

Abstract:

A cross-sectional study was conducted from May 2016 to January 2017 in Rubavu and Nyabihu districts, Western Rwanda, aiming at estimating the prevalence of subclinical mastitis (SCM) and identifying its causative bacteria. Management practices and milking procedures were recorded through a questionnaire. 123 crossbreed milking cows from 13 dairy farms were randomly selected and screened for SCM using California Mastitis Test (CMT). Composite CMT positive milk samples were processed for bacterial isolation and identification. The overall SCM prevalence at cow level was 50.4%. 68 bacterial isolates were identified by morphological and biochemical characteristics. They included, Coagulase Negative staphylococci (51.5%), *Staphylococcus aureus* (20.6%), *Streptococcus* species (10.3%), *Bacillus* species (10.3%), *Streptococcus agalactiae* (5.8%), and *Escherichia coli* (1.5%). About 67.1% of the farmers checked for mastitis; of these, 58.9% relied on clinical signs and only 6.8% screened with CMT. Only 5.5% and 2.7% of the farmers tried to control mastitis using dry cow therapy and teat dips, respectively. Thus, to reduce the prevalence of SCM, farmers in the study area need to be trained on good milking practices, including regular use of teat dips, application of dry cow therapy, and SCM screening. This will improve their sales and their financial status.