



PINGAO – kuaka* – tauhinu young dune ecosystem

*= Eastern bar tailed godwit

Food for native birds:

F = Fruit

S = Bird Seed

N = Nectar

B = Bud/foilage

I = Insects

For lizards: L = fruit

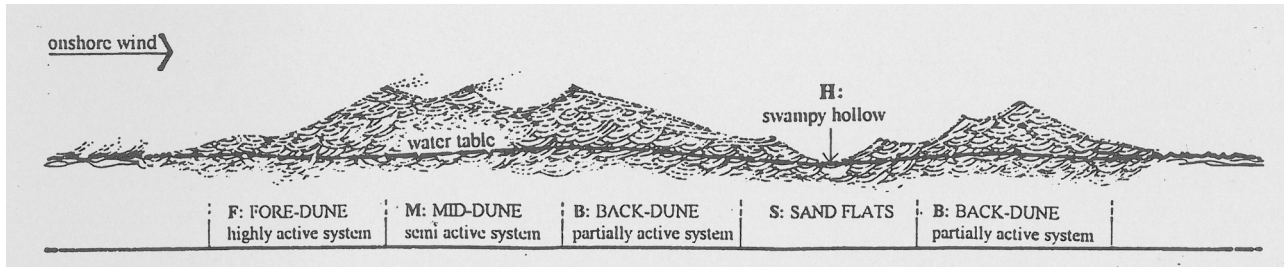
Plant Tolerances

■ = tolerates or needs

□ = intolerant

½ = tolerant of some

* = to establish, protect from frost
t = toxic for toddlers



Plants keyed to landform units, as shown in diagram:

(F) = Foredune; (M) = Mid-dune; (B) = Back dune; (S) = Sand flats/plains; (H) = Swampy hollow; (E) / (O) = edge plants of back and old dunes

PLANT LISTS Selected from vegetation natural to droughty & raw Kairaki soils

TREES & LARGE SHRUBS

<i>Cordyline australis</i>	ti kouka, cabbage tree (B,S,H)
<i>Discaria toumatou</i>	matagouri (M,S)
<i>Dodonaea viscosa</i>	akeake (M,B)*
<i>Leptospermum scoparium</i>	manuka, teatree (B,S)
<i>Myoporum laetum</i>	ngaio (M,B)*
<i>Olearia paniculata</i>	akiraho, golden akeake (M,B)
<i>Solanum laciniatum</i>	poroporo (M,B)

Food

F,N,I

I

N,I

F,N

S,I

F,I

Tolerances

sun	shade	wet	dry	wind
■ ½	■	■	■	■
■	□	□	■	■
■ ½	□	■	■	■
■	□	■	■	■
■ ½	□	■	■	t
■ ½	□	■	■	■
■ ½	½	■	■	t

SHRUBS

<i>Carmichaelia appressa</i>	prostrate broom (M,S)
<i>Carmichaelia australis</i>	makaka, NZ broom (M,S)
<i>Clematis afoliata</i>	leafless clematis, pohue (M,S)
<i>Coprosma acerosa</i>	sand coprosma (F,M)
<i>Coprosma crassifolia</i>	a thick-leaved mikimiki (M,S)
<i>Coprosma propinqua</i>	mikimiki (M,B,S)
<i>Corokia cotoneaster</i>	korokio (M)
<i>Helichrysum lanceolatum</i>	niniao (M)
<i>Melicytus alpinus</i>	porcupine shrub (M)
<i>Muehlenbeckia astonii</i>	shrub pohuehue (M,B)
<i>Muehlenbeckia complexa</i>	pohuehue (M,S)
<i>Ozothamnus leptophyllus</i>	tauhinu, cottonwood (M,S)
<i>Olearia adenocarpa</i>	Canterbury shrub daisy (M)
<i>Plagianthus divaricatus</i>	marsh ribbonwood (F,S)
<i>Pomaderris ericifolia</i>	tauhinu (M)
<i>Sophora prostrata</i>	prostrate kowhai (M)

I

I

L

L

F,L

F,I

I

F,L,I

F,L,I

F,L,I

I

I

I

I

N,I

■	□	□	■	■
■	□	□	■	■
■	□	□	■	■
■	□	□	■	■
■ ½	½	■	■	■
■ ½	■	■	■	■
■ ½	□	■	■	■
■ ½	□	■	■	■
■	□	½	■	■
■	□	□	■	■
■	□	■	■	■
■ ½	□	■	■	■
■	□	□	■	t

TUSsocks & GROUNDcovers

<i>Acaena novae-zelandiae</i>	piripiri, biddibid (M,B,S)
<i>Apodasmia similis</i>	oioi, jointed wire rush (H)
<i>Austrofestuca littoralis</i>	sand fescue (F,S)

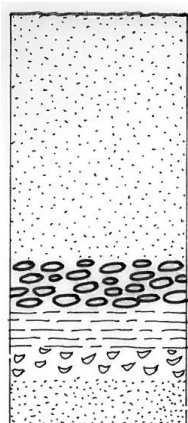
I

S

S

■ ½	□	■	■
■	□	■ ½	■
■	□	□	■

			Tolerances					
			Food	sun	shade	wet	dry	wind
<i>Bolboschoenus caldwellii</i>	brackish water sedge (deciduous)(H)	S	■	□	■	□	■	
<i>Calystegia soldanella</i>	nihinihi, sand convolvulus (F,M,S)	I	■	□	□	■	■	
<i>Carex pumila</i>	sand sedge (F,S)	S	■	□	□	■	■	
<i>Cortaderia richardii</i>	toetoe (S,H)	S	■	□	■	■	■	
<i>Craspedia sp.</i>	Sand woolly head (S)	I	■	□	□	■	■	
<i>Cyperus ustulatus</i>	upoko-tangata, umbrella sedge (H)	S	■	□	■	½	■	
<i>Desmoschoenus spiralis</i>	pingao, golden sand sedge (F)	S	■	□	□	■	■	
<i>Euphorbia glauca</i>	shore spurge (F,M)	I	■	□	□	■	■	
<i>Ficinia nodosa</i>	wiwi, knobby clubrush (F,M,S,H,E)	S	■	□	½	■	■	
<i>Geranium sessiliflorum</i>	NZ geranium (S)	I	■	□	□	■	■	
<i>Gnaphalium audax</i>	cudweed (S,E)	I	■	□	½	■	■	
<i>Gunnera dentata</i>	sand gunnera (H)	F,L	■	½	■	½	■	
<i>Hydrocotyle novae-zelandiae</i>	pennywort (H)	I	■	□	½	½	■	
<i>Hydrocotyle sulcata</i>	pennwort (H)	I	■	□	■	½	■	
<i>Isolepis basilaris</i>	bristle sedge (H)	S	■	□	■	½	■	
<i>Juncus australis</i>	wiwi, NZ rush (H)	S	■	□	■	½	■	
<i>Juncus pallidus</i>	giant rush (H)	S	■	□	■	½	■	
<i>Leptinella dioica</i>	cotula (H)	I	■	½	■	½	■	
<i>Libertia ixioides</i>	NZ iris (B)	I	½	■	□	■	■	
<i>Linum monogynum</i>	rauhuia (F,M,S)	I	■	□	□	■	■	
<i>Mazus novae-zelandiae</i>	(H)	I	■	□	½	½	■	
<i>Muehlenbeckia axillaris</i>	mat pohuehue (B,S)	F,I	■	½	□	■	■	
<i>Muehlenbeckia ephedroides</i>	leafless pohuehue (S)	F,I	■	□	□	■	■	
<i>Ophioglossum coriaceum</i>	adders tongue fer n (H)		■	□	½	½	■	
<i>Pelargonium inodorum</i>	a cranesbill, namunamu (M,S,E)	I	■	½	□	■	■	
<i>Phormium tenax</i>	harakeke, NZ flax (S)	N,L	■	□	■	■	■	
<i>Pimelea arenaria</i>	sand daphne (S)	I	■	□	□	■	■	
<i>Pteridium esculentum</i>	rahurahu, bracken fern (M,B)		■	½	½	■	■	
<i>Raoulia australis</i>	scabweed (S)	I	■	□	□	■	■	
<i>Sarcocornia quinqueflora</i>	glasswort (H)		■	□	½	■	■	
<i>Schoenoplectus pungens</i>	three-square (H)	S	■	□	■	½	□	
<i>Schoenus concinnus</i>	turf sedge (H)	S	■	□	½	½	■	
<i>Selliera radicans</i>	remuremu (H)	I	■	□	■	□	■	
<i>Senecio glomeratus</i>	NZ groundsel (E)	S,I	■	½	½	■	■	
<i>Senecio minimus</i>	NZ groundsel (E)	S,I	■	½	□	■	■	
<i>Senecio quadridentatus</i>	NZ groundsel (E)	S,I	■	□	□	■	■	
<i>Spinifex sericeus</i>	spinifex (F)	S	■	□	□	■	■	
<i>Zoysia minima</i>	sand twitch (S)	S	■	□	□	■	■	



Underlayers: Sand on beach-worn greywacke stones (2-100mm discoid) on clay on shells on sand.