STATE OF CONNECTICUT
DEPARTMENT OF PUBLIC HEALTH

Deidre S. Gifford, MD, MPH
Acting Commissioner

Ned Lamont
Governor
Susan Bysiewicz
Lt. Governor

Updated COVID-19 Guidance for Healthcare Providers (MDs, APRNs, PAs, & RNs) – August 5, 2020

This document summarizes guidance updates from the Centers for Disease Control and Prevention (CDC) and supplements prior guidance provided by the Connecticut Department of Public Health (DPH).

CDC recently updated guidance regarding duration of isolation and transmission-based precautions for patients with COVID-19.[1,2] They also published a Decision Memo citing persistent RNA detection in the absence of live virus, and the lack of confirmed reinfections.[3] These updates affect the following infection control/public health decisions:
- Duration of home isolation of individuals diagnosed with COVID-19 or asymptomatic detection of SARS-CoV-2[1]
- Duration of transmission-based precautions for healthcare settings[2]
- Return-to-work criteria for healthcare personnel[4]

Updates to Criteria for Lifting Isolation Precautions
CDC now recommends for individuals diagnosed with COVID-19 and asymptomatic detection of SARS-CoV-2:
- The test-based strategy is no longer recommended except for rare situations.
    - The test-based strategy requires 2 consecutive **RT-PCR** results collected $\geq$24 hours apart.
    - All test results should be final before isolation ends.
    - The use of the test-based strategy is discouraged given the potential for prolonged detection of viral RNA.
- Symptom-based criteria were modified such that in addition to a minimum of 10 days of isolation, symptomatic individuals should have:
    - No fever (without the use of fever-reducing medications) for **>24 hours**, rather than >72 hours.
    - "Improvement in symptoms", rather than "improvement in respiratory symptoms", as non-respiratory symptoms are associated with COVID-19.
- The recommended duration of precautions was extended to 20 days for individuals with *severe to critical illness* or *severe immunocompromise*.
    - SARS-CoV-2 illness severity criteria are adapted from the NIH COVID-19 Treatment Guidelines.[5]
    - "Severe immunocompromise" is not clearly defined. Consider consultation with infection control experts.
    - Some conditions, such as being on chemotherapy, CD4 T lymphocyte count < 200, primary immunodeficiency disorders, and use of prednisone >20mg/day for >14 days, may cause a higher degree of immunocompromise.
    - Other factors, such as advanced age, diabetes mellitus, or end-stage renal disease, may pose a much lower degree of immunocompromise and not clearly affect decisions about duration of isolation.
    - Ultimately, the degree of immunocompromise for the patient is determined by the treating provider, and preventive actions are tailored to each individual and situation.
- For persons who never develop symptoms, isolation precautions can be discontinued 10 days after the date of their first positive RT-PCR test for SARS-CoV-2.

Phone: (860) 509-7994 • Fax: (860) 509-7910
Telecommunications Relay Service 7-1-1
410 Capitol Avenue, P.O. Box 340308
Hartford, Connecticut 06134-0308
www.ct.gov/dph
Affirmative Action/Equal Opportunity Employer

Updated Recommendations about Persistence of Positivity and Retesting
CDC now recommends against retesting any individual during the 3-month/90-day period after confirmed COVID-19 infection unless new-onset symptoms associated with COVID-19 arise.[3]
- Individuals previously diagnosed with COVID-19 who remain asymptomatic after recovery should not be retested for 3 months after the date of initial symptom onset.
- In the event of a significant exposure, quarantine is not recommended for individuals who recovered from COVID-19 during the 3-month period after symptom onset.
- For individuals who never developed symptoms, testing is not recommended within the 3-month period after the first positive PCR test for SARS-CoV-2.
- If someone who previously had a positive PCR test for SARS-CoV-2 becomes symptomatic within the following 3 months and an evaluation fails to identify a diagnosis other than SARS-CoV-2 infection (e.g., influenza), then the person may warrant evaluation for SARS-CoV-2 reinfection in consultation with an infectious disease or infection control expert. Isolation may be warranted during this evaluation, particularly if symptoms developed after close contact with an infected person.

Counseling Patients to Self-Isolate at time of COVID-19 testing
CMS will now reimburse providers for counseling patients to self-isolate. Providers should counsel patients at the time of COVID-19 testing and include in their discussion:[6]
- The need for isolation immediately, even before results are available. This means wearing a mask at all times and limiting interactions with others. Self-isolating away from household members should also be considered.
- The importance of informing immediate household members that they too should be tested for COVID-19.
- A review of COVID-19 signs and symptoms.
- Any services available to them to aid in isolating at home.
- When results are available, further counseling is also warranted to further reinforce isolation or quarantine, as indicated by the patient's situation.

Contact Tracing and Case Investigation in the Healthcare Setting[7]
Contact Tracers associated with local health departments and DPH will contact individuals with confirmed COVID-19 to conduct contact tracing and case investigation. Healthcare facilities should be prepared to identify staff and patients who might have been in close contact with an individual who spent part of their infectious period in the facility.

Healthcare providers will often receive COVID-19 test results prior to health departments, given the time it takes for laboratory reporting to DPH and the contact tracing system. Healthcare facilities can help control the spread of COVID-19 by starting contact tracing and case investigation as soon COVID-19 is diagnosed.

- **Contact Tracing** identifies close contacts of individuals who test positive for COVID-19. Someone with a significant exposure to an individual with COVID-19 should quarantine for 14 days. The period of 14 days has been established as the maximum incubation period for COVID-19.
  - The index case's infectious period sets the time period for which close contacts should be identified. This starts 2 days prior to COVID-19 symptom onset (or 2 days prior to first positive test for index cases without symptoms at time of testing), and ends when the index case meets criteria of lifting isolation precautions.[1,2]
  - While data to inform the definition of a "significant" exposure is limited, CDC considers a "close contact" as someone who was within 6 feet for $\geq$ 15 minutes.
  - Non-Healthcare Personnel (HCP) are considered to have had a significant exposure if they had close contact (<6 feet, $\geq$15 min) with someone in their infectious period for COVID-19, irrespective of whether either party was wearing a cloth face covering or whether the contact was wearing respiratory personal protective PPE.[8]
  - HCP are considered to have had a significant unprotected exposure if they had prolonged close contact (<6 feet, $\geq$15 min) with someone in their infectious period for COVID-19 AND:
    o The HCP was not wearing a respirator or facemask.
    o The HCP was not wearing eye protection if the person with COVID-19 was not wearing a face covering.
    o The HCP was not wearing all recommended PPE (i.e., gown, gloves, eye protection, respirator) while performing an aerosol-generating procedure.[9,10]

- **Case Investigation** involves identifying where someone diagnosed with COVID-19 might have been exposed. Exposure may have occurred up to 14 days prior to symptom onset or time of first positive specimen collection. Median time from exposure to symptoms onset is 4–5 days.
  - Case investigation is important to identify events during which multiple individuals could have been infected.
  - During case investigation, look for adherence to infection control guidance such as hand hygiene, source control (face covering over nose and mouth), and physical distancing.
  - Indoor gatherings, particularly where adherence to face covering is low, should be identified as potential sources of exposure.
  - Information about events and gatherings where unknown contacts might have also been exposed can be communicated to the appropriate local health department for timely investigation.

Counseling Patients After a Significant Exposure to COVID-19

CDC's criteria of "significant exposure" for community exposures[8] and healthcare personnel[9] exposures is discussed above (see "Contact Tracing"). Those who had an exposure to a person with known or suspected COVID-19 should self-quarantine at home for 14 days after the last exposure, stay at least 6 feet away from others, avoid contact with people at higher risk for severe illness, and self-monitor for symptoms. The 14-day period for quarantine reflects the 14-day maximum incubation period for COVID-19.
- If symptoms develop during the 14-day quarantine, the individual should follow home isolation guidance for cases and seek medical care and testing.
- A person who tests negative during their 14-day quarantine period should continue to self-quarantine until the end of their 14-day quarantine period.
- If an individual does not develop symptoms during the 14-day quarantine period, then they may be released from self-quarantine.

Return-to-Work Criteria for Healthcare Personnel (HCP)

For staff who test positive for COVID-19, an assessment should be made regarding possible exposures at work (take PPE use into account) and outside work (PPE use not taken into consideration). If infection control guidance (PPE use, hand hygiene, facemask use) is adhered to, the risk of exposure at work in a healthcare setting is very low. Symptom-based criteria should be used to determine when HCP who test positive should return to work. HCP who are not severely immunocompromised and were asymptomatic throughout their infection may return to work when at least 10 days have passed since the date of their first positive viral diagnostic test.[4]

Though the test-based strategy for return-to-work is discouraged for HCP who test positive for SARS-CoV-2, if it is to be used to bring HCP back to work before 10 days:
- Fever must be resolved without the use of fever-reducing medications,
- Symptoms must be improved (e.g. cough, shortness of breath), and
- **2** negative specimens collected $\geq$24 hours apart must be negative using a **molecular (i.e. PCR)** assay for SARS-CoV-2.[4]

HCP identified to have had a significant exposure within the healthcare setting[9] or community[8] should be excluded from work for 14 days after last exposure with advice to monitor for symptoms consistent with COVID-19. HCP who test negative during their 14-day quarantine period should continue to self-quarantine until the end of their 14-day quarantine period. If HCP develop symptoms consistent with COVID-19, medical evaluation and testing should be sought.

Antigen Testing Recommendations

Antigen testing can be useful to obtain rapid results when PCR wait times are prolonged. It is most useful when the person being tested is symptomatic and testing occurs in the first five days post symptom onset. While the antigen tests for SARS-CoV-2 are improving in sensitivity, there is no sensitivity data for asymptomatic individuals at this time. Current

recommendations suggest that due to the higher chance of false negatives, negative results from an antigen test may need to be confirmed with a PCR test prior to making treatment or infection control decisions.[11]

In Connecticut, current low prevalence of COVID-19 means that the pre-test probability of an asymptomatic person is low. For someone with a significant exposure, the pre-test probability may be higher, however we do not know the best time after exposure to test an asymptomatic individual using an antigen test to optimize sensitivity. It should also be noted that false positive antigen detection can occur and are most likely in populations where the prevalence of SARS-CoV-2 infection is low.[12]

At this time, DPH recommends prioritizing antigen testing for outpatient testing of individuals with symptoms consistent with COVID-19. DPH also recommends using PCR testing for high-risk populations, and prioritizing on-site or in-state PCR testing resources for these populations (to include but not limited to): hospitalized patients, residents of congregate living settings, and staff working in congregate living settings.

A Note about False Positives
A few laboratories across the U.S. have recently reported false positive results for SARS-CoV-2 PCR tests due to testing instrument errors, contamination, or other reasons. CLIA-certified laboratories must adhere to strict laboratory protocols to ensure reporting of accurate results, and they are responsible for notifications of erroneous results. Additional testing performed within 10 days of an initial positive result should not be used to identify potential false positive results or to eliminate the need for public health action in response to a positive result.

Unless identified as a false positive by a CLIA-certified laboratory, positive results should be considered true positives. DPH expects that infection control and public health actions should result from positive results. Clinicians suspicious of a false positive result can consider discussing their suspicion with the laboratory that provided the result.

Connecticut's Travel Advisory
Governor Lamont issued Executive Order 7III[13] on July 21, 2020 which updated the travel advisory to include the completion of a travel form and mandatory self-quarantine for 14 days for persons arriving to Connecticut from states with either a 7 day rolling average of case rates exceeding 10/100,000 or a test positivity rate of 10%. The list of states is updated weekly on Tuesdays and can be found here: https://portal.ct.gov/Coronavirus/Travel. Persons who do not comply with completing the form or the mandatory self-quarantine can be fined $1,000.

Persons who are critical infrastructure workers, as defined by the Cybersecurity and Infrastructure Security Agency, are exempted from the mandatory self-quarantine IF their travel was work related. If a critical infrastructure worker travels for vacation or other reasons, they must complete the form and comply with the self-quarantine on their return. A negative test on return from an affected state does NOT allow a person to be exempted from the self-quarantine requirement. A testing option is included for those persons who are unable to quarantine (for example, a person visiting a dying relative in the state) but the test must be obtained 72 hours prior to arrival in Connecticut. In general, a Connecticut resident returning from a state affected by the travel advisory should be able to self-quarantine.

The state coronavirus website should be monitored regularly for information on the travel advisory including updates and Frequently Asked Questions.[14]

While not included as part of the state travel advisory, CDC continues to recommend against non-essential international travel. Persons returning from international travel are recommended to observe a 14-day self-quarantine.[15,16]

References

[1]CDC. Discontinuation of Isolation for Persons with COVID-19 Not in Healthcare Settings: https://www.cdc.gov/coronavirus/2019-ncov/hcp/disposition-in-home-patients.html

[2]CDC. Discontinuation of Transmission-Based Precautions and Disposition of Patients with COVID-19 in Healthcare Settings (Interim Guidance): https://www.cdc.gov/coronavirus/2019-ncov/hcp/disposition-hospitalized-patients.html

[3]CDC. Decision Memo: Duration of Isolation and Precautions for Adults with COVID-19: https://www.cdc.gov/coronavirus/2019-ncov/hcp/duration-isolation.html

[4]CDC. Criteria for Return to Work for Healthcare Personnel with SARS-CoV-2 Infection (Interim Guidance): https://www.cdc.gov/coronavirus/2019-ncov/hcp/return-to-work.html

[5]NIH. Management of Persons with COVID-19: https://www.covid19treatmentguidelines.nih.gov/overview/management-of-covid-19/

[6]CDC. Press Release: CMS and CDC announce provider reimbursement available for counseling patients to self-isolate at time of COVID-19 testing: https://www.cdc.gov/media/releases/2020/p0730-cms-cdc-provider-reimbursement-available-covid-19.html

[7]Investigating a COVID-19 Case: https://www.cdc.gov/coronavirus/2019-ncov/php/contact-tracing/contact-tracing-plan/investigating-covid-19-case.html

[8]CDC. Public Health Guidance for Community-Related Exposure: https://www.cdc.gov/coronavirus/2019-ncov/php/public-health-recommendations.html

[9]CDC. Interim U.S. Guidance for Risk Assessment and Work Restrictions for Healthcare Personnel with Potential Exposure to COVID-19: https://www.cdc.gov/coronavirus/2019-ncov/hcp/guidance-risk-assesment-hcp.html

[10]CDC. Clinical Questions about COVID-19: "Which procedures are considered aerosol generating procedures in healthcare settings?" https://www.cdc.gov/coronavirus/2019-ncov/hcp/faq.html#Infection-Control

[11]OASH. Guidance – Proposed Use of Point-of-Care (POC) Testing Platforms for SARS-CoV-2 (COVID-19): https://www.cdc.gov/coronavirus/2019-ncov/downloads/OASH-COVID-19-guidance-testing-platforms.pdf

[12]APHL. Considerations for Implementation of SARS-CoV-2 Rapid Antigen Testing: https://www.aphl.org/programs/preparedness/Crisis-Management/Documents/APHL-SARSCov2-Antigen-Testing-Considerations.pdf

[13]CT Office of the Governor. Executive Order No. 7III: https://portal.ct.gov/-/media/Office-of-the-Governor/Executive-Orders/Lamont-Executive-Orders/Executive-Order-No-7III.pdf

[14]CT Travel Advisory for Visitors to Connecticut: https://portal.ct.gov/Coronavirus/travel

[15]CDC. Considerations for Travelers—Coronavirus in the US: https://www.cdc.gov/coronavirus/2019-ncov/travelers/travel-in-the-us.html

[16]CDC. Returning from International Travel: https://www.cdc.gov/coronavirus/2019-ncov/travelers/after-travel-precautions.html