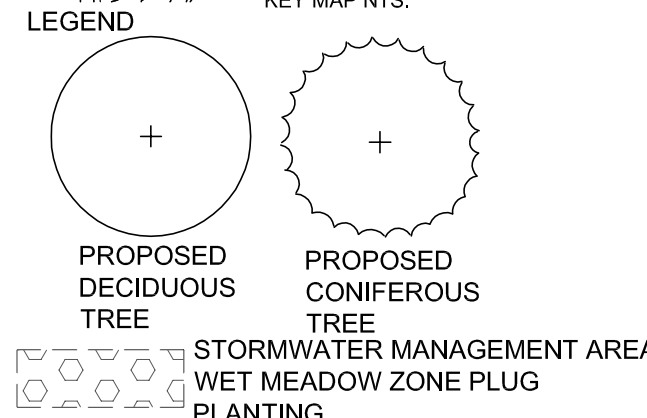
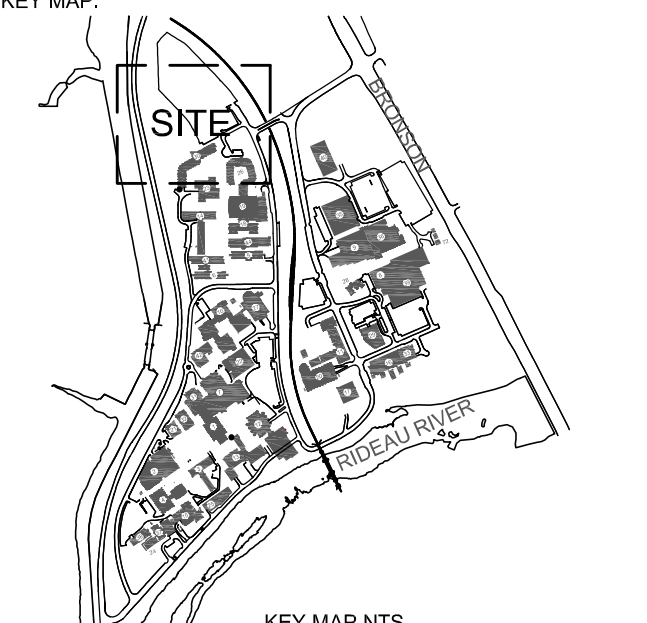
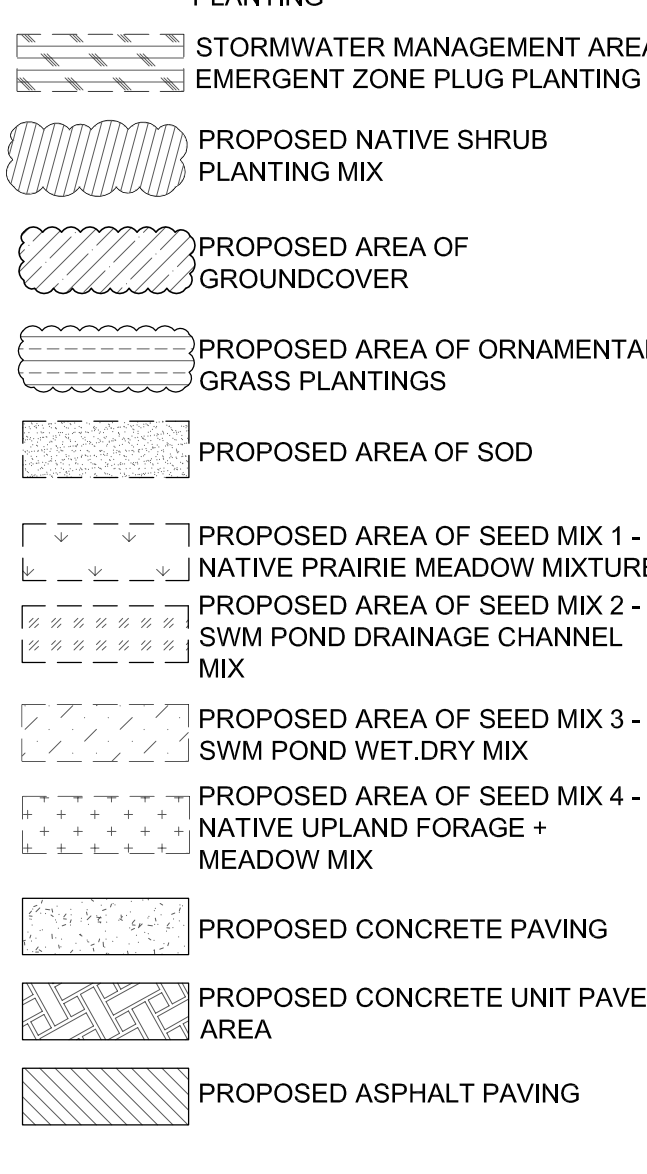
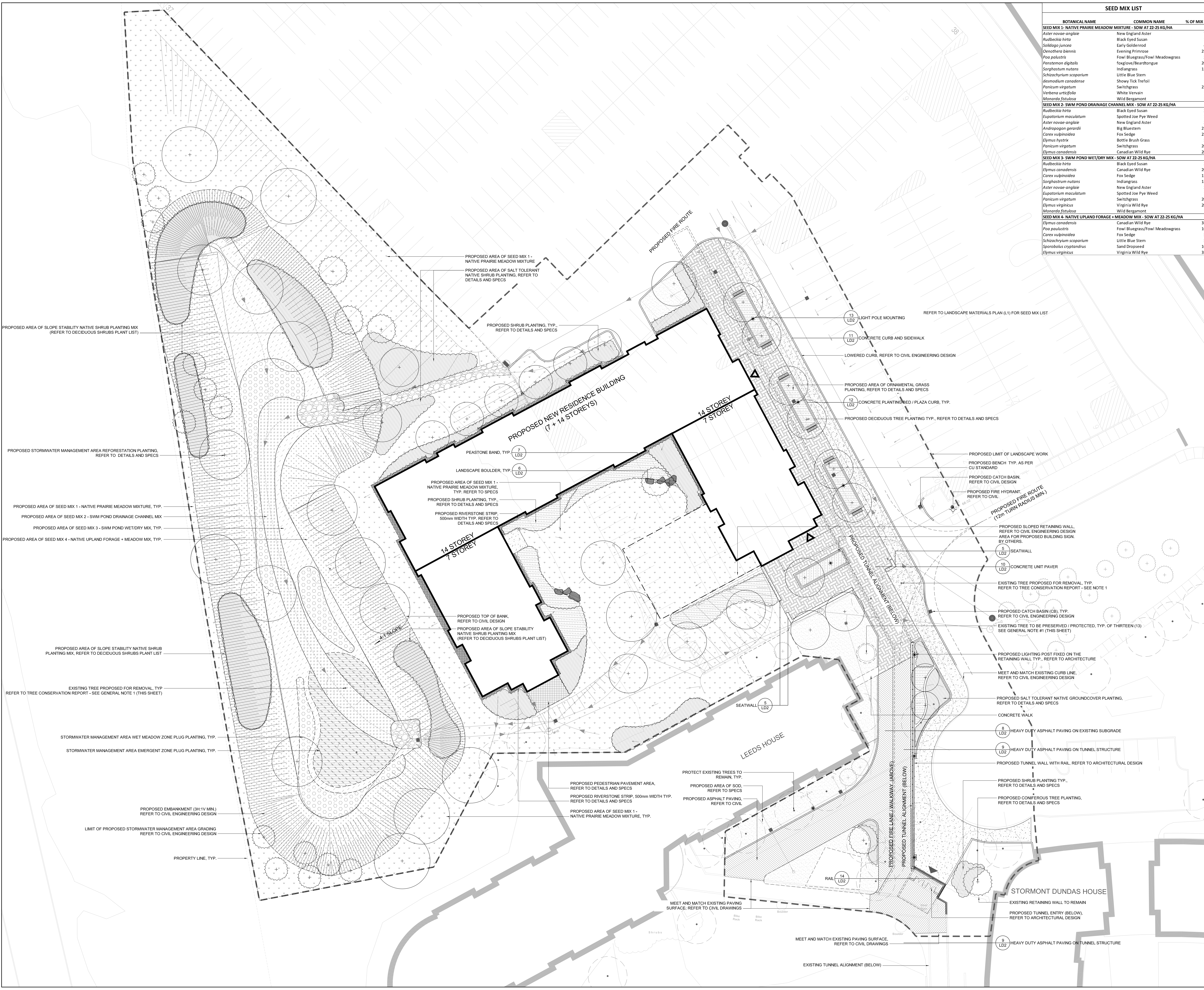


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SEED MIX LIST		
BOTANICAL NAME	COMMON NAME	% OF MIX
SEED MIX 1 - NATIVE PRAIRIE MEADOW MIXTURE - SOW AT 22-25 KG/HA		
<i>Aster novae-angliae</i>	New England Aster	7
<i>Rudbeckia hirta</i>	Black Eyed Susan	1
<i>Solidago juncea</i>	Early Goldenrod	4
<i>Oenothera biennis</i>	Evening Primrose	25
<i>Poa polystris</i>	Fowl Bluegrass/Fowl Meadowgrass	2
<i>Penstemon digitalis</i>	Foxglove/Beardtongue	20
<i>Sorghastrum nutans</i>	Indiangrass	15
<i>Schizachyrium scoparium</i>	Little Blue Stem	1
<i>desmodium canadense</i>	Showy Tick Trefoil	1
<i>Panicum virgatum</i>	Switchgrass	22
<i>Verbena urticifolia</i>	White Vervain	1
<i>Monarda fistulosa</i>	Wild Bergamont	1
SEED MIX 2 - SWM POND DRAINAGE CHANNEL MIX - SOW AT 22-25 KG/HA		
<i>Rudbeckia hirta</i>	Black Eyed Susan	2
<i>Eupatorium maculatum</i>	Spotted Joe Pye Weed	1
<i>Aster novae-angliae</i>	New England Aster	2
<i>Andropogon gerardii</i>	Big Bluestem	25
<i>Carex vulpinoidea</i>	Fox Sedge	25
<i>Elymus hystrix</i>	Bottle Brush Grass	5
<i>Panicum virgatum</i>	Switchgrass	20
<i>Elymus canadensis</i>	Canadian Wild Rye	20
SEED MIX 3 - SWM POND WET/DRY MIX - SOW AT 22-25 KG/HA		
<i>Rudbeckia hirta</i>	Black Eyed Susan	3
<i>Elymus canadensis</i>	Canadian Wild Rye	20
<i>Carex vulpinoidea</i>	Fox Sedge	17
<i>Sorghastrum nutans</i>	Indiangrass	15
<i>Aster novae-angliae</i>	New England Aster	3
<i>Eupatorium maculatum</i>	Spotted Joe Pye Weed	1
<i>Panicum virgatum</i>	Switchgrass	20
<i>Elymus virginicus</i>	Virginia Wild Rye	20
<i>Monarda fistulosa</i>	Wild Bergamont	1
SEED MIX 4 - NATIVE UPLAND FORAGE + MEADOW MIX - SOW AT 22-25 KG/HA		
<i>Elymus canadensis</i>	Canadian Wild Rye	35
<i>Poa polystris</i>	Fowl Bluegrass/Fowl Meadowgrass	10
<i>Carex vulpinoidea</i>	Fox Sedge	5
<i>Schizachyrium scoparium</i>	Little Blue Stem	5
<i>Sporobolus cryptandrus</i>	Sand Dropped	10
<i>Elymus virginicus</i>	Virginia Wild Rye	35



NOTES:

- REFER TO TREE CONSERVATION REPORT, DATED DECEMBER 17, 2014 BY MIM GROUP PREPARED FOR CARLETON UNIVERSITY.
- GRADES SHOWN ARE APPROXIMATE. REFER TO CIVIL ENGINEERING DESIGN.

REVISIONS

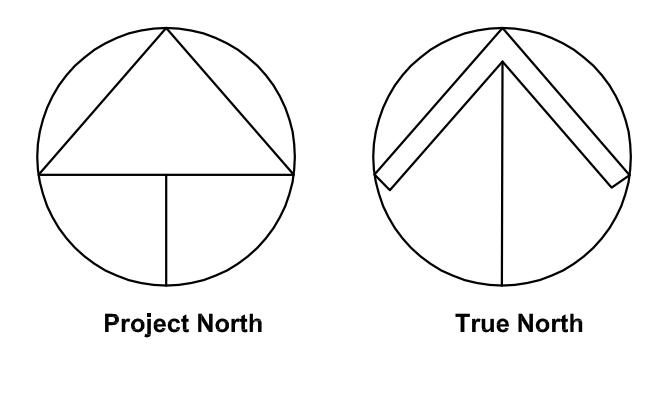
No.	DESCRIPTION	DATE
F	ISSUED FOR 100% REVIEW	03/06/2015 J.L.
E	ISSUED FOR SPA	15/04/2015 J.L.
D	ISSUED FOR SPA REVIEW	06/02/2015 J.L.
C	ISSUED FOR REVIEW	23/12/2014 B.L.
B	PROGRESS	21/11/2014 B.L.
A	PROGRESS	16/11/2014 B.L.

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DATE	BY	APP.
03/06/2015	BL / AB	
03/06/2015		

CHECKED: J.L.
DATE PRINTED: 03/06/2015



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2015-06-04

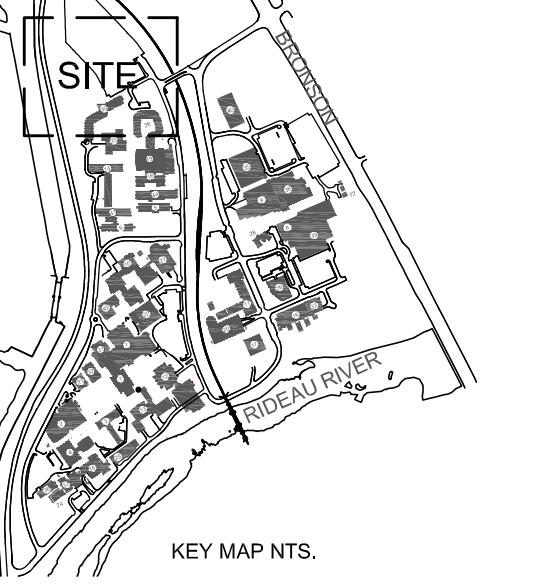
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CARLETON UNIVERSITY
1125 COLONEL BY RD.,
OTTAWA, ON, K1S 5B6

DWG. TITLE: LANDSCAPE MATERIALS PLAN
SCALE: 1:200
PROJ. NO.: 0114
DWG. NO.: L1

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LEGEND

- PROPOSED DECIDUOUS TREE
- PROPOSED CONIFEROUS TREE
- STORMWATER MANAGEMENT AREA WET MEADOW ZONE PLUG PLANTING
- STORMWATER MANAGEMENT AREA EMERGENT ZONE PLUG PLANTING
- PROPOSED NATIVE SHRUB PLANTING MIX
- PROPOSED AREA OF GROUNDCOVER
- PROPOSED AREA OF ORNAMENTAL GRASS PLANTINGS
- PROPOSED AREA OF SOD
- PROPOSED AREA OF SEED MIX 1 - NATIVE PRAIRIE MEADOW MIXTURE
- PROPOSED AREA OF SEED MIX 2 - SHRUB DRAINAGE CHANNEL MIX
- PROPOSED AREA OF SEED MIX 3 - SHRUB POND WET DRY MIX
- PROPOSED AREA OF SEED MIX 4 - NATIVE UPLAND FORAGE MEADOW MIX

NOTES:
1. REFER TO TREE CONSERVATION REPORT, DATED DECEMBER 17, 2014 BY MMM GROUP PREPARED FOR CARLETON UNIVERSITY.

REV	DESCRIPTION	DATE
F	ISSUED FOR 100% REVIEW	03/06/2015 JL
E	ISSUED FOR SPA	15/04/2015 JL
D	ISSUED FOR SPA REVIEW	06/02/2015 JL
C	ISSUED FOR REVIEW	23/12/2014 BL
B	PROGRESS	21/11/2014 BL
A	PROGRESS	18/11/2014 BL

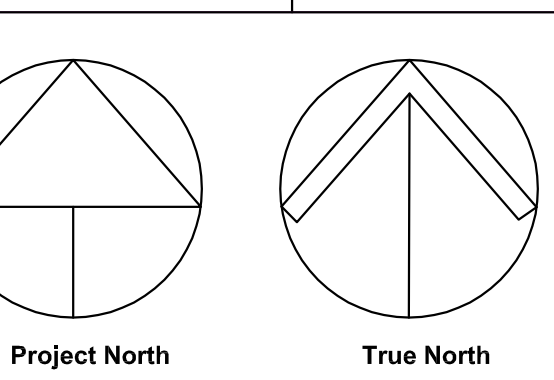
REVISIONS

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DATE	DRAWN	DATE	CHECKED
03/06/2015	BL / AB / JN	03/06/2015	JL / AG



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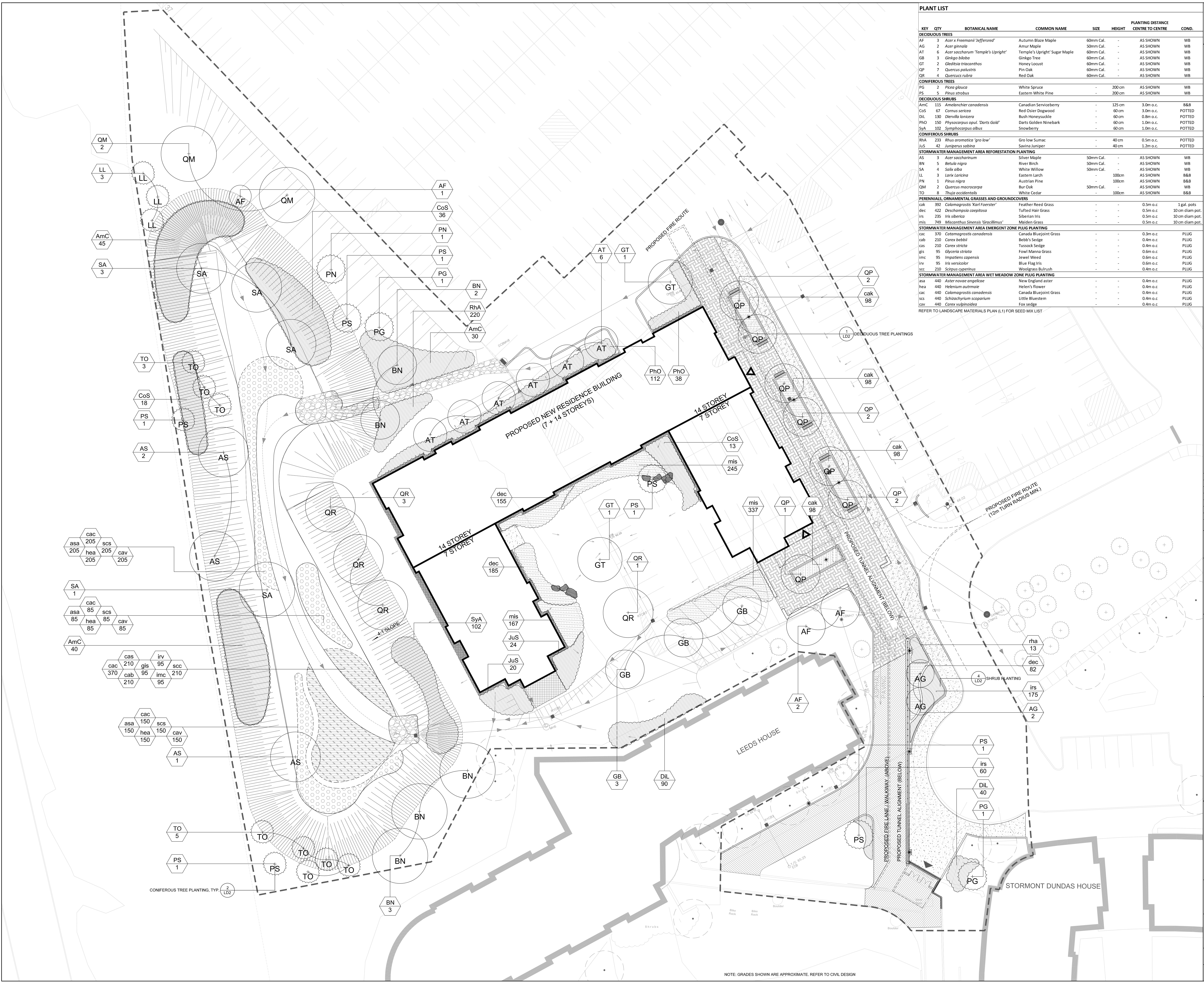
CARLETON UNIVERSITY
1125 COLONEL BY RD.,
OTTAWA, ON, K1S 5B6

DWG. TITLE
LANDSCAPE PLANTING PLAN

SCALE	DWG. NO.
1:200	L3
PROJ. NO.	0114

KEY	QTY	BOTANICAL NAME	COMMON NAME	SIZE	HEIGHT	PLANTING DISTANCE	COND.
DECIDUOUS TREES							
AF	3	<i>Acer x Freemanii 'Jeffers'</i>	Autumn Blaze Maple	60mm Cal.	-	AS SHOWN	WB
AG	2	<i>Acer ginnala</i>	Amur Maple	50mm Cal.	-	AS SHOWN	WB
AT	6	<i>Acer saccharum 'Temple's Upright'</i>	Temple's Upright Sugar Maple	60mm Cal.	-	AS SHOWN	WB
GB	3	<i>Ginkgo biloba</i>	Ginkgo Tree	60mm Cal.	-	AS SHOWN	WB
GT	2	<i>Gleditsia triacanthos</i>	Honey Locust	60mm Cal.	-	AS SHOWN	WB
QP	7	<i>Quercus palustris</i>	Pin Oak	60mm Cal.	-	AS SHOWN	WB
QR	4	<i>Quercus rubra</i>	Red Oak	60mm Cal.	-	AS SHOWN	WB
CONIFEROUS TREES							
PG	2	<i>Picea glauca</i>	White Spruce	-	200 cm	AS SHOWN	WB
PS	5	<i>Pinus strobus</i>	Eastern White Pine	-	200 cm	AS SHOWN	WB
DECIDUOUS SHRUBS							
AmC	115	<i>Amelanchier canadensis</i>	Canadian Serviceberry	-	125 cm	3.0m o.c.	B&B
CoS	67	<i>Cornus sericea</i>	Red Osier Dogwood	-	60 cm	3.0m o.c.	POTTED
DIL	130	<i>Diervilla lonicera</i>	Bush Honeysuckle	-	60 cm	0.8m o.c.	POTTED
PHO	150	<i>Physocarpus opulifolius 'Darts Gold'</i>	Darts Golden Ninebark	-	60 cm	1.0m o.c.	POTTED
SyA	102	<i>Syrphocarpus albus</i>	Snowberry	-	60 cm	1.0m o.c.	POTTED
CONIFEROUS SHRUBS							
RhA	233	<i>Rhus aromatica 'gro low'</i>	Gro low Sumac	-	40 cm	0.5m o.c.	POTTED
JuS	42	<i>Juniperus sabinna</i>	Savina Juniper	-	40 cm	1.2m o.c.	POTTED
STORMWATER MANAGEMENT AREA REFORESTATION PLANTING							
AS	3	<i>Acer saccharinum</i>	Silver Maple	50mm Cal.	-	AS SHOWN	WB
BN	5	<i>Betula nigra</i>	River Birch	50mm Cal.	-	AS SHOWN	WB
SA	4	<i>Salix alba</i>	White Willow	50mm Cal.	-	AS SHOWN	WB
LL	3	<i>Larix laricina</i>	Eastern Larch	-	100cm	AS SHOWN	B&B
PN	1	<i>Pinus nigra</i>	Austrian Pine	-	100cm	AS SHOWN	B&B
QM	2	<i>Quercus macrocarpa</i>	Bur Oak	50mm Cal.	-	AS SHOWN	WB
TO	8	<i>Thuja occidentalis</i>	White Cedar	-	100cm	AS SHOWN	B&B
PERENNIALS, ORNAMENTAL GRASSES AND GROUNDCOVERS							
caK	392	<i>Calamagrostis 'Karl Foerster'</i>	Feather Reed Grass	-	-	0.5m o.c.	1 gal. pots
dec	422	<i>Deschampsia cespitosa</i>	Tufted Hair Grass	-	-	0.5m o.c.	10 cm diam pot
irs	235	<i>Iris sibirica</i>	Siberian Iris	-	-	0.5m o.c.	10 cm diam pot
mis	749	<i>Miscanthus Sinensis 'Gracillimus'</i>	Maiden Grass	-	-	0.5m o.c.	10 cm diam pot
STORMWATER MANAGEMENT AREA EMERGENT ZONE PLUG PLANTING							
cab	210	<i>Carex bebbii</i>	Bebb's Sedge	-	-	0.3m o.c.	PLUG
cas	210	<i>Carex stricta</i>	Tussock Sedge	-	-	0.4m o.c.	PLUG
gis	95	<i>Glyceria striata</i>	Fowl Manna Grass	-	-	0.6m o.c.	PLUG
imc	95	<i>Impatiens capensis</i>	Jewel Weed	-	-	0.6m o.c.	PLUG
irv	95	<i>Iris versicolor</i>	Blue Flag Iris	-	-	0.6m o.c.	PLUG
scc	210	<i>Scirpus cyperinus</i>	Woolgrass Bulrush	-	-	0.4m o.c.	PLUG
STORMWATER MANAGEMENT AREA WET MEADOW ZONE PLUG PLANTING							
asa	440	<i>Aster novae anglicae</i>	New England aster	-	-	0.4m o.c.	PLUG
hea	440	<i>Helianthus autumnalis</i>	Helens Flower	-	-	0.4m o.c.	PLUG
cac	440	<i>Calamagrostis canadensis</i>	Canada Bluejoint Grass	-	-	0.4m o.c.	PLUG
scs	440	<i>Schizachyrium scoparium</i>	Little Bluestem	-	-	0.4m o.c.	PLUG
cav	440	<i>Carex vulpinoidea</i>	Fox sedge	-	-	0.4m o.c.	PLUG

REFER TO LANDSCAPE MATERIALS PLAN (L1) FOR SEED MIX LIST



NOTE: GRADES SHOWN ARE APPROXIMATE. REFER TO CIVIL DESIGN

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GENERAL NOTES:

- REFER TO TREE CONSERVATION REPORT, LATEST VERSION BY MIM GROUP PREPARED FOR CARLETON UNIVERSITY.
- CONTRACTOR TO REMOVE AND DISPOSE OF OFF-SITE AT NO ADDITIONAL COST TO THE CONTRACT ITEMS NOTED FOR REMOVAL INCLUDING BUT NOT LIMITED TO ALL ASPHALT PAVING, CONCRETE CURBS, CONCRETE PAVING, STUMPS, SOIL TOPSOIL, SIGNAGE AND FILL AS REQUIRED TO FACILITATE THE IMPLEMENTATION OF CHANGES AS PER PLANS AND DETAILS. ANY SIGNAGE OR ANY OTHER ITEMS IDENTIFIED BY THE CLIENT TO BE SALVAGED, SHALL BE STORED AT A LOCATION ON-SITE AS IDENTIFIED BY THE CLIENT.
- CONTRACTOR TO MAKE GOOD TO CONTRACT ADMINISTRATOR'S APPROVAL ALL DAMAGES THAT OCCUR DURING CONSTRUCTION.
- CONTRACTOR TO REVIEW DRAWINGS AND REPORT ANY ERRORS, OMISSIONS, AND / OR DISCREPANCIES TO CONTRACT ADMINISTRATOR IN WRITING PRIOR TO CONSTRUCTION. PROPERTY LINES TO BE VERIFIED PRIOR TO INITIATING ANY CONSTRUCTION.
- EXTENT OF WORK SHOWN IS TO CONVEY INTENT ONLY. EXTENT OF CONSTRUCTION IS TO BE VERIFIED ON SITE PRIOR TO CONSTRUCTION. IF THERE IS AMBIGUITY OR LACK OF INFORMATION, THE CONTRACTOR SHALL IMMEDIATELY INFORM THE CONTRACT ADMINISTRATOR. THE CONTRACTOR MAY BE HELD RESPONSIBLE TO REMOVE ANY CHANGES MADE WITHOUT WRITTEN PERMISSION OF THE CONTRACT ADMINISTRATOR.
- CONTRACTOR TO ENSURE PROPER DEPTH OF EXCAVATIONS ACCOMMODATE HARD SURFACE AND LANDSCAPING AS SPECIFIED ON THESE DRAWINGS.
- CONTRACTOR IS RESPONSIBLE FOR ALL FEES ARISING FROM THE COMPLETION OF WORKS CONVEYED BY THESE DRAWINGS AND IN THE SPECIFICATION PACKAGE. FEES INCLUDE BUT ARE NOT LIMITED TO SECURITIES, PERMIT FEES, DEPOSITS, APPLICATION FEES, LETTERS OF CREDIT, OR ANY OTHER RELATED FUNDING REQUIREMENTS.
- THE CONTRACTOR IS RESPONSIBLE FOR LOCATION AND STAKING OF ALL UTILITIES PRIOR TO WORK COMMENCING ON THE SITE. CONTRACTOR SHALL LOCATE PLANT MATERIAL IN ACCORDANCE WITH UTILITY OFFSET REQUIREMENTS.
- CONTRACTOR IS RESPONSIBLE FOR DAMAGE TO ALL UNDERGROUND SERVICES INCLUDING LIGHT STANDARD ELECTRICAL LINES.
- THE CONTRACTOR IS TO TAKE ALL NECESSARY PRECAUTIONS TO PROTECT EXISTING SITE FEATURES UNLESS IDENTIFIED FOR REMOVAL OR DEMOLITION, INCLUDING ALL SURVEY BARS, STAKES AND MONUMENTS. CONTRACTOR IS TO MAKE GOOD ANY DAMAGE.
- SUBSTITUTIONS FROM SPECIFIED PRODUCTS AND MATERIALS MUST BE APPROVED BY THE CONTRACT ADMINISTRATOR PRIOR TO THE ORDERING OF MATERIALS.
- THESE DESIGN DRAWINGS ARE PREPARED SOLELY FOR THE USE BY THE PARTY WITH WHOM THE DESIGN PROFESSIONAL HAS ENTERED INTO A CONTRACT WITH.
- THIS DRAWING FORMS PART OF A SET AND MAY NOT BE SEPARATED. THIS DRAWING MUST BE READ IN CONJUNCTION WITH ALL OTHER DRAWINGS IN THE SET AND ALL SPECIFICATIONS INCLUDED IN THE CONTRACT DOCUMENTS.
- THE CONTRACTOR IS RESPONSIBLE FOR FAMILIARIZING THEMSELVES WITH LIMITS OF CONSTRUCTION PRIOR TO THE COMMENCEMENT OF ANY WORK ON THE SITE. THE CONTRACTOR IS TO CONTACT CONTRACT ADMINISTRATOR IN UNCERTAINTY.
- THE CONTRACTOR SHALL VISIT THE SITE TO CONFIRM SITE CONDITIONS PRIOR TO SUBMITTING BIDS.
- DRAWINGS MAY BE SCALED FOR APPROXIMATE LAYOUT. ALL MEASUREMENTS ARE METRES (METRIC) UNLESS NOTED OTHERWISE. LAYOUT OF PLANT MATERIALS TO BE STAKED BY CONTRACTOR, REVIEWED BY LANDSCAPE ARCHITECT, AND APPROVED BY THE CONTRACT ADMINISTRATOR PRIOR TO PLANTING.
- THE CONTRACTOR SHALL SUPPLY ALL MATERIALS IN QUANTITIES SUFFICIENT TO COMPLETE WORK SHOWN ON THESE DRAWINGS. ANY DISCREPANCIES BETWEEN QUANTITIES ILLUSTRATED ON THE PLAN AND THE PLANT LIST SHALL BE REPORTED TO THE LANDSCAPE ARCHITECT FOR CLARIFICATION.
- THE CONTRACTOR SHALL REMOVE ALL DEBRIS, GARBAGE AND SURPLUS MATERIALS FROM THE SITE AT THE END OF EACH DAY. THE SITE IS TO BE KEPT CLEAN.
- UPON FINAL COMPLETION OF THE PROJECT, ALL WORKMANSHIP AND MATERIALS ARE TO BE GUARANTEED FOR ONE (1) FULL YEAR, UNLESS NOTED OTHERWISE. ALL WORKMANSHIP IS TO BE COMPLETED TO THE STANDARDS OF THE ONTARIO LANDSCAPE CONTRACTORS ASSOCIATION.
- AT THE TIME OF FINAL INSPECTION ALL SEEDED (AND SODDED) AREAS SHALL BE IN A HEALTHY, VIGOROUS GROWING CONDITION, UNIFORMLY ESTABLISHED, FREE OF RUTS, EROSION, BARE AND/OR DEAD SPOTS AND FREE FROM WEEDS IN FULL ACCORDANCE WITH DRAWINGS AND SPECIFICATIONS.

SITE PREPARATION NOTES:

- CONTRACTOR TO ENSURE POSITIVE DRAINAGE OF ALL AREAS WITHIN THE LIMIT OF THE CONTRACT.
- CONTRACTOR TO WORK WITHIN GUIDELINES FOR THE MUNICIPALITY'S NOISE BY-LAWS.
- ANY REFUSE, GARBAGE, OR OTHER DEBRIS ON SITE MUST BE REMOVED AND DISPOSED OF OFF SITE AT THE EXPENSE OF THE CONTRACTOR.
- AREAS TO BE SODDED SHALL BE BACKFILLED WITH NATIVE SOIL TO 150mm BELOW FINISHED GRADE TO ALLOW FOR TOPSOIL INSTALLATION.
- CONTRACTOR TO DETERMINE A SINGLE POINT OF CONSTRUCTION ACCESS AND RESTORE BOULEVARD TO EXISTING OR BETTER CONDITION AFTER THE COMPLETION OF CONSTRUCTION.
- ABSOLUTELY NO STORAGE OF EQUIPMENT OR MATERIALS OUTSIDE OF CONSTRUCTION FENCING.

SEDIMENTATION CONTROL NOTES:

- ALL SILTATION CONTROL FENCING SHALL BE INSTALLED PRIOR TO THE COMMENCEMENT OF EXCAVATION OR GRADING.
- CONTRACTOR SHALL BE RESPONSIBLE FOR MAINTAINING ALL SILTATION CONTROL DEVICES IN GOOD WORKING ORDER AT ALL TIMES. CONTRACTOR SHALL INSPECT SUCH DEVICES DAILY AND AFTER EACH RAINFALL EVENT.
- FOLLOWING COMPLETION OF CONSTRUCTION, COLLECTED SILT SHALL BE DISPOSED OFF-SITE. SILT FENCE SHALL BE REMOVED AND THE AFFECTED AREAS SHALL BE RESTORED IN ACCORDANCE WITH THE APPROVED CONSTRUCTION DRAWINGS.
- ALL ON-SITE STORAGE OF GRANULAR MATERIALS WILL BE ISOLATED AND SECURED WITH SILT FENCING.
- NO IN-WATER WORKS ARE PERMITTED.
- NO VEHICLES OR EQUIPMENT WILL BE REFUELED WITHIN 30 METRES OF A WATERCOURSE.
- NO MATERIAL WILL BE STOCKPILED ON THE WATERCOURSE BANKS.
- THE EROSION AND SEDIMENT CONTROL STRATEGIES OUTLINED ON THE PLANS ARE NOT STATIC AND MAY NEED TO BE UPDATERECOMMENDED AS SITE CONDITIONS CHANGE TO PREVENT SEDIMENT RELEASES TO THE NATURAL ENVIRONMENT. THE CONTRACT ADMINISTRATOR ENFORCEMENT OFFICER SHOULD BE IMMEDIATELY CONTACTED SHOULD THE EROSION AND SEDIMENT CONTROL PLANS CHANGE FROM THE APPROVED PLANS. FAILED EROSION AND SEDIMENTATION CONTROL MEASURES SHOULD BE REPAIRED IMMEDIATELY.

UNDERGROUND SERVICING AND UTILITIES NOTES:

- CONTRACTOR IS RESPONSIBLE FOR LOCATING ALL EXISTING UTILITIES ON THE SITE.
- CONTRACTOR MUST CHECK & VERIFY ALL DIMENSIONS AND CONDITIONS ON THE JOB. REPORTING ALL DISCREPANCIES TO THE CONTRACT ADMINISTRATOR BEFORE PROCEEDING WITH THE WORK.
- CONTRACTOR IS RESPONSIBLE FOR ANY DAMAGE CAUSED TO EXISTING SERVICES WHEN EXCAVATING.

GRADING NOTES:

- CONTRACTOR TO ENSURE POSITIVE DRAINAGE OF ALL AREAS WITHIN THE LIMIT OF THE CONTRACT.
- ENSURE TRANSITION OF EXISTING AND NEW GRAD ELEVATIONS IS SMOOTH.
- MINIMUM PERMITTED HARDSCAPE SLOPE IS 2%; MAXIMUM PERMITTED IS 5%.
- MINIMUM GROUND SLOPE TO BE 2%, MAXIMUM PERMITTED 3%.
- PROPOSED ELEVATIONS ALONG LIMIT OF CONTRACT MUST MATCH EXISTING ELEVATIONS.
- NOTIFY CONTRACT ADMINISTRATOR IMMEDIATELY, IN WRITING, IF ANY DISCREPANCIES WITH STATED REQUIREMENTS ARE DISCOVERED.

LAYOUT NOTES:

- LAYOUT TO BE STAKED BY CONTRACTOR AND APPROVED BY THE CONTRACT ADMINISTRATOR.
- ALL PLANT MATERIAL TO BE INSPECTED BY CONTRACT ADMINISTRATOR PRIOR TO INSTALLATION. ALL PLANT MATERIAL MAY BE REJECTED AT ANY TIME DURING CONSTRUCTION AND WARRANTY PERIOD.
- CONTRACTOR TO REVIEW DRAWINGS AND REPORT ANY ERRORS, OMISSIONS, OR DISCREPANCIES TO THE CONTRACT ADMINISTRATOR IN WRITING.
- PROPERTY LINES TO BE VERIFIED PRIOR TO INITIATING CONSTRUCTION.
- SITE FURNISHINGS TO BE AS SPECIFIED UNLESS SUBSTITUTION IS APPROVED IN WRITING BY CONTRACT ADMINISTRATOR.
- NOTIFY CONTRACT ADMINISTRATOR IMMEDIATELY, IN WRITING, IF ANY DISCREPANCIES WITH STATED REQUIREMENTS ARE DISCOVERED.

DEFINITIONS:

- CU - CARLETON UNIVERSITY
- CB - CATCH BASIN
- SPECS - SPECIFICATIONS

CONCRETE NOTES:

- ALL CONCRETE WORK SHALL CONFORM TO CSA STANDARDS A23.1, A23.2, & A23.3.
- CONFORM TO THE REQUIREMENTS OF CANCSA C30.18 SERIES OF REINFORCING STEEL. REINFORCING BARS SHALL BE DEFORMED HOOKED HARD GRADE WITH MINIMUM YIELD STRENGTH OF FY = 400MPa. ALL REINFORCING STEEL SHALL BE EPOXY COATED.
- CONFORM TO THE CONCRETE COVER REQUIREMENTS OF CSA A23.1 AND THE FOLLOWING, UNLESS OTHERWISE NOTED:
 - CONCRETE CAST AGAINST EARTH: 100mm (4")
 - PIERS AND WALL: 100mm (4")
 - EXPOSED TO DE-ICING CHEMICALS: 100mm (4")
- WELDING OF REINFORCING STEEL SHALL NOT BE PERMITTED UNLESS SPECIFICALLY NOTED ON THE DRAWINGS.
- ALL REINFORCING STEEL FABRICATION AND PLACEMENT DRAWINGS SHALL BE SUBMITTED TO THE ENGINEER FOR REVIEW PRIOR TO FABRICATION.
- CONCRETE PROPERTIES:
 - EXPOSED CONCRETE TO BE CLASS C-2 CONCRETE (28 DAY COMPRESSIVE STRENGTH OF 32MPa) WITH AIR ENTRAINMENT.
 - FOUNDATION WALLS AND CONCRETE EXPOSED TO FREEZE THAW SHALL BE CLASS F-2, HAVE A 28 DAY COMPRESSIVE STRENGTH OF 28 MPa, 0.56 WATER-CEMENT RATIO WITH AIR ENTRAINMENT.
 - CONCRETE MIX DESIGN SHALL BE SUBMITTED TO THE ENGINEER FOR APPROVAL PRIOR TO USE AT JOB SITE.
- ALL CONCRETE FORMS TO BE WET THOROUGHLY BEFORE POURING CONCRETE.
- DO NOT ADD WATER TO CONCRETE UNLESS WRITTEN APPROVAL GIVEN BY THE ENGINEER. IF HIGHER SLUMP CONCRETE IS DESIRED, CONCRETE SUPPLIER SHALL DESIGN AND SUPPLY ACCORDINGLY.
- SLUMP OF CONCRETE TO BE 75mm +/- 25mm (3" +/- 1") OR AS OTHERWISE SPECIFIED. CONCRETE WITH 110mm (4.3") SLUMP OR MORE IS TO BE REJECTED.
- WATER CURING OF CONCRETE IS RECOMMENDED. CURE ALL CONCRETE IN ACCORDANCE WITH CSA A23.1 SECTION 7.4
- ALL OIL, GREASE, MUD AND DEBRIS SHALL BE ENTIRELY REMOVED FROM THE REINFORCING STEEL AND ANCHOR BOLTS PRIOR TO THE PLACEMENT OF THE CONCRETE. REBAR REBAR SHALL BE STORED ON-SITE IN A MANNER TO BE KEPT CLEAN AND FREE FROM DELETERIOUS MATERIALS.
- REINFORCING BARS, DOWELS AND ANCHOR BOLTS SHALL BE SECURELY TIED IN PLACE SO AS TO MAINTAIN THEIR EXACT POSITION BEFORE AND DURING PLACEMENT OF THE CONCRETE. BAR SUPPORTS SHALL ONLY BE MADE OF PRECAST CONCRETE BLOCKS, PLASTIC OR WIRE.
- ALL CONCRETE EXCEPT SLABS ON GRADE 125mm THICK OR LESS SHALL BE MECHANICALLY VIBRATED SO AS TO COMPLETELY FILL THE FORM WITHOUT CAUSING UNDESIRABLE SEGREGATION. ANY DEFECTS IN THE HARDENED CONCRETE SHALL BE SATISFACTORY REPAIRED OR SHALL BE REPLACED.

SODDING NOTES:

- ALL SOD SHALL BE GUARANTEED FOR 3 MONTHS FROM DATE OF SUBSTANTIAL PERFORMANCE.
- SODDING SHALL CONFORM TO LANDSCAPE ONTARIO'S 'GENERAL LANDSCAPE SPECIFICATIONS'.
- TOPSOIL SHALL BE EVENLY SPREAD OVER SUB-GRADE AND LOOSELY COMPACTED TO 150mm MINIMUM DEPTH.
- ALL STONES AND DEBRIS SHALL BE REMOVED.
- TOPSOIL SHALL BE SUPPLEMENTED WITH A 10-4-4 FERTILIZER AND 20% SUPERPHOSPHATE APPLIED AT A RATE OF 5 KILOS PER 100 SQUARE METRES EACH, PRIOR TO PLACEMENT OF SOD.
- SOD SHALL BE PLACED WITH STAGGERED BUTT JOINTS, WATERED THOROUGHLY, AND ROLLED WHEN DRY.
- LAY SOD SECTIONS PERPENDICULAR ON SLOPES GREATER THAN 3:1 AND SECURE WITH WOODEN PEGS. WOODEN PEGS TO BE 17 X 17 X 300mm. PLACE PEGS 3 PER SQUARE METRE, 100mm BELOW TOP EDGE TO PREVENT SHIFTING OF SOD AND DRIVE PEGS FLUSH WITH TOP OF SOD SOIL. PROVIDE A MINIMUM OF 2 STAKES PER ROLL OF SOD.
- MAINTAIN SODDED AREA FROM THE TIME OF INSTALLATION UNTIL THIRTY (30) CALENDAR DAYS AFTER ALL SODDED AREAS HAVE BEEN INSPECTED BY THE CONTRACT ADMINISTRATOR AND A CERTIFICATE OF COMPLETION IS ISSUED. MINIMUM OF TWO CUTS.
- MAINTENANCE SHALL INCLUDE ALL NECESSARY MEASURES TO ESTABLISH AND MAINTAIN GRASS IN A HEALTHY, VIGOROUS GROWING CONDITION.
- MAINTENANCE SHALL INCLUDE, BUT NOT BE LIMITED TO THE FOLLOWING WORK:
 - MOVING AT REGULAR INTERVALS TO MAINTAIN A MAXIMUM HEIGHT OF 60MM. DO NOT CUT MORE THAN 1/3 OF THE GRASS HEIGHT AT ANY ONE MOWING. TRIM AND CLIP EDGES. REMOVE CLIPPINGS AFTER MOWING AND TRIMMING.
 - WATERING WHEN REQUIRED IN SUFFICIENT QUANTITIES AND AT A FREQUENCY TO PREVENT SOD FROM DRYING OUT AND TO MAINTAIN SOIL UNDER SOD CONTINUOUSLY MOIST TO A DEPTH OF 75 TO 100MM.
 - FERTILIZE SODDED AREAS ONE MONTH AFTER SODDING WITH 2:1:1 RATIO FERTILIZER. SPREAD EVENLY AT A RATE AS PER MANUFACTURER'S INSTRUCTIONS AND WATER IN WELL WITH A MINIMUM OF 50MM INFILTRATION AS PREVIOUSLY MENTIONED.

ENVIRONMENTAL NOTES:

- THERE SHALL BE NO WORKS PERMITTED BEYOND THE LIMIT OF CONSTRUCTION BOUNDARY UNDER ANY CIRCUMSTANCES (SEE ENGINEERING DRAWINGS FOR EXTENT OF DISTURBANCE AND CONSTRUCTION LIMIT).
- THE CONTRACTOR SHALL ENSURE THAT ALL REASONABLE MEASURES ARE TAKEN TO LIMIT GROUND DISTURBANCE CAUSED BY HEAVY EQUIPMENT USAGE, AND THAT EROSION AND SEDIMENT CONTROL SHALL BE INSTITUTED ON DISTURBED AREAS. NO SUBSURFACE GROUND-DISTURBING EQUIPMENT SHALL BE USED BY CONSTRUCTION FORCES EXCEPT ON ACCESS ROADS.
- ALL DISTURBED AREAS WILL BE STABILIZED AND RESTORED UPON COMPLETION OF WORKS TO THE SATISFACTION OF THE CONTRACT ADMINISTRATOR. ALL DISTURBED AREAS SHALL BE FINE GRADED AND SEEDED PROMPTLY AFTER DISTURBANCE.
- ALL CONSTRUCTION ACTIVITIES WITHIN THE LIMIT OF CONSTRUCTION SHALL BE EXECUTED IN SUCH A MANNER SO AS TO PREVENT THE ENTRY OF CHEMICALS, PETROLEUM PRODUCTS, DEBRIS, RUBBLE, CONCRETE OR OTHER DELETERIOUS SUBSTANCES INTO LANDSCAPE AREAS.
- THE CONTRACTOR WILL BE RESPONSIBLE FOR DAILY INSPECTION, CLEANUP, AND PROPER LABELING, STORAGE, AND DISPOSAL OF ALL REFUSE AND DEBRIS PRODUCED BY OPERATIONS AND EMPLOYEES. SUITABLE REFUSE COLLECTING FACILITIES WILL BE REQUIRED. ONLY THOSE DISPOSAL AREAS DESIGNATED BY THE OWNER/ CONTRACT ADMINISTRATOR SHALL BE USED. DISPOSAL CONTAINERS SUCH AS DUMPSTERS OR ROLL-OFF CONTAINERS SHALL BE OBTAINED FROM A PROPER WASTE DISPOSAL CONTRACTOR.
- SOLID, SPECIAL, CONSTRUCTION/DEMOLITION, AS WELL AS SCRAPS ARE PART OF POTENTIAL REFUSE GENERATED AND SHALL BE PROPERLY MANAGED WITH EMPHASIS ON REUSE, RECYCLE, OR POSSIBLE GIVE AWAY, AS APPROPRIATE, BEFORE THEY ARE HANDLED AS WASTE.
- CONTRACTOR SHALL ENSURE THAT ALL EQUIPMENT IN OPERATION ON THE SITE IS IN GOOD WORKING CONDITION, AND SHALL MAINTAIN AND OPERATE EQUIPMENT TO LIMIT VEHICLE EXHAUST EMISSIONS. CORRECTIVE ADJUSTMENTS OR REPAIRS SHALL BE DONE ON EQUIPMENT AND VEHICLES THAT SHOW EXCESSIVE EMISSIONS OF EXHAUST AND/OR PARTICULATE MATTER DUE TO POOR ENGINE ADJUSTMENTS OR OTHER INEFFICIENT OPERATING CONDITIONS.
- CONTRACTOR SHALL VISIT SITE PRIOR TO THE START OF CONSTRUCTION AND PHOTOGRAPH EXISTING CONDITIONS. CONTRACTOR TO NOTE ANY OVERHANGING BRANCHES THAT WILL REQUIRE PRUNING TO PERMIT VEHICULAR ACCESS AND ADVISE LANDSCAPE ARCHITECT/CONTRACT ADMINISTRATOR. ALL PRUNING SHALL BE AS PER CURRENT ISA (INTERNATIONAL SOCIETY OF ARBORICULTURE) STANDARDS.

MAINTENANCE NOTES:

- ALL TREES AND SHRUBS PLANTED SHALL BE UNDER WARRANTY ON THE DATE OF APPROVED SUBSTANTIAL COMPLETION. THE CONTRACTOR SHALL SUBMIT WRITING APPROPRIATE DOCUMENTATION TO THE CONTRACT ADMINISTRATOR REQUESTING REVIEW AND APPROVAL OF SUBSTANTIAL COMPLETION OF LANDSCAPE WORKS. ALL PLANT MATERIAL SHALL BE MAINTAINED SO THAT THEY REMAIN IN THE SAME QUALITY AND REQUIREMENTS PRESCRIBED FOR THE ORIGINAL MATERIAL PLANTS WHICH HAVE DIED DURING THE PERIOD OF WARRANTY SHALL BE REPLACED AT NO COST TO THE OWNER, CONSISTENT WITH THE ALLOWABLE PLANTING SEASON. DEAD PLANT MATERIAL REPLACED UNDER WARRANTY SHALL BE REMOVED FROM THE CONTRACT SITE AT THE CONTRACTOR'S EXPENSE. PLANT MATERIAL REPLACED UNDER WARRANTY SHALL CONFORM TO ALL SPECIFICATIONS OF THE ORIGINAL CONTRACT INCLUDING THE WARRANTY FROM THE DATE OF REPLACEMENT PLANTING.
- THE CONTRACTOR SHALL PROVIDE MAINTENANCE IMMEDIATELY AFTER THE PLANTS ARE INSTALLED AND CONTINUE THROUGHOUT THE ENTIRE WARRANTY PERIOD. MAINTENANCE REQUIREMENTS SHALL INCLUDE ALL PROCEDURES CONSISTENT WITH PROPER HORTICULTURAL PRACTICES TO ENSURE NORMAL, VIGOROUS AND HEALTHY GROWTH OF ALL MATERIAL PLANTED INCLUDING THE SEED. MAINTENANCE SHALL INCLUDE BUT NOT BE LIMITED TO THE FOLLOWING:
 - CULTIVATION AND WEED CONTROL OF PLANTING BEDS AND TREE PITS (NO PESTICIDES OR HERBICIDES IN ACCORDANCE WITH MUNICIPAL BY-LAWS AND PROVINCIAL LEGISLATION).
 - WATER A MINIMUM OF ONCE A WEEK FOR THE FIRST FOUR WEEKS, WHEN REQUIRED THEREAFTER AND IN SUFFICIENT QUANTITIES TO SATURATE THE ROOT SYSTEM AND TO ENSURE SUFFICIENT MOISTURE FOR VIGOROUS PLANT MATERIAL GROWTH. ENSURE ADEQUATE MOISTURE IN THE ROOTBALL AT TIME OF FIRST FROST.
 - PRUNING, INCLUDING THE REMOVAL AND DISPOSAL OF DEAD OR BROKEN BRANCHES.
 - KEEP ALL ACCESSORIES IN GOOD CONDITION AND PROPERLY ADJUSTED. REPAIR OR REPLACE ACCESSORIES AS REQUIRED AT NO ADDITIONAL EXPENSE TO THE OWNER.
- AT THE TIME OF FINAL WARRANTY ACCEPTANCE, ALL MATERIAL MUST BE IN A HEALTHY AND VIGOROUS CONDITION. BEDS AND TREE PITS MUST BE FRESHLY CULTIVATED AND FREE OF WEEDS, RUBBISH AND DEBRIS. ALL STAKES, WIRES, HOSE AND OTHER ACCESSORIES MUST BE REMOVED UPON FINAL ACCEPTANCE, EXCEPT FOR PLANT MATERIAL UNDER WARRANTY.

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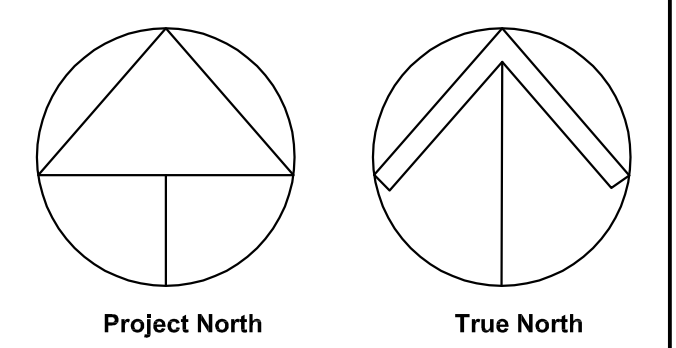
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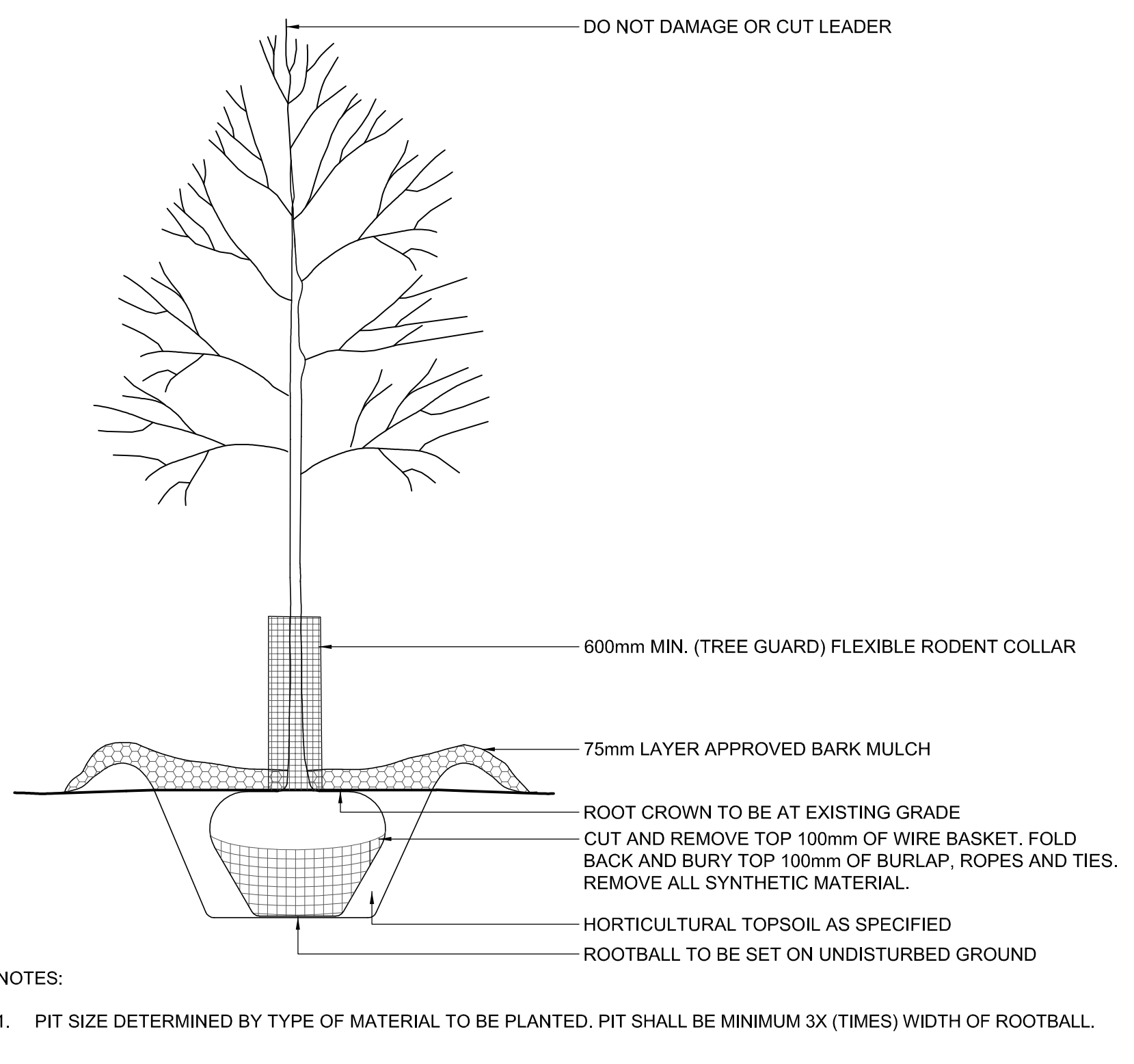
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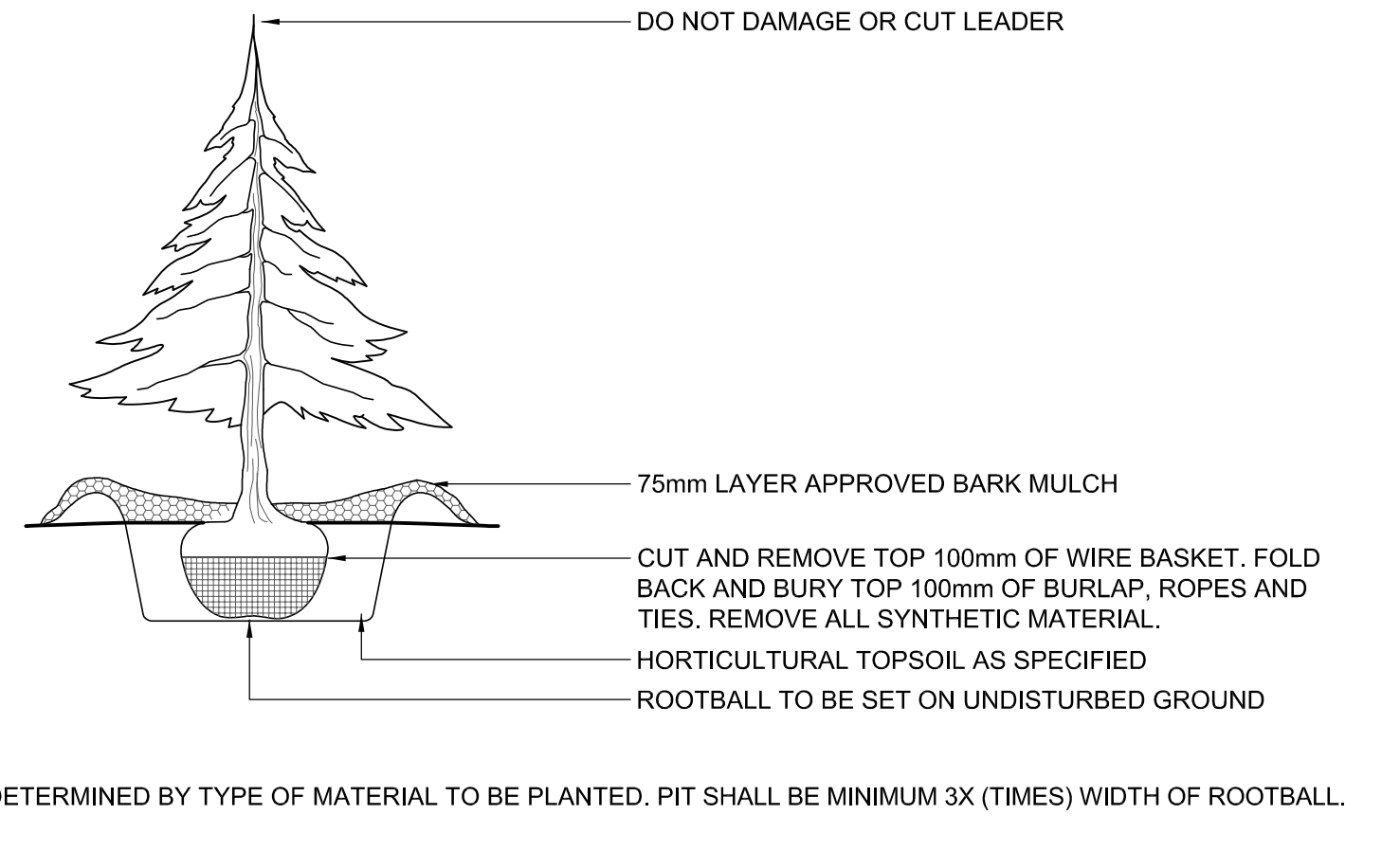


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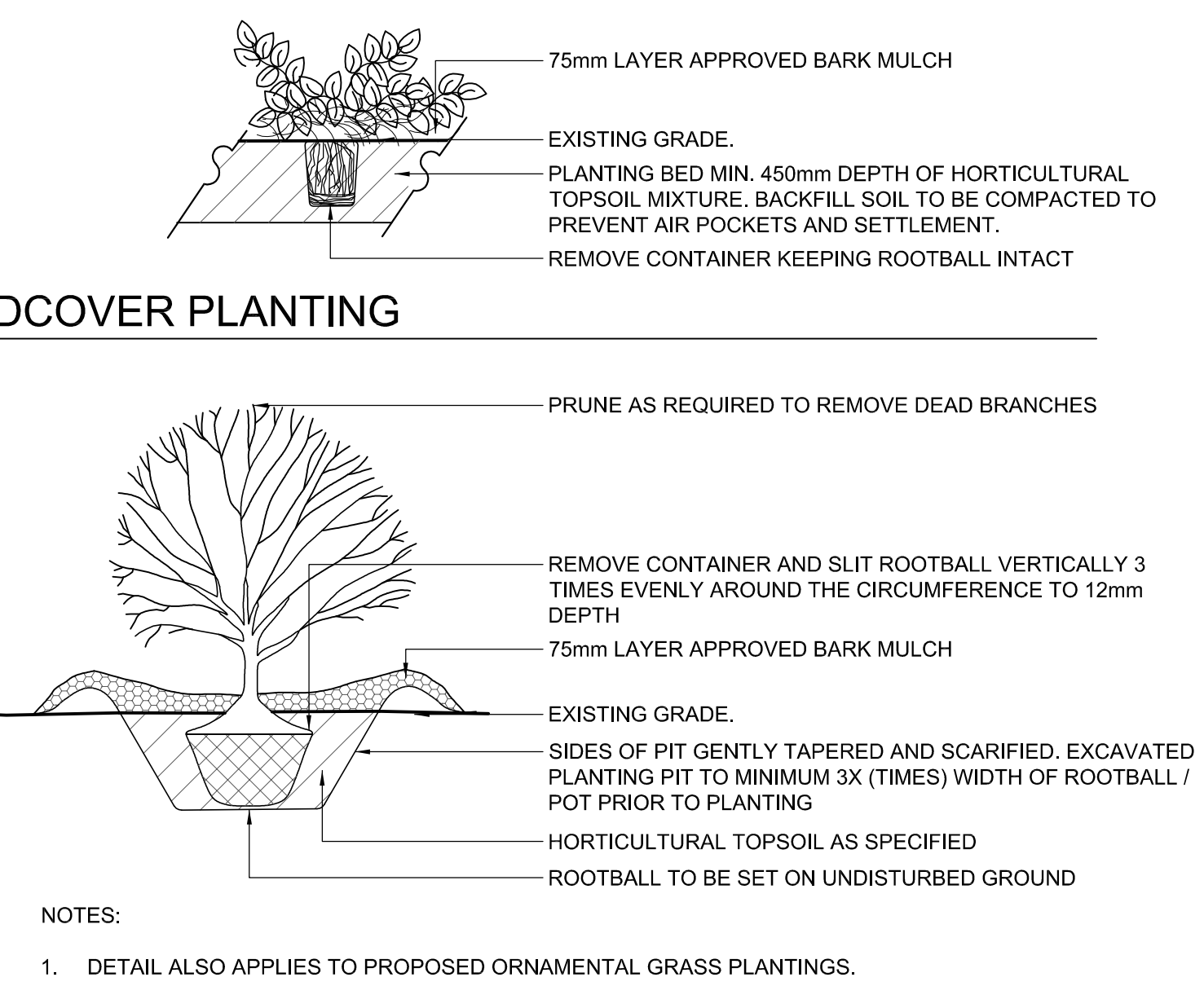
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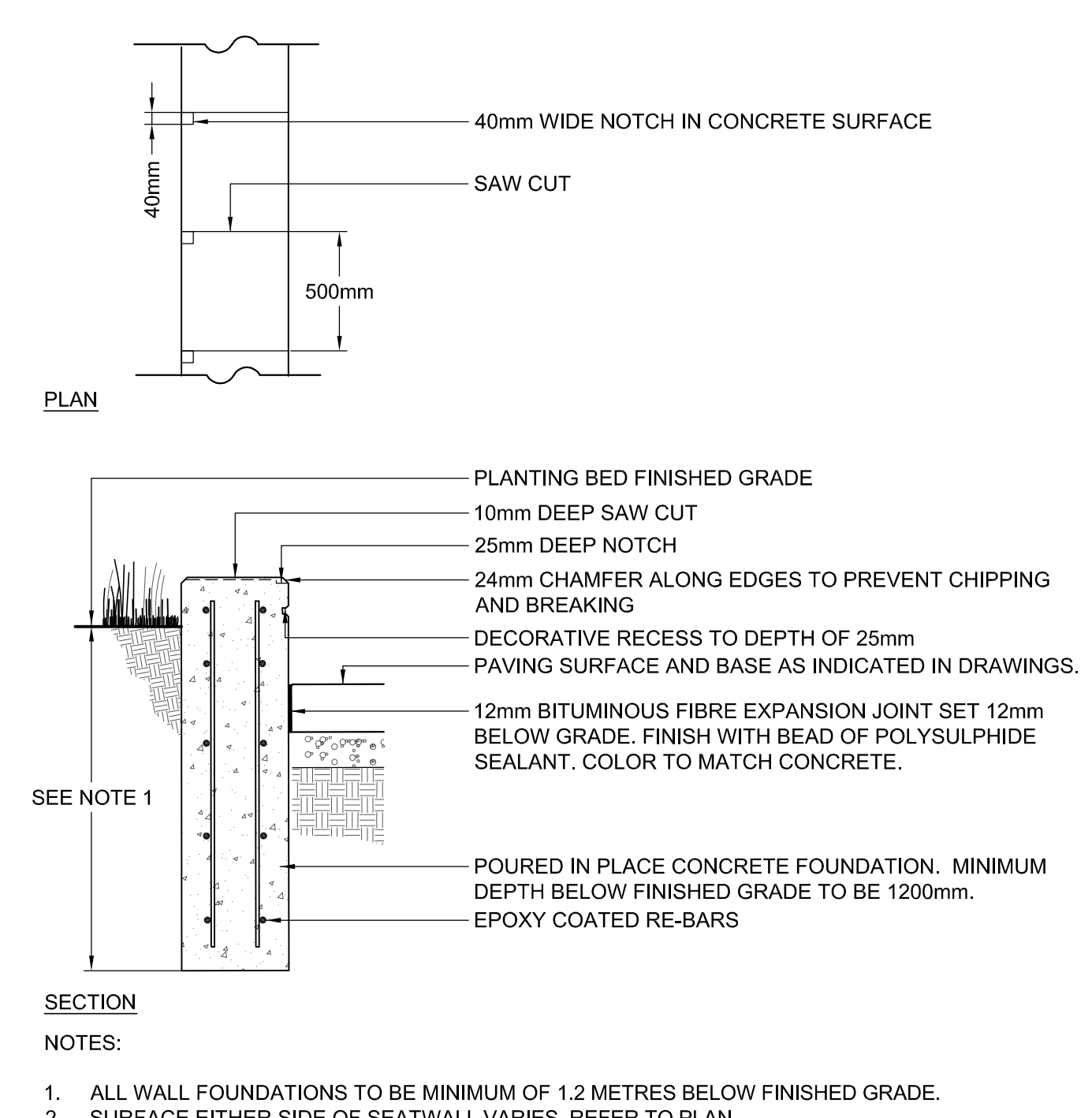
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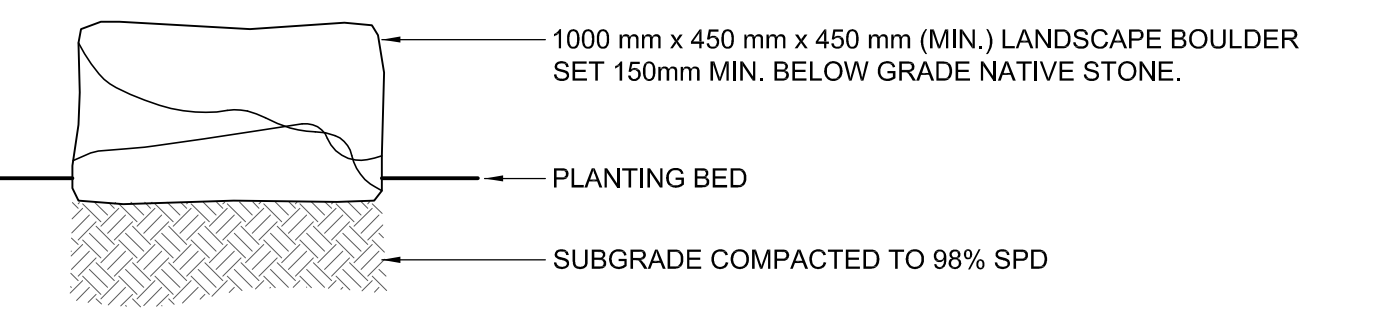
3 GROUNDCOVER PLANTING
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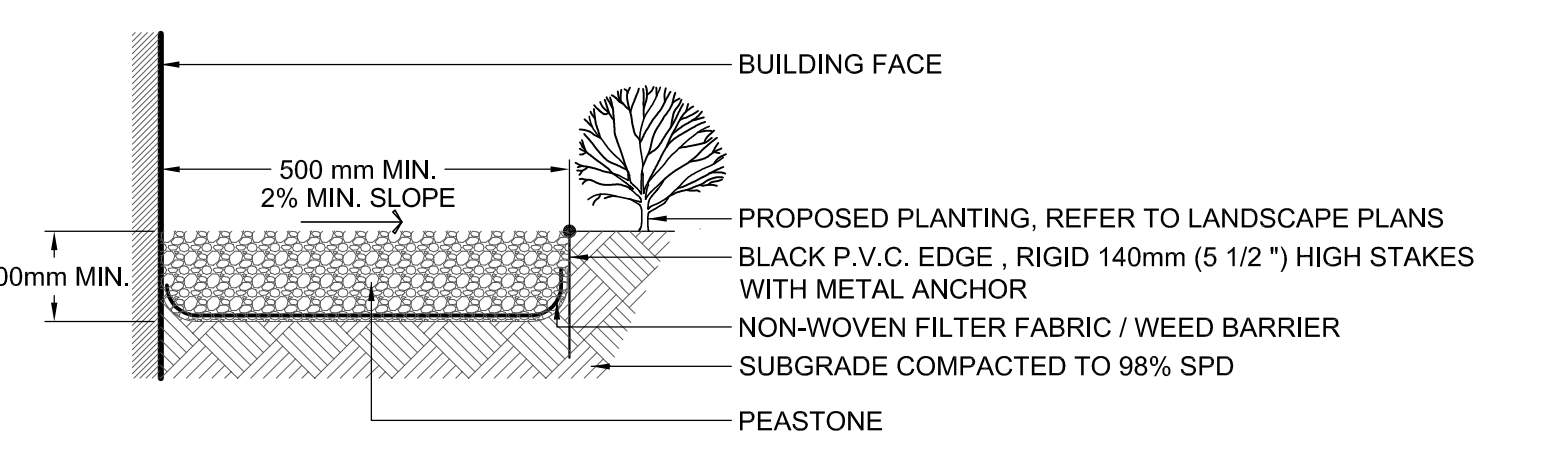
4 SHRUB PLANTING
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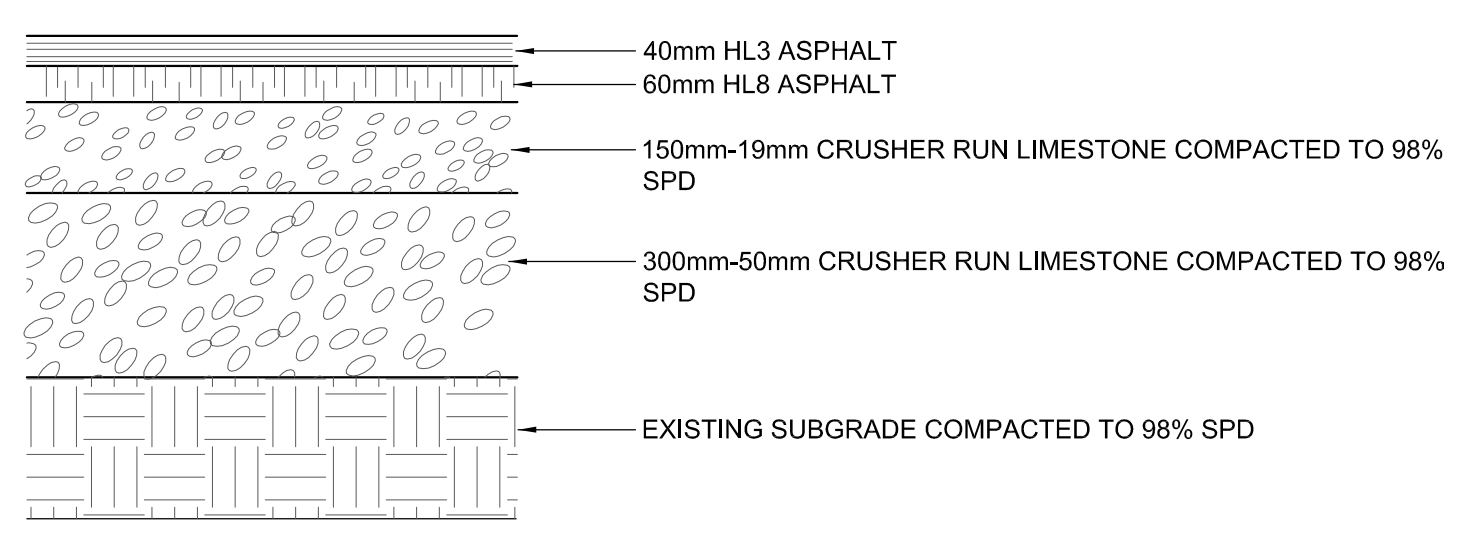
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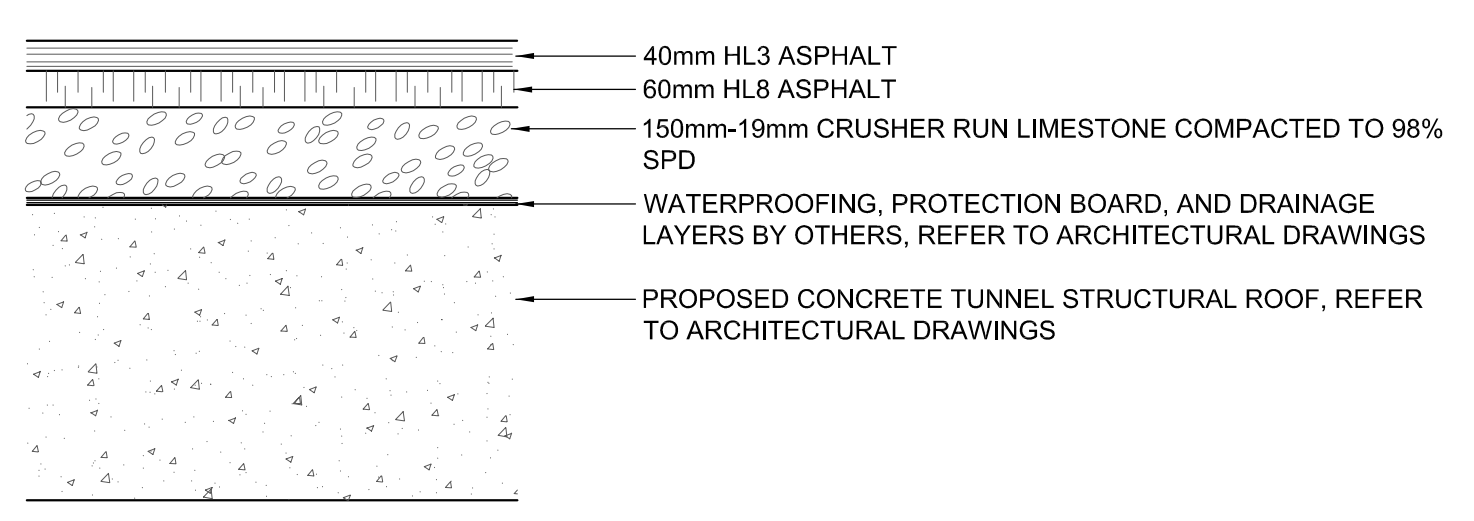
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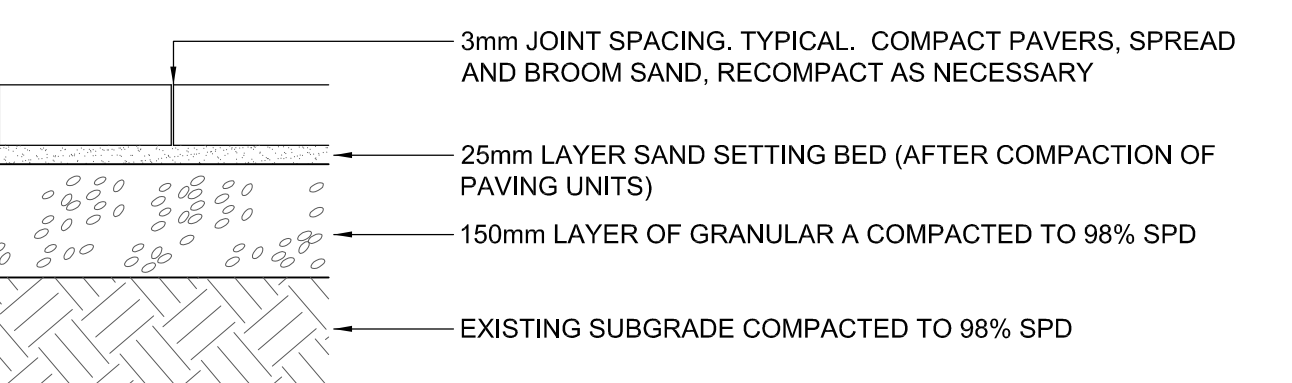
7 PEASTONE BAND
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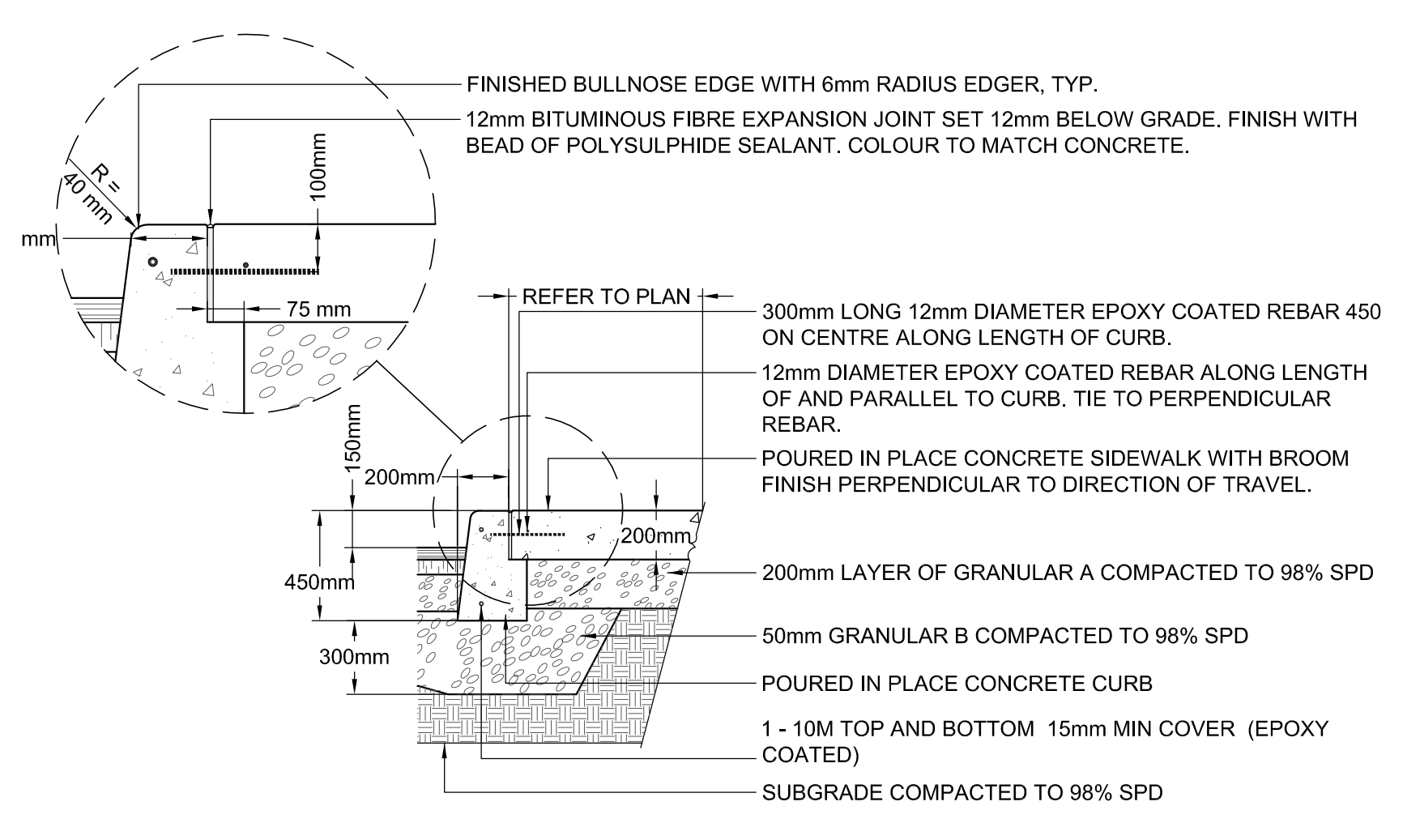
8 HEAVY DUTY ASPHALT PAVING ON EXISTING SUBGRADE
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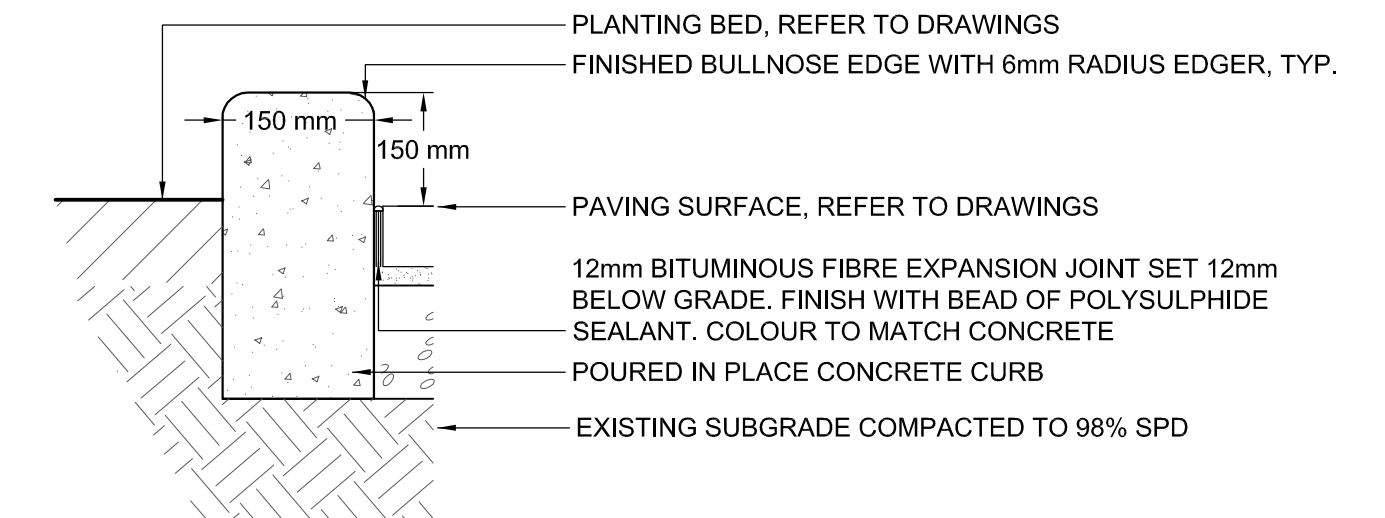
9 HEAVY DUTY ASPHALT PAVING ON TUNNEL STRUCTURE
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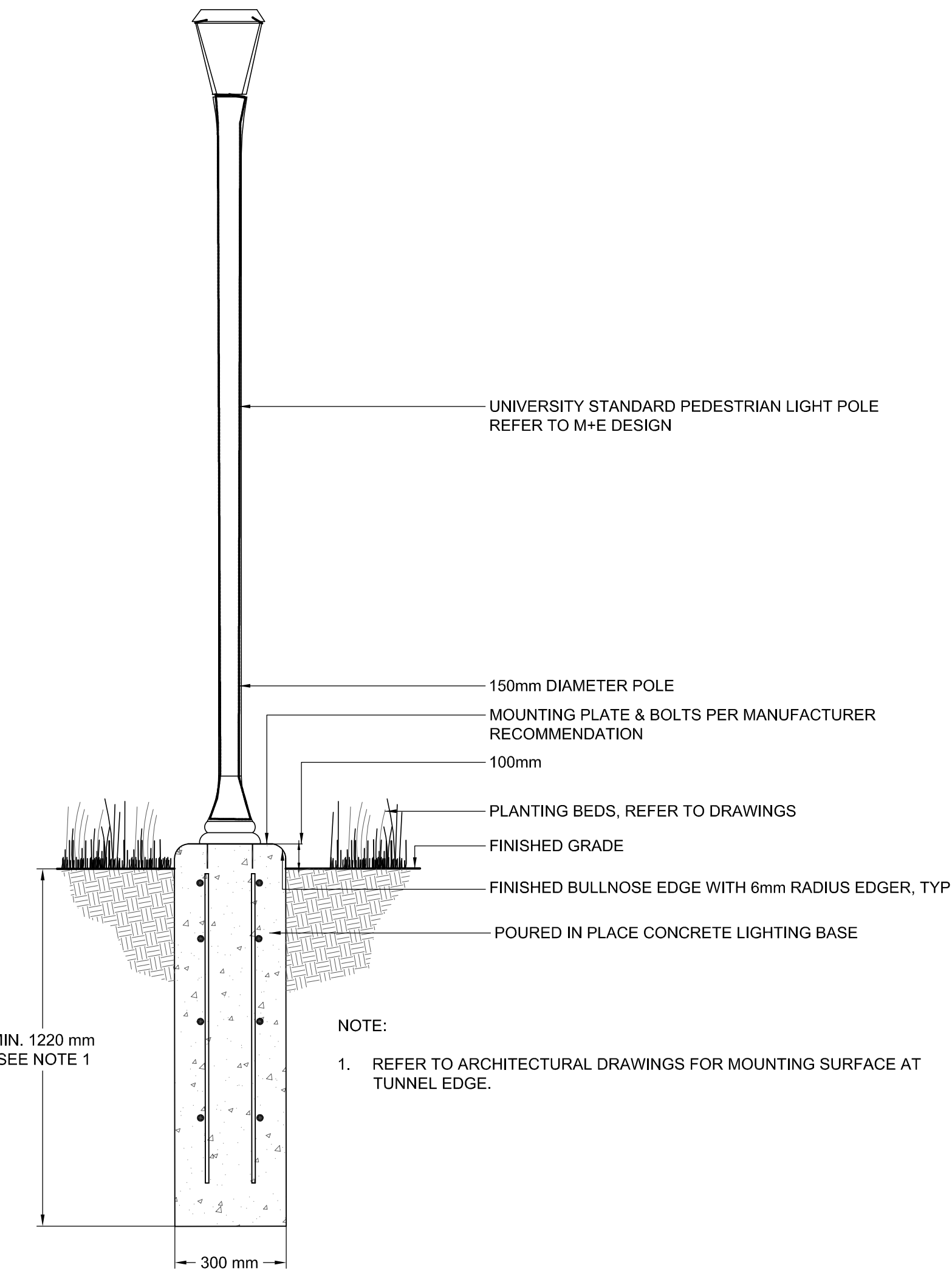
10 CONCRETE UNIT PAVER
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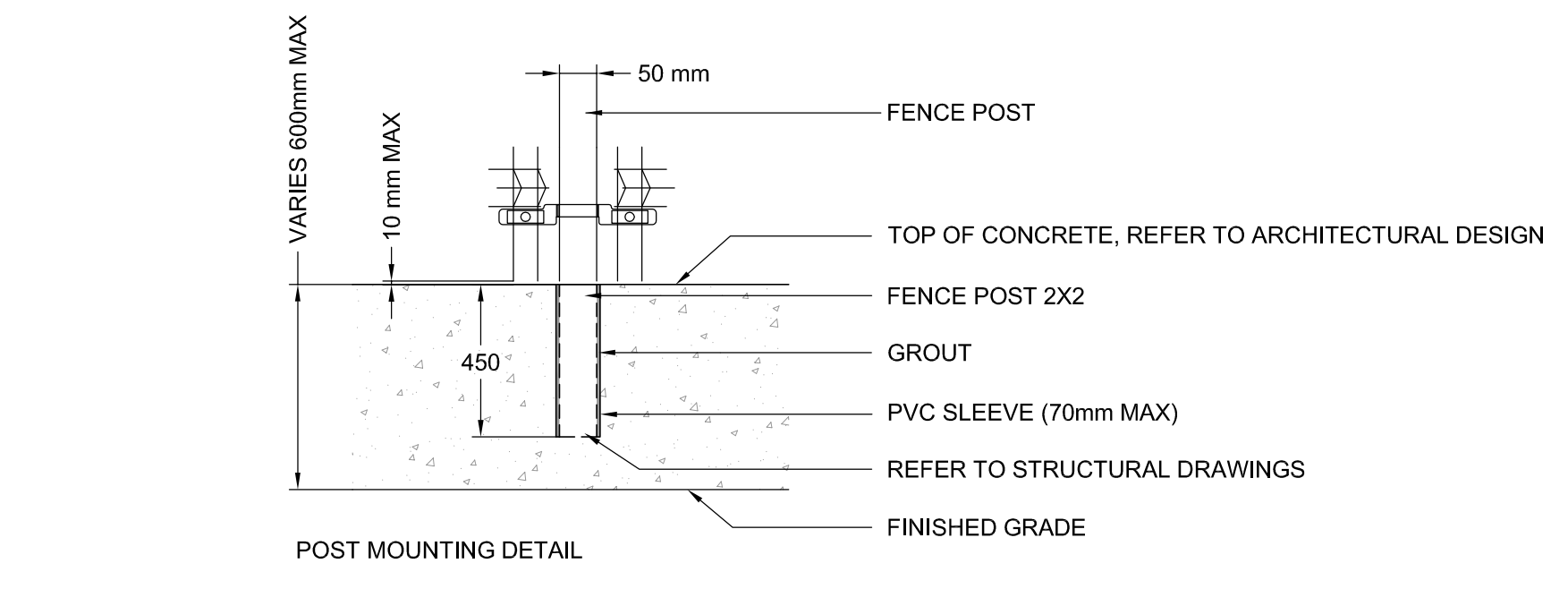
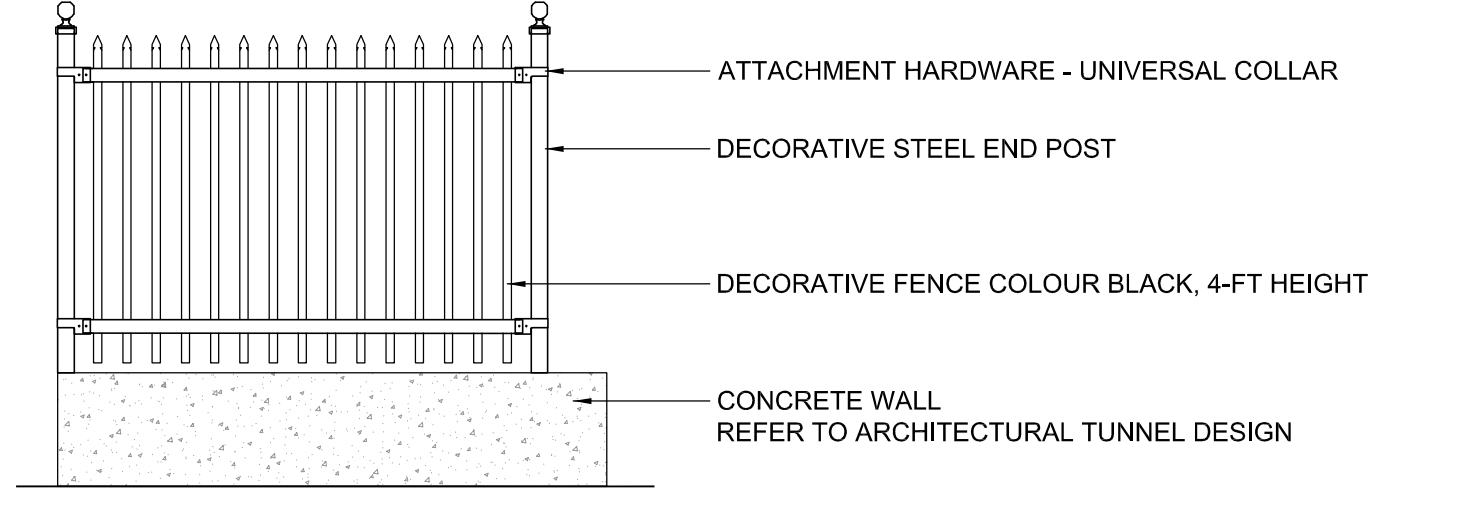
11 CONCRETE CURB AND SIDEWALK
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12 CONCRETE PLANTING BED / PLAZA CURB
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13 LIGHT POLE MOUNTING
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14 RAIL
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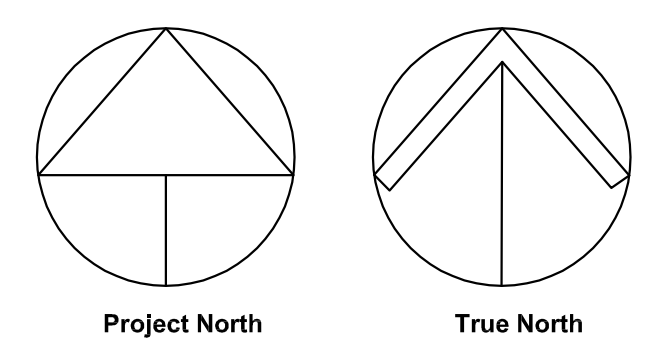
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