

The Importance of Preventative Medicine and Uses of Data on Beef Farms - February 24

This month we are holding two beef benchmarking meetings and with the start of the calving season fast approaching it is a suitable time to highlight the importance of data collection on beef farms.

Disease cases and animal losses can easily be left unnoticed without consistent data recording. It is also difficult to highlight problem areas which may be significantly impacting on profitability and those areas which may require veterinary intervention. Two farms with very similar vet bills can be spending that money in completely different areas and as a result one farm will be more profitable through fewer animal losses, lower disease prevalence and higher growth rates. We will look at a real-world example of this below.

Collecting data allows us to form a baseline to monitor progress made within the herd year on year as well as benchmark farms against each other. Below is a table outlining various Key Performance Indicators (KPIs) with targets for each of them. Benchmarking allows you to compare your performance with other farms who operate in a comparable way to your own and so indicate possible areas for improvement or highlight areas that you can are currently performing well in.

Suckler herds

Key Performance Indicators		Performing well	Room to improve	Review performance
Age at first calving		23- 24.5months	24.5-30months	30-36months
Cows/heifers calved in first six weeks		85-70%	70-50%	50-35%
Herd replacement rate		14-16%	16-19%	19-22%
Calves alive 24 hours after birth		105-95%	95-85%	85-80%
Calves weaned		102-94%	94-84%	84-80%
Daily liveweight gain - Weaned calves		1.6-1.2kg/day	1.2-1kg/day	1-0.8kg/day
Herd efficiency		60-45%	45-35%	35-30%
Full economic cost of production	Per calf weaned	£600-650/hd	£650-800/hd	£800-1000/hd
	Per liveweight kilo of calves weaned	£2.00-2.25/kg	£2.25-3.00/kg	£3.00-4.00/kg

Pregnancy Scanning

Assessing the number of cows in calf is the best place to start with data collection. This information allows you to plan for the number of expected calves, duration of the calving window and can also highlight problem areas such a poor bull fertility or presence of diseases such as BVD which significantly reduce fertility.

COMPASSION RESPECT INTEGRITY SUSTAINABILITY PROGRESSION CARE

A poor PD positive % can be indicative of many problems including:

- · Sub fertile bull
- Infectious disease such as BVD
- · Poor nutritional management
- Trace element deficiency

Calving

This is already a busy period so it's important to focus on a few key areas for data collection. It is far better to only collect a couple of data parameters well than overcomplicating things and giving up halfway through the calving period.

Some key parameters to record:

- Stillbirths number of calves born dead. This can be indicative of important trace element deficiencies
- Number of assisted births any cows which required intervention at calving
- Number of calves lost in first 24 hours a good record of any losses, ideally with a cause of death if known, will highlight pinch points such as hygiene and colostrum management

Calving to Finishing

- Profitability on farm is driven by two main factors: calf losses and growth rates. It is important to break down calf losses into ages as this will help pinpoint specific issues
- Where possible it is also useful to record the reason for death e.g. naval ill, scour
- Tracking daily live weight gain provides a consistent metric for monitoring the development of your calves. All that's
 needed to calculate this metric is regular weights and the age of the calves at each of these weights
- It can be useful to link this metric to any changes in nutrition or treatments to see how they affect productivity
- The target for ADLWG is 1.2kg/day up to weaning with a target of 0.8kg/day from weaning to finishing

Case Study: The benefits of preventative medicine

How you utilise vet time can have a massive impact on the profitability of a farm through cattle health and efficiency. Below we have two farms that have a similar total yearly vet bill. However, one (Farm A) focuses on preventative measures and data collection including pregnancy scanning, mineral supplementation, and vaccination. The other (Farm B) doesn't routinely pregnancy scan, vaccinate or supplement the cows. This results in a stark contrast in the vet fee breakdown. Farm A has spent the same as Farm B but has a higher pregnancy rate, lower disease prevalence and fewer calf losses. These are both modelled on two actual clients with similar animal numbers, breeds, and systems.

Vet Cost Area	Farm A (Preventative)	Farm B (Non- preventative)	
Pain Relief	£135	£175	
Cow Health (Sick cow visits, calvings, surgery, etc.)	£600	£1,750	
Visits	£190	£770	
Fertility (include hormones)	£1,440	£70	
Antibiotics	£140	£840	
Vaccines	£850	£0	
Vitamin/Mineral Supplements	£810	£20	
Other	£335	£875	
Total	£4 500	£4 650	

As you can see Farm A is spending far less on vet visits and emergency vet work. They also perform noticeably better on the KPIs we have discussed above resulting in a more health and productive herd that finishes animals quicker, are forced to cull fewer cows and have a much lower disease prevalence.

It is easy to feel overwhelmed by the amount of data which can be collected and the massive number of metrics that can be calculated. However, starting with a few parameters this year and making one or two management changes on the back of them can lead to a significant improvement in the health and productivity of your herd.

Best wishes.

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