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VILLAGE OF MARVIN

VILLAGE HALL PARK PHASE 1

10006 MARVIN SCHOOL ROAD

MARVIN, NORTH CAROLINA 28173



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VILLAGE OF MARVIN
 VILLAGE HALL PARK PHASE 1
 PRELIMINARY CONSTRUCTION DOCUMENTS
 10006 MARVIN SCHOOL ROAD
 MARVIN, NORTH CAROLINA

SITE INFORMATION

SITE LOCATION
 PARCEL NUMBER: 06225390A
 ETJ AREA: MARVIN
 TIME FRAME: FALL '25 - SPRING '26

ZONING INFORMATION
 EXISTING ZONING DISTRICT: CIVIC
 OVERLAY DISTRICT:
 PRINCIPAL USES:
WATERSHED INFORMATION
 STREAM WATERSHED: 6-MILE

SCOPE OF WORK: CONSTRUCTION OF A NEW PARK SITE ADJACENT TO THE EXISTING VILLAGE OF MARVIN TOWN HALL TO INCLUDE AN 8'-WIDE ASPHALT TRAIL AND GRADED PAD FOR A FUTURE AMPHITHEATER.

DENUDED LIMITS: 3 AC

CODE REFERENCES

- MARVIN DEVELOPMENT ORDINANCE - 2024
- AMERICANS WITH DISABILITIES ACT - ACCESSIBILITY GUIDELINES, 2010 (ADAAG)
- NCDEQ EROSION AND SEDIMENT CONTROL MANUAL - 2013
- NC DOT POLICY ON STREET AND DRIVEWAY ACCESS TO NORTH CAROLINA HIGHWAYS - 2003
- UNION COUNTY PUBLIC WORKS SANITARY SEWER & WATER SPECIFICATIONS
- VILLAGE OF MARVIN ENGINEERING STANDARDS AND PROCEDURES MANUAL - 2017

LOCATION MAP



VICINITY MAP



CONTACTS

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SUBMITTAL		SET NUMBER
<input checked="" type="checkbox"/> PRELIMINARY	<input type="checkbox"/> CONSTRUCTION	
<input type="checkbox"/> APPROVAL	<input type="checkbox"/> REVISION	
<input type="checkbox"/> BIDDING	<input type="checkbox"/> RECORD	

SEAL

**PRELIMINARY
 NOT RELEASED FOR
 CONSTRUCTION**

KEY PLAN:

SCALE:

REVISIONS

NO.	DATE	BY	DESCRIPTION
1	11/08/24	BML	30% REVIEW SET

DRAWN BY: BJN
 APPROVED BY: BML
 CHECKED BY: DJ
 DATE: AUGUST 28, 2024

TITLE

COVER SHEET

DEI PROJECT NO: 50181675

SHEET NO.

T0.01



1

GENERAL NOTES

- BASE DATA FROM UNION COUNTY GIS AND SURVEY PROVIDED BY DEWBERRY ENGINEERS INC. DATED JULY 12, 2024.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR FIELD VERIFYING ALL ILLUSTRATED KNOWN UNDERGROUND ELEMENTS. ADDITIONALLY, THE CONTRACTOR SHALL BE RESPONSIBLE FOR EXERCISING REASONABLE EFFORTS TO PROTECT ANY UNKNOWN UNDERGROUND ELEMENTS. THE CONTRACTOR SHALL NOTIFY THE OWNER AND DESIGNER OF RECORD IMMEDIATELY IF UNKNOWN ELEMENTS ARE DISCOVERED THAT WOULD NECESSITATE MODIFICATION TO THE ILLUSTRATED DESIGN.
- PROTECT ALL ADJACENT PROPERTIES, THE GENERAL PUBLIC, AND ALL OF THE OWNER'S FACILITIES. SHOULD DAMAGES OCCUR, CONTRACTOR SHALL REPAIR IMMEDIATELY AS DIRECTED BY THE OWNER OR DESIGNER OF RECORD. REPAIRS SHALL BE MADE AT NO COST TO THE DEVELOPER/OWNER.
- CONTRACTOR SHALL HOLD HARMLESS THE OWNER AND THE DESIGNER OF RECORD FOR DAMAGES, INJURIES OR OTHER ACCIDENTS WHICH OCCUR DURING THESE CONSTRUCTION ACTIVITIES.
- TREES AND EXISTING LANDSCAPING NOT DESIGNATED FOR REMOVAL SHALL BE PROTECTED DURING CONSTRUCTION.
- CONTRACTOR IS RESPONSIBLE FOR ALL DAMAGES DURING CONSTRUCTION INCLUDING DAMAGES TO OTHER CONTRACTORS & CONSULTANTS WORK AND SHALL MAKE REPAIRS OR HAVE REPAIRS MADE BY OTHERS AT THEIR EXPENSE.
- CONTRACTOR SHALL BE RESPONSIBLE FOR LOCATION ADJUSTMENTS OF ALL EXISTING VAULTS (REGARDLESS OF FUNCTION), METER BOXES, FIRE HYDRANTS, CLEAN OUTS, MANHOLES ETC. TO MATCH FINISHED GRADES AND SITE PLAN. ALL SUCH WORK SHALL BE COORDINATED WITH THE DESIGNER OF RECORD AND OWNER.
- UTILIZE SIGNS, BARRICADES, ETC. TO ENSURE THE SAFETY OF THE GENERAL PUBLIC.
- THE CONTRACTOR SHALL BE RESPONSIBLE FOR VERIFYING LAYOUT OF ALL WORK AS ILLUSTRATED ON PLANS. IF EXISTING CONDITIONS DIFFER FROM THOSE ILLUSTRATED ON PLANS, NOTIFY DESIGNER OF RECORD AND DEVELOPER/OWNER PRIOR TO CONSTRUCTION.
- VERIFY ALL DIMENSIONS AND GRADES AT THE JOB SITE. IF DIFFERENCES ARE FOUND, NOTIFY DESIGNER OF RECORD SO THAT MODIFICATIONS TO THESE DRAWINGS CAN BE MADE.
- ALL SIGNAGE AND PAVEMENT MARKINGS SHALL CONFORM TO THE LATEST EDITION OF THE "MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES".
- ANY LAND DISTURBANCE ACTIVITY >1 ACRE REQUIRES COMPLIANCE WITH ALL CONDITIONS OF THE GENERAL PERMIT TO DISCHARGE STORMWATER UNDER THE NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (PERMIT No. NCG010000). ANY PERMIT NONCOMPLIANCE IS A VIOLATION OF THE CLEAN WATER ACT AND MAY REQUIRE ENFORCEMENT ACTION BY THE NORTH CAROLINA DEPARTMENT OF ENVIRONMENTAL QUALITY. (FOR QUESTIONS CONTACT MOORESVILLE REGIONAL OFFICE WATER QUALITY STAFF AT 704-663-1699.
- SPOT ELEVATIONS SHOWN ON THE PLANS ARE LOCATED AT THE BACK OF CURB UNLESS OTHERWISE SPECIFIED ON THE PLANS.
- PROPOSED RIM ELEVATIONS FOR CATCH BASINS ARE MEASURED AT THE CENTER OF THE GRATE AT THE EDGE OF PAVEMENT. RIM ELEVATIONS FOR MANHOLES AND DROP INLETS ARE AT THE CENTER OF THE LID/GRATE.
- ALL SUBSURFACE DRAINAGE PIPE SHALL BE REINFORCED CONCRETE (RCP) PIPE, AS APPROVED BY THE CITY OF CHARLOTTE. PIPES IN R/W MUST BE RCP.
- EXISTING TREES ON THIS SITE ARE RECOGNIZED AS A NATURAL MARKETING ASSET; THEREFORE, THE DEVELOPER WILL ENDEAVOR TO RETAIN EXISTING TREES WHERE POSSIBLE THROUGHOUT THE SITE, ESPECIALLY IN THE OUTER BOUNDARY PERIMETER AREAS WHERE THE SITE ADJOINS OTHER PROPERTIES.
- CONTRACTOR TO COORDINATE PLANTING LOCATIONS WITH THE CITY OF CHARLOTTE PRIOR TO PLACEMENT.

EROSION AND SEDIMENT CONTROL NOTES

- ON-SITE BURIAL PITS REQUIRE AN ON-SITE DEMOLITION LANDFILL PERMIT FROM THE ZONING ADMINISTRATOR.
- ANY GRADING BEYOND THE DENUDED LIMITS SHOWN ON THE PLAN IS A VIOLATION OF STATE LAW AND IS SUBJECT TO A FINE.
- GRADING MORE THAN ONE ACRE WITHOUT AN APPROVED EROSION CONTROL PLAN IS A VIOLATION OF THE CITY EROSION CONTROL ORDINANCE AND IS SUBJECT TO A FINE.
- ALL PERIMETER DIKES, SWALES, DITCHES, PERIMETER SLOPES, AND ALL SLOPES STEEPER THAN 3 HORIZONTAL TO 1 VERTICAL (3:1) SHALL BE PROVIDED TEMPORARY OR PERMANENT STABILIZATION WITH GROUND COVER AS SOON AS PRACTICABLE BUT IN ANY EVENT WITHIN 7 CALENDAR DAYS FROM THE LAST LAND-DISTURBING ACTIVITY.
- ALL OTHER DISTURBED AREAS SHALL BE PROVIDED TEMPORARY OR PERMANENT STABILIZATION WITH GROUND COVER AS SOON AS PRACTICABLE BUT IN ANY EVENT WITHIN 14 CALENDAR DAYS FROM THE LAST LAND-DISTURBING ACTIVITY.
- ADDITIONAL MEASURES TO CONTROL EROSION AND SEDIMENT MAY BE REQUIRED BY THE EROSION CONTROL INSPECTOR.
- A GRADING PLAN MUST BE SUBMITTED FOR ANY LOT GRADING EXCEEDING ONE ACRE THAT WAS NOT PREVIOUSLY APPROVED.
- DEWATERING TO BE AUTHORIZED BY THE EROSION CONTROL INSPECTOR AS RELATED TO SITE CONDITIONS. CONTRACTOR SHALL OBTAIN EROSION CONTROL INSPECTOR AUTHORIZATION PRIOR TO DEWATERING ACTIVITIES.
- TEMPORARY DRIVEWAY PERMIT FOR CONSTRUCTION ENTRANCES IN NCDOT RIGHT OF WAY MUST BE PRESENTED AT PRE-CONSTRUCTION MEETING.
- ALL EMBANKMENTS MUST BE CONSTRUCTED PER SECTION 4.0.6 EMBANKMENT REQUIREMENTS IN THE BMP DESIGN MANUAL.
- SITE PREPARATION SHALL BE AS DIRECTED IN REPORT TITLED "REPORT OF SUBSURFACE EXPLORATION AND GEOTECHNICAL ENGINEERING SERVICES" BY FROEHLING & ROBERSTON, INC. DATED SEPTEMBER 20, 2024. SLOPES GREATER THAN 10 VERTICAL FEET REQUIRE ADEQUATE TERRACING. SOILS ENGINEER TO VERIFY STABILITY OF SLOPES GREATER THAN 3:1.
- SOIL COMPACTION TESTS ARE REQUIRED ON ANY BERM >= 5' IN HEIGHT FROM THE NATURAL GRADE. SOIL COMPACTION MUST BE AT 95% PROCTOR PER ASTM D-1557 AND CERTIFIED BY A LICENSED SOIL ENGINEER.
- ALL LAND-DISTURBING ACTIVITIES, INCLUDING THOSE THAT DISTURB LESS THAN AN ACRE, SHALL PROVIDE ADEQUATE EROSION CONTROL MEASURES, STRUCTURES, OR DEVICES IN ACCORDANCE WITH THE CITY SOIL EROSION AND SEDIMENTATION CONTROL ORDINANCE.
- ENHANCED EROSION CONTROL MEASURES - THESE MEASURES ARE REQUIRED TO BE INSTALLED IN THE AREAS IDENTIFIED IN ATTACHMENT 1 (MCDOWELL CREEK WATERSHED, CRITICAL & PROTECTED WATERSHED DISTRICTS AND LAND WITHIN 500' OF CLARKE CREEK.
- SURFACE WATER DRAW DOWN DEVICES (RISERS OR SKIMMERS) SHALL BE INSTALLED IN ALL SEDIMENT BASIN. ROCK COFFER FOREBAYS SHALL BE USED IN CONJUNCTION WITH ALL SEDIMENT BASINS. THE BASIN SHALL ALSO HAVE A VOLUME TWENTY-FIVE (25) PERCENT GREATER THAN THE 1,800 CUBIC FEET PER DRAINAGE ACRE, WHEN POSSIBLE.
- POLYACRYLAMIDES (PAM) SHALL BE USED TO REDUCE TURBIDITY AND SUSPENDED SOLIDS WHENEVER A SEDIMENT TRAP, BASIN, PIT, HOLE, OR BUILDING FOUNDATION IS BEING PUMPED OUT TO REMOVE SEDIMENT LADEN WATER. PAM IS NOT REQUIRED WHEN ANY OF THE ABOVE IS BEING PUMPED TO AN APPROVED SEDIMENT BASIN ON SITE. THIS ACTIVITY MUST BE INSPECTED AND APPROVED BY THE CITY OF CHARLOTTE EROSION CONTROL INSPECTOR. CONTRACTOR SHALL APPLY PAM AS DIRECTED BY MANUFACTURER.
- POLYACRYLAMIDES MAY BE REQUIRED ON SITE, AS DETERMINED BY THE CITY EROSION CONTROL INSPECTOR.
- DOUBLE ROW OF HIGH HAZARD SILT FENCE WITH WIRE BACKING AND STONE SHALL BE USED ALONG WETLANDS, STREAMS, LAKES OR OTHER SURFACE WATER BODIES AS WELL AS ADJACENT TO ALL S.W.I.M. OR OTHER WATER QUALITY BUFFERS. SINGLE ROW OF SILT FENCE WITH WIRE BACKING AND WASHED STONE MAY BE REQUIRED ON ALL OTHER AREAS, AS DETERMINED NECESSARY BY THE TOWN ENGINEER OR FIELD INSPECTOR.
- THE AMOUNT OF UNCOVERED AREA AT ANY ONE TIME SHALL BE LIMITED TO NO MORE THAN 20 ACRES, UNLESS APPROVED BY THE CITY.
- A 10-FOOT UNDISTURBED BUFFER SHALL BE PROVIDED AROUND THE OUTSIDE EDGE OF DRAINAGE FEATURES SUCH AS INTERMITTENT AND PERENNIAL STREAMS, PONDS, AND WETLANDS. INCIDENTAL DRAINAGE IMPROVEMENTS OR REPAIRS WILL BE PERMITTED WITHIN THE BUFFER AS APPROVED BY TOWN STAFF. THESE WOULD INCLUDE ANY ALLOWANCES STATED IN THE SWIM BUFFER AND/OR PCCO ORDINANCES, IF APPLICABLE.
- A GROUND COVER SUFFICIENT TO RESTRAIN ACCELERATED EROSION MUST BE PROVIDED WITHIN 7 CALENDAR DAYS OF THE DATE OF LAST LAND-DISTURBING ACTIVITY ON ANY PORTION OF THE PROJECT.
- APPLY EROSION CONTROL MATTING TO DIVERSION DITCHES AND INTERIOR BASIN SLOPES AS SHOWN ON THE PLANS.
- ALL BASIN SPILLWAYS SHALL BE SIZED TO PASS THE 50-YR STORM EVENT.

- FILL SLOPE STEEPNESS SHALL BE LIMITED TO 2:1. SLOPES STEEPER THAN 3:1 MUST BE TERRACED OR OTHERWISE PROVIDE AN APPROVED ENGINEERED SOLUTION. SLOPES 3:1 OR FLATTER MUST BE DESIGNED AS SET FORTH IN THE NC SOIL EROSION & SEDIMENT PLANNING & DESIGN MANUAL, STANDARD 6.02A.
- ALL PLANS WILL CARRY A "PERFORMANCE RESERVATION".
- ALL SELF-INSPECTION LOG BOOK ENTRIES WILL BE ELECTRONICALLY SENT TO THE AREA INSPECTOR, WITHIN 2 WORKING DAYS OF A QUALIFYING RAIN EVENT OR WEEKLY (WHICHEVER IS SHORTER). FOR EROSION CONTROL BASINS WITH A DRAINAGE AREA GREATER THAN 10 ACRES, TURBIDITY MEASUREMENTS MAY BE REQUIRED AT THE DISCRETION OF THE TOWN TO MEASURE CLARITY OF BASIN EFFLUENT AND ANY POTENTIAL IMPACT TO RECEIVING WATERS AT THE TIME OF RAINFALL-TRIGGERED INSPECTIONS. READINGS MUST BE COLLECTED AT THE BASIN OUTFALL (TO MEASURE CLARITY OF BASIN EFFLUENT), UPSTREAM OF THE DISCHARGE POINT (TO MEASURE BASELINE CONDITIONS) AND DOWNSTREAM OF THE DISCHARGE POINT (TO MEASURE STREAM IMPACTS OF THE BASIN EFFLUENT) WHEN POSSIBLE. THE RESULTS MUST BE LOGGED IN THE INSPECTION REPORTS.
- AFTER CONSTRUCTION IS COMPLETED AND THE SITE IS STABILIZED, REMOVE ALL TEMPORARY MEASURES.

GENERAL DEMOLITION NOTES

- SAW CUT AND REMOVE ALL ASPHALT AND CONCRETE TO LIMITS REQUIRED FOR PROPOSED WORK. SAW CUTS FOR CONCRETE SHALL OCCUR AT THE NEAREST CONTROL JOINT OR EXPANSION JOINT. SAW CUTS BETWEEN CONTROL JOINTS ARE NOT ACCEPTABLE. ALL DECORATIVE SCORING PATTERNS SHALL BE REPLACED TO THE OWNER'S SATISFACTION. CONTRACTOR SHALL DOCUMENT AND PHOTOGRAPH ALL DECORATIVE SCORING PATTERNS PRIOR TO DEMOLITION.
- REMOVE VEGETATION, GRASS, & ROOTMAT IN AREAS TO RECEIVE NEW ASPHALT AND CONCRETE PAVEMENTS.
- ALL PRIMARY UTILITIES DISCOVERED DURING DEMOLITION OPERATIONS SHALL BE PROPERLY PRESERVED AND PROTECTED.
- THE CONTRACTOR SHALL IMMEDIATELY REPORT TO THE OWNER ANY UNFORESEEN OR ADVERSE CONDITIONS DISCOVERED DURING DEMOLITION OPERATIONS.
- CONTRACTOR SHALL PROTECT EXISTING PLANT MATERIAL NOT DESIGNATED FOR REMOVAL OR RELOCATION FROM DAMAGE DURING CONSTRUCTION.
- CONTRACTOR SHALL KEEP ALL SURROUNDING PUBLIC ROADWAYS AND DRAINAGE SYSTEMS FREE FROM DIRT, MUD, AND CONSTRUCTION DEBRIS AT ALL TIMES.
- CONTRACTOR SHALL REMOVE ASPHALT PAVEMENT, CONCRETE AND MISCELLANEOUS ITEMS AS NECESSARY TO FACILITATE CONSTRUCTION IN ACCORDANCE WITH STATE AND LOCAL REGULATIONS.
- CONTRACTOR SHALL BE RESPONSIBLE FOR THE REPAIR OF ANY ITEMS DAMAGED DURING THE CONSTRUCTION.
- CONTRACTOR SHALL REMOVE ALL FOUNDATIONS, FOOTING, AND SLABS WITHIN THE PROJECT LIMITS TO FULL DEPTH OR AS INDICATED ON THESE PLANS.
- CONTRACTOR SHALL LEGALLY DISPOSE OF ALL DEBRIS AND CONSTRUCTION WASTE AT A LANDFILL LEAGALLY ABLE TO ACCEPT SUCH MATERIAL IN THE STATE OF NORTH CAROLINA.

SITE NOTES

- DIMENSIONS AND COORDINATE POINTS ARE TO FACE OF CURB, EDGE OF PAVEMENT, OR CORNER OF BUILDING UNLESS OTHERWISE NOTED.
- ALL IMPROVEMENTS AND CONSTRUCTION SHALL BE IN ACCORDANCE WITH STATE AND LOCAL STANDARDS.
- ANY DISCREPANCIES FOUND IN THE FIELD SHALL BE CALLED TO THE ATTENTION OF THE OWNER OR ENGINEER OF RECORD PRIOR TO PROCEEDING WITH WORK.
- PRIOR TO BEGINNING CONSTRUCTION, THE GENERAL CONTRACTOR SHALL OBTAIN ALL REQUIRED PERMITS AND APPROVALS FROM ALL REGULATORY AUTHORITIES.
- THE GENERAL CONTRACTOR SHALL CONTACT ALL OWNERS OF EASEMENTS, UTILITIES, AND RIGHT-OF-WAYS, PUBLIC AND PRIVATE, PRIOR TO WORKING IN THESE AREAS.
- GENERAL CONTRACTOR SHALL MAINTAIN THE SITE IN A MANNER SO THAT WORKMEN AND THE PUBLIC SHALL BE PROTECTED FROM INJURY.
- DO NOT SCALE DRAWINGS FROM ACTUAL DIMENSIONS, AS IT IS A REPRODUCTION AND SUBJECT TO DISTORTION.
- ALL SIGNS, PAVEMENT MARKING, AND OTHER TRAFFIC CONTROL DEVICES SHALL CONFORM TO THE MANUAL ON UNIFORM TRAFFIC CONTROL DEVICES (MUTCD), 2009 EDITION AS AMENDED.
- CONTRACTOR SHALL SAW-CUT EXISTING ASPHALT PAVEMENT AREAS TO TIE IN SMOOTHLY TO PROPOSED PAVEMENT.
- LAND DEVELOPMENT INSPECTOR TO BE GIVEN 24 HOURS NOTICE PRIOR TO START OF CONSTRUCTION.
- THE (CITY OF CHARLOTTE/MECKLENBURG COUNTY) ENGINEERING DEPARTMENT HAS NOT REVIEWED THE STRUCTURAL STABILITY OF ANY RETAINING WALLS ON THE SITE AND DOES NOT ASSUME RESPONSIBILITY FOR THEM.
- THE ENGINEER WILL PROVIDE THE CONTRACTOR WITH AN ELECTRONIC FILE OF THESE DRAWINGS UPON REQUEST.
- ALL RETAINING WALLS SHALL HAVE A 48" HEIGHT BLACK ALUMINUM FENCE WITH PICKETS NOT PERMITTING THE PASSAGE OF A 4" DIAMETER SPHERE LOCATED ON THE TOP OF WALL. SEE WALL DESIGN BY OTHERS FOR DETAILED INFORMATION.
- IF REQUIRED BY MECKLENBURG COUNTY, P.E. SEALED SHOP DRAWINGS FOR RETAINING WALLS MUST BE SUBMITTED TO CITY ENGINEER PRIOR TO CONSTRUCTION.
- ALL PAVED AREAS SHALL COMPLY WITH THE LATEST ADA ACCESSIBILITY (2010) AND ANSI A17.1 GUIDELINES.
- ALL CONCRETE SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 3,600-PSI AT 28 DAYS, AND SHALL HAVE A MEDIUM BROOM FINISH PERPENDICULAR TO THE PATH OF TRAVEL.
- ALL PROPOSED PAVEMENT ADJACENT TO EXISTING PAVEMENT SHALL TIE FLUSH TO ADJACENT SURFACES.

CONSTRUCTION SEQUENCE

PHASE 1:

- OBTAIN ALL NECESSARY PERMITS FROM GOVERNMENT AGENCIES.
- SET UP AN ON-SITE PRE-CONSTRUCTION CONFERENCE WITH THE EROSION CONTROL INSPECTOR.
- INSTALL CONSTRUCTION ENTRANCE, SILT FENCE, SKIMMER BASIN, SEDIMENT BASIN, AND OTHER MEASURES AS SHOWN ON PLANS, CLEARING ONLY AS NECESSARY TO INSTALL THESE DEVICES.
- CALL FOR ON-SITE INSPECTION BY INSPECTOR. ONCE THE INSPECTOR REVIEWS ALL MEASURES IN THE FIELD AND DEEMS THEM ACCEPTABLE, A GRADING PERMIT WILL BE ISSUED.
- ALL EROSION CONTROL MEASURES SHALL BE CONSTRUCTED IN ACCORDANCE WITH THE NORTH CAROLINA EROSION AND SEDIMENT CONTROL PLANNING AND DESIGN MANUAL, U.S. DEPARTMENT OF AGRICULTURE, AND CITY OF CHARLOTTE LAND DEVELOPMENT STANDARDS (CLDSM).
- BEGIN CLEARING, GRUBBING, AND DEMOLITION OPERATIONS.

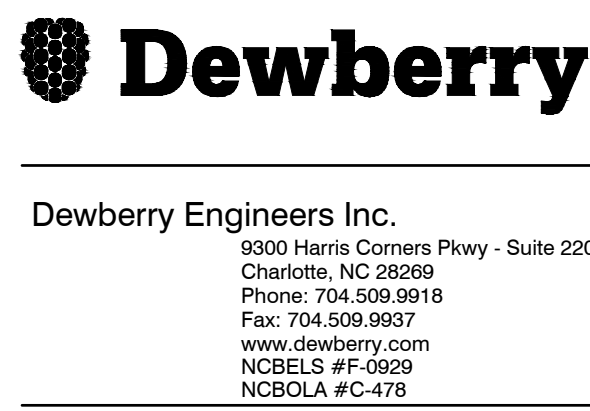
PHASE 2:

- COMMENCE WITH ROUGH GRADING OF THE SITE
- VERIFY SILT FENCE AND OTHER MEASURES INSTALLED DURING PHASE 1 ARE STILL PROVIDING PROTECTION TO KEEP SEDIMENT FROM LEAVING THE SITE. ADJUST MEASURES AS NECESSARY TO PREVENT SEDIMENT FROM LEAVING PROJECT LIMITS.
- INSTALL ADDITIONAL RUNOFF PREVENTION MEASURES SHOWN ON PLANS.
- INSTALL PERMANENT STORM PIPES, STRUCTURES, AND UTILITIES AS SHOWN ON PLANS. CONTRACTOR SHALL CALL FOR ON-SITE INSPECTION BY INSPECTOR. INSPECTOR SHALL VERIFY INSTALLATION OF STORM PIPES AND STRUCTURES AND THAT SITE DRAINAGE PATTERNS MATCH CONDITIONS SHOWN ON THE PHASE 2 ESC PLAN.
- CONTRACTOR SHALL REMOVE SKIMMER BASIN LOCATED IN THE PROPOSED BUILDING "A" FOOTPRINT PRIOR TO FINE GRADING OF THE SITE. ENSURE ALL DENUDED AREAS SHOWN ON THE PLANS CONTINUE TO DISCHARGE TO THE TEMPORARY SEDIMENT BASIN.
- COMMENCE FINE GRADING OF THE SITE.
- COMMENCE PAVING, SIDEWALK INSTALLATION, AND BRING ALL GRADES TO FINAL GRADES AS SHOWN ON PLANS.
- STABILIZE ALL DENUDED AREAS. ONCE THE SITE HAS BEEN STABILIZED, CONTRACTOR SHALL CONVERT THE SEDIMENT BASIN INTO A DRY DETENTION BASIN AS SHOWN ON THE PLANS. CONTRACTOR SHALL CLEAN OUT SEDIMENT THAT HAS ACCUMULATED IN THE BASIN DURING EROSION CONTROL PHASES.
- ONCE CONSTRUCTION IS COMPLETE, COORDINATE WITH EROSION CONTROL INSPECTOR FOR FINAL SITE INSPECTION.

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GRADING NOTES

- ALL STORM STRUCTURES SHALL MEET CURRENT NCDOT STANDARDS APPROVED FOR USE IN THE CITY OF CHARLOTTE AND CHARLOTTE ETJ PER CLDSM STD. NO. 20.00.
- ALL STORM INLETS LABELED "CB" SHALL BE GRATE TYPE INLETS (NCDOT 840.02).
- ALL STORM STRUCTURES LABELED "JB" SHALL BE JUNCTION BOXES (NCDOT 840.52).
- ALL STORM STRUCTURES LABELED "DI" SHALL BE GRATE DROP TYPE INLET (NCDOT 840.14 & 840.17 IF PIPE GREATER THAN 30" DIA.).
- THE MINIMUM COVER FOR CLASS III RCP SHALL BE 2'. WHERE 2' OF COVER CANNOT BE PROVIDED THE PIPE SHALL BE CLASS IV.
- ALL INCOMING PIPES SHALL BE CUT FLUSH WITH THE INSIDE OF STORM STRUCTURES AND THE INVERTS GROUTED AND TROWELED TO PROVIDE POSITIVE DISCHARGE THROUGH THE STRUCTURE.
- ALL STORM DRAINAGE STRUCTURES GREATER THAN 42" DEPTH SHALL HAVE STEPS CAST INTO THEM.
- RIM ELEVATIONS ARE AT THE CENTER OF THE GRATE AT THE EDGE OF PAVEMENT. RIM ELEVATIONS FOR DROP INLETS AND MANHOLES SHALL BE AT THE CENTER OF THE LID OR GRATE.
- ALL SPOT ELEVATIONS SHOWN ARE TOP BACK OF CURB (BC) UNLESS OTHERWISE NOTED.
- ALL SIDEWALKS AND PAVED AREAS FOR PEDESTRIAN TRAFFIC SHALL BE GRADED IN ACCORDANCE WITH THE 2010 ADA GUIDELINES AND SHALL HAVE A CROSS SLOPE OF 1.5% PREFERRED, 2% MAXIMUM. THE LONGITUDINAL SLOPE OF WALKS SHALL NOT EXCEED 5% UNLESS THESE DRAWINGS INDICATE A RAMP CONDITION. ANY LANDINGS, AND LOADING AREA ADJACENT TO BUS STOP SHALL NOT HAVE A SLOPE GREATER THAN 2% IN ANY DIRECTION.
- WHERE ADJACENT PLACEMENT SLOPES AWAY FROM THE PROPOSED CURB & GUTTER THE CONTRACTOR SHALL PROVIDE SPILL CURB.
- IN ORDER TO ENSURE PROPER DRAINAGE, CURB SHALL HAVE A MINIMUM OF 0.5% SLOPE, UNLESS SPILL CURB IS INDICATED ON THE PLANS. SHADED CURB & GUTTER INDICATES LOCATION FOR SPILL CURBS.
- CONTRACTOR IS RESPONSIBLE FOR OBTAINING POSITIVE DRAINAGE AT ALL INTERSECTIONS. SPECIAL CARE MUST BE TAKEN WHERE SPILL CURB IS CALLED OUT.
- NO STORM PIPE SHALL BE INSTALLED WITHIN THE S.W.I.M. BUFFERS.
- GENERALLY, SOIL MATERIALS FOR CONSTRUCTION SHALL BE AS RECOMMENDED IN THE GEOTECHNICAL REPORT BY THE OWNER'S GEOTECHNICAL ENGINEER.
- FILL AND BACKFILL MATERIAL SHALL CONSIST OF SOIL, GRANULAR SAND, GRAVEL, AND COBBLE MATERIAL, FREE FROM FROZEN MATERIAL, ORGANIC MATERIAL, TRASH, GLASS, BROKEN CONCRETE, AND OTHER CORROSIVE OR DELETERIOUS MATERIAL. APPROVAL OF FILL AND BACKFILL MATERIAL IS CONTINGENT ON THE MATERIAL HAVING A MAXIMUM DRY DENSITY OF NOT LESS THAN 90 POUNDS PER CUBIC FOOT. THE MATERIAL MUST BE STABLE AND HAVE A LIQUID LIMIT LESS THAN 40 AND A PLASTIC INDEX LESS THAN 30 WHEN TESTED IN ACCORDANCE WITH ASTM D4318. SIZE RESTRICTIONS ARE AS FOLLOWS:
 - NO MATERIAL SHALL HAVE DIMENSIONS LARGER THAN SIX (6") INCHES. WHERE THE SUBGRADE LAYER IS LESS THAN SIX (6") INCHES THE MAXIMUM SIZE SHALL NOT EXCEED TWO THIRDS (2/3) THE DEPTH OF THE LAYER. WHERE UNSTABLE SUBGRADE IS ENCOUNTERED, THE CONTRACTOR SHALL OBTAIN RECOMMENDATIONS FROM THE OWNER'S GEOTECHNICAL ENGINEER AND PROVIDE RECOMMENDATIONS AND VARIANCE PRICING TO OWNER TO STABILIZE THE MATERIAL. BY TECHNIQUES SUCH AS OVER-EXCAVATION AND BACKFILL WITH IMPORTED MATERIAL, USE OF GEOTECHNICAL REINFORCEMENT, CHEMICAL STABILIZATION OR OTHER METHODS. THE CONTRACTOR SHALL NOTIFY THE OWNER OF PROPOSED SOLUTION TO STABILIZE THE SUBGRADE AND SHALL NOT COMMENCE UNTIL THEY HAVE RECEIVED WRITTEN APPROVAL FROM THE OWNER. IF TESTS OR OBSERVATION REVEAL THAT MATERIAL BEING PLACED IS NOT OF SUITABLE QUALITY AND STRUCTURAL VALUE, THE CONTRACTOR SHALL PROVIDE OTHER MATERIAL AS APPROVED BY THE OWNER'S GEOTECHNICAL ENGINEER.
- EXCAVATION OF ALL MATERIALS SHALL BE PERFORMED IN CONFORMITY WITH THE LINES AND GRADES INDICATED ON THE DRAWINGS. SUITABLE MATERIAL REMOVED FROM THE EXCAVATION MAY BE USED AS FILL AND BACKFILL OR ANY OTHER AREAS WITHIN THE LIMITS OF WORK AS PERMITTED BY THE ENGINEER. WHERE MATERIAL ENCOUNTERED WITHIN THE LIMITS OF THE WORK IS CONSIDERED UNSUITABLE BY THE OWNER'S GEOTECHNICAL ENGINEER, SUCH MATERIAL SHALL BE EXCAVATED AS DIRECTED BY THESE STANDARDS, THE PLANS, OR THE OWNER'S GEOTECHNICAL ENGINEER AND REPLACED WITH SUITABLE MATERIAL.
- BUILDING PADS AND THE PAVEMENT STRUCTURE SHALL BE FOUNDED ON ORIGINAL, UNDISTURBED SOIL OR ON STRUCTURAL BACKFILL EXTENDED TO THE UNDISTURBED SOIL. BUILDING PADS AND THE PAVEMENT STRUCTURE SHALL NOT BE FOUNDED ON EXISTING FILL IF ENCOUNTERED AT THE PROJECT SITE UNLESS APPROVED BY THE ENGINEER. IF EXISTING FILL IS ENCOUNTERED AT THE SUBGRADE, THE CONTRACTOR SHALL NOTIFY THE ENGINEER WHO SHALL EVALUATE THE EXISTING FILL FOR SUITABILITY OF ACCEPTING NEW FILL.
- THE CONTRACTOR SHALL BLEND THE INTERSECTION OF CUT SLOPES WITH THE SLOPES OF ADJACENT NATURAL GROUND SURFACES IN A UNIFORM MANNER. THE TOPS OF CUT SLOPES SHALL BE FLATTENED AND ROUNDED.
- ALL EXCAVATED MATERIAL SHALL BE STOCKPILED IN A MANNER THAT DOES NOT ENDANGER THE WORK OR WORKERS AND DOES NOT OBSTRUCT SIDEWALKS, STREETS, ALLEYS, AND/OR DRIVEWAYS. THE WORK SHALL BE DONE IN A MANNER THAT WILL MINIMIZE INTERFERENCE WITH TRAFFIC AND/OR DRAINAGE. THE CONTRACTOR AT THE END OF EACH DAY SHALL BARRICADE ALL EXCAVATIONS AND DITCH LINES, REMOVE EXCESS EXCAVATED MATERIAL FROM TRAVEL WAYS, AND THOROUGHLY CLEAN ALL STREETS, ALLEYS, AND/OR SIDEWALKS AFFECTED BY THE EXCAVATION.
- MATERIAL ENCOUNTERED DURING EXCAVATION; SUCH AS, RUBBISH, ORGANIC, OR FROZEN MATERIAL, AND ANY OTHER MATERIAL WHICH IS UNSATISFACTORY FOR USE AS BACKFILL IN THE OPINION OF THE OWNER'S GEOTECHNICAL ENGINEER, SHALL BE REMOVED FROM THE SITE AND LEGALLY DISPOSED OF AT THE CONTRACTOR'S EXPENSE. STONES, CONCRETE, OR ASPHALT CHUNKS LARGER THAN SIX (6") INCHES OR FROZEN MATERIAL SHALL BE CONSIDERED UNSATISFACTORY BACKFILL AND REMOVED BY THE CONTRACTOR. FROZEN MATERIAL, HOWEVER, MAY BE THAWED OUT AND USED AT A LATER DATE.
- FILL AND BACKFILL SHALL CONSIST OF APPROVED MATERIAL UNIFORMLY DISTRIBUTED IN 8-INCH UNCOMPACTED LIFTS. EACH LIFT OF BACKFILL SHALL BE COMPACTED TO THE REQUIRED DENSITY BEFORE SUCCESSIVE LAYERS ARE PLACED. STRUCTURAL FILL AND BACKFILL SHALL BE COMPACTED TO A DENSITY OF NOT LESS THAN 95 PERCENT OF THE MAXIMUM DRY DENSITY WITHIN +/- TWO (2%) PERCENT OF THE OPTIMUM MOISTURE CONTENT AS DETERMINED BY ASTM D698.
- BEFORE ANY FILL IS PLACED, CLEARING, TREE REMOVAL, SOD AND TOPSOIL REMOVAL OVER THE ENTIRE AREA SHALL BE PERFORMED IN ACCORDANCE WITH THESE STANDARDS. THE BASE OF FILL AREA SHALL BE PROOFROLLED WITH A PNEUMATIC TIRED VEHICLE WEIGHING NO LESS THAN 20 TONS AND OBSERVED BY THE OWNER'S GEOTECHNICAL ENGINEER. THE CONTRACTOR SHALL NOTIFY THE OWNER AND THE OWNER'S GEOTECHNICAL ENGINEER NO LESS THAN 24 HOURS PRIOR TO PLACING FILL TO SCHEDULE THE PROOFROLL. NO FILL MATERIAL SHALL BE PLACED UPON SIFT, SPONGY, OR FROZEN MATERIAL OR OTHER MATERIAL, THE STABILITY OF WHICH IS IN THE OPINION OF THE OWNER'S GEOTECHNICAL ENGINEER, UNSUITABLE FOR THE PLACEMENT THEREOF.
- WHEN FILL IS TO BE PLACED ON SLOPES, IT SHALL BE CONTINUOUSLY BENCHED IN HORIZONTAL LAYERS TO KEY INTO THE EXISTING SLOPE. EACH LIFT OF THE FILL MATERIAL SHALL NOT EXCEED EIGHT (8") INCHES IN LOOSE DEPTH. THE CONTRACTOR SHALL THOROUGHLY MIX AND INSURE UNIFORM DENSITY AND MOISTURE FOR PROPER COMPACTION.
- GRADED SLOPES SHALL NOT EXCEED 3:1 OR AS RECOMMENDED BY THE OWNER'S GEOTECHNICAL ENGINEER.
- BACKFILL MATERIAL SHALL NOT BE DEPOSITED AGAINST NEWLY CONSTRUCTED MASONRY OR CONCRETE STRUCTURES UNTIL THE CONCRETE HAS DEVELOPED A FIELD COMPRESSIVE STRENGTH OF EQUAL TO THE DESIGN COMPRESSIVE STRENGTH.
- COMPACTION METHODS THAT PRODUCE HORIZONTAL OR VERTICAL EARTH PRESSURES, WHICH MAY CAUSE EXCESSIVE DISPLACEMENT OR OVERTURNING, OR MAY DAMAGE STRUCTURES, BURIED PIPE, OR UTILITIES, SHALL NOT BE USED.
- UNLESS OTHERWISE INDICTED IN THE CONTRACT OR DIRECTED BY THE ENGINEER, ALL SHEETING AND BRACING USED IN EXCAVATION SHALL BE REMOVED BY THE CONTRACTOR PRIOR TO BACKFILLING.
- THE CONTRACTOR IS RESPONSIBLE FOR THE SCHEDULING THE QUALITY CONTROL TESTING AND PROTECTION OF WORK UNTIL ACCEPTED BY THE OWNER. ALL QUALITY CONTROL TEST RESULTS SHALL BE MADE AVAILABLE TO THE OWNER AND ENGINEER IMMEDIATELY AFTER TESTING. ACCEPTANCE TESTING MAY INCLUDE BUT NOT LIMITED TO TESTS ASSOCIATED WITH PLACING OF CONCRETE, ASPHALT, AND BASE COURSE SUBGRADE PREPARATION, AND SOIL COMPACTION. THE CONTRACTOR SHALL COORDINATE WITH THE CONSTRUCTION MATERIAL TESTING FIRM AS TO WHEN HE OR SHE IS READY FOR TESTING. THE CONTRACTOR SHALL BE RESPONSIBLE FOR THE COSTS ASSOCIATED WITH RE-TESTING DUE TO FAILED ACCEPTANCE TEST.
- UPON COMPLETION OF THE STRIPPING OPERATIONS, THE EXPOSED SUBGRADE IN AREA TO RECEIVE FILL SHOULD BE PROOFROLLED WITH A LOADED DUMP TRUCK OR SIMILAR PNEUMATIC TIRED VEHICLE (MINIMUM LOADED WIGHT OF 20 TONS) UNDER THE OBSERVATION OF THE A REPRESENTATIVE OF THE GEOTECHNICAL ENGINEER.
- THE PROOFROLLING PROCEDURES SHOULD CONSIST OF COMPLETE PASSES OF THE EXPOSED AREA, WITH HALF OF THE PASSES BEING IN A DIRECTION PERPENDICULAR TO THE PRECEDING ONES. AFTER EXCAVATION OS THE SITE HAS BEEN COMPLETED, THE EXPOSED SUBGRADE IN CUT AREAS SHOULD ALSO BY PROOFROLLED AS PREVIOUSLY DESCRIBED. ANY AREA WHICH DEFLECT, RUT, OR PUMP EXCESSIVELY DURING PROOFROLLING OR FAIL TO IMPROVE SUFFICIENTLY AFTER SUCCESSIVE PASSES SHOULD BE UNDERCUT TO SUITABLE SOILS AND REPLACED WITH STRUCTURAL FILL. THE EXTENT OF THE UNDERCUT REQUIRED SHOULD BE EVALUATED IN THE FIELD BY AN EXPERIENCED REPRESENTATIVE OF THE GEOTECHNICAL ENGINEER WHILE MONITORING CONSTRUCTION ACTIVITY. THE EVALUATION SHOULD CONSIST OF A COMPREHENSIVE PROOFROLLING PROGRAM AND THOROUGH FIELD EVALUATION DURING CONSTRUCTION.
- AFTER THE PROOFROLLING OPERATION HAS BEEN COMPLETED AND APPROVED, FINAL SITE GRADING SHOULD PROCEED IMMEDIATELY. IF CONSTRUCTION PROGRESSES DURING WET WEATHER, THE PROOFROLLING OPERATION SHOULD BE REPEATED WITH AT LEAST ON PASS IN EACH DIRECTION IMMEDIATELY PRIOR TO PLACING BASE COURSE IN THE PARKING/DRIVE AREAS. IF UNSTABLE CONDITIONS AREA EXPOSED DURING THE OPERATION, THEN UNDERCUTTING SHOULD BE PERFORMED.



VILLAGE OF MARVIN
VILLAGE HALL PARK PHASE 1
PRELIMINARY CONSTRUCTION DOCUMENTS
10006 MARVIN SCHOOL ROAD
MARVIN, NORTH CAROLINA

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KEY PLAN:

SCALE:

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NO.	DATE	BY	DESCRIPTION
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DRAWN BY: BJN
APPROVED BY: BML
CHECKED BY: DJ
DATE: AUGUST 28, 2024

TITLE

GENERAL NOTES

DEI PROJECT NO: 50181675

SHEET NO.

C0.01

GROUND STABILIZATION AND MATERIALS HANDLING PRACTICES FOR COMPLIANCE WITH THE NCG01 CONSTRUCTION GENERAL PERMIT

Implementing the details and specifications on this plan sheet will result in the construction activity being considered compliant with the Ground Stabilization and Materials Handling sections of the NCG01 Construction General Permit (Sections E and F, respectively). The permittee shall comply with the Erosion and Sediment Control plan approved by the delegated authority having jurisdiction. All details and specifications shown on this sheet may not apply depending on site conditions and the delegated authority having jurisdiction.

SECTION E: GROUND STABILIZATION

Required Ground Stabilization Timeframes		
Site Area Description	Stabilize within this many calendar days after ceasing land disturbance	Timeframe variations
(a) Perimeter dikes, swales, ditches, and perimeter slopes	7	None
(b) High Quality Water (HQW) Zones	7	None
(c) Slopes steeper than 3:1	7	If slopes are 10' or less in length and are not steeper than 2:1, 14 days are allowed
(d) Slopes 3:1 to 4:1	14	-7 days for slopes greater than 50' in length and with slopes steeper than 4:1 -7 days for perimeter dikes, swales, ditches, perimeter slopes and HQW Zones -10 days for Falls Lake Watershed
(e) Areas with slopes flatter than 4:1	14	-7 days for perimeter dikes, swales, ditches, perimeter slopes and HQW Zones -10 days for Falls Lake Watershed unless there is zero slope

Note: After the permanent cessation of construction activities, any areas with temporary ground stabilization shall be converted to permanent ground stabilization as soon as practicable but in no case longer than 90 calendar days after the last land disturbing activity. Temporary ground stabilization shall be maintained in a manner to render the surface stable against accelerated erosion until permanent ground stabilization is achieved.

GROUND STABILIZATION SPECIFICATION

Stabilize the ground sufficiently so that rain will not dislodge the soil. Use one of the techniques in the table below:

Temporary Stabilization	Permanent Stabilization
<ul style="list-style-type: none"> Temporary grass seed covered with straw or other mulches and tackifiers Hydroseeding Rolled erosion control products with or without temporary grass seed Appropriately applied straw or other mulch Plastic sheeting 	<ul style="list-style-type: none"> Permanent grass seed covered with straw or other mulches and tackifiers Geotextile fabrics such as permanent soil reinforcement matting Hydroseeding Shrubs or other permanent plantings covered with mulch Uniform and evenly distributed ground cover sufficient to restrain erosion Structural methods such as concrete, asphalt or retaining walls Rolled erosion control products with grass seed

POLYACRYLAMIDES (PAMS) AND FLOCCULANTS

- Select flocculants that are appropriate for the soils being exposed during construction, selecting from the *NC DWR List of Approved PAMS/Flocculants*.
- Apply flocculants at or before the inlets to Erosion and Sediment Control Measures.
- Apply flocculants at the concentrations specified in the *NC DWR List of Approved PAMS/Flocculants* and in accordance with the manufacturer's instructions.
- Provide ponding area for containment of treated Stormwater before discharging offsite.
- Store flocculants in leak-proof containers that are kept under storm-resistant cover or surrounded by secondary containment structures.

EQUIPMENT AND VEHICLE MAINTENANCE

- Maintain vehicles and equipment to prevent discharge of fluids.
- Provide drip pans under any stored equipment.
- Identify leaks and repair as soon as feasible, or remove leaking equipment from the project.
- Collect all spent fluids, store in separate containers and properly dispose as hazardous waste (recycle when possible).
- Remove leaking vehicles and construction equipment from service until the problem has been corrected.
- Bring used fuels, lubricants, coolants, hydraulic fluids and other petroleum products to a recycling or disposal center that handles these materials.

LITTER, BUILDING MATERIAL AND LAND CLEARING WASTE

- Never bury or burn waste. Place litter and debris in approved waste containers.
- Provide a sufficient number and size of waste containers (e.g dumpster, trash receptacle) on site to contain construction and domestic wastes.
- Locate waste containers at least 50 feet away from storm drain inlets and surface waters unless no other alternatives are reasonably available.
- Locate waste containers on areas that do not receive substantial amounts of runoff from upland areas and does not drain directly to a storm drain, stream or wetland.
- Cover waste containers at the end of each workday and before storm events or provide secondary containment. Repair or replace damaged waste containers.
- Anchor all lightweight items in waste containers during times of high winds.
- Empty waste containers as needed to prevent overflow. Clean up immediately if containers overflow.
- Dispose waste off-site at an approved disposal facility.
- On business days, clean up and dispose of waste in designated waste containers.

PAINT AND OTHER LIQUID WASTE

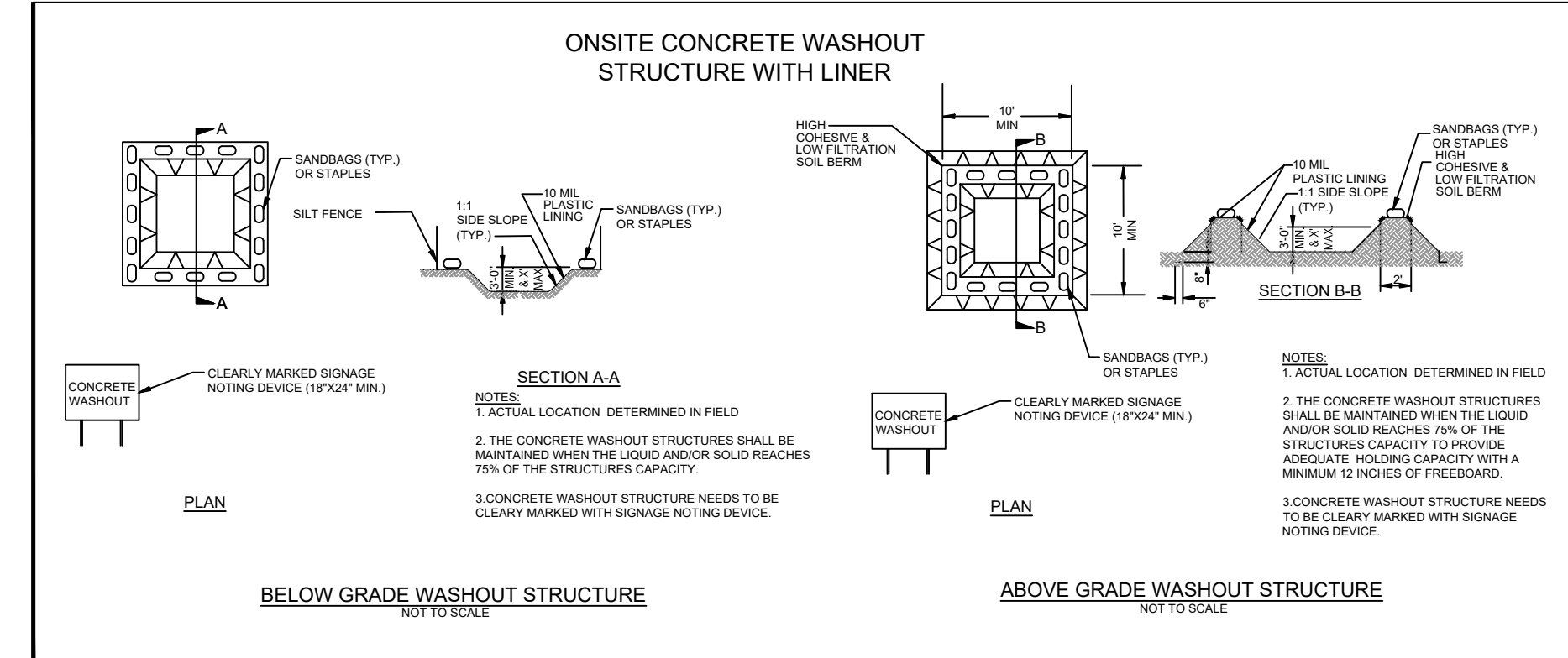
- Do not dump paint and other liquid waste into storm drains, streams or wetlands.
- Locate paint washouts at least 50 feet away from storm drain inlets and surface waters unless no other alternatives are reasonably available.
- Contain liquid wastes in a controlled area.
- Containment must be labeled, sized and placed appropriately for the needs of site.
- Prevent the discharge of soaps, solvents, detergents and other liquid wastes from construction sites.

PORTABLE TOILETS

- Install portable toilets on level ground, at least 50 feet away from storm drains, streams or wetlands unless there is no alternative reasonably available. If 50 foot offset is not attainable, provide relocation of portable toilet behind silt fence or place on a gravel pad and surround with sand bags.
- Provide staking or anchoring of portable toilets during periods of high winds or in high foot traffic areas.
- Monitor portable toilets for leaking and properly dispose of any leaked material. Utilize a licensed sanitary waste hauler to remove leaking portable toilets and replace with properly operating unit.

EARTHEN STOCKPILE MANAGEMENT

- Show stockpile locations on plans. Locate earthen-material stockpile areas at least 50 feet away from storm drain inlets, sediment basins, perimeter sediment controls and surface waters unless it can be shown no other alternatives are reasonably available.
- Protect stockpile with silt fence installed along toe of slope with a minimum offset of five feet from the toe of stockpile.
- Provide stable stone access point when feasible.
- Stabilize stockpile within the timeframes provided on this sheet and in accordance with the approved plan and any additional requirements. Soil stabilization is defined as vegetative, physical or chemical coverage techniques that will restrain accelerated erosion on disturbed soils for temporary or permanent control needs.



CONCRETE WASHOUTS

- Do not discharge concrete or cement slurry from the site.
- Dispose of, or recycle settled, hardened concrete residue in accordance with local and state solid waste regulations and at an approved facility.
- Manage washout from mortar mixers in accordance with the above item and in addition place the mixer and associated materials on impervious barrier and within lot perimeter silt fence.
- Install temporary concrete washouts per local requirements, where applicable. If an alternate method or product is to be used, contact your approval authority for review and approval. If local standard details are not available, use one of the two types of temporary concrete washouts provided on this detail.
- Do not use concrete washouts for dewatering or storing defective curb or sidewalk sections. Stormwater accumulated within the washout may not be pumped into or discharged to the storm drain system or receiving surface waters. Liquid waste must be pumped out and removed from project.
- Locate washouts at least 50 feet from storm drain inlets and surface waters unless it can be shown that no other alternatives are reasonably available. At a minimum, install protection of storm drain inlet(s) closest to the washout which could receive spills or overflow.
- Locate washouts in an easily accessible area, on level ground and install a stone entrance pad in front of the washout. Additional controls may be required by the approving authority.
- Install at least one sign directing concrete trucks to the washout within the project limits. Post signage on the washout itself to identify this location.
- Remove leavings from the washout when at approximately 75% capacity to limit overflow events. Replace the tarp, sand bags or other temporary structural components when no longer functional. When utilizing alternative or proprietary products, follow manufacturer's instructions.
- At the completion of the concrete work, remove remaining leavings and dispose of in an approved disposal facility. Fill pit, if applicable, and stabilize any disturbance caused by removal of washout.

HERBICIDES, PESTICIDES AND RODENTICIDES

- Store and apply herbicides, pesticides and rodenticides in accordance with label restrictions.
- Store herbicides, pesticides and rodenticides in their original containers with the label, which lists directions for use, ingredients and first aid steps in case of accidental poisoning.
- Do not store herbicides, pesticides and rodenticides in areas where flooding is possible or where they may spill or leak into wells, stormwater drains, ground water or surface water. If a spill occurs, clean area immediately.
- Do not stockpile these materials onsite.

HAZARDOUS AND TOXIC WASTE

- Create designated hazardous waste collection areas on-site.
- Place hazardous waste containers under cover or in secondary containment.
- Do not store hazardous chemicals, drums or bagged materials directly on the ground.

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DRAWN BY: BJN
 APPROVED BY: BML
 CHECKED BY: DJ
 DATE: AUGUST 28, 2024

TITLE

NCG01 NOTES (1 OF 2)

DEI PROJECT NO: 50181675

SHEET NO.

C0.03



Dewberry Engineers Inc. 8500 Harris Corners Pkwy - Suite 220 Charlotte, NC 28269 Phone: 704.509.9918 Fax: 704.509.9937 www.dewberry.com NCBELS #F-0829 NCBOLA #C-478

VILLAGE OF MARVIN VILLAGE HALL PARK PHASE 1 PRELIMINARY CONSTRUCTION DOCUMENTS 10006 MARVIN SCHOOL ROAD MARVIN, NORTH CAROLINA

SEAL PRELIMINARY NOT RELEASED FOR CONSTRUCTION

KEY PLAN:

SCALE:

Table with 4 columns: NO., DATE, BY, DESCRIPTION. Includes a revision entry for 11/08/24 by BML for 30% REVIEW SET.

DRAWN BY: BJN APPROVED BY: BML CHECKED BY: DJ DATE: AUGUST 28, 2024

TITLE

NCG01 NOTES (2 OF 2)

DEI PROJECT NO: 50181675

SHEET NO.

C0.04

PART III SELF-INSPECTION, RECORDKEEPING AND REPORTING

SECTION A: SELF-INSPECTION

Self-inspections are required during normal business hours in accordance with the table below. When adverse weather or site conditions would cause the safety of the inspection personnel to be in jeopardy, the inspection may be delayed until the next business day on which it is safe to perform the inspection.

Table with 3 columns: Inspect, Frequency (during normal business hours), Inspection records must include: (1) Rain gauge, (2) E&SC Measures, (3) Stormwater outfalls, (4) Perimeter of site, (5) Streams or wetlands, (6) Ground stabilization measures.

NOTE: The rain inspection resets the required 7 calendar day inspection requirement.

PART III SELF-INSPECTION, RECORDKEEPING AND REPORTING

SECTION B: RECORDKEEPING

1. E&SC Plan Documentation

The approved E&SC plan as well as any approved deviation shall be kept on the site. The approved E&SC plan must be kept up-to-date throughout the coverage under this permit.

Table with 2 columns: Item to Document, Documentation Requirements. Includes items (a) through (e) regarding E&SC measures, grading, ground cover, maintenance, and corrective actions.

2. Additional Documentation to be Kept on Site

In addition to the E&SC plan documents above, the following items shall be kept on the site and available for inspectors at all times during normal business hours, unless the Division provides a site-specific exemption based on unique site conditions that make this requirement not practical:

- (a) This General Permit as well as the Certificate of Coverage, after it is received. (b) Records of inspections made during the previous twelve months.

3. Documentation to be Retained for Three Years

All data used to complete the e-NOI and all inspection records shall be maintained for a period of three years after project completion and made available upon request. [40 CFR 122.41]

PART III SELF-INSPECTION, RECORDKEEPING AND REPORTING

SECTION C: REPORTING

1. Occurrences that Must be Reported

- (a) Visible sediment deposition in a stream or wetland. (b) Oil spills if: They are 25 gallons or more, They are less than 25 gallons but cannot be cleaned up within 24 hours, They cause sheen on surface waters, They are within 100 feet of surface waters. (c) Releases of hazardous substances in excess of reportable quantities. (d) Anticipated bypasses and unanticipated bypasses. (e) Noncompliance with the conditions of this permit that may endanger health or the environment.

2. Reporting Timeframes and Other Requirements

After a permittee becomes aware of an occurrence that must be reported, he shall contact the appropriate Division regional office within the timeframes and in accordance with the other requirements listed below.

Table with 2 columns: Occurrence, Reporting Timeframes (After Discovery) and Other Requirements. Includes items (a) through (e) regarding sediment, oil spills, bypasses, and noncompliance.

PART II, SECTION G, ITEM (4) DRAW DOWN OF SEDIMENT BASINS FOR MAINTENANCE OR CLOSE OUT

Sediment basins and traps that receive runoff from drainage areas of one acre or more shall use outlet structures that withdraw water from the surface when these devices need to be drawn down for maintenance or close out unless this is infeasible.

- (a) The E&SC plan authority has been provided with documentation of the non-surface withdrawal and the specific time periods or conditions in which it will occur. (b) The non-surface withdrawal has been reported as an anticipated bypass in accordance with Part III, Section C, Item (2)(c) and (d) of this permit. (c) Dewatering discharges are treated with controls to minimize discharges of pollutants from stormwater that is removed from the sediment basin. (d) Vegetated, upland areas of the sites or a properly designed stone pad is used to the extent feasible at the outlet of the dewatering treatment devices described in Item (c) above. (e) Velocity dissipation devices such as check dams, sediment traps, and riprap are provided at the discharge points of all dewatering devices, and (f) Sediment removed from the dewatering treatment devices described in Item (c) above is disposed of in a manner that does not cause deposition of sediment into waters of the United States.

NCG01 SELF-INSPECTION, RECORDKEEPING AND REPORTING

EFFECTIVE: 04/01/19



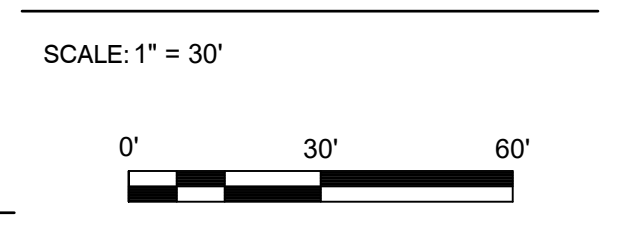
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VILLAGE OF MARVIN
VILLAGE HALL PARK PHASE 1
PRELIMINARY CONSTRUCTION DOCUMENTS
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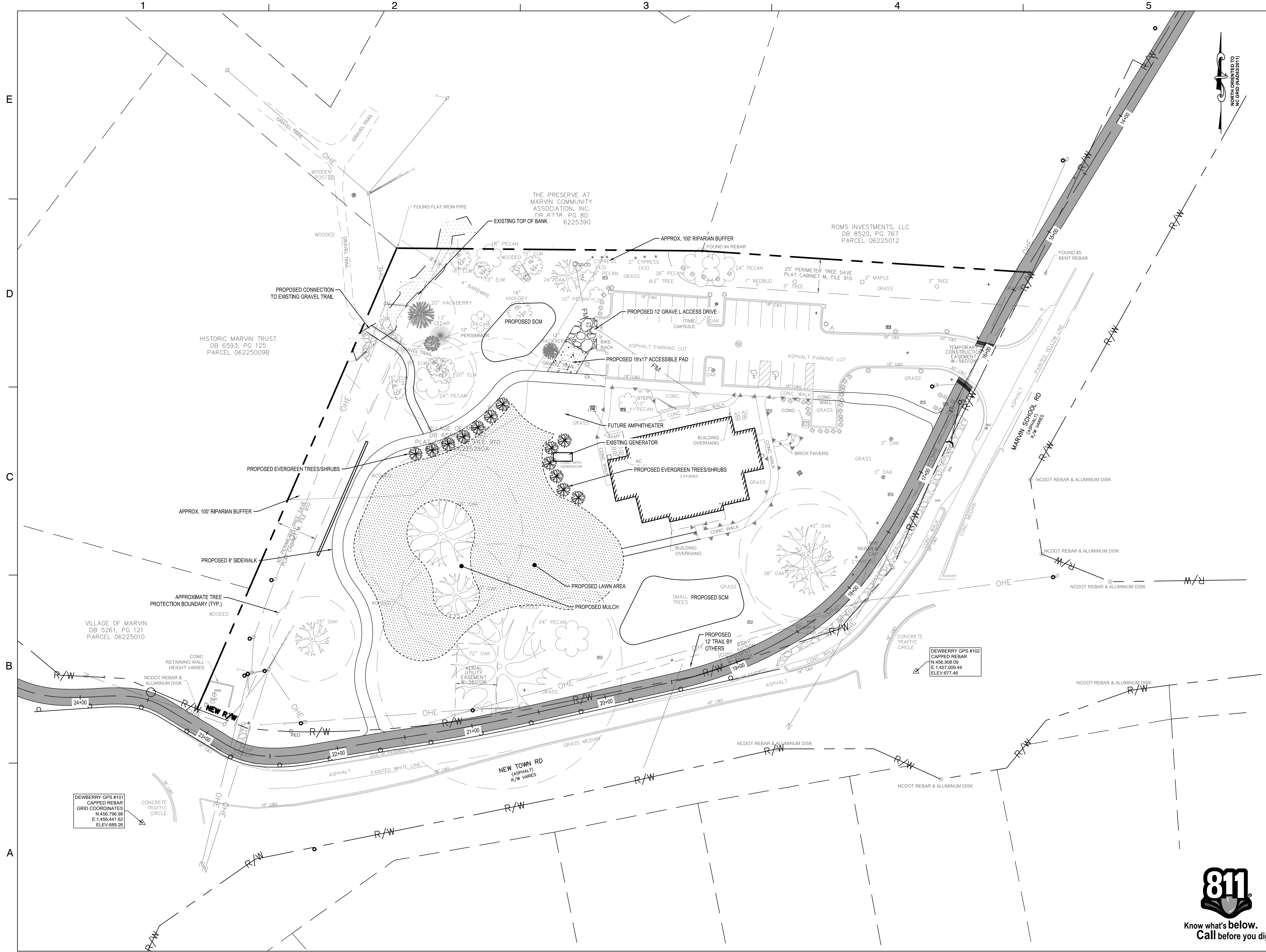
DEMOLITION AND
ESC PH I PLAN

DEI PROJECT NO: 50181675

SHEET NO.

C1.01





**VILLAGE OF MARVIN
 VILLAGE HALL PARK PHASE 1**
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KEY PLAN:

SCALE: 1" = 30'

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SITE PLAN

DEI PROJECT NO: 50181675
 SHEET NO.

C2.01



DEWBERRY GPS #101
 CAPPED REBAR
 GRID COORDINATES
 N:456,796.98
 E:1,456,441.52
 ELEV:699.28

DEWBERRY GPS #102
 CAPPED REBAR
 N:456,908.09
 E:1,457,009.44
 ELEV:677.46



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 TITLE:

ESC PH II PLAN

DEI PROJECT NO: 50181675

SHEET NO.

C4.01



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ESC DETAILS

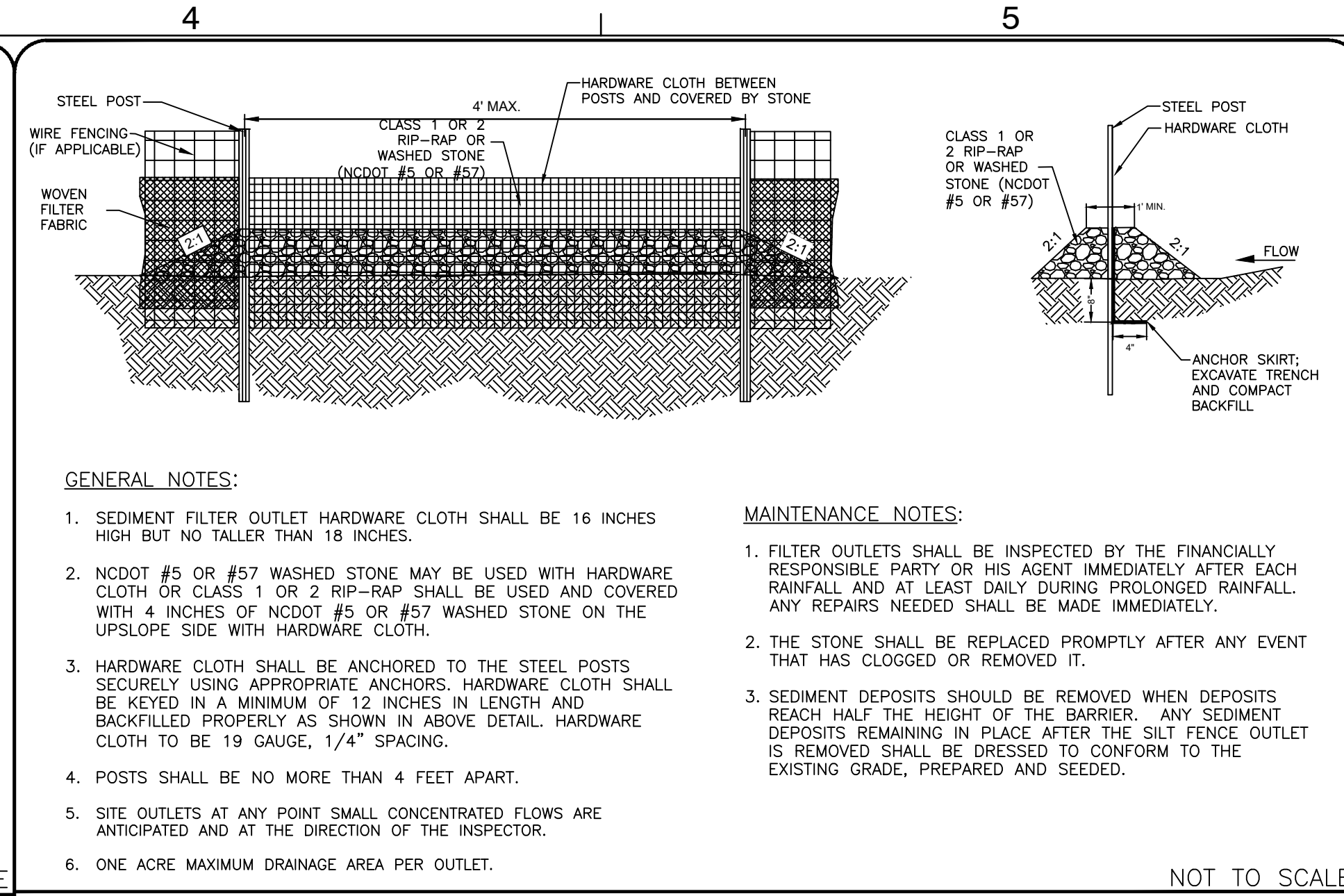
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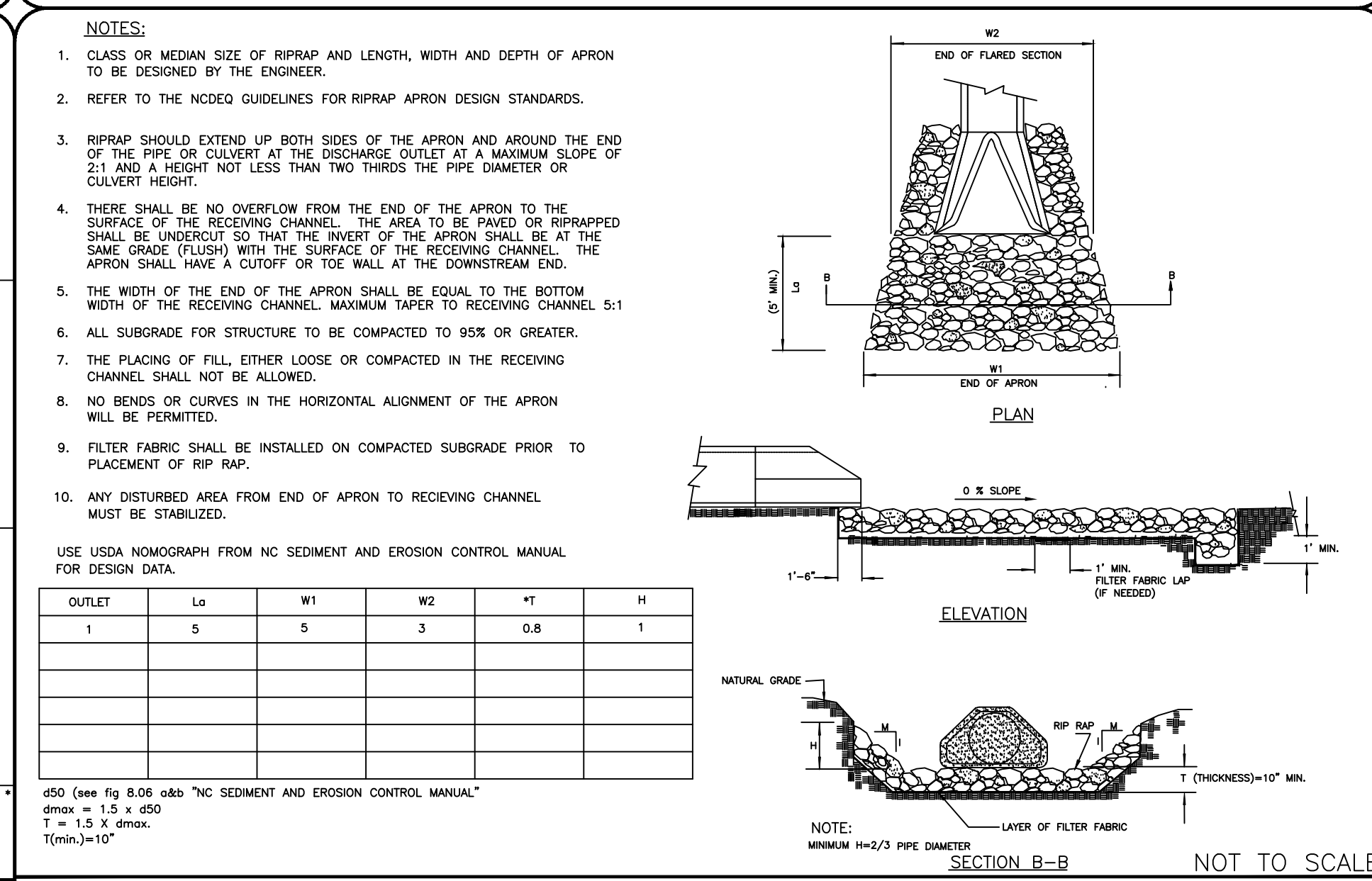
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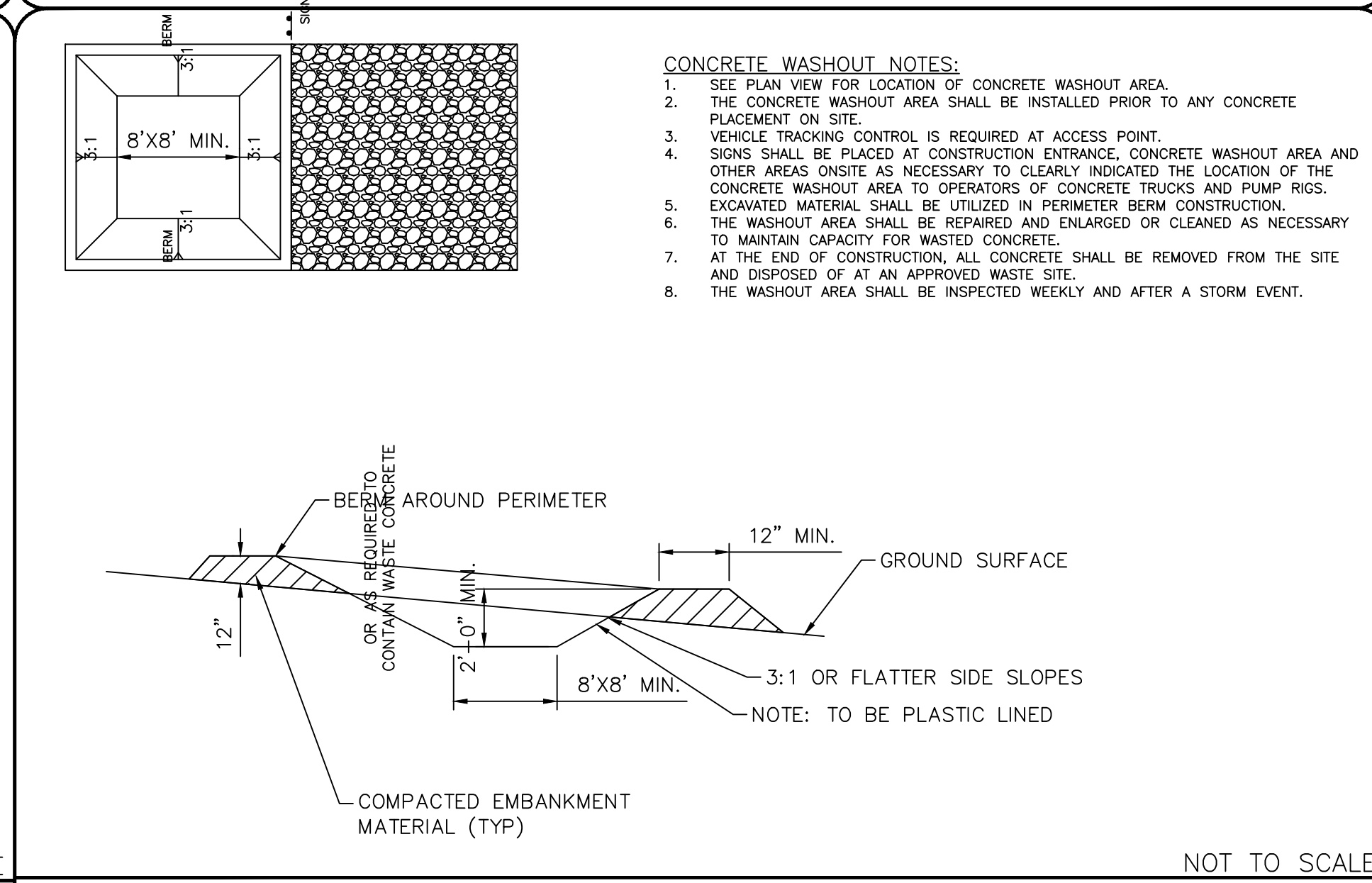
Know what's below.
 Call before you dig.



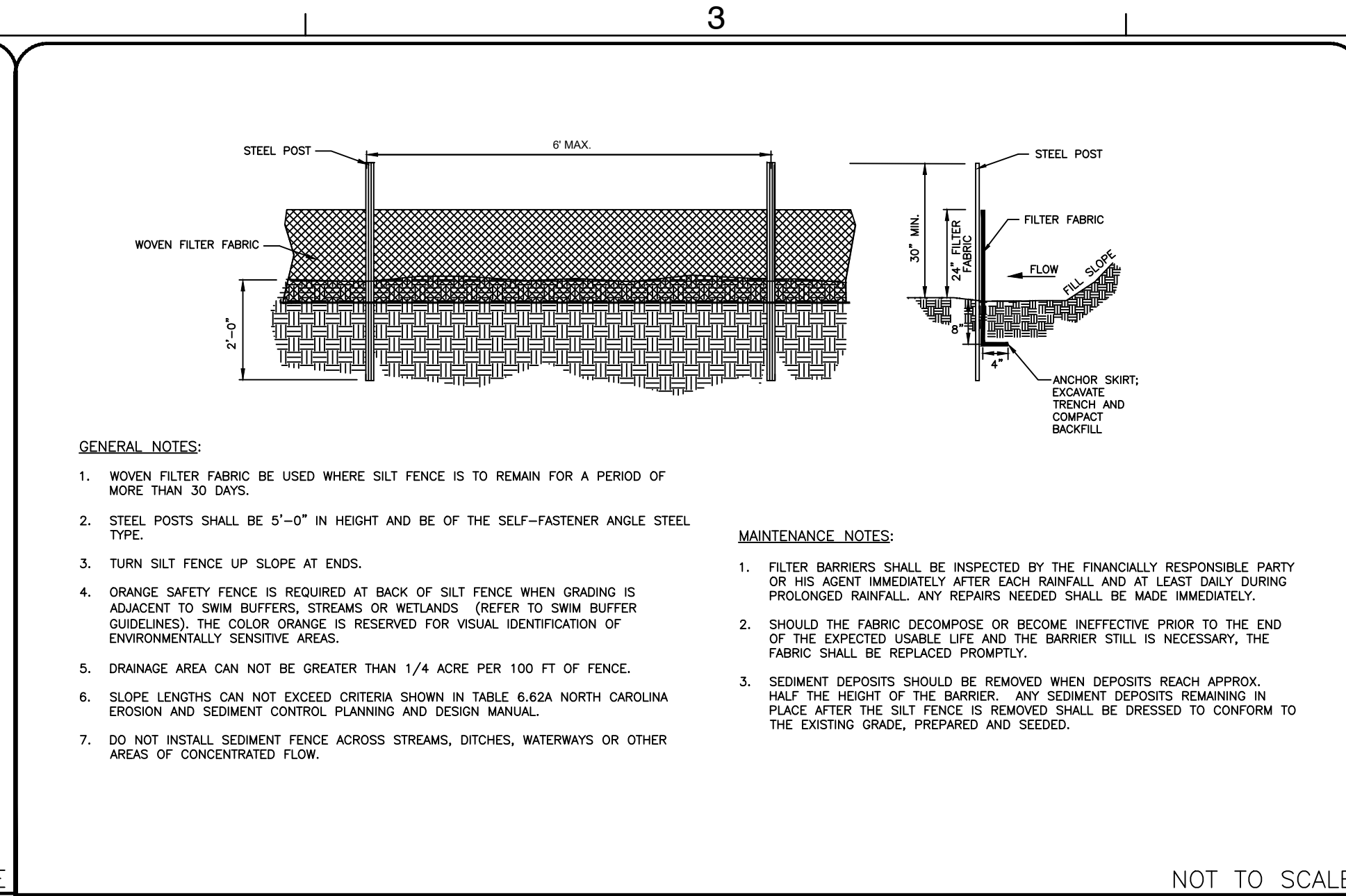
SILT FENCE OUTLET NOT TO SCALE



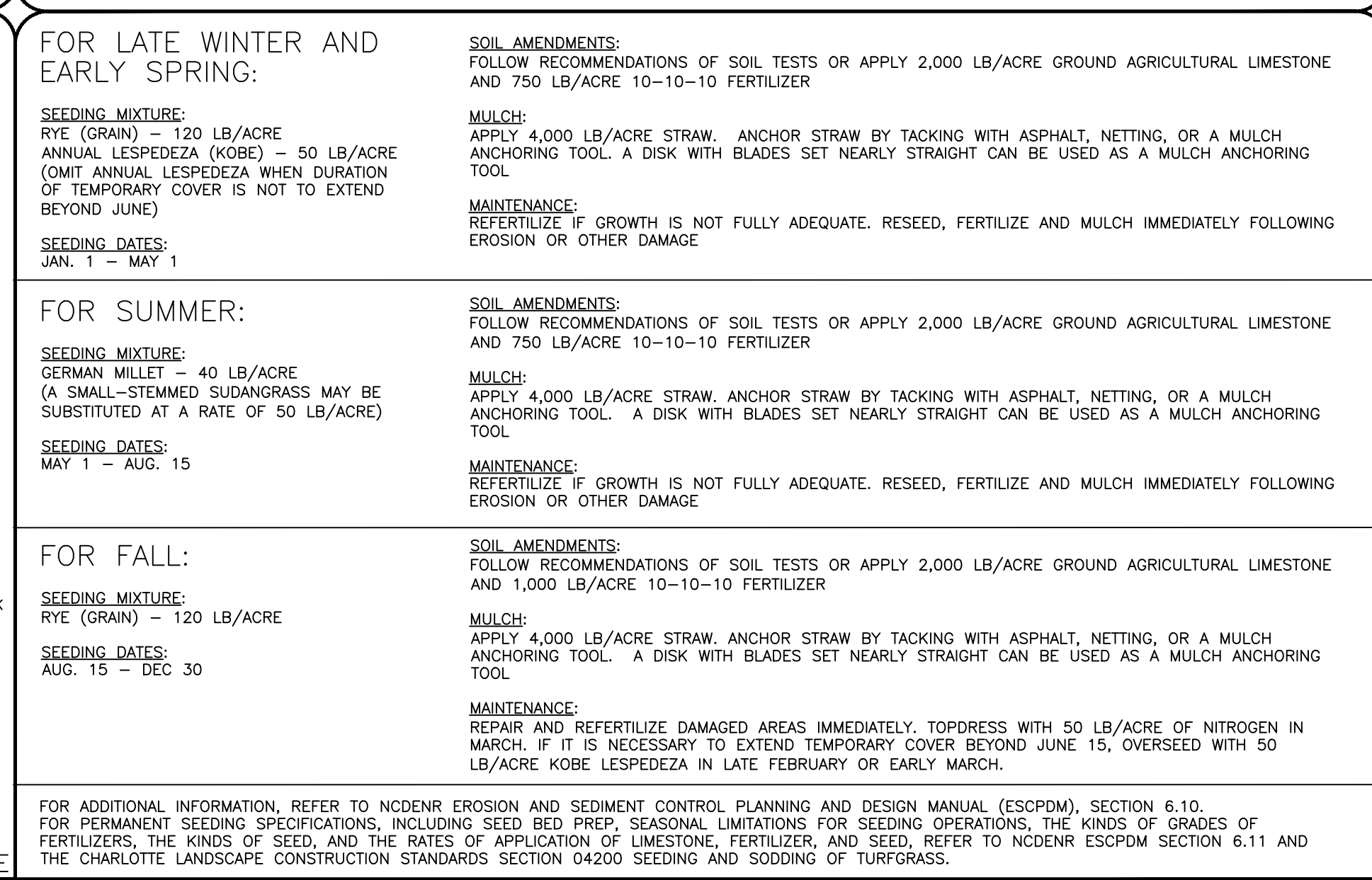
RIPRAP APRON AT PIPE OUTFALLS OTHER THAN AT SWIM NOT TO SCALE



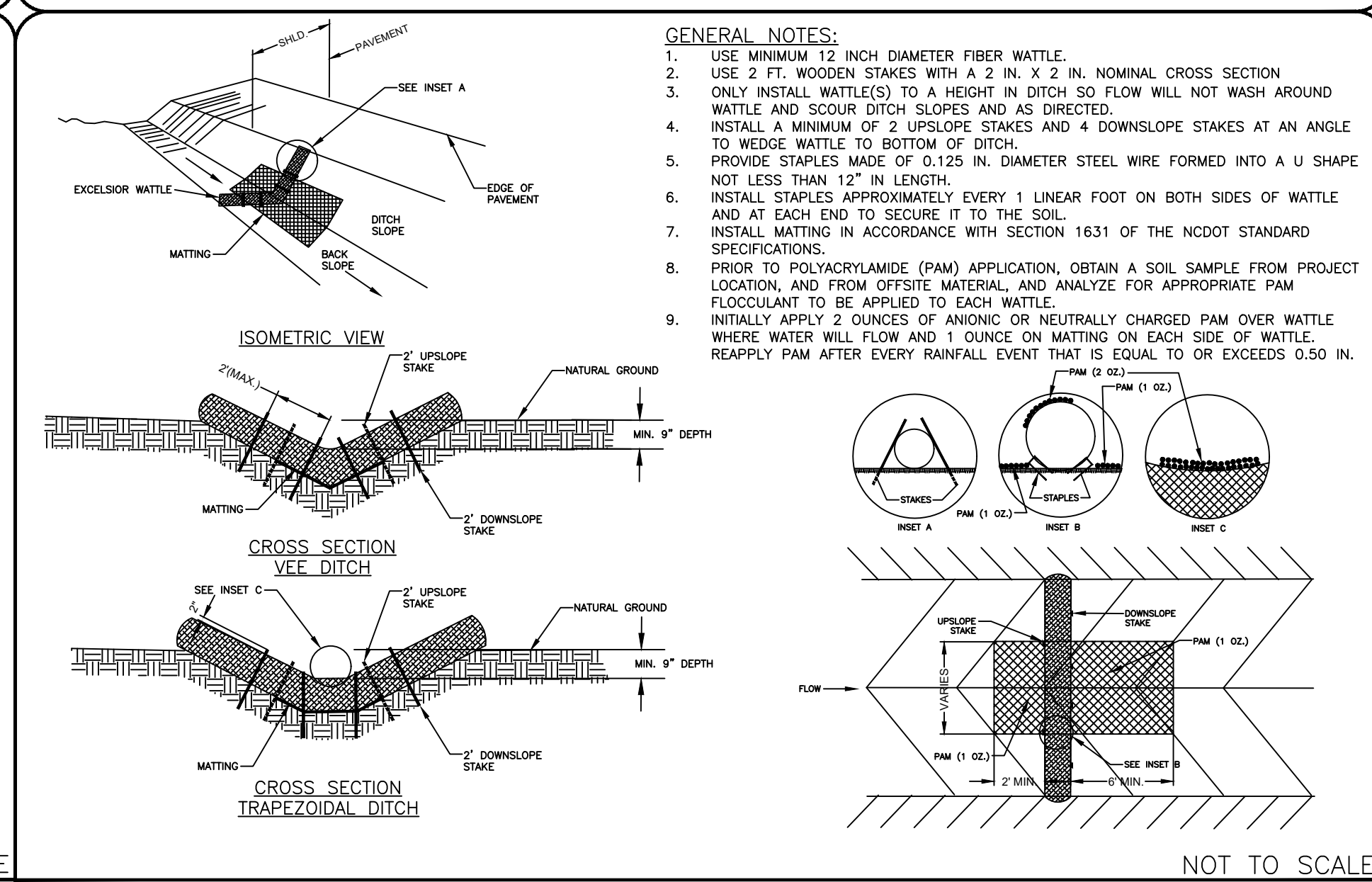
CONCRETE WASHOUT NOT TO SCALE



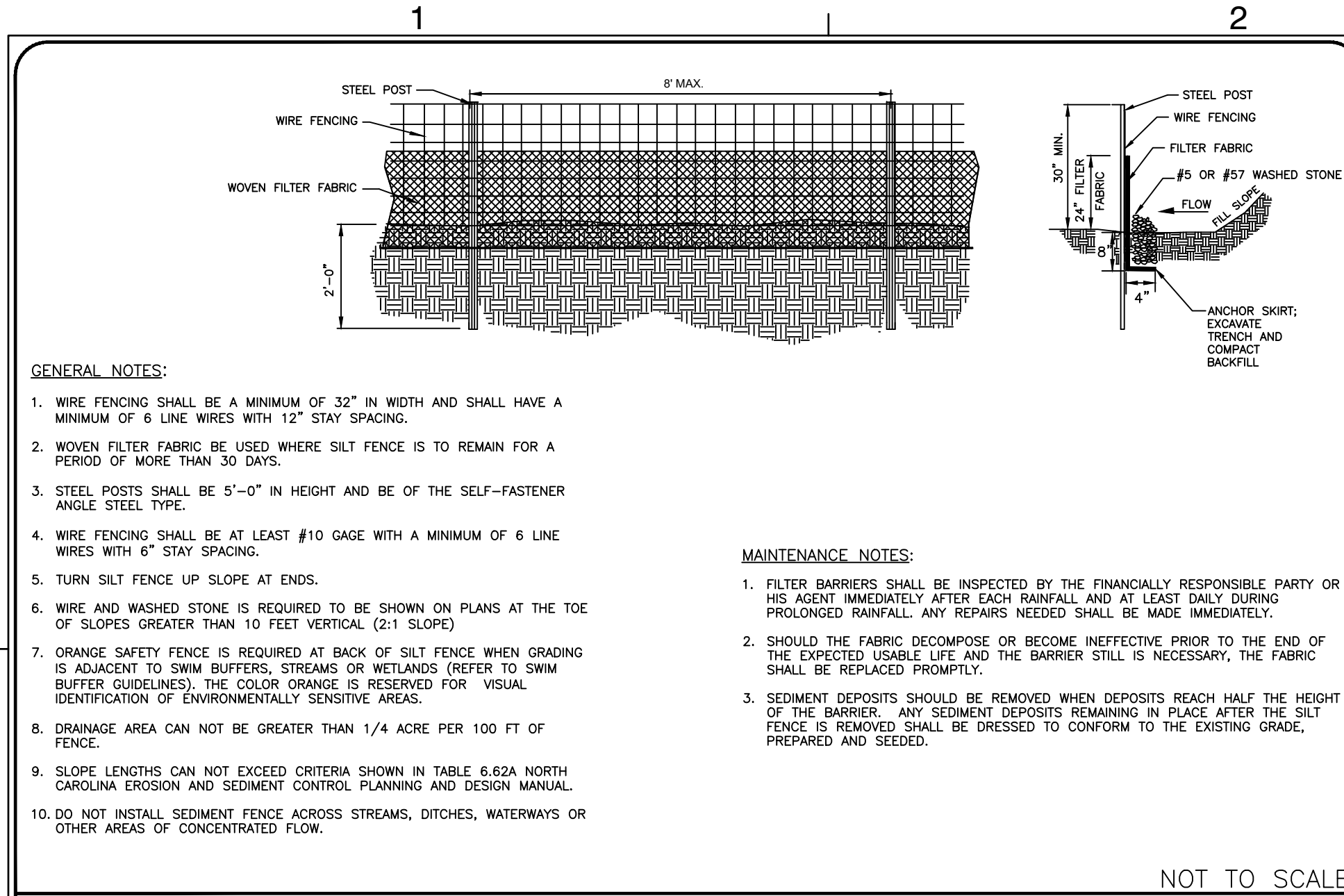
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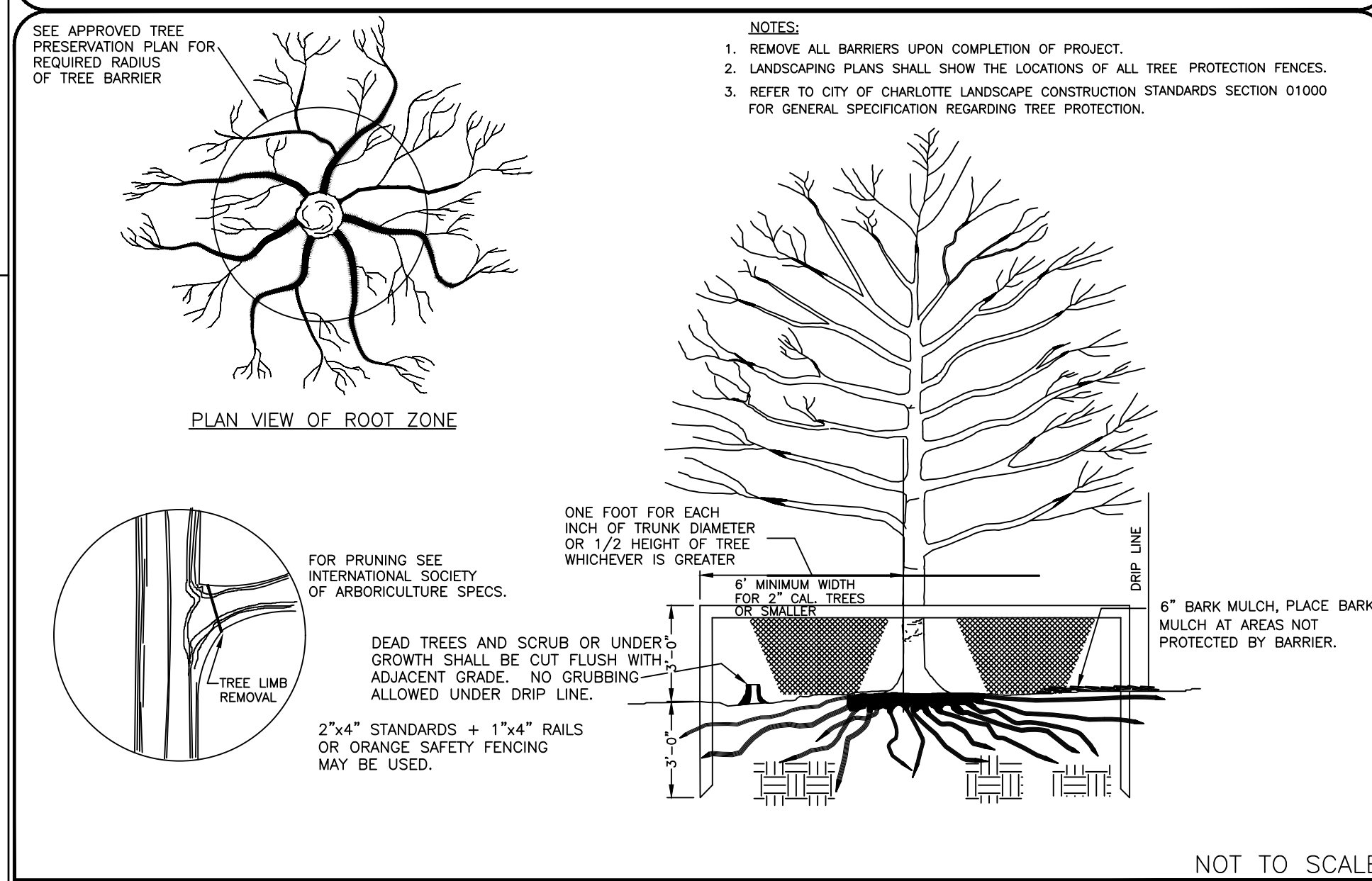
TEMPORARY SEEDING SCHEDULE NOT TO SCALE



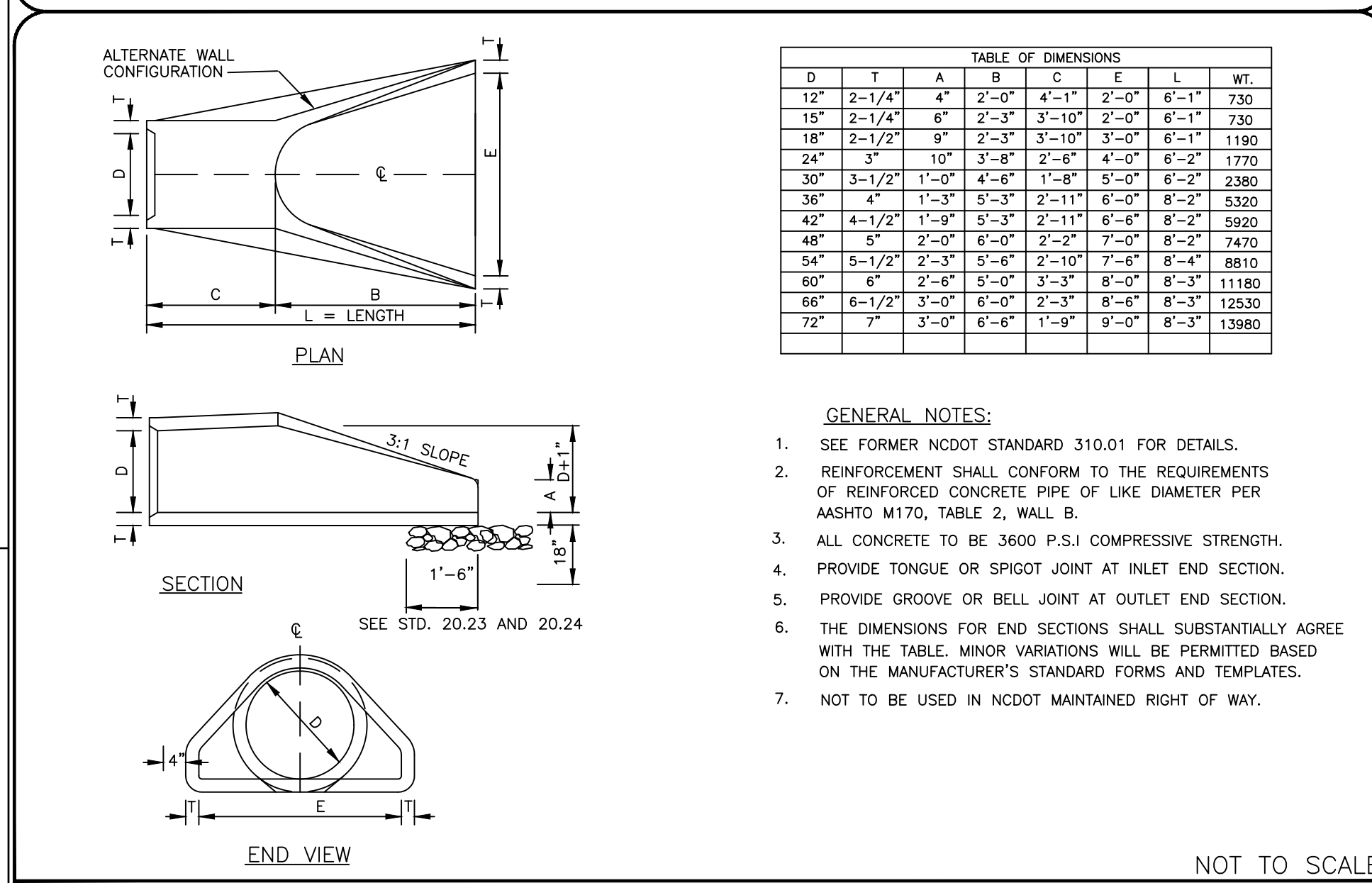
TEMPORARY WATTLE CHECK DAM WITH MATTING AND OPTIONAL PAM NOT TO SCALE



HIGH HAZARD TEMPORARY SILT FENCE NOT TO SCALE



TEMPORARY TREE PROTECTION FENCING NOT TO SCALE



FLARED END SECTION 12" THRU 72" PIPE NOT TO SCALE

1

2

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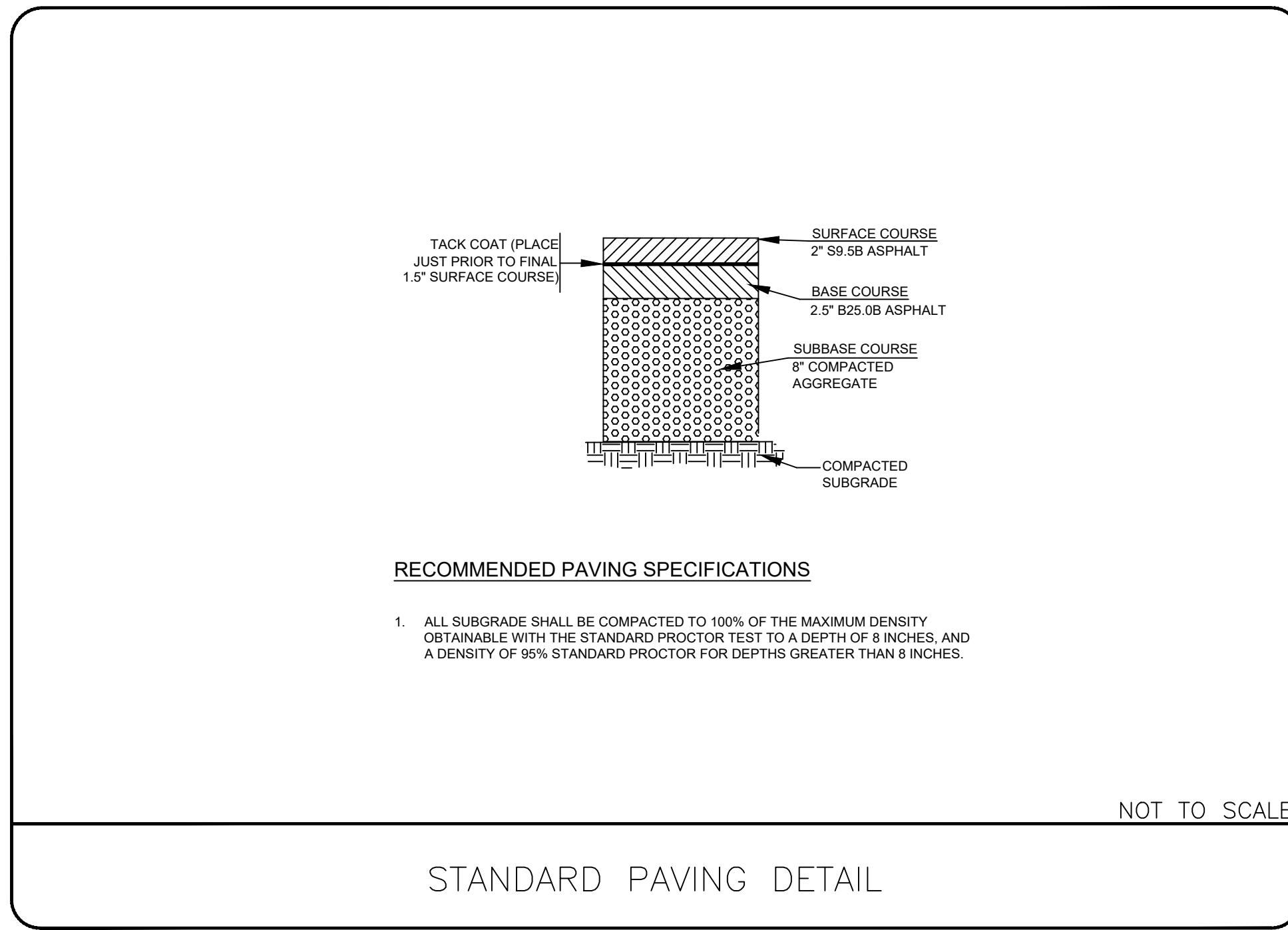
A



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VILLAGE OF MARVIN
 VILLAGE HALL PARK PHASE 1

PRELIMINARY CONSTRUCTION DOCUMENTS
 10006 MARVIN SCHOOL ROAD
 MARVIN, NORTH CAROLINA



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 CONSTRUCTION

KEY PLAN:

SCALE:

REVISIONS

NO.	DATE	BY	DESCRIPTION
1	11/08/24	BML	30% REVIEW SET

DRAWN BY: BJN
 APPROVED BY: BML
 CHECKED BY: DJ
 DATE: AUGUST 28, 2024

TITLE

SITE DETAILS

DEI PROJECT NO: 50181675

SHEET NO.

C6.02



FLEXIBLE PIPE

Diameter (inches)	Minimum cover (inches)	Maximum Height of Cover (feet)				
		18	14	12	10	8
12	12	204	256	12	10	8
15	12	182	204			
18	12	135	169	239		
21	12	118	145	204		
24	12	100	126	178		
30	12	79	100	142		
36	12	65	83	117	152	
42	12	55	70	100	130	160
48	12	48	61	87	113	139
54	12	42	54	77	100	123
60	12	37	48	69	90	111
66	12	32	42	61	81	100
72	12	28	37	54	74	91
78	12	24	32	48	66	81
84	12	21	28	42	59	69

Diameter (inches)	Minimum cover (inches)	Maximum Height of Cover (feet)				
		18	14	12	10	8
12	12	123	155	218	281	344
15	12	98	123	174	224	275
18	12	81	102	144	187	228
21	12	69	87	123	160	195
24	12	60	76	108	139	171
27	12	52	67	95	123	151
30	12	46	60	85	111	136
36	12	40	50	71	92	113
42	12	35	44	61	78	96
48	12	31	38	52	68	84
54	12	27	33	46	59	74
60	12	24	30	41	52	62
66	12	21	27	36	46	55
72	12	19	24	32	41	49

HDPE - * (Minimum fill) 2' for pipe diameters ≤ 12" and ≤ 60"
 * (Maximum fill) 20' for pipe diameters ≤ 24"
 17' for pipe diameters ≥ 30" and ≤ 60"

PVC - * (Minimum fill) 2' for pipe diameters ≤ 12" and ≤ 36"
 * (Maximum fill) 30' for pipe diameters ≥ 12" and ≤ 36"

* FILL HEIGHT IS MEASURED FROM THE TOP OF THE PIPE TO THE BOTTOM OF THE PAVEMENT STRUCTURE

RIGID PIPE

RCP - * (Minimum fill) 1' for Class IV & CLASS V
 2' for Class III & Class II

* (Maximum fill) 10' - Class II pipe
 20' - Class III pipe
 30' - Class IV pipe
 40' - Class V pipe

(For fills > 40' & < 80' use LRFD Direct Design Method)

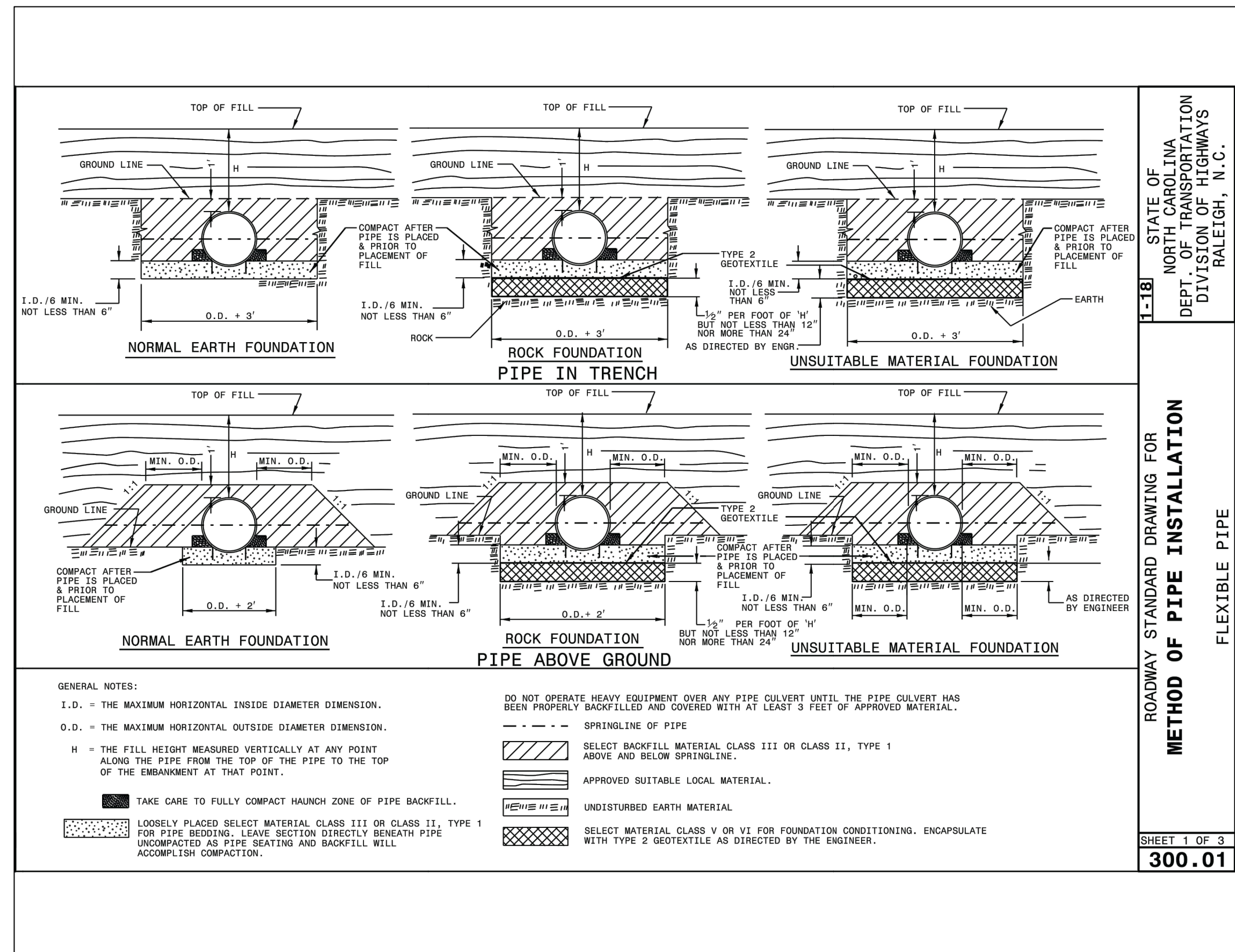
* FILL HEIGHT IS MEASURED FROM THE TOP OF THE PIPE TO THE BOTTOM OF THE PAVEMENT STRUCTURE

REFER TO THE FOLLOWING FOR PIPE SPECIFICATIONS
 CSP - AASHTO M35
 CAAP - AASHTO M196
 HDPE - AASHTO M294
 PVC - ASTM F949 or AASHTO M304

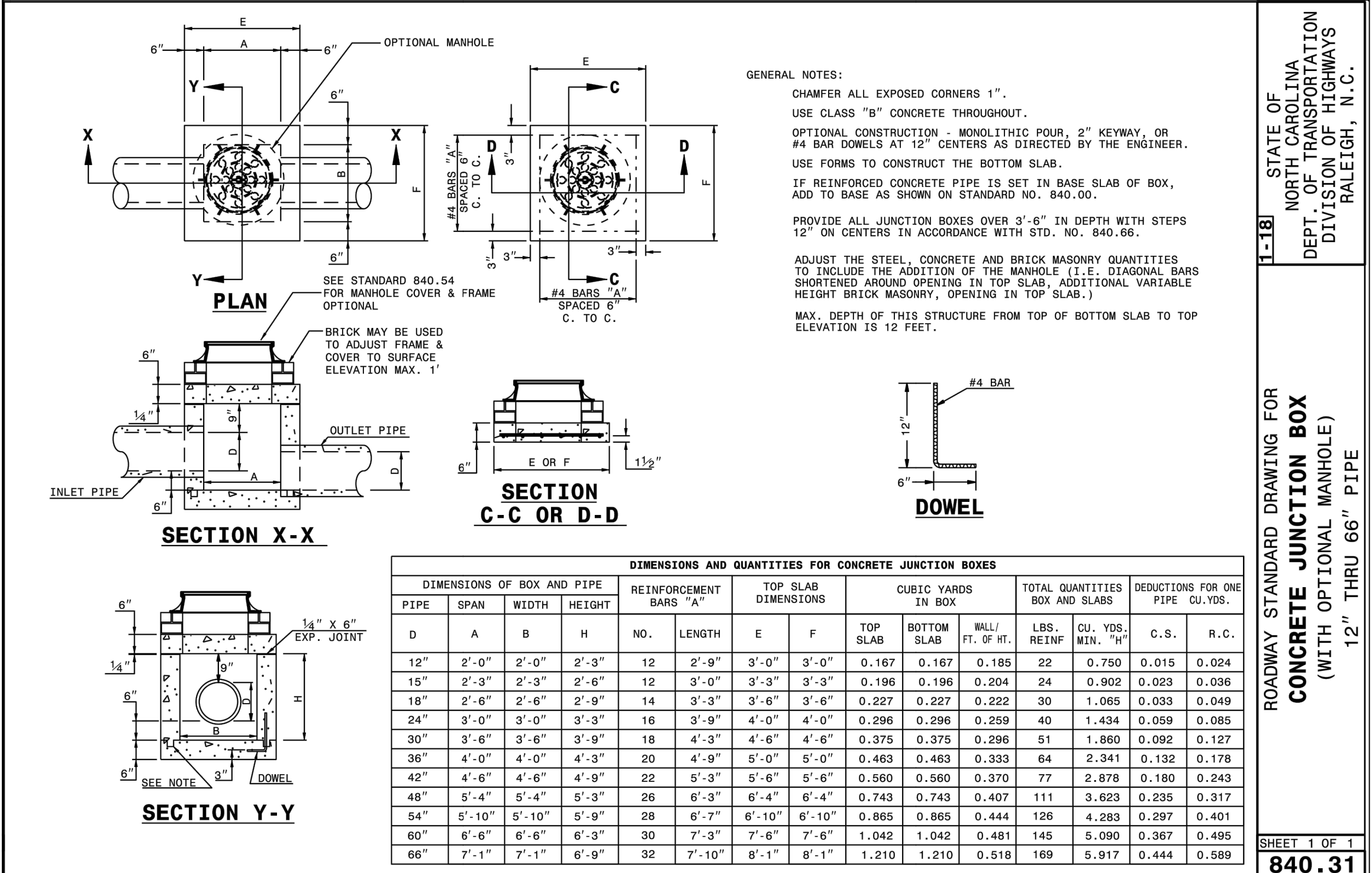
NOTES: FILL HEIGHTS SHOWN WERE CALCULATED USING AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS
 1' MINIMUM COVER FOR ALL SIDE DRAIN PIPE IN ACCORDANCE WITH THE STANDARD SPECIFICATIONS

NOTES: FILL HEIGHTS SHOWN WERE CALCULATED USING AASHTO LRFD BRIDGE DESIGN SPECIFICATIONS
 1' MINIMUM COVER FOR ALL SIDE DRAIN PIPE IN ACCORDANCE WITH THE STANDARD SPECIFICATIONS

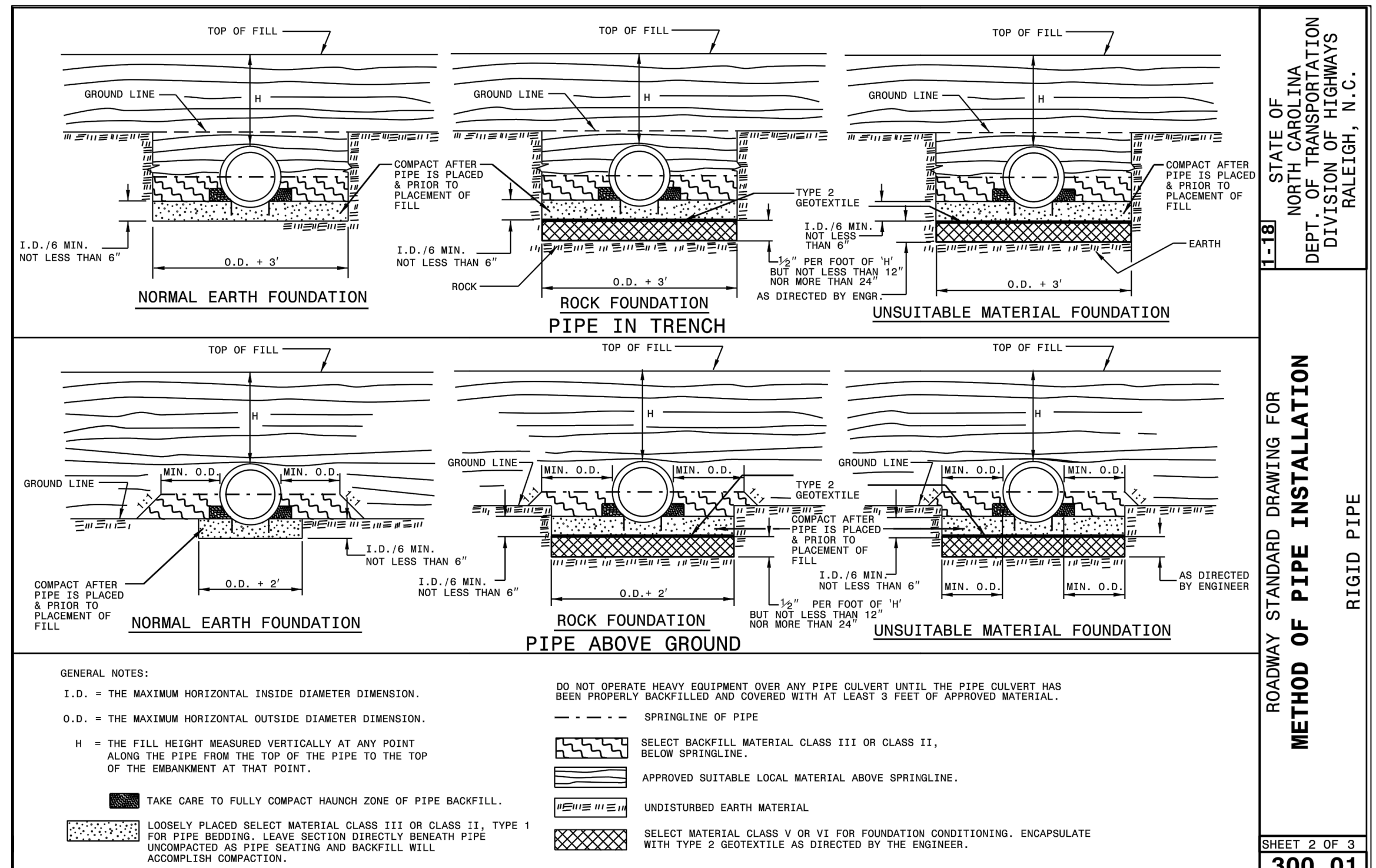
STATE OF NORTH CAROLINA DEPT. OF TRANSPORTATION DIVISION OF HIGHWAYS RALEIGH, N.C.
 ROADWAY STANDARD DRAWING FOR METHOD OF PIPE INSTALLATION
 FILL HEIGHT TABLES
 SHEET 3 OF 3
 300.01



STATE OF NORTH CAROLINA DEPT. OF TRANSPORTATION DIVISION OF HIGHWAYS RALEIGH, N.C.
 ROADWAY STANDARD DRAWING FOR METHOD OF PIPE INSTALLATION
 FLEXIBLE PIPE
 SHEET 1 OF 3
 300.01



STATE OF NORTH CAROLINA DEPT. OF TRANSPORTATION DIVISION OF HIGHWAYS RALEIGH, N.C.
 ROADWAY STANDARD DRAWING FOR CONCRETE JUNCTION BOX (WITH OPTIONAL MANHOLE) 12" THRU 66" PIPE
 SHEET 1 OF 1
 840.31



STATE OF NORTH CAROLINA DEPT. OF TRANSPORTATION DIVISION OF HIGHWAYS RALEIGH, N.C.
 ROADWAY STANDARD DRAWING FOR METHOD OF PIPE INSTALLATION
 RIGID PIPE
 SHEET 2 OF 3
 300.01

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 MARVIN, NORTH CAROLINA

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KEY PLAN:

SCALE:

NO.	DATE	BY	DESCRIPTION

DRAWN BY: BJN
 APPROVED BY: BML
 CHECKED BY: DJ
 DATE: AUGUST 28, 2024

TITLE: **STORMWATER DETAILS**
 DEI PROJECT NO: 50181675
 SHEET NO: **C6.03**





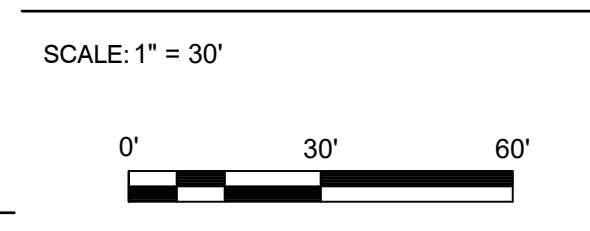
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REVISIONS

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TITLE

**LANDSCAPING
 PLAN**

DEI PROJECT NO: 50181675

SHEET NO.

L1.01

