Breeding robust cows for grazing system

Breeding cows that are suited to not only the topography of his unit but also his organic management system is key to the success of Gloucestershire-based producer Rob Richmond's herd.

TEXT RACHAEL PORTER

un on a true Kiwi-style system – with cows outside all year round and fed on grazed grass and conserved forage – milk quality is also important to the business of Rob Richmond because a proportion of it is processed into two local handmade cheeses. Rob manages a herd of 250 milkers at Chedworth, on a split calving system. Around 180 cows calve in spring block and the remaining 80 in an autumn block. "This makes for easier management of the herd and the grazing platform, and ensures a year round supply of milk," says Rob. "This suits us and our set up – and our milk buyer," he says, adding that cheese is made, on farm, by David Jowett, who owns and runs King Stone Dairy. OMSCo buys the rest.

"Back in 2011, we were milking 200 cows that calved in one autumn block. But our facilities were well past their sell-by date and we decided to invest in a new milking parlour – as well as move to a spring calving block," explains Rob.

Challenging conditions

The switch to spring calving was made in 2013, the new parlour was built in the centre of the unit in 2016, to help improve access to grazing, and cow numbers increased to 300 head in 2018. A combination of two difficult years – milk and feed price ratios were unfavourable – saw Rob focus on maximising milk production from grass. And he reduced milking numbers back down to 250 in

Next generation: young stock from the Chedworth-based herd



Sires recently used

- Fleckvieh: Mungo, Walk and Varta
- NZ CRV Ambreed: Deluca, Philosopher, Maelstrom, Stravaganza
- Red-and-white Holstein: Anreli

autumn 2019. "We want to produce milk from grazed grass and forage – that's where the margins are."

Situated 240 metres above sea level, on limestone land, Rob says that the farm's soil was pretty poor when he took on the management of the tenancy 16 years ago. "It's free draining and can still be pretty challenging when conditions are dry. But we've worked really hard to improve soil organic matter. "It was at around 3% and it's above 10% now that's between 150mm and 200mm of good top soil, compared to between 50mm and 75mm back in 2004. That's certainly helped to ensure that we have plenty of grazing to support the herd throughout the

Rob is a Nuffield scholar and studied methods of improving soil organic matter levels, so he was and is well-placed to make improvements at his unit.

Grazing cows

Breeding cows that can graze and eat plenty of forage is key to the success of the business as cows are outside all year round and concentrate feeding is kept to a minimum. Most, if not all, the herd's current 4,000-litre average, at 4.0% butterfat and 3.3% protein, is produced from forage. He says it should be closer to 4,500 litres and that average will increase this year - he's optimised the stocking rate and should be in a better place to exploit grass growth this coming season.

The herd was predominantly Friesian when he first came to the farm, but had been bred to Holstein sires for five years prior to Rob's arrival. "But I quickly realised that the resulting daughters were not best suited to the farm or our management system. We had issues with somatic cell counts and we also decided to make the switch to a purely grass-based system. A cross-bred cow offered improved health and fertility traits – and plenty of capacity and good feet and legs for grazing."

Three-way cross

"Initially I began using British Friesian and Shorthorn sires on the Holsteins. And then six years ago we began using the CRV Ambreed bulls," says Rob, who's been using New Zealand CRV Ambreed sires for the past six years and only began using Fleckvieh sires on his herd three years ago.

Red-and-white Holstein sire Anreli scores high for efficiency and he's also good on health traits. "That's why I've also used so much of him on the herd," says Rob. "Using a mixture of Holstein, Friesian and Fleckvieh bloodlines on top has resulted



in the robust and productive cows that we're milking today."

Rob first 'dabbled' with Fleckvieh sires in 2017 and now has cross-bred heifers that are about to calve this spring and join the milking herd. He says he'll put these Fleckvieh crosses to an Ambreed Friesian sire and then cross again with a red-and-white Holstein, to produce a three-way cross.

The red-and-white Holsteins offer medium stature, as well as milk yield and efficiency. "I've used a lot of Anreli on the herd because he's produced the goods. His daughters are what I'm looking for and I'll be using him as a cross for a good while yet." The New Zealand CRV Ambreed sires he uses also give Rob's herd stature and the square-set shape he's looking for, with efficiency and health. "They give balance - good all-round, medium-sized cows. A mower with plenty of capacity – they can eat a lot of grass and forage.

"I've used Anreli on Shorthorn crosses, Fleckvieh on the bigger black-and-white, and Ambreed sires on the 'middle-sized' cows. The plan, now, is to put the Fleckvieh crosses to Ambreed Friesians to keep the size of the cows where we want it to be," he adds.

Sire selection

When selecting sires, he looks at CRV's health and efficiency scores: "And then I whittle them down from there, by looking at type, fertility and milk. Milk is on the list, but it's never at the top. Breeding robust cows that thrive in our system is a priority. That means a medium-sized cow with plenty of capacity, good fertility and health and a low somatic cell count. "These will be more robust cows and produce milk easily on our forage-based system. And the milk they produce will also have the constituents that our cheese-making milk buyer needs." His grassland platform, of 100 hectares, comprises herbal leys and these are rotationally grazed. "As we dry off the autumn calvers and they leave the grazing platform, there's typically enough grass

cover for good milk production from the spring

calvers before they're dried off." |

Kiwi-style system: cows are bred for grazing and producing milk from forage