

3RD CALL OIE INFORMAL ADVISORY GROUP ON COVID-19 AND ANIMALS

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Agenda

1. Update on any research about origin or potential role of animals (host range studies etc.)
 - a. Ongoing research
 - b. Planned research
 - c. Immediate priorities
2. Diagnostics in animals – protocols
3. Longer term work on risk mitigation around wildlife trade/sale/consumption

Meeting notes

1. Update on animal research

- Animal infection studies have been initiated in several high containment laboratories. The studies include fruit bats ('flying foxes'), ferrets, pigs, chickens and turkeys.; solid results were expected in 4-6 weeks.
- China Animal Health Epidemiology Center (CAHEC) (China), has been testing archived animal samples (including from poultry, cat, dogs, pigs) that had been taken in 2019 in numerous locations around China. SARS-CoV-2 was not detected in any samples. If possible, the sample size, location and testing protocol will be shared with the OIE.
- HKU (Hong Kong), updated on the first dog (17-year-old. Pomeranian) to test positive for SARS-CoV-2 in Hong Kong. The dog had tested positive by RT-PCR on oral and nasal samples over a period of 12 days. CT values were all above 30. Experience with human samples demonstrates that it is difficult to isolate virus when the CT is over 30. Nasal swabs showed a higher viral load than oral swabs. Preliminary serological tests for antibodies to SARS-CoV-2 had been negative but after using a lower challenge dose, antibodies were detected. The dog showed no clinical signs of COVID-19. It has passed away (thought to be due to other geriatric health problems) after testing PCR negative and being released from quarantine. A second dog (a German Shepard) in quarantine in Hong Kong has also very recently tested positive to SARS-CoV-2.

Action: Priority recommendation for animal research facilities to assess infection dynamics of dogs and potential for dog to dog transmission.

Action: OIE information unit to contact focal point in Hong Kong for further information on this second infected dog and to report it as an Immediate Notification.

- Centers for Disease Control (CDC) (USA), updated on the ad hoc approach to diagnostic testing of pets belonging to humans that are sick with COVID-19. This is being done on a case by case basis according to a risk assessment. Not all pets of COVID-19 patients will be tested, and only a small number of samples have been collected. CDC, NAHNL labs and some state labs are testing animal samples for SARS-CoV-2 in the USA. IDEXX has also been testing some animal samples.

- FAO informed that some laboratories in Italy are preparing to test pets. No routine testing of pets appears to be happening in other European countries, although in Germany any animal that shows respiratory disease symptoms and has had contact with a COVID-19 positive human is eligible for testing.

2. Diagnostics

- Several RT-PCR protocols exist for SARS-CoV-2 including the protocol developed by HKU (which is on the WHO website) and the ‘Drosten’ protocol. These are suitable for use in animals. The protocols are cross reactive for SARS-CoV-2, SARS CoV and bat CoVs. Therefore, they are useful for investigating potentially infected animals (in contact with COVID-19 patients) and the animal source (allowing detection of pre-cursor viruses to SARS-CoV-2). Positive results should be followed up with sequencing to identify specific virus.
- If RT-PCR protocols which are more broadly cross reactive for coronaviruses are used, there is a loss in sensitivity.
- FAO is developing lab guidance following a request from their office in South East Asia.
- CFIA has shared protocols with human labs and animal health labs.

Action: FAO to share lab guidance

3. Longer term work on risk mitigation

- OIE informed that the OIE Wildlife Working Group had met during the previous week and recommended the development of risk-based guidelines and standards on capture, farming, trade, consumption of wildlife. This is a very complex area and it is important to identify different types of wildlife and different practices, then apply risk assessment and mitigation measures accordingly. There are many angles to consider, including conservation, food safety, biodiversity and sustainability, benefits of certain wildlife enterprises, the feasibility and burden of enforcement.
- China reaffirmed that wildlife trade and wildlife markets have been prohibited since the beginning of the outbreak. This is supported by legislation. The ban on wildlife trade and the closure of live wildlife markets is a temporary measure.
- The importance of aligning messages and of showing the benefits of conservation work.
- Active calls for proposals related to the topic:
 - USAID – ‘Stop Spillover’
 - R&D Blueprint
 - Wellcome trust