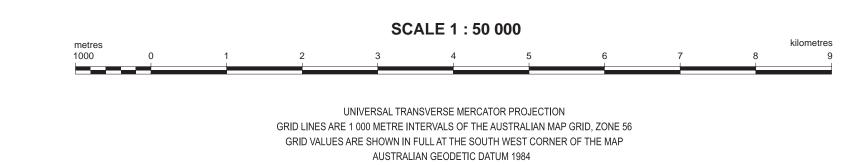


#### BRISBANE VALLEY LAND RESOURCE ASSESSMENT - MAP 2

#### **BRISBANE VALLEY - MOORE SHEET**

# SOILS



#### REFERENCE

							REFE	RENCE			
34		Mapping Unit <sup>1</sup>	Distinguishing Attributes Associated with Principal Soil		Principal e Forms³	Australian Classification⁴	Area⁵ (ha)	Mapping Unit <sup>1</sup>	Major Attributes of Principal Soil	Main Principal Profile Forms <sup>3</sup>	Australian Classification⁴
33	SOILS O	OVERLYING ALLUVIUM  FTHE FLOOD PLAINS AND L  n to gradational sands and lo						Very shallow soils overlyin  Dg  D'AGUILAR	ng weathering rock  Very shallow loamy soil, usually rocky.	Um1.21 Um1.24 Um1.41 Um1.43 Um6.21 Um6.61	Leptic Rudosols
	Cr	CRESSBROOK	Stratified soil with a sandy surface and neutral reaction trend.	Gn2.02 Uc1.23 Uc1.43	Uc1.21 Uc1.41 Uc2.21	Stratic Rudosols	399	(Crossdale Rhyolite, u	E-GRAINED ACID IGNEOUS ROCKS ndifferentiated rhyolites/trachytes)		
32 26° 50'	Cr(rp)	CRESSBROOK rocky phase	Cressbrook soil with common to abundant coarse gravel or cobble in the surface soil.  Stratified soil with a loamy surface and neutral reaction trend.	Gn2.12 Gn3.12	Gn2.42 Um1.21	Stratic Rudosols; Chernic or Chernic-Leptic Tenosols	54 1 298	Texture contrast soils  Bd BURRUNDON	Sandy to loamy surface soil over brown, black, yellowish brown or greyish brown clay subsoil with neutral to alkaline reaction trend.	Db2.43 Dd1.33 Dd2.33 Dd2.43 Dy2.13 Dy2.33 Dy2.42 Dy2.43	Brown, Black or Grey Sodosols
31	Md	] MONSILDALE	Loamy, strongly structured soil with a gradational to uniform profile and neutral	Um1.23 Um5.52 Gn3.12 Gn3.42	Um1.44 Um6.23 Gn3.22 Gn3.43	Black or Brown Dermosols	2 288	Bm BERRIMA <sup>2</sup>	Loamy surface soil over brown clay subsoil with acid reaction trend.	Db2.41 Dy3.41	Brown Sodosols; Brown Chromosols
	SOILS O	F THE LOW TO MID TERRAC	reaction trend.	Uf6.32 Um6.31	Uf6.33			Very shallow soils overlyin	ng weathering rock  Very shallow sandy soil, usually rocky.	Uc1.44 Uc2.12 Um1.41 Um2.12 Um3.21	Leptic Rudosols
30		e contrast soils							RSE-GRAINED ACID IGNEOUS ROCKS	01110.21	
	GI	GALLANANI	Loamy surface soil overlying reddish brown to black, well structured clay subsoil. Neutral to alkaline reaction trend.	Db1.12 Db1.32 Dd1.13 Gn3.22	Db1.22 Dd1.12 Dr2.22 Gn3.25	Brown, Black, Red or Grey Chromosols; Brown, Black, Red or Grey Dermosols	3 311		and other granitic intrusions) n neutral to alkaline reaction trend Sandy surface soil over brown clay subsoil. Subsurface horizon weakly developed.	Db1.12 Db1.22 Db2.12	Brown Chromosols
29	GI(rp)	GALLANANI rocky phase GUNYAH	Gallanani soil with common to abundant coarse gravel in the surface soil.  Loamy surface soil over black, brown or dark grey clay subsoil with neutral to alkaline	Db1.13 Dd1.13	Dd1.12 Dd1.33	Brown, Black or Grey Sodosols; Brown, Black or	35 959	GiLLA	Sandy surface soil over brown or yellowish brown clay subsoil. Subsurface bleached.	Db1.42 Dd1.33 Dy2.32 Dy2.43 Dy3.13 Dy3.42	Black or Brown Chromosols; Black or Brown Sodosols
28	Uniforn	n clay soils	reaction trend.	Dd2.33	Dy2.13	Grey Chromosols		Texture contrast soils with	n neutral to acid reaction trend Sandy surface soil over brown to yellow clay	Db2.41 Dy2.31	Brown, Yellow or Grey
8	Bs	BASEL	Grey clay (cracking or non-cracking). Subsurface may be bleached.	Uf3 Ug3.2 Ug5.24 Ug5.28	Uf6.33 Ug5.21 Ug5.25	Grey Vertosols; Grey Dermosols	1 630	REBEL REBEL	subsoil.  Loamy surface soil over red clay subsoil.	Dr2.12 Dr2.22	Chromosols  Red Chromosols
27	Bs(gp)	BASEL gilgai phase	Basel soil with gilgai microrelief.				1 182			Dr2.42 Dr3.31	
21	Du	DUGGUA <sup>2</sup>	Brown cracking clay.	Ug5.31 Ug5.33 Ug5.35	Ug5.32 Ug5.34	Brown Vertosols	-	Uniform sands  IV  IV	Deep sand showing little texture change with depth. Neutral reaction trend.	Uc1.22 Uc2.23 Uc5.23 Gn2.55	Orthic Tenosols
<b>S</b> 26	Cb	COOEEIMBARDI	Self-mulching black cracking clay.	Ug5.11 Ug5.15 Ug5.17	Ug5.14 Ug5.16	Black Vertosols	2 238	Very shallow soils overlyin	ng weathering rock Very shallow sandy soil.	Uc1.21 Uc1.22	Leptic Rudosol
2	SOILS O	FTHE MID TO HIGH TERRACE	ES					FS	INE-GRAINED SEDIMENTARY ROCKS	Um1.41 Um3.21	Leptic Rudosoi
		e contrast soils SPENCER	Loamy surface soil over brown, yellowish	Db1.33	Db1.43	Brown or Grey Sodosols;	8 883	(Maronghi Creek Gro	oup, Cressbrook Creek Group, Marumba Beds on neutral to alkaline reaction trend	s: chert, jasper, 1	nudstone, shale, greywacl
25 1	Sp		brown or grey clay subsoil with neutral to alkaline reaction trend. Subsurface often strongly bleached.	Db2.43 Dy2.42 Dy3.33	Dy2.33 Dy2.43 Dy3.43	Brown or Grey Chromosols		EV ESKVALE	Loamy surface soil over brown, yellowish brown or grey clay subsoil. Subsurface often strongly bleached.	Db1.32 Db1.42 Db2.42 Dy2.42 Dy2.43 Dy3.33	Brown or Grey Sodosols; Brown or Grey Chromosols
	Sp(gp)	SPENCER gilgai phase SPENCER	Spencer soil with gilgai microrelief.  Spencer soil with common to abundant				435 37	Texture contrast soils with	acid reaction trend	Dy3.42 Dy3.43	
24	Sp(rp)	rocky phase OTTABA	coarse gravel or cobble in the surface soil.  Sandy to loamy surface soil over mottled clay	Db2.41	Dy2.41	Brown, Yellow or Grey	1 993	Hs HORSE	Loamy surface soil over brown to yellow clay subsoil. Subsurface often strongly bleached.	Dy2.31 Dy2.21 Dy2.41 Dy3.41	Brown, Yellow or Grey Chromosols; Brown, Yellow or Grey Kurosols
	Ot	OTTABA	subsoil with acid reaction trend. Subsurface strongly bleached.  Ottaba soil with gilgai microrelief.	Dy3.41	Dy5.41	Kurosols; Brown, Yellow or Grey Sodosols	459	Fm FREEMAN <sup>2</sup>	Loamy surface soil over red clay subsoil.	Dr2.11 Dr2.21 Dr2.31 Dr2.41 Dr3.21 Dr3.31	Red Chromosols; Red Kurosols; Red Sodosols
23 26° 55	Ot(gp) Ot(rp)	gilgai phase  OTTABA rocky phase	Ottaba soil with common to abundant coarse gravel or cobble in the surface soil.				626	Gradational to texture con  NOON	trast soils with neutral reaction trend  Loamy surface soil over red or brown clay subsoil.	Db1.12 Dr2.12 Dr2.22 Dy2.12	Brown or Red Chromosols; Brown or
22			RAINED SEDIMENTARY ROCKS					Very shallow soils overlyin	ng weathering rock Very shallow loamy soil, associated with	Gn3.12 Gn3.24 Um1.21 Um1.23	Red Dermosols  Leptic Rudosols
		rmation, Bryden Form e contrast soils with neutral t	ation, Helidon Sandstone: sandston o alkaline reaction trend	e, conglo	omerate, s	hale, siltstone)			upper slopes and ridges.	Um1.43 Um4.11 Um4.13 Um6.23	25000 (10000000
21	Вр	ВЕРРО	Loamy surface soil over brown, yellowish brown or greyish brown clay subsoil. Subsurface strongly bleached. Subsoil generally sodic.	Db1.33 Db1.43 Dy2.42 Dy3.33	Db1.42 Db2.43 Dy2.43 Dy3.43	Brown or Grey Sodosols; Brown or Grey Chromosols	14 512	SOILS OVERLYING MET (Jimna Phyllite: phyllit Texture contrast soils	FAMORPHIC ROCKS te, minor basic metavolcanics)		
	Bp(rp)	BEPPO rocky phase WATT	Beppo soil with common to abundant coarse gravel or cobble in the surface soil.  Loamy surface soil over brown, yellowish	Db1.32	Db1.33	Brown, Grey or Black	966 1 776	Bu BUNYA	Loamy surface soil over brown, red or yellow clay subsoil. Subsurface often strongly bleached. Neutral to acid reaction trend.	Db1.42 Dr2.31 Dr2.41 Dr3.31 Dr3.41 Dy2.31	Red or Brown Sodosols; Red or Brown Kurosols Red or Brown Chromosols
20	Wt	] WATT	brown or black clay subsoil. Subsurface commonly with sporadic (weak) bleach. Subsoil generally sodic.  Watt soil with common to abundant coarse	Db2.33 Dy2.13 Dy3.33	Dd1.33 Dy2.33	Sodosols; Brown, Grey or Black Chromosols	251	Very shallow soils overlyin Yn YEDNIA²	ng weathering rock Very shallow loamy soil, usually rocky.	Dy2.41 Um1.21 Um1.41	Leptic Rudosols
	Wt(rp)	rocky phase	gravel or cobble in the surface soil.				201	Mapping Unit <sup>1</sup>	Geology	Um1.43  Predominant	Main Soils
19	CI	CALABASH <sup>2</sup>	Loamy surface soil over brown or yellow clay subsoil. Subsurface may be bleached.	Dy2.12 Dy3.21	Dy2.42 Dy3.31	Brown or Yellow Chromosols	-	inapping oint		Vegetation	
3	Кр	KIPPER	Subsoil not sodic.  Loamy surface soil over red subsoil grading to brown or yellowish brown with depth.  Subsurface may be bleached. Subsoil not	Dy3.42 Dr2.21 Dr2.31 Dr3.21	Dr2.22 Dr2.41 Dr4.21	Red Chromosols	174	SOIL ASSOCIATIONS O	N STEEP HILLS  Coarse-grained sedimentary rocks (Esk Formation, Bryden Formations, Helidon Sandstone)	Eucalypt open fores	t Gh, Gk, Tu, Cl, Kp, Wt
18	Gh	GREENHIDE	sodic.  Loamy surface soil over brown or red clay subsoil. Subsoil not sodic.	Db1.12 Dr2.12 Dy2.12	Db1.22 Dr2.22	Brown or Red Chromosols	224	Hcs	Coarse-grained sedimentary rocks (Esk Formation)	Softwood scrub	Lv, Ca, Gk
	Texture	e contrast soils with acid read		•	D=0.44	Danier or Valley Konsonley	4 000	Hnf	Intermediate to basic volcanic rocks (Neara Volcanics)  Intermediate to basic volcanic rocks	Eucalypt open fores  Softwood scrub	t Le, Na, Pd, Dg, St  De, Dg
17	Tu	TURTLE	Loamy surface soil over yellow, brown or red clay subsoil. Subsurface strongly bleached. Sodic subsoil.	Db1.31 Dr3.41 Dy2.41 Dy3.41	Dr2.41 Dy2.31 Dy3.31	Brown or Yellow Kurosols; Brown or Red Sodosols	1 630	Hrf	(Neara Volcanics)  Fine-grained acid igneous rocks	Eucalypt open fores	-
v 12	Gradati Lv	ional to texture contrast soils  LAKEVIEW	s with neutral to alkaline reaction trend  Loamy surface soil over brown clay subsoil.  Softwood scrub or formerly softwood scrub	Db2.11 Db1.13	Db1.12 Db2.12	Brown Chromosols; Brown Dermosols	300	Hgf	(Crossdale Rhyolite, undifferentiated rhyolites/trachytes)  Coarse-grained acid igneous rocks (Eskdale Granodiorite and other granitic	Eucalypt open fores	t Rb, Bl, Iv, Fs
16	Gradati	•	vegetation. with neutral to acid reaction trend	Dy2.12	Gn3.22	D. I.K. alian I	4 507	Hff	intrusions) Fine-grained sedimentary rocks (Cressbrook Creek Group, Maronghi	Eucalypt open fores	t Nn, Wl, Hs, Fm, Ev
	Hb	HIBISCUS     YELLOWBANK	Red loamy soil.  Yellow or brown loamy soil.	Gn2.11 Gn2.15 Um1.43 Gn2.22	Gn2.12 Gn4.12 Um4.21 Gn2.24	Red Kandosols  Brown or Yellow	1 587 196	Hfs	Creek Group, Marumba Beds) Fine-grained sedimentary rocks (Cressbrook Creek Group)	Softwood scrub	Nn, WI, Hs, Fm, Ev
15	Yb	n clay soils	relief of brown bully self.	Gn2.42 Um5.52	Um5.21	Kandosols	130	Hmf	Metamorphic rocks (Jimna Phyllite)	Eucalypt open fores	t Bu, Yn
14	Br	BEER	Black, brown or grey cracking clay. Forest or formerly forest vegetation.	Ug5.12 Ug5.14 Ug5.32	Ug5.13 Ug5.21 Ug5.34	Black, Brown or Grey Vertosols	513	MISCELLANEOUS	Stream		
27° 00	Br(rp)	BEER rocky phase CABOONBAH	Beer soil with common to abundant coarse gravel or cobble in the surface soil.  Grey or brown cracking clays. Softwood	Ug5.22	Ü	Brown or Grey Vertosols	13	Lake	Lake		
152° 30'	Ca	CABOUNDAH	scrub or formerly softwood scrub vegetation.	Ug5.32	Ug5.24 Ug5.34	Brown or Grey vertosols	1 222	Dam	Dam		
	Very sh	nallow soils overlying weathe GRIENKE	ering rock  Very shallow loamy soil, associated with upper slopes and ridges.	Um1.21 Um1.41	Um1.23 Um1.43	Leptic Rudosols	10	Quar	Quarry		
			NATE TO BASIC VOLCANIC ROCKS		<b>G</b>			Urbn	Urban area		
		e contrast soils with neutral to  MOORE	o alkaline reaction trend  Loamy surface soil over brown, yellowish	Db1.42	Db1.43	Brown, Grey or Yellow	5 097	•1234	Soil profile sampling site		
	IVIO		brown or greyish brown clay subsoil. Subsurface strongly bleached.	Dy2.33 Dy2.43 Dy3.43	Dy2.42 Dy3.42	Sodosols; Brown, Grey or Yellow Chromosols	2.004	$\sim$	Solid lines represent clear or observed boundaries between	en mapping units	
	Dw	DUNWICH	Loamy surface soil over black, brown, yellowish brown or greyish brown clay subsoil. Subsurface commonly with sporadic (weak) bleach.	Db1.13 Db1.32 Dd1.33 Dy2.32	Db1.23 Db1.33 Dy2.13 Dy2.33	Brown, Black, Yellow or Grey Chromosols; Brown, Black, Yellow or Grey Sodosols	3 224		Dashed lines represent either approximate boundaries or  - Approximate boundaries are based on geology mapp patterns and vegetation from aerial photographs		•
	Texture Pd	e contrast soils with acid read PADDY	Loamy surface soil over brown, yellowish	Db1.21	Db1.41	Brown or Grey Kurosols;	780		Gradual or diffuse boundaries are used where a clea field observations and aerial photograph interpretation	•	e determined by
	St	STEVENTON	brown or greyish brown clay subsoil. Subsurface commonly bleached. Loamy surface soil over red clay subsoil.	Dy2.31 Dy3.31 Dr2.21 Dr3.11	Dy2.41 Dy3.41 Dr2.31 Dr3.31	Brown Sodosols; Brown Chromosols Red Chromosols; Red Kurosols	202	V	ased on Isbell, R.F. (1996), The Australian Soil Classificatio Yery shallow <0.25 m Shallow 0.25-<0.5 m pased on Isbell, R.F. (1996), The Australian Soil Classification	Moderate 0.5-<	1.0 m
	Shallov	J w to moderately deep texture ] LINVILLE	contrast soils with neutral reaction trend  Loamy surface soil over brown, black, red or	Dr3.11	Dr3.31	Brown, Grey, Red or	4 164	Soil layers: si	pased on Isbell, K.F. (1996), The Australian Soil Classification urface soil corresponds to the A1 horizon ubsurface corresponds to the A2 horizon ubsoil corresponds to the B or D horizons	<b></b>	
	Le		greyish brown clay subsoil.	Dd1.12 Dr2.22 Dy2.22	Dr2.12 Dy2.12	Black Chromosols	· ·		nce applies to the entire study area and is the same for both	soils maps (Map 1 and	d Map 2).
	Shallov Na	w to moderately deep soils w NEARA	ith dark, strongly structured surface horizons a Uniform, gradational or texture contrast soil with a loamy to light clay surface over black,	Dd1.12 Dy2.12	Dd1.13 Gn3.12	Brown, Black or Grey Dermosols; Brown, Black	2 533	≥ 60% of a ma	are named after the dominant soil profile class. The domina apping unit area. The use of two symbols (e.g. Bp-Wt) indicated il profile classes are co-dominant.		
		DEER	brown or greyish brown clay subsoil. Forest vegetation. Uniform, gradational or texture contrast soil	Gn3.41 Uf6.32 Db1.12	Uf6.31 Uf6.33 Db1.13	or Grey Chromosols  Brown or Black	394	components o	or soil profile classes that do not actually occur as mapping of the miscellaneous soil units on steep hills and mountains. It is provided a complete list of soil profile classes likely to be e	They are listed here s	
	De		with a loamy to light clay surface over black or brown clay subsoil. Softwood scrub or formerly softwood scrub vegetation.	Dd1.12 Uf6.31	Gn3.52 Uf6.32	Dermosols; Brown or Black Chromosols		3 Principal profil	e forms are from Northcote, K.H. (1979), A Factual Key for the striction of the striction o	the Recognition of Aus	tralian Soils.
	Uniforr Jm	m cracking clays JIMNA	Black or brown cracking clay with alkaline reaction trend.	Ug5.12 Ug5.31	Ug5.14 Ug5.32	Black or Brown Vertosols	84	5	al areas for both soils map sheets (Map 1 and Map 2).		

792 Bu 436

Dw Hnn 151 Hnf 151 Hnf

Hns 176

Hns 176

Hns 176

Hns 176

30 Dw 116 Le-Na Bs 18 20 21 22 116 155 155 17 18 38 39 39 39 37 17 18 38 39 Dw Dw 39 Dw 117 Ot 1

### KEY TO 1:50 000 MAPPING

4	1	4
NANANGO	JIMNA	KENILWORTH
3	442	9444- 3
BLACKBUTT	MOORE Moore	KILCOY
4	1	4
ANDURAMBA	ESK	SOMERSET DAM
}	Esk	
3 93	43 2	9443-
CROWS NEST	MOUNT HALLEN	LOWOOD

## NATIONAL LANDCARE PROGRAM

The National Landcare Program, whose support is gratefully acknowledged, largely funded the Brisbane Valley Land Resource Assessment.

#### INTENSITY STATEMENT

This is a medium intensity soil survey consisting of ground observations and aerial photograph interpretation. Its purpose is to provide information for regional planning and catchment management and to identify agricultural and pasture production areas. For intensive land use at the property scale, more detailed examinations should be carried out prior to development. Observation density averaged one observation per 53 ha over the entire study area, ranging from less than one per 100 ha in rugged terrain to approximately one per 25 ha in intensively used areas.

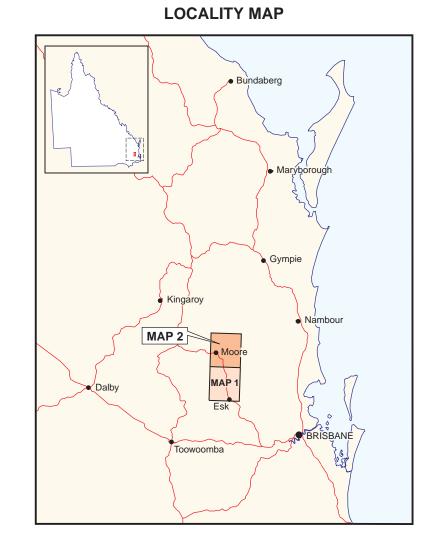
SURVEY by B.P. Harms and S.M. Pointon, Department of Natural Resources and P. Sorby, formerly of the Department of Primary Industries.

CARTOGRAPHY by G.J. Finney, Natural Sciences Precinct, Department of Natural Resources, Indooroopilly, Brisbane.

BASE MAP compiled from the Digital Cadastral Data Base, Department of Natural Resources, Brisbane.

PRODUCED at the Natural Sciences Precinct by the Spatial Information and Mapping Group, Resource Sciences and Knowledge, Department of Natural Resources, Indooroopilly.

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Ug5.12 Ug5.14 Ug5.32
Ug5.35

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BRISBANE VALLEY AREA - MOORE SHEET

SOILS

DNR Ref. No. 99-BVL-I-P 3233