



JOHNE'S DISEASE BULLETIN

Investigating test positive animals in herds screened for Johne's disease

Whole herd screening tests using the ELISA test are a valuable method for the early detection of Johne's disease in a herd. However, the unique features of the MAP bacteria, which causes Johne's disease, and its ability to 'hide' in cells mean that tests are most informative when repeated at regular intervals on all animals over two years of age in the herd. With repeated whole herd screening tests and careful attention to the risk management plan, confidence in the absence of Johne's disease from a herd can build over time.

A proportion of herds undertaking a whole herd screening test for Johne's disease may return test positive ELISA results. These animals pose a challenge, since some of the animals will be in the early stages of infection, and others may be false positives. It is important that you decide on how best to manage these animals before the next calving season where the risk of disease spread is greatest.

Ancillary testing focuses on the individual test-positive animal, rather than the whole herd, and uses a dung sample instead of blood or milk. There are two tests recommended as ancillary tests; the faecal culture test and the PCR test. Your veterinary practitioner can provide you with further information about these tests and can take the samples if you decide to proceed. A positive result from either of these tests confirms infection in the animal and the herd. The management plan your vet provides as part of the on-farm risk assessment (VRAMP) will assist you put in place the necessary practices to minimise further disease spread within your herd and reduce the risk of further faecal shedding and environmental contamination.

Ancillary testing assists vets and farmers to identify animals which are truly infected. Without this additional testing, the advice is to manage all test-positive animals as if they were infected, and to keep them away from young stock and calves, and areas where young stock and calves are housed or are fed. This cautious approach is warranted given the consequences of an infected animal contaminating the farm environment by shedding bacteria.

An animal with a test-negative ancillary test result is described as having an inconclusive disease status until the animal is tested again as part of the next whole herd screening test. This is because the animal could be in the early stages of the disease process where bacterial shedding is low and intermittent, with the result that bacteria may not always be present in the dung sample at this stage.

Ancillary testing is a useful next step in a herd investigation for Johne's disease, and one in which test interpretation should be provided by your veterinary practitioner. Your vet understands your farming operation and will discuss how best to manage ancillary testing in your herd.