Centers for Disease Control and Prevention

Influenza (Flu)

CDC A(H5N1) Bird Flu Response Update

May 10, 2024 – CDC continues to respond to the public health challenge posed by a multistate outbreak of avian influenza A(H5N1) virus, or "A(H5N1) virus," in dairy cows and other animals in the United States. CDC is working in collaboration with the U.S. Department of Agriculture (USDA), the Food and Drug Administration (FDA), state public health and animal health officials, and other partners using a One Health approach. USDA is now reporting that 42 dairy cattle herds in nine U.S. states have confirmed cases of A(H5N1) virus infections in cattle. There have been no additional human cases detected since the one recent case from Texas was reported on April 1, 2024, [1][2] despite the fact that more than 260 people have been monitored as a result of their exposure to infected or potentially infected animals and at least 33 who have developed flu-like symptoms have been tested.

CDC's response to this outbreak of influenza A(H5N1) virus in dairy cattle and other animals most recently includes:

- Continuing to support states that are monitoring people with exposure to cows, birds, or other domestic or wild animals infected, or potentially infected, with avian influenza A(H5N1) viruses. Testing of symptomatic people who have exposures is being done by state or local officials, and CDC is conducting confirmatory testing when needed.
- Continuing discussions with multiple states about state-led field investigations to explore key scientific and public health questions related to the ongoing outbreak. CDC is playing a coordinating role with regard to investigation protocols so that data collection can be standardized across states and results can be pooled. CDC's multilingual and multidisciplinary epidemiological field teams are standing by, ready to deploy to support on-site studies if requested.
- Working to make personal protective equipment (PPE) available for affected farmworkers by asking that jurisdictions use their existing stockpiles for workers on dairy farms, poultry farms, and in slaughterhouses, prioritizing distribution of PPE to affected farms. If needed, HHS/ASPR has indicated it can provide PPE from the strategic national stockpile.
- Continuing work to better characterize the virus from the human case in Texas.
    - This week, CDC researchers inoculated (infected) ferrets with the virus from the one human infection for its laboratory studies. Ferrets are used as a model for people because they get sick and spread influenza viruses in a manner similar to people. The goals of these animal studies, include:
        - Assessing the severity of illness and transmissibility of the virus under different contact scenarios by infecting ferrets and assessing the outcome, including:
            - via direct or close contact, with healthy and infected ferrets in the same space; and
            - via respiratory droplets, with healthy and infected ferrets in side-by-side spaces separated by a wall with holes in it.
    - Results from the animal studies will be available in approximately three weeks. Experimental infection of cell lines is forthcoming.
- Continuing to engage with manufacturers of commercial diagnostic tests and clinical partners to make progress toward the goal of having an A(H5N1) test that is widely available if needed.
- Continuing the process so that all states can conduct A(H5) testing on eye specimens using CDC's H5 test. CDC submitted the official request package for this to FDA at the end of last week. Use of eye swabs with the CDC H5 test when the testing is performed by CDC was approved by the CDC Clinical Laboratory Improvement Amendment (CLIA) director on April 27th, which means results of testing of eye swabs at CDC can be reported back for patient care. Some state public health laboratories have also taken the step to have eye swabs approved as a sample type for testing under their internal CLIA authorization. Originally, the test was designed for use with respiratory specimens. Once FDA authorizes the use of that specimen type with the test, all states will be able to do the testing themselves.
- Continuing to engage One Health partner organizations from public health, agriculture, wildlife, milk regulatory officials, and others to share information and ensure preparedness to prevent and respond to this emerging infectious disease threat and for any potential human infections.

- Continuing to monitor flu surveillance data, especially in areas where A(H5N1) viruses have been detected in dairy cattle or other animals, for any unusual trends in flu-like illness, flu, or conjunctivitis.
    - Overall, for the most recent week of data, CDC flu surveillance systems show no indicators of unusual flu activity in people, including avian influenza A(H5N1) viruses.

CDC Recommendations

CDC has interim recommendations for prevention, monitoring, and public health investigations of A(H5N1) virus infections in people. CDC also has updated recommendations for worker protection and use of personal protective equipment (PPE). Following these recommendations is central to reducing a person's risk and containing the overall public health risk. Additionally, as a reminder, while CDC believes the current risk of A(H5N1) infection to the general public remains low, high levels of A(H5N1) virus have been found in unpasteurized ("raw") milk. CDC and FDA recommend against the consumption of raw milk or raw milk products. The risk of human infection from drinking raw milk containing live A(H5N1) virus specifically is unknown. To date, A(H5N1) viruses have not acquired the ability to bind to virus receptors that are most prevalent in the upper respiratory tract of people. If a person consumed raw milk with live A(H5N1) virus, the person could become infected, theoretically, by the virus binding to a limited amount of virus receptors in the upper respiratory tract or by aspiration of virus into the lower respiratory tract where receptors that A(H5N1) viruses can bind to are more widely distributed.

Ongoing Surveillance Needed

Genetic analysis of the human A(H5N1) virus and hundreds of cattle viruses indicate these viruses are still mainly avian in nature and do not currently have the ability to easily infect or spread among people. However, because of the potential for influenza viruses to constantly change, continual surveillance and preparedness efforts are critical, and CDC is taking measures to be ready in case the current risk assessment for the general public changes. The immediate goal is to prevent further spread of this virus between animals and people. CDC will continue to monitor these viruses and update and adjust guidance as needed.

This is a rapidly changing situation, and CDC is committed to providing frequent and timely updates.

Footnotes

[1] The first human case of A(H5N1) bird flu in the United States was reported in 2022 in a person in Colorado who had direct exposure to poultry and was involved in the depopulating of poultry with presumptive A(H5N1) bird flu. The 2022 human case was not related to dairy cattle. The person recovered. Learn more at U.S. Case of Human Avian Influenza A(H5) Virus Reported.

[2] The second human case of A(H5N1) bird flu in the United States was reported in 2024 and linked with dairy cattle and reported eye redness as their only symptom, consistent with conjunctivitis, and has recovered. Learn more at Highly Pathogenic Avian Influenza A (H5N1) Virus Infection Reported in a Person in the U.S.

Last Reviewed: May 10, 2024