

Biodiversity

Six month Review 31 December 2008

Biodiversity Coordinating Group

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1. Significant biodiversity projects

1.1 Involvement in national programmes

Greater Wellington staff are involved in a number of national biodiversity programmes. While at times such involvement stretches limited staff time, it is judged that the advantages of contributing to, and benefitting from, such interaction offsets this.

Four such programmes are:

1. Biodiversity voluntary change research project

This project is focussing on the Ohariu catchment and our work promoting voluntary streamside management to protect and enhance aquatic biodiversity. It has been reported on in detail in previous Biodiversity reports

2. Community Conservation Fund

Tim Park was nominated by Local Government New Zealand to assist the Department of Conservation in selecting the projects that merit funding from this biodiversity enhancement fund for projects on public land (including council land).

3. Vertebrate Pest Control Decision Support System

This is a joint regional council/ Landcare Research project funded by Envirolink. The project, when complete, will provide prioritisation guidance for organisations undertaking pest control for biodiversity purposes. Tim Park from Environmental Policy and Glen Falconer, Pest Animals Team Leader, have been involved in the process as members of the expert working group.

4. Co-ordinating Biodiversity Forum

This national forum for regional councils has been recently established and reports through to the Biosecurity Managers Group and is led by Rob Philips from Taranaki Regional Council. The intention of the forum is to enable regional councils to share their approaches to measuring, reporting and managing biodiversity and to develop a coherent collective view of how best to take a leadership role in their regions.

Three workstreams have emerged from the two meetings held so far. They are:

- 1. Engagement with the Foundation of Research, Science and Technology to ensure that the views of regional councils are taken into account in developing research priorities for biodiversity.
- 2. To develop a consistent approach to reporting on central government's "National priorities for Biodiversity".

3. To look at how regions are addressing biodiversity through their second generation Regional Policy Statements.

1.2 Wetlands incentives and advice programme

An application to the Biodiversity Condition Fund for funding a weed control programme in Te Hapua Wetland over 14 individual properties was successful in obtaining \$24,438 over three years. The implementation of this work by GW Biosecurity staff has proceeded well with full involvement of the landowners. As a result, one landowner has indicated their willingness to legally protect their area with a QEII National Trust covenant.

An application was also successful for Te Harakiki (Rawakahia) Wetland weed control work for \$11,500 over three years. The contractors have been busy undertaking the work overseen by GW Biosecurity staff.

Implementation of a hydrological monitoring network at Te Hapua wetland complex is underway. \$25,000 funding for monitoring equipment was approved by Kapiti Coast District Council in their annual plan. The monitoring equipment is mostly located on private land to understand the hydrological characteristics of the wetland and to guide future resource management decisions.

The Wetland Incentive Programme budget is fully allocated for the financial year, despite the tougher times for land owners. Three new landowners joined the programme in the last quarter bringing the total to 131 in the programme.

1.3 Urban Streams

This is a joint project with the Wellington City Council and Porirua City Council determining priorities for ecological restoration in the Porirua Stream catchment. A draft report looking at stream health and ecological and landscape conditions in the catchment has been as a first step has been completed. As part of preparing the report there were two meetings held with ccommunity groups carrying out restoration in the catchment and meetings were held with staff of all three councils.

1.4 Freshwater ecosystems

A steering group comprising representatives of Council departments is overseeing the preparation of the Freshwater Ecosystems Action Plan. The Action Plan is intended to guide departments on operational practices that promote freshwater biodiversity. Rutherford and Blashcke are to prepare the Action Plan. A questionnaire has been sent to Council departments that will provide a "stocktake" of what freshwater ecosystem activities they are carrying out at the present time. The stocktake is now complete and meetings have been held with all departments on the results of the stocktake.

1.5 Porirua Harbour project

Tim Porteous has attended the first meeting of the Porirua Harbour Inter-Agency Group which has replaced a similar group that focused solely on the Pauatahanui Arm. This

expansion reflects the Porirua City Council's wider harbour project. While our specific project funding is limited to the Pauatahanui Arm, we are contributing where we can to the development of the broader harbour-wide strategic approach.

Peter Handford continues to work with private landowners in the Pauatahanui catchment offering advice and, in some cases, financial assistance to retire and plant riparian margins.

1.6 Streams Alive riparian programme

Work this year is again concentrated in the Otaki, Waitohu and Mangaroa catchments, as demand is initiated in these catchments by the landowners themselves. This is resulting in some good riparian linkages between neighbouring properties. A limited amount of work has been carried out in the Upper Ruamahanga, Wainuiomata, Ration Creek, Karori and Waihora catchments.

In the last three months work has focussed on release spraying of new planting, and hand clearance of weeds on sites in the Otaki area where weed and grass growth threatens to suffocate emerging plants. This is an annual problem, especially on the Kapiti coast where summer growth of weeds and grasses is excessive.

The *Streams Alive* programme has been reviewed and the findings will be presented to the Catchment Management Committee in February.

Work in 2009 will focus on weed control by contractors in all *Streams Alive* sites to ensure they are free of environmental weeds. Landowner education on weed control will also be introduced, so landowners are better prepared to maintain their riparian margins weed free in the long term. This has been a weakness in some cases and needs to be addressed to ensure these riparian margins do not harbour and spread weeds in these catchments.

1.7 Coastal and marine biodiversity action plan

Work is progressing on implementing the Coastal and Marine Biodiversity Action Plan. Targeted control of invasive weed species has been undertaken at Te Humenga Point and Ureti Beach. Site preparation and planting was completed at a site in Paekakariki identified in the Wildlands (ecological consultants) report as a high priority. More planting will be undertaken this winter by members of the local community and surf club.

Work is underway to complete restoration plans for North Waitohu Stream mouth, South Pekapeka, Waikanae Boating Club, Onehunga Bay dunes and wetland, Lyall Bay and Island Bay. The appropriate local authorities are being consulted and are contributing to the cost of the plan preparation and assisting with consultation processes.

A fence has been constructed to protect dunelands with the help of Rotary at Whangaimoana Beach, South Wairarapa.

1.8 Wairarapa Biodiversity Strategy

Tim Park, Lucy Harper and Tim Porteous have been reviewing drafts of Wairarapa Biodiversity Strategy. The strategy, being developed by the three Wairarapa councils, was recommended for adoption in December by the multi-agency steering group. Tim Porteous and steering group chair, Bob Francis, will be liaising with the CEOs of the three Councils to encourage them to make adequate financial provision in their councils' LTCCPs to ensure the strategy's recommendations can be implemented.

1.9 Take Care programme

Thirty five care groups are working to restore degraded ecosystems in 2008-09. Only one new group commenced this year – on the Makoura Stream at Masterton. Although there was no public round of applications for this year, four existing groups were renewed, having come to the end of their existing funding arrangement – Island Bay Coast Care, Silverstream Care Group, Friends of Owhiro Stream, and the Millwood restoration group. Two groups ceased being funded – on the Papawai Stream at Greytown and at the Millennium wetland in Masterton – but both are continuing under their own steam.

Groups have progressed through the second half of the winter planting season and the overall level of planting activity has increased markedly. Conditions were good for plants (it was a very wet period) but not good for planting, with several events needing to be rescheduled or cancelled.

Some of the groups' achievements during the period are as follows:

- Albemarle Stream (500 plants planted and the removal of 2 tonnes of rubbish)
- Churton Park (1200 trees planted since July helped by ANZ Bank staff and the removal of all the willows and blackberry from the site)
- Paraparaumu beach (2000 spinifex planted since July to complete the successful restoration of this site)
- Eastbourne dunes (1800 pingao and 120 flax planted this winter with help from Muritai School and the Global Volunteers Network)
- Enaki Stream Care (200 plants planted and, in August, the creation of a nutrient interception wetland on farm land neighbouring the Fensham wetland, planted with Honda trees)
- Wharemaukau Stream (the group has acquired substantial funding from KCDC to provide for the maintenance of their site)
- Friends of Maara Roa (5000 plants this winter)

- Millennium wetland group (2000 plants this winter and weed removal with help from the National Bank and Masterton South Rotary)
- Friends of Otaki River (over 1000 trees planted since May)
- Friends of Owhiro Stream (many planting events over the winter, including two with Owhiro Bay school)
- Friends of Queen Elizabeth Park (6000 spinifex planted over winter and extensive stream side and wetland planting)
- Glenside Stream Care (200m of blackberry cut and sprayed and 1400 plants over winter)
- Island Bay Coast Care (550 spinifex planted throughout the season)
- Nga Uruora Kapiti (7,000 plants planted throughout the season)
- Onehunga Beach Care (500 spinifex planted since July, restoration areas fenced off, and weeds removed)
- Papawai Stream Care (developing plans to spend funding for this project derived from the Sustainable Management Fund and continuing with weed removal and replanting)
- Petone Dune Restoration Group (700 spinifex and pingao planted)
- Riversdale Dune Care (500 spinifex planted by Whareama School students in June)
- Silverstream Care Group (continued weeding and planting; Environment Division planting day in August)
- Trelissick Park Group (1300 plants planted over the winter)
- Waihora Watch (wetland seep and gully fenced, gorse removed, and 400 plants planted)
- Waikanae Dune Restoration Group (extensive spraying of marram and ice plant; 2000 spinifex planted this winter)
- Waikanae Estuary Care Group (despite adverse weather conditions, planting and weed control continued, including by students of three local schools)
- Waimeha Restoration Group (200 sedges, nikau and kohekohe planted in the wetland and cabbage trees, taupata and olearia planted in dry areas)
- Waipahihi Stream Care (students from Onslow College planted 300 trees at their site on this Wellington stream)

- Waitohu Streamcare (weed spraying and continued planting. Won the Community Award at the NZ Plant Conservation Network Awards in August)
- Whangaehu River Group (willow control and weed spraying, plus 12,000 plants planted).

In order to access additional sources of funds, three groups were assisted to apply for funds from the new Community Conservation Fund established by the government (Riversdale Beach Care, Moehau Stream Care, and the Friends of Queen Elizabeth Park). This fund is available for the next three years and we have encouraged groups to make full use of it. Three further groups will be applying in the March funding round.

Trees for Survival is a national school based re-vegetation programme which is delivered by the department in this region. There are 16 schools taking part. Each school is integrated with a relevant care group, adding another source of plants, energy, and community involvement to the care group's restoration project. This programme has been revamped and revitalised over the last six months, both by Greater Wellington and Trees for Survival, with a regional co-ordinator being appointed. During the December quarter seedlings for next season's planting were delivered to schools and a "procedures and responsibilities" protocol was completed. This is already improving the delivery of the programme.

A total of 13 care groups received additional funds (amounting to \$21,340) during the period under review from the Honda TreeFund. This has been used to purchase plants for next year's planting season.

The 2008 Wellington Conservation Awards were held in December, at which Greater Wellington groups were very successful. The Friends of the Waikanae River won the Habitat Restoration Category, and the Waikanae Estuary Care Group received a merit award. Our nomination of Honda Cars Wellington/Wairarapa for the Business in Conservation category was also successful.

1.10 Parks

Implementing the Parks Environmental Asset Management Plan

- A mustelid trap network was installed and trapping initiated in the Lakes Block in East Harbour Regional Park
- Bait stations were refilled for ongoing possum control operations in Belmont and East Harbour Regional Parks, and Cannon Point in Akatarawa Forest
- Professional ungulate control operations resulted in the culling of 113 goats and 14 pigs in Akatarawa Forest, Belmont and Kaitoke Regional Parks, while 12 deer were removed from East Harbour Regional Park

- The Parks "weed team" have controlled climbing asparagus and other infestations in East Harbour and Belmont Regional Parks. They have also completed weed surveys in Queen Elizabeth Park and Speedy's Reserve
- Contracts have been let for tradescantia control in the Wainuiomata Recreation Area and various pest plant infestations in Korokoro Valley
- Bird monitoring was completed in all the parks and the four forests during spring
- The annual kereru counts in Kaitoke Regional Park showed a big increase in numbers in the park
- Re-measuring of the permanent plots in Akatarawa Forest has begun
- An aerial spray trial, using two different chemicals on 30ha of alder was completed at Lake Wairarapa
- Rodent monitoring was undertaken in East Harbour Regional Park, Battle Hill Farm Forest Park bush remnant and on the dunes in Queen Elizabeth Park
- Rat control was maintained in the mainland island in East Harbour Regional Park
- A reassessment of restoration plantings is underway in Queen Elizabeth Park.

WaterGroup Contract

- Planning for the Hutt 1080 possum control operation planned for May 2009 was completed
- Sixteen goats and 4 pigs were culled in a professional animal control operation in the Wainuiomata/Orongorongo water collection area
- Infestations of buddleia in the Wainuioamata catchment and of gorse in the Hutt catchment were controlled.

1.11 Wainuiomata Mainland Island

- Bait fills and trap checks were completed on a two-monthly basis, as programmed
- A possum trend monitor showed possums to be at 0.5%RTC in the mainland island, which is well below target
- Four deer were culled in the mainland island
- Bird monitoring showed no significant increase in bird numbers

• Quarterly rodent monitoring showed an increase in rat numbers in May, but after changing to a new bait formulation, numbers fell to zero percent tracking.

1.12 Key Native Ecosystem programme

Pest animals

The Western Zone urban and peri-urban KNE) possum and rat baiting programme has undergone a number of improvements since the return to servicing by internal GW staff.

- Recording the exact location of the over 7,000 bait stations in the system made possible by affordable hand-held high sensitivity GPS units
- Re-numbering of bait stations to correct errors such as repeated numbers and missed stations
- The development of a spread sheet form for each control area. This allows the quick, clear recording of data and access to relevant information. These forms are printed on the back of the aerial photo maps
- Utilise GIS mapping system with new layers to show lines, routes and tracks on each map, showing the fastest access route. The information also includes which stations were full or empty at the last service. This allows decisions about the optimum bait/toxin matrix and will result in less bait being used.

This detailed information will also assist with service line cutting, maintenance and countering theft and vandalism. With increased public awareness surrounding toxin use, it is important to have quick access to detailed information where control is being undertaken.

A proposal for an extension to the current Waihora Stream KNE programme into the northern Aorangi Range was discussed at a meeting in Martinborough during October 2008. The meeting was convened by the care group Waihora Watch and included representatives from GW, DoC, South Wairarapa District Council, iwi, other local landowners and interested parties. The proposed extension area is DoC Estate and its inclusion is part of a vision for the future which includes the reintroduction of rare species such as kiwi which are thought to have been present until the early 1960's. The proposal is only at the investigative stage and will require the involvement and approval of DoC as the major landowner.

Funding has been approved by WCC to allow intensive predator control to commence in the Long Gully KNE under the aegis of the Natural Heritage Trust. Without this additional funding it is likely that the project would have lapsed. GW has no funding to support it next year but will now be able to assist. The area adjoins the Karori Wildlife Sanctuary.

The rodent and bird monitoring regime has been reviewed and fine-tuned to get the best results from less resources. Some sites have been abandoned and the rodent monitor will now be done bi-annually rather than quarterly. The invertebrate monitoring programme which is a valuable bio-diversity outcome monitor is also being re-evaluated. The feasibility

of continuing this project with an amended methodology will be determined over the next few months.

We are broadening our working relationship with the regions TLA's, with several collaborative monitoring projects being considered for 2009. Results from the KNE survey conducted last year is being fed into a review of the KNE programme and has yielded insights and new ideas from contributors.

Currently 23 TLA and QE2 reserves are receiving pest plant control through 41 contracts. The majority of work being undertaken is for future planting programmes by TLA's or community groups. Some contracts are being completed for GW's Take Care programme.

Pest Plants

This half of the year saw a successful continuation of current programmes across the region as well as the rolling on of a new site, the 20 hectare Karehana Bay reserve, located in Plimmerton.

Successful partnerships in pest plant control, and where necessary co-ordinating restorative plantings, occurred with 8 TLAs, DoC, QE II and Community Groups as well as interdepartmentally. To best support biodiversity a wide range of ecosystem types across the region had programmes operating in the last half of 2008. They were:

- Coastal Escarpments: Paekakariki Escarpment, Pukerua Bay Escarpment, Raumati Escarpment, Tarakena Bay
- Dunelands: Flat Point, Riversdale Dunes, Waitohu Dunes
- Dune Gravel Systems: Pencarrow, Ringitatau Point
- Estuaries: Makara, Waikanae
- Forest Ecosystems: Greytown Memorial Park, Haywards Reserve, Johnsonville/ Khandallah Park, Keith George Memorial Park, Raroa Reserve, Porirua Park Bush, Porirua Scenic Reserve, Trellisick Park, Tauherenikau Bush
- Riparian systems: Waikanae River
- Wetlands: Nga Manu Wetland complex, Riversdale southern reserve, Te Hapua Wetland Complex, Te Harekeke (Kawakahia), Waimeha Lagoon
- Community Assistance Programme: many community groups were assisted through advice/ information and a small amount of weed contracting funding and contract management. They included; Albemarle Stream, Churton Park, Eastbourne dunes, Glenside Stream, Hulls Creek, Island Bay/ Houghton Bay, Owhiro Stream, and Waipahihi Stream.

1.13 Flood Protection Environmental programmes

Report on the Working Relationships with Friends Groups - GW External Review

External Consultant Derek Wilshere (Common Sense Solutions) has completed a draft report with recommendations addressing the partnership between GW and Friends groups. GW staff have met with Derek and discussed any changes needed to complete the report. The final report will impact on how the Friends are currently supported by FP and facilitate areas of improvement for any Friends groups long term, throughout the region.

Friends of the Waikanae River

The planting plan for the Waikanae River is complete and identifies 15 areas for restoration work to be taken on by the Friends. The number of sites planted each year depends on each sites' needs, the ability of the Friends to set and carry out the work and availability of flood protection staff. Advice on site restoration will be given by GW staff. Potentially new sites for the planting plan will be visited and assessed in the New Year.

Enquiries by the community and FWR concerning maintenance on the river corridor are being considered by FP staff - this is especially important in the absence of an overall pest management plan for the river.

Waikanae River Environmental Strategy

Work is progressing on the review of the Waikanae River Environmental Strategy. The concepts in the Waikanae River Ecological strategy are seen as integral to this document and as such will be incorporated. Iwi consultation is planned for the New Year. The Environmental Strategy will be finalised after this has been completed.

Friends of the Otaki River

The Friends of the Otaki River (FOTOR) has their AGM on 8 October. John Sawyer from the Department of Conservation made a presentation about biodiversity and highlighted the importance of restoration work.

The DoC community conservation fund application for the Otaki Estuary Restoration Project was completed in conjunction with FOTOR, Mike Urlich (Biosecurity) and Melanie McElwee (FP) and submitted on November 5th. This application included a restoration vision from Ecological Consultant Geoff Park and an Action Plan from GW staff.

FOTOR were presented with a merit award at the GW environment awards ceremony on 24 October, for their contribution to the Chrystalls Bend enhancement work on the Otaki River.

2. Looking ahead

- Contributing to the development of the inter-council Regional Coordinating Biodiversity Forum
- Providing input into Porirua City Council's Porirua Harbour and Catchment Strategy
- Implementing the Indigenous Ecosystems provisions in the notified Regional Policy Statement
- Rationalising the amount and type of ecological monitoring for the Biosecurity Department due to reduced resources.
- Consolidating the current KNE and Reserves programmes
- Completing 1080 possum control operation in the Hutt Water Collection Area
- Organising a robin release for Wainuiomata Mainland Island
- Completing an environmental farm plan for Battle Hill Farm Forest Park
- Completing fish survey work at Lake Wairarapa
- Selecting new care groups to join *Take Care* through this year's application round.