### Rochester Veterinary Practice



### **July 2021**



In this issue:

- **♦** Seasonal reminders
- Heifers with udder oedema (flag)
- Use metricure early
- ♦ Mastitis in heifers
- Pain relief in cows

#### Seasonal reminders:

- Cows should calve in a clean environment, so preparation of this area should start soon. Also make sure calf sheds are clean before the first batch arrives.
- Check dry cows each week for mastitis. Walk around them and look for swollen quarters. Any quarters that have mastitis should be treated as you would treat an infected quarter during lactation. Do **not** touch the other quarters unless they look suspicious.



Spray paint the leg that is lame if we are coming out to treat lame cows. Sometimes the cow that is very obviously lame walking along the track can mask that lameness once she is stirred up and on concrete.

# Heifers with udder oedema (flag)

Heifers with flag (fluid swelling in the udder and under the belly) are a nuisance as they are prone to mastitis and are difficult to milk out. The ligaments that support the udder may stretch permanently.

Several different factors cause udder oedema: -

- Salt retention by the heifer
- Pressure on the veins returning blood from the mammary gland by the calf
- Low protein levels in the blood as antibodies move from the heifer's blood to colostrum
- Heavy grain feeding (especially in heifers)
- Excess salt intake (sodium and potassium)
- Insufficient intake of calcium

Heifers with flag that have already calved can be treated with **Frusemide**, which is a diuretic that rapidly reduces the fluid swelling. A dose of oxytocin (Letdown) after calving will help as well.

Before calving the options for treating flag are: -

- Induce calving with a short-acting cortisone injection
- Milk affected heifers before calving
- Apply teat spray to heifers before calving. The glycerine will help with teat health and the disinfectant will help reduce mastitis. This is only practical if heifers are getting lead feed in the dairy.
- If your heifers are quiet and willing to stand at the lead feed trough, they can be teat sprayed

## **Rochester Veterinary Practice** §



### **July 2021**

with a long nozzle/wand on a garden sprayer.

 Add a calcium supplement such as limestone to the ration.

Heifers take longer to calve and lie down for longer periods during calving, so their udders are more likely to get contaminated with mud and manure. Older cows will boss heifers around and force them to calve in the worst area. For this reason, heifers should be calved in a separate paddock away from older cows if it is possible.

If you are thinking of inducing heifers to calve, we find that a short-acting cortisone, such as **Dexapent**, is a gentler option than **PG**. Heifers induced with **PG** are more likely to calve quickly but sometimes the cervix and birth canal do not dilate properly increasing the chance of tearing. Heifers induced with **Dexapent** are less likely to retain their afterbirth compared with heifers induced by **PG**.

### **Use Metricure early**

We know that treating cows with a Metricure when they have an infection in the uterus helps their fertility. If cows, with a discharge of pus from the cervix, are treated within 4 weeks of calving then their first-round conception rate is 48% compared with 22% in untreated cows.

#### Which cows to check?

- Cows with retained foetal membranes
- Stillbirth or a calf that dies within 24 hours of birth
- Twins
- Milk fever
- Discharge from vulva seen 7 days or more from calving
- Assisted calving

It is important to be hygienic when checking to see if cows have a

discharge from the cervix. If you use a gloved hand, make sure that you use disinfectant, and that the vulva is cleaned properly.

The best way to check to see if a cow has a pus discharge is to use a metricheck device. This is a thin metal tube that has a rubber cup like an inside out squash ball.



Ideally, you should aim to treat dirty cows within **2 weeks** of calving to get the maximum benefit.

In the large trial at Maffra, they found that when cows were treated with Metricure 6 weeks or more after calving that their fertility was worse than when they were left untreated.

Our thinking is that when cows have been calved this long the cervix is shut tight and all the extra fiddling around passing the pipette does more harm than the good of the antibiotic.

#### **Mastitis in heifers**

Cases of mastitis in heifers are very demoralizing and frustrating. The most common bug we see in heifers at calving is Strep uberis. Studies have shown that where there is one quarter infected with Strep uberis there is likely to be one other quarter that is affected sub-clinically.

It makes sense to treat heifer mastitis with injectable antibiotics (Tribactral or Penethaject) as well as tubes and anti-inflammatory drugs (Metacam or Ketoprofen).

#### Pain relief in cows

Because of evolutionary pressure cows do not readily show pain. Back when cows were hunted by predators any sign of weakness or injury would make them more vulnerable. Our understanding of the effect of pain in cows has progressed greatly over the last 10 years. A recent study compared lame cows that were either treated with an anti-inflammatory for 3 days or not treated.

The level of pain was assessed by squeezing the hoof with foot testers and measuring the reaction. As you would expect the level of pain was significantly reduced while the cow was being treated with an anti-inflammatory.

The interesting thing was that the level of pain was still much lower in the treated cows 30 days later. It seems that if the initial level of pain is high then the nerve pathways "remember" that pain for a long time afterwards - the sore foot was sensitised to feel more pain. So, while the anti-inflammatory was well and truly out of the system the effect was quite long lasting.

Vets in our practice have moved towards using more pain relief in procedures such as eye removals, caesareans and difficult calvings.

Anti-inflammatory treatments such as Ketoprofen are widely used to help cows with calving paralysis and down cows. This is particularly the case since Ketoprofen was registered with nil milk withhold.

It is our opinion that cows that have had difficult calvings and some lame cows will benefit from being given pain relief. It is likely that if a cow is in less pain immediately after calving, then she will be more likely to maintain her appetite.

A cow that is eating will be much less likely to develop secondary problems such as acetonemia and displaced stomachs. It will also increase her chance of producing well throughout the whole lactation and of getting back in calf.

A reasonable definition of a difficult calving would include any calving where a calving jack is required or where a calf is born dead because of a difficult birth or where there is damage to the soft tissue of the cow.