



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

29th March 2019

Our Reference: 18840:NB450

Winslow Constructors Pty Ltd
50 Barry Road
CAMPBELLFIELD VIC 3061

Dear Sirs/Madams,

RE: LEVEL 1 EARTHWORKS INSPECTION AND TESTING
ALBRIGHT – STAGE 05 (TRUGANINA)

Please find attached our Report No's 18840/R001 to 18840/R002 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 was performed in March 2019.

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).

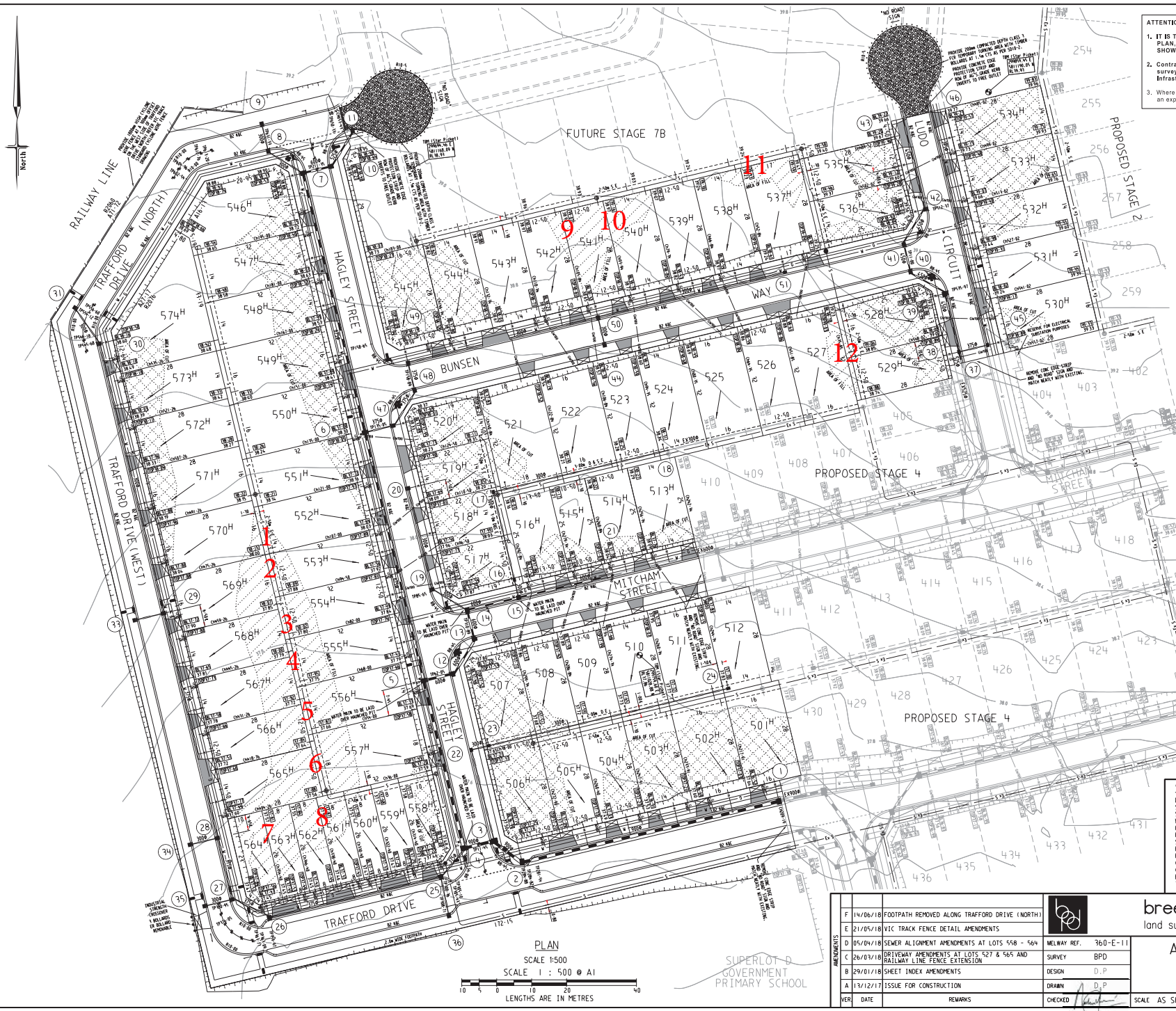
We are of the view that the bulk fill materials that have been placed across the reported allotments by Winslow Constructors during the aforementioned period can be considered as having been placed in a controlled manner to a minimum density ratio of 95% (standard compactive effort).

Please contact the undersigned if you require any additional information.

Civil Geotechnical Services

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

Nick Brock



ATTENTION TO CONTRACTOR

- IT IS THE CONTRACTORS RESPONSIBILITY TO ENSURE THAT THE DIGITAL PLAN, PROVIDED FOR SETOUT PURPOSES, MATCHES THE TBM COORDINATES SHOWN.
- Contractor to ensure that the site is pegged and or set out checked by the licensed surveyor responsible for certifying the Plan of Subdivision prior to underground Infrastructure being Installed.
- Where concrete works abut a sewer access chamber surround or similar structure, an expansion joint of approved material shall be provided between the two faces.

SHEET INDEX

SHT No.	VER	DESCRIPTION
1	F	DETAIL & PLAN
2	D	NOTES, SERVICES OFFSETS, LOCALITY PLAN & PIT SCHEDULE
3	B	INTERSECTION DETAILS
4	C	INTERSECTION DETAILS - 2
5	C	INTERSECTION DETAILS - 3
6	A	INTERSECTION DETAILS - 4
7	B	TRAFFORD DRIVE - LONGITUDINAL SECTIONS
8	A	TRAFFORD DRIVE - CROSS SECTIONS
9	B	TRAFFORD DRIVE - CROSS SECTIONS
10	A	HAGLEY STREET - LONGITUDINAL SECTIONS
11	A	HAGLEY STREET - CROSS SECTIONS
12	A	LUDO CIRCUIT - LONGITUDINAL SECTIONS & CROSS SECTIONS
13	A	BUNSEN WAY - LONGITUDINAL SECTIONS & CROSS SECTIONS
14	A	MITCHAM STREET - LONGITUDINAL SECTIONS & CROSS SECTIONS
15	A	DRAINAGE LONGITUDINAL SECTIONS 1
16	B	DRAINAGE LONGITUDINAL SECTIONS 2
17	A	DRAINAGE LONGITUDINAL SECTIONS 3
18	A	DRAINAGE LONGITUDINAL SECTIONS 4
19	B	STORAGE & LINE PARKING PLAN

SYMBOL LEGEND

Prop	Exel	Ex/Natural/FS Level
Drains <100		FS Building Line
Sewer >300		Top/Toe of Batter
Water		Top Ret. Wall Level
House Drain		100yr Flood Level
Property Inlet		Fill Prop/Ex
Street Sign		Ex & Low depth
PST		Cut Prop/Ex
Retaining Wall		Ex Gas/Elect/Tel
Conduits 100mm		TBM
Conduits 150mm		
Ex Gas/Elect/Tel		
TBM		

REV	DATE	REMARKS	CHECKED
F	14/06/18	FOOTPATH REMOVED ALONG TRAFFORD DRIVE (NORTH)	
E	21/05/18	VIC TRACK FENCE DETAIL AMENDMENTS	
D	05/04/18	SEWER ALIGNMENT AMENDMENTS AT LOTS 558 - 564	
C	26/03/18	DRIVEWAY AMENDMENTS AT LOTS 527 & 565 AND RAILWAY LINE FENCE EXTENSION	
B	29/01/18	SHEET INDEX AMENDMENTS	
A	13/12/17	ISSUE FOR CONSTRUCTION	

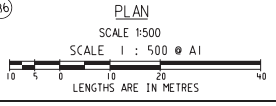
breese pitt dixon pty. ltd.
land surveyors civil engineers

1/19 colto street
hawthorn east, 3123
telephone 8823 2300
fax no. 8823 2310

**ALBRIGHT ESTATE
STAGE 5**

MUNICIPALITY: WYNDHAM
REFERENCE: 9354 E/5

SCALE AS SHOWN DATUM: AHD DATE: AUG 17 SHEET 1 OF 19 F



SUPERLOT D
GOVERNMENT
PRIMARY SCHOOL

PROJECT NO. 1801



COMPACTION ASSESSMENT

Job No 18840
 Report No 18840/R001
 Date Issued 29/03/2019

CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	BGG
Project	ALBRIGHT ESTATE - STAGE 5	Date tested	02/03/19
Location	TRUGANINA	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 13:07
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	1	2	3	4	5	6
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/m³</i>	1.84	1.83	1.84	1.84	1.86	1.84
Field moisture content <i>%</i>	27.6	24.2	15.1	29.0	21.3	22.2

Test procedure AS 1289.5.7.1

Test No	1	2	3	4	5	6
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/m³</i>	1.90	1.90	1.90	1.90	1.91	1.90
Adjusted Peak Converted Wet Density <i>t/m³</i>	-	-	-	-	-	-
Optimum Moisture Content <i>%</i>	30.5	26.0	17.5	31.5	24.0	24.5

Moisture Variation From Optimum Moisture Content	2.5% dry	2.0% dry	2.5% dry	2.5% dry	2.5% dry	2.0% dry
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Density Ratio (R_{HD})	%	97.0	96.0	97.0	97.0	97.5	97.0
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Material description

No 1 - 6 Clay Fill

AVRLOT HILF V1.10 MAR 13



The results of the tests, calibrations and/or measurements included in this document are traceable to Australian/National standards. Accredited for compliance to ISO/IEC 17025. Accreditation No 9909

Approved Signatory : Justin Fry



COMPACTION ASSESSMENT

Job No 18840
 Report No 18840/R002
 Date Issued 29/03/2019

CIVIL GEOTECHNICAL SERVICES

6 - 8 Rose Avenue, Croydon 3136

Client	WINSLOW CONSTRUCTORS PTY LTD (CAMPBELLFIELD)	Tested by	JB
Project	ALBRIGHT ESTATE - STAGE 5	Date tested	07/03/19
Location	TRUGANINA	Checked by	JHF

Feature	EARTHWORKS	Layer thickness	200 mm	Time: 09:30
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Test procedure AS 1289.2.1.1 & 5.8.1

Test No	7	8	9	10	11	12
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/m³</i>	1.77	1.76	1.78	1.75	1.71	1.70
Field moisture content <i>%</i>	26.4	27.0	25.4	26.8	24.2	25.8

Test procedure AS 1289.5.7.1

Test No	7	8	9	10	11	12
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/m³</i>	1.79	1.79	1.78	1.79	1.74	1.74
Adjusted Peak Converted Wet Density <i>t/m³</i>	-	-	-	-	-	-
Optimum Moisture Content <i>%</i>	28.5	29.5	27.5	29.0	26.0	28.5

Moisture Variation From Optimum Moisture Content	2.0% dry	2.5% dry	2.0% dry	2.0% dry	2.0% dry	2.5% dry
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Density Ratio (R_{HD})	%	99.0	98.5	100.0	98.5	98.0	98.0
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Material description

No 7 - 12 Clay Fill



The results of the tests, calibrations and/or measurements included in this document are traceable to Australian/National standards. Accredited for compliance to ISO/IEC 17025. Accreditation No 9909

Approved Signatory : Justin Fry