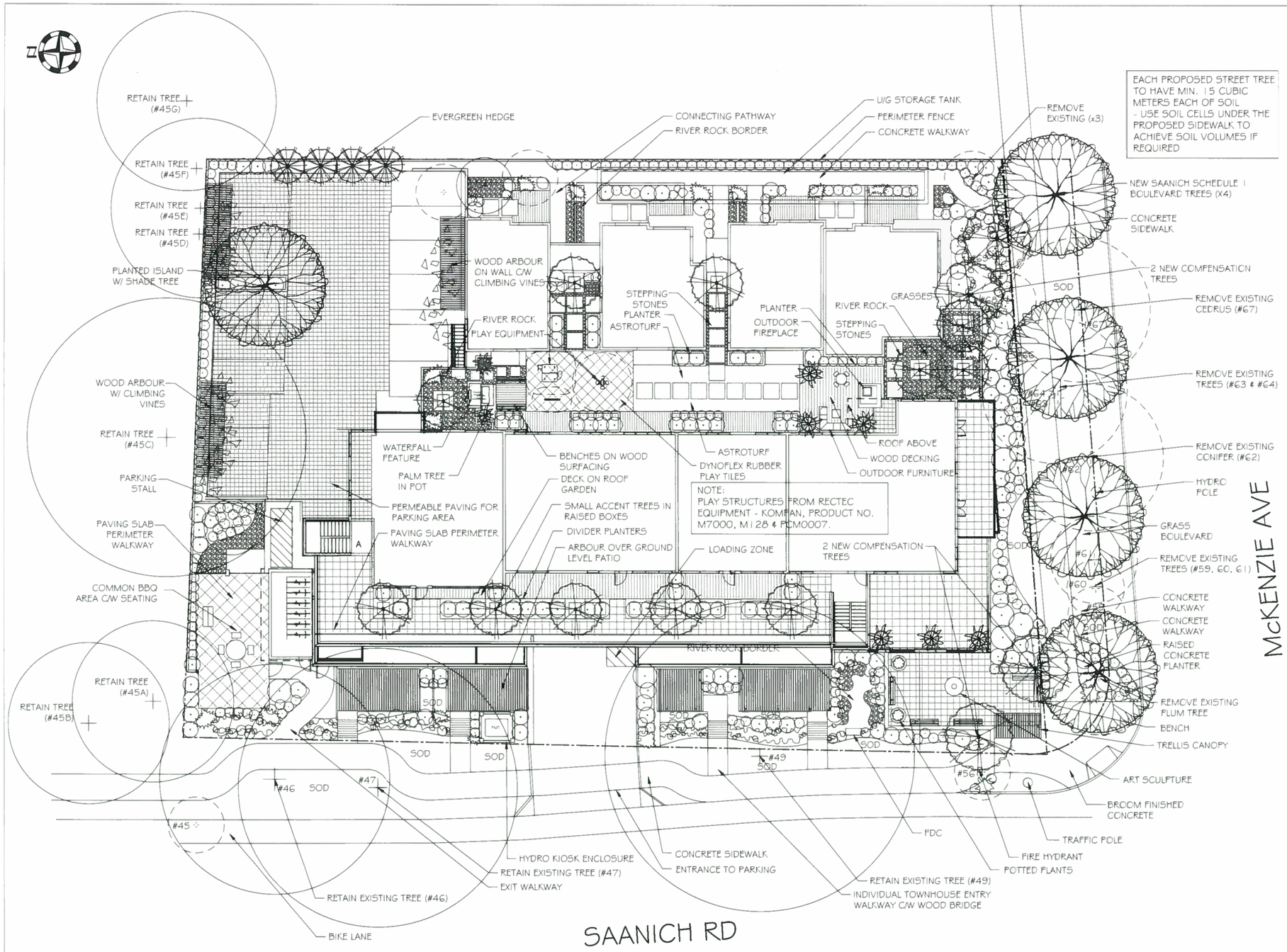


EACH PROPOSED STREET TREE TO HAVE MIN. 15 CUBIC METERS EACH OF SOIL - USE SOIL CELLS UNDER THE PROPOSED SIDEWALK TO ACHIEVE SOIL VOLUMES IF REQUIRED

SUGGESTED PLANT LIST

	Common Name	Latin Name	Size
Trees	Vine Maple	Acer circinatum	6cm Cal.
	Japanese Maple	Acer palmatum var.'Bloodgood'	6cm Cal.
	Katsura Tree	Cercidiphyllum japonicum	8cm Cal.
	Pacific Dogwood	Cornus nuttalii var.'Radiata White Wonder'	6cm Cal.
	Serbian Spruce	Picea omorika	2.5m Ht.
	Autumn Flowering Cherry	Prunus autumnalis	8cm Cal.
	Garry Oak	Quercus garryana	6cm Cal.
	Japanese Snowbell	Styrax japonica	6cm Cal.
	Western Red Cedar	Thuja plicata var. 'Excelsa'	2.5m Ht.
	Lavalle Hawthorn	Crataegus x Lavallei	6cm Cal.
Large Shrubs	California Lilac	Ceanothus var.'Victoria'	1.5m Ht.
	Dwarf Burning Bush	Euonymus alata var. 'Compacta'	#5 Pot
	Star Magnolia	Magnolia stellata var.'Royal Star'	#5 Pot
	Lily of the Valley Shrub	Pieris japonica var.'Forest Flame' & 'Valley Rose'	#5 Pot
	Rhododendron	Rhododendron var.'Pink Walloper' & 'Gomer Waterer'	#5 Pot
	Upright Cedar	Thuja occidentalis var.'Smaragd'	1.5m Ht.
	Viburnum	Viburnum tinus var.'Spring Bouquet'	#5 Pot
	Summer Snowflake Viburnum	Viburnum plicatum var.'Summer Snowflake'	#5 Pot
Shrubs	Glossy Abelia	Abelia x grandiflora	#2 Pot
	Mexican Orange Blossom	Choisya ternata	#5 Pot
	Variegated Dogwood	Cornus alba var.'Sibirica Elio'	#2 Pot
	Salal	Gaultheria shallon	#2 Pot
	Dwarf Oregon Grape	Mahonia aquifolium var.'Compacta'	#2 Pot
	Otto Luyken Laurel	Prunus laurocerasus var.'Otto Luyken'	#2 Pot
	Rhododendron	Rhododendron var.'Unique' & 'Christmas Cheer'	#5 Pot
	Red Flowering Currant	Ribes Sanguineum var. Kina Edward	#2 Pot
	Nootka Rose	Rosa nutkana	#2 Pot
	Snowberry	Symphoricarpos albus	#2 Pot
	David Viburnum	Viburnum davidii	#2 Pot
Small Shrubs	Evergreen Azalea	spp	#2 Pot
	Autumn Fern	Dryopteris erythrosora	#5P5 Pot
	Winter Flowering Heather	Erica darleyensis var.'Arthur Johnson'	#1 Pot
	Dwarf Escallonia	Escallonia x Newport Dwarf	#2 Pot
	Creeping Euonymus	Euonymus fortunei var.'Emerald Gaiety'	#1 Pot
	Lenten Rose	Helleborus orientalis & Helleborus niger	#1 Pot
	Hydrangea	Hydrangea macrophylla var.'Forever Pink'	#1 Pot
	Cascade mahonia	Mahonia nervosa	#1 Pot
	Dwarf Mock Orange	Philadelphus lewisii var.'Snowdwarf'	#1 Pot
	Dwarf Lily of the Valley Shrub	Pieris japonica var.'Desuitante'	#1 Pot
	Sword Fern	Polystichum munitum	#1 Pot
	Dwarf Rhododendron	Rhododendron var.'Bow Bells' & 'Jock'	#2 Pot
	Sweetbox	Sarcococca hookerana humilis	#1 Pot
Ground	Bearberry	Arctostaphylos uva-ursi var.'Vancouver Jade'	SP4
	Heart-leaf Bergenia	Bergenia cordifolia var.'Bressingham Ruby'	SP6
	Bunchberry	Cornus canadensis	SP4
	Mountain Cranberry	Vitis idaea minus	SP4
Vines	Evergreen Clematis	Clematis armandii	#5 Pot
	Clematis	Clematis var. 'Elizabeth'	#2 Pot
	Winter Flowering Jasmine	Jasminum nudiflorum	#1 Pot
	Summer Jasmine	Jasminum officinale	#1 Pot
	Virginia Creeper	Parthenocissus quinquefolia var.'Engelmannii'	#1 Pot
Perennials	Astilbe	Astilbe chinensis var.'Pumila'	SP5
	Montbretia	Crocosmia var.'Lucifer'	SP5
	Dwarf Daylily	Hemerocallis var.'Stella d'Oro'	SP5
	Coral Bells	Heuchera micrantha var.'Bressingham Bronze'	SP5
	Sweet Iris	Iris pallida var.'Aureo - Variegata'	SP5
	English Lavender	Lavandula angustifolia var.'Hidcote'	SP5
	Kaffir Lily	Schizostylis coccinea var.'Oregon Sunset'	SP5
Wildflowers & Bulbs	Common Camas	Camassia quamash	Bulb
	Crocus	Crocus chrysanthus ssp.	Bulb
	Shooting Star	Dodecatheon hendersonii	Bulb
	Easter Lily	Erythronium oregonum	Bulb
	Chocolate Lily	Fritillaria lanceolata	Bulb
	Snowdrops	Galanthus nivalis	Bulb
	Tulip	Tulipa clusiana	Bulb
	Blue Violet	Viola adunca	#1 Pot

Notes: - All landscape work to conform with B.C.S.L.A. / B.C.N.T.A. standard specification.
- All areas to be irrigated with an automatic underground system.

SOFTSCAPE LEGEND

- DECIDUOUS TREE
- LARGE AND SMALL CONIFEROUS TREES
- SMALL ORNAMENTAL DECIDUOUS TREES
- LARGE SHRUB
- MEDIUM SHRUB
- SMALL SHRUB
- GROUND COVER & PERENNIALS

TREES TO BE RETAINED

TREES TO BE REMOVED

TREE PROTECTION FENCING WILL BE PROVIDED FOR ALL RETAINED TREES AND TREE REPLACEMENT PLANTING SITES

GROWING MEDIA SOURCE & INSTALLATION TO BE APPROVED BY LANDSCAPE ARCHITECT

BOULEVARD TREE IRRIGATION SYSTEM MUST BE ON ITS OWN TIMER

SAANICH WILL REQUIRE ROOT BARRIER ADJACENT TO ALL SIDEWALKS

SPECIFICATIONS USING A DOUBLE RING DRIP SYSTEM W/ A DOUBLE CHECK VALVE

IRRIGATION TO THE BOULEVARD TREES SHALL BE PROVIDED BY THE DEVELOPER BY A WATER METER THAT IS SEPARATE FROM THE BUILDING. THE BOULEVARD TREE IRRIGATION SYSTEM SHALL BE INSTALLED BY THE APPLICANT'S CONTRACTOR TO IIABC & DISTRICT OF SAANICH

Saanich & McKenzie
Landscape Concept Plan

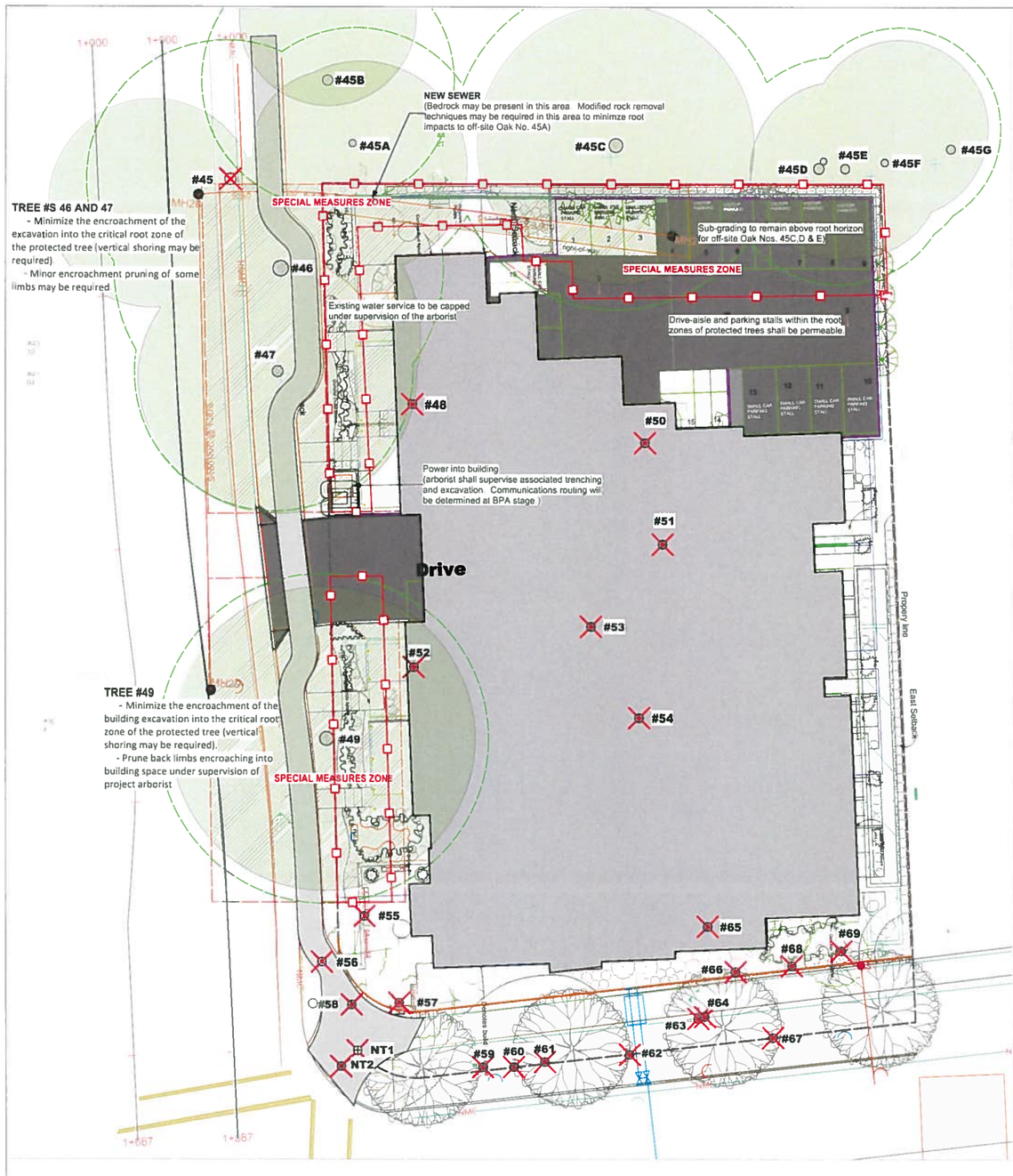
SCALE
1:150

DATE
JUNE 4, 2020 (REVISED)

NOTES

DRAWN BY
BF/RF

4☆SITE
LANDSCAPE ARCHITECTURE AND SITE PLANNING 250.508.7885



TREE INVENTORY TABLE

G&A Tree ID	Common Name	DBH (cm)	PRZr (m)	Crown Radius (m)	Health	Structural Condition	Bylaw Protected Tree?	Comments	Recommendations
ON-SITE TREES (16)									
48	Walnut	44	8	4	Good	Good	No		**REMOVE**
50	Sycamore maple	40	7	4	Good	Fair	No		**REMOVE**
51	Cherry	42	8	4	Good	Fair	No		**REMOVE**
52	Cherry	18	3	2	Fair	Fair	No		**REMOVE**
53	Locust X6	12 to 18	4	4	Good	Fair	No		**REMOVE**
54	Apple (no tag)	18	3	2	Good	Fair	No	No tag	**REMOVE**
55	Golden cedar	30, 29, 26	5	4	Good	Fair	**Yes**		**REMOVE**
57	Cypress	68	7	4	Good	Poor	**Yes**	Multiple leaders, included bark. 59.7 cm @ 3 m height	**REMOVE**
58	Ornamental plum	24	4	4	Good	Fair	No		**REMOVE**
59	Ornamental plum X3	12 to 24	4	4	Good	Fair	No		**REMOVE**
63	Cherry	36, 20, 16	6	5	Fair	Fair	**Yes**		**REMOVE**
64	Laburnum	38	7	5	Good	Fair	No		**REMOVE**
65	Deodar cedar	84	10	7	Good	Fair	**Yes**	Lean east	**REMOVE**
66	Deciduous sp. X2	22,24	5	5	Good	Fair	No		**REMOVE**
68	Douglas fir	31	5	4	Good	Fair	**Yes**		**REMOVE**
69	Red cedar	28	5	3	Fair	Fair	No		**REMOVE**
BOUNDARY TREES (5)									
NT1	Ornamental plum	17, 16	5	3	Fair	Fair	No	Located on plan by arborist	**REMOVE**
60	Ornamental plum	18	3	3	Fair	Poor	No		**REMOVE**
61	Cherry	14	3	2	Poor	Poor	No		**REMOVE**
62	Cherry	18	3	3	Fair	Poor	No		**REMOVE**
67	Deodar cedar	48	6	5	Good	Poor	No	Topped	**REMOVE**
OFF-SITE TREES (7)									
45A	Garry oak	58	7	6	Good	Fair	Yes	Lean west, old flush cut	Retain and protect
45B	Garry oak	82	10	8	Good	Good	Yes		Retain and protect
45C	Garry oak	108	13	8	Good	Fair	Yes		Retain and protect
45D	Garry oak X2	82,52	9	7	Good	Fair	Yes		Retain and protect
45E	Garry oak	70	8	7	Good	Fair	Yes		Retain and protect
45F	Garry oak	58	7	5	Good	Good	Yes		Retain and protect
45G	Garry oak	70	8	7	Good	Fair	Yes	Old flush cut, internal decay	Retain and protect
BOULEVARD TREES (6)									
45	Garry oak	90	11	8	Good	Fair	**Yes**	Lean west, double leader, sidewalk imbeded at the base of tree	**REMOVE**
46	Garry oak	122	13	11	Good	Fair	**Yes**	Old flush cut, included bark	Retain and protect
47	Garry oak	88	11	8	Good	Fair	**Yes**	Old flush cut, included bark	Retain and protect
49	Garry oak	110	13	12	Good	Good	**Yes**		Retain and protect
56	Ornamental plum	20	4	2	Good	Fair	No		**REMOVE**
NT1	Ornamental plum	19	3	3	Fair	Fair	No	Located on plan by arborist	**REMOVE**
NT2	Ornamental plum	17	3	3	Fair	Fair	No	Located on plan by arborist	**REMOVE**

SUMMARY TREE STATISTICS	
CLASSIFICATION	**NUMBER OF TREES**
Trees indicated in table and on plan	**35**
On-site and boundary trees	**21**
On-site bylaw trees	4
On-site bylaw trees proposed for removal	5
On-site replacement trees required for planting	5
Off-site (private) trees adjacent to site	**7**
Public boulevard trees	**7**
Number of boulevard trees proposed for removal	4
Number of boulevard replacement trees required	4

TREE PRESERVATION MEASURES

1. Before demolition, site servicing or other site work commences, the owner, contractor a relevant design consultant(s) shall meet with the arborist to review the Tree Protection P and associated measures. This particularly includes the civil engineer, geo-techni consultant and sub-contractors responsible for site servicing and road works.

2. Tree fencing shall be erected to the satisfaction of the project arborist and the District Sanich before other site work commences and remain in good condition throughout t duration of the project (see attached details for fencing and signage).

3. Temporary construction access within a TPA must be approved and supervised by t project arborist. This includes landscaping.

4. If it should prove necessary to reduce the tree fencing, the exposed TPA outside t fencing shall be armoured with 3/4" plywood or a temporary cover of geo-textile and 200m of road-base, moderately compacted with a plate compactor.

5. All forms of disturbance to the protected trees or their habitat within the fenced protecti areas (TPAs) are prohibited.

6. No equipment, materials, waste products or excavated soil shall be placed or stored wit the TPA. THIS PARTICULARLY INCLUDES HOARDING OF EXCAVATED SOILS NEEDED F BACKFILLING OF FUTURE BUILDING FOUNDATION.

7. The arborist shall be present to oversee stump removal, excavation, service trenching, s grading, blasting and landscaping within, or adjacent to, the tree protection areas (TPA **Areas of particular sensitivity are identified on this plan as *Special Measures Zones*. Spec measures required to minimize impacts to trees or their growing environments may inclu hydro-vaccing, air-spading, hand-digging, vertical shoring, reduced excavation depths, r pruning, modified rock removal techniques or use of specialized geotechnical products materials.**

8. Any tree roots damaged shall be pruned back to undamaged tissue by the arborist.

9. The vertical face of the excavation adjacent to the TPAs shall be covered with geo-textile prevent soil desiccation and erosion.

10. The contractor and blasting sub-contractor shall meet with the arborist to review t blasting plan prior to drilling. Modified blasting practices or rock removal techniques shall utilized where considered necessary by the arborist to minimize blasting impacts to protect trees.

11. Procedure for blasting near tree root zones:
a) When blasting is required immediately adjacent to a Tree Protection Area, the blast contractor shall work with the arborist to develop a blasting plan and deploy best practi that minimize impacts to protected trees.
b) Blasting vibrations in the vicinity of the Tree Protection Areas are not to exceed a pa particle velocity of 25 mm/sec.
c) Use DYNAMITE as the explosive product. No fertilizer-based explosive is permitted, d to its toxicity to tree roots.
d) The contractor shall prevent rock debris from the blast site from entering the TPA.

12. In areas where the root zone of the tree has been reduced by excavation or rock remo the remaining area shall be top-dressed with 10cm of tree chip mulch until landscape stage

13. The General Contractor, Landscape Contractor and Landscape Architect shall meet w the arborist to review the landscaping workplan prior to landscape construction or preparation commencing. Potential impacts to sensitive tree habitat will be identified measures provided to eliminate or mitigate the impacts.

14. The Project Arborist shall monitor the site during the site preparation, construction landscaping phases to ensure ongoing and effective compliance with the tree protect measures specified in this tree plan and in on-site meetings with the General Contractor relevant sub-contractors.

15. Cash will be paid to the District of Saanich in lieu of Five (5) replacement trees to mitig the loss of five (5) bylaw-protected trees. See Landscape Plan for proposed species planting location.

17. Four boulevard tree replacments will be provided for the removal of three boulev trees (one tree at 2:1 ratio and two trees at 1:1 ratio) (see Landscape Plan for siting of r trees on boulevard).

18. A full size all-weather copy of the Tree Plan shall be posted in the site office in plain sig

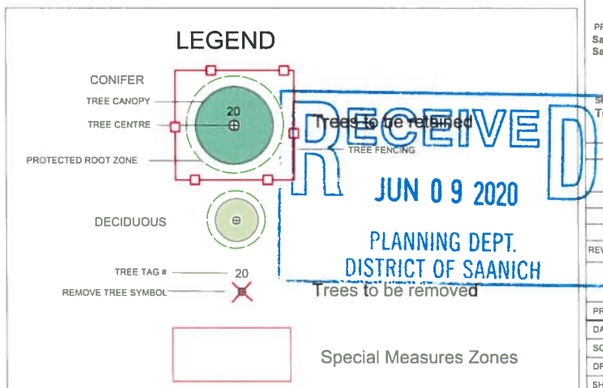
19. A post-construction inspection and assessment of the site and protected trees shall conducted by the Project Arborist in the company of the General Contractor and the Dist of Saanich Parks Arborist. Any deficiencies will be identified. Once all deficiencies have b addressed to the satisfaction of the Project Arborist and the District of Sanich post-construction letter of completion will be prepared by the arborist and submitted to District.

Tree Protection Fencing Detail

Modular steel panel fencing is recommended in order to reduce land-fill waste post-construction. Fencing panels shall be secured to the ground with rebar wired to panel frame.

16 x 24" all-weather signage will be attached with the following wording.
Wording for protected trees: **DO NOT ENTER – Tree Protection Zone**
Wording for future tree planting sites: **DO NOT ENTER – Future Tree Planting Zone**

In cases where steel-panel fencing is not practical or available, fencing shall be constructed with a wooden 2x4 frame (side, top and bottom rails) and back-bracing supports as required to ensure robust placement. Snow-fencing will then be affixed to the frame using battens, zip-ties, staples, wire or nails.



GyeandAssociate

PROJECT
Saanich Road & McKenzie Ave
Saanich, BC

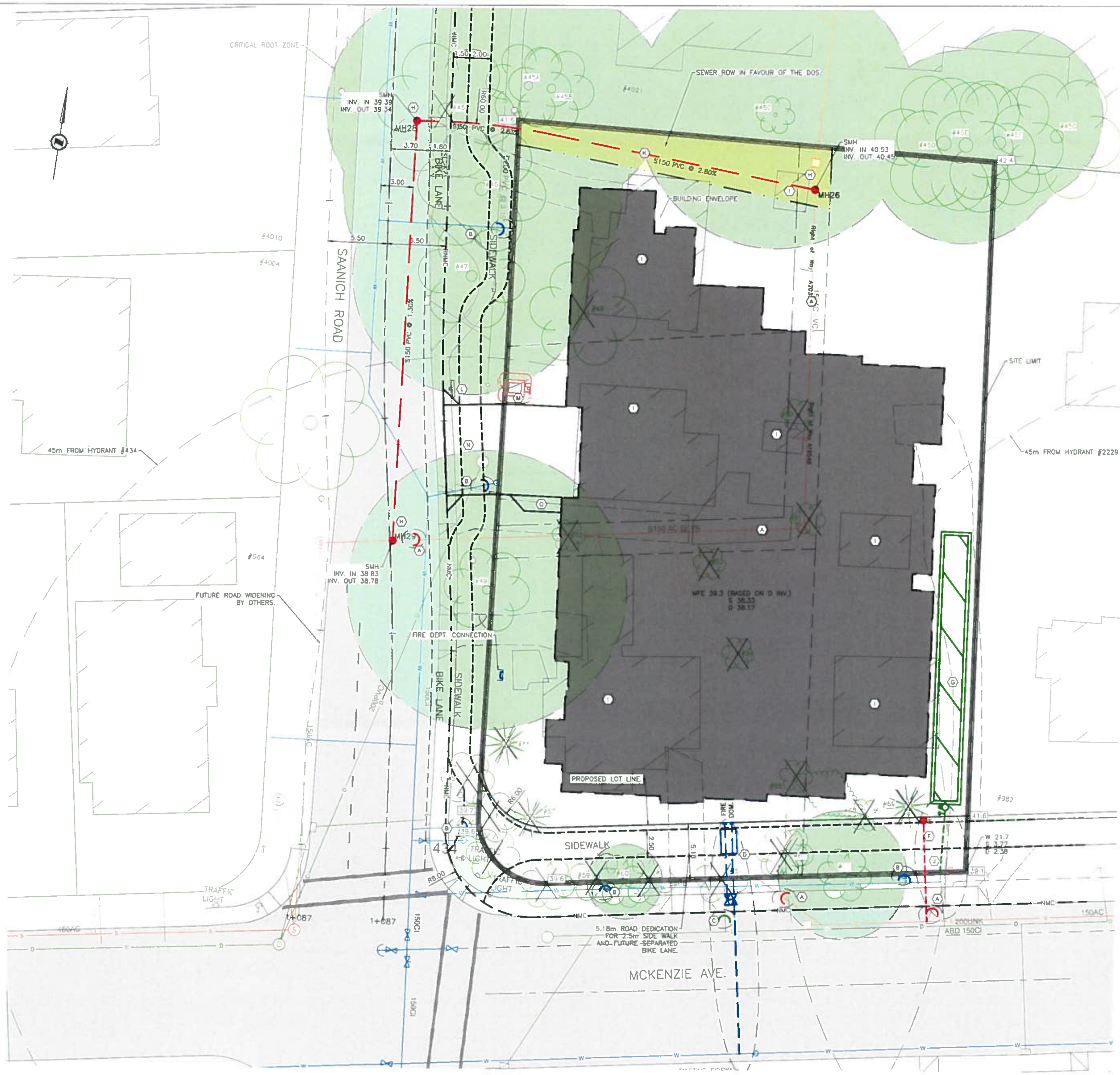
SHEET TITLE
Tree Management Plan

REV NO	DESCRIPTION	
2	FOR REZONING & S/D	June
1	FOR REZONING & S/D	Oct 2

PROJECT NO	1
DATE	May 25
SCALE	
DRAWN BY	
SHEET NO	T

DETAILED CONSTRUCTION NOTES:

- (A) DISTRICT OF SAANICH TO CAP AND DECOMMISSION EXISTING SEWER AND SEWER SERVICE AT DEVELOPERS EXPENSE
- (B) DISTRICT OF SAANICH TO CAP EXISTING WATER SERVICE AT MAIN AT DEVELOPERS EXPENSE
- (C) DISTRICT OF SAANICH TO CAP EXISTING DRAIN SERVICE AT MAIN AT DEVELOPERS EXPENSE
- (D) DISTRICT OF SAANICH TO INSTALL WATER METER VAULT AT PROPERTY LINE AT DEVELOPERS EXPENSE. SIZE TO BE DETERMINED
- (F) DISTRICT OF SAANICH TO INSTALL NEW SEWER SERVICE AT DEVELOPERS EXPENSE. SIZE TO BE DETERMINED
- (G) CONTRACTOR TO INSTALL SWM SYSTEM AS SPECIFIED
- (H) DISTRICT OF SAANICH TO INSTALL NEW SEWER AND SEWER MANHOLES
- (I) EXISTING BUILDINGS TO BE DEMOLISHED
- (J) DISTRICT OF SAANICH TO INSPECT EXISTING DRAIN SERVICE AND EXTEND IT TO THE NEW PROPERTY LINE. DOS TO REPLACE IF NECESSARY.
- (K) ROCK MAY NEED TO BE REMOVED. SEE THE ARBORIST REPORT FOR TRENCHING SPECIFICATIONS RELATED TO TREE PROTECTION
- (L) CONTRACTOR TO INSTALL RIGHT TURN ONLY SIGN AS PER SAANICH STANDARD DRAWING DES 34
- (M) LPT SHOWN SCHEMATICALLY. DESIGN DETAILS BY OTHERS
- (N) INSTALL DRIVEWAY DROP AS PER SAANICH STANDARD DRAWING C7SS
- (O) CONSTRUCT LOADING BAY ONSITE AS SHOWN.



PLAN – SAANICH AND MCKENZIE
H 1:200

KEY PLAN
NTS

SAANICH AND MCKENZIE STORMWATER MANAGEMENT NOTES AND CALCULATIONS:

THE DEVELOPMENT IS WITHIN A 'TYPE 1' WATERSHED.

REQUIRED STORAGE: 200m³/ha OF IMPERVIOUS AREA.

SITE AREA – SITE = 3071m²
% IMERVIOUS = 52% (FROM EBA SITE PLAN)

STORAGE = 32m³

(G) STORAGE PROVIDED BY STORMTECH RETENTION CHAMBERS COMPLETE WITH FLOW CONTROL MANHOLE, PERFORATED DRAIN MAIN AND CONNECTION TO BUILDING FOOTING DRAINS FOR HIGH WATER TABLE RELIEF. 17 RETENTION CHAMBERS WILL PROVIDE THE REQUIRED STORAGE VOLUME

SAANICH AND MCKENZIE CONCEPTUAL SERVICING PLAN, AND FRONTAGE IMPROVEMENTS

Scale horiz. 1:200	Scale vert. --
Sheet 1 of 1	
Eng. Project No 30124	

1:200 0 4 12m

JEA J E ANDERSON & ASSOCIATES
SURVEYORS - ENGINEERS
VICTORIA NANAIMO PARKSVILLE
PHONE 250-727-2214 FAX 250-727-3395

V:_Engineering\30124 EBA Saanich Mckenize\02 – Drawings (Eng)\Working Drawings\30124 Design.dwg Plot Date: June 3, 2020