Dear Stakeholder

Notice of Intention to Apply Vertebrate Toxic Agents: Waipunga Whirinaki Combined

Epro Limited of Taupo has been contracted by TBfree New Zealand Limited and the Department of Conservation to undertake predator control within the Whirinaki Te Pua-a-Tane Conservation Park and Waipunga Conservation Area. Some adjacent privately-owned land will also be treated.

In accordance with the Health and Safety at Work (Hazardous Substances) Regulations 2017, Epro wishes to notify you of our intention to apply sodium fluoroacetate (1080) and potassium cyanide (Feratox). This operation will be carried out in two phases. Initially non-toxic prefeed bait will be applied. This will be followed five to ten days later by an application of toxic bait. The bait will be in the form of pellets and will be dyed green.

This operation will commence as soon as practicable after 15 September 2019 and should be completed by 20 December 2019.

Toxin warning signs will be erected at all normal points of entry to the area prior to toxic bait being applied.

Fact sheets are enclosed with this letter. They include maps of the area concerned and information about the operation and the toxins to be used including the precautions that should be taken.

This information has been provided to you as a stakeholder or user organisation of affected land. Please inform any associates, members or staff who may also use this area. Should you require further fact packs, these are available upon request from our Taupo office.

Please feel free to contact Epro if you require any further information.

Yours faithfully

Andrew Buchanan Operational Controller

Potassium Cyanide

Bait

- Bait is in two forms, encapsulated potassium cyanide pellets and a paste.
- Pellets are spherical in shape and approximately three millimetres in diameter.
- Potassium cyanide will be dispensed in bait stations or stapled to trees in biodegradable bags with skull and crossbones printed on them.
- Potassium cyanide pellets have to be crushed to release the poison.
- All bait, pellets and paste, is green in colour.
- Ferapaste is the brand name for the potassium cyanide paste. Feratox is the brand name for encapsulated potassium cyanide pellets.

Poisoning Symptoms in Humans

- Hot flushes throughout the body, vomiting, nausea, headaches, drowsiness, dizziness, anxiety, difficulty in breathing and loss of consciousness.
- This toxin is very dangerous if swallowed, crushed in the mouth or absorbed through skin.
- If potassium cyanide comes in contact with a victim's mouth unconsciousness can occur in **ten seconds** and **death within minutes.**

First Aid Treatment

- Break an amyl nitrate capsule into a handkerchief and hold under patient's nose for 30 seconds. Repeat with further capsules every two minutes until patient stabilises.
- Remove any contaminated clothing and wash any cyanide from skin.
- Keep patient warm and call a doctor immediately.

Poisoning Symptoms in Animals

- In animals, symptoms occur in rapid succession, including excitement and general muscle tremor.
- Animals may salivate, pass faeces and urine, gasp for breath and eventually die.

Cautions

- Although encapsulated potassium cyanide is considered safe to handle in a bait station or biodegradable bag, time or exposure to moisture can split the outer shell of the baits releasing the potassium cyanide.
- Keep all domestic animals away from bait stations and biodegradable bags.
- Do not handle any bait.
- Do not allow children to wander unsupervised.
- Poison warning notices will be erected before application of sodium cyanide.

For further information, contact Epro Limited on 0800 ASK EPRO or the National Poison Information Centre on 0800 764 766.

Sodium Fluoroacetate (1080)

Bait

- Bait comes in the form of carrot, cereal pellets, gel or paste.
- Distribution methods include aerial based (helicopter or fixed wing) and ground based methods.
- Ground methods include bait in bait stations, bait bags or applied on biodegradable cards, directly on the ground or placed in trees.
- Feed baits, used to familiarise animals with the bait type, are not toxic and are not dyed.
- Toxic baits are dyed green.
- There are no harmful effects from the smell of baits, which are often deliberately scented to attract possums.

Amount of Bait to Kill

Species	Grams of Bait	Number of Baits
Possum	1 to 4	1
Dog	3 to 9	1
Man	48 to 132 84 to 249	4 to 11 (pellets at 0.15%) 7 to 20 (carrot at 0.08%)

Poisoning Symptoms in Humans

- Nausea, vomiting, tingling and numbness in hands and face, stomach pains and anxiety.
- Muscular twitching, blurred vision and mental confusion.
- Coma, convulsions.

First Aid Treatment

- Call a doctor immediately.
- Give water, induce vomiting until vomit fluid is clear.

Dog Safety

- Do not take dogs into the operational area as dogs can be killed by eating 1080 baits.
- Carcasses remain toxic until completely decomposed; poison is found in the flesh and stomach content of the carcass.
- The biggest risk to dogs is from scavenging carcasses that have been poisoned by 1080.
- Dog muzzles can be purchased from Epro Limited, veterinary clinics or stock and station agents.
- Emetic pills are available from Epro Limited's Taupo office.

Cautions

- Do not handle any bait.
- Do not allow children to wander unsupervised.
- Keep all domestic animals out of the operational area.
- Do not take animals for eating from within the vicinity of an operational area.

• Poison warning notices will be erected prior to the application of toxic 1080 baits.

For further information, contact Epro Limited on 0800 ASK EPRO or the National Poison Information Centre on 0800 764 766.

Protect our species in Whirinaki Te Pua-a-Tāne



Pest control to protect native species from widespread predator plagues

A heavy seeding (mast) will occur in many forests this year. This natural event, that should benefit native species, will be hijacked by introduced predators as rodent and stoat numbers will skyrocket. Seed fall and rodent levels will be monitored at sites where rare and endangered native species are under greatest threat. When rodent numbers meet critical levels, that will trigger predator control. Without predator control some species such as whitehead/pōpokotea, North Island kākā, blue duck/whio, kokako, rifleman/tītipounamu, kererū, long-tailed bats/pekapeka tou roa and short-tailed bats/pekapeka tou poto will suffer heavy losses.

Predicting increased rodent populations –

A widespread heavy seed fall in South Island beech forests in early 2014 and again in 2016 led to escalating rat and mice numbers. Two events of such magnitude in quick succession was thought to be unusual. DOC, with the help of NIWA, is getting better at predicting these mast events.

Pest control works

DOC carried out aerial 1080 pest control in the winters following the prolific forest flowering over more than 600,000 hectares each season. Monitoring showed an average rat kill of about 95%, which reduced rodents to undetectable levels at most sites and stoat plagues were avoided.

Outcomes

Intensive species monitoring showed the nesting success of rock wren, mohua, robin and rifleman was significantly higher within pest control areas than outside. Go to doc.govt.nz/our-work/battle-for-our-birds.

2019 - the battle continues

Extensive seeding is occurring again in 2019 but on an even larger scale. This is likely to be the biggest mast in decades. We will have a major pest problem on our hands.

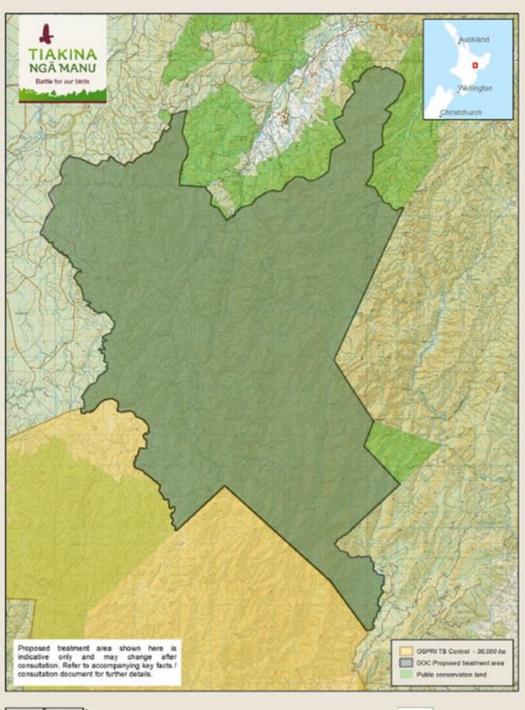


Male Dactylanthus flowers. Photo: DOC



Whirinaki whio. Photo: DOC





5 km

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Aerial Predator Control 2019

Proposed treatment area: 41,044 ha



Department of Conservation Te Papa Ataubai

New Zealand Government

Whirinaki Te Pua-a-Tāne values:

Where heavy seed fall occurs, we can expect predator numbers to soar. To be ready to protect native species at risk, DOC is planning predator control in Whirinaki Te Pua-a-Tăne.

- The Whirinaki Forest covers approximately 56,000ha of contiguous forest ranging from predominantly softwood forest of rimu, miro, matai, totara and kahikatea in the north, to pure beech forests of red and silver beech at higher altitudes further south.
- Whirinaki is home to nine threatened plant species, two ranked as nationally critical, one as nationally endangered and six as nationally vulnerable. Notably, three of these threatened plants have strong populations in Whirinaki, so much so, the forest is crucial for the survival of their species!
- The Whirinaki whio/blue duck population has been consistently growing where intensive predator control (currently 37,00ha), has been carried out. Due to the success of whio in the park, the Whirinaki Whio Security Site is one of the highest ranked sites in the country. This season, a minimum of 100 ducklings have hatched within the Whirinaki Security Site.
- Whio are not the only threatened species calling
 Whirinaki home. The short-tailed and long-tailed bat
 populations are thriving within the Whirinaki. Over
 5,100 short-tailed bats were located in just one roost,
 making the population one of the biggest in the
 country. Equally, the long-tailed bat population is
 healthy and is spread over the whole forest. Because
 of the strong short and long-tailed bat populations,
 Whirinaki is ranked as one of the top four bat habitats
 in the country.
- Many residents of the Whirinaki will benefit from the Tiakina Ngā Manu operation such as the North Island brown kiwi, North Island kākā, New Zeland parakeet/kākāriki, crenulate skink, small-scaled skink and New Zealand falcon/kārearea



Male formitt in Whirtnaki. Photo: DOC



Short-tailed bat on Dactylanthus. Photo: Nga Manu Nature Images



Whirinaki rifleman, Photo: DOC



A range of pest control methods will be used including traps and toxins

Aerial application of 1080 baits are the most cost-effective predator control method over large areas. It is the only viable method in remote or rugged terrain. In more accessible areas, traps or bait stations will be laid, depending of the density of pest populations. High predator numbers can overwhelm trapping networks in some areas. In those cases, aerial 1080 pest control will supplement existing trapping.

Aerial 1080 pest control will target rats, but stoats will also be killed through eating poisoned rodent carcasses. Operations begin with an aerial pre-feed of non-toxic baits to encourage rats to eat the 1080 baits that are applied later

Time frame

Operations will be triggered as rodent populations reach monitored thresholds. Operations, which are weather dependent, will take place when they are most effective between June and November. Dates will vary between sites and will be confirmed closer to operations taking place.

Planning

DOC is working closely with iwi and consulting with key stakeholders before finalising details. Before operations begin, DOC will contact affected neighbours, put up warning signs and advertise in local newspapers. Use of 1080 requires the consent of the Environmental Protection Authority, and permission from the Ministry of Health. The process includes an assessment of environmental effects (AEE) to safeguard the public and the environment.

What you need to know

The Department of Conservation complies with all relevant regulations and takes a precautionary approach to the aerial application of pesticides.

- . The 1080 cereal baits are about 2 cm long, cylinder-shaped and are dyed green.
- Non-toxic pre-feed cereal pellets are about 2 cm long, cylinder-shaped but are fawn-coloured (not dyed).

Managing risk

Dogs, in particular, are highly susceptible to 1080. The risk to dogs from poisoned carcasses will remain until they have completely rotted, perhaps for more than 6 months.

Precautionary approach

Risks can be eliminated by following these simple rules:

- DO NOT touch bait
- WATCH CHILDREN at all times
- DO NOT EAT animals from this area
- Poison baits or carcasses are DEADLY to DOGS

Observe these rules whenever you see warning signs about pesticides. Warning signs indicate pesticide residues may still be present in baits or animals. When signs are removed, this means you can resume normal activities in the area. Please report suspected vandalism or unauthorised removal of signs. If in doubt, check with your local DOC office.

Additional Information

An Ospri run aerial 1080 operation over 36,000 ha to eradicate bovine tuberculosis will be carried out over the same period in the Waipunga, Pohokura and Ngatapa area lands directly adjacent to this operation

More information

Community Team
Department of Conservation Whakatane
07 307 2770
shape@doc.govt.nz



What to do if you suspect poisoning Contact emergency services: 111 National Poisons Centre: 0800 764 766

7 June 2019

Also see doc.govt.nz/battleforourbirds

New Zealand Government



WAIPUNGA AERIAL TB CONTROL OPERATION

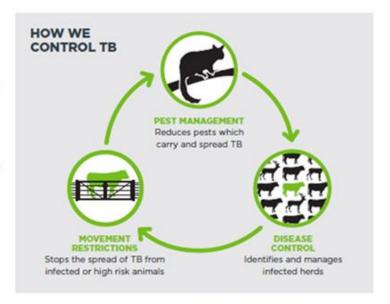
OSPRI'S TBFREE **PROGRAMME**

The TBfree programme aims to manage and eventually eradicate bovine tuberculosis (TB) from New Zealand's farmed cattle and deer and wild animal populations. Controlling disease prevents livestock production losses and protects the world leading reputation of New Zealand's dairy, beef and deer products. We use possum control, along with regular herd testing and movement restrictions, to achieve our eradication goals. Information gathered from wild animal surveys, recent and historic findings of TB in wild animals, herd testing results and the operational history of the region are used when planning operations.



We're running a possum control operation in the Waipunga area (please see map provided for the operation area). It will cover 35,500 hectares.

To eradicate bovine TB, possum numbers need to be kept extremely low - around one to two animals every



10 hectares. Monitoring has shown that further control work is needed in the Waipunga area to reduce the possum population and minimise the risk of the disease spreading through wild animal populations and onto farmed cattle and deer. Possum control has dramatically reduced the number of infected herds in the Waipunga region. This area was last treated in 2014.

WHAT TO **EXPECT FROM** THE OPERATION

The operation will begin with the distribution of non-toxic, tan-coloured cereal pellets by helicopter. This "pre-feed" gives possums a taste for the pellets and overcomes bait shyness.









One to two weeks later, toxic, green cereal pellets – each containing O.15 percent biodegradable sodium fluoroacetate (also known as 1080) – will be applied by helicopter at a rate of two kilograms per hectare. That's about one bait to every 60 square metres. The Waipunga operation will be subject to strict safety, quality-assurance and monitoring requirements.

Advanced GPS navigational equipment will be used to ensure the pellets are accurately placed and exclusion zones avoided.

Some areas of private land will have deer repellent added to bait.

THE METHOD

The vast majority of possum control in the region is done by local contractors using ground-based traps and handlaid toxins. The remaining, far smaller area is controlled using aerially applied pellets containing biodegradable 1080. Aerial control is efficient, cost effective and has been extremely successful at knocking possum numbers down to very low levels in the past. It is preferred in areas like Waipunga due to the rugged

nature of the terrain. The Parliamentary Commissioner for the Environment also supports aerial control. The commissioner completed an extensive review into the use of 1080, in which she strongly endorsed its continued use in New Zealand.

Please visit pce.parliament.nz to read this report.

WHAT HAPPENS NOW

This operation will commence from July 2019. A contractor will be doing the work on behalf of OSPRI's TBfree programme. Before the operation, affected landowners and occupiers will be contacted and visited by one of our contractors. They will discuss boundary issues, water supply safety and the management of any risks to dogs and livestock. Consents from the Department of Conservation and the Ministry of Health are required for this operation. Affected landowners and occupiers will be contacted again before the operation starts, notices will be published in local newspapers and warning signs will be placed at all likely access points to the operational area.

BIODIVERSITY BENEFITS

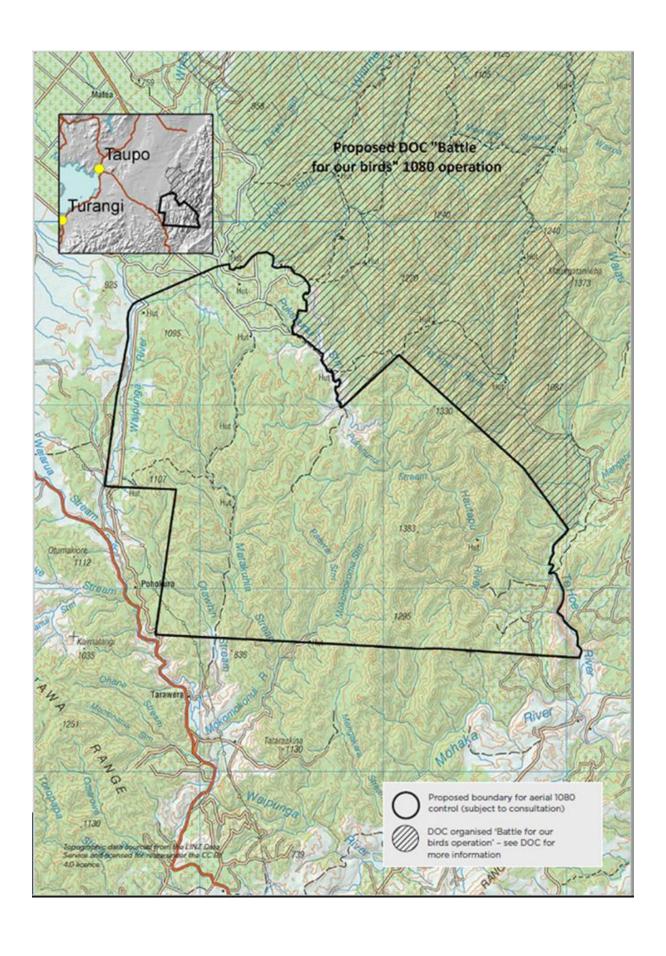
The operation will have additional conservation benefits for native birds and bush. Possums eat the forest canopy and prey on native birdlife, including eggs and chicks. Biodegradable 1080 is also extremely effective at controlling other introduced predators such as ship rats and stoats.











IMPORTANT INFORMATION

Warning signs will be placed at all main access points to the operational area and everyone must follow the cautions on the signs. There's no health risk when using this area as long you follow these instructions:

Do not handle any bait or allow children to wander unsupervised. Cereal baits containing 1080 are dyed green.

Do not hunt or take game from within a two kilometre radius of the operational area for human or pet consumption. It's an offence to sell meat products that have been exposed to 1080. Hunting can resume approximately four months following the control work.

Please observe these rules whenever you see warning signs about the pesticide. Warning signs indicate that pesticide residues may still be present in the baits or carcasses. When the signs are officially removed, you can resume normal activities in the area.



Do not bring dogs into the area until the warning signs have been officially removed.

Dogs are particularly susceptible to 1080. They must not be allowed access to balt or poisoned carcasses which remain taxic to dogs until they have fully decomposed.

Free dog muzzles will be provided on request Please contact OSPRI's Palmenton North Office on 06 353 2710 to obtain a muzzle



THERE IS NO **RISK TO PUBLIC** DRINKING WATER

Biodegradable 1080 is highly soluble and does not persist in water or soil. Local health authorities apply strict conditions to aerial operations so that drinking water supplies are not contaminated. Safety has been confirmed by tests on several thousand water samples taken after aerial 1080 operations over many years.



Contact your local hospital or doctor, or dial 111

National Poisons Centre 0800 POISON (764 766)

If a domestic animal is poisoned, contact a local



FURTHER INFORMATION

OSPRI

Hamilton Office

P 07 849 8915

E vector.sni@ospri.co.nz

W ospri.co.nz

Contractor

Epro Ltd

P 0800 ASK EPRO (0800 275 3776)

E control@epro.co.nz

For more information on controlling bovine TB and how and why 1080 is used in New Zealand, visit 1080facts.co.nz

For guidance on recreational hunting see our factsheet 'TB Information for Hunters' at ospri.co.nz

For guidance on commercial hunting see the Ministry for Primary Industries and Department of Conservation websites.



