

2002 Senior Dairy Quiz Bowl Questions

Round 01

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. Name the 5 major dairy breeds.

ANS: Holstein, Jersey, Guernsey, Ayrshire, Brown Swiss

2. Which normally occurs first in a lactating dairy cow, peak milk production or peak feed intake?

ANS: Peak milk production

3. What buffering compound is routinely added to dairy rations to help prevent acidosis?

ANS: Sodium bicarbonate

4. Name the four fat-soluble vitamins:

ANS: A, D, E, K

5. You purchase one ton (2000 pounds) of dairy feed that contains 24% protein. How many pounds of protein did you buy?

ANS: 480 pounds

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. What is the name of the primary milk protein?

ANS: Casein

2. In humans, what mineral is associated with the prevention of osteoporosis?

ANS: Calcium

3. When a sperm cell with a Y chromosome fertilizes an egg, what sex will the offspring be?

ANS: Male

4. What is the term for the period when a cow carries a calf during pregnancy?

ANS: Gestation

5. Name the four compartments of a dairy cow's stomach.

ANS: Rumen, reticulum, omasum, abomasum

6. What is the name of the "milk let down hormone"?

ANS: Oxytocin

7. In the first month after calving, what happens to the body weight of a lactating dairy cow?

a) the cow gains weight b) the cow loses weight c) her weight remains the same

ANS: b) the cow loses weight

8. A deficiency of what mineral has been associated with retained placenta in cows and White Muscle Disease in calves?

a) copper b) iron c) selenium d) phosphorous

ANS: c) selenium

9. What is the name of the gland that produces oxytocin?

ANS: Pituitary gland

10. The “ring test” conducted on milk samples is a screening test for what cattle disease?

ANS: Brucellosis (also known as Bangs disease)

11. On the PDCA Dairy Cow Unified Score card, how many points are assigned to the udder category?

a) 10 b) 15 c) 20 d) 40

ANS: 40

12. What two breeds of dairy cattle originated on islands in the English Channel?

ANS: Guernsey and Jersey

13. When you measure the heart girth of a heifer with a special tape, what are you trying to estimate?

ANS: Body weight

14. What condition in cattle is usually caused by grazing lush alfalfa or clover?

ANS: Bloat

15. Which compartment of the dairy cow’s stomach is known as the “true stomach”?

ANS: Abomasum

16. What is the name of the milk producing cells in the mammary gland?

ANS: alveoli

17. On a milking system, what prevents the vacuum from going too high?

ANS: Vacuum regulator or controller (accept regulator or controller)

18. If a corn silage sample contains 33% dry matter, what percentage moisture does it contain?

ANS: 67%

19. Name the hormone produced by the ovary that makes cows come into heat.

ANS: Estrogen

20. In reference to feed analysis, what do the initials NPN stand for?

ANS: Non-protein nitrogen

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. How many 50 pound square bales are required to make one ton of hay?

ANS: 40

2. Compute your score using a 50 point maximum when the official placing is 1-4-3-2 with cuts of 2-3-6 and your placing is 1-3-4-2.

ANS: 47

3. “Hardware disease” can occur when a piece of wire or metal that the cow accidentally consumed punctures what part of the ruminant stomach?

ANS: Reticulum

4. When evaluating a sire summary, what do the letters PTA stand for?

ANS: Predicted Transmitting Ability

5. What is the name of the major respiratory disease in calves?

ANS: Pneumonia