

# Avian Influenza - Advisory for wildlife managers and bird handlers

## *What is Avian Influenza?*

Avian Influenza (also called bird flu) is a contagious viral disease that affects both domestic and wild birds and is caused by avian influenza (AI) viruses.

Most wild birds infected with the virus are asymptomatic. Strains of this virus are classed as either low pathogenic (LPAI - causing no or minimal illness) or highly pathogenic (HPAI - causing severe illness). Signs of HPAI vary but strong indicators include:

- Sudden death,
- tremors, convulsions, twisted neck, backward-arching head, eye rolling, weakness, drooping wings, and paralysis,
- nasal discharge, coughing, sneezing, respiratory distress/gasping for air,
- diarrhoea,
- skin bruising,
- docile behaviour,
- “sick bird look”.

## *How is it spread?*

Avian influenza is mainly spread by close contact between infected birds and healthy birds. It can also be transmitted when birds come in contact with environments, equipment or materials (including water and feed) that have been contaminated with faeces or secretions from the nostrils or beak of infected birds.

This highly contagious viral infection can affect all species of birds both wild and domestic. Cases have also been seen in mammals associated with bird mortality events including seals and sea lions.

The transmission of avian influenza from birds to humans is rare but the World Health Organisation states HPAI has a 50% mortality rate. People who are in close and repeated contact with infected birds or heavily contaminated environments are at risk of acquiring avian influenza.

## *What is happening now?*

Highly pathogenic avian influenza H5N1(HPAI) has spread globally to all areas since December 2021 except Australia, New Zealand, the Pacific Islands, and mainland Antarctica.

It is associated with outbreaks of disease in domestic and wild birds, particularly colony-nesting seabirds, across Europe, Asia, Africa, and North & South America. Cases have also been seen in pinnipeds (seals and sea lions) associated with bird mortality events, and in scavenger/predatory birds and mammals.

## ***What is the risk to New Zealand?***

Biosecurity New Zealand has assessed the risk of HPAI viruses reaching New Zealand as low. New Zealand is lucky to be isolated from other land masses, does not have migratory waterfowl pathways, and we have good border biosecurity which all reduce the risk of arrival of HPAI. New Zealand has never had a case of HPAI.

One possible pathway for HPAI entering the country would be via birds arriving from mainland Antarctica at the end of summer, if infected. The virus has not been detected in mainland Antarctica, but surveillance is underway so we can be prepared for this possibility.

Birds migrating from Australia, or the Pacific Islands, could pose a similar risk, depending on the time of year, if the virus is detected in these locations.

Biosecurity New Zealand is monitoring HPAI and the global situation and has many systems in place to prevent HPAI entering New Zealand and to ensure early detection if it does arrive.

If HPAI is detected in New Zealand, Biosecurity New Zealand is the lead agency and would coordinate any response with support from DOC. DOC has prepared a HPAI Avian Influenza Mitigations Options Guideline to reduce impacts to threatened species if HPAI is detected in New Zealand. This includes actions to enhance detection, reduce spread and protect threatened species.

If the disease is found in humans, then the Ministry of Health will be involved.

## ***Which New Zealand wildlife species are most vulnerable?***

We don't know exactly what impact HPAI would have on native species but, based on overseas evidence, it's more likely to affect colony nesting birds such as red and black-billed gulls, gannets, terns and other seabirds due to the close contact transmission of the virus through secretions and faeces; and predator/scavenger species such as raptors and marine mammals

## ***What should you do?***

At all times:

- Maintain a heightened awareness of disease risk when working with wildlife.
- Always maintain good biosecurity and personal hygiene practices to prevent spread and protect yourself. This includes scrubbing and disinfecting all your equipment between sites/species, using clean bird bags for each bird to avoid faecal contamination, and cleaning your hands and equipment between handling each bird, e.g., with alcohol wipes.
- Do not touch, handle or collect any dead or dying birds. These should be left alone to prevent spread and to protect human health.
- If the public report sick or dying birds tell them to leave them in place, take photos, record details.
- For captive birds, undertake the measures above and exclude wild birds from access to aviary or food/water sources, and/or treat water sources.

## **HPAI is a notifiable disease and therefore must be reported to MPI.**

People are asked to report groups of three or more sick or dying birds, marine mammals or other wildlife to the Biosecurity New Zealand Exotic Pest and Disease hotline: 0800 80 99 66.

Do not touch, handle or collect dead or dying birds. Report the incident to BNZ in the first instance and follow their instructions.

Your call will be answered by BNZ staff who will take some details from you and one of their incursion investigators will be in contact with you.

- Record a GPS reading or other precise location information.
- Take photographs and/or videos of sick and dead birds.
- Identify the species and estimate the numbers affected.
- Note how many sick or freshly dead are present as well as the total number present.
- Follow Biosecurity New Zealand instructions for handling of sick or dead birds.

If an investigation is determined necessary, BNZ will coordinate sampling and any other response actions, depending on the site of concern and logistics.

## ***Further resources***

MPI - [High pathogenicity avian influenza and the risk to NZ](#) (link to website)

MPI - [Avian influenza surveillance programme annual report](#) (link to pdf)

WOAH - <https://www.woah.org/en/disease/avian-influenza/> (link to website)

WOAH - [Risk Management for People Working with Wild Birds](#) (link to website)

CDC - [H5N1 Bird Flu: Current Situation Summary \(cdc.gov\)](#) (link to website)

ACAP - [Guideline for working with albatrosses and petrels](#) (link to pdf)

FAO - [Scientific Task Force on Avian Influenza and Wild Birds statement on H5N1 High pathogenicity avian influenza in wild birds \(fao.org\)](#) (link to pdf)