

REQUEST to Test a Milk Sample for Antibody to *Salmonella* Dublin

Background:

Salmonella Dublin (*S. Dublin*) has recently been diagnosed in Ontario herds. Outbreaks of disease with *S. Dublin* can be very severe. Taking precautions is warranted if infection is spreading. Cattle movement is how *S. Dublin* has entered the herds affected so far. As over 70% of Ontario producers reported introducing cattle into their herds over a recent five year period we suspect that more herds could be infected than those who have had disease detected in laboratory submissions.

We want to conduct a survey of dairy herds for “carrier” *S. Dublin* cows. About 20% of heifers infected with *S. Dublin* may grow up and become carriers. They can harbour the bacteria but show no signs. While some *Salmonella* infections cause obvious gastrointestinal disease (diarrhea), *S. Dublin* infection often results in septicemia (blood infection) with the infection persisting in body organs and tissues, with periodic shedding. One way to detect carrier animals is to test their blood or milk for antibody. About 80% of carrier cows shed antibody in their milk at some time. Therefore one way to screen a herd for carriers is to test a sample of bulk tank milk. There are limitations to this form of testing. Not all carriers have antibody at the same time or at all, not all cows in the herd are in the bulk tank at one time (some are dry) and a certain percentage of cows in the herd must be shedding antibody to get a level of antibody that can be reliably detected; however, bulk tank antibody testing is a good first step to evaluate how prevalent *S. Dublin* is within Ontario’s dairy herd population. Further testing over time will be required for individual herd owners to firmly establish their own herd’s specific status.

We can test bulk milk samples selected from those routinely collected for milk testing by milk transporters. Use of samples for this project will not interfere with routine quality and composition testing. Only aggregate test results without herd identifiers will be included in the project reports. Your herd’s test results will be returned to you privately via your veterinarian. *S. Dublin* is an “immediately notifiable” disease under the Ontario Animal Health Act. Positive test results must be reported to OMAFRA. If necessary, follow-up from OMAFRA with your herd vet and yourself may occur to provide you with current information on preventive actions you can take.

If you would like to have a sample from your herd tested please provide the information requested below and your signature.

Farm owners name: _____ County: _____

Farm Premises Identification number (PID): _____

Farm Name: _____ DFO License Number: _____

Veterinarian name: _____ Vet. Email: _____

I request to have a bulk tank sample tested for *Salmonella* Dublin antibody and for my results to be included in the project database without herd identifiers:

Farm Owner Signature: _____ Date: _____

Return to: ann.godkin@ontario.ca (scan & email) or FAX: 519 846 8178