BIOSECURITY Activity Booklet

BIOSECURITY
FOR BIRDS

Word Games, Word Searches & More!





Biosecurity For Birds

doing everything you can to protect your birds from disease—such as washing your hands before and after you handle your birds, and keeping new birds separated from your other birds for at least 30 days.

Here are six simple steps that you can take to keep your birds healthy and keep poultry diseases away.

1. Keep Your Distance.

Don't let visitors who have poultry of thier own come ner your birds. Don't visit other households that have poultry. If you've been near other birds or bird owners, such as at a poultry exhibit or fair, a swap meet, small sale, or auction, clean and disinfect your clothes and shoes before going near own birds.

2. Keep It Clean.

Carefully wash your hands with sopa and water before and after you handle your birds. Change water and food every day. Disinfect all tools and equipment. Wear clean clothes when you work with your birds.

3. Keep It Away.

Buy chicks and birds from a reputable source to make sure you are getting healthy animals. New birds should be kept separate from your other birds for at least 30 days. If your birds have been to a fair or exhibit, keep them separate from your other birds for at least 2 weeks. Wild birds can carry disease, so keep them away from your birds.

4. Don't Borrow Disease From Your Neighbors.

Don't share garden tools or poultry supplies. If you do bring these items home, clean and disinfect them before they reach your property.

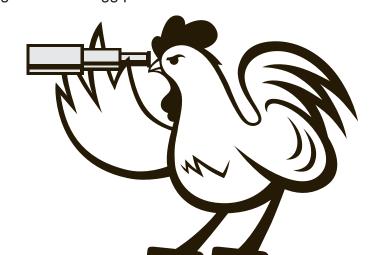
5. Know the Warning Signs of Infectious Bird Diseases.

Learn the warning signs of infectious bird diseases at **www.aphis.usda.gov/animalhealth/defendtheflock**. Look for sudden bird deaths and dramatic decreases in eating habits and egg production.

6. Report Sick Birds.

If your birds are sick or dying, don't wait. Call your local cooperative extension agent, your veterinarian, the State Veterinarian or State animal/poultry diagnostic laboratory, or USDA at 1-866-536-7593.

YOU ARE THE BEST PROTECTION YOUR BIRDS HAVE!





WORD SCRAMBLE #1

If you have chickens or other poultry, there are three things that you can do to help keep them healthy.

- 1. Look for signs of disease—check your birds every day.
- 2. **Report sick birds**—tell your parents, and they can call your veterinarian or the State veterinarian.
- 3. **Protect your birds** by using good hygiene, by keeping items around them such as water and cages clean, and by keeping people and other birds away from them.

Have fun unscrambling the words below. They have to do with poultry and with keeping your birds safe from disease, and **they are all found in the text above!**

1. teyahlh	
2. edseasi	
3. trpero	
4. youltrp	
5. coprtet	
6. dirsb	
7. gihyeen	
8. ncekihcs	
9. kolo	



WORD SCRAMBLE#2:

CHICKENS

FIND THE BREED Name

Can you untwist the breed names of these chickens, turkeys, and ducks? All of the names are listed below.

Araucana, Wyandotte,
Bourbon, Muscovy,
Brahma, Polish, Rhode
Island Red, White,
Sumatra, Narragansett,
Runner, Leghorn, Call,
Sultan, Pekin, Cochin,
Dominique, Black,
Bronze, Rouen

СП	ICKENS
1.	Tetwdonay
2.	Eohdr Dre Dnials
3.	Neglroh
4.	Alustn
5.	Phlios
	Hcinoc
7.	Ahmabr
8.	Atumsra
9.	Eoqdmniiu
10.	Nuaaraac
TU	RKEYS
1.	Nroubbo
2.	Ewtih
3.	Kabcl
4.	Ranatetgnasr
5.	Obrzne
DU	ICKS
1.	Nuero
2.	Lalc
3.	Npkie
	Vmsuyco
	Nunrer



ANSWERS • Word Scramble #1

- 1. healthy
- 2. disease
- 3. report
- 4. poultry
- 5. protect
- 6. birds
- 7. hygiene
- 8. chickens
- 9. look

ANSWERS • Word Scramble #2

CHICKENS

- 1. Wyandotte
- 2. Rhode Island Red
- 3. Leghorn
- 4. Sultan
- 5. Polish
- 6. Cochin
- 7. Brahma
- 8. Sumatra
- 9. Dominique
- 10. Araucana

TURKEYS

- 1. Bourbon
- 2. White
- 3. Black
- 4. Narragansett
- 5. Bronze

DUCKS

- 1. Rouen
- 2. Call
- 3. Pekin
- 4. Muscovy
- 5. Runner

Difficulty Level: EASY

Biosecurity Word Search

Keeping your birds healthy is a big responsibility. Make sure you and your family take proper steps to prevent the spread of germs.

- Wash your hands with soap and water before and after handling your birds.
- Change into clean clothes and shoes before entering the coop.
- Disinfect any poultry tools and equipment every time you use them.

Find the words listed below. Words may appear going up, down, across, diagonal, or even backwards.

WORD BANK	0	Р	Υ	T	Ι	R	U	С	Ε	S	0	Ι	В
Biosecurity	D	U	Р	Т	С	Ε	F	N	I	S	I	D	R
Bird Flu	U	N	Α	I	R	Α	N	I	R	Ε	Т	Е	V
Clean Water	J	14	^	_	11	^	14	_			•	_	V
Disinfect	I	R	Ε	Т	Α	W	N	Α	Ε	L	C	Υ	R
Germs	Υ	Υ	R	Т	L	U	0	Р	С	U	0	Н	Q
Healthy	'	'	11	'	_	O	O	•		O	O	''	Q
Poultry	R	0	D	Ε	N	Т	S	0	K	Z	S	Т	S
Rodents	W	Α	S	Н	Н	Α	N	D	S	Т	Α	L	G
Wash Hands	74	^	,	••		^	14	D	,	'		_	J
Veterinarian	U	L	F	D	R	Ι	В	Н	Μ	Ι	X	Α	V
	Н	Н	F	Ε	S	С	В	W	Т	С	Н	E	Q
	N	Υ	Υ	J	D	Χ	S	М	R	Е	G	Н	М



USDA

Difficulty Level: MEDIUM

Biosecurity Word Search

Biosecurity means doing everything you can to protect your birds from disease.

- Buy chicks and birds from a reputable, NPIP-certified hatchery.
- Separate new birds or birds that have been to a fair/exhibit from your other birds for 30 days.
- Do not share equipment with other poultry owners.
- Take measures to keep wild birds away from your flock.

Find the words listed below. Words may appear going up, down, across, diagonal, or even backwards.

W	0	R	D	B	ΑI	V	K

Biosecurity
Boot Covers
Contamination
Disease
Disinfectant
Fresh Litter
Good Habits
Health
Manure
Migration
Poultry
Quarantine
Rodents
Veterinarian

0	0	Т	Z	L	Χ	С	Υ	J	J	R	K	В	Т	Т	Z	W
Z	R	Ε	Т	Т	I	L	Н	S	Ε	R	F	Ι	Υ	G	K	N
F	K	K	W	D	I	S	E	Α	S	E	U	Z	C	0	E	Α
X	N	Z	Α	В	0	0	Т	C	0	V	Ε	R	S	0	N	I
C	0	N	Т	Α	М	I	N	Α	Т	I	0	N	C	D	I	R
D	I	W	U	Z	V	Ε	Т	0	М	J	М	V	W	Н	Т	Α
Α	Т	S	В	U	L	W	0	F	D	L	I	W	V	Α	N	N
Т	Α	G	L	S	R	0	D	Ε	N	Т	S	В	V	В	Α	Ι
D	R	X	Р	0	U	L	Т	R	Υ	X	Н	Υ	I	I	R	R
Н	G	D	I	S	I	N	F	Ε	C	Т	Α	N	Т	Т	Α	Ε
В	I	0	S	Ε	С	U	R	I	Т	Υ	V	U	L	S	U	Т
0	М	Υ	Ε	R	U	N	Α	М	Н	Ε	Α	L	Т	Н	Q	Ε
U	L	S	U	Z	S	J	Т	F	Х	K	Υ	Υ	С	Υ	J	V



Wild Fowl

GLOSSARY FOR REFERENCE ONLY, NOT PART OF GAME

EASY:

Biosecurity	Actions one can take to prevent the spread of disease in your birds
Comb	Red crest on top of a chicken's head
Coop	Small house for chickens
Disinfect	To clean and destroy bacteria
Flock	A group of birds living together
Migration	When birds move south in the fall
Predators	Animals who hunt birds for food
Quarantine	Separating new or sick birds from the rest of your flock
Rodents	Small furry pests that try to sneak into coops
Spurs	Sharp horns on the back of chicken's leg

MEDIUM:

Biosecurity	Measures taken to prevent the spread of disease within a flock
Broody	Behavior of a bird who wants to incubate eggs and care for chicks
Candling	Looking at the inside of an egg by shining a bright light through it
Disinfectant	A chemical used to destroy bacteria on surfaces
Exhibition	Event where poultry are displayed and judged on breed standards
FFA	Acronym for youth organization that promotes careers in agriculture
HPAI	Acronym for the official name of highly contagious bird flu
Incubator	Mechanical device used to hatch eggs
Layers	Chickens used for egg collection
Litter	Bedding on the floor of a coop
Manure	Animal droppings or feces
Migration	Seasonal movement of bird flocks
NPIP	Acronym for poultry breeder certification program
Outbreak	Sudden spread of contagious disease
Predator	An animal who hunts birds and other animals for food or sport
Pullet	Female chicken less than one year old
Quarantine	Separation of new birds from existing flocks to avoid spread of disease
Run	Fenced or enclosed outdoor space for your chickens
Salmonella	Disease that does not affect birds but can be easily spread to humans
Separation	Line of: a boundary around the poultry area



Difficulty Level: EASY

Biosecurity Crossword Puzzle

Biosecurity Comb Coop Disinfect Flock Migration Predators Quarantine Rodents Spurs

ACROSS

- 4. Actions one can take to prevent the spread of disease in your birds
- 6. Sharp horns on the back of chicken's leg
- 7. A group of birds living together
- 8. To clean and destroy bacteria
- 9. Small house for chickens

DOWN

- Separating new or sick birds from the rest of your flock
- 2. Animals who hunt birds for food
- 3. When birds move south in the fall
- 5. Small furry pests that try to sneak into coops
- 9. Red crest on top of a chicken's head



Difficulty Level: MEDIUM

Biosecurity Crossword Puzzle

WORD BANK

Biosecurity

Broody

Candling

Disinfectant

Exhibition

FFA

HPAI

Incubator

Layers

Litter

Manure

Migration

NPIP

Outbreak

Predator

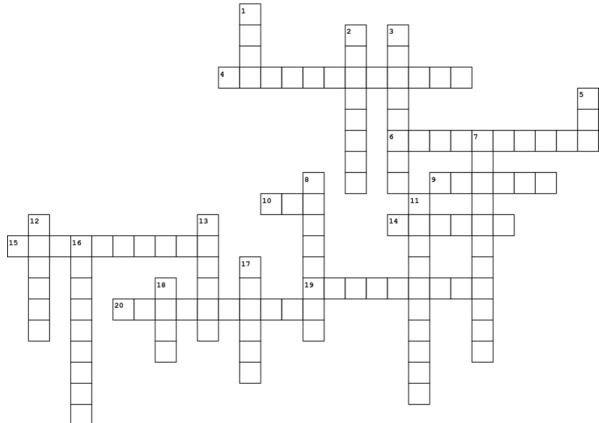
Pullet

Quarantine

Run

Salmonella

Separation



Across

- 4. A chemical used to destroy bacteria on surfaces
- Event where poultry are displayed and judged on breed standards
- Behavior of a bird who wants to incubate eggs and care for chicks
- 10. Acronym for youth organization that promotes careers in agriculture
- 14. Female chicken less than one year old
- 15. Disease that does not affect birds but can be easily spread to humans
- 19. Mechanical device used to hatch eggs
- 20. Line of _____: a boundary around the poultry area

Down

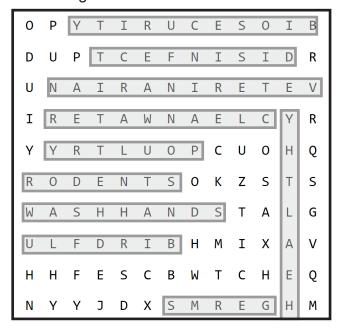
- Acronym for the official name of highly contagious
- An animal who hunts birds and other animals for food or sport
- Sudden spread of contagious disease
- Fenced or enclosed outdoor space for your chickens
- Measures taken to prevent the spread of disease within a flock
- Looking at the inside of an egg by shining a bright light through it
- 11. Separation of new birds from existing flocks to avoid spread of disease
- 12. Animal droppings or feces
- 13. Chickens used for egg collection
- 16. Seasonal movement of bird flocks
- 17. Bedding on the floor of a coop
- 18. Acronym for poultry breeder certification program



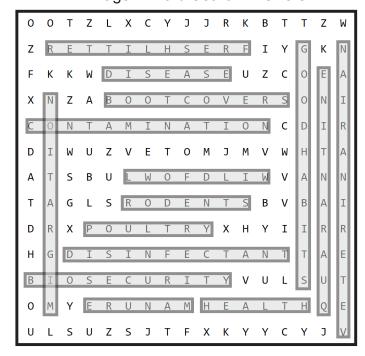


Answer Key for Word Search and Crossword Puzzles

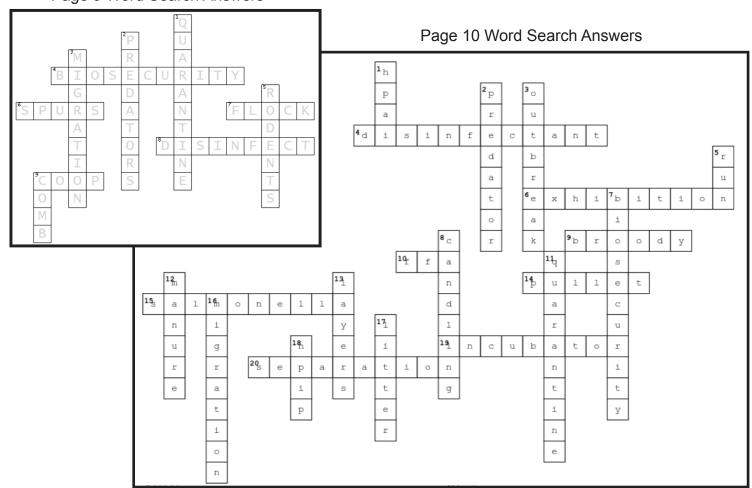
Page 6 Word Search Answers



Page 7 Word Search Answers



Page 9 Word Search Answers



Flock Facts: Test Your Knowledge Quiz

Circle TRUE or FALSE for each statement

1. When purchasing new birds, always look for breeders and hatcheries that are NPIP-certified.	TRUE	FALSE
2. As long as new birds appear healthy, they can be introduced to your flock without a quarantine period.	TRUE	FALSE
3. It is important to use boot covers or change into dedicated boots right before walking into the poultry area.		
	TRUE	FALSE
4. Purple discoloration on the comb and wattles of a bird is a symptom of illness.	TRUE	FALSE
5. Hugging and kissing birds does not spread disease to humans.	TRUE	FALSE
6. A "line of separation" is a barrier with the purpose of keeping germs and illness away from your flock.	TRUE	FALSE
7. Sharing any yard equipment with your neighbor can potentially introduce disease to your birds.	TRUE	FALSE



Flock Facts: Test Your Knowledge Quiz #1NSWER KEY:

- 1. **TRUE**. Starting out with healthy poultry is the best way to keep focks safe from disease. The NPIP, or National Poultry Improvement Plan, is a voluntary program that certifes that breeders regularly test their birds for some important poultry diseases. Only purchase or source poultry from NPIPcertifed breeders, hatcheries, and dealers. You can request a copy of the hatchery or source farm's biosecurity protocols.
- 2. **FALSE**. New birds can carry disease into a fock even if they show no outward signs of being sick. Always quarantine new birds for 30 days before adding them to an existing fock. Check for sneezing, coughing, runny nose, swollen eyes, mites, lice, and other health issues daily. After combining new birds with your existing fock, check original stock daily for any signs of illness. The stress of this change can cause an underlying illness to surface.
- 3. **TRUE**. Wear personal protective equipment or clothing and shoes that you only use when caring for your poultry. This includes boot covers or boots that can be disinfected. Change into fresh protective gear between poultry houses or coops. When you're done, remove and discard your protective gear. If using dedicated clothing and boots, change clothing and clean and disinfect your boots. Wash your hands thoroughly with soap and water. Wash and dry your dedicated clothing.
- 4. **TRUE**. Learn to recognize the signs of poultry disease. Discharge from eyes and nose or discoloration on comb and wattles can be signs of deadly poultry disease and need to be addressed immediately. Report any signs of illness your veterinarian or animal health officials right away.
- 5. **FALSE**. Snuggling birds, letting them roam free, or eating around them can transfer germs to you. Do not touch your face or mouth after handling birds until you properly wash your hands with soap and water.
- 6. **TRUE**. A line of separation is a functional line, separating the poultry house or enclosure (and the poultry inside) from exposure to potential disease sources. Define the boundaries for your poultry areas and include a place to change out of footwear and outer clothing before crossing the lineof separation.
- 7. **TRUE**. While sharing equipment can be helpful, all of it can spread disease. Do not share tools, poultry supplies, or lawn and garden equipment with other fock owners or neighbors. If you must, be sure toclean and disinfect the items before they reach your property and before returning them.

FLOCK FACTS: Test Your Knowledge Online Game



Scan the QR Code below with your phone to test your poultry biosecurity knowledge with an online version of the Flock Facts Game!

In the game, you travel around a poultry farm answering true or false questions on basic biosecurity principles.

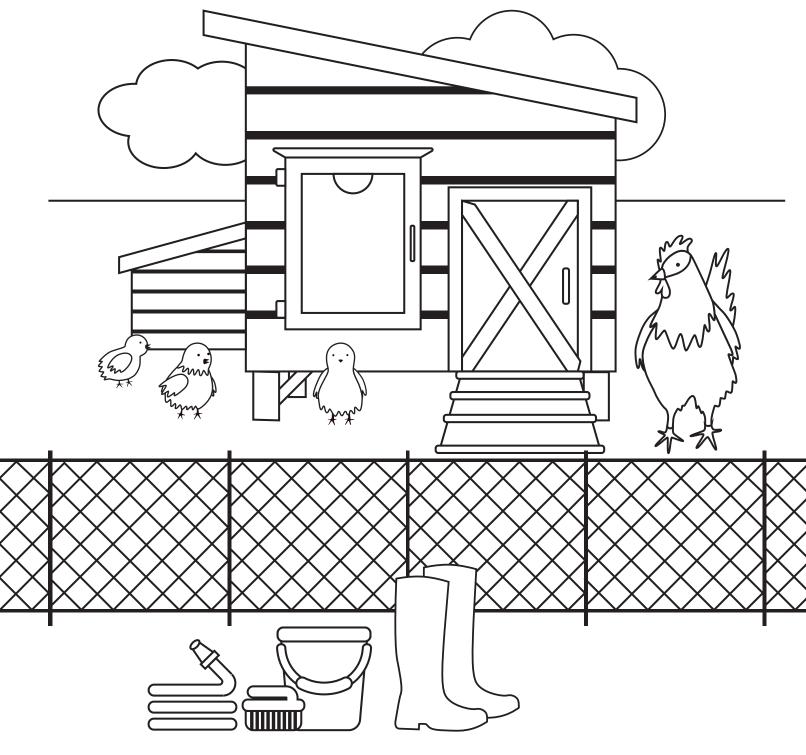
When you complete the game you will be able to download a completion certificate.

Good Luck!



Find the Online Flock Facts Game at bit.ly/DefendtheFlock-Youth!

Practicing Biosecurity with My Colorful Poultry





"Let's Keep Our Poultry Healthy Together"

BACKYARD BIOSECURITY SELF EVALUATION

A poultry flock owner should be able to check off every item on this list! **KEEP YOUR DISTANCE** □ I restrict visitor access to my property and my birds. ☐ My bird area is fenced in or has a barrier to keep visitors out. ☐ I prevent other bird owners from coming into contact with my birds. My birds are protected from contact with wild game birds and migratory fowl. **KEEP IT CLEAN** ☐ I properly clean and disinfect equipment that comes into contact with my birds. ☐ I change into clean clothes and shoes and wash my hands before entering my birds areas. ☐ I clean the cages and change my birds food and water daily. DO NOT HAUL DISEASE HOME After contact with other birds/bird owners, before returning home, I disinfect my vehicle tires, poultry cages and equipment. ☐ Birds that I took to the fair/exhibition are separated from the rest of the flock for at least two weeks after the event. New birds are isolated from my current flock for at least 30 days. DO NOT BORROW DISEASE FROM YOUR NEIGHBOR ☐ I do not share lawn and garden equipment, tools, or poultry supplies with my neighbors. When I borrow equipment form my neighbors, before I bring it onto my property I make sure to properly clean and disinfect the equipment. KNOW THE WARNING SIGNS OF INFECTIOUS BIRD DISEASE ☐ I can identify the warning signs of infectious bird diseases (such as Avian Influenza and Virulent Newcastle Disease). Symptoms can be: Sudden increase in bird deaths in my flock Purple discoloration of the wattles, ·Sneezing, gasping for air, coughing, and combs, and legs (AI) nasal discharge Tremors, dropping wings, circling, Watery and green diarrhea twisting of the head and neck, or Lack of energy and poor appetite lack of movement (vND) Drop in egg production

REPORT SICK BIRDS BY CALLING 1-866-536-7593

If you suspect that your birds might be showing symptoms of infectious bird disease, please call the above number or reach out to the Indiana State Poultry Association at 1-765-494-8517 or ispa@purdue.edu

•Swelling around the eyes, neck and head.







LOOK for Signs.

REPORT Sick Birds.

PROTECT Your Birds.





United States Department of AgricultureAnimal and Plant Health Inspection Service

For more information on Biosecurity or Poultry Health, visit the Indiana State Poultry Association's website at:

www.INPoultry.com

Indiana State Poultry Association
Purdue University, Animal Sciences
270 South Russell Street
West Lafayette, IN 47907

PH: 765-494-8517 EMAIL: ispa@purdue.edu

Find helpful information at www.aphis.usda.gov/animalhealth/defendtheflock