

Appendix B: Provincial Case Definitions for Diseases of Public Health Significance

Disease: Hepatitis C

Effective: February 2019

Hepatitis C

1.0 Provincial Reporting

Confirmed cases of disease

2.0 Type of Surveillance

Case-by-case

3.0 Case Classification

3.1 Confirmed Case – Newly Acquired (24 months of age or older)

Confirmation of a newly acquired infection in an individual requires:

- Detection of anti-hepatitis C virus (anti-HCV) antibody or hepatitis C virus ribonucleic acid (HCV RNA);

AND

- Less than 24 months between current positive and previous negative

OR

- Detection of anti-HCV antibody or HCV RNA;

AND

- Clinically compatible signs and symptoms (see Section 5.0) with no other known cause;

AND

- Exclusion of acute hepatitis A and B as follows:

- Immunoglobulin M antibody to hepatitis A virus (IgM anti-HAV) negative

AND

- Immunoglobulin M antibody to hepatitis B core antigen (IgM anti-HBc) negative

3.2 Confirmed Case – Newly Acquired (less than 24 months of age)

- Detection of HCV RNA in those less than 18 months of age

OR

- Detection of anti-HCV antibody or HCV RNA in those 18 months to less than 24 months of age

3.3 Confirmed Case – Previously Acquired/Unspecified

- Detection of anti-HCV antibody or HCV RNA

AND

- 24 months of age or older

AND

- Doesn't meet criteria for 3.1

Infection Status

The infection status should be ascertained for any case meeting the definitions above:

- a. Infectious - if HCV RNA test reported as 'Detected'
- b. Resolved - if HCV RNA test reported as 'Not Detected' and anti-HCV antibody positive
- a. Unknown - if HCV RNA status is not known

4.0 Laboratory Evidence

4.1 Laboratory Confirmation

Any of the following will constitute a confirmed case of Hepatitis C:

- Reactive for HCV antibody;

OR

- HCV RNA detected

4.2 Approved/Validated Tests

- Anti-HCV antibody screening and supplemental assays that are Health Canada approved;
- HCV RNA molecular assays that are Health Canada approved

4.3 Indications and Limitations

- In immunocompromised cases, if anti-HCV antibodies are negative or indeterminate then HCV RNA is recommended.
- If the HCV antibody screening test is reactive and the supplemental test is non-reactive, the overall interpretation for the two-test algorithm is "inconclusive". In these instances, the submitting clinician should ask their patient to submit new samples for repeat HCV antibody testing **and** HCV RNA testing if not already completed.

- Anti-HCV antibody testing should not be performed in infants ≤18 months of age because of detectable levels of maternal antibody. However, if antibody testing is performed and found to be reactive in an infant ≤18 months of age, HCV RNA testing should be performed to determine if viremia is present.
- Cord blood should not be used for testing in infants because of potential maternal blood contamination.
- Testing for HCV RNA earlier than 6 weeks of age is not recommended.
- Cases newly confirmed as reactive for HCV antibody should receive HCV RNA testing to determine their current infectious status and to guide treatment decisions.

5.0 Clinical Evidence

Clinically compatible signs and symptoms are characterized by acute illness with discrete onset of any sign or symptom consistent with acute viral hepatitis (e.g. anorexia, abdominal discomfort, nausea, vomiting)

AND

- Jaundice;

OR

- Elevated serum alanine aminotransferase (ALT) level

A clinical consultation is necessary for diagnosis.

6.0 ICD 10 Code(s)

B17.1 Acute hepatitis C

B18.2 Chronic viral hepatitis C

7.0 Sources

Centers for Disease Control and Prevention. National Notifiable Disease Surveillance System: Hepatitis C, Acute - 2016 Case Definition [Internet]. Atlanta, GA: U.S. Department of Health & Human Services; 2016 [cited March 7, 2018]. Available from: <https://wwwn.cdc.gov/nndss/conditions/hepatitis-c-acute/case-definition/2016/>

Heymann DL, editor. Control of Communicable Diseases Manual. 20 ed. Washington, D.C: American Public Health Association; 2015.

Notifiable Diseases Database. Hepatitis C - Canada [Internet]. Winnipeg, MB: National Collaborating Centre for Infectious Diseases; 2014 [cited March 7, 2018]. Available from: http://nddb.ca/diseaseinfo/disease_detail/617

8.0 Document History

Table 1: History of Revisions

Revision Date	Document Section	Description of Revisions
January 2018	General	New Template
January 2018	3.1 Confirmed Case	Add to section heading “Newly Acquired (24 months of age or older)” Revision of the entire section.
January 2018	3.2 Confirmed Case – Newly Acquired (less than 24 months of age)	Add entire new section.
January 2018	3.3 Confirmed Case – Previously Acquired/Unspecified	Add entire new section.
January 2018	4.1 Laboratory Confirmation	First Bullet: Delete “with laboratory confirmation.”
January 2018	4.2 Approved/ Validated Tests	First Bullet: Add “antibody screening assays that are Health Canada approved; anti-HCV antibody supplemental assays.”
January 2018	4.3 Indications and Limitations	<p>First Bullet: Delete “HCV NAT is recommended, as antibodies may be negative in this population’ and add “if anti-HCV antibodies are negative or indeterminate then HCV RNA is recommended.”</p> <p>Second Bullet: Add “If the HCV antibody screening test is reactive and the supplemental test is non-reactive, the overall interpretation for the two-test algorithm is “inconclusive”. In these instances, the submitting clinician should ask their patient to submit new samples for repeat HCV antibody testing <i>AND</i> HCV RNA testing if not already completed.”</p> <p>Third Bullet: Add “Anti-HCV.” Delete “HCV RNA real-time reverse transcription, polymerase chain reaction (RT-PCR) or nucleic acid amplification test (NAT) should be performed to rule out maternal antibody and to confirm viremia” and add “HCV RNA testing should be performed to determine if viremia is present.”</p> <p>Fourth Bullet: Add “for testing in infants.”</p> <p>Fifth Bullet: Revise to state “Testing for HCV RNA earlier than 6 weeks of age is not recommended.”</p> <p>Added Bullet Six.</p>

Revision Date	Document Section	Description of Revisions
January 2018	5.0 Clinical Evidence	Revision of the entire section.
January 2018	9.0 Document History	Updated
February 2019	General	To support the regulation changes of negative lab reporting.
February 2019	General	Minor updates were made to support the regulation change to Diseases of Public Health Significance.
February 2019	4.2 Approved/Validated Tests	Entire section revised.
February 2019	4.3 Indications and Limitations	Added bullet two and six.
February 2019	6.0 ICD 10 Code(s)	Addition: B17.1 Acute hepatitis C

