



TIAKINA  
NGĀ MANU

Battle for our birds

# Protecting taonga species

## Te tautiaki i ngā momo taonga koiora

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2020



Department of  
Conservation  
*Te Papa Atawhai*

## THE PROBLEM – TE RARURARU

# The native wildlife of Aotearoa

and the places they live are taonga (treasures).  
We need to protect them.

Twenty five million native birds are killed each year by possums, stoats, rats and other predators.<sup>1</sup>

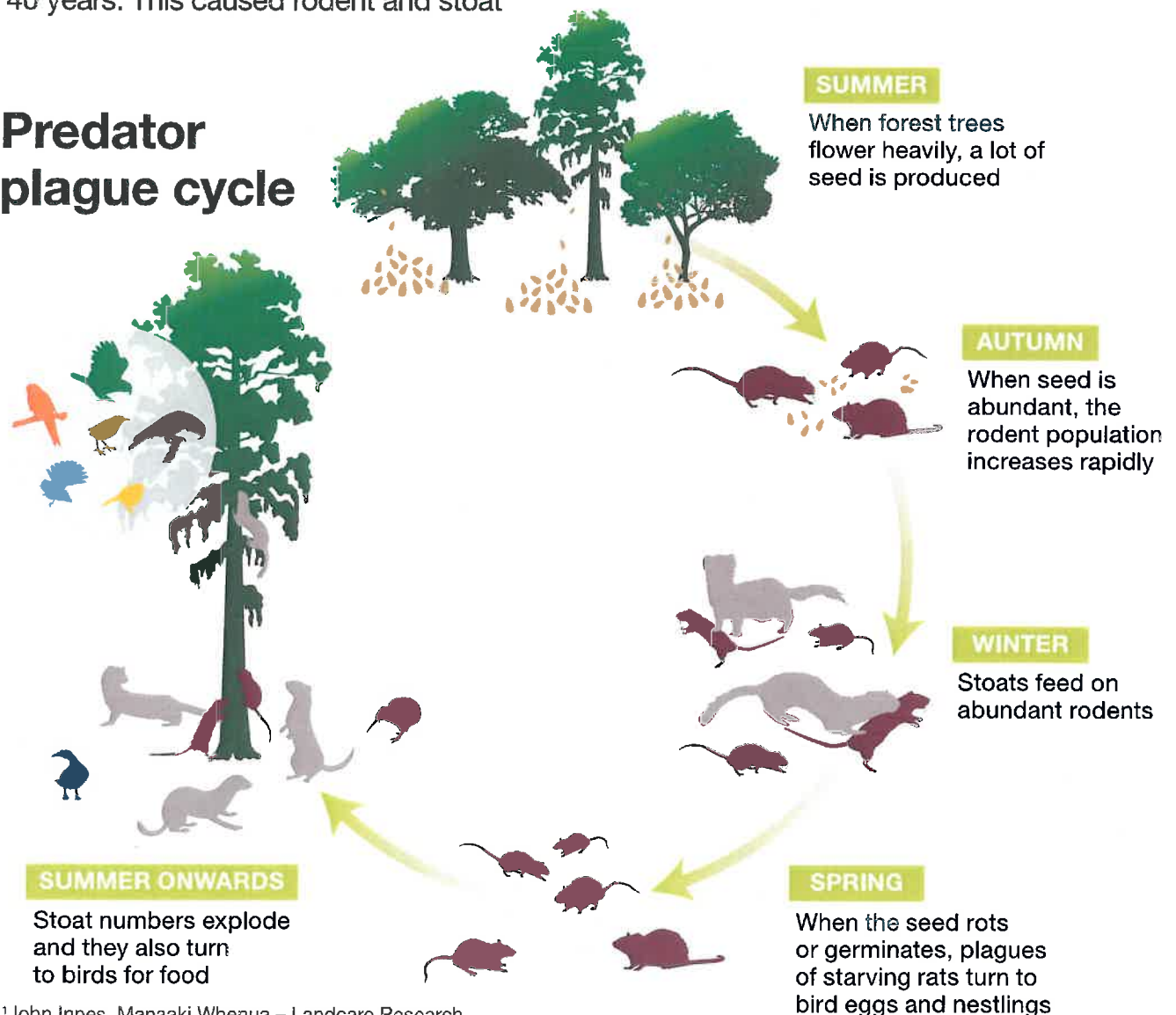
Tiakina Ngā Manu is the Department of Conservation's (DOC) national programme to protect threatened native species from predators. It is part of the national Predator Free 2050 movement.

In spring and summer 2018/19, beech forests had their heaviest seeding ('mast') in 40 years. This caused rodent and stoat

numbers to soar, putting many species, including birds, bats and invertebrates, in even more danger of regional disappearance.

In response, DOC has concentrated its species protection mainly in the South Island's beech forests. By June 2020, over 900,000 ha of public conservation land will have been treated to reduce predator numbers and to give taonga species a chance to breed.

## Predator plague cycle



<sup>1</sup>John Innes, Manaaki Whenua – Landcare Research.



## Treasure for the future – Hei taonga mā ngā whakatupuranga

Even though there is no mast this year, DOC must continue its long-term predator control to prevent decline of native species.

A fundamental part of DOC’s long-term approach is to work closely with our Treaty partner. Iwi-led initiatives to improve the health of the ngahere (forests), including predator control on lands over which they are kaitiaki (guardians), are supported by DOC.

### Kākā

Threat status: North Island: In some trouble  
South Island: In serious trouble

Population: More than 10,000

Distribution: Mainland North and South Islands, and offshore islands

#### Kākā study Waitutu, southern South Island 2006–2016

Males outnumbered females 6 to 1

- Female birds killed on nests
- No juveniles seen



#### After aerial 1080 predator control operations and trapping (2016):

Male and female numbers now more balanced (6 to 3)

- Improved breeding rates
- Many juveniles seen



Photo: Sabine Bernert



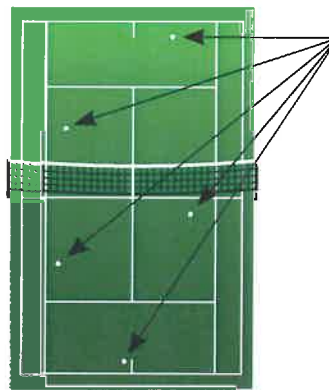
# Controlling predators

The Department of Conservation uses a range of pest-control tools to suit particular needs. Trapping and other ground-based predator control methods play an important part in ongoing control, but cannot be easily scaled up to respond rapidly to immediate pest threats.

Biodegradable 1080 is applied by air over large areas or rugged terrain to suppress rats, stoats and possums.

## Aerial 1080

1080 is biodegradable, breaks down quickly in the environment and does not leave permanent residues in water, soil, plants or animals. The active component occurs naturally in many plants in Australia, South America and Africa as a defence against browsing animals.



**4–6 baits** are dropped in an area the size of a tennis court. Without the need to respond to a mast this year, Tiakina Ngā Manu is focused on protecting vulnerable sites and species across the country.

## Ground control

Conventional and self-resetting traps and bait stations are used for **longer term** and **localised suppression** of predator populations.



Conventional traps



Bait stations



## North Island brown kiwi

Status: In some trouble

Population: 25,000

Distribution: Patchy throughout the northern North Island

### Without predator control:



Only **5%** of kiwi chicks hatched in the wild will make it until they are old enough to breed – their fourth birthday.

### With predator control:



Up to **60%** of kiwi chicks hatched in the wild will survive to breeding age.



**More than 600 kiwi have been monitored** during aerial 1080 operations since 1990. Not one kiwi has died as a result of 1080.

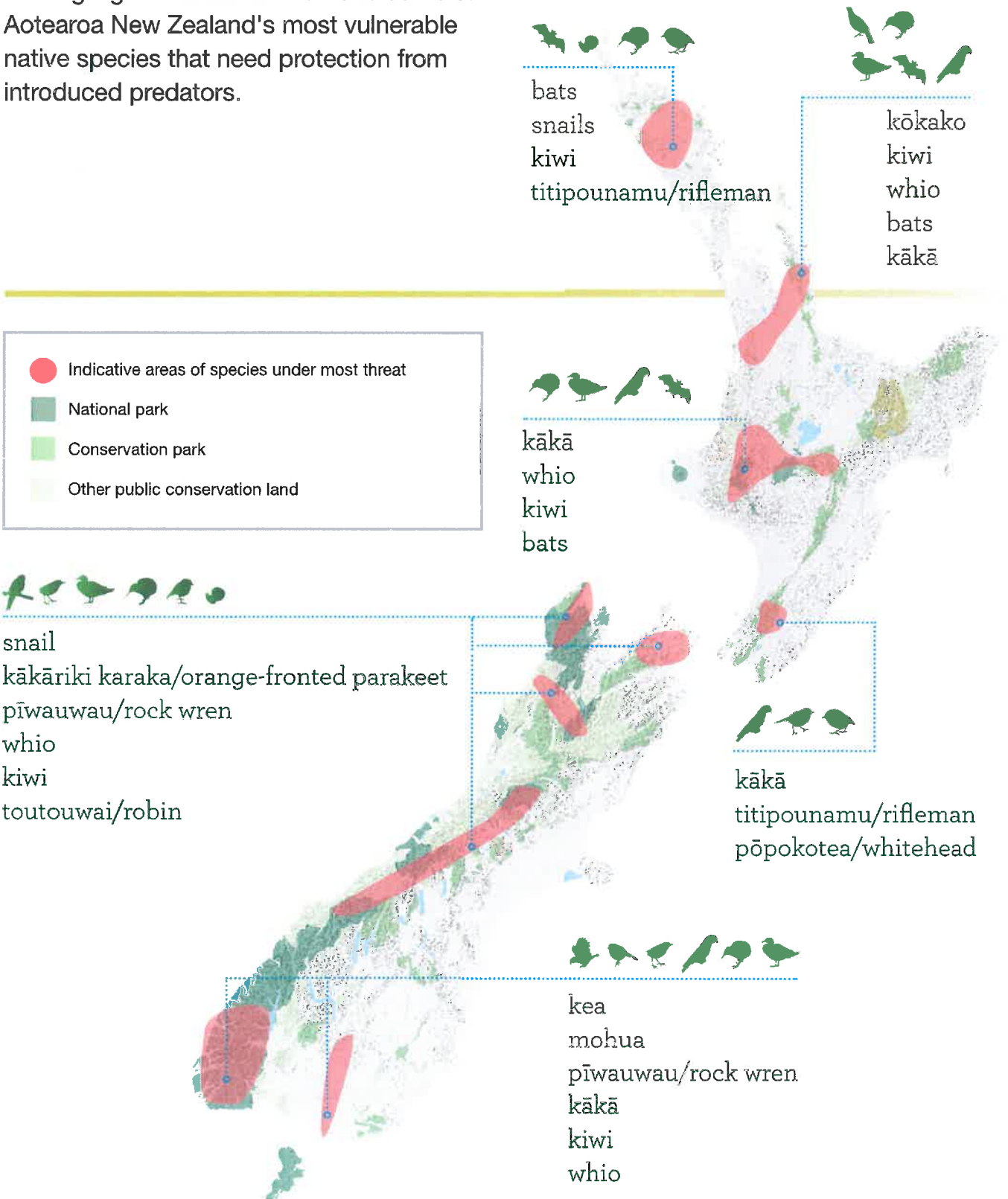
*Photo: Neil Hutton*



Self-resetting traps

# Taonga species under threat

The highlighted areas are home to some of Aotearoa New Zealand's most vulnerable native species that need protection from introduced species predators.



### Brown kiwi



Photo: Rod Morris

Status: In serious trouble

Population: 25,000

Distribution: Confined to populations in north-western Nelson, Paparoa Range and Lewis Pass to Arthur's Pass

### Kākā



Photo: Herb Christophers

Status: North Island: In some trouble  
South Island: In serious trouble

Population: >10,000

Distribution: Large forested areas in the North and South Islands

### Mohua



Photo: James Reardon

Status: In some trouble

Population: Approx. 5,000

Distribution: Strongholds where predator control is carried out. In good numbers on some offshore islands

### Whio



Photo: Herb Christophers

Status: In serious trouble

Population: Breeding population unlikely to be more than 1,000 pairs

Distribution: Forested headwater catchments along the ranges of both islands

### Powelliphanta snails



Photo: Kath Walker

Status: In serious trouble

Population: Declining

Distribution: Widely but sparsely spread throughout western South Island and lower North Island

### North Island kōkako



Photo: Andris Apsē

Status: In some trouble

Population: 1,600 pairs

Distribution: North Island native forests

# Long-term monitoring

An example: doubling native bird numbers in the Landsborough valley



For 21 years, our ‘bird counters’ have researched how bird life in the South Westland’s remote Landsborough valley responds to sustained predator control.

The results of this painstaking work show that native bird numbers have doubled since predator control began. Most of the 13 taonga species in the valley have increased. One of the most threatened birds, the mohua (yellowhead), has multiplied in number from 14 to 444 birds at the last count in November 2018.

This outcome shows that where we protect taonga species against possums, rats and stoats over whole valleys and forests, we can turn their fortunes around.

This progress bodes well for Aotearoa New Zealand to be predator free by 2050.



Riroro/grey warbler. Photo: Janice McKenna



Titi pouamu/rifleman. Photo: DOC



Miromiro/tomtit. Photo: Brent Beaven

For more information on DOC’s planning for predator control this year, visit [www.doc.govt.nz/tiakina-nga-manu](http://www.doc.govt.nz/tiakina-nga-manu)

For more information on Predator Free 2050:  
[www.doc.govt.nz/pf2050](http://www.doc.govt.nz/pf2050)

This publication is produced using paper sourced from well-managed, renewable and legally logged forests.

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