



**CIVIL GEOTECHNICAL SERVICES**  
**ABN 26 474 013 724**  
**PO Box 678 Croydon Vic 3136**  
**Telephone: 9723 0744 Facsimile: 9723 0799**

19<sup>th</sup> February 2022

Our Reference: 21097:NB1153

Winslow Constructors Pty Ltd  
50 Barry Road  
CAMPBELLFIELD VIC 3061

Dear Sirs/Madams,

**RE: LEVEL 1 EARTHWORKS INSPECTION AND TESTING  
SMITHS LANE – STAGE 13 (CLYDE NORTH)**

Please find attached our Report No's 21097/R001 to 21097/R014 which relate to the field density testing that was conducted within the filled allotments at the above subdivision. The level 1 inspections and associated field density testing commenced in February 2021 and was completed in April 2021.

The inspections and testing of the earthworks was undertaken in general accordance with the Level 1 requirements of AS 3798 - Guidelines on Earthworks for Commercial and Residential Developments.

The site inspection and testing was performed by experienced geotechnicians from this office. Any areas that were deemed unsatisfactory were reworked and retested under their supervision. The testing was performed to the relevant Australian Standards and the accompanying test reports carry NATA endorsement. The attached compaction results, which were located randomly throughout the fill profile, are considered to be representative of the bulk fill materials that were placed across the reported allotments by Winslow Constructors during the aforementioned period. The approximate locations of the field density tests can be seen on the attached plan (Figure 1).

We are of the view that the bulk fill materials that have been placed across the reported allotments by Winslow Constructors during the aforementioned period can be considered as having been placed in a controlled manner to a minimum density ratio of 95% (standard compactive effort).

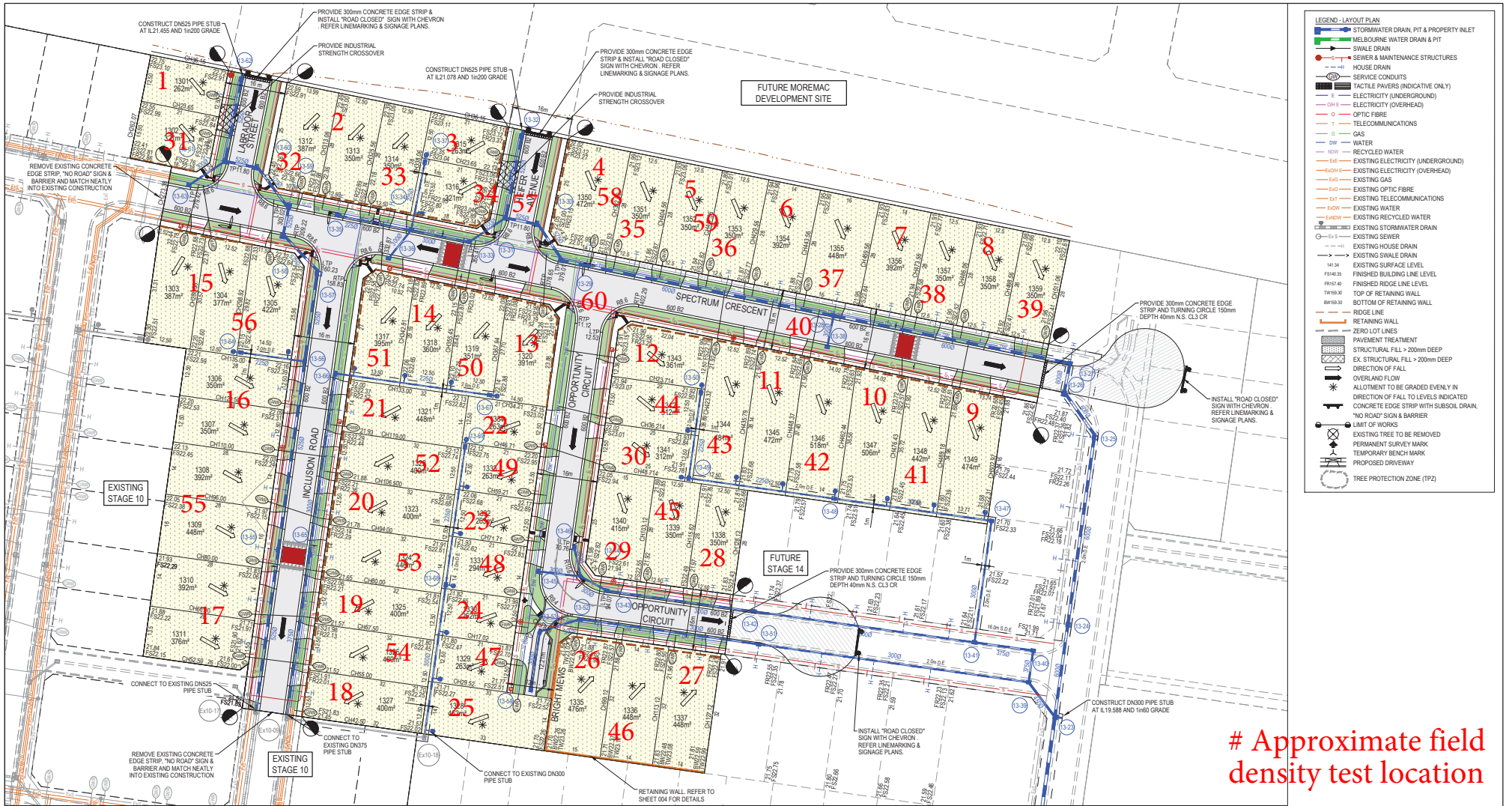
Please contact the undersigned if you require any additional information.

Civil Geotechnical Services

A handwritten signature in blue ink, appearing to read 'Nick Brock', is written over a faint, light blue circular stamp.

Nick Brock

# FIGURE 1



# Approximate field density test location

FOR CONTINUATION REFER TO 1101438-13-011

SERVICE OFFSET TABLE

Location	Gas		ND - Water		Water		Electricity		Telecommunication		Sewer		Irrigation	
	Side	Offset (m)	Side	Offset (m)	Side	Offset (m)	Side	Offset (m)	Side	Offset (m)	Side	Offset (m)	Side	Offset (m)
SPECTRUM CRESCENT	N	2.25	N	2.70	N	3.20	S	2.60	S	1.85	N/S	1.00	-	-
OPPORTUNITY CIRCUIT (NS)	W	2.25	W	2.70	W	3.20	E	2.60	E	1.85	EW	0.80	-	-
OPPORTUNITY CIRCUIT (EW)	S	2.25	S	2.70	S	3.20	N	2.70	N	1.85	N/S	0.80	-	-
LABRADOR STREET	W	2.25	W	2.70	W	3.20	E	2.60	E	1.85	W	1.00	-	-
HEIFER AVENUE	W	2.25	W	2.70	W	3.20	E	2.60	E	1.85	E	0.80	-	-
INCLUSION ROAD	E	2.25	E	2.70	E	3.20	W	2.60	W	1.85	EW	1,000.80	-	-
BRIGHT MEWS	W	2.25	W	2.70	W	3.20	E	1.25	E	0.50	W	0.80	-	-

NOTE: STREET TREES ARE TO BE PLANTED IN THE CENTRE OF ALL NATURE STRIPS

ROAD NAME	RESERVE WIDTH (m)	ROAD WIDTH (m)				VERGE WIDTH (m)	
		LIP TO LIP		INV TO INV		NORTHWEST	SOUTHEAST
		LIP TO LIP	INV TO INV	BACK TO BACK	VERGE WIDTH (m)		
SPECTRUM CRESCENT	16.00	6.40	7.30	7.60	4.50	4.20	
OPPORTUNITY CIRCUIT (NS)	16.00	6.40	7.30	7.60	4.20	4.50	
OPPORTUNITY CIRCUIT (EW)	16.00	6.40	7.30	7.60	4.20	4.50	
LABRADOR STREET	16.00	6.40	7.30	7.60	4.50	4.20	
HEIFER AVENUE	16.00	6.40	7.30	7.60	4.50	4.20	
BRIGHT MEWS	12.00	3.20	-	3.50	4.50	1.90	
INCLUSION ROAD	16.00	6.40	7.30	7.60	4.20	4.50	

THE FINISHED SURFACE LEVELS, EXTENT OF FILL SHOWN ON THIS PLAN ARE PRELIMINARY ONLY, AND SHALL NOT BE FINALISED UNTIL CITY OF CASEY HAVE APPROVED THE PLANS FOR CONSTRUCTION

**WARNING**  
BEWARE OF UNDERGROUND SERVICES  
The locations of underground services are approximate only and their exact position should be proven on site.  
No guarantee is given that all existing services are shown.  
Locate all underground services before commencement of works  
**DIAL 1100 BEFORE YOU DIG**  
www.1100.com.au

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PH ISSUED FOR INFORMATION 19.02.21 CD XX



Designed Date: C.DAWSON 06.02.2021  
Drawn: N. TABUENA  
Approved Date: L. MURRAY  
PH Number: PS837152J



Project Details: SMITHS LANE STAGE 13 CITY OF CASEY  
Drawing Title: LAYOUT PLAN (SHEET 1 OF 3)

Sheet 05 of 31  
Scale: 1:500 @ A1  
Drawing No: 1101438 13 010 P1



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R001  
 Date Issued 05/04/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	11/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 10:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	1	2	3	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth mm	175	175	175	-	-	-
Field wet density t/m <sup>3</sup>	2.01	1.98	1.99	-	-	-
Field moisture content %	16.2	16.1	17.4	-	-	-

Test procedure AS 1289.5.7.1

Test No	1	2	3	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve mm	19.0	19.0	19.0	-	-	-
Percent of oversize material wet	0	0	0	-	-	-
Peak Converted Wet Density t/m <sup>3</sup>	2.03	1.99	2.00	-	-	-
Adjusted Peak Converted Wet Density t/m <sup>3</sup>	-	-	-	-	-	-
Optimum Moisture Content %	17.5	17.5	18.5	-	-	-

Moisture Variation From Optimum Moisture Content	1.5% dry	1.5% dry	1.5% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	99.5	99.5	99.0	-	-	-
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Material description

No 1 - 3 Clay Fill
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AVRLOT HILF V1.10 MAR 13



NATA Accredited Laboratory No 9909  
 Accredited for compliance with  
 ISO/IEC 17025 - Testing

Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R002  
 Date Issued 04/05/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	12/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 13:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	4	5	6	7	8	9
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1
Approximate depth below FSL						
Measurement depth	mm	175	175	175	175	175
Field wet density	t/m <sup>3</sup>	2.06	2.05	2.04	2.04	2.04
Field moisture content	%	23.0	23.2	26.0	24.4	23.7

Test procedure AS 1289.5.7.1

Test No	4	5	6	7	8	9
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	0	0	0	0	0
Peak Converted Wet Density	t/m <sup>3</sup>	2.07	2.06	2.07	2.05	2.05
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	24.5	24.5	27.5	26.0	25.0

Moisture Variation From Optimum Moisture Content	1.0% dry	1.5% dry	1.0% dry	1.0% dry	1.5% dry	1.0% dry
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Density Ratio ( R <sub>HD</sub> )	%	99.5	99.5	98.5	99.5	99.5	99.0
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Material description

No 4 - 9 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Job No 21097  
Report No 21097/R003  
Date Issued 04/08/2021

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	15/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 13:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	10	11	12	13	14	15
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1
Approximate depth below FSL						
Measurement depth	mm	175	175	175	175	175
Field wet density	t/m <sup>3</sup>	2.02	2.02	2.02	1.94	1.93
Field moisture content	%	23.1	22.6	21.4	23.4	21.8

Test procedure AS 1289.5.7.1

Test No	10	11	12	13	14	15
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	0	0	0	0	0
Peak Converted Wet Density	t/m <sup>3</sup>	2.06	2.04	2.09	2.01	2.01
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	24.5	24.0	23.0	25.0	24.0

Moisture Variation From Optimum Moisture Content	1.5% dry	1.5% dry	1.5% dry	1.5% dry	2.0% dry	1.0% dry
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density and moisture ratio results relate only to the soil to the depth of test and not to the full depth of the layer

Density Ratio ( R <sub>HD</sub> )	%	98.0	99.0	97.0	96.5	96.5	97.0
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Material description

No 10 - 15 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R004  
 Date Issued 04/05/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	17/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time:	09:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	16	17	18	19	20	21
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1
Approximate depth below FSL						
Measurement depth	mm	175	175	175	175	175
Field wet density	t/m <sup>3</sup>	2.05	2.06	2.04	2.04	2.05
Field moisture content	%	17.7	18.9	19.9	20.9	19.4

Test procedure AS 1289.5.7.1

Test No	16	17	18	19	20	21
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	0	0	0	0	0
Peak Converted Wet Density	t/m <sup>3</sup>	2.06	2.07	2.06	2.06	2.07
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	20.0	21.5	22.0	21.0	19.5

Moisture Variation From Optimum Moisture Content	2.0% dry	2.0% dry	2.0% dry	0.0%	0.0%	0.0%
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Density Ratio ( R <sub>HD</sub> )	%	99.5	99.5	99.5	99.0	99.0	99.0
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Material description

No 16 - 21 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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Approved Signatory : Justin Fry



## COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R005  
 Date Issued 04/05/2021

**CIVIL GEOTECHNICAL SERVICES**

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	18/03/21
Location	CLYDE NORTH	Checked by	JHF

<b>Feature</b>	EARTHWORKS	Layer thickness	200 mm	Time: 11:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	22	23	24	25	26	27
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1
Approximate depth below FSL						
Measurement depth <i>mm</i>	175	175	175	175	175	175
Field wet density <i>t/m<sup>3</sup></i>	2.13	2.13	2.12	2.12	2.12	2.11
Field moisture content <i>%</i>	20.3	19.9	19.5	20.5	19.0	20.3

Test procedure AS 1289.5.7.1

Test No	22	23	24	25	26	27
Compactive effort	Standard					
Oversize rock retained on sieve <i>mm</i>	19.0	19.0	19.0	19.0	19.0	19.0
Percent of oversize material <i>wet</i>	0	0	0	0	0	0
Peak Converted Wet Density <i>t/m<sup>3</sup></i>	2.15	2.15	2.14	2.15	2.14	2.14
Adjusted Peak Converted Wet Density <i>t/m<sup>3</sup></i>	-	-	-	-	-	-
Optimum Moisture Content <i>%</i>	20.5	20.0	19.5	20.5	19.0	20.0

Moisture Variation From Optimum Moisture Content	0.0%	0.0%	0.0%	0.0%	0.0%	0.0%
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<b>Density Ratio ( <math>R_{HD}</math> )</b>	<b>%</b>	<b>99.0</b>	<b>99.5</b>	<b>99.0</b>	<b>98.5</b>	<b>99.0</b>	<b>98.5</b>
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Material description

No 22 - 27 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R006  
 Date Issued 25/06/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	25/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time:	14:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	28	29	30	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.13	2.13	2.12	-	-
Field moisture content	%	17.4	16.1	15.8	-	-

Test procedure AS 1289.5.7.1

Test No	28	29	30	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	2.16	2.17	2.15	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	15.5	14.0	14.5	-	-

Moisture Variation From Optimum Moisture Content	2.0% wet	2.0% wet	1.0% wet	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	98.5	98.5	98.5	-	-
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Material description

No 28 - 30 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R007  
 Date Issued 25/06/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	26/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 12:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	31	32	33	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.12	2.11	2.13	-	-
Field moisture content	%	17.9	19.5	18.5	-	-

Test procedure AS 1289.5.7.1

Test No	31	32	33	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	2.17	2.15	2.16	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	20.0	22.0	21.0	-	-

Moisture Variation From Optimum Moisture Content	2.0% dry	2.5% dry	2.0% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	98.0	98.0	98.5	-	-
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Material description

No 31 - 33 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R008  
 Date Issued 25/06/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	29/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 13:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	34	35	36	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.09	2.10	2.09	-	-
Field moisture content	%	17.4	20.0	17.1	-	-

Test procedure AS 1289.5.7.1

Test No	34	35	36	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	2.12	2.15	2.15	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	19.5	22.0	19.0	-	-

Moisture Variation From Optimum Moisture Content	2.0% dry	2.0% dry	2.0% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	98.5	97.5	97.0	-	-
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Material description

No 34 - 36 Clay Fill
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AVRLOT HILF V1.10 MAR 13



NATA Accredited Laboratory No 9909  
 Accredited for compliance with  
 ISO/IEC 17025 - Testing

Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Job No 21097  
Report No 21097/R009  
Date Issued 28/06/2021

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	30/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time:	11:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	37	38	39	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.09	2.09	2.09	-	-
Field moisture content	%	16.5	17.8	18.7	-	-

Test procedure AS 1289.5.7.1

Test No	37	38	39	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	2.11	2.15	2.16	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	19.5	20.0	21.0	-	-

Moisture Variation From Optimum Moisture Content	2.5% dry	2.5% dry	2.0% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	99.0	97.0	96.5	-	-
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Material description

No 37 - 39 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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ISO/IEC 17025 - Testing

Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Job No 21097  
Report No 21097/R010  
Date Issued 28/06/2021

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	31/03/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 12:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	40	41	42	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.08	2.09	2.08	-	-
Field moisture content	%	18.3	18.4	17.5	-	-

Test procedure AS 1289.5.7.1

Test No	40	41	42	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	2.13	2.12	2.14	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	20.5	20.5	20.5	-	-

Moisture Variation From Optimum Moisture Content	2.0% dry	2.0% dry	2.5% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	98.0	98.5	97.5	-	-
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Material description

No 40 - 42 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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ISO/IEC 17025 - Testing

Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R011  
 Date Issued 28/06/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	08/04/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 13:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	43	44	45	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.09	2.06	2.07	-	-
Field moisture content	%	18.8	19.0	18.5	-	-

Test procedure AS 1289.5.7.1

Test No	43	44	45	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	2.13	2.11	2.12	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	21.0	20.5	20.0	-	-

Moisture Variation From Optimum Moisture Content	2.0% dry	1.0% dry	1.5% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	98.0	98.0	98.0	-	-
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Material description

No 43 - 45 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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 ISO/IEC 17025 - Testing

Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R012  
 Date Issued 06/09/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	09/04/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 10:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	46	47	48	49	50	51
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1
Approximate depth below FSL						
Measurement depth	mm	175	175	175	175	175
Field wet density	t/m <sup>3</sup>	2.04	2.03	2.04	2.03	2.04
Field moisture content	%	22.1	19.9	22.2	19.4	18.4

Test procedure AS 1289.5.7.1

Test No	46	47	48	49	50	51
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	0	0	0	0	0
Peak Converted Wet Density	t/m <sup>3</sup>	2.07	2.08	2.05	2.07	2.05
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	20.0	17.5	19.5	20.0	21.0

Moisture Variation From Optimum Moisture Content	2.0% wet	2.5% wet	2.5% wet	0.5% dry	2.5% dry	2.5% dry
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Density Ratio ( R <sub>HD</sub> )	%	98.5	97.5	99.5	98.0	98.5	99.5
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Material description

No 46 - 51 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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Approved Signatory : Justin Fry



# COMPACTION ASSESSMENT

Job No 21097  
 Report No 21097/R013  
 Date Issued 06/09/2021

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	12/04/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time:	10:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	52	53	54	55	56	57
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1
Approximate depth below FSL						
Measurement depth	mm	175	175	175	175	175
Field wet density	t/m <sup>3</sup>	2.01	2.02	2.03	2.04	2.02
Field moisture content	%	20.5	18.7	17.8	21.2	19.3

Test procedure AS 1289.5.7.1

Test No	52	53	54	55	56	57
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	19.0	19.0
Percent of oversize material	wet	0	0	0	0	0
Peak Converted Wet Density	t/m <sup>3</sup>	2.04	2.04	2.05	2.06	2.05
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	20.5	20.0	17.5	23.5	21.0

Moisture Variation From Optimum Moisture Content	0.0%	1.5% dry	0.0%	2.5% dry	2.0% dry	2.0% dry
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Density Ratio ( R <sub>HD</sub> )	%	99.0	99.0	99.0	99.0	98.0	98.5
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Material description

No 52 - 57 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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# COMPACTION ASSESSMENT

## CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Job No 21097  
Report No 21097/R014  
Date Issued 28/06/2021

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	SB
Project	SMITHS LANE - STAGE 13	Date tested	13/04/21
Location	CLYDE NORTH	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time:	11:00
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	58	59	60	-	-	-
Location	REFER TO FIGURE 1	REFER TO FIGURE 1	REFER TO FIGURE 1			
Approximate depth below FSL						
Measurement depth	mm	175	175	175	-	-
Field wet density	t/m <sup>3</sup>	2.02	2.01	2.01	-	-
Field moisture content	%	20.1	21.2	19.3	-	-

Test procedure AS 1289.5.7.1

Test No	58	59	60	-	-	-
Compactive effort	Standard					
Oversize rock retained on sieve	mm	19.0	19.0	19.0	-	-
Percent of oversize material	wet	0	0	0	-	-
Peak Converted Wet Density	t/m <sup>3</sup>	1.99	2.03	2.04	-	-
Adjusted Peak Converted Wet Density	t/m <sup>3</sup>	-	-	-	-	-
Optimum Moisture Content	%	20.5	22.0	20.5	-	-

Moisture Variation From Optimum Moisture Content	0.0%	1.0% dry	1.0% dry	-	-	-
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Density Ratio ( R <sub>HD</sub> )	%	102.0	99.0	98.5	-	-
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Material description

No 58 - 60 Clay Fill
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AVRLOT HILF V1.10 MAR 13



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