

Ministry of Health

Office of Chief Medical Officer of Health, Public Health

Box 12.

Toronto, ON M7A 1N3

Fax: 416 325-8412

Ministère de la Santé

Bureau du médecin hygiéniste en chef, santé publique

Boîte à lettres 12

Toronto, ON M7A 1N3

Téléc.:416 325-8412

September 6, 2024

MEMORANDUM

TO: Ontario Hospital Chief Executive Officers

Primary Care Providers

FROM: Dr. Kieran Moore

Chief Medical Officer of Health and Assistant Deputy Minister

RE: Human Rabies Case in Ontario

Dear Colleagues,

Earlier this week, the Office of the Chief Medical Officer of Health was alerted to a case of clinical rabies in Ontario, The case was exposed to a bat in Ontario and became progressively ill. They were later admitted to the hospital for care with clinical signs of encephalitis and symptoms consistent with rabies; clinical diagnosis of rabies was made and confirmed by PCR analysis. This marks the first domestically acquired case of human rabies in Ontario since 1967.

Rabies is a reportable disease in Ontario. When a suspected exposure to rabies occurs, the case must be reported to your <u>local public health unit</u>, which is available **24/7.** Local public health units will conduct an investigation, provide a risk assessment, and recommend rabies post-exposure prophylaxis, if necessary.

Human rabies is an extremely rare disease in Canada due to effective public health prevention and control measures and the availability of publicly funded rabies vaccines and immunoglobulins. Since reporting of the disease began in Canada in 1924, there have been 26 other cases of rabies in humans in six provinces; all cases were fatal. Prior to this, the most recent death occurred in an adult male in British Columbia from a bat exposure in 2019.

In Canada, we have endemic rabies variants in bats, foxes, skunks, and raccoons, and we are considered free of all other species variants. Statistics show that bats are the most frequently reported animals testing positive for rabies across Canada. Skunks and raccoons have also tested positive in Ontario as recently as 2023. In 2024 the only rabies detections in the province have been in bats, with 42 positive identifications (approx. 16% of submitted bats).

Rabies is a viral disease and a type of Lyssavirus. It is transmitted by saliva from an infected animal and enters the central nervous system. Exposures to rabies can happen in two ways – bite exposures and non-bite exposures. Bite exposures involve the penetration of teeth into flesh, while non-bite exposures involve the contamination of scratches, abrasions, or cuts of the skin or mucous membranes by saliva or other potentially infectious material, such as the brain tissue of a rabid animal. Transmission cannot occur by exposure to the blood, urine, or feces of infected animals.

When assessing a patient for rabies, health care providers must use the appropriate infection prevention and control measures to prevent rabies exposure from the saliva of their patient. Clinicians must report suspected exposures of rabies to their local public health unit, and discuss whether rabies prophylaxis is recommended by their local Medical Officer of Health, as part of their clinical decision making. There are currently rabies vaccines and immunoglobulin available in Ontario for post-exposure prophylaxis.

Primary health care providers have an important role in ensuring patients are aware that they should seek medical attention if they have had a bite or potential exposure. Patients should not try to assess for themselves whether they may need rabies prophylaxis, particularly related to bat exposure due to the high positivity in the bat population.

We want to thank the medical team involved in the care of this individual and their family, and all health care providers for your efforts to help keep Ontarians safe and healthy.

Sincerely,

Dr. Kieran Michael Moore, MD, CCFP(EM), FCFP, MPH, DTM&H, FRCPC, FCAHS Chief Medical Officer of Health and Assistant Deputy Minister, Public Health

c: Elizabeth Walker, Executive Lead, Office of the Chief Medical Officer of Health Dr. S. Wajid Ahmed, Associate Chief Medical Officer of Health Peter Kaftarian, Associate Deputy Minister, Clinical Care and Delivery Matthew Anderson, President and Chief Executive Officer, Ontario Health Medical Officers of Health