January 24, 2020

UPDATE: 2019 Novel Coronavirus (2019-nCoV)

Summary and Action Items

- The Delaware General Health District, The Ohio Department of Health, and Centers for Disease Control and Prevention (CDC) are closely monitoring an outbreak of respiratory illness caused by a novel (new) coronavirus (termed “2019-nCoV”) first identified in Wuhan City, Hubei Province, China in December 2019 and which continues to expand.
- On January 21, 2020, the United States announced the first infection with 2019-nCoV detected in a traveler returning from Wuhan. As of January 23, 2020, Chinese health officials have reported hundreds of infections with 2019-nCoV in China, including outside of Hubei Province. Human infections with 2019-nCoV have also been confirmed in Taiwan, Thailand, Japan and South Korea.
- More cases are likely to be identified in the coming days, including possibly more cases in the United States. Increased travel to and from China is expected due to the Lunar New Year which begins on January 25, 2020. CDC has issued a Level 3 travel health notice for Wuhan City.
- Limited information is available to characterize the spectrum of clinical illness associated with 2019-nCoV. No vaccine or specific treatment for 2019-nCoV infection is available; care is supportive.
- The CDC clinical criteria for a 2019-nCoV patient under investigation (PUI) have been developed based on what is known about MERS and SARS and are subject to change as additional information becomes available.
- Health care providers should obtain a detailed travel history for patients being evaluated with fever and acute respiratory illness. Collection and testing of lower respiratory, upper respiratory and serum specimens for PUIs is recommended.
- For suspected cases of 2019-nCoV, healthcare providers or any individual having knowledge, should immediately notify both infection control personnel at their healthcare facility and their local health department (see attached Director’s Journal Entry).
- CDC guidance on clinical specimen collection and testing as well as additional resources for healthcare providers are included.

Background

Coronaviruses are a large family of viruses, some causing illness in people and others that circulate among animals. Rarely, animal coronaviruses can evolve and infect people and then spread between people such as has been seen with MERS and SARS. When person-to-person spread has occurred with SARS and MERS, it is thought to have happened via respiratory droplets. Investigations are ongoing to learn more about 2019-nCoV, but some degree of person-to-person spread of 2019-nCoV is occurring. Please note that 2019-nCoV is a novel coronavirus, and different from other common human coronaviruses (e.g., types OC43, 229E, HKU1, NL63).

Chinese health officials have reported hundreds of infections with 2019-nCoV in China, including outside of Hubei Province. Human infections with 2019-nCoV have been confirmed in Taiwan, Thailand, Japan, and South Korea. On January 21, 2020, the United States announced the first infection with 2019-nCoV detected in a traveler returning from Wuhan. More cases are likely to be identified in the coming days, including possibly more cases in the United States. The United States is actively screening incoming travelers from Wuhan.

Interim Guidance for Healthcare Professionals
Limited information is available to characterize the spectrum of clinical illness associated with 2019-nCoV. Patients with confirmed 2019-nCoV infection have reportedly had mild to severe respiratory illness with symptoms of fever, cough, and shortness of breath. CDC believes that symptoms of 2019-nCoV may appear in as little as 2 days or as long as 14 days after exposure.

No vaccine or specific treatment for 2019-nCoV infection is available; care is supportive. The CDC clinical criteria for a 2019-nCoV PUI (attached) have been developed based on what is known about MERS and SARS and are subject to change as additional information becomes available. The criteria are intended to serve as guidance for evaluation. Patients should be evaluated and discussed with The Delaware General Health District on a case-by-case basis if their clinical presentation or exposure history is equivocal (e.g., uncertain travel or exposure).

Health care providers should:

- Obtain a detailed travel history for patients being evaluated with fever and acute respiratory illness. Patients in the United States who meet the attached criteria for a PUI should be evaluated as a PUI in association with the outbreak of 2019-nCoV.
- Notify infection control personnel at their healthcare facility and contact the Delaware General Health District immediately to notify them of patients with fever and lower respiratory illness who traveled to Wuhan, China within 14 days of symptom onset. Local and state public health staff will determine if the patient meets the criteria for a PUI for 2019-nCoV.
- Collect clinical specimens for routine testing of respiratory pathogens at either clinical or public health labs. For PUIs, collection of three specimen types, lower respiratory, upper respiratory and serum specimens is recommended; these specimens can be sent to the ODH Public Health Laboratory for testing at CDC. Please see guidance for specimen collection and testing below.

Recommendations

For Specimen Collection and Testing

- To increase the likelihood of detecting 2019-nCoV infection, collect three specimen types, lower respiratory, upper respiratory and serum specimens. If available, additional specimen types (e.g., stool, urine) should be collected and stored until a decision is made by CDC whether these specimens should be tested. Specimens should be collected as soon as possible once a PUI is identified regardless of symptom onset. Detailed guidance for collecting, handling, and testing clinical specimens from PUIs is attached.
- For biosafety reasons, it is not recommended to perform virus isolation in cell culture or initial characterization of viral agents recovered in cultures of specimens from a PUI for 2019-nCoV. Detailed laboratory biosafety guidelines for handling and processing specimens associated with 2019-nCoV is attached.
- At this time, diagnostic testing for 2019-nCoV can be conducted only at CDC. Please contact the Delaware General Health District or ODH to obtain pre-approval and shipping information.

Infection Control for Healthcare Facilities

CDC currently recommends a cautious approach to PUIs for 2019-nCoV. PUIs should be asked to wear a surgical mask as soon as they are identified and be evaluated in a private room with the door closed, ideally an airborne infection isolation room if available. Healthcare personnel entering the room should use standard, contact, droplet, and airborne precautions. Please note that any facility capable of managing patients with Mycobacterium tuberculosis or measles can safely manage patients infected with 2019-nCoV following the above infection control recommendations. At this time, there is no recommendation for patient transfer to a special pathogen treatment center. CDC’s general guidelines for isolation precautions can be found at https://www.cdc.gov/infectioncontrol/guidelines/isolation/index.html.

Interim Guidance for Preventing 2019-nCoV from Spreading to Others in Homes and Communities

Based on public health and medical evaluation, some people who are confirmed to have, or being evaluated for, 2019-nCoV infection and do not require hospitalization for medical reasons may be cared for at home. Prior to a healthcare facility releasing a person to home care, the following steps should be taken:
- Assess the suitability of the residential setting for home care.
• Provide CDC’s interim guidance for preventing 2019-nCoV from spreading to others in homes and communities to the person confirmed to have, or being evaluated for, 2019-nCoV infection, and to the caregiver and household members.
• Contact the state or local health department to discuss criteria for discontinuing home isolation.

Reporting
Healthcare providers should notify infection control personnel at their healthcare facility and contact the Delaware General Health District immediately to notify them of patients with fever and lower respiratory illness who traveled to Wuhan, China within 14 days of symptom onset. Cases of 2019-nCoV are class A, meaning cases should be reported to The Delaware General Health District immediately via telephone. Please report all cases to the Delaware General Health District (DGHD) by calling (740) 203-2040.

For more information

Attachments
• Director’s Journal Entry (Jan. 23, 2020)
• Criteria to Guide Evaluation of PUIs for 2019-nCoV
• Interim Guidelines for Collecting, Handling, and Testing Clinical Specimens from PUIs for 2019-nCoV
• Interim Laboratory Biosafety Guidelines for Handling and Processing Specimens Associated with 2019-nCoV
• Interim 2019 Novel Coronavirus PUI Form (Jan. 17, 2020)