

Project Name: New Farm Forest
Project Code: NFF **Site ID:** BIL1 **Observation ID:** 1
Agency Name: CSIRO Division of Soils (SA)

Site Information

Desc. By:	I. Hollingsworth	Locality:	
Date Desc.:	15/04/97	Elevation:	91 metres
Map Ref.:	Sheet No. : 7827 1:100000	Rainfall:	No Data
Northing/Long.:	6077587 AMG zone: 55	Runoff:	No runoff
Easting/Lat.:	312423 Datum: AGD66	Drainage:	Very poorly drained

Geology

ExposureType:	Auger boring	Conf. Sub. is Parent. Mat.:	No Data
Geol. Ref.:	No Data	Substrate Material:	Auger boring, 1 m deep, Slightly porous, Clay

Land Form

Rel/Slope Class:	Undulating plains <9m 3-10%	Pattern Type:	Flood plain
Morph. Type:	Flat	Relief:	3 metres
Elem. Type:	Swamp	Slope Category:	Level
Slope:	0 %	Aspect:	No Data

Surface Soil Condition (dry): Surface crust, Self-mulching, Cracking

Erosion:

Soil Classification

Australian Soil Classification:		Mapping Unit:	N/A
Epihypersodic Self-Mulching Grey Vertosol Not recorded		Principal Profile Form:	N/A
Non-gravelly Medium fine Very fine Deep			

ASC Confidence:		Great Soil Group:	N/A
No analytical data are available but confidence is fair.			

Site Disturbance: Cultivation. Irrigated, past or present

Vegetation:

Surface Coarse Fragments: No surface coarse fragments

Profile Morphology

A11	0 - 0.1 m	Dark grey (5Y4/1-Moist); , 0-0% ; Light medium clay; Strong grade of structure, <2 mm, Polyhedral; Moderate grade of structure, 5-10 mm, Subangular blocky; Rough-ped fabric; Fine, (0 - 5) mm crack; Many (>5 per 100mm2) Fine (1-2mm) macropores, Dry; Very plastic; Normal plasticity; Very sticky; Field pH 6 (Raupach); Common, very fine (0-1mm) roots; Clear, Smooth change to -
A12	0.1 - 0.3 m	Dark grey (5Y4/1-Moist); , 7.5YR44, 10-20% , 0-5mm, Distinct; Medium heavy clay; Moderate grade of structure, 10-20 mm, Angular blocky; Moderate grade of structure, 20-50 mm, Columnar; Rough-ped fabric; Fine, (0 - 5) mm crack; Common (1-5 per 100mm2) Fine (1-2mm) macropores, Dry; Very plastic; Normal plasticity; Very sticky; Common cutans, 10-50% of ped faces or walls coated, distinct; Field pH 6 (Raupach); Common, very fine (0-1mm) roots; Clear, Smooth change to -
B2	0.3 - 0.4 m	Dark grey (5Y4/1-Moist); , 7.5YR44, 10-20% , 5-15mm, Faint; , 5Y51, 10-20% , 5-15mm, Faint; Heavy clay; Moderate grade of structure, 10-20 mm, Lenticular; Rough-ped fabric; Few (<1 per 100mm2) Very fine (0.075-1mm) macropores, Moist; Very plastic; Normal plasticity; Very sticky; Many cutans, >50% of ped faces or walls coated, distinct; Field pH 6 (Raupach); Common, very fine (0-1mm) roots; Clear, Smooth change to -
B	0.4 - 0.7 m	Dark grey (5Y4/1-Moist); , 0-0% ; Heavy clay; Moderate grade of structure, 10-20 mm, Lenticular; Smooth-ped fabric; Few (<1 per 100mm2) Very fine (0.075-1mm) macropores, Wet; Very plastic; Normal plasticity; Very sticky; Many cutans, >50% of ped faces or walls coated, distinct; Field pH 8.5 (Raupach); Clear, Smooth change to -
B	0.7 - 1.1 m	Light olive grey (5Y6/2-Moist); , 7.5YR44, 2-10% , 5-15mm, Distinct; Medium heavy clay; Moderate grade of structure, 10-20 mm, Lenticular; Smooth-ped fabric; Few (<1 per 100mm2) Very fine (0.075-1mm) macropores, Moist; Very plastic; Normal plasticity; Very sticky; Many cutans, >50% of ped faces or walls coated, distinct; Field pH 9.5 (Raupach); Clear, Smooth change to -

Project Name: New Farm Forest

Project Code: NFF

Site ID: BIL1

Observation ID: 1

Agency Name: CSIRO Division of Soils (SA)

Bky 1.1 - 1.5 m Light olive grey (5Y6/2-Moist); , 5Y56, 2-10% , 5-15mm, Faint; Medium clay; Moderate grade of structure, 10-20 mm, Lenticular; Smooth-ped fabric; Few (<1 per 100mm²) Very fine (0.075-1mm) macropores, Moist; Very plastic; Normal plasticity; Very sticky; Common cutans, 10-50% of ped faces or walls coated, distinct; Few (2 - 10 %), Manganiferous, Fine (0 - 2 mm), Concretions; Few (2 - 10 %), Calcareous, Medium (2 -6 mm), Soft segregations; Few (2 - 10 %), Calcareous, Medium (2 -6 mm), Nodules; Few (2 - 10 %), Gypseous, Medium (2 -6 mm), Crystals; Field pH 9.5 (Raupach);

Morphological Notes

Observation Notes

Epi-hypersodic, Self-mulching, Grey Vertosol, non-gravelly, medium fine, very fine, deep. Poorly drained and not performing

Site Notes

DENILQUIN, BILLINUDGEL, ; Photo surface 83/2, 83/3, 83/14; profile 83/15. Drainage irrigated, growth similar to N.Markars salinity trial!!Epi-hypersodic, Self-mulching, Grey Vertosol, non-gravelly, medium fine, very fine, deep, 1yr old

Project Name: New Farm Forest

Project Code: NFF

Agency Name: CSIRO Division of Soils (SA)

Site ID: BIL1

Observation ID: 1

Laboratory Test Results:

Depth	pH	1:5 EC	Exchangeable Cations			Na	Exchangeable	CEC	ECEC	ESP
m		dS/m	Ca	Mg	K	Cmol (+)/kg	Acidity			%

Depth	CaCO3	Organic	Avail.	Total	Total	Total	Bulk	Particle		Size	Analysis	
m	%	C	P	P	N	K	Density	GV	CS	FS	Silt	Clay
		%	mg/kg	%	%	%	Mg/m3			%		

Depth	COLE	Gravimetric/Volumetric Water Contents							K sat	K unsat
		Sat.	0.05 Bar	0.1 Bar	0.5 Bar	1 Bar	5 Bar	15 Bar		
m					g/g -	m3/m3			mm/h	mm/h

Project Name: New Farm Forest
Project Code: NFF Site ID: BIL1
Agency Name: CSIRO Division of Soils (SA)

Observation ID: 1

Laboratory Analyses Completed for this profile