Rotoiti Nature Recovery Project
Nelson/Marlborough Conservancy
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Revive Rotoiti

Kahurangi, Awaroa and a new arrival

There has been great excitement at Nelson Lakes National Park as a new addition to the kiwi population has arrived.

In October of last year Kahurangi was plotted sitting in a northern location in the mainland island for a substantial period of time. It was considered he may have been incubating an egg laid by Awaroa.

In early November, Kahurangi had moved from this location. After an investigation of the burrow it was concluded this may have been a "dummy run" at incubating an egg.

In November, Kahurangi was recorded in a new possible nest sight.

Lake Rotoiti School pupils with Awaroa. Photo: Nelson Mail.

Kahurangi vacated this burrow during the week of 7-14 February, thus having spent a minimum of 84 days at the burrow - approximately the amount of time required to incubate and hatch an egg plus attend a chick at the nest.

On 14 February, Paul Gasson and Andrew Taylor inspected the burrow and were able to confirm an egg had been there. They found numerous strips of membrane from inside the egg plus a few small fragments of eggshell which they believe is evidence of a successful hatch.

Although Paul and Huxley, the kiwi dog, have checked both Kahurangi and Awaroa a number of times to establish whether the chick was sheltering with or close to the parents, the chick has not been found at this stage.

If the chick is still alive, it is likely that it has moved a substantial distance from the nest.

KIWI RECOVERY
Bank of New Zealand
WITH DEPARTMENT OF CONSERVATION

Bank of New Zealand Kiwi Recovery, a partnership between the Bank of New Zealand and Department of Conservation, has as its long term goals: increasing the kiwi population, increasing the number of places where kiwi live and maintaining the genetic diversity of kiwi species and sub-species.

Department of Conservation
Te Papa Atawhai

Great Spotted kiwi transfer anniversary and annual health checks

May 2005 marks a full year since nine kiwi were transferred to the Rotoiti Nature Recovery Project as part of Bank of New Zealand Kiwi Recovery. The RNRP team is extremely pleased with the overall results so far. The annual transmitter changes and general health checks this May progressed well. Seven radio-tagged birds - four males and three females - were recaptured and their weight and general condition checked.

Dale Clare (left) and Joseph Walker (right) of the BNZ's Blenheim branch with Massey Uiversity vet Jenny Youl holding Rameka.

Unfortunately two kiwi, Tata and Wainui, had lost their transmitters and were not able to be located using radio telemetry. Finding these birds and, if possible the chick, are challenges the RNRP team are confident they will be able to meet in the near future.

All four males have gained weight in the year since their release into the recovery area. Kahurangi has made a 175g weight gain, from 2450g to 2625g, Onetahua has gained 230g in weight, from 2170g to 2400g, Takaka has gained 200g in weight, from 2150g to 2350g and Te Matau has made a 440g weight gain, from 2610g to 3050g.

Of the females, Awaroa has remained the same weight, 3200g, while Rameka has gained 80g in weight, from 3120g to 3200g and Tai Tapu has had a minor weight loss, losing 170g, from 3620g to 3450g.

The catching team was particularly pleased to find an original pair, Te Matau and Tai Tapu, sheltering together in a hollow log. These two kiwi had been mates when they were caught at Gouland Downs so it was fantastic to find them still together a year on.

Moving the great spotted kiwi to Rotoiti was experimental and it was not certain how the kiwi would respond. That the kiwi have all stayed in the RNRP area, that they are all in good condition and that a chick was bred in the first year are all encouraging indications a breeding kiwi population can establish at Rotoiti.

Great Spotted Kiwi at Rotoiti

Males	Females
Onetahua	Tai Tapu
Te Matau	Rameka
Kahurangi	Awaroa
Takaka	Wainui
Tata	

Mohua

For most of the past year Mohua, has been at Massey University's New Zealand Wildlife Health Centre where she has made a good recovery from the bill injury she sustained last year while being transported from Gouland Downs to Rotoiti.

Massey University wildlife vet Clare Green with Mohua. Photo supplied by Massey University.

It was recently decided, with the agreement of Manawhenua ki Mohua (the Golden Bay iwi), to release her into the Rotoiti Nature Recovery Project area. Her bill had re-grown, she had been feeding on her own and it was needed to see how she fared living in the wild again. Mohua was released into the RNRP area near the other kiwi on the evening of 5 May. Her radio signal was then monitored daily to ensure she did not leave the recovery area undetected, and to confirm she was still alive.

Mohua was recaptured by kiwi contractor Jane Tansell and Jenny Youl, of the Institute of Veterinary, Animal and Biomedical Sciences at Massey University, on 15 May to check her health. Jenny's inspection revealed Mohua had lost a considerable amount of weight and it was decided to move Mohua back to Massey.

Back at Massey University's New Zealand Wildlife Health Centre, Mohua's weight has stabilised and is slowly creeping up again. The RNRP team is now looking at what the options are for her future. Mohua had been feeding herself at the wildlife centre before being released at Rotoiti but it would seem she is incapable of sustaining herself in the wild. The RNRP team will be discussing her future with those with an interest in her welfare.

Kaka breeding 2003-04 final results

The kaka breeding season finally finished in the third week of June 2004 with the young in the last nest fledging. Overall the season was a success with no adult females killed during breeding.

Six of the nine nests monitored inside or on the periphery of the area under predator control fledged successfully.

Kaka. Photo: Allan Poll.

Of the three unsuccessful nests, one was lost to a stoat, and two to possums. This suggests that so far the stoat control regime is working and we are very happy with this result. The loss of two nests to possums is frustrating. These nests were in areas where the Animal Health Board (AHB) are controlling possums for TB vector management but their control operations took place too late in the season to be of benefit to breeding kaka. While the Rotoiti kaka population will still increase despite these losses, we hope to tie in with the AHB to try to make their work of more benefit to kaka in the future.

Three nests well outside the predator control were banded with aluminium to prevent predators accessing the nests. One of these nests was also ringed with five stoat and rat traps which were checked weekly by the Friends of Rotoiti. All these nests were successful.

Twenty four chicks fledged in 2003-04 and it is likely that more chicks fledged from birds nesting on the St Arnaud Range. Six adult females are known to nest in the old core project area but their transmitters are now dead and their nests cannot be located. In spring 2004, flocks of 8-9 birds were regularly seen flying over the village in the early mornings and evenings. The largest flock reported was of 13 kaka and one bonus falcon.

No kaka breeding activity was detected in the 2004-05 season, due to a lack of flowering and seed set of beech trees.

The three goals of the Rotoiti Nature Recovery Project are:

- *restoration of the native ecosystem's components and processes*
- *reintroduction of species lost from the area*
- *advocacy for indigenous species conservation and long term pest control*

Wasps

Summer last year showed all the signs of being one of the biggest wasp years ever. Very high densities of nests and high activity rates had us all geared up for wasp control in late January. A training package in long range weather forecasting or fortune telling would be beneficial as hindsight tells us we needn't have bothered.

A February three times wetter than average had a similar effect upon wasps as poisoning. Wasp numbers at the Rotoroa and Lakehead comparison sites crashed without poisoning to similar levels to those of the treated site at Rotoiti.

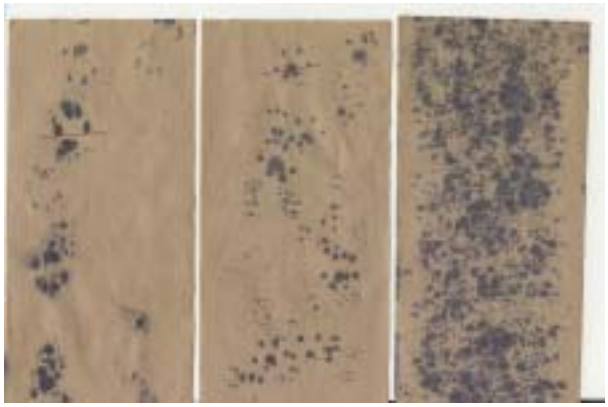
Matt Maitland carrying out wasp poisoning.

This 2004 -05 summer, we again used the insecticide Finitron to control wasps. Poisoning was carried out on January 20th with mixed results.

It seemed that many of the nests took up the poison and were successfully destroyed but a fair few either were not taking protein at the time of poisoning or the nests closer to the bait stations monopolised the bait. This may have been a result of varying developmental progress between nests resulting from the very wet spring. Results so far show that Rotoiti has vastly fewer wasps than either of the untreated sites at Lakehead or Rotoroa, but still many more than we would like. We've limited the damage caused but not removed this threat altogether.

Rodent / Mustelid indexing

Examining blurry footprints left behind by rodents and mustelids in tracking tunnels sometimes feels like ecologist's palmistry. But interpreting those prints is an invaluable tool for assessing the effectiveness of our trapping programmes - both for us locally, and contributing to the national understanding of how these animals behave in our forests, where we manage them and where we don't.



Tracking tunnel papers: Left - mustelid, middle - rat and mice, right - mice.

Locally rats have tracked between 4 and 13% (the proportion of tunnels showing footprints) in the RNRP since August 2003, with a spike to 30% with the onset of seedfall in May. This dropped back to 13% in August. This compares well against the untreated Lakehead where indices range from 33-53%, with a spike in May to 75%. Mustelids in the RNRP have tracked between 0 and 4%, and at untreated Rotoroa the range is 13 to 38%.

A new network of tracking tunnels has been established and run by the Nelson Marlborough Institute of Technology trainee ranger class in the Wairau Valley / Eastern St Arnaud Range to monitor the effect of Friends of Rotoiti mustelid trapping. Monitors from May 2004 have given 0-2% indices, making this site more similar to the RNRP treated area than an untreated site like Rotoroa. This suggests that the Friends are being very successful in their trapping endeavours.

Revive Rotoiti is published by the Department of Conservation, c/- St Arnaud Area Office, PO Box 55, St Arnaud.
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Congratulations to Friends of Rotoiti

The Friends of Rotoiti dedication and efforts supporting the mainland island project were rewarded in November last year. Drew and Marg Hunter, on behalf of the Friends of Rotoiti, collected the Tasman District Councils' top Community and Individuals Environmental Award for 2004.

Some of the Friends of Rotoiti and Huxley the kiwi dog.

The award was given in recognition of the significant contribution they are making to pest control efforts at Rotoiti.

The community group's work is considered an integral part of the Rotoiti Nature Recovery Project's main aim to reduce introduced pests and alter the balance in favour of the native species in the area.

The Friends continue to trap rodents in the village, and mustelids in the Wairau and up the Mt Robert road. They plan to add another five-kilometre stoat line along the western shore of Lake Rotoiti to Whisky Falls.

The Friends of Rotoiti stoat capture results for the 2004-05 year are similar to those of the Rotoiti Nature Recovery Project with a seasonal peak in summer. Rat capture results have remained reasonably steady throughout the year while mouse numbers have tended to fluctuate.

Friends of Rotoiti volunteers, Carol and Bryce Buckland, checking a fenn trap.