Tuberculosis in cattle and badgers

Sir, The issue of tuberculosis (TB) in cattle and badgers is a complex problem about a serious disease and I welcome the opportunity to comment.

With reference to Mr Hancox's letter (Animal Welfare 1994, 3: 253-254), there is no direct comparison between the situations in Northern Ireland and the South West of England. Cattle herds in Northern Ireland are clustered closer together than in England and so have more nose to nose contact with a larger number of neighbouring herds. When combined with greater movement of cattle between herds and the proximity of the more severe problem in cattle in the Republic of Ireland it is no surprise that badger origin breakdowns account for a smaller percentage than is the case this side of the Irish Sea.

Mr Hancox is misinformed in his belief that cattle are infectious immediately following exposure. The organism is usually entrapped by the body defence mechanism and encapsulated in a lymph node. On occasions the organism escapes this mechanism and forms an abscess in the lung or other organ from where it can subsequently be excreted - an 'open' case. Very few such 'open' cases in cattle have been found at post-mortem in recent years. While no test is perfect, the tuberculin skin test has been used to effectively eradicate TB from cattle in most parts of Great Britain. If a substantial number of infected cattle were being missed by the tuberculin test one would expect a larger number of cases to be disclosed during monitoring at slaughterhouses, and a problem across the country, not just concentrated in the South West. This is not the case.

The role of the badger as a maintenance host for TB has been the subject of extensive research and has been accepted by two independent reviews of the problem by leading scientists: Lord Zuckerman in 1980 and Professor Dunnet *et al* in 1986. Informed scientific opinion, even amongst those who are outspoken opponents of badger culling, accepts the role of the badger.

Mr Hancox attempts to link the upswing of TB in South West England to bovine spongiform encephalopathy (BSE), but his facts are wrong. There have been 50,950 cases of BSE in South West England, not 130,000. There have been 82,587 cases of BSE elsewhere in Great Britain. The incidence of affected dairy herds is lower in South Western counties than in a number of counties in other parts of England, but there has been no increase in TB breakdowns in those counties outside the South West. The suggested link between BSE and TB is untenable.

The TB debate has now moved on to the issue of how best to reduce or even prevent the transmission of infection from badgers to cattle, and the comprehensive measures announced by the Government on 8 December 1993 reflected this aim. The newly developed live test for TB in badgers will be used to target our efforts against those setts which contain infected badgers. Research will continue on improving tests for both cattle and badgers and ways to prevent spread of disease from badgers to cows. In addition MAFF will fund research on the effect of disturbance to badger populations caused by culling and Central Veterinary importantly our Laboratory is undertaking a substantial programme to develop a badger vaccine. While none of these measures can be considered a panacea in isolation this multipronged approach is a valuable way forward in the long-running campaign against this serious and complex disease problem.

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Animal Welfare 1994, 3: 340