

2004 Senior Dairy Quiz Bowl Questions

Round 04

Phase B 5 Questions Correct answers are worth 10 points each.

Only the team being asked the questions is to be in the room. Each team will be asked these 5 questions. Answers are to be given by a team captain, but assistance may come from any team member. A question may be repeated only once. Answers must be started within 20 seconds. Partial credit may be given at the discretion of the judges. After one team has been questioned, the other team will enter the contest room and be asked the same 5 questions.

1. On DHIA milk production records, what does M.E. stand for?

ANS: Mature equivalent

2. Which age group of cattle on a dairy farm generally has the highest incidence of dystocia (calving difficulty)?

ANS: Heifers (when giving birth to their first calf)

3. When referring to the dairy industry, what does MUN stand for?

ANS: Milk Urea Nitrogen

4. What is the name of the disease in cattle that is the same as “Undulant Fever” in humans?

ANS: Brucellosis (or Bangs Disease)

5. What is the name of the process that breaks up the fat globules so that they are evenly distributed in the milk?

ANS: Homogenization

Phase C 20 Questions Correct answers are worth 15 points each.

Both teams are in the room for Phase C. The first contestant to signal will answer the question within 5 seconds after being acknowledged by the moderator. Failure to do so will cost that team 10 points. Any contestant answering a question without being acknowledged by the moderator will lose 10 points. If an answer is incorrect, members of the other team will have the opportunity to answer the question without having it reread except for true/false, either or and yes or no type questions. If an answer is given in these types of questions, the question will be replaced with a tie breaker question, and given to the other team. No points are deducted for giving an incorrect answer. Team members are not allowed to discuss the answers in this phase. No partial credit is available in Phase C, except for bonus questions. If neither team can offer an answer to the question within 10 seconds, the moderator will give the answer and the question will be dropped but neither team will forfeit points.

1. The disease “Rickets” in calves is due to a deficiency of:

- a) Vitamin A b) Vitamin D c) Vitamin E d) Vitamin C

ANS: b) Vitamin D

2. The condition in which a cow comes into heat every few days is called:

- a) cystic b) anestrus c) gestation

ANS: a) cystic

3. What term refers to practices that prevent the introduction or spread of disease on the farm?

- a) incubation b) pasteurization c) homogenization d) biosecurity

ANS : d) biosecurity

4. What are the three basic elements contained in carbohydrates?

- a) carbon, nitrogen, hydrogen b) carbon, nitrogen, oxygen c) carbon, hydrogen, oxygen

ANS: c) carbon, hydrogen, oxygen

5. Which of the following vitamins is water-soluble?

- a) Vitamin A b) Vitamin D c) niacin

ANS: c) niacin

6. The somatic cell count (SCC) in milk gives an indication of:

- a) a mastitis infection b) the mineral content c) the vitamin content
d) the protein content

ANS: a) a mastitis infection

7. Drought-stressed forages, especially following a rain, can be toxic to dairy animals due to high concentration of:

- a) nitrates b) protein c) calcium d) phosphorous

ANS: a) nitrates

8. DUMPS is an inherited condition which results in embryonic death. In which breed is it found?

- a) Jersey b) Guernsey c) Holstein

ANS: c) Holstein

9. Chromosomes are found in the nucleus of the cell. How many pairs of chromosomes do dairy cattle have?

- a) 10 b) 20 c) 30 d) 40

ANS: c) 30

10. On the Dairy Cow Unified Score Card, under what category is “Pasterns”?

ANS: Feet and Legs

11. Which of the following types of fiber is indigestible by the cow?

- a) cellulose b) hemicellulose c) lignin

ANS: c) lignin

12. What are the basic structural units of protein?

ANS: Amino acids

13. What are zoonotic diseases (or zoonoses)?

- a) diseases found only in zoos b) diseases that are transmitted between vertebrate

animals and humans

c) subclinical diseases

d) incurable diseases

ANS: b) diseases that are transmitted between vertebrate animals and humans

14. On a DHIA record, what does “days to first service mean”?

a) time from dry off to calving

b) days from calving until first breeding date

c) days from calving until conception

ANS: b) days from calving until first breeding date

15. What is the name of the condition that can exist in a cow after calving when an excessive amount of lymph fluid accumulates between the skin and the secretory tissue of the udder?

ANS: Udder edema

16. When should the newborn calf receive its first feeding of colostrum?

a) at 3 days of age

b) after the first day of life

c) as soon as possible, preferably within the first 30 minutes of life

ANS: c) as soon as possible, preferably within the first 30 minutes of life

17. Which of the following is not part of the cow’s digestive system?

a) rumen

b) small intestine

c) cervix

d) esophagus

ANS: c) cervix

18. Bypass protein refers to the part of feed protein that, in the cow’s rumen, is:

a) degraded

b) undegraded

c) fermented to volatile fatty acids

ANS: b) undegraded

19. When a baby calf has scours, not enough fluids are absorbed from the intestinal tract. What problem does this cause?

a) chelation

b) rumination

c) dehydration

ANS: c) dehydration

20. At what temperature should milk be held in the farm bulk tank?

a) 38 degrees F b) 48 degrees F c) 58 degrees F

ANS: a) 38 degrees F

Bonus Questions Each bonus question is worth 20 points.

Bonus questions may be earned in the toss-up round. To receive a bonus question, 3 different team members must correctly answer the toss-up questions. Bonus questions are not passed to the other team, nor are points deducted for an incomplete or incorrect answer to the question. Bonus question will be asked whenever 3 team members have answered toss-up questions correctly with the count kept individually for both teams within a match. Eligibility for bonus questions does not carry over to another match. The answers must come from the team captain but assistance can come from the other team members. Only the number or answers required by the bonus question will be accepted. Example: If the bonus has a four-part answer - the first four answers given by the team will be accepted. Answers to a bonus question must start within 20 seconds and be completed within 60 seconds.

1. True or False

The disease cryptosporidiosis in calves can be transmitted to humans.

ANS: True

2. How many 50 pound square bales are required to make 1 ton (2000 pounds) of hay?

ANS: 40

3. On a milking machine, if the milk to rest pulsation ratio is set at 65:35, what percent of the time is the inflation closed?

ANS: 35%