

PROTECT YOUR FARM. PROTECT YOUR LIVELIHOOD.

2022 Updates: The current 2022 threat is probably the most serious we have faced, with HPAI infected waterfowl moving down the US Atlantic flyway and across the country. A significant percentage of waterfowl are carrying the Eurasian H5 virus that devastated the European poultry industry in 2021. Use all biosecurity principles, especially the visitor control and line of separation. Be All In and protect your flock, protect your livelihood.



FOREWORD

ALL IN – ALL THE TIME

When it comes to highly infectious bird diseases like Avian Influenza (AI), none of us can afford to be complacent. Stopping the spread of disease in its tracks requires biosecurity measures to be in place and in practice at every farm, all the time — even when there are no outbreaks in your state or region.

BIOSECURITY HABITS WORK FOR A WIDE SPECTRUM OF POULTRY DISEASES

These same good biosecurity efforts to control AI can also prevent many other common diseases like Infectious Laryngotracheitis (ILT), *Mycoplasma synoviae* (MS), and *Mycoplasma gallisepticum* (MG).

Any disease outbreak can be devastating — not just to the specific farm and grower, but to an entire state's economy and to the poultry industry as a whole. We have learned that while some infectious diseases like HPAI are introduced initially by wild birds, the spread from farm to farm is primarily by the movement of people, vehicles and equipment. These are factors we can control.

PROTECT YOUR LIVELIHOOD

Practicing vigilance each and every day pays off. With this booklet, we hope to arm you with the information you need to protect your livelihood. Given the choice of All In or All Gone, let's not leave our farms open to risk. Choose instead to be ALL IN — ALL THE TIME.

- Mike Giles, President, Georgia Poultry Federation

INTRODUCTION

In an effort to inform and educate growers across the country about best practices regarding HPAI prevention and protection, the Georgia Poultry Federation created a campaign in 2015 based on the theme: "ALL IN or ALL GONE. Protect Your Farm. Protect Your Livelihood."

Through a series of weekly emailed messages, topics ranging from early detection to depopulation were explored. Each emailed message contained quick tips regarding biosecurity practices, from "drawing a line of defense" around your houses to proper equipment care and personnel training — as well as vehicle and visitor restriction and disinfection. The campaign very quickly gained national exposure, with poultry associations across the country contributing news and updates to the campaign website www.allinallgone.com.

This booklet features a recap of the messages, as a refresher for growers and to reinforce enhanced biosecurity practices for protection against HPAI.

Look for this mark throughout the booklet. You will find it placed next to specific tips that represent good biosecurity practices for ALL disease protection, as well as avian influenza.



Highly pathogenic avian influenza (HPAI) is a real threat. It is critical that everyone working on poultry farms should follow **strict biosecurity measures** to prevent HPAI from making its way onto poultry farms. The economic impact across the nation could be devastating.

ALL IN means **ALL OF US** practicing biosecurity measures **ALL THETIME**.

Catching avian influenza on your farm means your chickens are **ALL GONE**. The flock will be depopulated, and your farm will be quarantined.

Help us help you by educating **ALL of your farm** workers and ensuring they follow simple, preventative biosecurity procedures **ALL the time**, every time. We are all in this together.

Biosecurity tips and other information about avian influenza are provided throughout these pages. Please read and follow them closely. Protect your farm. Protect your livelihood.

How Safe Is Your Housekeeping?

Biosecurity practices on poultry farms have evolved over time. While discouraging visitors to farms is still very important, it is now also critical to think of it in terms of drawing an impenetrable line of defense around each individual poultry house.

This is a new day. The biosecurity practices of the past are not sufficient to protect your farm from the disease threats of the future. One way to think about it is to assume that the virus is on your farm already, and treat any entry into a poultry house by you or one of your workers as potentially dangerous.

Insist on **ALL IN, ALL THE TIME** for yourself, every single farm worker, visitor or family member.

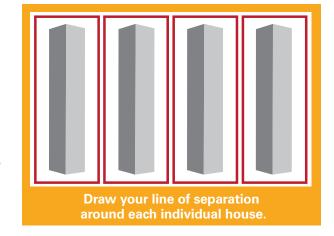
Each person must follow the strictest biosecurity procedures when they enter the poultry house – for example, wearing protective foot coverings or using shoes dedicated for inside the poultry house only, making sure that any equipment to be used in the house is

completely disinfected before it comes into the house, and preventing wild birds from getting into your poultry house.

These are just a few of the "must do" practices to keep the bad stuff outside your poultry house.

It's ALL IN. OR ALL GONE.

Your farm IS your livelihood. Protect it.



Are You ALL IN With Biosecurity on Your Farm? How Many of These Questions Can You Answer "YES" to?

- 1 Do you prohibit **ALL** non-essential visitors on your farm?
- 2 Do you make sure **ALL** equipment used on your farm is cleaned and disinfected before use **every single time**?



- 3 Do you have a biosecurity entry procedure, such as dedicated footwear or disinfectant foot bath, that you and your workers use to enter your poultry house which separates the outside (dirty) from the inside (clean)? Is this procedure followed **EVERY** time you or your workers enter the poultry house?
- 4 Do you have a sign-in log for **ALL** essential visitors coming to your farm (repairmen, serviceman)?
- 5 Have you told your workers and family that they can't have **ANY** contact with other chickens or wild birds when they are away from your farm?
- 6 Do you **ALWAYS** use hand sanitizer (or wash your hands or wear gloves) before and after you go inside your chicken houses?
- Do you **ALWAYS** dispose of all dead birds in a timely and approved manner?
- 8 Do you know how to recognize the signs of bird flu? Do you report any abnormal mortality promptly to your company's service personnel?
- Do you have an insect and rodent control program in place that is ALWAYS maintained properly? Do you prevent wild birds from EVER entering your poultry house? Do you keep ALL things off of your farm that could attract wild birds (feed spills, bird houses etc.)?
- 10 Do you use water from a well or utility in your poultry house or cool cell instead of pond water?

You're ALL IN But Are Your Workers and Family?

Anyone working on your poultry farm should be as knowledgeable about biosecurity as you are.

Have you sat down with **EVERYONE** who works in your poultry houses to educate them about the threat of avian influenza and the importance of biosecurity on your poultry farm?

Better yet, have you demonstrated it for them and followed through by making sure that they are implementing your biosecurity plan **EVERY SINGLE TIME?**

Out of the hundreds of entries into your poultry houses that are likely to happen annually, it only takes one biosecurity failure to bring avian influenza into your flock.

This goes for your children too. And don't forget your furry family members. Dogs have no business in a poultry house!

ALL IN means **EVERYBODY**. Please make sure your workers and family are **ALL IN** and educated about how biosecurity practices can **PROTECT YOUR FARM and PROTECT YOUR LIVELIHOOD**.

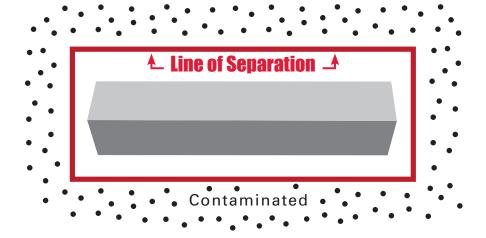


#5

Entering your poultry house safely is the #1 thing you can do to be **ALL IN** and **PROTECT YOUR FARM**. Some critical steps include wearing protective foot coverings, using dedicated shoes or using a disinfectant foot bath upon **EVERY** house entry. Keep the bad stuff outside the Line of Separation of each house.



THINK & ACT before you cross the line



To be **ALL IN**, you have heard that a safe approach is to consider everything outside your farm and each poultry house to be contaminated. Why is that?

The avian influenza virus can survive for weeks, even months, under certain conditions. On cold and moist ground on your farm, the virus could last for a month! Depending on the temperature, it could last for a week or more on the floorboard of your car or truck. That goes for the soles of your shoes too.



And remember that one gram of feces from an infected bird (about the size of the end of your thumb) has enough virus to infect **ONE MILLION BIRDS!**

There is no margin for error with this virus. That is why the experts say that you should assume that shoes, hands and anything you bring into your poultry house is already contaminated. **ALWAYS** clean and disinfect when you cross the Line of Separation!

Entering the premises of your farm and each poultry house safely is the #1 biosecurity measure that you can do to be **ALL IN** and **PROTECT YOUR FARM**.

ALL IN Means No Risky Business!

We've talked about the things you can do to be **ALL IN**. The things to avoid can be just as important... that means **NO RISKY BUSINESS!**

- No contact with any bird, domestic or wild, by you or your farm workers
- No visits to farms other than yours
- No use of pond water to water or cool the birds
- No sharing of equipment between farms without cleaning and disinfection
- No visitors unless authorized and following strict biosecurity protocols

Be **ALL IN** with biosecurity and **PROTECT YOUR FARM** by avoiding risks!



Would You Recognize Signs of Avian Influenza in Your Flocks?

HPAI, Highly Pathogenic Avian Influenza, strikes quickly. In fact, the virus is so deadly and swift that by the time you spot the clinical signs, your birds may already be dying.

If you are a commercial poultry grower and you suspect that your flock has avian influenza, contact the company that you contract with immediately. This is absolutely critical to stop further spread to other farms in your area.



Would you recognize the AI signs?

Most likely signs:



- Decrease in activity among your flocks
- Birds stop or decrease eating, drinking or laying
- Severe depression that causes the birds to fall quiet, causing an unusual and eerie silence inside the poultry house.



Other common signs:

- Discolored shanks
- Respiratory stress and difficulty with breathing
- Darkened comb and wattles
- Unexplained mortality



Don't take chances on your farm. Your failure to report early detection of avian influenza could put neighboring poultry farms and the entire industry at risk.

Be **ALL IN** and vigilant about looking for any signs or symptoms. And never hesitate to call, even if you are unsure. A false alarm is much preferred to a real outbreak.

ALL IN Means Keeping Wild Birds ALL OUT!

Be vigilant when it comes to reducing the risk associated with wild birds on your farm. Even one small "crack in the armor" of your line of defense can be an open invitation to an avian influenza outbreak on your farm.



Deter wild birds with these simple measures:

- Clean up feed spills promptly and completely
- No bird houses on your farm
- No bird baths on your farm
- No standing water (such as from leaky cool cells) around poultry houses
- Bird-proof houses
- Check eaves once a week to prevent birds from building nests in them
- Practice good insect control
- Dispose of dead birds promptly using approved methods

Every step you take to be **ALL IN** with your biosecurity measures is one step closer to being **ALL GOOD** on your farm.



What Would You Do?

A loyal, long-time employee on your farm mentions to you that he and his wife often go to the area flea market to look for tools. This flea market is known to sell live chickens and chicks on the premises. What would you do?

The Answer Is Clear.

Your employee **MUST** be told to stay away or risk infecting the poultry houses with avian influenza, or another costly

poultry disease, from an outside bird source. **EVERY ONE** on the farm needs to be **ALL IN, ALL THE TIME**...not just you, the grower. Educate your employees and make sure they understand that under no circumstances can they be exposed to backyard birds or wild fow! **AT ANY TIME**. Al is persistent and deadly.

Be vigilant **ALL THE TIME**.



Before Equipment Goes in, Make Sure You Are ALL IN

Keeping feet, hands and clothing clean is very important, but the same is true for everything that you carry into your poultry house.



- The first step is to clean the item.
 For example, a bucket or rake should be free of dirt or organic material **BEFORE** you apply the disinfectant. You have to clean first to give the disinfectant a chance to be effective!
- Only use disinfectants that have a label claiming to be effective at killing the influenza virus.
- If you have an item that can't be dunked in a disinfectant bath or sprayed down heavily (a drill for example), be sure to wipe it down with something like disinfectant wipes.
- If you bring an item inside your chicken house and then take it back outside, it must be cleaned and disinfected again... even if it only spends a short time outside.
- A good practice is to have equipment, buckets for example, that **ALWAYS** stays
 inside the chicken house on the clean side of your biosecurity line and equipment that **ALWAYS** stays on the outside or dirty side of the line.

Treat **EVERYTHING** that you carry inside your chicken house just like your feet, hands and clothing. **All IN** means **ALL CLEAN**!

Your Feet Need a Bath.

Foot baths are a great way to separate the outside (dirty) from the inside (clean) of the poultry house, and one of the most important things you can do to prevent AI from infiltrating. **BUT**, the foot baths must be properly maintained or they are completely ineffective. Here are some guidelines to follow before crossing the Line of Separation at your farm:



WET FOOT BATH

Use: Remove excess dirt from footwear before dipping in foot bath.

Dip feet completely in disinfectant solution. For further protection, use a long-handled brush soaked with disinfectant to completely scrub shoes.

Maintenance:

Use a disinfectant that is effective against avian influenza. Dilute in water as recommended by the manufacturer.

Remember that most disinfectants are inactivated by organic matter.

Protect foot bath from rain and sunlight using a cover or place inside the control or work room if possible.

Change solution once a day, every 20-30 dips, or when visibly dirty.

DRY FOOT BATH

Use: Remove excess dirt from footwear before walking in dry foot bath.

As you walk in the powder, rub feet in dry disinfectant powder to maximize contact.

Maintenance:

Protect foot bath from rain and sunlight using a cover or place inside the control or work room if possible.

Protect the dry powder from dirt, insects and animal droppings.

Change powder once a week or when visibly dirty or wet.

Remember **ALL IN** means everyone, with no exceptions, uses the foot bath **EVERY TIME** one enters the poultry house.

Keep Your Guard Up. Infection Risk is Real.

Back in 2014, HPAI was discovered on the West Coast in a backyard flock and a captive falcon bird in Oregon. That incident was followed by HPAI infections in 15 western and northern states that occurred through June 2015, devastating the poultry industry in those areas.



Since then, avian influenza has been discovered in wild waterfowl in a number of states, and in early 2017 avian influenza was reported in the Southeastern states of Tennessee, Alabama, Kentucky and Georgia.

All of these incidents confirmed what the poultry disease experts have been saying all along . . . that it is likely that avian influenza will be circulating in wild birds when they

migrate south. The impact of these infections sweeping the country in recent years has been a more urgent focus on improving biosecurity practices. And now in 2022, the Eurasian H5 virus is being detected in the US Atlantic Flyway and across the country.

Today, a tremendous amount of work has since gone into preparation and prevention. New and more stringent biosecurity habits have been created, and poultry growers are **ALL IN** and better prepared than ever before.

Today, the Al risk remains real. So please keep your guard up. Stay ALL IN, ALLTHETIME.

#14

What Would You Do?



You start your rounds early one cold morning, and you notice that your poultry flock is a little quieter and less active than normal. There seems to be an increase in mortality, but not a lot more than you've seen at other times over the years.

Even though the worker who helps on your farm didn't mention anything the day before, you check the mortality records and confirm that mortality increased from the day before. Water usage seems to

be off some, but it doesn't seem to be a dramatic difference to you.

It's Friday and you have a busy weekend ahead. What would you do?

- A. Wait another day. You've seen things like this before over the years.
- B. Ask your neighbor, who is a poultry grower too, to come over and see what he thinks.
- C. Report what is happening to the company you contract with immediately.

Of course, the answer is "C. Report immediately." The only way to contain an outbreak of avian influenza is to recognize the signs quickly and act immediately. It is better to have a false alarm than to lose a day or two of response time. Don't play the waiting game or it could have serious consequences.

ALL IN means being alert to the signs of avian influenza **ALLTHETIME**.

Don't Forget the Trash!

Do you have a trash dumpster on your farm? Many poultry farms do, and there are a few things you can do to handle your trash while keeping your

farm ALL safe and secure.



Any visitor to a farm represents a potential biosecurity risk. For example, trash removal service providers might visit multiple farms on their pickup route.



Here are a few things you can do to reduce the risk of spreading a disease to your farm:

- Place dumpsters at least 100 feet away from your poultry houses. When practical, vehicles and visitors should not come within the immediate vicinity of your poultry houses.
- In addition to keeping a safe distance, dumpsters should be placed toward the entrance to the farm. In other words, the vehicle picking up the trash should not have to travel by your poultry houses to get to the dumpster.
- As with any visitor to your farm, trash removal vehicles should follow your farm's biosecurity protocols.

When you need to get your trash **ALL OUT**, make sure you stay **ALL IN** by following these simple biosecurity tips.

#16

ALL the Latest Information, At Your Fingertips.

The easiest way to stay informed and upto-date about avian influenza on a national, regional and local level is to regularly check our website **www.ALLinALLgone.com**. On the website you will find Al updates, perspectives and reports from different parts of the country, an in-depth educational video series, and a collection of all the e-mail messages providing helpful information about safe practices to avoid Al contamination in your poultry houses.



We're **ALL IN** this together to be part of the solution. Shared information gives us the power and ability to protect our farms and our livelihoods. Check back often at **www.ALLinALLgone.com**.

Lessons Learned – A Discussion of Industry Experts on Al Epidemiology and Industry Response



At the International Production & Processing Expo in January 2016, USPoultry and United Egg Producers (UEP) sponsored a program on "Lessons Learned" from the 2015 HPAI outbreak. A discussion moderated by Dr. John Glisson focused on key aspects of the disease as well as case studies and the coordinated federal, state and industry response.

Lessons learned from the 2015 HPAI outbreak

- Wild birds introduced the virus initially but the spread from farm to farm was primarily by movement of people, vehicles and equipment.
- It is important to have a point of demarcation between clean and dirty on each poultry house. The most important line of biosecurity is the poultry house door.
- A major breach in biosecurity was the sharing of labor and equipment between farms.
- Vaccination against HPAI does not prevent infection or shed of the virus. Vaccination alone cannot be used to eradicate the virus.
- Growers need to be clean each and every time they enter a poultry house. Plan your work to minimize the number of times per day that a house must be entered.
- Biosecurity programs must work as well on weekends and holidays as they do during the week. They must be effective for very short visits to the farm as well as more extended ones.

Practicing vigilance each and every day pays off. Lesson learned? **ALL IN or ALL GONE**.

#18

Don't Let the Dogs in!



Dogs may be man's best friend, but they are most unwelcome in your poultry houses.



Remember: It only takes one biosecurity failure to erase all the hard work of keeping your poultry house free from the threat of avian influenza. You may be diligent about protective foot coverings and disinfectant foot baths, but your furry friends could not care less, and there's no telling where their paws have been and what they might track in.

When entering your poultry house, always make sure to look behind you — and be sure to close the door tight. That way, you'll keep the dogs out (cats too!) and everyone will sleep better at night.

Keep the Rats ALL OUT

Rodents can be a sneaky and potentially deadly carrier of many poultry diseases such as Highly Pathogenic Avian Influenza, or HPAI. A poultry house offers attractive shelter and nesting sites, especially during cold weather, and availability of food and water. Pests such as rats and mice are never polite enough to knock or enter through the front door and they also travel from farm to farm. So, effective rodent control is a must.

There are four basic steps that poultry growers can take to prevent an infestation or remove it once a rodent has made its way inside a poultry house:

- 1. Sanitation
- 2. Rodent-proof construction
- 3. Rodent population reduction
- 4. Evaluation

For this **ALL IN** segment, we'll focus on sanitation. . . .

The primary purpose of clean practices is to expose evidence of critters attempting to burrow through. Mow the grass regularly and keep a 3-foot perimeter around the poultry house that is free of brush, trash, and other clutter.



You likely will never be able to build a total fortress against rodent invasion, but proper sanitation sure can keep you better prepared — and lessen the chance of yet another potential Al carrier infecting your birds.

This segment provided in part from information compiled by the Mississippi State University Extension Service.



Batten Down the Hatches!

To combat the spread of avian influenza and other poultry diseases, there are four basic steps that poultry growers can take to prevent and rid rodent infestation:

- 1. Sanitation
- 2. Rodent-proof construction
- 3. Rodent population reduction
- 4. Evaluation

For this **ALL IN** segment, we'll highlight rodent-proof construction . . .

You likely will never be able to build a total fortress against rodent invasion, but here are some must-do measures that can certainly help lessen the chance of yet another potential disease carrier infecting your birds.



- Make sure load-out and walk-in doors close and seal properly.
- Check that corrugated metal siding is sealed and that corner seams are tight.
- Properly seal openings surrounding feed augers, water lines and electrical conduits entering
 the poultry house from the outside. A gravel strip around the perimeter of the house helps
 discourage rodent entry.

Do all you can to "batten down the hatches" and close up any potential entry points for rodents.

This segment compiled in part from information provided by the Mississippi State University Extension Service.

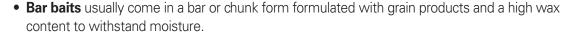


Rodenticides Are Effective if Used Properly and Handled With Care

As part of our **ALL IN** series on rodent control, we are offering advice in this segment on the use of rodenticides to eliminate an infestation problem that can potentially open the door to avian influenza and other poultry diseases.

Ready-to-use commercial rodent baits are recommended as the easiest and safest options over mix-your-own baits. Also, most poultry growers prefer single-feed poisons because they work faster than multiple-feed poisons. Consult your company, a pest control vendor or local poultry supply store for selection of the best rodenticide for your situation and advice on how to use it.

Rodenticides may be sold as bar baits, pellets, concentrates or tracking powders.



- **Pellets** are available in bulk or in small individual packs.
- Concentrates are most often sold in powder form and are mixed with feed or water.
- **Tracking powders** are formulated with talc or some similar ingredient and should be spread along rodent pathways. Its use is regulated and restricted to trained individuals.

Remember that all rodenticides are poisonous — not just for rats and mice but also at some level for humans, poultry, livestock and wildlife. So read the label and follow instructions closely.

This segment compiled in part from information provided by the Mississippi State University Extension Service.



Effective Control of Rodents in Your Poultry Houses Relies on Constant Monitoring and Evaluation.



In this last segment of our **ALL IN** series on rodent control, we wrap up with advice on a monitoring program to keep those pesky rodents at bay, closing yet another potential open door to avian influenza and other poultry diseases.

Rodents will never stop looking for a way to invade your poultry houses and taking advantage of free food and water. Likewise, poultry growers like you should always be on guard and constantly evaluating your rodent control program.

Rodenticides are usually effective, but make sure not to let these mistakes happen:

- Too few rodenticide bait stations
- Size of bait area is too limited
- Bait is removed too soon
- Existence of too many other food options such as trash
- Insufficient bait (monitor and stock regularly)
- Wrong bait choice
- Bait is allowed to get old and moldy before replacing
- Failure to check baits at least twice a month
- Failure to use gloves when dispensing bait (not just for your protection but to eliminate a human scent that may repel the rodents).

It's best to consult with an expert on such control measures as proper placement and number of boxes. Always be on the lookout for signs of rodents and be prepared to act immediately.

Remember: The best program for rodent control should include proper sanitation, rodent-proofing of the poultry house, population reduction with rodenticides, and ongoing monitoring. Rodent control should be a critical part of every poultry farm's biosecurity plan against HPAI and other poultry diseases.

This segment compiled in part from information provided by the Mississippi State University Extension Service.

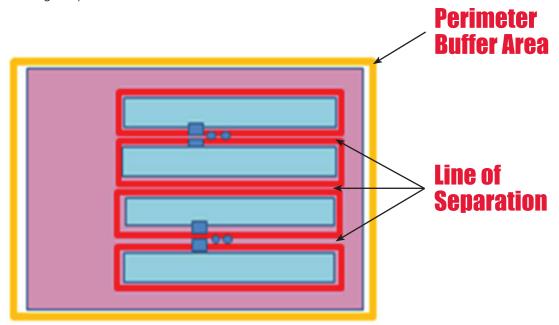


Setting and Protecting Your Perimeter Buffer Area

So what exactly is a Perimeter Buffer Area, and why is it important?

It is a functional zone surrounding the poultry houses or raising area that separates them from areas unrelated to poultry production on that site or adjoining properties. It's made up of the houses and raising areas as well as nearby structures and high traffic areas involved in the daily function of the farm. This includes feed bins, manure sheds, composting areas, egg rooms, generators, pump rooms, etc.

You should have a site-specific biosecurity plan in place outlining procedures that caretakers, visitors or suppliers must follow when entering and leaving the area. The plan should include: posting signage outside the farm premises, providing personal protective equipment for visitors, keeping a sign-in log and disinfecting wheels and tires prior to entering and when leaving the premises.



Minimum practices set for National Poultry Improvement Plan Program Standards

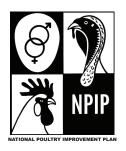
Biosecurity was a primary focus at a USDA conference in 2016 where industry, state and federal stakeholders with the National Poultry Improvement Plan (NPIP) met. The result was an addition to the NPIP Program Standards of a list of poultry biosecurity principles.

The list outlines biosecurity considerations that poultry operations should address in their programs to minimize the risk of infectious diseases, including HPAI, being introduced and spread throughout the farm. The following principles address biosecurity at the farm level:

- 1. Maintain **Line of Separation** for each poultry house
- 2. Protect **Perimeter Buffer Area** around entire operation
- 3. **Personnel** should wear personal protective equipment (PPE)
- 4. Have control program in place for **birds**, **rodents**, **insects**
- 5. Disinfect equipment and vehicles
- 6. Follow proper dead poultry disposal
- 7. Follow proper manure and litter management
- 8. Restrict exposure to surface water for your farm water supplies
- 9. Remove feed spills promptly; Cover feed and replacement litter deliveries
- 10. Report elevated mortality and morbidity

With **ALL IN, ALL THE TIME** participation, we have a much better chance of keeping our farms – and our livelihoods safe from the spread of infectious diseases.





National Poultry Improvement Plan



ALL IN. ALL THE TIME.

It is very important that the entire poultry industry maintain the good practices and habits that have been implemented in recent years. Today, poultry farms are far more secure and safe because growers like you have taken action. Let's keep up the good work going forward!

Each of the ALL IN messages that you have received are available for review online under the Education section of the ALL IN website at www.poultryimprovement.org. Please consider reviewing these messages periodically, especially with any new employees that you hire.

Effective biosecurity is a year-round business. Thank you for being **ALL IN** and let's keep up the good habits and practices - **ALL THE TIME**.





PROTECT YOUR FARM. PROTECT YOUR LIVELIHOOD.



www.ALLinALLgone.com