5	2	na	0.25	2	na