Ideas for Dairy Cow Learning Activities

Advanced Level

Need more ideas for your dairy cow project? There are hundreds of things you can do! You are being asked to complete at least five activities each year. Use this list, the 4-H Dairy Cow Resource Handbook, and your imagination, and then write your ideas in your Dairy Cow Project and Record Book. Have fun!

- Help a new 4-H member select an animal for his or her dairy cow project.
- List at least five ways in which mastitis can be prevented or controlled.
- Using a model or a live animal, demonstrate how to properly administer an intramammary infusion.
- Demonstrate to younger members how to use a cow-side test to detect mastitis.
- Make a chart listing the symptoms and at least one method of prevention for the following reproductive diseases: brucellosis, vibriosis, IBR, and leptospirosis.
- Keep a biweekly record of the body condition score of your cow throughout her lactation. Describe any changes that you observe.
- Describe the difference between environmental and contagious mastitis and name at least two types of bacteria that are causes of each.
- Demonstrate how to determine forage quality.
- Using a computer ration-balancing program, develop a ration for a lactating cow.
- Develop a ration for a dry cow.
- Identify the essential vitamins in a dairy cow ration and describe the function of each.
- Calculate how much energy (Mcal) your cow is receiving in her ration.
- Collect at least three different feeds that can be classified as “by-product” feeds. Determine the use for each in the ration as a source of protein, vitamins, minerals, energy, or water.
- Explain to younger members how to read a pedigree.
- Explain what an estrus synchronization program is and describe two types of estrous synchronization programs that may be used for cows.
- Using a model or a live animal, demonstrate how to artificially inseminate a cow.
- List at least three advantages of using artificial insemination vs. natural breeding.
Define the following terms: Federal Milk Marketing Order, Class 1 Milk, Grade A Milk and Grade B Milk.

Keep a record of the milk prices you receive during the year. Make a graph of milk prices vs. time. Determine if milk price exhibits a seasonal pattern.

Collect labels from two types of teat dips. Compare the labels and the effectiveness of the active ingredients (effectiveness of teat dips can be obtained from the National Mastitis Council).

Develop a checklist that you can use to maintain milking equipment on your farm.

Describe the steps that can be taken to ensure the quality of the milk produced for the consumer.

Describe the following systems of dairying: confinement, management intensive grazing, and seasonal. Provide at least two advantages and disadvantages of each.

Describe a management intensive grazing system for a herd of 30 cows of your favorite breed. Specify the number and approximate size of grazing paddocks, length of the grazing season, and recommend a rotational pattern for the paddocks.

Hold a training session about dairy cow management for younger 4-H members.

Develop a sample budget for maintaining a milking herd of cows.

Explain why using management groups may be beneficial.

Select a type of manure management system for a herd of 300 milking cows and tell why you selected that system.

Describe the steps that can be taken to assure that your waste management techniques are environmentally sound.

Explain the importance of environmental assurance to younger members.

Prepare a skit demonstrating how to handle questions about dairy cow production from people who are not familiar with animal agriculture.

Help a new 4-H member with a dairy cow project prepare an animal for show.

Help younger members prepare for a dairy quiz or knowledge bowl.

Judge a class of four dairy cows and give oral reasons (explain your placings).

Help teach younger members to judge.

Help a new member update his or her records.

Demonstrate how to groom a dairy cow for show.

Participate in a dairy judging contest.

Send a thank you note to award donors and anyone who helped with your project (advisors, older members, parents, etc.).