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OR this update, we put the following questions to Michael Collins, professor of microbiology at the University of Wisconsin School of Veterinary Medicine and president of the International Association for Paratuberculosis.

— The editors

Is the Johne’s situation getting better?

It is getting worse. Consider the USDA-National Animal Health Monitoring System surveys. The 1996 survey reported that 22 percent of U.S. dairy herds had Johne’s. The 2002 survey found that 50 percent were infected. This was based on fecal culture positive tests. This growth in infection is logical in that virtually chronically, incurable infectious diseases will spread (get worse) unless or until something substantial is done to stop the spread. Cattle are being bought and sold daily without regard for their Johne’s status.

What current developments will help?

In research, we’re getting a better handle on how Johne’s tests compare. There are three USDA-licensed ELISAs for use on serum (blood). Two of these (CSL/Biocor and IDEXX) have high specificity, meaning that you can trust a positive test to be positive. The third, Synbiotics, has lower specificity, meaning that you can trust a positive test to be positive. The second, M. paratuberculosis bacteria per gram of cow manure, the greater the likelihood that the herd is infected. This was based on fecal culture and is most effective to verify that herds are not infected. With herds known to be infected, you might as well sample individual cows initially. Otherwise, you have to go back to sample all 5 or 10 cows that contributed to a positive pooled sample.

Might we see more interest in vaccination?

I only hope a better vaccine becomes available. The one that’s available is far from effective.

What about the usefulness of our tests?

About 30 percent of all fecal culture-positive cows will test positive to a blood or milk test. Some experts think this percentage is too low. However, blood and milk tests detect 50 percent of the moderate shedders and 80 percent of the heavy shedders.

So, for a third of the cost of fecal culture, you can detect the cows most likely to spread the infection. Also, you can get the test results in less than a week compared to three to four months.

In my opinion, blood and milk ELISAs are a better value. They are good tests with higher sensitivity, meaning that you can trust a positive test to be positive. However, blood and milk tests detect 50 percent of the moderate shedders and 80 percent of the heavy shedders.

What about the Johne’s-Crohn’s link?

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What about the Johne’s-Crohn’s link?

I believe we have tests that are accurate enough. However, indemnities may not be needed. With the right tests and test interpretations, we can identify cows that are not going to survive or produce well on the next lactation. Producers will want to cull these cows even without indemnities. Unfortunately, some of these cows that are in good body condition and two to three months from calving are “recycled” — sold to other unsuspecting dairy herd owners.

It is in the best interest of everyone in our industry to permanently label all cows certain to have Johne’s disease before they leave the farm. Unless or until we stop recycling these cows into other herds, we will not stop the spread of this disease.

In my opinion, every cow with a strong positive blood test or positive culture or PCR manure test should be branded, tagged, or ear punched (J-punch is used in Wisconsin). Every potential buyer needs to know that the animal has Johne’s disease and should not be bought. Far too often, producers cull cows they know to have Johne’s and are paid salvage value, say $450. Then, some sells that same cow to an unsuspecting dairy herd owner for $1,450. The person conducting this transaction picks up a quick $1,000 and spreads Johne’s to another herd. This must stop.

In a well-designed program, dairy producers will not suffer financially. They will continue to get salvage value for Johne’s culls. The only people who would raise objections to labeling cows for slaughter are those now financially benefitting from selling sick cows to dairymen. Where we stand in the Johne’s war

Where we stand in the Johne’s war

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