

2015 Junior Dairy Quiz Bowl Questions

Round 05

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. FCM stands for “Fat-Corrected-Milk”. What does ECM stand for?

ANS: Energy-Corrected-Milk

2. Your heifer calf weighs 100 pounds at birth and 460 pounds at 180 days of age. Calculate your heifers’ average daily gain (ADG).

ANS: 2 pounds per day ADG

Calculation: 460 pounds minus 100 pounds birth weight = 360 pounds of gain;

360 pounds of gain divided by 180 days of age = 2.0 pounds per day ADG.

3. In reference to digestion and metabolism, which one of the following describes “heat increment”?

a) NEL b) the energy used up in the consumption, digestion and metabolism of a feed c) the total amount of energy in a feed determined by bomb calorimetry

ANS: b) the energy used up in the consumption, digestion and metabolism of a feed

4. Research has shown that by formulating lactating cow rations with proper amounts of certain amino acids, we can decrease the crude protein content of the ration and reduce which one of the following:

a) bloat b) acidosis c) metritis d) nitrogen excretion to the environment

ANS: d) nitrogen excretion to the environment

5. What is the average gestation period (in days) for a cow?

ANS: 280 days (accept 275 to 285 days)

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 process uses donor cows and recipient cattle?

ANS: embryo transfer

2. Which one of the following is an example of a mineral found in dairy cattle diets:

a) biotin b) niacin c) potassium d) nitrogen

ANS: c) potassium

3. Which of the following best describes the term “alveoli” in the udder of a dairy cow?

a) scar tissue b) a hormone c) keratin d) clusters of milk secreting cells

ANS: d) clusters of milk secreting cells

4. During nutrient metabolism, what is the term for a protein that acts as a catalyst in starting or speeding up certain chemical reactions?

ANS: enzyme

5. The official placing on a class of cows is 3-4-2-1 with cuts of 3-4-6. Your placing is 4-3-1-2. What is your score?

ANS: 41

6. In a high producing, early lactation dairy cow, what happens to her body weight when she enters a negative energy balance phase?

a) it increases b) it decreases c) it stays the same

ANS: b) it decreases

7. When a calf nurses milk, what is the function of the esophageal groove?

ANS: the esophageal groove diverts the milk so that it flows to the abomasum

8. What dairy product is being made when whey is recovered as a by-product?

ANS: Cheese

9. Which one of the following is the approximate percentage of solids in normal milk?

a) 20% b) 25% c) 13% d) 5%

ANS: c) 13%

10. What percentage of their mature weight should first lactation cows weigh?

a) 85% b) 75% c) 65% d) 55%

ANS: a) 85%

11. In a 4-H dairy cattle judging contest, how many minutes are allowed for you to present a set of oral reasons?

ANS: 2 minutes

12. Which one of the following is not a compartment of the cow's stomach?

a) omasum b) reticulum c) rumen d) colon

ANS: d) colon

13. Many dairy farmers enroll their herds in the DHI milk testing and record-keeping program. What does DHI stand for?

ANS: Dairy Herd Improvement

14. Fumonisin and Zearalenone are examples of:

a) viruses b) carbohydrate c) lipids d) mycotoxins

ANS: d) mycotoxins

15. Which one of the following is the name of the cow side test that uses a four-compartment paddle to test a sample of milk to identify cows with mastitis?

a) CMT test b) ELISA test c) DHI test d) Johnes test

ANS: a) CMT test

16. What do the letters BVD stand for in reference to dairy cattle?

ANS: Bovine Viral Diarrhea

17. What does the Standard Plate Count (SPC) measure in milk?

a) mycotoxins b) somatic cell count c) bacteria count

ANS: c) bacteria count

18. Cows are most susceptible to mastitis infection:

a) at freshening b) during the early dry period c) in late lactation

ANS: a) at freshening

19. Which of the following is the main thing that a judge looks for when judging a type show?

a) the animal's condition b) how she was clipped c) the animal's conformation

ANS: c) the animal's conformation

20. Ov-Synch, CIDR-PG, or Lutalyse are used in cows primarily for what reason?

a) mastitis treatment b) estrus synchronization c) heat detection

ANS: b) estrus synchronization

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. T/F

Because it is not organic in composition, sand is an excellent choice for bedding in free stalls.

ANS: True

2. What is the name of the waxy substance that is found in the teat duct (streak canal)?

ANS: Keratin

3. In reference to milk production records, what does “ME” stand for?

ANS: Mature Equivalent