Comparison of a standard and a detailed postmortem protocol for detecting Mycobacterium bovis in badgers.


A standard postmortem protocol, consisting of gross pathology, culture for mycobacteria and limited selective histopathology, was used in the randomised badger culling trial in Great Britain to detect Mycobacterium bovis infection. This standard protocol was compared with a more detailed protocol in which more tissues were examined grossly, more tissues were cultured, more culture slopes were seeded, the culture period was extended and tissues were examined routinely by histopathology. The standard protocol was more sensitive in badgers with gross visible lesions than in badgers with no gross visible lesions. When applied to the study population of badgers, the overall sensitivity of the standard protocol relative to the more detailed protocol was estimated to be 54.6 per cent (95 per cent confidence interval 44.9 to 69.8 per cent). Badgers with tuberculosis (tb) detected by the standard protocol had a mean of 7.6 tissues with microscopic lesions suspicious of tb. The additional badgers detected by the detailed protocol had a mean of 4.4 tissues with microscopic lesions suspicious of tb.