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There has been recent detection of multiple avian influenza viruses into North America (Canada and United States). These viruses are apparently spread by migratory birds. These influenza viruses have been detected in captive birds, backyard poultry and commercial poultry flocks in 20 different states and provinces in USA and Canada. This situation is **UNPRECEDENTED** in the history of North America.

These viruses appear to be related to an influenza virus that has been circulating in Asia and Europe throughout 2014. This group of influenza viruses is highly pathogenic to birds, making them severely sick and in many cases inducing high mortality in birds up to 90%. However, they seem to represent a low risk for human infection, so poultry and poultry products are safe to consume when they are properly handled and cooked.

While surveillance and diagnosis are essential tools to detect the virus and limit the infection and eventually control the outbreak, it's the **BIOSECURITY** efforts that will prevent the infection from reaching your flock, whether it is commercial or noncommercial. Biosecurity is the sound sanitary practices that are used to stop the infectious agent from reaching the host. But before understanding biosecurity and the logic behind it, one must understand the dynamics of disease transmission. Most infectious diseases in bird populations can be transmitted by two main ways:

1. Direct transmission, which means the infectious agents are transmitted through direct physical contact between infected individuals and uninfected susceptible individuals.
2. Indirect transmission, which means the infectious agents are transmitted through indirect transportation vehicles to reach the susceptible individuals. In case of diseases that affect birds including avian influenza, the indirect transportation vehicles include:
  - Human
  - Domestic animals including pets
  - Wild animals including varmints and rodents
  - Physical objects including equipment
  - Feed
  - Water
  - Environments including shared pastures and water ponds.

Accordingly, biosecurity practices are divided into:

1. Practices that aim to prevent direct transmission.

- Avoid contact between your flock and other birds, wild, domestic or otherwise.
- Prevent your birds from mixing with other poultry or wild birds. Mixing of birds often happens around open water bodies and in open pasture.
- Whenever possible prevent mixing between species within the same flock, and between multiple ages within the same species.
- Try to acquire birds from National Poultry Improvement Plan (NPIP) disease free sources.
- If you bring new birds to your flock, quarantine the new birds for a week before mixing with the rest of the flock.
- If you show birds, attend fairs or perform any activity where birds from different places come together in one place, quarantine the birds for a week before mixing back with the rest of the flock.

2. Practices that aim to prevent indirect transmission.

- It is highly recommended **NOT** to bring any visitors to your bird flock. They could be carriers of diseases on their cloths, their shoes, on their hands or any objects they bring with them.
- It's recommended to have specific cloths and shoes dedicated to working with your birds.
- Additionally, using disposable coveralls, gloves and shoe covers are highly recommended.
- Wash your hands before and after handling your birds, or their feed or their water.
- Wash your hands before and after handling any equipment, bedding material housing material on any object that comes in contact with the birds.
- Foot paths and hand sanitizing stations should be in place and used every time the poultry house is entered or exited.
- Don't bring your pets or allow them access to your birds.
- It is essential to house the birds in animal proof/bird proof houses.
- It is very important to have effective rodent control program. Rodents are notorious for transmitting not only human disease but also poultry diseases.
- Equipment, bedding material housing material on any object that comes in contact with the birds should be thoroughly cleaned and properly disinfected before using with your birds.
- Acquire you feed from trusted sources and properly store the feed in dry, cool and clean place, shielded form access by other birds and animals particularly rodents.
- Drinking water for birds should be the same quality as drinking water for human. Surface water from rivers, ponds or puddles is particularly dangerous as it often contains infectious disease agents from migratory wild birds.

These practices should be adopted by anyone who owns, grows or handles poultry.

The Link below is updated daily for all the latest detections in the USA.

[http://www.aphis.usda.gov/wps/portal/aphis/ourfocus/animalhealth/SA\\_Animal\\_Disease\\_Information/SA\\_Avian\\_Health/sa\\_detections\\_by\\_states/ct\\_by\\_state!/ut/p/a1/jVBBTsMwEHwLD0C7mNC0R6dpY6cJR\\_YoA44u1FDel1LhVbVWC15MWxAGJ0r3Nzox2dkCDAu3p4FqKbuupO2I9MuVSsJsMmSyayQzl\\_dO8Hlfp7VIkg-BIEEwLLpK0QsRkzFDmmcjTSY0oR5f58Y\\_h-J-\\_vOAA29fTugW9o7i5dn69BdVww73rqTO5C5aCNXLY7\\_vT31\\_0wZE3wlIXN6ACmTcb7epIB\\_P6bkKkaAOoVfxB8Az6V5pilg1p5tVDuigZLu6-BefqOgnO9LHrH9VHxdeNbK8-AWYnQm0!/?1dmy&urile=wcm%3apath%3a%2FAPHIS\\_Content\\_Library%2FSA\\_Our\\_Focus%2FSA\\_Animal\\_Health%2FSA\\_Animal\\_Disease\\_Information%2FSA\\_Avian\\_Health%2FSA\\_Detections\\_by\\_States%2F](http://www.aphis.usda.gov/wps/portal/aphis/ourfocus/animalhealth/SA_Animal_Disease_Information/SA_Avian_Health/sa_detections_by_states/ct_by_state!/ut/p/a1/jVBBTsMwEHwLD0C7mNC0R6dpY6cJR_YoA44u1FDel1LhVbVWC15MWxAGJ0r3Nzox2dkCDAu3p4FqKbuupO2I9MuVSsJsMmSyayQzl_dO8Hlfp7VIkg-BIEEwLLpK0QsRkzFDmmcjTSY0oR5f58Y_h-J-_vOAA29fTugW9o7i5dn69BdVww73rqTO5C5aCNXLY7_vT31_0wZE3wlIXN6ACmTcb7epIB_P6bkKkaAOoVfxB8Az6V5pilg1p5tVDuigZLu6-BefqOgnO9LHrH9VHxdeNbK8-AWYnQm0!/?1dmy&urile=wcm%3apath%3a%2FAPHIS_Content_Library%2FSA_Our_Focus%2FSA_Animal_Health%2FSA_Animal_Disease_Information%2FSA_Avian_Health%2FSA_Detections_by_States%2F)

In the link below is additional information about the history of this influenza outbreak.

[http://www.nwhc.usgs.gov/publications/wildlife\\_health\\_bulletins/WHB\\_2014-05\\_H5N8.pdf](http://www.nwhc.usgs.gov/publications/wildlife_health_bulletins/WHB_2014-05_H5N8.pdf)

It also offers recommendations and additional resources regarding safe handling of wild birds.

Finally, if you experience sudden disease signs or sudden mortality in your flock, please contact:

Animal Disease Diagnostic Laboratory  
8995 East Main Street  
Reynoldsburg, OH 43068-3399  
Phone: (614) 728-6220  
Email: [animal@agri.ohio.gov](mailto:animal@agri.ohio.gov)

Ohio Poultry Association  
Phone: (614) 882-6111  
Email: [info@ohiopoultry.org](mailto:info@ohiopoultry.org)

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