

4-H Poultry Showmanship Questions

- 1.* What is the function of the vent? Is it common to all poultry? (It is the uro-genital opening of the bird, the external portion of the cloaca. All poultry have one. It is where the egg, uric acid and feces all exit.)
- 2.* In order for a female to lay eggs, does she need the presence of a male? (No, only for fertile eggs to be produced.)
3. In what part of the hens reproductive tract is the shell produced ? (Uterus or shell gland)
4. What are the following? Pullet, Hen, Cockerel, Rooster, Capon? (Pullet is young female, hen is a female that has laid eggs for about 6 months, cockerel is a young male, rooster is mature male and capon is castrated male chicken.)
- 5.* What is the importance of calcium in the diets of laying hens? (Needed for the calcium of the egg shell.)
- 6.* What precautions must be taken when you introduce new birds into your home flock? (First check for disease, next quarantine for three weeks, and check for any symptoms.)
- 7.* What are the differences between the plumage of most adult male and female chickens (Male: long, sharp hackle feathers, saddle feathers and sickle feathers on tail. Female: short, blunt hackle feathers, no saddle feathers and no sickle feathers on tail.)
- 8.* Other than feathers, what other anatomical features are unique to the male chicken? (Larger comb and wattles, coloring, spurs)
9. What are the major external parasites of poultry? How do you perform a parasite check on chickens or poultry? (Lice and Mites, check vent, under wings, on skin under feathers by preen gland, general body area.)
10. If you found external parasites how should you treat them? (Use *Sevin* powder or liquid, dust or spray birds and dust nest boxes.)
- 11.*What are the two other names for the breast bone of chickens? (Sternum or Keel)
- 12.*How many eggs can a hen potentially lay in one year? (365, one a day.)
13. What nutrient do chickens and other poultry require each day? (Protein, carbohydrate, fat, minerals, vitamins, water, oxygen)
14. What are the most common feed ingredients used in poultry diets in the United States? (Corn and Soybean meal)

15. It has been said that eggs are an almost perfect food, however they are missing one vitamin, what is it? (Vitamin C)
- 16.*What does depth of body indicate? (Size of abdomen and ability to hold a forming egg)
- 17.*What does width of body indicate? (Size of body across the pelvic bones, room for egg)
- 18.*Why do we measure flexibility of the pubic bones? (To see if they will open enough for an egg to pass)
- 19.*Why does the judge ask to see the feet and legs of birds? (To check for deformities and disease and for parasites)
20. What does "molt" mean relative to chickens? (Lose feathers, reproduction stops, renews the bird for another reproduction cycle)
- 21.*Why should birds be removed from and replaced into cages head first? (Prevent possible wing damage, to maintain control)
- 22.*What is the function of the uropygial (preen) gland? (Produces an oily substance the bird wipes onto its feathers with its beak, for preening. In ducks and waterfowl it helps to waterproof their feathers.)
23. Which of the nutrients, other than oxygen, should poultry have free access to at all times? (Water)
- 24.* Do chickens ever have teeth? (Yes, egg tooth at hatch to help break through the shell)
- 25.*What does "dual purpose" mean relative to chickens? (Can be used for both meat and egg production, like Rhode Island Reds, New Hampshire's, White and Barred Plymouth Rocks, etc.)
- 26.*What does "bleaching" mean relative to chickens? (It refers to the order of loss of skin color in laying hens, particularly in Leghorn type birds, where the yellow pigment, xanthophyll, of the skin fades to white as the pigment is used to color the yolk. Order of bleaching: vent, eyering and ear lobes, beak bottom of feet, front of shanks, back of shanks, tops of toes, hock joints, when birds stop laying eggs they replace pigment in reverse order.)
27. Where does the yellow color of the skin, beak and shanks of chickens come from? (Xanthophyll from corn and grass they eat.)
- 28.*What color eggs do Rhode Island Red's, New Hampshire's and Sex Linked chickens lay? (Brown)
- 29.*What breed(s) of chicken lay(s) blue-green eggs? (Araucana and Ameraucana)

30. What needs to be supplied in an artificial incubator to hatch eggs? (Heat, Humidity and Turning)
31. How long is the incubation period for Chickens, Turkeys and Ducks and Geese? (21, 28, 28, 30-32, for muscovy it is 33-35 days.)
32. At what temperature should most chicken eggs be incubated? (100°F)
33. What is the purpose of turning eggs in an incubator? (Keep embryo from sticking to membranes and causing malformations of the embryo)
34. Why should incubators be "fumigated" or "Disinfected" prior to use? (To remove any bacteria, virus or mold organisms that might infect the eggs being hatched)
- 35.*How many eyelids does a chicken have? Why? (Three, upper, lower and nictating membrane which moves from the front to the rear of the eye and is clear.)
- 36.*How many feather tracts do chickens have? (10- head, neck, shoulder, wings, breast, back, abdomen, rump, thigh and legs)
- 37.*How many primary and secondary flight feathers do most chickens have? (10 primary and 14-18 secondary)
38. What and where are the covert feathers? (Small feathers on wing, fill in spaces.)
- 39.*What is the function of the comb and wattles on chickens? (Sex differentiation, Identification and thermoregulation)
- 40.*Where is the axial feather found and how many do chickens have? (on wings between primary and secondary flights, one on each wing.)
- 41.*For what disease must all birds going to shows out of state be tested for? (*Salmonella pullorum*).
42. How is *Salmonella pullorum* spread or transmitted? (Through the egg, either by organisms from the ovary or from shell contamination from contact with manure in the nest box.)
- 43.*What are basic signs of good health in chickens? (Alert, active, clear eyes, good manure consistency and free from external parasites)
44. How often should poultry flocks that are allowed access to outside for roaming or grazing be de-wormed? (As often as needed, but at least twice a year, spring and fall.)
45. For what disease of poultry should small flock owners be particularly aware of that can cause high mortality and be of great concern to commercial poultry growers? (Avian Influenza)

46. If you saw a lot of manure staining on the feathers just below the vent, what health related problem of your bird should you suspect? (Diarrhea)
47. Why is the problem described in # 45 of concern and how can it be treated? (Diarrhea can lead to de-hydration and possible death. One needs to re-hydrate the bird by providing electrolytes and water and then determine why the bird had diarrhea in the first place and treat that. A high load of worms, coccidiosis or bacterial infection of the gut can often lead to diarrhea)
48. Sometimes in breeding flocks feather loss is noticed on the lower back and the back of the head of some females. What is the cause of this? (When breeding, the males stand on the back of the females, and hold onto the feathers on the back of the head with their beak, causing loss of feathers in those areas.)
49. Many starter feeds for chickens are labeled as "Medicated". What is the medication and for what reason is it in the feed? (Amprolium or Coban (Monensin), and it is to help the bird build immunity to Coccidiosis, a protozoan disease of the digestive tract of birds. There are nine (9) different types of coccidiosis, so medicated feed is a good preventative measure.)
50. What is the main difference between Starter Feed, Grower Feed and Layer Feed for feeding chicks, pullets and laying hens? (Protein levels, Starter 18-19%CP, Grower 14-15% CP and Layer 16-17% CP.)
- 51.*What is the difference between a broiler, a roaster and a capon? (Broilers are young meat birds, usually processed at 6-8 weeks of age, roasters are usually 10-14 weeks of age and capons a castrated meat birds grown to about 18-20 weeks of age.)
52. What is bumble foot? (An infection in the foot pad of poultry, usually caused by *Staphylococcus aureus* from the manure.)
53. If upon checking the sternum of a chicken it is found to be crooked, what nutritional deficiency disease could be the cause? (Rickets, lack of calcium or phosphorous in the diet.)
54. If checking the legs of the bird one finds that the scales on the shank are all crusty and bumpy and swollen, what might be the problem? (Scaly leg mites.) How is it treated? (Dust with malathion or dip the legs in gasoline and then cover with petroleum jelly.)
- 55.*Where is the crop of chickens and what is its function? (The crop is an enlargement of the esophagus and it is located on the neck just above the junction with the body cavity. It holds the food the bird eats and slowly releases it to the rest of the digestive tract.)
56. What is the ratio of males to females that will provide the best fertility for a laying flock, without having more males than necessary? (about 1 male for every 10 females)
- 57.*How many nest boxes should be provided for a flock of laying hens? (Usually 1 for each 5 hens.)

58.*How can one tell if baby chicks under a brooder stove or light have the proper temperature? (They are spread evenly under the light, not all bunched up or all far away from the heat source, or all to one side or another, which indicates a draft)

59.*In general, what temperature should be provided for growing chicks? (about 95°F for the first week and drop by 5° per week until at ambient temperature)

60. How much floor space should be provided for standard and bantam adult laying hens reared on the floor? (About 1.5 - 2 sq. ft for standards and .75 to 1.5 sq. ft for bantams)

61. What is "Biosecurity" and why is it important for your flock of birds? (Biosecurity means preventing infectious or disease causing organisms and other pests, like insects, rodents, etc., from coming in contact with your birds. Keeping human traffic to a minimum, and not allowing contact with any sick birds, either directly or indirectly through. Keep a foot dip pan filled with disinfectant near the door to your coop and dip your shoes or boots prior to entering your facility. It will prevent disease transmission to your birds and is very important.)

62. What is the gizzard and what is its function? (The gizzard is also known as the ventriculus a part of the digestive system just behind the proventriculus, true stomach, and it is where the food is ground up by the chicken to aid in digestion and absorption.)

63. What is cannibalism and how can it be prevented or reduced in your flock? (The pecking of one bird by another and it can cause injury and/or death. Prevent by beak trimming, use of specs or decreasing the density of your flock.)

64. To keep a flock of laying hens producing eggs year round, what key environmental factor needs to be controlled and altered to meet the needs of the bird? (Light, maintain 16 hrs of light per day year round.)

65. What gaseous product can be produced in manure that can be harmful to chickens? (Ammonia)

66. How can you tell an adult male turkey from a female? (Beard and size of bird)

* signifies questions suitable for novice and clover showmen.