Evaluating Patients For Secondary Syphilis

SEXUAL HISTORY, RISK ASSESSMENT & PHYSICAL EXAM

Sexual History, Risk Assessment (past year)
- Gender of partners
- Number of partners (new, anonymous, serodiscordant HIV status, exchange of sex for drugs or money)
- Types of sexual exposure
- Recent STDs; HIV serostatus
- Substance abuse
- Condom use

Physical Exam
- Oral cavity
- Lymph nodes
- Skin
- Palms & soles
- Neurologic
- Eyes
- Genitalia/pelvic
- Perianal

History of Syphilis
- Prior syphilis (last serologic test & last treatment)

DIAGNOSTIC ISSUES IN SECONDARY SYPHILIS

- RPR/VDRL ~100% sensitive in secondary syphilis
  - Rare caveat: prozone reaction, false negative RPR/VDRL from excess antibody interfering with antibody/antigen reaction
  - Prozone occurs <1% of secondary syphilis cases; if suspected ask lab to dilute serum to at least 1/16
- Use same test (RPR or VDRL) in sequential testing; titers are not interchangeable
- Need both non-treponemal (RPR or VDRL) and treponemal test to make syphilis diagnosis
- Treponemal tests (TP-PA, FTA-ABS, EIA, CIA) can remain positive for life; utility limited in patients with history of prior syphilis, comparison of non-treponemal titers needed
- RPR/VDRL titer interpretation should be taken in context of prior titers, clinical scenario and documented treatment history

Note: Evaluate for neurosyphilis (assess if neurologic, ophthalmic, or otic symptoms present, as neurosyphilis can occur at any stage of syphilis)

TREATMENT & FOLLOW-UP

Treatment of Secondary Syphilis

Recommended Regimen
- Benzathine Penicillin G 2.4 million units IM x 1

Alternative Regimens for Penicillin Allergic Non-Pregnant Patients:
Efficacy not well established & not studied in HIV+ patients; close follow-up essential:
- Doxycycline 100 mg po bid x 2 weeks or
- Tetracycline 500 mg po qid x 2 weeks

*Pregnant patients with penicillin allergy should be desensitized and treated with penicillin

See CDC STD Treatment Guidelines: www.cdc.gov/std/treatment

California STD Treatment Guidelines Grid:
https://bit.ly/CAstiguide

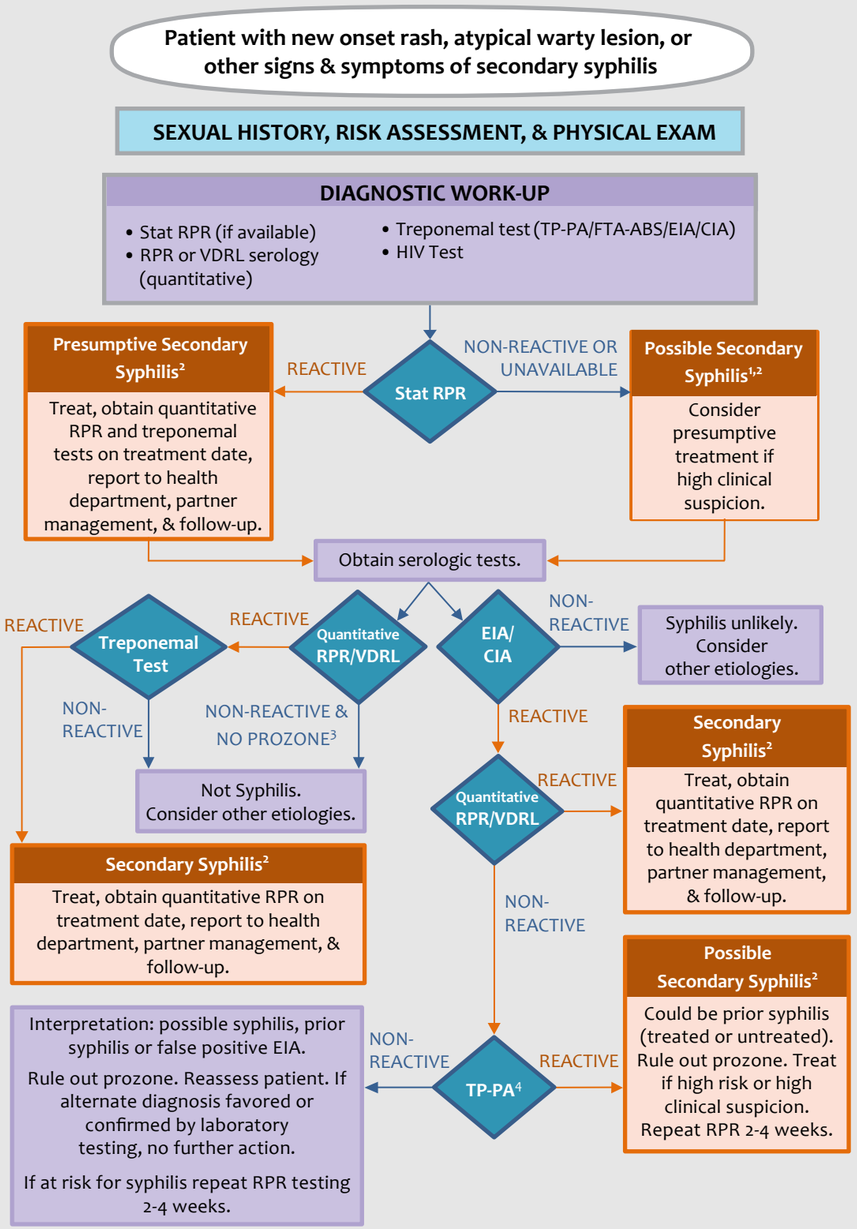
****Additional Testing and Follow-up**
Note: Also test for HIV, GC/CT, and pregnancy (if female of reproductive age)

- 1-2 weeks: clinical follow-up
- 3, 6, 9, 12, 24 months: serologic follow-up for HIV+ patients
- 6, 12 months: serologic follow-up for HIV- patients
- Failure of titer to decline fourfold (e.g. 1:64 to ≤1:16) within 6-12 months from titer at time of treatment may indicate treatment failure. Titer decline may be slower in HIV+ patients.
- Consider retreatment and CSF evaluation if titer fails to decline appropriately

Refer to CDC Treatment Guidelines for management of treatment failure & consult the STD Clinical Consultation Network at www.STDCCN.org

REPORTING & PARTNER MANAGEMENT

- All syphilis cases and presumptive cases must be reported to the local health department within one working day of diagnosis
- Local health departments will assist in partner notification & management
- Contact Number at Local Health Department:

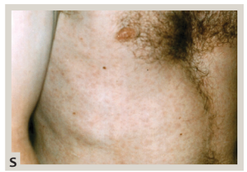


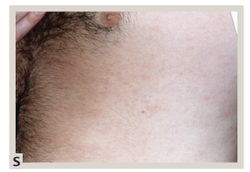
¹ If the patient is a man who has sex with men (MSM) or clinical exam with classic features of secondary syphilis, consider presumptive treatment at the time of initial visit before the diagnostic tests results are available. Presumptive treatment is also recomended if patient follow-up is a concern.
² All patients with secondary syphilis should be tested for HIV infection and screened for other STDs. Repeat HIV testing of patients with secondary syphilis 3 months after the first HIV test, if the first test is negative.
³ Prozone reaction is a false negative RPR or VDRL from excess antibody interfering with the antigen-antibody reaction.
⁴ FTA-ABS is no longer considered the gold standard treponemal test given concerns regarding specificity. TP-PA should be used for a second treponemal test when EIA/CIA is reactive and RPR is non-reactive.

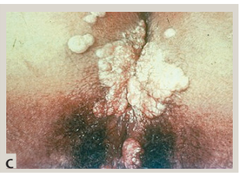
CLINICAL PRESENTATIONS OF SECONDARY SYPHILIS

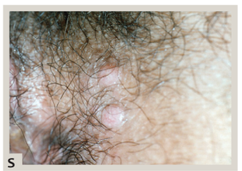
- Symptoms typically occur 3-6 weeks after primary stage (can overlap with primary); resolve in 2-10 weeks
- 25% may have relapse of signs & symptoms in first year

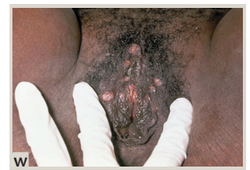
Signs & Symptoms of Secondary Syphilis
- **Rash:** most common feature (75-90%); can be macular, papular, squamous (scale), pustular (rare), vesicular (very rare) or combination; usually nonpruritic; may involve palms & soles (60%)
- **Lymphadenopathy:** (70-90%); inguinal, epitrochlear, axillary & cervical sites most commonly affected
- **Constitutional Symptoms:** (50-80%); malaise, fever
- **Mucous Patches:** (5-30%); flat gray-white patches in oral cavity & genital area
- **Condyloma Lata:** (5-25%); moist, heaped, wart-like lesions in genital, peri-rectal & rectal areas, & oral cavity
- **Alopecia:** (10-15%); patchy hair loss, loss of lateral eyebrows
- **Neurosyphilis:** (<2%); visual loss, hearing loss, cranial nerve palsies among other

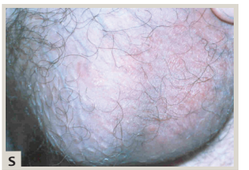

Maculopapular Rash

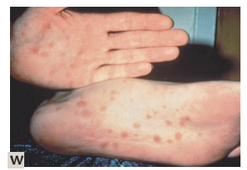

Subtle Macular Rash

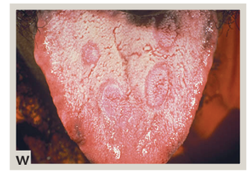

Condyloma Lata

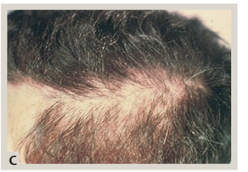

Condyloma Lata


Condyloma Lata

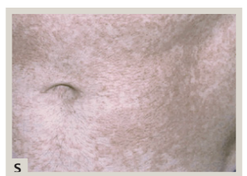

Subtle Scrotal Rash

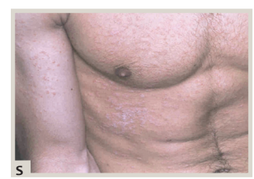

Macular Rash

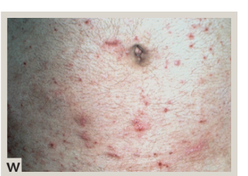

Mucous Patches


Alopecia

Differential Diagnosis of the rash of secondary syphilis includes: pityriasis rosea, psoriasis, erythema multiforme, tinea versicolor, scabies, drug reaction, primary HIV infection


Drug Reaction


Guttate Psoriasis


Scabies

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To Order Additional Copies: See the online version of the Secondary Syphilis Algorithm on the clinical resources page of the CAPTC website: www.californiaptc.com

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