COVID-19 ECHO Session #14 _ June 2, 2020: Specimen Referral Systems for SARS-COV-2 Testing

SN	Questions	Answer/ Response / Comments
Sample Management		
1.	What is the rate of specimen rejection due to poor quality and how is this communicated to the collection centers? Botswana and Zambia	Botswana said this wasn't a problem and Zambia said they weren't currently rejecting specimens. Rejections should be communicated to collection sites either by paper using the same transport system in reverse, or electronically.
2.	What are the panelists' opinions on the transport of dry swabs from referral sites to testing sites? Have any labs done evaluations comparing dry swabs to VTM transported swabs?	Neither Botswana or Zambia or any of the countries where IDDS have transported dry swabs.
3.	There are challenges to obtain dacron/polyester swabs and viral transport medium? Has any country discussed the use of deep gargle specimens instead? It could be collected using normal saline and in the same cup as for sputum collection for TB, requires less PPE use and less exposure to HCW	Countries have had challenges with procuring VTM but I have not heard of challenges with swabs.
4.	How do we package COVID19 samples for transport to central testing Laboratories?	COVID-19 specimens fall under the UN infectious substances category B or UN3373, which means that specimens should be properly triple-packaged. https://www.un3373.com/category-biological-substances/category-b/
5.	Specimen/sample backlog is a foreseen challenge for most countries in the region. Can NAT pooling be an option? I think it can significantly reduce cost of testing and TAT, so long at validation is done and sensitivity and specificity performance found to be acceptable.	Countries can answer but this has been discussed on previous calls. Pooled testing should be discussed in terms of cost efficiency and if it is deemed cost efficient, protocols should be discussed and planned for.
6.	What is your storage temperatures for those samples you're talking about please?	Ideally 2-8 degrees Celsius for transport within 72 hours.
7.	Regarding nasopharyngeal swabs, is this a strong recommendation to use flocked or dacron swabs?	Yes, it is recommended to use synthetic, flocked swabs.
Biosafety		
8.	What is the minimal equipment with GeneXpert concerning security?	There is a product called PrimeStore MTM molecular transport medium that rapidly inactivates the virus and stabilizes the nucleic acids for transport without cold-chain. This product eliminates risks during transport and handling and eliminates the need for separate inactivation steps in the lab and eliminates the need for BSCs when using GeneXpert.
9.	Is there a minimum package of PPE recommended for those who are doing transportation of specimens?	The specimens should be fully packaged before the transporter arrives so the main PPE would be gloves to touch the tertiary packaging (i.e. cooler box). Transporters should also be trained on what to do in case of a spill and potentially provided a spill kit or at least an SOP of how to document the incident and whom to notify.

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10.	Are transporters trained and what is the training package?	They should be trained on how to handle potentially biohazardous materials. More resources can be found in the Global Laboratory Initiative (GLI) Specimen Referral Toolkit at http://www.stoptb.org/wg/gli/srt.asp.
11.	In a situation where the level of safety in the labs is sometimes very questionable in Africa, what specific strategies are you placing in sample collection, transport and testing to prevent infection among health care workers at the workplace?	This question is larger than specimen referrals but see answers to questions 10 and 11 for the transport piece.
12.	What do you advice on PPE utilization for couriers using motorbike, do they need to use the full gear when they are transporting specimens	There is PPE for safe motorcycle riding, which includes head-to-toe safety gear. And then there is PPE for transporting potentially biohazardous materials (see answers to questions 10 and 11).
13.	Do we have a record of how many lab staff have contracted COVID-19? Any statistics from Zambia and Botswana?	
Result Reporting / LIS		
14.	How are results sent back to facilities and quarantine centers with no LIS?	They should be sent back by an expedited mechanism (phone or email) but followed up with the paper copy sent by the same transportation system, in reverse
15.	Is any country using a specimen tracker? In a decentralized system how are you using barcodes and aggregating data / disaggregating data?	Tracking individual specimens and results throughout the turnaround is very difficult for most countries and very few use barcodes for all routine specimens.
16.	Have some countries started using the diagnostic connectivity solutions (e.g. GxAlert, DataToCare) to manage and transmit results when you use GeneXpert?	Testing on Xpert has not yet commenced
Testing Systems		
17.	When there are multiple labs testing (e.g. Zambia with 8 labs) what criteria do you use to distribute the samples to which lab?	Countries can answer for their own context but all countries, if possible, should go through an exercise to plan for their diagnostic network for SARS-CoV-2 testing. This will help answers about centralized/decentralized testing, collection points, meeting testing targets, frequencies of collection, etc.
18.	Would decentralization make for effective testing?	This is highly dependent on the strength of the SRS. The more centralized a system, the more robust the SRS needs to be at every level/tier of the health system. Even with decentralized testing, however, a country will still need a SRS but it may not need to extend as far (i.e. from lowest-tier collection points all the way to the national referral laboratory)