

**HIV/STD Program  
STD Clinic**

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**Azithromycin-Resistant *Neisseria gonorrhoeae*  
in Men Who Have Sex with Men (MSM) in King County**

- King County has recently experienced an increase in infections caused by azithromycin-resistant *Neisseria gonorrhoeae*. At present, these infections have only been seen in MSM.
- Providers should no longer use azithromycin 2g alone as a treatment for gonorrhea in beta-lactam allergic patients, particularly MSM and transgender persons.
- Ceftriaxone plus azithromycin is the preferred regimen for treating gonorrhea.
- Because cefixime plus azithromycin is not likely to consistently cure pharyngeal infections in persons infected with azithromycin-resistant gonorrhea, clinicians should not routinely use that regimen in MSM and transgender persons. Approximately 30-40% of MSM with genital tract gonorrhea have concurrent pharyngeal infections.
- MSM and transgender patients treated with regimens that do not include ceftriaxone, particularly persons with asymptomatic rectal or pharyngeal gonorrhea, require a test of cure 2-3 weeks following treatment.
- Obtain gonorrhea cultures from persons with persistent gonococcal infections or symptoms of possible persistent infection following treatment.

Since February 2014, the Public Health Seattle & King County STD Clinic has diagnosed 25 cases of azithromycin-resistant gonorrhea. All of these cases occurred in men who have sex with men (MSM). Overall, >5% of all isolates collected from MSM were resistant to azithromycin. All of the gonococcal isolates with azithromycin-resistance demonstrated laboratory susceptibility to ceftriaxone. Three of the men with azithromycin-resistant gonorrhea were treated with azithromycin-monotherapy (2 grams of azithromycin alone). Two of these three men returned for a test of cure (TOC) and both had persistent infection. One man was cured with 360mg of gentamicin intramuscularly. The other was treated with ceftriaxone and doxycycline. He did not undergo repeat TOC and has not returned to the clinic.

**NEW GONORRHEA TREATMENT GUIDELINES**

*First line:*

**Ceftriaxone 250mg IM PLUS Azithromycin 1g PO**

*Alternative: **NOT RECOMMENDED** in MSM*

**Cefixime 400mg po PLUS Azithromycin 1g PO**

*For beta-lactam allergy:*

**Azithromycin 2g PO PLUS Gentamicin 240mg IM**

or

**Azithromycin 2g PO PLUS Gemifloxacin 320mg PO**

The new 2015 CDC STD Treatment Guidelines do not recommend using azithromycin 2g orally alone to treat gonorrhea in beta-lactam allergic patients. The new guidance recommends using two drugs with different mechanisms of action to ensure both clinical and microbiologic cure, and to prevent the development of resistance. The preferred treatment for all gonococcal infections remains ceftriaxone 250 mg intramuscularly **PLUS** azithromycin 1g orally once. For patients with a beta-lactam allergy, CDC recommends azithromycin 2g orally **PLUS** either 1) gentamicin 240 mg intramuscularly or 2) gemifloxacin 320 mg orally once. All sexual partners from the preceding 60 days should be treated. Partners can be referred to the PHSKC STD Clinic for treatment.

### PHSKC HIV/STD Program Recommendations

- Sexually active MSM should test for HIV, syphilis, gonorrhea and chlamydia at least annually.\*
- Higher-risk MSM\* should be screened every three months.
- Patients should be tested for gonorrhea and chlamydia at all exposed anatomic sites.
- Clinicians should recommend pre-exposure prophylaxis (PrEP) for HIV to all HIV-uninfected MSM diagnosed with rectal gonorrhea or syphilis. (PrEP for these men is available at the PHSKC STD Clinic.)
- Treat, or refer to the STD Clinic, all sexual partners of men diagnosed with a bacterial STD.

\* MSM in long-term, mutually monogamous relationships with men with the same HIV status do not require HIV/STD testing. High risk MSM include men with any of the following risks in the prior year:  $\geq 10$  sex partners, methamphetamine or popper use, unprotected anal intercourse with a partner of different or unknown HIV status, or diagnosis of bacterial STD.

If you suspect a gonorrhea treatment failure, please obtain cultures and nucleic acid amplification tests (NAAT) from all exposed sites. Please call Dr. Lindley Barbee (206.744.2595) or Dr. Matthew Golden (206.744.6829) at PHSKC STD Clinic to assist you with arranging antimicrobial susceptibility testing and treatment.

Sincerely,



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