



## Te Ngae Junction Wetland

<b>Site Number:</b>	34
<b>Ecological District:</b>	Rotorua Lakes
<b>Source of Information:</b>	Field work 2015
<b>Digital Scale:</b>	1:5,000
<b>Data Source:</b>	BOPLASS Ltd 2011
<b>Regional Council:</b>	Bay of Plenty
<b>1998 Site Number:</b>	NHS No. 34; and an unidentified portion to the east (not previously identified as a site in Shaw and Beadel (1998)).
<b>Current Tenure:</b>	Unprotected
<b>Site Area:</b>	10.82 ha
<b>Altitude Range:</b>	300 m
<b>Bioclimatic Zone:</b>	Lowland
<b>Grid Reference:</b>	NZTM E1891696, N5780793

VEGETATION		LANDFORM	EXTENT
CODE	TYPE		
1	<p><b>Grey willow-crack willow forest</b> A mixture of grey willow and crack willow forms a canopy with local alder, walnut, kōhūhū and māhoe. The understorey is variable and includes swamp kiokio, <i>Carex secta</i>, karamū, <i>Carex virgata</i>, swamp millet, blackberry and patches of Japanese honeysuckle. Adventive species including lupin (<i>Lupinus arboreus</i>), gorse, and Chinese mugwort (<i>Artemisia verlotiorum</i>) are present between the beach and the wetland. Japanese honeysuckle and blackberry are also present on the margins.</p> <p>Standing water in the interior of the wetland has duck weed, swamp kiokio and parrots feather (<i>Myriophyllum aquaticum</i>). Water purslane (<i>Lythrum portula</i>) is locally common in lower-lying areas. A sandy beach occurs along the lake edge and there are many bleached freshwater mussel (kākahi; <i>Echyridella menziesi</i>) shells present.</p> <p><b>Crack willow/blackberry- Chinese mugwort-pohue (<i>Calystegia sepium</i>) treeland</b> occurs on the margins.</p>	Wetland	10.76 ha
2	<p><b>Open water</b> Open water with <i>Carex secta</i> occurs at the northern end of the site.</p>	Open water	0.06 ha

**Indigenous Flora:** No threatened or at risk plant species as listed in de Lange *et al.* 2013 have been recorded from this site.

**Fauna:** No threatened or at risk bird species as listed in Robertson *et al.* 2013 have been recorded from this site. However the wetland may provide habitat for birds typical of wetland habitat such as spotless crane (*Porzana tabuensis plumbea*) (At Risk-Relict).

**Notes on Overall Condition:** This highly modified wetland on the margins of Lake Rotorua is degraded as a consequence of pest plant invasion but retains some elements of indigenous character.

**Change Relative to Shaw and Beadel (1998):** Unknown, but likely to be minor.

**Threats/Modification/Vulnerability:** This wetland is vulnerable to increasing dominance of pest plant species.

<b>Risk Assessment:</b>	Pest plants: Risk to site - medium; Timeframe - low.
<b>Significance Level:</b>	Regional (Appendix 8 - Table 1 - Criteria 3.1, 3.2, 3.9, 3.11, 3.12; Table 2 - Factors R4, R8, and R9).
<b>Significance Justification:</b>	<p>This site is of Regional significance as it is wetland vegetation that acts as a natural buffer, improving the quality of groundwater entering Lake Rotorua, a nationally significant lake. In particular, lake edge wetlands play an important role in the control of nutrient and bacteria inputs to lakes via groundwater contaminated from urban development and rural agricultural practices (Gibbs and Lusby 1996). The wetland may provide habitat for at risk bird species such as spotless crane.</p> <p>Wetlands have been greatly reduced in extent in Rotorua Lakes Ecological District and are poorly represented in the existing reserve system.</p>
<b>Field Work Required:</b>	No field work required.
<b>Notes:</b>	<p>The western end of this site was identified as a “Recommended Area for Protection” (RAP No. 34) in the natural area survey of Rotorua Lakes ED (Beadel <i>et al.</i> 1998).</p> <p>This site now combines Te Ngae Junction Recreation Reserve Extension (Site 149) with SNA 34 Te Ngae Junction Wetland.</p>
<b>References:</b>	Gibbs and Lusby (1996); Shaw and Beadel (1998); Beadel <i>et al.</i> (1998); Wildland Consultants (2009).