

This month we feature the work of a keen group of conservationists, the Kowhai District Girl Guides, who though small in years are making a big impact in their Southland community.

The Waihopai River flows through the east of the Southland Plains and through the region's largest city, Invercargill which in Maori is *Waihōpai*.

The Waihopai River was used by Māori as part of a trail to and from Otago. Te Rakitauneke had a settlement near Thompsons Bush which is part of a large forest known as Taurakitewaru. The wharenui/meeting house on Murihiku Marae is named after him. Traditionally, the river was a valuable food source for tuna (eels) and inanga as well as the shellfish found in the estuary. Other important resources in the riparian areas included harakeke (flax) and tī kōuka (cabbage tree) used for clothing, footwear and weaving.

A significantly modified catchment, much of the lower Waihopai River has been straightened with flood banks along its margins to the outfall at New River estuary. A lot of the land in the catchment has been drained and cleared



over the years to allow for the development of agriculture. The lower river is also affected by Invercargill's storm water network and the tidal fluctuation of the New River Estuary.

Due to its modified nature and associated land uses, the water quality of the Waihopai River is compromised. LAWA shows the river is among the poorest 25% of New Zealand rivers for *E. coli* and nitrogen and bottom 50% for clarity and phosphorus.

Recognising the importance of the river to the community, Environment Southland included the Waihopai in its <u>Living Streams</u> programme, a long-term initiative to improve the health of Southland's waterways for the benefit of landowners, the community and the environment.

Guiding light for river restoration

As part of their commitment to the Waihopai, Environment Southland joined together with the Kowhai District Girl Guides in a three-year project to establish a small, vegetated area around the Waihopai River at the Dacre Community Centre.

"It all started with an email from the National Office of the Girl Guides Association saying that Environment Southland was looking for a group interested in helping with their Living Streams project," explains Kowhai District coordinator Jane King.

After discussions, the girl guides decided to embark on a planting project, at Dacre, which is only 15 minutes from town. The land was associated with the Dacre Community Hall; however, the Hall Committee struggled just to keep the hall maintained, let alone the land.

Historically, the neighbouring farmer grazed the land to keep the grass under control but the waterway wasn't fenced and stock had access to the stream. When the property was sold in 2012 the new owners continued to assist the Hall Committee by grazing the land but supported the protection of this tributary and agreed to fence the waterway (at their cost) to a suitable width for the Girl Guides to plant.



Image: Ana McWilliam(5) – Glenrose Pippin, Kayla Troon (5) – Windsor Pippin, and Ellie McWilliam (7) – Glenrose Brownie

In March 2012 during a very dry spell, the girl guides and their families turned up ready to put the first 80 plants in the ground, hopeful that the promised rain would eventuate for the sake of new plants.

As well as the plantings, the girls took part in crafts and activities to learn how to identify plants and weeds, and were excited to find native fish in the stream. The younger of the group, the Pippins, were able to help too by preparing the ground for planting, an activity they called *stomping* and took to with great enthusiasm!

As for the rain? Mrs King said it arrived just in time for the BBQ at the end of the day but was met with high spirits and hungry tummies.

Initially committing to the project for three years, the group has since removed the timeframe on this commitment having identified it as an important programme that they want to continue supporting as long as they can. There have been two subsequent plantings and over 200 plants have become established in a <u>riparian</u> margin which is now fenced and protected from stock access.

"The girls are getting a lot out of it but its also involving their wider family groups in the planting process as well," said Mrs King.

Youthful enthusiasm impresses

Environment Southland land sustainability officer, Anastazia Raymond, has been impressed by the initiative and enthusiasm with which the girls have tackled the project.

"Many groups lose their energy for site restoration projects after the first planting day but these girls and their leaders have been keen to return not only to continue planting projects but to learn about the aquatic life, the plants and maintenance of the site," said Ms Raymond.

The project has also brought people in the community together who may not otherwise have had reason to interact. From the local dairy farmers, to the ladies of the Hall Committee and the urban girl guides.

"I am delighted that all of these people have cooperated towards a common goal," said Ms Raymond.

"It's exciting to see a piece of land and waterway transformed to an example of best environmental practice. I hope it will inspire others to treat their waterways with respect and transform them to things of beauty."

Chair of Environment Southland, Ali Timms said the project was an excellent example of collaboration.

"This is a great project involving collaboration of the community and in particular the voluntary commitment from a group of town girls to improve water quality and bring back biodiversity to a tributary which was previously suffering from a lack of protection," said Ms Timms.

"As far as we know, the Kowhai District Girl Guides are the first guide group in New Zealand to adopt a piece of land and commit to its enhancement and improvement for the environment.

"Although the science outcomes are not measurable within such a short time frame, we know from previous research that this work will contribute positively to the health of the Waihopai, particularly when seen in conjunction with other work underway in the catchment."

Since 2006, the wider community has worked very hard to implement riparian management projects across the Waihopai catchment. So far, 54 landowners have participated in the programme achieving:

- 74.14 km of new fences to exclude stock from waterways.
- 4 bridge upgrades and 2 improved culverts to reduce the amount of animal waste and sediment getting into the waterway.
- Stabilized banks and established 4.83km of riparian plantings to provide shade and filter run-off
- Extending 3 water systems so stock no longer drink directly from the stream
- Excavated a tile drain, created wetland and planted area
- Upgrading a silage pad to prevent silage running into the waterway

Looking for more information?

You can read more about the Waihopai Catchment and the community restoration efforts at the following links:

http://www.es.govt.nz/media/31493/waihopai_alive_sept_2013_web.pdf

http://www.es.govt.nz/media/31848/36_enviroweek_september_19.pdf