

October 12, 2021

Dear Health Care Provider:

Re: Updates to Syphilis Protocol Congenital Syphilis and Syphilitic Stillbirth Case Definitions and Reporting:

Congenital Syphilis Case Reporting and Investigation:

The *Congenital Syphilis Investigation Form*

(https://www.gov.mb.ca/health/publichealth/surveillance/docs/mhsu_2667.pdf) should be completed for all confirmed and probable cases of congenital syphilis and returned to MHSAL as per the user guide instructions

https://www.gov.mb.ca/health/publichealth/surveillance/docs/mhsu_2667 Ug.pdf.

Case Definitions:

The case definitions for early congenital syphilis have been further revised to enhance and simplify capture of cases. Section 2.1.1 of the Manitoba Health Seniors and Active Living (MHSAL) Syphilis protocol <https://www.gov.mb.ca/health/publichealth/cdc/protocol/syphilis.pdf> should be replaced with the revised content below.

2.1.1 Early Congenital Syphilis (within two years of birth)

Lab Confirmed Case - Early Congenital Syphilis (within 2 years of birth):

- Identification of *T. pallidum* by dark-field microscopy^a, direct fluorescence antibody^b, or detection of *T. pallidum* DNA by nucleic acid amplification test (NAAT) (e.g., PCR – polymerase chain reaction) in an appropriate clinical specimen, or equivalent examination of material from nasal discharges, skin lesions, placenta or umbilical cord, or autopsy material of a neonate (up to four weeks of age)

Note: A nasopharyngeal (NP) swab should be taken for syphilis PCR as many of the cases are positive by this relatively non-invasive method. The specimen collection procedure is the same as the Cadham Provincial Laboratory NP swab collection for respiratory virus detection described here:

https://www.gov.mb.ca/health/publichealth/cpl/docs/nasopharyngeal_collection.pdf;

OR

- Reactive serology (treponemal and nontreponemal) from venous blood (not cord blood) in an infant/child with or without clinical, other laboratory, or radiographic evidence consistent with congenital syphilis^c but who has one or both of the following:
 - Rising syphilis serologic titres upon follow-up where there is evidence that the mother had a syphilis infection during pregnancy
 - Titres greater than or equal to fourfold higher than those of the mother when collected at the same time or within a week, in the immediate post-natal period.

OR

- Reactive serology (treponemal and nontreponemal) from venous blood (not cord blood) in an infant/child with clinical, other laboratory, or radiographic evidence consistent with congenital syphilis^c whose mother was seropositive or PCR positive for syphilis during pregnancy or at delivery.

OR

- A child who does not meet the above criteria but has persistently reactive treponemal serology between 18 and 24 months of age (regardless of maternal treatment status and infectious status).

Probable Case - Early Congenital Syphilis (within 2 years of birth)^d:

- Reactive serology (treponemal and nontreponemal) from venous blood (not cord blood) in an infant/child **without** clinical, laboratory, or radiographic manifestations of congenital syphilis whose mother had

- untreated or inadequately^e treated syphilis prior to delivery

OR

- evidence of reinfection or relapse in the pregnancy following appropriate treatment (e.g. rising nontreponemal titres at least four-fold higher)

Lab Confirmed Case - Syphilitic Stillbirth:

- A fetal death that occurs after 20 weeks gestation with laboratory confirmation of infection (i.e., detection of *T. pallidum* DNA in an appropriate clinical specimen, direct fluorescent antibody^b or equivalent examination of material from placenta, umbilical cord or autopsy material).

Note: In order to improve capture of congenital syphilis stillbirths, it is **critical that stillbirth investigation protocols include a swab (e.g. nasopharyngeal, oral, umbilical cord, placenta) for syphilis PCR testing**. Ensure that your local stillbirth protocols include syphilis PCR testing of all stillbirths.

Probable Case - Syphilitic Stillbirth:

- A fetal death that occurs after 20 weeks gestation where the mother had untreated or inadequately treated syphilis prior to delivery OR whose mother had evidence of reinfection or relapse in pregnancy following appropriate treatment (such as rising titres), with no other cause of stillbirth established.

^a Not available in most medical laboratories including Cadham Provincial Laboratory (CPL).

^b Direct fluorescence antibody testing for syphilis is not routinely available in Manitoba but may be used in exceptional circumstances.

^c Includes any evidence of congenital syphilis on physical examination (e.g. hepatosplenomegaly, consistent rash, condyloma lata, snuffles, pseudoparalysis), evidence of congenital syphilis on radiographs of long bones, a reactive CSF (cerebrospinal fluid) VDRL (Venereal Disease Research laboratory test), an elevated CSF cell count or protein without other cause.

^d A persistent treponemal serologic reaction at 18-24 months of age confirms the diagnosis of congenital syphilis. An absent serologic reaction (both treponemal and nontreponemal tests) at, or before, 18-24 months of age excludes the case (i.e., it is no longer a probable case).

^e Inadequate treatment consists of any non-penicillin therapy or penicillin administered during pregnancy but less than 30 days before delivery, or despite treatment there has been an inadequate drop in nontreponemal titres. Note: The type of penicillin administered is important and is usually benzathine penicillin in pregnancy, with the exception of treatment for neurosyphilis.

Sincerely,

"Original Signed by"

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