

Feature

Rodenticides and wildlife

Dr Alan Buckle from the Campaign for Responsible Rodenticide Use (CRRU) highlights some shocking statistics of contamination of wildlife with rat poisons and how gamekeepers can help.

WE HAVE RECENTLY DISCOVERED THAT MORE of our wildlife is contaminated with rodenticides than we had previously thought. This is mostly happening when rodenticides are used where wild small mammals, such as mice and voles, live side-by-side with rats and house mice. This is primarily in rural areas.

HOW IS THIS CONTAMINATION HAPPENING?

A breakthrough in our understanding came when we discovered that almost 70% of kestrels carry rodenticide residues. At first this was a puzzle because we knew that kestrels hardly ever eat Norway rats and house mice (the rodents targeted during rodenticide treatments). Kestrels feed almost exclusively on voles and wood mice, so it must be through these, non-target rodents, that they are being contaminated. The same is almost certainly true of barn owls, tawny owls and several of the other species involved.

NEW RESEARCH

The Predatory Bird Monitoring Scheme, run by the Centre for Ecology and Hydrology at Lancaster, has been monitoring rodenticide residues in barn

owls for about 30 years (www.pbms.ceh.ac.uk). For the last few years we had thought that the percentage of barn owls exposed to anticoagulants had peaked at about 40%. Few of the birds examined contain lethal quantities of the poisons. Most had in fact died from other causes, such as collisions with road traffic and starvation. But the fact that they are contaminated shows that, at some time in their lives, they had taken as their prey rodents that had eaten rat bait. A recent switch to more sensitive methods of residue analysis has now shown that the percentage of exposed barn owls is actually closer to 90%!

It is not only barn owls that are affected. Anticoagulants are found in a wide variety of our key wildlife species including red kites, tawny owls, kestrels, stoats, weasels, polecats, foxes and badgers. This makes them one of the most widely distributed contaminants of UK wildlife. Does this matter if the levels of these residues are generally very low? The answer is “yes”, because although we do not know if these low-level residues are having any adverse effects, the fact that they are there at all is a matter of concern – for manufacturers,

government departments which regulate rodenticide use, conservationists and anyone who has an interest in the health of UK's wildlife and countryside.

ANTICOAGULANTS ARE VITAL IN RAT CONTROL; DON'T LOSE THEM!

It is clear that the main route of exposure for many species is not via rats and mice but through their non-target cousins. Knowing this, we are in a better position to reduce exposure of our wildlife to rodenticides. To avoid the European Parliament placing severe restrictions on anticoagulant use, we must ensure that we take all necessary precautions to avoid anticoagulants getting into non-target wildlife populations. What can gamekeepers do about it? The box below explains.

WHAT CAN GAMEKEEPERS DO?

The Campaign for Responsible Rodenticide Use (CRRU) is running courses for gamekeepers and other pest controllers who use rodenticides in the countryside about wildlife exposure, and how to prevent it. CRRU's recommendations are:

- Remove food sources as soon as they become the focus of rat attention.
- Use traps for rat control in hedgerows, around gamebird pens and feeders, and in cover crops to avoid exposure of wild small mammals to rodenticides.
- If you need a chemical solution, use a gassing technique; they are effective and there are no long-lived wildlife residues.

For more information, please visit CRRU's website, www.thinkwildlife.org.uk or contact Dr Alan Buckle by email alan@alanbuckleconsulting.com

ISTOCKPHOTO/ERIC VAN DER EIJK



A kestrel in characteristic hover looking for prey.