Pentre Farm: Evaluating the effectiveness of chicory in Welsh sheep systems

The aim of this three-year project at Pentre Farm demonstration site is to determine the effectiveness of the inclusion of chicory in the sward on lamb performance, sward and diet quality and internal parasites. Approximately 1.82 hectares of land was reseeded with a standard ryegrass-based mixture including clover and another 1.76 hectares reseeded with a grass mixture including chicory. Lambs were grouped to graze both treatments, with a rotational grazing system implemented.

Data collection during the first year of the project included:

- Regular weighing of the lambs to determine their daily liveweight gain (DLWG)
- Blood testing a sample of lambs within each group at the beginning and end of the grazing period to monitor cobalt, copper and selenium concentrations
- Pasture quality and quantity
- Faecal egg counts (FECs) to monitor internal parasite burden.

Average lamb DLWG for the duration of the grazing period was 12.5 kg. Figure 1. Lamb weights on chicory and clover swards during September 2020

The initial blood test results indicated satisfactory cobalt (Vitamin B12), copper and selenium (GSH-Px) concentrations for both treatments at the beginning of the grazing period. Further blood testing at the end of the grazing period recorded elevated copper concentrations for the lambs grazing the pasture containing chicory (193g/day) than those grazing the ryegrass-based pasture (168g/day), although this difference was insignificant.

Figure 2. Average copper concentrations in the blood (µmol/l) at the beginning and end of the grazing period.

Cefnllan: Managing the change – suckler to dairy beef

The aim of this project is to investigate the feasibility of changing from a traditional suckler cow enterprise to rearing, growing and finishing bought-in Angus cross dairy calves, with the aim to do this on a low-cost grass and forage-based system. In addition to this, monitoring and optimising the performance of the calves, as well as monitoring and controlling costs will be a key aspect to the project.

Calves are weighed regularly throughout the project. When weighed on 31 August, 2020, the 99 younger calves (which would be around 7-8 months old) weighed an average of 245kg (they’ve averaged 0.8-0.9kg/day since arriving on farm at the end of April), and the older 36 calves weighed an average of 470kg (averaging 1.2kg/day).

On 29 September, Hefin Richards visited Cefnllan to produce a winter ration for the calves when they’ll be housed around the end of October. Key outcomes from the visit include:

- Silage analysis results were very good (with an ME of 11.73) and should support a good level of daily liveweight gain throughout the housing period.
- A single blend was formulated for all cattle – 2kg for growers and 5kg for finishers.
- Mineral specification will be formulated – including protected zinc and biotin to promote good hoof health bearing in mind introduction to slatted floors can be hard on feet.
- Consider inclusion of ‘Digestaid Live Yeast’ – this helps fibre digestion and forage utilisation. It costs under 5p/day and has proven benefits in terms of DLWG and feed efficiency.

Figure 3. Calves on the rotational grazing system at Cefnllan

Graig Olway: Focus on feet – reducing lameness in the dairy herd

Lameness continues to be an important health problem on dairy farms and has a negative impact on cow health and production. At Graig Olway, reducing lameness levels and improving cow comfort has been identified as two of the key goals for improving their welfare and also increasing milk yield. The main objective of the project is to determine the accuracy of digital dermatitis (DD). All cattle were mobility scored and digital dermatitis scored at the beginning of the project (January).

Although lameness was difficult to reduce during the first few months of the project, careful management and imposing changes recommended by the project specialist has resulted in positive reductions in the most recent round of mobility scoring (14 November). New case rates have come down and the new cases of lameness are showing very early stages of bruising. Chronic cows are healing well with no new chronic cases since the summer. There is one small active DD case which also shows that DD is well controlled at the moment. In September, nearly 1 in 3 sound cows down and the new cases of lameness are showing very early stages of bruising. Chronic cows are healing well with no new chronic cases since the summer.

Careful management of the herd will continue and scoring will be carried out again in December to assess lameness.

Figure 4. Older calves at Cefnllan prior to winter housing
**Webinars**

66 WEBINARS HELD with 2,297 VIEWERS

Examples of webinars held include:

**25/08/2020: Flock replacements options**
Consultant Rhidian Jones discussed different flock replacement options for farming businesses, focusing on:
1. What are the benefits of rearing own replacements
2. Flying flock costings
3. The role of hybrid vigour
4. Trials done to compare mothering abilities of ewes between different breeds
5. Ewe efficiency

**28/10/2020: Lamb finishing efficiency**
As lamb markets for 2021 are still uncertain and ensuring that lambs are finished efficiently over the coming months is as important as ever. Farming Connect teamed up with sheep consultant, Lesley Stubbs, and John Richards from Hybu Cig Cymru to deliver a webinar focused on lamb finishing. Lesley covered the risks and fluctuating prices, as well as highlighting key drivers for profitability for lamb finishing over winter such as costs, health factors, quality of feed, and genetics. John covered the overall lamb price trend, export sales and COVID-19’s impact on sales.

**EIP**

26 APPROVED LIVESTOCK PROJECTS working with 173 FARMERS AND FORESTERS

**Implementing advanced nutritional management in the Welsh sheep industry**
Working with 12 sheep farmers in North Wales, vet Joseph Angell investigated whether focusing on the nutritional management of the ewes could improve the overall productivity of the flocks. From working with these flocks, five areas were identified where significant improvements could impact on flock performance. These five areas were:

- Forage availability
- Body Condition Scoring
- Disease detection
- Trace mineral supply
- Parasite monitoring

Click [here](#) to read a pamphlet with further information.

**Advisory Service**

Number of businesses who have received support through the Livestock Categories of the Advisory Service during this period:

10 individuals received one-to-one support through the Livestock Categories of the Advisory Service during this period.

2 groups made of 6 individuals received support through the Livestock Categories of the Advisory Service during this period.

Feedback from businesses on delivery of this Advisory service:

“Useful to create a plan moving forward for herd success and standardising procedures.”

“Very pleased with the service. Everything was explained properly and I now have a good clear business plan.”

**Discussion Groups**

**Monmouthshire Sheep Group – Preparing for Tupping**
This was the first meeting for the Monmouthshire sheep discussion group and due to Covid-19, held digitally on Zoom. The consultant working with the group is Philippa Page who discussed ‘Preparing for tupping’. She began the meeting by encouraging the members to get to know each other and share some details of their farms and farm systems with the group. This group will be working together for 18 months, therefore, getting to know each other is very important.

Preparing for tupping is arguably the most important time of the year for sheep farmers. It’s vital that sheep are healthy and at the correct body condition score for tupping, to ensure a good scanning percentage and lamb numbers in the following year.

Prior to the meeting, group members were asked to watch a short video prepared by Flock Health. This video showed them how to body condition score ewes and how to identify what categories to put them into (on a scale of 1-5) and group as appropriate into fit, fat, thin to tup and thin to cull. The group then had a discussion on how regular body condition scoring empowers the shepherd to make good decisions, take control of flock performance and the management required for each group and the consequences on flock fertility.

The group were then introduced to Measure to Manage and the benefits benchmarking can bring to a business which include:

- Being able to compare the business performance year on year
- Being able to compare with similar businesses
- Identifying any areas of weakness or where costs are too high

The second meeting will look at benchmarking in more detail and also focus on liver fluke control.

**Knowledge Exchange Hub**

The KE Hub produces regular articles on a variety of topics. Examples of articles that address this theme include:

- ROBOTIC MILking AND CATTLE WELFARE
- GREENHOUSE GASES PRODUCED IN PIG REARING: PART 1 AND PART 2
- PRECISION LIVESTOCK TECHNOLOGIES IN THE PIG SECTOR
- GREENHOUSE GAS EMISSIONS AND ENVIRONMENTAL IMPACTS OF THE POULTRY INDUSTRY: PART 1 AND PART 2

**E-learning**

Some of the e-learning courses completed within this period include:

- JOHNNE’S DISEASE IN CATTLE
- RAM HEALTH
- SCHMALLENBERG VIRUS (SBV)
- ANTIMICROBIAL RESISTANCE (AMR)

Click [here](#) to visit the website.

**Training Courses**

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<tr>
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<th>Number of individuals trained during this period</th>
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