

# WETLAND WILDLIFE

## WAYS TO ATTRACT BIRDS

To encourage birds to your wetland you have to start thinking like them! What ground cover do they like? Where do they normally nest and feed? Here are a few helpful habitat hints:

- New Zealand scaup like deep, open, clear water.
- Mallards, grey ducks, shoveler and grey teal favour shallow water around the edges of a pond or lake.
- New Zealand dabchicks feed in deep, open water but build their nests on floating rafts of vegetation, among reeds.
- Paradise shelducks feed on pasture next to wetlands.
- Rails, crakes, pūkeko and fernbirds feed and nest around damp areas of vegetation. Fernbirds prefer wetlands with dense ground cover under a selection of shrubs and small trees like mānuka.
- Spotless crane and marsh crane are secretive and feed in permanently shallow water under cover of dense raupō or flax. They build nests under sheltering sedges among stands of mānuka. Half a hectare of this habitat would support a breeding pair of spotless crane.
- Pied stilts feed on worms and insects in temporary winter pools in paddocks and nest in scattered clumps of rushes.
- All waterfowl need sites to moult.
- Tūī, waxeyes and bellbirds will feed on flaxes and kōwhai. Kererū will visit fruiting kahikatea (see the *Planting Guide* factsheet for more information).

## ALL THE COMFORTS OF HOME

As well as providing the basics (water and shelter), there are a number of extras you can provide that will make your wetland a highly desirable home for birds. Create gently sloping, irregular shorelines. This allows birds, particularly waders, chicks and ducklings, easy access to and from the water and will extend the belt of reeds and rushes that grow around the edge.

Logs and trees provide perching sites and shelter, however, it is important to leave some gaps around the wetland for birds to fly through.

During the breeding season (September to December for most species), birds are particularly sensitive to disturbance. Grazing or other activities should stop or be significantly reduced at this time. Islands, or a floating raft with plants growing on it, make safe nesting sites in lakes and ponds. Alternatively Ducks Unlimited NZ can offer advice on nest box designs.

If your wetland is near a block of native bush, or another wetland, consider linking them by planting a green corridor of native plants between them.

**Most of New Zealand's wetland plants and animals are found nowhere else in the world.**



Spotless crane

## UNIQUE, UNUSUAL AND VALUED

Wetlands support an amazing number of species and some of them are very unusual. Most of New Zealand's wetland plants and animals are found nowhere else in the world. Endemic birds include fernbirds, brown teal, New Zealand dabchicks and scaup, shoveler and paradise shelducks. Black mudfish are also unique, as are our cabbage trees, flaxes and various orchids.

Plants and animals that live only in wetlands face an uncertain future. Because of habitat loss and/or damage, many, like the Australasian bittern and short-jawed kōkopu, are now endangered. Conservation and restoration programmes make a big difference and it's not too difficult to create conditions ideally suited to our intriguing wetland wildlife



Shoveler duck

## FOCUS ON FISH

Many of New Zealand's native freshwater fish live in wetlands for some or all of their lives. Short and long-finned eels, īnanga, giant kōkopu and banded kōkopu are all found in our Waikato wetlands. These fish also make amazing journeys to and from the sea using a corridor of rivers, streams and drains. This watery pathway must be kept intact for them to complete their life cycle successfully.

In contrast, the endangered black mudfish spends all its life in wetlands, even drains or weed-filled creek beds. They have the extraordinary ability to burrow deep into mud or under logs and aestivate (hibernate) for months at a time during dry spells. This means they can occupy temporary wetlands not accessible to other fish.

Wetlands are also home to our native freshwater crab, pea mussel and shrimp.

## WHITEBAIT

The juveniles of five of our native fish – banded, giant and short jawed kōkopu, īnanga and kōaro – are known as whitebait. Their eggs hatch in autumn and the larvae are washed out to sea. Six months later they make the hazardous return journey as juveniles. Most of the whitebait fishery catch is īnanga. Juvenile kōkopu and kōaro may migrate over 100 kilometres upstream, even climbing damp rocks alongside waterfalls, until they reach sheltered streams and wetland habitats.

## MOVING RIGHT ALONG

Wetlands connected to streams at least 10 centimetres deep will be accessible to most native freshwater fish. However, long stretches of fast flowing or polluted water, flap gates or over-hanging culverts act as impassable barriers.

Native fish also need streams with fairly clear water, shading and cover. Muddy water limits their vision and reduces their food supply of aquatic insects.

## SIMPLE SOLUTIONS

- Set stream culverts low in the stream bed, placed horizontally.
- Rough up the smooth bottom of culverts with cement or rocks to slow water flow.
- Some juvenile fish are able to climb wet surfaces, and a flexible corrugated pipe with water trickling through it can be used for fish to travel short distances between two wetland areas.
- Plant overhanging species like flax and sedges for shelter and to keep the water cool.
- A hay bale placed at the head of a ditch entering your wetland will act as a simple silt trap.
- When clearing drains, leave one side or parts of it untouched until plants have grown back



Mudfish



Giant kōkopu



Banded kōkopu



**Native fish also need streams with fairly clear water, shading and cover. Muddy water limits their vision and reduces their food supply of aquatic insects.**