

 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Report No
 17697/R001

 Date Issued
 07/12/2017

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 23/11/17

 Location
 CRAIGIEBURN
 Checked by
 JHF

FeatureCLASS 4Layer thickness150 mmTime:10:40:48

Test No		1	2	3	4	5
Location			Va	ntage Boulev	ard	
	Chainage	390	350	300	250	220
	Offset	1.8	1.8	1.8	1.8	1.8
		east	west	east	west	east
		of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т					
Measurement depth	mm	125	125	125	125	125
Field wet density	t/m³	2.42	2.39	2.41	2.39	2.41
Field dry density	t/m³	2.22	2.20	2.20	2.19	2.21
Field moisture content	%	8.5	8.0	9.0	9.0	8.5
Compactive effort Maximum Dry Density Optimum Moisture Content	t/m³ %			2.:		
Test procedure AS 1289.5.4.1				1		1
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	-	-	-	-	-
Percent of oversize material	dry	-	-	-	-	-
Adjusted Maximum Dry Density	t/m³	•	-	-	-	-
Adjusted Optimum Moisture Conter	nt %	-	-	-	-	-
Moisture Variation From		0.5%	0.0%	1.5%	1.0%	0.5%
Optimum Moisture Conte	nt	wet	wet	wet	wet	wet
	-					
Moisture Ratio (R <sub>m</sub> )	%	106.5	101.5	115.0	111.5	106.5
				•		
Density Ratio (R <sub>D</sub> )	%	99.5	98.5	98.5	98.0	99.0



July Jo



 CIVIL GEOTECHNICAL SERVICES
 Report No
 17697/R002

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Date Issued
 07/12/2017

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 23/11/17

 Location
 CRAIGIEBURN
 Checked by
 JHF

FeatureCLASS 3Layer thickness150 mmTime:10:37:32

Test No		6	7	8	9	10	11
Location		7	radition Roa	d	Е	dgewater Ro	ad
	Chainage	60	110	130	120	70	20
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		east	west	east	south	north	south
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.31	2.31	2.31	2.31	2.32	2.32
Field dry density	t/m³	2.23	2.23	2.23	2.22	2.23	2.22
Field moisture content	%	3.5	3.5	4.0	4.0	4.0	4.5
Maximum Dry Density Optimum Moisture Content	t/m³ %			2.:			
Compactive effort Maximum Dry Density	-			2.:			
	,,						
Test procedure AS 1289.5.4.1	-		T	T			•
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	-	-	-	-	-	-
Percent of oversize material	dry	-	-	-	-	-	-
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-
Adjusted Optimum Moisture Conte	ent %	-	-	-	-	-	-
Moisture Variation From	n	4.5%	4.5%	4.0%	4.0%	4.0%	3.5%
Optimum Moisture Cont	ent	dry	dry	dry	dry	dry	dry
			40.0	40.0	1 4		
Moisture Ratio (R <sub>m</sub> )	%	45.5	43.0	49.0	47.5	50.5	55.0
	0.1	00 F	00.5	00.0	000	00.0	00.0
Density Ratio (R <sub>D</sub> )	%	98.5	98.5	98.0	98.0	98.0	98.0



Approved Signatory: Justin Fry



 CIVIL GEOTECHNICAL SERVICES
 Report No
 17697/R003

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Date Issued
 08/12/2017

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 28/11/17

 Location
 CRAIGIEBURN
 Checked by
 JHF

FeatureCLASS 3Layer thickness150 mmTime:07:51:08

Test No		12	13	14	15	16	17
Location			Vantage	Boulevard		Sona	Street
	Chainage	230	280	330	380	40	90
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		east	west	east	west	south	north
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.40	2.38	2.36	2.39	2.38	2.38
Field dry density	t/m³	2.24	2.24	2.24	2.26	2.25	2.25
Field moisture content	%	6.5	6.0	5.0	5.5	6.0	6.0
Maximum Dry Density Optimum Moisture Content	t/m³ %			2. 8			
Maximum Dry Density							
Test procedure AS 1289.5.4.1							
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	-	-	-	-	-	-
Percent of oversize material	dry	-	-	-	-	-	-
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-
Adjusted Optimum Moisture Conter	nt %	-	-	-	-	-	-
Moisture Variation From		1.0%	2.0%	3.0%	2.5%	2.0%	2.0%
Optimum Moisture Conte	nt	dry	dry	dry	dry	dry	dry
Moisture Ratio (R <sub>m</sub> )	%	86.0	73.0	65.0	70.5	73.0	74.0
		20.5	22.2				
Density Ratio (R <sub>D</sub> )	%	98.5	99.0	98.5	99.5	99.0	99.0



July Jo



Job No 17697 CIVIL GEOTECHNICAL SERVICES Report No 17697/R004 6 - 8 Rose Avenue, Croydon, Vic 3136 Date Issued 08/12/2017

WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD) Tested by AC Client ASTON - STAGE 27 Project Date tested 28/11/17 **CRAIGIEBURN** Location Checked by **JHF** 

Feature CLASS 3 Layer thickness 150 mm Time: 07:55:17

		18	19	20	21	22	23
Location	Bold Street   Element Street	et					
С	: hainage	160	125	75	90	40	10
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		north	south	north	west	east	west
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	m						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.34	2.35	2.35	2.33	2.33	2.35
Field dry density	t/m³	2.23	2.25	2.26	2.24	2.23	2.26
Field moisture content	%	4.5	4.5	4.0	4.0	4.0	4.0
Compactive effort Maximum Dry Density	t/m³			2.2			
Optimum Moisture Content	%			8.	0		
,				T	1	ī	
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0	19.0
Oversize rock retained on sieve Percent of oversize material	wet	19.0	19.0	19.0	19.0	19.0	19.0
Oversize rock retained on sieve Percent of oversize material Percent of oversize material	wet dry	19.0 - -	19.0	19.0 - -	19.0 - -	19.0 - -	19.0 - -
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³	- - -			- - -		-
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry	19.0	19.0 - - -	19.0 - - -	19.0 - - -	19.0 - - -	19.0 - - - -
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³	- - -			- - -		- - - -
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content	wet dry t/m³ %	- - -	- - -	- - -	- - -	- - -	- - - -
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	wet dry t/m³ %	3.5%	3.5%	- - - - 4.0%	- - - - 4.5%	- - - - 4.0%	4.0%





Location

**CRAIGIEBURN** 

# **COMPACTION ASSESSMENT**

		Job No	17697
CIVIL GEOTE	CHNICAL SERVICES	Report No	17697/R005
6 - 8 Rose Ave	nue, Croydon, Vic 3136	Date Issued	08/12/2017
Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	AC
Project	ASTON - STAGE 27	Date tested	28/11/17

Checked by

**JHF** 

FeatureCLASS 3Layer thickness150 mmTime:08:46:11

Test No		24	25			
Location		Rivergle	en Drive			
Cl	hainage	320	370	1		
-	Offset	1.8	1.8			
I	•	north	south			
I		of kerb	of kerb			
Approximate depth from F.S.L.	m			1		
Measurement depth	mm	125	125	1		
Field wet density	t/m³	2.39	2.38			
Field dry density	t/m³	2.28	2.28			
Field moisture content	%	5.0	4.0			
Material source and location Compactive effort			20mm	MODIFI	, Wyndham Vale ED	
Maximum Dry Density	t/m³			2.27		
Optimum Moisture Content	%			8.0		
Test procedure AS 1289.5.4.1						
Oversize rock retained on sieve	mm	19.0	19.0			
Percent of oversize material	wet	-	<u> </u>			
Percent of oversize material	dry	-	<u> </u>			
Adjusted Maximum Dry Density	t/m³	-	-			
Adjusted Optimum Moisture Content	%	-	<u> </u>			
				· · ·		
Moisture Variation From		3.5%	4.0%			
Optimum Moisture Content		dry	dry			
	%		<u> </u>	<del> </del>		
	0/ 1	58.5	51.5	1		1
Moisture Ratio (R <sub>m</sub> )	/0	00.0				
Moisture Ratio (R <sub>m</sub> )  Density Ratio (R <sub>D</sub> )	%	100.5	100.5	<del></del>		



July 3



 CIVIL GEOTECHNICAL SERVICES
 Report No
 17697/R006

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Date Issued
 07/12/2017

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 28/11/17

 Location
 CRAIGIEBURN
 Checked by
 JHF

FeatureCLASS 2Layer thickness150 mmTime:08:48:33

Test No		26	27	28			
Location		Riverglen	Scenery	Vantage			
		Drive	Drive	Boulevard	í		
Cř	hainage	400	30	410	í		
	Offset	1.8	1.8	1.8	İ		
		south	north	west	í		
		of kerb	of kerb	of kerb	í		
Approximate depth from F.S.L.	т						1
Measurement depth	mm	125	125	125			
Field wet density	t/m³	2.39	2.39	2.39			
Field dry density	t/m³	2.27	2.25	2.25		]	
Field moisture content	%	5.0	5.5	6.0			
Compactive effort  Maximum Dry Density	t/m³			MOD 2.2	26		
Optimum Dry Density Optimum Moisture Content	t/m³			8.			
,							
1681 DIDIEGIJIE AS 1709 S 4 1							
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve	mm	19.0	19.0	19.0			<u> </u>
Oversize rock retained on sieve Percent of oversize material	mm wet	19.0	19.0	19.0			
Oversize rock retained on sieve		19.0	19.0 - -	19.0 - -			
Oversize rock retained on sieve Percent of oversize material	wet	19.0 - -	19.0 - - -	19.0 - - -			
Oversize rock retained on sieve Percent of oversize material Percent of oversize material	wet dry	-	19.0 - - - -	-			
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³	- - -		-			
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³	-	19.0 - - - - - - 2.5%	-			
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content	wet dry t/m³	- - -		- - -			
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From Optimum Moisture Content	wet dry t/m³ %	3.0% dry	2.5% dry	2.0% dry			
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	wet dry t/m³	3.0%	2.5%	2.0%			



July Jo



Job No 17697 CIVIL GEOTECHNICAL SERVICES Report No 17697/R007 6 - 8 Rose Avenue, Croydon, Vic 3136 Date Issued 07/12/2017

WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD) Tested by AC Client ASTON - STAGE 27 04/12/17 Project Date tested **CRAGIEBURN** Location Checked by **JHF** 

Feature CLASS 3 Layer thickness 150 mm Time: 10:30:20

		29	30	31	32	33	34
Location			Bilo Street		E	lement Stree	et
C	Chainage	160	125	75	90	40	10
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		south	north	south	east	west	east
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.32	2.34	2.33	2.34	2.40	2.39
Field dry density	t/m³	2.22	2.25	2.23	2.25	2.30	2.28
Field moisture content	%	4.0	4.0	4.5	4.0	4.5	4.5
Compactive effort Maximum Dry Density	t/m³			2.2			
Optimum Moisture Content	%			8.	0		
,	mm	19.0	19.0	19.0	19.0	19.0	19.0
Oversize rock retained on sieve	mm wet	19.0	19.0	19.0	19.0	19.0	19.0
Oversize rock retained on sieve Percent of oversize material	wet	19.0 - -	19.0	19.0 - -	19.0 - -	19.0 -	19.0
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density		19.0	19.0	19.0 - -	19.0 - -	19.0 - -	19.0 - -
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³	19.0 - - - -	19.0	19.0 - - -	19.0 - - -	19.0 - - -	19.0
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content	wet dry t/m³		- - -	- - -	- - -	- - -	- - -
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	wet dry t/m³ %			3.5%	- - - - 4.5%	- - - - 4.0%	3.5%
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content	wet dry t/m³ %		- - -	- - -	- - -	- - -	- - -
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	wet dry t/m³ %			3.5%	- - - - 4.5%	- - - - 4.0%	3.5%





 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Report No
 17697/R008

 Date Issued
 07/12/2017

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 04/12/17

 Location
 CRAGIEBURN
 Checked by
 JHF

FeatureCLASS 3Layer thickness150 mmTime:10:37:25

Test No		35	36	37	38	39	40
Location		Sona	Street		Vantage l	Boulevard	
	Chainage	90	40	230	280	330	380
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		south	north	west	east	west	east
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.39	2.38	2.39	2.39	2.39	2.39
Field dry density	t/m³	2.23	2.23	2.23	2.25	2.25	2.25
Field moisture content	%	6.5	6.5	7.0	6.0	6.0	6.5
Compactive effort  Maximum Dry Density  Ontimum Moisture Content	t/m³			2			
Optimum Moisture Content	%			8	.0		
Test procedure AS 1289.5.4.1			I	1	I		
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	-	-	-	-	-	-
Percent of oversize material	dry	-	-	-	-	-	-
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-
Adjusted Optimum Moisture Cont	ent %		-	_	-	-	-
Moisture Variation Fro	m	1.5%	1.5%	1.0%	2.0%	1.5%	1.5%
Optimum Moisture Con	tent	dry	dry	dry	dry	dry	dry
Moisture Ratio (R <sub>m</sub> )	%	84.0	83.0	87.0	75.5	78.5	80.0
			-	<u>-</u>	-	ē.	
Density Ratio (R <sub>D</sub> )	%	98.5	98.0	98.5	99.0	99.0	99.0



Approved Signatory: Justin Fry



Location

CRAGIEBURN

# **COMPACTION ASSESSMENT**

		Job No	17697
CIVIL GEOTE	CHNICAL SERVICES	Report No	17697/R009
6 - 8 Rose Ave	nue, Croydon, Vic 3136	Date Issued	07/12/2017
Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	AC
Project	ASTON - STAGE 27	Date tested	04/12/17

FeatureCLASS 3Layer thickness150 mmTime:10:41:51

Checked by

**JHF** 

Test No		41	42			
Location		Rivergle	en Drive			
Ch	ainage	320	380	1		
	Offset	1.8	1.8			
		north	south			
		of kerb	of kerb			
Approximate depth from F.S.L.	т					
Measurement depth	mm	125	125			
Field wet density	t/m³	2.39	2.39			
Field dry density	t/m³	2.25	2.25			
Field moisture content	%	6.0	6.0			
Compactive effort  Maximum Dry Density  Optimum Moisture Content	t/m³			2.:		
Test procedure AS 1289.5.4.1	70			<u> </u>	0	
Oversize rock retained on sieve	mm	19.0	19.0			
Percent of oversize material	wet	-	-			
	dry	-	-			
Percent of oversize material	dry t/m³	-	-			
Percent of oversize material Adjusted Maximum Dry Density		-	- - -			
Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content	t/m³	-				
Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	t/m³	2.0%	2.0%			
Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content	t/m³	-	2.0% dry			
Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	t/m³	2.0%	,			
Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From Optimum Moisture Content	t/m³ %	2.0% dry	dry			



July Jo



 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Report No
 17697/R010

 Date Issued
 07/12/2017

ClientWINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)Tested byACProjectASTON - STAGE 27Date tested04/12/17LocationCRAGIEBURNChecked byJHF

Feature CLASS 2 Layer thickness 150 mm Time: 10:44:37

Test No		43	44	45		
Location		Riverglen	Scenery	Vantage		
		Drive	Drive	Boulevard		
C	hainage	400	20	410		
	Offset	1.8	1.8	1.8		
		north	south	east		
		of kerb	of kerb	of kerb		
Approximate depth from F.S.L.	m				 	
Measurement depth	mm	125	125	125		
Field wet density	t/m³	2.39	2.39	2.39		
Field dry density	t/m³	2.24	2.25	2.24		
Field moisture content	%	6.0	6.0	6.5		
Maximum Dry Density	t/m³			MOD 2.2		
Compactive effort	1/203			MOD		
Maximan Dry Donory				/.,		
Optimum Moisture Content	%			8.		
Test procedure AS 1289.5.4.1	%	40.0		8.	1	
Test procedure AS 1289.5.4.1 Oversize rock retained on sieve	mm	19.0	19.0		<u> </u>	
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve  Percent of oversize material	mm wet	19.0	19.0	8.		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve  Percent of oversize material  Percent of oversize material	mm wet dry	-	19.0	19.0		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	mm wet dry t/m³	19.0	19.0	8.		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve  Percent of oversize material  Percent of oversize material	mm wet dry	-	19.0 - - - -	19.0		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve  Percent of oversize material  Percent of oversize material  Adjusted Maximum Dry Density  Adjusted Optimum Moisture Content	mm wet dry t/m³	- - -		19.0 - - - -		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	mm wet dry t/m³ %	2.0%	2.5%	8. 19.0 - - - - 1.5%		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve  Percent of oversize material  Percent of oversize material  Adjusted Maximum Dry Density  Adjusted Optimum Moisture Content	mm wet dry t/m³ %	- - -		19.0 - - - -		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From Optimum Moisture Content	mm wet dry t/m³ %	2.0%	2.5%	8. 19.0 - - - - 1.5%		
Test procedure AS 1289.5.4.1  Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Content  Moisture Variation From	mm wet dry t/m³ %	2.0% dry	2.5% dry	19.0 - - - - - 1.5% dry		



Approved Signatory: Justin Fry



 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Pate Issued
 09/03/2018

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 09/03/18

 Location
 CRAGIEBURN
 Checked by
 JHF

Feature CLASS 2 Layer thickness 120 mm Time: 08:55:38

Test No		46	47	48	49	50	51	
Location		R	riverglen Driv	'e	Scenery Drive			
	Chainage	320	370	400	20	70	115	
	Offset	1.8	1.8	1.8	1.8	1.8	1.8	
		south	north	south	north	south	north	
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb	
Approximate depth from F.S.L.	т							
Measurement depth	mm	100	100	100	100	100	100	
Field wet density	t/m³	2.38	2.37	2.37	2.39	2.37	2.39	
Field dry density	t/m³	2.26	2.24	2.24	2.29	2.28	2.29	
Field moisture content	%	5.5	6.0	6.0	4.5	4.0	4.0	
Compactive effort Maximum Dry Density Optimum Moisture Content	t/m³ %	:=·						
Optimum Moisture Content		——————————————————————————————————————						
Test procedure AS 1289.5.4.1								
	mm	19.0	19.0	19.0	19.0	19.0		
Oversize rock retained on sieve	111111	10.0	19.0	19.0		19.0	19.0	
	wet	-	-	-	-	-	19.0	
Percent of oversize material		-	-	-	-	-	19.0 - -	
Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³						19.0 - -	
Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density	wet dry t/m³	- - -	-		- - - -		19.0 - - -	
Oversize rock retained on sieve Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Conte	wet dry t/m³ ent %	- - -	- - -	- - -	- - -	- - -	- - -	
Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Conte	wet dry t/m³ ent %	2.5%	2.0%	2.0%	3.5%		- - - - 4.0%	
Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Conte	wet dry t/m³ ent %	- - -	- - -	- - -	- - -	- - -	- - -	
Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Conte  Moisture Variation From Optimum Moisture Conte	wet dry t/m³ ent %	2.5%	2.0%	2.0%	3.5%		- - - - 4.0%	
Percent of oversize material Percent of oversize material Adjusted Maximum Dry Density Adjusted Optimum Moisture Conte	wet dry t/m³ ent %	- - - - 2.5% dry	- - - - 2.0% dry	- - - - 2.0% dry	- - - - 3.5% dry	- - - - 4.0% dry	- - - - 4.0% dry	



Approved Signatory: Justin Fry



Location

**CRAGIEBURN** 

# **COMPACTION ASSESSMENT**

Job No 17697 CIVIL GEOTECHNICAL SERVICES Report No 17697/R013 6 - 8 Rose Avenue, Croydon, Vic 3136 Date Issued 09/03/2018 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD) Tested by AC Client ASTON - STAGE 27 09/03/18 Project Date tested

FeatureCLASS 2Layer thickness120 mmTime:09:01:48

Checked by

**JHF** 

Test No		57	58				
Location		Sonia	Street				
Ch	ainage	90	40				
	Offset	1.8	1.8				
		west	east				
		of kerb	of kerb				
Approximate depth from F.S.L.	т						
Measurement depth	mm	100	100				
Field wet density	t/m³	2.37	2.38				
Field dry density	t/m³	2.29	2.30				
Field moisture content	%	3.5	3.5				
Material source and location  Compactive effort  Maximum Dry Density	t/m³	20mm Class 2 - MVQ, Donnybrook MODIFIED 2.27					
Maximum Dry Density	t/m³						
Optimum Moisture Content	%			8	.0		
Test procedure AS 1289.5.4.1							
Oversize rock retained on sieve	mm	19.0	19.0				
Percent of oversize material	wet	-	-				
Percent of oversize material	dry	-	-				
Adjusted Maximum Dry Density	t/m³	-	-				
Adjusted Optimum Moisture Content	%	-	-				
	1	4.50/	1			1	ı
Moisture Variation From		4.5%	4.5%				
Optimum Moisture Content		dry	dry		<u> </u>		
Moisture Ratio (R <sub>m</sub> )	%	44.0	45.5				
	<u>.</u>						
Density Ratio (R <sub>D</sub> )	%	101.0	101.0				



July Jz



 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Pate Issued
 09/03/2018

 Client
 WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)
 Tested by
 AC

 Project
 ASTON - STAGE 27
 Date tested
 09/03/18

 Location
 CRAGIEBURN
 Checked by
 JHF

Feature CLASS 2 Layer thickness 120 mm Time: 09:04:23

Test No		59	60	61	62	63	64	
Location			Bold Street		Element Street			
	Chainage	160	125	75	90	40	10	
	Offset	1.8	1.8	1.8	1.8	1.8	1.8	
		north	south	north	east	west	east	
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb	
Approximate depth from F.S.L.	m							
Measurement depth	mm	100	100	100	100	100	100	
Field wet density	t/m³	2.33	2.32	2.33	2.32	2.33	2.35	
Field dry density	t/m³	2.25	2.24	2.25	2.23	2.25	2.25	
Field moisture content	%	3.5	3.5	3.5	4.0	3.5	4.0	
Compactive effort  Maximum Dry Density  Optimum Moisture Content	t/m³	MODIFIED 2.27 8.0						
Optimum Moisture Content	%			8	.0			
Test procedure AS 1289.5.4.1			1	1				
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0	19.0	
Percent of oversize material	wet	-	-	-	-	-	-	
Percent of oversize material	dry	-	-	-	-	-	-	
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-	
Adjusted Optimum Moisture Conte	ent %	-	-	-	-	-	-	
Moisture Variation From	n	4.5%	4.5%	4.5%	4.0%	4.5%	4.0%	
Optimum Moisture Content		dry	dry	dry	dry	dry	dry	
Moisture Ratio (R <sub>m</sub> )	%	43.5	45.5	43.5	52.5	46.0	53.0	
		22.2						
Density Ratio (R <sub>D</sub> )	%	99.0	98.5	99.0	98.5	99.0	99.5	



July J



 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Report No
 17697/R015

 Date Issued
 09/04/2018

ClientWINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)Tested byACProjectASTON - STAGE 27Date tested14/08/2017LocationCRAGIEBURNChecked byJHF

Feature CAPPING Layer thickness 150 mm Time: 08:00:14

Test No		65	66	67	68	69	70		
Location		Riverglen Drive		Scenery Drive		Tradition Road			
•	nainage	320	370	50	100	50	100		
	Offset	1.8	1.8	1.8	1.8	1.8	1.8		
		south	north	west	east	west	east		
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb		
Approximate depth from F.S.L.	m								
Measurement depth	mm	125	125	125	125	125	125		
Field wet density	t/m³	2.39	2.38	2.39	2.39	2.39	2.39		
Field dry density	t/m³	2.15	2.15	2.15	2.14	2.15	2.14		
Field moisture content	%	10.0	10.0	10.0	10.5	10.5	10.5		
Date of assignment Material source and location Compactive effort	24/11/2017 40mm Capping - MVQ, Donnybrook STANDARD								
Compactive effort	STANDARD								
Maximum Dry Density	t/m³	2.16							
Optimum Moisture Content	%	9.0							
Test procedure AS 1289.5.4.1									
Oversize rock retained on sieve	mm	37.5	37.5	37.5	37.5	37.5	37.5		
Percent of oversize material	wet	-	-	-	-	-	-		
Percent of oversize material	dry	-	-	-	-	-	-		
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-		
Adjusted Optimum Moisture Content	%	-	-	-	-	-	-		
Moisture Variation From		2.0%	1.5%	2.0%	2.5%	2.5%	2.5%		
Optimum Moisture Content		wet	wet	wet	wet	wet	wet		
•									
Moisture Ratio (R <sub>m</sub> )	%	120.5	119.5	123.5	127.0	129.5	131.0		
	0/ 1	00.5	00 E	00 F	00.0	00.0	00.0		
Density Ratio (R <sub>D</sub> )	%	99.5	99.5	99.5	99.0	99.0	99.0		



July J



 CIVIL GEOTECHNICAL SERVICES
 Job No
 17697

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Report No
 17697/R016

 Date Issued
 09/04/2018

ClientWINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)Tested byACProjectASTON - STAGE 27Date tested14/08/2017LocationCRAGIEBURNChecked byJHF

FeatureCAPPINGLayer thickness150 mmTime:08:46:29

Test No		71	72	73	74	75	76
Location		Edgewa	ter Road	Vantage Boulevard			
	Chainage	100	50	400	350	300	250
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		south	north	west	east	west	east
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.32	2.34	2.33	2.34	2.40	2.39
Field dry density	t/m³	2.12	2.15	2.15	2.15	2.16	2.17
Field moisture content	%	8.5	8.5	8.0	8.5	10.5	9.0
•	t/m³ %	STANDARD 2.16 9.0					
Compactive effort Maximum Dry Density				2.	16		
					-		
Test procedure AS 1289.5.4.1							1
Oversize rock retained on sieve	mm	37.5	37.5	37.5	37.5	37.5	37.5
Percent of oversize material	wet	-	-	-	-	-	-
Percent of oversize material	dry	-	-	-	-	-	-
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-
Adjusted Optimum Moisture Cont	ent %	-	-	-	-	-	-
Moisture Variation Fro	m	0.5%	0.0%	0.5%	0.0%	2.5%	1.0%
Optimum Moisture Con		wet	wet	dry	dry	wet	wet
Spaniani moistare con	COTT	WOL	WOL	u u y	u y	WOL	WOL
Moisture Ratio (R <sub>m</sub> )	%	105.0	102.0	92.5	99.0	126.0	109.0
	-			_			
Density Ratio (R <sub>D</sub> )	%	98.0	99.5	99.5	99.5	99.5	100.5



July Jo



 CIVIL GEOTECHNICAL SERVICES
 Report No
 17697/R017

 6 - 8 Rose Avenue, Croydon, Vic 3136
 Date Issued
 09/04/2018

ClientWINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)Tested byACProjectASTON - STAGE 27Date tested14/08/2017LocationCRAGIEBURNChecked byJHF

FeatureCAPPINGLayer thickness150 mmTime:09:29:08

Test No		77	78	79	80	81	82
Location		Elemer	nt Street	Bold Street		Sona Street	
(	Chainage	160	125	75	90	40	10
	Offset	1.8	1.8	1.8	1.8	1.8	1.8
		east	west	south	north	south	north
		of kerb	of kerb	of kerb	of kerb	of kerb	of kerb
Approximate depth from F.S.L.	т						
Measurement depth	mm	125	125	125	125	125	125
Field wet density	t/m³	2.32	2.34	2.33	2.34	2.40	2.39
Field dry density	t/m³	2.12	2.15	2.12	2.15	2.17	2.15
Field moisture content	%	8.5	8.5	9.0	8.5	9.5	10.0
Compactive effort  Maximum Dry Density  Ontimum Mainture Content	t/m³	40mm Capping - MVQ, Donnybrook STANDARD 2.16					
Optimum Moisture Content Test procedure AS 1289.5.4.1	% [			9.	0		
Oversize rock retained on sieve	mm	37.5	37.5	37.5	37.5	37.5	37.5
Percent of oversize material	wet	-	-	-	-	-	-
Percent of oversize material	dry	-	-	-	-	-	-
Adjusted Maximum Dry Density	t/m³	-	-	-	-	-	-
Adjusted Optimum Moisture Conten	%	-	-	-	-	-	-
Moisture Variation From		0.5%	0.0%	0.5%	0.0%	1.5%	2.0%
Optimum Moisture Content		wet	wet	wet	dry	wet	wet
Moisture Ratio (R <sub>m</sub> )	%	105.0	100.5	107.5	99.0	117.0	124.0
·,						l	I
Density Ratio (R <sub>D</sub> )	%	98.0	99.5	98.0	99.5	100.5	99.5



Approved Signatory : Justin Fry