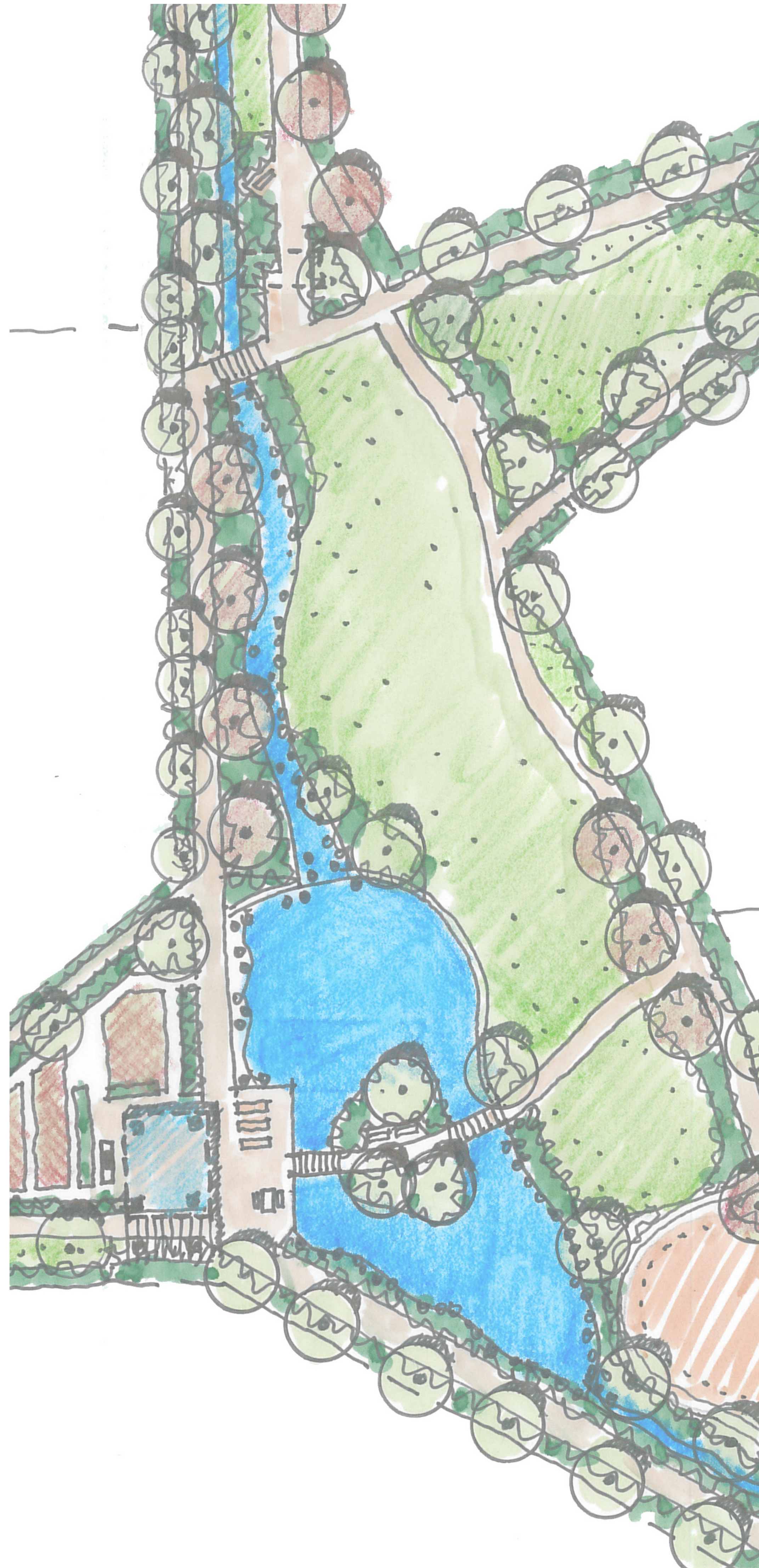




UBC RESEARCH PARK

UBC SOUTH CAMPUS, VANCOUVER B.C.

DEVELOPMENT PERMIT BOARD SUBMISSION

P+A

Landscape Architecture
Site Planning

Design Rationale

Conformity to Neighbourhood Plan
The design for the park adheres to the guidelines established in 2005 by UBC in the South Campus Northeast Sub-Area Neighbourhood Plan and the design guidelines articulated in the 2016 Wesbrook Place Design Vision Supplement. The design intent for the park is to “encourage a flexible, adaptable, functional design that prioritizes community use and growth and maintains the overall Wesbrook Place design excellence.” *

Context

The new park is located in the UBC South Campus Neighbourhood of Wesbrook Village, east of Wesbrook Boulevard and south of Gray Avenue. The park is bounded by future development parcels on all sides and connected to the adjoining streets and larger south campus parks by greenway links.

Size

The park and connected greenstreet links are ± 10,000m2 in overall area. The main body of the park is 110 meters in length and ± 42 m’s in average width in the east west direction. The greenstreet connections are linear parks with a constant 15m overall width and vary in length from 53m to 83m. The park has an overall 7-meter grade change between Grey Avenue to the north and the new road to the south. The main body of the park has been design graded to achieve a ±2% slope from north to south. The green street segments are graded to a maximum of 5% slope for the two north-south segments.

Design Features

The proposed park design will provide for both active and passive recreational experiences including: large open and relatively flat lawn areas for both passive and active enjoyment, play areas for children, seating and gathering areas for social engagement, a recirculating water course and pond for storm water management, streams and pond bubblers for sound mitigation and visual enjoyment, and a community garden. Walkways are provided through the park linking adjacent development parcels to the park and the neighbourhood pedestrian circulation network.

The children’s play area is proposed to be located at the north end of the park and takes advantage of a more open and elevated location within the park. This location provides opportunities for play to extend out onto the large open lawn area and to interact with the adjacent waterway. A covered seating area for parents overlooks the play area providing opportunities for social engagement and all season use.

A Community garden for neighbourhood use is proposed on the west side of the park adjacent the plaza and pond overlook. This location provides easy access from Wesbrook, is centrally located within the park and maintains a sunny aspect through the growing season. The community garden will include raised gardening plots, a storage shed, composting and seating.

A plaza area with covered pavilion is proposed to be centrally located within the park adjacent the community garden and overlooking the pond. It has been situated such that it can be viewed from Wesbrook to the west and Grey Avenue to the North. The plaza is intended to serve as the social heart for the neighbourhood and and can be used for yoga, tai chi, or for gathering to celebrate special events. The overhead covered structure is intended to provide an all season area for outdoor enjoyment and programming. The plaza and pond have been integrated to take advantage of the flatter grade conditions in this area and to provide a visual focus and to mitigate sounds generated by programming in the plaza.

The pond will function as a storm water detention facility for clean storm water run off delivered to the channel system from adjacent development roof areas. Water will be circulated through the stream network by pumps. Through the summer months the streams will be designed to be visually appealing in the event of reduced water volumes.

The park design will incorporate the materials and site furnishings already established throughout the neighbourhood. A variety of seating areas will be provided to take advantage of the many different views of the park and greenways.

Site Lighting

Appropriate levels of lighting will be provided throughout the park and along the greenstreets utilizing light fixtures already established in the neighbourhood. Pedestrian level post top lights will be utilized along the main walkways, bollard lighting will be provided along secondary walkways. LED strip lighting will be provided at bridges and CIP wall lights at trellis’s and seating nodes.

Sustainability

The parks and greenstreets provide accessible pedestrian and cyclist access to all areas of the South Campus Neighbourhood and beyond to other UBC housing areas, the academic campus, Pacific Spirit Park and transit for access to Greater Vancouver. Spaces for social interaction and quiet reflection allow interaction among residents thus contributing to social sustainability. A community gardening area has been integrated into the design adjacent the social hub of the park to encourage residents to garden. Additional strategies include: 300mm top soil depths for lawn areas and 450mm depth for planted areas to encourage storm water detention, a plant palette incorporating the use of native and adaptive plantings and plantings to encourage birds, creative re-use and integration of excavated boulders traditionally trucked from site and a recirculating water feature utilizing storm water harvested from the adjacent development parcels roof tops. A play area will be incorporated with a diversity of play experiences to engage children and their families in an outdoor setting.

Source
*2016 Wesbrook Place Neighbourhood Plan Design Vision Supplement, Page 11, Open Space and Landscape





Research Park
10,500 m²

- 3 Maximum Number of Storeys
- Internal Site Height Transitions
- Street Wall Massing
5 Storeys or less
- Mixed-Use Commercial Centre
- Schools
- Green Edge
- Usable Neighbourhood
Open Space (UNOS)
- Greenway
- Maximum 3.5 FSR
High Rise with Low Rise/Townhouses
- Maximum 2.8 FSR
High Rise with Townhouses
- Maximum 2.8 FSR
- Maximum 2.0 FSR
- Maximum 1.2 FSR

Neighbourhood Circulation



MARCH 10AM



MARCH 12PM



MARCH 4PM



JUNE 10AM

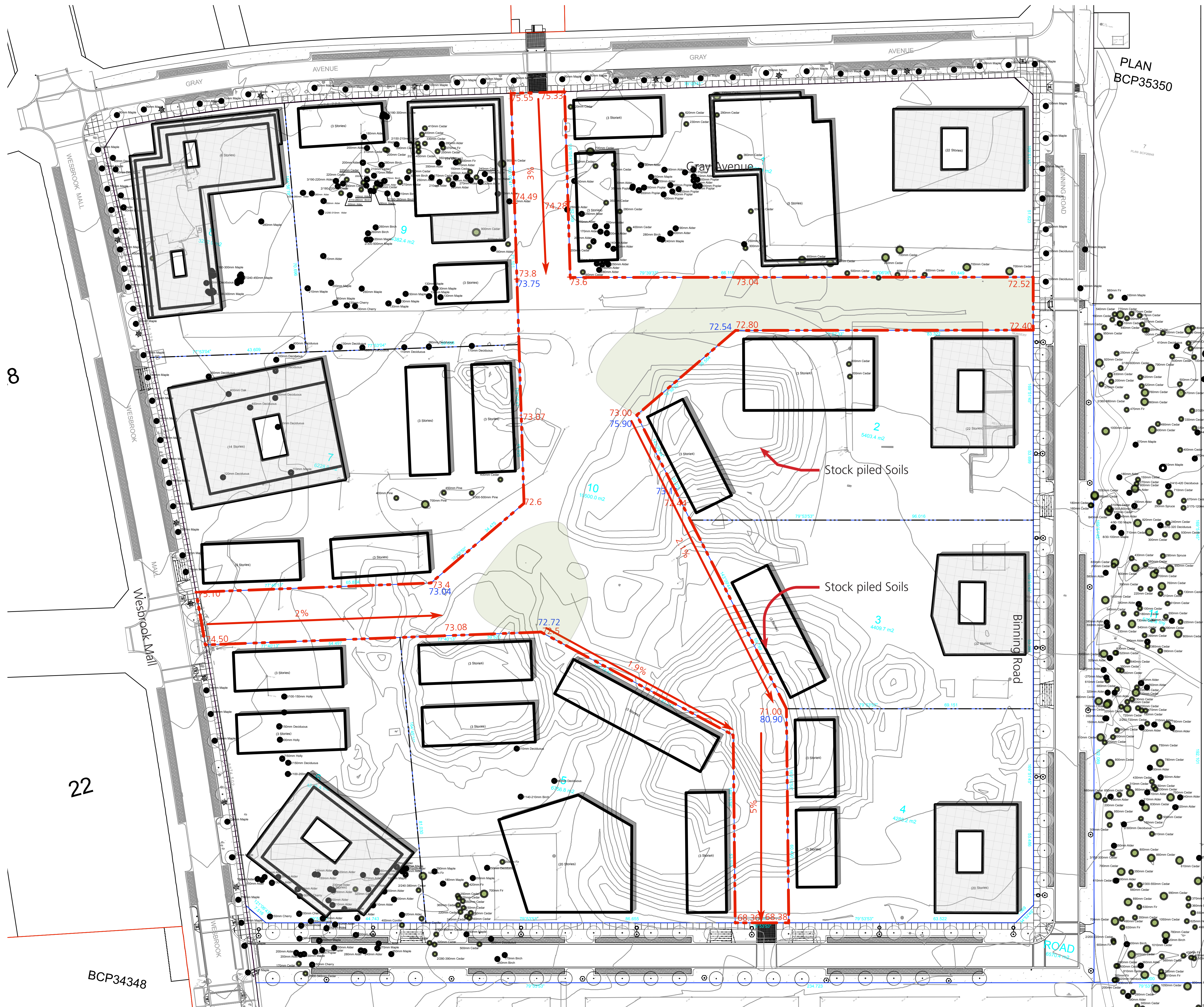


JUNE 12PM



JUNE 4PM





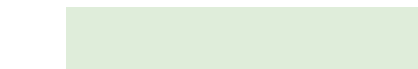
Legend

+73.02

EXISTING GRADE

+73.02

PROPOSED GRADE



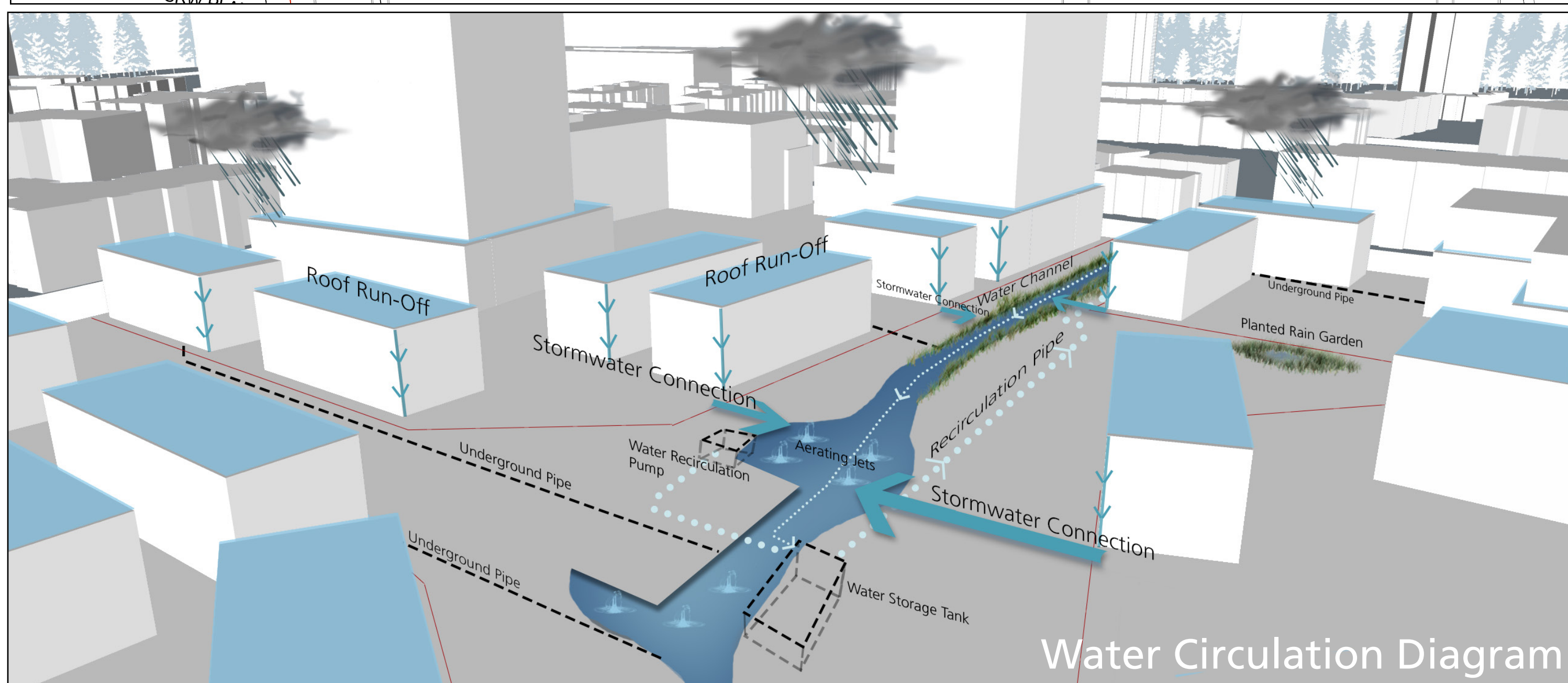
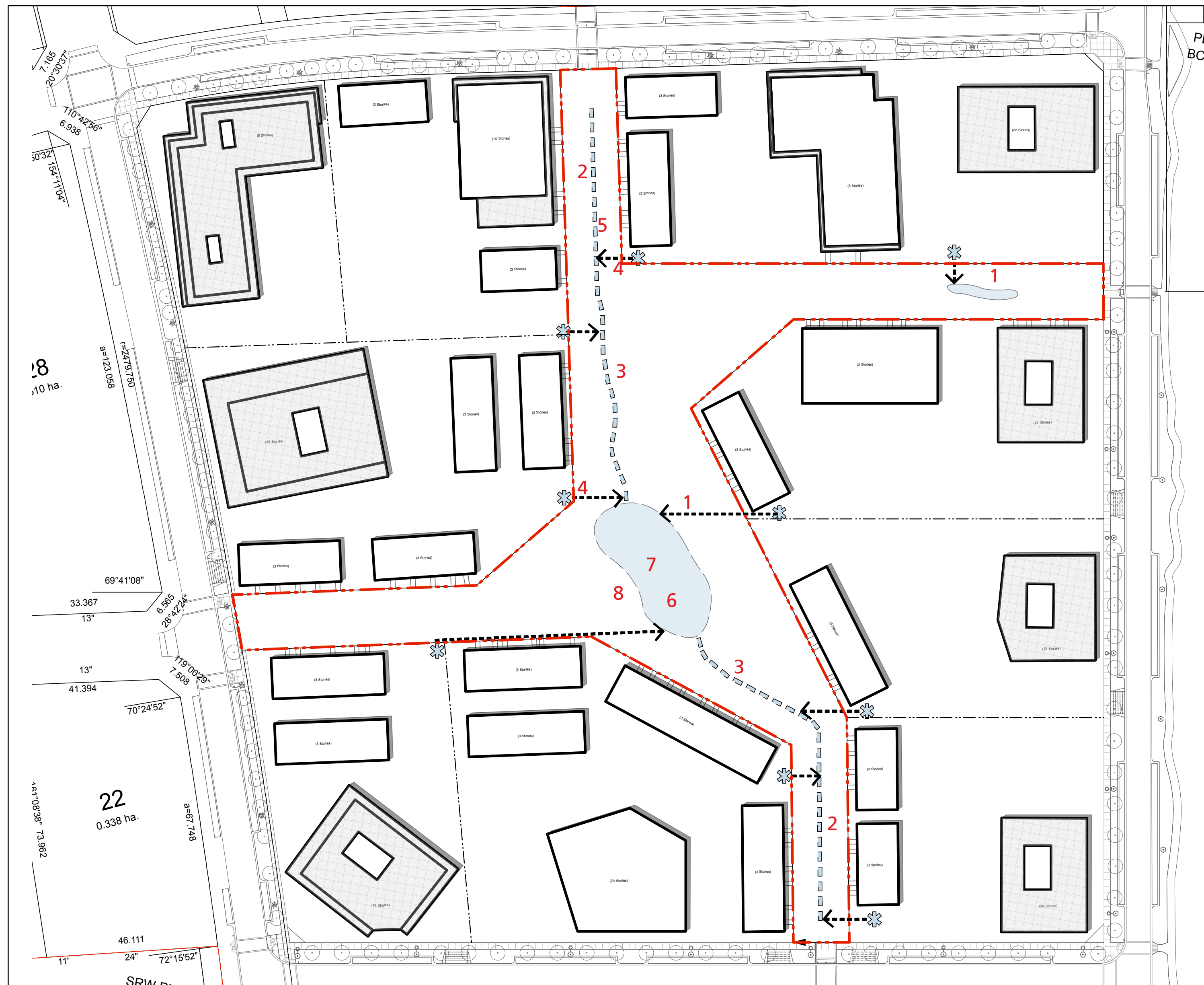
SLOPE LESS THAN 1%

8

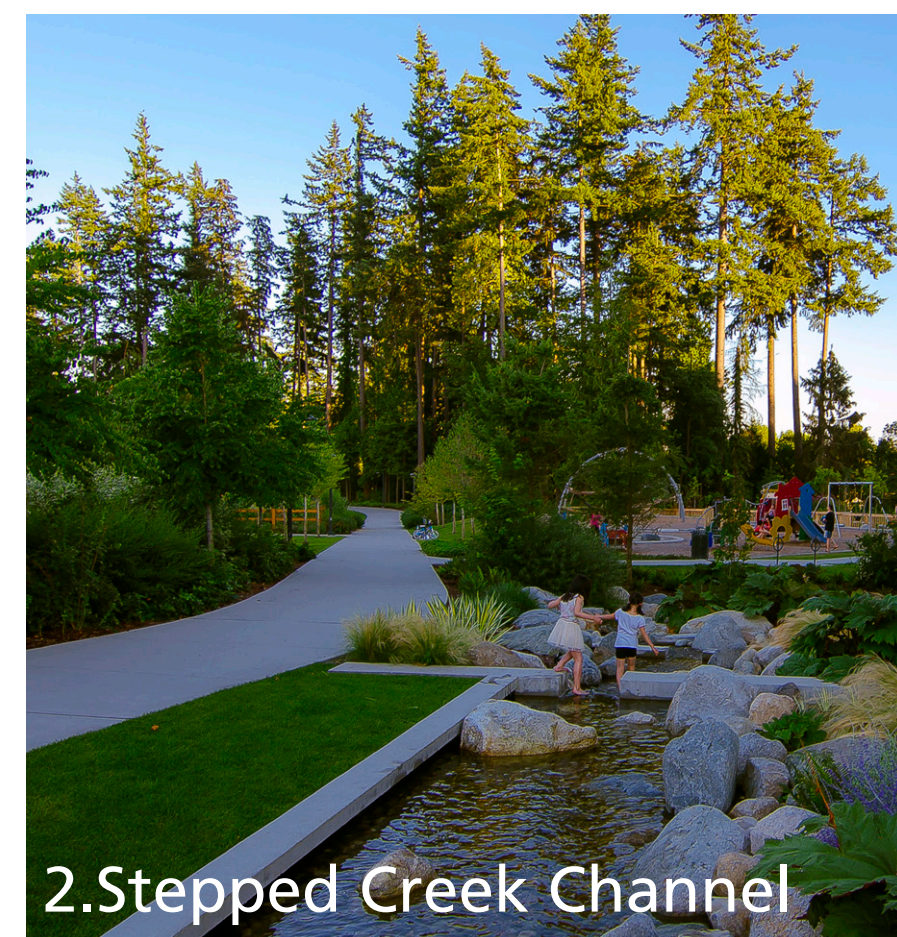
22

BCP34348

PLAN
BCP35350



1. Planted Rain Garden



2. Stepped Creek Channel



3. Creek Channel



4. Stormwater Connection



5. Basalt Faced Weirs



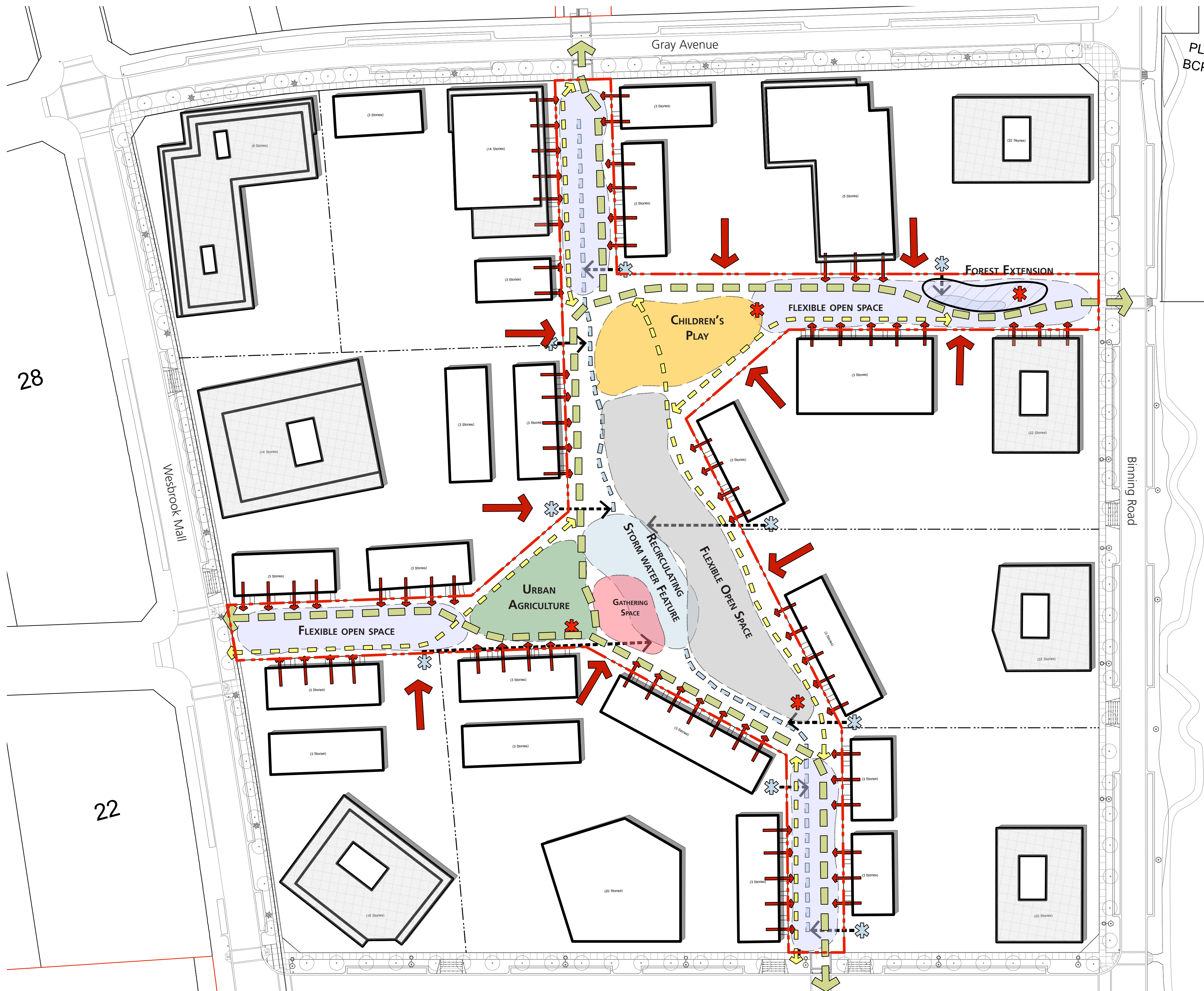
6. Aerating Jets



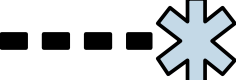
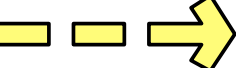
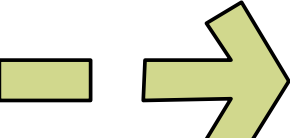
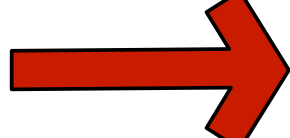
7. Pond



8. Custom Runnel



Legend

-  FUTURE STORMWATER CONNECTIONS
-  SECONDARY PEDESTRIAN CONNECTIONS
-  PRIMARY PEDESTRIAN CONNECTIONS
-  FUTURE PROJECT CONNECTIONS
-  BIRD HABITAT



3	Issued for DP Board	10/03/201
2	Issued for DRC Review	09/08/201
1	Issued for Development Permit	03/28/201

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Client

UBC Properties Trust

Project Title:

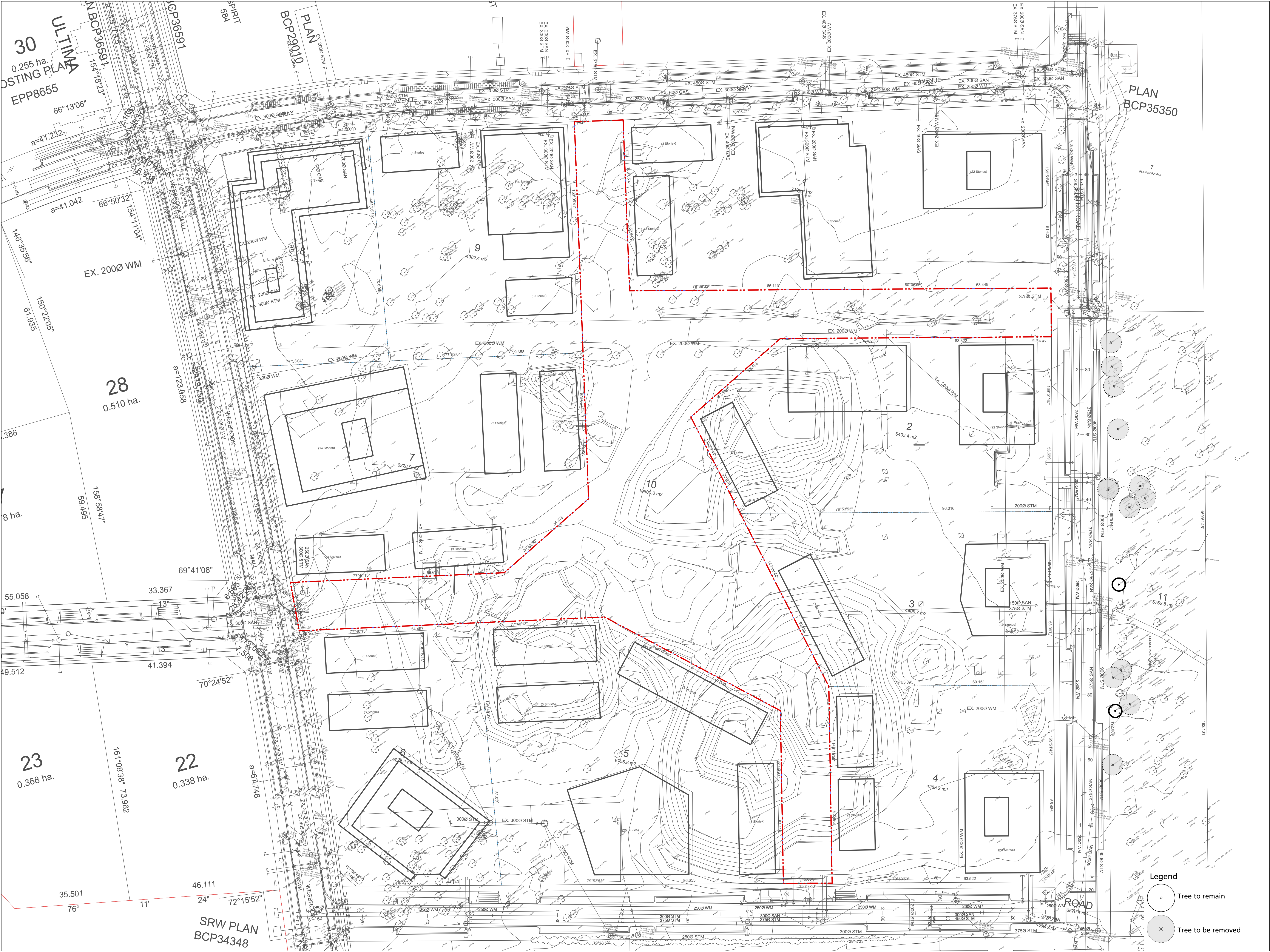
UBC SC Research Park

Drawing Title:

Lighting Plan

Project North:	Drawn By:	JO
	Checked By:	MR
Scale:	Job No.:	16-042
Sheet No.:		

L1.1



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2	Issued for DRC Review	09/08/2017
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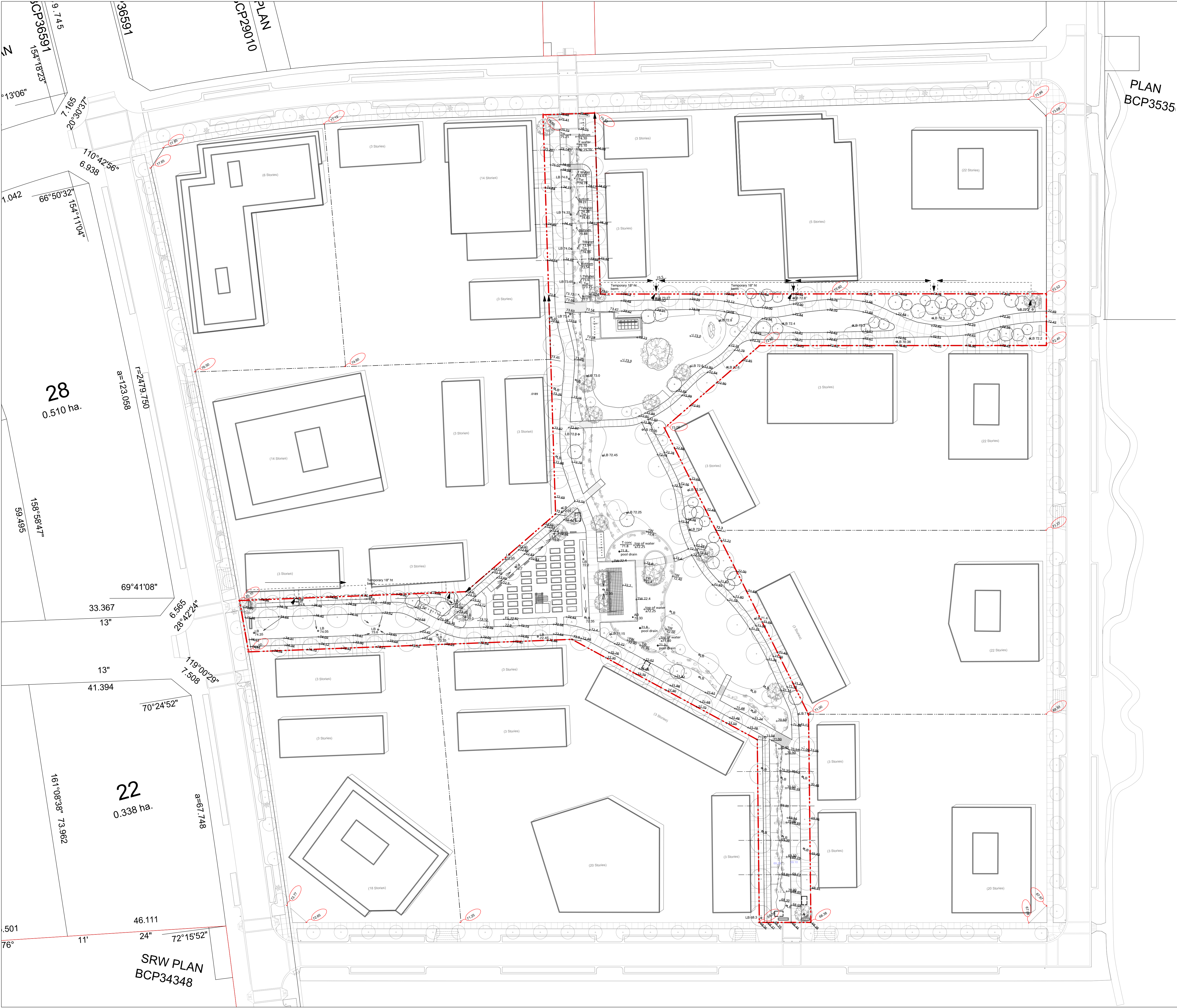
Client: **UBC Properties Trust**

Project Title: **UBC SC Research Park**

Drawing Title: **Tree Removal Plan**

Project North:	Drawn By: JG
Scale: 1:500	Checked By: MP
Sheet No.:	Job No.: 16-043

- Legend**
- Tree to remain
 - ⊗ Tree to be removed



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Client: **UBC Properties Trust**

Project Title: **UBC SC Research Park**

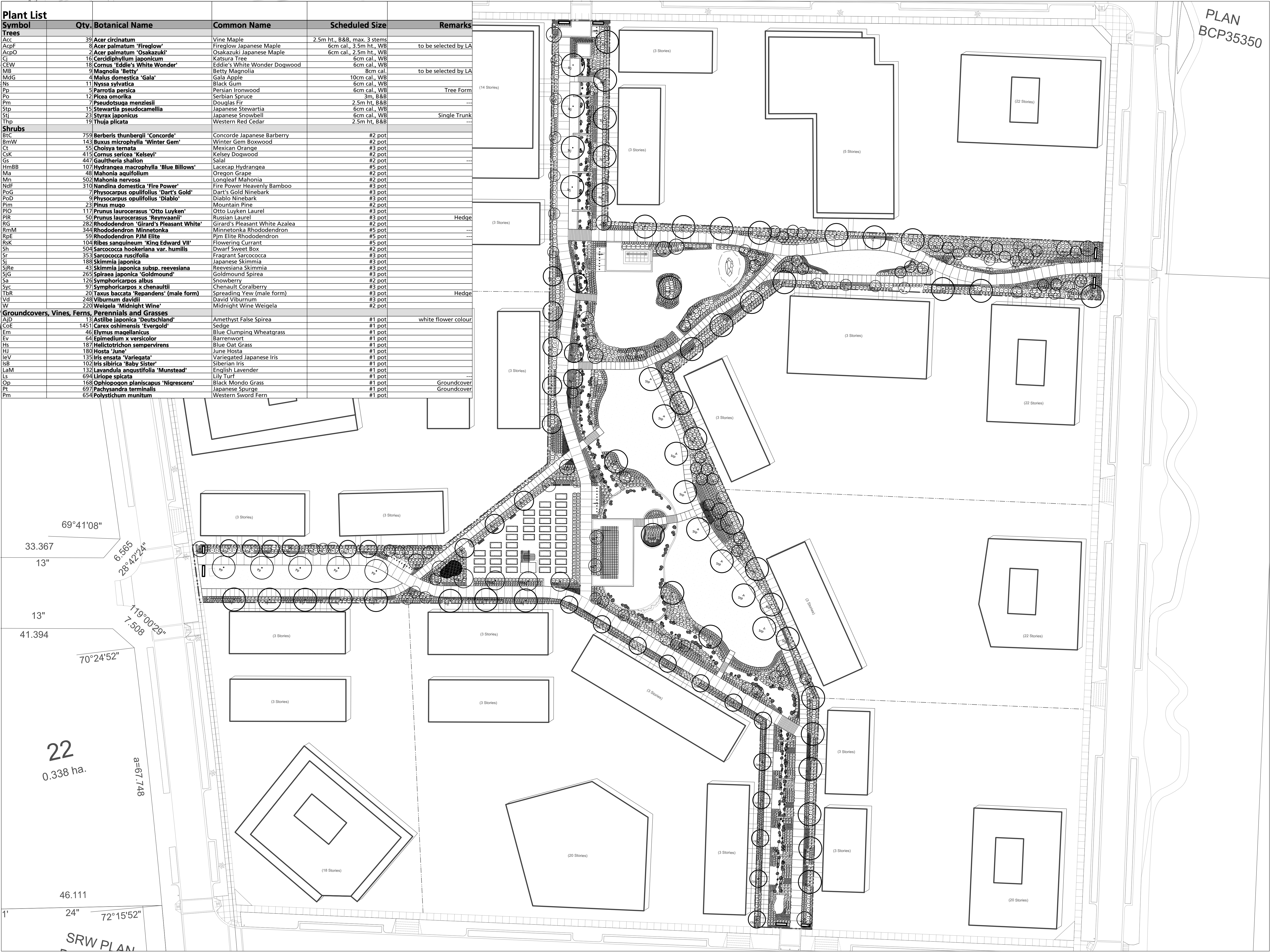
Drawing Title: **Grading Plan**

Project North:	Drawn By:	JG
	Checked By:	MP
Scale:	Job No.:	16-043
		1:500
Sheet No.:		

L2.0

Legend	
	Concrete lawn basin with cast iron lid
	Area drain
	Grade Marker
	Pool Drain
	Top of Wall
	Top of Water
	Top of Weir

Plant List				
Symbol	Qty.	Botanical Name	Common Name	Scheduled Size
Trees				
Acc	39	Acer circinatum	Vine Maple	2.5m ht., B&B, max. 3 stems
AcpF	8	Acer palmatum 'Fireglow'	Fireglow Japanese Maple	6cm cal., 3.5m ht., W8
AcpO	2	Acer palmatum 'Osakazuki'	Osakazuki Japanese Maple	6cm cal., 2.5m ht., W8
CJ	16	Cercidiphyllum japonicum	Katsura Tree	6cm cal., W8
CEW	18	Cornus 'Eddie's White Wonder'	Eddie's White Wonder Dogwood	6cm cal., W8
MB	9	Magnolia 'Betty'	Betty Magnolia	8cm cal.
MdG	4	Malus domestica 'Gala'	Gala Apple	10cm cal., W8
Ns	11	Nyssa sylvatica	Black Gum	6cm cal., W8
Pp	5	Parrotia persica	Persian Ironwood	6cm cal., W8
Po	12	Picea omorika	Serbian Spruce	3m, B&B
Pm	7	Pseudotsuga menziesii	Douglas Fir	2.5m ht, B&B
Stp	15	Stewartia pseudocamellia	Japanese Stewartia	6cm cal., W8
Stj	23	Styrax japonicus	Japanese Snowbell	6cm cal., W8
Thp	19	Thuja plicata	Western Red Cedar	2.5m ht, B&B
Shrubs				
BTC	759	Berberis thunbergii 'Concorde'	Concorde Japanese Barberry	#2 pot
BmW	143	Buxus microphylla 'Winter Gem'	Winter Gem Boxwood	#2 pot
Ct	55	Choisya ternata	Mexican Orange	#3 pot
CsK	415	Cornus sericea 'Kelsey'	Kelsey Dogwood	#2 pot
Gs	447	Gaultheria shallon	Salal	#2 pot
HmBB	107	Hydrangea macrophylla 'Blue Billows'	Lacecap Hydrangea	#5 pot
Ma	48	Mahonia aquifolium	Oregon Grape	#2 pot
Mn	502	Mahonia nervosa	Longleaf Mahonia	#2 pot
NdF	310	Nandina domestica 'Fire Power'	Fire Power Heavenly Bamboo	#3 pot
PoG	7	Physocarpus opulifolius 'Dart's Gold'	Dart's Gold Ninebark	#3 pot
PoD	9	Physocarpus opulifolius 'Diablo'	Diablo Ninebark	#3 pot
Pm	23	Pinus mugo	Mountain Pine	#2 pot
PIO	117	Prunus laurocerasus 'Otto Luyken'	Otto Luyken Laurel	#3 pot
PIR	50	Prunus laurocerasus 'Reynvaanii'	Russian Laurel	#3 pot
RG	282	Rhododendron 'Girard's Pleasant White'	Girard's Pleasant White Azalea	#2 pot
RmM	344	Rhododendron Minnetonka	Minnetonka Rhododendron	#5 pot
RpE	59	Rhododendron PJM Elite	PJM Elite Rhododendron	#5 pot
Rsk	104	Ribes sanguineum 'King Edward VII'	Flowering Currant	#5 pot
Sh	504	Sarcococca hookeriana var. humilis	Dwarf Sweet Box	#2 pot
Sr	353	Sarcococca ruscifolia	Fragrant Sarcococca	#3 pot
Sj	188	Skimmia japonica	Japanese Skimmia	#3 pot
SjRe	43	Skimmia japonica subsp. reevesiana	Reevesiana Skimmia	#3 pot
SjG	265	Spiraea japonica 'Goldmound'	Goldmound Spirea	#3 pot
Sa	126	Symphoricarpos albus	Snowberry	#2 pot
Syc	97	Symphoricarpos x chenaultii	Chenault Coralberry	#3 pot
TbR	20	Taxus baccata 'Repandens' (male form)	Spreading Yew (male form)	#3 pot
Vd	248	Viburnum davidii	David Viburnum	#3 pot
W	220	Weigela 'Midnight Wine'	Midnight Wine Weigela	#2 pot
Groundcovers, Vines, Ferns, Perennials and Grasses				
AID	13	Astilbe japonica 'Deutschland'	Amethyst False Spirea	#1 pot
CoE	1451	Carex oshimensis 'Evergold'	Sedge	#1 pot
Em	46	Elymus magellanicus	Blue Clumping Wheatgrass	#1 pot
Ev	64	Epimedium x versicolor	Barrenwort	#1 pot
Hs	187	Helictotrichon sempervirens	Blue Oat Grass	#1 pot
Hj	180	Hosta 'June'	June Hosta	#1 pot
IeV	135	Iris ensata 'Variegata'	Variegated Japanese Iris	#1 pot
IsB	102	Iris sibirica 'Baby Sister'	Siberian Iris	#1 pot
LaM	132	Lavandula angustifolia 'Munstead'	English Lavender	#1 pot
LS	694	Liriope spicata	Lily Turf	#1 pot
Og	168	Ophiopogon planiscapus 'Nigrescens'	Black Mondo Grass	#1 pot
Pt	697	Pachysandra terminalis	Japanese Spurge	#1 pot
Pm	654	Polystichum munitum	Western Sword Fern	#1 pot



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Client:

UBC Properties Trust

Project Title:

UBC SC Research Park

Drawing Title:

Planting Plan

Project North:	Drawn By:	KS
	Checked By:	MP
Scale:	Job No.:	16-043
Sheet No.:		

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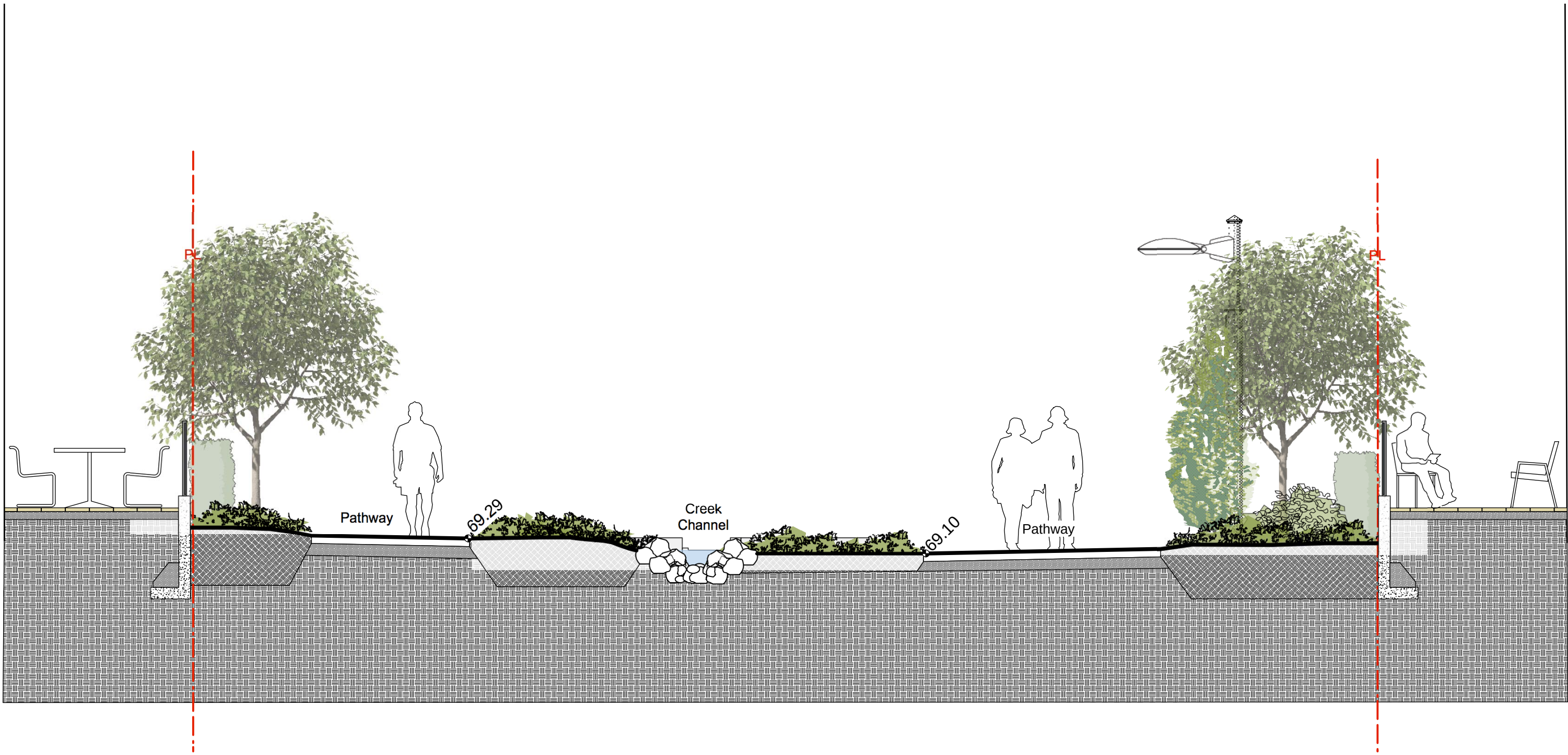
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UBC Properties Trust

Project Title:
UBC SC Research Park

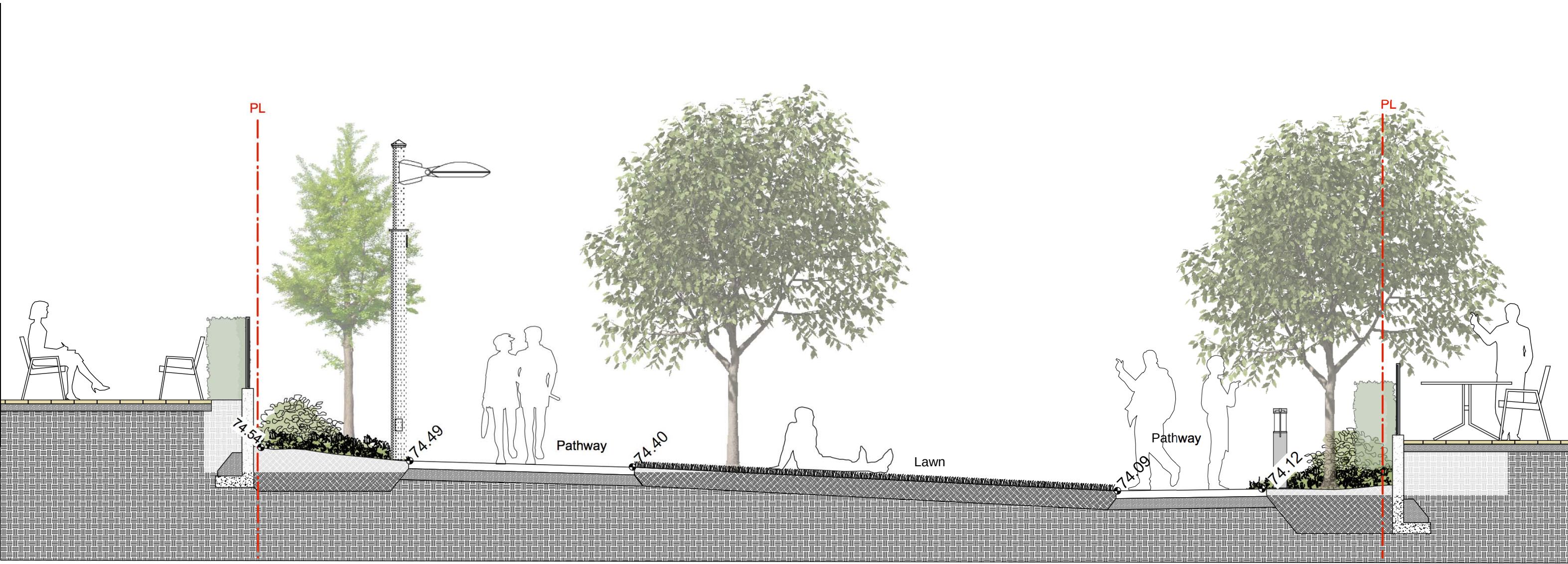
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Illustrative Sections

Project North:	Drawn By:	KS
	Checked By:	MP
Scale:	Job No.:	16-043
As shown		
Sheet No.:		

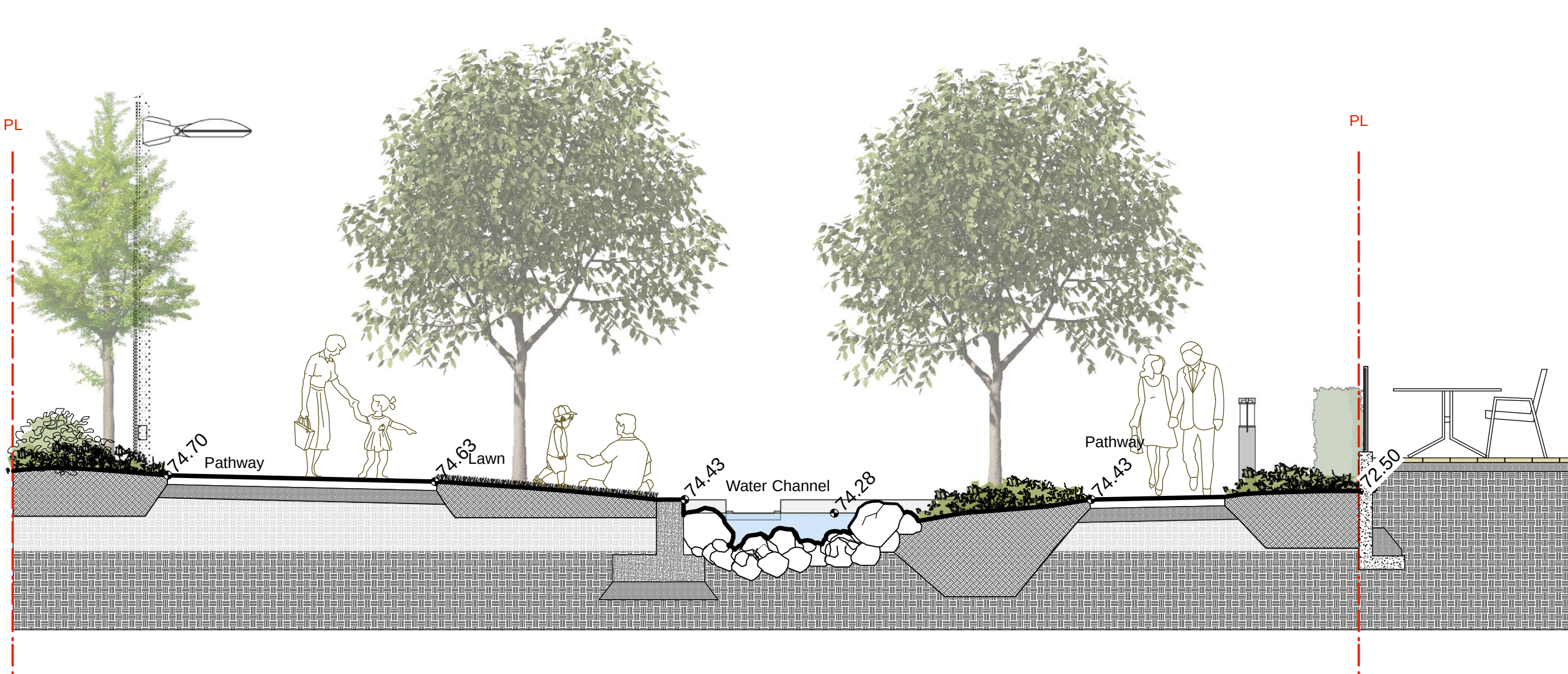
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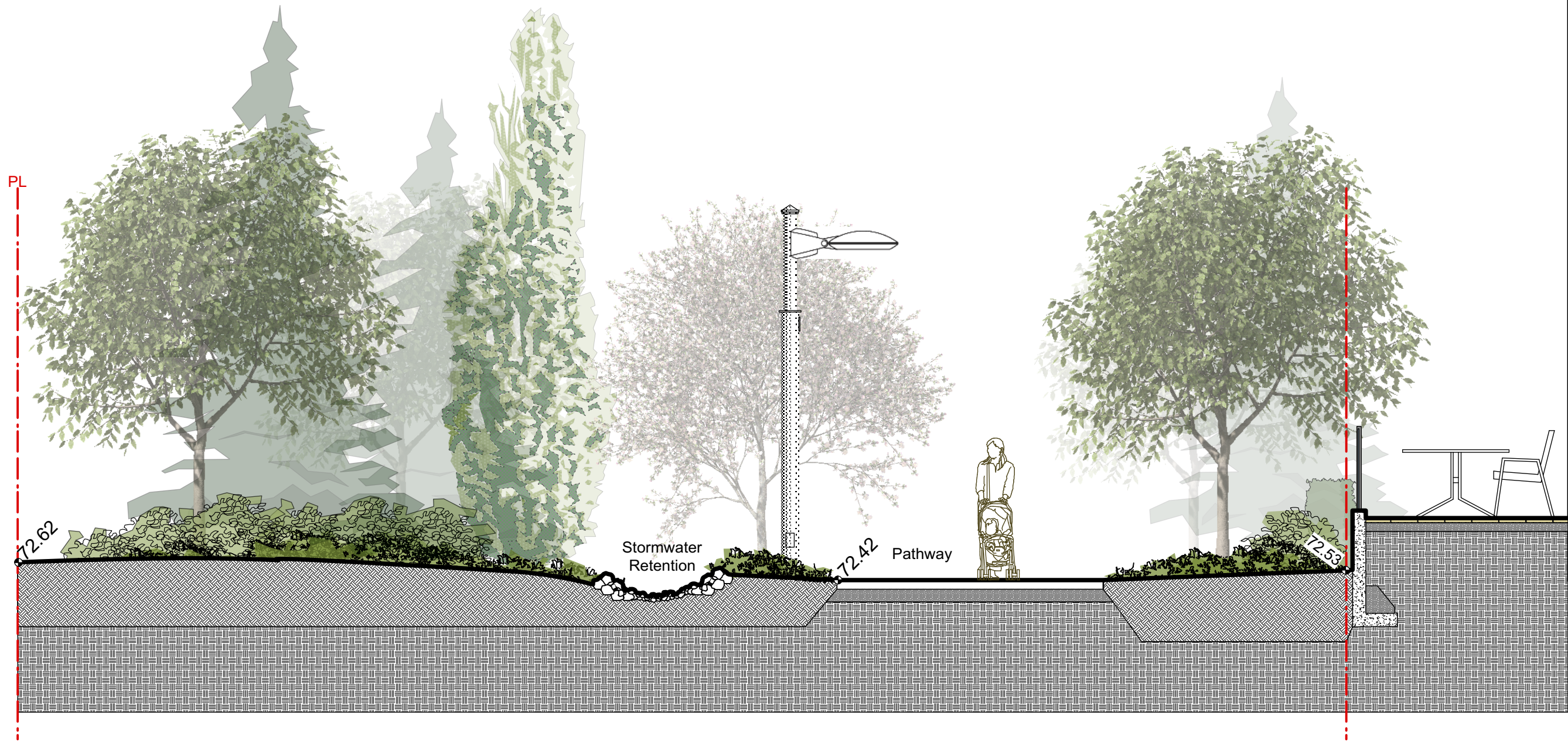
1 SECTION THROUGH SOUTHERN ARM



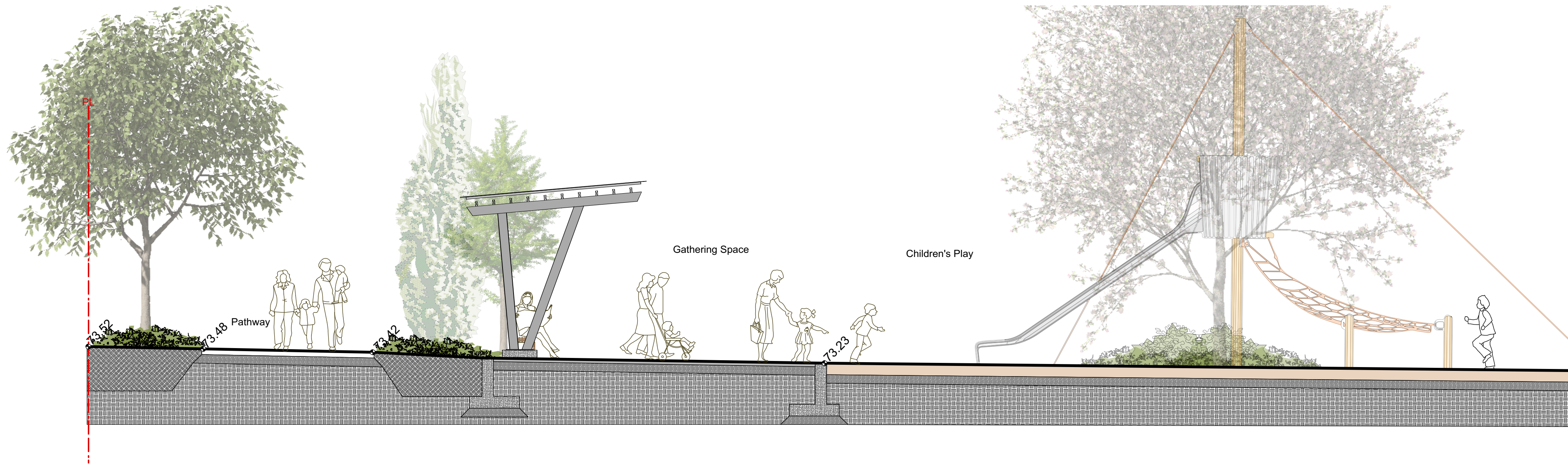
2 SECTION THROUGH WESTERN ARM



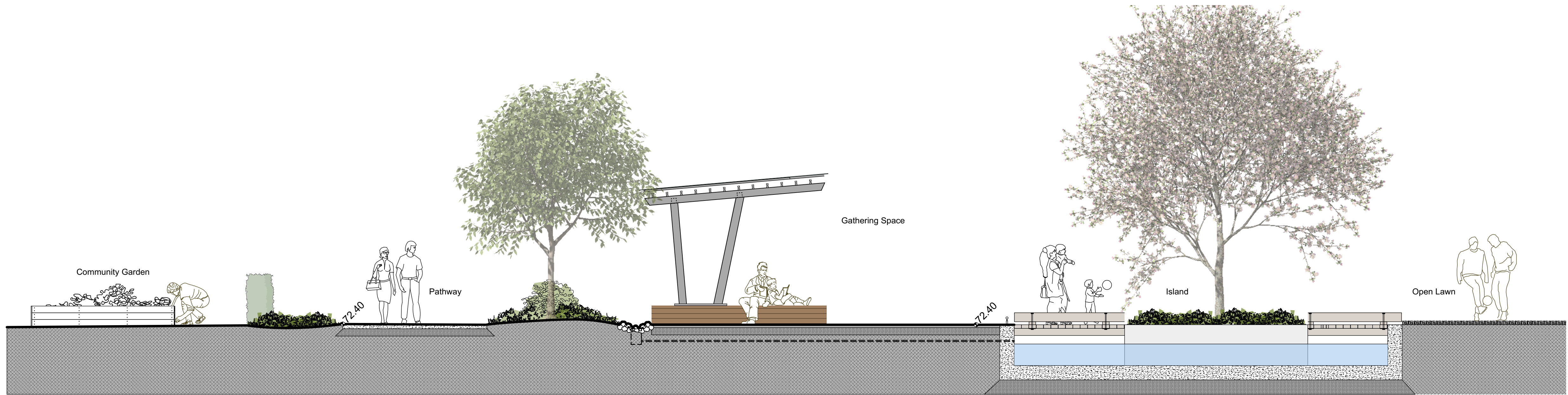
3 SECTION THROUGH NORTHERN ARM



4 SECTION THROUGH EASTERN ARM



5 SECTION THROUGH PLAY AREA



6 SECTION THROUGH PARK CENTRE

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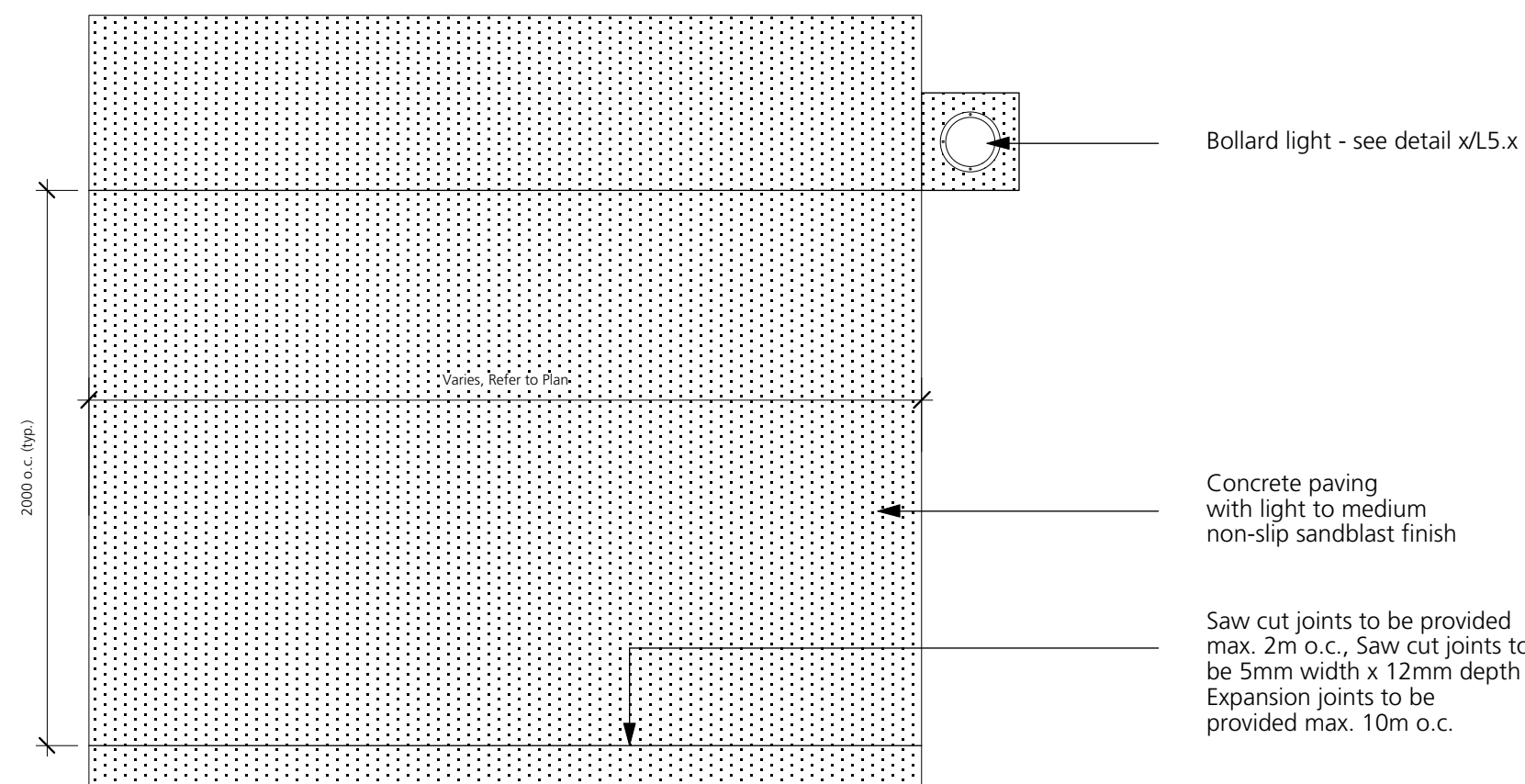
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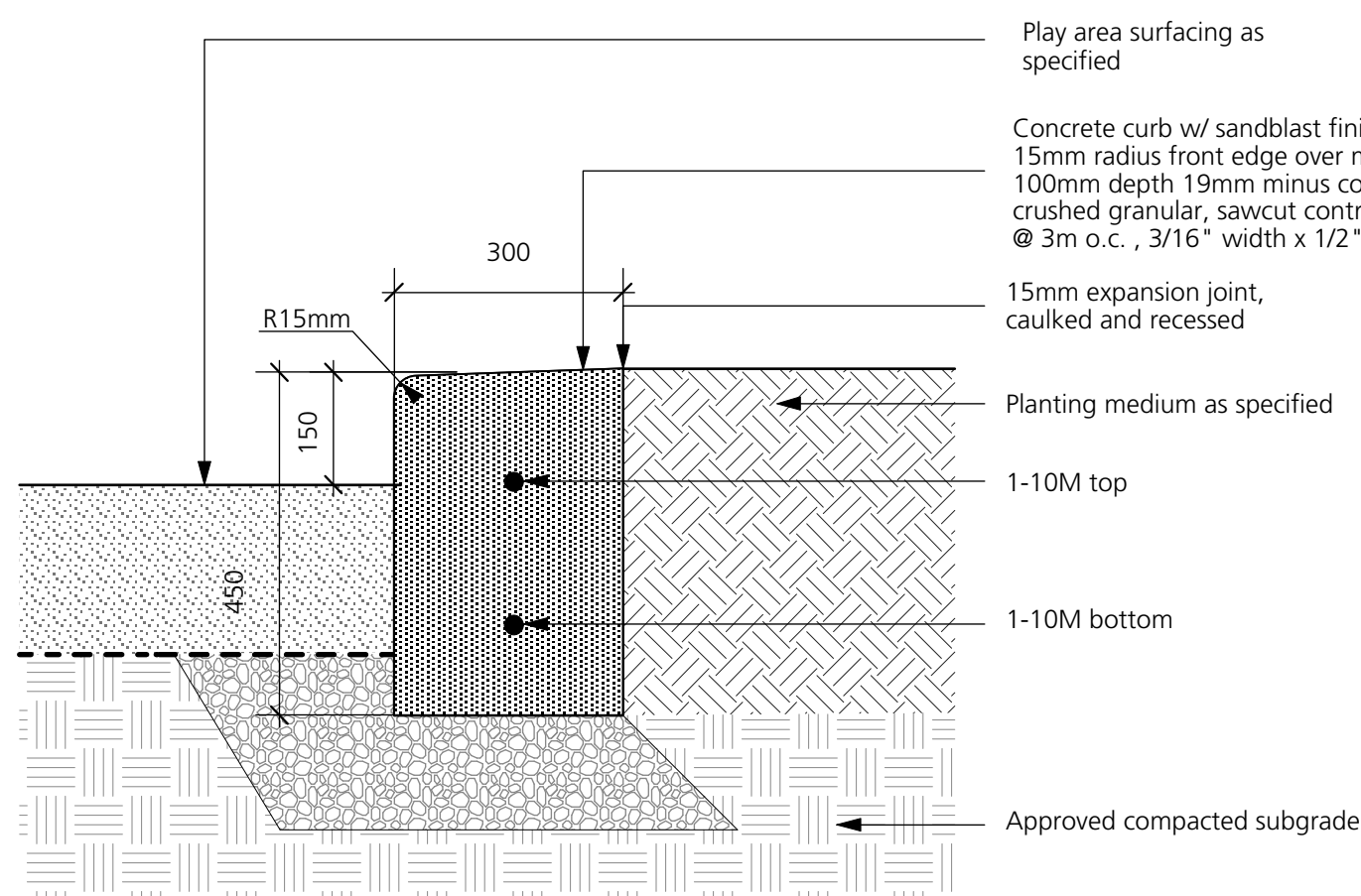
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Drawing Title:
Illustrative Sections

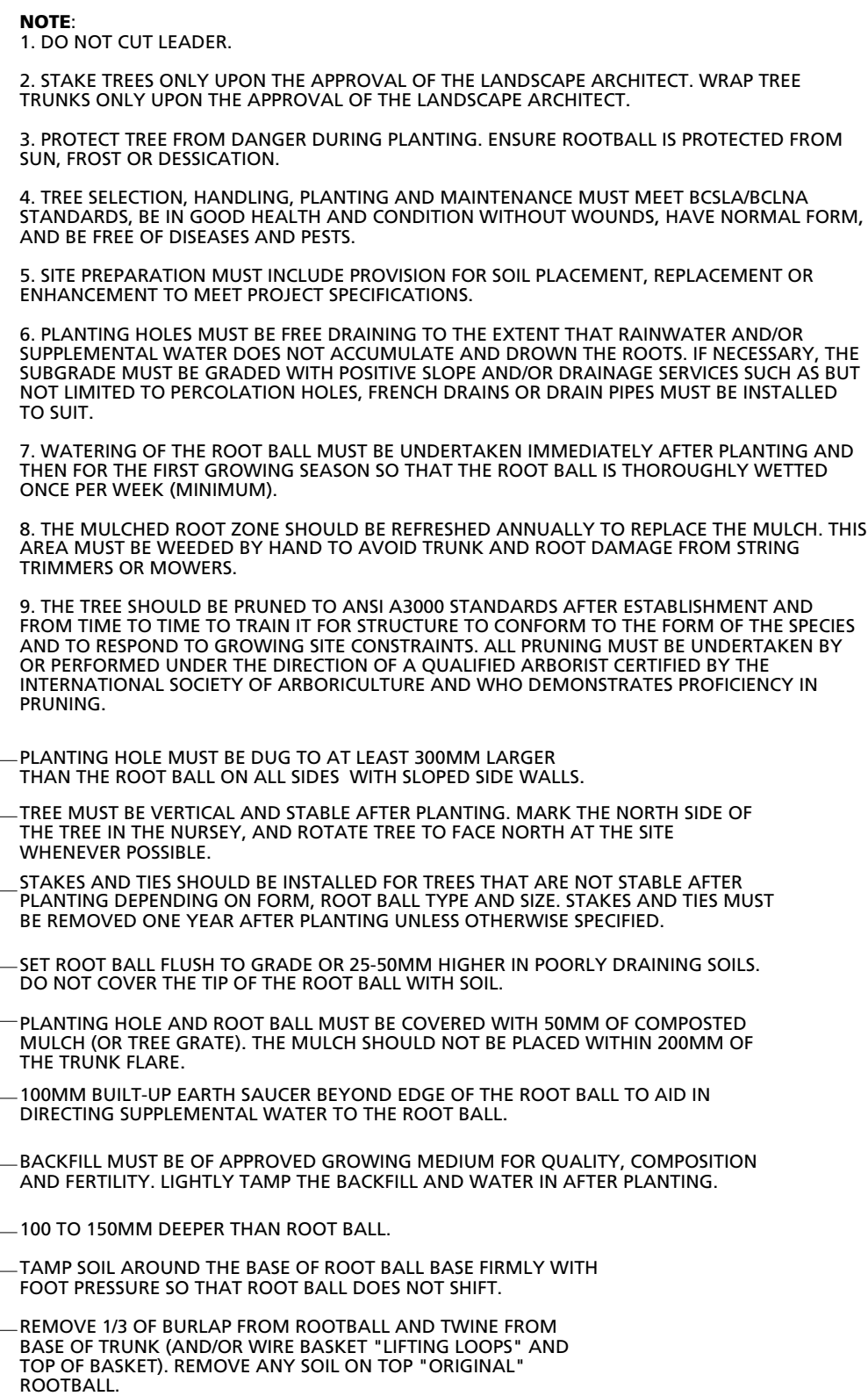
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	Checked By:	JM
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As Shown		
Sheet No.:		



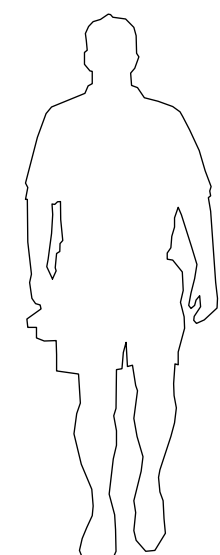
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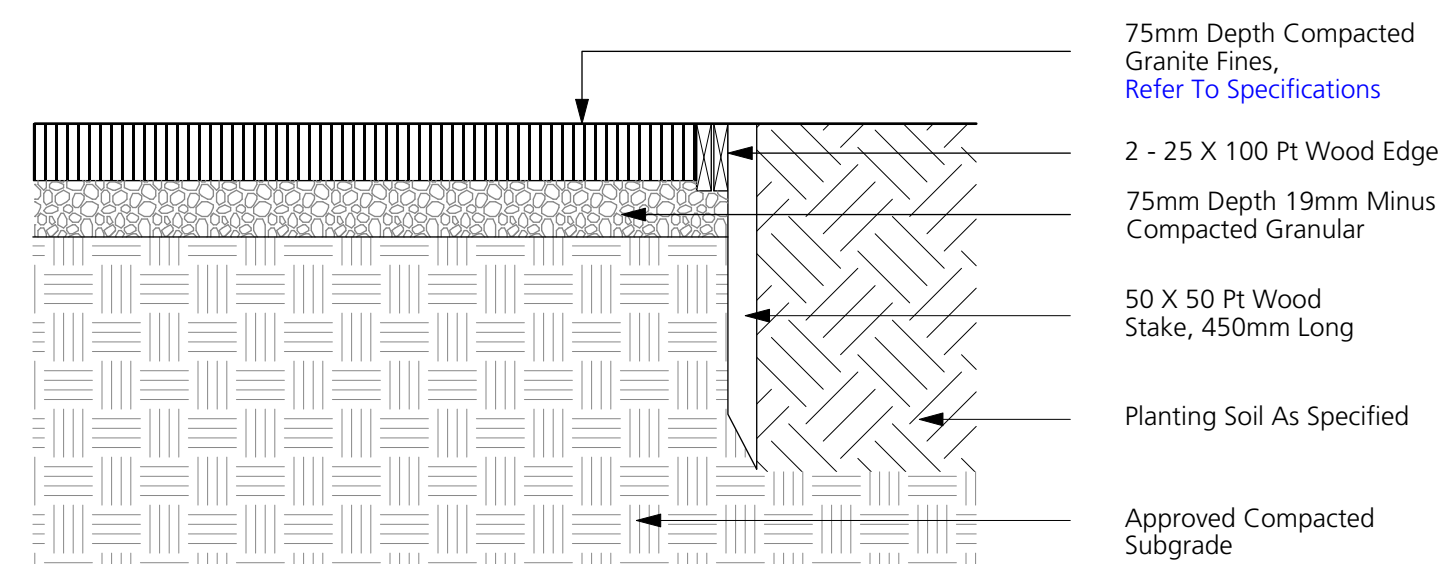
3) Cor 1:10



6) $\frac{1}{1:25}$



7 — Glacé
1:25


$$(2) \frac{\text{Co}}{1:1}$$


PRODUCT:
Hardy island salt and pepper available from bedrock granite sales (604)941-7783.

FINISH:

SUBMITT

2. Contractor to provide a separate mock-up panel for approval by landscape architect prior to proceeding with stone masonry work. mock-up to be a minimum 1.5m widex1.0m ht.

PRODUCT: Nom. 100mm thick precast concrete panel with architectural concrete sandblast finish w/ 25mm deep recessed letters.

FINISH: letters to have a light sandblast finish highlighted with ubc std grey (ral 7043).

typeface to be gill sans regular. panel to be flush with wall.

SUBMITTALS/MOCK UPS:contractor to provide shop drawings for lettering, joint locations, anchors and attachment to wall for approval by landscape architect

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UBC Properties Trust

UBC SC Research Park

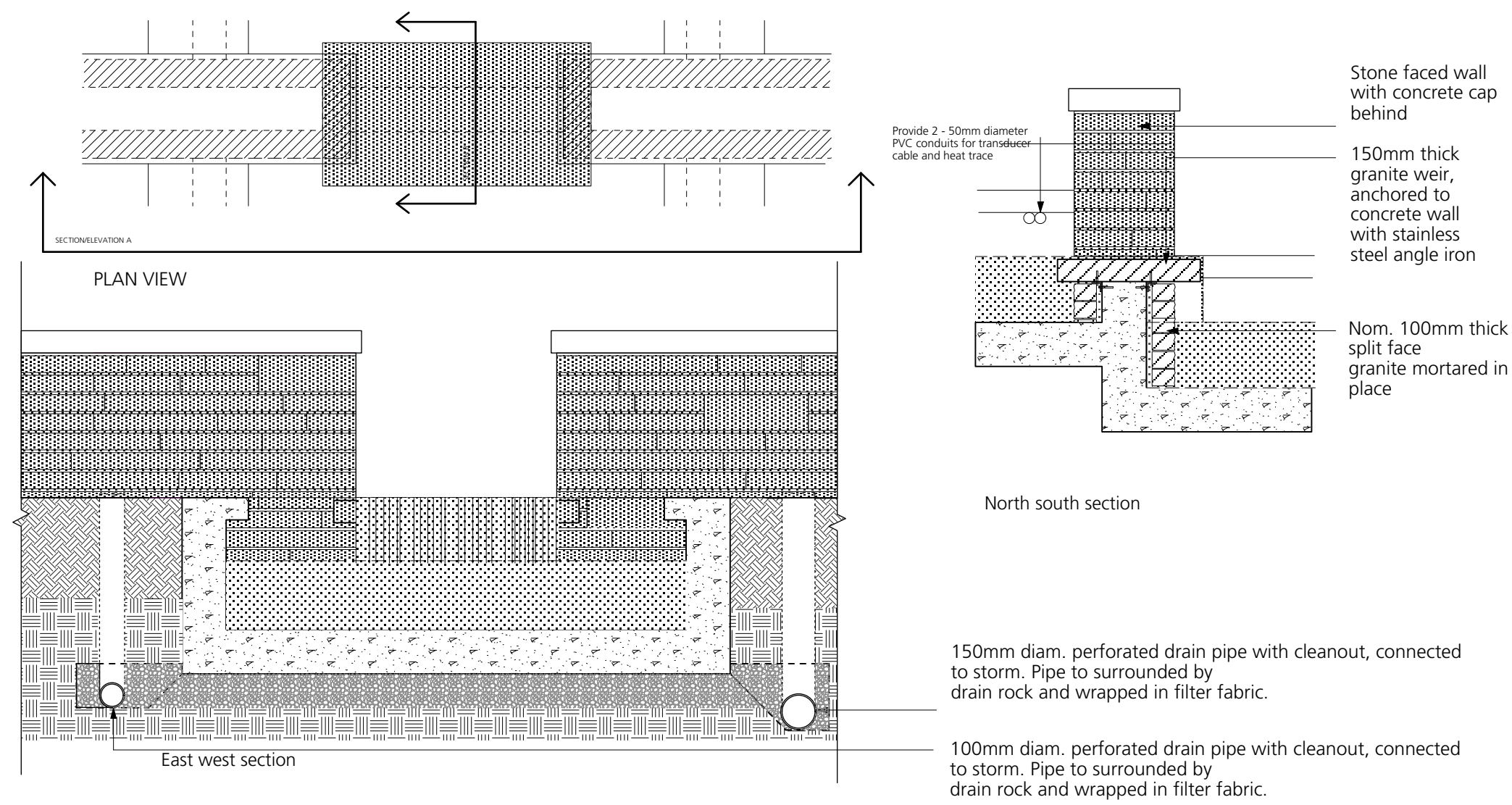
Landscape Details

KS

MF

As shown 16-043

5.0



The drawing consists of two views: a Plan View and an Elevation View.

Plan View: Shows the top-down layout of the bridge. It features a central rectangular concrete bridge with a stippled texture, flanked by two vertical concrete water channel walls. A dimension line at the top indicates the width of the bridge deck, labeled "Varies, refer to Layout plan for length and width".

Elevation View: Shows a side cross-section of the bridge. The central concrete bridge is shown with a stippled texture. It is supported by a base. On top of the bridge, there is a concrete water channel coping, a concrete water channel wall below it, and a 2 - 50mm diameter metal rail. The bridge surface has a stippled texture and is labeled "Concrete bridge with architectural light sandblast finish, score lines in concrete bridge surface every 300mm". The base of the bridge is labeled "Firm bearing approved by geotechnical engineer, typical of all footings". The ground level is indicated by a dashed line, and the base of the bridge is labeled "Approved compacted subgrade, all".

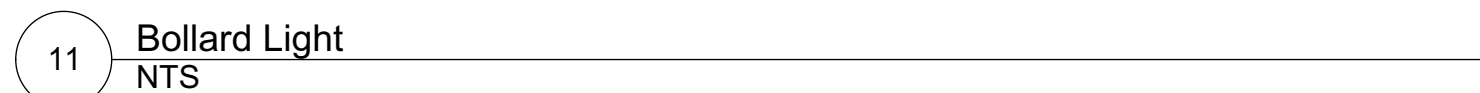
Labels and Dimensions:

- Concrete water channel coping
- Concrete water channel wall below
- 2 - 50mm diameter metal rail
- Concrete bridge with architectural light sandblast finish, score lines in concrete bridge surface every 300mm
- Varies, refer to Layout plan for length and width
- PLAN VIEW
- CIP concrete bridge with architectural light sandblast finish, score lines in concrete bridge surface every 300mm
- Concrete water channel
- 2 - 50mm diameter metal rail
- Paving assembly as specified
- Varies, refer to Layout plan for length and width
- Firm bearing approved by geotechnical engineer, typical of all footings
- Approved compacted subgrade, all

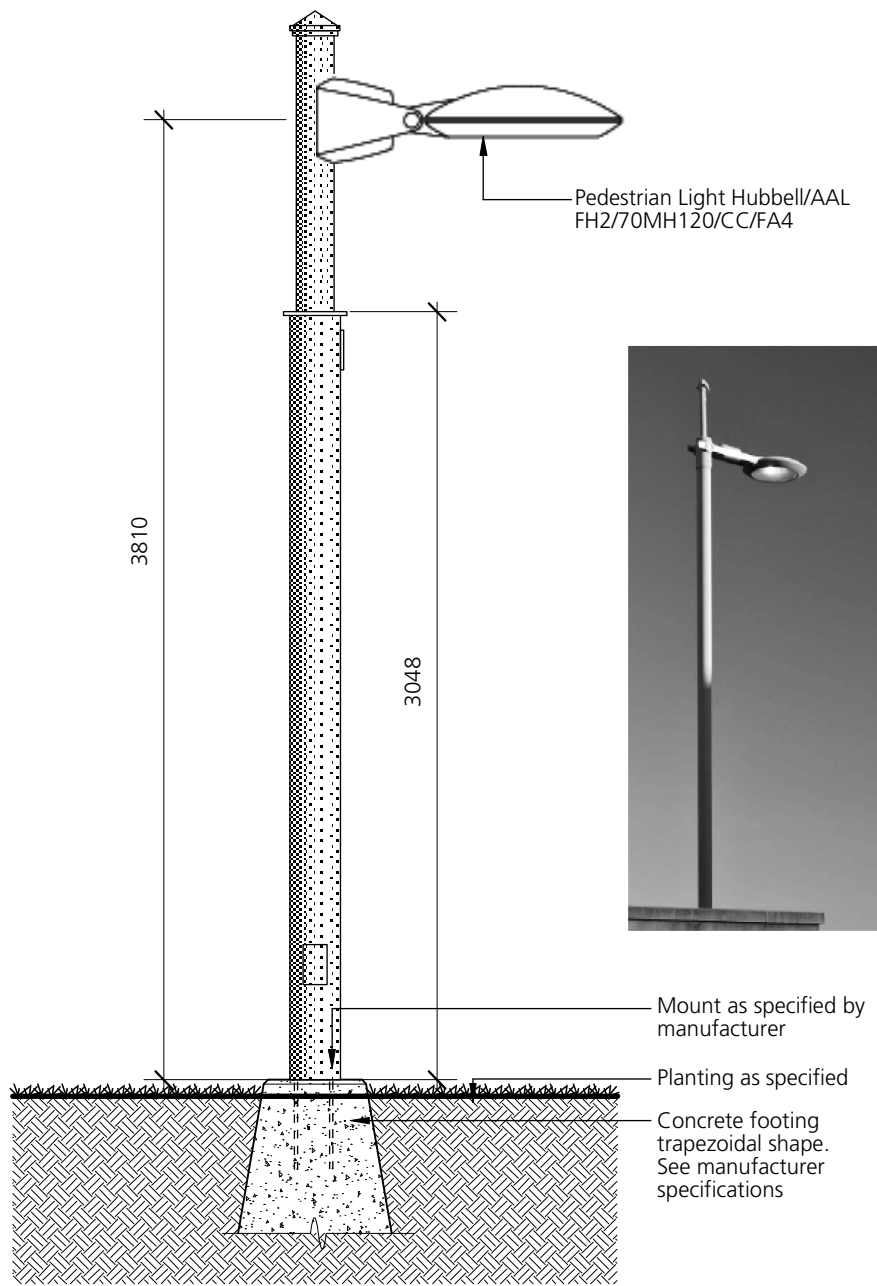
Notes:

- Contractor to provide shop drawings for all metalwork, hardware and attachments for approval by landscape architect and structural engineer.

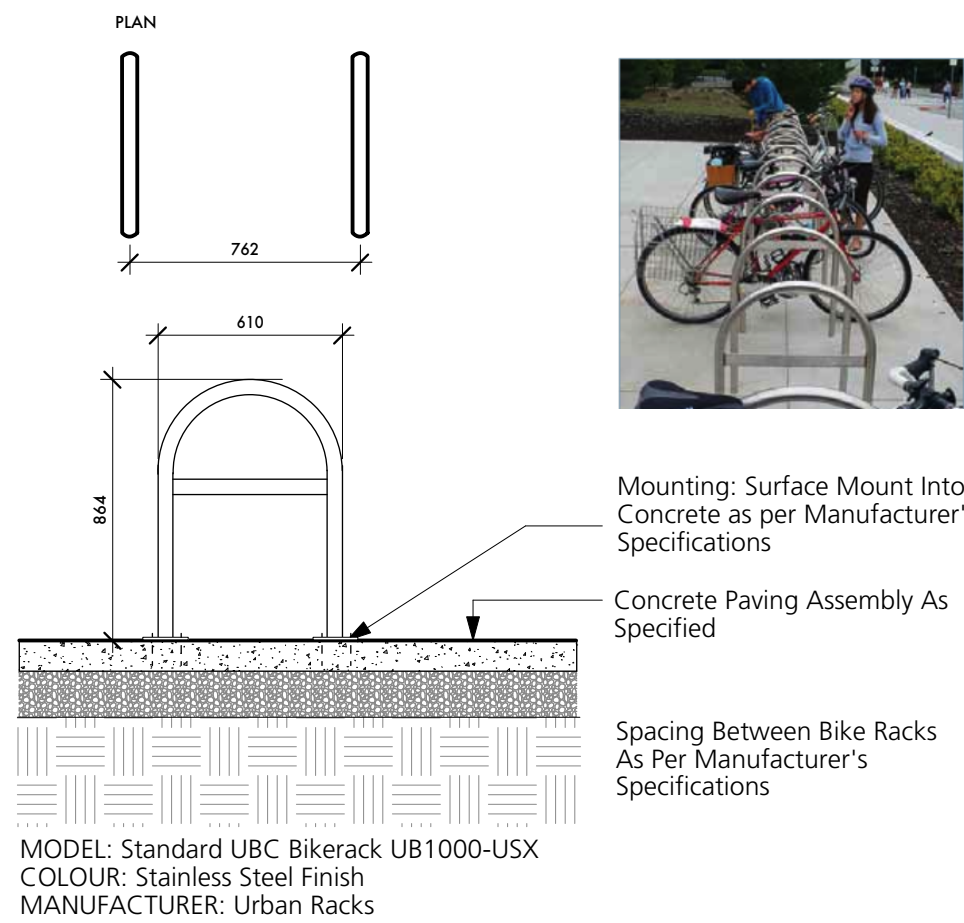
10 Concrete Pedestrian Bridge
1:25



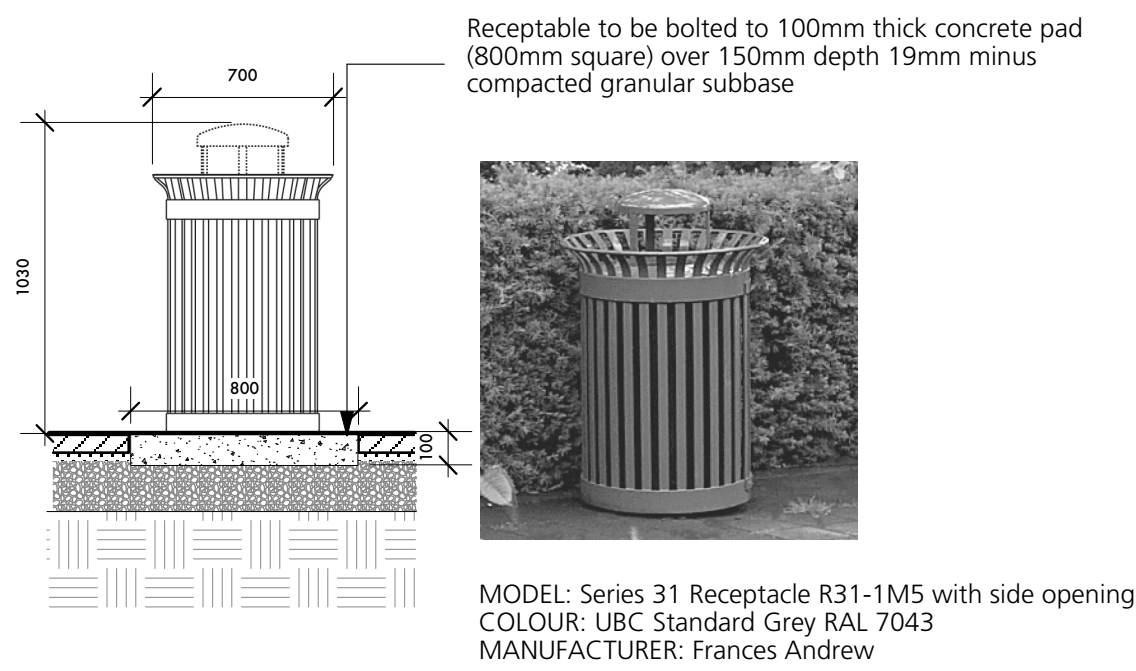
12 Frances Andrew Bench
1:25



13 Pole Light
NTS

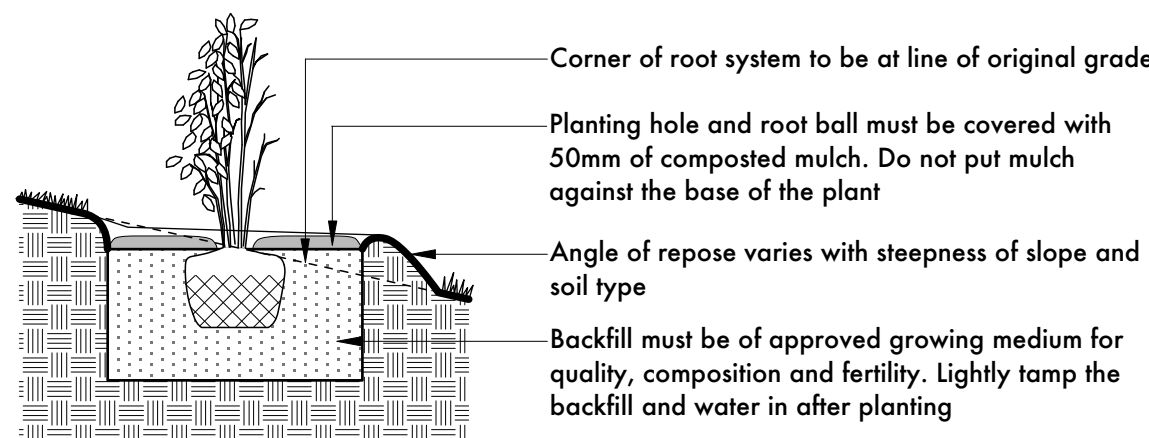
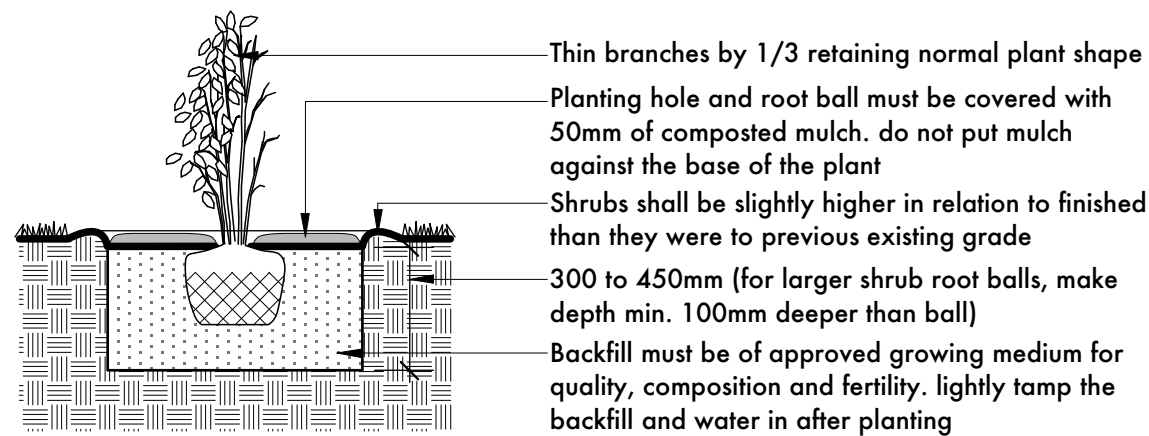


14 Bike Rack
1:25

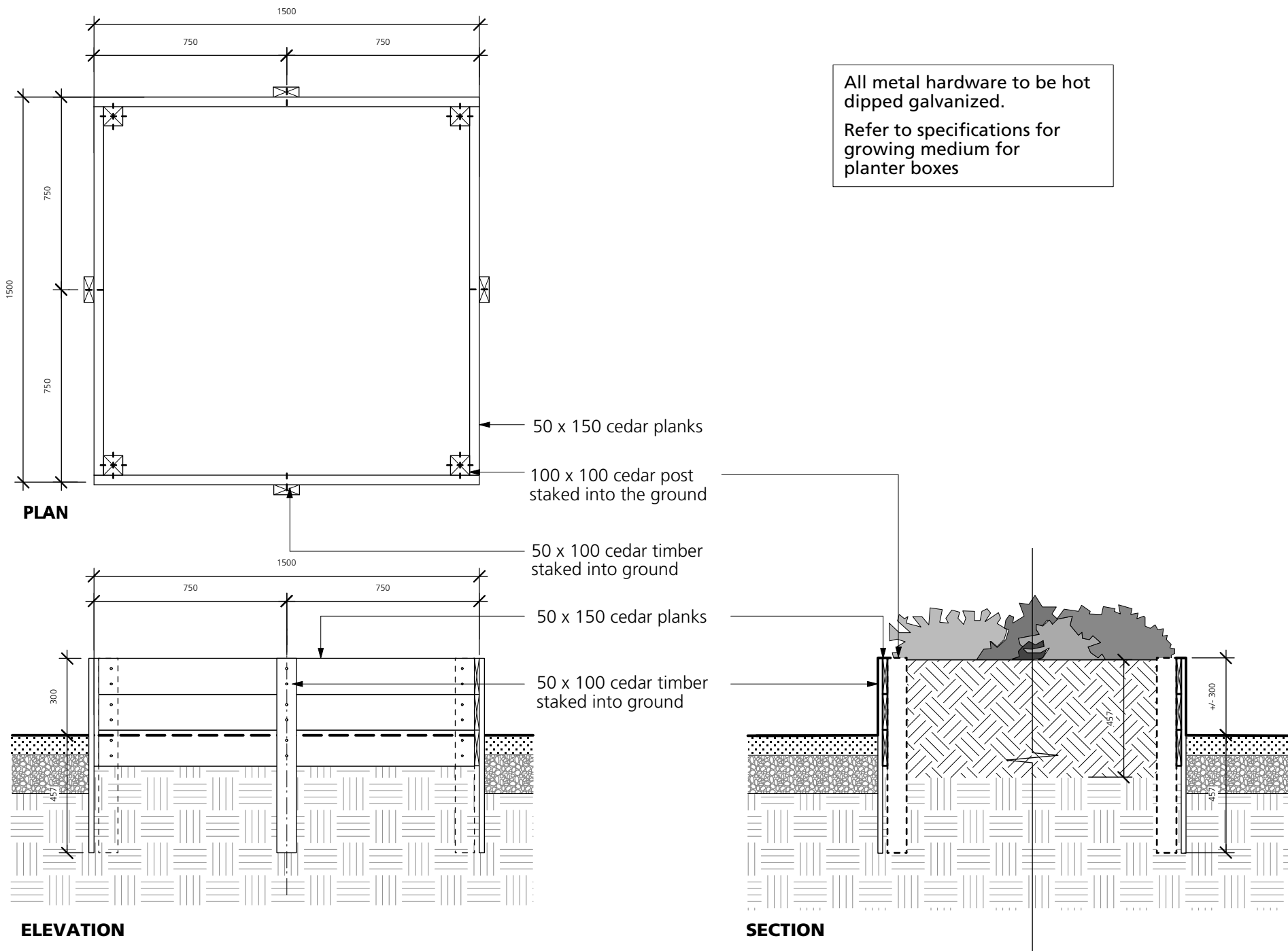
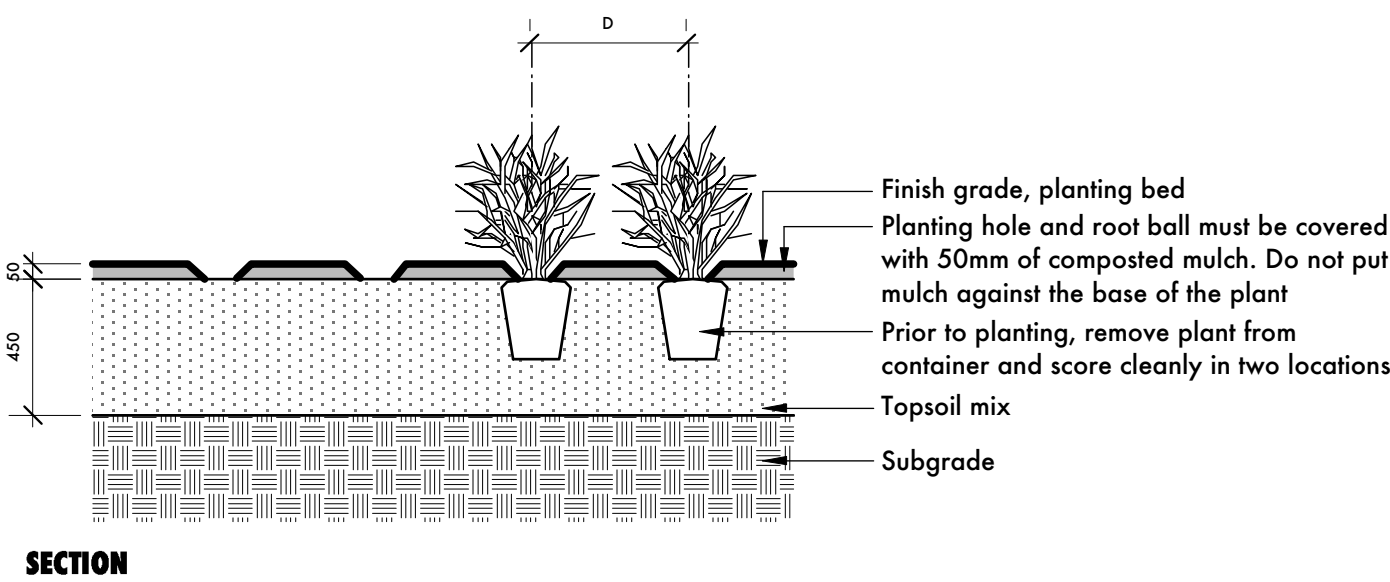
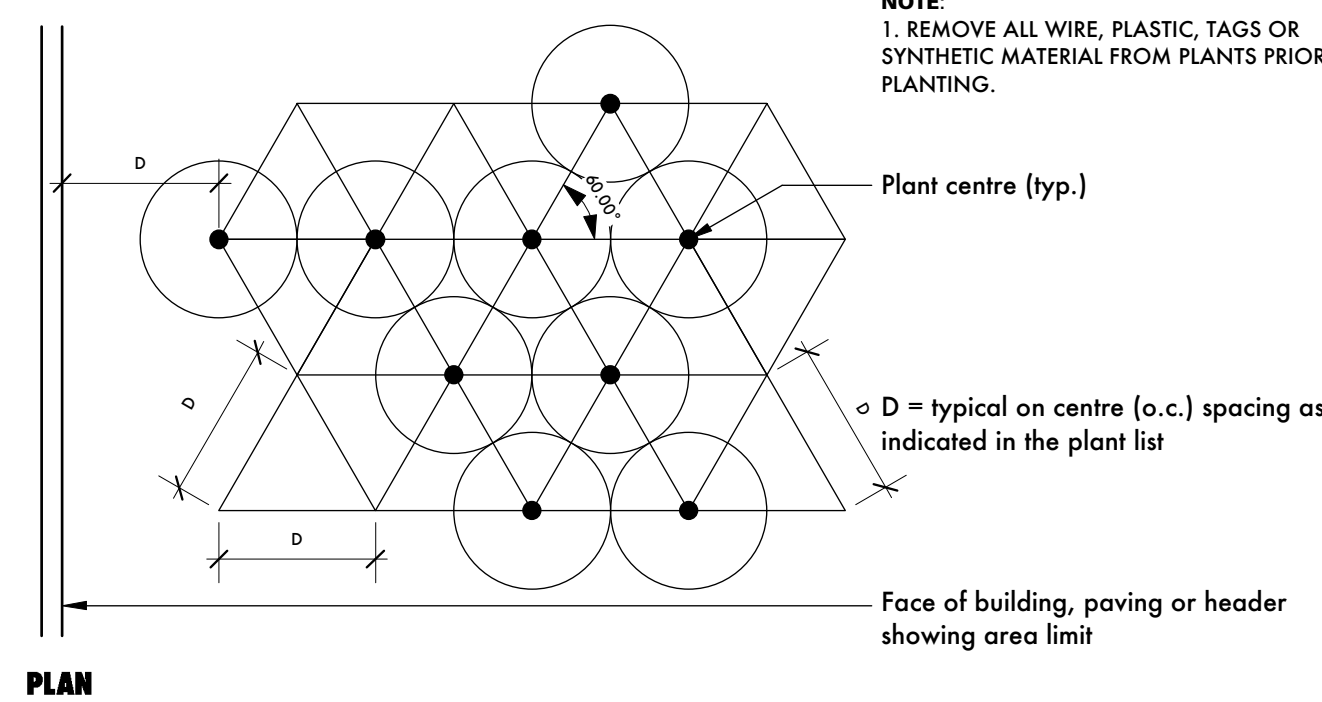


15 Trash Receptacle
1:25

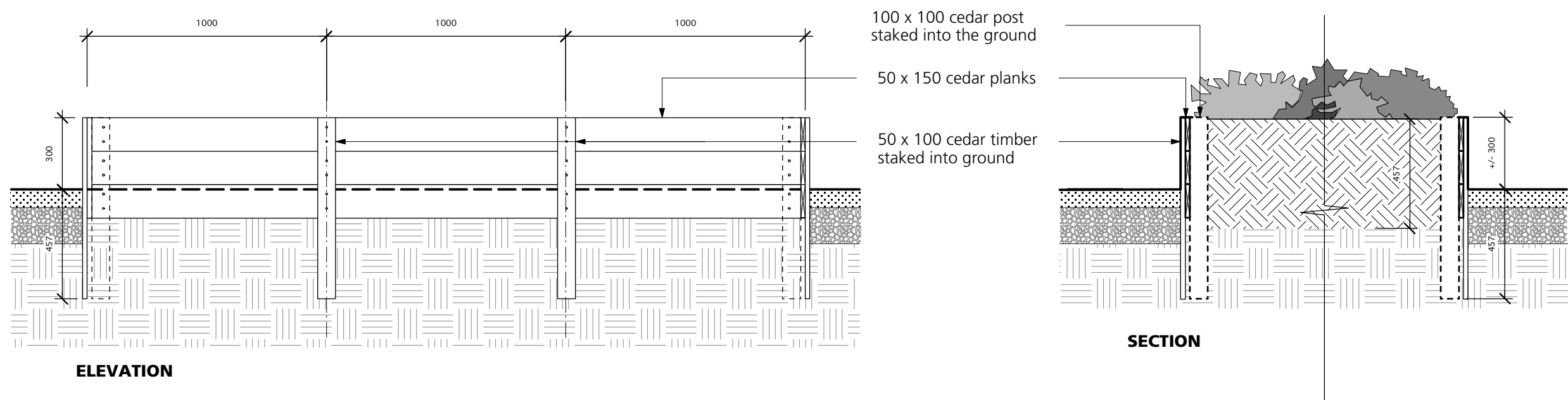
- NOTE:**
1. MIN. ROOT SPREAD TO BE IN ACCORDANCE WITH "AMERICAN STANDARDS FOR NURSERY STOCK."
 2. FOR CONTAINER-GROWN SHRUBS, USE FINGERS OR SMALL HAND TOOLS TO PULL THE ROOTS OUT OF THE OUTER LAYER OF POTTING SOIL; THEN CUT OR PULL APART ANY ROOTS THAT CIRCLE THE PERIMETER OF THE CONTAINER. PRUNE ALL DAMAGED, DISEASED, OR WEAK LIMBS AND ROOTS.
 3. CLEANLY PRUNE ALL DAMAGED ROOT ENDS.
 4. FOLD BURLAP FROM TOP OF ROOT BALL DOWN INTO GROUND SET TOP OF BALL FLUSH WITH FINISH GRADE.
 5. DO NOT ALLOW ROOTS TO DRY OUT DURING INSTALLATION PROCESS.
 6. SOAK ROOTS IN WATER OVERNIGHT BEFORE PLANTING.



16 Shrub and Groundcover Planting
1:25



17 Community Garden Planter Box Type 1
1:20



18 Community Garden Planter Box Type 2
1:20



11 cubic feet recycled plastic 'garden gourmet' compost bin or approved equal

Available from www.gardengourmet.com

Colour: black

Assemble as per manufacturer's specifications.

20 Community Garden Compost Bin
NTS

3	Issued for DP Board	10/03/2017
2	Issued for DRC Review	09/08/2017
1	Issued for Development Permit	03/28/2017

Revision No. Date

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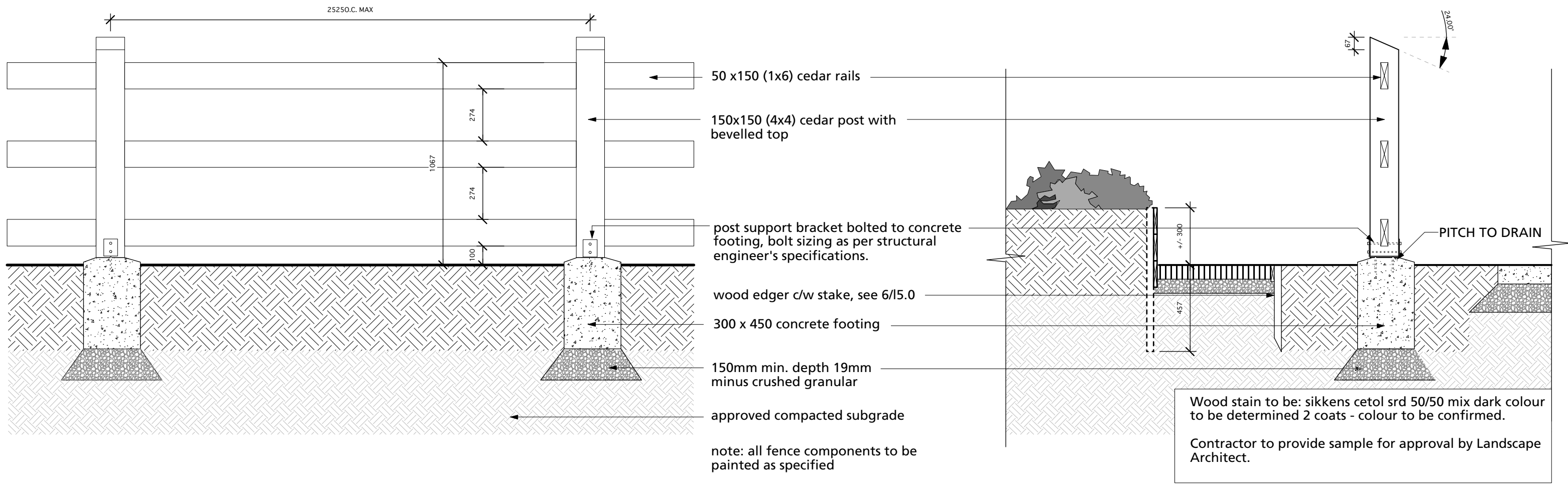
Client:

UBC Properties Trust

Project Title:
UBC SC Research Park

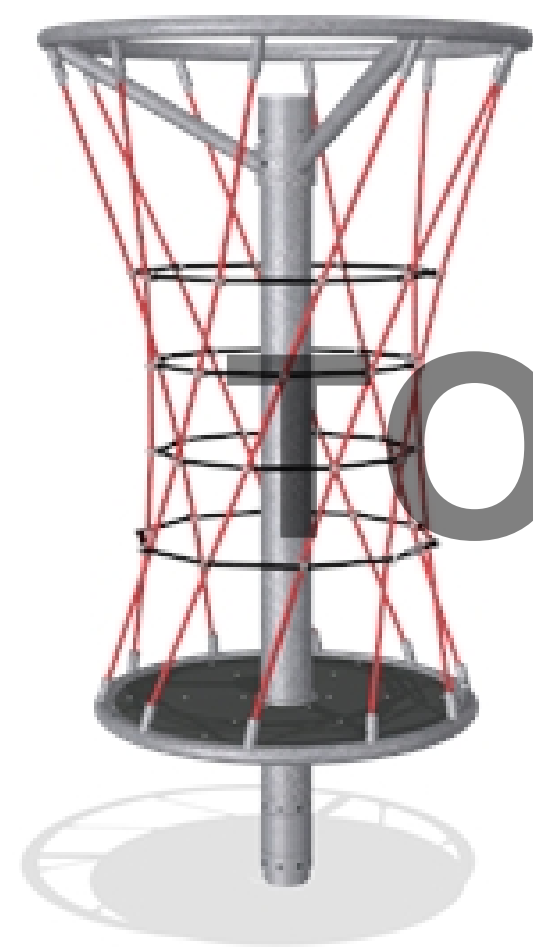
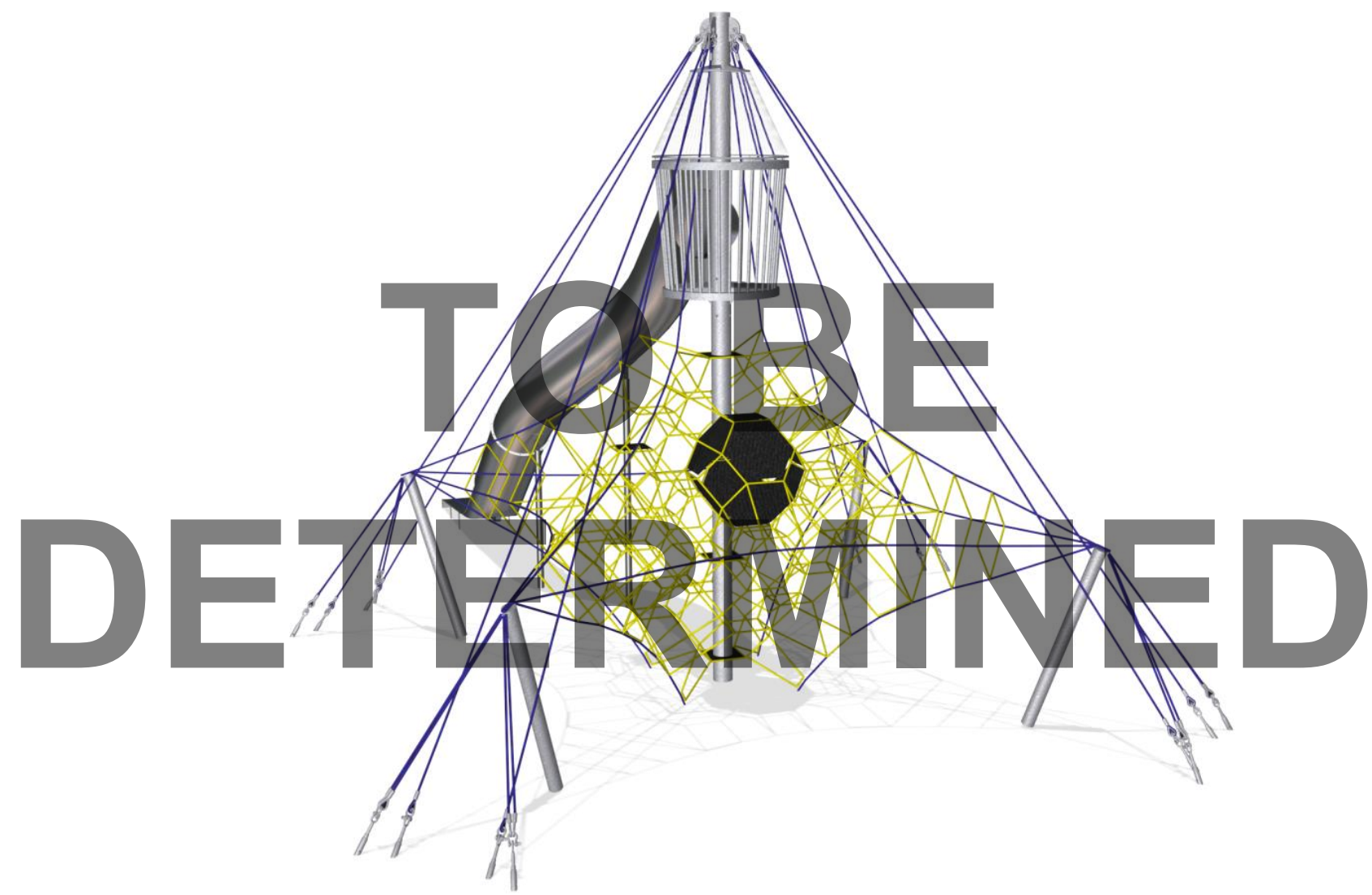
Drawing Title:
Landscape Details

Project North:	Drawn By:	KS
	Checked By:	MP
Scale:	Job No.:	16-043
Sheet No.:		



21 Community Garden Fence
1:20

22 Playground Climber
NTS



23 Playground Spinner
NTS



24 Playground Swings
NTS

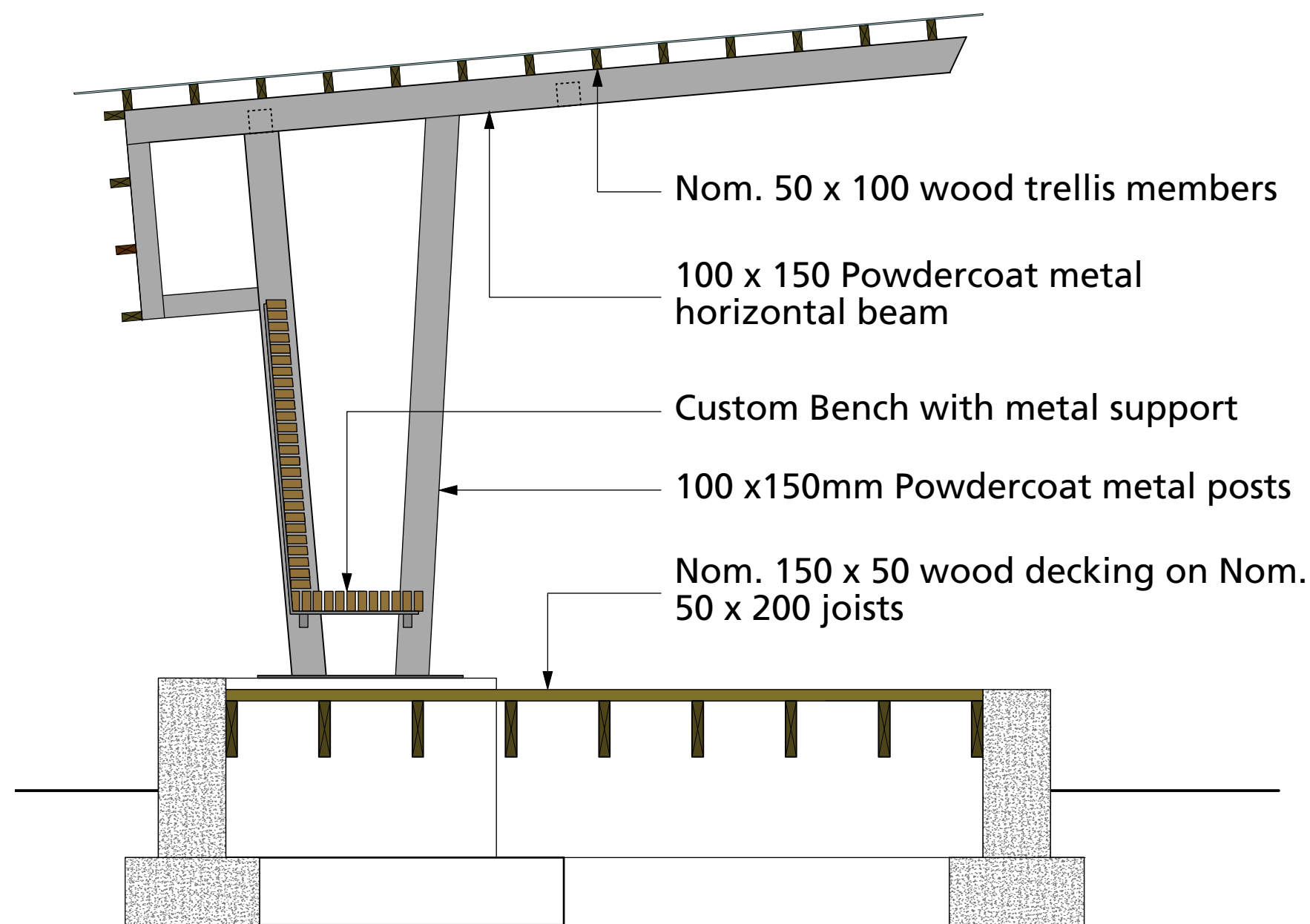


MEDIUM SIZED

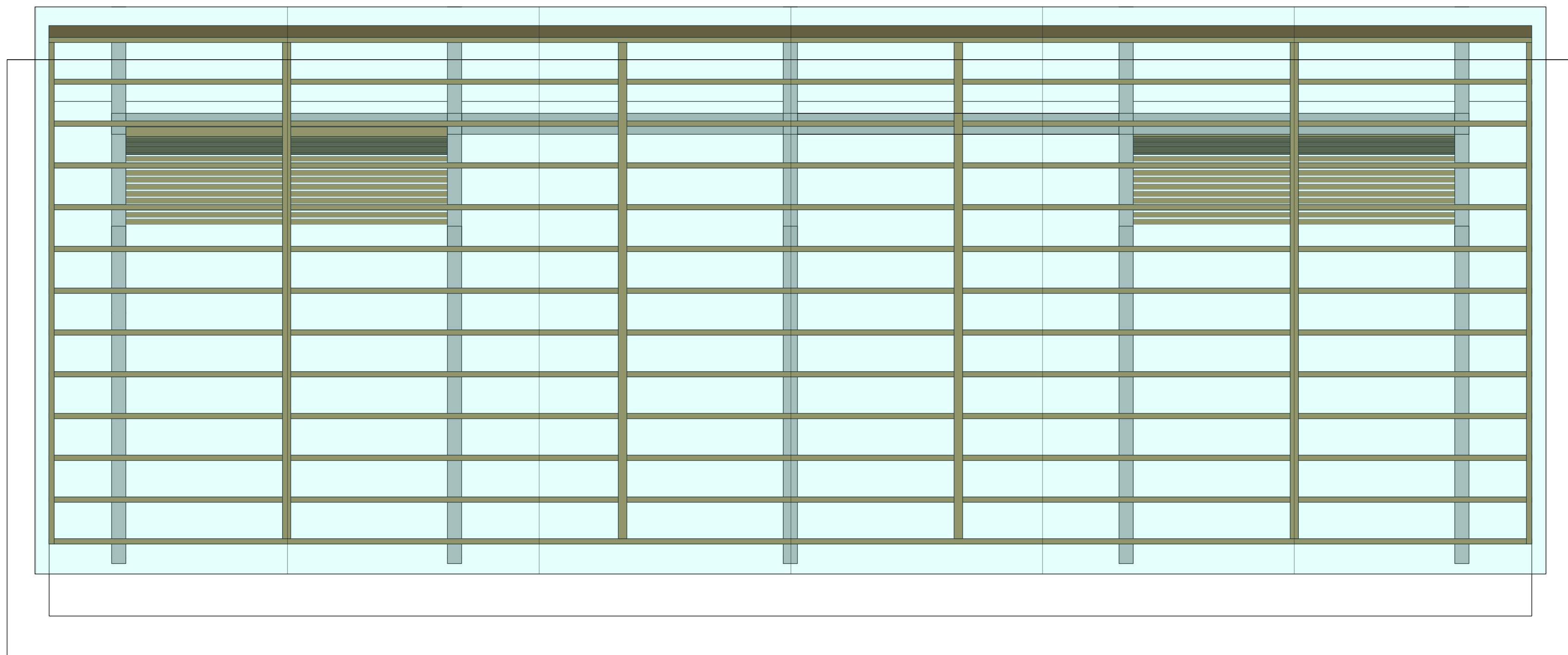
- 10' average height
- 13' average length
- Approx 350 sf
- \$25,000 + shipping / craning

Boulder by Eldorado Wall Company

25 Climbing Boulder
NTS



26 Trellis Detail
1:50



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Client:
UBC Properties Trust

Project Title:
UBC SC Research Park

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Project North:	Drawn By:	KS
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As shown		
Sheet No.:		