

## Good News! The Investigation into the Origin of the Coronavirus Makes Periodic Headway

January 26, 2020 17:50:20 Source: China Daily

Today, reporters learned from the Chinese Center for Disease Control and Prevention that, with the National Institute for Viral Disease Control and Prevention maintaining its resolve since the initial outbreak of the novel coronavirus epidemic, progress has been made in its investigation into the source of the virus. Of the 585 environmental samples that the Office originally obtained from the Huanan Seafood Market, testing found that 33 samples contained novel coronavirus RNA. The virus was successfully isolated from the positive environmental samples, pointing toward the trade of wild animals at the Huanan Seafood Market as the source of the virus.

Most of the confirmed cases during the early stages of the novel coronavirus epidemic in Wuhan came from the Huanan Seafood Market. On December 31, 2019, based on the orders from the Chinese Center for Disease Control and Prevention, the National Institute for Viral Disease Control and Prevention sent a team of specialists to Wuhan to contain the spread of the epidemic, and on the morning of January 1, 2020, the *Work Plan for an Environmental Investigation into the Origin of the Virus* was drafted. At 8 o'clock on the morning of January 1, the team arrived at the Huanan Seafood Market, where they collected 515 environmental samples from the case-related vendors and areas of the market and then sent the samples back to the Institute for testing. On January 12, the team of specialists from the National Institute for Viral Disease Control and Prevention once again gathered samples from the Huanan Seafood Market, this time collecting 70 samples from the shops that had engaged in the trade of wild animals, and then they shipped the samples back to the laboratory for testing.

The two batches of samples from the Huanan Seafood Market totaled 585 samples, and the results of PCR testing showed that 33 of these samples were positive for novel coronavirus RNA. These positive samples were collected among 22 stalls at the market, along with one trash cart, and 93.9% (31/33) of the positive samples came from the Huanan Seafood Market's West District. Through the investigation, it was discovered that although the Huanan Seafood Market was a seafood market by name, it was actually a more comprehensive marketplace. Wild animal trade existed in the Huanan Seafood Market's West District, especially in Lanes 7 and 8 toward the interior region of the market, where multiple vendors who engaged in wild animal trade were located. The positive samples were more concentrated here than in other areas, with 42.4% (14/33) of the total positive samples found here. In short, it is highly probable that this epidemic is related to the trade of wild animals.

For the samples with the positive RNA test result, the National Institute for Viral Disease Control and Prevention utilized sensitive cell lines in the virus to initiate virus isolation work, and the results of observation via electron microscope, PCR testing, and deep sequencing all showed that the novel coronavirus could be successfully isolated from the

environmental samples, further confirming that a large amount of the novel coronavirus (2019-nCoV) was present at the Huanan Seafood Market.

[Error Correction] Editor: Xiaodong Liu