

HILL RIDGE HOMES CRANBERRY MARSH ESTATES TOWN OF COLLINGWOOD

KEY PLAN



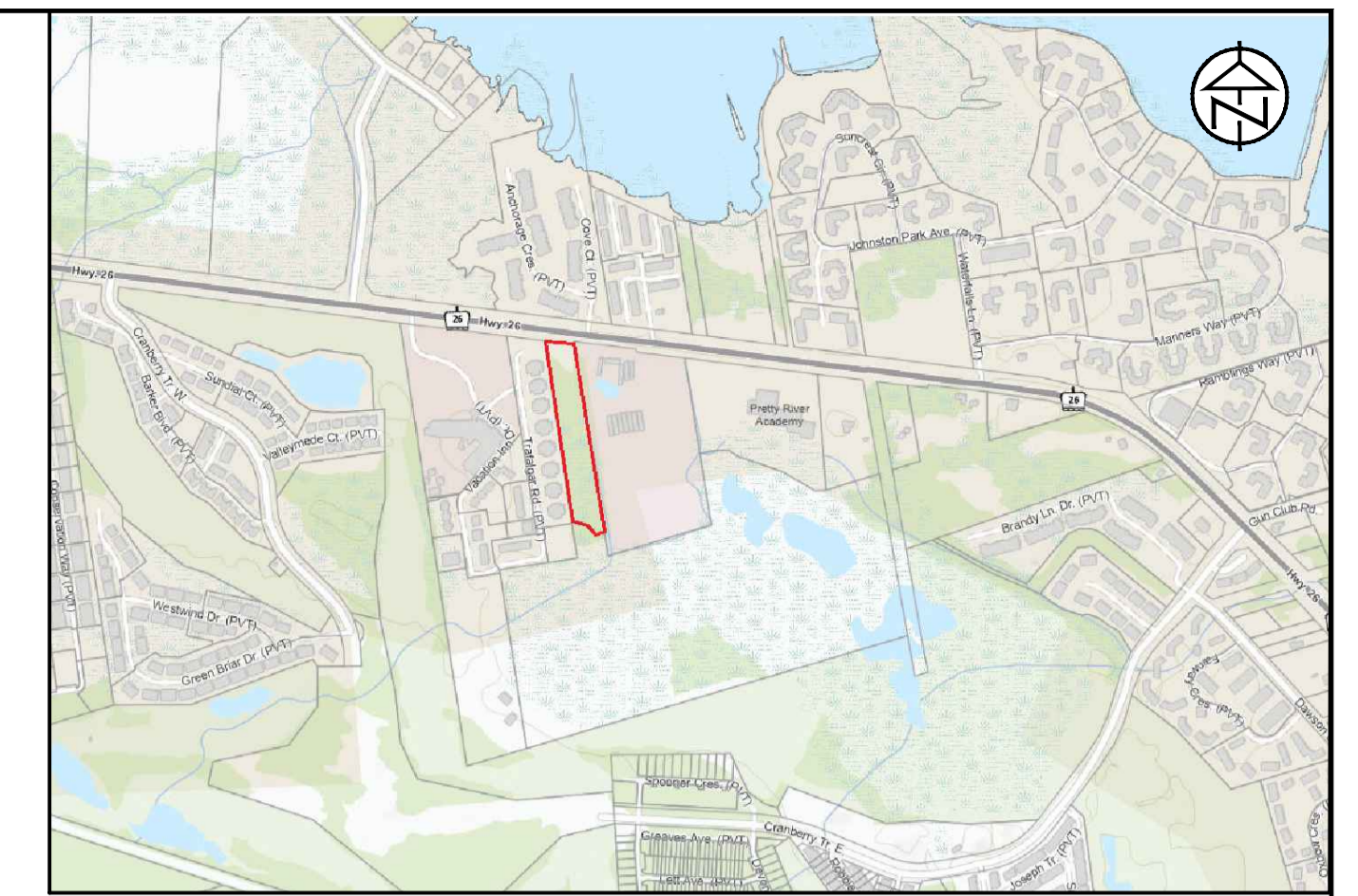
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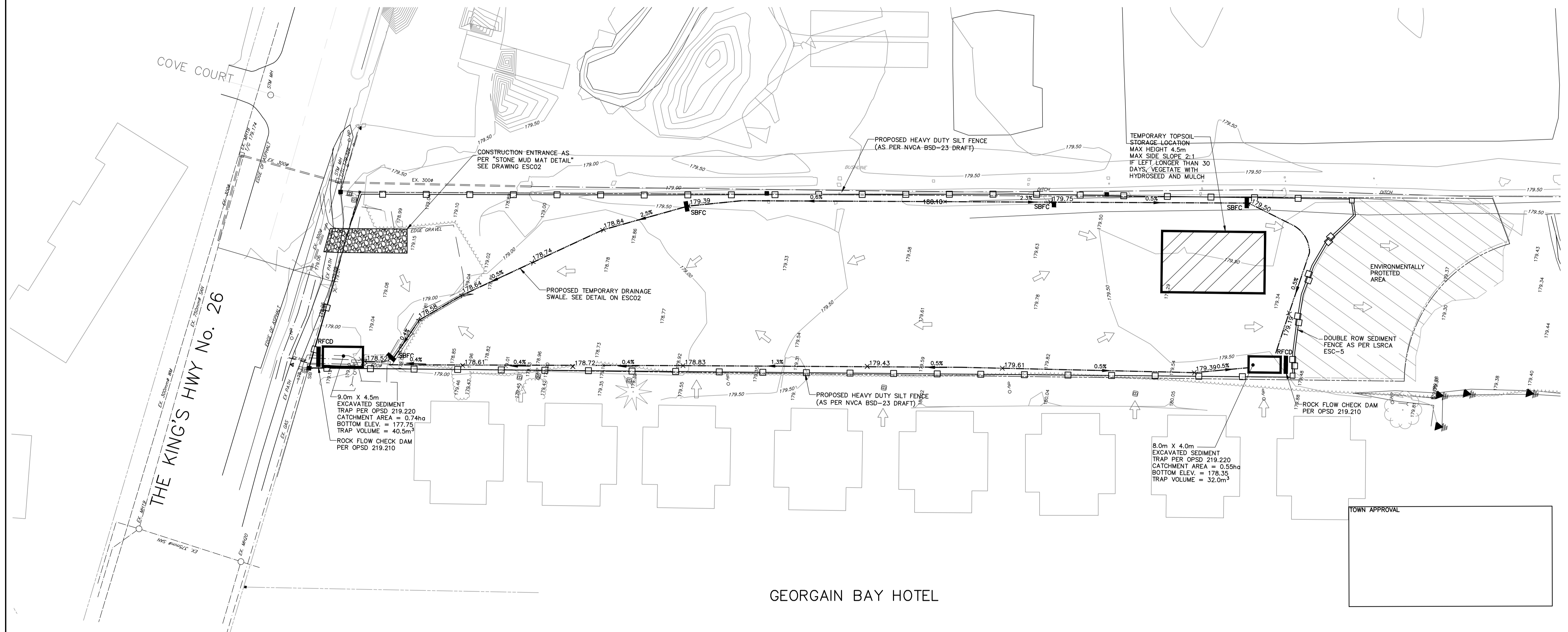
LEGEND

PROPERTY LINE	----
EXISTING CENTERLINE	----
PROPOSED CENTERLINE	----
EXISTING EDGE OF ASPHALT	----
PROPOSED EDGE OF ASPHALT	----
EXISTING EDGE OF SHOULDER	----
PROPOSED EDGE OF SHOULDER	----
EXISTING DITCH/DIRECTION OF FLOW	----->
PROPOSED DITCH/DIRECTION OF FLOW	----->
EXISTING SANITARY SEWER/SIZE/DIRECTION OF FLOW	-----> 200# SAN
PROPOSED SANITARY SEWER/SIZE/DIRECTION OF FLOW	-----> 200# SAN
EXISTING SANITARY SERVICE	-----CO
PROPOSED SANITARY SERVICE	-----CO
EXISTING SANITARY FORCEMAIN/SIZE/DIRECTION OF FLOW	-----> 200# SAN F/M
EXISTING WATERMAIN/SIZE	-----> 150# W/M
PROPOSED WATERMAIN/SIZE	-----> 150# W/M
EXISTING WATER SERVICE	-----
PROPOSED WATER SERVICE	-----
EXISTING STORM SEWER/SIZE/DIRECTION OF FLOW	-----> 375# STM
PROPOSED STORM SEWER/SIZE/DIRECTION OF FLOW	-----> 375# STM
EXISTING CULVERT	=====
PROPOSED SWALE LOCATION	-----
PROPOSED CULVERT	=====
PROPOSED JOINT HYDRO, BELL AND ROGERS	=====
EXISTING GAS MAIN	-----
PROPOSED GAS MAIN	-----
EXISTING FENCELINE	-----
PROPOSED FENCELINE	-----
EXISTING BUSHLINE	~~~~~
EXISTING CONTOUR	----- 179.00
EXISTING SPOT ELEVATION	x 179.00
PROPOSED SPOT ELEVATION	x 179.00
EXISTING GRADING DIRECTION	----->
PROPOSED GRADING DIRECTION	----->
PROPOSED SWALE LOCATION	-----
EXISTING TEMPORARY BENCHMARK	• TBM
EXISTING STANDARD IRON BAR	■ SIB
EXISTING BOREHOLE/NUMBER	◆ BH#
EXISTING GAS VALVE	◇ GAS
EXISTING HYDRO TRANSFORMER	□
EXISTING CABLE PEDESTAL	□
EXISTING BELL PEDESTAL	□
EXISTING BELL MAINTENANCE HOLE	○ BELL MH
EXISTING BELL POLE	○ BP
EXISTING HYDRO POLE	○ HP
EXISTING HYDRO GUY WIRE	---
PROPOSED LIGHT STANDARD	● LS
EXISTING DECIDUOUS TREE	⊕
EXISTING CONIFEROUS TREE	⊕
EXISTING SANITARY MAINTENANCE HOLE/NUMBER	○ SAN MH#
PROPOSED SANITARY MAINTENANCE HOLE/NUMBER	● SANMH#
EXISTING HYDRANT AND VALVE	◇ HYD & WV
PROPOSED HYDRANT AND VALVE	◆ HYD & WV
EXISTING WATER VALVE	◇ WV
PROPOSED WATER VALVE	◆ WV
PROPOSED CURB STOP VALVE	◆ CSV
EXISTING STORM MAINTENANCE HOLE	○ STM MH
EXISTING CATCH BASIN	□ CBMH 1#
TACTILE SURFACE INDICATORS	■
TRANSFORMER	□
SWITCHGEAR	□
LIGHTING PEDESTAL	□

GREENTREE GARDENS
& EMPORIUM



KEY PLAN



GEORGAIN BAY HOTEL

TOWN APPROVAL

LEGEND	
PROPOSED STRAW BALE FLOW CHECK (AS PER OPSD 219.210)	RFCD
PROPOSED ROCK FLOW CHECK (AS PER OPSD 219.180)	SBFC
PROPOSED HEAVY DUTY SILT FENCE (AS PER NVCA BSD-23 DRAFT)	SBFC
PROPOSED SWALE / DITCH	0.5%
EXISTING OVERLAND FLOW	→

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CONTRACTOR MUST VERIFY ALL DIMENSIONS AND BE RESPONSIBLE FOR SAME. ANY DISCREPANCIES MUST BE REPORTED TO THE ENGINEER BEFORE COMMENCING WORK. DRAWINGS ARE NOT TO BE SCALED.

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BENCHMARKS
ELEVATIONS SHOWN ON THIS PLAN ARE RELATED TO GEODETIC DATUM AND ARE DERIVED FROM BENCH MARK No. 0011972U311 HAVING A PUBLISHED ELEVATION OF 181.032 METRES.

NOTES
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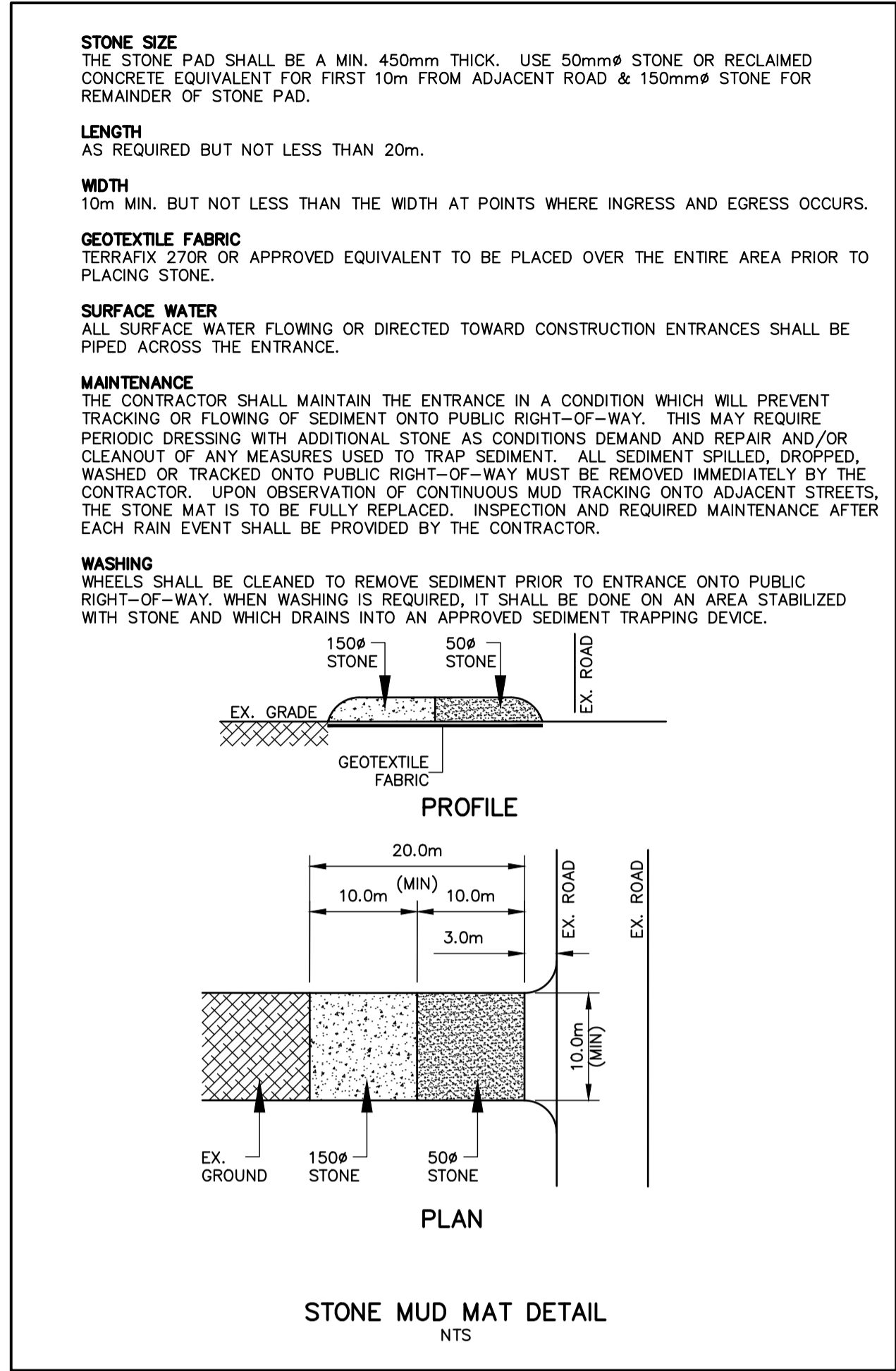
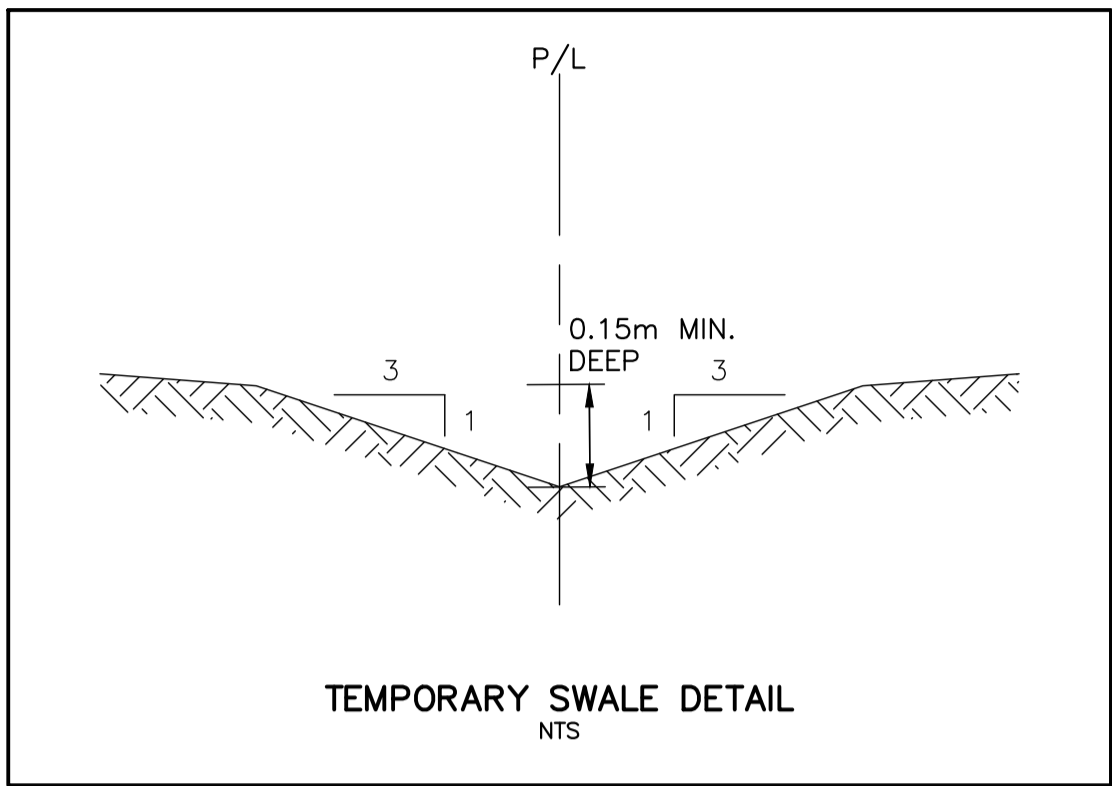
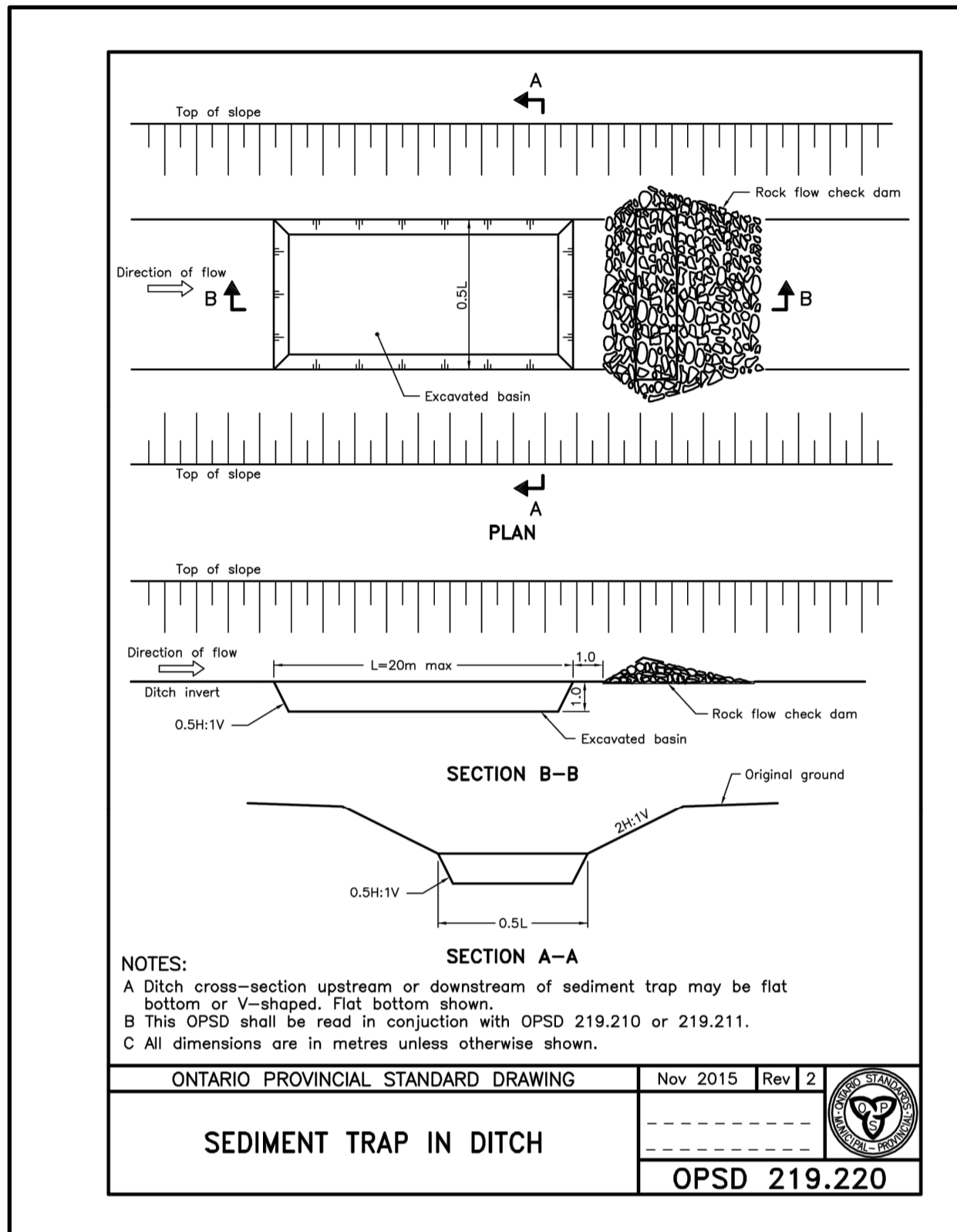
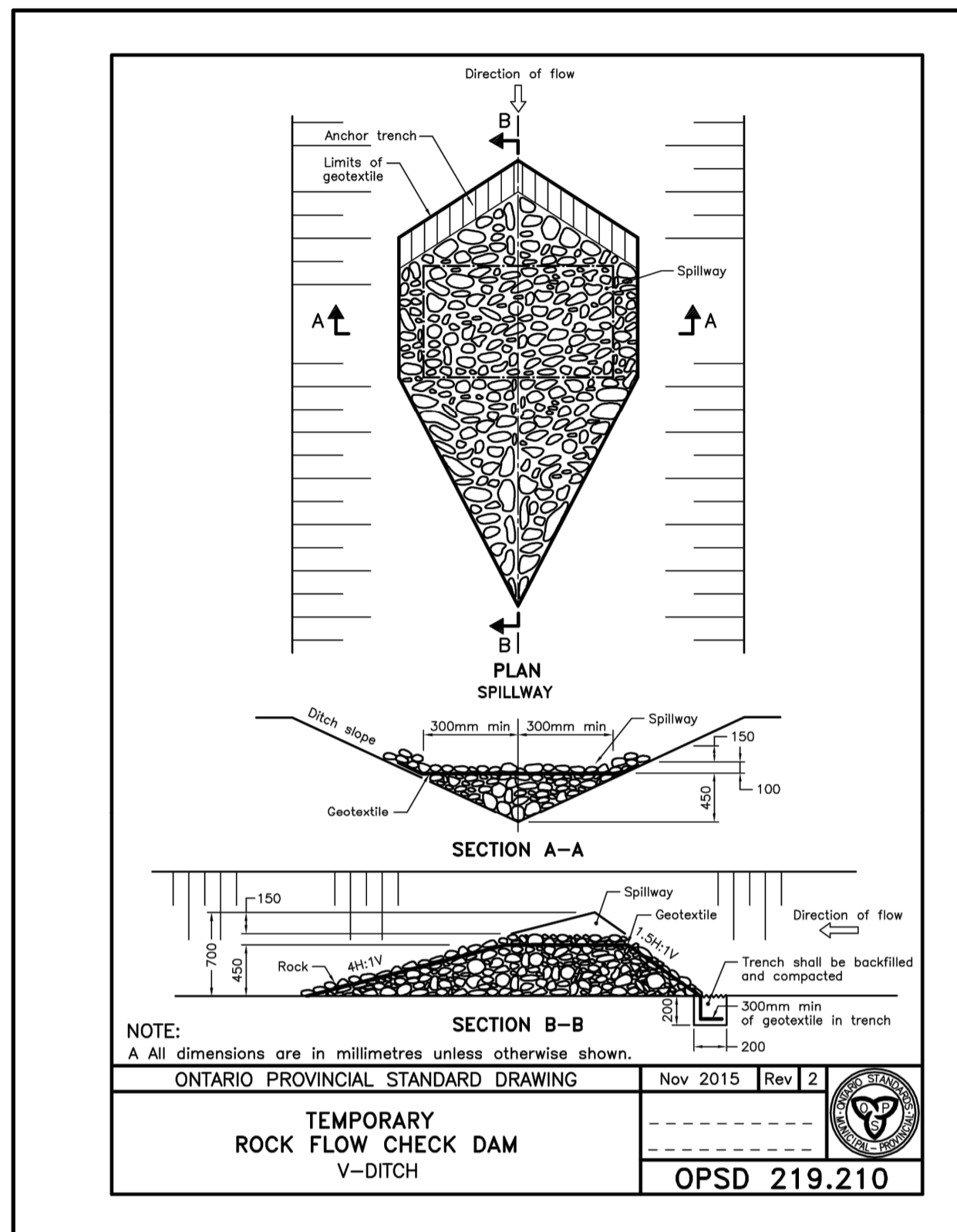
No.	REVISION DESCRIPTION	DATE	ENGINEER STAMP
1.	1ST SUBMISSION	03/22	

ENGINEER STAMP

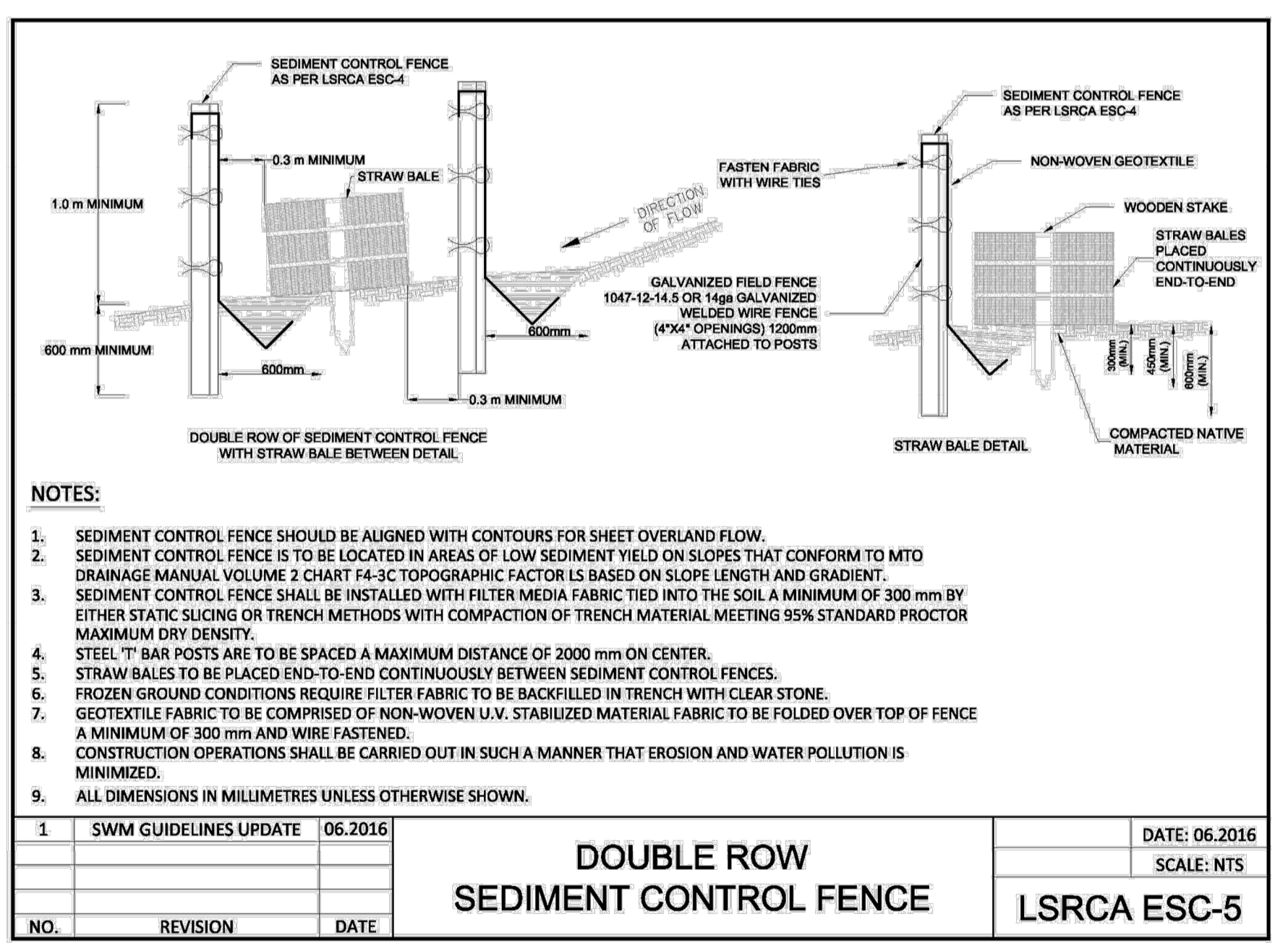
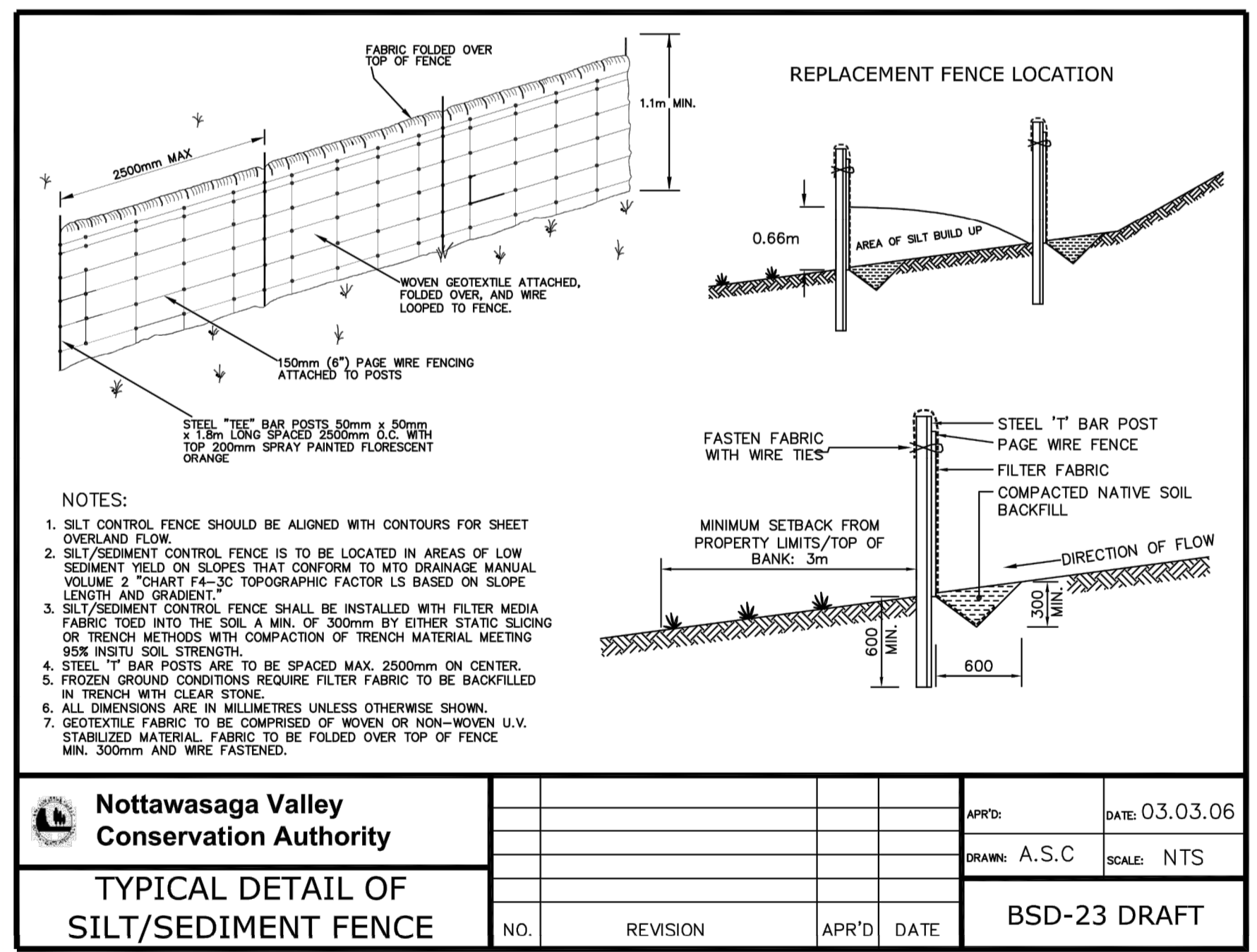
CRANBERRY MARSH ESTATES
TOWN OF COLLINGWOOD

EROSION AND SEDIMENT CONTROL PLAN

TATHAM ENGINEERING
 DESIGN: KG FILE: 120181 DWG: **ESC01**
 DRAWN: KB/SBU DATE: MAR 2022
 CHECK: DC SCALE: 1:500



- NOTES**
1. ALL SEDIMENT AND EROSION CONTROL MEASURES SHALL BE INSTALLED PRIOR TO THE COMMENCEMENT OF CONSTRUCTION. SEDIMENT AND EROSION CONTROL MEASURES THAT ARE DESIGNED TO CONTROL RUNOFF FROM SPECIFIC AREAS MUST BE INSTALLED PRIOR TO ANY DISTURBANCE OF THAT PART OF THE SITE. THE LOCATION OF ALL SILTATION AND EROSION CONTROL WORKS TO BE REVIEWED ON SITE AND MAY BE REVISED AS DIRECTED BY THE ENGINEER.
 2. THE CONTRACTOR MAY CONSIDER ALTERNATIVE SEDIMENT AND EROSION CONTROL MEASURES. SUCH MEASURES MUST BE PRESENTED IN WRITING TO THE ENGINEER FOR APPROVAL OF THE TOWN AND NOTTAWASAGA VALLEY CONSERVATION AUTHORITY.
 3. THE CONTRACTOR SHALL HAVE MATERIALS AVAILABLE ON SITE TO REPAIR SEDIMENT AND EROSION CONTROL MEASURES IN THE EVENT OF UNFORESEEN CONDITIONS SUCH AS HIGH WATER, EXTREME RAINFALL EVENTS, ETC.
 4. ALL EROSION AND SEDIMENT CONTROL MEASURES MUST BE INSPECTED, CLEANED AND MAINTAINED BY THE CONTRACTOR AFTER EACH STORM EVENT. ALL WORKS WILL BE INSPECTED BY THE ENGINEER BI-WEEKLY AND AFTER EACH MAJOR STORM EVENT.
 5. CONSTRUCTION OF ALL SILTATION AND EROSION CONTROL WORK IS TO BE IN ACCORDANCE WITH THE FOLLOWING STEPS:
 - 5.1. INSTALL NEW OR MAINTAIN EXISTING STONE MUD MAT AS PER DETAIL.
 - 5.2. INSTALL SILT FENCE AS PER NVCA STANDARDS (BSD-23).
 - 5.3. INSTALL TEMPORARY CATCH BASIN SEDIMENT TRAPS ON ALL NEW AND EXISTING CATCH BASINS. SEDIMENT TRAPS TO BE RECTANGULAR BY LAYFIELD OR APPROVED EQUAL. ALL CATCH BASINS TO REMAIN SCREENED UNTIL BASE COURSE ASPHALT IS PLACED AND LOT GRADING IS COMPLETE.
 6. ALL CONSTRUCTION VEHICLES TO ACCESS SITE USING THE DESIGNATED CONSTRUCTION ACCESS POINTS.
 7. EROSION AND SEDIMENT CONTROL MEASURES TO BE REMOVED BY THE CONTRACTOR ONCE GROUND COVER IS ESTABLISHED AND LANDSCAPING IS COMPLETE AND APPROVED BY THE ENGINEER.
 8. STOCKPILE LOCATIONS ARE TO BE APPROVED BY THE ENGINEER.
 9. PROVIDE FENCE OR APPROVED EQUAL ACROSS ALL CONSTRUCTION ACCESSES DURING PERIODS OF INACTIVITY.
 10. CONSTRUCTION AREAS THAT EXCEED 30 DAYS OF INACTIVITY SHALL BE STABILIZED BY SEEDING IN ACCORDANCE WITH THE NOTTAWASAGA VALLEY CONSERVATION AUTHORITY'S TECHNICAL DESIGN GUIDELINES, STANDARDS AND POLICIES FOR SILTATION AND EROSION CONTROL. CONSTRUCTION CONTROL REQUIREMENTS, NOTES 1, 2 AND 3 AND/OR AS DIRECTED BY THE TOWN. THIS IS TO INCLUDE STOCKPILES OF FILL AND TOPSOIL.



		APRD:	DATE: 03.03.06
TYPICAL DETAIL OF SILT/SEDIMENT FENCE		DRAWN: A.S.C	SCALE: NTS
NO.	REVISION	APR'D	DATE
			BSD-23 DRAFT

		DATE: 06.2016
DOUBLE ROW SEDIMENT CONTROL FENCE		SCALE: NTS
NO.	REVISION	DATE
1	SWM GUIDELINES UPDATE	06.2016

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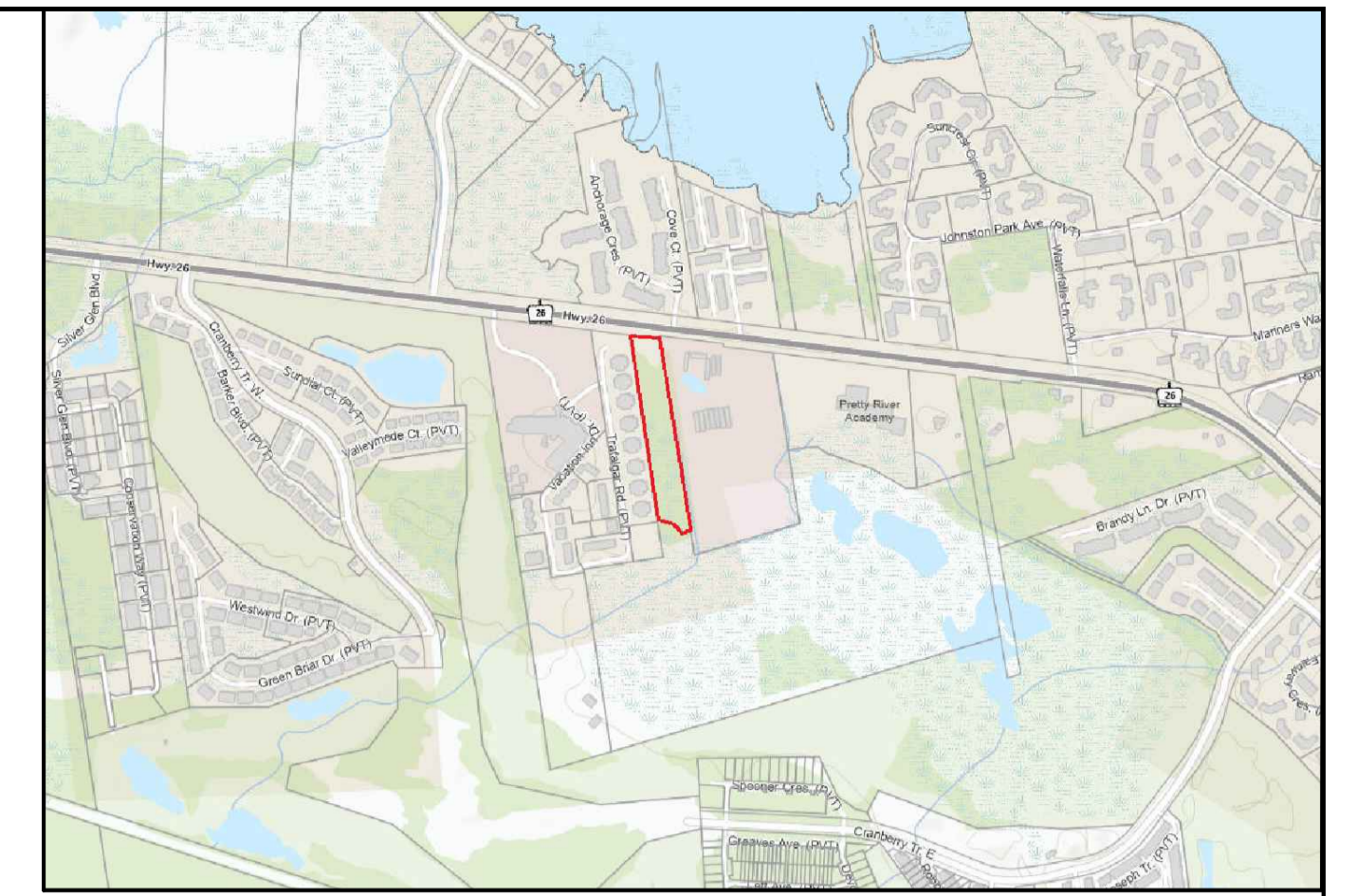
BENCHMARKS
 ELEVATIONS SHOWN ON THIS PLAN ARE RELATED TO GEODETIC DATUM AND ARE DERIVED FROM BENCH MARK No. 00119720311 HAVING A PUBLISHED ELEVATION OF 181.032 METRES.

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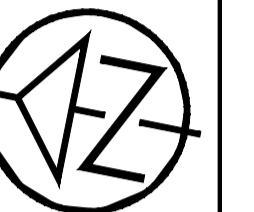
No.	REVISION DESCRIPTION	DATE	ENGINEER STAMP
1.	1ST SUBMISSION	03/22	

CRANBERRY MARSH ESTATES
 TOWN OF COLLINGWOOD
EROSION AND SEDIMENT CONTROL DETAILS

		ESC02
DESIGN: KG	FILE: 120181	DWG:
DRAWN: KH/SBU	DATE: MAR 2022	
CHECK: DC	SCALE: 1:500	

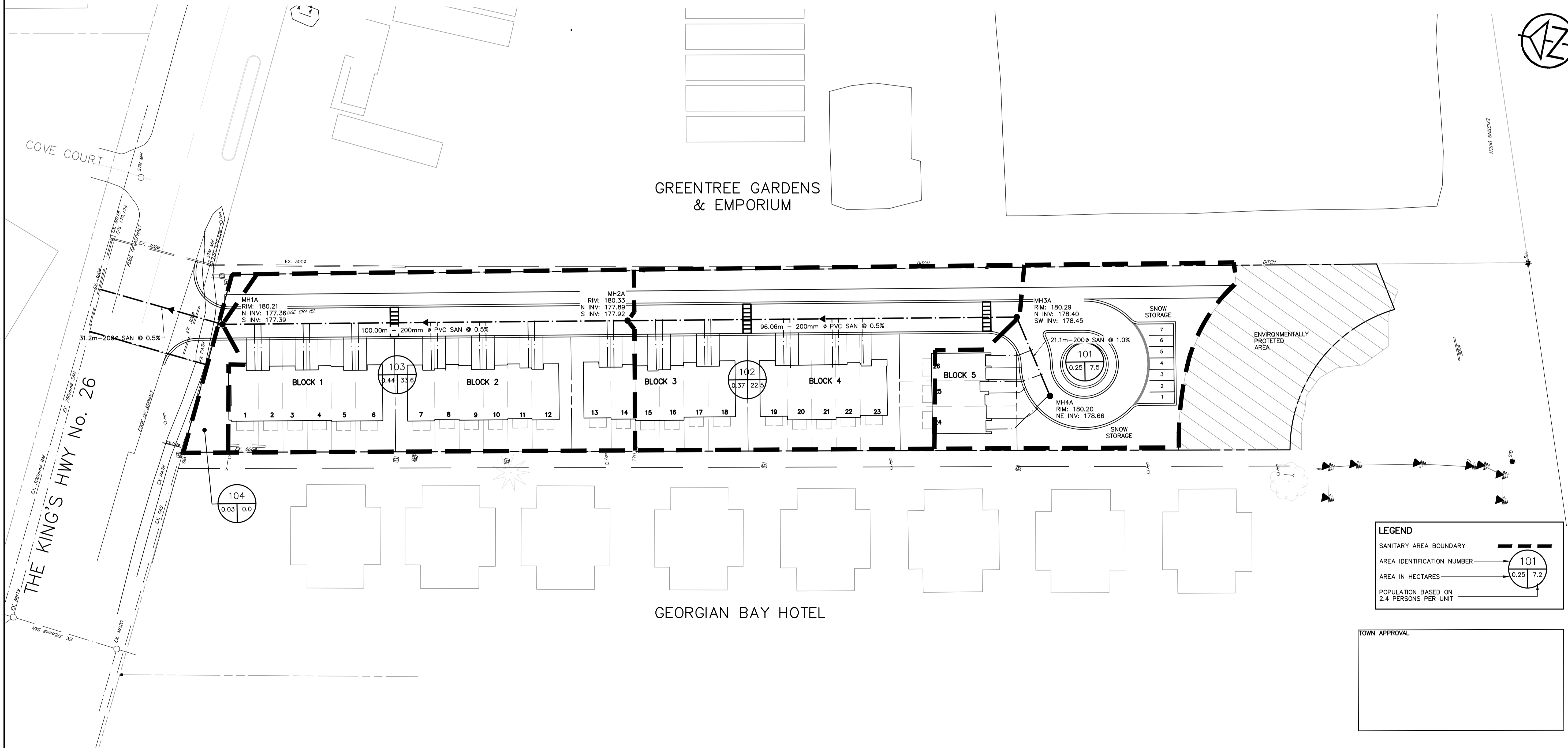


KEY PLAN



GREENTREE GARDENS & EMPORIUM

GEORGIAN BAY HOTEL



LEGEND	
SANITARY AREA BOUNDARY	
AREA IDENTIFICATION NUMBER	
AREA IN HECTARES	
POPULATION BASED ON 2.4 PERSONS PER UNIT	

TOWN APPROVAL

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No.	REVISION DESCRIPTION	DATE
1.	1ST SUBMISSION	03/22

ENGINEER STAMP

CRANBERRY MARSH ESTATES
TOWN OF COLLINGWOOD
 SANITARY DRAINAGE PLAN

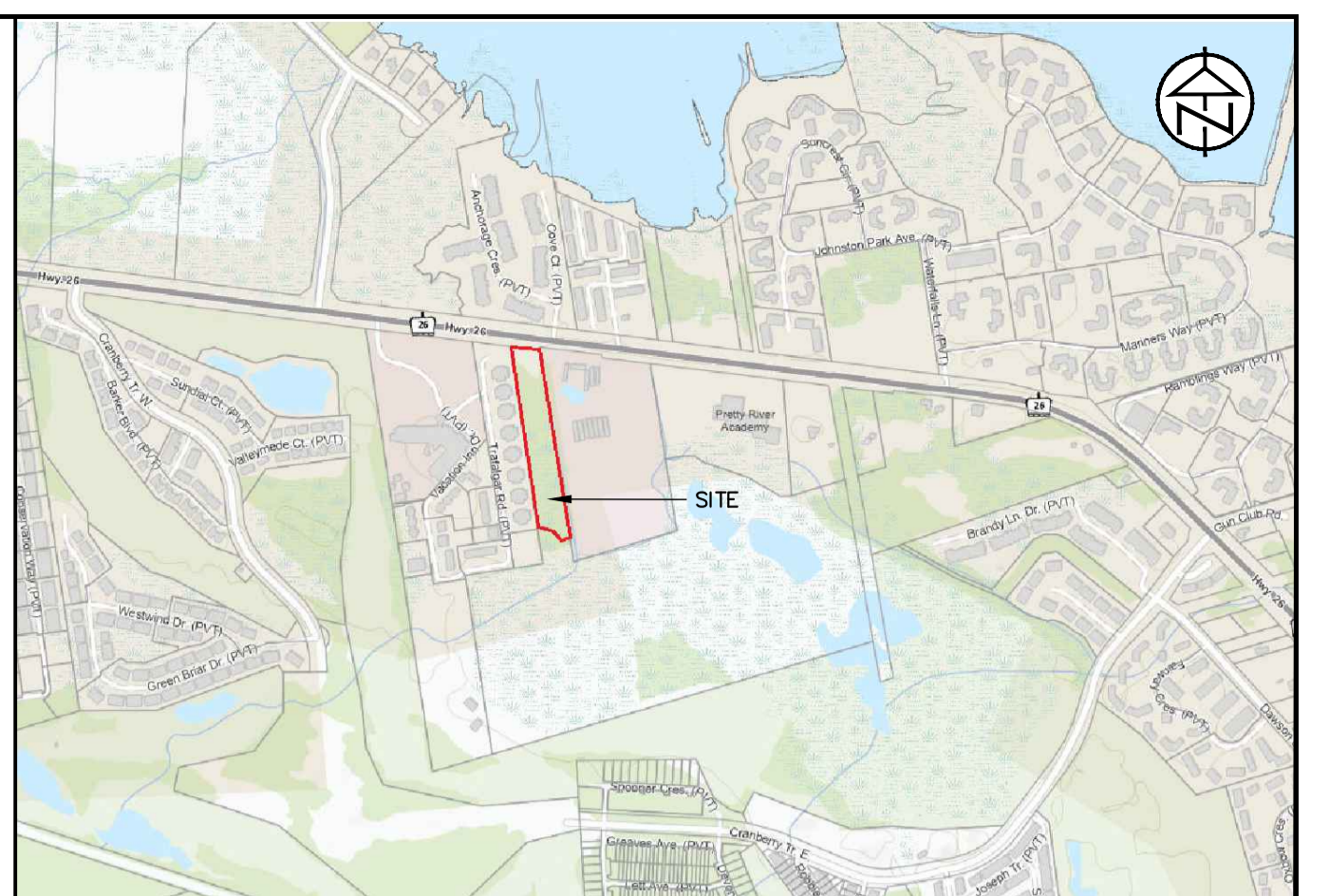
TATHAM ENGINEERING

DESIGN: KG	FILE: 120181	DWG:
DRAWN: KH/SBU	DATE: NOV 2021	SAN01
CHECK: DC	SCALE: 1:500	

LEGEND

AREA BOUNDARY	
AREA IDENTIFICATION NUMBER	
AREA IN HECTARES	
RUNOFF COEFFICIENT	
EXISTING MAJOR OVERLAND FLOW DIRECTION	
EXISTING DITCH FLOW DIRECTION	

TOWN APPROVAL



KEY PLAN



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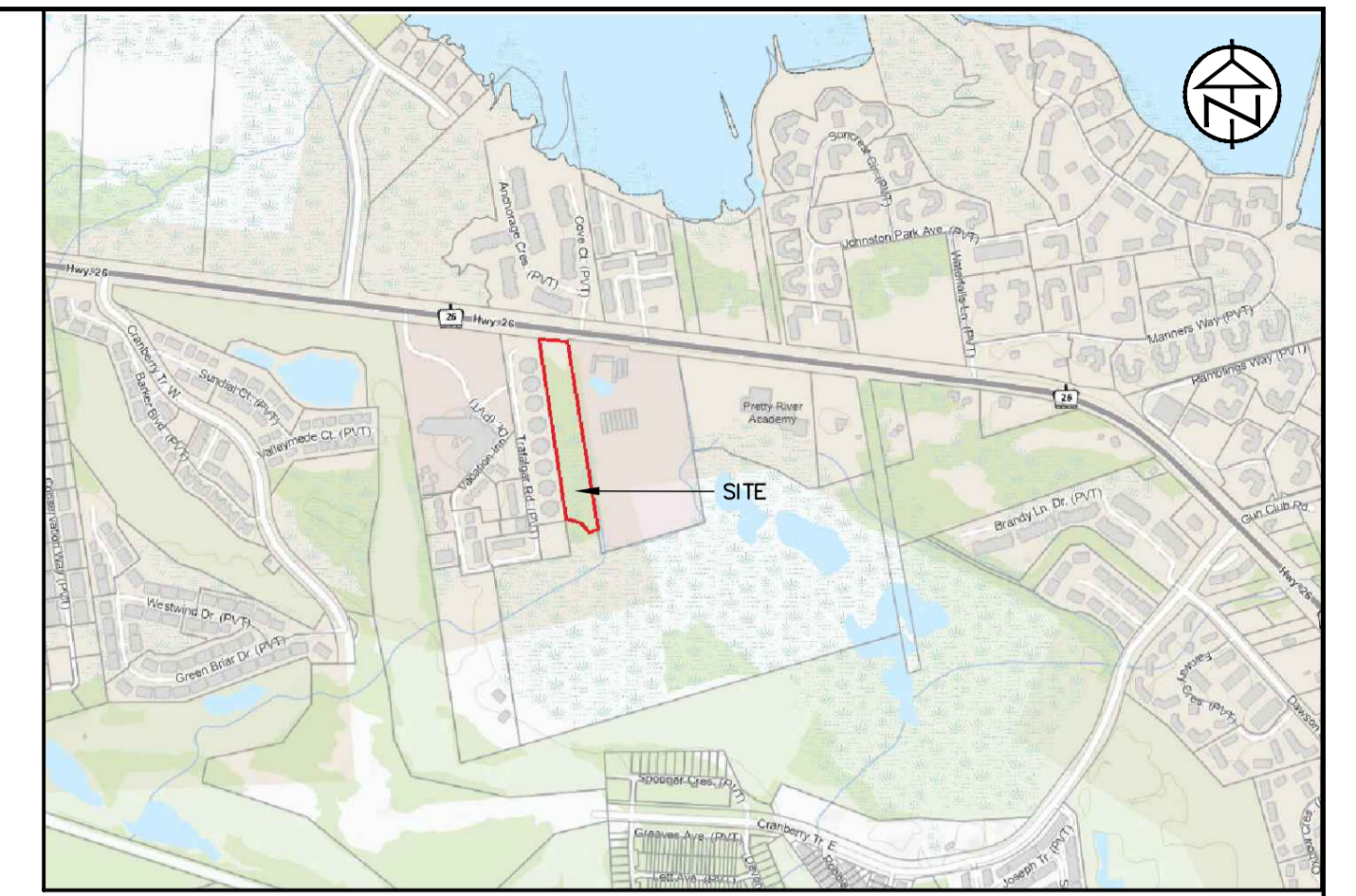
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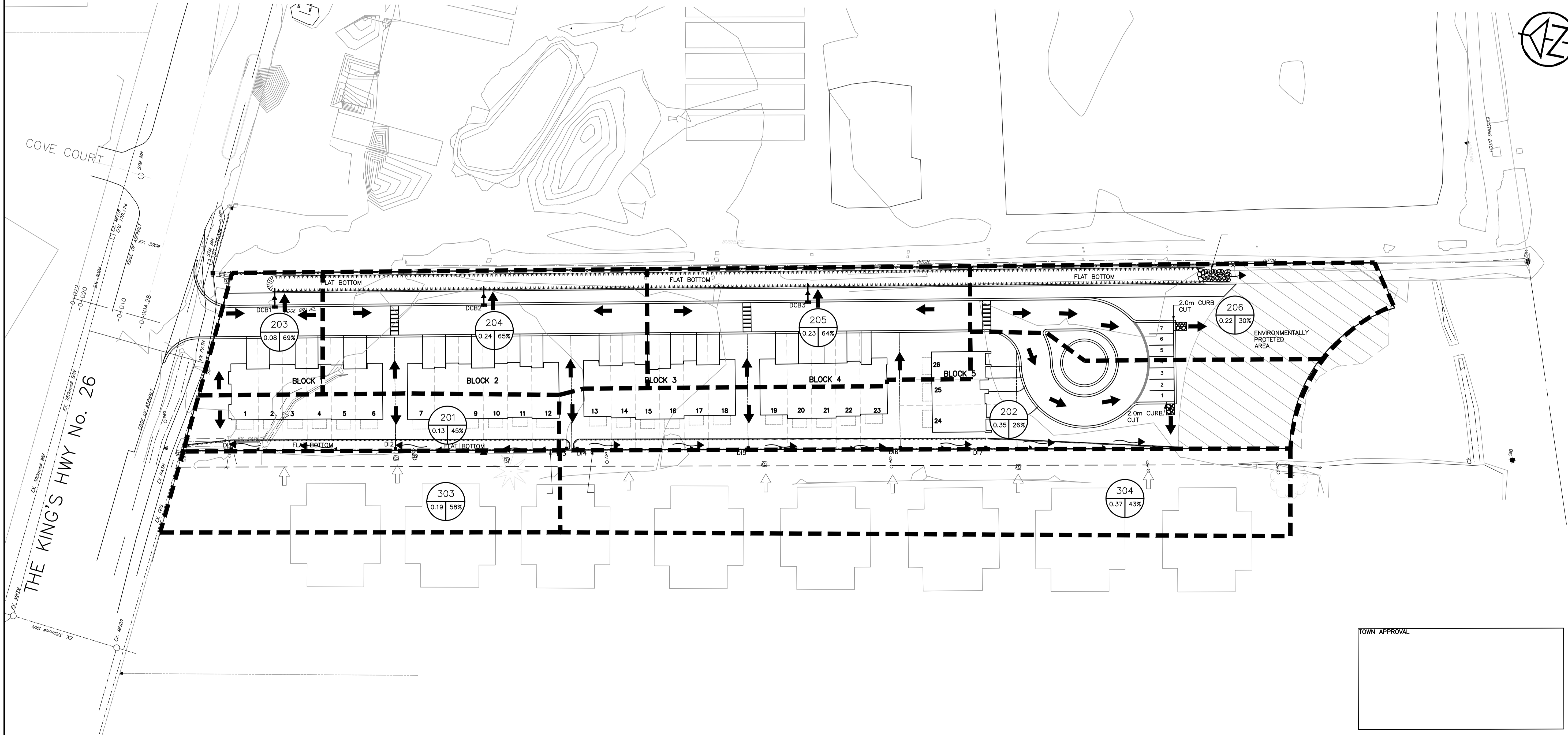
CRANBERRY MARSH ESTATES
 TOWN OF COLLINGWOOD
 PRE-DEVELOPMENT DRAINAGE PLAN

TATHAM ENGINEERING
 DESIGN: KG FILE: 120181 DWG: **DP01**
 DRAWN: KH/SBU DATE: DEC 2021
 CHECK: DC SCALE: 1:500

LEGEND	
AREA BOUNDARY	
AREA IDENTIFICATION NUMBER	201
AREA IN HECTARES	1.40 65%
CN VALUE/PERCENT IMPERVIOUS	
PROPOSED MAJOR OVERLAND FLOW DIRECTION	
EXISTING MAJOR OVERLAND FLOW DIRECTION	
PROPOSED SWALE FLOW DIRECTION	



KEY PLAN



TOWN APPROVAL

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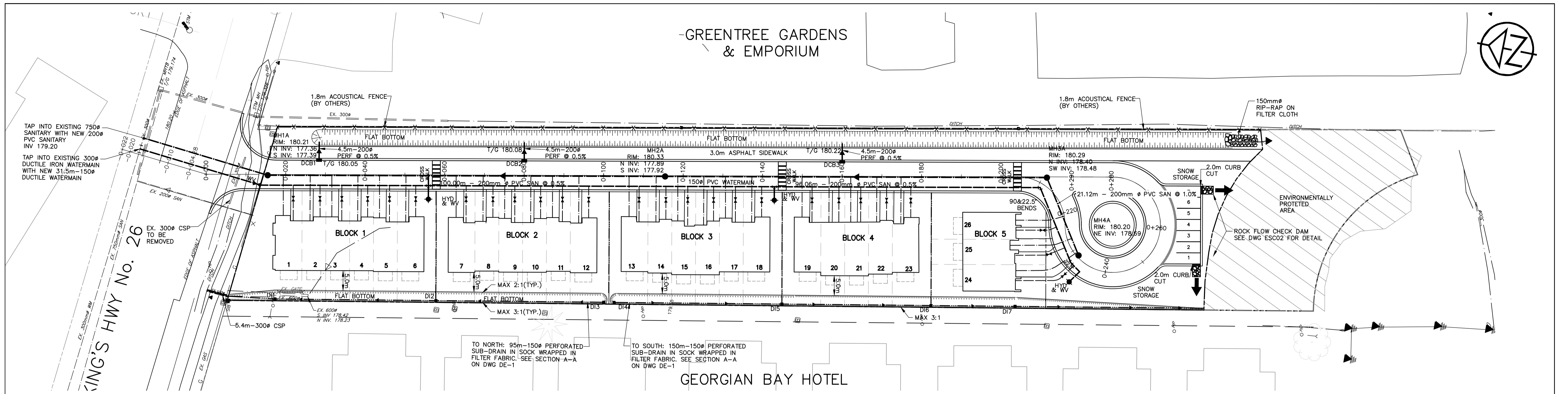
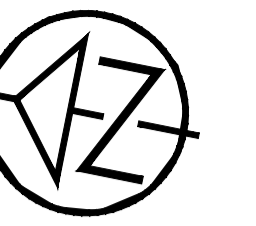
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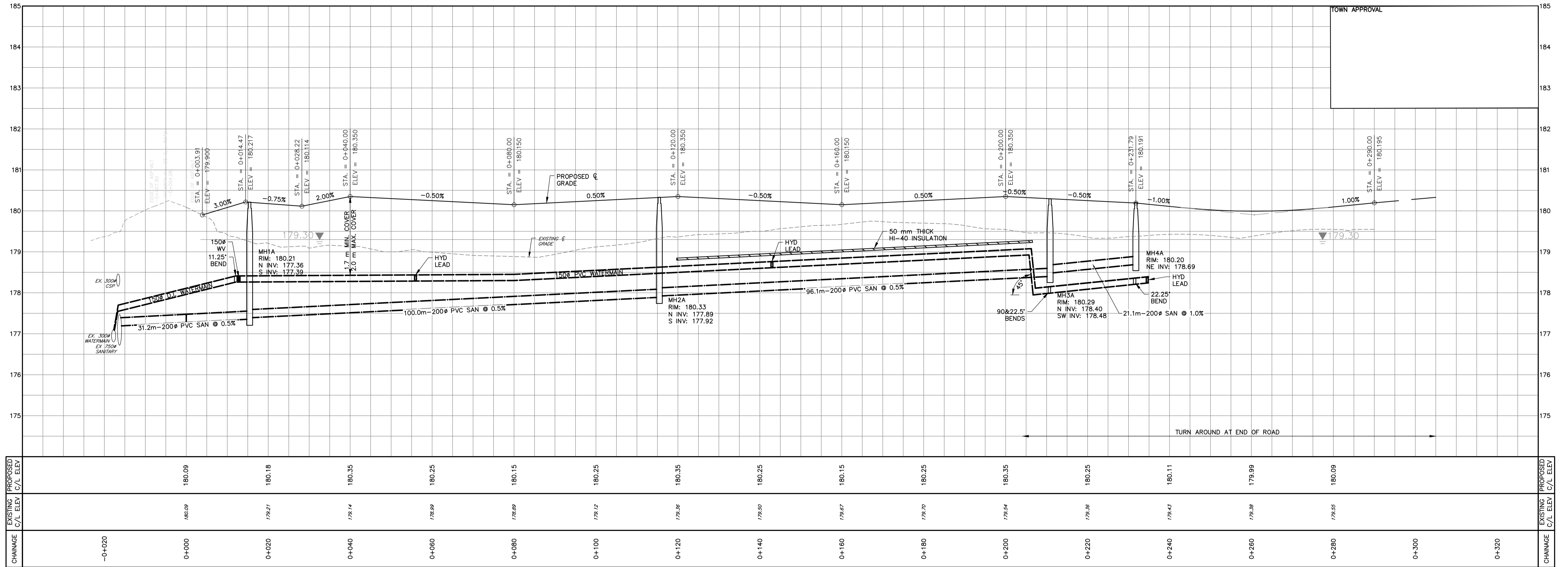
CRANBERRY MARSH ESTATES
TOWN OF COLLINGWOOD
 POST-DEVELOPMENT DRAINAGE PLAN

DRAWN: KH/SBU	DATE: FEB 2022	DP02
CHECK: DC	SCALE: 1:500	

GREENTREE GARDENS & EMPORIUM



GEORGIAN BAY HOTEL

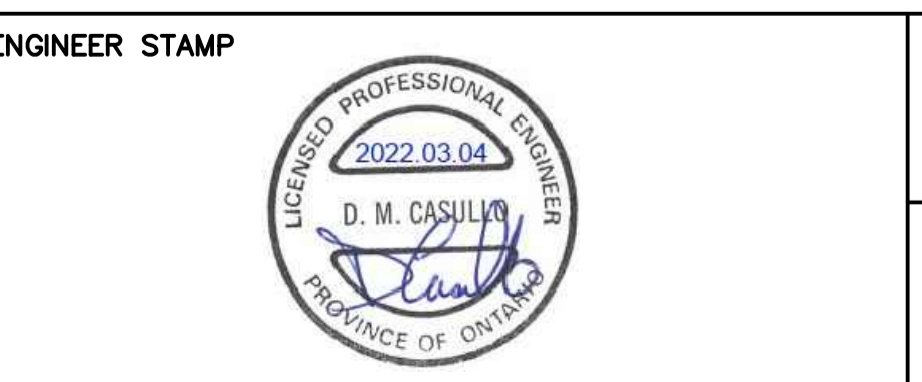


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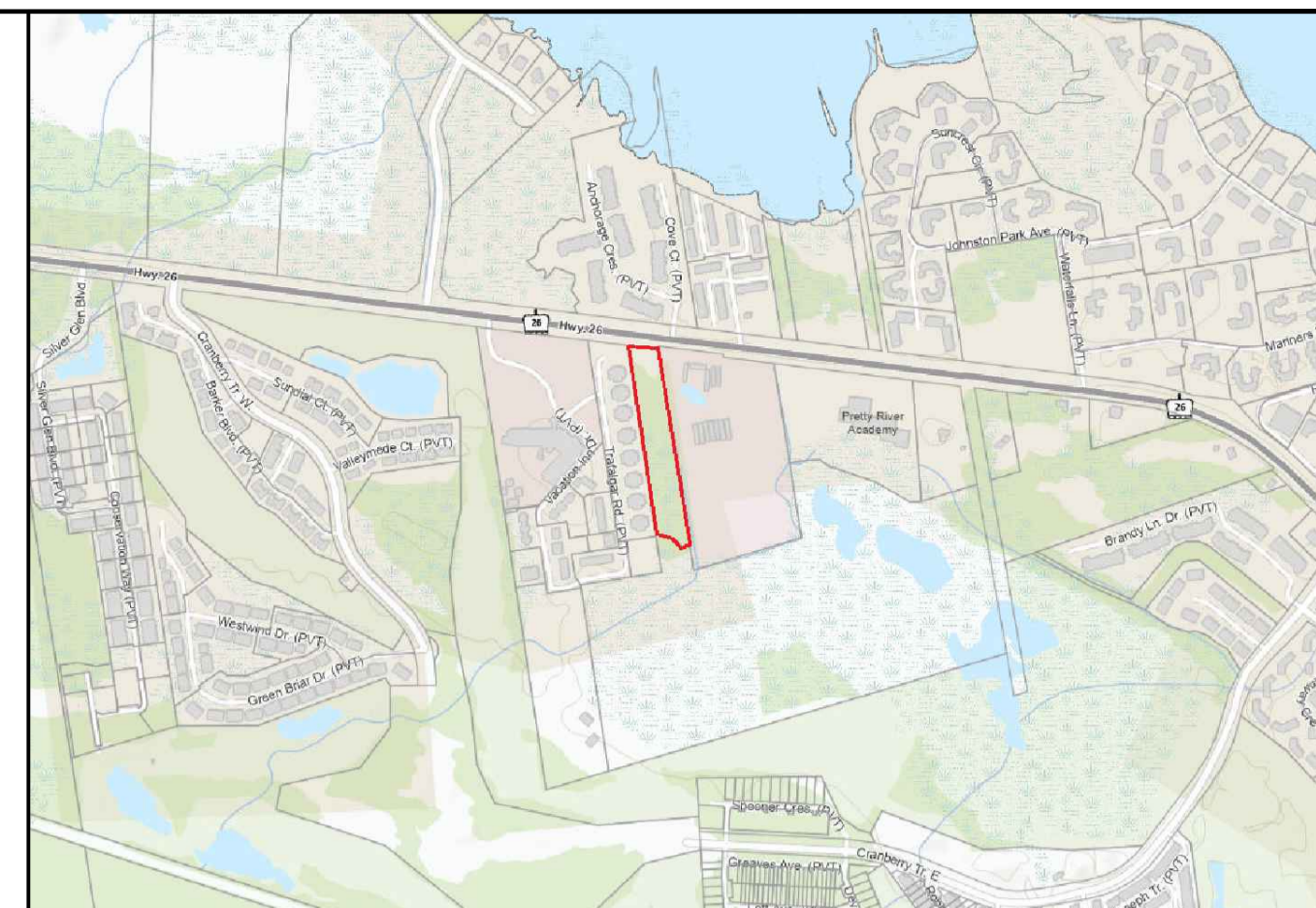
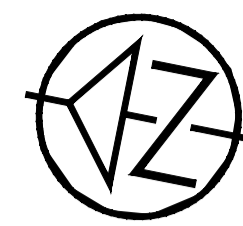
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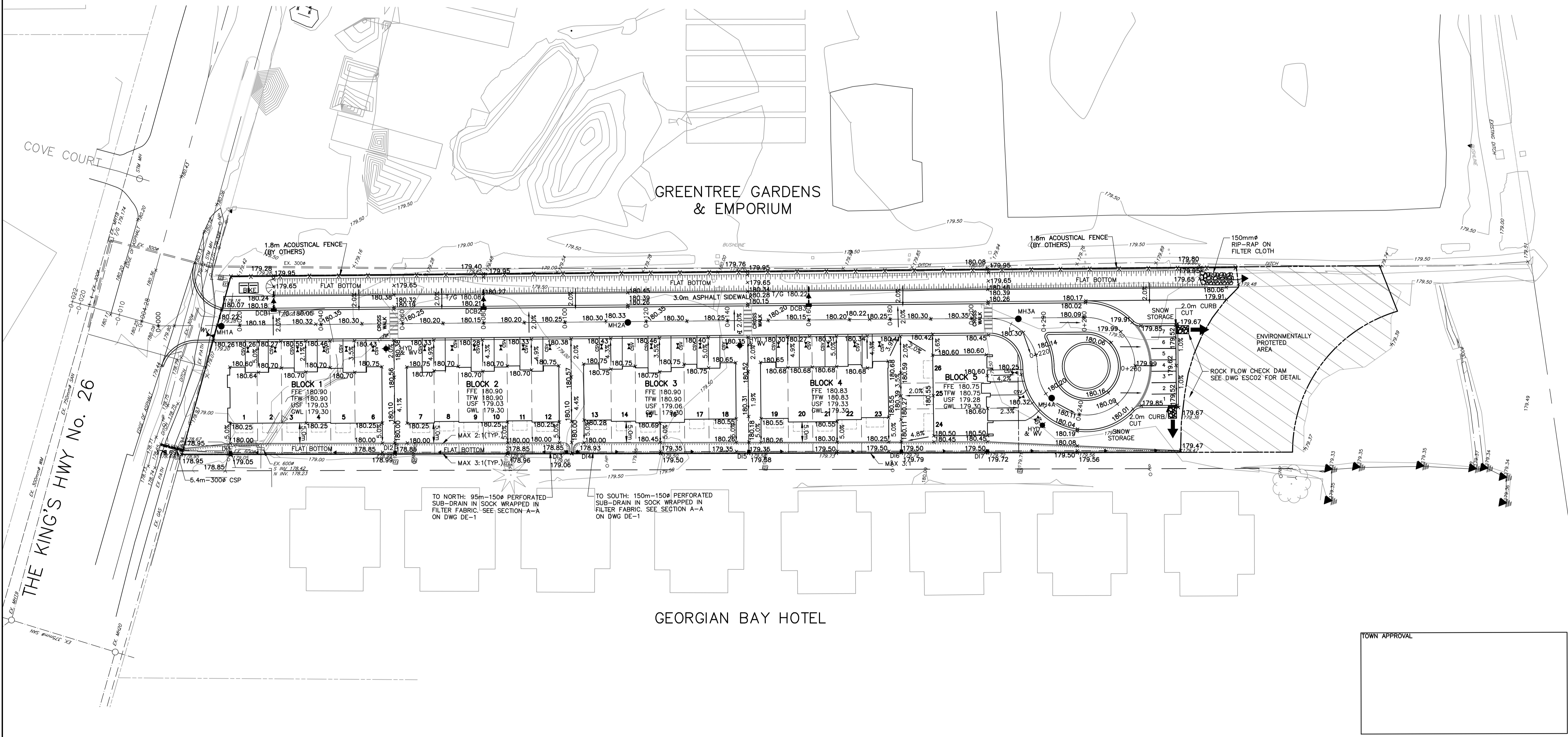
CRANBERRY MARSH ESTATES
 TOWN OF COLLINGWOOD
SITE SERVICING PLAN AND PROFILE

TATHAM ENGINEERING

DESIGN: KG	FILE: 120181	DWG:
DRAWN: KH/SBU	DATE: MAR 2022	PP-1
CHECK: DC	SCALE: H-1:500 V-1:50	



KEY PLAN



TOWN APPROVAL

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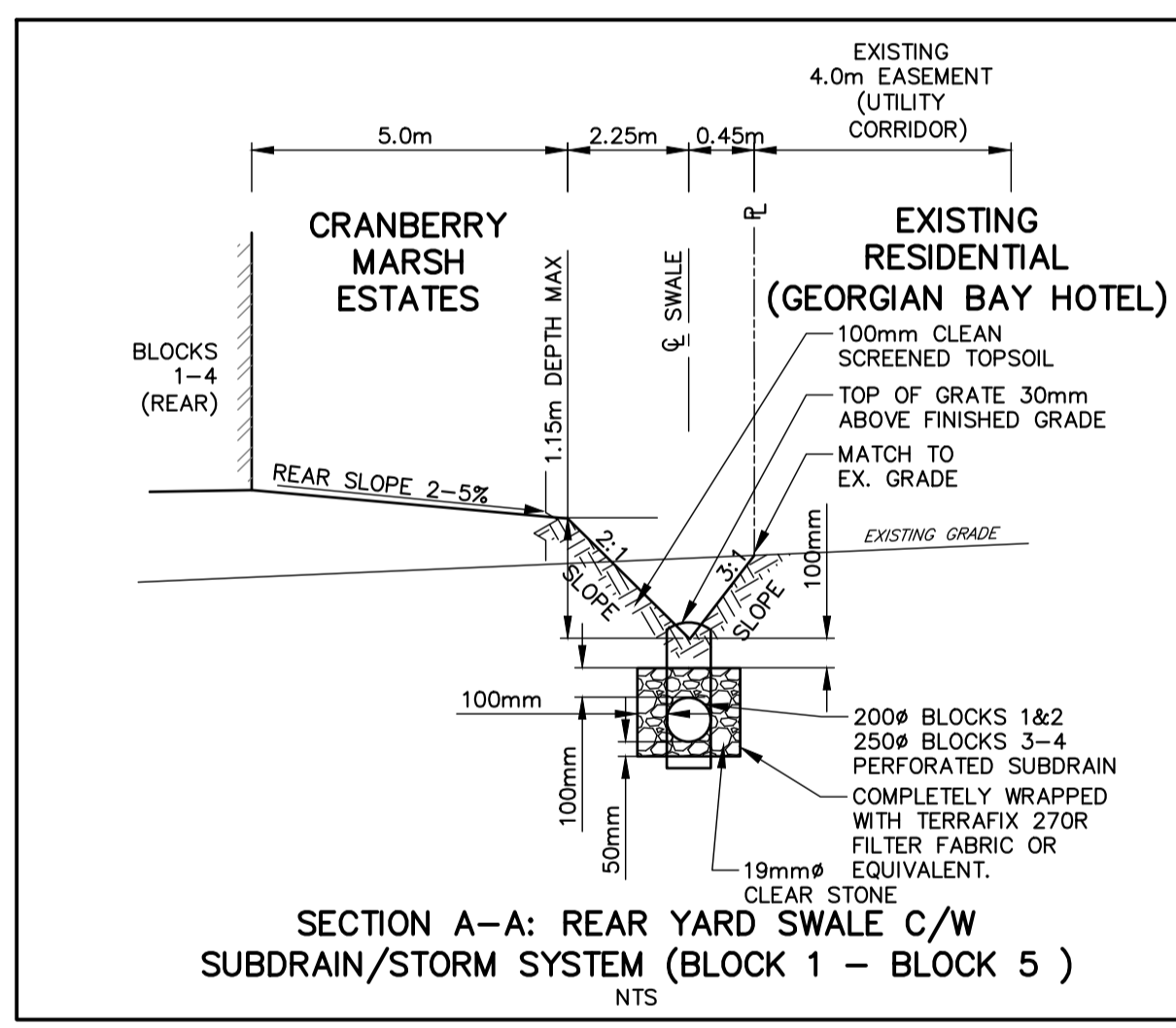
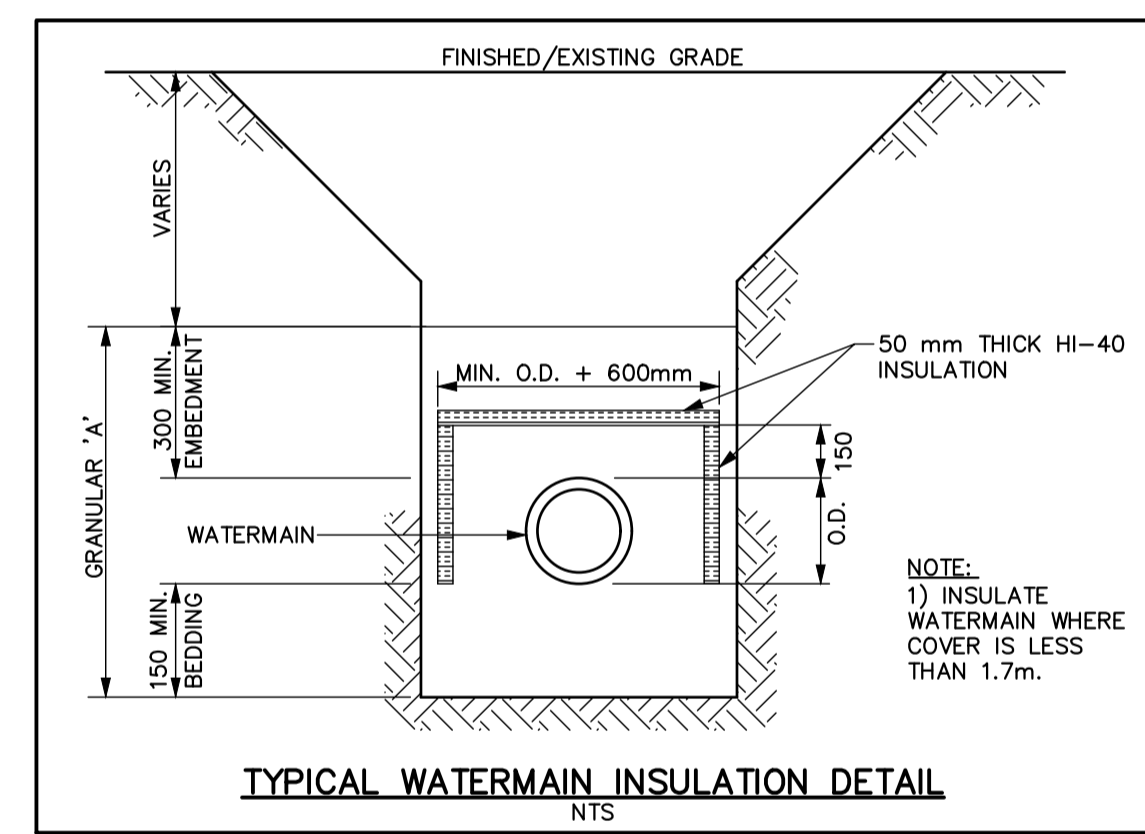
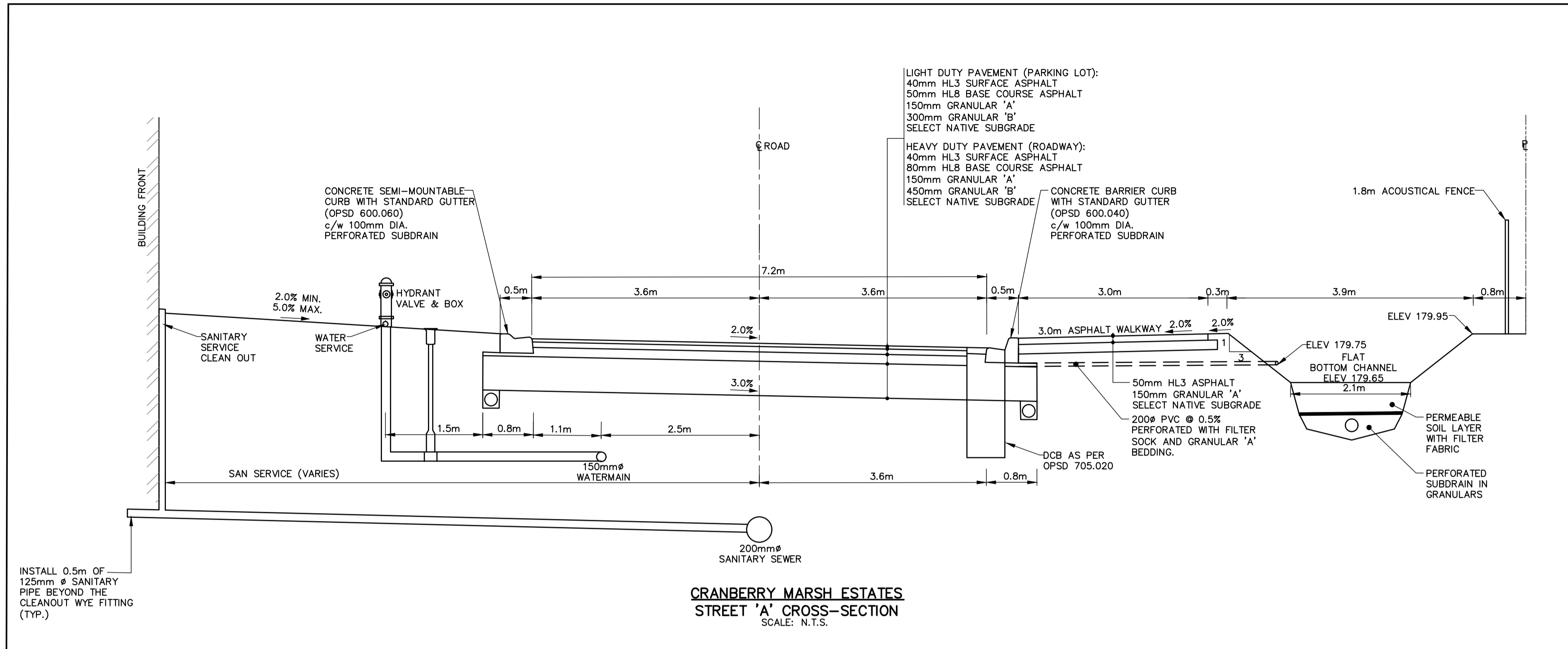
ENGINEER STAMP

CRANBERRY MARSH ESTATES
 TOWN OF COLLINGWOOD

SITE GRADING PLAN

TATHAM ENGINEERING

DESIGN: KH	FILE: 120181	DWG: SG-1
DRAWN: KH/SBU	DATE: OCT 2021	
CHECK: DC	SCALE: 1:500	



- GENERAL - CONSTRUCTION**
- ALL WORK TO BE CARRIED OUT IN ACCORDANCE WITH TOWN OF COLLINGWOOD STANDARDS, O.P.S.D. AND O.P.S.S. WHERE CONFLICT OCCURS, TOWN OF COLLINGWOOD STANDARD TO GOVERN.
 - TRENCH BACKFILL TO OPSD 802.010 TO BE SELECT NATIVE MATERIAL OR IMPORTED SELECT SUBGRADE TO OPS 1010. BACKFILL TO BE PLACED IN MAXIMUM 200 mm THICK LIFTS AND COMPACTED TO 95% OF THE MATERIAL'S STANDARD PROCTOR MAXIMUM DRY DENSITY (SPMDD).
 - PIPE BEDDING TO BE GRANULAR 'A' PIPE COVER TO BE GRANULAR 'B' MAX. AGGREGATE SIZE 25mm FOR RIGID PIPE AND GRANULAR 'A' FOR FLEXIBLE PIPE. (MINIMUM BEDDING DEPTH 150 mm, MINIMUM COVER 300mm, COMPACTED TO A MINIMUM 95% SPMDD).
 - CLEAR STONE WRAPPED IN FILTER FABRIC CAN BE SUBSTITUTED FOR EMBEDMENT MATERIAL IF APPROVED BY THE ENGINEER.
 - ALL TOPSOIL AND EARTH EXCAVATION TO BE STOCK PILED OR REMOVED TO OPS 180. MANAGEMENT AND DISPOSAL OF EXCESS MATERIAL TO AN APPROVED SITE AS DIRECTED BY ENGINEER.
 - THE OWNER'S ENGINEER SHALL PROVIDE BENCH MARK ELEVATIONS AND HORIZONTAL ALIGNMENT REFERENCE FOR THE CONTRACTOR. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE DETAILED LAYOUT OF THE WORK.
 - ALL PROPERTY BARS TO BE PRESERVED AND REPLACED BY O.L.S. AT CONTRACTOR'S EXPENSE IF REMOVED DURING CONSTRUCTION.
 - ALL MAINTENANCE HOLE AND CATCHBASIN FRAMES AND COVERS TO BE SET TO BASE COURSE HLB ASPHALT ELEVATION AND RAISED PRIOR TO PLACEMENT OF FINAL COURSE HLB ASPHALT.
 - THE CONTRACTOR SHALL MAKE HIS OWN ARRANGEMENTS FOR THE SUPPLY OF TEMPORARY WATER AND POWER.
 - DEWATERING TO BE CARRIED OUT IN ACCORDANCE WITH OPS-517 AND 518 TO MAINTAIN ALL TRENCHES IN A DRY CONDITION.
 - ALL ENGINE DRIVEN PUMPS TO BE ADEQUATELY SILENCED, SUITABLE FOR OPERATION IN A RESIDENTIAL DISTRICT.
 - ALL DISTURBED AREAS TO BE REINSTATED TO PREVIOUS CONDITION OR BETTER.
 - THE CONTRACTOR IS RESPONSIBLE FOR PRESERVATION OF ALL EXISTING FACILITIES AS WELL AS NOTIFYING ALL UTILITY COMPANIES PRIOR TO COMMENCING WORK AND CO-ORDINATE CONSTRUCTION ACCORDINGLY.
 - ALL SIGNAGE TO BE LAWFULLY ERECTED AND MAINTAINED IN ACCORDANCE TO THE TOWN SIGN BY-LAW.
 - CLEARING, GRUBBING AND REMOVAL OF SURFACE BOULDERS TO OPS 201.
 - GRADING TO OPS 206.
 - COMPACTING TO OPS 501.
 - DUST SUPPRESSANTS TO OPS 506.
 - TREE REMOVALS AND/OR TRANSPLANTS TO BE COMPLETED OUTSIDE OF MIGRATORY BIRDS NESTING SEASON FROM APRIL 1ST TO AUGUST 31ST. REMOVALS MAY TAKE PLACE DURING THIS RESTRICTED TIME ONLY IF THE REQUIREMENTS OF MIGRATING BIRDS CONVENTION ACT ARE MET AND NESTING ACTIVITY IS ROUTINELY MONITORED BY QUALIFIED INDIVIDUALS (I.E. WILDLIFE BIOLOGIST).

- SANITARY SEWERS**
- MAINTENANCE HOLES TO OPSD 701.010 AND 701.030.
 - BENCHING TO OPSD - 701.021.
 - STEPS TO OPSD - 405.010.
 - FROST STRAPS SHALL BE INSTALLED ON ALL MAINTENANCE HOLE AS PER OPSD - 701.100.
 - FRAMES AND COVERS TO OPSD - 401.030 (WATER TIGHT COVER).
 - PIPE SUPPORT AT MAINTENANCE HOLES AS PER OPSD 708.020.
 - ALL MAINTENANCE HOLES, UNLESS EXPRESSLY IDENTIFIED ARE 1200 mm DIAMETER WITH WATER TIGHT INSERTS.
 - GENERAL INSTALLATION AND TESTING OF SEWERS AND APPURTENANCES TO BE IN ACCORDANCE WITH O.P.S.S. 407, 408, 409 (CCTV), 410, 421 AND ALL SPECIFICATIONS REFERENCED WITHIN THESE SECTIONS.
 - SERVICE CONNECTIONS TO BE 125 mm DIA., TERMINATED WHERE SPECIFIED ON THE DRAWING COMPLETE WITH PLUG AND MARKED WITH A 38mm x 89mm PAINTED GREEN FROM THE INVERT OF THE SERVICE TO 600 mm ABOVE GRADE.
 - SERVICE CONNECTION TO OPSD 1006.020, GRANULAR A BEDDING AND EMBEDMENT.
 - RIGID BOARD INSULATION (HI-40) REQUIRED FOR FROST PROTECTION OF SEWER WITH LESS THAN 1.2 m MINIMUM COVER. INSULATION TO BE MINIMUM 50 mm THICK AND HAVE A MINIMUM WIDTH OF 1.2m.

- WATER MAINS**
- THRUST BLOCKS TO OPSD-1103.010 AND 1103.020 WHERE SUITABLE SOILS ARE ENCOUNTERED.
 - MINIMUM COVER ON WATER MAIN AND SERVICES TO BE 1.7 m.
 - GATE VALVES, BENDS AND FITTINGS TO BE CONNECTED WITH ROMAC GRIP RING RESTRAINING CLAMP.
 - CLEARANCE BETWEEN WATER MAINS AND SEWERS TO BE A MINIMUM OF 0.5m VERTICAL WHERE WATER MAIN IS BELOW SEWER OR 2.5m MINIMUM HORIZONTAL SEPARATION. WHERE WATER MAIN IS ABOVE SEWER, THE MINIMUM SEPARATION TO BE 150 mm (BEDDING MATERIAL).
 - GENERAL INSTALLATION AND TESTING OF WATER MAIN AND APPURTENANCES TO BE IN ACCORDANCE WITH O.P.S.S. 701 AND ALL SPECIFICATIONS REFERENCED WITHIN THESE SECTIONS.
 - ALL WORK ON TOWN PROPERTY AND ON TOWN OF COLLINGWOOD WATER DEPARTMENT (TCWD) WATER MAINS MUST BE UNDERTAKEN BY TCWD OR AN APPROVED CONTRACTOR WITH TCWD INSPECTION, ALL AT DEVELOPER'S COST.
 - SERVICE CONNECTIONS TO OPSD-1104.010, 100 mm GRANULAR 'A' EMBEDMENT AND COVER OVER PIPE. TERMINATE WHERE SPECIFIED ON DRAWING C/W CURB STOP AND BOX, TESTING TAIL TO SURFACE ATTACHED TO A 38mm x 89mm MARKER POST PAINTED BLUE FROM THE INVERT OF THE SERVICE TO 600 mm ABOVE GRADE. I) ALL SERVICES ARE TO BE CONSTRUCTED IN ACCORDANCE WITH TOWN STANDARDS.
 - WATER MAIN SERVICES - 50mm TYPE 'K' COPPER. MAIN STOPS TO 201-A3H3, 3/4", BALL STYLE. AWWA THREAD BY COMPRESSION CAMBRIDGE BRASS. CURB STOPS TO 203-H3H3, 3/4" BALL STYLE WITH DRAIN. COMPRESSION JOINT CAMBRIDGE BRASS. SERVICE BOXES TO NUMBER 7, D-1 CLOW OR MUELLER WITH 24" BLACK RODS STRAIGHT OR OTHERWISE NOTED ON DRAWINGS.
 - ALL WATER TESTING AND WATER MAIN CHLORINATION WILL BE CONDUCTED BY TCWD AT THE DEVELOPER'S COST. WATER MAINS ARE NOT TO BE CONNECTED TO THE EXISTING WATER MAINS UNTIL BACTERIOLOGICAL TESTING HAS BEEN SUCCESSFULLY COMPLETED. NEW WATER MAINS CAN NOT BE CONNECTED TO EXISTING MAINS UNLESS PAS'ALL BACTERIOLOGICAL TESTING AND AS SUCH A TEMPORARY BACKFLOW PREVENTOR WILL NEED TO BE INSTALLED BETWEEN THE LIVE TAP AND THE NEW SERVICE TO FACILITATE ADEQUATE PROTECTION OF THE EXISTING WATER MAIN. IT SHOULD BE NOTED THAT THIS TESTING TAKES APPROXIMATELY A WEEK TO COMPLETE AND MUST BE CONDUCTED BY TCWD. A WORK PLAN FOR THIS WORK MUST BE SUBMITTED TO TCWD FOR APPROVAL.
 - AS A GENERAL PRINCIPLE EACH PROPERTY SHALL HAVE ONE SERVICE AND ONE METER. M) NO WATER VALVES ARE TO BE OPERATED WITHOUT TCWD APPROVAL.

- STORM SEWERS**
- CATCH BASINS AND DOUBLE CATCH BASINS TO OPSD 705.010 AND 705.020 C/W 600 mm SUMP. REAR LOT CATCH BASINS AND DITCH INLET CATCH BASINS TO OPSD 705.010 WITHOUT SUMP.
 - CATCH BASINS AND DOUBLE CATCH BASINS FRAMES AND GRATES TO OPSD 400.020. REAR LOT CATCH BASIN FRAMES AND GRATES TO OPSD 400.120.
 - CATCH BASIN LEADS - 250 mm DIA. SINGLE AND 300 mm DIA. DOUBLE. CATCH BASIN CONNECTIONS TO OPSD 708.010 AND OPSD 708.030.
 - PIPE SUPPORT AT OB'S TO OPSD 708.020. CATCH BASINS AND INLET STRUCTURES FITTED WITH SEDIMENT TRAPS DURING CONSTRUCTION ACTIVITIES, AND CLEANED OUT AS REQUIRED PRIOR TO ASSUMPTION OF THE WORK.
 - HEADWALLS TO BE INSTALLED IN ACCORDANCE WITH OPSD 804.030 (PIPE LESS THAN 900 mm DIA.) OR OPSD 804.040 (AS SPECIFIED), C/W GRATING IN ACCORDANCE WITH OPSD 804.050.

- ROAD AND PARKING**
- SUBGRADE AND ALL GRANULAR 'A' BOULEVARD MATERIAL TO BE COMPACTED TO A MINIMUM DRY DENSITY OF AT LEAST 95% SPMDD. SUBGRADE TO BE PROOF ROLLED AND CERTIFIED PRIOR TO PLACING GRANULAR 'B'.
 - GRANULAR 'A' AND 'B' BASE TO BE COMPACTED TO 100% OF THE MATERIAL'S RESPECTIVE SPMDD.
 - LIGHT DUTY PAVEMENT TWO LIFTS TOTAL 90mm (50mm HLB AND 40mm HL3), 150mm GRANULAR 'A', 300mm GRANULAR 'B'. HEAVY DUTY PAVEMENT TWO LIFTS TOTAL 120mm (80mm HLB AND 40mm HL3), 150 mm GRANULAR 'A', 450mm GRANULAR 'B', ALL SUBDRAINS TO BE CONSTRUCTED IN ACCORDANCE WITH OPS 405.
 - CONCRETE SEMI-MOUNTABLE CURB WITH STANDARD GUTTER TO OPSD 600.060. CONCRETE BARRIER CURB WITH STANDARD GUTTER TO OPSD 600.040. CONCRETE BARRIER CURB WITH STANDARD GUTTER TO OPSD 600.110.
 - SELECT SUBGRADE MATERIAL, OR IMPORTED GRANULAR MATERIAL APPROVED BY THE ENGINEER, COMPACTED TO 98% S.P.M.D.D. TO BE USED AS FILL IN ALL AREAS WHERE PROPOSED PIPE INVERTS ARE HIGHER THAN EXISTING GRADE OR AS INSTRUCTED BY THE ENGINEER.
 - ALL GRANULARS AND ASPHALT MATERIALS AND PLACEMENT TO BE IN ACCORDANCE WITH OPS 314 AND OPS 310.
 - JOINTS WITH EXISTING ASPHALT TO BE SAW CUT STRAIGHT PRIOR TO PLACING NEW ASPHALT AND TACK COAT APPLIED TO EXISTING ASPHALT.
 - REINSTATEMENT OF ALL DISTURBED BOULEVARDS TO INCLUDE REGRADING, MINIMUM 150mm TOPSOIL AND SOD TO OPS.MUNI 802 AND 803.
 - ALL FIRE ROUTE SIGNAGE TO BE AS PER TOWN OF COLLINGWOOD BY-LAW 96-37.
 - ENTRANCE AS PER OPSD 350.010, SIDEWALKS TO OPSD 310.050 AND 310.010.

- MATERIALS**
- SANITARY SEWER SDR-35 PVC, SANITARY SERVICES - SDR 28 PVC
 - WATER MAIN - DUCTILE IRON CLASS 52, OR PRESSURE CLASS 350 CEMENT LINED. CONDUCTIVITY CONNECTORS TO BE USED ON ALL JOINTS.
 - WATER SERVICE CONNECTIONS TO BE TYPE 'K' COPPER PIPE.
 - VALVES - RESILIENT SEATED, RSGV, MECHANICAL JOINT, OPEN LEFT CLOW OR MUELLER WITH 5 SL-48 SLIDING VALVE BOX, TO AWWA C504.
 - MECHANICAL JOINT DUCTILE FITTINGS - AWWA/ANSI C153/A21.53.
 - RESTRAINER - ROMAC GRIPPER RING FOR PIPE SIZES UP TO 300 mm AND SIGMA ONE-LOCK FOR PIPE SIZES GREATER THAN 300 mm.
 - LIVE TAP SADDLES - EPOXY COATED C/W STAINLESS STEEL BOLTS.
 - LIVE TAP VALVE - RESILIENT SEATED RSGV LIVE TAPE VALVE, OPEN LE.
 - FILTER FABRIC - TERRAFIX 270R OR APPROVED EQUAL.
 - PERFORATED SUBDRAINS - 100mm DIA. BIG 'O' WITH GEOTEXTILE FILTER SOCK OR APPROVED EQUAL UNLESS NOTED OTHERWISE.
 - ALL SPECIFIED AGGREGATES TO OPSD 1010.
 - INSULATION - STYROFOAM HI-40.

TOWN APPROVAL

DISCLAIMER AND COPYRIGHT
 CONTRACTOR MUST VERIFY ALL DIMENSIONS AND BE RESPONSIBLE FOR SAME. ANY DISCREPANCIES MUST BE REPORTED TO THE ENGINEER BEFORE COMMENCING WORK. DRAWINGS ARE NOT TO BE SCALED.
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BENCHMARKS
 ELEVATIONS SHOWN ON THIS PLAN ARE RELATED TO GEODETIC DATUM AND ARE DERIVED FROM BENCH MARK No. 0011972U311 HAVING A PUBLISHED ELEVATION OF 181.032 METRES.

NOTES
 LEGAL SURVEY INFORMATION AND LOT DIMENSIONS SHOWN ON THIS PLAN ARE TAKEN FROM A SURVEY PLAN PREPARED BY C.C. TATHAM & ASSOCIATES LTD, DATED, 2012 WHICH MAY NOT BE FINAL AND ARE NOT GUARANTEED.

No.	REVISION DESCRIPTION	DATE	ENGINEER STAMP
1.	1ST SUBMISSION	03/22	

ENGINEER STAMP

CRANBERRY MARSH ESTATES
 TOWN OF COLLINGWOOD

TATHAM ENGINEERING

DESIGN: KG/SBU FILE: 120181 DWG:
 DRAWN: KH/SBU DATE: NOV 2021 **DE01**
 CHECK: DC SCALE: 1:500

DETAILS & NOTES