FriarsMoor
Livestock Health

JUNE NEWSLETTER

CHARITY GOLF DAY - FRIDAY 3 JULY
SUPPORTING YELLOW WELLIES & LET'S FARM FOUNDATION
FOLKE GOLF CENTRE / BOOK ONLINE FMLH.CO.UK

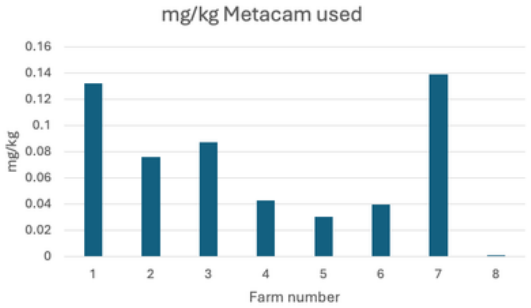
NSAID use in livestock: Applications in calves, heifers, mastitis and more

Article written by Helen Rogers MA, VetMB, MRCVS, DBR

As prey species, the expression of pain in livestock is a risky one, as it signals weakness to a predator. Why would you want to appear weak when surrounded by lions on the savannah?! Is this the reason that injured ruminants always lie with their affected leg under them? I am often laughed at when describing why behaviours in ruminants have developed, but this knowledge helps us understand why ruminants appear so stoical, even if they are in pain.

An indirect benefit of the industry focus on responsible use of antibiotics is that we have become much better at providing supportive care to livestock. NSAID use to provide pain relief and reduce inflammation, alongside fluid therapy to correct dehydration and encourage food intake are now the go-to treatments when faced with off colour ruminants. The dairy industry has embraced the use of both pain relief and fluid therapy, in part due to the ease of handling their cattle, but it is really encouraging to see the beef and sheep industry moving in the same direction.

Benchmarking use of antibiotics or pain relief within beef and sheep herds is very challenging, as we have to calculate the total average kg of bodyweight on farm throughout the year!As a starting point for benchmarking this data, we have looked at mg of active ingredient of NSAIDs used on some of our suckler cow farms, as a proportion of bodyweight on farm (estimated at the point at which this was at its highest).



The graph shows the range of usage

The graph shows the range of usage. In these suckler farms, the range of usage was influenced by factors such as an outbreak of pneumonia in weaned calves but also by the farmer's perception of what would benefit from the pain relief and anti-inflammatory properties of NSAID drugs.

There are many documented benefits to using pain relief in calves. For example, in cases of neonatal diarrhoea, a single dose of meloxicam has been shown to make calves more likely to consume their entire milk allowance, eat more starter food and gain more weight when compared to calves treated with only antibiotics (Todd et al., 2010). Similarly, in calves with bovine respiratory disease, the addition of NSAID alongside antibiotic treatment reduced lung lesions and increased average daily weight gain.

There is also some interesting work suggesting the benefit of providing pain relief to newborn calves, born with assistance. At our suckler cow benchmarking meeting we discussed this topic whilst comparing results of transfer of antibodies in colostrum to newborn calves. The farm with the best results has both an excellent policy around

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JOIN OUR COURSE WAITING LISTS

Email our farm office at **farmoffice@fmlh.co.uk** to join our waiting lists for the following courses, and be the first to hear when a date is released:

- Milksure | AI Course | Mastering Medicines
  Mastering Medicines: Smallholders
  Smallholders Lambing course 2027

fmlh.co.uk/events

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NSAID USE IN LIVESTOCK

colostrum harvesting and supplementation, but also treats any calves suspected of having a more difficult birth with a single dose of meloxicam. We have no proof to directly link the two, but it was a great illustration of how holistic broad thinking can benefit our livestock and how differently we now view pain within the industry.

In adult cattle, the use of pain relief has increased hugely within our clients at Friars Moor Livestock Health. It is no longer reserved just for severe cases such as toxic mastitis or a bad calving.Some of this uptake has been around treatment and prevention of lameness. There is some great work by Thomas (2015), showing that the combination of treating a lame cow with trimming, a block, and NSAIDs is significantly more effective than trimming alone. Thomas's 2016 paper illustrated the importance of providing this treatment promptly, as the effects were not significant in the chronically lame cow, albeit these cows should be provided with pain relief on welfare grounds.

Work illustrating how mobility improves through the use of pain relief is also really fascinating.A 10% improvement in 1st lactation heifer mobility was found if heifers were treated at the point of calving with ketoprofen for three days and at every lameness event thereafter (Wilson, 2022). Again, this work challenges our perceptions of pain and inflammation and makes us think more broadly about how we should use pain relief within our ruminants.

The increasing use of technology means that we are now capable of detecting painful conditions much earlier.Early detection allows us to use supportive treatments such as fluid therapy and pain relief at an early stage of the disease, whilst we determine what is wrong with the animal and whether further therapies are required. It will be really interesting to see how supportive therapies evolve over the next few years and the benefit this provides to our livestock.

ADOPT GRANT

EXPLORING GENE EXPRESSION AS A PRACTICAL TOOL FOR DAIRY HERD HEALTH

At Friars Moor Livestock Health, we're always looking for tools that genuinely add value on farm, not just in research settings, but in the real, day-to-day work of managing dairy herds. This year, we're part of a new Innovate UK ADOPT funded project asking a straightforward question: could gene expression data become a useful addition to practical herd health management?

The aim isn't to chase headline results. It's to understand whether this type of information can help identify pressure points earlier, and support better, more informed decision-making at farm level.

ABOUT THE ADOPT GRANT

This project is funded through the Innovate UK ADOPT programme, which supports farmer-led, on-farm trials of new technologies and management approaches. The scheme is open to farmers, growers and foresters across England, with additional support available for those new to Innovate UK funding. More information on eligibility and how to apply can be found on our blog.

UK Research and Innovation

Read full blog online

CALVING & CALF REARING COURSES — £105 +VAT

Calf Rearing Fundamentals
Friday 26th June | 10:30-3:30pm | Lunch Included
LOCATION: Hanford Farm, Blandford Forum, Dorset DT11 8HL

Calf Rearing Advanced
Friday 10th July | 10:30-3:30pm | Lunch Included
LOCATION: Longmoor Farm, Gillingham, Dorset SP8 5QW

Calving
Friday 24th July | 10:30-3:30pm | Lunch Included
LOCATION: West Stour, Shaftesbury Road, Dorset SP8 5SF

MINERAL DISCUSSIONS — £25 +VAT

Optimal Mineral Nutrition for Sheep Health
Tuesday 23rd June | 2-5pm
LOCATION: Countess Farm, c/o Stockport Farm, Amesbury SP4 7AS

Understanding mineral nutrition for growing cattle
Wednesday 24th June | 2-5pm
LOCATION: Sydling Estate, Upper Sydling, Dorchester DT2 9PH

Book online or contact the office for more details.

01258 472314 farmoffice@fmlh.co.uk friarsmoorlivestockhealth.co.uk