

Texas Dairy Matters

Higher Education Supporting the Industry

PRODUCE MEAT AND MILK FREE OF ANTIBIOTICS

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An *antibiotic* is a substance or compound that kills bacteria or inhibits their growth. Penicillin, a common antibiotic, was first discovered in 1928. Other antibiotic discoveries have followed. The therapeutic usage in food animals began shortly after their discovery. Antibiotics are used both to treat and prevent diseases in food animals. Approximately 87% of all antibiotics used in animals are for treatment of disease.

Antibiotic usage is necessary to treat sick animals and to protect the food supply. Some antibiotics are used for treating mastitis. Whenever using an antibiotic to treat a cow, record the following information:

- Date
- Cow ID
- Diagnosis
- Treatment
- Withdrawal time for meat and milk

Records help a) identify new problems, b) assist the herd owner with determining what may be the cause of an illness or disorder, c) provide information to evaluate whether treatments are working, and d) track cows that need to be rechecked or withheld from the meat or milk supply.



What Are the Consequences of Residues in Meat or Milk?

At the slaughter plant a carcass that tests positive for antibiotics is condemned and discarded. If a milk tank tests positive for an antibiotic residue, the milk is discarded. Either way the producer does not get paid. The violation is reported to USDA or FDA. For meat residues, there is a

residue violator list posted on the web. Producers may lose their ability to sell milk or cows for beef, depending upon the number of violations and the antibiotics identified.

During 2009, over 99.9% of all milk tanker trucks were negative for antibiotics. On the meat side, the results aren't nearly as good. The total number of animals slaughtered was not reported by FSIS (Food Safety Inspection Service); however over half of the cattle found in violation during one week in 2010 were from dairy cows. In addition, veal calves had over a third of the animals on the positive residue list that week.

Reduce the Risk of Residues

When treating an animal, read and follow directions on the label or from the farm veterinarian. Record the treatment. If any antibiotics are used in treatments:

- Mark the cow,
- Follow discard protocols for milk, and
- Record MEAT withdrawal time. *Remember there are two "withdrawal" times -* one for milk and one for meat.

Communication is the key to preventing residues. Communicate to and between employees, owners, and veterinarians. Label all antibiotics properly. Store drugs properly in a clean, temperature controlled, locked location. Separate medications for lactating and non-lactating animals to reduce the chance of accidental residue violations. Maintain an accurate inventory.

Follow the directions for the amount of antibiotic to be used, the number of times to treat, and the amount of time between treatments. If a cow doesn't respond, follow farm policy developed with the herd veterinarian for further diagnosis or treatment.

For a detailed resource manual, including a complete list of FDA-approved drugs for use in lactating and non-lactating dairy cattle, visit the National Dairy FARM Program website at: http://www.nationaldairyfarm.com and click on the *Milk and Dairy Beef Residue Prevention Manual*.

Final Words on Antibiotics

What we all want is to produce a healthy, wholesome product. Our goals, when using medications, should include:

- a product, meat or milk, free of residues;
- preventing antimicrobial resistance; and
- meat that is free from injection sites which detract from beef quality.

http://texasdairymatters.org

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