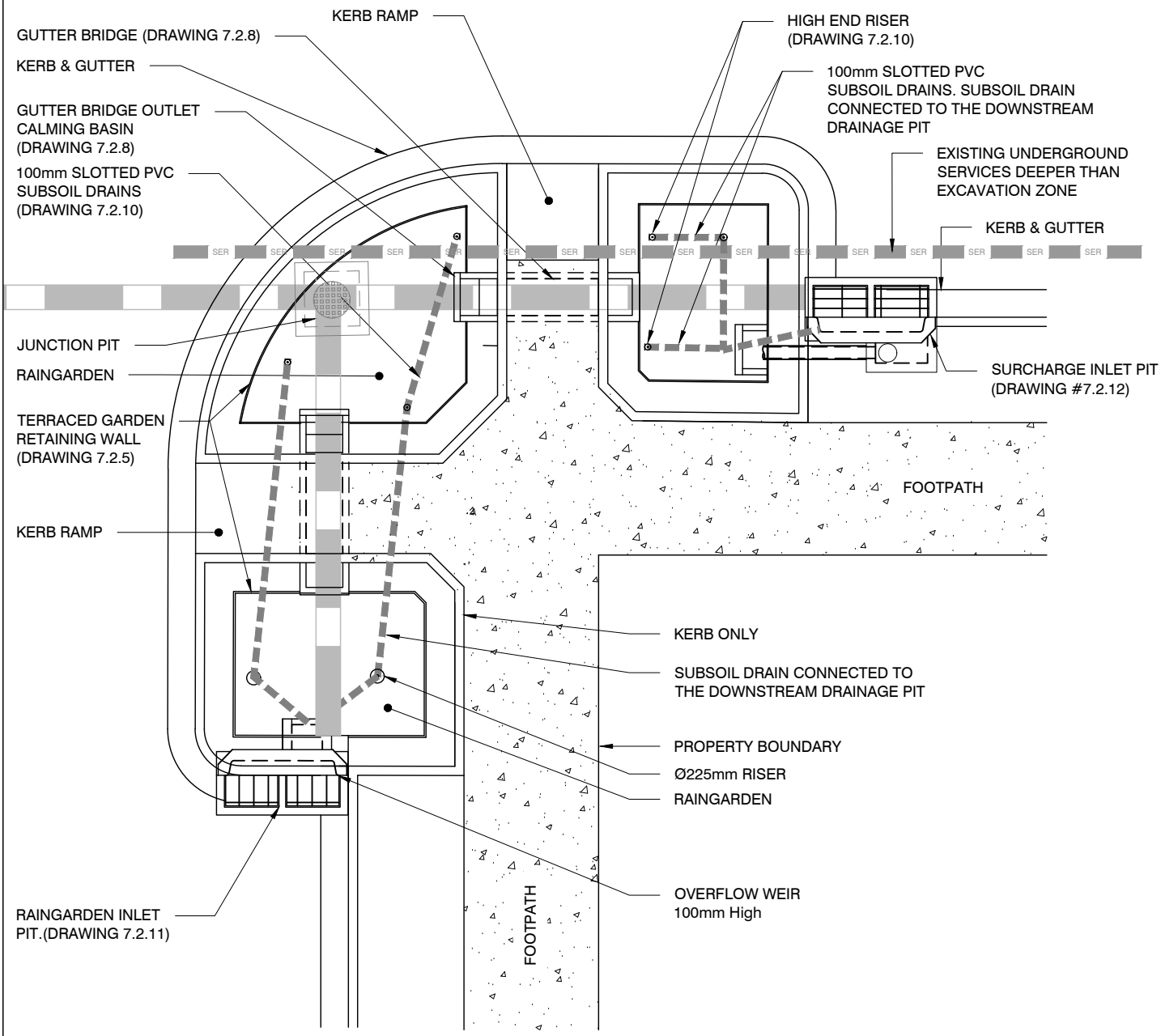


PLAN 1:100

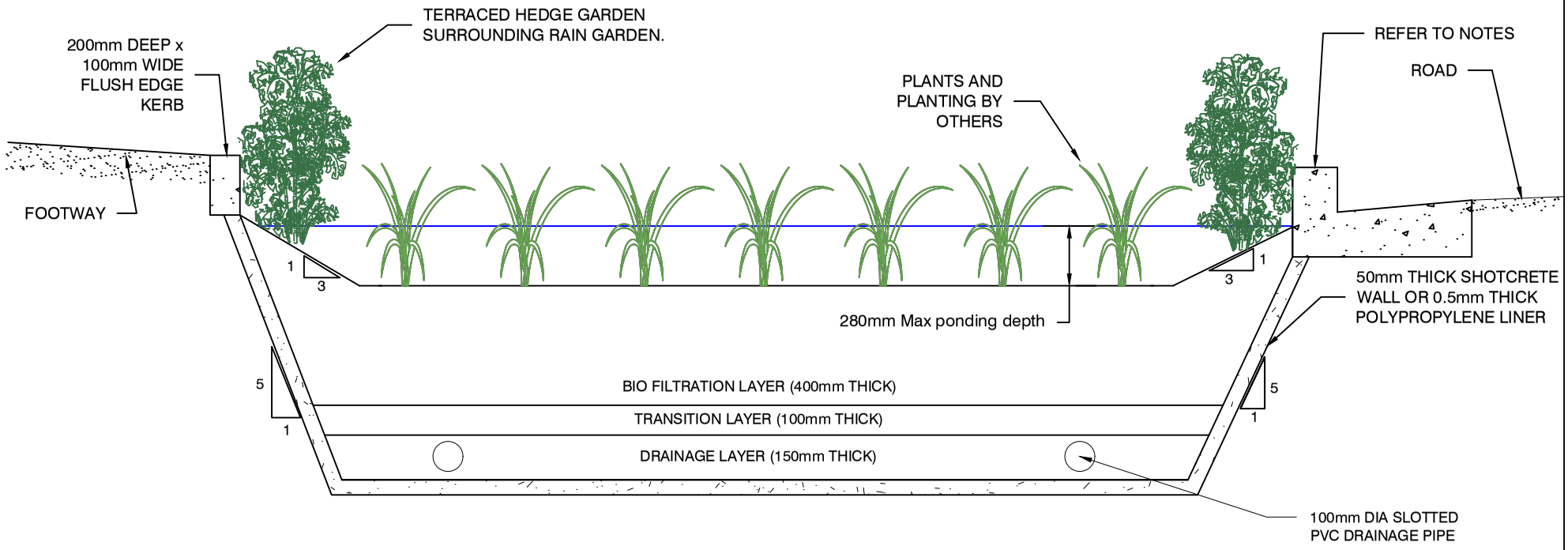
NOTES:

1. THE RAINGARDENS ARE PREFERRED TO BE TERRACED RAINGARDEN TO MAXIMISE THE PONDING VOLUME. REFER DRAWING 7.2.5.
2. THE RAINGARDEN & SURROUNDINGS AREAS SHALL BE DESIGNED IN ACCORDANCE WITH SYDNEY STREET TECHNICAL SPECIFICATION PART A4.
3. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.

CITY OF SYDNEY	RAINGARDENS SETOUT PLAN - EXAMPLE	DRAINAGE Rev D Date 01.12.19 Approved P S Dwg No. 7.2.1

CITY OF SYDNEY

SECTION 1:20



NOTES:

1. PROPOSED FILTER MEDIA SHALL COMPLY WITH CITY'S TECHNICAL SPECIFICATION B10 - 10.4.8.2
2. BACK OF KERB SHALL BE CONSTRUCTED VERTICALLY AND NO EXCESS CONCRETE SHALL BE POURED IN THE RAIN GARDEN.
3. WHERE STRUCTURAL STABILITY OF KERB IS A CONCERNED MATTER, THE KERB & GUTTER MAY BE REINFORCED USING REINFORCEMENT STEEL BARS REFER DWG# 1.1.15.
4. THE KERBS MATERIAL SHALL BE SELECTED IN ACCORDANCE WITH CITY OF SYDNEY STREET CODE.
5. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.

RAINGARDENS
LINED

DRAINAGE

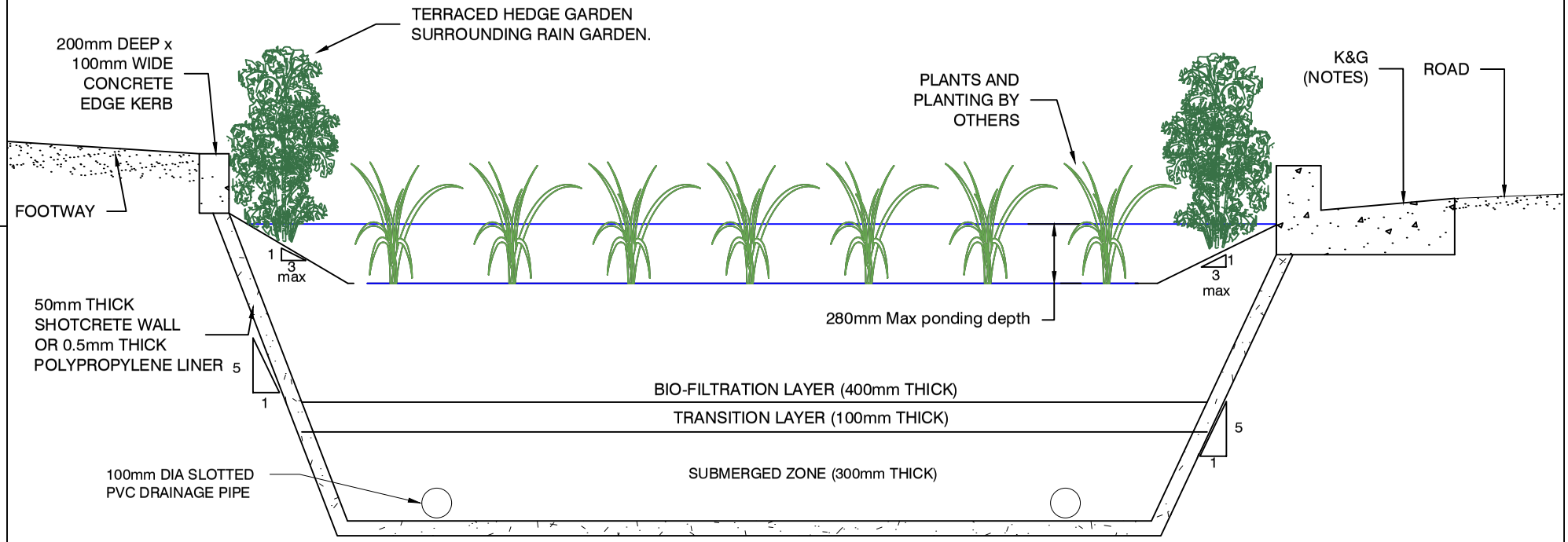
Dwg No. 7.2.2

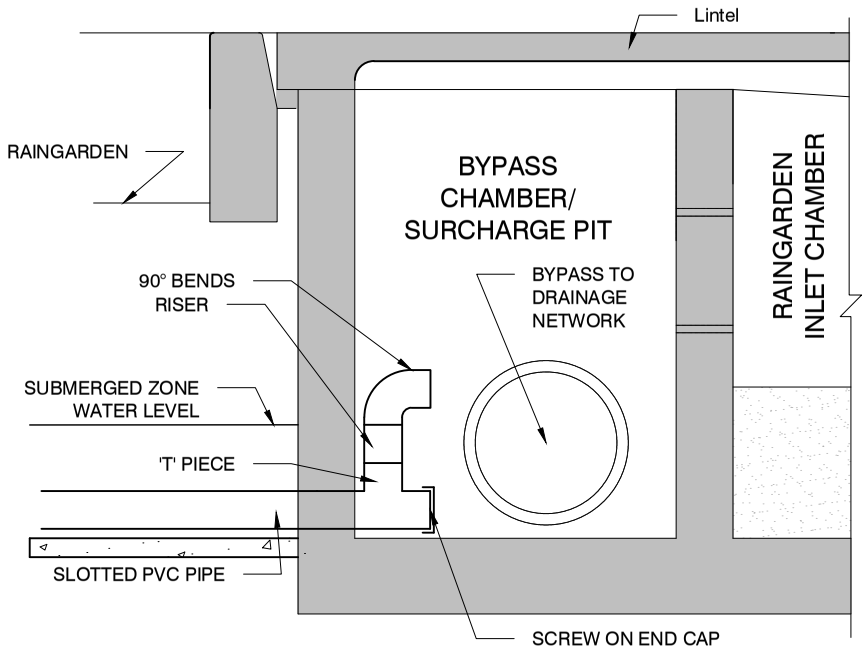
Rev	Date	Approved
E	16.11.22	S A

CITY OF SYDNEY

RAINGARDENS

LINED - SUBMERGED ZONE





NON-STANDARD DRAINAGE PIT CONNECTION (SUBMERGED ZONE)

NOTES:

1. PROPOSED FILTER MEDIA SHALL COMPLY WITH CITY'S TECHNICAL SPECIFICATION B10 - 10.4.8.2
2. BACK OF KERB SHALL BE CONSTRUCTED VERTICALLY AND NO EXCESS CONCRETE SHALL BE POURED IN THE RAIN GARDEN.
3. WHERE STRUCTURAL STABILITY OF KERB IS A CONCERNED MATTER, THE KERB & GUTTER MAY BE REINFORCED USING REINFORCEMENT STEEL BARS REFER DWG# 1.1.15.
4. THE KERBS MATERIAL SHALL BE SELECTED IN ACCORDANCE WITH CITY OF SYDNEY STREET CODE.
5. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.

Rev	Date	Approved
E	16.11.22	S A

DRAINAGE

Dwg No. 7.2.3

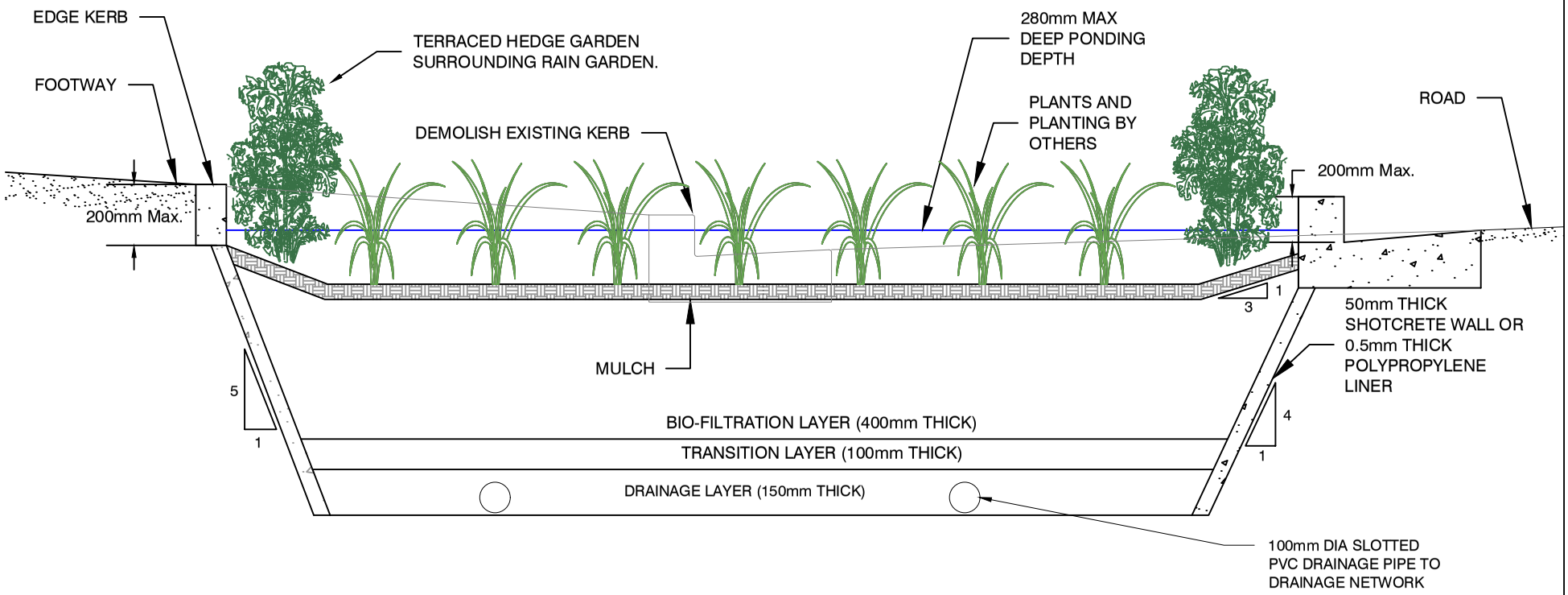
CITY OF SYDNEY

RAINGARDENS
UNLINED

DRAINAGE
Dwg No. 7.2.4

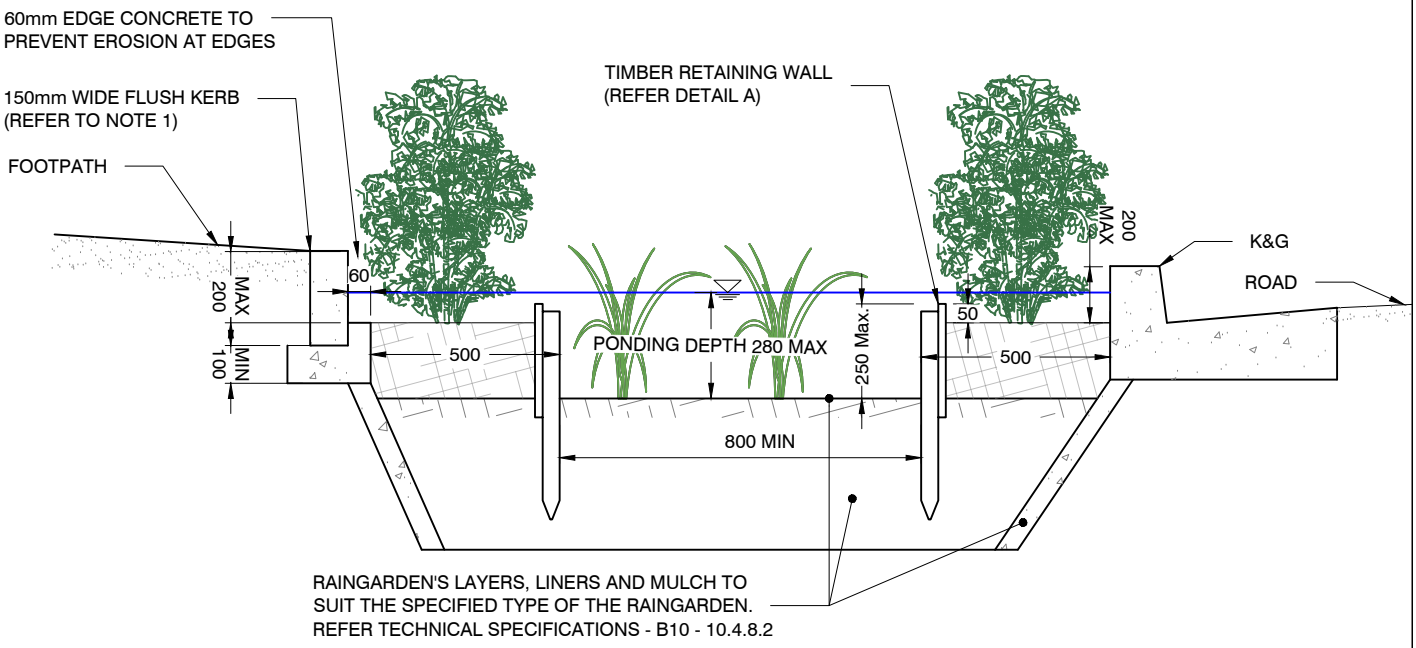
Rev	Date	Approved
E	16.11.22	S A

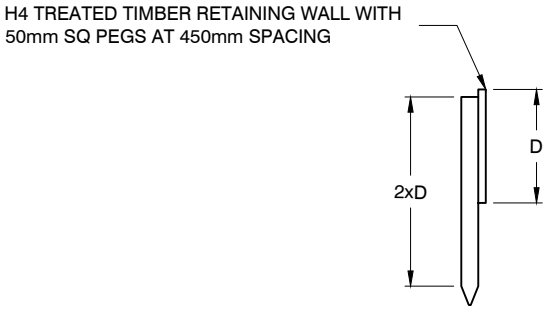
SECTION 1:20



NOTES:

1. PROPOSED FILTER MEDIA SHALL COMPLY WITH CITY'S TECHNICAL SPECIFICATION B10 - 10.4.8.2
2. BACK OF KERB SHALL BE CONSTRUCTED VERTICALLY AND NO EXCESS CONCRETE SHALL BE POURED IN THE RAIN GARDEN.
3. WHERE STRUCTURAL STABILITY OF KERB IS A CONCERNED MATTER, THE KERB & GUTTER MAY BE REINFORCED USING REINFORCEMENT STEEL BARS REFER DWG# 1.1.15.
4. THE KERBS MATERIAL SHALL BE SELECTED IN ACCORDANCE WITH CITY OF SYDNEY STREET CODE.
5. DRAINAGE LAYER MAY BE DELETED IF THERE IS NO DRAINAGE IN THE VICINITY SUBJECTED TO CITY'S APPROVAL.
6. THE SLOTTED PIPE SHALL BE CONNECTED TO BY PASS CHAMBER OF BYPASS PIT/SURCHARGE PIT
7. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.





DETAIL A

NOTES:

1. THE FLUSH KERB AT THE EGDE OF THE FOOTPATH SHALL BE SELECTED TO MATCH THE SURROUNDING KERBS.
2. FOR KERB AND GUTTER DETAILS REFER TO STANDARD DRAWING # 1.1.1 & 1.1.2
3. OTHER MATERIALS MAY BE USED FOR THE RETAINING TERRACED EDGES UPON CITY'S APPROVAL.
4. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

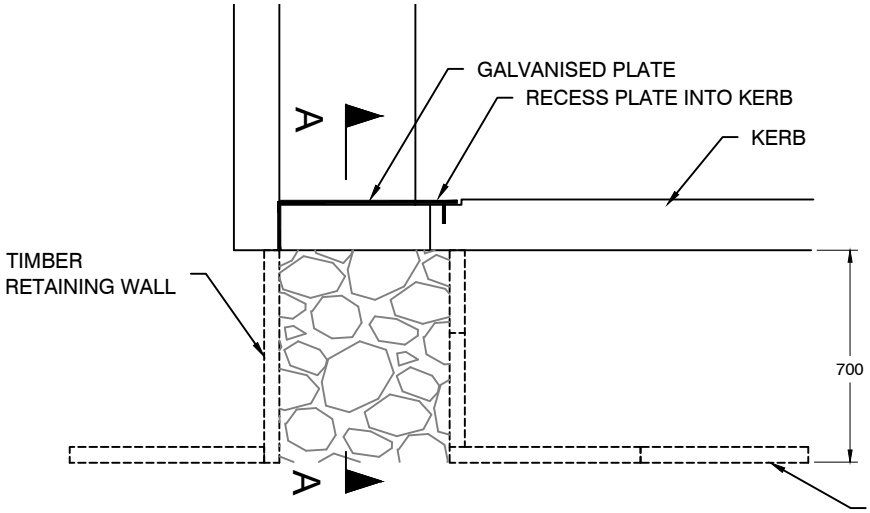
CITY OF SYDNEY

RAINGARDENS
TERRACE RAINGARDEN

DRAINAGE

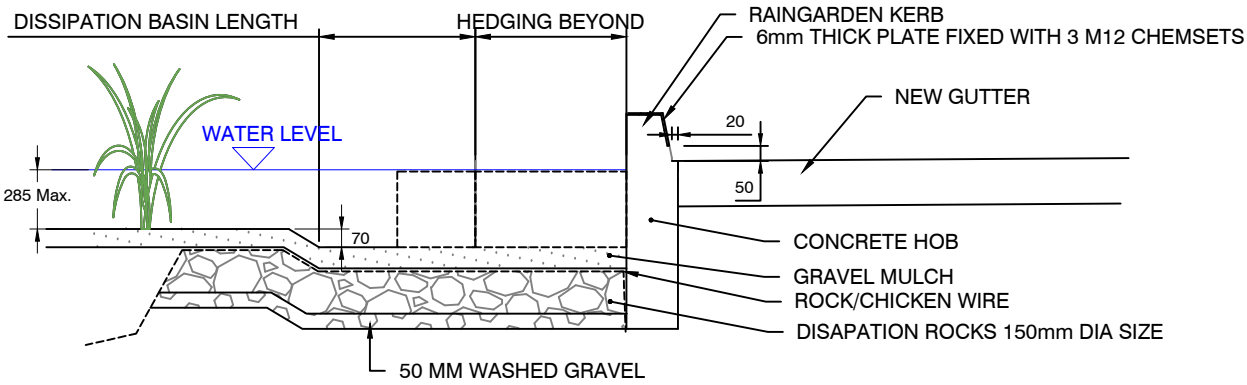
Rev	E
Date	*16.11.22*
Approved	S A

Dwg No.
7.2.5



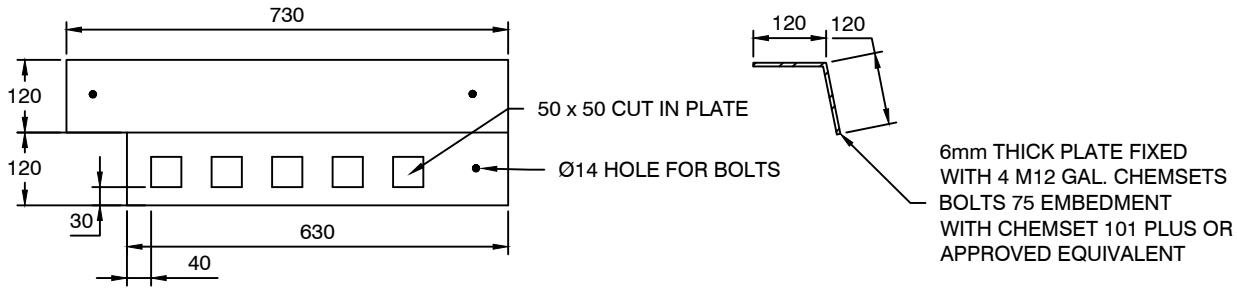
RAINGARDEN ENERGY DISSIPATION - PLAN

1:25



SECTION A-A

1:10



GALVANISED PLATE

1:10

NOTES:

1. DISSIPATION BASIN LENGTH SHALL BE MINIMUM 400mm UNLESS NOTES OTHERWISE.
2. T - TERRACE GARDEN IS THE PREFFERED OPTION FOR MOST OF RAINGARDENS EXCEPT ROCK SWALES: IN WHICH CASE ENTRY STRUCTURE SHALL BE DESIGNED TO SUIT THE ROCK SWALE
3. THE PLATE SHALL BE RECESSED INTO THE KERB
4. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

RAINGARDEN

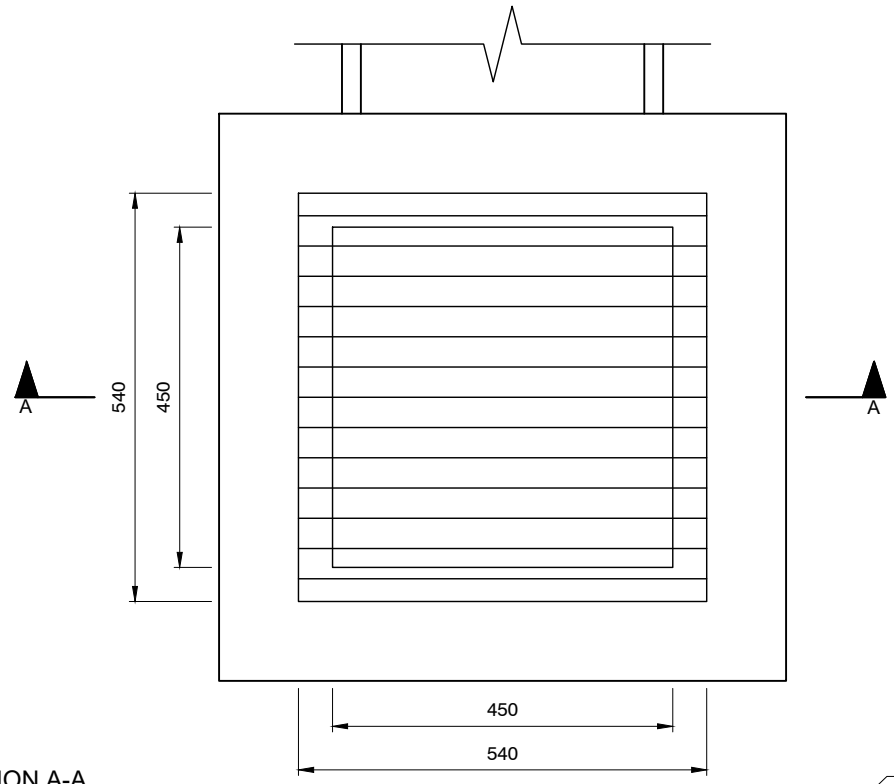
RAINGARDEN DIRECT INFLOW WEIR AND CALMING BASIN DIRECT ENTRY

DRAINAGE

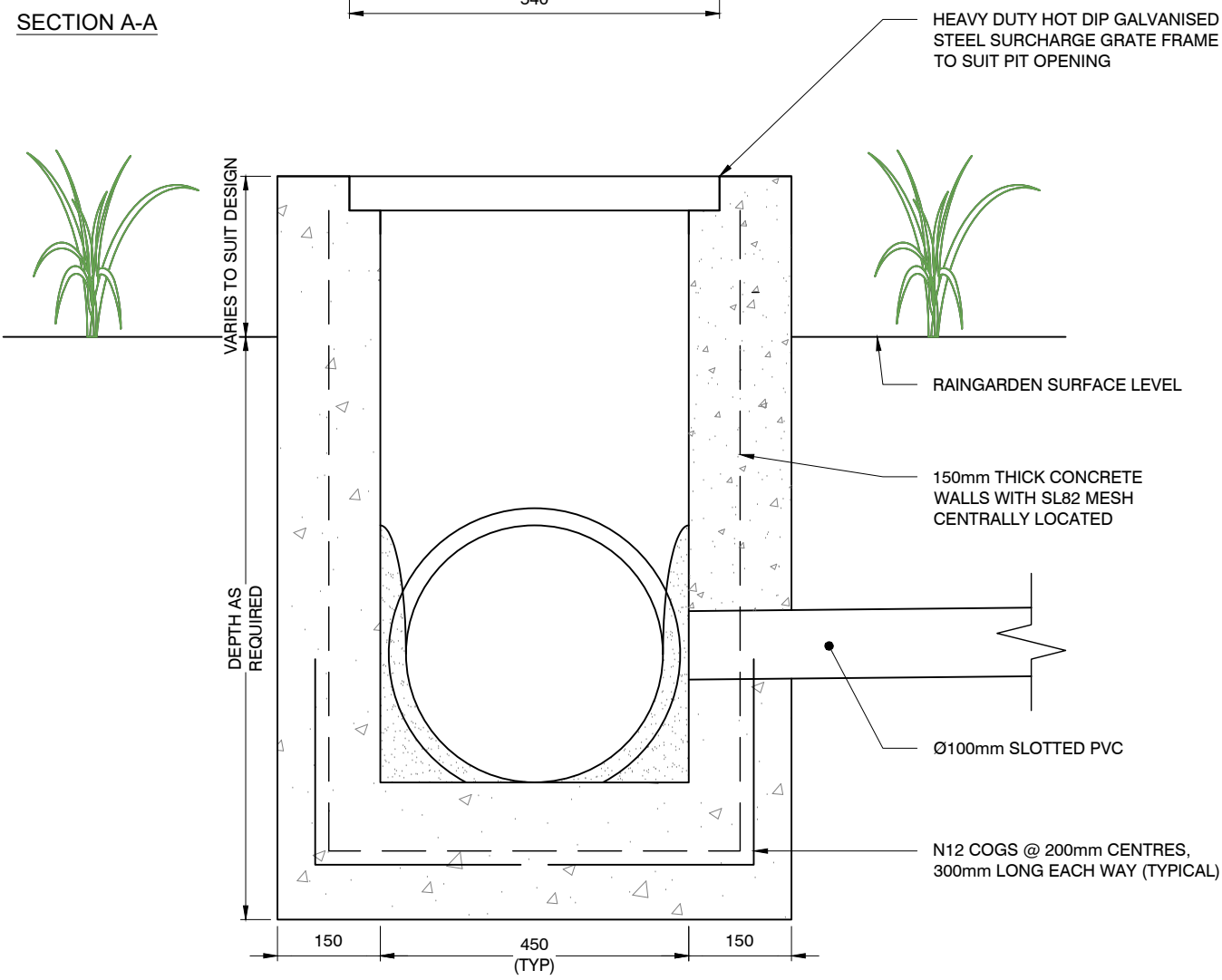
Rev	E
Date	*16.11.22*
Approved	S A

Dwg No. 7.2.6

PLAN



SECTION A-A



SCALE 1:10

NOTES:

1. ALL CONCRETE IS TO HAVE A MINIMUM STRENGTH OF 32 MPa.
2. PIT STRUCTURE TO BE 150mm THICK UNLESS NOTED OTHERWISE.
3. DRAINAGE PIPE TO BE MINIMUM 375Ø CLASS 4 REINFORCED CONCRETE PIPE
4. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

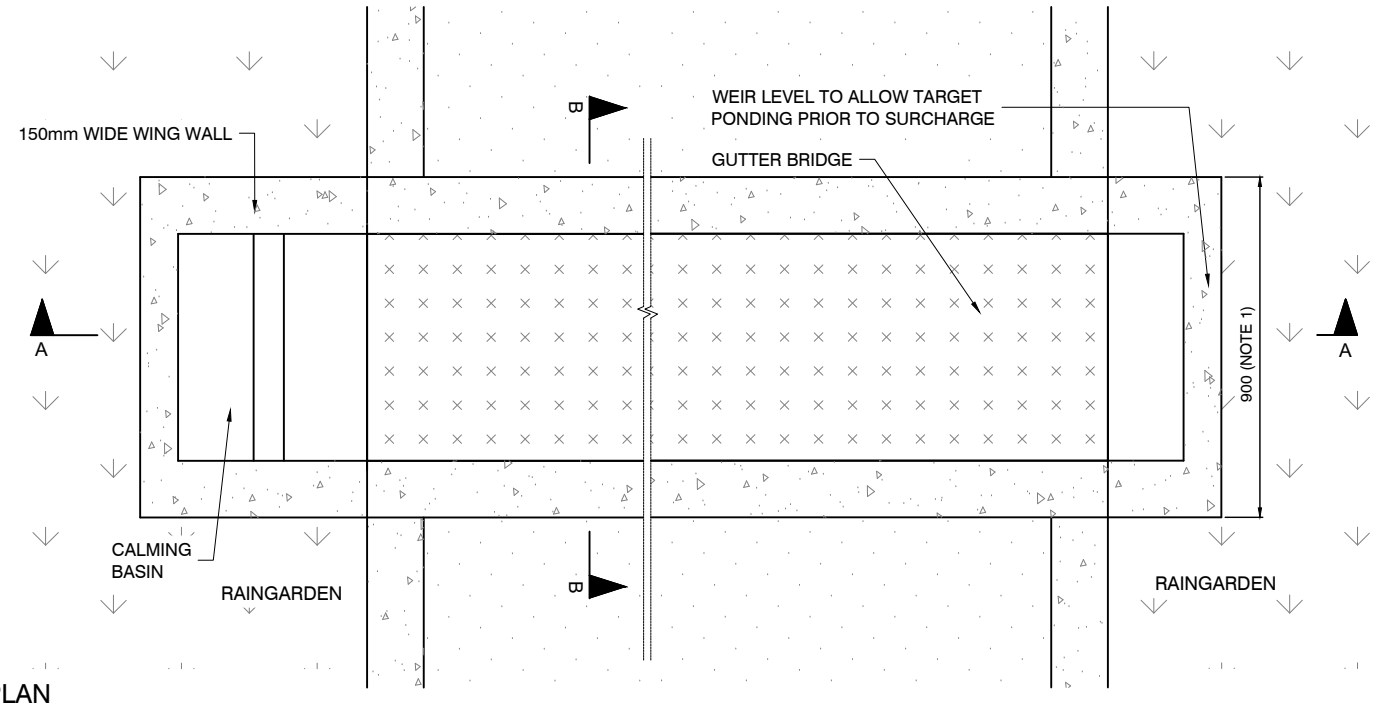
RAINGARDENS

STANDARD SURCHARGE PIT

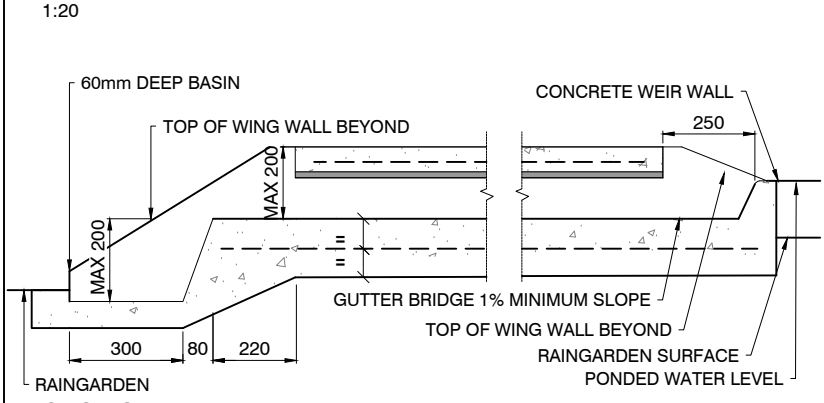
DRAINAGE

Rev	D
Date	*01.12.19*
Approved	P S

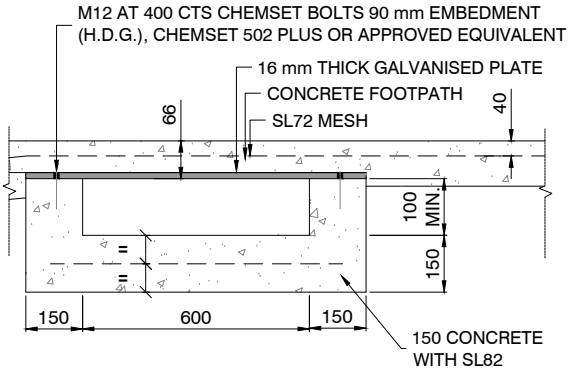
Dwg No. 7.2.7



PLAN
1:20

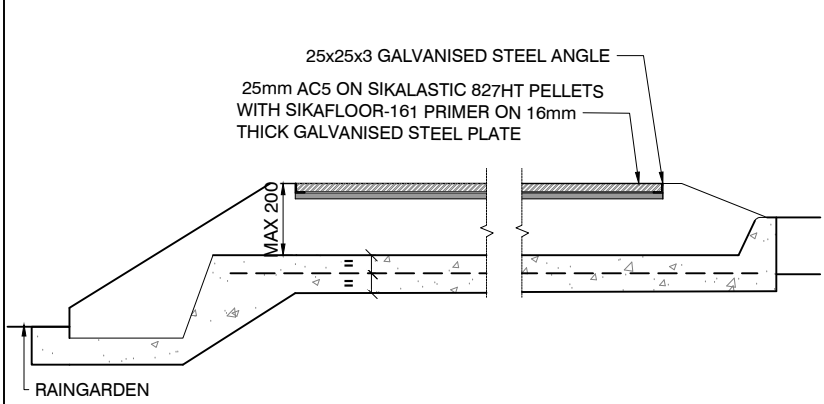


SECTION A-A
1:20

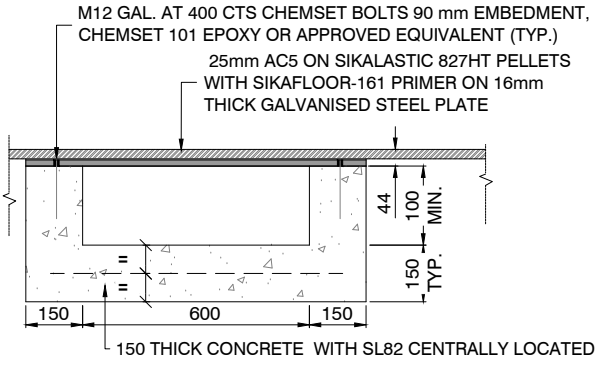


SECTION B-B
1:20

CONCRETE GUTTER BRIDGE



SECTION A-A
1:20



SECTION B-B
1:20

ASPHALT GUTTER BRIDGE

NOTES:

1. GUTTER BRIDGE SHALL BE DESIGNED TO SUIT MINIMUM 5 YEARS ARI STORM. DESIGNER SHALL SUBMIT MAINTENANCE REGIME WITH ANY RAINGARDEN INCORPORATED IN DESIGN.
2. USE OF BONDEK IS NOT ALLOWED FOR GUTTER BRIDGES.
3. SIZE OF GUTTER BRIDGE SHALL BE DESIGNED TO SUIT THE ANTICIPATED FLOW RATES
4. COMPRESSIVE STRENGTH OF CONCRETE AT 28 DAYS TO BE 32MPa.
5. CONCRETE STRUCTURES & REINFORCEMENT TO COMPLY WITH AS 3600, AS 4671 & CoS TECHNICAL SPECIFICATIONS.
6. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

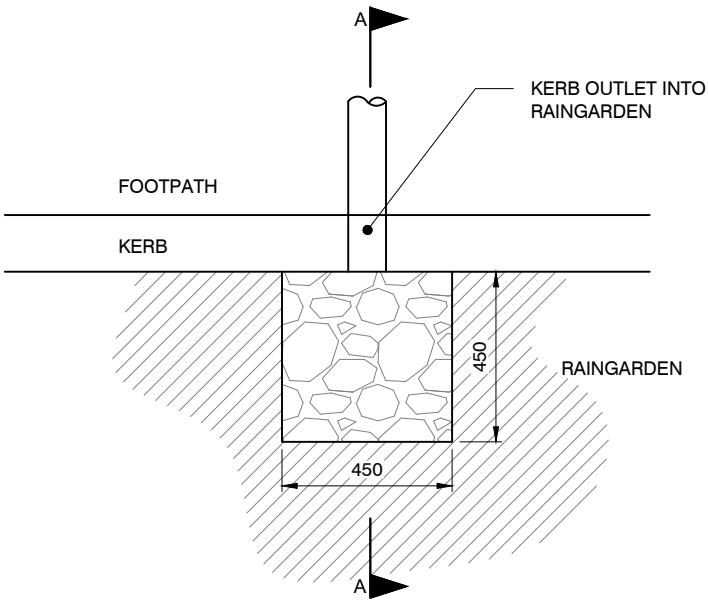
RAINGARDENS
GUTTER BRIDGE DETAILS

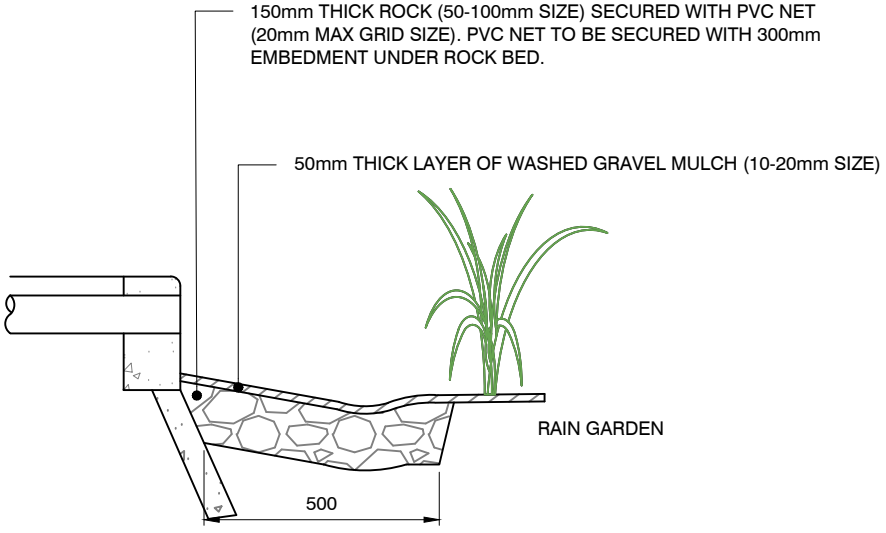
DRAINAGE

Rev	E
Date	*16.11.22*
Approved	S A

Dwg No.
7.2.8

SMALL DISSIPATION ROCKS





SECTION B-B

SCALE 1:20

NOTE: ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

RAINGARDENS
DISSIPATION ROCKS
SMALL KERB OUTLETS

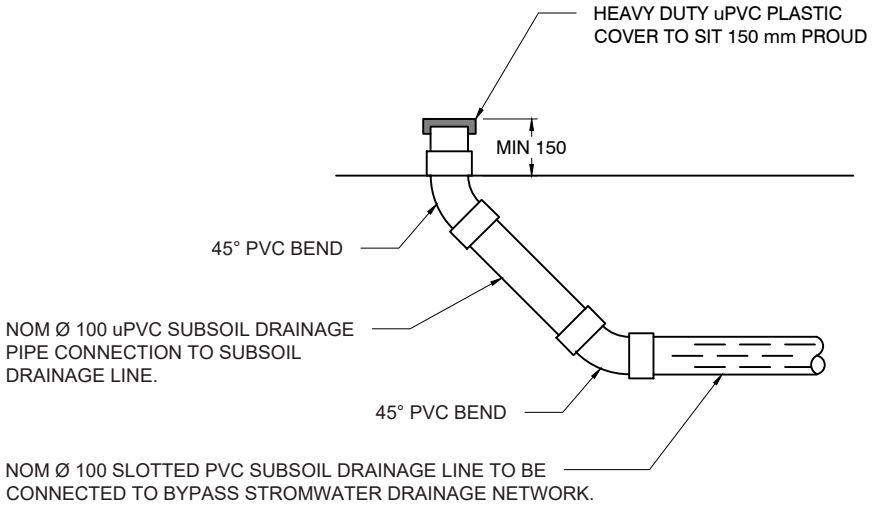
DRAINAGE

Rev	D
Date	*01.12.19*
Approved	P S

Dwg No. 7.2.9

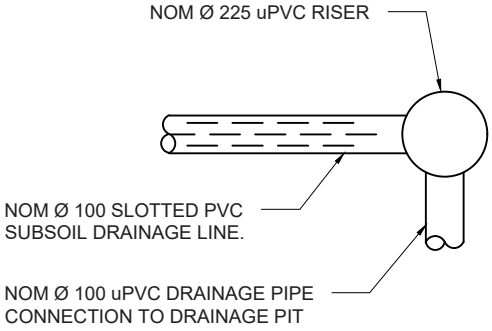
Ø 100 HIGH END RISER

SECTION

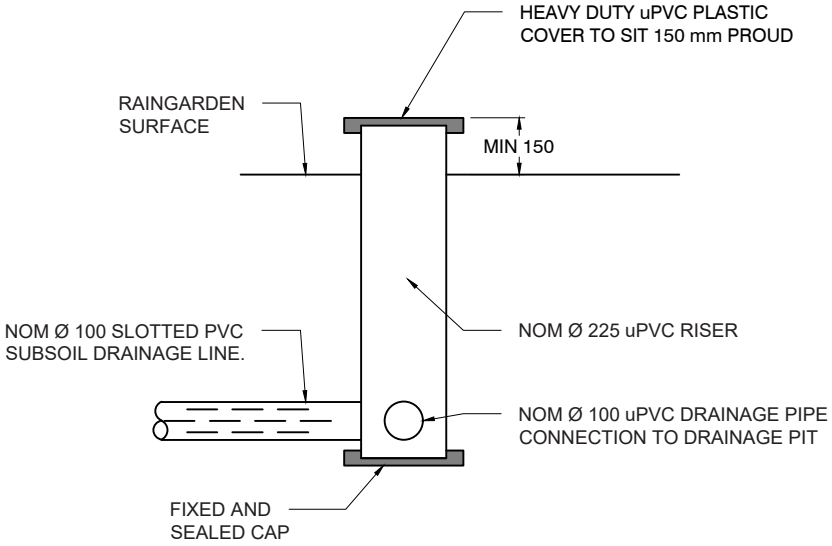


Ø 225 HIGH END RISER JUNCTION

PLAN



SECTION



NOTES:

1. THE SUBSOIL DRAIN SHALL BE CONNECTED TO THE
   - BYPASS CHAMBER OF THE INLET PIT, OR;
   - BYPASS DRAINAGE PIT, OR;
   - RAINGARDEN SURCHARGE PIT.
2. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.

SCALE 1:20

CITY OF SYDNEY

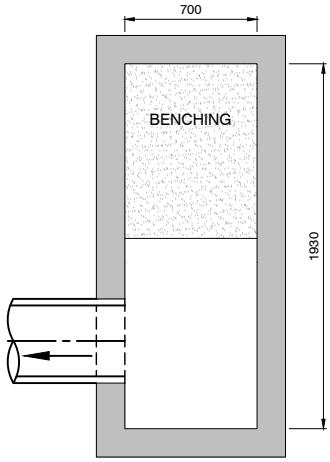
RAINGARDENS

SUBSOIL DRAINS AND HIGH END RISER

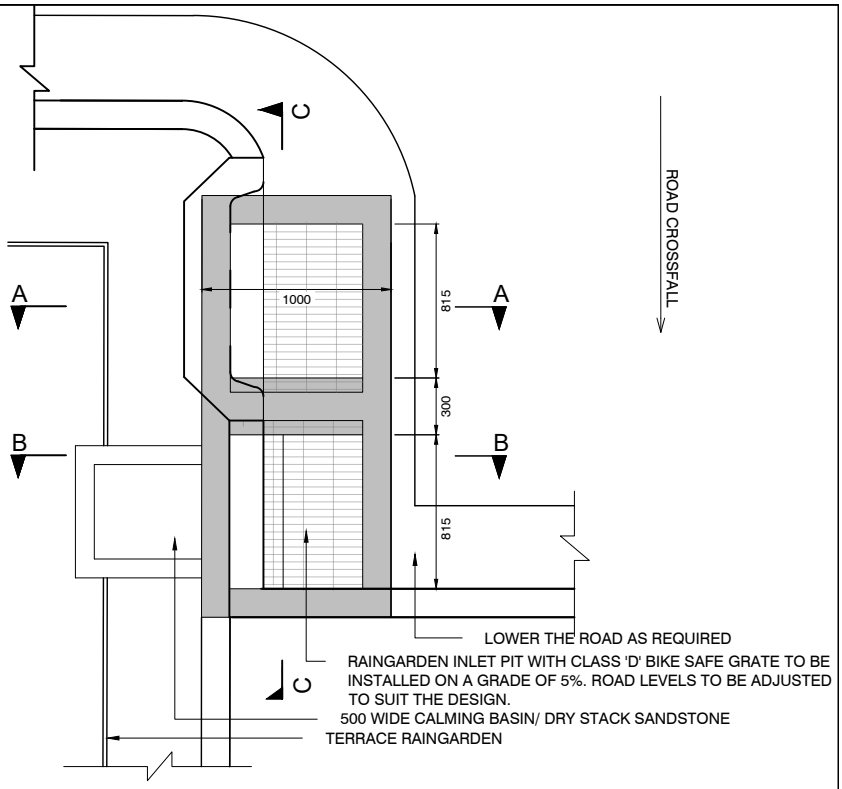
DRAINAGE

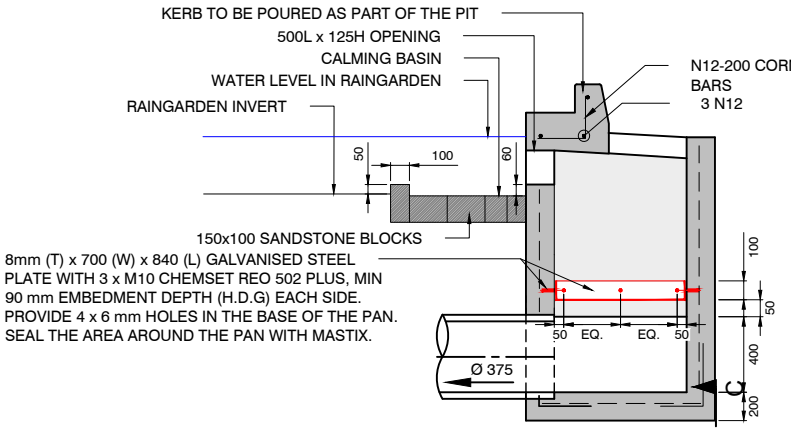
Rev	D
Date	*01.12.19*
Approved	P S

Dwg No. 7.2.10

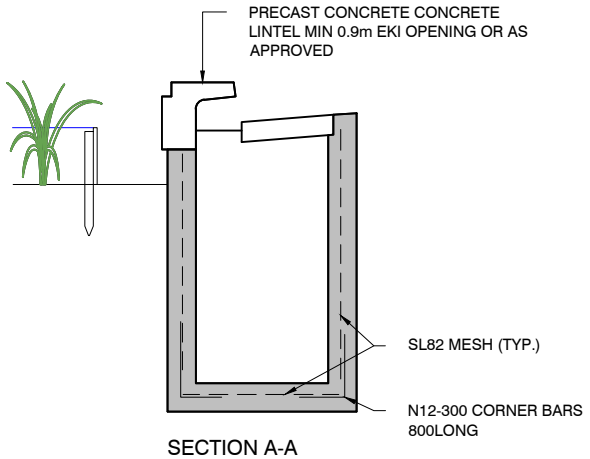


SECTION C1-C1
1:20

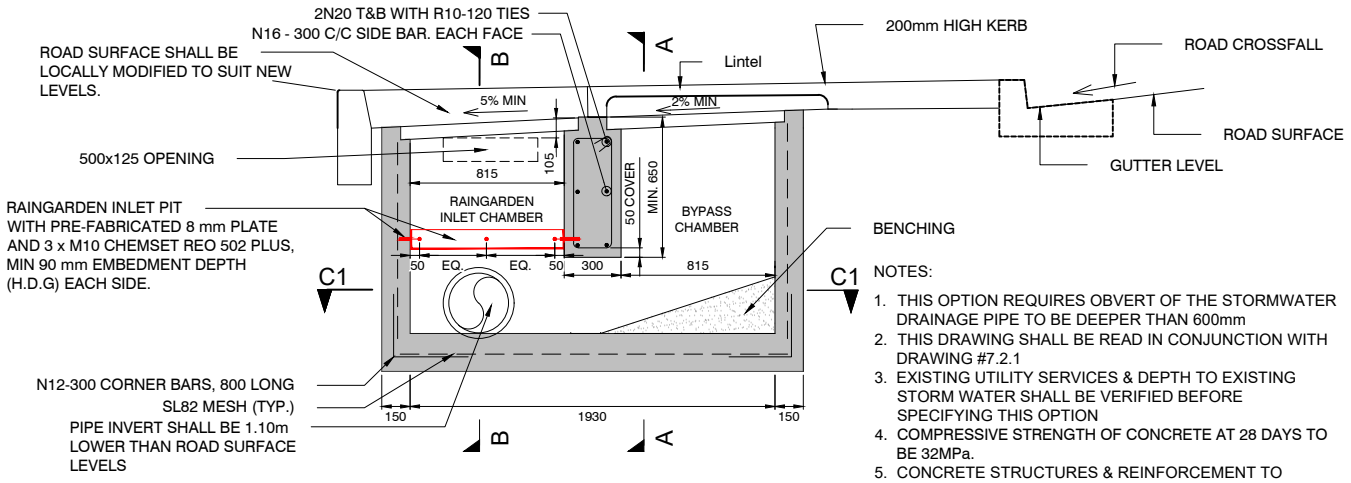




SECTION B-B
1:20



SECTION A-A
1:20



SECTION C-C
1:20

NOTES:

1. THIS OPTION REQUIRES OBVERT OF THE STORMWATER DRAINAGE PIPE TO BE DEEPER THAN 600mm
2. THIS DRAWING SHALL BE READ IN CONJUNCTION WITH DRAWING #7.2.1
3. EXISTING UTILITY SERVICES & DEPTH TO EXISTING STORM WATER SHALL BE VERIFIED BEFORE SPECIFYING THIS OPTION
4. COMPRESSIVE STRENGTH OF CONCRETE AT 28 DAYS TO BE 32MPa.
5. CONCRETE STRUCTURES & REINFORCEMENT TO COMPLY WITH AS 3600, AS 4671 & CoS TECHNICAL SPECIFICATIONS.
6. MINIMUM LAP LENGTH IS TO BE 40 x BAR Ø UNLESS NOTED OTHERWISE.
7. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

SCALE 1:40

CITY OF SYDNEY

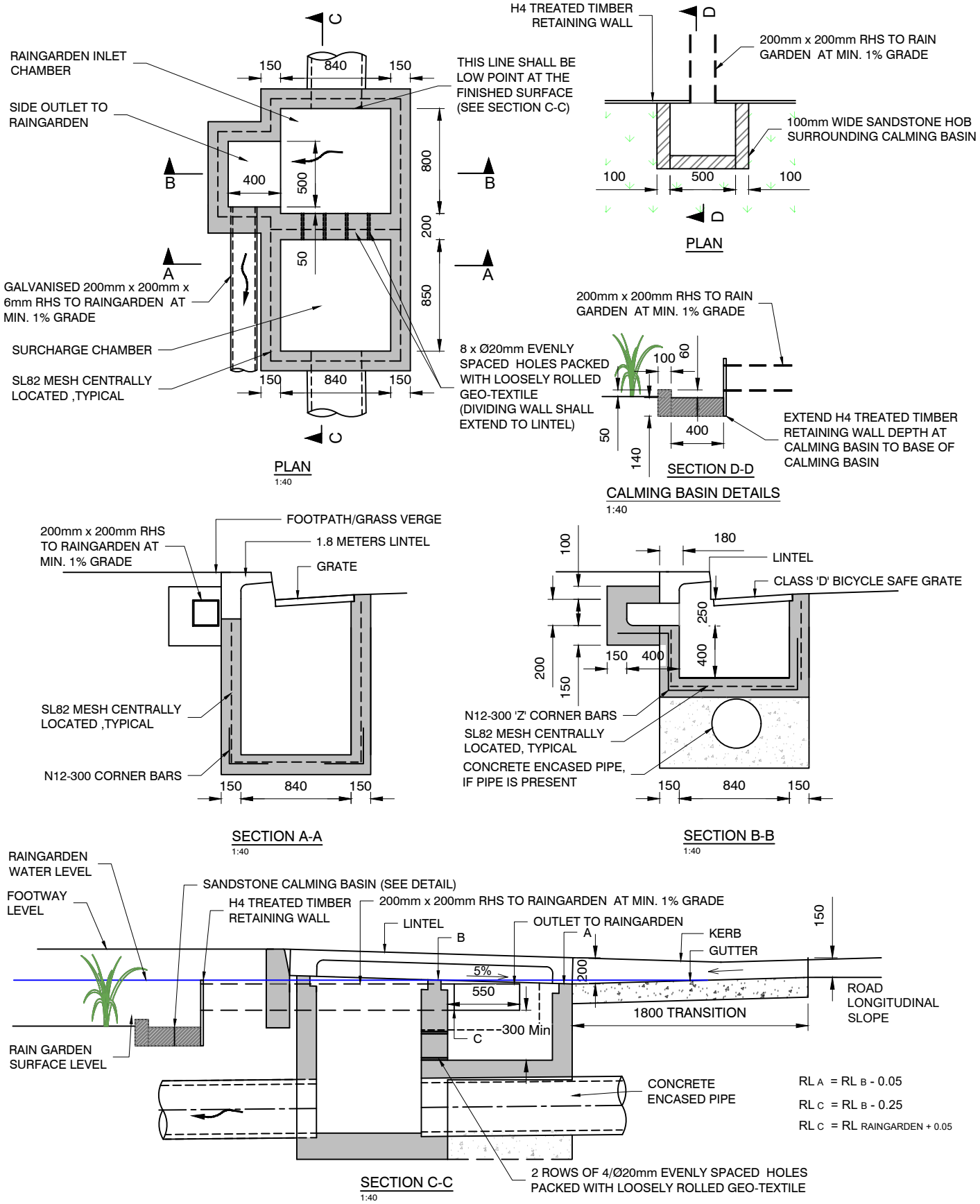
RAINGARDENS

RAINGARDEN INLET PIT WITH STEEL TRAY PIT PERPENDICULAR TO THE ROAD

DRAINAGE

Rev	E
Date	*16.11.22*
Approved	S A

Dwg No. 7.2.11



NOTES:

1. THIS DRAWING SHALL BE READ IN CONJUNCTION WITH DRAWING #7.2.1
2. THIS OPTION REQUIRES OBVERT OF THE STORMWATER DRAINAGE PIPE TO BE DEEPER THAN 700 mm.
3. SIZE OF THE BYPASS SHALL BE ADJUSTED TO SUIT THE CATCHMENT SIZE.
4. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

RAINGARDENS

RAINGARDEN INLET PIT

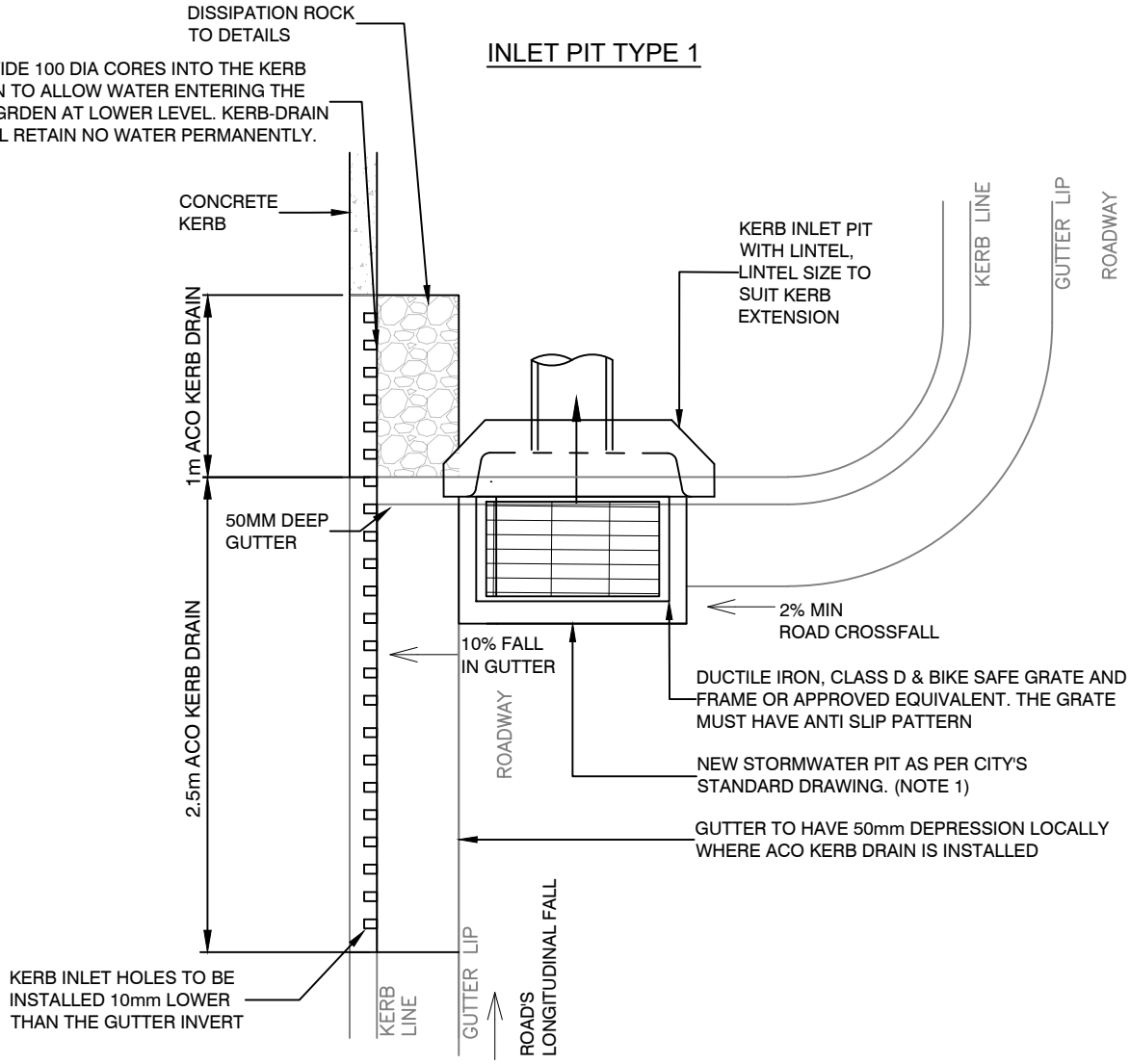
PIT PARALLEL TO THE ROAD

DRAINAGE

Rev	F
Date	*01.07.25*
Approved	S A

Dwg No. 7.2.12

INLET PIT TYPE 1



PLAN
1:40

NOTES:

1. STORMWATER PIT SHALL BE CONSTRUCTED AS PER CITY'S STANDARD DRAWINGS. THE PIT SHALL BE CAREFULLY SELECTED TO SUIT SYDNEY STREET CODE & STANDARD SPEC. FROM DRAWINGS #7.1.1 TO 7.1.6.
2. THE ACO KERB DRAIN OR APPROVED EQUIVALENT SHALL BE USED FOR RANGARDEN ENTRY PIT.
3. THIS DETAIL IS WELL SUITED FOR THE AREAS WHERE
   (i) NO GRASS VERGE EXISTS
   (ii) THE DRAINAGE PIPES ARE SHALLOWER THAN 1.20m.
4. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED.

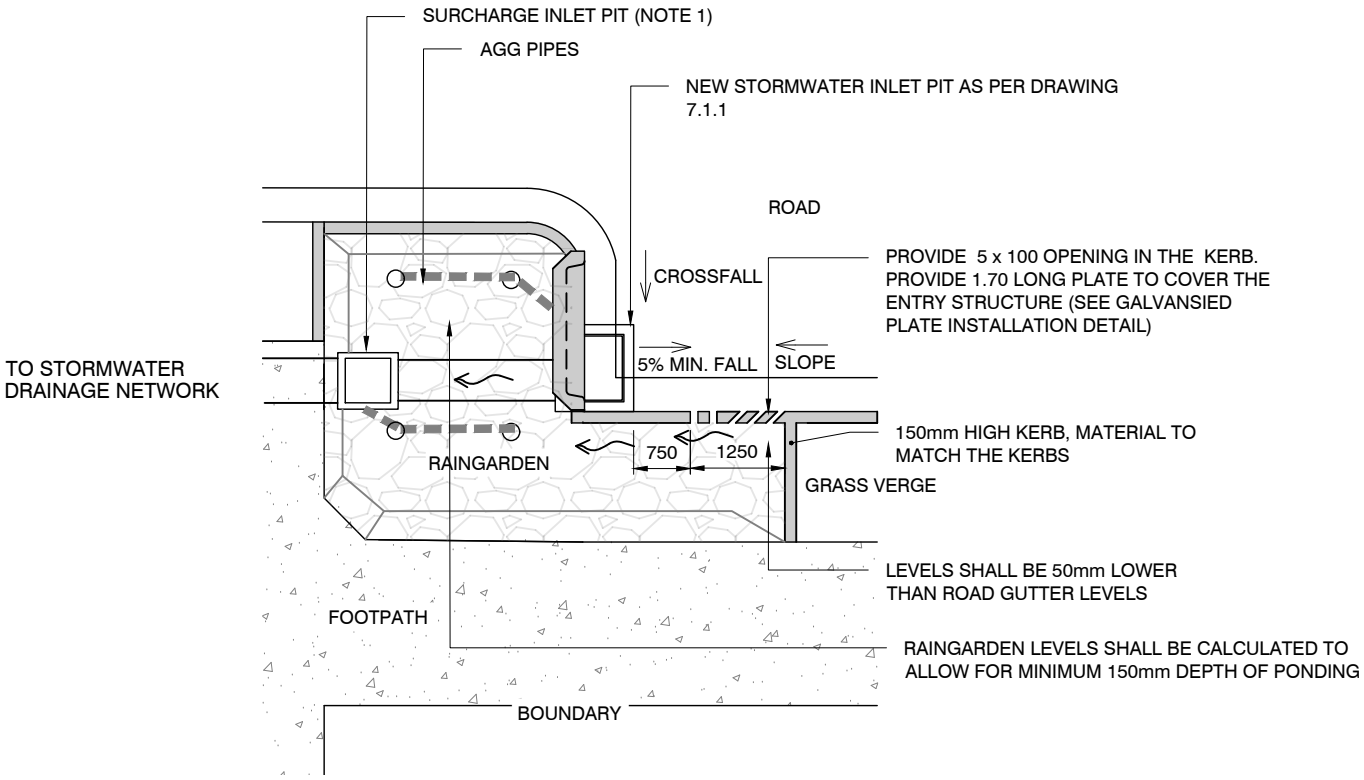
CITY OF SYDNEY

RAINGARDENS
RAINGARDEN WITH KERBDRAIN & STANDARD DRAINAGE PIT AS BYPASS

DRAINAGE

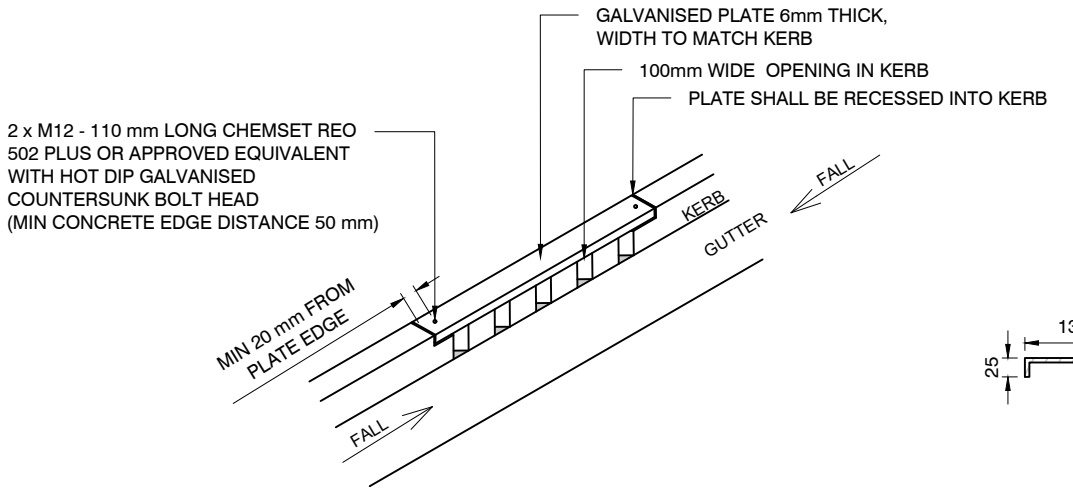
Rev	D
Date	*01.12.19*
Approved	P S

Dwg No. 7.2.13



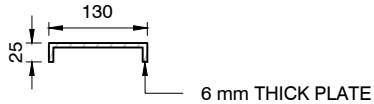
PLAN

1:100



GALVANISED PLATE INSTALLATION DETAIL

1:50



GALVANISED PLATE DETAIL

1:10

NOTES:

1. RAINGARDEN SHALL BE DESIGNED IN ACCORDANCE WITH SYDNEY STREET TECHNICAL SPECIFICATION PART A4.
2. SURCHARGE PIT MAY BE DELETED UPON APPROVAL. REFER SYDNEY STREET TECHNICAL SPECIFICATION PART A4.
3. THIS OPTION BEST SUITS SMALLER CATCHMENTS WHERE:
   (i) FOOTPATH HAS A GRASS VERGE.
   (ii) INVERTS OF THE EXISTING DRAINAGE PIPES ARE SHALLOWER THAN 1.2m.
4. THE DRAINAGE PIT SHALL BE CONSTRUTUED IN ACCORDANCE WITH DRAWINGS #7.1.1 TO #7.1.6.
5. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

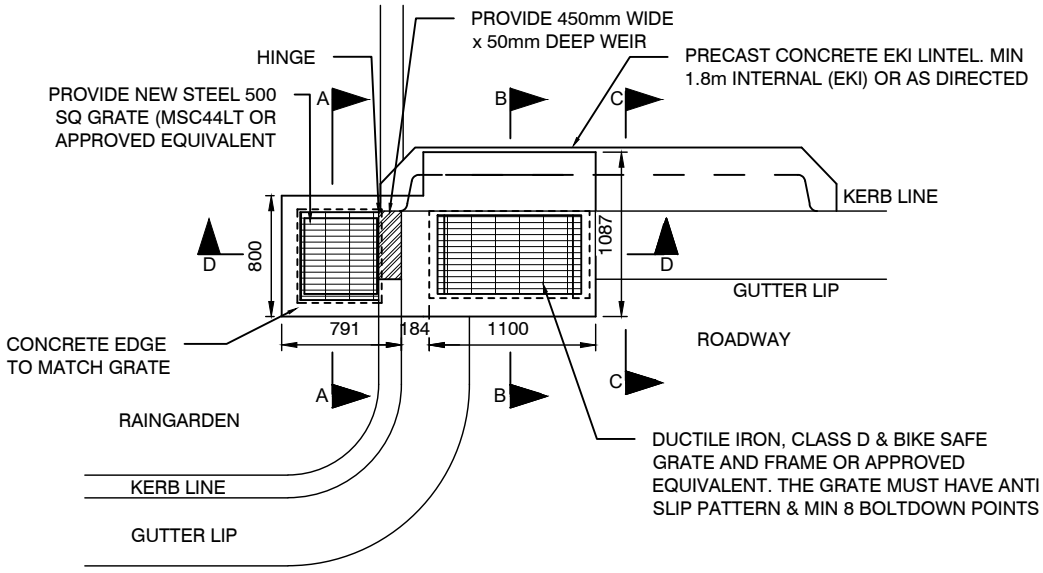
RAINGARDENS
SETOUT PLAN
WITH DIRECT SIDE INLET

DRAINAGE

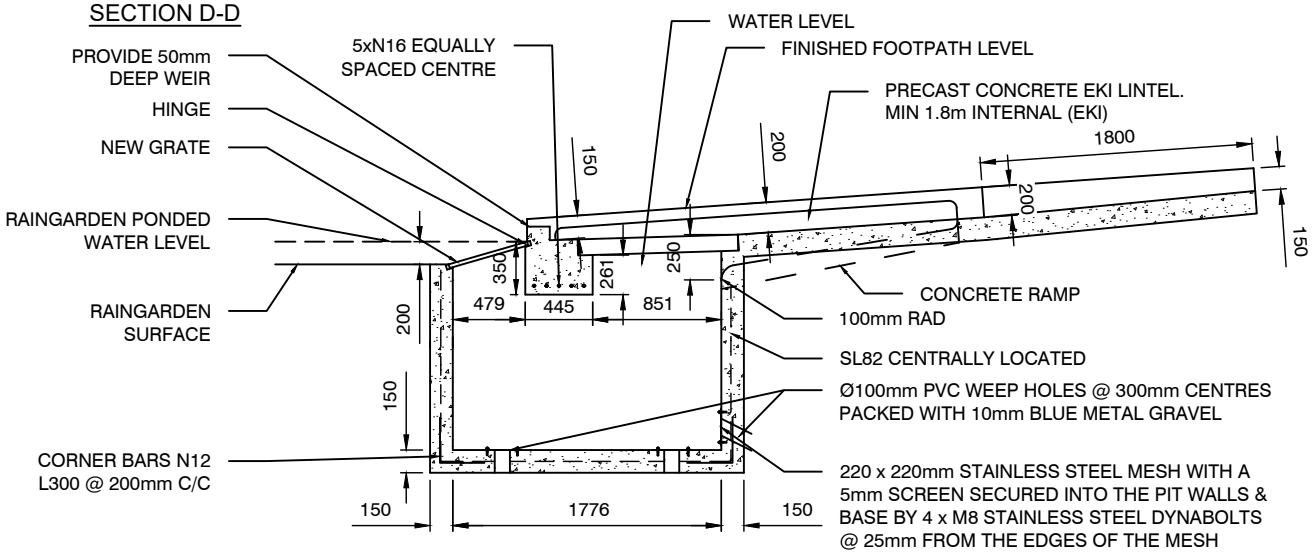
Rev	D
Date	*01.12.19*
Approved	P S

Dwg No. 7.2.14

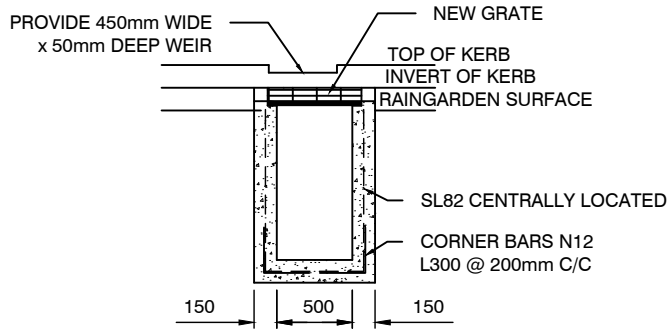
PLAN



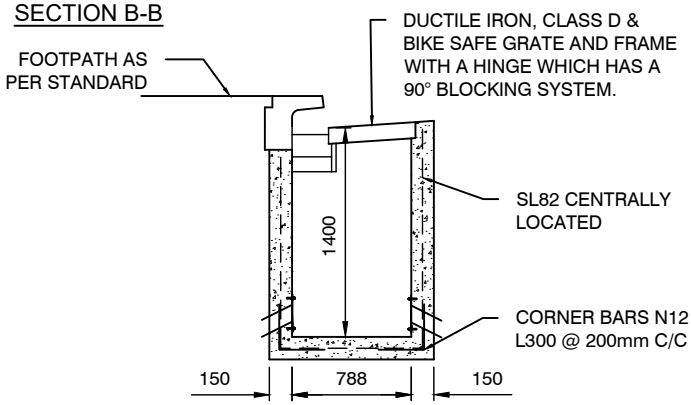
SECTION D-D



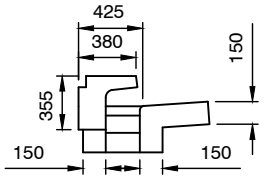
SECTION A-A



SECTION B-B



SECTION C-C



SCALE 1:50

NOTES:

1. COMPRESSIVE STRENGTH OF CONCRETE AT 28 DAYS TO BE 32MPa.
2. 75mm MINIMUM BENCHING TO HALF PIPE HEIGHT TOTAL BENCHING TO OBVERT OF PIPE.
3. Ø100mm SUBSOIL DRAINAGE PIPE 3.0m LONG WRAPPED IN FABRIC SOCK TO BE PROVIDED IN PIPE TRENCHES ADJACENT TO INLET PIPES.
4. PROVIDE STEP IRONS WHERE PIT IS DEEPER THAN 1.0m AT 300mm CENTRES.
5. PITS OVER 1.5m IN DEPTH TO BE REINFORCED WITH SL82 MESH RETURNED 300mm INTO BASE WITH WALLS 200mm THICK.
6. PITS OVER 2.4m IN DEPTH TO BE DESIGNED BY STRUCTURAL ENGINEER.
7. GRATES SHALL BE BICYCLE SAFE AND HAVE MAXIMUM INLET CAPACITY. ALL GRATES MUST BE APPROVED BY THE CITY'S REPRESENTATIVE.
8. ALL CONCRETE IS TO HAVE A MINIMUM STRENGTH OF 32MPa.
9. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

CITY OF SYDNEY

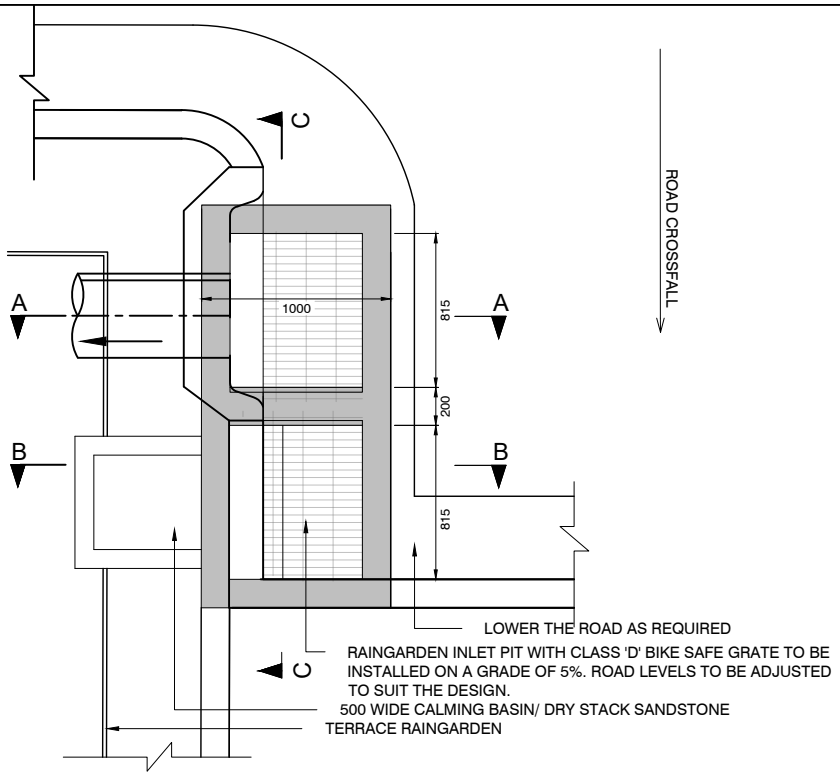
RAINGARDENS

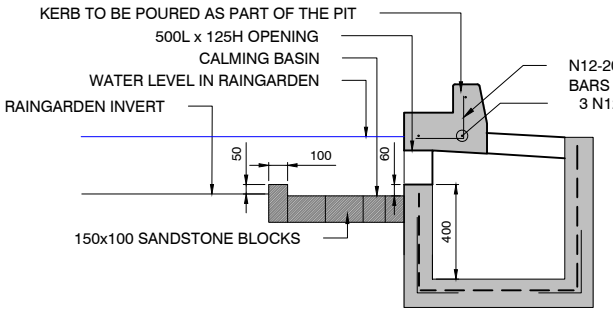
SURCHARGE INLET PIT

DRAINAGE

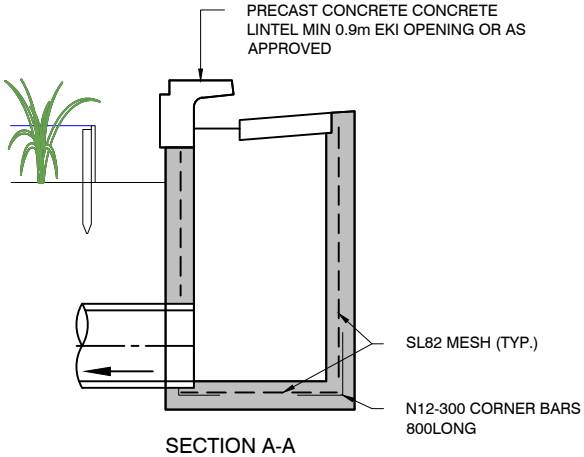
Rev	C
Date	*21.11.13*
Approved	P S

Dwg No. 7.2.16

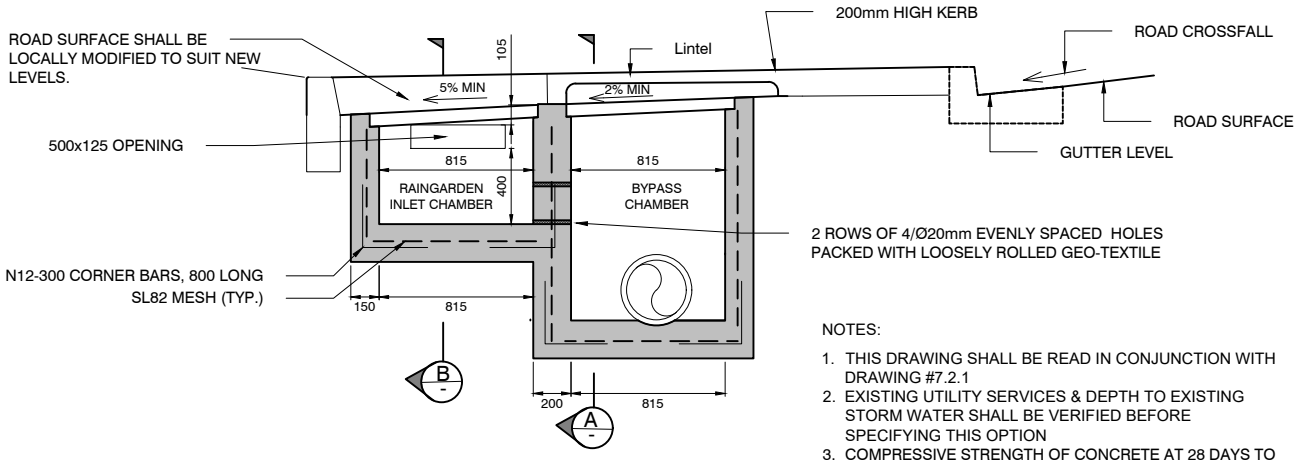




SECTION B-B
1:20



SECTION A-A
1:20



SECTION C-C
1:20

NOTES:

1. THIS DRAWING SHALL BE READ IN CONJUNCTION WITH DRAWING #7.2.1
2. EXISTING UTILITY SERVICES & DEPTH TO EXISTING STORM WATER SHALL BE VERIFIED BEFORE SPECIFYING THIS OPTION
3. COMPRESSIVE STRENGTH OF CONCRETE AT 28 DAYS TO BE 32MPa.
4. CONCRETE STRUCTURES & REINFORCEMENT TO COMPLY WITH AS 3600, AS 4671 & CoS TECHNICAL SPECIFICATIONS.
5. MINIMUM LAP LENGTH IS TO BE 40 x BAR Ø UNLESS NOTED OTHERWISE.
6. ALL DIMENSIONS IN MILLIMETRES UNLESS OTHERWISE STATED

SCALE 1:40

CITY OF SYDNEY

RAINGARDENS

RAINGARDEN INLET PIT

PIT PERPENDICULAR TO THE ROAD

DRAINAGE

Rev	-
Date	01.07.25
Approved	S A

Dwg No. 7.2.17