

SIU SOM PEDIATRICS

EMPIRIC ANTIBIOTIC RECOMMENDATIONS FOR SELECT INFECTIONS

This document provides guidance on empiric treatment recommendations for select infections based upon current guidelines and local antibiogram data. Therapy should be modified based upon patient specific culture results once available. These recommendations do not establish a standard of care to be followed in every case. It is recognized that each case is different and those individuals involved in providing health care are expected to use their judgement in determining what is in the best interests of the patient based on the circumstances existing at the time.

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*Durations listed are based on the literature cited or has been agreed upon by the ID division. Some duration of therapies have large variability and are too dependent on clinical course to be specific.

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Bone and Joint¹⁻⁹					
Open fracture prophylaxis / Lawnmower accident	Polymicrobial	<p><u>GRADE I/II OPEN FRACTURES:</u> Cefazolin 33 mg/kg/dose IV q8h (max: 2000 mg/dose)</p> <p><u>GRADE III OPEN FRACTURES:</u> Cefazolin 33 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Gentamicin (see dosing guidelines)</p>	<p><u>ALLERGY:</u> <u>GRADE I/II OPEN FRACTURES:</u> Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose)</p> <p><u>GRADE III:</u> Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose) PLUS Gentamicin (see dosing guidelines)</p>	<p>Prophylaxis: Grade I: 24-48 hrs Grade II/III: 48-72 hrs</p> <p><u>Antibiotic prophylaxis should not extend >24 hours after skin closure for open fractures</u></p>	<p>Recommend ID Consult for Grade III or concern for infection</p> <p>Verify tetanus vaccine status</p> <p>Consider adding High dose PCN if there is presence of fecal material or <i>Clostridium</i> contamination of wound (farm related injuries)</p> <p>Cultures for routine, fungal, and acid-fast pathogens are indicated <u>at the time an infection is suspected</u></p>
Osteoarticular infections > 3 months to < 5 years	MSSA or MRSA <i>K. kingae</i> <i>S. pyogenes</i> <i>S. pneumoniae</i>	Cefazolin 33 mg/kg/dose IV q8h (max 2000 mg/dose)	<p><u>IF H/O MRSA COLONIZATION/ INFECTION OR HOUSEHOLD CONTACT WITH MRSA:</u> ADD Clindamycin 13 mg/kg/dose IV/PO q8h (max: 600 mg/dose)</p> <p><u>IF TOXIC OR BACTEREMIC:</u> ADD Vancomycin (see doing guide)</p> <p><u>IN PATIENTS WITH SICKLE CELL DISEASE OR NO H/O HIB VACCINE:</u> Ceftriaxone 100 mg/kg/dose IV every 24h (max: 2000 mg/day) PLUS Clindamycin 13 mg/kg/dose IV/PO q8h (max: 600 mg/dose)</p>	≥ 4 weeks	<p>Recommend ID consult</p> <p>Obtain NP swab and send for MRSA culture</p> <p>In clinical stable patients consider delaying antibiotics if bone biopsy or joint aspiration planned</p> <p>Vancomycin trough goal 15 – 20 mcg/ml</p> <p>Cephalexin high dose: 100 – 150 mg/kg/day divided QID (max: 4 g/day)</p>

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Osteoarticular infections ≥ 5 years	MSSA or MRSA <i>S. pyogenes</i> <i>S. pneumoniae</i>	Clindamycin 13 mg/kg/dose IV/PO q8h (max: 600 mg/dose)	<u>IF TOXIC OR BACTEREMIC:</u> ADD Vancomycin (see dosing guide) <u>IN SICKLE CELL DISEASE OR NO H/O HIB VACCINE:</u> ADD Ceftriaxone 100 mg/kg/dose IV q24h (max: 2000 mg/day) <u>IF CONCERN FOR GONORRHEA:</u> Ceftriaxone 50mg/kg/dose IV q24h (max: 1000 mg/dose) PLUS Azithromycin 1000 mg PO x 1 (for ≥ 45 kg)	≥ 4 weeks	Recommend ID consult Obtain NP swab and send for MRSA culture In clinical stable patients consider delaying antibiotics if bone biopsy or joint aspiration planned Vancomycin trough goal 15 – 20 mcg/ml Cephalexin high dose: 100 – 150 mg/kg/day divided q 6h (max: 4 g/day)
Central Nervous System ¹⁰⁻¹³					
Brain Abscess	<i>S. anginosus</i> group Anaerobes Enteric gram negatives MSSA or MRSA	Vancomycin (see dosing guide) PLUS Ceftriaxone 50 mg/kg/dose IV q12h (max: 2000 mg/dose) PLUS Metronidazole 7.5 mg/kg/dose IV q6h (max: 500 mg/dose)	<u>CEPHALOSPORIN ALLERGY:</u> Vancomycin (see dosing guide) PLUS Meropenem 40 mg/kg/dose IV q8h (max: 2000 mg/dose)	≥ 4 weeks	Recommend ID Consult Vancomycin trough goal 15 – 20 mcg/mL
CSF shunt infections / Open skull fracture	CONS <i>S. aureus</i> Aerobic gram negative bacilli (including <i>P. aeruginosa</i>) <i>Propionibacterium acnes</i>	Vancomycin (see dosing guide) PLUS Cefepime 50 mg/kg/dose IV q8h (max: 2000 mg/dose)	<u>CEPHALOSPORIN ALLERGY:</u> Vancomycin (see dosing guide) PLUS Meropenem 40 mg/kg/dose IV q8h (max: 2000 mg/dose)		Recommend ID Consult Vancomycin trough goal 15 – 20 mcg/mL Prior to antibiotics obtain shunt CSF studies and cultures (culture has priority over PCR)

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Meningitis (CSF pleocytosis present), patient ≤ 28 days of age	<i>E. coli</i> <i>S. agalactiae</i> (GBS) <i>L. monocytogenes</i>	Ampicillin PLUS Ceftazidime (see dosing guide)		<i>N. meningitidis</i> : 7 days <i>H. influenzae</i> : 7 days <i>S. pneumoniae</i> : 10 – 14 days <i>S. agalactiae</i> (GBS): 14 – 21 days	Recommend ID Consult
Meningitis (CSF pleocytosis present), patient > 28 days of age	<i>S. pneumoniae</i> <i>N. meningitidis</i> <i>S. agalactiae</i> (GBS) <i>H. influenzae</i> <i>E. coli</i>	Ceftriaxone 50 mg/kg/dose IV q12h (max: 2000 mg/dose) +/- Vancomycin** (see dosing guide)	CEPHALOSPORIN ALLERGY: Vancomycin (see dosing guide) PLUS Meropenem 40 mg/kg/dose IV q8h (max: 2000 mg/dose)	Aerobic gram negative bacilli: 21 days <i>L. monocytogenes</i> : ≥ 21 days	Recommend ID Consult **Addition of vancomycin recommended if patient is septic and/or CSF is highly suggestive of bacterial meningitis Vancomycin trough goal 15 – 20 mcg/mL
Meningoencephalitis, Herpes Simplex Virus	HSV1 HSV2	<u>IN ADDITION TO EMPIRIC ANTIBIOTICS FOR MENINGITIS:</u> <u>< 3 months:</u> Acyclovir 20 mg/kg/dose IV q8h <u>3 months – 11 years:</u> Acyclovir 15 mg/kg/dose IV q8h <u>≥ 12 years:</u> Acyclovir 10 mg/kg/dose IV q8h		21 days minimum (repeat HSV CSF PCR towards the end of treatment; if positive extend therapy by 1 week with repeat testing)	Recommend ID Consult Ideal body weight (IBW) should be used for dosing in obese patients See HSV Protocol
Gastrointestinal/Abdominal¹⁴⁻²²					
Appendicitis	Enteric gram negative bacilli Anaerobes	Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose) PLUS Metronidazole 30 mg/kg/dose IV q24h (max: 1500 mg/dose)	ALLERGY: Ciprofloxacin 10 mg/kg/dose IV q12h (max: 400 mg/dose) PLUS Metronidazole 30 mg/kg/dose IV q24h (max: 1500 mg/dose)	-Uncomplicated: pre-op only -Gangrenous: up to 24 hours post-op -Perforated: 7 days -Non-operative: 7 days	Recommend ID consult if abscess See appendicitis protocol

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Cholangitis / Cholecystitis	Enteric gram negative bacilli <i>Enterococcus spp.</i> Anaerobes	Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose) PLUS Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose) <u>IF SEVERE:</u> ADD Ampicillin 50 mg/kg/dose IV q6h (max: 2000 mg/dose)	<u>ALLERGY:</u> Ciprofloxacin 10 mg/kg/dose IV q12h (max: 400 mg/dose) PLUS Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose)		
<i>C. difficile</i>-associated diarrhea	<i>Clostridium difficile</i> Please defer <i>C. Diff</i> testing on patients younger than 2 yrs of age as they may be colonized with <i>C. Diff</i>	<u>NON-SEVERE:</u> Metronidazole 7.5 mg/kg/dose PO q6h (max: 500 mg/dose) <u>SEVERE:</u> Vancomycin 10 mg/kg PO q6h (max: 125 mg/dose) <u>FULMINANT:</u> Vancomycin 10 mg/kg/dose PO q6h (max: 500 mg/dose) PLUS/MINUS Vancomycin 10 mg/kg/dose rectal enema q6h (max: 500 mg/dose) PLUS Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose) <u>FIRST RECURRENCE:</u> Metronidazole 7.5 mg/kg/dose PO q6h (max: 500 mg/dose) OR Vancomycin 10 mg/kg PO q6h (max: 125 mg/dose)		10 days	<u>NON-SEVERE:</u> diarrhea and minimal symptoms <u>SEVERE:</u> (without ileus, not life-threatening): WBC > 15, WBC < 5, albumin < 2.5, elevated SCr <u>FULMINANT:</u> (with ileus or life-threatening): perforation, toxic megacolon, pseudomembranes on colonoscopy, colonic ischemia, or hemodynamic collapse (i.e. vasopressors required) without other obvious cause. Consider rectal vancomycin Recommend ID consult if fulminant or recurrent infection

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Diarrhea	<i>Campylobacter</i> <i>E. coli</i> <i>Salmonella</i> <i>Shigella</i> <i>Yersinia</i>	Antibiotics should only be utilized for specific bacteria after a positive PCR <u>AND</u> if indicated <u>Indications for antibiotics:</u> Age < 3 months Immunocompromised Extra-intestinal disease Severe disease See page 26 if antibiotics indicated			Antimotility agents should not be used because they have been shown to prolong symptomatology and may be associated with an increased risk of death If < 3 months or toxic looking, obtain blood culture
Intra-abdominal infection (Community-acquired)	Enteric gram negative bacilli Anaerobes	Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose) PLUS Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose)	ALLERGY: Ciprofloxacin 10 mg/kg/dose IV q12h (max: 400 mg/dose) PLUS Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose)		
Genitourinary Tract ²³⁻³¹					
Bacterial vaginosis	<i>G. vaginalis</i> <i>Ureaplasma</i> <i>Mycoplasma</i> Anaerobes	Metronidazole 7.5 mg/kg/dose PO q12h (max: 500 mg/dose)		7 days	See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/
Epididymitis	<i>N. gonorrhoeae</i> <i>C. trachomatis</i> Enteric gram negative bacilli (MSM)	Ceftriaxone If > 45 kg, 250 mg IM/IV x1 dose If < 45 kg, 125 mg IM/IV x1 dose PLUS Doxycycline 2 mg/kg/dose PO q12h (max: 100 mg/dose)		Ceftriaxone – 1 dose Doxycycline – 10 days	See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Genital Herpes	Herpes simplex virus (HSV)	<u>ADOLESCENT/ADULT:</u> <u>FIRST EPISODE:</u> Valacyclovir 1 g PO q12h OR Acyclovir 400 mg PO q8h <u>RECURRENT EPISODES:</u> Valacyclovir 1 g PO daily OR Acyclovir 800 mg PO BID		<u>FIRST EPISODE:</u> 7 – 10 days <u>RECURRENT EPISODE:</u> 5 days	Make referral for recurrent infections to public health STI clinic: 217-789-2182 See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/
Pelvic inflammatory disease (PID)	<i>N. gonorrhoeae</i> <i>C. trachomatis</i> Enteric gram negative bacilli Anaerobes	<u>OUTPATIENT (ADOLESCENT):</u> Ceftriaxone If > 45 kg, 250 mg IM/IV x1 dose If < 45 kg, 125 mg IM/IV x1 dose PLUS Doxycycline 2 mg/kg/dose PO q12h (max: 100 mg/dose) PLUS Metronidazole 500 mg PO q12h <u>INPATIENT:</u> Cefoxitin 40 mg/kg/dose IV q6h (max: 2000 mg/dose) PLUS Doxycycline 2 mg/kg/dose PO/IV q12h (max: 100 mg/dose)	<u>ALLERGY:</u> Clindamycin 13 mg/kg/dose IV q8h (max: 900 mg/dose) PLUS Gentamicin (see dosing guide)	14 days	Therapy may be changed to oral after clinical improvement (usually after 24 hours of treatment). See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Sexually transmitted infection (STI)	<i>C. trachomatis</i> <i>N. gonorrhoeae</i>	<u>ADOLESCENT/ADULT:</u> Ceftriaxone If > 45 kg, 250 mg IM/IV x1 dose If < 45 kg, 125 mg IM/IV x1 dose PLUS Azithromycin 1 g PO x1 dose	<u>ALLERGY TO AZITHROMYCIN:</u> Doxycycline 2.2 mg/kg/dose PO q12h (max: 100 mg/dose)	Ceftriaxone – 1 dose Azithromycin – 1 dose Doxycycline – 7 days	Empirically treat both infections if suspicion of either infection See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/
	Syphilis (<i>Treponema pallidum</i>)	<u>PRIMARY / SECONDARY / EARLY LATENT (< 1 YR DURATION):</u> Penicillin G Benzathine 50,000 units/kg/dose IM x 1 dose (max: 2.4 million units/dose)	<u>ALLERGY:</u> Doxycycline 100mg PO bid x 14 days**	One Dose	**Cannot use in pregnancy or congenital, neuro, or tertiary syphilis See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/
		<u>LATE LATENT / LATENT WITH UNKNOWN DURATION / TERTIARY WITH NORMAL CSF:</u> Penicillin G Benzathine 50,000 units/kg/dose IM once weekly x 3 doses (max: 2.4 million units/dose)		Once weekly x 3 doses	
	<u>NEUROSYPHILIS / OCULAR:</u> Penicillin G (Aqueous/Parenteral) 50,000 units/kg/dose IV q4h (max: 4 million units/dose)		10 – 14 days	Consider PCN testing (Pre-Pen) or penicillin desensitization for penicillin allergy Consider ID Consult	

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		<u>CONGENITAL SYPHILIS:</u> Penicillin G (Aqueous/Parenteral) ≤ 7 days of age: 50,000 units/kg/dose IV q12h 8 – 28 days of age: 50,000 units/kg/dose IV q8h ≥ 1 month of age: 50,000 units/kg/dose IV q4 – 6h		10 days	Consider ID Consult
	Trichomoniasis (<i>Trichomonas vaginalis</i>)	<u>Metronidazole</u> < 45 kg: 15 mg/kg/dose PO Q8h x 7 days (max: 1500 mg/day) ≥ 45 kg: 2000 mg PO x1 dose	<u>PREVIOUS TREATMENT FAILURE:</u> Metronidazole ≥ 45 kg: 500 mg PO BID x 7 days		See latest CDC guidelines (2015) https://www.cdc.gov/std/treatment/

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Urinary tract infection (NOT Pyelonephritis)	<i>E. coli</i> Enteric gram negative bacilli <i>S. saprophyticus</i> <i>Enterococcus</i>	<p><u>OUTPATIENT:</u></p> <p>> 1 MONTH OF AGE: Cephalexin 25 mg/kg/dose PO q8h (max: 500 mg/dose)</p> <p>≥ 12 YEARS OF AGE: Nitrofurantoin 100mg PO BID** OR Cephalexin 500mg PO BID</p> <p><u>INPATIENT:</u></p> <p>< 1 MONTH OF AGE: Ampicillin 25 mg/kg/dose IV q6h PLUS Gentamicin (see dosing guide)</p> <p>> 1 MONTH OF AGE: Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose)</p> <p>COMPLICATED UTI***: Ceftazidime 50 mg/kg/dose IV q8h (max: 2000 mg/dose)</p>	<p><u>ALLERGY:</u></p> <p>TMP/SMX 5 mg/kg/dose trimethoprim component PO q12h (max: 800/160 mg/dose) OR Ciprofloxacin 10 mg/kg/dose PO q12h (max: 500 mg/dose) OR Ciprofloxacin 10 mg/kg/dose IV q8h (max: 400 mg/dose)</p>	7 days	<p>** Avoid nitrofurantoin if pregnant, febrile, or pyelonephritis</p> <p>*** Complicated UTI is defined as abnormal GU tract anatomy, indwelling catheter, or history of resistant organisms in urine cultures. Consider ID Consult.</p> <p>Oral therapy is preferred in patients > 1 month old who are non-toxic and can tolerate oral therapy.</p> <p>Consider modifying antibiotics to include coverage of previous urine cultures</p>

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Urinary tract infection, Pyelonephritis	<i>E. coli</i> Enteric gram negative bacilli <i>Enterococcus</i>	<p>< 1 MONTH OF AGE: Ampicillin 25 mg/kg/dose IV q6h PLUS Gentamicin IV (see dosing guide)</p> <p>> 1 MONTH OF AGE: Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose)</p> <p>STEP DOWN THERAPY: Cephalexin 25 mg/kg/dose PO q8h (max: 500 mg/dose) or q12h if age ≥ 12</p> <p>COMPLICATED UTI**: Ceftazidime 50 mg/kg/dose IV q8h (max: 2000 mg/dose)</p>	<p>ALLERGY: Ciprofloxacin 10 mg/kg/dose IV q8h (max: 400 mg/dose) OR Gentamicin IM/IV (see dosing guide)</p> <p>STEP DOWN THERAPY: TMP/SMX 5 mg/kg/dose trimethoprim component PO q12h (max: 800/160 mg/dose) OR Ciprofloxacin 10 mg/kg/dose PO q12h (max: 500 mg/dose)</p>	10 – 14 days	<p>Consider modifying antibiotics to include coverage of previous urine cultures</p> <p>**Complicated UTI is defined as abnormal GU tract anatomy, indwelling catheter, or history of resistant organisms in urine cultures. Consider ID Consult</p>
Respiratory tract, Ears/Nose/Throat Infections ³²⁻⁵⁰					
Aspiration pneumonia	Oral flora	<p>OUTPATIENT: Amoxicillin/clavulanate 45 mg/kg/dose amoxicillin component PO q12h (max: 875 mg amoxicillin/dose)</p> <p>INPATIENT: Ampicillin/sulbactam 50 mg/kg/dose ampicillin component IV q6h (max: 2000 mg ampicillin/dose)</p>	<p>ALLERGY: Clindamycin 13 mg/kg dose IV q8h (max: 600 mg/dose)</p>	7 – 10 days	<p>Standard adult doses for amoxicillin/clavulanate: 875 mg/125 mg PO BID OR 500 mg/125 mg PO TID</p>

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Community acquired pneumonia (CAP) (uncomplicated)	<i>S. pneumoniae</i> <i>Mycoplasma pneumoniae</i>	<u>OUTPATIENT:</u> Amoxicillin 30 mg/kg/dose PO q8h (max: 1000 mg/dose)** <u>INPATIENT:</u> Ampicillin 50 mg/kg/dose IV q6h (max: 2000 mg/dose) <u>IF ATYPICAL PNEUMONIA SUSPECTED, ADD:</u> Azithromycin: 10 mg/kg PO on day 1 (max: 500 mg/dose), followed by 5 mg/kg PO q24h on days 2 – 5 (max: 250 mg/dose)	<u>ALLERGY TO PENICILLINS:</u> Ceftriaxone 50 mg/kg/dose q24h (max: 2000 mg/dose) OR Levofloxacin 6 mo-4 years: 10 mg/kg/dose IV/PO q12h ≥ 5 years: 10 mg/kg/dose IV/PO q24h (max: 750 mg/dose)	5 – 7 days	For unimmunized consider ceftriaxone Children receiving antibiotics outpatient that are being admitted for CAP should still be started on Ampicillin IV **For coverage of resistant <i>S. pneumoniae</i> higher dose than adults may be required
CAP (complicated)	<i>S. pneumoniae</i> <i>S. pyogenes</i> MSSA or MRSA	Ceftriaxone 75 mg/kg/dose IV q24h (max: 2000 mg/dose) PLUS Clindamycin 13 mg/kg dose IV q8h (max: 600 mg/dose)	<u>IF TOXIC OR H/O MRSA COLONIZATION/ INFECTION:</u> Ceftriaxone 75 mg/kg/dose IV q24h (max: 2000 mg/dose) PLUS Vancomycin (see dosing guide)		Consider ID Consult Complicated as defined by significant effusion, empyema, necrotizing pneumonia
Dental abscess	<i>Viridans streptococci</i> <i>Neisseria sp</i> <i>Eikenella sp</i> Anaerobes (<i>Peptostreptococcus</i> , <i>Prevotella sp</i>)	<u>OUTPATIENT:</u> Amoxicillin/clavulanate 25 mg/kg/dose amoxicillin component PO q12h (max: 875 mg amoxicillin/dose) <u>INPATIENT:</u> Ampicillin/sulbactam 50 mg/kg/dose ampicillin component IV q6h (max: 2000 mg/dose)	<u>ALLERGY:</u> Clindamycin 13mg/kg/dose IV/PO q8h (max: 600 mg/dose)	10 days	

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Hospital/Ventilator associated pneumonia (HAP/VAP)	Gram negative organisms (<i>Pseudomonas</i> sp, enteric gram negative) MSSA or MRSA	Ceftazidime 50 mg/kg IV q8h (max: 2000 mg/dose)	<u>IF TOXIC OR H/O MRSA COLONIZATION/ INFECTION:</u> ADD Vancomycin (see dosing guide)	7 days	Consider modifying antibiotics to include coverage of previous tracheal aspirate cultures
Influenza	Influenza	<u>TREATMENT:</u> Oseltamivir Infants/Children < 1 year: 3 mg/kg/dose PO q12h Children 1 – 12 years: ≤ 15 kg: 30 mg PO q12h 16-23 kg: 45 mg PO q12h 24-40 kg: 60 mg PO q12h >40 kg: 75 mg PO q12h Children >12 years: 75 mg PO BID <u>PROPHYLAXIS:</u> Oseltamivir 3 months – 1 year: 3 mg/kg PO q24h Children 1 – 12 years: ≤ 15 kg: 30 mg PO q24h 16-23 kg: 45 mg PO q24h 24-40 kg: 60 mg PO q24h >40 kg: 75 mg PO q24h Children >12 years: 75 mg PO q24h		<u>TREATMENT:</u> 5 days <u>PROPHYLAXIS:</u> 10 days	Prophylaxis not recommended for infants less than 3 months of age

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Mastoiditis	<i>S. pneumoniae</i> <i>S. pyogenes</i> <i>H. influenzae</i> MSSA or MRSA	<u>ACUTE MASTOIDITIS:</u> Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose) PLUS Clindamycin 13 mg/kg/dose IV q8h (max: 600 mg/day)	<u>ALLERGY:</u> Meropenem 40 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Vancomycin (see dosing guide)		Recommend ID consult Vancomycin trough goal 15 – 20 mcg/ml
		<u>INTRACRANIAL EXTENSION OR VENOUS SINUS THROMBOSIS:</u> Ceftriaxone 50 mg/kg/dose IV q12h (max: 2000 mg/dose) PLUS Vancomycin (see dosing guide) PLUS Metronidazole 10 mg/kg/dose IV/PO q8h (max: 500 mg/dose)			
		<u>CHRONIC MASTOIDITIS, RECURRENT AOM, RECENT ANTIBIOTICS (consider <i>Pseudomonas</i> infection):</u> Ceftazidime 50 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Clindamycin 13 mg/kg/dose IV q8h (max: 600 mg/dose)			

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Otitis media, acute	<i>S. pneumoniae</i> <i>M. catarrhalis</i> <i>H. influenzae</i> <i>S. pyogenes</i>	Amoxicillin 45 mg/kg/dose PO q12h (max: 1500 mg/dose) OR Amoxicillin/clavulanate 45 mg/kg/amoxicillin component PO q12h (max: 875 mg amoxicillin/dose)**	<u>ALLERGY:</u> Cefdinir 7 mg/kg/dose PO q12h (max: 300 mg/dose) Ceftriaxone 50 mg/kg IM/IV q24h for 1 or 3 days (max: 2000 mg/dose)	< 2 yrs or severe symptoms (any age): 10 days 2 – 5 years with mild-moderate symptoms: 7 days ≥ 6 yrs with mild-moderate symptoms: 5 – 7 days	**Consider high-dose amoxicillin/clavulanate if treated with amoxicillin for AOM in past 30 days or with concomitant conjunctivitis <u>Standard adult doses for Amoxicillin/clavulanate:</u> 875 mg/125 mg PO BID OR 500 mg/125 mg PO TID
Orbital cellulitis (post-septal)	<i>S. pneumoniae</i> <i>Haemophilus spp.</i> <i>S. pyogenes</i> MRSA or MSSA <i>Streptococcus anginosus</i> or <i>Strep spp</i> Anaerobes	Ceftriaxone 50 mg/kg/dose IV q12h (max: 2000 mg/dose) PLUS Clindamycin 13 mg/kg/dose IV q8h (max: 600 mg/day)	<u>IF CONCERN FOR SIGHT-THREATENING INFECTION, TOXIC, MRSA COLONIZATION, OR CNS EXTENSION:</u> Vancomycin (see dosing guide) PLUS Ceftriaxone 50 mg/kg/dose IV q12h (max: 2000 mg/dose) PLUS Metronidazole 7.5 mg/kg/dose IV/PO q6h (max: 500 mg/dose)	14 – 21 days	Recommend ID consult Obtain deep nasal culture prior to starting antibiotics Vancomycin trough goal 15 – 20 mcg/mL
Periorbital cellulitis (pre-septal)	<i>S. pyogenes</i> MRSA or MSSA <i>S. pneumoniae</i>	<u>OUTPATIENT:</u> Amoxicillin/clavulanate 45 mg/kg/dose amoxicillin component PO q12h (max: 875 mg amoxicillin/dose) <u>INPATIENT:</u> Ampicillin/sulbactam 50 mg/kg/dose ampicillin component IV q6h (max: 2000 mg ampicillin/dose)	<u>IF H/O MRSA COLONIZATION/ INFECTION OR HOUSEHOLD CONTACT WITH MRSA:</u> Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose) <u>IF TOXIC:</u> Vancomycin (see dosing guide)	7 – 10 days	Obtain NP swab and send for MRSA culture

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Periorbital cellulitis (entry site on skin)	MSSA or MRSA <i>S. pyogenes</i>	Cefazolin 30 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose) OR Cephalexin 15 mg/kg/dose PO q8h (max: 500 mg/dose) PLUS Clindamycin 10 mg/kg/dose PO q8h (max: 450 mg/dose)	<u>ALLERGY:</u> Clindamycin 13mg/kg/dose IV/PO q8h (max: 600 mg/dose) <u>IF TOXIC:</u> Vancomycin (see dosing guide)	7-10 days	Obtain culture from entry site
Pertussis	<i>Bordetella Pertussis</i>	<u>Azithromycin</u> < 1mo: 10 mg/kg/day PO q24h 1 – 5 mo: 10 mg/kg/day PO q24h ≥ 6 mo: 10 mg/kg (max 500 mg/dose) PO on day 1, then 5 mg/kg (max 250 mg/dose) q24h on days 2 - 5 Adolescents: 500 mg on day 1, then 250 mg PO q24h on days 2-5	<u>ALLERGY:</u> TMP/SMX 4 mg/kg/dose trimethoprim component PO q12h (max: 160 mg trimethoprim/dose)	Azithromycin: 5 days TMP-SMX: 14 days	Postexposure prophylaxis for close contacts
Pharyngitis (GAS)	<i>S. pyogenes</i>	Amoxicillin 50 mg/kg/dose PO q24h (max: 1000 mg/dose) OR Penicillin G Benzathine: < 27 kg: 600,000 units IM x1 dose ≥ 27 kg: 1.2 million units IM x1 dose	<u>ALLERGY:</u> Cephalexin 20 mg/kg/dose q12h (max: 500 mg/dose) OR Clindamycin 7 mg/kg/dose q 8 h (max: 300 mg/dose)	10 days	

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Retro- or para- pharyngeal abscess	Polymicrobial: <i>S. pyogenes</i> <i>S. anginosus</i> group <i>Haemophilus spp.</i> Oral anaerobes MRSA or MSSA	Ampicillin/sulbactam 50 mg/kg/dose ampicillin component IV q6h (max: 2000 mg/ ampicillin/dose)	<u>ALLERGY:</u> Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose) AND/OR Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose)	14 days	
Sinusitis, acute	<i>S. pneumoniae</i> <i>M. catarrhalis</i> <i>H. influenzae</i> <i>S. pyogenes</i>	<u>OUTPATIENT:</u> Amoxicillin/clavulanate 45 mg/kg/dose amoxicillin component PO q12h (max: 875 mg amoxicillin/dose) <u>INPATIENT:</u> Ampicillin/sulbactam 50 mg/kg/dose ampicillin component IV q6h (max: 2000 mg ampicillin/dose)	<u>OUTPATIENT ALLERGY OR TREATMENT FAILURE:</u> Cefdinir 7 mg/kg/dose PO q12h (max: 300 mg/dose) PLUS Clindamycin 10 mg/kg/dose PO q8h (max: 600 mg/dose) <u>BETA-LACTAM ALLERGY:</u> Levofloxacin 10 mg/kg/dose PO q24h (max: 500 mg/dose)	10 days	
Tonsillar or peritonsillar abscess	<i>S. pyogenes</i> <i>S. anginosus</i> group MSSA or MRSA Oral anaerobes Polymicrobial	Ampicillin/sulbactam 50 mg/kg/dose ampicillin component IV q6h (max: 2000 mg ampicillin/dose)	<u>IF MRSA HISTORY CONSIDER:</u> Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose)	10 – 14 days	
Tracheitis (intubated/tracheostomy patient)	Gram negative organisms MSSA or MRSA	Ceftazidime 50 mg/kg/dose IV q8h (max: 2000 mg/dose)	<u>ALLERGY:</u> Ciprofloxacin 10 mg/kg/dose PO q12h (max: 500 mg/dose) <u>IF TOXIC OR PRIOR HISTORY OF MRSA:</u> ADD Vancomycin (see dosing guide)	5 days	Consider modifying antibiotics to include coverage of previous tracheal aspirate cultures

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Tracheitis (non-intubated following croup-like illness)	MSSA or MRSA <i>S. pyogenes</i> <i>S. pneumoniae</i> <i>H. influenzae</i>	Vancomycin (see dosing guide) PLUS Ceftriaxone 75 mg/kg/dose IV q24h (max: 2000 mg/dose)			Recommend ID consult
Skin and Soft Tissue⁵¹⁻⁵⁴					
Abscess	MSSA or MRSA	Clindamycin 13mg/kg/dose IV/PO q8h (max: 600 mg/dose) OR TMP/SMX 5 mg/kg/dose trimethoprim component PO q12h (max: 160 mg trimethoprim/dose)	<u>ALLERGY:</u> Doxycycline 2 mg/kg/dose PO q12h dose (max: 100 mg/dose) <u>IF TOXIC:</u> Vancomycin (see dosing guide)	5 days	Send drainage for culture prior to starting antibiotics Consider Surgery Consult for I&D
Cellulitis (nonpurulent)	<i>S. pyogenes</i> MSSA or MRSA	Cefazolin 30 mg/kg/dose IV q8h (max: 2000 mg/dose) OR Cephalexin 15 mg/kg/dose PO q8h (max: 500 mg/dose)	<u>ALLERGY:</u> Clindamycin 13mg/kg/dose IV/PO q8h (max: 600 mg/dose) <u>IF TOXIC/SEVERE:</u> REFER TO NECROTIZING FASCITIS GUIDELINE BELOW	5 – 7 days	IF prior history of MRSA, consider Clindamycin as 1 st line therapy Obtain NP swab and send for MRSA culture
Human Bite	<i>E. corrodens</i> Oral anaerobes Polymicrobial <i>Streptococci sp.</i> MSSA or MRSA	Amoxicillin/clavulanate 25 mg/kg/dose amoxicillin component PO q12h (max: 875 mg amoxicillin/dose) OR Ampicillin/sulbactam 50mg/kg/dose ampicillin	<u>ALLERGY:</u> Clindamycin 13 mg/kg/dose PO q8h (max: 600 mg/dose) PLUS TMP/SMX 5 mg/kg/dose trimethoprim component PO q12h (max: 800 mg SMX/160 mg	Infected: 10 days Prophylaxis: 3 – 5 days <u>PROPHYLAXIS INDICATIONS:</u> • Moderate or severe bite wounds, especially if edema or crush injury is	Verify tetanus vaccine status For animal bites: assess rabies risk

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Animal Bite	<i>P. multocida</i> Oral anaerobes <i>E. corrodens</i> <i>Capnocytophaga sp.</i> <i>Streptococci sp.</i> MSSA or MRSA	component IV q6h (max: 2000 mg ampicillin/dose)	TMP /dose)	present <ul style="list-style-type: none"> • Puncture wounds, especially if penetration of bone, tendon sheath, or joint • Deep or surgically closed facial bite wounds • Hand and foot bite wounds • Genital area bite wounds • Immunocompromised or asplenic • Cat bite wounds 	
Lymphadenitis, suppurative	MSSA or MRSA Group A streptococcus	Clindamycin 13mg/kg/dose IV/PO q8h (max: 600 mg/dose)	<u>IF LOW SUSPICION OF MRSA IN CLINICALLY STABLE PATIENT:</u> Cefazolin 33 mg/kg/dose IV q8h (max: 2000 mg/dose)	7 – 10 days	If slow response or more severe infection, consider 14 days of treatment
Necrotizing fasciitis	<i>S. pyogenes</i> MSSA or MRSA Polymicrobial (mixed aerobes & anaerobes)	Vancomycin (see dosing guide) PLUS Cefepime 50 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Metronidazole 7.5 mg/kg/dose IV/PO q6h (max: 500 mg/dose) PLUS Clindamycin 13 mg/kg/dose IV q8h (max: 900 mg/dose)	<u>ALLERGY TO BETA-LACTAMS:</u> Vancomycin (see dosing guide) AND Meropenem 20 mg/kg/dose IV q8h (max: 1000 mg/dose) AND Clindamycin 13 mg/kg/dose IV q8h (max: 900 mg/dose)		Recommend ID and Surgery Consults
Pyomyositis (Stage 2 or 3 with pus seen in the muscle tissue)	MSSA or MRSA	Vancomycin (see dosing guide) PLUS Cefazolin 30 mg/kg/dose IV q8h (max: 2000 mg/dose)	<u>IF IMMUNOCOMPROMISED OR OPEN TRAUMA TO MUSCLES:</u> ADD Cefepime 50 mg/kg/dose IV q8h (max: 2000 mg/dose) instead of cefazolin		Recommend ID and Surgery Consults

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Surgical wound infection	Clean wound on trunk, head, neck, extremity: MSSA or MRSA <i>S. pyogenes</i>	Cefazolin 30 mg/kg/dose IV q8h (max: 2000 mg/dose) OR Cephalexin 15 mg/kg/dose PO q8h (max: 500 mg/dose)	IF H/O MRSA COLONIZATION/ INFECTION OR HOUSEHOLD CONTACT WITH MRSA: Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose) IF TOXIC: Vancomycin (see dosing guide IF		Obtain wound cultures prior to starting antibiotics
	Axilla, GI, Perineum, Female genital tract: MSSA or MRSA <i>S. pyogenes</i> Gram negatives Anaerobes	Ceftriaxone 75 mg/kg IV/IM q24h (max: 2000 mg/dose) PLUS Metronidazole 7.5 mg/kg IV q6h (max: 500 mg/dose)	ALLERGY: Ciprofloxacin 10 mg/kg IV/PO q12h (max 400 mg/dose IV or 500 mg/dose PO) PLUS Metronidazole 7.5 mg/kg IV/PO q6h (max: 500 mg/dose) IF H/O MRSA COLONIZATION/ INFECTION OR HOUSEHOLD CONTACT WITH MRSA: Add Clindamycin 13mg/kg/dose IV q8h (max: 600 mg/dose) IF TOXIC: Vancomycin (see dosing guide)		
Miscellaneous ⁵⁵⁻⁶²					
Febrile neutropenia (hematology/oncology patients)	Gram negative bacilli (including <i>P. aeruginosa</i>) Gram positive pathogens (including <i>S. aureus</i> , CONS, <i>Streptococcus</i>)	Ceftazidime 50mg/kg/dose IV q8h (max: 2000 mg/dose)	IF TOXIC, PNEUMONIA, OR CELLULITIS: ADD Vancomycin (see dosing guide) IF ABDOMINAL SYMPTOMS: ADD Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose)		

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Lemierre's Syndrome	<i>Fusobacterium necrophorum</i> <i>Bacteroides sp.</i> <i>Peptostreptococcus</i> <i>S. aureus</i> <i>Streptococcus sp.</i>	Vancomycin (see dosing guide) PLUS Ceftriaxone 50 mg/kg/dose IV q12h (max: 2000 mg/dose) PLUS Metronidazole 7.5 mg/kg/dose IV q6h (max: 500 mg/dose)			Recommend ID Consult
R/O Catheter-associated blood stream infection (CLABSI)	MSSA or MRSA Coagulase Negative Staphylococcus (CONS) Enteric Gram negative bacilli	Vancomycin (see dosing guide) PLUS Ceftazidime 50 mg/kg/dose IV q8h (max: 2000 mg/dose)	IF HISTORY OF SHORT GUT: ADD Metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose)		Recommend ID Consult Obtain blood culture from central line AND periphery before starting antibiotics
R/O Sepsis 0 – 28 days (no central lines)	<i>S. agalactiae (GBS)</i> <i>E. coli</i> <i>L. monocytogenes</i>	Ampicillin PLUS Gentamicin (see Neonatal dosing guide)	<u>IF TOXIC LOOKING OR CONCERNS FOR MENINGITIS (CSF WBC >20)</u> Ampicillin PLUS Ceftazidime (see Neonatal dosing guide)		See sepsis protocol Recommend ID consult if toxic looking or concern for meningitis

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
R/O sepsis > 1 month of age (no central lines and no concern for meningitis)	<i>S. agalactiae</i> (GBS) <i>S. pneumoniae</i> <i>E. coli</i> <i>N. meningitidis</i> <i>S. pyogenes</i>	Ceftriaxone 50 mg/kg/dose q24h (max: 2000 mg/dose) PLUS Vancomycin (see dosing guide)	<u>IF IMMUNOCOMPROMISED:</u> Cefepime 50 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Vancomycin (See dosing guide) <u>IF TOXIN-MEDIATED INFECTION SUSPECTED:</u> ADD Clindamycin 13mg/kg/dose IV q8h (max: 900 mg/dose) <u>IF SUSPECTED ANAEROBIC INFECTION:</u> ADD metronidazole 10 mg/kg/dose IV q8h (max: 500 mg/dose)		
Sickle Cell Disease with Fever	<i>S. pneumoniae</i> Gram negative enterics Salmonella <i>S. aureus</i> <i>Mycoplasma</i>	Ceftriaxone 50 mg/kg/dose IV q24h (max: 2000 mg/dose)**	<u>IF ACUTE CHEST SYNDROME SUSPECTED:</u> ADD Azithromycin 10 mg/kg PO on day 1 (max: 500 mg/dose), followed by 5 mg/kg PO q24h on days 2 – 5 (max: 250 mg/dose) <u>IF TOXIC OR H/O MRSA COLONIZATION/ INFECTION:</u> ADD Vancomycin (see dosing guide)		**Ceftriaxone may increase the risk of severe hemolysis in patients with sickle cell disease
Tickborne Infections	<i>Ehrlichia</i> <i>Rickettsia</i>	Doxycycline 2.2 mg/kg/dose PO/IV q12h (max: 100 mg/dose)		Patients should be treated for at least 3 days after fever subsides and until clinical improvement. Minimum course is 5 – 7 days.	Recommend ID consult

Diagnosis	Common Pathogens	Preferred Empiric Drug(s)	Alternative Drug(s) for Allergy or Clinical Severity	Duration*	Comments
Toxic shock syndrome	<i>S. pyogenes</i> <i>S. aureus</i>	Vancomycin (see dosing guide) PLUS Cefazolin 30 mg/kg/dose IV q8h (max: 2000 mg/dose) PLUS Clindamycin 13 mg/kg/dose IV q8h (max: 900 mg/dose)			Recommend ID consult

PEDIATRIC DOSING RECOMMENDATIONS

VANCOMYCIN EMPIRIC PEDIATRIC DOSING RECOMMENDATIONS

(patients previously therapeutic on vancomycin should be restarted on that dose as appropriate)

< 3 months	15 mg/kg/dose q8h
3 – 11 months	15 mg/kg/dose q6h
1 – 8 years	20 mg/kg/dose q6h
9 – 13 years	20 mg/kg/dose q8h
≥ 14 years	15 mg/kg/dose q8h

- Max: 1500 mg/dose
- Exclusions to this dosing: Patients with renal or cardiac insufficiency
- Check Vancomycin trough prior to 4th dose

Conventional aminoglycoside dosing preferred in the following situations:

- NICU, age < 30 days
- Gram positive synergy
- Renal insufficiency, hemodialysis
- Endocarditis
- Tularemia
- Ascites, burns
- Pregnancy

EXTENDED INTERVAL AMINOGLYCOSIDE DOSING (age > 30 days only) **preferred dosing method**

Cystic Fibrosis

Drug	Daily Dose
Gentamicin / Tobramycin Age ≥ 1 month	10 mg/kg IV q24h
Amikacin Age ≥ 1 month	30 mg/kg IV q24h

Non-Cystic Fibrosis

Drug	Daily Dose
Gentamicin / Tobramycin Age 3 months to < 2 years Age 2 years to < 8 years Age ≥ 8 years	9.5 mg/kg IV q24h 8.5 mg/kg IV q24h 7 mg/kg IV q24h
Amikacin Age ≥ 1 month	15 mg/kg IV q24h

Urinary Tract Infection

Drug	Daily Dose
Gentamicin / Tobramycin Age 1 month to < 5 years Age 5 years to < 10 years Age ≥ 10 years	7.5 mg/kg IV q24h 6 mg/kg IV q24h 5 mg/kg IV q24h

*Check peak and trough if therapy continues > 48 hours

CONVENTIONAL AMINOGLYCOSIDE DOSING (age > 30 days)

Drug	Dose (mg/kg)	Interval (hours)
Gentamicin / tobramycin	2.5	8
Amikacin	5 – 7.5	8
Gentamicin synergy	1 – 2	8

*Check peak and trough if therapy continues > 48 hours

CONVENTIONAL AMINOGLYCOSIDE DOSING (neonates)

Gentamicin / Tobramycin			
PMA (weeks)	Postnatal (days)	Dose (mg/kg)	Interval (hours)
30 to 34	0 to 7	4.5	36
	≥ 8	4	24
≥ 35	ALL	4	24
Amikacin			
PMA (weeks)	Postnatal (days)	Dose (mg/kg)	Interval (hours)
30 to 34	0 to 7	18	36
	≥ 8	15	24
≥ 35	ALL	15	24

*Check peak and trough if therapy continues > 72 hours

NEONATAL DOSING RECOMMENDATIONS

Ampicillin: 50 mg/kg/dose IV		
Postmenstrual age (weeks)	Postnatal age (days)	Interval
≤ 29	0 – 28 > 28	q 12 hr q 8 hr
30 – 36	0 – 14 > 14	q 12 hr q 8 hr
37 – 44	0 – 7 > 7	q 12 hr q 8 hr
≥ 45	All	q 6 hr

*Meningitis dosing: 300 mg/kg/day DIVIDED q8h (age ≤ 7 days) or q6h (age ≥ 8 days)

Ceftazidime: 30 mg/kg/dose IV		
Postmenstrual age (weeks)	Postnatal age (days)	Interval
≤ 29	0 – 28 > 28	q 12 hr q 8 hr
30 – 36	0 – 14 > 14	q 12 hr q 8 hr
37 – 44	0 – 7 > 7	q 12 hr q 8 hr
≥ 45	All	q 8 hr

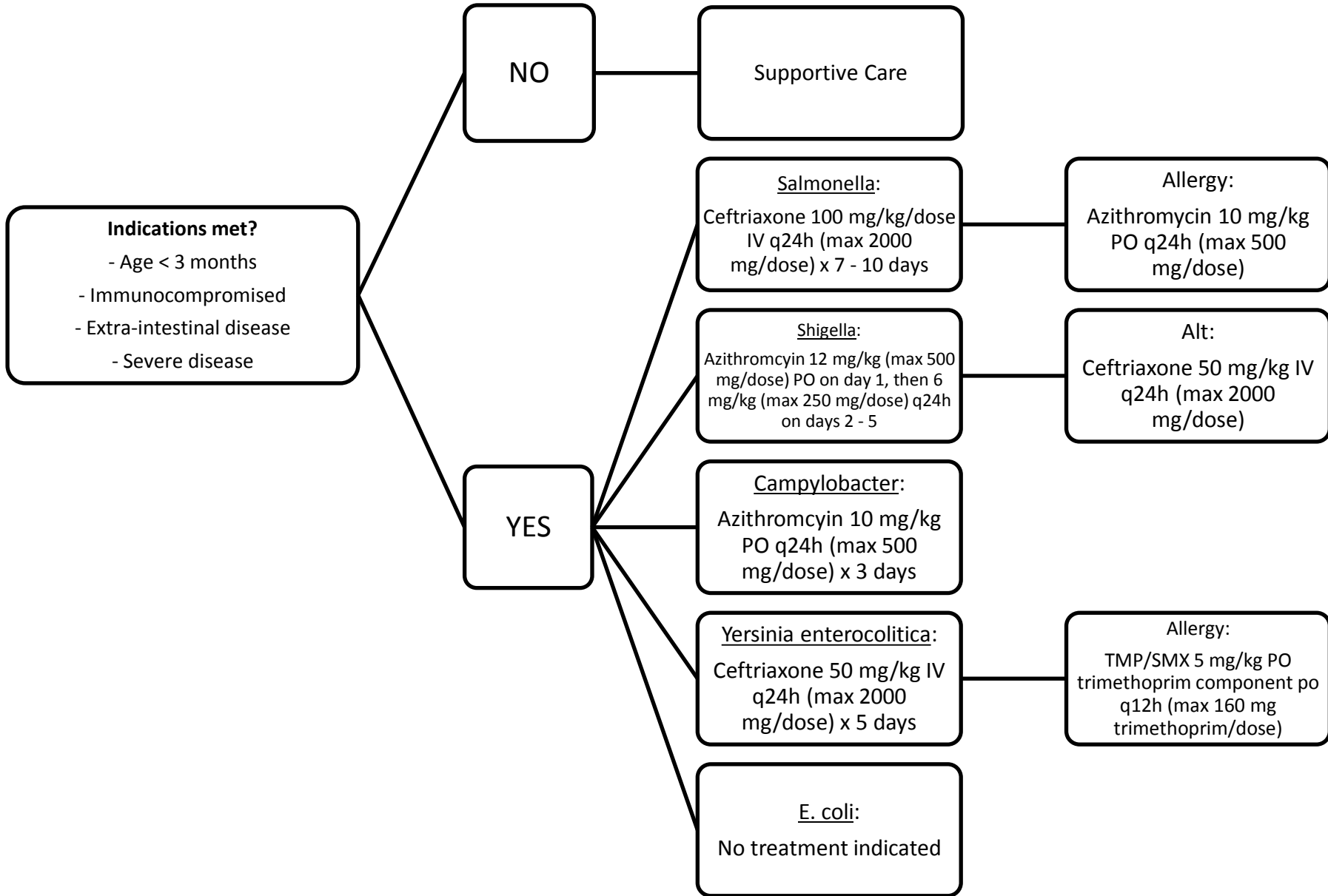
Gentamicin: 5 mg/kg/dose IV			
Postmenstrual age (weeks)	Postnatal age (days)	Dose (mg/kg)	Interval
≤ 29	0 – 7	5	q 48 hr
	8 – 28	4	q 36 hr
	≥ 29	4	q 24 hr
30 – 34	0 – 7	4.5	q 36 hr
	≥ 8	4	q 24 hr
≥ 35	All	4	q 24 hr

Metronidazole: 15 mg/kg/dose load PO or IV, then 7.5 mg/kg/dose*	
Postmenstrual age (weeks)	Interval
≤ 27	q 24 hr
28 – 33	q 12 hr
34 – 40	q 8 hr
> 40	q 6 hr

*For 26 – 27 weeks, give 10 mg/kg maintenance dose

Vancomycin: 15 mg/kg/dose IV		
Postmenstrual age (weeks)	Postnatal age (days)	Interval
≤ 29	0 – 14 > 14	q 18 hr q 12 hr
30 – 36	0 – 14 > 14	q 12 hr q 8 hr
37 – 44	0 – 7 > 7	q 12 hr q 8 hr
≥ 45	All	q 6 hr

TREATMENT OF INFECTIOUS DIARRHEA



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