

forage watch

with Micron Bio-systems

Over the coming months we will be speaking to two farmers about their forage systems in a new Forage Watch series. Here we meet the farmers to find out what preparations they are making for this year's forage crops.



Steven Jones says this year will be more difficult than last year, but making top quality forage is key to maintaining high yields.

Increase in milk production down to silage

As the manager of Bridgwater College's 154-hectare (380-acre) Somerset farm, our Forage Watch farmer Steve Jones, strives to keep his unit in the UK's top 10 per cent for the key performance parameters.

Making outstanding forage is a cornerstone of this policy, and he attributes much of the 240-head college herd's increase in milk production to a focus on forage quality. And while the herd now produces in excess of 10,000 litres at 4.1 per cent fat and 3.3 per cent protein on two-times-a-day milking, it does so alongside excellent fertility (predicted calving index of 368 days and a

replacement rate of 15 per cent) and little if any metabolic disease.

Also citing accuracy and consistency of rationing as essential in achieving these goals, he says: "We weigh every ingredient and when we had a problem with our scales and were forced to estimate weights for the dry cow ration for a few days, we had our only two cases of milk fever in the past 10 months."

Forage production is undertaken with similar precision, and the farm's policy is to seed 81ha (200 acres) of Italian rye-grass with red clover after wheat or maize every autumn, and to take the first cut of silage from it in mid- to late-April. A total of six cuts will be taken during that season, with a

seventh cut the following spring, before ploughing up for maize.

"This year will definitely be more difficult," admits Mr Jones. "We only managed to seed 100 acres of Italian rye-grass last autumn, so we aim to put in a further 60 acres this April."

"Some of the autumn-sown crop that's on our lighter land is probably as forward as a normal year," he adds. "But some is on heavy clay and has been under water for most of the winter and may not recover."

About 32ha (80 acres) of long-term perennial rye-grass leys also feature on the farm. Three quarters will be reseeded this spring.

"We'll be land-draining the area in consultation with Natural Eng-

land," he says. "And will only be permitted to do so if it's returned to permanent pasture."

With Italian and perennial ryegrasses, as well as wholecrop wheat and maize all contributing to the preserved forage mix, crop-specific inoculants are used to give the best chance of success.

"We've used an inoculant for wholecrop, grass and maize for the past three years," says Mr Jones. "And we've found it gives us good fermentation and higher levels of sugar – apparently breaking down the lignin well in whatever crop we've ensiled."

"This has made the silages highly digestible and intakes have been high – in fact higher than specified in the diet formulation."

Expert's view

By Richard Rolfe,
Newbreed UK



EARLY planning can help ensure the success of any crop, and first cut silage in around a month's time is no exception to this principle.

Now is the time to focus your attention on your silage fields, which should be walked now if you have not already done so. This means any problems can be identified and dealt with such as molehills, stones and holes, all of which can hamper harvesting and lead to silage contamination.

Swards should be assessed for their perennial rye-grass content and if this is lower than 50 per cent, a reseed should be considered. Broad leaved weeds may also need chemical control if they represent more than 5 per cent of the sward.

Inspecting

While in the fields, it is worth inspecting gateways as filling them with hardcore could prevent soil sticking to tractor tyres, which can be a source of contamination back at the pit.

Repairs to clamps should not be left until the last minute and they should also be thoroughly cleaned, from top to bottom, leaving no trace of rotting or mouldy silage from the previous season.

Ensuring you have enough consumables in stock is also

important and these should include enough silage sheets to fully overlap the side walls and top of the pit and enough tyres or sand-filled bags to properly weigh down sheets. It is also worth considering a vacuum film beneath the black sheet for optimal results.

Other consumables should be ordered well ahead including a well-proven additive to maximise silage performance. Even in perfect harvesting conditions, the use of an inoculant containing bacteria and enzymes can lead to significant improvements in silage quality.

Feed value

Check your product meets these requirements to maximise the feed value and stability of your forage.

Aim to cut a week earlier than normal, as by mentally preparing for an early cut you will have more flexibility as the season progresses. This can make the difference between finishing with a full clamp of quality silage or not which, in turn, is central to dairy herd health and performance.



Supplier of Advance silage inoculants

Preparations under way for this year's forage

When you expect your herd to yield more than 11,000kg at 4.6 per cent fat and 3.2 per cent protein on twice-a-day milking and your total mixed ration to provide maintenance plus 35 litres, there is no doubt the quality of its ingredients has to be of the highest order.

This requirement from our Cumbrian Forage Watch farmer Stephen Boow, drives his desire to make the highest quality grass and wholecrop silage, which, in turn, fuels the all-round excellence – in terms of health, fertility and overall performance – of his family's renowned, 130-head Dunnerdale herd.

"Milk yields can only be maintained with a high quality and consistent diet," says Mr Boow, "and we always see a drop in production if we move from a good to a poorer forage or from silage to grazed grass."

For this reason, the entire herd except youngstock is

housed throughout the year, giving complete control over the ration, while silage is made to the strictest possible protocols with the aim of achieving a dry matter of at least 30 per cent.

An inoculant is considered an essential part of this process, and Mr Boow says this helps to achieve outstanding preservation of the high dry matter product.

"We used it last year for the first time," says Mr Boow. "And we found that intakes were high and it was much more stable in the clamp than anything we'd tried before."

Preparations so far this year on the 117 hectares (290 acres) of owned and rented at Corney Hall, in Bootle, near Millom, are well under way, with 100kg/acre of a 27:5:5 bagged fertiliser which also includes sulphur having been applied to silage ground in late February.

Another application before the end of March following up to 33,700 litres/ha (3,000 gallons/acre) of slurry should see



Stephen Boow says silage is made to strict protocols to ensure quality.

grass sufficiently advanced for an early May first cut which Mr Boow says is an important target to meet if the farm is to bring in the planned four cuts.

With first and second cuts layered in the clamp and fed to the milking herd, this will be used up by the end of April, so emptying the clamp ready for this year's first cut.

The third cut is clamped separately and used for the milking

herd during the summer, while any fourth cut is baled for youngstock and dry cows.

"For the first time we have also gone over all silage ground with an aerator this year as we felt it had become compacted after so much wet weather and after winter grazing with sheep."

The forage complement is rounded off with wholecrop spring barley which is bagged and used in the TMR.

FEEDBACK ONLINE

Read more and share your experiences at www.farmersguardian.com/foragewatch

Advance silage inoculants are formulated for individual crops. They contain two strains of lactic acid bacteria to drive the fermentation of ensiled crops from start to finish. An acetic acid forming bacteria inhibits yeast and mould growth when exposed to air to reduce waste and aid stability at feed-out. The addition a proprietary enzyme package delivers digestibility and energy improvements, and the inclusion of a novel microbial stimulant pack ensures maximum activity of bacteria once rehydrated. For more information on Advance silage additives, visit the Micron Bio-systems website - www.micronbio-systems.co.uk - or call 01278 427 272.