



# STATE OF CONNECTICUT

## DEPARTMENT OF PUBLIC HEALTH

### Interim Criteria for Submission of Specimens to the

#### Connecticut Department of Public Health Laboratory for Novel H1N1 Influenza A Testing (7/2/09)

UPDATE: Sustained community transmission of the novel H1N1 influenza strain continues throughout Connecticut. The Department of Public Health (DPH) continues to NOT recommend H1N1 influenza testing in outpatients with febrile respiratory illnesses for surveillance purposes.

If testing for novel H1N1 influenza is clinically indicated for certain outpatients, healthcare providers can request RT-PCR testing for influenza through a commercial laboratory, such as Quest Diagnostics. The rapid flu tests that are commercially available were not designed to detect novel H1N1 influenza virus. They are screening tests for influenza A or B and can produce both false negative and false positive results. In a recent report, rapid-test results were positive for 20 of 39 patients who had positive results for novel H1N1 influenza on RT-PCR assay (sensitivity, 51%; 95% confidence interval [CI], 35 to 67) (<http://content.nejm.org/cgi/content/full/NEJMc0904264?query=TOC>). Given widespread community transmission of novel H1N1 in Connecticut, a negative rapid flu test in a person with influenza-like illness is possibly a false negative result.

The groups outlined below will remain the focus for testing at the Connecticut DPH Laboratory. When submitting specimens, it is important that the entire top portion of the lab requisition form is filled out completely and that the reason for testing is written in the "Comments" section; this includes patient symptoms and rapid flu test results. This information will help to prioritize specimens sent to the DPH Laboratory. Specimens from asymptomatic patients will not be tested.

*The Connecticut DPH Laboratory is currently accepting specimens on the following patients only:*

- Specimens from hospitalized patients with influenza-like illness (ILI)  
Please note: The hospitalized status of the patient must be noted on the lab requisition form.
- Specimens from healthcare workers with ILI and a negative rapid influenza A test. Healthcare workers with a positive rapid influenza test should be assumed to be infected with the novel H1N1 virus. **Please note: the status of the patient as a healthcare worker must be noted on the lab requisition form.**

*⇒ Specimens sent to the DPH lab that do not meet the above criteria will not be accepted.*

Definition of Influenza-Like Illness (ILI): Fever  $>37.8^{\circ}\text{C}$  ( $100^{\circ}\text{F}$ ) plus cough or sore throat

NOTE: The CDC US Outpatient Influenza-like Illness Surveillance Network (ILINet) uses this fever threshold (<http://www.cdc.gov/flu/weekly/fluactivity.htm>).

#### Other Important Information

- **Specimens must be accompanied by a completed laboratory requisition form.** Laboratory requisition forms are available in the State Lab VR-C kits or on-line at <http://www.ct.gov/ctfluwatch>.
- Test results will be provided to the healthcare provider ordering the test and the local health director where the patient resides.
- Healthcare providers requesting novel H1N1 influenza testing through Quest must specify that testing for novel H1N1 flu is desired on the order form. Healthcare providers are requested to contact the local health director for the town where their patient resides with positive results obtained through Quest.

## **Diagnostic Laboratory Testing for Suspected Novel H1N1 Influenza A**

- Collect one nasopharyngeal swab using a Dacron swab in viral transport medium for submission to the Department of Public Health Laboratory (DPHL) 10 Clinton St., Hartford CT 06106 for molecular testing.
- Respiratory viral reference collection kits (VRCs) may be obtained by calling the DPH Laboratory at 860-509-8501. Please see attached collection instructions. For questions regarding the collection, handling, and transport of specimens, please call the DPH Laboratory at 860-509-8500.
- Laboratories that use the rapid EIA influenza test should send positive influenza type A specimens to the DPH Virology Laboratory. The original nasopharyngeal swab should be sent for subtyping in viral transport medium.
- Diagnostic laboratory work on clinical samples from patients who are suspected cases of novel H1N1 influenza A virus infection should be conducted in a BSL2 laboratory. All sample manipulations should be done inside a biosafety cabinet (BSC).
- Results of testing of initial cases suggest that rapid EIA influenza tests may be insensitive for the detection of novel H1N1 influenza A and these assays should not be relied on as screening tests for this agent.

### **VR-C Kit Collection Instructions**

1. Remove all contents of the kit:
  - a. Requisition sheet
  - b. M4-RT viral transport tube
  - c. Dacron sampling swab
  - d. Diagnostic Specimen mailer (Zip lock plastic bag, inner aluminum tube, outer fiberboard tube with State Laboratory mailing address)
  - e. A copy of these instructions
2. Completely fill out the requisition sheet
3. Label the M4-RT with Patient name, Facility ID, source of specimen (throat, eye, etc.)
4. Obtain specimen from patient.
5. Remove screw cap top from M4-RT vessel.
6. Insert swab into the M4-RT vessel until swab touches the bottom. Break or cut off excess swab handle.
7. Discard excess handle.
8. Screw on top of M4-RT tube tightly.
9. Place M4-RT tube in plastic bag, seal top and insert into aluminum tube, seal inner tube, place requisition sheet around aluminum tube and insert into fiberboard tube.
10. Attach appropriate postage and place mailer in mailbox or hand deliver.