

**WORK COMPLETED / FIELD BOOK**

CONSTRUCTED BY .....

WORKS COMPLETED .....

SIGNATURE ..... DATE .....

INSPECTED BY .....

SIGNATURE ..... DATE .....

**ASSET RECORDING**

1 .....

OF .....

CONTACT No .....

HEREBY CERTIFY THAT ASSETS MARKED AS-BUILT ON THIS DRAWING HAVE BEEN RECORDED AS PER ENDEAVOUR ENERGY STANDARD SAD 0004.

SIGNATURE ..... DATE .....

HV TRENCH LENGTH 1400 M  
 LV TRENCH LENGTH 1720 M  
 TOTAL TRENCH LENGTH 3120 M

**CERTIFIED BY ENDEAVOUR ENERGY**

AMENDMENT .....

DATE APPROVED .....

EXAMINER'S SIGNATURE .....

PRINT NAME .....

THIS CERTIFICATION IS ISSUED SUBJECT TO ENDEAVOUR ENERGY'S STANDARD CERT. TERMS.

**QUALITY LEVEL DATA POINT**

DATA\_POINT\_ID

BDY - Boundary

DE - Duct End

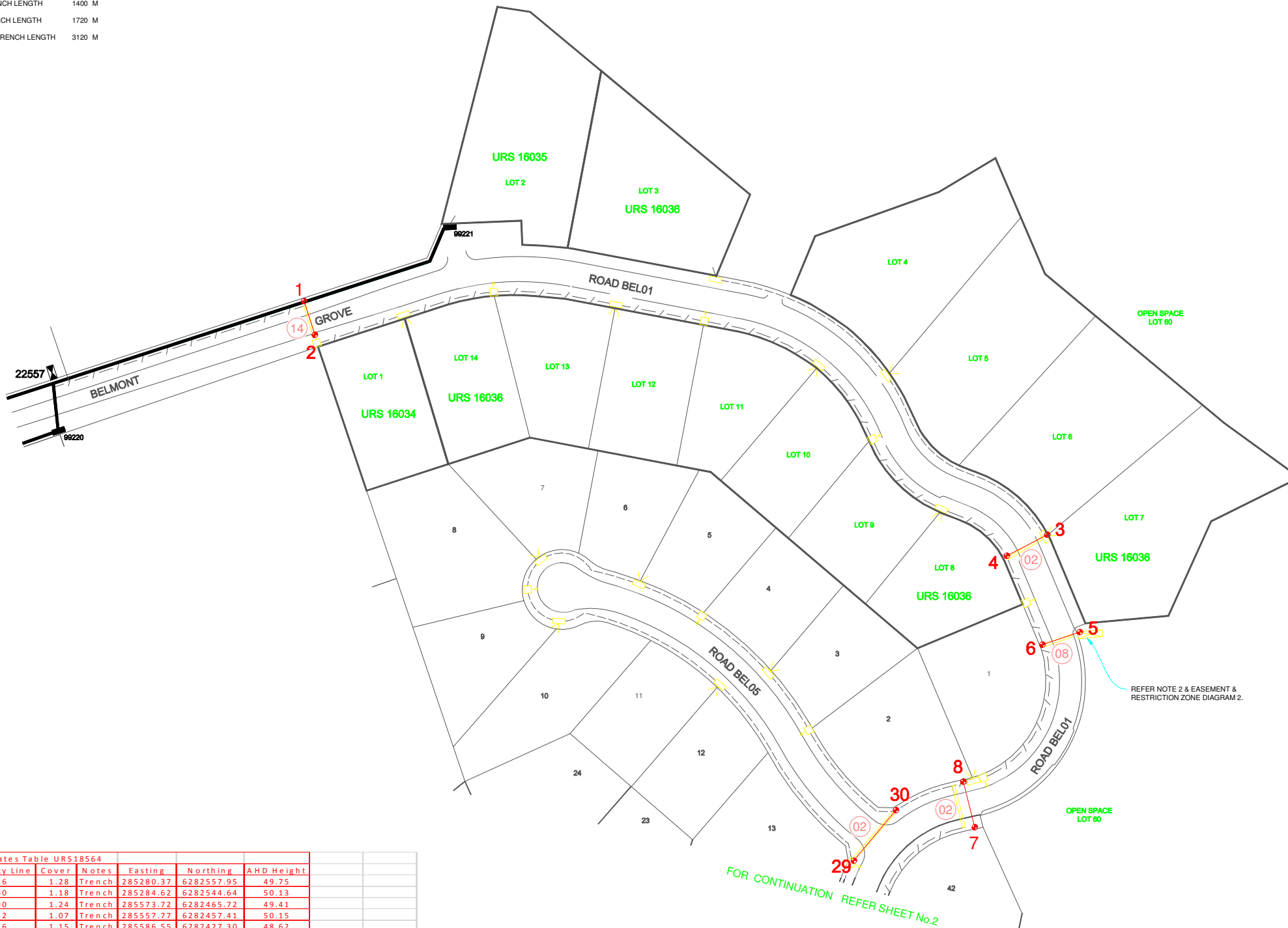
New Ducts

UB-RC UNDERBORE - ROAD CROSSING

Note:

1. ALL UNDERBORE DUCTS FOUND TWISTED

2. SECTION MARKED IN RED TO BE CAPTURED ONLY



- NOTES**
- THIS DRAWING IS TO BE READ IN CONJUNCTION WITH ENDEAVOUR ENERGY'S MDI 0028, MCI 0006.
  - EASEMENTS FOR SUBSTATION SITES (2' & VAR. x 2.75m (THIS IS MINIMUM SIZE ONLY) IS REQUIRED BY THE DEVELOPER OVER LOT 60. IN ADDITION TO THE EASEMENT A RESTRICTION ON THE USE OF LAND (A) IS REQUIRED IN RELATION TO THE FIRE RATING OF BUILDINGS MEASURED 3M FROM THE PLINTH OVER LOTS 60 & 43. ALSO A RESTRICTION ON THE USE OF LAND (D) IS REQUIRED IN RELATION TO SWIMMING POOLS MEASURED 5M FROM THE EASEMENT OVER LOT 43.
  - REFER TELSTRA/NBN DESIGN LAYOUT FOR DUCTING AND EXCAVATION REQUIREMENTS.
  - ATTENTION - PERMANENT SURVEY MARKS MAY EXIST IN THIS AREA. THESE ARE TO BE LOCATED BY A SURVEYOR PRIOR TO THE COMMENCEMENT OF WORK.
  - WARNING - LIVE ENDEAVOUR ENERGY CABLES AND OTHER SERVICES IN THIS AREA. PLEASE CONTACT 'DIAL BEFORE YOU DIG' ON TEL: 1100 FOR SEARCHES A MINIMUM TWO DAYS PRIOR TO EXCAVATION.
  - ALL THE REQUIREMENTS OF THE ENVIRONMENTAL PROTECTION AUTHORITY POLLUTION CONTROL LEGISLATION IS TO BE STRICTLY ADHERED TO.

ALL WORKS TO BE CONSTRUCTED ARE TO BE COMPLETED IN ACCORDANCE WITH ENDEAVOUR ENERGY'S GENERIC ENVIRONMENTAL PLAN - EMS 0001.

ALL SL. COLUMNS ARE TO BE INSTALLED 350mm FROM THE FRONT PROPERTY BOUNDARIES UNLESS SHOWN OTHERWISE.

**DESIGN COMPLIANCE AND INDEMNITY**

This design complies with the Endeavour Energy's relevant standards as current at this time and as listed on the Endeavour Energy Accredited Service Provider's internet site. These standards include, but are not limited to:

- CP : Connection Policy
- EMS : Environmental Management Standard
- MCI : Mains Construction Instruction
- MDI : Mains Design Instruction
- PDI : Protection Design Instruction
- SDI : Substation Design Instruction
- EDI : Earthing Design Instruction
- SAD 0001 : Design Drawing Standard
- MMI : Mains Maintenance Instruction
- SMI : Substation Maintenance Instruction
- LDI 0001 : Public Lighting Electrical Design Element

Additionally, where relevant, the design complies with AS/NZS 7000 'Overhead Line Design - Detailed Procedures' published by the Australian Standards.

**ESTATE POWER DESIGN** (Company name) indemnifies Endeavour Energy for any loss or damage resulting from non-compliance of the design with the above standards.

Signed: BRIAN JUDE

Name: ..... Service Provider Number: 1033 Date: 13 / 09 / 2017

Feature ID	Quality Level	WAE Survey Coordinates Table URS18564	Asset	Property Line	Cover	Notes	Easting	Northing	AHD Height
1	A	Duct End	1.26	1.28	Trench	285280.37	6282557.95	49.75	
2	A	Duct End	4.60	1.18	Trench	285284.62	6282544.64	50.13	
3	A	Duct End	0.90	1.24	Trench	285573.72	6282465.72	49.41	
4	A	Duct End	1.12	1.07	Trench	285557.77	6282457.41	50.15	
5	A	Duct End	1.16	1.15	Trench	285586.55	6282427.30	48.62	
6	A	Duct End	0.50	1.06	Trench	285571.83	6285571.829	48.59	
7	A	Duct End	0.54	0.93	Trench	285545.10	6282350.24	53.63	
8	A	Duct End	0.89	1.38	Trench	285540.57	6282368.26	53.19	
9	A	Duct End	1.67	0.95	Trench	285491.18	6282246.40	59.95	
10	A	Duct End	1.53	0.95	Trench	285474.61	6282249.89	60.01	
11	A	Duct End	0.18	0.95	Trench	285492.53	6282172.73	58.84	
12	A	Duct End	1.40	1.00	Trench	285477.56	6282178.16	58.68	
13	A	Duct End	0.96	1.29	Trench	285552.53	6282117.96	59.82	
14	A	Duct End	0.94	0.98	Trench	285556.65	6282101.02	60.41	
15	A	Duct End	0.27	1.59	Trench	285585.99	6282153.29	58.61	
16	A	Duct End	0.58	1.29	Trench	285601.11	6282141.53	58.84	
17	A	Duct End	1.64	0.95	Trench	285754.98	6282353.36	46.25	
18	A	Duct End	2.16	0.93	Trench	285767.30	6282342.87	46.18	
19	A	Duct End	0.60	1.03	Trench	285486.92	6281941.14	84.79	
20	A	Duct End	1.21	1.07	Trench	285495.39	6281934.53	84.76	
21	A	Duct End	1.02	1.05	Trench	285540.53	6282103.98	59.81	
22	A	Duct End	1.33	1.14	Trench	285556.32	6282101.53	60.21	
23	A	Duct End	0.26	1.14	Trench	285473.42	6282172.98	58.81	
24	A	Duct End	4.43	0.91	Trench	285476.83	6282158.06	59.10	
25	A	Duct End	1.14	0.93	Trench	285337.39	6282208.57	77.10	
26	A	Duct End	3.69	0.91	Trench	285352.32	6282210.92	77.03	
27	A	Duct End	1.25	1.06	Trench	285332.24	6282267.57	77.93	
28	A	Duct End	1.72	0.92	Trench	285349.08	6282265.03	78.09	
29	A	Duct End	1.30	0.99	Trench	285497.38	6282337.04	58.85	
30	A	Duct End	1.08	0.92	Trench	285514.01	6282357.00	56.71	
31	A	Duct End	1.04	0.96	Trench	285555.41	6282022.64	70.12	
32	A	Duct End	0.82	1.06	Trench	285543.98	6281999.22	72.85	
33	A	Underbore End	0.60	1.63	UB RC	285490.8	6281928.52	84.75	
34	A	Underbore End	7.22	1.34	UB RC	285474.31	6281903.42	83.90	

**DUCT DECLARATION**

Ernest Shum

OF MAROUBRA

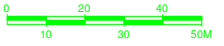
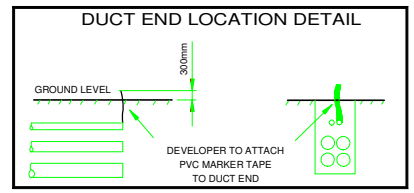
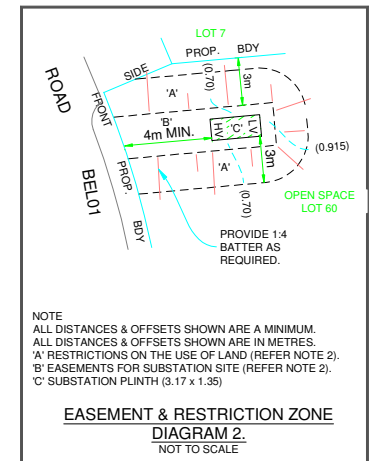
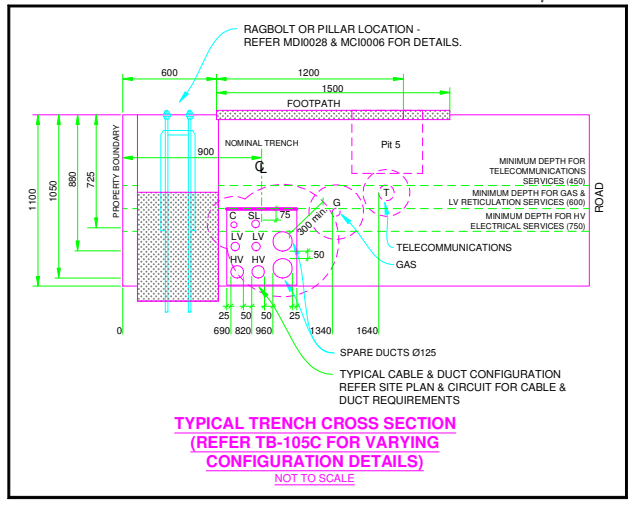
CONTACT NUMBER 02 4725 3421

HEREBY CERTIFY THAT THE DUCTS SHOWN ON THIS DRAWING HAVE BEEN INSTALLED IN ACCORDANCE WITH STANDARDS MCI0006 AND SADD0004.

THE INSTALLATION OF THE DUCTS WAS COMMENCED ON 05-10-2017 & COMPLETED ON 13-12-2017

SIGNATURE

LAND SURVEYOR REGISTERED UNDER SURVEYING ACT 2002 OR MEMBER OF THE INSTITUTE OF ENGINEERS OF AUSTRALIA



EPD REFERENCE No. 10/233/ED12

**WAE**

**JK Williams**

J K Williams Contracting Pty Ltd  
 44 Jack Williams Drive, Penrith NSW 2751  
 Ph (02) 4725 3400 Fax (02) 4725 3499  
 ABN: 45 056 566 771

**ESTATE POWER DESIGN PTY LIMITED**

ABN 69 002 331 142

ELECTRICAL RETICULATION CONSULTANTS  
 P.O. BOX 1872, PENRITH BC, 2751  
 TEL: (02) 4731-8333 FAX: (02) 4731-1594  
 EMAIL: brian@estatepower.com.au

REFERENCE DRAWINGS

503335	ELECTRICAL RETICULATION
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WORK ORDERS

GENERAL
OVERHEAD
UNDERGROUND
SUBSTATIONS

CAP / SAMP No.	URS 18564
AM PROJ. No.	
HV SWITCHING	
UBD/PENGUIN REF	MAP 63 REF D3
GIS MAP No	6482 93
HV OP DIAGRAM	NTH/RICHMOND 1 LB
LOCAL GOV AREA	HAWKSBURY

ORIGINAL SCALE 1:1000

DO NOT SCALE

DIMENSIONS IN METRES

DRAWN	P.M.
DATE	06.02.18
CH'D	B.J.
DESIGN	B.J.

STAGE 12 BELMONT ESTATE NORTH RICHMOND URS 18564 DUCT, EASEMENT & TRENCH REQUIREMENTS

**Endeavour Energy**

A1 503334 B

SHEET No 1 OF 2 SHEETS

**WORK COMPLETED / FIELD BOOK**

CONSTRUCTED BY: \_\_\_\_\_  
 WORKS COMPLETED: \_\_\_\_\_  
 SIGNATURE: \_\_\_\_\_ DATE: \_\_\_\_\_

INSPECTED BY: \_\_\_\_\_  
 SIGNATURE: \_\_\_\_\_ DATE: \_\_\_\_\_

**ASSET RECORDING**

1. \_\_\_\_\_  
 OF \_\_\_\_\_  
 CONTACT No: \_\_\_\_\_

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SIGNATURE: \_\_\_\_\_ DATE: \_\_\_\_\_

**QUALITY LEVEL DATA POINT**

DATA\_POINT\_ID

BDY - Boundary  
 DE - Duct End  
 - New Ducts  
 UB-RC UNDERBORE - ROAD CROSSING

Note:  
 1. ALL UNDERBORE DUCTS FOUND TWISTED  
 2. SECTION MARKED IN RED TO BE CAPTURED ONLY

**DUCT DECLARATION**

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OF MAROUBRA  
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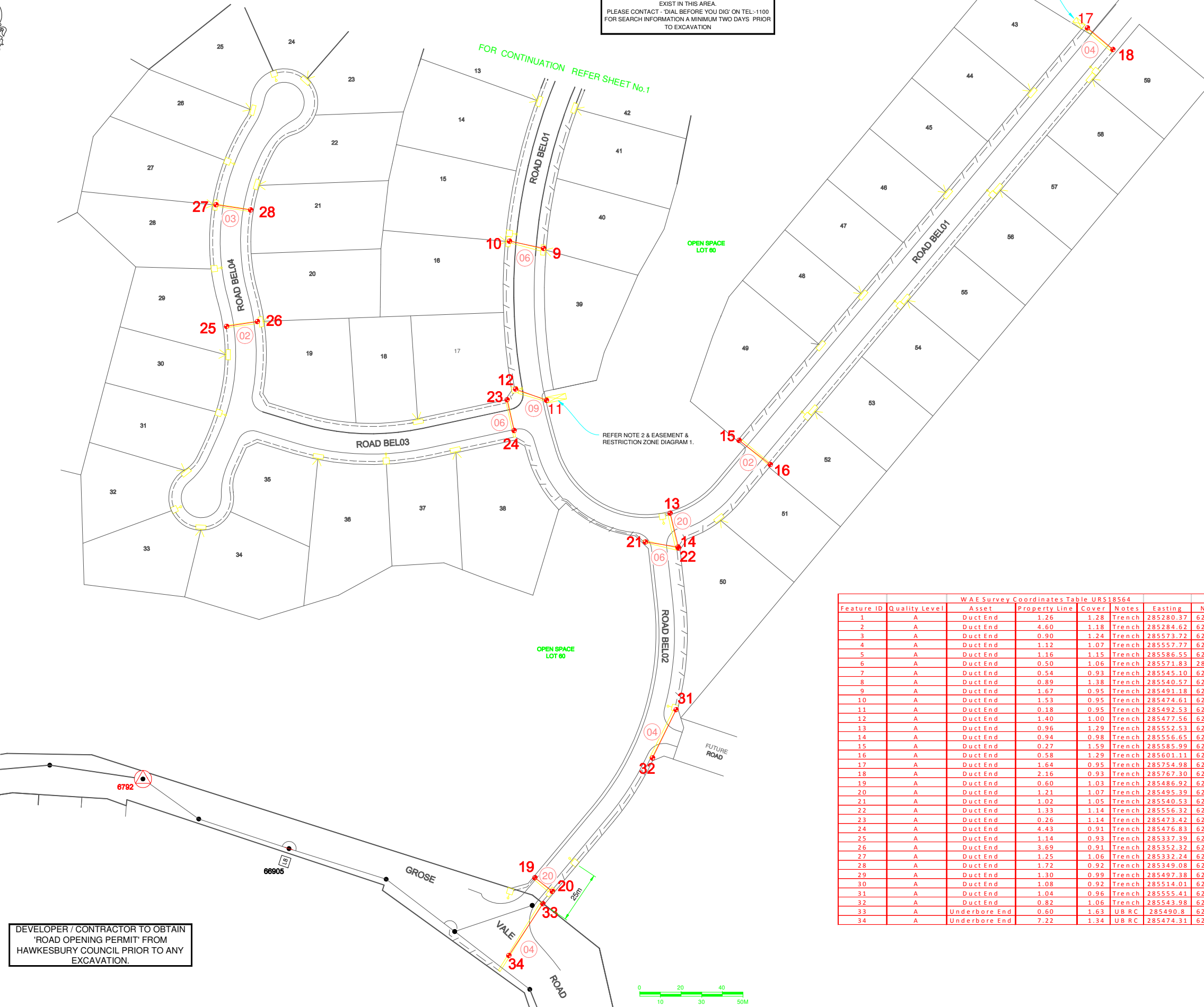
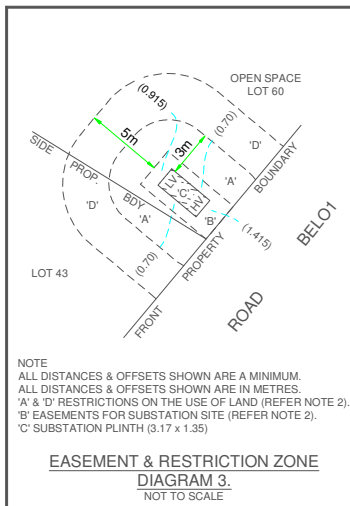
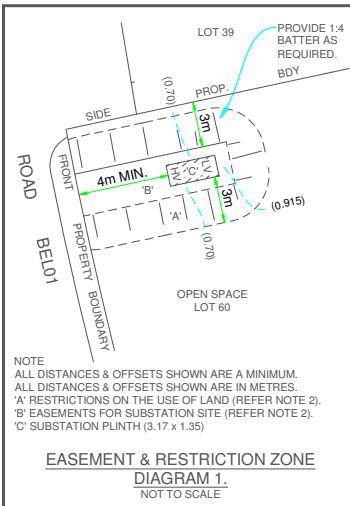
SIGNATURE: *Ernest Shum*

LAND SURVEYOR REGISTERED UNDER SURVEYING ACT 2002 OR MEMBER OF THE INSTITUTE OF ENGINEERS OF AUSTRALIA

**WARNING**

LIVE ENDEAVOUR ENERGY CABLES AND OTHER SERVICES EXIST IN THIS AREA. PLEASE CONTACT 'DIAL BEFORE YOU DIG' ON TEL: 1100 FOR SEARCH INFORMATION A MINIMUM TWO DAYS PRIOR TO EXCAVATION

REFER NOTE 2 & EASEMENT & RESTRICTION ZONE DIAGRAM 3.



Feature ID	Quality Level	Asset	Property Line	Cover	Notes	Easting	Northing	AHD Height
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**CERTIFIED BY ENDEAVOUR ENERGY**

AMENDMENT: \_\_\_\_\_  
 DATE APPROVED: \_\_\_\_\_  
 EXAMINER'S SIGNATURE: \_\_\_\_\_  
 PRINT NAME: \_\_\_\_\_

THIS CERTIFICATION IS ISSUED SUBJECT TO ENDEAVOUR ENERGY'S STANDARD CERT. TERMS.

DEVELOPER / CONTRACTOR TO OBTAIN 'ROAD OPENING PERMIT' FROM HAWKESBURY COUNCIL PRIOR TO ANY EXCAVATION.

AMENDMENTS	ORIGINAL ISSUE	DATE	BY	REVISION	DESCRIPTION	DRAWN	DATE	DESIGN	BY	SCALE	DO NOT SCALE	DIMENSIONS IN METRES	STAGE 12 BELMONT ESTATE NORTH RICHMOND URS 18564 DUCT, EASEMENT & TRENCH REQUIREMENTS	EPD REFERENCE No. 10/233/ED12	Endeavour Energy	A1 503334 B	SHEET No. 2 OF 2 SHEETS
	CHKD																
A	05.02.2018		B.J.				06.02.18		B.J.	1:1000							

W A E

**jk Williams**  
 J K Williams Contracting Pty Ltd  
 44 Jack Williams Drive, Penrith NSW 2751  
 Ph: (02) 4725 3400 Fax: (02) 4725 3499  
 ABN: 45 056 566 771

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 EMAIL: brian@estatepower.com.au

REFERENCE DRAWINGS: 503335 ELECTRICAL RETICULATION

WORK ORDERS: GENERAL, OVERHEAD, UNDERGROUND, SUBSTATIONS

CAP / SAMP No. URS 18564  
 AM PROJ. No.  
 HV SWITCHING  
 UBD/PENGUIN REF MAP 63 REF D3  
 GIS MAP No 6482 93  
 HV OP DIAGRAM NTH/RICHMOND 1 LB  
 LOCAL GOV AREA HAWKESBURY

ORIGINAL SCALE 1:1000  
 DRAWN P.M.  
 DATE 06.02.18  
 CHD B.J.

EPD 1.5