NM Northwestern Medicine
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OUTPATIENT STEWARDSHIP TIP SHEET

Acute Bronchitis vs. Pneumonia

Almost all cases of acute bronchitis are viral, and 70% of outpatient visits for cough are for acute bronchitis.
Unlike pneumonia, acute bronchitis lacks shortness of breath, hypoxia and abnormal pulmonary examination
Acute cough Management Flowchart

	Acute Bronchitis	Pneumonia
Symptoms & Clinical Findings	- **cough** (productive or nonproductive) <3 weeks - pulmonary examination may be normal or demonstrate wheezes - often with nasal congestion/rhinorrhea - low-grade fevers may be present - myalgias and headache may be present	- **cough** (productive or nonproductive), fevers, chills, shortness of breath - **abnormal pulmonary findings (crackles and/or decreased breath sounds, dullness, tachypnea)** - myalgias and headache may be present **Post-influenza bacterial pneumonia develops about a week after onset of influenza illness**
	1. Evaluation should focus on ruling out pneumonia (which is rare among healthy adults) **2. Chest radiography is not indicated if suspicion for pneumonia is low** 3. Pediatric patients –Chest radiography may be warranted in atypical disease (absence of viral symptoms, severe distress, frequent recurrences or lack of improvement	1. COVID and influenza should be ruled out before starting antibiotics, unless local rates of these viruses are low 2. Chest radiography confirms diagnosis of pneumonia 3. Do not order blood/sputum cultures (or urine antigen tests) for outpatients with suspected pneumonia 4. CRB-65 can help assess severity of illness & disposition in patients with pneumonia (consider transfer to ED if score ≥ 2) Age >65 (1 point) — SBP <90 mmHg, or DBP ≤60 mmHg (1 point) Confusion (1 point) — Respiratory rate ≥30 (1 point)
Antibiotic Treatment	**Antibiotics not recommended, regardless of cough duration** **See Adjunctive Measures**	**See chart below** for antibiotic guidance for pneumonia **See Adjunctive Measures**
Adjunctive measures	- Home remedies (lemon, honey, etc.) - Decongestants such as phenylephrine - Oral hydration & humidified/steamed air	- Cough suppressants e.g., benzonatate - Expectorants e.g., guaifenesin - Acetaminophen or NSAIDs for fever & discomfort

	Adults & Adolescents Bacterial Pneumonia Treatment	Pediatric Bacterial Pneumonia Treatment
Antibiotics for Pneumonia	**Without** comorbidities* Amoxicillin 1 g TID for **5 days** OR Doxycycline 100 mg BID for **5 days (also Low, Moderate and High Risk Beta-lactam Allergy History option)** **With** comorbidities* **Standard Antibiotics (select ONE from Box A & ONE from Box B)**: **Box A** **1, Amoxicillin-clavulanate** 875 mg/125 mg BID for **5 days** 2. **Cefpodoxime†^** 200 mg BID for **5 days (also Low & Moderate risk pcn allergy** **Box B** 1. **Azithromycin** 500 mg QD for **1 day**, then 250 mg QD for **4 days** 2. **Doxycycline** 100 mg BID for **5 days** **High Risk Beta Lactam Allergy History (see NM Allergy Considerations first):** **Levofloxacin** 750 mg QD for **5 days** ***Comorbidities:** heart, lung, liver or kidney disease; alcohol use disorder; diabetes mellitus or malignancy **†For patients on acid suppressive therapy, use cefpodoxime 400 mg BID** ^dissimilar drug structure from penicillins	**Up to 6 months** **Infants under 6 months of age with suspected bacterial pneumonia should be hospitalized** **≥6 months (select ONE)** **Amoxicillin** 90 mg/kg/day divided BID to TID for **5 days** (dose based on amox component) (maximum dose (amox): 4 g/day) **Amoxicillin-clavulanate** 90 mg/kg/day divided BID-TID for **5 days** *Use ES suspension 600 mg-42.9 mg/5 mL* (dose based on amox component) (maximum dose (amox): 4 g/day) **Mild or Moderate PCN Allergy History (select ONE)** **Cefpodoxime^** 10 mg/kg/day divided BID for 5 days (maximum dose: 400 mg/day) **Cefixime^** 8 mg/kg/day divided BID for 5 days (maximum dose :400 mg/day) **High Risk Beta Lactam Allergy History (see NM Allergy Considerations first):** **6 months to 5 years** **Levofloxacin** 16 to 20 mg/kg/day divided BID for **5 days** (maximum dose: 750 mg/day) **≥5 years** **Levofloxacin** 8 to 10 mg/kg/day once daily for **5 days** (maximum dose: 750 mg/day)

Key Points for Counseling Patients
1. **Most cases of bronchitis are viral; antibiotics are not recommended**
2. **Viral bronchitis can last 3 weeks**
3. **Colored or cloudy sputum is seen in both viral and bacterial infections**
4. **Avoid side effects by avoiding unnecessary antibiotics**

When to Consider Transfer to ED **Updated 8 24 2023**
1. CRB-65 score ≥2
2. Age <6 months
3. Severe immunocompromise, asplenia or active receipt of chemotherapy

ADSP Northwestern Medicine Antimicrobial and Diagnostic Stewardship Program