

in this issue...

- Mycoplasma in the UK and NZ
- **Introducing Figured software**
- Latest learnings from the US
- **Farm borrowing and what the future may hold**



Mycoplasma in the UK and NZ



Duncan Williams duncan.williams@kiteconsulting.com

The disease

Mycoplasma bovis is a tiny bacterium that can cause mastitis, metritis, pneumonia, drooped ears and lameness in dairy cattle. While this bacterium has existed for more than 100 years, it is only recently being recognised as a major issue on farms. There has been a steady rise in the frequency and severity of disease associated with *M. bovis* in the last ten years. *M. bovis* is a highly contagious disease that can have serious economic effects on a dairy farm due to decreased milk production, additional veterinary and treatment costs, culling of cows and calf losses. All dairy animals can be infected, including calves, heifers and adult cows.

The UK position

M. bovis can be found on 25-50% of UK dairy farms and is estimated to cost the dairy industry up to £15 million per year. Unfortunately, once infection is established on a farm, it is almost impossible to eradicate without complete depopulation. The USA often try, with large scale, individual cow test-and-cull programmes set up to minimise the impact of the disease. The strains found in the UK tend to be milder, so instead of aiming for eradication, it is sensible to take some basic preventative measures:

- Have a tight culling programme: By keeping the herd free from on-going sick cattle with lower immunity you minimise the pool of infection present on farm.
- Minimise respiratory pressure: Improving the defenses of the airways by dropping ammonia and dust levels to give lungs a better chance to fight off infection.
- Eradicate easier diseases: BVD and Johne's play havoc with cow immunity and should be dealt with through well-constructed herd health policies.
- Full vaccination programmes: Those infectious diseases that cannot be eradicated should be vaccinated against if present, notably IBR.
- Minimise stress: While harder to define, the overall stress of an animal will greatly influence its immunity through cortisol levels. Consider both physical and nutritional causes of stress including transition success, energy and mineral balance, building design and management.

As always, herd health plans should be constructed with your vet, using the disease data and specific environment of your own farm to make any decisions.

The New Zealand position

If *M. bovis* is a frustrating but manageable disease on UK dairy farms, why is there so much press and controversy about the disease occurring over in New Zealand?

Up until late 2015 New Zealand was one of only 2 countries in the world that were *M. bovis* free, the other being Norway. Around that time, for a currently unknown reason, the bacteria found its way onto a farm in the Southern tip of the South Island. We can be confident in the introduction date by tracing back various mutations in DNA between different infections, working as a sort of genetic clock. Since this introduction, the disease has spread, mainly through the buying and selling of calves and cows and now is confirmed on 40 units, with another 30 under movement restrictions.

A few weeks ago the NZ government agreed a plan going forward, to eradicate the disease from the country through a staged approach over the next two years. This decision has proved controversial, but ultimately the proof will be in the pudding. If the country eradicates *M. bovis* it will be the first such eradication in the world and will save the farming industry millions in the years to come.

Continued on page 2...

Continued from front page...

One thing that has helped them so far is the fantastic connectivity of the industry. DairyNZ (their version of AHDB), NZ Veterinary Association and MPI (NZ Defra) have communicated to their members a huge amount of information and have been able to coordinate both farmers and vets

throughout the country to monitor and test for the disease. These networks have been put to the test recently and it shows how important good support is in times of crisis.

In researching this issue I couldn't help but be struck by the similarities

to other infectious disease outbreaks in the recent past, not as much mycoplasma, but Foot and Mouth. Although on a much smaller scale (£0.5 billion estimated cost of M. bovis vs £8 billion for F&M), there are lessons we can learn or be reminded of:

- The impact of exotic infectious diseases on an industry can be huge, but equally the gains from eradication can, over time, be far greater.
- Rules are there for a reason; whether it is import checks on live and dead animals or a boot dip at the front of the yard. These precautions are in place to prevent the spread of some catastrophic diseases. It is easy to forget biosecurity when it does not seem that there are any diseases about, but we never know what we will be facing tomorrow, and may regret not taking extra precautions.
- Animal tracing records need to be kept up to date and reliable to serve any purpose in outbreak situations.
- Animals pay the price of disease; 150,000 animals will be slaughtered in NZ over the next 2 years, equating to almost 3% of the national dairy herd.
- There are real human consequences to any animal health event. Right now some farmers are facing a tough kiwi winter with either a depopulated farm or movement restrictions placing huge strains on resources. While compensation is awarded in these cases, this does little to relieve the heartache that many will be going through.

Introducing Figured software



By Helen Evans helen.evans@kiteconsulting.com



Accounting software for the agricultural sector has come on in leaps and bounds during the past few years. Xero has been hugely useful for many of our clients and is a cost-effective solution that really works for us as consultants and you as clients.

The cloud-based structure allows bookkeepers, consultants and you easy access to data which can be manipulated into an infinite number of reports which provide really useful information. Cashflow is now much easier to track and it is a great relief to move to a system that is so much smoother than the previous file sharing and back-and-forth cashflows that we used to work with on farm.

We are always looking to find the next thing to keep you ahead of the

game and have been delighted to work with Figured over the last six months. Figured is a New Zealand business that has designed a product that effectively sits on top of Xero and works behind the scenes to pull down figures and take reports down to bank balance level. Its budget and forecast tools open the door to really useful recording and benchmarking, with all authorised parties (bank managers, advisors, accountants etc.) able to view the information of a business at cashflow level, fully reconciled with the bank. For farming it allows us to monitor technical performance i.e. stock movements and reconciliation and in New Zealand, users can now link the software to their milk buyer to draw in milk quality data and it also links to their BCMS equivalent. The US version has a credit control part which even formulates figures ready for lending requests.

The best thing about the software is that it gives you up-to-date

information at the touch of a button, so you can view your current position, production trends and enterprise costs (e.g. heifer rearing costs) instantaneously – previously we would have needed to pull this information together from multiple sources before coming up with the answers. You can also quickly carry out scenario budgeting - for example, at the start of the drought we could quickly model scenarios to see the impact of things such as milk sales dropping or increased feed costs.

We have been working with Figured to get the product ready for the UK market with some of our clients testing it for us and the good news is that it is now being rolled out live to the country. We really do see it as a game changer – clients will be able to respond more quickly to situations with the data they now have which, ultimately, gives them a competitive advantage. To find out more, please speak to your consultant.

Latest learnings from the US



Will Jones will.jones@kiteconsulting.com



Will Jones recently travelled to the US, attending the Cornell Advanced Dairy Nutrition Shortcourse as well as spending time on farm with independent nutritionists in New York State. Below are the highlights of learnings from his trip.

Feeding for milk fat

A number of sessions at Cornell looked at increasing milk solids, particularly butterfat (BF). Here, increasing DCABs in lactating cows to +300 had a positive impact on butterfats. This reasons for this are two-fold; firstly DCAB acts as a buffer in the digestive tract and secondly it replaces sodium and potassium lost during periods of heat stress through sweat.

The role of fatty acids and their combined impact on butterfats was also highlighted. We have seen a number of cases where fats have been put under pressure through the addition of purchased feeds high in specific fatty acids.

Understanding the fatty acid profile of forages is the first step, so that individual decisions can then be made on purchased feeds – what appears good value may have a negative impact on your income-over-feed costs, due to milk fat depression.

Amino acids

The vast majority of the farms I visited were balancing rations for amino acids, generally methionine (driving milk proteins) and lysine (increasing yield). The idea was to ensure that none of the amino acids were limiting production and generally this approach resulted in lower CP diets. The results were improved performance, reduced cost and reduced N output. It must be pointed out that the Americans do have the option to feed blood meal, which is a much more cost effective way of meeting lysine requirements. It does show though, that understanding the makeup of our forages and feedstuffs through analysis is vital if we are to progress this idea over here.

Robots

I was surprised by the number of robotic herds in the area. This number was said to be increasing rapidly, mostly driven by labour concerns with farms I visited ranging from having 2 to 36 robots. I spent some time with Todd Ward, an independent nutritionist who specialised in robots. One of the farms was averaging 52 litres at 3.7BF and here I was surprised by the nutritional management of these systems. The farm had moved away from feeding large amounts of concentrates through the robots as this was causing excessive changes in body condition as well as affecting milk solids. Instead, they were using flavourings sprayed into the trough to keep visits high, whilst moving much of the feed into the TMR - the result was healthier cows and lower feed costs.

Forage

Forage digestibility and how this is affected by weather conditions was another topic covered. If plants encounter heat stress (like now) the plant goes into survival mode and in doing so the fibres within the plant become less digestible through increased lignin and cross linking. A good example of this would be illustrated by why we often see less milk in second cuts compared to first cuts. These alterations in digestibility can be managed by varying supplemental feeds.

Quite a few farms were growing triticale as a wholecrop to feed to dry cows with the benefits being good yields, low energy and low potassium. Doing so meant that they were able to remove straw from the diet and also avoid pre-processing as the chopper was doing this at harvest.

FOCUS ON NUTRITION



Don't forget to come along and see us in the Coalport Suite at this year's UK Dairy Day on Wednesday 12th September 2018.

The event is free to attend and takes place at the International Centre in Telford, Shropshire. TF3 4JH.

Farm borrowing and what the future may hold



Neil Wilson, Head of Agriculture, HSBC UK Bank plc

HSBC is very much open for business for the farming sector and, like most banks, is very supportive of the wider agriculture industry. Farm borrowings as measured by the Bank of England have continued to increase (graph below) as farmers invest in their businesses and diversify their operations.

There is undoubtedly some cashflow support included in the current agricultural borrowing figures of £18.7bn, most recently caused by difficult climate conditions, however, the absolute majority of the recent debt increases have been for investment in progressive projects.

There is no doubt that the recent dairy downturn forced dairy farmers to take on additional borrowings. Mostly via the bank but also through increasing creditors. Banks were generally supportive through that difficult trading period but what would the future hold if that were to be repeated?

There were some factors in the last downturn of 2015/16 that will not be

repeated, such as milk quota removal and the Russian dairy product ban. With that in mind, any future downturn is likely to be a supply and demand driven event and with volatility increasing across the globe then it is likely that a lower price cycle will occur again in future.

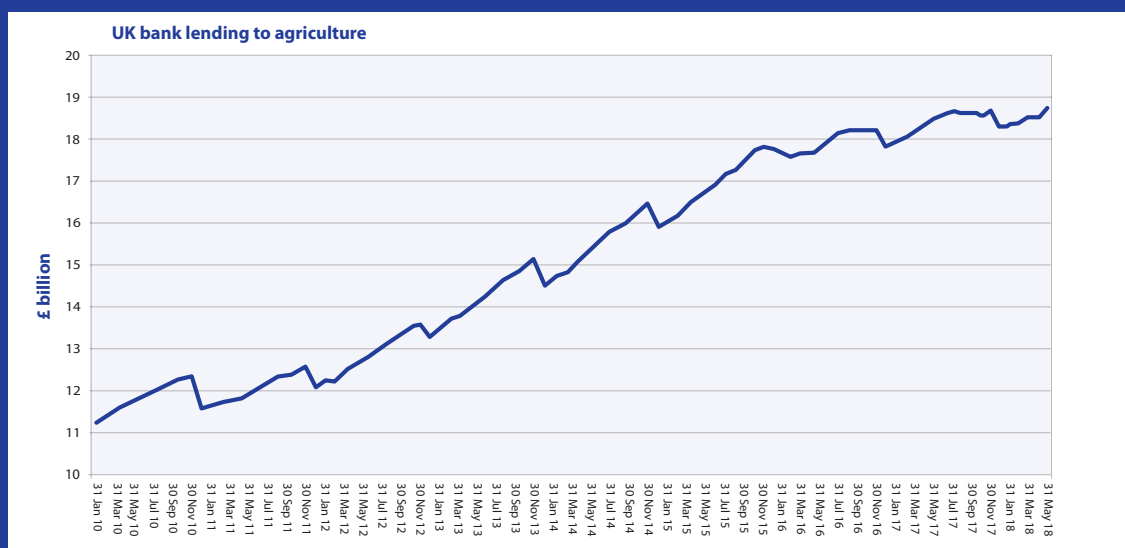
It is difficult to say with certainty how banks will approach future downturns, but wholesale sector support is far from guaranteed. Dealing with the last downturn put pressure on banks' balance sheets as well as farmers' balance sheets. This impacts on the banks' costs of capital and therefore increases the cost of lending additional money to distressed businesses, which many dairy farms were. Despite most businesses being well secured, banks still need to account for businesses that have been unable to stay within their borrowing agreements.

So how do you ensure that you retain the support of the bank at critical times? Communication remains the key. Keeping in touch and not hiding anything is a great start. Understanding your business

and your goals will also help the bank understand your motivations and direction of travel. Within that I include being able to articulate your technical and financial performance on an ongoing basis which will also be vital if and when another downturn comes along.

Competitiveness and efficiency are the best ways for your business to cope with volatility. Allied with a good working capital base, these factors should ensure you retain support from your banking partner through the toughest of times.

At HSBC, our agriculture team remains committed to supporting our well-managed and progressive dairy farming businesses. Our relationship managers are asked to consider a range of factors across farm businesses with the key areas of focus being management ability and long term business viability when considering lending applications. This allows us to look through the volatility of the sector and work alongside you for the long term and especially through tougher times.



For enquiries regarding the information in this newsletter please contact:
 Kite Consulting | The Dairy Lodge | Dunston Business Village | Dunston | Staffordshire | ST18 9AB
 Tel: 01902 851007 | Email: enquiries@kiteconsulting.com