

About Jobs for Nature: Freshwater Improvement Fund – Fish Passage Project

General info

This project has been funded to improve fish diversity and abundance by searching out and remediating in-stream structures across the Tasman District over a 5-year period. In-stream structures include culverts, weirs, dams, and water intakes that migratory fish cannot climb or swim over. This project will allow action to be taken to address these barriers to fish migration as they are identified.

Why it is important

Our freshwater fish species are in trouble - 11 of the 20 species in Tasman are classified as 'in decline'. Around 75 percent of these fish species are migratory and require uninterrupted passage to access their "homes". In-stream structures such as culverts, dams and weirs often block fish migration and impact stream health. Several native bird species that mainly eat freshwater fish are also threatened.

Who is doing the work?

A dedicated, trained team from Kūmānu Environmental (a division of Nelmac) is carrying out the work.

What is the work?

Assessments of any in-stream structures will be carried out to determine if they are barriers to fish passage. If a structure is deemed a barrier or partial barrier and the structure is not due to be removed or replaced with a bridge, then remediation will be carried out. Rubber aprons/ramps, hairy spat rope and flexible baffles will be installed as the main methods used to assist fish with moving past/over/through the in-stream structure. If the remediation cannot be carried out at the time due to access or out-of-scope remediation requirements it will be recorded for follow up.

How long can I expect the work to take?

It all depends on how many in-stream structures you have on your property and how many need remediation. It takes on average about 30-40 minutes to remediate a culvert (including the assessment) and about 15 minutes for an assessment of an in-stream structure that does not need remediation.

Are there risks to my culverts blocking up or eroding out?

The work is designed to maintain flood flow capacity and is not likely to cause debris jams or compromise the structural integrity of your culvert, or other structure. In fact, the work may protect your culvert from erosion at the outlet. This type of remediation work has been routinely used across Tasman for a few years now and no issues have been identified.

Who is funding the work?

Jobs for Nature - Mahi mō te Taiao is a \$1.2 billion programme that manages funding across New Zealand across multiple government agencies to benefit the environment, people and the regions. It is part of the COVID-19 economic recovery package. This project funding was secured and is also supported by Tasman District Council.

More information:

Jobs for Nature Tasman Projects Website:

<https://tasman.govt.nz/my-council/projects/economic-recovery-projects/jobs-for-nature/>

Point of Contact:

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Frequently Asked Questions:

➤ Will this cost me anything?

This project will be able to cover the full cost of remediating most in-stream structures. If you do have a structure that needs a lot more work, for example needing trucks and diggers, that in-stream structure will be noted for further work outside this project. Wherever possible Tasman will try to find workable solutions to support this kind of work.

➤ Is there anything in this for me?

The work carried out will often protect your structure from erosion and thereby help to extend the lifetime of the structure and/or reduce maintenance costs. A typical remediation at a perched culvert installs a rubber conveyor belt right down onto the stream bed to reduce the power and recirculation of water at the outlet (particularly during floods).

If you wish, we can acknowledge your positive contribution to healthy waterways through channels of your choice.

➤ What information will you be collecting as part of this exercise?

Tasman District Council is required by law to collect information about the location, type of structure, physical measurements relating to the structure and river flow and character. Photos will be taken, but only of the stream near the structure and of the structure itself.

The purpose of collecting this information is clear: To ensure that the relevant regional/unitary council obtains information on the design and performance of structures in relation to the passage of fish. The full list of these data requirements is detailed in sections 61-68 of the [Resource Management \(National Environmental Standards for Freshwater\) Regulations 2020 \(LI 2020/174\) \(as at 30 April 2021\) Contents – New Zealand Legislation](#).

As part of this project the supplier completing the assessment and remediation work will not be collecting any other information about the environmental performance or other aspects of your farm or property.

- **Can you provide me with a certificate that my in-stream structures are fish-friendly that could be used in my farm plan or property file?**

We would be happy to provide this in whatever form you prefer. Please send requests to the Project Manager kerry.south@tasman.govt.nz

- **What are the privacy provisions?**

No information or photos from your farm will be shared publicly by the supplier, including no online posts. Kūmānu Environmental (a division of Nelmac) is under contract in this regard. Tasman's assessment data may be contributed to a national fish passage database but this data will not include landowner contact details.

- **Will the team carrying out the work be reporting to council on anything beyond fish passage from my property?**

No. As part of this project the contractors will not be collecting any other information about the environmental performance or other aspect of your farm or property.

- **What will happen with the data and information collected about my in-stream structures?**

The data will be used to report to the funder (Ministry for the Environment) about how well the project is meeting the objectives of the project. Maps will be produced at a catchment scale that will show in-stream structures as dots along waterways. The streams will be shown in various colours indicating whether or not fish passage has been restored to the catchment upstream. These maps will be of such a scale that they will not identify your individual property. No personal information will be made public. If you wish to have maps produced for your own, or business use, we would be only too happy to oblige. Please send requests to Project Manager kerry.south@tasman.govt.nz

- **If the fish values increase with this work, will there be any consequences for the way I manage my waterways? E.g. will I still be able to protect banks and dig out my waterways when there is excessive erosion or build-up of gravel?**

There will be no change to the way you manage your streams because of this fish passage project. There is lots of information online about the best practice regarding managing waterways on farms to achieve both farm and ecological goals.

DairyNZ provides some well researched advice: [waterway-technical-notes.pdf \(dairynz.co.nz\)](https://www.dairy.co.nz/assets/Uploads/waterway-technical-notes.pdf).

- **How do we know that the remediation being done on my structure is going to work for the fish?**

A lot of research has been done on this around New Zealand by NIWA, DOC and Councils (see [Resources: Fish passage management in New Zealand \(doc.govt.nz\)](#)). A reasonable amount of such research has also occurred in this region. As part of this project there will be monitoring upstream/downstream and before/after select remediations. If one of your structures presents a good monitoring situation, and you are happy for the team to visit the site a couple more times, then we would be very grateful.

- **To what extent are intermittently-flowing streams covered by this work programme?**

If there is no useful aquatic habitat upstream of the structure, such as a grassy paddock that is dry most of the time, then there is no point doing work on the structure as no fish will benefit. However, if there is a defined channel, with gravel bed and there are residual pools upstream of the structure and a reasonable catchment size (>20 hectares in the Moutere Hill country), then there is likelihood of a reasonable fish community. Fish will retreat to residual pools when the stream stops flowing and survive at reasonably high densities. Then when the flow resumes, they spread out once again. Several of our native fish, including several of our whitebait species, have been found to burrow over a metre under the stream bed to where water flow is permanent.

➤ **What health and safety measures and procedures will the field crew be taking?**

We have a comprehensive health and safety plan for the work at the structure and will be totally responsible. We understand that you are likely to have such a plan and are happy to abide by it faithfully.

Probably the greatest risk to safety while working on a structure is flash flooding, particularly while working in culverts. We will be very cognisant of the weather and will postpone the work when moderate to heavy rain is forecast or dark rain clouds appear in the area. The team are very competent in the stream environment, including working around steep banks, slippery stream beds and using power tools.

➤ **Do I (as the landowner or manager) need to be present during the work?**

No, but you are welcome to accompany the team to find out what it is all about. It may be useful to know how to remediate a structure for fish passage so you can undertake such work if needed in the future.