Example Provider Notes for a CS Case Investigation

A woman and her newborn have reactive RPRs at the birth hospital in your county. You have no prior record of this woman in your surveillance system. Mom's RPR was 1:128 at delivery and the baby's was 1:64. You have remote access to the EMR for this hospital. You open the infant's chart and navigate to the provider notes section. You read the History and Physical (H&P) first and then you read the most recent progress note.

NICU H&P
History:
Babygirl was delivered via NSVD to a 28-year-old G2P1 woman at 34 2/7 weeks. Birthweight 1900g. Apgars 4 and 6. Required PPV in the DR x 1min due to lack of spontaneous respirations and brought up to NICU on nasal CPAP.
Maternal history: Mom was seen in the ED and had + pregnancy test around 16 weeks. No labs were drawn in the ED. No prenatal care visits or previous notes in our system. Mom presented in preterm labor and all screening labs drawn on presentation to L&D are still pending.

Physical Exam:
Gen: Small preterm infant
HEENT: AFSOF, nasal CPAP and OG in place
Lungs: Course bilaterally, mild tachypnea with mild retractions
Cardiac: RRR, no murmur, pulses 2+ upper and lower
Abd: Mildly distended, liver edge palpable 2cm below costal margin
Skin: Faint maculopapular rash on trunk, mild acrocyanosis
Neuro: Grossly intact, good tone, spontaneous movements of all extremities, consistent with gestational age

Assessment and Plan:
Preterm infant admitted to NICU with mild respiratory distress. Mother has no prenatal care, screening labs pending.
Plan: Monitor on CPAP. Blood culture, CBC-diff pending. Follow up maternal infectious disease labs and tox screen. Start empiric Amp/Gent as GBS unknown and infant with respiratory distress. Monitor glucose q2h, adjust dextrose in fluids. Exam concerning for congenital infection.

Most Recent Progress Note
Subjective: Babygirl is a 6-day old infant born at 34, 2 with RDS and congenital syphilis. On day 4 of penicillin, after receiving 2 days of ampicillin. Required frequent nasal suctioning overnight for copious secretions. Tolerating enteral feeds. D/C'd PTX yesterday, with persistent direct hyperbilirubinemia.

Objective:
Physical Exam:
Gen: Small preterm infant in isolette
HEENT: AFSOF, nCPAP and OG in place, thick nasal discharge
Lungs: Coarse bilaterally, intermittent tachypnea
Cardiac: RRR, no murmur, good perfusion
Abd: Mildly distended, liver 3cm below the costal margin, spleen palpable 2cm below the costal margin
Skin: Maculopapular rash on trunk and extremities, no edema, + jaundice
Neuro: Grossly intact, spontaneous movements of all extremities, suck improving

Labs and Imaging:
- Maternal RPR at delivery 1:128, TPPA Reactive. HIV Negative.
- Baby's RPR drawn on day 2, RPR reactive at 1:64
- Elevated WBC, borderline low H/H, persistent thrombocytopenia – likely due to CS
- LP performed on day 2 with high WBC and protein – likely due to CS
    - Bacterial culture with no growth

- CSF VDRL reactive
- Mildly elevated transaminases
- Indirect Bili normalized after PTX x2d, Direct Bili remains elevated
- CXR consistent with RDS, no cardiomegaly
- Skeletal films pending

Assessment: Babygirl is a 6-day old infant born at 34, 2 with RDS, congenital syphilis, conjugated hyperbilirubinemia.

Plan:

- Continue CPAP and frequent suctioning.
- Continue to increase enteral feeds.
- Follow up results of skeletal films.
- Recheck D Bili and CBC tomorrow.
- Continue PCN x10 days total.

CS Case Definition and Report Algorithm

Probable

A condition affecting an infant whose mother had untreated or inadequately treated* syphilis at delivery, regardless of signs in the infant, or an infant or child who has a reactive non-treponemal test for syphilis (Venereal Disease Research Laboratory [VDRL], rapid plasma reagin [RPR], or equivalent serologic methods) **AND** any one of the following:

- Any evidence of congenital syphilis on physical examination (see Clinical description)
- Any evidence of congenital syphilis on radiographs of long bones
- A reactive cerebrospinal fluid (CSF) venereal disease research laboratory test (VDRL) test
- In a nontraumatic lumbar puncture, an elevated CSF leukocyte (white blood cell, WBC) count or protein (without other cause):
  Suggested parameters for abnormal CSF WBC and protein values:
  - During the first 30 days of life, a CSF WBC count of >15 WBC/mm3 or a CSF protein >120 mg/dL.
  - After the first 30 days of life, a CSF WBC count of >5 WBC/mm3 or a CSF protein >40 mg/dL, regardless of CSF serology.
    The treating clinician should be consulted to interpret the CSF values for the specific patient.

Syphilitic stillbirth: A fetal death that occurs after a 20-week gestation or in which the fetus weighs greater than 500 g and the mother had untreated or inadequately treated* syphilis at delivery.

*Adequate treatment is defined as completion of a penicillin-based regimen, in accordance with CDC treatment guidelines, appropriate for stage of infection, initiated 30 or more days before delivery.

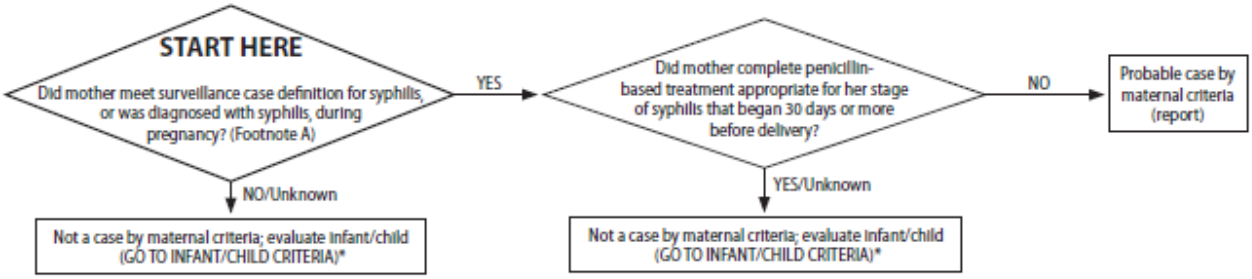
Confirmed

A case that is laboratory confirmed.

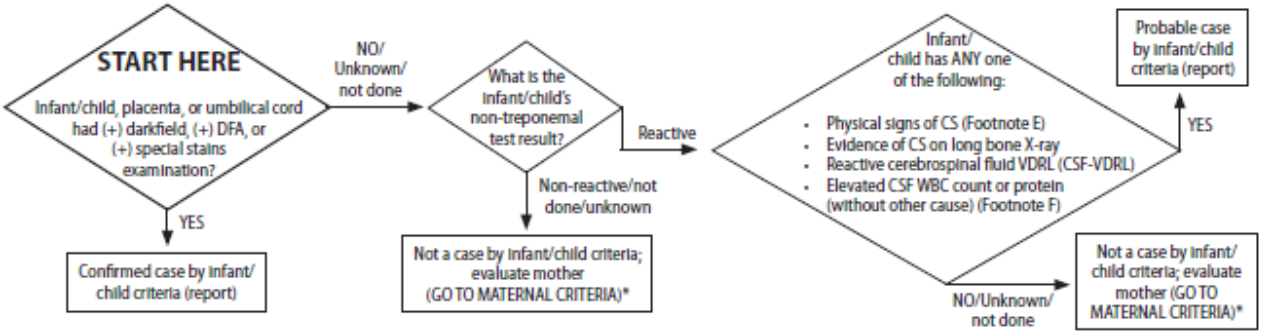
https://wwwn.cdc.gov/nndss/conditions/congenital-syphilis/case-definition/2015/

CS Report Algorithm: a case meeting *any* criteria (maternal, infant/child, or stillbirth) should be reported

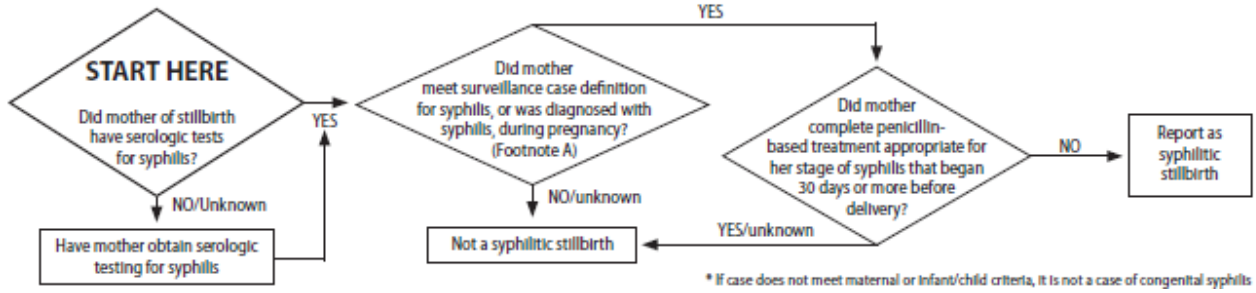
MATERNAL CRITERIA TO REPORT CONGENITAL SYPHILIS



INFANT/CHILD CRITERIA TO REPORT CONGENITAL SYPHILIS



CRITERIA TO REPORT SYPHILITIC STILLBIRTH



https://www.cdc.gov/std/program/Congenital-Syphilis-Form-2013.pdf

Footnote A — **Primary syphilis** is defined as a clinically compatible case with one or more ulcers (chancres) consistent with primary syphilis and a reactive serologic test. **Secondary syphilis** is defined as a clinically compatible case characterized by localized or diffuse mucocutaneous lesions, often with generalized lymphadenopathy, with a nontreponemal titer ≥1:4. *Latent syphilis* is the absence of clinical signs or symptoms of syphilis, with no past diagnosis or treatment, or past treatment but a fourfold or greater increase from the last nontreponemal titer. **Early latent syphilis** is defined as latent syphilis in a person who has evidence of being infected within the previous 12 months based on one or more of the following criteria: 1) documented seroconversion or fourfold or greater increase in nontreponemal titer during the previous 12 months, 2) a history of symptoms consistent with primary or secondary syphilis during the previous 12 months, 3) a history of sexual exposure to a partner who had confirmed or probable primary, secondary, or early latent syphilis (documented independently as duration <1 year), or 4) reactive nontreponemal and treponemal tests where the only possible exposure occurred within the preceding 12 months. **Late latent syphilis** is defined as latent syphilis in a patient who has no evidence of being infected within the preceding 12 months. See *MMWR Recomm Rep. 1997 May 2;46(RR-10):1-55* for more information.

Footnote E — Signs of CS (usually in an infant or child <2 years old) include: condyloma lata, snuffles, syphilitic skin rash, hepatosplenomegaly, jaundice/hepatitis, pseudoparalysis, or edema (nephrotic syndrome and/or malnutrition). Stigmata in an older child might include: interstitial keratitis, nerve deafness, anterior bowing of shins, frontal bossing, mulberry molars, Hutchinson's teeth, saddle nose, rhagades, or Clutton's joints.

Footnote F — Cerebrospinal fluid (CSF) white blood cell (WBC) count and protein vary with gestational age. During the first 30 days of life, a CSF WBC count of >15 WBC/mm^3 or a CSF protein >120 mg/dl is abnormal. After the first 30 days of life, a CSF WBC count of >5 WBC/mm^3 or a CSF protein >40 mg/dl is abnormal, regardless of CSF serology.