

RECONSTRUCTION OF WEST STREET - PHASE 2 BROOK STREET TO TALBOT STREET SOUTH SIMCOE, ON

CONTRACT No. EIS-ENG-25-34

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GENERAL NOTES

- ALL WORK SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE MOST CURRENT NORFOLK COUNTY STANDARDS ND SPECIFICATIONS, ONTARIO PROVISIONAL STANDARDS DRAWINGS AND SPECIFICATIONS AND ASSOCIATED AMENDMENTS; AND APPROVED MANUFACTURER'S LIST, UNLESS OTHERWISE NOTED.
- THE LOCATION OF UNDER/ABOVE GROUND UTILITIES AND STRUCTURES SHOWN ON THE DRAWINGS ARE APPROXIMATE ONLY AND THE ACCURACY IS NOT GUARANTEED. THE CONTRACTOR SHALL DETERMINE THE LOCATION OF ALL UTILITIES AND STRUCTURES BY CONSULTING THE APPROPRIATE AUTHORITIES OR UTILIT AGENCIES. THE COUNTY DISCLAIMS ALL RESPONSIBILITY FOR THE ACCURACY AND/OR SUFFICIENCY OF THE INFORMATION. THE CONTRACTOR SHALL DETERMINE THE EXACT LOCATIONS OF ALL UTILITIES AND STRUCTURES AND SHALL ASSUME ALL LIABILITY AND ASSUME THE COSTS OF REPAIR OF DAMAGE CAUSED BY THESE
- THE CONTRACTOR IS TO MEET ALL THE REQUIREMENTS OF THE OWNERS OF THE UTILITIES AND MAKE SATISFACTORY ARRANGEMENTS WITH THE UTILITY COMPANIES FOR CROSSING THEIR INSTALLATIONS AND FOR PROVIDING ADEQUATE PROTECTION DURING CONSTRUCTION.
- 4. DIMENSIONS ARE NOT TO BE SCALED FROM THE DRAWINGS.
- 5. READ ALL DRAWINGS IN CONJUNCTION WITH CONTRACT SPECIFICATIONS.
- 6. THE LOCATION AND ELEVATION OF ALL EXISTING SERVICES AND UTILITIES ARE TO BE VERIFIED IN THE FIELD BY THE CONTRACTOR FOR ACCURACY PRIOR TO CONSTRUCTION. ANY DISCREPANCIES SHALL BE IMMEDIATELY REPORTED TO THE CONTRACT ADMINISTRATOR. DETAILS ARE NOT TO BE SCALED FROM THE DRAWINGS. IN THE CASE OF STORM, SANITARY SEWERS AND CULVERTS, THE CONTRACTOR SHALL SURVEY THE INVERTS AND SIZES TO CONSTRUCTION.

 7. ALL WATERMAIN FITTINGS SHALL HAVE MECHANICAL JOINTS.

 8. ANODES ARE TO BE PROVIDED ON ALL METALLIC BENDS, TE EACH WATER SERVICE CONNECTION PER COUNTY OF NORFOLD THIS DWG. TO CONSTRUCTION.
- 7. ALL SERVICES AND UTILITIES SHALL BE SUPPORTED AS PER THE REQUIREMENTS OF THE COUNTY OR UTILITY AGENCIES. WHERE THE STABILITY, SAFETY OR FUNCTION OF THE EXISTING ROADWAY OR UNDERGROUND FACILITIES MAY BE IMPAIRED DUÉ TO THE CONTRACTOR'S METHOD OF OPERATIONS. THE CONTRACTOR SHALL PROVIDE SUCH PROTECTION AS MAY BE REQUIRED INCLUDING SHEETING, SHORING AND DRIVING OF PILES WHERE NECESSARY, TO PREVENT DAMAGE EXISTING WORKS OR PROPOSED WORKS. CONSTRUCTION OF SHORING, BRACING AND PROTECTION SCHEMES SHALL CONFORM TO OPSS 404 AND 539.
- 8. ALL HYDRO, POWER OR TELEPHONE POLES WITHIN 2.0m FROM PIPE TRENCHES OR OPEN EXCAVATIONS SHALL
- 9. EXTREME CARE IS REQUIRED DURING EXCAVATION IN THE VICINITY OF ANY EXISTING UNDERGROUND OR OVERHEAD UTILITY IN ORDER TO AVOID DAMAGE. REPAIR TO ANY DAMAGE TO THE UTILITIES SHALL BE CONTRACTOR'S RESPONSIBILITY. REPAIR SHALL BE COMPLETED TO THE SATISFACTION OF UTILITY OWNER AND
- 10. CLEARING OF ANY EXISTING VEGETATION OTHER THAN THAT DETAILED ON THE CONTRACT DRAWINGS SHALL NOT BE UNDERTAKEN WITHOUT SPECIFIC WRITTEN DIRECTIONS OF THE CONTRACT ADMINISTRATOR, VERTICAL EXCAVATION, HAND EXCAVATION, AUGURING AND IMMEDIATE BACKFILLING OF ANY TRENCH SHALL BE UNDERTAKEN BY THE CONTRACTOR AS NECESSARY TO ENSURE THAT ALL REASONABLE PRECAUTIONS ARE TAKEN TO PROMOTE THE SURVIVAL OF ANY EXISTING VEGETATION. COORDINATE WITH THE CONTRACT ADMINISTRATOR AND COUNTY ARBORIST FOR ANY WORKS WITH THE DRIPLINE OF ANY TREE OVER 50mm CALIPER.
- 11. EXCAVATION OF ALL TRENCHES TO BE IN ACCORDANCE WITH THE REQUIREMENTS OF THE OCCUPATIONAL HEALTH & SAFETY ACT (OHSA) AND REGULATIONS FOR CONSTRUCTION PROJECTS.
- 12. ALL ORGANIC, SUITABLE OR UNSUITABLE MATERIALS BENEATH THE ROAD ALLOWANCE MUST BE REMOVED AND THESE AREAS BACKFILLED WITH AN APPROVED FILL MATERIAL TO THE SATISFACTION OF THE CONTRACT ADMINISTRATOR
- 13. SURPLUS OR UNSUITABLE EXCAVATED MATERIAL SHALL BE REMOVED AND TRANSPORTED FOR DISPOSAL OFFSITE PER THE REQUIREMENTS OF O.REG 406/19 AND AS PER THE PROJECT'S EXCESS SOILS MANAGEMENT PLAN.
- 14. HANDLING AND INSTALLATION OF ALL PIPES SHALL BE IN STRICT COMPLIANCE WITH THE MANUFACTURER'S GUIDELINES.
- 15. ALL GEOTECHNICAL BOREHOLE (BH) LOGS SHOWN ON PLAN AND PROFILE DRAWINGS ARE SCHEMATIC ONLY UNLESS OTHERWISE NOTED.
- 16. PRIOR TO CLOSING ANY STREET, THE CONTRACTOR SHALL OBTAIN CLEARANCE BY FILLING OUT THE COUNTY'S NOTICE OF ROAD CLOSURE FORM AND NOTIFY SCHOOL BUS OPERATORS OR STREETS USED FOR DETOUR AND
- 17. ACCESS TO ALL PROPERTIES SHALL BE MAINTAINED AT ALL TIMES. CONSTRUCTION STAGING ACROSS STREETS AND DRIVEWAYS SHALL BE LIMITED TO HALF AT A TIME. SHOULD TEMPORARY DRIVEWAY BLOCKAGE BE

THE DURATION OF THE DETOUR. THE CONTRACTOR MUST SUPPLY AND MAINTAIN ADEQUATE LOCAL DETOUR SIGN

- REQUIRED, THE RESIDENT OR BUSINESS SHALL BE NOTIFIED A MINIMUM OF 24 HOURS IN ADVANCE OF WORK 18. SHOP DRAWINGS FOR SHORING, SHEETING AND BRACING SHALL BE PREPARED BY THE CONTRACTOR, BY A PROFESSIONAL ENGINEER CERTIFIED IN THE PROVINCE OF ONTARIO AND SUBMITTED FOR REVIEW TO THE
- CONTRACT ADMINISTRATOR PRIOR TO CONSTRUCTION. 19. THE CONTRACTOR SHALL NOT BACKFILL OR BURY ANY UTILITY OR STRUCTURE WITHOUT FIRST ENSURING THAT THE ACTUAL LOCATION OF THE SERVICE (BOTH VERTICAL AND HORIZONTAL) HAS BEEN RECORDED BY THE
- CONTRACT ADMINISTRATOR FOR 'AS-CONSTRUCTED' PURPOSES. 20. MAINTENANCE HOLE AND VALVE CHAMBER COVERS ARE TO BE SET FLUSH WITH BASE COVER ASPHALT AND
- ADJUSTED TO FINAL GRADE PRIOR TO INSTALLING TOP LIFT ASPHALT.
- 21. ALL PAVEMENT OR CURB MARKINGS AND TRAFFIC STRIPING REMOVED OR DISTURBED, WHETHER PARTIALLY OR COMPLETELY BY THE CONTRACTOR'S OPERATION SHALL BE REPLACED COMPLETELY.
- 22. ALL EXISTING SURFACE IMPROVEMENTS SHALL BE ASSESSED BY THE CONTRACTOR PRIOR TO BEGINNING WORK AND SHALL BE REPLACED IN KIND AT THE CONTRACTOR'S EXPENSE IF DAMAGED DURING CONSTRUCTION. 23. NO BLASTING IS PERMITTED.
- 24. NORFOLK COUNTY STANDARD DRAWINGS AND ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD), AS AMENDED, SHALL CONSTITUTE PART OF THE ENGINEERING DESIGN AND CONSTRUCTION CONTRACT.
- 25. WHERE AS NECESSARY TO ENTER PRIVATE PROPERTY TO CONNECT THE EXISTING WATER RESULTS IN A NEGATIVE IMPACT TO THE PRIVATE PROPERTY, THE PRIVATE PROPERTY MUST BE RESTORED TO EXISTING CONDITION OR BETTER, AT NO ADDITIONAL COST TOT HE CONTRACT OR THE LANDOWNER.
- 26. THE CONTRACTOR SHALL CONSTRUCT TEMPORARY MEASURES TO CONTROL SILT FROM ENTERING THE STORM DRAINAGE SYSTEM TO THE SPECIFICATIONS OUTLINED IN THE GUIDELINES ON EROSION AND SEDIMENT CONTROL FOR URBAN CONSTRUCTION SITES PREPARED BY THE MNR. THESE MEASURES ARE TO BE INSTALLED PRIOR TO COMMENCING ANY CONSTRUCTION AND ARE TO REMAIN IN PLACE UNTIL CONSTRUCTION HAS BEEN COMPLETED
- 27. ALL TREES OR VEGETATION REMOVAL MUST BE COMPLETED IN COMPLIANCE WITH THE MIGRATORY BIRDS CONVENTION ACT. TREES AND VEGETATION REMOVAL SHALL BE COMPLETED OUTSIDE OF THE BIRD BREEDING SEASON OR FOLLOWING INSPECTION AND CONFIRMATION OF NO ACTIVE NESTS BY A QUALIFIED BIOLOGIST. IF REMOVAL TO TAKE PLACE IN THE BIRD BREEDING WINDOW, CONSULTATION WITH THE CANADIAN WILDLIFE

STORM AND SANITARY SEWER NOTES

TO THE SPECIFICATIONS OF THE COUNTY AND CONTRACT ADMINISTRATOR.

- 1. SEWER INSTALLATION SHALL CONFORM TO THE LATEST REVISIONS OF THE ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD) AND SPECIFICATIONS (OPSS) AS AMENDED BY THE COUNTY AND AS PER THE CONTRACT SERVICE CONNECTION LOCATIONS AND ELEVATIONS ARE APPROXIMATE. CONTRACTOR TO FIELD VERIFY ALL
- CONNECTION LOCATIONS
- 3. A MINIMUM HORIZONTAL SEPARATION OF 2.5m MUST BE MAINTAINED BETWEEN WATERMAINS AND SANITARY OR STORM SEWERS, INCLUDING SERVICE LATERALS, UNLESS OTHERWISE NOTED.
- 4. A MINIMUM VERTICAL SEPARATION OF 0.50m BETWEEN WATERMAINS AND SEWERS MUST BE MAINTAINED.
- 5. MINIMUM DEPTH OF COVER OVER THE SEWER SHALL BE 1.4m UNLESS NOTED OTHERWISE.
- 6. PRIVATE CONNECTIONS SHALL BE 100mmø PVC SDR28 WITH CLASS B BEDDING TO OPSD 1006.010 AND OPSD 1006.020 AS APPLICABLE. CONNECTIONS ARE TO BE MADE AT THE PROPERTY LINE c/w WATERTIGHT CAP IF
- ALL CATCH BASIN LEADS SHALL BE 250mmø FOR SINGLE CATCH BASINS AND 300mmø FOR DOUBLE CATCH BASINS, UNLESS NOTED OTHERWISE. PIPE MATERIAL TO BE PVC SDR 35 BEDDED WITH CLASS B BEDDING.
- 8. REINFORCED CONCRETE STORM SEWER MAIN PIPE SHALL BE CLASS 65-D UNLESS NOTED OTHERWISE.
- 9. POLYVINYL CHLORIDE STORM SEWER SHALL BE (PVC SDR35) IN ACCORDANCE WITH THE REQUIREMENTS OF
- 10. HDPE PIPE SHALL BE 320 KPa IN ACCORDANCE TO CSA B182.6 (SANITARY) FOR SIZES UP TO AND INCLUDING 450mm. JOINTS SHALL HAVE AN ELECTROMETRIC GASKET. SPLIT COUPLING JOINTS WILL NOT BE ACCEPTED. 11. ALL PIPE SHALL HAVE A SMOOTH INTERIOR WALL.
- 12. FRAME AND GRATE ON SANITARY MAINTENANCE HOLES PER OPSD 401.010 TYPE A.
- 13. FRAME AND GRATE FOR STORM MAINTENANCE HOLES TO OPSD 401.010 TYPE B.
- 14. CATCH BASIN FRAME AND GRATE WITHIN ROADWAY TO OPSD 400.100. IN VEGETATE AREAS, PROVIDE FRAME AND GRATE TO OPSD 400.120.
- 15. CATCH BASINS TO OPSD 705.010. DOUBLE CATCH BASINS TO OPSD 705.020.
- 16. CATCH BASIN INSTALLATION AT CURB AND GUTTER TO OPSD 610.010.
- 17. CONNECTIONS TO MAIN PER OPSD 708.010
- 18. MAINTENANCE HOLE RISERS AND ADJUSTMENT UNITS TO OPSD 701.031 AND 704.120.
- 19. SUBDRAIN UNDER CURB PER OPSD 207.041. PROVIDE SUBDRAIN CONNECTIONS AT STORM STRUCTURES PER

20. MAINTENANCE HOLE BENCHING TO OPSD 701.021

WATERMAIN NOTES

- WATERMAIN INSTALLATION SHALL CONFORM TO THE LATEST REVISIONS OF THE ONTARIO PROVINCIAL STANDARD DRAWINGS (OPSD) AND SPECIFICATIONS (OPSS) AS AMENDED BY THE COUNTY AND AS PER THE CONTRACT DRAWINGS AND SPECIFICATIONS.
- 2. A MINIMUM HORIZONTAL SEPARATION OF 2.5m MUST BE MAINTAINED BETWEEN WATERMAINS AND SANITARY OR STORM SEWERS, INCLUDING SERVICE LATERALS, UNLESS OTHERWISE NOTED.
- 3. A MINIMUM VERTICAL SEPARATION OF 0.50m BETWEEN WATERMAINS AND SEWERS MUST BE MAINTAINED IF
- 4. ALL VALVES SHALL BE APPROVED TYPE WITH NON-RISING STEM AND SHALL HAVE 50mm SQUARE STANDARD AWWA OPERATING NUT. SEE THE COUNTY'S APPROVED MANUFACTURERS PRODUCTS LIST.
- 5. ALL PLUGS, CAPS, TEES AND BENDS SHALL BE PROVIDED WITH THRUST BLOCKS AS PER OPSD 1103.01 AND OPSD 1103.020. IN ADDITION, ALL PVC PIPES SHALL BE MECHANICALLY RESTRAINED AS PER MANUFACTURERS SPECIFICATIONS. RESTRAINTS SHALL MEET ALL REQUIREMENTS OF UNI-BELL B-13. REFER TO THE THRUST RESTRAINT TABLE THIS DRAWING.
- 6. MINIMUM DEPTH OF COVER OVER THE WATERMAIN SHALL BE 1.7m UNLESS NOTED OTHERWISE.

WATERMAIN IS INSTALLED ABOVE THE SEWER OR 0.50m IF SEWER IS ABOVE THE WATERMAIN.

- ANODES ARE TO BE PROVIDED ON ALL METALLIC BENDS, TEES, CROSSES, VALVES, REDUCERS, ETC., AT EACH WATER SERVICE CONNECTION PER COUNTY OF NORFOLK STANDARDS. REFER TO THE SUMMARY TABLE
- 9. TWU 10 COPPER TRACER WIRE TO BE INSTALLED ON ALL NEW INSTALLATIONS OF PVC WATERMAIN PIPE FOR LOCATING PURPOSES. JOINTS IN THE WIRE BETWEEN VALVES ARE NOT PERMITTED.
- . THE CONTRACTOR SHALL TEST THE TRACING WIRE FOR CONDUCTIVITY, IF THE TRACING WIRE IS NOT CONTINUOUS FROM VALVE TO VALVE, THE CONTRACTOR SHALL, AT HIS OWN EXPENSE, REPLACE OR REPAIR
- 11. WATERMAIN FITTINGS, INCLUDING ALL STANDARD BENDS, VALVES, AND HYDRANTS, SHALL BE MECHANICAL JOINT OR PUSH-ON JOINT INSTALLED WITH NORFOLK COUNTY APPROVED MECHANICAL RESTRAINTS.
- 12. CHANGES IN THE VERTICAL AND HORIZONTAL ALIGNMENT OF WATERMAINS ARE GENERALLY TO BE ACHIEVED BY THE USE OF STANDARD BENDS. WHERE THE USE OF STANDARD BENDS IS NOT POSSIBLE. CHANGES IN ALIGNMENT MAY BE BY DEFLECTION OF JOINTS AS PER MANUFACTURER'S SPECIFICATIONS. DEFLECTION OF THE WATERMAIN SHALL BE 50% OF THE MANUFACTURER'S SPECIFICATIONS. PIPE BARREL DEFLECTION IS STRICTLY PROHIBITED.
- 13. THE CONTRACTOR SHALL PROVIDE ALL TEMPORARY CAPS, PLUGS AND BLOW OFFS REQUIRED FOR TESTING THE
- 14. ALL WATER CUSTOMERS SUPPLIED BY A WATERMAIN TO BE TEMPORARILY SHUT DOWN SHALL BE NOTIFIED BY THE CONTRACTOR AT LEAST 48 HOURS IN ADVANCE OF THE SHUT DOWN.
- 15. FIRE HYDRANTS SHALL BE CLOW M67 BRIGADIER OR CENTURY HYDRANT BY CANADA VALVE, PAINTED RED.
- 16. ALL NEW RESIDENTIAL WATER SERVICES SHALL BE 25mmø CROSS-LINKED POLYETHYLENE (PEX) PIPE, CSA CERTIFIED TO CSA B137.5 CONFORMING TO AWWA C904 AND SHALL BE SDR9, PRESSURE RATED AT THE
 - -160 PSI AT 73.4°F (1100 KPA AT 23°C) -100 PSI AT 180°F (690 KPA AT 82°C)
 - -80 PSI AT 200°F (55 KPA AT 93°C)S.
- 17. THE DEPTH OF WATER SERVICES AT PROPERTY LINE SHOULD BE A MINIMUM OF 1.7m AND A MAXIMUM OF 2.0m. THE DISTANCE BETWEEN THE GROUND ELEVATION AND THE TOP OF THE ROD SHOULD BE BETWEEN 0.5m AND 1.0m.
- 18. UNLESS OTHERWISE NOTED SERVICES TO BE REPLACED FROM THE MAIN TO PROPERTY LINE WITH A NEW CURB STOP AND SERVICE BOX AT THE PROPERTY LINE.
- 19. THE CONTRACTOR SHALL NOT OPERATE ANY VALVE OR HYDRANT ON THE MUNICIPAL WATER SYSTEM. REQUESTS FOR OPERATION OF VALVES, HYDRANTS OR OTHER APPURTENANCES SHALL BE MADE TO THE COUNTY'S WATER
- IS THE CONTRACTOR'S RESPONSIBILITY TO ENSURE THAT THEY HAVE A COPIES OF, AND ARE FAMILIAR WITH. THE MOST RECENT NORFOLK COUNTY DESIGN CRITERIA, CONTRACT SPECIFICATIONS AND STANDARD DRAWINGS AND SPECIFICATIONS FOR CONNECTIONS TO EXISTING WATERMAINS, AND SWABBING, FLUSHING, DISINFECTION, LEAKAGE TESTING AND BACTERIOLOGICAL TESTING.

WORKS DEPARTMENT A MINIMUM OF 48 HOURS IN ADVANCE OF OPERATIONS BEING REQUIRED..

ROAD WORKS NOTES

NEW WATERMAIN.

- 1. NEW AND REPLACED CURB AND GUTTER TO BE IN ACCORDANCE WITH OPSD 600.040, AND 608.010, AS INDICATED OR AS REQUIRED TO MATCH EXISTING CONDITIONS.
- 2. ALL PAVEMENT DIMENSIONS MEASURED TO EDGE OF PAVEMENT.
- 3. SIDEWALKS TO BE IN ACCORDANCE WITH OPSD 310.010, 310.020 AND 310.030 AS INDICATED OR AS APPROPRIATE TO MATCH EXISTING CONDITIONS
- 4. ALL NEW ASPHALT SHALL BE HOT MIX, HOT LAID, ASPHALTIC CONCRETE PLACED IN ACCORDANCE WITH OPSS FORMS 310 AND 1151 LATEST AMENDMENTS.
- 5. RESTORATION OF EXISTING DRIVEWAYS AND/OR APPROACHES DISTURBED DURING THE COURSE OF CONSTRUCTION SHALL BE COMPLETED TO THE FOLLOWING STANDARDS:
 - A) GRAVEL DRIVEWAY: MINIMUM 150mm LAYER OF GRANULAR A COMPACTED TO 100% SPMDD. B) ASPHALT DRIVEWAYS: 50mm HL3A COMPACTED TO 97% MARSHALL OVERLYING 150mm GRANULAR A COMPACTED TO 100% SPMDD.
 - C) CONCRETE DRIVEWAYS: RESTORED WITH 150mm THICK 30MPa CONCRETE OVERLYING 150mm GRANULAR A COMPACTED TO 100% SPMDD. D) PAVING STONES: RESTORED WITH EXISTING SALVAGED OR AUGMENTED PAVING STONES. PROVIDE MAXIMUM 3mm JOINT WIDTHS FILLED WITH MORTAR SAND, 50mm COMPACTED DEPTH OF MORTAR SAND OR LIMESTONE SCREENINGS, AND 200mm COMPACTED DEPTH GRANULAR A COMPACTED TO
- 6. BOULEVARDS SHALL BE RESTORED WITH SOD OVERLYING 150mm TOPSOIL UNLESS NOTED OTHERWISE.
- 7. CONTINUOUS SUBDRAIN SHALL BE INSTALLED UNDER CURB. SUBDRAIN SHALL BE BOSS 2000 PERFORATED PIPE c/w KNITTED SOCK OR APPROVED EQUIVALENT.
- 8. CONSTRUCTION JOINTS BETWEEN EXISTING AND NEW ASPHALT SHALL BE CONSTRUCTED IN ACCORDANCE WITH OPSS 310 AND 1212. COMPLETE WITH STEP JOINT AS DETAILED AND HOT RUBBER SEALING COMPOUND.
- 7. ALL MAINTENANCE HOLES WITHIN THE TRAVELED PORTION OF THE ROAD AND CATCH BASINS LOCATED AT ROAD LOW POINTS SHALL BE SET FLUSH WITH THE BASE ASPHALT GRADE AND ADJUSTED TO FINAL GRADE IMMEDIATELY PRIOR TO PLACEMENT OF THE FINISH COURSE ASPHALT. ALL OTHER STREET CATCH BASINS SHALL BE SET TO FINAL ROAD GRADES AND TEMPORARILY COLD ASPHALT RAMPED. IMMEDIATELY PRIOR TO PLACING SURFACE COURSE THE CATCH BASIN RAMPS SHALL BE REMOVED.
- 8. EXISTING STREET NAMES AND TRAFFIC CONTROL SIGNS SHALL BE MAINTAINED THROUGHOUT THE COURSE OF CONSTRUCTION AND RELOCATED IN ACCORDANCE WITH NORFOLK COUNTY STANDARDS IMMEDIATELY UPON COMPLETION OF BASE ASPHALT INSTALLATION.
- 9. DIRECT PEDESTRIAN TRAFFIC AROUND WORK SITE. WHERE EXISTING SIDEWALK IS REMOVED TEMPORARY ASPHALT SIDEWALK TO BE PROVIDED.
- 10. CONTRACTOR TO INSTALL TACTILE WALKING SURFACE INDICATORS AS PER OPSD 310.039 AT INTERSECTIONS IDENTIFIED ON THE PLANS. CONTRACTOR TO ENSURE INSTALLATION COMPLIES WITH NORFOLK COUNTY ACCESSIBILITY DESIGN GUIDELINES SECTION 3.4.

11. CONTRACTOR TO STRIP TOPSOIL FROM EXISTING DITCHES, BACKFILL WITH ONSITE SUITABLE FILL MATERIAL TO

CONFORM TO GRADING PLANS. CONTRACTOR TO PLACE FILL IN DITCHES IN MAXIMUM 200mm LIFTS. 12. PROPOSED CATCHBASINS WITHIN SOFTSCAPE AREAS TO BE FITTED WITH BIRDCAGE FRAME AND GRATE AS PER OPSD 310.039.

EROSION CONTROL NOTES

- 1. EROSION AND SEDIMENT CONTROL MEASURES SHALL BE IMPLEMENTED PRIOR TO, AND MAINTAINED DURING, THE CONSTRUCTION PART TO PREVENT ENTRY OF SEDIMENT INTO LOCAL STORM SEWERS OR THE NATURAL ENVIRONMENT.
- 2. THE CONTRACTOR SHALL BE SOLELY RESPONSIBLE FOR DESIGNING AND PROVIDING ALL SEDIMENT CONTROL MEASURES AS MAY BE REQUIRED TO PROTECT THE WORK SITE OR THE ADJACENT LANDS, REGARDLESS OF THE 2. SOURCE OR ORIGIN OF EROSION OR SEDIMENTS. IF THE CONTRACT ADMINISTRATOR IS NOT SATISFIED WITH THE EXTENT OF THE MEASURES TAKEN. THEY MAY DIRECT THAT ADDITIONAL CONTROLS BE PUT IN PLACE. THE CONTRACT REQUIREMENTS FOR SEDIMENT AND EROSION CONTROL SHALL BE CONSIDERED ABSOLUTE MINIMUMS THE ULTIMATE RESPONSIBILITY TO ENSURE THAT THE MEASURES ARE ADEQUATE SHALL LIE SOLELY ON THE CONTRACTOR. ANY DAMAGE RESULTING FROM FAILURE OF THESE MEASURES SHALL BE REPAIRED AT THE CONTRACTOR'S EXPENSE.
- ALL SEDIMENT AND FROSION CONTROLS ARE TO BE INSPECTED REGULARLY, INCLUDING PRIOR TO RAIN EVENTS. ALL INEFFECTIVE OR DAMAGED ESC MEASURES SHOULD BE MAINTAINED, REPAIRED OR REPLACED WITHIN 48 HOURS OF THE INSPECTION.
- 4. PERSONNEL WILL ATTEND THE SITE TO INSPECT ALL CONTROLS, ON A REGULAR BASIS, OR FOLLOWING A RAIN EVENT, TO MONITOR ALL WORKS, AND IN PARTICULAR WORKS RELATED TO EROSION AND SEDIMENT CONTROL, DEWATERING, RESTORATION. SHOULD CONCERNS ARISE, THE CONSERVATION AUTHORITY AND THE CONTRACT ADMINISTRATOR WILL BE CONTACTED.
- 13. ALL COLLECTED SEDIMENT TO BE REMOVED AND TRANSPORTED FOR DISPOSAL OFFSITE. CONTRACTOR TO SUBMIT OPSS FORM 180 FOR DISPOSAL SITES.
- 14. EROSION AND SEDIMENT CONTROL MEASURES MAY NEED TO BE UPGRADED/AMENDED AS SITE CONDITIONS CHANGE IN ORDER TO PREVENT THE RELEASE OF SEDIMENT.
- 15. ALL ACTIVITIES, INCLUDING EQUIPMENT MAINTENANCE AND REFUELING WILL BE CONTROLLED TO PREVENT THE ENTRY OF PETROLEUM PRODUCTS, DEBRIS, RUBBLE, CONCRETE, OR OTHER DELETERIOUS SUBSTANCES INTO THE STORM SEWER OR THE NATURAL ENVIRONMENT
- 16. ALL SITE DISCHARGE, INCLUDING DEWATERING, MUST BE TREATED TO MEETING THE REQUIRED OBJECTIVES OF THE RECEIVING INFRASTRUCTURE OR WATERCOURSE (e.g. COUNTY SEWER USE BY-LAW OBJECTIVES FOR STORM OR SANITARY SEWERS, AND PROVINCIAL WATER QUALITY OBJECTIVES FOR THE NATURAL ENVIRONMENT).
- 17. THE CONTRACTOR SHALL FAMILIARIZE THEMSELVES WITH THE GEOTECHNICAL WORK UNDERTAKEN AND PROVIDED FOR INFORMATION BY THE CONSULTANT AND SHALL FOLLOW THE DEWATERING RECOMMENDATIONS OR REQUIREMENTS, IF NECESSARY, REQUIRED FOR CONSTRUCTION OF THE WORKS.
- 18. ALL DEWATERING EFFLUENT SHALL BE TREATED BEFORE RELEASE TO THE ENVIRONMENT AT LEAST 30 METRES FROM A WATERCOURSE OR WETLAND AND ALLOWED TO DRAIN THROUGH A WELL VEGETATED AREA. NO DEWATERING EFFLUENT SHALL BE SENT DIRECTLY TO ANY WATERCOURSE, WETLAND OR FOREST, OR ALLOWED TO DRAIN ONTO DISTURBED SOILS WITHIN THE WORK AREA. THESE CONTROL MEASURES SHALL BE MONITORED FOR EFFECTIVENESS AND MAINTAINED OR REVISED AT NO ADDITIONAL COST TO MEET THE OBJECTIVE OF PREVENTING THE RELEASE OF SEDIMENT LADEN WATER. USE OF ENVIRO—TANK, FILTER BAGS OR PERFORATED PIPE SHOULD BE CONSIDERED FOR TREATING DEWATERING EFFLUENT.
- 19. PROTECT ALL CATCHBASINS, MANHOLES AND PIPE ENDS FROM SEDIMENT INTRUSION.T. CATCH BASIN INSERT FILTERS SHALL BE UNDER GRATES OF ALL CATCH BASINS TO TRAP SEDIMENT. INSERTS ARE TO BE CLEANED REGULARLY AND ARE NOT TO BE REMOVED UNTIL SUCH TIME AS THE CURBS ARE CONSTRUCTED IF REQUIRED, AND THE BOULEVARDS ARE SODDED. CATCH BASIN INSERT TO BE TERRAFIX OR APPROVED EQUIVALENT.
- 20. ROADS TO BE CLEANED MINIMUM ONCE A WEEK OR AS INSTRUCTED BY THE CONTRACT ADMINISTRATOR. IT IS NOT ACCEPTABLE TO HAVE MUD AND DEBRIS LYING ON ROADS. ADDITIONAL ENVIRONMENTAL CONTROLS ARE TO BE PLACED AS INSTRUCTED BY THE CONTRACT ADMINISTRATOR.
- 21. STOCKPILES TO BE ENCLOSED WITH EROSION CONTROL SILT FENCE.

<u> THRUST RESTRAINT TABLE</u>

	MINIMUM LENGTH (m) TO BE RESTRAINED EACH SIDE OF FITTING					G	
DIAMETER	HORIZONTAL BEND		VERTICAL BEND	TE	Œ	VALVE	
	11.25°	22.5*	45 °	UNDERCROSSING	BRANCH	THROUGH	
150mm	1	1	2	8	6	6	14
200mm	1	2	3	8	6	6	19
300mm	1	2	4	8	6	6	26
NOTE: RES	TRAINT DIS	TANCES W	FRF CALCU	JLATED BASED ON TH	HE USE OF	FBAA SU	PPI IFD

PRODUCTS THE CONTRACTOR WILL BE REQUIRED TO PROVIDE DESIGN CALCULATION TO SUPPORT THE USE OF AN ALTERNATE SUPPLIER, AS PERMITTED BY THE COUNTY.

TABLE OF	SANITARY	MAINTENANCE ST	RUCTURES
STRUCTURE NAME	LID ELEV.	INV. ELEV.	STRUCTURE HEIGHT
EX.SAN MH C320 1200mmø	230.27	200mmø 228.02 W 200mmø 227.97 E	2.30m
SAN MH C117 1200mmø	217.07	200mmø 214.76 W 200mmø 214.80 N 200mmø 214.71 E	2.36m
SAN MH C119 1200mmø	218.74	200mmø 216.19 W 200mmø 216.10 S 200mmø 216.16 E 200mmø 216.23 N	2.64m
SAN MH C119B 1200mmø	218.64	200mmø 217.13 S 200mmø 216.20 N	2.44m
SAN MH C120 1200mmø	220.94	200mmø 218.00 E	2.94m
SAN MH C122 1200mmø	222.03	200mmø 218.95 W 200mmø 218.20 N	3.83m
SAN MH C123 1200mmø	224.67	200mmø 222.07 W 200mmø 222.04 E	2.63m
SAN MH C124 1200mmø	226.96	200mmø 224.05 W 200mmø 224.05 SW 200mmø 224.02 E	2.94m
SAN MH C125 1200mmø	229.01	200mmø 226.40 W 200mmø 226.37 E	2.64m

		·	
TABLE OF	STORM	MAINTENANCE ST	RUCTURES
STRUCTURE NAME	LID ELEV.	INV. ELEV	STRUCTURE HEIGHT
STM MH 0624 1500mmø	222.04	600mmø 219.45 W 600mmø 219.21 N 375mmø 219.66 E	2.83m
STM MH 0624A 1200mmø	221.15	250mmø 219.58 S 250mmø 219.58 N 375mmø 218.68 W 525mmø 218.52 E	2.63m
STM MH 0661 1200mmø	218.72	525mmø 217.14 W 200mmø 217.23 S 525mmø 217.11 E	1.61m
STM MH 2176 1200mmø	230.27	600mmø 228.28 W 250mmø 228.09 N 300mmø 228.12 S 600mmø 227.98 E	2.29m
STM MH 2176C 1200mmø	226.95	600mmø 224.46 W 300mmø 224.49 S 600mmø 224.43 E	2.52m
STM MH 2176D 1200mmø	225.05	600mmø 222.52 W 600mmø 222.49 E	2.56m

TRAFFIC MANAGEMENT NOTES

- THE CONTRACTOR IS ADVISED OF HEAVY TRAFFIC VOLUMES DURING THE MORNING AND EVENING PEAK HOURS AND MUST IMPLEMENT ALL NECESSARY MEASURES SUCH AS ENGAGING ADDITIONAL CONSTRUCTION CREWS IN ORDER TO COMPLETE THE WORK IN THE SHORTEST POSSIBLE TIME. THE WORK MUST BE SCHEDULED RESPECTING TRAFFIC FLOWS AND MUST MEET THE CONDITIONS OF THE ROAD OCCUPANCY PERMIT.
- ALL OF THE CONTRACTOR'S OPERATIONS AND ACTIVITIES SHALL BE IN ACCORDANCE WITH THE MOST CURRENT VERSION OF THE ONTARIO TRAFFIC MANUAL (OTM), BOOK 7 (TEMPORARY CONDITIONS)."TRAFFIC CONTROL
 - LAYOUTS FOR SIGNING TEMPORARY LANE CLOSURES FOR CONSTRUCTION STAGES TO BE IN ACCORDANCE WITH OTM BOOK 7.
- WHERE REQUIRED, EXISTING LANE MARKINGS ARE TO BE REMOVED AND TEMPORARY LANE MARKINGS PAINTED. AT THE COMPLETION OF PROJECT, TEMPORARY LANE MARKINGS ARE TO BE REMOVED AND PERMANENT LANE MARKINGS REINSTATED BY PAINTING
- THE CONTRACTOR SHALL SCHEDULE THE WORK SO THAT THERE WILL BE NO OPEN EXCAVATION OVERNIGHT OR ON NON-WORKING DAYS, ADJACENT TO A LANE CARRYING TRAFFIC, EXCEPT WHERE A TRAFFIC BARRIER DESIGNED TO RESTRAIN ERRANT VEHICLES IS LOCATED BETWEEN THE TRAFFIC FLOW AND EXCAVATION.

PERSONS" SHALL BE AS DEFINED IN BOOK 7 OF THE ONTARIO TRAFFIC MANUAL.

- MATERIALS SHALL NOT BE STORED WITHIN 4 METRES OF THE TRAVELED PORTION OF ANY ROAD.
- THE CONTRACTOR SHALL PREPARE AND SUBMIT TO THE COUNTY A DETAILED TRAFFIC MANAGEMENT PLAN FOR REVIEW AT LEAST 15 DAYS PRIOR TO CONSTRUCTION. THIS IS TO BE ACCOMPANIED BY STAGING PLANS FOR THE CONTROL OF THROUGH TRAFFIC FOR THE PROJECT AND WHERE APPLICABLE, DETAILS FOR THE SAFE PASSAGE OF PEDESTRIANS THROUGH THE CONSTRUCTION AREA.
- 8. A TRAFFIC PROTECTION PLAN FOR WORKER SAFETY IS ALSO REQUIRED IN ACCORDANCE WITH THE OHSA.
- 9. WEST STREET SHALL BE KEPT OPEN TO THROUGH TRAFFIC AND MAINTAINED WITH A MINIMUM OF ONE LANE FOR LOCAL TRAFFIC ONLY, EXCEPT WHEN APPROVED FOR THE INSTALLATION OF SERVICE CONNECTIONS. IT IS ANTICIPATED THAT THE CONTRACTOR WILL EXPEDITE THE SERVICE CONNECTION WORK REQUIRING FULL ROAD CLOSURE AND LIMIT ANY FULL CLOSURES TO LESS THAN ONE WORKING DAY AT A TIME.
- 10. THE WORK SHALL BE UNDERTAKEN IN A LOGICAL SEQUENCE THROUGHOUT THE CONSTRUCTION PERIOD AND MUST MEET CONDITIONS OF ROAD OCCUPANCY PERMIT. SAFE TRAFFIC CONTROL SHALL BE MAINTAINED AT ALL TIMES DURING CONSTRUCTION, INCLUDING REMOVALS AND THE APPLICATION OF PAVEMENT MARKINGS AS NECESSARY TO MAINTAIN VEHICULAR TRAFFIC IN ITS DESIGNATED LANES. THE CONTRACTOR WILL BE RESPONSIBLE FOR PROVIDING, MAINTAINING AND RELOCATING WHERE NECESSARY, SUFFICIENT SIGNS, DELINEATORS, BARRICADES, LIGHTS, ETC, AND PROVIDING TRAFFIC CONTROL PERSONS (TCP'S) AND/OR POLICE OFFICERS AS REQUIRED, SO THAT MOTORISTS AND PEDESTRIANS ARE PROPERLY DIRECTED TO ENSURE
- 11. THE CONTRACTOR SHALL PROVIDE TO THE COUNTY CONTACT DETAILS FOR A MINIMUM OF 3 STAFF MEMBERS. TO BE MADE AVAILABLE 24/7 THROUGHOUT THE DURATION OF THE PROJECT.
- 12. THE CONTRACTOR SHALL BE RESPONSIBLE FOR OBTAINING ALL NECESSARY APPROVALS IN ADVANCE OF COMMENCING WORK AS DETERMINED BY THE COUNTY (ROAD OCCUPANCY PERMIT ETC).
- 13. ALL TRENCHES CONSTRUCTED IN THE EXISTING ROADWAYS SHALL BE RESTORED TO MATCH THE EXISTING ROAD STRUCTURE UNLESS INDICATED OTHERWISE. RESTORATION SHALL BE COMPLETED WITHIN TWENTY-FOUR (24) HOURS OF THE COMPLETION OF THE WATERMAIN INSTALLATION. ASPHALT REPLACEMENT AND RESTORATION TO FOLLOW IMMEDIATELY WHERE CROSSING INTERSECTIONS.
- 14. IT IS THE RESPONSIBILITY OF THE CONTRACTOR TO ENSURE THAT ALL SIGNS DAMAGED OR RENDERED ILLEGIBLE ARE REINSTATED, CLEANED AND/OR REPLACED IN A TIMELY MANNER.
- 15. ALL TRAFFIC CONTROL DEVICES AND SIGNAGE MUST BE MAINTAINED IN THEIR REQUIRED PROPER LOCATION. CLEANED, WEIGHTED DOWN BY SANDBAGS ONLY AND MAINTAINED THROUGHOUT THE DURATION OF THE WORK.
- 16. SUBJECT TO APPROVAL BY THE COUNTY, ALL CONSTRUCTION VEHICLES MUST ENTER AND EXIT THE CONSTRUCTION ZONE VIA THE EAST AND WEST LIMITS OF WEST STREET USING QUEEN STREET SOUTH AND NORFOLK STREET SOUTH AS ACCESS, RESPECTIVELY. CONSTRUCTION TRAFFIC BETWEEN THE LIMITS OF CONSTRUCTION SHALL BE ROUTED USING EVERGREEN HILL ROAD. METCALFE STREET SOUTH, HEAD STREET SOUTH. TALBOT STREET SOUTH. JOHN STREET, KENT STREET SOUTH, AND JAMES STREET ARE NOT TO BE USED FOR ROUTING OF CONSTRUCTION TRAFFIC UNLESS REQUIRED TO PERFORM THE WORKS.
- 17. THE CONTRACTOR SHALL PROVIDE PORTABLE VARIABLE MESSAGE SIGNS (PVMS) BOARDS AT LEAST TWO WEEKS PRIOR TO CONSTRUCTION TO ADVISE MOTORISTS OF PENDING ROAD CLOSURE/LANE RESTRICTIONS INCLUDING THE DATE AND TIME. ADDITIONAL PVMS BOARDS SHALL BE DEPLOYED AT MAJOR INTERSECTIONS ONE WEEK PRIOR TO THE ROAD CLOSURE.

TABLE OF STORM CATCHBASIN STRUCTURES				
STRUCTURE NAME	LID ELEV.	INV. ELEV	STRUCTURE HEIGHT	SUMP
CB27 600mmx600mm	229.80	250mmø 228.32 S	2.08m	0.60m
CB29 600mmx600mm	228.93	250mmø 227.44 N	2.09m	0.60m
CB30 600mmx600mm	228.46	250mmø 227.01 S	2.05m	0.60m
CB31 600mmx600mm	227.40	250mmø 226.14 N	1.86m	0.60m
CB32 600mmx600mm	227.28	250mmø 225.82 S	2.05m	0.60m
CB35 600mmx600mm	225.29	250mmø 223.84 N	2.05m	0.60m
CB36 600mmx600mm	225.25	250mmø 223.80 S	2.05m	0.60m
CB37 600mmx600mm	223.86	250mmø 222.41 N	2.05m	0.60m
CB38 600mmx600mm	223.65	250mmø 222.20 S	2.05m	0.60m
CB39 600mmx600mm	222.53	250mmø 221.08 S	2.05m	0.60m
CB40 600mmx600mm	222.60	250mmø 221.24 N 250mmø 221.15 N	2.05m	0.60m
CB41 600mmx600mm	221.08	250mmø 219.63 N	2.05m	0.60m
CB42 600mmx600mm	221.08	250mmø 219.63 S	2.05m	0.60m
CB43 600mmx600mm	218.97	250mmø 217.52 S	2.05m	0.60m
CB44 600mmx600mm	218.85	250mmø 217.40 N	2.05m	0.60m
CB45 600mmx600mm	217.54	250mmø 216.09 S	2.05m	0.60m
CB46 600mmx600mm	217.53	250mmø 216.08 N	2.05m	0.60m
CB47 600mmx600mm	217.10	250mmø 215.65 S	2.05m	0.60m
CB48 600mmx600mm	217.08	250mmø 215.62 N	2.05m	0.60m
CB49 600mmx600mm	216.06	250mmø 214.61 N 250mmø 215.05 N	2.05m	0.60m
CB50 600mmx600mm	216.07	250mmø 214.62 S	2.05m	0.60m



GENERAL

HOSPITAI

TOWN

CENTRE

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1 | JA | 2025/01/15 | ISSUED FOR TENDER DATE WT INFRASTRUCTURE

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ROJECT NAME: RECONSTRUCTION OF WEST STREET - PHASE : BROOK STREET TO TALBOT STREET

GENERAL NOTES AND SPECIFICATIONS

IENT REF: EIS-ENG-25-34

	G1		 2 of 21
DRAWING No:			SHEET #:
JA	AK	AT	25mm
1.4	LAIZ	1	
DESIGNED BY:	DRAWN BY:	CHECKED BY:	1
22-2016	1:250	2025/01/15	25mm LONG, ADJUST THE PLOTTING SCALE.
PROJECT NO:	SCALE:	DATE:	IF THIS BAR IS NOT

EXISTING

SITE

	PROPERTY LINE
	LOT LINE
	EXTERIOR LOT LINE
	CENTRELINE OF ROAD
	EDGE OF PAVEMENT
	EDGE OF GRAVEL
	EDGE OF SHOULDER
	PAVED DRIVEWAY
	GRAVEL DRIVEWAY
	CURB
	SIDEWALK
	BUILDING
	CONCRETE
XX	FENCE
	TOP OF BANK
	BOTTOM OF BANK
	DITCH
S	SWALE
	PROPERTY MARKER
- 0	EXISTING SIGN
\odot	EXISTING DECIDUOUS TREE
2M/2 2007 2007	EXISTING CONIFEROUS TREE
MB	EXISTING MAILBOX
• _{FP}	EXISTING FLAG POST
Ф вн	EXISTING BOREHOLE

<u>UTILITIES</u>

DELL
CABLE
FIBER
GASMAIN
HYDRO
OVERHEAD WIRES
SURFACE MOUNTED HAND HOLD
EXISTING BELL PEDESTAL
EXISTING PEDESTAL
EXISTING HYDRO POLE
EXISTING LIGHT STANDARD
EXISTING ANCHOR

<u>WATER</u>

W	EXISTING	WATERMAIN	
₩ WV	EXISTING	WATER VALVE	
-Ó-FH	EXISTING	FIRE HYDRANT	
⇔ CS	EXISTING	SERVICE VALVE	

<u>STORM</u>

ST	STORM SEWER
	EXISTING CATCH BASIN
	EXISTING CATCH BASIN MAINTENANCE HOLE
•	EXISTING STORM MAINTENANCE HOLE

SANITARY

SA	SANITARY SEWER
•	EXISTING SANITARY MAINTENANCE HOLE

<u>REMOVED</u>

<u>SITE</u>

ASPHALT TO BE REMOVED

	GRAVEL TO BE REMOVED
	SHOULDER TO BE REMOVED
	ASPHALT DRIVEWAY TO BE REMOVED
	GRAVEL DRIVEWAY TO BE REMOVED
	CURB TO BE REMOVED
	SIDEWALK TO BE REMOVED
	CONCRETE TO BE REMOVED
X	FENCE TO BE REMOVED / REINSTATED
	SIGN TO BE REMOVED / REINSTATED
\otimes	DECIDUOUS TREE TO BE REMOVED
※	CONIFEROUS TREE TO BE REMOVED
\(\psi\) \(\	VEGETATION TO BE REMOVED
	ASPHALT DRIVEWAY TO BE REMOVED
	ASPHALT ROADWAY TO BE REMOVED
**********	ASPHALT ROADWAY TO BE MILLED
4 4 4 4 4	CONCRETE DRIVEWAY / SIDEWALK TO BE REMOVED
	GRAVEL DRIVEWAY TO BE REMOVED

<u>WATER</u>

w_	WATERMAIN TO BE REMOVED
⊕ WV	VALVE TO BE REMOVED
- Ó FH	FIRE HYDRANT TO BE REMOVED
⊕ CS	SERVICE VALVE TO BE REMOVED
႕	90° BEND TO BE REMOVED
-1▶1-	REDUCER TO BE REMOVED
년	TEE TO BE REMOVED

<u>STORM</u>



SANITARY



PROPOSED

<u>SITE</u>

PROPOSED EDGE OF PAVEMENT

PROPOSED EDGE OF SHOULDER
PROPOSED ASPHALT DRIVEWAY
PROPOSED GRAVEL DRIVEWAY
PROPOSED CURB
PROPOSED DROP CURB
PROPOSED SIDEWALK
PROPOSED CONCRETE
PROPOSED / REINSTATED FENCE
PROPOSED TOP OF SLOPE
PROPOSED BOTTOM OF SLOPE
PROPOSED DITCH
PROPOSED SWALE
PROPOSED RETAINING WALL
PROPOSED / REINSTATED SIGN
NEW DECIDUOUS TREE
NEW CONFEDENCE TREE
NEW CONIFEROUS TREE
NEW VEGETATION
NEW ASPHALT DRIVEWAY / ROADWAY
NEW CONCRETE DRIVEWAY / SIDEWALK
NEW GRAVEL DRIVEWAY

<u>WATER</u>

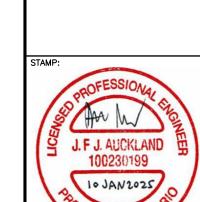
PROPOSED	WATERMAIN
PROPOSED	VALVE
PROPOSED	FIRE HYDRANT
PROPOSED	SERVICE VALVE
	PROPOSED PROPOSED

<u>STORM</u>



<u>SANITARY</u>

SA	PROPOSED SANITARY SEWER PIPE
	PROPOSED SANITARY MAINTENANCE HOLE



NORFOLK GENERAL HOSPITAL

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NO.	BY	DATE	ISSUE / REVISION

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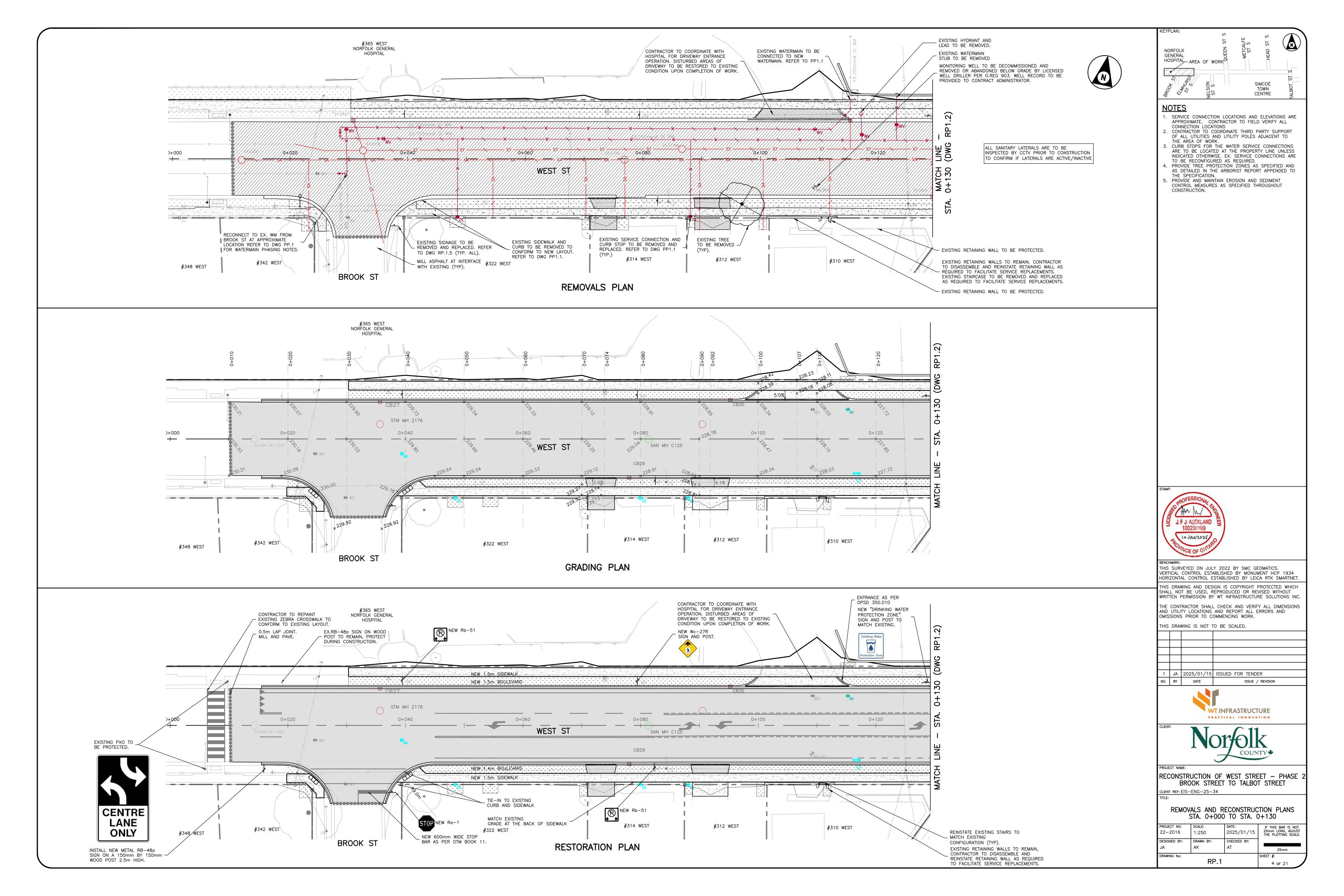
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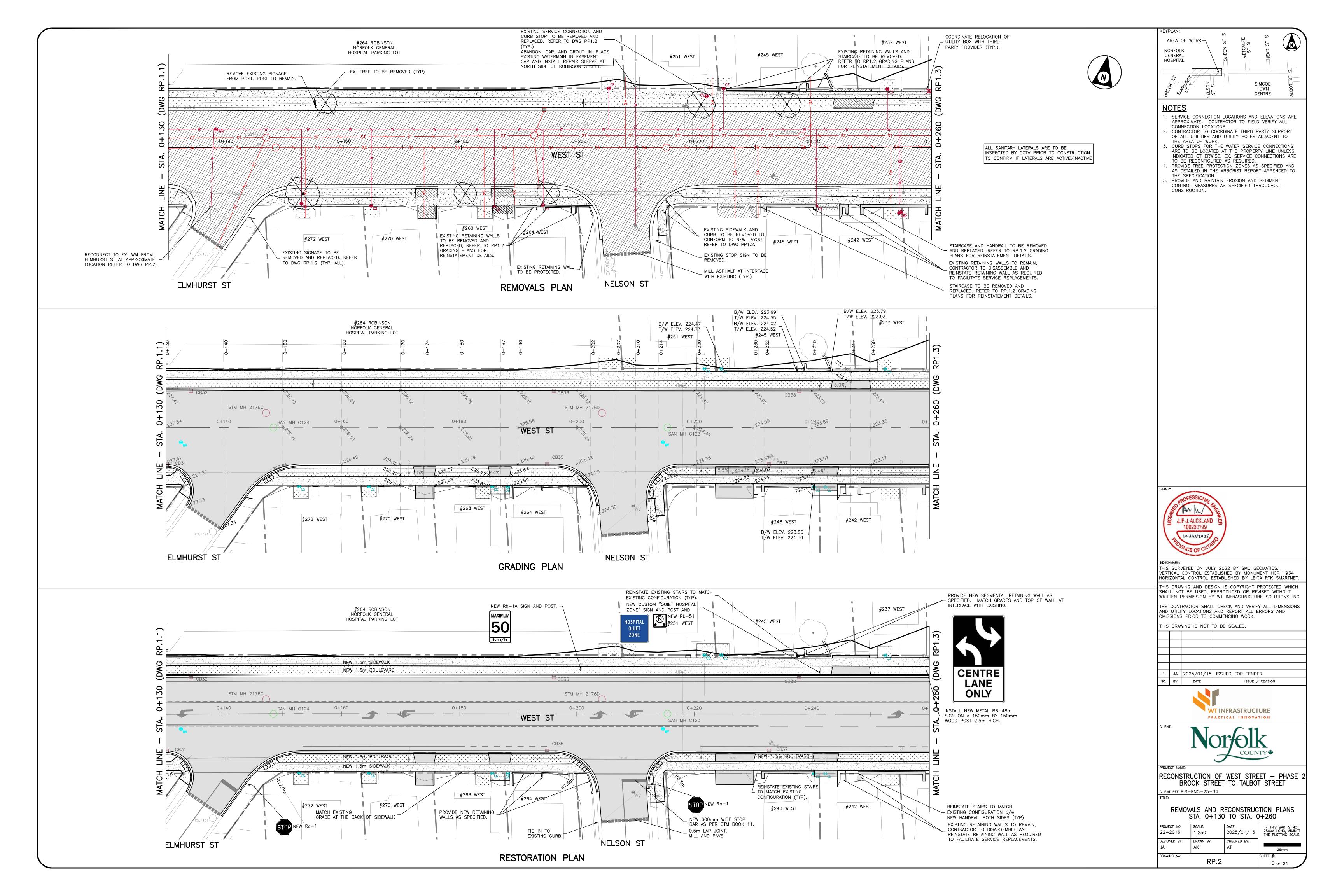
RECONSTRUCTION OF

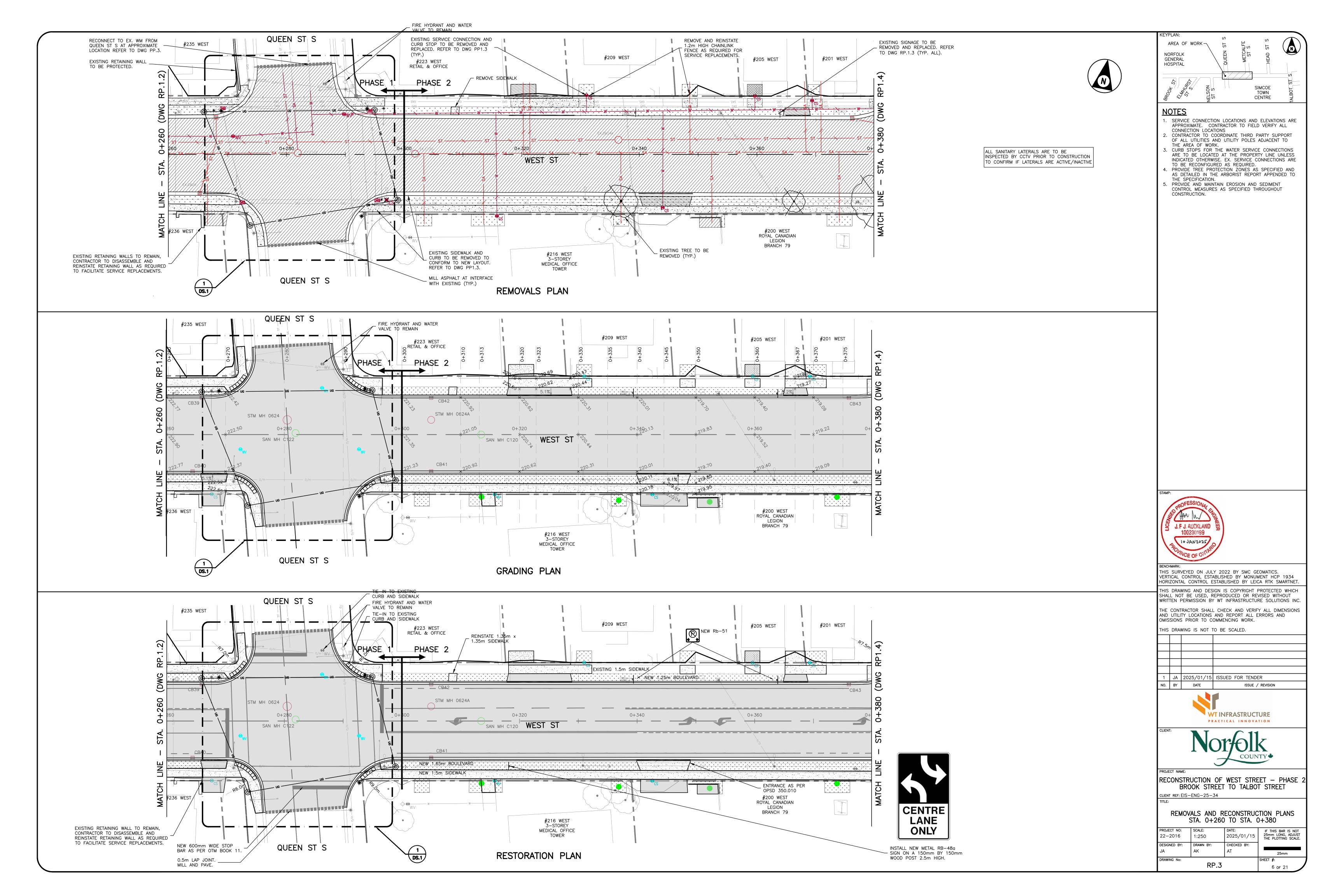
RECONSTRUCTION OF WEST STREET — PHASE 2 BROOK STREET TO TALBOT STREET CLIENT REF: EIS—ENG—25—34

LEGEND

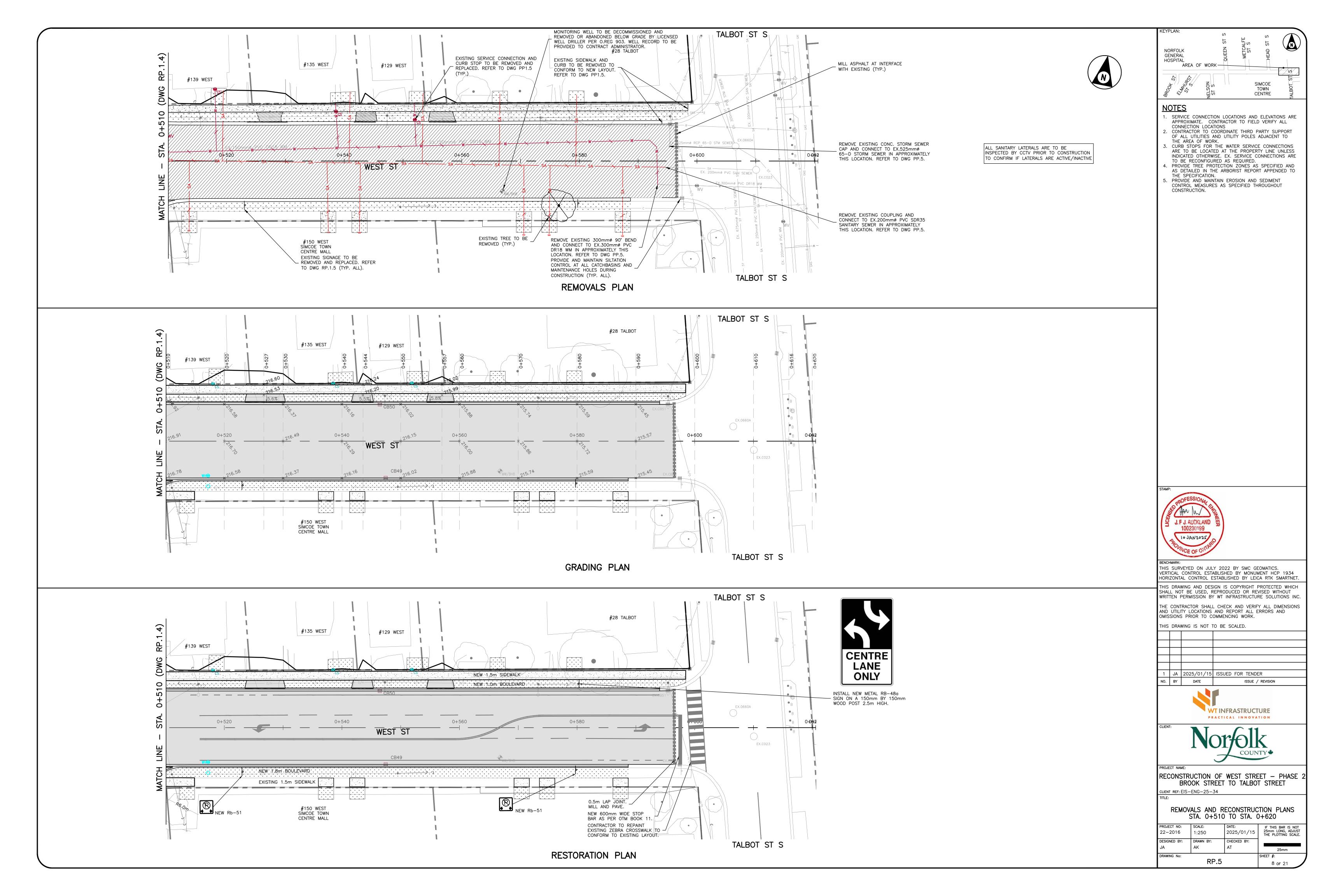
DRAWING No:	G2	•	SHEET #: 3 OF 21
DESIGNED BY: JA	DRAWN BY: AK	CHECKED BY: AT	25mm
PROJECT NO: 22-2016	SCALE: 1:250	DATE: 2025/01/15	IF THIS BAR IS NOT 25mm LONG, ADJUST THE PLOTTING SCALE.

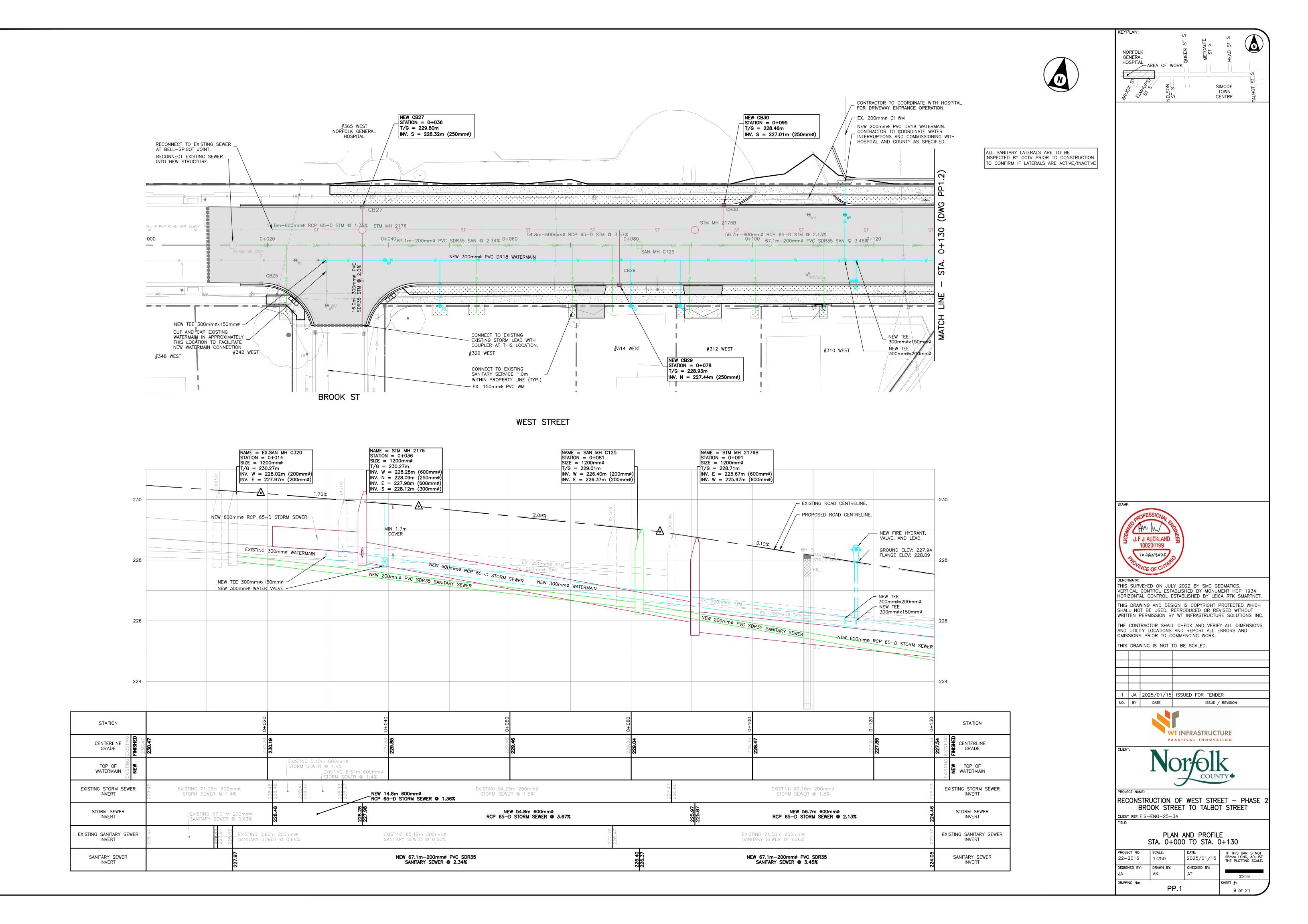


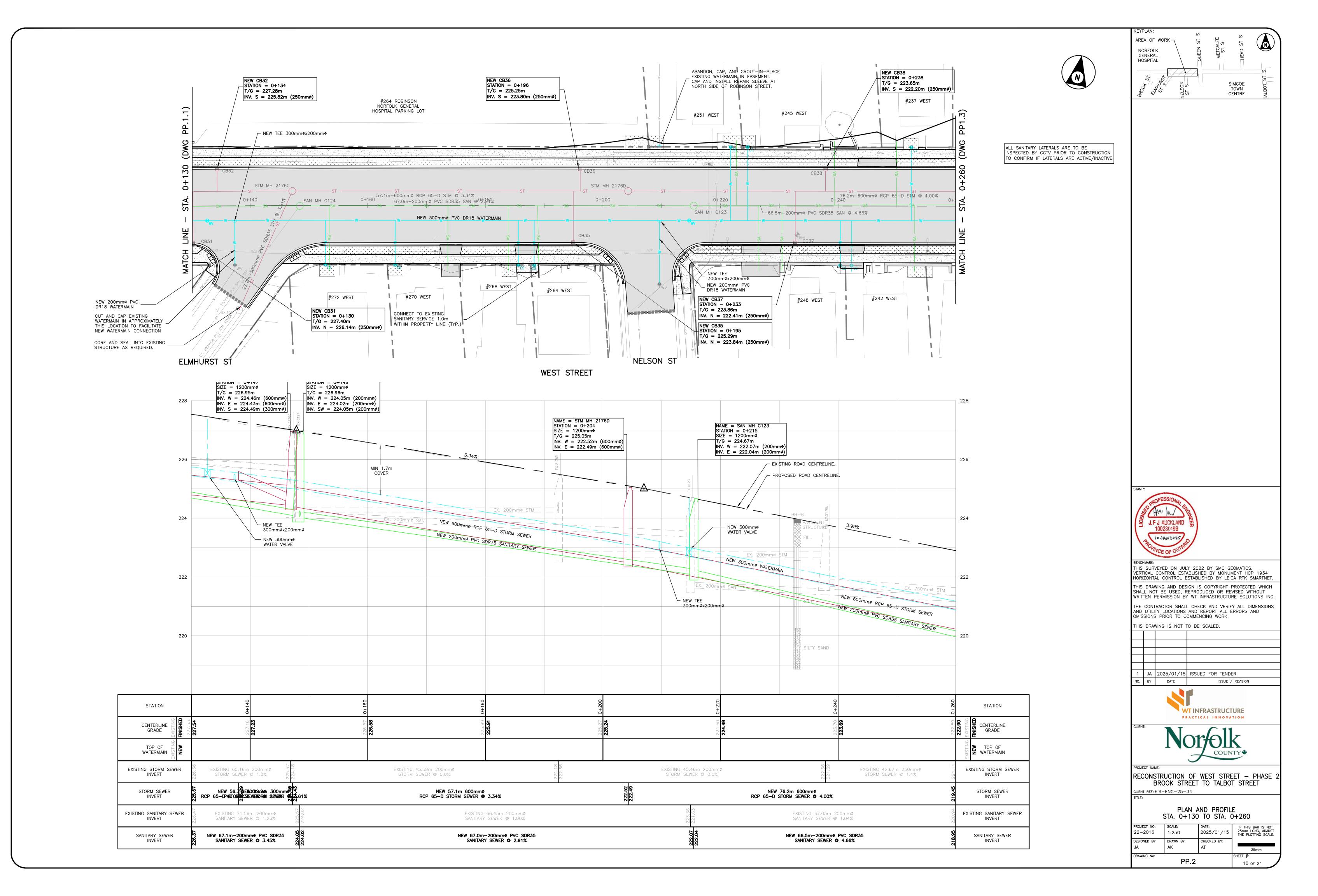


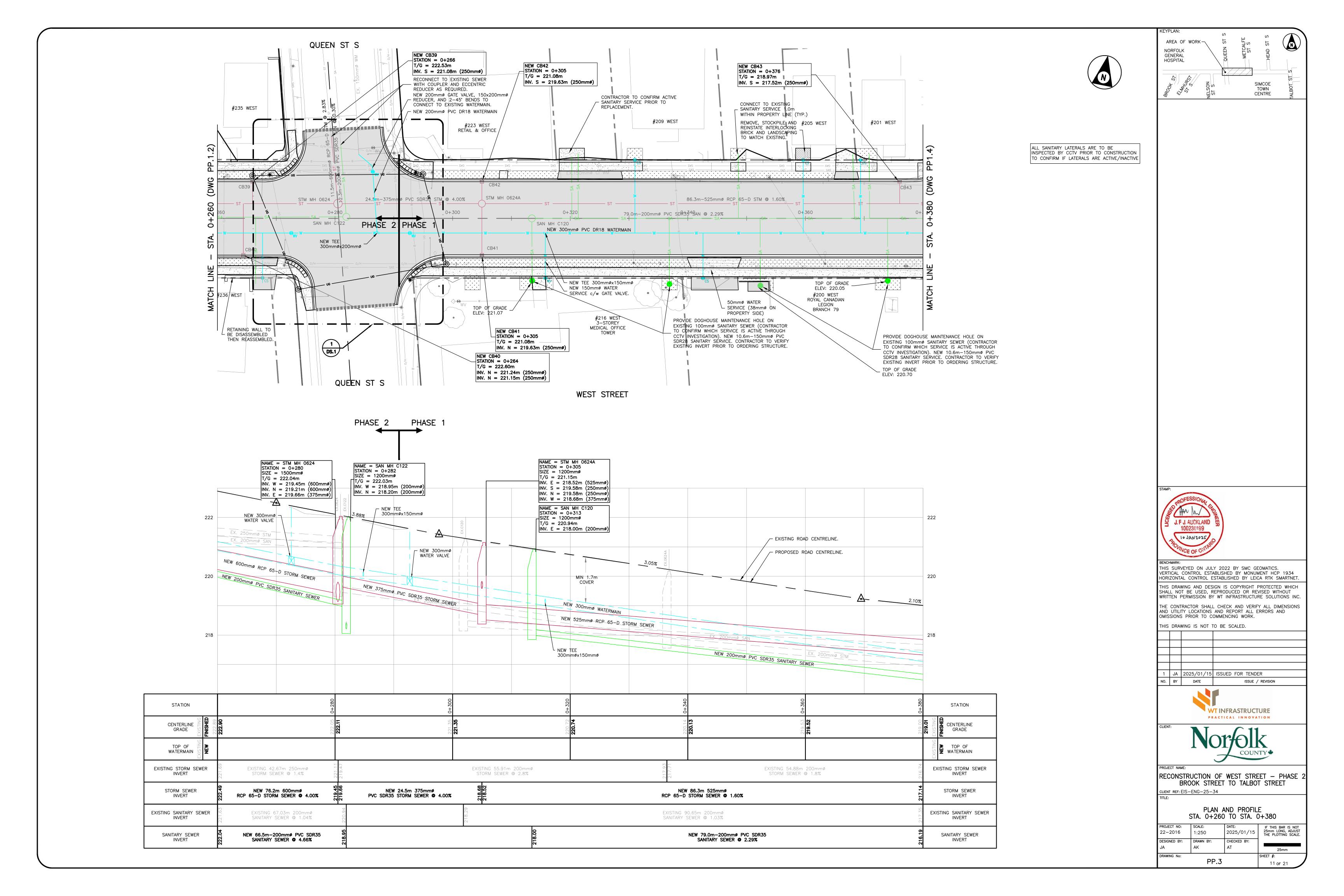


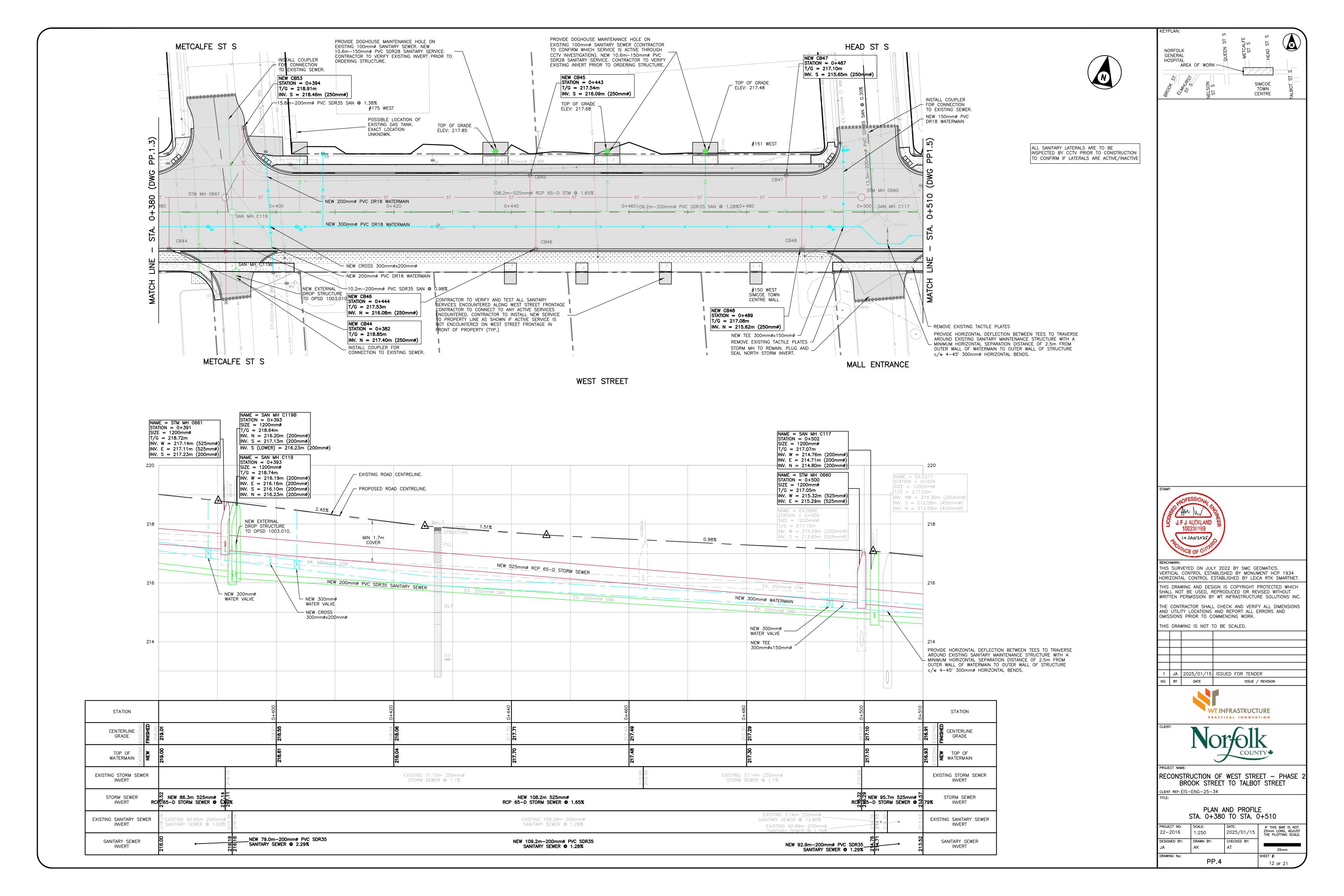


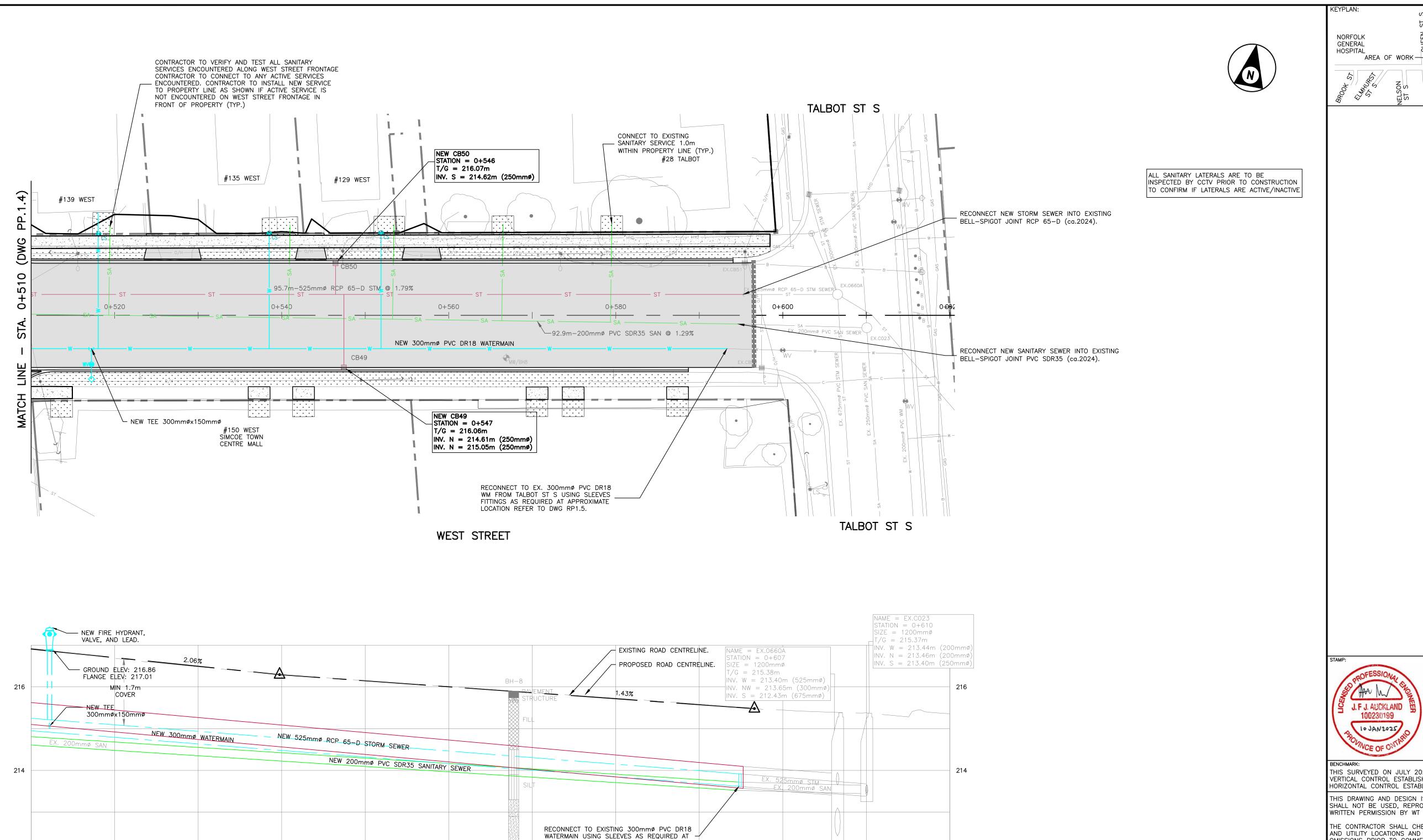












212

EXISTING 11.30m 525mmø

STORM SEWER @ 1.5%

EXISTING 15.42m 200mmø

SANITARY SEWER @ 0.52%

STATION

CENTERLINE

GRADE

₹ TOP OF

岁 WATERMAIN

EXISTING STORM SEWER

STORM SEWER

INVERT

EXISTING SANITARY SEWER

SANITARY SEWER

INVERT

INVERT

APPROXIMATELY THIS LOCATION.

NEW 95.7m 525mmø

RCP 65-D STORM SEWER @ 1.79%

EXISTING 92.89m 200mmø

SANITARY SEWER @ 1.29%

NEW 92.9m−200mmø PVC SDR35 SANITARY SEWER **©** 1.29**%**

212

STATION

CENTERLINE

GRADE

TOP OF

WATERMAIN

EXISTING STORM SEWER

INVERT

STORM SEWER

INVERT

EXISTING SANITARY SEWER

INVERT

SANITARY SEWER

INVERT

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ESIGNED BY:

IF THIS BAR IS NOT 25mm LONG, ADJUST THE PLOTTING SCALE.

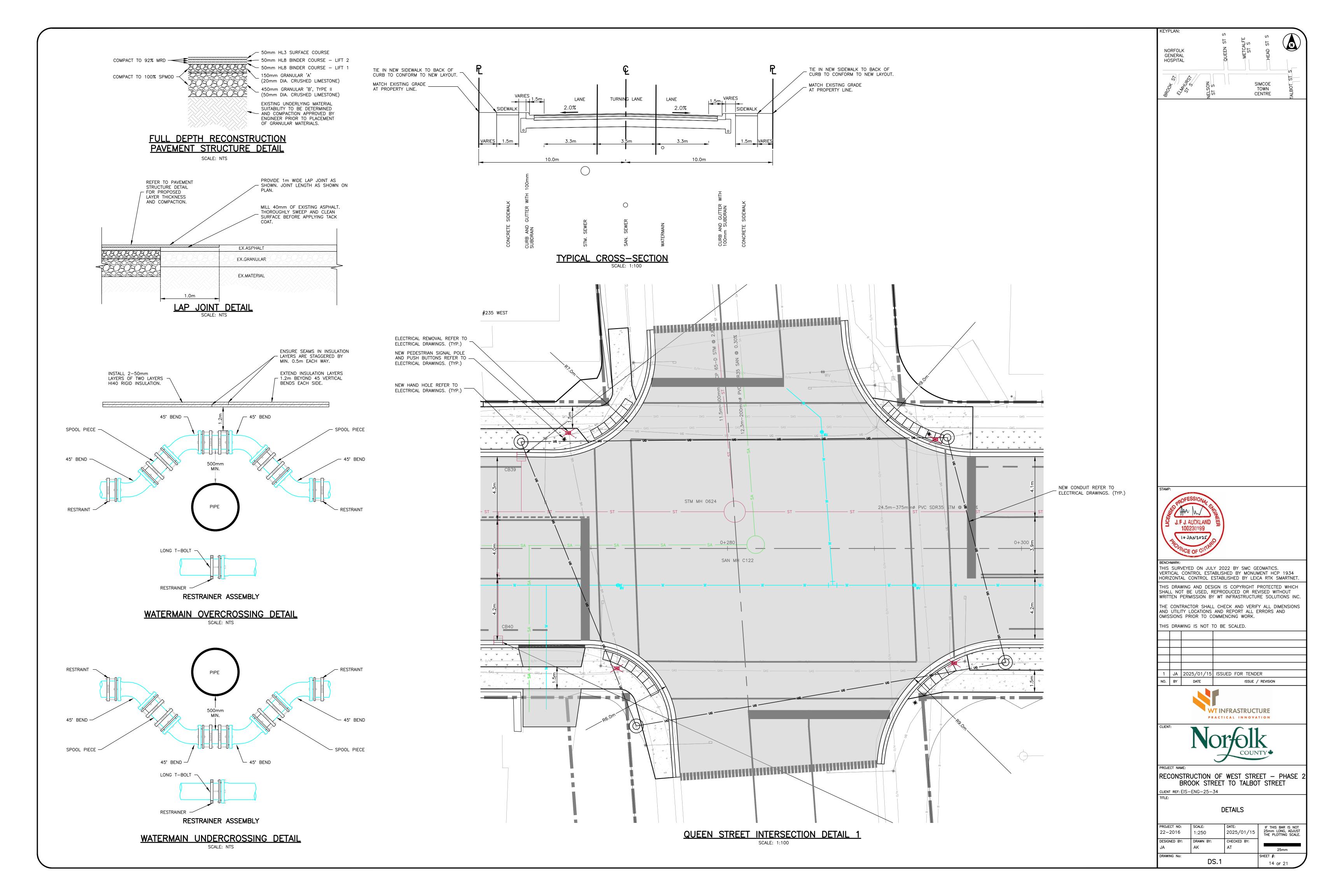
25mm

13 of 21

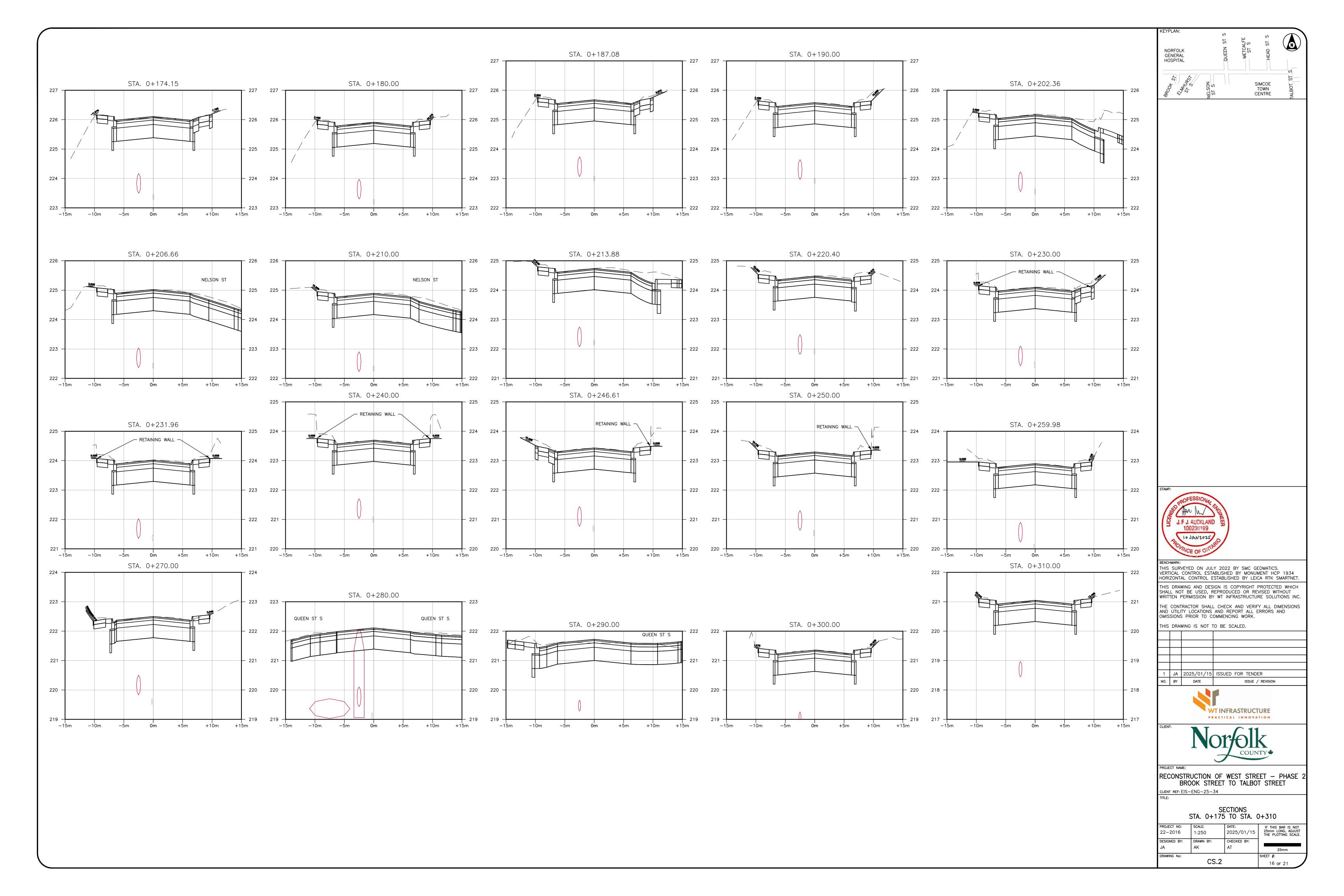
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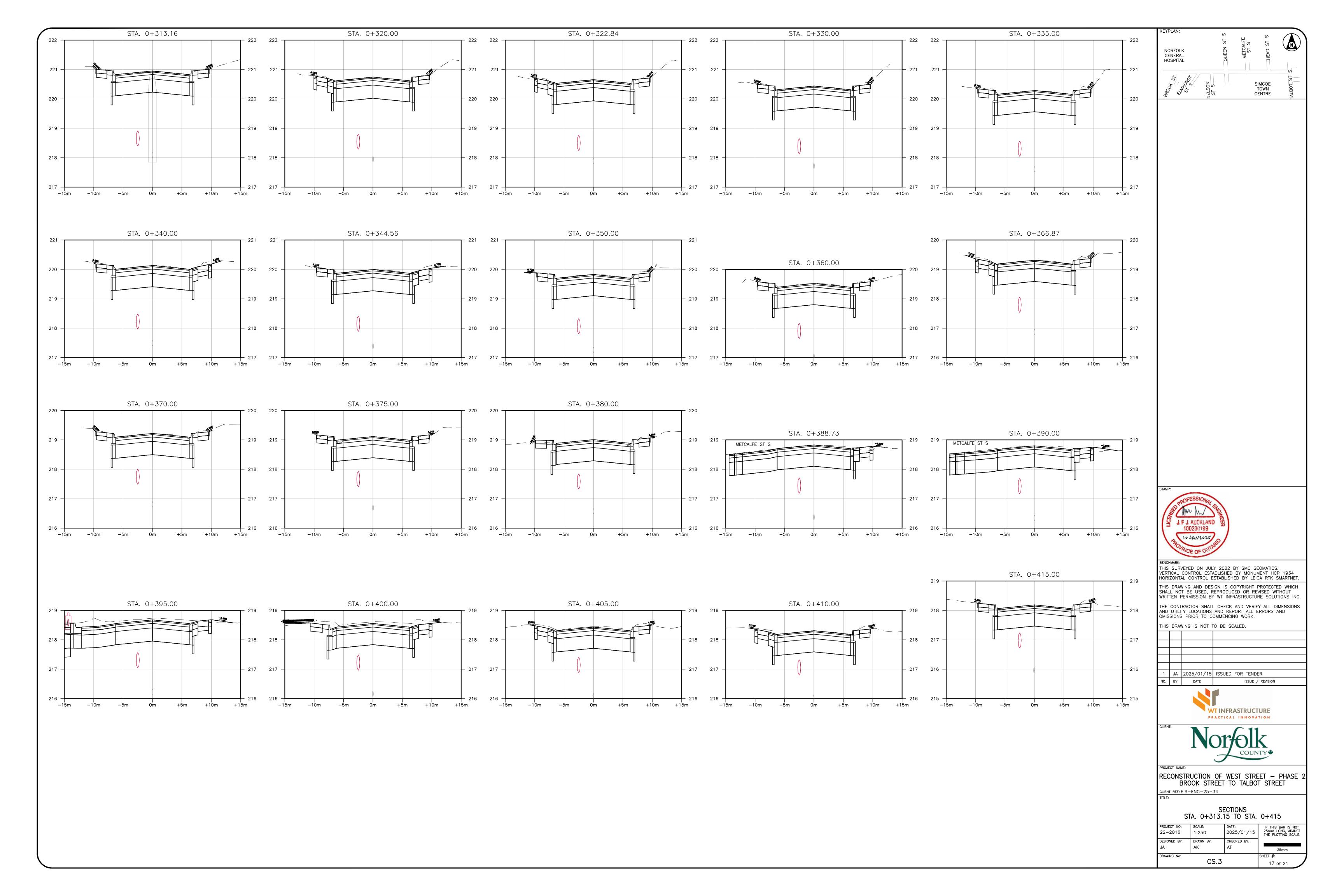
SIMCOE TOWN

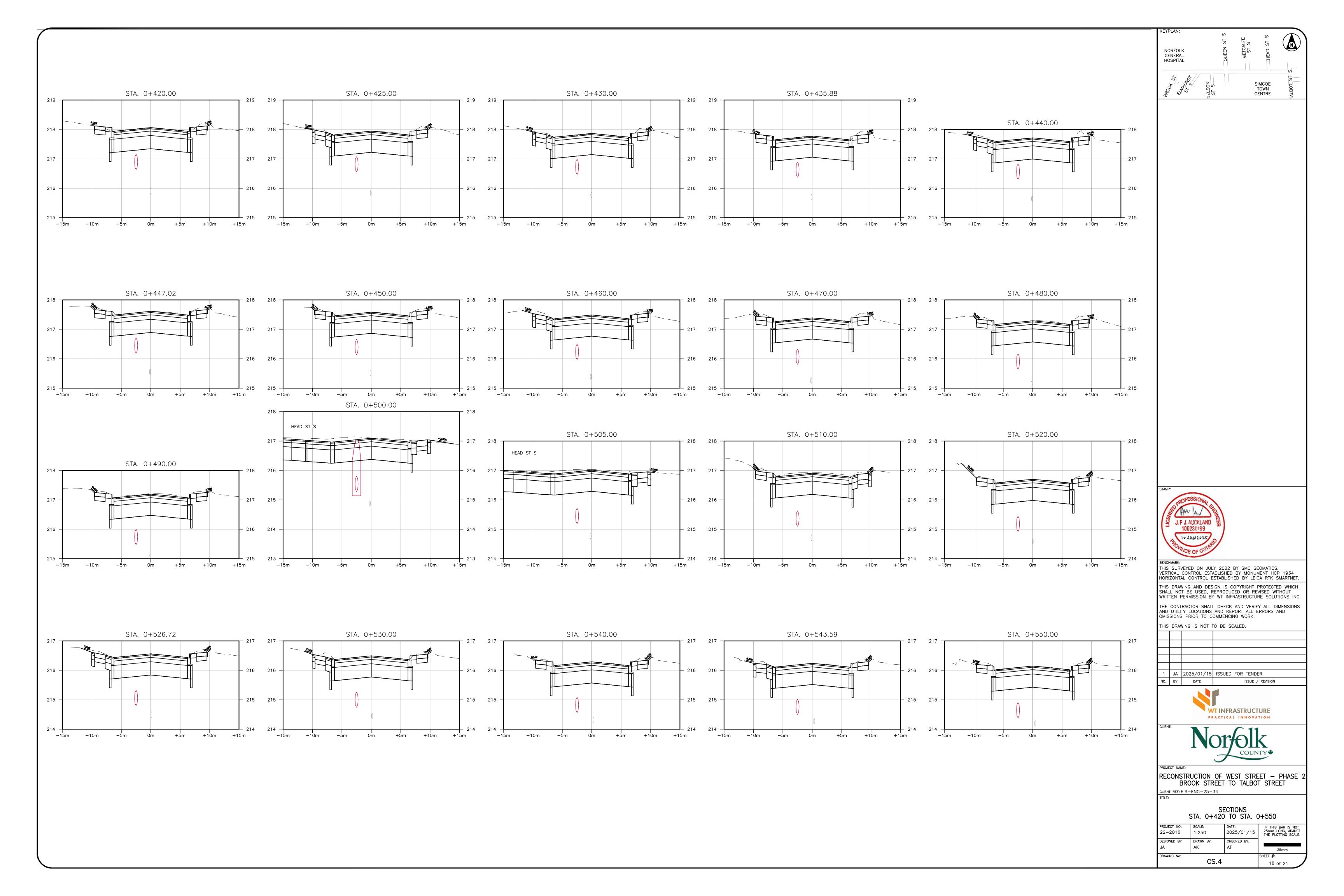
CENTRE

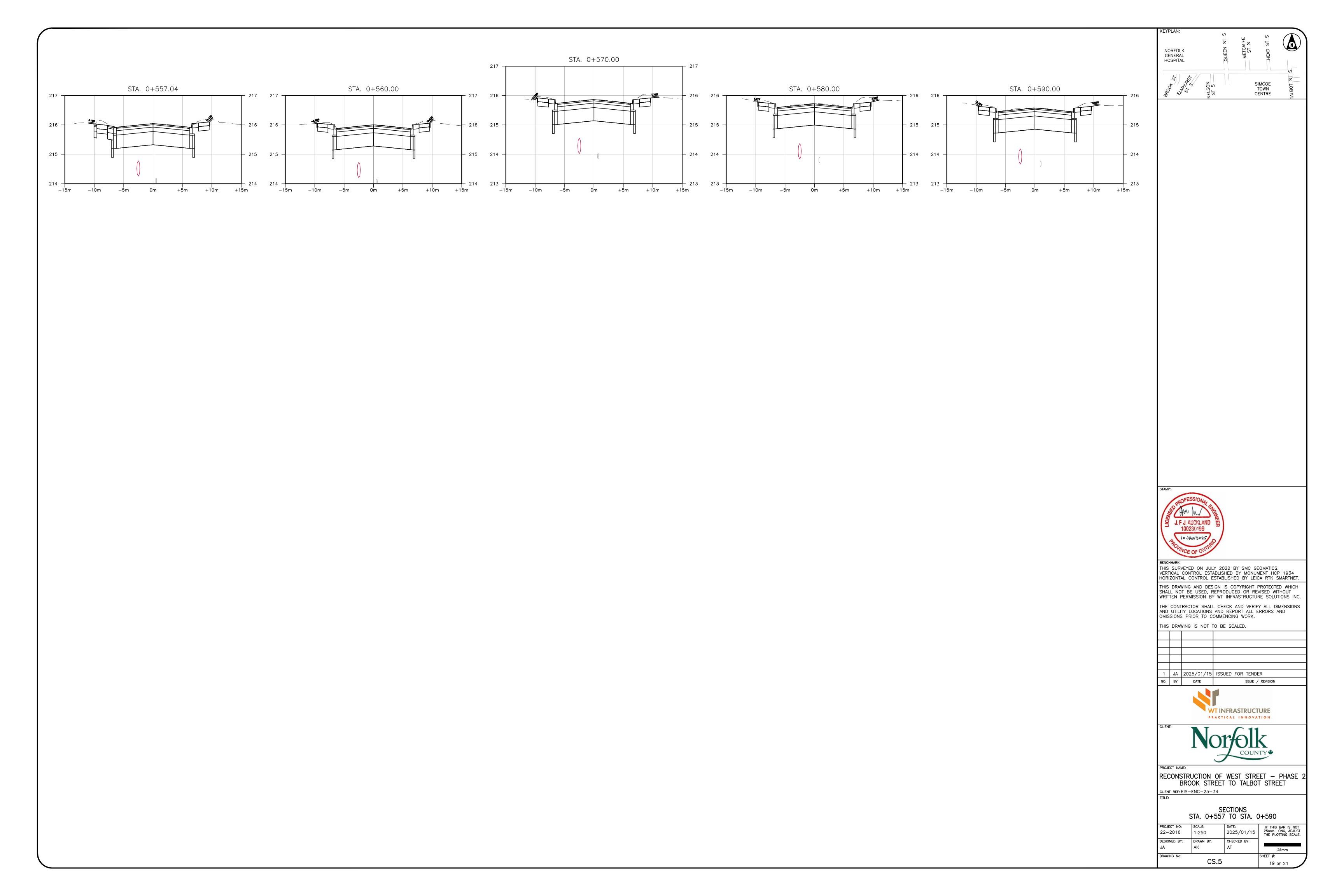


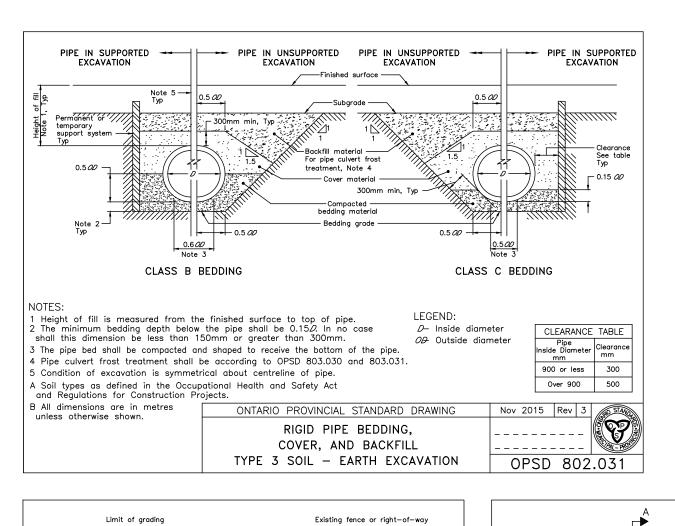












PLAN

SECTION A-A

ONTARIO PROVINCIAL STANDARD DRAWING

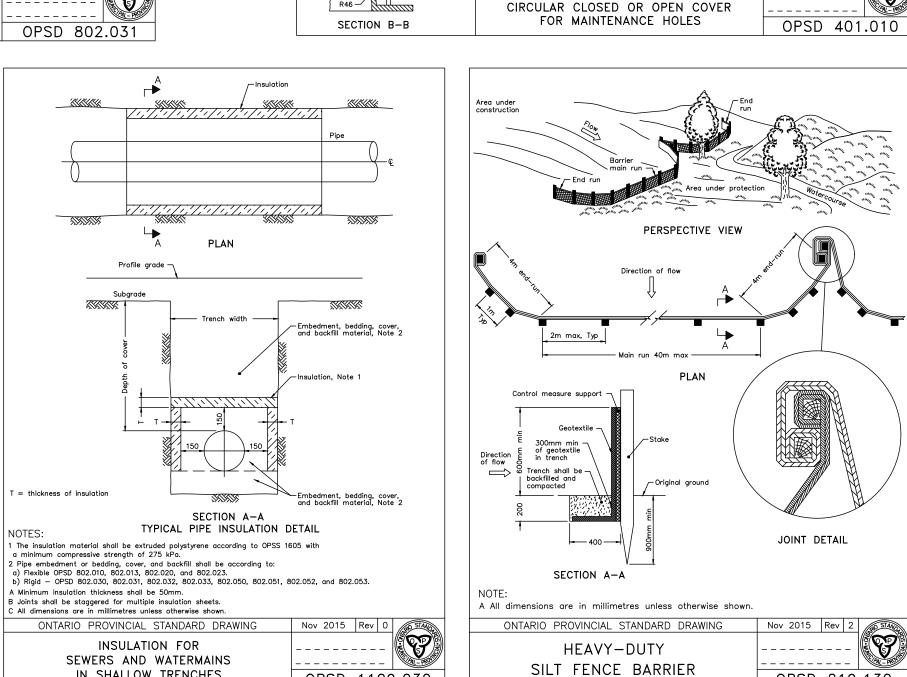
BARRIER FOR TREE PROTECTION

Nov 2007 Rev 0

OPSD 220.010

IN SHALLOW TRENCHES

Limit of grading -



OPSD 1109.030

Pavement Curb with gutter

SECTION THROUGH TAPER TOP

2 Centre reinforcing in adjustment

3 Round and square adjustment units are available in sizes of 50, 75, 100, 150, and 300mm.

Hoisting hook rib, Typ, OPSD 400.001 \(\sum \text{FRAME} \) PLAN

— ø632 ——

SECTION A-A

Maintenance hole ste

Standard frame mith grate
Typ

SECTION THROUGH

-Catch basin

OPSD 704.010

OPEN COVER

SECTION D-D

OPSD 219.130

A Covers shall be Type A or Type B, as specified.

B All dimensions are in millimetres unless otherwise shown

CATCH BASIN

minimum of one maximum of three Typ

A Adjustment units shall not extend beyond the outside edge of the structure.

SECTION THROUGH

- Reinforce each adjustment unit with a minimum of 1 wire with an end area of at least 15mm? Lap wire 150mm or butt weld.

Note 2, Typ

ONTARIO PROVINCIAL STANDARD DRAWING

PRECAST CONCRETE ADJUSTMENT UNITS FOR MAINTENANCE HOLES, CATCH BASINS,

AND VALVE CHAMBERS

TYPE A

CLOSED COVER

SECTION C-C

ONTARIO PROVINCIAL STANDARD DRAWING

CAST IRON, SQUARE FRAME WITH

|-114 -| 24 | | -29 -29 | -22 |

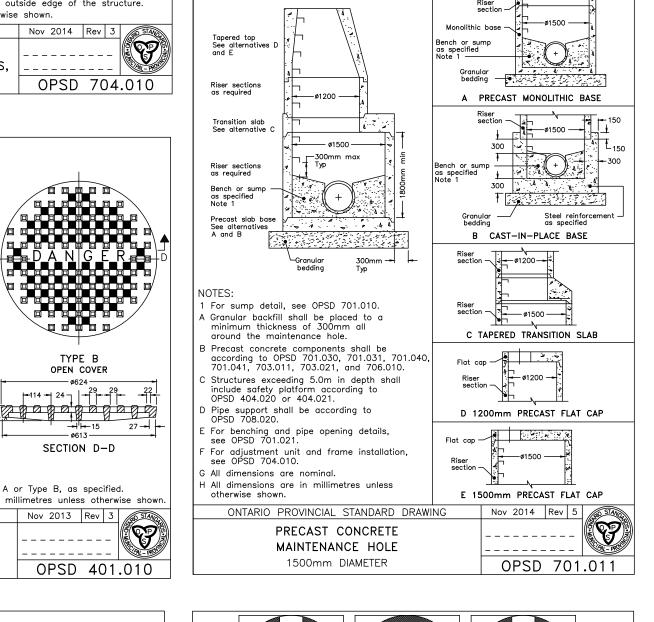
—— ø624 ——

FLAT CAP

1 If first step is in an adjustment unit, the adjustment unit shall be of the type manufactured with a step in place.

A Adjustment units shall not extend beyond the outside edge by the step in place.

B All dimensions are in millimetres unless otherwise shown.



A Concrete for benching shall be 30MPa.

ONTARIO PROVINCIAL STANDARD DRAWING

MAINTENANCE HOLE BENCHING

AND PIPE OPENING ALTERNATIVES

All dimensions are in millimetres unless otherwise shown.

ALTERNATIVES

Riser sections as required

Monolithic base with inlet and outlet openings to suit See alternatives A and B

see alternatives

Bench or sump
as specified

300mm, Typ

1 The sump is measured from the lowest invert.

A Granular backfill shall be placed to a minimum

B Precast concrete components shall be according to OPSD 701.030, 701.031, or 701.032.

C Structure exceeding 5.0m in depth shall include

ONTARIO PROVINCIAL STANDARD DRAWING

PRECAST CONCRETE

MAINTENANCE HOLE

safety platform according to OPSD 404.020.

D Pipe support according to OPSD 708.020.

E For benching and pipe opening details, see OPSD 701.021.

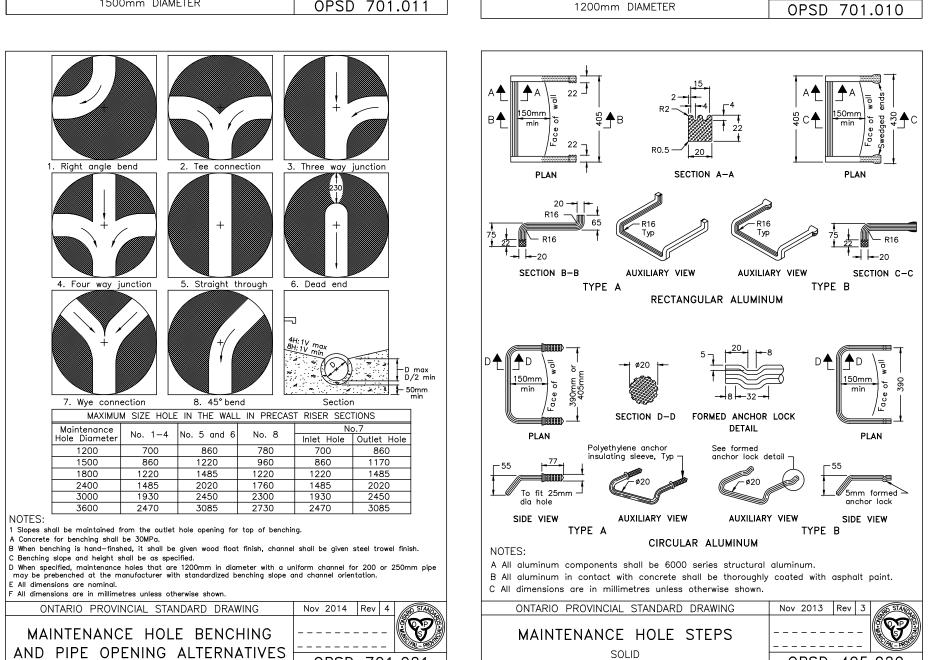
G All dimensions are nominal.

unless otherwise shown.

H All dimensions are in millimetres

thickness of 300mm all around the

maintenance hole.



ALTERNATIVES

A PRECAST SLAB BASE

i 🗝 ø1200 🚤 j

Steel reinforcement Granular as specified bedding

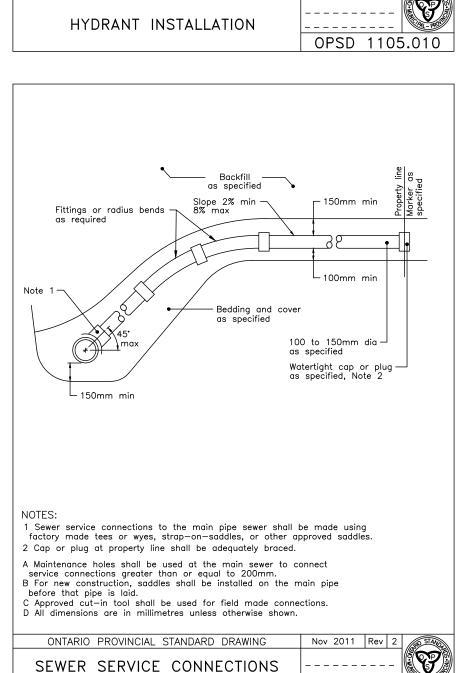
B CAST-IN-PLACE BASE

ø1200 ——

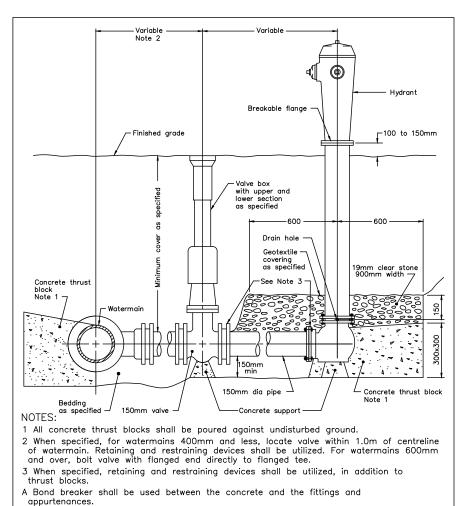
C PRECAST FLAT CAP

Nov 2014 Rev 5

OPSD 405.020



FOR FLEXIBLE MAIN PIPE SEWER



B Bolts and nuts for buried flange to flange connections shall be stainless steel. C When required, flange of standpipe extensions shall not be in frost zone. O This OPSD shall be read in conjunction with OPSD 1103.010 and 1103.020. E Backfill material within 500mm of service box shall be native or imported, as specified. F All dimensions are in millimetres unless otherwise shown. ONTARIO PROVINCIAL STANDARD DRAWING

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J. F J. AUCKLAND

100230199

10 JAN 2025

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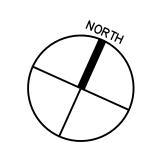
GENERAL HOSPITAL

> TOWN CENTRE

PRACTICAL INNOVATION

RECONSTRUCTION OF WEST STREET - PHASE 2 BROOK STREET TO TALBOT STREET IENT REF: EIS-ENG-25-34

AT		25mm SHEET #:
AT		25mm
N BY: CHEC	KED BY:	
50 202	5/01/15	25mm LONG, ADJUST THE PLOTTING SCALE.
: DATE:	1	IF THIS BAR IS NOT
	202	2025/01/15



LIGHTING POLE SUMMARY			
POLE NO.	LOCATION	STATION	OFFSET FROM ALIGNMENT
P1	QUEEN STREET	0 + 290.01	-11.100
P2	QUEEN STREET	0 + 273.60	-12.644
P3	WEST STREET	0 + 267.63	<i>−7.478</i>
P4	WEST STREET	0 + 271.39	7.377
P5	QUEEN STREET	0 + 274.42	13.390
P6	QUEEN STREET	0 + 291.29	15.143
P7	WEST STREET	0 + 296.15	7.682
P8	WEST STREET	0 + 296.53	− <i>7.832</i>
P9	QUEEN STREET	0 + 292.77	10.478
P10	WEST STREET	0 + 293.71	-7.799
P11	WEST STREET	0 + 268.88	-7.412
HH101	WEST STREET	0 + 294.94	-7.561
HH102	WEST STREET	0 + 265.94	-7.247
HH103	QUEEN STREET	0 + 273.81	12.087
HH104	WEST STREET	0 + 298.92	7.727

ELECTRICAL LEGEND

LIGHT FIXTURE TRAFFIC SIGNAL HEAD

NEW UTILITY POLE

AUDIBLE PEDESTRIAN SIGNAL HEAD PEDESTRIAN PUSH BUTTON

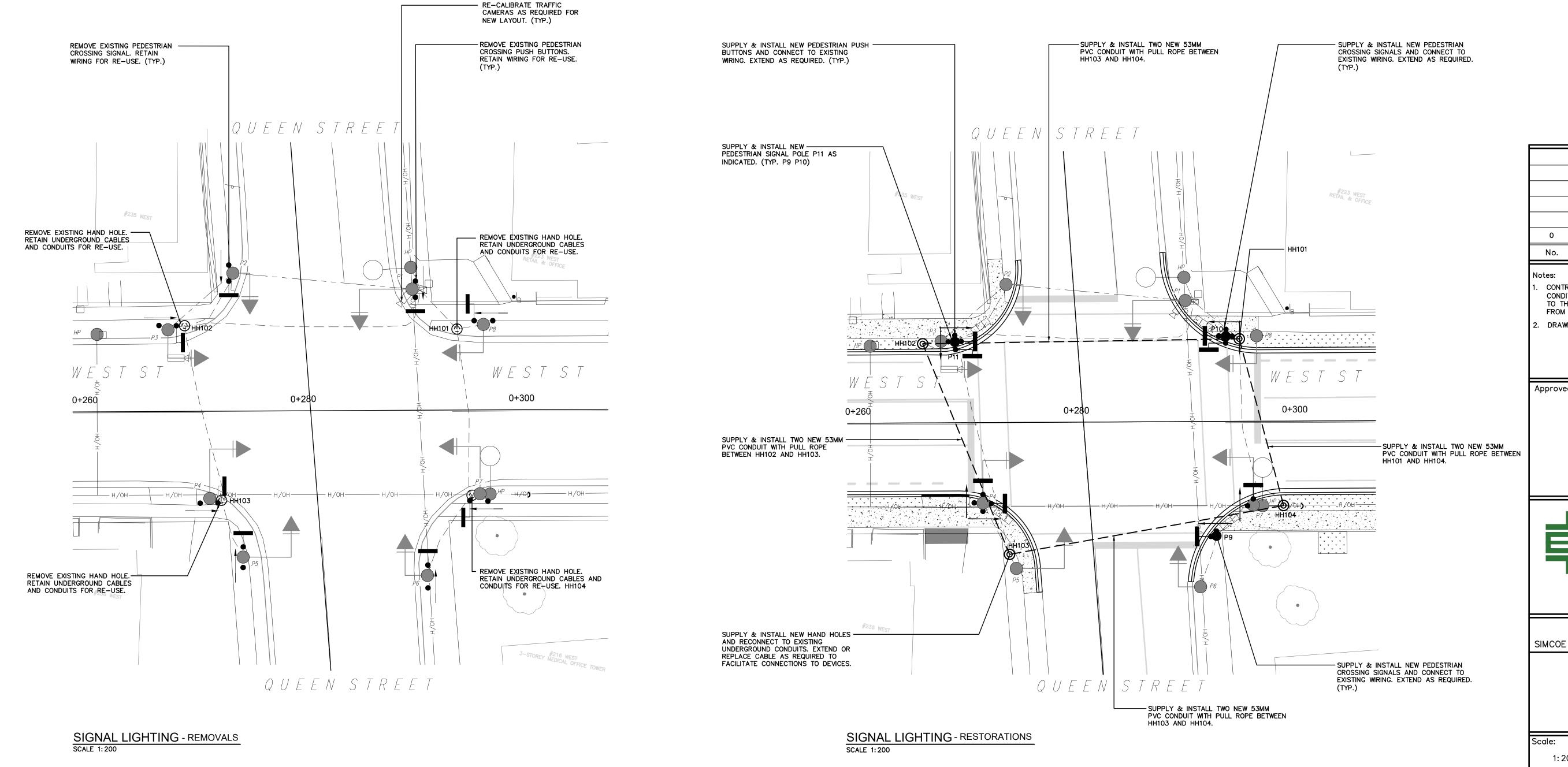
ELECTRICAL HAND HOLE TRAFFIC CABINET

HYDRO POLE

1. TRAFFIC SIGNALS AND POSTS TO REMAIN IN EXISTING LOCATIONS

TRAFFIC DETECTOR CAMERA

- 2. REDIRECT VIDEO CAMERA DETECTORS TO COMPENSATE FOR CONDENSING OF FOUR LANES TO THREE LANES
- CONNECT NEW PEDESTRIAN SIGNALS AND BUTTONS TO EXISTING TRAFFIC CONTROL CIRCUIT
- 4. ENSURE NEW PEDESTRIAN PUSH BUTTONS ARE COMPLIANT WITH AODA STANDARD 413/12 INTEGRATED ACCESSIBILITY STANDARDS 80.28.



OTHER UTILITIES REMOVED FOR CLARITY. REFER TO CIVIL DRAWINGS FOR UTILITY LOCATIONS.

CONTRACTOR TO OBTAIN UNDERGROUND LOCATES FOR OTHER UTILITIES PRIOR TO ANY EXCAVATION

08/30/24 ISSUED FOR TENDER Revision Date Initial

CONTRACTOR SHALL BE RESPONSIBLE FOR CHECKING DIMENSIONS AND EXISTING CONDITIONS AT THE OUTSET OF CONSTRUCTION. REPORT ANY DISCREPANCIES TO THE ENGINEER. DO NOT PROCEED WITHOUT FURTHER WRITTEN DIRECTION FROM THE ENGINEER.

DRAWING SHOWS GENERAL ARRANGEMENT ONLY. DO NOT SCALE.

Approved Approved



E-mail: info@tbte.ca

WEST STREET RECONSTRUCTION

ELECTRICAL

QUEEN STREET INTERSECTION RECONSTRUCTION

AUG 2024

Ckd. By: JK 1:200

Dwg. No.: 24-155-E1