

MMWR in Review: Misdiagnosed group A streptococcal pharyngitis

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Editor's note: *This article summarizes key points from a Centers for Disease Control and Prevention (CDC) report published in Morbidity and Mortality Weekly Report (MMWR). The Introduction and Comment sections may include information that did not appear in the original publication. To subscribe to MMWR, visit www.cdc.gov/MMWR.*

- "Notes from the Field: Group A Streptococcal Pharyngitis Misdiagnoses at a Rural Urgent-Care Clinic – Wyoming, March 2015." MMWR. 2016;64(50):1383-1385, <http://1.usa.gov/1L6EZ1f>.

The 2012 *Clinical Practice Guideline for Diagnosis and Management of Streptococcal Pharyngitis* from the Infectious Diseases Society of America (IDSA), <http://bit.ly/1XINj9q>, emphasizes selective testing for group A *Streptococcus* (GAS) based on clinical symptoms and signs to avoid identifying GAS carriers rather than acute GAS infections. Testing is not recommended for patients with accompanying symptoms that suggest a viral etiology (e.g., cough, rhinorrhea), children younger than 3 years of age or asymptomatic household contacts of patients with GAS pharyngitis.

In March 2015, an urgent care clinic in Wyoming reported a substantial increase in diagnoses of GAS pharyngitis, prompting an evaluation by the local health department. Evaluation revealed inappropriate testing of patients without sore throat and patients with accompanying cough or rhinorrhea. In addition, rapid antigen detection tests (RADTs) were interpreted after the maximum recommended incubation time of five minutes, a practice that can lead to false-positive results. Furthermore, patients were treated with cephalosporins, clindamycin or amoxicillin-clavulanate rather than the recommended first-line therapy of penicillin or amoxicillin.

To date, there have not been any documented penicillin-resistant isolates of GAS. IDSA guidelines were reviewed with clinic staff, and the problematic practices have been corrected.

Question

Which of the following people should be tested for group A streptococcal pharyngitis?

- An asymptomatic family member of a patient with GAS
- A 16-year-old boy with rhinorrhea, sore throat and cough
- A 7-year-old girl with sudden onset sore throat, fever and tender cervical lymphadenopathy
- A patient who continues to have sore throat after treatment with penicillin
- All of the above

Answer: c

Dr. Thompson is a member of the AAP Section on Infectious Diseases and Section on Medical Students, Residents and Fellowship Trainees. She is a post-graduate training fellow in pediatric infectious diseases at Emory University School of Medicine in Atlanta. Dr. Pickering was editor of the AAP Red Book from 2000-'12. He is adjunct professor of pediatrics at Emory University School of Medicine.

Resource

- [The 2015 Red Book provides information about GAS pharyngitis as well as diagnosis and management of toxic shock syndrome and acute rheumatic fever.](#)

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