

Why Should We Worry About Local Stoats?

Stoats are about 340 to 400 mm long, so just a bit longer than an adult's foot. They are reddish-brown on top with a white underbelly and a distinct black tip to their tail, which is 10 to 15mm long. They are extremely agile, so can easily climb trees and they can move really fast. Stoats roam widely, so are occasionally seen in our urban environment and in the forest behind Eastbourne. However, they are more often seen on the road to the Pencarrow lighthouse and out at the Parangarahu Lakes because rabbits (a favourite food) are more common there.

Why are stoats bad? Stoats were introduced to New Zealand from Europe in the late 1800's to control rabbits. In their European environment winters were much more severe than here so, being hunters, they evolved to kill more than they could eat during warm weather, then stored surplus catch to feed on in during the freezing winter months when hunting was difficult.



John Horrocks holding a stoat trapped in the Northern Forest. Photo credit: Jane-Pyar Mautner

In our warmer environment they hunt at a high rate year-round, so have a devastating impact on many of our native species, which are not adapted to survive such predators. While some of our adult birds (e.g. kiwi) can fight off a stoat, they are unable to successfully defend their nests and chicks, so a high stoat population means zero breeding success for our most vulnerable birds.

How do we control them? The good news is that we can control stoats well enough for our birds to be able to breed successfully. The main approach to stoat control for areas the size of the Northern Forest is through the use of DOC200 stoat traps, the rectangular boxes with wire mesh ends, and a stainless-steel trap inside, which you see near tracks when you are out walking. These are baited with eggs and/or meat (dried rabbit in our case) and refreshed monthly. For effective control of an area the size of the Northern Forest (1,647 ha), about 220 of these traps are required. Out at the Parangarahu Lakes, where we have shore-nesting birds to protect, there are 76 DOC200s; a slightly higher density than in the Forest. In addition, a further 43 traps are positioned along the road on each side of the Lakes to try to stop incoming stoats. So, the key to effective control is to have a grid of traps of sufficient density, regularly cleared and rebaited by volunteers.

In our urban area the approach is a little different in that we have a much higher density of traps (DOC200s and rat traps), which means that we can control rats and stoats. This level of effort is easier to maintain because so many residents (over 450) participate in the trapping. Volunteers also service a further 120 or so DOC200 traps deployed along the foreshore from Point Howard to Burdans Gate.

Don't stoats keep the rat population under control? The short answer is no! While rats are a large part of a stoat's diet (along with rabbits and birds), rats breed much more quickly than their predators. This means that, in the New Zealand context, the rat population is limited by food supply, not predation. This's why it is safe to control stoats and not rats in an area, but ideally we would control both.

What about ferrets and weasels? Stoats are classed as a mustelid. Other mustelids that have been introduced to New Zealand are weasels and ferrets. We don't think ferrets (which are quite a bit larger than stoats) have arrived here yet, but they are present in the Wairarapa and on the Kāpiti Coast, so they may eventually get here. We have had one or two unconfirmed sightings, but no catches. Ferrets are a big threat to kiwi and are trapped with more powerful traps than the DOC200s we currently use, so should they arrive here we will need to reconsider the mix of traps we deploy. Weasels are present throughout our region. While they are smaller than stoats, they too are expert hunters, so pose a very similar threat to our native species. They are well-controlled using DOC200s.

It is useful if you report sightings of mustelids (to info@miro.org.nz), as this gives us a better understanding of what pests are around. However, deploying a trap temporarily where a stoat has been sighted often doesn't result in a catch because they range so widely. However, the existing trap network should eventually catch them.

You can find more detailed information and pictures of mustelids on the Greater Wellington website: <https://tinyurl.com/8dnrwkn9>.

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