

Project Name: Soil Studies in the Lower Namoi Valley
Project Code: EDGEROI **Site ID:** ed126 **Observation ID:** 1
Agency Name: CSIRO Division of Soils (QLD)

Site Information

Desc. By: W.T. Ward	Locality: W.H.(Warwick) Wall, Appletrees
Date Desc.: 06/01/87	Elevation: 197 metres
Map Ref.: Sheet No. : 8837_N 1:50000	Rainfall: No Data
Northing/Long.: 6661100 AMG zone: 55	Runoff: No Data
Easting/Lat.: 748400 Datum: AGD66	Drainage: No Data

Geology

ExposureType: Undisturbed soil core	Conf. Sub. is Parent. Mat.: No Data
Geol. Ref.: No Data	Substrate Material: No Data

Land Form

Rel/Slope Class: No Data	Pattern Type: No Data
Morph. Type: No Data	Relief: No Data
Elem. Type: Terrace flat	Slope Category: Level
Slope: 0 %	Aspect: No Data

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

Erosion:

Soil Classification

Australian Soil Classification: N/A	Mapping Unit: N/A
ASC Confidence: Confidence level not specified	Principal Profile Form: Ug5.15
	Great Soil Group: Grey clay

Site Disturbance: Cultivation. Irrigated, past or present, Cultivation. Rainfed,

Vegetation:

Surface Coarse Fragments:

Profile Morphology

A11p	0 - 0.1 m	Very dark greyish brown (10YR3/2-Moist); Dark grey (10YR4/1-Dry); ; Light clay; Moderate grade of structure, 2-5 mm, Granular; Smooth-ped fabric; Fine, (0 - 5) mm crack; Few (<1 per 100mm ²) Very fine (0.075-1mm) macropores, Moderately moist; Very firm consistence; Field pH 6.5 (pH meter); Few, very fine (0-1mm) roots; Sharp, Smooth change to -
A12	0.1 - 0.25 m	Very dark greyish brown (10YR3/2-Moist); ; Light medium clay; Moderate grade of structure, 50-100 mm, Angular blocky; Smooth-ped fabric; Fine, (0 - 5) mm crack; Few (<1 per 100mm ²) Very fine (0.075-1mm) macropores, Moderately moist; Strong consistence; Field pH 8.5 (pH meter); Few, very fine (0-1mm) roots;
A13	0.25 - 0.7 m	Very dark greyish brown (10YR3/2-Moist); , 10YR62, 0-2% , 0-5mm, Distinct; Light medium clay; Weak grade of structure, 50-100 mm, Angular blocky; Smooth-ped fabric; Fine, (0 - 5) mm crack; Few (<1 per 100mm ²) Very fine (0.075-1mm) macropores, Moderately moist; Strong consistence; Very few (0 - 2 %), Calcareous, Fine (0 - 2 mm), Nodules; Field pH 8.7 (pH meter); Few, very fine (0-1mm) roots; Diffuse, Smooth change to -
B21	0.7 - 1 m	Brown (7.5YR4/4-Moist); , 10YR32, 20-50% , 15-30mm, Prominent; , 10YR72, 0-2% , 0-5mm, Faint; Light medium clay; Weak grade of structure, 50-100 mm, Angular blocky; Smooth-ped fabric; Fine, (0 - 5) mm crack; Few (<1 per 100mm ²) Very fine (0.075-1mm) macropores, Moderately moist; Very firm consistence; Very few (0 - 2 %), Calcareous, Fine (0 - 2 mm), Nodules; Field pH 9 (pH meter);
B22	1 - 1.9 m	Brown (7.5YR4/4-Moist); , 7.5YR72, 0-2% , 5-15mm, Prominent; , 10YR41, 2-10% , 5-15mm, Distinct; Light medium clay; Weak grade of structure, 50-100 mm, Angular blocky; Smooth-ped fabric; Fine, (0 - 5) mm crack; Few (<1 per 100mm ²) Very fine (0.075-1mm) macropores, Moderately moist; Very firm consistence; Very few (0 - 2 %), Calcareous, Medium (2 -6 mm), Nodules; Field pH 9 (pH meter);
B23	1.9 - 2.71 m	Brown (7.5YR5/4-Moist); , 7.5YR72, 0-2% , 5-15mm, Prominent; , 10YR41, 2-10% , 5-15mm, Distinct; Light medium clay; Moderate grade of structure, 50-100 mm, Angular blocky; Moderate grade of structure, 2-5 mm, Cast; Smooth-ped fabric; Fine, (0 - 5) mm crack; Few (<1 per 100mm ²) Very fine (0.075-1mm) macropores, Moderately moist; Strong consistence; Very few (0 - 2 %), Calcareous, Medium (2 -6 mm), Nodules; Field pH 9 (pH meter);

Morphological Notes

A11p From 10cm-30cm appears to be compacted. ?MVpH.

Observation Notes

Project Name: Soil Studies in the Lower Namoi Valley
Project Code: EDGEROI **Site ID:** ed126 **Observation ID:** 1
Agency Name: CSIRO Division of Soils (QLD)

Site Notes

Micro undulations on surface, recently cultivated. Few calcium carbonate nodules on surface. Plus few waterworn quartz

Observation ID: 1

Laboratory Test Results:

Depth	pH	1:5 EC	Exchangeable Cations		Exchangeable	CEC	ECEC	ESP
m		dS/m	Ca	Mg	K	Na	Acidity	%
						Cmol	(+)/kg	
0 - 0.02	8.02A	0.101A	20.76B	10.28	1.72	0.44		
0 - 0.1	6.91A	0.266A	19.98B	10.22	1.17	0.67		
0.1 - 0.2	8.34A	9.100001E-02A	21.43B	11.29	0.82	1.26		
0.3 - 0.4	8.99A	0.076A	20.16B	12.76	0.55	2		
0.7 - 0.8	9.33A	0.261A	15.9B	12.49	0.64	3.78		
1.2 - 1.3	9.43A	0.304A	9.780001B	11.4	0.58	4.51		
2.5 - 2.6	9.31A	0.221A	9.05B	10.99	0.49	5.59		

[illegible][illegible]

Project Name: Soil Studies in the Lower Namoi Valley
Project Code: EDGEROI **Site ID:** ed126 **Observation ID:** 1
Agency Name: CSIRO Division of Soils (QLD)

Laboratory Analyses Completed for this profile

15A2_CA	Exchangeable bases (Ca ²⁺ ,Mg ²⁺ ,Na ⁺ ,K ⁺) - 1M ammonium chloride at pH 7.0, pretreatment for soluble salts
15A2_K	Exchangeable bases- 1M ammonium chloride at pH 7.0, pretreatment for soluble salts
15A2_MG	Exchangeable bases- 1M ammonium chloride at pH 7.0, pretreatment for soluble salts
15A2_NA	Exchangeable bases- 1M ammonium chloride at pH 7.0, pretreatment for soluble salts
19B1	Carbonates - manometric
3A1	EC of 1:5 soil/water extract
4A1	pH of 1:5 soil/water suspension
5A2	Chloride - 1:5 soil/water extract, automated colour
6B3	Total organic carbon - high frequency induction furnace, infrared
7B1	Water soluble nitrate - automated colour
9B1	Bicarbonate-extractable phosphorus - manual colour
P10_CF_C	Clay (%) - Coventry and Fett pipette method
P10_CF_Z	Silt (%) - Coventry and Fett pipette method