

Biosecurity

Operational Plan Report 2021/2022

September 2022



Record No: 22149189

September 2022

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Introduction

This Operational Plan Report (the Report) has been developed to serve dual purposes. That is, to meet the requirements of an annual report on the Operational Plan in accordance with section 100B of the Biosecurity Act 1993 (Act) and also report on various other work functions of the Biosecurity Section at Council, as detailed in Part Two of the Biosecurity Operational Plan 2018-2028.

Part One will report on each programme within the Regional Pest Management Plan 2018 (RPMP) that became operative on 1 October 2018. There are 34 programmes within the RPMP, of which 30 are for invasive plant species, two for invasive animals, one for an invasive bird and one for a marine pest.

Part Two will report on various other biosecurity services and/or initiatives that Council has decided to implement or support.

Part Three details a summary of performance against targets for the 2021/2022 year and over time.

Part Four details the annual review of the Operational Plan 2018-2028 in accordance with section 100B(1)(b) of the Act, including any proposed changes to the operational plan because of the review.

Performance Scoring System

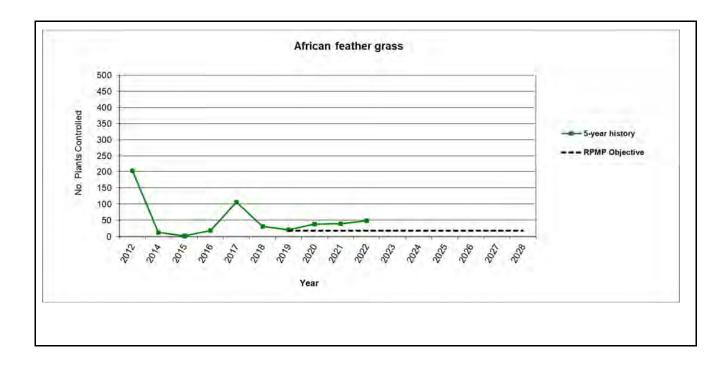
The Operational Plan outlines several targets for both RPMP programmes and other initiatives. Measures against these targets will be used to assess performance of implementation. A coloured 'traffic-light' system – outlined below – will be used to indicate the 2021/2022 performance against the respective target.

Symbol	Definition
	Achieved. All actions have been taken with the measure achieved.
	Almost Achieved. Actions have been undertaken but the measure has not been fully achieved for reported reasons.
	Not Achieved. Actions have not been undertaken to the level required or not been undertaken at all and the measure has not been achieved.
	Not applicable. No actions were required to measure against the target.

Part One - Regional Pest Management Plan Programmes

1. African feather grass (Pennisetum macrourus)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led
Objective	the Marlborough distr	the Plan, control Africa rict to less than or equa wellbeing, the environr	al to 2016 levels to min	imise adverse [′]
Operations overview	Council staff and/or o	contractors will carry oเ	it all operational activit	ies.
Target 1.1	Each year, 100% of s control and/or surveil	sites that have a status lance activities.	of active or monitoring	g are visited for
2021/2022			ority sites were visited. hose sites, compared t 2021.	
Target 1.2	Each year, 33% of sit activities.	tes that have a status o	of historical are visited	for surveillance
2021/2022 Programme tren	d:	activities during the 2 African feather grass Overall, the extent ar grass infestations rer found in the last three	tes, 6 sites were visite 021/2022 season. No was found at those sited density of Marlborounain small. However, the years have exceeded eep plant numbers at o	re-occurrence of es. ugh's African feather he plant numbers the threshold of the
	lot meeting objective			
	A	African feather grass		
2400 2200 2000 1800 1600 1400 0 400 200 0 600 400 200 0 660			20 - 15 to - No	current Historic/Historical Sites current Monitoring Sites current Active Sites
		Year		

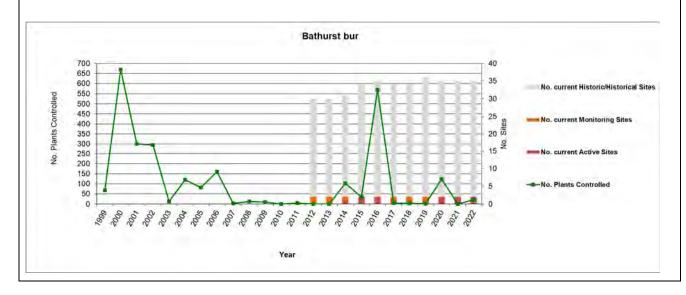


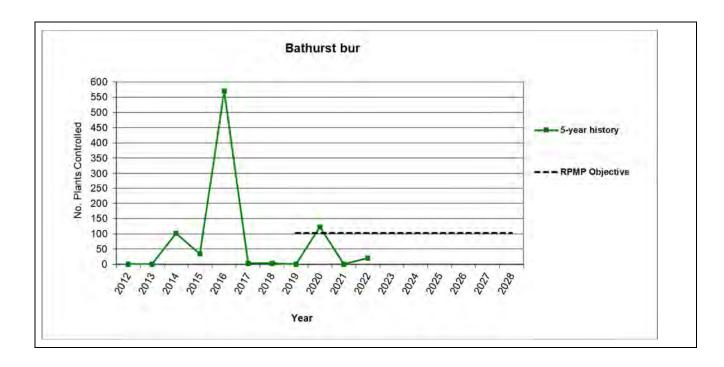
2. Bathurst bur (Xanthium spinosum)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led		
Objective	Over the duration of the Plan, control bathurst bur (<i>Xanthium spinosum</i>) in the Marlborough district to less than or equal to 2014 levels to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.					
Operations overview	Council staff and/or con	tractors will carry out all op	perational activities.			
Target 2.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.					
2021/2022	All 'active' and 'monitoring Bathurst bur sites were visited for control activities for 2021/2022. Only 20 plants were found and destroyed, compared to 0 plants in 2020/2021 and 122 plants in 2019/2020.					
Target 2.2	Each year, 10% of sites that have a status of historical are visited for surveillance, plus any site known to have had soil disturbance within the last 12-month period.					
2021/2022		5 sites out of 33 sites (15 visited for surveillance ac plants were found at any sites were known to be s	ctivities during 2021/20 historical site, and no)22. No historical		

Programme trend:

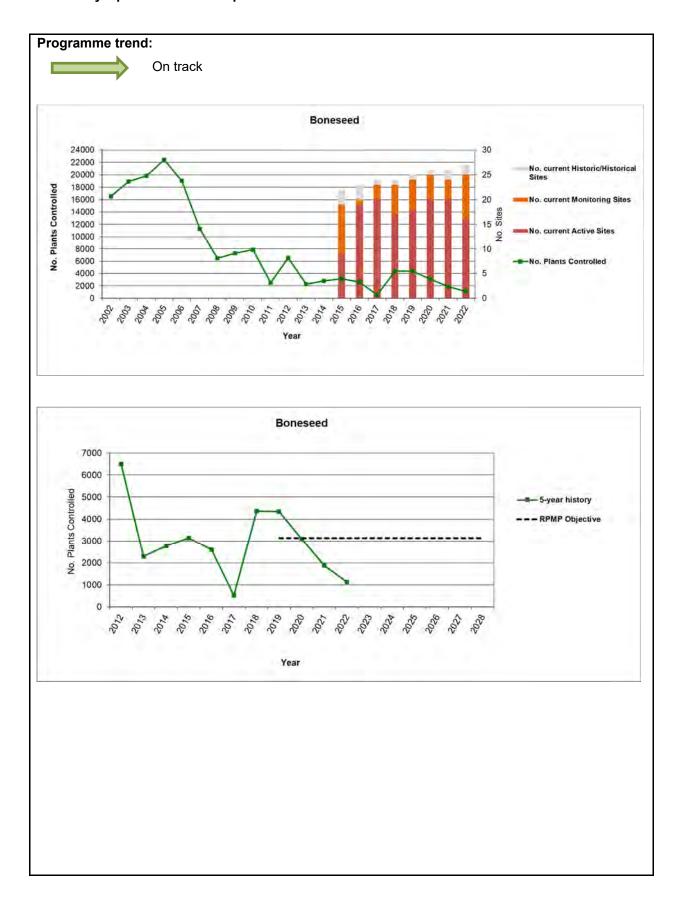






3. Boneseed (Chrysanthemoides monilifera)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led	
Objective	in the Marlborough	the Plan, control bone district to less than or e he environment and en	qual to 2015 levels to ι	minimise	
Operations overview	A Memorandum of Understanding has been agreed to by the Department of Conservation (DOC) and Council that includes the management of boneseed. Operational activities are pre-planned each year and are delivered by either: a) Council staff and/or contractors, or; b) Joint operations between DOC and Council staff and/or contractors (predominantly Queen Charlotte Sound/Tory Channel sites), or; c) DOC staff (Kenepuru Sound, Ocean Bay sites).				
Target 3.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.				
2021/2022	92% of sites with a status of active or monitoring were visited during 2021/2022. This resulted in the removal of 1128 plants. Of the two sites that were not visited – one on Moenui Road was where a single plant was found and destroyed in 2019, and the other an active site in Double Bay on Arapaoa Island. These sites will be prioritised in 2022/2023.				
Target 3.2	Each year, 33% of sites that have a status of historical are visited for surveillance activities.				
2021/2022	One	of the two historical sit	es was visited in 2021	/2022.	





Large boneseed shrub found in Rarangi

4. Broom (Cytisus scoparius)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led	
Objective 1	Over the duration of the Plan, control broom (<i>Cytisus scoparius</i>) in the Upper Awatere Broom Control Zone (excluding the Middlehurst Gorge Containment Area), Upper Wairau and Waima/Ure Broom and Gorse Control Zones to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.				
	*A baseline assessme commences.	ent will be made either p	rior to or immediately af	fter the Plan	
Objective 2	of the district, in situat adjoining land clear of	ne Plan, control broom (ions where the presence for being managed for b he environment and enjo	e of broom on boundarion of broom, to minimise adve	es threatens erse effects on	
Operations overview	within the respective F aware of the RPMP ol meet RPMP programr	ely deliver communication RPMP programme Zones bligations and follow thro me objectives. Surveillar as that can also assist oc	s. This will be to ensure ough with an adequate lace will also assist to for	e occupiers are level of control to rm accurate	
		follow-up and investigate st a boundary and poten			
Target 4.1	No more than 1 instar within the three Contro	nce of non-compliance no ol Zones	eeding enforcement ac	tion is identified	
2021/2022		No situations were ide	ntified requiring enforce	ement action.	
Target 4.2	Each year, undertake	inspection and/or survei	llance activities in all th	ree zones.	
2021/2022		were found. A number roadside, landowners i plants being found. Upper Wairau Inspections of land with a number of areas that Upper Awatere Given all occupiers with management programmer are more surveillance adone in conjunction with surveillance and the surve	hin this Zone were carri require follow up in the hin the Zone have very mes, the nature of Cour and information gatheri th property inspections There are a few instar	ed out. There are 2022/2023 year. active ncils operations ng. This of often assessing rabbit	

Target 4.3	Each year, any situation that comes to Council's attention with regard to broom is against a boundary and potentially threatening adjoining land is investigated, and compliance with the Rule determined, within 5 working days.		
2021/2022		No reports/complaints were received during the 2021/2022 year.	

5. Brushtail possum (*Trichosurus vulpecula*)

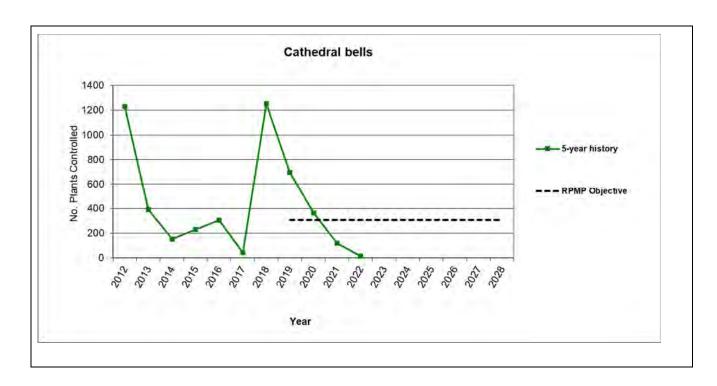
Exclusion	Eradicatio	n	Progressive Containment	Sustained Control	Site-led	
Objective	(<i>Trichosurus vu</i> Marlborough So	<i>ilpecu</i> ounds	la) on islands current (see Appendix 4 and	establishment of brush ly known to be possun I Map 4 of the RPMP) nt of the natural enviro	n-free in the to prevent future	
Operations overview		ess fo	or investigation/respo	en agreed to by DOC anse regarding a detect		
	In all instances,	joint	decision-making is to	occur.		
	Surveillance activities on the islands include both active activities (on predominantly 'pest-free' islands wholly occupied by DOC), and passive where there is a reliance of reports.					
	Education activities will occur within the community ensure the brushtail-possum free status of the islands, especially the large islands of Rangitoto ki te Tonga/D'Urville and Arapaoa where there is a mix of public and private land, is well understood and to report suspected sightings.					
Target 5.1	Each year, any situation that comes to DOC and/or Council's attention with regard to a report of a brushtail possum on any of the islands listed in the RPMP Programme, has an investigation started within 24 hours.					
2021/2022	One report of shoreline carcass on was received by the Department of Conservation (DOC) on Arapaoa Island. A jointly funded investigation was overseen by DOC with no evidence found of any other live possums.					
Status of brushtail po	ossums on desi	gnate	ed islands:			
Not established						

6. Bur daisy (Calotis lappulacea)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led			
Objective 1	no plants are four	sy (<i>Calotis lappulacea</i> nd in the preceding 5 effects on the econom	years, in the Marlbor				
Objective 2	found at densities	By the end of the term of this Plan, bur daisy (<i>Calotis lappulacea</i>) will only be found at densities less than or equal to 0.1 plants per man hour effort in the Marlborough district to prevent adverse effects on the economy.					
Operations overview	Council staff and/	Council staff and/or contractors will carry out all operational activities.					
Target 6.1		of sites that have a s surveillance activities		nitoring are visited			
ogramme trend:	rack	at the only known Bu Marlborough. Four p If a future trend dete	rmines that increase orrelate to an increas	e exist in d surveillance e in plants found,			
0.80 0.70 0.60 0.50 0.30 0.20		Bur daisy	180 - 160 - 140 - 120 - 100 §§ -	- S-year history - RPMP Objective			
0.00	2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2, 2	\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\\	60 40 20 0	— Hours effort			

7. Cathedral bells (Cobaea scandens)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led	
Objective	Marlborough district t	he Plan, control cathedro less than or equal to 2 enjoyment of the natura	2016 levels to minimise		
Operations overview	A Memorandum of Understanding has been agreed to by DOC and Council that includes the management of cathedral bells. DOC staff will undertake all operational activities. This is due to the current sites being aligned geographically with existing DOC operations and an acknowledgement by DOC as being a key beneficiary of intervening at these small numbers of sites.				
Target 7.1	Each year, 100% of s control and/or surveil	ites that have a status of ance activities.	of active or monitoring a	are visited for	
2021/2022	All five sites with the status of 'active or 'monitoring' were visited in 2021/2022. Only 16 plants were found and destroyed – substantially less than previous seasons.				
Target 7.2	Each year, 33% of sit activities.	es that have a status of	historical are visited fo	or surveillance	
2021/2022	3 sites out of 5 sites (60%) with a historical status were visited for surveillance activities during 2021/2022. No plants were found.				
Programme trend: On tre	ack				
1		Cathedral bells			
2000 1800 1600 1400 1200 0 800 400 200 0 800 0 0 0 0 0 0 0 0 0 0 0 0 0 0 0		20 00 00 00 00 00 00 00 00 00 00 00 00 0	10 8 No. cu 6 SS No. cu	urrent Historic/Historical Sites urrent Monitoring Sites urrent Active Sites	



8. Chilean needle grass (Nassella neesiana)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led	
Objective	Over the duration of the Plan, control Chilean needle grass (<i>Nassella neesiana</i>) in the Marlborough district to less than or equal to baseline levels* to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.				
	*A baseline assessment will be made either prior to or immediately after the Plan commences				
Operations overview	There are multiple facets to the Chilean needle grass programme delivered by Council. These are:				
		actors will undertake strate ority of sites. These are cor ions.			
		to develop management placessary, on the more heav		ıpliance	
		then where identified, prov f management plans.	ide cost sharing on the		
	 Work alongside the Chilean Needle Grass Action Group and any other rel projects to ensure work programmes are aligned and work in together as practicable. 				
	Continue to deliver ongoing communication, education and awareness initiatives.				
		/ork programmes Council one Chilean needle grass pr			
Target 8.1	Each year, an inspection is undertaken, or contact is made with the occupier, on 100% of sites that have an infestation of Chilean needle grass, where the occupier has a control obligation.				
2021/2022	Activ	e facilitation and/or inspec	tion occurred for 100% o	of sites.	
Target 8.2	Each year, carry out required management work, on 100% of sites that have an infestation of Chilean needle grass where Council undertakes strategic management.				
2021/2022		rol work visits by staff and/ e sites.	or contractors occurred	on 100% of	
Target 8.3	Each year, any report of potential Chilean needle grass received by Council is investigated within 2 working days.				
2021/2022	in 20	ncil received several report 21/2022. All reports had an s of receiving the report.			

Target 8.4	Each year, a minimum of 200 hours of surveillance is carried out on land not previously known to have an infestation of Chilean needle grass.		
2021/2022		A calculated total of 2819 hours of staff and contractor time was spent on surveillance activities outside of previously known infested areas.	
Target 8.5		to the Chilean Needle Grass Action Group or any other related ere are shared outcomes.	
2021/2022		Council managed a specific budget on behalf of the Chilean Needle Grass Action Group in 2020/21. This was used to contract NZ Landcare Trust to deliver facilitation services for the group and fund other group-initiated expenses.	
Target 8.6		nimum of 6 sites without any infestations of Chilean needle grass – l as being at risk - are visited for active surveillance.	
2021/2022		A total of 30 sites without known populations of CNG were and checked throughout the flowering season.	

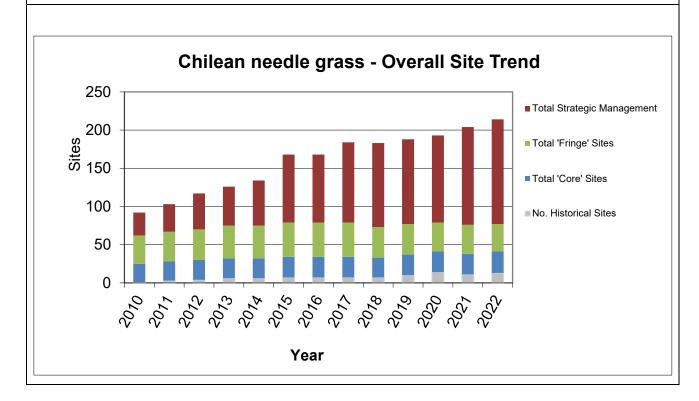
Programme trend:

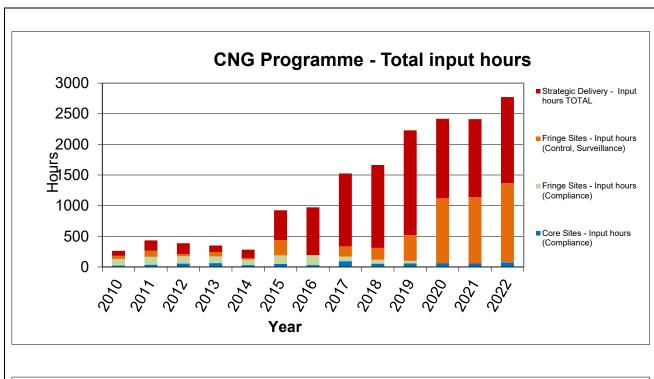


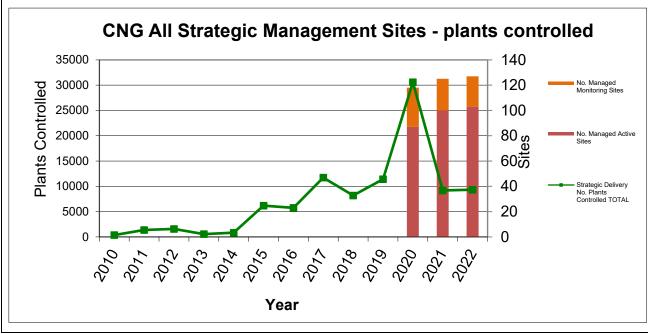
On track

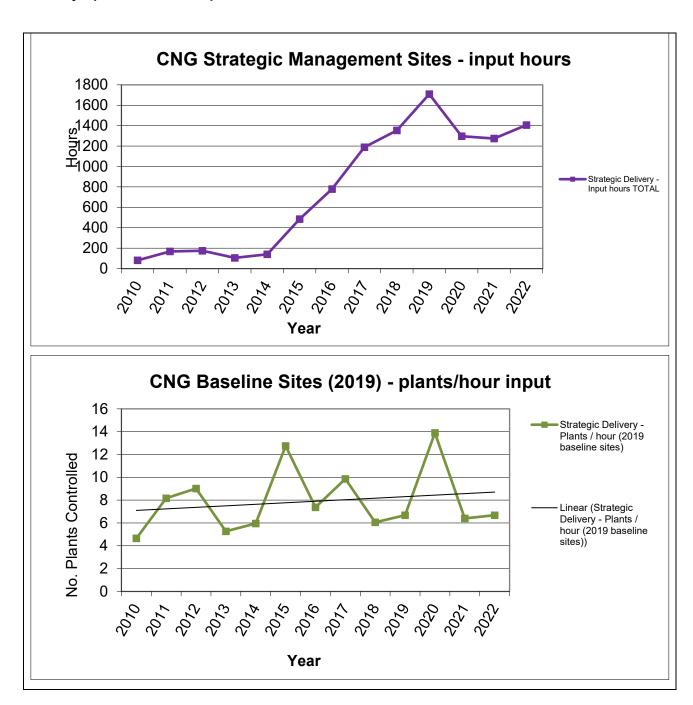
The following trend datasets are being used by Council to monitor the progress of the Chilean needle grass programme.

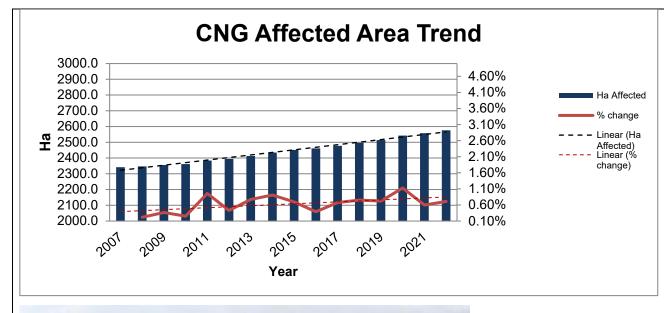
While the area affected is increasing, this is expected given this dataset is cumulative only. The number of plants controlled on strategic management sites is not trending upwards and the plants per unit effort is flat to marginally increasing on the baseline sites used for long term monitoring.









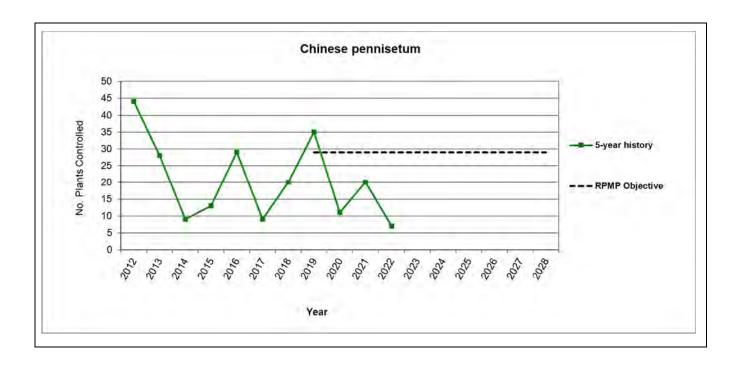




Chilean needle grass, found at Endeavour Park in Picton.

9. Chinese pennisetum (Pennisteum alpecuroides)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led		
Objective	in the Marlborough dis	Over the duration of the Plan, control Chinese pennisetum (<i>Pennisetum alpecuroides</i>) in the Marlborough district to less than or equal to 2016 levels to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.				
Operations overview	Council staff and/or co	Council staff and/or contractors will carry out all operational activities.				
Target 9.1	Each year, 100% of sit control and/or surveilla	es that have a status of nce activities.	active or monitoring are	visited for		
2021/2022	Overal to keep short-to follows	ive' and 'monitoring' site I, the annual plant numb o plant numbers at or be erm trend showing a spi ed by a decrease in plan of for this pattern of event	ers are trending to the flow 2016 levels. Howev ke in plant numbers eve t numbers in the followir	RPMP objective, ver, there is a ery 2-3 years		
Target 9.2	Each year, 33% of site activities.	s that have a status of h	istorical are visited for s	urveillance		
2021/2022	21 out of 60 historical sites were visited and no plants were found.					
Programme trend: On t	rack					
	Ch	inese pennisetum				
No. Plants Controlled 80 80 80 80 80 80 80 80 80 80 80 80 80	01-12-12-12-12-12-12-12-12-12-12-12-12-12		40 sg No 30 Sit 40 sg No 20 No	. current Historic/Historical es . current Monitoring Sites . current Active Sites . Plants Controlled		

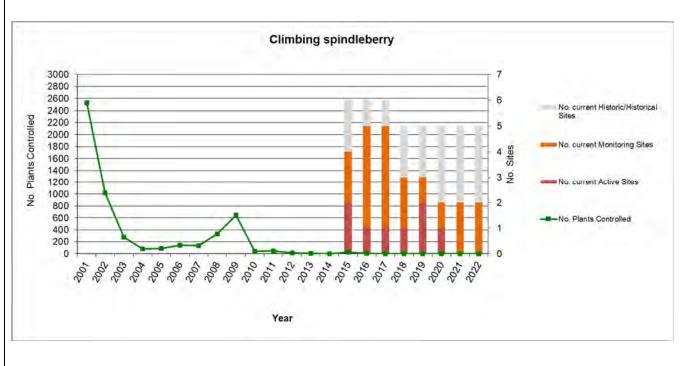


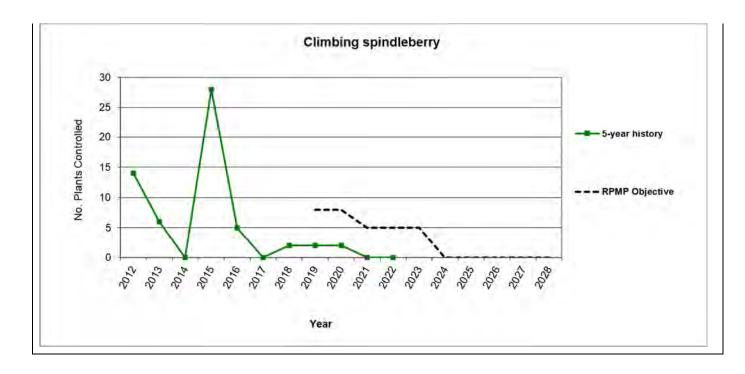
10. Climbing spindleberry (Celastrus orbiculatus)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led
Objective	By the end of the term of this Plan, climbing spindleberry (<i>Celastrus orbiculatus</i>) on all known sites in the Marlborough district will have been controlled to zero density to prevent adverse effects on the environment, and enjoyment of the natural environment.			
Operations overview		morandum of Understanding has been agreed to by DOC and Council that les the management of climbing spindleberry.		
	DOC staff will undertake all operational activities. This is due to the current sites being aligned geographically with existing DOC operations and an acknowledgement by DOC as being a key beneficiary of intervening at these small numbers of sites.			
Target 10.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.			
2021/2022		All 'active' and 'monitoring' sites were visited for 2021/2022. No plants were found at any of the sites. There are currently no active spindleberry sites in Marlborough.		
Target 10.2	Each year, 33% of sites that have a status of historical are visited for surveillance activities.			
2021/2022		All historical sites were visited, with no plants were found.		
Programme trend:	1	L		



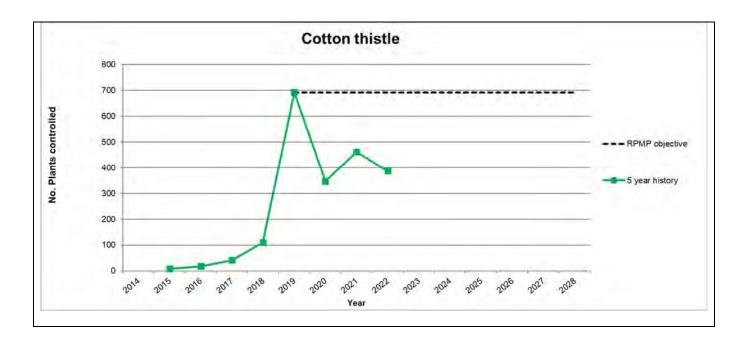
On track





11. Cotton thistle (Onopordum acanthium)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led
Objective	Marlborough district to	e Plan, control cotton this less than or equal to base ellbeing, the environment	eline levels* to minimise	adverse
	*A baseline level assessment will be made either prior to or immediately after the Plan commences.			
Operations overview	Council staff and/or contractors will carry out all operational activities.			
Target 11.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.			
2021/2022	All site 2021/2	s with a status of active o	or monitoring were visite	d in
Target 11.2	Each year, 33% of sites activities.	s that have a status of his	storical are visited for su	rveillance
2021/2022		ne historical site was visite were found.	ed for a surveillance insp	pection. No
Programme trend: On track	(
	- 0	Cotton thistle		
800 700 100 100 100 100 100 100 1	8102 8102	200 and a contract of the cont	20 18 16 14 No. current Histor No. current Monit 8 No. current Activit 6 No. Plants Cointre	cic/Historic sites oring Sites
	Year			



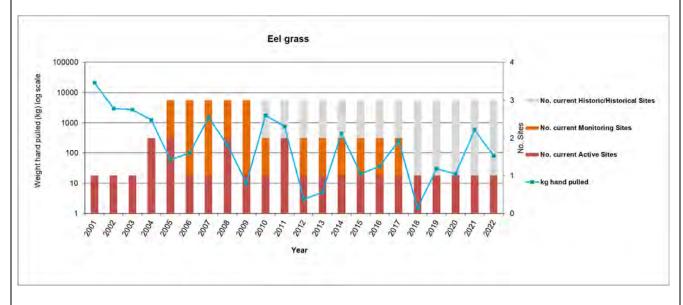
12. Eel grass (Vallisneria australis)

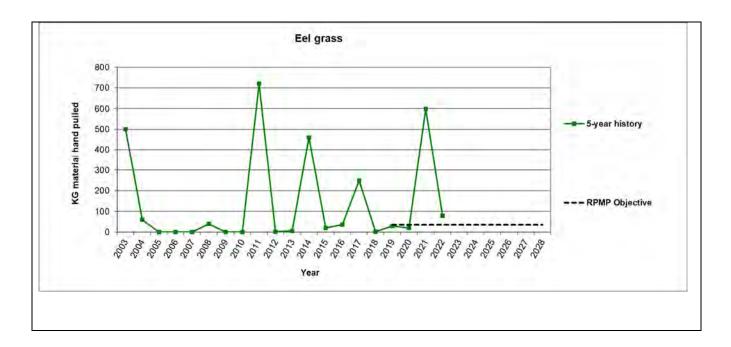
Eradication	Progressive Containment	Sustained Control	Site-led	
Over the duration of the Plan, control eel grass (<i>Vallisneria australis</i>) in the Marlborough district to less than or equal to 2016 levels to minimise adverse effects on the environment and enjoyment of the natural environment.				
Council staff and/or c	Council staff and/or contractors will carry out all operational activities.			
Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.				
All active/monitoring eel grass sites were visited in 2021/2022. 80 kilos of silt contaminated with eel grass rhizomes was removed from Waterlea Creek compared to 600 kg in 2020/2021.				
V\ re pi	The current data trend shows that the eel grass density at Waterlea Creek spikes every second or third year, despite the removal of all visible plants each year. A change in operational practice is recommended to ensure closer monitoring of the infestation site throughout the year.			
	Over the duration of the Marlborough district to the environment and control staff and/or control and/or surveill Align Align The Market of the duration of the Marlborough district to the environment and control and/or control and/or surveill Align The Market of the Market of the Marlborough district to the environment and control and/or surveill Align The Marlborough district to the Marlborough district to the environment and control and/or control and/or surveill Align The Marlborough district to the environment and control and/or control and/or surveill Align The Marlborough district to the environment and control and/or surveill Align The Marlborough district to the environment and control and/or surveill Align The Marlborough district to the environment and control and/or surveill Align The Marlborough district to the environment and control and/or surveill Align The Marlborough district to the environment and control and/or surveill Align The Marlborough district to the environment and control and/or surveill The Marlborough district to the environment and control and/or surveill Align The Marlborough district to the environment and control and c	Containment Over the duration of the Plan, control eel grass (Van Marlborough district to less than or equal to 2016 If the environment and enjoyment of the natural environment and enjoyment of the natural environment and/or contractors will carry out all operation of the natural environment and/or contractors will carry out all operation of sites that have a status of action control and/or surveillance activities. All active/monitoring eel grass kilos of silt contaminated with of from Waterlea Creek compare. The current data trend shows waterlea Creek spikes every some removal of all visible plants eal practice is recommended to environment.	Over the duration of the Plan, control eel grass (<i>Vallisneria australis</i>) in the Marlborough district to less than or equal to 2016 levels to minimise advers the environment and enjoyment of the natural environment. Council staff and/or contractors will carry out all operational activities. Each year, 100% of sites that have a status of active or monitoring are visite control and/or surveillance activities. All active/monitoring eel grass sites were visited in 2020/kilos of silt contaminated with eel grass rhizomes was refrom Waterlea Creek compared to 600 kg in 2020/2021. The current data trend shows that the eel grass density Waterlea Creek spikes every second or third year, despremoval of all visible plants each year. A change in ope practice is recommended to ensure closer monitoring or	

Programme trend:



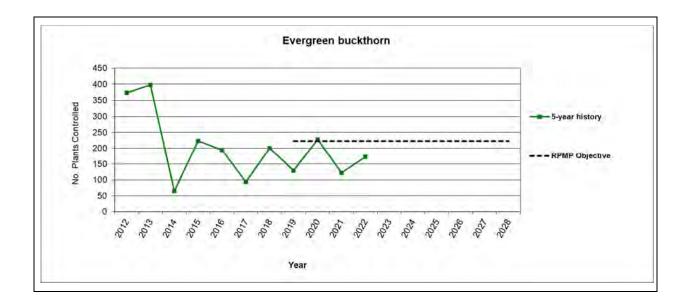
Not meeting objective





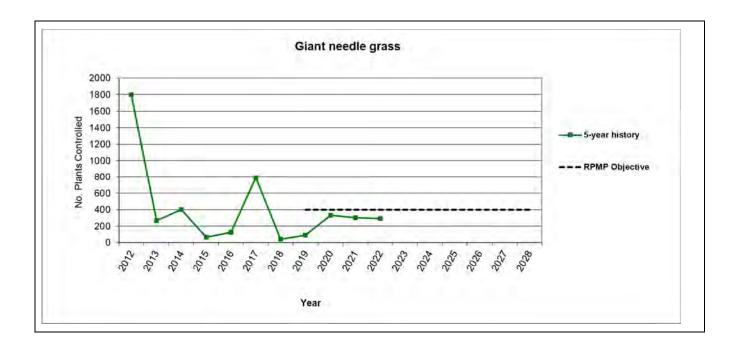
13. Evergreen buckthorn (Rhamnus alaternus)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led		
Objective	Over the duration of the Plan, control of evergreen buckthorn (<i>Rhamnus alaternus</i>) in the Marlborough district to less than or equal to 2015 levels to minimise adverse effects on the environment and enjoyment of the natural environment.					
Operations overview		A Memorandum of Understanding has been agreed to by DOC and Council that includes the management of evergreen buckthorn.				
	•	are pre-planned each	year and are delivere	d by either:		
	a) DOC staff, or;					
	b) A joint operation	between DOC and Co	uncil staff and/or conti	ractors.		
Target 13.1	Each year, 100% of s control and/or surveil	sites that have a status lance activities.	s of active or monitorin	g are visited for		
2021/2022		All active and monitoring evergreen buckthorn sites were visited in 2021/2022.				
Target 13.2	Each year, 33% of si activities.	Each year, 33% of sites that have a status of historical are visited for surveillance activities.				
2021/2022		The only historical evergreen buckthorn site was visited during 2021/2022, and no plants were found.				
Programme trend: On tra	ack					
	Eve	ergreen buckthorn				
2000 1800 1600 1400 1200 1000 800 400 200 0	Q LL Q Q Q Q Yea		7 6 88 No. cu	rrent Historic/Historical Sites rrent Monitoring Sites rrent Active Sites ants Controlled		



14. Giant needle grass (Austrostipa rudis)

	Containment	Control	Site-led	
Over the duration of the Plan, control giant needle grass (Austrostipa rudis) in the Marlborough district to less than or equal to 2014 levels to minimise adverse effects on economic wellbeing.				
Council staff and/or contractors will carry out all operational activities.				
Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.				
	100% of all high priority sites were visited for control work. The number of plants found remained below the RPMP objective.			
Each year, 33% of site activities.	Each year, 33% of sites that have a status of historical are visited for surveillance activities.			
5 out of 6 historical sites were visited for surveillance activities.				
ack				
G	Biant needle grass			
	\$100 \$100 \$100 \$100 \$100 \$100 \$100 \$100	7 6 gg No. ca 5 gg No. ca 4 2 No. ca 3 2 No. P	urrent Historic/Historical Sites urrent Monitoring Sites urrent Active Sites lants Controlled	
	Marlborough district to economic wellbeing. Council staff and/or co Each year, 100% of sit control and/or surveilla 100% of plan Each year, 33% of site activities. 5 out o	Over the duration of the Plan, control giant need Marlborough district to less than or equal to 20 economic wellbeing. Council staff and/or contractors will carry out a Each year, 100% of sites that have a status of control and/or surveillance activities. 100% of all high priority sites w of plants found remained below activities. 5 out of 6 historical sites were weak. Giant needle grass	Over the duration of the Plan, control giant needle grass (Austrostipa Marlborough district to less than or equal to 2014 levels to minimise a economic wellbeing. Council staff and/or contractors will carry out all operational activities. Each year, 100% of sites that have a status of active or monitoring ar control and/or surveillance activities. 100% of all high priority sites were visited for control of plants found remained below the RPMP objective. Each year, 33% of sites that have a status of historical are visited for activities. 5 out of 6 historical sites were visited for surveillance ack Giant needle grass	



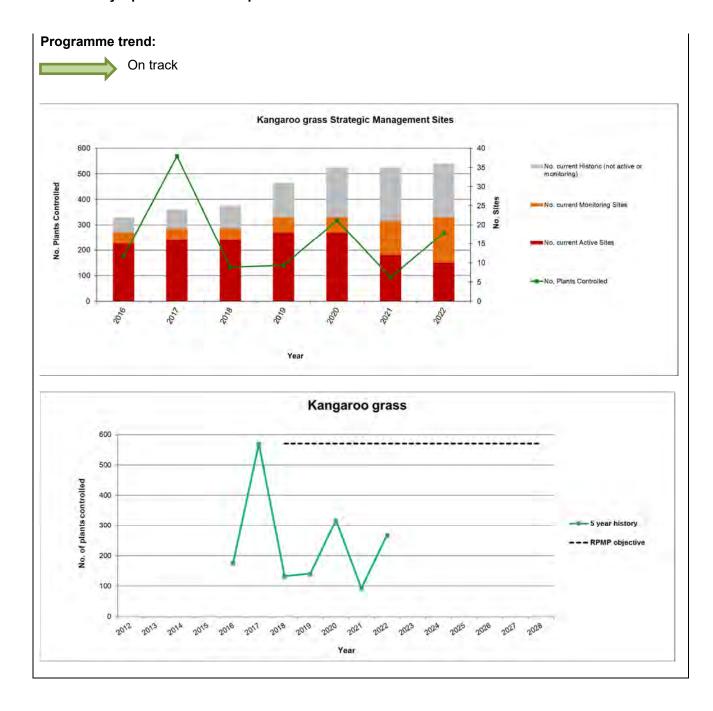
15. Gorse (*Ulex europaeus*)

Exclusion	Eradica	ation Progressive Sustained Site Containment					
Objective 1	Over the duration of the Plan, control gorse (<i>Ulex europaeus</i>) in the Upper Awatere Gorse Control Zone and the Upper Wairau and Waima/Ure Broom and Gorse Control Zones to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.						
Objective 2	Over the duration of the Plan, control gorse (<i>Ulex europaeus</i>) across the remainder of the district, in situations where the presence of gorse on boundaries threatens adjoining land clear of or being managed for gorse, to minimise adverse effects on economic wellbeing.						
Operations overview	Council staff will actively deliver communication, compliance and surveillance activities within the respective RPMP programme zones. This will be to ensure occupiers are aware of the RPMP obligations and follow through with an adequate level of control to meet RPMP programme objectives. Surveillance will also assist form accurate datasets of infestations that can also assist occupiers target control efforts.						
				gate situations that co tentially threatening ac			
Target 15.1	No more the within the the			ce needing enforcemer	nt action is identified		
2021/2022		No instances requiring enforcement action were identified this season.					
Target 15.2	Each year,	undertake	e inspection and/or su	rveillance activities in	all three zones.		
2021/2022		found. A landown found. Upper W Inspection number Upper A Given all program and info property	ance was undertaken number of landowned ers indicated that the value on sof land within this of areas that require watere I occupiers within the ermes, the nature of Commation gathering. The inspections assessing	in the Ure area, very for were spoken to on the ere were spoken to on the ere were very few brooks. Zone were carried out follow up this in the 20 are active ouncils operations are his of often done in contract on a prabbit population abow-up maybe needed in the ere were active ouncils operations.	the roadside, m plants being t. There are a 22/2023 year. e management more surveillance ijunction with undance. There are		

Target 15.3	boundary p	Each year, any situation that comes to Council's attention with regard to gorse on a boundary potentially threatening adjoining land is investigated, and compliance with the Rule determined, within 5 working days.				
2021/2022		One report was received and followed up with within 5 working days.				

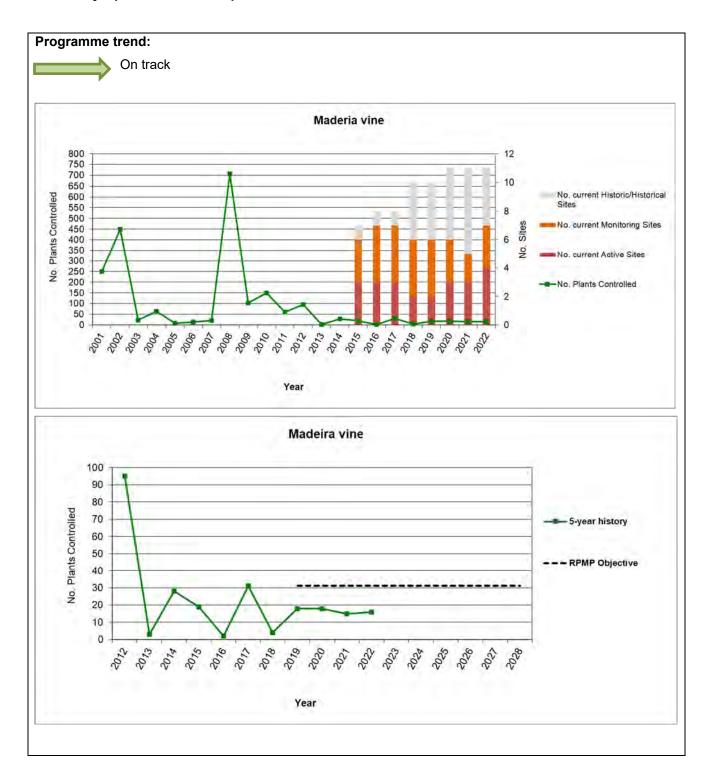
16. Kangaroo grass (*Themeda triandra*)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led		
Objective	Marlborough district to	ne Plan, control kangaroo less than or equal to bas rellbeing, the environment	eline levels* to minimis	e adverse		
	*A baseline assessment will be made either prior to or immediately after the Plan commences.					
Operations overview	There are multiple facets to the kangaroo grass programme delivered by Counci These are:					
	 Staff and/or contractors will undertake strategic management of kangaroo grass on the majority of sites. These are commonly the newer or smaller, scattered infestations. 					
	 Active facilitation to develop management plans, and undertake compliance function where necessary, on the more heavy infested sites. 					
	 Continue to deliver ongoing communication, education and awareness initiatives. 					
		vork programmes Council on the kangaroo grass pr				
Target 16.1		on is undertaken, or conta e an infestation of kangar				
2021/2022		percent of sites (11 prope ance programme were in		ve		
Target 16.2		surveillance, and carry ou e an infestation of kangar :.				
2021/2022	undert	ercent of sites subject to a akes strategic manageme aken if required.				
	The or	ne site not visited will be p	rioritised in the 2022/20	023 season.		
Target 16.3		of 20 hours of surveilland ave an infestation of kang		I not		
2021/2022		ulated total of 84 hours of veillance activities outside		•		



17. Madeira vine (Anredera cordifolia)

Exclusion	Eradication	on	Progressive Containment	Sustained Control	Site-led		
Objective	Over the duration of the Plan, control madeira vine (<i>Andredera cordifolia</i>) in the Marlborough district to less than or equal to 2017 levels to minimise adverse effects on the environment and enjoyment of the natural environment.						
Operations overview	A Memorandum of Understanding has been agreed to by DOC and Council that includes the management of madeira vine.						
	Operational ac	erational activities are pre-planned each year and are delivered by either:					
	a) Council s	ouncil staff and/or contractors (Blenheim, Seddon, Ward sites), or;					
	b) DOC staf	staff (Marlborough Sounds sites).					
	Sounds. This i DOC operation	DOC staff will undertake all operational activities for the sites within the Marlborough Sounds. This is due to the current sites being aligned geographically with existing DOC operations and an acknowledgement by DOC as being a key beneficiary of intervening at these small numbers of sites.					
Target 17.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.						
2021/2022	T a	All 'active' and 'monitoring' sites were visited for control in 2021/2022. This resulted in the destruction of 16 plants. These plants were found across 4 active sites. No plants have been found at three of the monitoring sites for the last 5 years, and status of these sites has been changed to 'historical'.					
Target 17.2	Each year, 33 ^o activities.	% of sit	es that have a status	of historical are visited	d for surveillance		
2021/2022	A	ll histor	ical sites were visited	d, and no plants were f	ound.		



18. Mediterranean fanworm (Sabella spallanzanii)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led			
Objective	(Sabella spallanza	Over the duration of the Plan, prevent the establishment of Mediterranean fanworm (<i>Sabella spallanzanii</i>) in Marlborough to eliminate adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.					
Operations overview		There are multiple facets to the Mediterranean fanworm programme delivered by Council. These are:					
	 Specialist dive contractors will undertake surveillance and removal of Mediterranean fanworm within areas where it has been detected previously. Currently that is only Picton Marina. 						
	risk of ingres Bay, Picton F	Specialist dive contractors will undertake targeted surveillance in areas of high risk of ingress into Marlborough. There are currently Waikawa Marina, Waikawa Bay, Picton Port, Shakespeare Bay, Okiwi Bay, Elaine Bay, Duncan Bay, Endeavour Inlet, Ship Cove and Oyster Bay (Port Underwood).					
		Responding to reports of suspected Mediterranean fanworm and/or fouled vessels that have recently arrived and undertaking compliance action if necessary.					
		Deliver ongoing communication, education and awareness initiatives as is appropriate in conjunction with the Top of the South Marine Biosecurity Partnership					
	can have an influe	Note: there are other work programmes Council delivers outside of the RPMP that can have an influence on the Mediterranean fanworm programme (see Part Two – Specific Projects).					
Target 18.1		num of two dive surveilla on Marina, Waikawa Ma					
2021/2022	Picto May/s	acted divers undertook n and Waikawa Marina d lune 2022. Small numbe g this surveillance.	over Nov/Dec/Jan 202	1/22 and in			
		checks were undertaker orm found.	in Port Underwood ar	nd Grove arm with no			
Target 18.2		num of two dive surveillation Port, and Shakespe		ndertaken in			
2021/2022	Bay.	Only one dive surveillance operation was undertaken in Shakespeare Bay. The delays in delivering this programme were due to issues with contractor capacity to deliver within the required timeframe. No fanworm were found during these operations.					
Target 18.3		num of one dive surveill n Bay, Endeavour Inlet, ina.					
2021/2022	Marir	surveillance was underta a, due to issues with co red timeframe.					

Target 18.4

Each year, any situation that comes to Council's attention with regard to suspected Mediterranean fanworm or a fouled vessel recently arrived into Marlborough, has an investigation started within 24 hours.

2021/2022



A number of vessels were notified to Council via Marlborough Sounds Marinas that may be a risk to the programme. A number of these vessels were able to be assessed and snorkelled by the Biosecurity team.

All reports of fanworm had an investigation started within 24hrs.

Status of Mediterranean fanworm in Marlborough: Not established

Detected in Picton Marina, Waikawa Marina, Grove Arm and Port Underwood (East Arm) – there is no evidence of establishment after response actions.

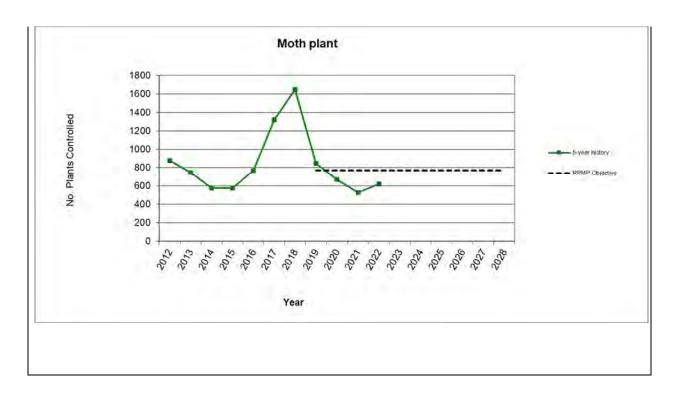
Dectected on vessels arrived from out of region – no evidence of establishment after response actions.



Biosecurity Officer inspecting a high risk structure that arrived from the North Island

19. Moth plant (*Araujia hortorum*)

	Eradication	Progressive Containment	Sustained Control	Site-led		
Objective	Marlborough district	the Plan, control moth to less than or equal to conment and enjoyment o	2016 levels to mir	nimise adverse		
Operations overview	Council staff and/or	contractors will carry or	ut all operational ad	ctivities.		
Target 19.1	Each year, 100% of sites that have a status of active or monitoring are visited control and/or surveillance activities.					
2021/2022	comr priori were	e inspection priority was nencement of Moth plar ty included 85 'monitorion inspected resulting in th ings).	nt control in 2021/2 ng' sites and 33 'ad	022; the inspection ctive' sites, all sites		
Target 19.2	Each year, 33% of sactivities.	sites that have a status	of historical are vis	ited for surveilland		
2021/2022	75 of	the 212 historical sites	(35%) were inspec	cted in 2021/2022.		
Programme trend: On tra	ck					
+						
		Moth plant				
3000 2800 2800 2400 2400 2200 2000 1800 1600 1400 1200 1000 800 600 400 200	\$0000000000000000000000000000000000000	Moth plant	400 350 300 250 200 9 150 100 50	No current Historic/Risporcal Sites No current Monitoring Sites No current Active Sites No Plants Controlled		



20. Nassella tussock (Nassella trichotoma)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led			
Objective	Over the duration of the Plan, control nassella tussock (<i>Nassella trichotoma</i>) in the Marlborough district to a population trend that is level or reducing to minimise adverse effects on economic wellbeing, the environment, and enjoyment of the natural environment.						
Operations overview	There are multiple facets to the nassella tussock programme delivered by Counc These are:						
	 Staff and/or contractors will undertake periodic surveillance for nassella tusso on a number of sites. These are commonly the historical, smaller, or scattered infestations to check they are not becoming established or re-established. 						
	 Undertake an active compliance function on the majority of sites. This inv communication with occupiers and the use of Management Plans that hele schedule control work that the occupier must complete and compliance inspections that Council may undertake. For more heavily infested sites, facilitation of the development of Manage Plans may be more comprehensive and involve the use of mapping and of management to assist the occupier. Continue to deliver ongoing communication, education and awareness initiatives. 						
		work programmes Cou e on the nassella tusso					
Target 20.1		I, provide to occupiers on, communication deta					
2021/2022	sent lette	For the 2021 active compliance programme 370 land occupiers were sent letters reminding them of their obligation to destroy nassella tussock.					
Target 20.2		tion is undertaken, on d the site is part of the a					
2021/2022	271 sites (73% of all sites subject to the active compliance programm were inspected to ensure land occupiers were meeting their obligation to destroy nassella tussock on their property.						
Target 20.3		e surveillance, and carr not part of the active c					
2021/2022		ance activities were car to the active complianc		3 sites (35%) not			
Target 20.4		m of 200 hours of survenave an infestation of n		n land not			

2021/2022

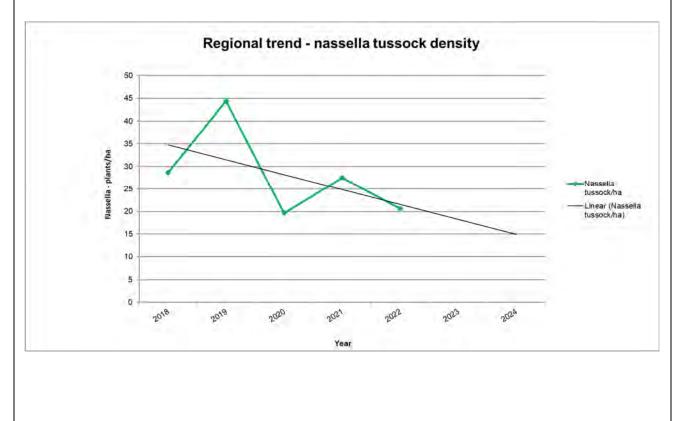


A total of 572 hours has been calculated to have been spent undertaking passive surveillance on affected properties but on land not previously known to have an infestation of nassella tussock.

Where new infestations were found the spatial distribution data was updated in Council's geographical information system to map the distribution of nassella in the Marlborough region.

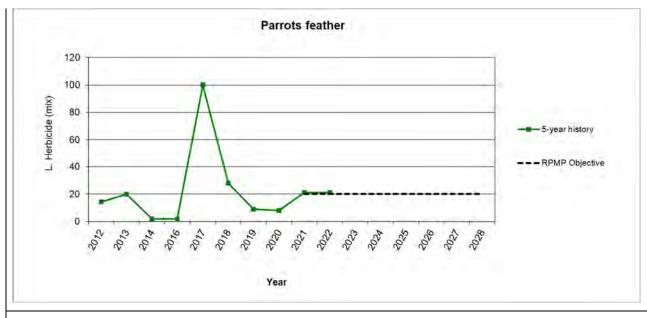
Programme trend:





21. Parrots feather (Myriophyllum aquaticum)

	Eradication	Progressive Containment	Sustained Control	Site-led
Objective	the Marlborough d	of the Plan, control parrots listrict to less than or equa ironment and enjoyment o	ll to 2013 levels to minimis	se adverse
Operations overview	Council staff and/o	or contractors will carry ou	t all operational activities.	
Target 21.1		of sites that have a status veillance activities.	of active or monitoring are	e visited for
2021/2022		biosecurity staff. Patche	nonitoring sites were visites of parrots feather were the Opaoa Loop, and 21 ontrol these plants.	found in
Target 21.2	Each year, 33% of activities.	f sites that have a status c	f historical are visited for	surveillance
Programme trend:	: of meeting objective	Four out of the four histoactivities, and no parrote	orical sites were visited fo s feather was found.	r surveillance
		Parrots feather		
120 100 100 80 60 00 200 200 200 200 200 200 200 200			No. current Moi No. current Act L Herbicide (mi	tive Sites

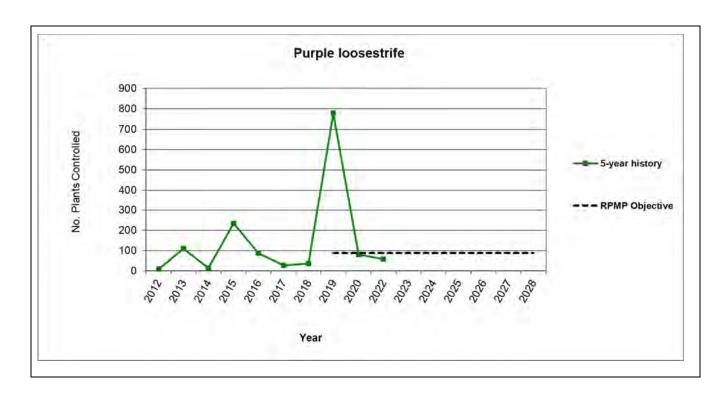




Patch of parrots feather near Ruakanakana Creek

22. Purple loosestrife (Lythrum salicaria)

Objective Over the duration of the Plan, control purple Loosestrife (Lythrum salicaria) in Mariborough district to less than or equal to 2016 levels to minimise adverse on the environment and enjoyment of the natural environment. Operations overview Council staff and/or contractors will carry out all operational activities. Target 22.1 Each year, 100% of sites that have a status of active or monitoring are visited control and/or surveillance activities. 100% of 'active' and 'monitoring' sites were inspected and coundertaken. 57 plants were destroyed in 2021/2022. Target 22.2 Each year, 33% of sites that have a status of historical are visited for surveilla activities. One of the two historical sites was visited in 2021/2022, and in were found.	ressive Sustained Site-led ainment Control	Eradication	Exclusion
Target 22.1 Each year, 100% of sites that have a status of active or monitoring are visited control and/or surveillance activities. 100% of 'active' and 'monitoring' sites were inspected and coundertaken. 57 plants were destroyed in 2021/2022. Target 22.2 Each year, 33% of sites that have a status of historical are visited for surveillance activities. One of the two historical sites was visited in 2021/2022, and reference found. Programme trend: On track Purple Loosestrite	or equal to 2016 levels to minimise adverse effects	Marlborough district to	Objective
control and/or surveillance activities. 2021/2022 100% of 'active' and 'monitoring' sites were inspected and coundertaken. 57 plants were destroyed in 2021/2022. Each year, 33% of sites that have a status of historical are visited for surveillactivities. One of the two historical sites was visited in 2021/2022, and refound. Programme trend: On track Purple Loosestrite	ill carry out all operational activities.	Council staff and/or co	Operations overview
undertaken. 57 plants were destroyed in 2021/2022. Each year, 33% of sites that have a status of historical are visited for surveilla activities. One of the two historical sites was visited in 2021/2022, and a were found. Programme trend: On track Purple Loosestrite			Target 22.1
Programme trend: On track Purple Loosestrife		underta	2021/2022
Programme trend: On track Purple Loosestrife	a status of historical are visited for surveillance		Target 22.2
900 800 16	torical sites was visited in 2021/2022, and no plants	were fo	Programme trend:
18	ife		
300 300 200 No. current Monitoring Sites No. Plants Controlled Year			800



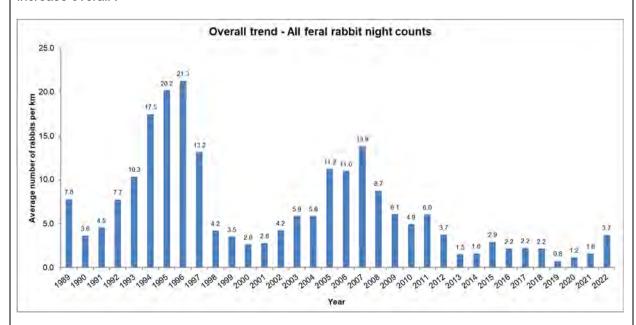
23. Rabbits - feral (*Oryctolagus cuniculus*)

Exclusion	Eradicatio	n	Progressive Containment	Sustained Control	Site-led		
Objective	Marlborough di	Over the duration of the Plan, control feral rabbits (<i>Oryctolagus cuniculus</i>) in the Marlborough district to a population trend that is level or reducing to minimise adverse effects on economic wellbeing and the environment.					
Operations overview	There are multi are:	There are multiple facets to the rabbit programme delivered by Council. These are:					
	 Staff undertaking targeted inspections of properties located in either high rabbit-prone parts of the district or those that have a recent history of sustaining high rabbit population levels. 						
	 Supporting research initiatives that seek to continue to maintain the efficacy of biological control agents such as the Rabbit Haemorrhagic Disease Virus (RHDV). 						
	Continue to deliver ongoing communication, education and awareness initiatives.						
Target 23.1		Each year, a schedule of sites is generated by 31 January outlining the coming season's inspections.					
2021/2022		An inspection schedule was developed by 31 January 2022 targeting properties in rabbit prone areas.					
Target 23.2		Each year, 100% of sites identified on the inspection schedule are inspected to assess rabbit population levels.					
2021/2022			es targeted for inspecti er/autumn 2022.	on were visited during	late		

Programme trend:



Rabbit numbers in the Upper Awatere and Waihopai appear to remain relativly low overall, however there was one night count that had a sharp increase in rabbit numbers which has shown a slight increase overall.

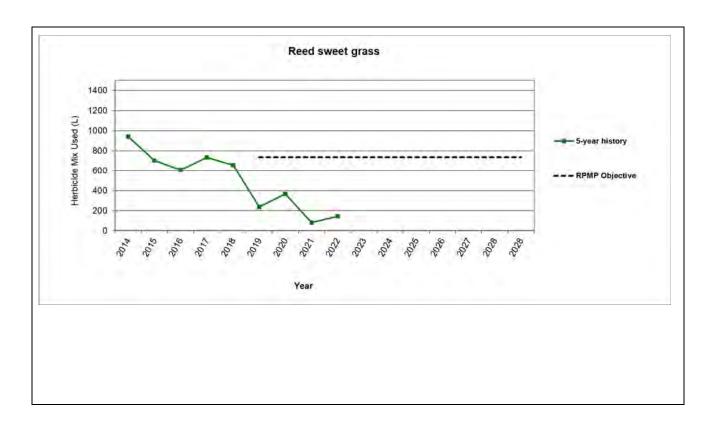




Inspecting rabbit ground sign on an Upper Awatere Valley property

24. Reed sweet grass (Glyceria maxima)

Exclusion	Eradicati	ion	Progressive Containment	Sustained Control	Site- led
Objective	Marlborough d	istrict to	ess than or equal to 20	eet grass (<i>Glyceria maxii</i> 117 levels to minimise ad nt and enjoyment of the i	lverse
Operations overview	Council staff a	nd/or cor	ntractors will carry out a	Il operational activities.	
Target 24.1	Each year, 100 control and/or			active or monitoring are	visited for
2021/2022		season. The amo		were visited during the 2 control infestations this son.	
Target 24.2	Each year, 33 ^o activities.	% of sites	s that have a status of h	nistorical are visited for s	urveillance
2021/2022		detected. One of th future be	ese sites may be re-cla	ited, and no reed sweet assified as 'eradicated' ir tion was contained within aterway.	the near
Programme trend: On trac	k				
	k	Re	ed Sweet Grass		
	k			20 16 16 16 Na. current Historic (12 12 10 Na. current Monitoris No. current Active S; 6 Herbicide Mix Used 4 2	not active or monitorin ng Siles



25. Rooks (Corvus frugilegus)

Exclusion	Eradica	ation	Progressive Containment	Sustained Control	Site-led		
Objective	Over the duration of the Plan, prevent the establishment of rooks (<i>Corvus frugilegus</i>) in the Marlborough district to prevent future impacts on economic wellbeing.						
Operations overview	Council staff and/or contractors will carry out all operational activities should rooks be detected in Marlborough.						
Target 25.1		year, undertake an appropriate awareness activity within the community to atterned to reporting of rooks if they are seen.					
2021/2022		The taxidermy rook was taken to a Biosecurity event held in Seddon.					
Target 25.2	Each year,	respond t	o any report of rooks	in Marlborough within	2 working days.		
2021/2022			espond to any report of rooks in Marlborough within 2 working days. One report of a lone rook was received this year on Stephens Island. further confirmed sightings have been reported in Marlborough.				
Status of rooks in Ma	arlborough:	Not octob	lichod				

Status of rooks in Marlborough: Not established

Last detection was in March 2020 (Tetley Brook Road). One bird was destroyed.

26. Rough horsetail (Equisetum hyemale)

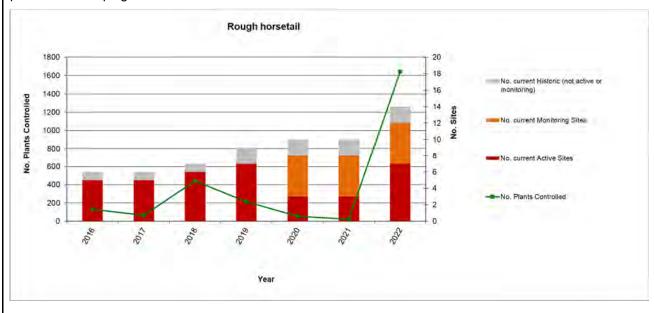
Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led			
Objective	Over the duration of the Plan, control rough horsetail (<i>Equisetum hymale</i>) in the Marlborough district to a population trend that is level or reducing, to minimise adverse effects on economic wellbeing, the environment, and enjoyment of the natural environment.						
Operations overview	Council staff and/or c	Council staff and/or contractors will carry out all operational activities.					
Target 26.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.						
2021/2022	In add	100% of active or monitoring sites were visited. In addition, four new rough horsetail sites were identified in 2021/2022. Each site contained a significant number of plants, and, because of this, there has been a large spike in the numbers of plants controlled.					
Target 26.2	Each year, 33% of sites that have a status of historical are visited for surveillance activities.						
2021/2022	All his	All historical sites were visited, no rough horsetail was detected.					

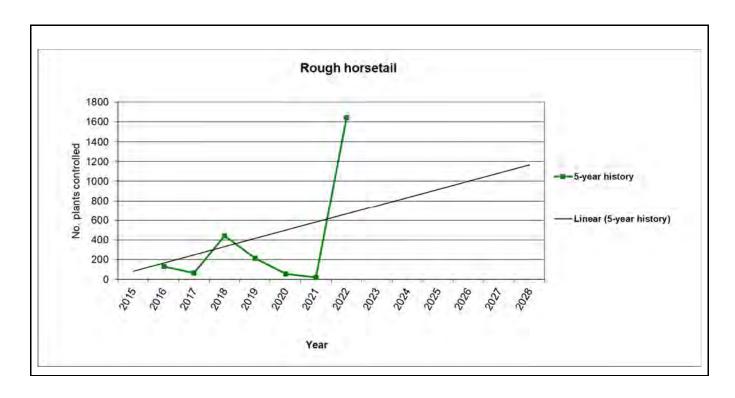
Programme trend:



Not meeting objective

This is a newer programme and there are still new sites being discovered associated to the historical use of the plant in landscaping features.





27. Saffron thistle (Carthamus lanatus)

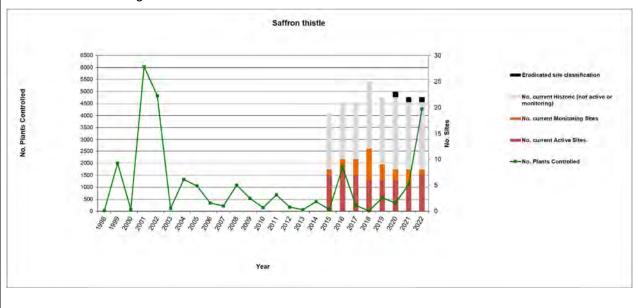
Exclusion	Eradicat	ion	Progressive Containment	Sustained Control	Site-led
Objective	Over the duration of the Plan, control saffron thistle (<i>Carthamus lanatus</i>) in the Marlborough district to less than or equal to 2016 levels to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.				
Operations overview	Council staff a	and/or co	ntractors will carry out a	ll operational activities.	
Target 27.1	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.				
2021/2022		All sites with a status of 'active' or 'monitoring' were visited in 2021/2022. There was a sharp increase in numbers this year which was largely attributable to the discovery of new infestations on two existing properties.			
Target 27.2	Each year, 33% of sites that have a status of historical are visited for surveillance activities.				urveillance
2021/2022			13 historical sites (46% vere found.) were visited in 2021/20	22 and no

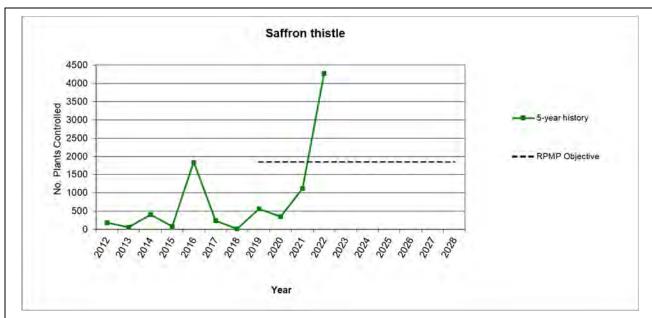
Programme trend:



Not meeting objective

The seed of saffron thistle is known to be extremely long-lived. The new infestations found could well relate to an historical seeding event.







Biosecurity officer Brent Holms controlling saffron thistle

28. Senegal tea (*Gymnocoronis spilanthoides*)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led		
Objective	Over the term of the Plan, prevent the establishment of Senegal tea (<i>Gymnocoronis spilanthoides</i>) in the Marlborough district to prevent future impacts on environmental values and the enjoyment of the natural environment.					
Operations overview	Council staff and/or contractors will carry out all operational activities should Senegal tea be detected in Marlborough.					
Status of Senegal tea in Marlborough: Not established Historically eradicated						

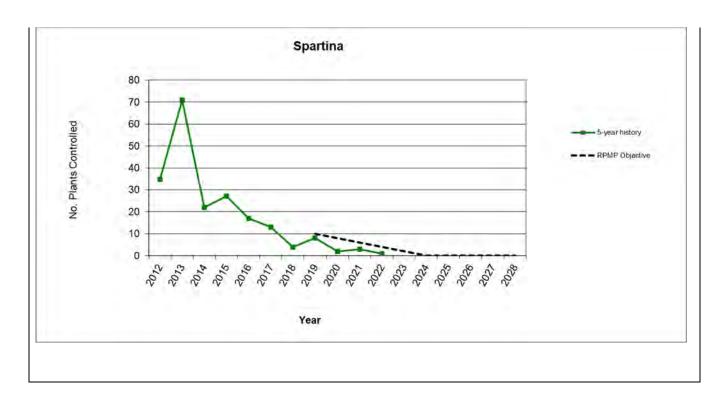
29. Spartina (Spartina anglica)

Exclusion	Eradicatio	n	Progressive Containment	Sustaine Control				
Objective	Marlborough distr	By the end of the term of this Plan, spartina (Spartina anglica) on all known sites in Marlborough district will have been controlled to zero density to prevent adverse effects on the environment, and enjoyment of the natural environment.						
Operations	Operations for thi	s progr	amme are led and delive	red by DOC.				
overview								
Target 29.1	Each year, 100% control and/or sur		s that have a status of acce activities.	tive or monitoring	g are visited for			
2021/2022	f	100% of all 'active' and 'monitoring' sites (8 in total) were visited control or surveillance activities for 2021/2022. Only 1 plant was found during 900 hours of searching. The number of plants found over the years has reduced, and this trend is following the RPM objective for this pest programme.						
Target 29.2	Each year, 33% c	of sites	that have a status of hist	orical are visited	for surveillance			
2021/2022	a	ctivities	ut of 6 historical sites we s. This included Fairy Ba Bay in the Kenepuru. No	y in the Pelorus, (Okiwi Bay, and			
Programme trend: On t	rack							
		Spartina						
No. of plants controlled 60				20 - 18 - 16 - 14 - 12	No. current Historic (not active or monitoring) No. current Monitoring Sites			
f plants o				10 N	No. current Active Sites			

2017 Year

2013

2015



30. Tall wheat grass (Thinopyrum ponticum)

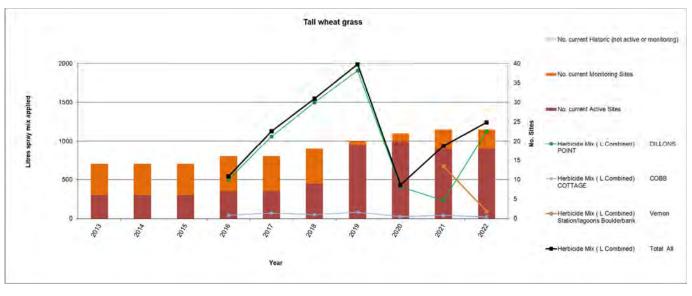
Marlborough dist economic wellbe Council staff and	strict to I eing, the	e Plan, control tall wheat of less than or equal to 2016 e environment, and enjoy	levels to minimise ad		
	d/or con			/ironment.	
Each year 100%		ntractors will carry out all	operational activities.		
	Each year, 100% of sites that have a status of active or monitoring are visited for control and/or surveillance activities.				
	100% of all known sites were visited for surveillance or control activities. Additional surveillance activities were undertaken within the Vernon Lagoons area which resulted in one small infestation being found. An additional small site was also identified in the Taylor River Reserve. The amount of herbicide used in 2021/2022 exceeded the threshold of the RPMP objective to maintain herbicide use at, or below, 540 litres of spramix.			in the Vernon eing found. An ver Reserve. the threshold of the	
Each year, 33% of sites that have a status of historical are visited for surveillance activities.					
	To date there are no sites with a historical status.				
	Each year, 33% activities.	Lagoor addition The am RPMP mix. Each year, 33% of sites activities.	Lagoons area which resulted in a additional small site was also ide The amount of herbicide used in RPMP objective to maintain herbinix. Each year, 33% of sites that have a status of his activities.	Lagoons area which resulted in one small infestation be additional small site was also identified in the Taylor Riv The amount of herbicide used in 2021/2022 exceeded RPMP objective to maintain herbicide use at, or below, mix. Each year, 33% of sites that have a status of historical are visited for su activities.	

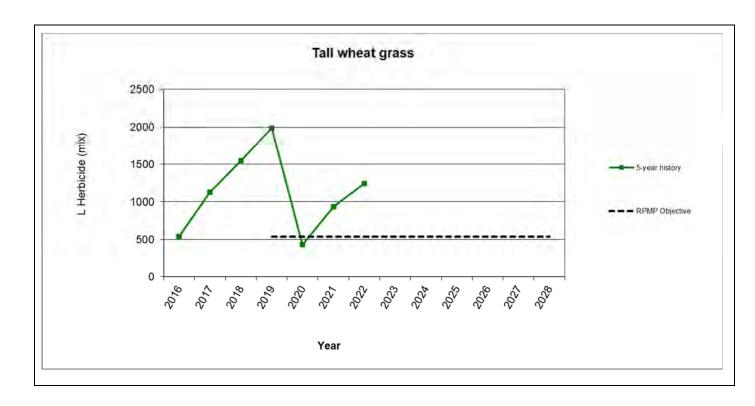
Programme trend:



Not meeting objective

This is a newer programme with baseline infestations still being progressively managed, including some new sites also being discovered.





31. Wallabies (Family Macropodidae)

Exclusion	Eradicat	tion	Progressive Containment	Sustained Control	Site-led		
Objective	Macropodida	Over the duration of the Plan, prevent the establishment of wallabies (<i>Family: Macropodidae</i>) in the Marlborough district to prevent future impacts on economic wellbeing, the environment and enjoyment of the natural environment.					
Operations overview	Council staff and/or contractors will carry out all operational activities should wallabies be detected in Marlborough. Further support could also be provided by DOC.						
Target 31.1	Each year, respond to any report of wallabies in Marlborough within 2 working days.						
2021/2022		One report of a wallaby sighting was received this year on the Canterbury and Marlborough Boundary. ECan lead the response w no evidence of wallabies found.					

Status of wallabies in Marlborough: Not established

There continues to be periodic reports and sightings but no sign of a live wallaby has been found after thorough investigations.

32. White-edged nightshade (Solanum marginatum)

		Progressive Containment	Sustained Control	Site-led			
Objective	Over the duration of the Plan, control white-edged nightshade (<i>Solanum marginatum</i>) in the Marlborough district (excluding the White-edged Nightshade Containment Area) to less than or equal to 2016 levels to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.						
Operations overview	There are multiple facet Council. These are:	tshade programme deliv	ered by				
	involves communic	ve compliance and surveill cation with occupiers and al control operations.					
	Continue to deliver	r ongoing communication,	education and awarene	ss initiatives			
Target 32.1		ary, provide to all affected and include and a volunta		on remindin			
2021/2022	them of	cted land occupiers were f their obligation under the ade. Land occupiers agre	RPMP rule for white-ed	lged			
Target 32.2		n is undertaken on the two		ontainment			
2021/2022	obligati	cions were undertaken at a on to annually destroy all red 24 plants.					
Programme trend: On tra	ck						
White Edge 450 - 450 - 400 - 350 - 250 - 200 - 150 - 50 - 50 - 60 - 60 - 60 - 60 - 60 -	ged Nightshade mature pl	ants found during compl		year history PMP objective			
10							

33. Willow-leaved hakea (Hakea salicifolia)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led			
Objective 1	By 2035, willow-leaved hakea (<i>Hakea salicifolia</i>) on Rangitoto ki te Tonga/D'Urville Island (see Map 12 RPMP) will have been controlled to zero levels, where no plants are found over the preceding 5 years, to prevent adverse effects on the environment, and enjoyment of the natural environment.						
Objective 2	By the end of the term of this Plan, willow-leaved hakea (<i>Hakea salicifolia</i>) on Rangitoto ki te Tonga/D'Urville Island will have been controlled to less than 10% of the original infestation size at the commencement of management based on plant numbers, to prevent adverse effects on the environment, and enjoyment of the natural environment.						
Operations overview	Council staff and/or contractors will carry out all operational activities.						
Target 33.1	Each year, a control operation is undertaken on Rangitoto ki te Tonga/D'Urville in accordance with the project plan.						
2021/2022		A total of 1258.5 hours of season. Majority of the r destroyed. Work has sta	nature plants have nov	w been located and			

Programme trend:

The programme has just completed the initial control phase where the entire original mature infestation has been destroyed. It is now moving into the long mop-up phase to exhaust the seed bank.

In partnership with the contractor, some seedling establishment plots have been established to assess what degree of germination is occurring and what % of those seedling survive.

A suitable metric for programme trend monitoring has not yet been settled upon.



The main willow-leaved hakea infestation (yellow) as seen in October 2019 before control work commenced

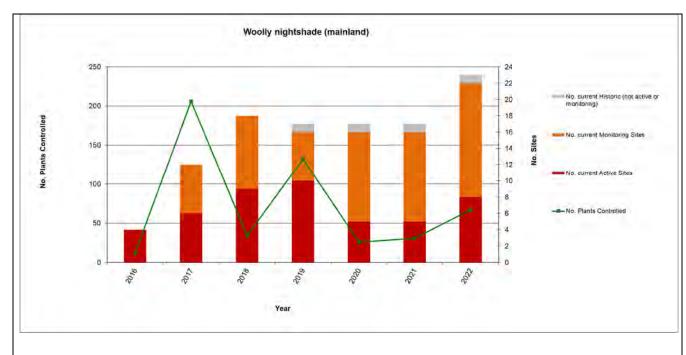


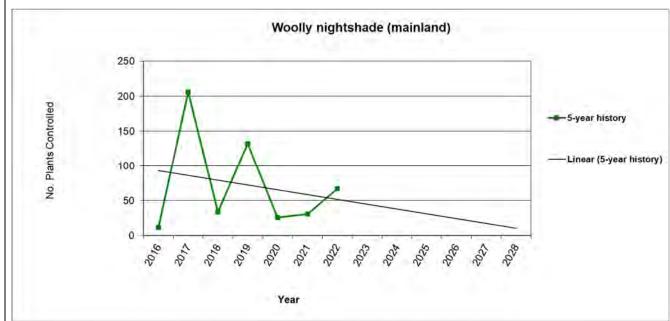
The same main willow-leaved hakea infestation as seen in October 2021

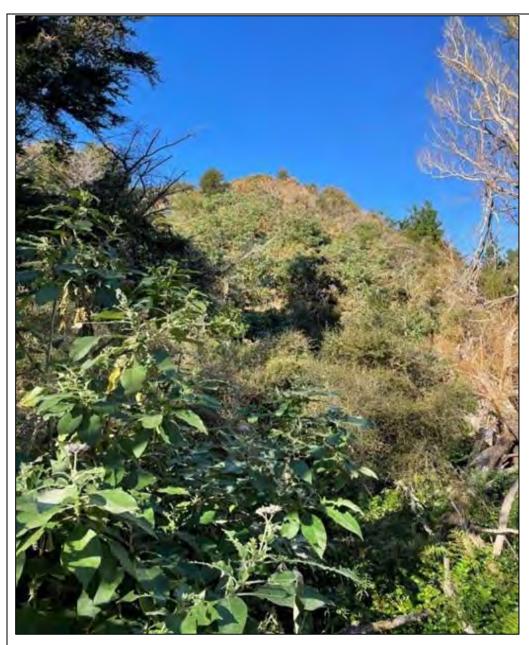
34. Woolly nightshade (Solanum mauritanium)

Exclusion	Eradication	Progressive Containment	Sustained Control	Site-led			
Objectives	the Marlborough dis known areas to min	Over the duration of the Plan, control woolly nightshade (<i>Solanum mauritianum</i>) in the Marlborough district by maintaining or reducing the number of plants found in known areas to minimise adverse effects on economic wellbeing, the environment and enjoyment of the natural environment.					
Operations overview	Council staff and/or	contractors will carry out a	ll operational activities.				
Target 34.1	Each year, a contro accordance with the	operation is undertaken o project plan	n Rangitoto ki te Tonga/l	O'Urville in			
2021/2022		2.5 Hours of control work v 5 year plan.	vas undertaken to contro	l plants as per			
Target 34.2		sites (excluding those on l ve or monitoring are visited					
2021/2022	20 67 ide Or Ok su tho	0% of 'active' and 'monitor 21/2022. plants were controlled this entified. he of the new sites is a exterior iwi Bay. Control work has reveillance work puts the nubusands. This will see a shortrolled in coming years.	year, and three new site ensive infestation discove o't begun at that site as y mber of plants present ir	es were ered near et. Initial n the			
Target 34.3		ites (excluding those on R orical are visited for survei		rville) that			
2021/2022	Th	e only site with a historical ind	site was searched and r	no plants were			
Programme trend: On track	(

Biosecurity Operational Plan Report 2021-2022







An example of the densities of woolly nightshade at the new site found in 2021/2022 near Okiwi Bay

Part Two - Other biosecurity services or initiatives

1. Education and awareness

Overview	Continuing to raise the profile of invasive species is a critical part of the Biosecurity Team's work. This can be providing general information and advice to the community, profiling RPMP pest species or putting out calls for sightings of RPMP species in the landscape.
Operational Summary 2021/2022	In conjunction with the Council Communications Team, there has been ongoing work to ensure Biosecurity-related messaging is continued to be put out through Council channels.

2. Investigation & analysis

Overview	This service ensures both new threats are investigated, and those that are present are analysed as information comes to hand. The outcome of both investigations and analyse continually shape Council decisions and/or direction. The process used is outlined in further detail within the Marlborough District Council Biosecurity Strategy.	
Target 35.1	Each year, undertake active surveillance activities for aquatic pest species at a minimum of 2 sites identified as being at risk from such threats.	
2021/2022	During 2021/2022, 310 hours (compared to 109 hours and 128 hours in 2020 and 2021, respectively) were attributed to reed swee grass operations across 4 key sites. This extra time resulted in greater coverage within those aquatic sites. Despite the extra time spent within those areas no other potential biosecurity threats were identified. Council staff also conducted surveillance in the Vernon Lagoon. Although a patch of tall wheat grass was found, no other aquatic pest species were identified.	

Operational Summary 2021/2022

In addition to that outline against Target 35, the Biosecurity team was made aware of a bomarea infestation in Marlborough at Waitaria Bay in the Sounds. Biosecurity officers have since mapped out the area of infestation with control work planned to be undertaken in the spring.



Flower from a bomarea vine

Target 35.2

Each year, conduct a minimum of two inspections of parties selling or trading plants

to determine adherence to the National Pest Plant Accord.

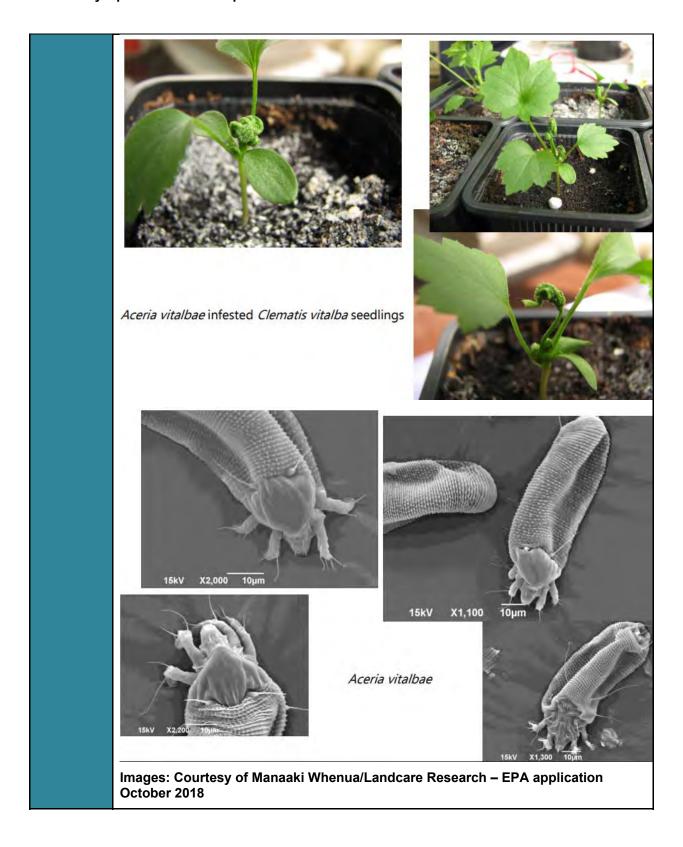
2021/2022



Council biosecurity staff undertook 3 inspections of parties selling plants in 2021/2022. It was determined all 3 parties were adhering to the National Pest Plant Accord with no issues being identified.

3. Biocontrol

Overview	For many invasive organisms that are well established in Marlborough (particularly invasive weed species), the only remaining intervention is control on an as needed basis by occupiers. What can assist that control is the introduction and movement where necessary of biological control agents. These biological control agents can also assist in the management of species managed under RPMP programmes.		
Target 36.1	Each year, provide an annual contribution into the National Biological Control Initiative.		
2021/2022		A contribution of \$15,000 was made by Council towards the National Biocontrol Collective research programme.	
Target 36.2	Each year, undertake a minimum of two new releases of biological control agents comprising of new agents (subject to availability) or existing agents available (subject to establishment status in Marlborough).		
2021/2022		In 2021 the old man's beard mite was released in two separate locations in Marlborough. A total of 8 infected vines were planted, with locations selected following advice provided by Manaaki Whenua Landcare Research.	
Target 36.3	Each year, undertake monitoring of all sites where agents were released ex-mass rearing stock within the previous 3 year period, to assess establishment status.		
2021/2022		Monitoring was carried out at the site where the original releases of the Honshu White Admiral Butterfly were made, but no evidence of establishment was found. Monitoring was also carried out for the yellow spot leaf fungus but, again, no evidence of establishment was found.	
Operation al Summary 2021/2022	Council is working with Manaaki Whenua Landcare Research to receive an additional 3 releases of old man's beard mites (<i>Aceria vitalbae</i>). It is expected that these agents will be ready for release in spring 2022/2023. In terms of monitoring and releasing biological agents, biosecurity staff surveyed the site where the initial release of the Honshu White Admiral Butterfly was made in 2018. The establishment of this agent has been limited to isolated sites around the country; establishment of releases has been slow, and at some sites the agents have failed to establish at all. No evidence of the agent has been found in Marlborough since its release in 2018 and because of this it was decided not to conduct any further releases in 2021/2022.		



4. Supporting Community Organisations

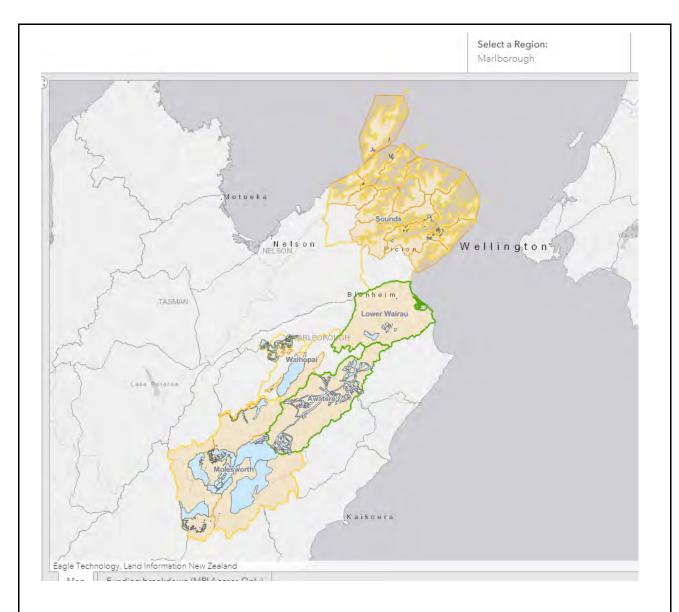
Overview	On occasions, a community can come together to address concerns relating to harmful organisms within an area of interest.		
	The organisms of concern are often those that are well established and the community is seeking a reduction in impact from those organisms. Outcomes can be related to improvement in biodiversity, aesthetics/landscapes, or even water yield and production values.		
	While implementation of RPMP programmes is a priority, supporting these community organisations is a key goal within the Marlborough District Council Biosecurity Strategy. It is recognised that by supporting these organisations, the resulting work delivered and resources harnessed often well exceeds any single agency operating in isolation. In addition, the very nature of the organisations is community-driven, which make buy-in from the wider community an easier task.		
Target 37	Each year, provide an annual contribution into the following community organisations: • Marlborough Sounds Restoration Trust		
	South Marlborough Landscape Restoration Trust		
	Chilean Needle Grass Action Group (by way of a dedicated budget)		
2021/2022	Financial contributions by way of grants were made to the Marlborough Sounds Restoration Trust (\$30,000), South Marlborough Landscape Restoration Trust (\$30,000) and a specific budget managed on behalf of the Chilean Needle Grass Action Group (up to \$15,000).		
Operational Summary	As outlined against Target 37, annual financial contributions were made to assist these key community organisations.		
	In addition to this, Biosecurity staff have also provided a large amount of in-kind advice and support to all these community organisations.		
	For the two community Trusts, this is primarily through fulfilling the exofficio role on both Trust boards.		

5. Wilding Conifer Management

Overview	The management of wilding conifers is a large, complex, landscape scale issue. What has been recognised is the need to approach the issue will all interested parties working in collaboration. Council sees its role as a lead facilitator in accordance with both the Marlborough District Council Biosecurity Strategy and statutory requirements relating to leadership under section 12B of the Biosecurity Act 1993. As part of this role in Marlborough, helping establish and maintain collaborative wilding conifer management programmes is integral to achieve positive outcomes.
Target 38.1	While it is agreed, fulfil the role of Regional Fundholder as part of the National Wilding Conifer Control Programme to the satisfaction of Biosecurity New Zealand (MPI).

Biosecurity Operational Plan Report 2021-2022

tate Marlborough Wilding Conifer Steering Group tion of all stakeholders involved.
ty staff facilitated a meeting of the Marlborough onifer Steering Group on one occasions in 2. This was via Zoom on 9 March 2022 to focus on ecisions for the coming 2022/23 year.
ty staff continued to play a prominent role in filding Conifer Control Programme (NWCCP) was and safely in Marlborough. stones achieved this year: programmes received core NWCCP investment in s was the Molesworth, Wiahopai and Sounds e programmes were successfully delivered safety, in budget. South Marlborough Landscape Restoration Trust ring both a number of standalone projects, and the nunity Partnership Project in the Ned/Te Hau en working with both the South Marlborough toration Trust and Marlborough Sounds Restorations officio role for both trusts.
per Siril etc



An overview of all the operative management units in Marlborough and control efforts from the 2021/2022 season.

Aerial control techniques - 92,348ha

Ground control techniques - 4,568ha

6. Research

Overview	With all biosecurity programmes, a continual improvement in understanding relating to both the organisms of interest and techniques to manage them is required. Some applied research is often carried out as part of operational programmes (e.g. farming system shifts to improve Chilean needle grass management) with other research being more direct.	
Operational Summary 2021/2022	 In 2021/2022, The Biosecurity team was involved or supported the follow areas of research: Sponsor and collaborator for the 'Tomorrow's Marine Biosecurity Toolbox' MBIE funded programme led by the Cawthron Institute; Managing the product registration of Taskforce™ herbicide in NZ; Ongoing support toward national research projects looking into the biological control of Vespula sp. wasps; Support the SFF project exploring pathogenic biological control agents for nassella tussock. Operational trial using UAV technology to quantify wattle infestations in the Picton vicinity while in flower. The research budget for 2021/2022 was \$20,000. Actual 2021/2022 spend = \$22,500. 	

7. Specific Projects

Operational Summary 2021/2022	In 2021/2022, Biosecurity staff were involved in the following projects that align to the goals of Council's Biosecurity Strategy:	
	Top of the South Marine Biosecurity Partnership This initiative sees the three Top of the South (TOS) Councils come together with the Ministry for Primary Industries financially, and with many other parties in committee, to minimise the risk and impact of marine pests. It strongly supports the work delivered operationally by Council in the Mediterranean fanworm programme.	
	Contract management rotated to be undertaken by Tasman District Council from 2020/21.	
	Budget:	
	1. Financial contribution \$42,250;	
	Staff time and associated costs.	
	<u>2021/2022 Actual</u> :	
	\$42,250.00 – shared funding for the coordination/projects contract;	
	Staff time attending Committee meetings and providing input into any TOS Partnership initiatives.	
	Response to plague skinks in Marlborough	
	The response to the Riverlands detection of plague skinks has been closed out given the large area they were found to be established across – linking up with the Cloudy Bay business park.	
	However, the incursion at Havelock is still an active response led by Biosecurity New Zealand with specialist support from the Department of Conservation. Council is also involved at the governance group level.	
	The Havelock response continues to have an elimination objective given the incursion point and timing is definitively known which is extremely rare.	
	Budget: Staff time and associated costs	
	<u>2021/2022 Actual</u> : Staff time involved in the response governance group.	

• Restoring and Protecting Flora (Jobs for Nature)

In August 2021 the Marlborough District Council signed a contract for service with The Nature Conservancy (TNC) to provide operational support to the Jobs for Nature funded 'Restoring And Protecting Flora Project' in Marlborough.

The initial purpose of the project was to roll out short term high impact weed control programmes at ecologically significant sites of various tenures. The Operational Liaison Support role (OPLS) was appointed out of Council's Biosecurity section and commenced on 4 October 2021.

The role would facilitate the operational objectives of the project and foster community engagement with community groups already undertaking restorative work at ecologically significant sites in Marlborough.

Since the commencement of the OPLS (and community engagement) role, the OPLS has surveyed and recommended 12 ecologically significant sites subsequently approved by the TNC Project Lead to receive benefit from the project.

From the commencement of weed control in late 2021, the OPLS has made the necessary connections between the project's delivery contractor and landowners/community group(s) to ensure safe access to the work sites.

During the 2021/2022 period, monthly and quarterly reports have been submitted to TNC's project lead as per the TNC/MDC contract requirements. Project reports were prepared to document FTE hours and conservation out comes to help assist project planning for 2023/2024. These reports also included health and safety reports to ensure the delivery contractor was operating safely and that all operations were being carried out according to best practice.

Recent OPLS work has also included draft recommendations for planting proposals at current project sites, as project partners consider widening the project's scope to include restorative/enhancement planting.

Since the appointment of the OPLS role on 4 October 2021 1521.5 OPLS hours have been committed to the 'Restoring and Protecting Flora Project' up to 31 August 2022.

<u>Budget</u>: \$15,000 (over and above the \$75,000 funding received per annum).

2021/2022 Actual (Since OPLS commencement 4 Oct 2021):

\$4,050.19 + \$451.32 of direct operational contributions.

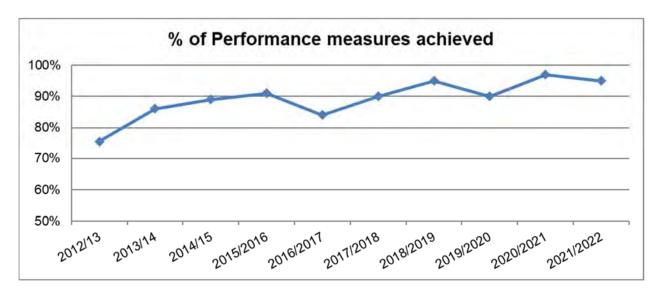
= \$4,501.51

Part Three – Performance Summary

Overall scoring of performance objectives (excluding those that are not applicable):

Measure	2021/2022 Score
Achieved	76 (95%)
Almost Achieved	4 (5%)
Not Achieved	0 (0%)
	80 (100%)

Performance Trend



Part Four - Operational Plan Review

In accordance with section 100B(1)(b) of the Biosecurity Act 1993, the Operational Plan 2018-2028 was subject to a review on 30 August 2022.

This review did not result in any proposed amendments to the current Operational Plan.