

# Canolfan Milfeddygaeth Cymru NEWSLETTER **CYLCHLYTHYR**

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## WVSC CPD Club

12-month programme of free virtual CPD evenings and 10% discount on WVSC CPD courses\* sign up by <u>clicking here</u> for £5 per person per year.

Abomasal ulceration was the cause of death of a five-year-old Welsh Black bull. The bull had been slightly stiff on a hind limb and within a few hours was dyspnoeic and then found dead. At necropsy there was extensive fibrinous peritonitis with gastrointestinal content throughout the abdomen. There was a 5cm diameter full thickness abomasal ulcer (see Figure 1).

Figure 1. Full thickness abomasal ulcer



The cause of ulcers is often unknown, and more commonly seen in high lactation dairy cattle. Stressful events, ingestion of sharp objects and periods of inappetence are possible causes.

Lead poisoning was the cause of death of a two-yearold dairy cow submitted for postmortem examination. Six cows had died after displaying neurological signs including walking aimlessly, blind and bruxism (teeth grinding). There was also milk drop in the herd.

Grossly, necropsy findings were largely unremarkable. A sample of kidney was sent for lead analysis and found 205mg/kg FT (reference value 0-0.2mg/kg FT). This is an extremely high level. The farmer was advised of the food safety responsibilities and an investigation to find the source was instigated immediately by APHA.

Mycoplasma ovipneumoniae has been isolated from two different submissions recently. In the first case, three pre-weaned lambs (6-8 weeks old) were found dead with others heard coughing.

In the second case, lambs presented as dyspnoeic and not responding to antibiotic / NSAID treatment.

In both cases, the gross lesions (figure 2) were very suggestive of atypical pneumonia (also known as enzootic pneumonia) which is caused by a mixed infection of a bacterial agent and *M. ovipneumoniae*.

> Figure 2. Mycoplasma ovipneumoniae affected lungs (Atypical Pneumonia)



M. ovipneumoniae spreads throughout the flock during housing but we are seeing increasing cases in animals at pasture, particularly when animals are closely stocked or after gathering. Effective antibiotics should be used to treat clinically affected individuals. Control in an affected flock can be difficult but should be addressed in the flock health plan.

Vaccination of lambs with a full initial course of Pasteurella vaccine may be beneficial (although this offers no protection for Mycoplasma infection).

Marek's disease has been diagnosed in a one-year-old chicken from a small backyard flock recently. The hen appeared bright and was eating and drinking but she was becoming increasingly lethargic. At necropsy there was evidence of dehydration, and an empty crop suggesting a period of inappetence. The spleen and kidneys were enlarged. Histology of the liver, spleen and kidney confirmed a lymphoma, and Marek's was confirmed by PCR.

Marek's disease is a ubiquitous infection of poultry in the UK. Although vaccination is an option for large scale producers this is not an economic option for small backyard flocks. The virus persists in the environment for many years and is almost impossible to eradicate. A diagnosis of mareks does not mean that all chickens in the flock will become infected, they could still live long and healthy lives. Infection is most likely to occur during periods of stress.

Mycoplasma gallisepticum, Mycoplasma synoviae and Avibacterium gallinarum were isolated from two chickens submitted from a small backyard flock after a long period of respiratory signs. Signs were noted after the birds were "locked down" in December 2020. Conjunctivitis progressed to dyspnoea, weight loss and inappetence. At necropsy there was conjunctivitis and sinusitis. *Heterakis spp* eggs were found in the caecum. The eggs although non-pathogenic are the potential vector for Histomonas (blackhead).

Mycoplasma gallisepticum is a pathogenic organism causing airsacculitis and upper respiratory tract disease. The organism is transmitted horizontally and vertically. Treatment is effective antibiotics. *Mycoplasma synoviae* is known for causing subclinical upper respiratory infection and air sac lesions. It typically causes inflammation of synovial membranes and commonly presents as Lameness. Avibacterium gallinarum is an opportunistic pathogen secondary to the Mycoplasma infection.

Johne's disease and parasitic gastroenteritis were diagnosed in a six-year-old goat that presented with chronic weight loss and diarrhoea.

The goat was emaciated, and the faeces were liquid. Worm egg count revealed high infestation of trichostrongyle-type worms (1,000epg). Clusters of acid alcohol-fast bacilli were seen on a ZN stain of the faeces. Confirmation of Johne's (Mycobacterium avium subsp. Paratuberculosis) was confirmed by PCR testing.

The owners were advised not to retain any recently born kids for breeding.

Haemonchosis was diagnosed in a five-year-old ewe that presented with lethargy and recumbency. 30 thin ewes had died since lambing. Necropsy revealed pale, almost white mucous membranes and pronounced subcutaneous oedema in the jowl, sternum and ventrum.

The abomasal muscosa was thickened with red areas. A worm egg count revealed 15,700 trichonstrongyletype epg. 74,600 adult worms were found during a total worm count of the abomasum, which were diagnosed as Haemonchus contortus. It is typical in cases of haemonchus to get very high worm egg counts.

This blood sucking parasite, also known as the Barber Pole worm due to its appearance, is found in the abomasum of sheep and goats and typically presents

ill thrift, bottle jaw and death. Adult sheep and goats do not acquire any immunity, so disease can be seen

as anaemia.



Figure 3. Pale mucous membranes in

an adult ewe with Haemonchosis.

in all ages. The choice of anthelmintic is dependent on whether other nematodes are also present.

The SCOPS Technical Manual offers more advice and information on this parasitic disease.

#### Found a dead badger in Wales?

Please don't forget to telephone the hotline on 0808 1695 110 or go to www.bfd.wales

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Please check the eligibility for **free** carcase collection via this website:



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