



Lancashire-based cattle vet Debby Brown says that producers should keep an extra close eye on cows and calves because cases of Mycoplasma bovis infection are on the increase.

What can producers do to prevent an outbreak?

Mycoplasma bovis update

A recent and significant widespread outbreak of Mycoplasma in New Zealand is causing serious problems for Kiwi producers and a testing programme in underway to identify infected herds, which will be culled. The ultimate aim for the New Zealand dairy industry is to eradicate the disease.

Mycoplasma is thought to be present in around 70% of UK dairy herds and vets are seeing more outbreaks here. The key strain seen is Mycoplasma bovis. This bacterium can lie dormant in cattle, causing no signs of disease. But during times of stress, cattle shed the bacterium in milk and nasal secretions.

It causes symptoms similar to those caused by other respiratory diseases in calves, such as coughing and dullness (pneumonia). And, interestingly, it is the most common pathogen found in cattle with chronic and unresponsive pneumonia and fatal bronchopneumonia. It is also linked to inflammatory lung lesions. And it also causes mastitis, abortions and arthritis. Clinical signs to look out for in calves include a dry and hacking cough, low-grade fever, runny eyes, or ear droop. The latter is often the result of a painful ear infection. Calves will, of course, also go off their feed and exhibit the usual signs of lethargy and ill thrift.

The goods news is that, although it is found in healthy calves in infected herds, it's rarely found in healthy herds.

The mycoplasma organism produces a biofilm around itself to protect it from 'stress' and antibiotics. It has no cell wall and it is one of the smallest self-replicating organisms on the planet. Key advice for producers is to disinfect teats between feeds and make sure that colostrum feeding protocols are in place.



The encyclopaedia Mycoplasma bovis



Blood samples can be taken to check for antibodies to Mycoplasma bovis and nasal swabs can also be tested.

Prevention

Running a closed herd is preferable and test stock for the disease prior to purchase. Effective colostrum management in calves is vital and good calf house ventilation will also help to reduce the spread of the disease, as will removing

other stressors. In herds with a known mycoplasma problem, an autogenous (farm specific) vaccine can be extremely effective and is often well worth the investment. These will encourage calf growth rates and minimise lung lesions.

Treatment

Antibiotic treatment may help but veterinary advice should be sought. Giving animals antibiotics on a metaphylactic basis, to eliminate or minimise an expected outbreak of disease, could be one option on some units where mycoplasma has been found. But using antibiotics can be problematic in itself, as mycoplasma is becoming resistant to most of them.