# Todea barbara

# Common Name(s):

Royal Fern, Hard todea, King fern

#### **Current Threat Status (2012):**

Threatened - Nationally Endangered

#### **Distribution:**

Indigenous. In New Zealand confined to the North Island, where it grows on the Poor Knights Islands and locally from Te Paki south to about Dargaville and the Bay of Islands. Common in South Africa and Australia.

# **Habitat:**

Coastal to lowland areas. A species of gumland scrub, coastal shrublands, and streamside margins in open forest, occasionally found on coastal cliffs or on serpentinite. Often found on bare claybanks or fringing sinkholes in gumland scrub.

#### Features\*:

Extremely, robust, coriaceous ferns producing trunks up to 1 m tall. Stipes smooth, 150–600 mm, yellow brown, with ear–like lobes at base. Fronds persistent, coriaceous,  $0.25-0.65 \times 1.2-3.5$  m, ovate, elliptic to lanceolate, 1-pinnate-pinnatifid to 2-pinnate, glabrous or finely pubescent along veins, glossy, upper surface pale green, yellow-green to golden yellow, undersides similar but paler. Pinnae 20–60 × 4–10 mm, lanceolate, narrowly oblong, to ovate; pinnules broadly attached at base,  $15-80 \times 4-9$  mm, oblong-elliptic, apex acute, margins toothed; sporogenous pinnae occasionally shorter than sterile ones, restricted to lower part of frond, on lower pinnules of primary pinnae, at first in discrete groups, then confluent, green turning reddish brown.



Caption: Todea barbara at Coopers

Beach

Photographer: Bill Campbell



Caption: Todea barbara on Inland Road, Karikari Peninsula Photographer: Bill Campbell

#### Flowering: Fruiting:

None (spore producing)

None (spore producing)

#### **Threats:**

Threatened by habitat loss through land clearance and competition from weeds such as Hakea spp. and pampas grass (Cortaderia selloana (Schult. et Schult.f.) Asch. et Graebn.). Some populations have been eliminated by people collecting plants for the horticultural trade. At least one major population, that on Aorangi Island, Poor Knights Island group is threatened by natural succession from open shrubland to coastal forest.

# \*Attribution:

Fact Sheet prepared for NZPCN by P.J. de Lange 1 August 2003. Description based on Chinnock (1998) but see also de Lange et al. (2010)

# References and further reading:

Chinnock, R.J. 1998: Osmundaceae. Pp. 112–115. Flora of Australia 48: Ferns, Gymnosperms and Allied Groups. Melbourne: ABRS/CSIRO Australia.

de Lange, P.J.; Heenan, P.B.; Norton, D.A.; Rolfe, J.R.; Sawyer, J.W.D. 2010: Threatened Plants of New Zealand. Canterbury University Press, Christchurch.

# For more information, visit:

http://nzpcn.org.nz/flora\_details.asp?ID=95