

We know that before pest control, for every three breeding pairs of whio only two whio ducklings made it to fledgling. After predator control the number of whio ducklings to make it to fledgling rose to 6 ducklings.

1080 presents very little risk to the environment. It dilutes very quickly in water and is almost undetectable in waterways a short time after a poison operation. It does not bio-accumulate in soils, invertebrates or plants, including those used in cultural harvest. Its use is strictly regulated and openly communicated.

Aerial 1080 operations are fast and cost effective for protecting large areas. Ground-based pest control is considerably costlier. Labour, equipment and transport costs make such operations in large remote areas impractical

2019 mega mast

As you may be aware, New Zealand's beech and rimu forests are producing large amounts of seed in 2019. It's being called a mega mast (seeding). DOC's sampling of beech and rimu trees in February and March has confirmed a widespread and heavy beech and rimu mast throughout most of New Zealand.

Following heavy fruiting that occurs during a mega mast, pest populations increase rapidly. Our native species need extra protection during these cyclic events, and we need to apply widespread and immediate pest control at such times.

Much of New Zealand's wild spaces are steep and densely vegetated. They are either impossible or impractical to access by foot, making aerial operations the most effective method.

The science supports the use of 1080

DOC relies on external, independent scientific advice to assess risks associated with 1080 use. A wealth of scientific data has been collected over more than 60 years confirming that, when used in accordance with New Zealand regulations, 1080 presents little risk to humans or the environment.

DOC maintains a thorough 'information review' of all 1080-related scientific research. The information contains references to all the scientific information we use to inform our decisions. The document is available on request.

We draw heavily on robust science conducted by independent research agencies such as Landcare Research, the National Institute of Water and Atmospheric Research (NIWA), Cawthron Institute and Universities in New Zealand and abroad. Much of this science is published in international scientific journals and quality checked by the peer review process in which independent experts verify accuracy and quality.

The use of 1080 in New Zealand is strictly regulated

Strict health and environment regulations control all 1080 operations. There are 15 separate pieces of legislation that govern toxins use in New Zealand, ensuring a high level of safety and assurance.

The EPA is the government agency responsible for regulating activities that affect New Zealand's environment. They decide how 1080 may be applied in New Zealand and monitor its safe use. DOC closely follows EPA guidelines in order to keep the public safe.

We acknowledge that despite extensive 1080 research and strict regulation, a minority of people still have concerns. We believe that properly informing the public of the efficacy of 1080 in our predator control programmes is key to ensuring that we are able to ensure our native species are kept safe.

We work with farmers to keep stock safe

We work with farmers that are adjacent to pest control operations to manage their stock. Buffer zones are put in place and livestock are mustered away from controlled drop areas until the all-clear is given.

OSPRI are responsible for eradicating bovine tuberculosis which is carried by possums and ferrets. Reducing pest populations reduces risks to livestock. Where possible, DOC and OSPRI work together on pest control operations to maximise the benefits for natural heritage and livestock health.

Our response

To provide as comprehensive and complete response to your request as possible we have collated the following schedule. Please note that the schedule below records every incident that the Department is aware of since 2008 where 1080 was alleged to have contributed to the death or sickness of farm livestock.

It is important to note that the Department has not paid any compensation in relation to the claims set out below. However, we are aware of four occasions when other parties have chosen to pay compensation to farmers, these are highlighted below for your information.

Year	Operation	Approx. hectares treated	Summary	Dead stock?
2018	Mapara	1400	Farmer requested DOC to apply 1080 to his private land. Was informed of toxin application. He assured DOC that his stock were excluded from the drop zone on his land. However, a substandard gate failed, allowing cattle to access toxic bait within the agreed drop zone.	Eight dead cows. Cause was substandard gate which failed to exclude stock from agreed drop zone on private land.
2017	Whareorino	27237	Four cattle were killed when they made their way into the operational area, the landowner took full responsibility for the incident.	Four cows inadequately fenced.
2014	Pouiatoa	5574	Two incidents regarding stock death. The first farmer lost four cattle; the second farmer lost six. The first farmer's stock was reimbursed by the Taranaki Regional Council as the fence they erected had failed. The second farmer was reimbursed in part by the Taranaki Regional Council, but after investigation it was found that the second farmer's fence had failed and that he was at fault.	Two incidents; 1=4 cattle, 2= 6 cattle, all due to inadequate fencing.
2014	Tennyson Mt Stanley	3939	There were no incidents or complaints on the day of the operation. The day after the operation, a neighbour to the operation reported that two donkeys had died in a paddock near his house. The paddock was	Two dead donkeys. However, post-mortem showed this was not due to

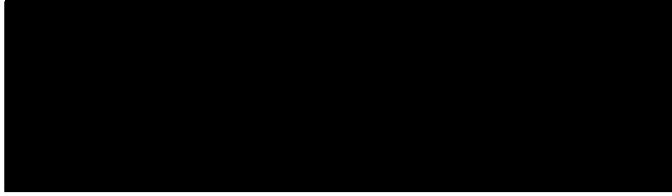
			approx 1.5km away from the treatment area boundary and it was therefore unlikely that 1080 was the cause of death in this case. To be certain that 1080 played no part in the deaths, it was agreed with the landowner that the Department would have a sample taken and tested for 1080 residue. This was done in due course and the results were negative. It turned out that the donkeys had died from bloat after eating high protein emu feed (emu shared the paddock).	1080.
2012	Te Kopia	2428	12/12/2012 - Neighbouring landowner - three calves died in paddock adjacent to aerial 1080 treatment area 3 days after application. Both farmer and Epro staff member walked paddocks to check for 1080 cereal baits, none were found. An area of the boundary fence was raised but there was inconclusive evidence to suggest stock had been using this avenue to access treatment area, the landowner had taken samples and a veterinarian had undertaken testing to rule out usual causes, however testing for 1080 poisoning was not conducted and therefore the results were inconclusive.	Three calves died after operation. They apparently went under the farmer's fence to access the treatment area.
2008	Pureora	27921	<ol style="list-style-type: none"> 1. Landowner complaint over stock deaths from 1080 (20/06/09): Dead in-calf cow found in paddock adjacent to treatment area - no bait found in paddock. Area of bush behind the paddock was not fenced off so the cow had access to inside the aerial treatment area. Prior to toxic bait being laid the farmer had confirmed boundaries with contractor which included the bush behind the paddock. Onus on the farmer as he did not ensure all stock were unable to access treatment area. Contractor compensated farmer for half cost of stock unit as gesture of good will. 2. Landowner complaint over stock deaths from 1080 (late September 2008): One dead cow found in paddock approximately 3km from edge of operation boundary. Cow tested for 1080 - results came back positive. Possible the cow had wandered into bush edge at time of operation and had later been moved into paddock far from the operational area at some stage after the 1080 drop. Most unusual situation as toxic application was completed on 9 July and cow died over two months later. Contractor compensated farmers for stock unit. 	Two dead cows, refer to notes to left.

There are presently no other practical alternatives to 1080

We need to use 1080 to protect our native species. There are currently no practical alternatives to aerial 1080 pest control over vast, remote and rugged terrain. We collaborate with others in researching new technology, such as self-resetting traps and genetic techniques. If we were to stop and wait for an alternative, progress would be lost, and many native species would face a grim future.

Please note that this letter (with your personal details removed) and enclosed documents may be published on the Department's website.

Yours sincerely



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