

Parasite control in dairy heifers

Rearing replacement dairy heifers is more than just raising calves, it is investing in the profitability of your herd. Attaining target weights at weaning and 1st mating is crucial for achieving maximum production when those animals enter the milking herd.

Good nutrition, disease management and parasite control all play important roles in maintaining the growth curve in young stock. Inattention to one of these areas can waste your hard work in the other two areas.

Parasite control should be getting simpler with today's scientific knowledge. Instead it is becoming more complicated. Intensive rearing/grazing practices have forced New Zealand farmers to rely on drench for parasite management. Because of their potency and convenience, the majority of drenches given to cattle are endectocides. After many years of this practice the emergence of drench-resistant parasites is becoming a serious concern.

Two parasites have emerged as the main species that have developed resistance to the endectocides. *Cooperia* spp is widespread, but *Trichostrongylus* resistance has also been reported.

Heavy *Cooperia* burdens are primarily a problem in young growing cattle, up to 15-18 months of age. Affected animals may have a 'pot bellied' look, dull coat lustre and slow growth rates. This results in a greater number of 'tail enders.' A common scenario is young stock that are drenched frequently yet they just don't seem to go ahead.

Where do high *Cooperia* burdens come from? *Cooperia* is the most difficult worm for the endectocide family of drenches (eprinomectin, moxidectin, ivermectin, abamectin, doramectin,) to kill. As a matter of fact, in New Zealand today it would be very difficult to find a strain of this parasite that is 100% susceptible to this otherwise potent family of drugs. Every time an endectocide is used in cattle some resistant *Cooperia* are left behind. These resistant parasites then breed and produce more resistant offspring. At the same time these drugs are highly effective against other species of worms, allowing the selective growth of the *Cooperia* population in the environment.

Fortunately levamisole, the active ingredient in clear drenches, has retained its high potency against *Cooperia*. The use of combination drenches containing levamisole such as the oral drench Arrest C, and now the pour-on Eclipse, are effective treatments against *Cooperia*, including those strains that are resistant to endectocides.

Treatment programmes for calves should include one of these products at least twice in the first 12 months of life. More and more New Zealand farmers are using combination drenches in their young stock. Calves start picking up infective worm larvae when they start nibbling grass. The first drench for calves should be 21 days after they show interest in the green stuff even if they are still being supplemented

with milk or grain feeds. Repeat drenching needs to be given at regular intervals after the first drench at 21 days. This interval is determined by the type of drench used.

An endectocide or endectocide combination such as Genesis pour-on or Eclipse, respectively, will allow drenching intervals of up to 6 weeks, An oral drench such as Arrest C, or Oxfen C should be given more frequently – at least 4 weekly.

Regular monitoring of weight gains using scales is a good indicator of calf health. Wormy cattle's growth rates will slow before showing any outward signs of being parasitized . Your vet is your animal health professional and their advise can be invaluable in getting the best from your investment in your replacement heifers.