

Pediatric and Neonatal Antibiotic Surgical Prophylaxis Guideline

1. The start of the infusion for all prophylactic antibiotics should be within 60 minutes prior to incision, except for vancomycin & ciprofloxacin which should be within 120 minutes.
2. The pre-op dose of antibiotic prophylaxis must be counted as part of the 24-hour duration. This results in <24 hours of post-op prophylaxis. For example, if cefazolin is given as pre-op prophylaxis x 1 dose and then prescribed as 1gm IV Q8h for post-op prophylaxis, the patient should receive no more than 2 post-op doses.
3. Many procedures are suitable to receive only a single pre-operative dose of antibiotic prophylaxis. Studies addressing duration of prophylaxis have failed to show any benefit of prophylaxis given after wound closure.
4. If ≥ 30 mL/kg (up to 50 kg) or 1.5L (patients ≥ 50 kg) of blood is lost intra-operatively, surgical prophylaxis antibiotics should be re-dosed.
5. Post-operative antibiotics (oral or IV) prescribed for an indication other than surgical prophylaxis must have adequate documentation of the indication in the medical record so it will not be interpreted as post-op prophylaxis upon review.
6. The Pediatric Antibiotic Surgical Prophylaxis guideline may not be an appropriate reference for patients weighing >60 kg or older than 16 years old. The Adult Antibiotic Surgical Prophylaxis guideline remains available if needed.

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
Cardiac (CT surgery/procedure excluding cardiac catheterization)	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 900 mg if ≥60 kg OR Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 48 hours including pre-op dose
Thoracic	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 900 mg if ≥60 kg OR Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 48 hours including pre-op dose
Neurosurgery (Elective craniotomy, intrathecal baclofen shunt or ventricular shunt placement)	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg OR Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg Cefazolin 50 mg/kg if < 40 kg 2g if 40-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Skull base surgery	Cefepime 50 mg/kg if < 40 kg 2g if ≥40 kg Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg + Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Gentamicin 2.5 mg/kg + Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg + Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefepime 50 mg/kg if < 40 kg 2g if ≥40 kg + Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg + Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Gentamicin 2.5 mg/kg + Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg + Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Metronidazole = n/a Vancomycin = n/a	Should not exceed 24 hours including pre-op dose

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
Orthopedic (Clean operations involving hand, knee, and not involving implantation of foreign materials)	None	None	None	None	n/a	n/a
Orthopedic (internal fixation of fractures, hip repairs, implantation of materials including prosthetic joint and spinal procedures with and without instrumentation)	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg OR Vancomycin (for hip procedures) 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Head and Neck (Clean, without entry into aerodigestive tract)	None	None	None	None	n/a	n/a
Head and Neck [Clean w/ placement of prosthesis (excludes typanostomy tubes), incision through oral oropharyngeal mucosa]	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Head and Neck (Clean, contaminated , with entry into aerodigestive tract, major intraoral surgery)	Ampicillin-sulbactam 50 mg/kg if < 67 kg 2g if 67-120kg; Dose based on ampicillin component	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Ampicillin-sulbactam = 2 hr Clindamycin = 6 hr	Should not exceed 24 hours including pre-op dose
<i>Percutaneous procedure</i>	None	None	None	None	n/a	n/a
<i>Lymph Node Dissection</i>	None	None	None	None	n/a	n/a

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
<i>Soft tissue/bone procedure (no mucosal involvement)</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Gastrointestinal Esophageal and Gastroduodenal	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Appendectomy</i>	Ceftriaxone* 50 mg/kg if < 40 kg 2g if ≥40 kg + Metronidazole 30 mg/kg if < 50 kg 1500 mg if ≥50 kg OR Cefazolin** 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Metronidazole 30 mg/kg if < 50 kg 1500 mg if ≥50 kg + Ciprofloxacin 10 mg/kg if <40 kg 400 mg if ≥40 kg OR Clindamycin** 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Ciprofloxacin 10 mg/kg if <40 kg 400 mg if ≥40 kg OR Cefazolin** 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Ciprofloxacin 10 mg/kg if <40 kg 400 mg if ≥40 kg OR Clindamycin** 10 mg/kg if <60 kg 600 mg if ≥60 kg	Ceftriaxone = n/a Cefazolin = 4 hr Clindamycin = 6 hr Metronidazole = n/a Vancomycin = n/a **If >1 hours since ceftriaxone (or ciprofloxacin or vancomycin) + metronidazole, use cefazolin or clindamycin	Duration at surgeon's discretion.
<i>EGD with/without biopsy</i>	None	None	None	None	n/a	n/a
Liver, biliary tract, and gallbladder (Open and elective, high-risk laparoscopic)	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Liver, biliary tract, and gallbladder (Elective, low-risk laparoscopic)	None	None	None	None	n/a	n/a
<i>Liver biopsy</i>	None	None	None	None	n/a	n/a

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
<i>Splenectomy</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin (15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Small Bowel (Nonobstructed)	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin (15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Small Bowel (Obstructed)	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg OR Cefazolin + 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Metronidazole = n/a Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Colorectal (uncomplicated, nonperforated)	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg OR Cefazolin + 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefoxitin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Metronidazole = n/a Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Colonoscopy involving biopsy</i>	None	None	None	None	n/a	n/a
<i>Penetrating abdominal trauma</i>	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
<i>Ruptured viscus (regarded as treatment, not prophylaxis), Exploratory laparotomy</i>	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg ± Gentamicin 2.5 mg/kg OR Ceftriaxone + 50 mg/kg if < 40 kg 2g if ≥40 kg Metronidazole 15 mg/kg if < 67 kg 1000 mg if ≥67 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Ceftriaxone = n/a Clindamycin = 6 hr Gentamicin = 8 hr Metronidazole = n/a Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Reproductive Tract – Female	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Urologic Tract						
<i>Clean procedure without entry into urinary tract: open or laparoscopic (orchiopepy, circumcision)</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Clean procedure with entry into urinary tract: open or laparoscopic (proximal hypospadias repair, partial nephrectomy, ureteral re-implant, pyeloplasty)</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Elective, urethral instrumentation, pre-op culture positive</i>	Based on culture	Based on culture	Based on culture	Based on culture	Based on culture	Should not exceed 24 hours including pre-op dose

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
<i>Emergent, urethral instrumentation</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr	Should not exceed 24 hours including pre-op dose
<i>Procedure involving implanted prosthesis (e.g. testicular prosthesis)</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg + Gentamicin 2.5 mg/kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Procedure involving entry into intestine: open or laparoscopic (MACE, Monti, Augmentation cystoplasty, Ileal Conduit)</i>	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Clean-contaminated Urologic/cutaneous fistula repair</i>	Cefoxitin 40 mg/kg if < 50 kg 2g if ≥50 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefoxitin = 2 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Indwelling bladder catheter insertion/removal or distal hypospadias repair</i>	None	None	None	None	n/a	n/a

* Recommended re-dose times are based on pediatric patients with normal renal function. For pediatric patients with reduced renal function, please contact pharmacy for re-dose guidance

Procedure	Preferred Regimen	Severe Beta-Lactam Allergy	MRSA Colonization		Intraoperative Re-dosing (until wound closure)*	Post-operative Re-dosing
			Without severe Beta-lactam allergy	Severe Beta-lactam allergy		
Kidney +/- Pancreas	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg ± Fluconazole (if high risk of fungal infection)	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg + Gentamicin 2.5 mg/kg	Cefazolin = 4 hr Clindamycin = 6 hr Gentamicin = 8 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
Skin and Soft Tissue	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Hernia repair (ventral, inguinal)</i>	None	None	None	None	n/a	n/a
<i>Hernia repair w/ mesh placement</i>	Cefazolin 30 mg/kg if < 67 kg 2g if 67-120kg; 3g if ≥120 kg	Clindamycin 10 mg/kg if <60 kg 600 mg if ≥60 kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Vancomycin 15 mg/kg if <67 kg 1g if 67-120kg; 1.5g if ≥120kg	Cefazolin = 4 hr Clindamycin = 6 hr Vancomycin = n/a	Should not exceed 24 hours including pre-op dose
<i>Biopsy (lymph node, muscle, bone marrow)</i>	None	None	None	None	n/a	n/a
<i>Central venous catheter insertion</i>	None	None	None	None	n/a	n/a
<i>I&D of abscess</i>	None	None	None	None	n/a	n/a

NEONATAL ANTIBIOTIC PROPHYLAXIS FOR SURGICAL PROCEDURES

Check patient medication profile for previous administrations of antibiotics prior to administering pre-op dose

	Likely Pathogens/Type of Procedure	Recommended Antibiotic
Neonatal (≤ 72 hours of age) – all major procedures	Group B Streptococcus, enteric gram negative bacilli, enterococci, coagulase negative staphylococci	Ampicillin 50 mg/kg PLUS Gentamicin 4 mg/kg
Neonatal (> 72 hours of age) – all major procedures	Prophylaxis targeted to operative site, nosocomial or colonizing organisms	<u>Esophageal/gastroduodenal/jejunal:</u> Cefazolin <u>Gastroschisis abdominal closure:</u> Cefazolin <u>Ileal/colorectal:</u> Ampicillin/gentamicin/metronidazole <u>NEC:</u> Ampicillin/gentamicin/metronidazole

NEONATAL DOSING SCHEDULE FOR PRE-OPERATIVE ANTIBIOTICS		
Antimicrobial Agent	Neonatal Dose	Re-dosing Schedule
Ampicillin	50 mg/kg	12 hr or 8 h if > 3kg And > 7d
Cefazolin	25 mg/kg	12 hr or 8 h if > 3kg And > 7d
Clindamycin	7.5 mg/kg	12hr or 8 hr if >3kg and > 7 d
Gentamicin	<29 wk GA: 5 mg/kg >30 wks GA: 4 mg/kg	NA
Metronidazole	<1.2 kg: 7.5 mg/kg ≥1.2 kg: 15 mg/kg	NA
Piperacillin/tazobactam*	PNA<7d: 100 mg/kg PNA 8-28 d: 80 mg/kg	12 hr or 8 hr if > 3kg and > 7d
Vancomycin	<u>10 mg/kg</u>	12 hr
Fluconazole	6 mg/kg	NA

*piperacillin/tazobactam dosing is based on piperacillin component

References

American Academy of Pediatrics. Antimicrobial prophylaxis in Pediatric Surgical Patients. In: Kimberlin DW, Brady MT, Jackson MA, Long SS, eds. Red Book: 2018 Report of the Committee on Infectious Diseases. 31st ed. Itasca, IL: American Academy of Pediatrics; 2018: 1031-1043.

Bratzler, DW, Dellinger EP, Olsen KM, et al. American Society of Health-System Pharmacists; Infectious Disease Society of America; Surgical Infection Society; Society for Healthcare Epidemiology of America. Clinical practice guidelines for antimicrobial prophylaxis in surgery. Am J Health Syst Pharm. 2013;70(3): 195-283.