

SYPHILIS

Epidemiology

- 1061 (16 cases per 100,000 population), of which 241 were either primary or secondary syphilis [2002]

Serology

- False-negatives can appear for up to 3 months after infection. False-positives also occur.
- Screening test: VDRL (false positives in viral infection, autoimmune diseases...)
- Confirmatory tests: FTA-ABS or TPHA. In practice, both of these tests are ordered in case of a positive VDRL.

Medications

Benzathine penicillin

Benzathine penicillin as a single IM injection will adequately treat primary and secondary syphilis, or sero-positive syphilis with a VDRL or RPR titre of 1:16 or higher. This same dose can be given to sexual contacts of the above groups as epidemiological treatment. As benzathine penicillin DOES NOT cross the blood brain barrier it is NOT suitable for use in treating latent syphilis (VDRL or RPR titre < 8) with abnormal CSF. Benzathine penicillin DOES cross the placenta and is therefore suitable for treating pregnant women with early syphilis.

Alternative medications

Tetracycline, erythromycin, and ceftriaxone have shown antitreponemal activity in clinical trials. When penicillin was still available, they were used only in patients allergic to penicillin. According to the 2010 CDC STD treatment guidelines, a course of ceftriaxone is effective for treating early syphilis, although the optimal dose and duration (10- or 14- days) have not been established.

The above guidelines also cite the effectiveness of azithromycin in treating early syphilis. Its use in men who have sex with men (MSM) or pregnant women is contraindicated. A 2010 study by Hook et al showed a single dose of azithromycin (2 gm PO) to be equivalent to benzathine penicillin G (2.4 million units IM) in patients with early syphilis without HIV.

Treatment Regimes

Early syphilis - primary, secondary and early latent (<2 years duration)

- benzathine penicillin 1.8gm (ie 900mg = 1,200,000IU*) IM as single dose, OR
- ceftriaxone 250mg IM x 14 days, OR
- azithromycin 2gm PO single dose, OR
- doxycycline 100mg PO TDS x 21 days, OR
- amoxicillin 3.0gm PO BD for 14 days (with 1gm probenocid PO QD)

Latent syphilis (> 2 years duration)

- benzathine penicillin 1.8gm (ie 900mg = 1,200,000IU*) IM as single dose, OR
- ceftriaxone 250mg IM x 14 days

Neurosyphilis (or where CSF examination not performed)

- benzathine penicillin 1.8gm (ie 900mg = 1,200,000IU*) IM as single dose, OR
- doxycycline 100mg PO TDS x 21 days.

Congenital syphilis

- Refer

HIV patients

- Refer.

**The brand we use in TY is Noraben (Each vial contains 1,200,000 IU). Our recommendation is to add 4ml of 1% lignocaine (plain) to each vial to minimize pain during and after injection. For an injection of 1.8gm, it means we need 2 vials of Noraben, one injected intramuscularly to each side of the buttock.*