



Agriculture and Rural Development

MDARD Reminds Bird Owners to Continue Protecting Their Flocks from Highly Pathogenic Avian Influenza

March 07, 2024

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With the spring migration of wild birds, owners must remain vigilant as HPAI continues to be detected across the nation

LANSING, MI While the Michigan Department of Agriculture and Rural Development (MDARD) has not reported any new cases of highly pathogenic avian influenza (HPAI) in domestic poultry flocks since December 2023, the virus continues to be detected throughout the United States and in Michigan's [wild birds](#). These detections coupled with the spring migration of wild birds means it is still vitally important to protect domestic flocks and keep birds healthy.

The risk posed by HPAI is still present. As wild birds migrate this spring, their movement can cause the disease to spread once again, said **State Veterinarian Dr. Nora Wineland, DVM, MS DACVPM**. To best protect Michigan's domestic flocks, bird owners need to remain committed to taking every precaution they can to protect their birds from being exposed to wild birds and their germs. Keeping birds safe and healthy must continue to be a priority.




HPAI is a highly contagious virus that can be spread in various ways from flock to flock, including through wild birds, contact with infected poultry, by equipment, and on the clothing and shoes of caretakers.

MDARD reported Michigan's first case of HPAI in a domestic flock on February 24, 2022. Since this first detection, the department received over 280 calls about possible cases of the disease, which resulted in 93 investigations. These investigations led to the detection of 29 infected flocks: 23 involved backyard flocks, three cases occurred in hunting preserves, and three cases were in commercial flocks. These cases were found in 18 counties across the Upper and Lower Peninsulas.

In 2024, MDARD has already received calls regarding sick or dead domestic birds and initiated responses. So far this year, two potential cases of the disease have been investigated; both were negative for HPAI.

According to the [U.S. Centers for Disease Control and Prevention](#), the public health risk associated with this disease remains low. In addition, no birds or bird products infected with HPAI will enter the commercial food chain. As a reminder, people should [properly handle](#) and cook all poultry and eggs.



Whether it's a few backyard birds or a large commercial flock, following [a few key steps](#) is still fundamental to protect the health and vitality of Michigan's domestic birds:


- Prevent contact between domestic and wild birds by bringing them indoors or ensuring their outdoor area is fully enclosed.
- Wash your hands before and after handling birds as well as when moving between different coops.
- Disinfect boots and other gear when moving between coops.
- Do not share equipment or other supplies between coops or farms.
- [Cleaning and disinfecting](#) equipment and other supplies between uses. If it cannot be disinfected, discard it.
- Use well or municipal water as drinking water for birds.
- Keep poultry feed secure to ensure there is no contact between the feed/feed ingredients and wild birds or rodents.

MDARD will continue to receive and respond to reports of sick or dead domestic birds in Michigan, share information with other state and federal agencies, and monitor national HPAI trends.



Reporting Possible Cases

For Domestic Birds




Domestic bird owners and caretakers should watch for multiple sudden deaths in the flock, a drop in egg production, a significant decrease in water consumption, diarrhea, sneezing/coughing, or an increase in sick birds. If avian influenza is **suspected in domestic birds**, contact MDARD **immediately** at 800-292-3939 (daytime) or 517-373-0440 (after-hours).

For Wild Birds

If anyone notices what appears to be unusual or unexplained deaths among wild bird populations, please report these cases to the Michigan Department of Natural Resources (DNR) by:

- Using the DNR's [Eyes in the Field app](#). Choose the Diseased Wildlife option among the selections for Observation Forms.
- Calling the DNR Wildlife Disease Laboratory at 517-336-5030.

Stay Up to Date



Subscribe to receive email notifications by visiting [MDARD's website](#) and clicking on the **Avian Influenza** link. After entering a valid email address, subscribers will receive updates and alerts regarding the status of avian influenza in Michigan whenever there are new developments to report. Additional resources can also be found at Michigan.gov/BirdFlu.

More information on avian influenza and how to protect flocks through biosecurity measures can be found on the U.S. Department of Agriculture's [website](#).

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Department of Agriculture and Rural Development

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Highly Pathogenic Avian Influenza Detected in Ottawa County Dairy Herd



Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Michigan Dairy Herd

March 29, 2024

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Sick domestic animal calls

800-292-3939


Michigan herd is linked to the affected cattle in Texas; producers are strongly encouraged to contact their veterinarian about any animal health concern

LANSING, MI – Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in a dairy herd from Montcalm County. The U.S. Department of Agriculture's National Veterinary Services Laboratories has confirmed this detection.



Further testing and investigation by state and federal officials have revealed the source of infection. The farm recently received cattle from an affected premises in Texas before that herd showed any sign of disease. When the cattle were moved from Texas to Michigan, the cattle were not symptomatic and did not appear ill. As this national situation continues to develop, it is essential for all producers to contact their veterinarian if they have any concerns regarding the health of their animals, regardless of species.


"We have well-trained staff responding to this situation and I have the utmost confidence in our team. We will continue working with our local, state, and national partners to protect animal and public health," said **Director Boring**. "Our highest priorities at MDARD remain protecting our food supply and ensuring animal health. As this situation evolves, we will provide critical updates to producers, industry, and all Michiganders."



"This case does reflect a lot of what is already known about this virus—namely, that it is highly contagious, it continues to be primarily spread by wild birds and contact with infected animals, and mammals can contract the virus," said **State Veterinarian Dr. Nora Wineland, DVM, MS, DACVPM**. "MDARD is working diligently and in close collaboration with government partners, producer groups, and Michigan dairy farmers to address the situation and prevent the spread of disease. As more is learned, it is vitally important for producers to work with their veterinarian and isolate sick animals from others, minimize the number of visitors to their farms, prevent contact between their animals and wildlife, and continue to vigilantly monitor the health of their animals."

H5N1 is a highly contagious virus that can be spread directly by infected wild birds/animals or indirectly through any item that has been exposed to the virus—such as equipment, feed, or the clothing and shoes of caretakers. The virus has been detected in various species of mammals—presumably after the animals come into contact with infected birds. To limit the spread of the disease, the affected premises voluntarily stopped movement.

Producers who have concerns about the health of their animals and/or questions regarding how to improve the measures they take to protect animal health on their farm should contact their veterinarian. Also, if cattle producers notice decreased lactation, low appetite, and/or other symptoms in their herds, please contact your veterinarian to determine the next appropriate steps to take.



Analysis of the virus from this case and the other cases of affected cattle has **not** shown any significant new adaptation to make the virus more transmissible between mammals. Therefore, [the public health risk associated with H5N1 remains low.](#)



According to the Food and Drug Administration and Centers for Disease and Prevention, the commercial milk supply remains safe due to both federal animal health requirements and pasteurization.

If anyone suspects the presence of HPAI or any other reportable animal disease in their domestic animals, please contact MDARD ***immediately*** at 800-292-3939 (daytime) or 517-373-0440 (after-hours).

For more information on the detections of HPAI in cattle, please visit the [U.S. Department of Agriculture's website](#).

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[Highly Pathogenic Avian Influenza \(HPAI\) Detections in Livestock](#) (USDA.gov)

[Highly Pathogenic Avian Influenza Detected in Michigan Dairy Herd](#) (MDARD - YouTube)

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[Highly Pathogenic Avian Influenza Detected in Three New Dairy Herds](#)



Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Ionia County Flock

April 02, 2024

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As wild birds complete their spring migration, prevention is essential to keeping Michigan's animals healthy and safe

LANSING, MI - Following a report to the Michigan Department of Agriculture and Rural Development (MDARD), the Michigan State University Veterinary Diagnostic Laboratory has detected the presence of highly pathogenic avian influenza (HPAI) in a commercial poultry facility from Ionia County. Since the disease was first detected in Michigan in 2022, this is the fourth detection of HPAI in a commercial facility, and the first detection in Ionia County. As wild birds complete their spring migration, it is crucial for every producer to protect their animals from wild birds and the germs they could be carrying.



"As the weather remains cool and wild birds continue their migration, conditions are ideal for the virus to thrive and spread. While these conditions persist, the need to take preventative measures will be high," said **State Veterinarian Dr. Nora Wineland, DVM, MS, DACVPM**. "Keeping HPAI out of Michigan's domestic animals remains a team effort, and it must be a top priority for all."

HPAI is a highly contagious virus that can be spread in various ways from flock to flock, including by wild birds, through contact with infected poultry, by equipment, and on the clothing and shoes of caretakers. To protect other facilities in Michigan, the premises is currently under quarantine, and the birds will be depopulated to prevent disease spread. These efforts also help to ensure the safety and integrity of the commercial food supply.

"Michigan's egg farmers are among the most proactive in the country, with their diligence leading to rapid detection of HPAI in this flock," said **Dr. Nancy Barr, executive director of Michigan Allied Poultry Industries**. "Strict biosecurity measures are in place to protect flocks from the increased threat of HPAI."

According to the [U.S. Centers for Disease Control and Prevention](#), the public health risk associated with avian influenza remains low. Also, no animals or products infected with HPAI will enter the commercial food chain. As a reminder, people should [properly handle](#) and cook all food.



Whether it's a few backyard birds or a large commercial flock, following [a few key steps](#) is fundamental to protect the health and vitality of Michigan's domestic birds:

- Prevent contact between domestic and wild birds by bringing them indoors or ensuring their outdoor area is fully enclosed.
- Wash your hands before and after handling birds as well as when moving between different coops.
- Disinfect boots and other gear when moving between coops.
- Do not share equipment or other supplies between coops or other farms.
- [Clean and disinfect](#) equipment and other supplies between If it cannot be disinfected, discard it.
- Use well or municipal water as drinking water for birds.
- Keep poultry feed secure to ensure there is no contact between the feed/feed ingredients and wild birds or rodents.

MDARD is continuing to work diligently with local, state, and federal partners to quickly respond to reports of HPAI to best mitigate the spread of the disease and provide outreach.



Reporting Possible Cases

For Domestic Birds



Domestic bird owners and caretakers should watch for multiple sudden deaths in the flock, a drop in egg production, a significant decrease in water consumption, diarrhea, sneezing/coughing, or an increase in sick birds. If avian influenza is **suspected in domestic birds**, contact MDARD **immediately** at 800-292-3939 (daytime) or 517-373-0440 (after-hours).

For Wild Birds

If anyone notices what appears to be unusual or unexplained deaths among wild bird populations, please report these cases to the Michigan Department of Natural Resources (DNR) by:

- Using the DNR's [Eyes in the Field app](#). Choose the Diseased Wildlife option among the selections for Observation Forms.
- Calling the DNR Wildlife Disease Laboratory at 517-336-5030.

Stay Up to Date



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More information on avian influenza and how to protect flocks through preventative measures can be found on the U.S. Department of Agriculture's [website](#).

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Highly Pathogenic Avian Influenza Detected in Ottawa County Dairy Herd



Agriculture and Rural Development

Farmers, Backyard Poultry Owners Must Tighten and Heighten Biosecurity to Protect Their Animals from Bird Flu

April 11, 2024

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LANSING — As highly pathogenic avian influenza (HPAI), commonly known as bird flu, continues to impact poultry and dairy cattle across the U.S., Michigan Department of Agriculture and Rural Development (MDARD) Director Dr. Tim Boring is strongly urging producers to tighten up all biosecurity measures to reduce the risks that could introduce the disease and cause it to spread, which is critical to protecting animal health.

In addition, MDARD is also asking any company, business, or organization traveling to multiple farms each day as part of their work to make sure they are implementing

biosecurity measures to protect Michigan farms.



"This is a virus that can easily be moved unknowingly on everything from farm equipment to shoes to delivery or service vehicles and the list goes on," said **Boring**. "Our farmers and those who deliver services to farm operations must act now to heighten and tighten biosecurity measures to contain the spread of HPAI in Michigan. As wild birds continue their spring migration, it's going to take a team effort to protect the health of our domestic animals."

"Two counties in Michigan—Ionia and Montcalm—have confirmed HPAI. Biosecurity is just another way to say risk reduction," added **State Veterinarian Dr. Nora Wineland, DVM, MS, DACVPM**. "It's implementing and adhering to specific steps to ensure your animals stay healthy. These steps could be as simple as cleaning and disinfecting equipment and vehicles, washing your hands before and after caring for animals, and keeping wild birds away from livestock and their feed and water sources. You can also work with your veterinarian to create or refine a secure food supply plan to further ensure the health of your animals."

Below are just a few of the steps implement biosecurity practices in your business or on your farm:



- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
- Isolate all animals that are new or returning to your farm.
- Monitor the health of your animals daily.
- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a secure food supply plan.
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are cleaned and disinfected. Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other farms.
- Clean and disinfect the interiors of trailers used to haul animals from other operations.
- Limit non-essential visitors to your farm.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.



HPAI is a virus found among various species of birds that can infect domestic poultry, including chickens, turkeys, pheasants, quail, ducks, geese, and guinea fowl.

For more information on current detections in domestic poultry, livestock, and wildlife across the U.S., please visit the [U.S. Department of Agriculture's webpage](#).

Current analysis of the virus has **not** shown any significant new adaptation to make the virus more transmissible between mammals, meaning [the public health risk associated with HPAI remains low](#).

According to the Food and Drug Administration and the Centers for Disease Control and Prevention, the commercial food supply remains safe due to both federal animal health requirements and pasteurization.

"MDARD are well-trained, prepared and able to quickly respond to HPAI. Our staff is working in collaboration with our local, state, and national partners to protect both animal and public health," said **Boring**. "Our highest priorities at MDARD remain protecting our food supply and ensuring animal health.

If anyone suspects the presence of HPAI or any other reportable animal disease in their domestic animals, please contact MDARD **immediately** at 800-292-3939 (daytime) or 517-373-0440 (after-hours).

For more information, visit the MDARD website at www.michigan.gov/birdflu for the U.S. Department of Agriculture's website at <https://www.aphis.usda.gov/livestock-poultry-disease/avian/avian-influenza>.

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Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Newaygo County Flock

April 16, 2024

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The risk for HPAI will remain high as wild birds continue their spring migration; keeping wild birds away is essential to protecting animal health


LANSING, MI - Following a report to the Michigan Department of Agriculture and Rural Development (MDARD), the Michigan State University Veterinary Diagnostic Laboratory has detected the presence of highly pathogenic avian influenza (HPAI) in a commercial poultry facility from Newaygo County. Since the disease was first detected in Michigan in 2022, this is the seventh detection of HPAI in a commercial facility, and the first detection in Newaygo County. As wild birds complete their spring migration, it is crucial for every producer to protect their animals from wild birds and the germs they could be carrying.



"MDARD continues to thoroughly and robustly respond to the detection of HPAI with an all-hands-on-deck approach with our federal, state, and local partners," said **MDARD Director Tim Boring**. "Biosecurity remains the best tool available to combat HPAI, and we continue to encourage producers of all sizes to enhance their biosecurity measures to reduce the risk of introducing this disease to their farm. MDARD is addressing this outbreak from every angle, including working to help mitigate the economic impacts on local communities. We remain laser-focused on our mission to protect animal and public health."


"Taking preventative measures to keep wild birds away from farms is essential to combatting HPAI and limiting its impact," said **State Veterinarian Dr. Nora Wineland, DVM, MS, DACVPM**. "As wild birds continue to migrate and the outside temperatures remain cool and temperate, conditions are ideal for the virus to spread. This is why it is so vital for producers to assess the risks on their premises and tighten protocols. Protecting animal health is of the utmost importance."


HPAI is a highly contagious virus that can be spread in various ways, including by wild birds, through contact with infected poultry, by equipment, and on the clothing and shoes of caretakers. To protect other facilities in Michigan, the premises is currently under quarantine, and the birds will be depopulated to prevent disease spread. These efforts also help to ensure the safety and integrity of the commercial food supply.



According to the [U.S. Centers for Disease Control and Prevention](#), the public health risk associated with avian influenza remains low. Also, no animals or products infected with HPAI will enter the commercial food chain. As a reminder, people should [properly handle](#) and cook all food.

Whether it's a few backyard birds or a large commercial flock, following [a few key steps](#) is fundamental to protect the health and vitality of Michigan's domestic birds:

- Prevent contact between domestic and wild birds by bringing them indoors or ensuring their outdoor area is fully enclosed.
 - Wash your hands before and after handling birds as well as when moving between different coops.
 - Disinfect boots and other gear when moving between coops.
 - Do not share equipment or other supplies between coops or other farms.
 - [Clean and disinfect](#) equipment and other supplies between If it cannot be disinfected, discard it.
 - Use well or municipal water as drinking water for birds.
 - Keep poultry feed secure to ensure there is no contact between the feed/feed ingredients and wild birds or rodents.
- 



MDARD is continuing to work diligently with local, state, and federal partners to quickly respond to reports of HPAI to best mitigate the spread of the disease and provide outreach.


Reporting Possible Cases

For Domestic Birds

Domestic bird owners and caretakers should watch for multiple sudden deaths in the flock, a drop in egg production, a significant decrease in water consumption, diarrhea, sneezing/coughing, or an increase in sick birds. If avian influenza is **suspected in domestic birds**, contact MDARD **immediately** at 800-292-3939 (daytime) or 517-373-0440 (after-hours).

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More information on avian influenza and how to protect flocks through preventative measures can be found on the U.S. Department of Agriculture's [website](#).

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Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Ottawa County

April 23, 2024

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Sick domestic animal calls

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Following a report to the Michigan Department of Agriculture and Rural Development (MDARD), the Michigan State University Veterinary Diagnostic Laboratory has detected the presence of highly pathogenic avian influenza (HPAI) in a commercial poultry facility in Ottawa County.



Biosecurity remains the best tool available to combat HPAI. MDARD continues to urge producers with flocks of all sizes to enhance their biosecurity measures to reduce the risk of introducing this virus to their farms. Following [a few key steps](#) is fundamental to protect the health and vitality of Michigan's domestic birds:

- Do not share equipment or other supplies between coops or other farms.
- [Clean and disinfect](#) equipment and other supplies between coops and farms. If it cannot be disinfected, discard it.
- Prevent contact between domestic and wild birds by bringing them indoors or ensuring their outdoor area is fully enclosed.
- Wash your hands before and after handling birds as well as when moving between different coops.
- Disinfect boots and other gear when moving between coops.
- Use well or municipal water as drinking water for birds.
- Keep poultry feed secure to ensure there is no contact between the feed/feed ingredients and wild birds or rodents.

MDARD is continuing to work diligently with local, state, and federal partners to quickly respond to reports of HPAI to best mitigate the spread of the disease and provide outreach.



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MDARD Reminds Michiganders to Think Food Safety this Memorial Day

Highly Pathogenic Avian Influenza Detected in Gratiot Dairy Herd

Highly Pathogenic Avian Influenza Detected in Three New Dairy Herds

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Highly Pathogenic Avian Influenza Detected in Ottawa County

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Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Gratiot County

April 24, 2024

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Following a report to the Michigan Department of Agriculture and Rural Development (MDARD), the Michigan State University Veterinary Diagnostic Laboratory has detected the presence of highly pathogenic avian influenza (HPAI) in a commercial poultry facility from Gratiot County.

Biosecurity remains the best tool available to combat HPAI. MDARD continues to urge producers with flocks of all sizes to enhance their biosecurity measures to reduce the risk of introducing the virus to their farms. Following [a few key steps](#) is fundamental to protect the health and vitality of Michigan's domestic birds:

- Do not share equipment or other supplies between coops or other farms.

- 
- [Clean and disinfect](#) equipment and other supplies between coops and farms. If it cannot be disinfected, discard it.
 - Prevent contact between domestic and wild birds by bringing them indoors or ensuring their outdoor area is fully enclosed.
 - Wash your hands before and after handling birds as well as when moving between different coops.
 - Disinfect boots and other gear when moving between coops.
 - Use well or municipal water as drinking water for birds.
 - Keep poultry feed secure to ensure there is no contact between the feed/feed ingredients and wild birds or rodents.

MDARD is continuing to work diligently with local, state, and federal partners to quickly respond to reports of HPAI to best mitigate the spread of the disease and provide outreach.

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Highly Pathogenic Avian Influenza Detected in Three New Dairy Herds



Agriculture and Rural Development

MDARD Director Praises USDA Actions to Protect Livestock Health from Highly Pathogenic Avian Influenza

April 29, 2024

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Michigan producers are strongly encouraged to follow federal guidance & increase all biosecurity measures to reduce risks of further spreading HPAI

Lansing, MI - As highly pathogenic avian influenza (HPAI), continues to impact livestock across the U.S., Michigan Department of Agriculture and Rural Development (MDARD) Director Dr. Tim Boring reminds all Michigan producers to read and follow [USDA's Animal and Plant Health Inspection Service \(APHIS\) Federal Order](#) requiring mandatory

reporting and testing for any dairy cows being transported from one farm to another across state lines.

"USDA's recent federal order takes important steps to minimize the spread of HPAI and enhance detection capability of the virus. As Michigan producers implement these federal measures, we will be better positioned to understand, respond to, and manage this outbreak," said **MDARD Director Boring**. "Ongoing detections in Michigan on both dairy and poultry farms underscore how we can all do more."

Biosecurity is Michigan's best tool to prevent the ongoing spread of this virus that appears to be moving from dairy farms to other dairy farms and poultry farms. MDARD is evaluating additional steps that can be taken beyond USDA's federal order, including but not limited to additional biosecurity practices, to further mitigate virus spread in Michigan.

It remains critical that producers conduct risk assessments of biosecurity vulnerabilities. Travel between farms should be minimized however possible and aggressive biosecurity measures in place on farms for essential movement functions. Individuals should be utilizing personal protective equipment and ensuring sanitization before entering facilities. Vehicles and equipment should be cleaned and disinfected before moving off the farm. As always, wild birds should be kept away from livestock and their feed and water sources.

At this time, the public health risk associated with HPAI remains low. According to the USDA APHIS, the Food and Drug Administration, and Centers for Disease Control and Prevention, the commercial milk supply remains safe due to federal animal health requirements and pasteurization. Federal experts continue to stress there is no concern about the safety of the commercial milk supply or that this circumstance poses any increased risk to consumer health.

"As we learn more about this HPAI outbreak, we're preparing to use every tool at our disposal to combat this virus while working with and supporting our industry partners," added **Boring**. "Thanks to recent budget investments, MDARD is well poised to engage in this response properly. However, as this outbreak evolves, we must be prepared at every level to respond quickly and efficiently. We're all on the same team as we combat HPAI."

MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI, mitigate the spread of the disease, and provide outreach.

To read the full APHIS Federal Order, [click here](#).

Additional resources can also be found at Michigan.gov/BirdFlu.

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Agriculture and Rural Development

MDARD Director Tim Boring Signs 'HPAI Risk Reduction Response Order' Determination of Extraordinary Animal Health Emergency in Response to the Ongoing HPAI Outbreak in Michigan

May 01, 2024

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At this time, the public health risk associated with HPAI remains low

LANSING, Mich. - Michigan Department of Agriculture and Rural Development (MDARD) Director Dr. Tim Boring today signed a "Determination of Extraordinary Emergency, "HPAI Risk Reduction Response Order," to further protect Michigan's poultry



and livestock industries from the ongoing threat of Highly Pathogenic Avian Influenza (HPAI). The order goes into effect on Wednesday, May 8, 2024, and applies to all dairy and commercial poultry facilities statewide.

"This national HPAI outbreak must be a top priority for all who work in agriculture. At MDARD, we're taking aggressive action to protect both animal and public health to help reduce the further spread of HPAI in Michigan," said **Director Boring**. "This outbreak has highlighted areas within our industry that require immediate attention. Producers must immediately implement robust biosecurity practices and create emergency preparedness plans and this order starts to address these on-farm risks. Implementing these measures must be the highest priority for every farm and agriculture worker. Working together, we can combat HPAI and reduce the long-term impacts on our dynamic food and agriculture industry."

The emergency order requires the following measures to be taken:

- All Michigan dairy farms, as well as poultry operations considered commercial by the U.S. Department of Agriculture Animal & Plant Health Inspection Service (APHIS) must develop and implement biosecurity practices that include:
 - Designation of a biosecurity manager.
 - Designation of a line of separation to represent the perimeter of a secure area, limiting access points.
 - Establishment of cleaning and disinfection practices and procedures at those access points for both vehicles and individuals. This must include deliveries of feed and other supplies, and training for employees.
 - Establishment of a log book maintaining a record of all vehicles and of individuals who have gotten out of vehicles and crossed those access points, to be retained and made available for examination upon request by MDARD.
 - All lactating dairy cattle, and those in the last two months of pregnancy, are prohibited from being exhibited until there are no new cases of HPAI in dairy cattle in the State of Michigan for at least 60 consecutive days. No dairy cattle of any age from an infected premises may be exhibited until further notice.
 - All exhibitions or expositions of poultry are prohibited until such time that there are no new cases of HPAI in domestic poultry in the State of Michigan for at least 30 consecutive days. As defined in the Animal Industry Act, "poultry" means, but is not limited to, chickens, guinea fowl, turkeys, waterfowl, pigeons, doves, peafowl, and game birds that are propagated and maintained under the husbandry of humans (MCL 287.703(iii)).



"As we work together with our federal partners to gain a more complete understanding of this virus and its transmission, it is necessary to re-evaluate, refine, and enhance the measures being taken on Michigan farms to lower the risk of introducing this disease to animals," said **State Veterinarian Nora Wineland, DVM, MS, DACVPM**. "By limiting the

opportunities for vulnerable species to be exposed to the virus, we can better protect animal health throughout the state.”

“Recent testing by the Food and Drug Administration has shown that consuming pasteurized dairy remains safe,” said **Elizabeth Hertel, Michigan Department of Health and Human Services director**. “We know pasteurization is effective in inactivating HPAI in milk, and milk sold in stores in Michigan is pasteurized. It’s important to make sure the milk products you eat and drink are pasteurized. Overall, the risk HPAI poses to the public remains low.”

According to the U.S. Department of Agriculture’s Animal and Plant Health Inspection Service, the Food and Drug Administration, and Centers for Disease Control and Prevention, the commercial milk supply remains safe due to federal animal health requirements and pasteurization. Federal experts continue to stress there is no concern about the safety of the commercial milk supply or that this circumstance poses any increased risk to consumer health.

“The poultry and dairy industry are two of the most important agriculture industries across Michigan and biosecurity procedures to mitigate the spread of this virus are vital,” said **Dr. Nancy Barr, Executive Director of the Michigan Allied Poultry Industries**.

“The actions taken today by MDARD reflect the seriousness of the situation facing our industries. MDARD and MAPI will continue to work together to support poultry producers and dairy farmers.”

“The Michigan Association of Fairs and Exhibitions is grateful for MDARD’s leadership and guidance surrounding the ongoing HPAI outbreak. Michigan’s fairs showcase the best of Michigan agriculture, but we first and foremost want the public and animals to be safe. By taking these actions today, it’s hoped that poultry exhibitors can still participate in fair activities once circumstances have improved,” said **John Schut, Executive Director of Michigan Association of Fairs and Exhibitions**.

“Significant collaborative work is currently underway in Michigan and across the nation to better understand how the virus is spreading within and across herds. MDARD, the MSU Veterinary Diagnostic Laboratory and epidemiologists from the College of Veterinary Medicine are partnering to gather information that will guide the local and national response to the ongoing outbreak. As these studies advance, it is vital to implement stringent biosecurity measures to mitigate virus transmission within our state,” said **Douglas Freeman, Interim Dean, MSU College of Veterinary Medicine**.

In the coming days, additional details and guidelines will be made available on Michigan.gov/BirdFlu. MDARD continues diligently working with local, state, and federal

partners to quickly respond to reports of HPAI, mitigate the spread of the disease, and provide outreach.



To view order, click the link below:

[HPAI-Risk-Reduction-Response-Order.pdf \(michigan.gov\)](#)

Additional resources can also be found at [Michigan.gov/BirdFlu](#).

###

[Video: 5/1 Update: Highly Pathogenic Avian Influenza Detected in Michigan Dairy Herd](#)
(YouTube)

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MDARD Encourages Owners to Help Keep Their Animals Safe this Memorial Day Holiday



Agriculture and Rural Development

MDARD Provides Further Guidance on 'HPAI Risk Reduction Response Order'

May 01, 2024

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On Wednesday, May 1, 2024, Michigan Department of Agriculture and Rural Development (MDARD) Director Dr. Tim Boring signed a [Determination of Extraordinary Emergency, HPAI Risk Reduction Response Order \(HRRRO\)](#), to further protect Michigan's poultry and livestock industries from the ongoing threat of highly pathogenic avian influenza (HPAI).

The order goes into effect on Wednesday, May 8, 2024, and applies to all dairy and commercial poultry facilities statewide.

Today, additional guidance on the HRRRO was published to help dairy and poultry producers meet the requirements outlined in the order.

If you are a member of an industry or organization impacted by this order and wish to provide additional comments or questions, please email mda-info@michigan.gov.



HRRRO guidance:

<https://www.michigan.gov/mdard/-/media/Project/Websites/mdard/documents/animals/d/HPAI-Order-Guidance-05-03-24.pdf>

To view the order, click the link below:

[HPAI-Risk-Reduction-Response-Order.pdf \(michigan.gov\)](#)

MDARD continues to diligently work with local, state, and federal partners to quickly respond to reports of HPAI, mitigate the spread of the disease, and provide outreach.

Additional resources can also be found at Michigan.gov/BirdFlu.

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Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Barry County

May 06, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in a dairy herd from Barry County.

Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI Risk Reduction and Response Order](#). In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
- Isolate all animals that are new or returning to your farm.
- Monitor the health of your animals daily.
- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a secure food supply plan.
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are cleaned and disinfected. Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other farms.
- Clean and disinfect the interiors of trailers used to haul animals from other operations.
- Limit non-essential visitors to your farm.
- If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.

As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###

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Highly Pathogenic Avian Influenza Detected in Ottawa County Dairy Herd

Highly Pathogenic Avian Influenza Detected in Clinton County Dairy Herd



Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Ionia County

May 09, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced additional detections of highly pathogenic avian influenza (HPAI) in both a dairy herd and a backyard flock from Ionia County. The cases involve two separate premises, and U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratory confirmed these detections.

Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy and commercial poultry operations in Michigan to adopt enhanced biosecurity measures, collectively reducing the risk of introducing this virus on to farms. On May 3,

2024, [additional guidance](#) was issued to help producers enact these requirements. The order went into effect on May 8, 2024.

In addition to these requirements, wherever there are domestic animals, following [a few key steps](#) is fundamental to protecting their health and vitality:

- Prevent contact between domestic and wild birds by bringing them indoors or ensuring their outdoor area is fully enclosed.
- Keep your animals away from other animals of unknown or suspect health status.
- Monitor the health of your animals daily.
- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a detailed biosecurity plan.
- Wash your hands before and after caring for your animals.
- Disinfect boots and other gear when moving between coops, barns, or pens.
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are [cleaned and disinfected](#). Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other premises.
- Limit non-essential visitors to your premises.
- Use well or municipal water as drinking water for domestic animals.
- Keep feed secure to ensure there is no contact between the feed/feed ingredients and wild birds or rodents. If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.

As part of the disease response for the dairy herd, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. As part of the disease response for the backyard poultry flock, the premises is currently under quarantine, and the birds will be depopulated.

MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###

MI Newswire

Department of Agriculture and Rural Development

HPAI



Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in New Michigan Dairy Herds

May 10, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in dairy herds in Allegan, Clinton, Gratiot, Ingham counties and an additional herd in Isabella. The Michigan State University Veterinary Services Laboratories confirmed these detections. Samples have been sent to the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratory for additional confirmatory testing.


Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the "[Determination of Extraordinary Emergency HPAI Risk Reduction and Response](#)" Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures,



collectively reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
- Isolate all animals that are new or returning to your farm.
- Monitor the health of your animals daily.
- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a [secure food supply plan](#).
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are [cleaned and disinfected](#). Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other farms.
- Clean and disinfect the interiors of trailers used to haul animals from other operations.
- Limit non-essential visitors to your farm.
- If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.



As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

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Highly Pathogenic Avian Influenza Detected in Gratiot County

May 15, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in an additional dairy herd from Gratiot County. Testing through the Michigan State University Veterinary Diagnostic Laboratory detected this case. Samples have been sent to the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratories for additional confirmatory testing.


Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively



reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
- Isolate all animals that are new or returning to your farm.
- Monitor the health of your animals daily.
- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a [secure food supply plan](#).
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are [cleaned and disinfected](#). Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other farms.
- Clean and disinfect the interiors of trailers used to haul animals from other operations.
- Limit non-essential visitors to your farm.
- If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.



As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###

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Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Three New Dairy Herds

May 20, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in additional dairy herds from Clinton, Gratiot, and Ionia counties. Testing through the Michigan State University Veterinary Diagnostic Laboratory detected this case. Samples have been sent to the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratories for additional confirmatory testing.


Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI](#)



[Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:


- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
- Isolate all animals that are new or returning to your farm.
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- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a [secure food supply plan](#).
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- Clean and disinfect the interiors of trailers used to haul animals from other operations.
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- If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.



As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###

Additional resources can on HPAI also be found at Michigan.gov/BirdFlu. For more information on the detections of HPAI in cattle, please visit the [U.S. Department of Agriculture's website](#).





Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Gratiot Dairy Herd

May 22, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in an additional dairy herd from Gratiot County. Testing through the Michigan State University Veterinary Diagnostic Laboratory detected this case. Samples have been sent to the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratories for additional confirmatory testing.


Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI](#)



[Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
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- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a [secure food supply plan](#).
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are [cleaned and disinfected](#). Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other farms.
- Clean and disinfect the interiors of trailers used to haul animals from other operations.
- Limit non-essential visitors to your farm.
- If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.



As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###

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Department of Agriculture and Rural Development



HPAI

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Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Three New Dairy Herds

May 25, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in a dairy herd from Calhoun County and additional dairy herds in Clinton and Ionia counties. Testing through the Michigan State University Veterinary Diagnostic Laboratory initially detected these cases. While confirmatory testing for the Calhoun and Clinton county herds is still pending, the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratories (NVSL) confirmed the detection in the Ionia County herd.



Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
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As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###



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Highly Pathogenic Avian Influenza Detected in Ottawa County Dairy Herd

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Highly Pathogenic Avian Influenza Detected in Gratiot Dairy Herd

Highly Pathogenic Avian Influenza Detected in Three New Dairy Herds



MDARD Designates Two Bovine Tuberculosis Testing Areas



Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Clinton County Dairy Herd

May 28, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in an additional dairy herd from Clinton County. Testing through the Michigan State University Veterinary Diagnostic Laboratory initially detected this case. Samples have been sent to the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratories for additional confirmatory testing.


Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively



reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

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As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

###

Additional resources can on HPAI also be found at Michigan.gov/BirdFlu. For more information on the detections of HPAI in cattle, please visit the U.S. Department of Agriculture's website.



MI Newswire

Department of Agriculture and Rural Development

HPAI



Agriculture and Rural Development

Highly Pathogenic Avian Influenza Detected in Ottawa County Dairy Herd

May 31, 2024

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Today, Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring announced the detection of highly pathogenic avian influenza (HPAI) in an additional dairy herd from Ottawa County. Testing through the Michigan State University Veterinary Diagnostic Laboratory initially detected this case. Samples have been sent to the U.S. Department of Agriculture's (USDA) National Veterinary Services Laboratories for additional confirmatory testing.


Regardless of species, biosecurity remains the best tool available to combat HPAI. On May 1, 2024, Director Boring issued the [Determination of Extraordinary Emergency HPAI Risk Reduction and Response](#) Order. In addition to other protocols, the order requires all dairy operations in Michigan to adopt enhanced biosecurity measures, collectively



reducing the risk of introducing this virus on to farms. On May 3, 2024, [additional guidance](#) was issued to help producers enact these requirements, which went into effect on May 8, 2024.

In addition to these requirements, following [a few key steps](#) can also be fundamental to protecting the health and vitality of Michigan's dairy cattle:

- Delay or stop incoming or returning animals from herds with unknown or suspect health status.
- Isolate all animals that are new or returning to your farm.
- Monitor the health of your animals daily.
- Contact your veterinarian if there are ever any animal health-related concerns or if you would like to develop a [secure food supply plan](#).
- Sick animals should have dedicated equipment and be cared for after tending to healthy animals first.
- Clothing, footwear, and equipment worn/used around sick animals should not be worn/used around other animals until they are [cleaned and disinfected](#). Use an EPA-registered disinfectant effective against avian influenza.
- Do not share tools, equipment, trailers, etc. with other farms.
- Clean and disinfect the interiors of trailers used to haul animals from other operations.
- Limit non-essential visitors to your farm.
- If individuals have recently been on a poultry farm, they should not visit a dairy operation, and vice versa.
- Require or provide clean clothing and footwear to those entering your farm.
- Use hand-washing stations and provide gloves to those working on your farm.



As part of the disease response, MDARD is working with the herd's veterinarian to monitor the health of the animals and conduct trace investigations. MDARD continues diligently working with local, state, and federal partners to quickly respond to reports of HPAI to mitigate the spread of the disease and provide outreach.

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USDA

- [USDA Announces \\$824 Million in New Funding to Protect Livestock Health; Launches Voluntary H5N1 Dairy Herd Status Pilot Program \(May 30, 2024\)](#)
- [Updates on H5N1 Beef Safety Studies \(May 24, 2024\)](#)
- [USDA Expands Support for Producers to Stop the Spread of H5N1 in Dairy Cattle \(May 23, 2024\)](#)
- [USDA, HHS Announce New Actions to Reduce Impact and Spread of H5N1 \(May 10, 2024\)](#)
- [USDA Actions to Protect Livestock Health From Highly Pathogenic H5N1 Avian Influenza \(April 24, 2024\)](#)

USDA - APHIS

- [USDA Confirms Highly Pathogenic Avian Influenza in Dairy Herd in Idaho \(April 2, 2024\)](#)
- [USDA Confirms Highly Pathogenic Avian Influenza in Dairy Herd in New Mexico \(April 1, 2024\)](#)
- [USDA, FDA and CDC Share Update on HPAI Detections in Dairy Cattle \(March 29, 2024\)](#)
- [Federal and State Veterinary, Public Health Agencies Share Update on HPAI Detection in Kansas, Texas Dairy Herds \(March 25, 2024\)](#)
- [APHIS Completes Final Environmental Assessment for First Seven States Affected by Highly Pathogenic Avian Influenza \(March 20, 2024\)](#)
- [USDA Provides Additional \\$502 Million For Highly Pathogenic Avian Influenza – Stands Ready to Combat Additional Detections \(March 5, 2024\)](#)
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Update: Human Infection with Highly Pathogenic Avian Influenza A(H5N1) Virus in Texas

April 5, 2024, 2:50 PM EDT

WHAT TO KNOW

- A person in Texas tested positive for highly pathogenic avian influenza (HPAI) A(H5N1) virus ("H5N1 bird flu"). This is only the second case of H5N1 bird flu in the United States; the first was in a poultry worker in Colorado in 2022.
- This person in Texas worked with dairy cows presumably infected with H5N1 bird flu viruses.
- This is the first time this virus has been found in cows and would be the first instance of cow-to-human spread of bird flu.
- CDC has sequenced the influenza virus genome from the patient in Texas and compared this with other sequenced H5N1 viruses. The virus obtained from this person is nearly identical to what has been found in cows and birds in Texas. There are no changes associated with resistance to antiviral medications and the virus is closely related to two existing candidate vaccine viruses.
- There is no sign of person-to-person spread of this virus at this time.
- This is an emerging and rapidly evolving situation that CDC is following closely. At this time, CDC believes that the overall risk to the general public posed by this virus remains low.

Summary

What CDC knows

H5N1 bird flu has been spreading in wild birds and causing outbreaks in poultry with infections in a growing number of other animals worldwide. It is now causing a [multi-state veterinary outbreak in the U.S.](#) in a new animal: dairy cows. In addition, there has been [one confirmed human infection](#) in a person who works with cows. CDC has been tracking and evaluating H5N1 bird flu for decades and is actively engaged with these recent developments because H5N1 bird flu has the potential to infect more humans and become a more widespread problem. Preliminary epidemiologic and laboratory data are reassuring, leading CDC to conclude that the current H5N1 risk to the general public remains low.

What CDC is doing

CDC is working with USDA, FDA, and state health departments to monitor people who may have been exposed to H5N1 bird flu infected animals and test people who develop symptoms. CDC has updated and expanded its recommendations for the prevention and control of H5N1 to include measures for people that are exposed to other animals, including cows, that may be infected with this virus. The CDC lab has sequenced and analyzed the virus from the person who tested positive for H5N1, [published a summary of their findings](#), and provided the full sequence of this virus to public databases. The virus from the Texas human case is very similar compared to those from poultry and impacted cattle, with only a few minor changes. There is no evidence of genetic adaptation that would make the virus more likely to spread from person-to-person. Additionally, the virus is picked up by CDC tests, susceptible to currently available flu antiviral medications, and at this time, there is no sign of person-to-person spread of this virus. CDC will continue to remain engaged with this situation.

Current Situation

[On April 1, 2024](#), Texas reported a human infection with highly pathogenic avian influenza (HPAI) A(H5N1) virus (H5N1 bird flu) after confirmation by CDC. This is the first time this virus has been found in a cow and the second human case of H5N1 bird flu reported in the United States. There was a previous case [in 2022 in Colorado](#) in a poultry worker. This new case is associated with a [multi-state veterinary outbreak of](#)

[H5N1 bird flu in U.S. dairy cows](#). This case occurs amid ongoing outbreaks of H5N1 bird flu in U.S. poultry, sporadic infections in a growing number of animal species, and widespread circulation of this virus in wild birds globally.

The person in Texas with H5N1 bird flu who had exposure to presumably infected cows reported eye redness, or conjunctivitis, as their only symptom and is recovering. The patient was told to stay at home away from others and was treated with a flu antiviral drug. Human infections with H5N1 bird flu are rare, but they do happen, most often after unprotected exposure to infected birds when enough virus gets into a person's eyes, nose, or mouth, or is inhaled, or when a person touches something that has virus on it and then touches their mouth, eyes, or nose. The case in Texas would be the first known instance of a person getting bird flu from a cow. It's not clear at this time exactly how the person in Texas became infected. Bird flu illnesses in people have ranged from mild (e.g., eye infection, upper respiratory symptoms) to severe (e.g., pneumonia, multi-organ failure, death).

CDC does not believe these developments change the overall H5N1 bird flu human health risk for the U.S. general public, which CDC continues to believe is low. CDC has preliminary analysis of genetic sequences showing that these viruses remain primarily avian and are not well adapted to people. There were no changes that would make these viruses resistant to current FDA-approved and recommended [flu antiviral medications](#). These viruses also are very closely related to two existing HPAI A(H5N1) candidate vaccine viruses that are already available to manufacturers, and which could be used to make vaccine if needed.

Viruses can undergo changes when they replicate after infection, and CDC scientists look for changes any time they study a virus. In this case, CDC scientists did identify a previously characterized change in one amino acid associated with human and other mammal infections. This finding is not uncommon or surprising and, importantly, is not associated with an increased ability of this virus to spread between people.

In addition to studying the virus, CDC analyzes whether people may be seeking more health care in areas where the virus might be spread. Although increases in health care use are unlikely in this situation, in an abundance of caution, CDC reviewed available public health surveillance data sources in the states with affected dairy farms and did not detect any evidence of increases in influenza A positive tests or influenza-related medical visits.

Recommendations

While CDC believes the current risk to the general public remains low, people with close or long unprotected exposures (not wearing respiratory or eye protection) to infected birds or other animals (including livestock), or to environments contaminated by infected birds or other animals, are at greater risk of infection.

To reduce the risk of infection:

- People should avoid unprotected exposures to sick or dead animals, including wild birds, poultry, other domesticated birds, and other wild or domesticated animals (including cows).
- People should avoid unprotected exposures to animal poop, bedding (litter), raw milk, or materials that have been touched by, or close to, birds or other animals with suspected or confirmed H5N1 bird flu.
- People should not prepare or consume uncooked or undercooked food or related uncooked food products, such as unpasteurized (raw) milk, or raw cheeses, from animals with suspected or confirmed H5N1 bird flu virus infection.
- It is safe to drink commercial milk because products are pasteurized before entering the market. Pasteurization kills bacteria and viruses, like influenza viruses, in milk.
- It is safe to eat properly handled and cooked poultry in the United States. Properly handling and cooking poultry and eggs to an internal temperature of 165°F kills bacteria and viruses, including bird flu viruses.
- [Specific recommendations](#) for farmers; poultry, backyard flock, and livestock owners; and worker protection are also available.

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[Meningococcal Disease Increasing in US](#)



APRIL 5, 2024

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CONTENT SOURCE:

National Center for Immunization and Respiratory Diseases (NCIRD); About NCIRD; NCIRD Divisions and Offices

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U.S. DEPARTMENT OF AGRICULTURE

USDA Announces \$824 Million in New Funding to Protect Livestock Health; Launches Voluntary H5N1 Dairy Herd Status Pilot Program

Press Release

Release No. 0103.24

Contact: USDA Press**Email:** press@usda.gov

WASHINGTON, May 30, 2024 -- The U.S. Department of Agriculture today announced it is taking several additional actions to ensure the health and viability of the nation's livestock and poultry. In the two months since the initial detection of H5N1 in dairy cattle, USDA has worked quickly and in concert with its federal and state partners to better understand the virus and contain the disease and remains committed to seeking additional ways to collect the data needed to better understand and mitigate the risk created by this outbreak. USDA is adding an additional \$824 million in emergency funding from the Commodity Credit Corporation (CCC) to bolster these efforts and is launching a new Voluntary H5N1 Dairy Herd Status Pilot Program to give dairy producers more options to monitor the health of their herds and move cows more quickly while providing on-going testing and expanding USDA's understanding of the disease.

Emergency Funding to Build on Response Efforts

To help ensure the Animal and Plant Health Inspection Service (APHIS) can continue to provide critical rapid response activities, Secretary Vilsack approved the transfer of \$824 million from the CCC to APHIS to directly support the response efforts. This funding

allows APHIS to continue its critical work with state and local partners to quickly identify and address cases of HPAI/H5N1 in poultry and livestock. The funding will support anticipated diagnostics, field response activities, pre-movement testing requirements, other necessary surveillance and control activities, surveillance in wildlife for APHIS, the Agricultural Research Service's (ARS) work in developing vaccines for HPAI in cattle, turkeys, pigs, and goats, and ARS and the Food Safety and Inspection Service's food safety studies.

The Secretary is authorized to transfer funding from available resources including the CCC to address emergency outbreaks of animal and plant pests and diseases. USDA previously approved the use of \$1.3 billion in emergency funding to address nationwide HPAI detections in wild birds and commercial poultry operations. These additional funds will ensure our continued robust and rapid response to this outbreak.

Voluntary Dairy Herd Status Pilot Program

Continuing to build on the efforts to contain H5N1, APHIS is standing up a Voluntary H5N1 Dairy Herd Status Pilot Program, which provides alternative testing and movement options to the [Federal Order](#) to increase USDA's monitoring capabilities to mitigate the spread of H5N1. The Voluntary H5N1 Dairy Herd Status Pilot Program aims to create additional testing options for producers with herds that have tested negative for three weeks in a row, further reduce H5N1 virus dissemination, provide for further opportunities to test herds that are not known to be affected with H5N1, increase surveillance and expand our knowledge of the disease, and support an overall national program to reduce the risk of H5N1 in dairy herds.

The main benefit for farmers who choose to enroll in the Voluntary H5N1 Dairy Herd Status Pilot Program is that once they can demonstrate their herds are free of H5N1 with results from a National Animal Health Laboratory Network (NAHLN) facility, they will then need to conduct weekly tests on bulk milk from that herd to confirm that status and will be able to ship their cows at the time they prefer and without testing individual animals.

Dairy producers from States enrolled in the first phase of this program who choose to enroll their herds and who test negative for H5N1 for three consecutive weeks using on-farm bulk tank milk samples or similar representative milk samples tested at a NAHLN laboratory will be able to move animals without additional pre-movement testing

currently required under the Federal Order. Producers must also comply with continued regular weekly monitoring and testing of the herd for H5N1.

APHIS is currently working with state animal health officials to identify states to participate in a pilot phase of the program. Producers from states participating in this pilot can start enrolling in the Voluntary H5N1 Dairy Herd Status Pilot Program on the week of June 3, 2024, by contacting their [APHIS Area Veterinarian in Charge](#) or State Veterinarian and signing a Herd Monitoring Plan agreement. USDA strongly encourages dairy producers to enroll in this new program. Beyond the benefits for their own operations, increased producer participation may help USDA to establish state and/or regional disease-free statuses that could further ease compliance with the current Federal Order. Those herds not enrolled in the pilot program will continue to follow the interstate testing and movement requirements published in the Federal Order. More specific guidance on the new program, including how to enroll and how to obtain and maintain a herd status, will be made available on the [APHIS website](#) in the coming days.

As additional testing measures take place, USDA anticipates that it will see an increase in testing and positive test results, which will add to our knowledge of the disease and how it may spread between herds. At the same time, this pilot program will help to gather additional information on how producers with affected herds can document elimination of the virus on their operations and steps they can take to maintain an H5N1 virus-free herd.

This new investment in risk mitigation augments the previously announced Federal Order on pre-movement testing of lactating dairy cattle, announced on [April 24](#), as well as the tools to support biosecurity activities, announced on [May 10](#), and the Emergency Assistance for Livestock, Honey Bees, and Farm-raised Fish Program funding availability, announced on [May 23](#).

As USDA continues to take steps to protect the health of livestock, the Department continues to work closely with federal partners at the CDC on protecting the health of people and FDA on protecting the safety of the food supply. The U.S. government remains committed to addressing this situation with urgency.

To learn more about USDA's response to H5N1 in dairy cattle, visit www.aphis.usda.gov/livestock-poultry-disease/avian/avian-influenza/hpai-detections/livestock.

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Emergency Preparedness and Response

Highly Pathogenic Avian Influenza A(H5N1) Virus: Identification of Human Infection and Recommendations for Investigations and Response



Distributed via the CDC Health Alert Network

April 05, 2024, 01:30 PM ET

CDCHAN-00506

Summary

The Centers for Disease Control and Prevention (CDC) is issuing this Health Alert Network (HAN) Health Advisory to inform clinicians, state health departments, and the public of a recently confirmed human infection with highly pathogenic avian influenza (HPAI) A(H5N1) virus in the United States following exposure to presumably infected dairy cattle. The U.S. Department of Agriculture (USDA) [recently reported detections of !\[\]\(95b425611cbd2b8716a140cf67c81822_img.jpg\) highly pathogenic avian influenza A\(H5N1\) virus in U.S. dairy cattle in multiple states.](#) This Health Advisory also includes a summary of interim CDC recommendations for preventing, monitoring, and conducting public health investigations of potential human infections with HPAI A(H5N1) virus.

Background

A farm worker on a commercial dairy farm in Texas developed conjunctivitis on approximately March 27, 2024, and subsequently tested positive for HPAI A(H5N1) virus infection. HPAI A(H5N1) viruses have been reported in the area's dairy cattle and wild birds. There have been no previous reports of the spread of HPAI viruses from cows to humans.

The patient reported conjunctivitis with no other symptoms, was not hospitalized, and is recovering. The patient was recommended to isolate and received antiviral treatment with oseltamivir. Illness has not been identified in the patient's household members, who received oseltamivir for post-exposure prophylaxis per [CDC Recommendations for Influenza Antiviral Treatment and Chemoprophylaxis](#). No additional cases of human infection with HPAI A(H5N1) virus associated with the current infections in dairy cattle and birds in the United States, and no human-to-human transmission of HPAI A(H5N1) virus have been identified.

CDC has sequenced the influenza virus genome identified in a specimen collected from the patient and compared it with HPAI A(H5N1) sequences from cattle, wild birds, and poultry. While minor changes were identified in the virus sequence from the patient specimen compared to the viral sequences from cattle, both cattle and human sequences lack changes that would make them better adapted to infect mammals. In addition, there were no markers known to be associated with influenza antiviral drug resistance found in the virus sequences from the patient's specimen, and the virus is closely related to two existing HPAI A(H5N1) candidate vaccine viruses that are already available to manufacturers, and which could be used to make vaccine if needed.

This patient is the second person to test positive for HPAI A(H5N1) virus in the United States. The first case was reported in [April 2022 in Colorado](#) in a person who had contact with poultry that was presumed to be infected with HPAI A(H5N1) virus.

Currently, HPAI A(H5N1) viruses are circulating among wild birds in the United States, with associated outbreaks among poultry and backyard flocks and sporadic infections in mammals.

The current risk these viruses pose to the public remains low. However, people with job-related or recreational exposures to infected birds, cattle, or other animals are at higher risk of infection and should take appropriate precautions outlined in [CDC Recommendations for Farmers; Poultry, Backyard Bird Flock, and Livestock Owners; and Worker Protection](#).

CDC continues to work with USDA, FDA, and state health departments to monitor people exposed to animals infected with HPAI A(H5N1) viruses. The FDA does not currently have concerns about the safety or availability of pasteurized milk products nationwide. Pasteurization has continually proven to inactivate bacteria and viruses, like influenza viruses, in milk and is required for any milk entering interstate commerce. Because influenza viruses constantly change, continued surveillance and preparedness efforts are critical. CDC is taking measures in case the public health risk assessment changes. This is a developing situation, and CDC will share additional updates as new relevant information becomes available.

No case of severe illness or death with HPAI A(H5N1) virus infection has been reported in the United States. Since 1997, more than 900 sporadic human cases of HPAI A(H5N1) have been reported in 23 countries, with more than half of these cases resulting in death. However, since 2015–2016, human cases have decreased substantially, and only a small number of sporadic human cases have been reported worldwide since 2022. Clinical illness with HPAI A(H5N1) virus infection has ranged from mild disease (e.g., conjunctivitis and upper respiratory symptoms) to severe or critical disease (e.g., pneumonia, multi-organ failure, and sepsis) and death.

Recommendations

CDC's updated recommendations include instructions for infection prevention and control measures, using personal protective equipment (PPE), testing, antiviral treatment, patient investigations, monitoring of exposed persons (including persons exposed to sick or dead wild and domesticated animals and livestock with suspected or confirmed infection with HPAI A(H5N1) viruses), and antiviral chemoprophylaxis of exposed persons.

Recommendations for Clinicians

- Clinicians should consider the possibility of HPAI A(H5N1) virus infection in people showing signs or symptoms of acute respiratory illness or conjunctivitis and who have relevant exposure history outlined in [Highly Pathogenic Avian Influenza A\(H5N1\) Virus in Animals: Interim Recommendations for Prevention, Monitoring, and Public Health Investigations](#).
 - Examples of symptoms include but are not limited to:
 - Mild illness: (e.g., cough, sore throat, eye redness or eye discharge such as conjunctivitis, fever or feeling feverish, rhinorrhea, fatigue, myalgia, arthralgia, and headache)
 - Moderate to severe illness: (e.g., shortness of breath or difficulty breathing, altered mental status, and seizures)
 - Complications: (e.g., pneumonia, respiratory failure, acute respiratory distress syndrome, multi-organ failure (respiratory and kidney failure), sepsis, and meningoencephalitis)
- If signs and symptoms compatible with avian influenza A(H5N1) virus infection are present:

1. Isolate patient and follow infection control recommendations, including using PPE.
 2. Initiate empiric antiviral treatment as soon as possible. Do not delay treatment while awaiting laboratory results.
 3. Notify state and local health department to arrange testing for influenza A(H5N1) virus.
 4. Collect respiratory specimens from the patient to test for influenza A(H5N1) virus at the state health department. If the exposed person has conjunctivitis, with or without respiratory symptoms, both a conjunctival swab and a nasopharyngeal swab should be collected for testing.
 5. Encourage patients to isolate at home away from their household members and not go to work or school until it is determined they do not have avian influenza A(H5N1) virus infection.
- Starting empiric antiviral treatment with oral or enterically administered oseltamivir (twice daily for five days) is recommended regardless of time since onset of symptoms. **Antiviral treatment** should not be delayed while waiting for laboratory test results.

Recommendations for State Health Departments

- State health department officials should investigate potential human cases of HPAI A(H5N1) virus infection as described in these **recommendations** and **notify CDC within 24 hours** of identifying a case under investigation.
- Patients who meet **epidemiologic criteria AND either clinical OR public health response criteria** should be tested for influenza A(H5N1) virus infection by reverse-transcription polymerase chain reaction (RT-PCR) assay using H5-specific primers and probes at state or local public health departments.
- **Recommendations for monitoring and antiviral chemoprophylaxis of close contacts of infected persons are different than those that apply to persons who meet bird or other animal exposure criteria.**
 - Post-exposure prophylaxis of close contacts of a person with HPAI A(H5N1) virus infection is recommended with oseltamivir twice daily (treatment dosing) instead of the once daily pre-exposure prophylaxis dosing.
- People exposed to HPAI A(H5N1) virus-infected birds or other animals (including people wearing recommended PPE) should be monitored for signs and symptoms of acute respiratory illness beginning after their first exposure and for 10 days after their last exposure.
- Whenever possible, public health officials (including the state public health veterinarian) and animal health and agriculture officials (including the state veterinarian) should collaborate using a One Health approach to conduct epidemiological investigations into animal and human infections with HPAI A(H5N1) virus to protect animal and human health.

Recommendations for Farmers; Poultry, Backyard Bird Flock, and Livestock Owners; and Worker Protection

- **To reduce the risk of HPAI A(H5N1) virus infection**, poultry farmers and poultry workers, backyard bird flock owners, livestock farmers and workers, veterinarians and veterinary staff, and responders should wear recommended PPE (e.g., the same PPE is recommended for persons exposed to any confirmed or potentially infected animals as for exposed poultry workers; for specific recommendations see: **PPE recommended for poultry workers**). This includes wearing an N95™ filtering facepiece respirator, eye protection, and gloves and performing thorough hand washing after contact, when in direct physical contact, or during close exposure to sick or dead birds or other animals, carcasses, feces, unpasteurized (raw) milk, or litter from sick birds or other animals confirmed to be or potentially infected with HPAI A(H5N1) viruses.
- **Workers should receive training on using PPE** and demonstrate an understanding of when to use PPE, what PPE is necessary, how to correctly put on, use, take off, dispose of, and maintain PPE, and PPE limitations.

Recommendations for the Public

- **People should avoid being near sick or dead animals** or surfaces contaminated with the animal's feces, litter, raw milk, or other byproducts when not wearing respiratory or eye protection.
 - Animals in which HPAI A(H5N1) virus infection has been identified include wild birds, poultry, other domesticated birds, and other wild or domesticated animals (including livestock such as cattle and goats).
- As always, people should not prepare or eat uncooked or undercooked food or related uncooked food products, such as unpasteurized (raw) milk or raw cheeses, from animals with **suspected or confirmed** HPAI A(H5N1) virus

infection.

For More Information

- General Information
 - [Highly Pathogenic Avian Influenza A\(H5N1\) Virus in Animals: Interim Recommendations for Prevention, Monitoring, and Public Health Investigations](#)
 - [Technical Update: Summary Analysis of Genetic Sequences of Highly Pathogenic Avian Influenza A\(H5N1\) Viruses in Texas](#)
 - [Information on Bird Flu](#)
 - [Past Outbreaks of Avian Influenza in North America](#)
 - [Transmission of Avian Influenza A Viruses Between Animals and People](#)
 - [Avian Influenza in Birds](#)
 - [Reported Human Infections with Avian Influenza A Viruses](#)
 - [Bird Flu Virus Infections in Humans](#)
- Information for Clinicians
 - [Human Infection with Avian Influenza A Virus: Information for Health Professionals and Laboratorians](#)
 - [Brief Summary for Clinicians: Evaluating and Managing Patients Exposed to Birds Infected with Avian Influenza A Viruses of Public Health Concern](#)
 - [Interim Guidance on Testing and Specimen Collection for Patients with Suspected Infection with Novel Influenza A Viruses with the Potential to Cause Severe Disease in Humans](#)
 - [Interim Guidance for Infection Control Within Healthcare Settings When Caring for Confirmed Cases, Probable Cases, and Cases Under Investigation for Infection with Novel Influenza A Viruses Associated with Severe Disease](#)
 - [Interim Guidance on the Use of Antiviral Medications for Treatment of Human Infections with Novel Influenza A Viruses Associated with Severe Human Disease](#)
 - [Interim Guidance on Influenza Antiviral Chemoprophylaxis of Persons Exposed to Birds with Avian Influenza A Viruses Associated with Severe Human Disease or with the Potential to Cause Severe Human Disease](#)
 - [Interim Guidance on Follow-up of Close Contacts of Persons Infected with Novel Influenza A Viruses and Use of Antiviral Medications for Chemoprophylaxis](#)
- Information for Farmers, Workers, and Livestock and Poultry Owners
 - [Recommendations for Worker Protection and Use of Personal Protective Equipment \(PPE\) to Reduce Exposure to Novel Influenza A Viruses Associated with Severe Disease in Humans](#)
 - [CDC Healthy Pets, Healthy People](#)
 - [Farm Animals | Healthy Pets, Healthy People](#)
 - [Backyard Poultry | Healthy Pets, Healthy People](#)
 - [Stay Healthy When Working with Farm Animals](#)
- Press Releases
 - [CDC: April 1 – Highly Pathogenic Avian Influenza A\(H5N1\) Virus Infection Reported in a Person in the U.S.](#)
 - [Texas DSHS: April 1 – Health Alert: First Case of Novel Influenza A \(H5N1\) in Texas, March 2024](#)
 - [USDA: March 25 – Federal and State Veterinary, Public Health Agencies Share Update on HPAI Detection in Kansas, Texas Dairy Herds](#)
 - [USDA: March 29 – USDA, FDA and CDC Share Update on HPAI Detections in Dairy Cattle](#)

The Centers for Disease Control and Prevention (CDC) protects people's health and safety by preventing and controlling diseases and injuries; enhances health decisions by providing credible information on critical health issues; and promotes healthy living through strong partnerships with local, national and international organizations.

DEPARTMENT OF HEALTH AND HUMAN SERVICES

HAN Message Types

- **Health Alert:** Conveys the highest level of importance about a public health incident.
- **Health Advisory:** Provides important information about a public health incident.
- **Health Update:** Provides updated information about a public health incident.

###

This message was distributed to state and local health officers, state and local epidemiologists, state and local laboratory directors, public information officers, HAN coordinators, and clinician organizations.

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Last Reviewed: March 28, 2024

**MDHHS**

First case of influenza A (H5) detected in Michigan resident

May 22, 2024

Author:

Chelsea Wuth

517-241-2112

The Michigan Department of Health and Human Services (MDHHS) is announcing the first case of influenza A (H5) virus identified in a Michigan farmworker who had regular exposure to livestock infected with influenza A (H5). This follows extensive public health actions over the course of the last few months by the state of Michigan to allow farmworkers to monitor and notify local public health officials should they have symptoms. According to the Centers for Disease Control (CDC), the risk to the public remains low; the Michigan farmworker diagnosed with influenza A (H5) had mild symptoms and has recovered. To protect farm and farmworker privacy, additional details are not being provided.

The virus has been circulating in dairy and poultry farms across the U.S. this spring, and state and local public health officials have been closely monitoring for human cases, which can occur sporadically in individuals with close contact to ill animals. This virus has been associated with the ongoing multistate outbreak of influenza A (H5N1). As such, it is not unexpected that comprehensive testing identified a human infection. Information to date suggests this is a sporadic infection, with no associated ongoing spread person-to-person.

“Michigan has led a swift public health response, and we have been tracking this situation closely since influenza A (H5N1) was detected in poultry and dairy herds in

Michigan. Farmworkers who have been exposed to impacted animals have been asked to report even mild symptoms, and testing for the virus has been made available," said Dr. Natasha Bagdasarian, chief medical executive. "The current health risk to the general public remains low. This virus is being closely monitored, and we have not seen signs of sustained human-to-human transmission at this point. This is exactly how public health is meant to work, in early detection and monitoring of new and emerging illnesses."

MDHHS and local health departments continue to work closely with the Michigan Department of Agriculture and Rural Development (MDARD), farms and workers to conduct monitoring of the health of people exposed to ill animals.

"Since the first detection of influenza A (H5N1) in dairy cattle on March 29, Michigan has prioritized both the animal and human health aspects of this disease outbreak. Today's news underscores the continued importance of limiting nonessential farm visits, including farm tours and field trips, as well as the use of personal protective equipment when working with livestock," said MDARD Director Tim Boring.

MDARD continues to implement a proactive, science-based approach to mitigating the spread of influenza A (H5N1). Michigan's response to influenza A (H5N1) has been a one-health approach, working with federal, state and local partners to address animal and public health concerns rapidly. Three U.S. Department of Agriculture (USDA) emergency management teams have been on the ground assisting MDARD in day-to-day responses at all impacted poultry facilities statewide. An epidemiological team from USDA is also deployed to further assist in tracing and testing within dairy herds to be able to provide real-time information.

Director Boring has taken proactive actions by signing an "[Determination of Extraordinary Emergency](#)" order Wednesday, May 1, which further protects Michigan's poultry and livestock industries from the ongoing threat of influenza A (H5N1). Michigan's order enhances USDA's federal order, which was issued Wednesday, April 24.

MDARD has identified both dairy and poultry farms that have tested positive for influenza A (H5N1) in several Michigan counties. Risk is not limited to those geographies as additional detections may be possible.

MDHHS recommends seasonal flu vaccination for people working on poultry or dairy farms. It will not prevent infection with avian influenza viruses, but it can reduce the risk of coinfection with avian and flu viruses.

Since 2022, there have been two previous human cases related to bird and dairy exposure in the U.S. -- one in Colorado in 2022 and one in Texas in 2024.

For more information, visit [Michigan.gov/InfluenzaA](https://www.michigan.gov/InfluenzaA).

**MDHHS**

Additional influenza A (H5) case detected in Michigan

May 30, 2024

Media Contact:

Chelsea Wuth

517-241-2112

The Michigan Department of Health and Human Services (MDHHS) is announcing an additional case of influenza A (H5) in a Michigan farmworker, who worked closely with influenza A (H5) positive cows. This worker was employed at a different farm than the [case announced on May 22](#). The Centers for Disease Control and Prevention (CDC) continues to highlight that the risk to the public remains low; this farm worker was quickly provided antivirals and is recovering from respiratory symptoms.

This virus has been associated with the ongoing multistate outbreak of influenza A (H5N1). As part of the ongoing response, state and local public health are closely monitoring for potential human cases, which can occur sporadically in individuals with close contact to infected animals. It is not unexpected that comprehensive testing is identifying sporadic human infections in farm workers.

“Michigan has led a swift public health response, and we have been tracking this situation closely since influenza A (H5N1) was detected in poultry and dairy herds in Michigan. Farmworkers who have been exposed to impacted animals have been asked to report even mild symptoms, and testing for the virus has been made available,” said Dr. Natasha Bagdasarian, chief medical executive. “With the first case in Michigan, eye symptoms occurred after a direct splash of infected milk to the eye. With this case, respiratory symptoms occurred after direct exposure to an infected cow. Neither



individual was wearing full personal protective equipment (PPE). This tells us that direct exposure to infected livestock poses a risk to humans, and that PPE is an important tool in preventing spread among individuals who work on dairy and poultry farms. We have not seen signs of sustained human-to-human transmission, and the current health risk to the general public remains low."

"In Michigan, we continue to respond to influenza A (H5N1) with a one-health approach, working closely with our federal, state, and local partners to address human and animal health," said Michigan Department of Agriculture and Rural Development (MDARD) Director Tim Boring. "Proper use of personal protective equipment is the best tool we have to protect farm workers. MDARD is currently offering assistance to dairy farms in need of additional protective equipment. MDARD has and will continue to take bold actions to assist farms impacted by this disease."

MDHHS recommends seasonal flu vaccination for people working on poultry or dairy farms. It will not prevent infection with avian influenza viruses, but it can reduce the risk of coinfection with avian and flu viruses.

MDHHS will be posting additional case identifications at [Michigan.gov/influenzaA](https://www.michigan.gov/influenzaA).

[Additional influenza A \(H5\) case detected in Michigan - ASL Version](#)



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How Michigan became ground zero for H5 avian influenza in the US



Kristen Jordan Shamus

Detroit Free Press

Michigan has become ground zero for the highly pathogenic H5N1 avian influenza virus that's sweeping the nation, killing turkeys, chickens and wild birds, infecting cows and other mammals — and now has sickened a third U.S. farmworker.

The Great Lakes state has more dairy cattle herds known to be infected with avian influenza than any other state in the U.S., with 24 outbreaks in 10 counties as of Friday, according to the U.S. Department of Agriculture. It now also has two farmworkers with confirmed bird flu infections — transmitted to them by close contact with sick cows.

Texas is the only other state where a person is known to have contracted the H5N1 virus from a cow, according to the U.S. Centers for Disease Control and Prevention. That state has reported 15 cattle herd infections since March. Seven other states — Idaho, South Dakota, Colorado, New Mexico, Kansas, Ohio and North Carolina — also have cow herds with known infections, the USDA reported.



The reason Michigan's tally of livestock outbreaks and farmworkers with avian influenza is higher than other states is not because Michigan is especially ripe for viral activity or because there's something different about the state's cows or workers, said Dr. Arnold Monto, emeritus professor of epidemiology and global public health at the University of Michigan and co-director of the Michigan Center for Respiratory Virus Research and Response.

"The main reason we're detecting more infection is because we're doing very good surveillance," Monto said. "Other states need to do the same. ... It's being missed."

The CDC reported May 22 that 40 people had been tested for highly pathogenic avian influenza nationally. The same day, Dr. Natasha Bagdasarian, Michigan's chief medical officer, told the Free Press that 35 Michigan farmworkers had undergone testing.

The means only five people who had been tested as of May 22 were from states other than Michigan. It also means the reach of the virus "is certainly more widespread" nationally than anyone currently knows, Monto said.

"The conclusions are pretty obvious when you hear things like that," said Monto. "If you don't look, you're not going to find it. What we need is to get serious about it in terms of how we handle surveillance because if you don't know it's there and don't have regulations in place ... it's going to spread even more."

The CDC updated its testing and monitoring data Friday, saying 44 people have now been tested nationally for the highly pathogenic H5N1 virus, and more than 390 people have been monitored as a result of their exposure to infected or potentially infected animals.

The agency said it also is stepping up national surveillance/testing by:

- Asking local labs to send more samples for subtyping to the CDC and state public health labs to test for the H5N1 virus.
- Extending reporting of flu-related hospitalizations through the Influenza Hospitalization Surveillance Network. The CDC typically stops reporting influenza hospitalizations from May-September because it's ordinarily such a seasonal virus. So far, the CDC said its surveillance systems show no indication of unusual flu activity in people.
- Increasing outreach through state and local health departments to health care providers and clinics about H5N1 symptoms so avian influenza is considered when patients with conjunctivitis or respiratory illness and a history of exposure to animals seek medical care.

How the virus came to Michigan cow herds

The outbreak of H5N1 virus in dairy cattle — with spillover to humans — began in Texas just a few months ago. It came to Michigan in late March,

when infected cows crossed state lines, said Tim Boring, the director of the Michigan Department of Agriculture and Rural Development.

"We know that a farm in Montcalm County initially (had an outbreak) as a result of cattle movement," Boring said, "and we've seen an expansion of our cases out of that general area since then."

Calling the H5N1 outbreak among poultry and cattle in Michigan an "extraordinary emergency," Boring issued an order May 1 that required all dairy and commercial poultry farms in Michigan to adopt biosecurity practices to slow the spread of the virus.

Among the requirements: Farms must secure animal areas, establish a perimeter and limit access. They must name a biosecurity manager and train employees, establish cleaning and disinfection practices for all with contact within the perimeter, including delivery drivers. They must keep log books tracking all who enter and leave.

More: Avian flu has spread to cows, milk — and experts worry human outbreak could be next

The order also prohibited all lactating dairy cattle, and those in the last two months of pregnancy, from being exhibited at fairs and festivals until there are no new cases of the virus statewide in dairy cattle for at least 60 consecutive days. Similarly, poultry also cannot be taken to exhibitions, fairs or festivals until no new cases of the virus have been detected in domestic poultry for at least 30 consecutive days.

The state agriculture department also teamed up closely with state and local health departments to ensure people would be protected, Boring said.

"In Michigan, we're testing in animals and we're testing in people and we've seen really strong coordination between animal and human health components within the state level, the federal level and on the local level," he told the Free Press on Friday. "Part of the reason that we've seen good

responses on testing is because of the involvement of local health departments. Those are trusted community partners. They are neighbors, not folks coming in from out of town. We're taking this really seriously. It's a proactive approach. This is both an animal and a public health concern, and we're managing it as such."



Still, Boring said, there are many unanswered questions about this virus, including how it spreads.

"We likely have a multifactorial transmission matrix going on of how the virus spreads from dairy farm to dairy farm. ... We're getting a better handle on it every day, and we're continuing to lead across the country of what the response looks like."

Human cases so far have been mild

All three people known to be infected with highly pathogenic avian influenza in the U.S. this year have had mild symptoms.

The Texas farmworker and the first person in Michigan to get ill from exposure to infected cattle reported only conjunctivitis, or pink eye. In the second Michigan case, which was announced Thursday, a farmworker had upper respiratory tract symptoms, including cough without fever, and eye discomfort with watery discharge, the CDC reported.

There is concern among scientists that the impact on people could change, as more animals get infected.

The more the virus spreads in animals, the greater the likelihood of human exposures and transmission, Monto said, which also increases the odds that the virus could mutate in a way that would allow H5N1 to spread from person to person or to cause more severe disease.

"That's why we really need to control it — not because we're sure that is going to happen, but because if that does happen, there's a chance it's going to be pretty bad," Monto said.

The CDC is conducting genetic sequencing on the most recent human case in Michigan to determine what, if any changes, there might be.

All three known human cases so far involved the 2.3.4.4b lineage of the virus that is nearly identical to the H5N1 viruses circulating in U.S. dairy cows, the CDC reported.

In samples taken from the infected eye of the first Michigan farmworker, whose case was announced May 22, the CDC identified a mutation that allows mammals to be infected more easily. However, it did not contain changes that would likely make it easier for the virus to spread from human to human.

And that's key, Monto said.

"We're lucky that there are receptor-binding issues that are preventing it from getting into humans easily," Monto said, "because if it were easy to transmit,

with all of the workers that are on these farms handling the equipment, which is heavily contaminated, we would see more cases."

The virus affects animals, people differently

The impact of the virus on animals so far has been extremely variable, said Timothy Cernak, an assistant professor of chemistry and medicinal chemistry at the University of Michigan.

"The virus behaves different in each species," said Cernak, whose work centers on developing new antiviral drugs that could be added to the arsenal of current antivirals to help stop a potential avian flu outbreak. "There are species that it gets into and they just don't seem to notice," while others get very sick and others see mass die-offs.



The current H5N1 strain in the U.S. is extremely deadly in birds and cats, sea lions, raccoons and skunks.

Dairy cows get sick from the virus, but don't typically die. A report from Michigan State University suggests cows on one Michigan farm with an H5N1 outbreak had high fevers and dehydration. There was a drop in rumination as well, which turns the grass they eat into energy and milk. Milk production dropped dramatically, and some pregnant cows miscarried.

Last week, the USDA reported that alpacas in Idaho also have contracted the virus. And mice became sick within a day of drinking raw milk from an infected cow. The New England Journal of Medicine published a letter from researchers at the Texas A&M Veterinary Medical Diagnostic Laboratory that showed the mice had high levels of virus in their organs. Levels also were high in the mammary glands of two mice — even though the mice were not lactating.

"In elephant seals it killed 96% of the pups from last year," Cernak said, adding that the virus also devastated the bald eagle population and affected horned owls. "It's entirely possible in wild populations, there are significant risks of extinction-level events happening."



More: Michigan farmworker is second US case of H5N1 bird flu likely transmitted from cow to human

For humans, he said a different subtype of H5N1 avian influenza that spread in Cambodia from 2003-23 caused severe illness and deaths.

"In Cambodia, the fatality rate in humans was really high, and that's the concerning thing," Cernak said. Of 64 people who contracted the other subtype of the virus, 41 died, according to the World Health Organization.

Could respiratory symptoms signal easier human-to-human spread?

For now, as the bird flu circulating in the U.S. has remained mild in the few human cases, Cernak said he is concerned about the potential for respiratory transmission to give this virus a boost.

"The biggest risk that we have is that it mutates toward respiratory transmission," he told the Free Press last week — before the Michigan Department of Health and Human Services announced that the state does now, in fact, have a farmworker with H5 infection and respiratory symptoms.

It's unclear, however, whether having those symptoms will make it easier to spread the virus from person to person.

Joe Coyle, deputy state epidemiologist and director of the MDHHS Bureau of Infectious Disease, said it's the first time respiratory symptoms have been associated with a human H5N1 influenza case following contact with sick cows.

"Generally speaking, with something like influenza and respiratory viruses, when you have respiratory symptoms, you're more likely to spread the virus than if it was just conjunctivitis like the previous case we had in Michigan and the one in Texas," Coyle said.

"It is a new presentation, and it's something that we'll definitely be looking at ... to see if this represents a different mutation of the virus that's causing these types of symptoms, or is it really the same virus but just a different route of transmission with respect to the human exposure."

The CDC reported that the farmworker with respiratory symptoms was treated with the antiviral drug oseltamivir, better known as Tamiflu, and is isolating at home. None of the person's contacts have developed symptoms and all are being monitored and offered antiviral medication.

More outreach to farms needed

Dr. Adam Lauring, an associate professor of infectious diseases and microbiology at U-M, said there are still a lot of unknowns when it comes to the current U.S. H5N1 avian influenza outbreak.

"Often in the health field, we are maybe appropriately focused on the humans, but the wider the outbreak is in animals, the more risk there is of humans being infected because there are more potential contacts," he said.

"I think everyone's trying to understand different ways that it could be spreading among dairy cattle within a herd and also between herds or between farms, and I think that's an important thing that we need to really get a better understanding of.

"In terms of how far it has spread in humans, that is dependent on really being able to do good surveillance, which is challenging in this situation in that it depends on people coming to attention, reporting their symptoms, getting tested."

Many farmworkers are undocumented migrant workers for whom English might not be a first language and who might be concerned about being deported if they say they are sick or seek medical care.

"A lot of these populations are hard to reach," Lauring said. "I know MDHHS has been doing outreach to try to do as best they can with surveillance for symptoms in people to try to catch anyone who could be infected, and also then to offer testing. That's how, for example, this (first) case in Michigan was identified was through this program."

Michigan, he said, appears to have done a better job than many other states. It has created a daily text-message surveillance system, available in English and in Spanish, that asks workers to detail whether they have symptoms. Anyone who answers yes is then offered testing by local public health workers.

Testing is encouraged, but not required, and the federal government now is reimbursing farms for the some of the losses they have incurred from H5N1 outbreaks and testing.

"This is an ongoing, evolving situation and it's important to pay attention to that," Lauring said. "Fortunately, the risk to the general population is low, but we need to pay attention and reach out to farms and people working with the farms and work together to control the outbreak."

'We're flying blind'

Katelyn Jetelina, an epidemiologist and consultant for several health organizations including the CDC, wrote on a post on her substack, "[Your Local Epidemiologist](#)," that the H5N1 situation in the U.S. is far from controlled.

"We are flying blind," she said. "We don't know how this virus is spreading, where it is spreading, and if it's becoming better at infecting humans."

Lack of trust in public health in the wake of the coronavirus pandemic, farmworkers' fears of deportation and language barriers, along with farmers' concerns about the financial impact the H5N1 outbreaks all are affecting surveillance efforts.

"It shouldn't be shocking that few are volunteering to test for H5N1," she wrote.

Animal testing for avian influenza viruses in Michigan is done through MSU's Veterinary Diagnostic Lab. Positive results are sent to the U.S. Department of Agriculture for confirmatory testing, Boring said.

If an animal's test result is positive, "we work closely with local and state health officials to make sure that local health is on farms, working with farmworkers, apprising them of everything they need to know about what this virus means and maintaining and tracking some human safety aspects there," he said.

That includes ensuring personal protective gear — such as face shields or goggles, respirator masks, rubber coveralls and boots — are available to workers on farms with infected animals. Although wearing PPE is recommended, it isn't mandatory.

"We're doing everything we can to assist those human health partners to be getting equipment out to not only just farms, but within those CDC guidelines around processing plants as well.

"We've had a few farms take us up on that, but the base PPE that makes so much of a difference in these cases — eye protection, gloves — that is equipment a lot of farms have on hand already."

Neither of the Michigan farmworkers who were infected by cows wore fully protective equipment, said Bagdasarian, the state's chief medical executive, in a statement issued Thursday. One was splashed in the eye with milk from an infected cow and the other had "direct exposure to an infected cow."

"This tells us that direct exposure to infected livestock poses a risk to humans, and that PPE is an important tool in preventing spread among individuals who work on dairy and poultry farms," she said.

For protection, the U.S. Department of Agriculture's Animal and Plant Health Inspection Service recommends that anyone who is within 6 feet of an infected cow should wear:

- Safety goggles or a face shield
- Disposable gloves
- Boots or boot covers
- A respirator, such as an N95 mask
- Fluid-resistant coveralls
- Head covering

Many questions about avian influenza remain unanswered

There remain many questions with wide implications, Monto said, when it comes to how this virus is behaving.

Among them, he said: For how long is a cow infectious? Will infections be sustained on farms or will they be able to be rid of the virus over time? Why are lactating cows so susceptible and why are virus particles so concentrated in their milk?

"What is going on in the mixed dairy-beef cattle farms? A cow is a cow," said Monto.

He noted that in one out of 109 samples of beef tested in late May by the USDA's Food Safety and Inspection Service, H5N1 viral particles were detected in muscle tissue. In ground beef that was inoculated with high levels of virus, cooking it to at least 145 degrees (medium) or 160 degrees (well done) killed the H5N1 virus.

"Even cooking burgers to 120 (rare) degrees, which is well below the recommended temperature, substantially inactivated the virus," the USDA reported.

And though similar testing of commercial milk found H5N1 viral fragments, those particles were inactivated by pasteurization and were unable to cause infection. Raw milk from infected cows, however, has been shown to be a risk for infection.

"We do know that raw milk is full of the virus," Monto said. "We know that we shouldn't be drinking unpasteurized milk and some people are (obsessed with) drinking unpasteurized milk."



Monto said scientists still don't know whether the milk of other animals — or humans — is infectious when they contract avian influenza.

"This virus is now spreading wherever they shipped dairy cows. It's come all the way from Texas to Michigan. And it's come to a variety of other states," Monto said.

"We need to control the infection in cattle, and that will lower the probability of humans becoming infected."

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