

LAND SYSTEM
Fingal Tier

472343

Area (ha):
60541

COMPONENT	A	B	C	D
PROPORTION (%)	20	50	5	25
RAINFALL (mm)	Approximate Annual Rainfall: 750-1000			
GEOLOGY	Jurassic Dolerite			
TOPOGRAPHY	Extensive Highland Plateau		Rugged Hills and Marshes	
Position	High Stony Crests	Undulating Plateaus	Marshes	Protected Slopes
Typical Slope (°)	15	7	0	20
NATIVE VEGETATION Structure	Open Forest	(Tall) Open Forest	Closed Scrub/Heath	(Tall) Open Forest
Floristic Association (See Appendix 1 for common names)	<u>Eucalyptus delegatensis</u> <u>Lomatia tinctoria</u> <u>Drimys lanceolata</u> <u>Cyathodes glauca</u> <u>Olearia viscosa</u> <u>Pultenaea juniperina</u> <u>Pteridium esculentum</u>	<u>Eucalyptus delegatensis</u> <u>Lomandra longifolia</u> <u>Cyathodes divaricata</u> <u>Acacia dealbata</u> <u>Banksia marginata</u> <u>Lomatia tinctoria</u> <u>Poa sp.</u> <u>Pultenaea juniperina</u> <u>Bedfordia salicina</u> <u>Zleria arborescens</u> <u>Polystichum proliferum</u> <u>Clematis aristata</u>	<u>Melaleuca squamea</u> <u>Epacris gunnii</u> <u>Epacris lanuginosa</u> <u>Lepidosperma filiforme</u> <u>Gahnia grandis</u> <u>Callistemon viridiflorus</u> <u>Leptosperma lanigerum</u> <u>Restio australis</u> <u>Eucalyptus rodwayi</u>	<u>Eucalyptus delegatensis</u> <u>Eucalyptus obliqua</u> <u>Cyathodes glauca</u> <u>Gahnia grandis</u> <u>Drimys lanceolata</u> <u>Acacia dealbata</u> <u>Coprosma hirtella</u> <u>Cassinia aculeata</u> <u>Pultenaea juniperina</u> <u>Senecio linearifolius</u> <u>Blechnum wattsil</u> <u>Olearia argophylla</u> <u>Olearia viscosa</u> <u>Bedfordia salicina</u>
SOIL Surface (A) Texture	Loam/Clay Loam	Stony Clay Loam	Silty Clay Loam	Clay Loam
B Horizon (subsoil) Colour (moist)	Shallow, extremely stony loam/clay loam - Dark brown (10 YR 3/3) to dark yellowish brown (10 YR 3/4) on bedrock. Uniform.	Deep, stony light clay - Dark yellowish brown (10 YR 4/6). Gradational.	Deep very dark brown (10 YR 2/2) loam over a dark yellowish brown (10 YR 4/6) light clay. Duplex.	Deep stony, light clay Dark brown (10 YR 4/3) to dark yellowish brown (10 YR 4/6) Gradational.
Texture and primary profile form				
Permeability	Moderate/High	Moderate	Low	Moderate
Typical depth (m)	0.30	1.00	1.00	>1.40
LAND USE	Forestry, Nature Conservation			
HAZARDS	Moderate - Low sheet Erosion		Waterlogging, Flooding	Moderate sheet Erosion

FINGAL TIER

This land system includes the high altitude (>600 m), dolerite country on the Eastern Tiers between Fingal and Tooms Lake. It has been extrapolated to include country near Mt Dromedary and Tanina Bluff.

High altitude, stony crests have a shallow (0.30 m), uniform, extremely stony loam or clay loam developed on bedrock. This supports an open forest dominated by *Eucalyptus delegatensis* with a heathy understorey that includes *Lomatia tinctoria*, *Drimys lanceolata*, *Cyathodes glauca*, *Olearia viscosa*, *Pultenaea juniperina* and *Pteridium esculentum*.

Undulating plateaux contain a deep (1.00 m), stony, gradational soil with a stony clay loam surface over a dark yellowish brown, light clay. This supports an open forest to tall, open forest dominated by *Eucalyptus delegatensis* with an understorey that includes *Lomandra longifolia*, *Cyathodes divaricata*, *Acacia dealbata*, *Banksia marginata*, *Lomatia tinctoria*, *Poa sp.*, *Pultenaea juniperina*, *Bedfordia salicina*, *Zieria arborescens*, *Polystichum proliferum* and *Clematis aristata*.

Marshes contain a deep (1.00 m), duplex soil with a silty clay loam surface over a very dark brown loam over a dark yellowish-brown light clay. This soil supports closed scrub and heath dominated by *Melaleuca squamea*, *Epacris gunnii*, *Epacris lanuginosa*, *Lepidosperma filiforme*, *Gahnia grandis*, *Callistemon viridiflorus*, *Leptospermum lanigerum*, *Restio australis* and *Eucalyptus rodwayi*.

Protected slopes contain a deep (>1.40 m), stony, gradational soil with a clay loam surface over a dark brown to dark yellowish brown light clay. This supports an open forest to tall, open forest dominated by *Eucalyptus delegatensis* and *Eucalyptus obliqua* with an understorey of *Cyathodes glauca*, *Gahnia grandis*, *Drimys lanceolata*, *Acacia dealbata*, *Coprosma hirtella*, *Cassinia aculeata*, *Pultenaea juniperina*, *Senecio linearifolius*, *Blechnum watsii*, *Olearia argophylla*, *Olearia viscosa* and *Bedfordia salicina*.

Forestry and nature conservation are the major land uses. The soils are not particularly susceptible to erosion although sheet erosion may sometimes be a problem following major disturbance. Waterlogging and flooding hazards are associated with the marshes.