Testing roadkill badgers for bovine TB

March 6 2014

The study hopes to establish presence or absence of the disease, geographic distribution and genotypes which could help to form larger studies and inform TB control measures.

(Phys.org) —Scientists at the University of Liverpool, in collaboration with farming groups and wildlife charities, are investigating the presence of bovine tuberculosis (bTB) in Cheshire wildlife by testing badgers that have been involved in road collisions.

A team based at the University's Leahurst veterinary campus will receive badgers for analysis in a scheme that has been backed by the local

National Farmers Union (NFU), regional conservation charity, the Cheshire Wildlife Trust, and government veterinary service, The Animal Health and Veterinary Laboratories Agency (AHVLA).

Year-on-year rise

Although it is widely accepted that bTB can be transmitted between badgers and cattle, the extent to which badgers play a role in the spread of the disease and where it is appears within Cheshire's badger population still remains largely unknown.

The study comes as the government assesses a recent badger culling trial in south west England, whilst in Cheshire, wildlife charities are expanding badger vaccination trials in some parts of the region.

Cheshire has experienced a year-on-year rise of bTB cases in livestock herds, and while the disease has established a strong presence in the south of the county, the region as a whole is considered to be within the 'edge area' of bTB progression northwards.

It's thought that if tackled effectively, reducing the presence of bTB along the northern edge of the spread of the disease could help to limit its progress northward.

The study hopes to establish presence or absence of the disease, geographic distribution and genotypes which could help to form larger studies and inform TB control measures.

Malcolm Bennett, Professor of epidemiology at the University's Institute of Infection and Global Health, said: "Bovine TB is a serious disease and how control it is both a complex and controversial issue. Any solution should be based on evidence, including some understanding on whether or not, and if so where, TB is present in cattle and badgers.

"Through testing, we already know where TB is in cattle in Cheshire, and this survey aims to give us a better idea of where it is in badgers in order to get some evidence that can be used in rational debate."

Richard Gardner, leading Cheshire Wildlife Trust's badger vaccination scheme added: "We know that badgers aren't solely responsible for the spread of TB in cattle, so any research that allows us to establish the local level of the role they do play, can help us direct how we approach tackling the problem here in the north west. This is especially useful while they remain at the heart of the government's current strategy for tackling bTB.

Region free of TB

"Our overall aim, like many of the landowners we work with, is to have a region that is free of TB and with healthy badgers, and any research that helps us to reach that goal is a step in the right direction."

There were 143 new cases of bTB across Cheshire in 2013, which led to the destruction of 829 animals. In the UK as a whole, 27,474 cattle were slaughtered due to bovine TB during January to October 2013.

Gonzalo Sanchez-Cabezudo, Regional Veterinary Lead with the AHVLA, said: "It is key to use all available tools to understand how the disease is spreading. This study is an initiative to explore how we can hopefully reduce the number of TB breakdowns by better understanding the role of wildlife in the spread of the disease in Cheshire."

Provided by University of Liverpool