DAIRY HERD HEALTH
& PRODUCTIVITY SERVICE

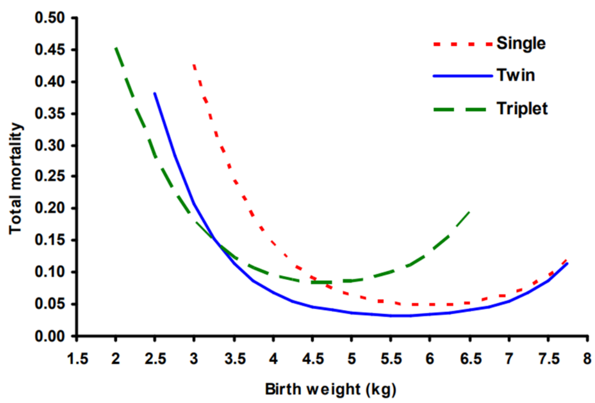
# Newsletter 2026, Q1 Feb 2026

## Focus on Pre-Lambing Sheep Nutrition

### Energy Balance

70% of lamb growth occurs in the last 6 weeks of gestation, therefore the plane of nutrition in late pregnancy has a major influence on lamb birth weight, lamb vigor and survival, ewe colostrum production and lamb mortality. All of the above listed factors have an effect on the number of lambs reared. Therefore, ensuring that the ewe receives appropriate nutrition pre-lambing is one of the key factors affecting subsequent lamb performance for the rest of the year and thus flock profitability.

### Relationship between lamb birth weight and mortality




Hanrahan and Keady (2013) *Adv. Anim. Biosci.* ***4***, *7*

Research work has shown that the likelihood of lamb mortality increases with lighter lamb birth weights. Lamb survival drops sharply with birthweights below 4 kg, with optimal lamb birth weight being in the region of 4.5kg to 5.5kg. Note that optimal lamb birth weight varies depending on breed and litter size.

One of the many challenges is that energy requirements in the ewe in late pregnancy are at a high point, whilst intake capacity in the ewe is often at its lowest.

### Concentrate Feeding Level

Four key factors that will determine the quantity of concentrates that should be fed to ewes in the run up to lambing:

- The number of lambs the ewe is carrying
- Stage of pregnancy – number of weeks before lambing
- Body condition score of the ewe
- Quality of the forage being fed

The table below shows a traditional step feeding plan for concentrates over the last eight weeks pre-lambing for a 70kg lowland ewe in BCS 3.

| Weeks before lambing | 8 | 6 | 4 | 2 | 1 |
|---|---|---|---|---|---|
| Silage (11MJ/Kg DM) 18% CP compound (kg/day) | | | | | |
| Triplets | 0 | 0.2 | 0.4 | 0.6 | 0.8 |
| Twins | 0 | 0 | 0.3 | 0.4 | 0.6 |
| Singles | 0 | 0 | 0 | 0.2 | 0.2 |

(EBLEX SHEEP BRP Manual 12)

Other management factors to consider are adequate trough space and water supply. It is vital that all ewes get access to their fair share of the forage and concentrates. A general guide for concentrate trough space is 45cm per head for a 70kg ewe (and 15cm per head for forage), with these values increasing as ewe size and weight increases. In late pregnancy, a ewe can consume up to 6 litres of water per day, especially when high levels of concentrates are being consumed. Water requirements increase further when lactation commences. Water should be made available at all times, and water troughs should be checked regularly to make sure that they are not contaminated or frozen.

*It is worth remembering energy requirements in lactating ewes are high and so concentrate feeding should be continued if grazing until the grass sward height is over 4cm high.*

With spring lambing on the not-so-distant horizon, it will not be long until the DHHPS start receiving blood samples for metabolic profiling from ewes in late pregnancy. The ideal time to test is 2-3 weeks before lambing, sampling 15-20 ewes. For further advice on Pre-Lambing Blood Testing, do not hesitate to contact the DHHPS office.

**RoMS accredited mobility scoring course**
We will be running a RoMS mobility scoring course on Thursday 14th May at Langhill Farm, Roslin, Midlothian, EH25 9ST. Please get in touch with the DHHPS office if you would like to attend.

## Extended colostrum feeding for calves

The benefits of colostrum feeding to newborn calves are well understood, and most cattle (and sheep) farmers understand the 5 "Q"s of colostrum management (Quality, Quantity, Quickly, Quietly, sQueaky clean). The aim is to get sufficient amounts of high quality colostrum into calves and lambs as quickly as possible after birth. This means that the newborn animal will absorb sufficient antibodies into the bloodstream before gut closure.

However could feeding colostrum after the first 24 hours of life also be beneficial in dairy calves? After all, this is what happens in beef calves and lambs, which continue to suckle their mother, even though colostrum quality reduces in the first week after birth.

There are a range of potential benefits to extended colostrum feeding, even though the lower levels of antibodies will not be absorbed into the circulation of the calf. The antibodies will provide a local effect in the gut, which will help to reduce infectious diseases such as diarrhoea. It is worth noting that vaccinating cows in late pregnancy to boost antibodies in the colostrum to help prevent diarrhoea in calves caused by rotavirus, coronavirus and cryptosporidium state that feeding transition milk for the first 5 – 14 days of life is necessary for best protection.

Colostrum is also about more than just antibodies. It contains a number of other compounds such as lactoferrin and IGF-1, that are not present in normal milk. Such compounds have been shown to promote gut health and development in calves, improve daily liveweight gain, and reduce calf treatments and deaths (from both diarrhoea and respiratory disease). Overall there is now a considerable body of research evidence showing the benefits of feeding colostrum or transition milk to calves after the first day of life.

One of the biggest issues is the practicalities of feeding transition milk or surplus colostrum. There are a number of approaches to doing this:

- Feeding surplus "true" colostrum from the first milking after calving, mixed in with whole milk or milk replacer feeding.
- Feeding transition milk to calves, which is milk from milkings 2 – 6 after calving. Although this milk is not saleable, this is not the same as waste milk from cows with mastitis or under treatment, which must **not** be fed to calves.
- Feeding artificial colostrum powders to "fortify" whole milk or replacer, but the colostrum content (assessed via IgG) is variable between the different commercial products.

The most common question is: how long do you feed transition milk for? The research on this is not complete, mainly because most of the trial data has used different timings. To some extent, this is determined by how much surplus colostrum and/or transition milk is available, and how many calves need to be fed. The minimum is 5 days (especially when using calf diarrhoea vaccines) - but ideally the longer, the better……

There are some key points worth considering when undertaking such an approach:

- First priority is to get enough colostrum into newborn calves. Extended feeding is secondary.
- Pooled transition milk will be very variable in quality, depending on what milking after calving it has been taken from, and how many cows contribute to the pool. Always test transition milk using a Brix refractometer.
- Transition milk must be stored correctly (4°C for 2-3 days; or frozen at -20°C) to prevent bacterial multiplication. The other option is to feed the transition milk immediately.
- Target the youngest calves for feeding transition milk to, especially if there is not enough surplus colostrum available.
- Transition milk can be a major risk for the transmission of diseases such as *Mycoplasma bovis* and Johne's Disease. Pasteurisation at 60°C for 60 minutes will reduce but **not** eliminate these risks. Always discuss the protocol with your vet prior to extended colostrum feeding.