PAKARU ROAD FOREST

Survey no. Q05/005

Survey date 19 December 1994

Grid reference Q05 147 440

Area 95 ha

Altitude 20-140 m asl

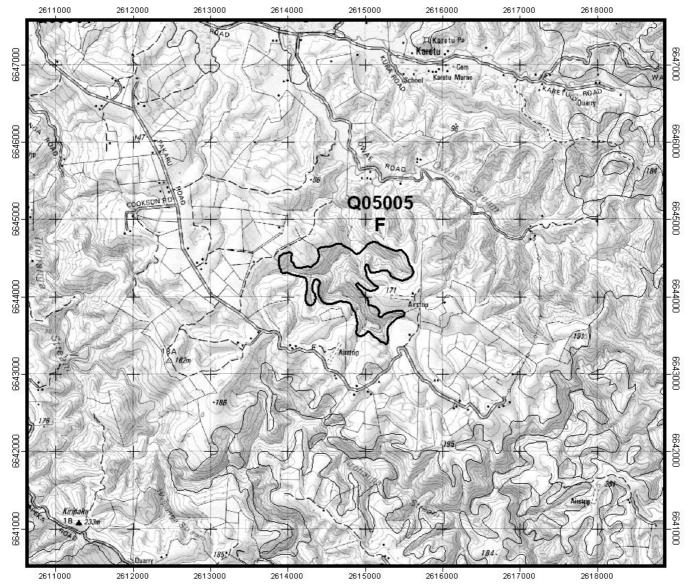
Ecological unit

(a) Taraire forest on hillslope (20%)

(b) Kanuka/manuka-tanekaha forest on hillslope (80%)

Landform/geology

A remnant on deeply incised valleys in Waipapa Terrane greywacke.



Pakaru Road Forest Q05/005

Each grid is 1000m x 1000m

and = 100 ha

S = shrubland

F = forest

W = wetland

E = estuarine

Vegetation

Cut-over and secondary forest remnant within a steep-sided tributary of Owae Stream. Forest types include:

- (a) Taraire forest with puriri, and occasional tawa, rimu, and emergent northern rata.
- (b) Kanuka/manuka-tanekaha forest with frequent rewarewa and occasional kauri, rimu, totara, and toru.

Fauna

Contains kukupa (Gradual Decline), as well as common forest birds.

Significance

An outlier of Russell Forest, performing an upper catchment and riparian protection function.

Presence of a threatened bird species.

Representative site for type (a) taraire forest, and type (b) kanuka/manuka-tanekaha forest.

WAIHAHA ROAD SWAMP FOREST

Survey no. Q05/006

Survey date 8 March 1995 Grid reference Q05 228 502

Area 1 ha
Altitude c.5 m asl

Ecological unit

(a) Kahikatea forest on alluvial flat

Landform/geology

Holocene alluvium on a delta floodplain at the mouth of the Waikare River.

Vegetation

(a) A small, drained, kahikatea swamp forest remnant on the floodplain of the lower Waikare River. Associated canopy species include pukatea with occasional swamp maire, ti kouka, kanuka, and taraire.

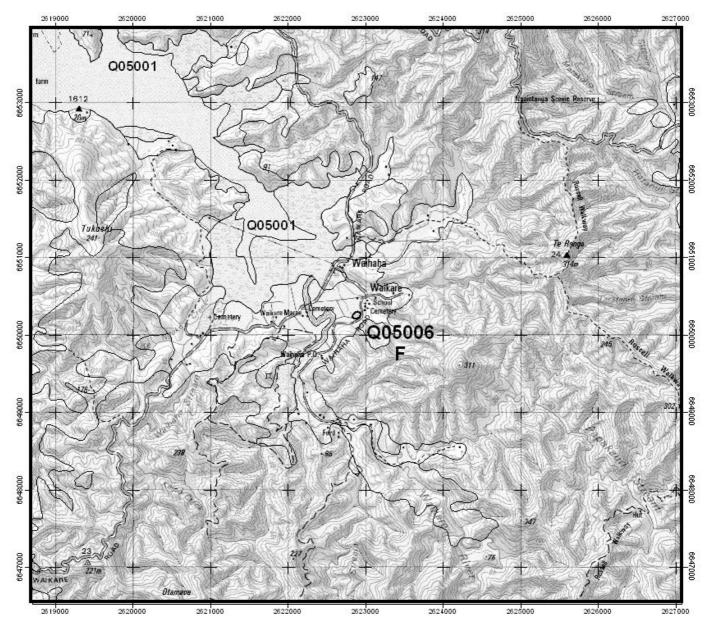
Fauna

Not surveyed.

Significance

The last remaining swamp forest remnant on the lower Waikare River floodplain. Small and drained, but representative of a very uncommon forest type.

Representative site.



Waihaha Road Swamp Forest Q05/006

Each grid is $1000m \times 1000m$ and = 100 ha

S = shrubland

F = forest

W = wetland

E = estuarine

D = duneland

CAPE BRETT PENINSULA FOREST

Survey no. Q05/007

Survey date 8 March 1995

Q05 254 634, Q05 296 601, Q05 304 602, Q05 242 609, Grid reference

Q05 287 635

2,580 ha (1,662 ha forest, 919 ha shrubland) Area

Altitude 0-362 m asl

Ecological unit

- (a) Kanuka/manuka-tanekaha coastal forest on headland
- (b) Kanuka/manuka coastal shrubland on headland
- (c) Kanuka/manuka-puriri-taraire coastal forest on headland
- (d) Pohutukawa forest on coastal margin

Landform/geology

Steep, cliffed peninsula of Waipapa Terrane greywacke.

Vegetation

Coastal secondary forest and shrubland occupying the Cape Brett promontory. Forest and shrubland types include:

- (a) Kanuka/manuka-tanekaha forest with frequent rewarewa, and occasional towai, rimu, kauri, and totara.
- (b) Manuka shrubland with occasional rimu, tanekaha, *Olearia* sp., houpara, mapou, and mahoe.
- (c) Kanuka/manuka-puriri-taraire forest with frequent towai, rewarewa, and tanekaha, and occasional kohekohe, tawa, kahikatea, totara, and rimu.
- (d) Pohutukawa forest.

Significant flora

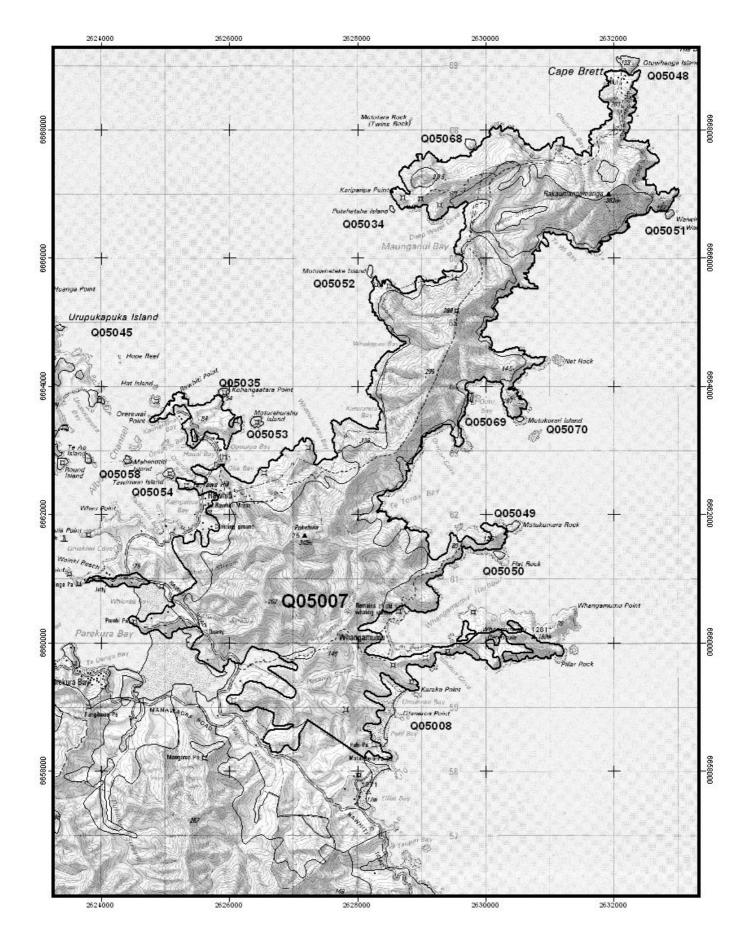
Several threatened or uncommon plants are known from this site including Senecio scaberulus (Nationally Endangered), Daucus glochidiatus (Serious Decline), Pimelea tomentosa (Serious Decline), Colensoa physaloides (Gradual Decline), Calystegia marginata (Sparse), Fuchsia procumbens (Sparse), and Scandia rosifolia (Sparse). Regionally significant plants include Asplenium flubellifolium, Metrosideros carminea, Olearia albida, Plantago raoulii, adders tongue, coastal maire, tawapou, and tawaroa. An historic record of Sonchus kirkii (Gradual Decline).

Fauna

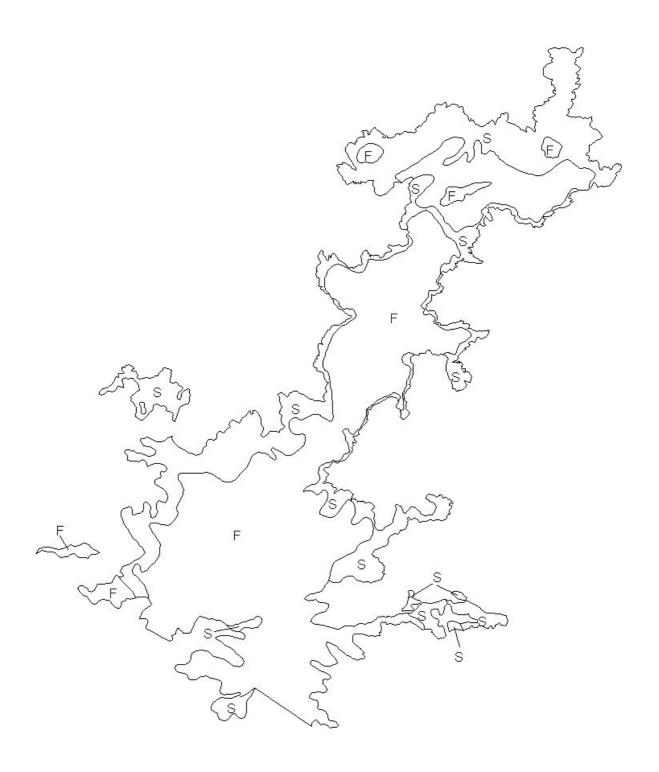
Important as a feeding and breeding site for several coastal species including northern little blue penguin (Gradual Decline), black shag (Sparse), and pied shag (Sparse). Also contains NI brown kiwi (Serious Decline), kukupa (Gradual Decline), and common forest birds.

The undescribed "common" gecko (Regionally Significant) has been collected at this site. Threatened snails include: *Amborhytida forsythi* (Gradual Decline), *Amborhytida* sp. "Motukokako" (Range Restricted), *Liarea bicarinata* (Range Restricted), *Phenacohelix brooki* (Range Restricted), *Kokikora mimiwhangata* (Range Restricted), *Phrixgnathus paralaomiformis* (Range Restricted), Punctidae sp. 28 (Range Restricted), Punctidae sp. 147 (Range Restricted), Punctidae sp. 222 (Range Restricted), and Punctidae sp. 230 (Range Restricted), and *Paralissotes mangonuiensis* (Sparse). The flax snail *Placostylus hongii* (Range Restricted) was formerly present at Whangamumu South Head, but is now presumed to be extinct. The Northland endemic stag beetle *Paralissotes mangonuiensis* (Sparse) has been recorded here.

Known native fish include longfin eel (Gradual Decline), banded kokopu (Regionally Significant), giant bully (Regionally Significant), bluegill bully (Regionally Significant), common bully, inanga, common smelt, koura, redfin bully, cockabully, and shortfin eel.



Cape Brett Peninsula Forest Q05/007



Cape Brett Peninsula Forest Q05/007

Each grid is 1000m × 1000m and = 100 ha S = shrubland F = forest W = wetland E = estuarine D = duneland

Significance

The largest and least modified coastal promontory in the Whangaruru Ecological District, which contains a high number of threatened animal and plant species. The Cape Brett Peninsula has recently been the focus of intensive browser control, principally to protect the coastal pohutukawa forest from damage inflicted by goats and possums. Under a management regime, ecological values should generally improve.

Supports many threatened and regionally significant plant and animal species.

Contains sequential gradients from hill forest to coastal forest.

Representative site for all four vegetation types.

2013 ha at this site are protected; 1411.1 ha by Nga Whenua Rahui and 601.9 ha are Scenic Reserve administered by the Department of Conservation.

ELLIOT-PAHI-UMUHEKE BEACHES

Survey no. Q05/008

Survey date 16 August 1991

Grid reference Q05 281 577, Q05 284 589

Area 35 ha
Altitude 0-10 m asl

Ecological unit

- (a) Sandfield on dunes
- (b) Coastal dune association on foredunes

Landform/geology

Two pocket sand beaches backed by Holocene dunes and bounded by steep headlands of Waipapa Terrane greywacke.

Vegetation

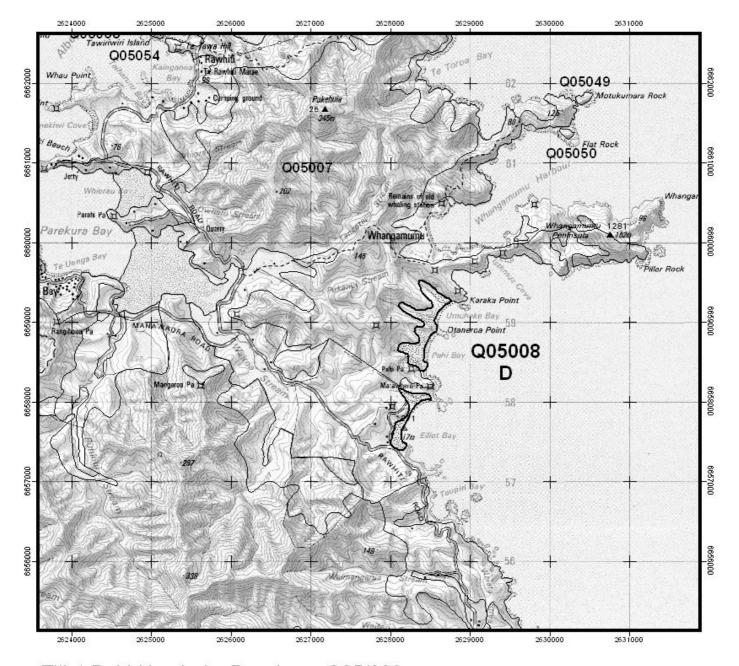
Sandy beach/duneland associations with freshwater stream outlets. Where vegetation occurs, it is a complex mosiac of seral sand-binders and prostrate coastal herbs. Associated species include harakeke, toetoe, knobby clubrush, glasswort, giant umbrella sedge, shore lobelia, and pingao.

Significant flora

Pingao (Gradual Decline), coastal tussock (Range Restricted), *Ranunculus urvilleanus* (Regionally Significant).

Fauna

An important breeding site for northern NZ dotterel (Nationally Vulnerable) and variable oystercatcher (Regionally Significant), with occasional visitors such as Asiatic whimbrel and royal spoonbill (reported). Other species include reef heron (Nationally Endangered), Caspian tern (Nationally Vulnerable), kukupa (Gradual Decline), black shag (Sparse), pied shag (Sparse), NI fantail, NZ kingfisher, paradise shelduck, pukeko, red-billed gull (breeding), tui and grey warbler.



Elliot-Pahi-Umuheke Beaches Q05/008

Each grid is 1000m × 1000m

and = 100 ha

S = shrubland

F = forest

W = wetland

E = estuarine

D = duneland

Significance

Contains relatively unmodified dune associations, in places adjoining coastal forest and shrubland.

Representative site.

Breeding site for threatened birds.

BLAND BAY FOREST

Survey no. Q05/009

Survey date 5 February 1997

Grid reference Q05 344 517, Q05 360 526, Q05 359 525 Area 190 ha (124 ha forest, 66 ha shrubland)

Altitude 0-140 m asl

Ecological unit

(a) Kanuka coastal forest on hillslope (70%)

- (b) Manuka coastal shrubland on steep hillslope (10%)
- (c) Kanuka-taraire coastal forest in gully (10%)
- (d) Pohutukawa coastal forest on headlands and hillslopes (10%)

Landform/geology

Steep, cliffed peninsula of Waipapa Terrane greywacke, locally capped by Kerikeri Volcanics basalt flow remnants and associated boulder colluvium.

Vegetation

Large area of coastal forest and shrubland, on a significant headland.

- (a) Most of the site is composed of regenerating kanuka forest of up to 7 m high. Mamangi occurs frequently throughout this vegetation type, with occasional rewarewa, kowhai, mahoe, karaka, taraire, tawaroa, and puriri. *Fuchsia procumbens* is a locally common ground cover on the ridge.
- (b) Steep hillslopes on the northern side of the site is vegetated with manuka shrubland, with frequent harakeke, ti kouka, and hangehange, and occasional mingimingi.
- (c) Gullies on the southern side of the site contain kanuka-taraire coastal forest, with kanuka of up to 12 m in height. Frequently occurring species include tawaroa, karaka and nikau, with occasional houhere, rewarewa and kohekohe.
- (d) Old-growth pohutukawa can be found on the edges of the site.

Significant flora

Calystegia marginata (Sparse), Fuschia procumbens (Sparse), Helichrysum lanceolatum (Regionally Significant), Loxsoma cunninghamii (Regionally Significant) and tawaroa (Regionally Significant).

Fauna

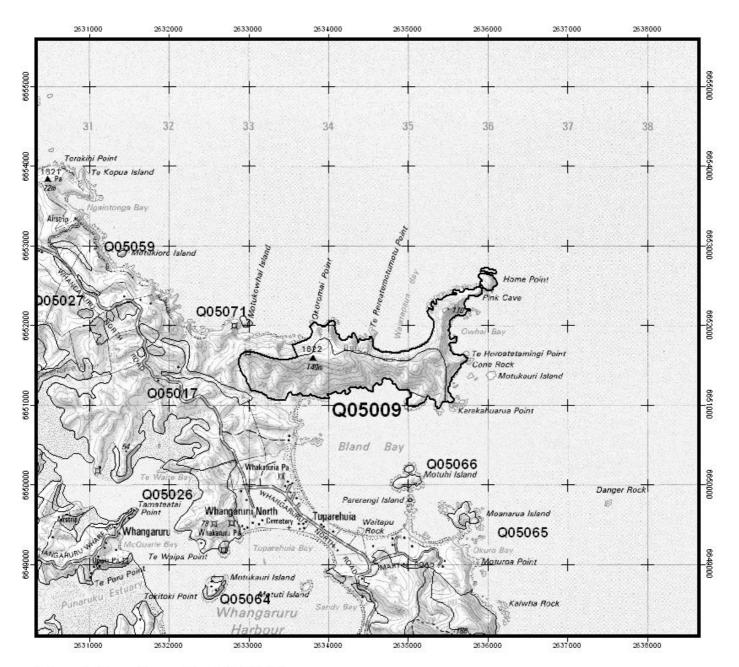
Not surveyed.

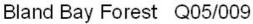
Significance

A good intact example of coastal forest and shrubland, which is a nationally rare forest type. Contains a small area of Kerikeri Volcanics, which is a rare geological type in the District.

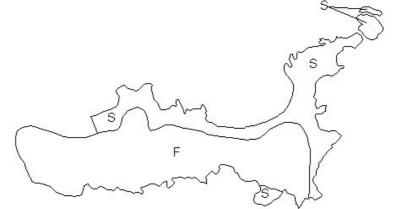
Presence of threatened and regionally significant plants.

Representative site for type (a) kanuka coastal forest, type (c) kanuka-taraire coastal forest, and type (d) pohutukawa coastal forest. Only record of type (c) in the Ecological District.





Each grid is 1000m × 1000m and = 100 ha S = shrubland F = forest W = wetland E = estuarine D = duneland



WHANGARURU NORTH HEAD COASTAL REMNANT

Survey no. Q05/010

Survey date 5 February 1997

Grid reference Q05 340 488, Q05 342 471, Q05 353 480, Q05 350 463,

Q05 343 478, Q05 348 468

Area 354 ha (255 ha forest, 91 ha shrubland, 9 ha wetland)

Altitude 0-186 m asl

Ecological unit

(a) Kanuka/manuka-puriri-rewarewa coastal forest on hillslope

- (b) Puriri-kanuka/manuka-coastal forest on hillslope
- (c) Kanuka/manuka-pohutukawa coastal forest on hillslope
- (d) Pohutukawa coastal forest on cliffs
- (e) Pohutukawa-puriri coastal forest on headland
- (f) Kanuka/manuka coastal shrubland on hillslope
- (g) Raupo reedland on alluvium

Landform/geology

Steep, cliffed coastal headland of Waipapa Terrane greywacke with Kerikeri Volcanics basalt flow remnants and associated boulder colluvium.

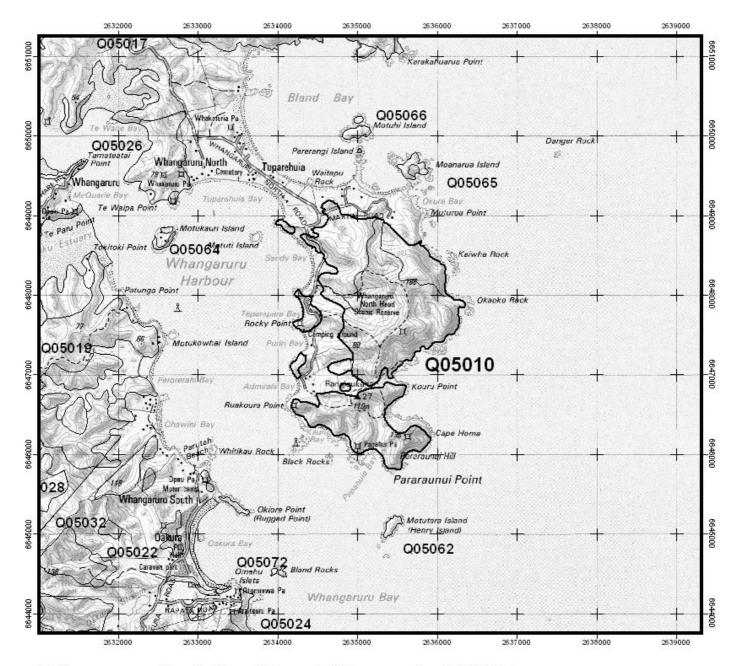
Vegetation

A large headland area of coastal forest and shrubland, forming a continuous gradient to the coast in most places.

- (a) Coastal forest at the high point of Rangiaukaha is kanuka/manuka-dominant, with rewarewa and puriri common. Mahoe is frequent, with occasional mamaku and pohutukawa.
- (b) West of Rangiaukaha, the forest is dominated by puriri, with kanuka/manuka common. Pohutukawa is frequent, with the occasional karaka, rimu, ti kouka, kowhai, and emergent rewarewa also present.
- (c) The coastal forest south of Rangiaukaha consists of a kanuka/manuka-pohutukawa mix. Tree ferns, towai, and kohekohe are also present. There are some grassy patches within this area.
- (d) Coastal cliffs in the area are vegetated in pohutukawa, with ponga scattered sparsely throughout.
- (e) The coastal forest of Rocky Point is dominated by pohutukawa and puriri. Karaka, kohekohe, and ti kouka occur occasionally within this area.
- (f) Coastal shrubland in the Martin Road area is kanuka/manuka-dominant. Mamangi is frequent, with occasional towai, ti kouka, and emergent pohutukawa, puriri, and rewarewa. Other areas of shrubland feature species such as mapou, houpara, and mahoe.
- (g) A fertile raupo wetland drains into Sandy Bay. Jointed twig-rush and kuta are present with ti kouka. The lower reaches of the wetland grade into tidal mangroves with manuka.

Significant flora

The area contains the threatened plants *Brachyglottis kirkii* (Serious Decline), *Daucus glochidiatus* (Serious Decline), *Pimelea tomentosa* (Serious Decline), *Calystegia marginata* (Sparse), and *Fuchsia procumbens* (Sparse). *Senecio scaberulus* (Nationally Endangered) was recorded here in 1972. Species of



Whangaruru North Head Coastal Remnant Q05/010

Each grid is 1000m × 1000m

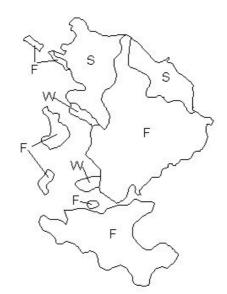
and = 100 ha

S = shrubland

F = forest

W = wetland

E = estuarine



restricted distribution in Northland include tawaroa (Regionally Significant) and *Loxsoma cunninghamii* (Regionally Significant).

Fauna

Pateke (Nationally Endangered) were formerly present and may recolonise in the future. Matuku (Nationally Endangered), reef heron (Nationally Endangered), NI brown kiwi (Serious Decline), kukupa (Gradual Decline), NI tomtit (Regionally Significant), Northland green gecko (Gradual Decline), forest gecko (Regionally Significant), and banded kokopu (Regionally Significant). The site also contains the threatened snails *Placostylus hongii* (Range Restricted); *Kokikora mimiwhangata* (Range Restricted); and Punctidae sp. 28 (Range Restricted).

Significance

The area features a large tract of coastal headland forest, which supports threatened and regionally significant flora and fauna. This forest type is now rare in Northland and throughout the rest of the country. Pateke utilised both the wetland and the artificial dam.

Contains sequential gradients from hill forest to coastal forest.

Representative site for type (a) kanuka/manuka-puriri-rewarewa coastal forest, type (b) puriri-kanuka/manuka-coastal forest, type (c) kanuka/manuka-pohutukawa coastal forest, type (d) pohutukawa coastal forest, type (e) pohutukawa-puriri coastal forest, and type (g) raupo reedland. Only record of types (a) and (b) in the Ecological District.

The site contains a small area of Kerikeri Volcanics, which is a rare geological type in the District.

The site is of regional importance due to its Whananaki soils, as:

- Good examples of Whananaki soils are uncommon.
- Most Whananaki soils have been developed for sheep and dairy farming, and market gardening (Arand et al. 1993).

304.3 ha at this site are reserves administered by the Department of Conservation.

WHANGARURU HARBOUR

Survey no. Q05/011

Survey date 4 February 1997

Grid reference Q05 296 513, Q05 306 483, Q05 302 499, Q05 319 505,

Q05 306 498, Q05 309 495

Area 330 ha Altitude sea level

Ecological unit

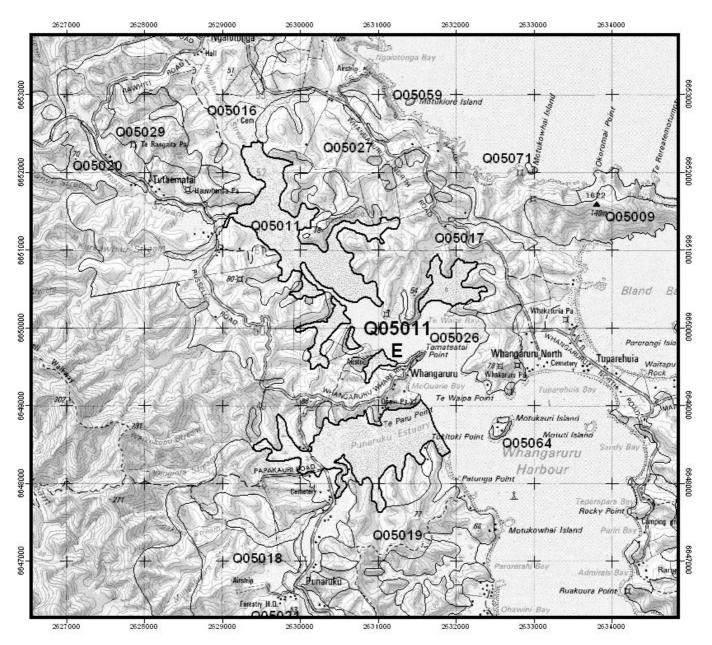
(a) Mangrove forest on estuary

Landform/geology

Estuary.

Vegetation

A long, narrow harbour which also includes Punaruku Estuary.



Whangaruru Harbour Q05/011

Each grid is $1000\text{m} \times 1000\text{m}$

and = 100 ha

S = shrubland

F = forest

W = wetland E = estuarine

(a) Extensive areas of mangrove forest in association with rushes. Raupo and manuka also occur on tidal fringes. The mangroves range in size from 0.5m to approximately 6m in height.

Fauna

Pateke (Nationally Endangered), reef heron (Nationally Endangered), Caspian tern (Nationally Vulnerable), white-fronted tern (Gradual Decline), banded rail (sparse), NI fernbird (Sparse), variable oystercatcher (Regionally Significant), white-faced heron, red-billed gull and black-backed gull.

Significance

Many coastal forest or shrubland remnants are scattered around the periphery of the harbour. Several wetland areas also provide a natural sequence of habitat types and add to the diversity of the ecosystem. Much of the wider catchment area of the harbour is forested, including the Ngaiotonga Scenic Reserve and part of the Russell Forest.

The area supports a varied fauna, including threatened and regionally significant species.

Representative site.

0.8 ha at this site is Scenic Reserve administered by the Department of Conservation.

MOKAU BAY

Survey no. Q05/012

Survey date 3 February 1997 Grid reference Q05 335 430

Area 8 ha (3 ha duneland, 5 ha estuary)

Altitude 0-3 m asl

Ecological unit

- (a) Rush sp.-saltmarsh ribbonwood saltmarsh on estuary
- (b) Exotic grass sp. grassland on dunes

Landform/geology

Sand pocket beach backed by Holocene foredune and small estuary.

Vegetation

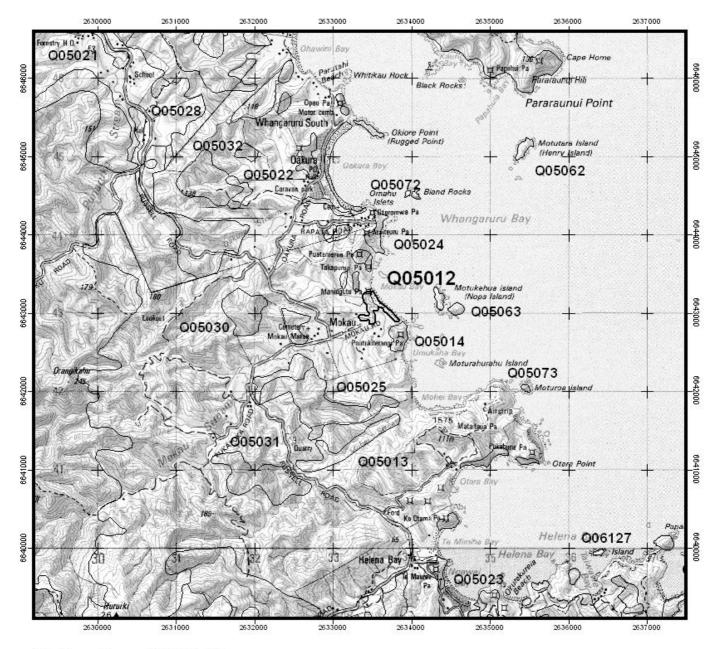
- (a) The estuary is rush-dominant, with saltmarsh ribbonwood common. Mangrove and manuka occur occasionally.
- (b) The coastal area has been modified by stock, leaving very little buffer adjacent to the estuary. Grazing has left the dunes dominated by grasses rather than native dune vegetation.

Fauna

Northern NZ dotterel (Nationally Vulnerable), variable oystercatcher (Regionally Significant), paradise shelduck, pied stilt, pukeko, red-billed gull, southern black-backed gull and welcome swallow.

Significance

Presence of threatened and regionally significant bird species. Northern NZ dotterel have made attempts to breed on the beach in the past.



Mokau Bay Q05/012

Each grid is 1000m × 1000m

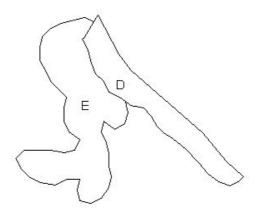
and = 100 ha

S = shrubland

F = forest

W = wetland

E = estuarine



MOHEI STREAM WETLAND

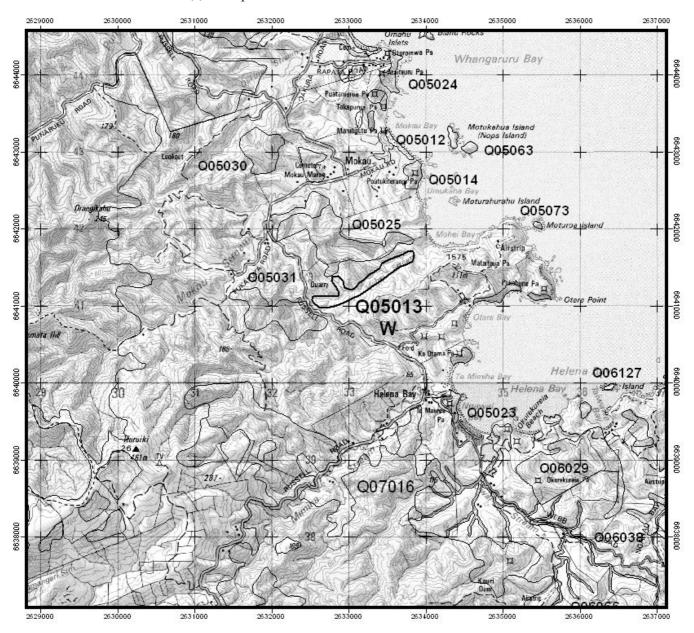
Survey no. Q05/013

Survey date 3 February 1997 Grid reference Q05 333 413

23 ha Area Altitude 10 m asl

Ecological unit

(a) Raupo reedland on alluvium



Mohei Stream Wetland Q05/013

Each grid is $1000m \times 1000m$ and = 100 ha

S = shrubland

F = forest

W = wetland

E = estuarine

Landform/geology

Valley-fill swamp and alluvium in coastal hill country of Waipapa Terrane greywacke.

Vegetation

(a) Raupo-dominant fertile wetland. The wetland is surrounded by pasture except for a small buffer of manuka, totara, mamaku, and tobacco weed at the western end. Some scattered totara occurs elsewhere.

Fauna

Pateke (Nationally Endangered) roost on the pond, and probably feed in the wetland. Pukeko also use the area, and there have been past records of spotless crake (Sparse).

Significance

A small example of a habitat type which is rare in the District.

Presence of pateke.

Representative site.

POUTUKITERANGI PA FOREST REMNANT

Survey no. Q05/014

Survey date 3 February 1997 Grid reference Q05 338 427

Area 7 ha

Altitude 5-40 m asl

Ecological unit

(a) Pohutukawa-puriri coastal forest on hillslope

Landform/geology

Coastal headland of Waipapa Terrane greywacke.

Vegetation

(a) Coastal forest dominated by pohutukawa and puriri. Occasionally occurring species include kahikatea, kauri, karaka, totara, rimu, and ti kouka, which form a semi-continuous canopy. No regeneration is occurring underneath the mature trees due to grazing.

Fauna

The flax snail *Placostylus hongii* (Range Restricted) was formerly present, but is now presumed to be extinct.

Significance

An example of a nationally rare forest type.

Representative site.

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