

Health **FAX**

Measles: Request for Increased Index of Suspicion

Attention: **Physicians, Emergency Departments, Nurse Practitioners, Infection Control Practitioners, Occupational Health Professionals, Walk-In Clinics/Urgent Care Clinics, Midwives, NSM LHIN, Central LHIN, Family Health Teams**

Date: March 11, 2013

Ontario has been made aware by the Public Health Agency of Canada that a number of laboratory confirmed cases of measles from multiple provinces have reported a history of travel to a resort in Mexico (Azul Fives Hotel, Playa del Carmen) and are part of an international outbreak of measles. Within the past week, two laboratory confirmed case of measles have been identified in Ontario, one with a confirmed link to this resort in Mexico. The period of potential exposure to the measles virus in Mexico is from January 31, 2013 to March 7, 2013. Measles has a short incubation period which is usually 10 days but can range from 7 – 18 days from exposure to onset of fever; rash usually appears 14 days after exposure. Rarely, the incubation period can be as long as 19-21 days. Secondary cases have already been reported in this incident.

Simcoe County and District of Muskoka

There are many Ontario residents who travelled to this area during this time period. SMDHU will be following up with individuals and families from Simcoe County and the District of Muskoka who were in the resort during the exposure period. No measles cases have been reported in SMDHU to date.

Patients presenting with signs and symptoms compatible with measles should be questioned to assess for recent history of travel to the resort in Mexico or contact with other travelers. However, the index of suspicion should be high for any suspect case *regardless of travel history*. At this point in time we expect to see cases in susceptible people who had not travelled or had known contact with other travelers.

Please review the Public Health Ontario "[Alert for Clinicians: Measles in Ontario](#)" document attached for the recommended diagnostic testing and infection prevention and control practices required for suspected cases of measles.

Suspected cases of measles should be reported **immediately**. Do not wait for laboratory confirmation. For additional information or to report suspected measles cases please contact the Simcoe Muskoka District Health Unit, Communicable Disease Team at (705)721-7520 or 1-877-721-7520 extension 8809.

SUBJECT: Alert for Clinicians: Measles in Ontario

DATE: March 9, 2013

Please be advised that there is an ongoing international outbreak of measles linked to contact with cases from Europe who were on vacation in Mexico in February 2013 (Azul Fives Hotel, Playa del Carmen). Two cases have recently been reported in Ontario (one confirmed to be related to travel to Mexico). Many other travellers from Ontario were also at the resort during the same time and further cases may emerge amongst these individuals and susceptible contacts, and patients with measles may present to your health care setting. We therefore urge you to be vigilant. Measles is highly infectious and rapid action needs to be taken to control infection and prevent further cases.

Signs and symptoms of measles:

- Fever \geq 38.3 degrees Celsius (oral);
- Cough, runny nose or conjunctivitis;
- Generalized maculopapular rash

Infection control:

Patients with suspected measles should be promptly isolated in a single room with negative air flow (*airborne isolation* room). If you do not have an airborne infection isolation room, the patient should wear a mask and be placed in a single room. In either case, the door should remain closed and only measles-immune health care workers should attend to these patients.

All healthcare providers should ensure they are immune to measles. Evidence of immunity is two documented doses of MMR vaccine or laboratory evidence of immunity (<http://www.phac-aspc.gc.ca/publicat/cig-gci/p04-meas-roug-eng.php#vacadv>).

Report to public health:

Please report suspected cases of measles **immediately** to your local public health unit. Do not wait for laboratory confirmation.

Laboratory Diagnostic Testing

Laboratory diagnosis of measles should include both serology and virus detection. Please obtain all of the following:

- Virus Detection: A nasopharyngeal swab/aspirate or throat swab collected using Viral Transport Media (pink liquid medium) obtained within 4 to 7 days after rash onset and 50 mL of urine collected within 14 days after the onset of rash.

- Please note that Measles virus detection is now performed by Measles PCR testing. Please refer to the PHO Measles PCR Labstract (hyperlink below) to review specimen acceptance criteria for measles PCR testing. If you are uncertain, please contact Public Health Ontario Laboratories (PHOL) customer service at 416-235-6556 or 1-877-604-4567, or after hours duty officer at 416-605-3113, to speak to the Medical/Clinical Microbiologist on-call.
- Acute Serology: A blood specimen (5ml in serum tube) for measles antibodies (IgM and IgG) collected at the first visit (ideally within 7 days after rash onset).
- Convalescent Serology: A second blood specimen collected 7 to 10 days after the onset of rash (and a minimum of 5 days after the acute sample). Requisition should state “convalescent measles serology.” Seroconversion or a significant rise in IgG titre is indicative of recent/acute infection.

On each laboratory requisition for virus isolation or acute serology clearly mark “suspect case of measles.” All requisitions should contain the following information: patient’s symptoms, date of onset of symptoms, exposure history, travel history (if any) and vaccination history. Specimens must be stored and shipped cold.

Public Health Ontario Measles PCR Labstract (June 2011) is available at:

<http://www.oahpp.ca/resources/documents/labstracts/Labstract%20-%20LAB-SD-079-000%20-%20Measles%20PCR%20-%20Addition%20to%20Testing%20menu%20at%20PHO%20Laboratories.pdf>