Johne’s Disease
The Next Steps…
Johne’s disease is an incurable disease caused by the organism *Mycobacterium Avium* subspecies *paratuberculosis* (MAP). Infection results in a thickening of the intestinal wall. This prevents the animal from successfully absorbing nutrients causing the animals to lose weight, scour and eventually die. Animals with Johne’s disease are likely to be culled earlier and are also likely to be affected by other conditions, including chronic mastitis, lameness, and high somatic cell counts.

**Understanding the spread of Johne’s disease between animals**

Johne’s infection is mainly caused by calves ingesting dung through contaminated bedding, udders, or on dirty buckets of colostrum or milk. 80% of Johne’s infections occur within the first month of life. Good hygiene and calving time management is crucial.

**Understanding the benefits of continually controlling the disease**

- Cows with Johne’s disease produce less milk and are more likely to have lameness, mastitis and higher somatic cell count. This increases the cost of production and reduces the yield of saleable milk.
- Cows with Johne’s disease are more likely to be culled early reducing the scope to cull for herd improvement.
- Johne’s is an unpleasant disease that badly affects cow welfare. The wasting of cows in the terminal stages of the disease is particularly hard to watch.
- In many cases farmers bring the disease onto their farms by buying cows with Johne’s disease from infected herds in markets or at herd dispersals.
- Antibiotic use may be higher in herds with Johne’s disease because of the increase in risk of other disease conditions. Reducing Johne’s disease will help to reduce the need for antibiotic use on farms and reduce the risk of antimicrobial resistance.
- Continuous regular testing leads to a better understanding of the pattern of Johne’s disease in your herd. Every farm is different.
Even though you are actively managing Johne’s within your herd it can often feel that very little progress is being made due to the challenging nature of the disease. It is vital to focus on the most important risks for the spread of Johne’s in your herd.

<table>
<thead>
<tr>
<th>Risk Category</th>
<th>Biosecurity</th>
<th>One to Many Risks</th>
<th>One to One Risks</th>
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</thead>
<tbody>
<tr>
<td>MAJOR</td>
<td>Cattle purchase</td>
<td>Cow to calf maternity</td>
<td>Clinical cow to foetus / calf</td>
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<td></td>
<td>Slurry</td>
<td>Milk &amp; colostrum</td>
<td>Infectious cow to foetus</td>
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<td>Infected Colostrum</td>
<td>Cow to post weaned calf</td>
<td>Infectious cow to calf</td>
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<td>MINOR</td>
<td>Rabbits</td>
<td>Cow to cow</td>
<td>Infected cow to foetus</td>
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<td></td>
<td>Rivers</td>
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<td>Infected cow to calf</td>
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- It is important to persevere with your action plan for Johne’s disease, check regularly that the plan is being followed and ask your vets for any advice if unsure.
- Work with your vet on a detailed honest review every year and update your action plan, using all the information available and based on how the action plan worked that year. Involve all farm staff in all stages of the plan and make the investment in changing practises where necessary.
- Do what you can do first to reduce the impact of the disease. The ‘easy wins’ should naturally lead into a progressive control – dealing with one challenge should naturally lead to the next. Eliminating the disease will need long term commitment...but the pay back is a healthier herd.
- Tackle the major ‘One to Many’ risks first – this is where one infectious animal can spread the disease to many of your replacement heifers. Segregation of high-risk cows at calving is one of the key first steps for every herd.
- Don’t hold onto red cows indefinitely – these cows are the main source of infection for the next generation for your farm. Decide on a culling protocol and stick to it even if the cow still looks okay. Having a robust breeding policy will make it easier to stick to a culling protocol.
- It is important that all staff on your farm understand how Johne’s disease works and how they can help to manage it on the farm.

**Progress is not a ‘tick box’ exercise but a dynamic process based on working closely with your vet.** Whatever your farm type, there is a strategy to suit you. Work in partnership with your BCVA Accredited Johne’s Veterinary Advisor (BAJVA) to create a bespoke management plan implementing the correct measures for your herd.

**REMEMBER!**
Be realistic about the timescale and what you can achieve: Even when positive steps are fully implemented it can take -4-5 years to see significant progress in Johne’s disease control on farm but the improvements in your herd’s general health will be worth the steps you take and will be seen much more quickly.
The National Johne’s Management Plan (NJMP) was developed to manage and then reduce the incidence of Johne’s disease in the dairy herd with a joined-up industry approach. To complete the requirements of the NJMP you will need to carry out three steps in conjunction with your BCVA Accredited Johne’s Veterinary Advisor (BAJVA).

A BAJVA is a veterinary surgeon who has completed the BCVA Johne’s training program.

Once these three steps have been completed you and your BAJVA should sign a National Johne’s Management Plan Declaration certificate. This should be kept on farm with your written Johne’s disease management plan, and a copy should be sent to your milk purchaser.

These three steps and the declaration should be reviewed and completed annually as required by your milk purchaser and Red Tractor dairy standards.

ACTION GROUP ON JOHNES

The Action Group on Johne’s is an open forum for industry stakeholders interested in tackling Johne’s disease, jointly funded by AHDB Dairy and milk purchaser members.

The National Johne’s Management Plan (NJMP) was developed by the Action Group on Johne’s to help manage and then reduce incidence of Johne’s disease in dairy cattle. The NJMP is not a national one size fits all approach, it is a coordinated initiative for the benefit of the industry and about choosing control strategies that meet the needs and aspirations of individual farmers.

Further information can be found on the Action Johne’s website www.actionjohnesuk.org