



**Wisconsin Veterinary
Diagnostic Laboratory**
UNIVERSITY OF WISCONSIN-MADISON

Avian Influenza in Backyard Flocks

Highly pathogenic avian influenza (HPAI) has been detected in U.S. wild birds, commercial poultry and backyard flocks beginning in January 2022. The H5N1 virus may cause disease in in gallinaceous birds (domestic poultry and game birds) and is described as highly pathogenic because of rapid spread and high mortality in domesticated poultry.

Clinical Signs of Avian Influenza: Owners of poultry and other game birds should be aware of the clinical signs of avian influenza, which are highly variable and include: lack of energy, decreased egg production, nasal discharge, coughing, swelling and discoloration of the head, combs and/or wattles, diarrhea, and neurologic signs such as stumbling.

Minimizing Risk of Infection: The key factor to minimize risk of infection to domesticated birds is to limit contact with wild birds and migratory wildfowl. Also important is to maintain a clean environment and to avoid sharing tools or supplies with other poultry owners. All purchased birds should originate from a reputable seller.

What to do with suspect cases: Questions about or observation of the above clinical signs or any event of high mortality in a flock should be reported to:

1. Your local veterinarian
2. The Department of Agriculture, Trade and Consumer Protection (DATCP) at (608)-224-4872 http://datcp.wi.gov/Animals/Animal_Diseases/index.aspx.

How to test birds for viral infection: One way to control the disease is by testing birds for the presence of the virus prior to movement, sale or to comply with a surveillance requirement such as those specified in the National Poultry Improvement Program (NPIP).

The Wisconsin Veterinary Diagnostic Laboratory is fully accredited and equipped with the expertise to test for avian influenza, as well as many other pathogens. The test that is performed is a real-time polymerase chain reaction (PCR). This assay can amplify small

amounts of viral nucleic acid so it is more readily detected by an instrument. Moreover, the assay is very rapid and may be completed in the same day the sample is received.

Please order supplies for this test by going to our website www.wvdl.wisc.edu and choosing the Avian Swab Kit Order Form. The kit contains tubes of broth and swabs with a polyester tip and plastic applicator. On the supply order form, please indicate the reason for testing (sick birds, surveillance as required by NPIP, or pending sale). An experienced veterinary technician or veterinarian can provide training on how to take the sample.

For backyard flocks, tracheal or oropharyngeal samples from up to 11 birds can be pooled in at least 5.5ml of VTM. Cloacal swab samples from up to 5 birds can be pooled in at least 3 ml VTM. Each bird should be sampled with a different swab then immerse the swab tip in the tube of broth then squeeze against the side. Tightly close the tube and ship with an ice pack. Affix the label identifying this package as an Avian Diagnostic sample. Ship for overnight delivery using our UPS shipping program. <https://www.wvdl.wisc.edu/our-shipping-program/>

If you have birds with clinical signs consistent with avian influenza, you will be contacted by a WVDL or DATCP veterinarian to discuss testing.

Please contact the WVDL at any time with questions. www.wvdl.wisc.edu 608-262-5432