

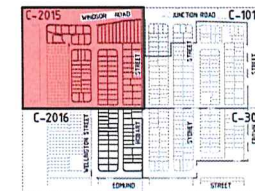
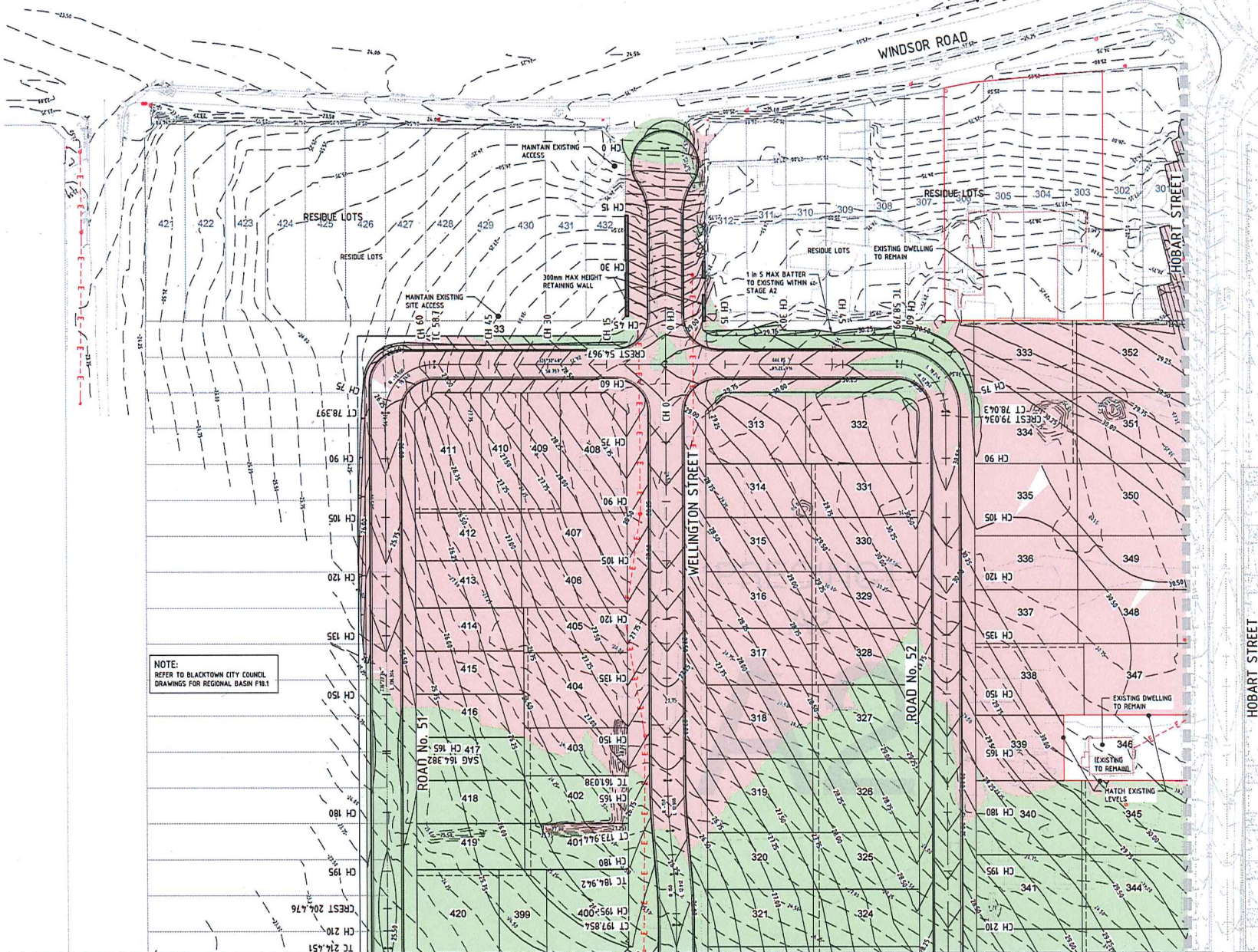


LOTS 301 TO 312 = 12 RESIDUE LOTS
LOTS 313 TO 420 = 108 RESIDENTIAL LOTS
LOTS 421 & 433 = 13 RESIDUE LOTS
LOTS 434 & 435 = 2 DRAINAGE RESERVE LOTS

STAGING BOUNDARIES

EXISTING DWELLINGS TO BE RETAINED

Areas and dimensions are subject to final survey and approval by Blacktown City Council.



LEGEND

- CUT = 12,250m³
- FILL = 34,850m³
- FILL REQUIRED = 22,600m³
- STAGE BOUNDARY
- 1150 EXISTING CONTOURS
- 1150 DESIGN CONTOURS
- BATTER LINES
- RETAINING WALL

NOTE:

- VOLUMES ARE TAKEN FROM EXISTING SURFACE TO FINISHED SURFACE
- ALL TREES TO BE REMOVED WITHIN CUT AND FILL AREAS

NOTE:
REFER TO BLACKTOWN CITY COUNCIL
DRAWINGS FOR REGIONAL BASIN F181

FOR CONTINUATION REFER TO DRAWING

FOR CONTINUATION REFER TO DRAWING

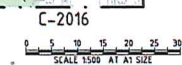
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2	12/03/16	RE-DRAWN FOR DA APPROVAL	FW
3	12/03/16	REVISED FOR INFORMATION	FW
4	03/04/16	RE-DRAWN FOR DA APPROVAL	FW
5	03/04/16	REVISED FOR INFORMATION	FW
6	03/04/16	RE-DRAWN FOR DA	FW
7	03/04/16	RE-DRAWN FOR DA	FW
8	03/04/16	RE-DRAWN FOR DA	FW

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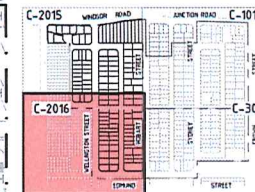
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ugreng.com

UGRE

PROJECT			
RIVERSTONE SCHEDULED LANDS (STAGE A2)			
STATUS			
FOR APPROVAL NOT TO BE USED FOR CONSTRUCTION			
DRAWN	DATE	REVISED	APPROVED
TB	12/03/16	PH	
SCALE	1:500		
CUT AND FILL PLAN SHEET 1			
PROJECT NO.	S13153	DATE	C-2015
REV	J		



C-2015



LEGEND



CUT = 12,250m³



ENI = 21.850 m³

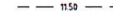
FILL REQUIRED = 22,600m³



STAGE BOUNDARY



STAGE BOUNDARY



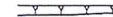
— EXISTING CONTOURS



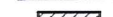
DESIGN CONTIGUOUS



DESIGN CONTOURS



BATTER LINES



DETAILING WALL

NOTE:

- NOTE:
1. VOLUMES ARE TAKEN FROM EXISTING SURFACE TO FINISHED DESIGN SURFACE
 2. ALL TREES TO BE REMOVED WITHIN CUT AND FILL AREAS

J	12/29/0	RE-ISSUED FOR GA APPROVAL	TW
H	11/28/0	RE-ISSUED FOR GA APPROVAL	TW
G	11/11/0	ISSUED FOR INFORMATION	TW
F	07/06/1	RE-ISSUED FOR GA APPROVAL	TH
E	02/04/1	ISSUED FOR TENDER	TH
D	21/12/0	RE-ISSUED FOR GA	PH
C	15/01/1	RE-ISSUED FOR GA	PH
REV	DATE	DESCRIPTION	REV

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PROJECT

RIVERSTONE
SCHEDULED LANDS (STAGE A2)

015

C-3	COUNCIL FILE REFERENCE
	STATUS

FOR APPROVAL

NOT TO BE USED FOR CONSTRUCTION			
DRAWN	DESIGNED	CHECKED	APPROVED
TEB	AME	TEB	

IB	NR	PH	
DATA	GRID	SCALE	
AHD	MGA	1:500	AT A1

FILE	CUT AND FILL PLAN
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SHEET 2

PROJECT No.	DATA SHEET No.	REV
S13153	C-2016	J

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Site area	Sub-catchment or Name of Structure	Notes
Total catchment area (ha)	11.23	
Disturbed catchment area (ha)	0.04	

Soil analysis (enter sediment type if known, or laboratory particle size data)		Notes
Sediment Type (C, F or G) (if known)	D	From Appendix C (if known)
To sand fraction (500 to 2.00 mm)		Enter the percentage of each soil fraction. E.g. enter 70 for 70%
To silt fraction (0.075 to 0.075 mm)		
To clay fraction (less than 0.075 mm)		
Dispersion percentage		E.g. enter 10 for dispersion of 10%
% of silt and clay dispersion		See Section 5.3.3.1. Sub-surface
Soil Texture Class	D	Sub-surface

Rainfall data		Notes
Design rainfall depth (mm)	75	See Section 5.3.4 and 5.3.5
Design rainfall depth (mm)	75	Table 5.3 on pages 5.3.4 and 5.3.5
1-day, 1-in-100-year rainfall (mm)	68.3	
2-day, 1-in-100-year rainfall (mm)	10.2	Only need to enter one or the other
2-day, 1-in-100-year rainfall (mm)	10.2	

RUSLE Factors		Notes
R-factor	2200	Auto-filled from above
K-factor	0.25	
LS-factor	0.01	
C-factor	0.5	
P-factor	0.5	
USLE factor (R x K x LS x C x P)	0.01	RUSLE LS factor calculated for a 1% slope
USLE factor (R x K x LS x C x P)	0.01	
USLE factor (R x K x LS x C x P)	0.01	
USLE factor (R x K x LS x C x P)	0.01	
USLE factor (R x K x LS x C x P)	0.01	
USLE factor (R x K x LS x C x P)	0.01	

Sediment Basin Design Criteria (for Type DIF basins only. Leave blank for Type C basins)		Notes
Design basin depth (mm)	2	Maximum is generally 3 months
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	
Design basin depth (mm)	2	

Calculations and Type DIF Sediment Basin Volumes		Notes
Soil Loss (tonnes/ha)	75	See Table 4.2, page 4.3
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	
Soil Loss (tonnes/ha)	75	

Nil for Type C (see Appendix C, Table 5.3.1.1)

NOTE:
REFER TO BLACKTOWN CITY COUNCIL
DRAWINGS FOR REGIONAL BASIN FIB-1

COUNCIL BASIN TO BE USED
FOR SEDIMENT CONTROL

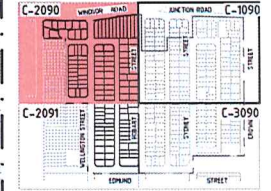
FOR CONTINUATION REFER TO DRAWING C-2091

WINDSOR ROAD

WELLINGTON STREET

ROAD No. 52

SCALE 1:500 AT A1 SIZE



- LEGEND
- STAGE BOUNDARY
 - EXISTING SURFACE CONTOURS
 - DESIGN CONTOURS
 - TEMPORARY CUTOFF DRAIN
 - SILT FENCE
 - STABILISED SITE ACCESS
 - INLET FILTER
 - GEOTEXTILE INLET FILTER

FOR CONTINUATION REFER TO DRAWING C-1090

REV	DATE	DESCRIPTION
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2	10/10/10	RE-DESIGNED FOR CA APPROVAL
3	10/10/10	RE-DESIGNED FOR CA APPROVAL
4	10/10/10	RE-DESIGNED FOR CA APPROVAL
5	10/10/10	RE-DESIGNED FOR CA APPROVAL
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8	10/10/10	RE-DESIGNED FOR CA APPROVAL
9	10/10/10	RE-DESIGNED FOR CA APPROVAL
10	10/10/10	RE-DESIGNED FOR CA APPROVAL

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PROJECT: RIVERSTONE SCHEDULED LANDS (STAGE A2)

STATUS: FOR APPROVAL
NOT TO BE USED FOR CONSTRUCTION

DESIGN	DATE	DESIGNED	PH	APPROVED
TB	NC	PH		

SCALE: 1:500

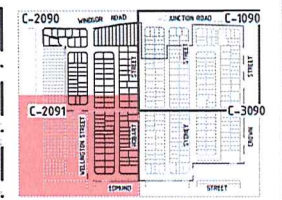
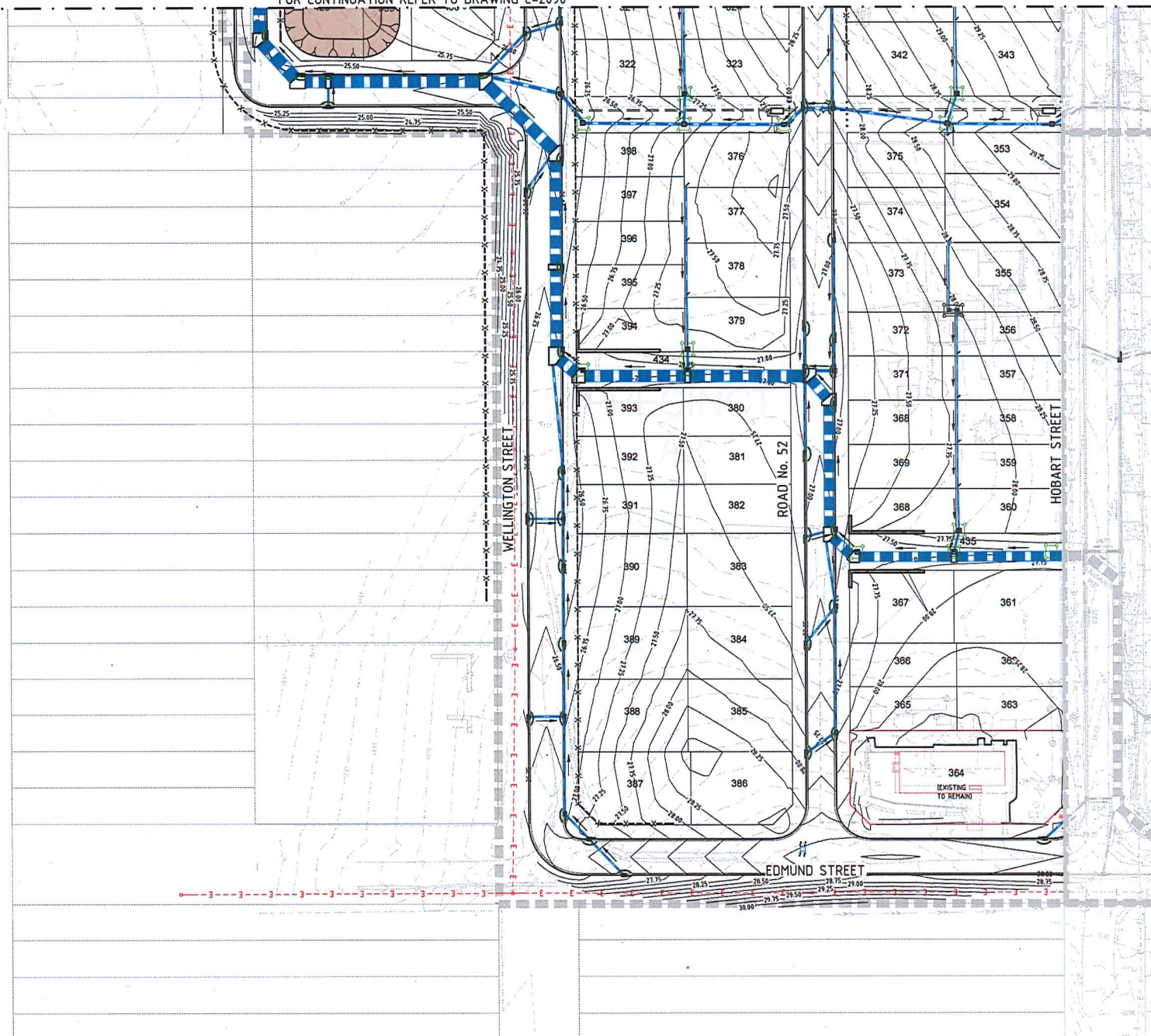
PROJECT NO: S13153

DRAWING NO: C-2090

SHEET 1

EROSION AND SEDIMENT CONTROL PLAN

FOR CONTINUATION REFER TO DRAWING C-2090



- LEGEND**
- STAGE BOUNDARY
 - EXISTING SURFACE CONTOURS
 - DESIGN CONTOURS
 - TEMPORARY CUTOFF DRAIN
 - SILT FENCE
 - STABILISED SITE ACCESS
 - INLET FILTER
 - GEOTEXTILE INLET FILTER

FOR CONTINUATION REFER TO DRAWING C-3090

REV	DATE	DESCRIPTION	REVISED BY
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2	11/03/18	RE-DESIGNED FOR DA APPROVAL	TW
3	11/03/18	ISSUED FOR INFORMATION	TW
4	01/04/17	RE-DESIGNED FOR DA APPROVAL	TH
5	02/04/17	ISSUED FOR TENDR	TH
6	23/03/16	RE-DESIGNED FOR DA	PH
7	15/01/15	RE-DESIGNED FOR DA	AB

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PROJECT

RIVERSTONE
SCHEDULED LANDS (STAGE A2)

STATUS

FOR APPROVAL
NOT TO BE USED FOR CONSTRUCTION

DESIGNED BY	CHECKED BY	APPROVED BY
TW	PH	PH

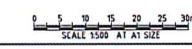
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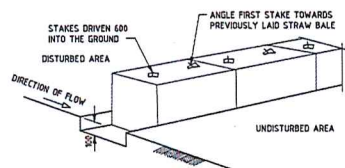
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TITLE

EROSION AND SEDIMENT CONTROL PLAN
SHEET 2

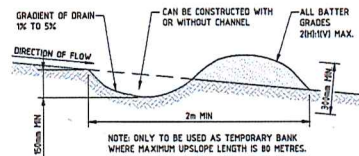
PROJECT NO. S13153 **DRAWING NO.** C-2091 **REV.** J





STRAW BALE SEDIMENT FILTER

NTS
NOTE: STAKE TO BE EITHER TAR COATED
STAR OR 50 x 50 HARDWOOD

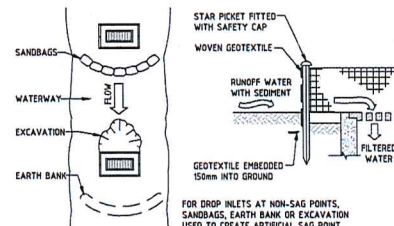
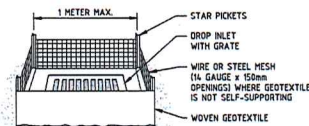


TEMPORARY CUT OFF DRAIN CONSTRUCTION NOTES:

1. BUILD WITH GRADIENTS BETWEEN 1% AND 5%.
2. AVOID REMOVING TREES AND SHRUBS IF POSSIBLE - WORK AROUND THEM.
3. ENSURE THE STRUCTURES ARE FREE OF PROJECTIONS OR OTHER IRREGULARITIES THAT COULD IMPEDE WATER FLOW.
4. BUILD THE DRAINS WITH CIRCULAR, PARABOLIC OR TRAPEZOIDAL CROSS-SECTIONS, NOT "V" SHAPED.
5. ENSURE BANKS ARE PROPERLY COMPACTED TO PREVENT FAILURE.
6. COMPLETE PERMANENT OR TEMPORARY STABILISATION WITHIN 10 DAYS OF CONSTRUCTION.

TEMPORARY CUT OFF DRAIN

SCALE N.T.S.

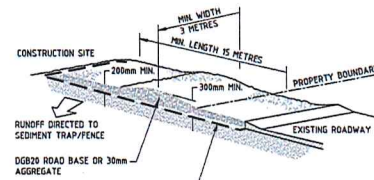


GEOTEXTILE INLET FILTER CONSTRUCTION NOTES:

1. FABRICATE A SEDIMENT BARRIER MADE FROM GEOTEXTILE OR STRAW BALES.
2. PICKET SPACING TO BE A MAXIMUM 10m CENTRES.
3. IN WATERWAYS, ARTIFICIAL SAG POINTS CAN BE CREATED WITH SANDBAGS OR EARTH BANKS AS SHOWN IN THE DRAWING.
4. DO NOT COVER THE INLET WITH GEOTEXTILES UNLESS THE DESIGN IS ADEQUATE TO ALLOW FOR ALL WATERS TO BYPASS IT.

GEOTEXTILE INLET FILTER

SCALE N.T.S.



GEOTEXTILE FABRIC DESIGNED TO PREVENT INTERMIXING OF SUBGRADE AND BASE MATERIALS AND TO MAINTAIN GOOD PROPERTIES OF THE SUBGRADE LAYERS.

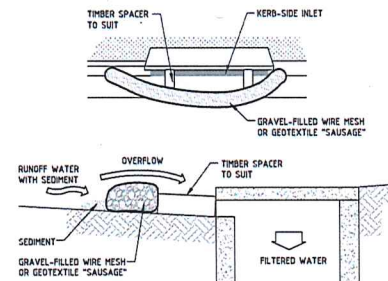
GEOTEXTILE MAY BE A WOVEN OR NEEDLE-PUNCHED PRODUCT WITH A MINIMUM CBR BURST STRENGTH (AS3706.4-90) OF 2500 N.

STABILISED SITE ACCESS CONSTRUCTION NOTES:

1. STRIP THE TOPSOIL, LEVEL THE SITE AND COMPACT THE SUBGRADE.
2. COVER THE AREA WITH NEEDLE-PUNCHED GEOTEXTILE.
3. CONSTRUCT A 200mm THICK PAD OVER THE GEOTEXTILE USING ROAD BASE OR 30mm AGGREGATE.
4. ENSURE THE STRUCTURE IS AT LEAST 15 METRES LONG OR TO BUILDING ALIGNMENT AND AT LEAST 3 METRES WIDE.
5. WHERE A SEDIMENT FENCE JOINS ONTO THE STABILISED ACCESS, CONSTRUCT A HUMP IN THE STABILISED ACCESS TO DIVERT WATER TO THE SEDIMENT FENCE.

STABILISED SITE ACCESS

SCALE N.T.S.

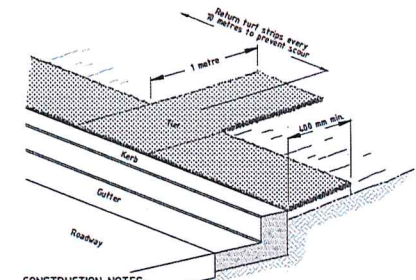


MESH & GRAVEL INLET FILTER CONSTRUCTION NOTES:

1. INSTALL FILTERS TO KERB INLETS ONLY AT SAG POINTS.
2. FABRICATE A SLEEVE MADE FROM GEOTEXTILE OR WIRE MESH LONGER THAN THE LENGTH OF THE INLET PIT AND FILL IT WITH 25mm TO 50mm GRAVEL.
3. FORM AN ELLIPTICAL CROSS-SECTION ABOUT 150mm HIGH x 400mm WIDE.
4. PLACE THE FILTER AT THE OPENING LEAVING AT LEAST A 100mm SPACE BETWEEN IT AND THE KERB INLET. MAINTAIN THE OPENING WITH SPACER BLOCKS.
5. FORM A SEAL WITH THE KERB TO PREVENT SEDIMENT BYPASSING THE FILTER.
6. SANDBAGS FILLED WITH GRAVEL CAN SUBSTITUTE FOR THE MESH OR GEOTEXTILE PROVIDING THEY ARE PLACED SO THAT THEY CAN FIRMLY ABUT EACH OTHER AND SEDIMENT-LADEN WATERS CANNOT PASS BETWEEN.

MESH & GRAVEL INLET FILTER

SCALE N.T.S.



CONSTRUCTION NOTES:

1. INSTALL A 400mm MINIMUM WIDE ROLL OF TURF ON THE FOOTPATH NEXT TO THE KERB AND AT THE SAME LEVEL AS THE TOP OF THE KERB.
2. LAY 14 METRE LONG TURF STRIPS NORMAL TO THE KERB EVERY 10 METRES.
3. REHABILITATE DISTURBED SOIL BEHIND THE TURF STRIP FOLLOWING THE EROSION SEDIMENT CONTROL PHASE AND STORMWATER MANAGEMENT PHASE.

KERBSIDE TURF STRIP

SCALE N.T.S.

REV	DATE	DESCRIPTION	BY
0	11/01/18	RE-DESIGNED FOR DA APPROVAL	TW
1	13/01/18	ISSUED FOR INFORMATION	TW
2	03/04/18	RE-DESIGNED FOR DA APPROVAL	TW
3	02/04/18	ISSUED FOR TENDER	TW
4	22/05/18	RE-DESIGNED FOR DA	TW
5	04/06/18	ISSUED FOR DA	TW
6	10/06/18	ISSUED FOR TENDER	TW
7	10/06/18	ISSUED FOR TENDER	TW

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CLIENT



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PROJECT

**RIVERSTONE
SCHEDULED LANDS (STAGE A2)**

STATUS

FOR APPROVAL

NOT TO BE USED FOR CONSTRUCTION

DRAWN

CHKD

DATE

BY

PROJECT NO.

SCALE

DATE

PROJECT NO.

SCALE

DATE

PROJECT NO.

SCALE

DATE

