Technical Bulletin

Date: December 18, 2020
Topic: Azithromycin Shortage and Alternative Sexually Transmitted Diseases (STD) Treatment
Contact: Elizabeth Kessler, STD Program Manager, Division of Public and Behavioral Health
To: All Health Care Providers and Facilities

Current Situation:
The Centers for Disease Control and Prevention (CDC) has updated their recommendations for the treatment of uncomplicated gonorrhea in adults. Gonorrhea should now be treated with a single higher dose intramuscular injection of ceftriaxone (500 mg) and dual therapy with azithromycin is no longer recommended. The updated recommendations published in the December 18, 2020 MMWR, accessible here [2020 Update to CDC’s Treatment for Gonococcal Infections], are summarized below. These updated treatment recommendations supersede the 2015 gonorrhea treatment recommendations (accessible here [2015 STD Treatment Recommendations]).

Background for Updated Treatment Recommendations (Monotherapy):
Drug-resistant gonorrhea remains an urgent public health threat as half of all gonorrhea infections are resistant to at least one antibiotic. The change from dual therapy to monotherapy was prompted by three items:

1. Antimicrobial stewardship and the need to minimize antibiotic exposure unless the benefit clearly outweighs the risk, an important consideration for all infections and not just sexually transmitted infections (STIs);
2. Further evidence and understanding of ceftriaxone’s pharmacokinetics and pharmacodynamics identifying the optimal dose to treat gonorrhea; and,
3. Azithromycin resistance in *N. gonorrhoeae* is increasing.

Updated Recommended Treatment Regimens for Gonococcal Infections

Regimen for uncomplicated gonococcal infections of the cervix, urethra, or rectum:
- Ceftriaxone 500 mg intramuscular (IM) as a single dose for persons weighing <150 kg (300 lb.).
- For persons weighing ≥150 kg (300 lb.), 1 g of IM ceftriaxone should be administered.
- If a chlamydia infection has not been excluded, providers should treat for chlamydia with doxycycline 100 mg orally twice daily for 7 days. During pregnancy, azithromycin 1 g as a single dose is recommended to treat chlamydia.

Alternative regimens for uncomplicated gonococcal infections of the cervix, urethra, or rectum if ceftriaxone is not available:
- Gentamicin 240 mg IM as a single dose plus azithromycin 2 g orally as a single dose OR
- Cefixime 800 mg orally as a single dose. If treating with cefixime, and chlamydial infection has not been excluded, providers should treat for chlamydia with doxycycline 100 mg orally twice daily for 7 days. During pregnancy, azithromycin 1 g as a single dose is recommended to treat chlamydia.

Recommended regimen for uncomplicated gonococcal infections of the pharynx:
- Ceftriaxone 500 mg IM as a single dose for persons weighing <150 kg (300 lb.).
- For persons weighing ≥150 kg (300 lb.), 1 g of IM ceftriaxone should be administered.
• If chlamydia coinfection is identified when pharyngeal gonorrhea testing is performed, providers should treat for chlamydia with doxycycline 100 mg orally twice a day for 7 days. During pregnancy, azithromycin 1 g as a single dose is recommended to treat chlamydia.

• No reliable alternative treatments are available for pharyngeal gonorrhea. For persons with a history of a beta-lactam allergy, a thorough assessment of the reaction is recommended.*

• For persons with an anaphylactic or other severe reaction (e.g., Stevens-Johnson syndrome) to ceftriaxone, consult an infectious disease specialist for an alternative treatment recommendation.

A test-of-cure is unnecessary for persons with uncomplicated urogenital or rectal gonorrhea who are treated with any of the recommended or alternative regimens; however, for persons with pharyngeal gonorrhea, a test-of-cure is recommended, using culture or nucleic acid amplification tests 7–14 days after initial treatment, regardless of the treatment regimen.

For More Information:

Please contact Elizabeth Kessler, STD Program Manager, Division of Public and Behavioral Health (DPBH) via phone (775) 447-4494 or email ekessler@health.nv.gov

• 2020 Update to CDC's Treatment for Gonococcal Infections: https://www.cdc.gov/mmwr/volumes/69/wr/pdfs/mm6950a6-H.pdf
• Centers for Disease Control and Prevention, STD website - https://www.cdc.gov/std/default.htm

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