Antibiotic Susceptibility of Common Organisms

2021 STHS Edinburg Children's - All Units

Numbers indicate percent susceptible; only the first isolate per patient per period is included

			Beta-Lactams								FQ					_	eous		Urine Isolates Only						
SOUTH TEXAS HEALTH SYSTEM®		# of isolates	Oxacillin	Ampicillin ¹	Ampicillin/Sulbactam	Piperacillin/Tazobactam	Cefazolin	Ceftriaxone	Cefepime	Meropenem	Ciprofloxacin	Amikacin	Gentamicin	Tobramycin	Clindamycin	Tetracycline ³	TMP/SMX (Bactrim)	Vancomycin	Linezolid	# of Isolates	1st Gen. Cephs (oral) ⁴	Nitrofurantoin ⁵	Ciprofloxacin	Ampicillin	TMP/SMX (Bactrim)
	Enterobacter cloacae ⁶	32	-	-	-	92	-	-	100	100	100	100	92	92	-	-	92	-	-	-	-	-	-	-	-
Gram Negative	Escherichia coli	612	-	40	54	96	87	87	88	100	84	100	83	84	-	-	61	-	-	540	87	97	84	39	60
	Klebsiella pneumoniae	89	-	0	82	94	91	92	92	100	95	100	96	94	-	-	76	•	-	69	-	33	97	0	74
	Proteus mirabilis	120	-	79	89	99	94	98	100	100	97	100	96	96	-	-	91	-	-	102	93	0	96	79	-
	Pseudomonas aeruginosa	90	-	-	-	97	-	-	98	94	96	97	79	88	-	-	-	-	-	21 [¥]	-	-	100	-	-
	Serratia marcescens	23	-	- 1	-	86	ı	61	100	100	91	96	70	57	-	-	61	-	-	-	-	1	-	-	-
Gram Positive	Staphylococcus aureus ^{8,9}	160	63	-	-	-	-	-	-	-	-	-	91	-	89	93	94	100	100	-	-	-	-	-	-
	Staphylococcus epidermidis	60	-	-	-	-	-	-	-			-	86	-	52	78	64	100	100	-	-		-	-	-
	Staphylococcus hominis	84	-	- 1	-	-	-	-	-	-	-	-	98	-	61	55	58	100	100	-	-	-	ı	-	-
	Enterococcus faecalis	92	-	100	-	-	-	-	-			-	-	-	-	30	-	100	100	74	-	100	ı	100	-

Resistance: 37% MRSA, 0% VRE, 12% ESBL

¹ Ampicillin susceptibility indicates susceptibility to amoxicillin, amoxicillin-clavulanate, ampicillin-sulbactam, and piperacillin-tazobactam

² Aztreonam use is reserved for severe penicillin allergy (e.g. anaphylaxis); caution: may cross-react with ceftazidime allergy

³ Tetracycline susceptiblity indicates susceptiblity to doxycycline and minocycline; some organisms resistant to tetracycline may be susceptible to doxycycline or minocycline

⁴ When used for therapy of uncomplicated UTIs due to E. coli, K. pneumoniae, and P. mirabilis, cefazolin susceptibility indicates susceptibility to the oral agents cefaclor, cefdinir, cefpodoxime, cefprozil, cefuroxime axetil, and cephalexin

⁵ Nitrofurantoin is indicated for use in cystitis only; it should not be used for systemic infections, including pyelonephritis

⁶ Use of 3rd generation cephalosporins is not recommended; these organisms frequently become resistant during therapy

⁷ Formerly known as Enterobacter aerogenes

⁸ Oxacillin and cefazolin are considered first-line antibiotic therapies for MSSA

⁹ For staphylococci that test susceptible, aminoglycosides must be used in combination with beta-lactams or vancomycin for synergy

[¥] Susceptibility rates determined on small sample size (<30) and may be statistically unreliable; interpret with caution