

The Victorian Rabbit Action Network (VRAN) promotes community-led action on rabbit management in Victoria, supporting people to work together for more effective and sustainable rabbit control.

VRAN's Rabbit Boot Camp and Leaps and Bounds learning network both aimed to build the next generation of rabbit management experts by sharing knowledge and building on the expertise already in the community.

The following case study is one of a series profiling the impacts of VRAN and its programs on people, communities and organisations.

CASE STUDY

Building on a lifetime of rabbit knowledge

A land manager's perspective on collaborative learning and rabbit action



PETER BARNES

Land management and restoration on a grand scale

Neds Corner Station is a privately owned and managed conservation reserve in far north-west Victoria that is an example of what well-planned restoration and land management can achieve. Lying in the far north-west reaches of Victoria, the property is vast, covering 30,000 hectares of saltbush plains, Black Box Woodland and other arid and semi-arid communities.

Trust for Nature acquired Neds Corner in 2002, at which time it was being used to graze sheep and cattle. The property was severely degraded, with low levels of groundcover,

problems with erosion and a widespread and well-established rabbit population. Grazing ceased in 2002 and since 2008, station manager Peter Barnes, his partner Colleen, Trust for Nature staff and hundreds of volunteers have worked to address the huge challenges faced at the property.

The team's efforts have included extensive revegetation works, with direct seeding and planting of thousands of seedlings across vast swathes of the property. This has helped stabilise soils, encouraged re-establishment of other flora and has provided habitat for birds, reptiles and a range of small mammals. However, one of the key and ongoing threats to these efforts has been rabbits.

"When we first came here a lot of the sand hills were still blowing and bare and all you had were the old native trees and a bit of old bush around. The rabbits weren't allowing any natural regeneration on the property ... controlling rabbits on a property this size is a massive undertaking—just the vastness of it."

Rabbit control has thus been an integral part of the property's management and Peter Barnes' day to day work.



The southern entrance to Neds Corner Station, looking across its saltbush plains towards its border with the Murray River.

A lifetime of working with rabbits

Peter's involvement with rabbits stretches back to his childhood.

"My experience with rabbits started from when I was very young, even just trapping them around the family property. And I would imagine I was put through school with income from rabbits. Then when I left school I went out onto the property with my grandfather and actually shot rabbits." As such, he has been well placed to tackle the rabbit infestation at Neds Corner. When he started at the property, rabbit numbers were in the tens of thousands. Spotlight counts (a standardised way of monitoring abundance) were averaging 30-35 rabbits per kilometre. After almost a decade of work, the average is now 0.4 rabbits per kilometre. This impact on rabbit numbers comes off the back of an amended strategy and huge amount of work destroying warrens, laying poisoned baits, shooting and installing predator-proof fences.

"Since about 2007, we've treated over 20,000 rabbit warrens and 13,000 of them have been ripped to destroy the warren. We've also done over 600 kilometres of 1080 bait trails [a poison-based control method]. When I started I would go out shooting and easily get 20 to 30 rabbits in a night. I went out the other night to get two rabbits for a feed for some people— it took two hours to find two rabbits! So that's pretty positive in a way, but a long time to get a feed!"

Despite the success, Peter acknowledges rabbit control on the property was very much trial and error.

"We just started out mostly ripping in the country where we could. Not really knowing ... and then refining our efforts. Over time we've changed our methods and a lot of that just came from learning along the way, running into good people. And then, in later times, through the Leaps and Bounds group."



Neds Corner Station manager, Peter Barnes, at work on the property. Neds Corner is the largest private conservation property in Victoria.

Learning and sharing through the Leaps and Bounds learning network

In 2015, Peter and 25 other land managers, contractors and government staff from around Victoria participated in a three-day rabbit boot camp in Bacchus Marsh. The event focused on training and sharing knowledge around best practice rabbit management with the aim of improving expertise and outcomes across the state. Like Peter, many of the participants were highly experienced in managing rabbits and were able to share that experience with the group.

"Although we had done a lot of work, most of the people involved had spent a lot of years working on rabbits, so it helped us to refine our efforts even more. We learnt to manage the rabbits and to mitigate the impact of rabbits, as much as kill them. We're good at killing them, but not so good at controlling them."

The boot camp also laid the groundwork for an ongoing community of practice—the Leaps and Bounds learning network. Peter and the other members of the network meet throughout the year to share information, experience and expertise.

"We came from different areas and perspectives and sat down and talked about different issues ... and we all learnt, I think, from every meeting, just so much... legislation, humane control, different control methods."

The value of the group, in Peter's view, is in the diversity of views and insights brought to bear on solving the problem of rabbits.

"To have someone to sit down with who's working on ground, that's good... you all have something that's a little bit different. You can discuss all your little bits and pieces ... even down to dealing with your management. I can never praise it enough really, it's hard to put it into words the value of the whole thing."

Change to practices

The key change brought about by Peter's participation in Leaps and Bounds relates to improved integration and timing of control methods.

"The way that the group's changed things for me here is probably more using each method at the right time. Before, we tried to kill rabbits, but we didn't put [the methods] in the right order to control rabbits. It's more obvious now, but you have to try to knock the numbers down and then you destroy the warrens ... we just went straight into ripping and so all of a sudden you had a massive population of rabbits just living on the surface, in the bush, already re-establishing before we finished treating them."

It also emphasised the importance of follow up work and persistence. This is particularly important for the work being done at Neds



Peter checks a predator-proof fence protecting 500 hectares of restored habitat on Neds Corner Station.

Corner, where some parts of the property have been protected within predator-proof fencing to encourage regeneration and, in the future, potential reintroduction of small marsupials.

"Once you get down to low numbers you just cannot stop working. Now if we notice rabbits in a spot or reinfecting, we'll treat that as it comes up."

Beyond sharing knowledge, information and insights, however, the network also helped to create a sense of solidarity among participants.

"All of a sudden you had a purpose, you're not just out on your own trying to solve all the issues—here's this great group of people who are dedicated to it as well. I look forward to catching up with them and we've more or less become friends."

Changing people - extending the lessons to the community

One of the underlying aims of the learning network was to not only help coordinate and improve rabbit management among participants, but among the broader community. It has been about establishing a group of leaders and influencers in rabbit management who can take their new knowledge out to other land managers across the state. People learn from experience—success and failure—and sharing experiences will build capacity in the next generation of rabbit champions.

"One of the good things about the meetings we attended was that we were all part of that group and we were able to share our knowledge with like-minded people. Not only within the group, but then it starts to leap out of the group and into the larger community. That's where we're starting to teach other people how to control rabbits. We spread the word, and we spread the right word."

For Peter, key channels for sharing lessons about best management practice in rabbit control include the local Landcare group, neighbours and a variety of local government advisory committees he sits on. His experience and insights from the network have also flowed through to other Trust for Nature management groups.

"They've supported me to be part of this group and then I've been able to relay the learnings back through the group ... to those people who manage properties across the state. We even get people phoning through and people will come along to look for advice on pest management in general."

This extension of knowledge out into the community is partly about having better information and practices, but also about having a more coordinated and systemic approach to rabbit control.

"It's trying to get everyone to tackle it as a system, not just individuals working in isolation ... And that's one of the big things about rabbit control, it needs to be an overall effort—everyone, not just a few people." linkages through the learning network have flowed through to influence rabbit management is in the release of the new strain of calicivirus, RHDV1 K5, in March 2017. While Peter noted that Trust for Nature could have applied for Neds Corner to be a release site in its own right, he instead contacted Landcare and ended up applying with both Landcare and Council as a collective. This led to there being multiple release sites at Neds Corner, one each through Landcare and Council, and three through Parks Victoria.

One of the clearest examples of how Peter's

Collaboration in action

- the calicivirus K5

release

"It helped with coordination ... that's part of the learning network group, it makes you think about that sort of thing as well ... We saw it as a major boost to knocking down the numbers of rabbits through the area. Anything you can use that keeps the numbers low is good."



Leaps and Bounds participants at Neds Corner Station.

Challenges and looking to the future

Although rabbit populations at Neds Corner have been substantially reduced since Trust for Nature first bought the property, rabbit control will continue to be an ongoing component of the property's management. As noted above, certain areas have been set aside, fenced off and intensive work done to eliminate rabbits completely. For the rest of the property, eradication is unfeasible. The goal, instead, is to set evidence-based thresholds and maintain densities at low enough levels so that they don't impact on recovery of the site's biodiversity values.

A complicating issue here is the prevalence of sites of aboriginal significance on the property. These can be impacted by rabbit activity, as well preventing the use of some control methods—such as mechanical warren ripping. As with the other challenges of rabbit control on the property, Peter's solution is to exploit a variety of methods to knock down the populations and make the warrens unusable—whether it is through covering entrances or hand collapsing.

Ultimately, the challenges of controlling rabbits in cultural heritage sites, across the vast landscape of the property and within the resource constraints of a not-for-profit, are ones that Peter is now able to seek advice on from the learning network. In turn, he is able to help others address their own challenges and to share in the success and inspiration that Neds Corner offers.

"When I came it was so bad, but now ... after doing all the rabbit works that we've done you just feel proud. You can see the natural regeneration of plants; we've now got over 60,000 plants and trees and semiarid woodland regrowing that wasn't there before ... We are making a difference. We're starting to see rare plants, new plants for Victoria and we've even had a new fungal species confirmed—the first of its kind for the world ... The feeling on the property now is just great. And to be able to share that with people is just good too. I think it is critical to the future of rabbit control to have groups like this. It is a rare opportunity to be involved with people that have such dedication, knowledge and passion, not only in controlling rabbits, but improving the environment for future generations."



Peter Barnes at Neds Corner Station.







VRAN is led by a group of community, industry and government leaders, and was established through funding from the Invasive Animals Cooperative Research Centre and the Victorian Government in 2014. It is now funded until 2019 by the Commonwealth and Victorian governments.

Watch a video of this case study at www.rabbitaction.com/stories

