

March 11, 2020

The purpose of this document is to provide instructions on how to collect samples for COVID-19 testing at the Utah Public Health Laboratory (UPHL). **Future guidance will be provided when testing is available in the Intermountain Central Laboratory.** An Intermountain test is being developed with all speed.

## ***Which labs can test for COVID-19?***

As of March 5, 2020, the Utah Department of Public Health (UDPH) is performing COVID-19 testing with a projected turnaround time of 24 hours upon receipt in the lab.

We anticipate a test being available in the Intermountain Central Lab by mid-March and will send notification when test validation has been completed.

## ***How should tests be ordered?***

Clinicians must have approval from the UPHL (1-888-EPI-UTAH) for COVID 19 testing done at the state. Detailed instructions for screening definitions and process are found in the Intermountain COVID-19 Guidance document. Clinicians can call the SCORE/COVID hotline (801-507-2673, Option 3) for questions about testing suspected cases prior to calling UPHL. *NOTE: Patients are encouraged to contact Connect Care for screening if they are not ill enough to seek medical evaluation in an ER or Urgent Care. The Connect Care team will perform screening and call UPHL for approval.*

Ordering process for UPHL testing:

- Obtain one nasopharyngeal and one oropharyngeal swab specimen using a flocked swab. Place BOTH swabs in UTM viral transport media.
- Complete one UPHL test request [form](#). Write “COVID19 – Intermountain” in the lower left corner of the form.
- Complete CDC Person Under Investigation [form](#).
- Place *Miscellaneous Send Out test (MSO)* order in iCentra with “test name = COVID-19”.
- Send viral transport media (with swabs inside) and forms to Intermountain laboratory.
- Ensure that the forms are placed in the document pouch of the outer biohazard bag. Do not place documents in the same inner bag with the primary specimen.
- Refrigerate sample if there will be delays in submission to the laboratory.

## ***What tests should be ordered?***

Refer to Intermountain COVID-19 Guidance document for risk definitions and testing criteria

High Risk Patient:

- Collect one NP swab and one OP swab for COVID-19 testing at UPHL.
- If other viral testing is needed (FLUPCR, FLU/RSV PCR, RFAPCR) collect extra NP swab for testing at a hospital-based lab if clinically indicated. Do not run Influenza PCR in clinic-based labs.

*Note: A positive result does not necessarily rule out COVID-19 in high risk patients*

Variable Risk: Guide testing based on clinical suspicion. If symptoms compatible for COVID-19 are present, test with FLUPCR OR RFAPCR first.

1. FLUPCR

Testing can be performed in Urgent Care Clinics using appropriate PPE

- Fluid impervious gown
- Gloves
- Face and eye protection (faceshield OR surgical mask + goggle)

2. RFAPCR – testing is performed in hospital-based labs

- Collect one NP swab and one OP Swab (see below). Testing will be performed on NP swab and if COVID testing is required, both samples will be submitted to the UPHL.

**What precautions should be taken during specimen collection?**

1. High risk patients and Variable patients in whom COVID testing has been approved – PAPR or N95 respirator with eye protection along with gloves and fluid impervious gown
2. Variable and all other patients in whom COVID-19 testing has been deemed unnecessary – gloves, gown, procedure/surgical mask, face shield.

**What samples to collect?**

Upper respiratory tract samples:

1. Nasopharyngeal swab - **flocked swab** (synthetic fiber with plastic shaft) into both nasopharyngeal areas with the same swab and place immediately into sterile tube with 2-3 mL of **transport media**.
  2. Oropharyngeal/throat swab: Swab the posterior pharynx, avoiding the tongue (**flocked swab with acceptable transport media**).
- NOTE. BOTH SWABS TO BE PLACED INTO A SINGLE TUBE OF TRANSPORT MEDIA.** *This is a change from previous recommendations - the CDC no longer requires that swabs be placed into separate containers.*
3. Acceptable transport media: Viral transport media, Universal transport media, M4 media
  4. If additional testing for respiratory viruses is needed for testing in an Intermountain Lab, please collect a separate NP swab for testing.

Lower respiratory tract samples:

5. BAL or tracheal aspirate: Collect 2-3 mL into a sterile, leak-proof, screw-cap sputum collection cup or sterile dry container. Refrigerate specimen at 2-8°C and coordinate overnight shipment to CDC on ice pack with UDOH.
6. Sputum: Have the patient rinse the mouth with water and then expectorate deep cough sputum directly into a sterile, leak-proof, screw-cap sputum collection cup or sterile dry container. Refrigerate specimen at 2-8°C and coordinate overnight shipment to CDC on ice pack with UDOH.

Note: Induced sputum is not recommended

### ***How should I bag the specimen?***

Swabs must be double bagged. For outer bag, use a biohazard bag with an outer pouch for paperwork. Placing paperwork in the bag with the specimen will delay processing as this must take place in a biohazard cabinet.

### ***How should specimens be stored?***

- Refrigerated at 2-8°C until shipment
- Ship cold with ice packs

As per Section II, COVID-19 samples should be sent by courier to the Central Lab for processing and shipment to the Utah Public Health Lab (UPHL) unless the facility can ship directly to UPHL within 2 hours.

### ***When will testing be performed at the UPHL?***

7 days/week with a turnaround time of 24 hours. There is no need to delay submission to the UPHL even if collected on weekends

### **References:**

[Intermountain Healthcare COVID Guidance](#)

<https://www.cdc.gov/coronavirus/2019-nCoV/lab/guidelines-clinical-specimens.html>