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CORNERSTONE CHURCH

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88

[illegible]

TOWN OF BLUFFTON PRELIMINARY DRC NO.: TBD



I HAVE PLACED MY SIGNATURE AND SEAL ON THE DESIGN DOCUMENTS SUBMITTED SIGNIFYING THAT I ACCEPT RESPONSIBILITY FOR THE DESIGN OF THE SYSTEM. FURTHER, I CERTIFY TO THE BEST OF MY KNOWLEDGE AND BELIEF THAT THE DESIGN IS CONSISTENT WITH THE REQUIREMENTS OF TITLE 48, CHAPTER 14 OF THE CODE OF LAWS OF SC, 1976 AS AMENDED, PURSUANT TO REGULATION 72-300 ET SEQ. (IF APPLICABLE), AND IN ACCORDANCE WITH THE TERMS AND CONDITIONS OF SCR100000.

CORNERSTONE CHURCH NEW RIVERSIDE CAMPUS

11 GRASSEY LANE
BLUFFTON, BEAUFORT COUNTY, SC 29910
PARCEL ID: R610 036 000 0014 0000

EXISTING LAND USE: COMMERCIAL EQUESTRIAN
PROPOSED LAND USE: ASSEMBLY AND WORSHIP (LARGE)

HORIZONTAL DATUM IS BASED OFF
STATE PLANE COORDINATES NAD83.
VERTICAL DATUM IS NAVD88.

LATITUDE: 32° 14' 03" N
LONGITUDE: -80° 58' 46" W

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Sheet List Table	
Sheet No.	Sheet Title
1	TITLE SHEET
2	GENERAL NOTES & LEGEND
3	EXISTING CONDITIONS
4	SHEET INDEX
5	DEMO & SWPP PLAN
6	DEMO & SWPP PLAN
7	DEMO & SWPP PLAN
8	SWPPP DETAILS
9	SWPPP DETAILS
10	SWPPP DETAILS
11	SITE IMPROVEMENTS OVERVIEW
12	SITE IMPROVEMENTS
13	SITE IMPROVEMENTS
14	SITE IMPROVEMENTS
15	SITE IMPROVEMENTS
16	UTILITY PLAN
17	STORMWATER COMPLIANCE PLAN
18	CIVIL DETAILS
19	CIVIL DETAILS
20	CIVIL DETAILS
21	CIVIL DETAILS
22	UTILITY DETAILS

ABBREVIATIONS LIST		
ABBREVIATIONS		DESCRIPTIONS
A		
ABBR	ABBREVIATION	
ABV	ABOVE	
AC	ACRE	
AFF	ABOVE FINISHED FLOOR	
APPROX	APPROXIMATE	
ASTM	AMERICAN SOCIETY FOR TESTING AND MATERIALS	
AWG	AMERICAN WIRE GAUGE	
AWS	AMERICAN WELDING SOCIETY	
AWWA	AMERICAN WATER WORKS ASSOCIATION	
B		
BC	BEGIN CURVE	
BIR		
BLDG	BUILDING	
BFS	BEGIN FULL SLOPE	
BG	BLACK GUM	
BNC	BEGIN NORMAL CROWN	
BNS	BEGIN NORMAL SHOULDER	
BOS	BOTTOM OF STEEL	
BOT	BOTTOM	
B.S.L.	BUILDING SETBACK LINE	
C		
C	CONDUIT	
CATV	CABLE TELEVISION JUNCTION BOX	
CED	CEDAR	
CF	CUBIC FEET	
CHY	CHERRY	
CJ	CONSTRUCTION JOINT	
CLR	CLEAR	
CMF	CONSTRUCTION MONUMENT FOUND	
CMP	CORRUGATED METAL PIPE	
CMU	CONCRETE MASONRY UNIT	
CO	CLEANOUT OR CONDUIT ONLY	
COL	COLUMN	
CONC	CONCRETE	
CONN	CONNECTION	
CONST	CONSTRUCTION	
COORD	COORDINATES	
CREPE	CREPE MYRTLE	
CTR	CENTER	
D		
DEG	DEGREE	
DGAB	DENSE GRADE AGGREGATE BASE	
DIA	DIAMETER	
DIM	DIMENSION	
DIP	DUCTILE IRON PIPE	
DOG	DOGWOOD	
DSTB	DISTURBED	
DWG	DRAWING	
E		
EA	EACH	
EB	ELECTRICAL BOX	
EC	EMPTY CONDUIT	
EC	END CURVE	
EF	EACH FACE	
EPS	END FULL SLOPE	
EJ	EXPANSION JOINT	
EL OR ELEV	ELEVATION	
ELEC	ELECTRICAL	
ENC	END NORMAL CROWN	
ENS	END NORMAL SHOULDER	
EO	ELECTRICAL OUTLET	
EOP	EDGE OF PAVEMENT	
EQ	EQUAL	
EQUIP	EQUIPMENT	
ES	EACH SIDE	
EW	EACH WAY OR EXISTING WATER	
EXIST	EXISTING	
EXP	EXPANSION	
F		
FFE	FINISH FLOOR ELEVATION	
FH	FIRE HYDRANT	
FOM	FIBER OPTIC MARKER	
FT	FOOT OR FEET	
FR	FRAME	
G		
GA	GAUGE	
GABC	GRADED AGGREGATE BASE COURSE	
GALV	GALVANIZED	
GI	GRATE INLET	
GUM	SWEET GUM	
GW	GUY WIRE	
I		
IE	INVERT ELEVATION	
INV	INVERT	
I.O.	IRON PIPE, OLD (FOUND)	
J		
JB	JUNCTION BOX	
JT	JOINT	
K		
KSI	KIPS PER SQUARE INCH	
kV	KILOVOLTS	
kVA	KILOVOLT-AMPERES	
kW	KILOWATTS	
kWHM	KILOWATT HOUR METER	
L		
LA	LAUREL OAK	
LB	POUND	
LF	LINEAR FEET	

ABBREVIATIONS LIST	
ABBREVIATIONS	DESCRIPTIONS
LO	LIVE OAK
M	
MB	MAILBOX
MAG	MAGNOLIA
MAP	MAPLE
MAX	MAXIMUM
MECH	MECHANICAL
MH	MANHOLE
MHW	MEAN HIGH WATER
MHHW	MEAN HIGHER HIGH WATER
MIN	MINIMUM
MIM	MIMOSA
MLW	MEAN LOW WATER
MLLW	MEAN LOWER LOW WATER
MSL	MEAN SEA LEVEL
N	
N/F	NOW OR FORMERLY
NAD	NORTH AMERICAN DATUM
NAVD	NORTH AMERICAN VERTICAL DATUM
NEMA	NATIONAL ELECTRICAL MANUFACTURERS ASSOCIATION
NIC	NOT IN CONTRACT
NO	NUMBER
NTS	NOT TO SCALE
O	
OC	ON CENTER
OD	OUTER DIAMETER
OE	OVERHEAD ELECTRICAL
P	
PA	
PL	PLATE
PN	PINE
PNL	PANEL
PP	POWER POLE
P/S	PRESTRESSED
PSF	POUNDS PER SQUARE FOOT
PSI	POUNDS PER SQUARE INCH
PVC	POLYVINYL CHLORIDE
PVMT	PAVEMENT
PWR	POWER
R	
R	RADIUS
RAD	RADIUS
RCP	REINFORCED CONCRETE PIPE
REINF	REINFORCING
REQD	REQUIRED
R/W	RIGHT-OF-WAY
S	
SAN	SANITARY
SCH	SCHEDULE
SD	STORM DRAIN
SF	SQUARE FEET
SPECS	SPECIFICATIONS
SQ	SQUARE
SS	STAINLESS STEEL OR SANITARY SEWER
SSMH	SANITARY SEWER MANHOLE
STA	STATION
STD	STANDARD
STL	STEEL
STRUC	STRUCTURE OR STRUCTURAL
SGD	SUBGRADE DRAIN
T	
T&B	TOP & BOTTOM
TC	TOP OF CURB
TEL	TELEPHONE JUNCTION BOX
TEMP	TEMPORARY
TOS	TOP OF STEEL
TRNSFMR	TRANSFORMER
TYP	TYPICAL
T/P	TOP OF PAVEMENT
U	
UE	UNDERGROUND ELECTRICAL
UL	UNDERWRITERS LABORATORY
UON	UNLESS OTHERWISE NOTED
V	
V	VOLT
VERT	VERTICAL
W	
W/	WITH
WAX	WAX MYRTLE
WM	WATER METER
WO	WATER OAK
WP	WORKING POINT
WV	WATER VALVE
WWF	WELDED WIRE FABRIC

SYMBOLS LIST	
SYMBOLS	DESCRIPTION
&	AND
⊙	AT
*	ASTERISK
∠	ANGLE
°	DEGREES
'	MINUTES OR FEET
#	NUMBER OR POUNDS
%	PERCENT
"	SECONDS OR INCH



EXISTING SANITARY MANHOLE



EXISTING STORM MANHOLE



EXISTING SIGN



POWER POLE



EXISTING ELECTRICAL BOX/TRANSFORMER/VAULT



EXISTING SPOT ELEVATION



EXISTING CONTOURS



EXISTING DROP INLET



EXISTING FIRE HYDRANT



EXISTING WATER VAULT



EXISTING WATER/GAS/SEWER VALVE



EXISTING CONTROL POINT/BENCHMARK



EXISTING UNDERGROUND ELECTRICAL



EXISTING OVERHEAD ELECTRICAL



EXISTING WATER LINE



EXISTING STORM DRAINAGE PIPE



EXISTING UNDERGROUND COMMUNICATIONS



EXISTING DUCT BANK



EXISTING FORCE MAIN



EXISTING SANITARY SEWER



EXISTING FENCE



EXISTING TREE LINE



EXISTING PAVEMENT - ASPHALT



EXISTING PAVEMENT - CONCRETE



LIMITS OF CONSTRUCTION



GRADING CUT



GRADING FILL



EXISTING - FIBER OPTIC



EXISTING - GAS



EXISTING - WATER

LEGEND

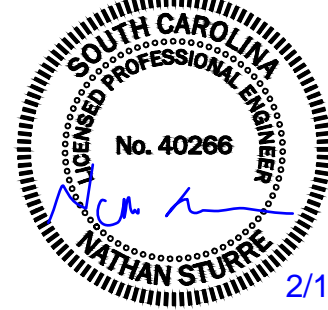
B.S.L.	BUILDING SETBACK LINE
CATV	CABLE TELEVISION PEDESTAL
CLD	CENTERLINE OF DITCH
CMFD	CONCRETE MONUMENT FOUND DISTURBED
CPP	CORRUGATED PLASTIC PIPE
HVAC	AIR HANDLER
IE	INVERTED ELEVATION
IPF	IRON PIN (OLD) FOUND
IPS	IRON PIN (NEW) SET
OHP	OVERHEAD POWERLINE
PP	POWER POLE
RCP	REINFORCED CONCRETE PIPE
SCO	SEWER CLEANOUT
TELE	TELEPHONE PEDESTAL
WV	WATER VALVE

GENERAL NOTES:

- ALL SILT BARRIERS AND OTHER EROSION CONTROL MEASURES MUST BE PLACED PRIOR TO LAND DISTURBING ACTIVITIES.
- A PRE-CONSTRUCTION CONFERENCE SHALL BE HELD WITH THE OWNER AND ENGINEER PRIOR TO BEGINNING CONSTRUCTION. THIS MEETING SHALL BE SCHEDULED WITH THE OWNER AND ENGINEER AT THE TIME NOTICE TO PROCEED IS GIVEN.
- THE OWNER AND ENGINEER SHALL BE NOTIFIED AT LEAST 48 HOURS IN ADVANCE, DURING REGULAR HOURS (8:00 AM TO 5:00 PM, MONDAY THROUGH FRIDAY, EXCLUDING HOLIDAYS), BEFORE THE COMMENCEMENT OF ANY CONSTRUCTION ACTIVITY.
- ALL WORK TO BE DONE IN ACCORDANCE WITH THE LATEST EDITION OF THE STANDARD SPECIFICATIONS FOR HIGHWAY CONSTRUCTION FOR THE SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION (SCDOT), TOWN OF BLUFFTON SPECIFICATIONS, AND THE PROJECT SPECIFICATIONS.
- THE CONTRACTOR WILL BE REQUIRED TO HAVE ON SITE A COPY OF SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION STANDARD SPECIFICATIONS AND STANDARD DRAWINGS, LATEST EDITION.
- ANY DISCREPANCIES, ERRORS, OR OMISSIONS DISCOVERED ON THE PLANS OR IN THE SPECIFICATIONS SHOULD BE IMMEDIATELY BROUGHT TO THE ENGINEERS ATTENTION, NOTED ON THE CONTRACTOR'S PROPOSAL, AND DOES NOT RELIEVE THE CONTRACTOR OF HIS RESPONSIBILITY TO CORRECT THE SAME AND CONSTRUCT THE PROJECT AS DESIGNED.
- THE EXISTENCE, ABSENCE, LOCATION AND ELEVATION OF UNDERGROUND UTILITIES ON THE PLANS ARE NOT BASED ON FIELD MARKS, ARE NOT GUARANTEED, AND SHALL BE INVESTIGATED, UNEARTHED IF NECESSARY, AND VERIFIED BY CONTRACTOR BEFORE BEGINNING CONSTRUCTION.
- THE CONTRACTOR SHALL CONTACT SOUTH CAROLINA 811, "CALL BEFORE YOU DIG" SERVICE IN ORDER TO LOCATE UTILITIES PRIOR TO STARTING ANY EXCAVATION OR CONSTRUCTION.
- CONTRACTOR SHALL PROTECT ALL EXISTING UTILITIES, ABOVE GROUND OR BELOW GROUND.
- CONTRACTOR SHALL COORDINATE CONSTRUCTION ACTIVITIES WITH APPROPRIATE UTILITIES PRIOR TO AND/OR DURING CONSTRUCTION.
- CONTRACTOR SHALL NOTIFY THE APPROPRIATE UTILITY BEFORE DIGGING NEAR WATER AND SANITARY SEWER LINES.
- NO EXTRA PAYMENT WILL BE MADE FOR REPAIRS TO DAMAGE OF EXISTING UTILITIES.
- THE CONTRACTOR WILL NOT BE PAID FOR DELAYS OR EXTRA EXPENSE CAUSED BY UTILITY FACILITIES, OBSTRUCTIONS, OR ANY OTHER ITEMS NOT REMOVED OR RELOCATED TO CLEAR CONSTRUCTION IN ADVANCE OF THEIR WORK.
- ALL STRUCTURES, TREES AND SHRUBS WHICH ARE WITHIN THE LIMITS OF THE PROPERTY BOUNDARY, BUT OUTSIDE THE LIMITS OF CONSTRUCTION SHALL NOT BE DISTURBED UNLESS OTHERWISE INSTRUCTED BY THE ENGINEER.
- UNSUITABLE AND SURPLUS EXCAVATION MATERIAL NOT REQUIRED FOR FILL SHALL BE DISPOSED OF OFFSITE.
- CONTRACTOR IS TO CLEAN ALL STORM WATER INLETS AND PIPE AT THE COMPLETION OF CONSTRUCTION TO REMOVE ANY SILT AND DEBRIS. THE CLEANING OF DROP INLETS, CULVERTS, AND PIPES (EXISTING AND PROPOSED) SHALL BE CONSIDERED INCIDENTAL TO THE PROJECT, NO ADDITIONAL PAYMENT WILL BE MADE THEREFOR.
- ANY DAMAGE TO THE SIDE STREETS OR SIDEWALK DUE TO CONSTRUCTION ACTIVITY SHALL BE REPAIRED IN AN EXPEDIENT MANNER AT THE CONTRACTOR'S EXPENSE.
- CONTRACTOR MAY SUBMIT BID ALTERNATIVES ON SITE WORK ELEMENTS FOR REVIEW AND APPROVAL BY ENGINEER AND ANY APPLICABLE OUTSIDE REGULATORY AGENCIES OR UTILITY COMPANIES.

SCDHEC STANDARD NOTES:

- PROVIDE SILT FENCE AND/OR OTHER CONTROL DEVICES, AS MAY BE REQUIRED, TO CONTROL SOIL EROSION DURING UTILITY CONSTRUCTION. ALL DISTURBED AREAS SHALL BE CLEANED, GRADED AND STABILIZED WITH GRASSING IMMEDIATELY AFTER THE UTILITY INSTALLATION. FILL COVER & TEMPORARY SEEDING AT THE END OF THE DAY ARE RECOMMENDED. IF WATER IS ENCOUNTERED WHILE TRENCHING, THE WATER SHOULD BE FILTERED TO REMOVE ANY SEDIMENTS BEFORE BEING PUMPED BACK INTO ANY WATERS OF THE STATE.
- STABILIZATION MEASURES SHALL BE INITIATED AS SOON AS PRACTICABLE IN PORTIONS OF THE SITE WHERE CONSTRUCTION ACTIVITIES HAVE TEMPORARILY OR PERMANENTLY CEASED, BUT IN NO CASE MORE THAN 14 DAYS AFTER THE WORK HAS CEASED, EXCEPT AS NOTED.
 - WHERE STABILIZATION BY THE 14TH DAY IS PRECLUDED BY SNOW COVER OR FROZEN GROUND CONDITIONS, STABILIZATION MEASURES MUST BE INITIATED AS SOON AS PRACTICABLE.
 - WHERE CONSTRUCTION ACTIVITY ON A PORTION OF THE SITE IS TEMPORARILY CEASED, & EARTH-DISTURBING ACTIVITIES WILL BE RESUMED WITHIN 14 DAYS, TEMPORARY STABILIZATION MEASURES DO NOT HAVE TO BE INITIATED ON THAT PORTION OF THE SITE.
- THE CONTRACTOR MUST TAKE NECESSARY ACTION TO MINIMIZE THE TRACKING OF MUD ONTO THE PAVED ROADWAY FROM THE CONSTRUCTION AREA & THE GENERATION OF DUST. THE CONTRACTOR SHALL DAILY REMOVE MUD/SOIL FROM PAVEMENT, AS MAY BE REQUIRED.
- ALL EROSION CONTROL DEVICES SHALL BE PROPERLY MAINTAINED DURING ALL PHASES OF CONSTRUCTION UNTIL THE COMPLETION OF ALL CONSTRUCTION ACTIVITIES AND ALL DISTURBED AREAS HAVE BEEN STABILIZED. ADDITIONAL CONTROL DEVICES MAY BE REQUIRED DURING CONSTRUCTION IN ORDER TO CONTROL EROSION AND/OR OFFSITE SEDIMENTATION. ALL TEMPORARY CONTROL DEVICES SHALL BE REMOVED ONCE CONSTRUCTION IS COMPLETE AND THE SITE IS STABILIZED.
- RESIDENTIAL SUBDIVISIONS REQUIRE EROSION CONTROL FEATURES FOR INFRASTRUCTURE AS WELL AS FOR INDIVIDUAL LOT CONSTRUCTION. INDIVIDUAL PROPERTY OWNERS SHALL FOLLOW THESE PLANS OR OBTAIN APPROVAL FOR AN INDIVIDUAL PLAN IN ACCORDANCE WITH S.C. REG. 72-302 & SCDDO000.
- LITTER, CONSTRUCTION DEBRIS, OILS, FUELS & BUILDING PRODUCTS WITH THE SIGNIFICANT POTENTIAL IMPACT (SUCH AS STOCK-PILING OF FRESHLY TREATED LUMBER) & CONSTRUCTION CHEMICALS THAT COULD BE EXPOSED TO STORM WATER MUST BE PREVENTED FROM BECOMING A POLLUTANT SOURCE IN STORM WATER DISCHARGES.
- ALL SEDIMENT & EROSION CONTROL DEVICES SHALL BE INSPECTED ONCE EVERY CALENDAR WEEK. IF PERIODIC INSPECTION OR OTHER INFORMATION INDICATES THAT A BMP HAS BEEN INAPPROPRIATELY OR INCORRECTLY INSTALLED, THE PERMITTEE MUST ADDRESS THE NECESSARY REPAIR, REPLACEMENT OR MODIFICATION REQUIRED TO CORRECT THE BMP WITHIN 48 HOURS OF IDENTIFICATION.
- INITIATE STABILIZATION MEASURES ON ANY EXPOSED STEEP SLOPE (3:1V OR GREATER) WHERE LAND DISTURBING ACTIVITIES HAVE CEASED, AND WILL NOT RESUME FOR A PERIOD OF 7 CALENDAR DAYS.
- MINIMIZE SOIL COMPACTION AND, UNLESS INFEASIBLE, PRESERVE TOPSOIL.
- MINIMIZE THE DISCHARGE OF POLLUTANTS FROM EQUIPMENT & VEHICLE WASHING, WHEEL WASH WATER, & OTHER WASH WATER. WASH WATERS MUST BE TREATED IN A SEDIMENT BASIN OR ALTERNATIVE CONTROL THAT PROVIDES EQUIVALENT OR BETTER TREATMENT PRIOR TO DISCHARGE.
- MINIMIZE THE DISCHARGE OF POLLUTANTS FROM Dewatering of TRENCHES & EXCAVATED AREAS. THESE DISCHARGES ARE TO BE ROUTED THROUGH APPROPRIATE BMP'S (SEDIMENT BASIN, FILTER BAG, ETC.)
 - WASTEWATER FROM WASHOUT OF CONCRETE, UNLESS MANAGED BY AN




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CORNERSTONE CHURCH

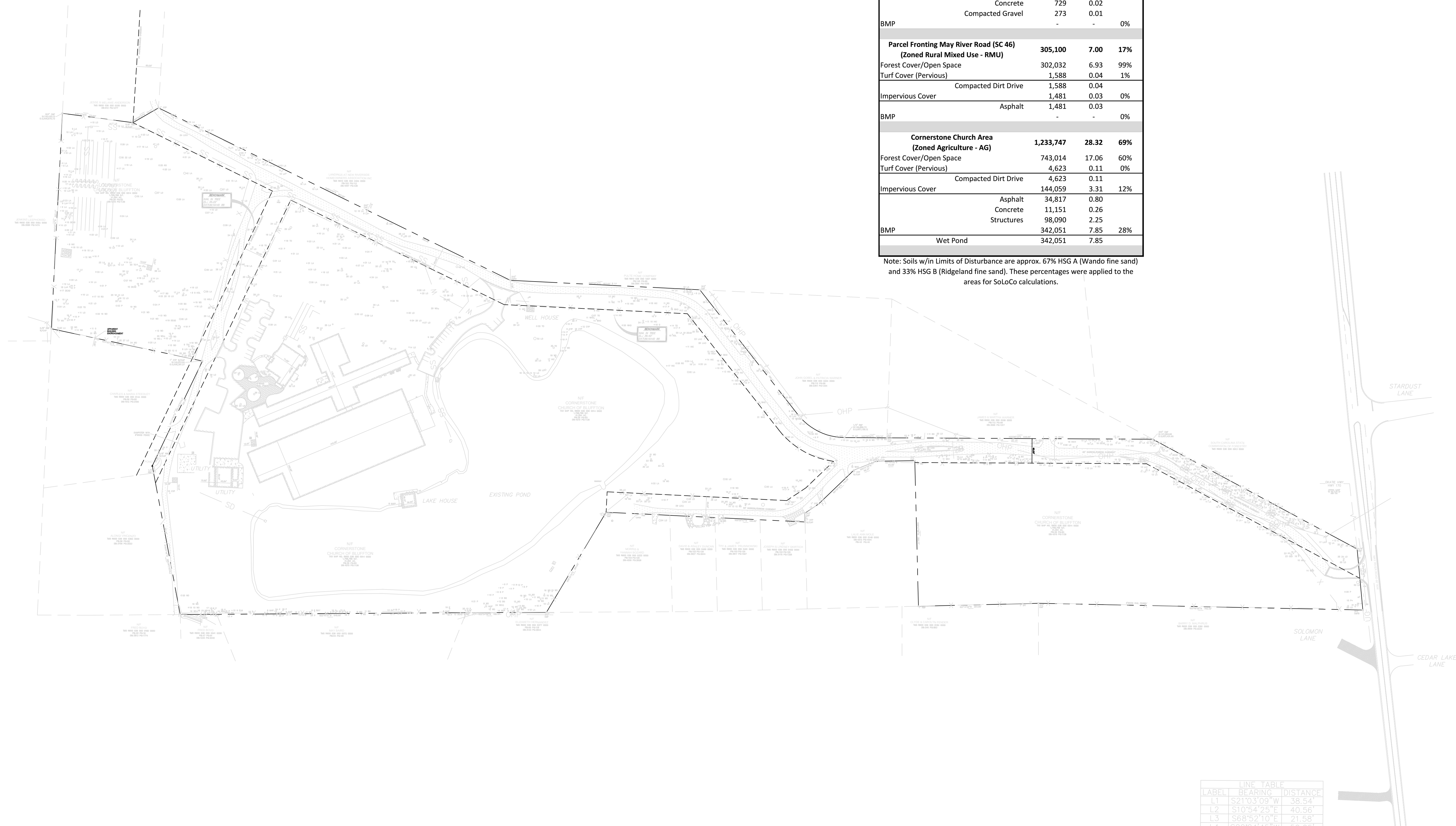
CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS



DATE	02/13/2025
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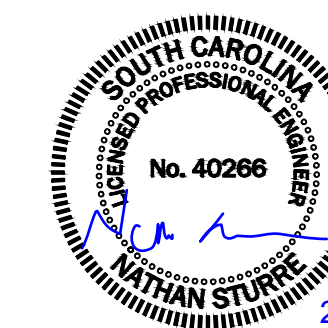
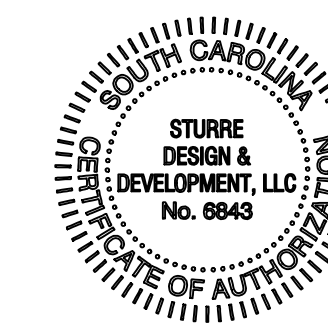
SHEET NAME

EXISTING CONDITIONS



Cornerstone Church Pre-Development Area Summary			
Land Cover	SF	AC	%
Total Parcel Area	1,798,788	41.29	
Forest Cover/Open Space	1,219,410	27.99	68%
Turf Cover (Pervious)	88,371	2.03	5%
Impervious Cover	148,956	3.42	8%
BMP	342,051	7.85	19%
Existing Access & Utility Easement (Meadow Drive 50' Easement)	259,941	5.97	14%
Forest Cover/Open Space	174,364	4.00	67%
Turf Cover (Pervious)	82,161	1.89	32%
Compacted Dirt Drive	81,458	1.87	
Sandset Brick Pavers	703		
Impervious Cover	3,416	0.08	1%
Asphalt	2,414	0.06	
Concrete	729	0.02	
Compacted Gravel	273	0.01	
BMP	-	-	0%
Parcel Fronting May River Road (SC 46) (Zoned Rural Mixed Use - RMU)	305,100	7.00	17%
Forest Cover/Open Space	302,032	6.93	99%
Turf Cover (Pervious)	1,588	0.04	1%
Compacted Dirt Drive	1,588	0.04	
Impervious Cover	1,481	0.03	0%
Asphalt	1,481	0.03	
BMP	-	-	0%
Cornerstone Church Area (Zoned Agriculture - AG)	1,233,747	28.32	69%
Forest Cover/Open Space	743,014	17.06	60%
Turf Cover (Pervious)	4,623	0.11	0%
Compacted Dirt Drive	4,623	0.11	
Impervious Cover	144,059	3.31	12%
Asphalt	34,817	0.80	
Concrete	11,151	0.26	
Structures	98,090	2.25	
BMP	342,051	7.85	28%
Wet Pond	342,051	7.85	

Note: Soils w/in Limits of Disturbance are approx. 67% HSG A (Wando fine sand) and 33% HSG B (Ridgeland fine sand). These percentages were applied to the areas for SoLoCo calculations.



ENGINEER OF RECORD

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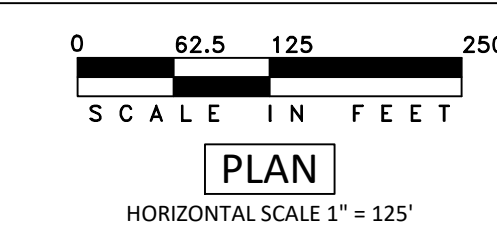
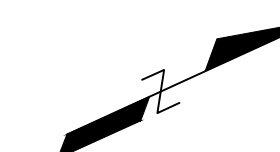
PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

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RIVERSIDE CAMPUS

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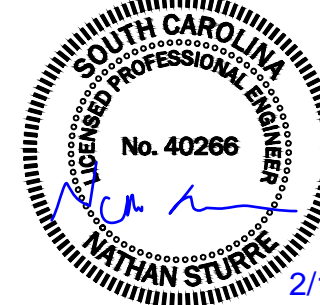
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SHEET NAME

SHEET INDEX

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2/13/202

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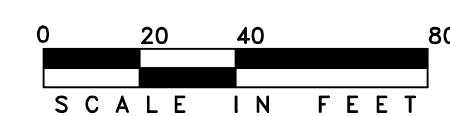
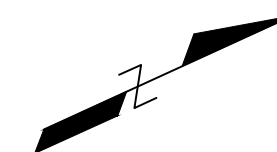
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PLAN

HORIZONTAL SCALE 1" = 40'

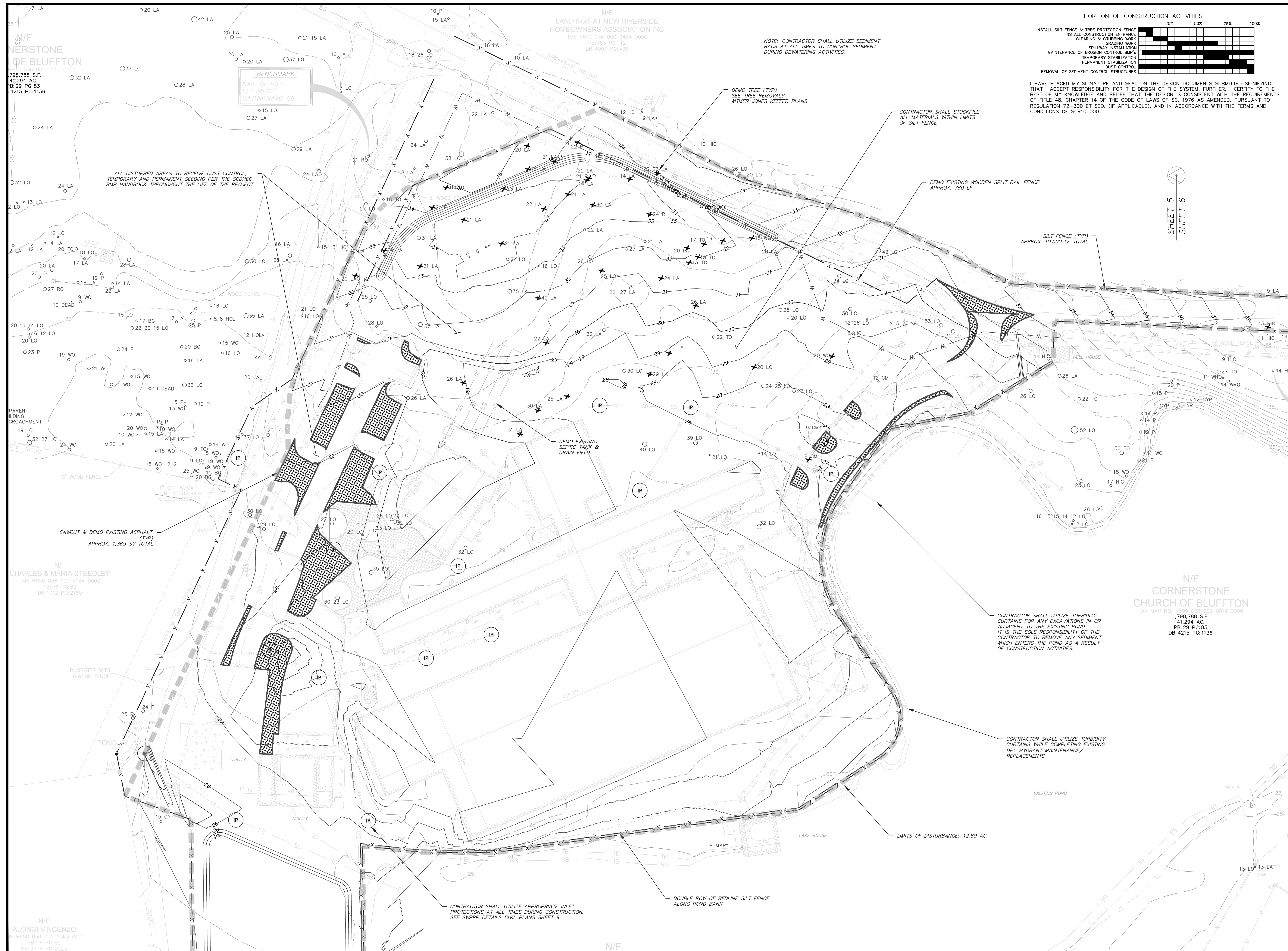
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REV #	DATE	DESCRIPTION
	DATE	02/13/202

SHEET NAME

DEMO & SWPP PLAN

1



Dust Control

Plan Symbol

DC

Description

Wind erosion occurs when the surface soil is loose and dry, vegetation is sparse or absent, the wind is sufficiently strong, and when construction traffic disturbs the soil. Wind erodes soils and transports the sediment off site in the form of fugitive dust, where it may be washed into receiving water bodies by the next rainfall event. Fugitive dust is a nuisance for neighbors. It settles on automobiles, structures and windows and finds its way into homes. It also makes breathing difficult for those with respiratory problems and becomes a safety problem when it blinds motorists, equipment operators, and laborers.

When and Where to Use It

Utilize dust control methods whenever there are offsite impacts, especially during periods of drought. Implemented dust control until final stabilization is reached.

Dust Control Design Criteria

There are many methods to control dust on construction sites. These methods include but are not limited to :

- **Phasing the Project.** Phasing is done to decrease the area of disturbed soil that is exposed to erosion. The smaller the amount of soil that is exposed at one time, the smaller the potential for dust generation. Phasing a project and utilizing temporary stabilization practices can significantly reduce dust emissions.
- **Vegetative Cover.** A vegetative cover helps reduce wind erosion. Vegetative Cover is for disturbed areas not subject to traffic. Vegetation provides the most practical method of dust control.
- **Mulch.** Mulching offers a temporary way to stabilize the soil and prevent erosion. Mulching offers a fast, effective means of controlling dust.
- **Sprinkling Water.** Sprinkling helps control the suspension of dust particles and promotes dust to settle out of the air. Sprinkling water is effective for dust control on haul roads and other traffic routes.
- **Spray-on-Adhesive.** Adhesives prevent soil from blowing away. Latex emulsions, or resin in water is sprayed onto mineral soils to prevent their blowing away and reduce dust caused by traffic.
- **Calcium Chloride.** Calcium chloride keeps the soil surface moist and prevents erosion. Calcium chloride is applied by mechanical spreaders as loose, dry granules or flakes at a rate that keeps the surface moist but not so high as to cause water pollution or plant damage.
- **Barriers.** Barriers are fences that prevent erosion by obstructing the wind near the ground stopping the soil from blowing offsite. Broad, wind, or sediment fences can control air currents and blowing soil. Barriers are not a substitute for permanent stabilization. Perennial grass and strands of existing trees may also serve as wind barriers.


Inspection and Maintenance

- Add additional dust control or re-spray area as necessary to keep dust to a minimum.
- Spray exposed soil areas only with approved dust control agents as indicated by the SCDHEC Standard Specifications.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook39

Dust Control





Dust Control by Sprinkling WaterDust Control by Sprinkling Water

Preventive Measures and Troubleshooting Guide

Field Condition	Common Solutions
Excessive dust leaves the site.	Increase frequency of dust control application. Consider using a palliative or binder on inactive areas.
Vehicles kick up dust.	Water more frequently. Limit vehicle speeds. Stabilize the roadway.
Watering for dust control causes erosion.	Reduce water pressure on the water truck. Check watering equipment to ensure that it has a positive shutoff. Water less frequently.
Sprayed areas are ineffective at limiting dust.	Re-spray areas and ensure that the application rate is proper. Try another product or method if current dust control is not effective.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook40

Temporary Seeding

Plan Symbol

TS

Description

The purpose of temporary seeding is to reduce erosion and sedimentation by stabilizing disturbed areas that would otherwise lay bare for long periods of time before they are worked or stabilized. Temporary seeding is also used where permanent vegetation growth is not necessary or appropriate.

When and Where to Use It

Temporary seeding is used on exposed soil surfaces such as denuded areas, soil stockpiles, dikes, dams, banks of sediment basins, banks of sediment traps, and temporary road banks. Temporary seeding prevents and limits costly maintenance operations on other sediment control structures. Sediment clean-out requirements for sediment basins, sediment, traps, and silt fence is reduced if the drainage area is seeded when grading and construction operation are not taking place.

Seed Selection

Seed selection is based on geographical location, soil type and the season of the year in which the planting is to be done. Use the tables in Appendix C as a guide for conventional tillage methods (plowing, seedbed preparation, hydroseeding, etc). If a fast growing crop to nurse the permanent specie or species is required, then use the mix rate. Failure to carefully follow agronomic recommendations results in an inadequate stand of temporary vegetation that provides little or no erosion control.

Installation

Tillage

If the area has been recently plowed, no tillage is required other than raking or surface roughening to break any crust that has formed leaving a textured surface. Disk the soil for optimal germination when the soil is compacted less than 6-inches.

Soil Testing

Soil testing is available through Clemson University Cooperative Extension Service.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook8

Temporary Seeding

Lime

Lime is not required for temporary seeding unless a soil test shows that the soil pH is below 5.0. It may be desirable to apply lime during the temporary seeding operation to benefit the long-term permanent seeding. Apply a minimum of 1.5 tons of Lime/acre (70 pounds per 1000 square feet) if it is to be used.

Fertilizer

Apply a minimum of 500 pounds per acre of 10-10-10 fertilizer (11.5 pounds per 1000 square feet) or equivalent during temporary seeding unless a soil test indicates a different requirement. Incorporate fertilizer and lime (if used) into the top 4-6 inches of the soil by disking or other means where conditions allow.

Seeding

Loosen the soil surface before broadcasting the seed. Apply seed evenly by the most convenient method available for the type of seed used and the location of the temporary seeding. Typical application methods include but are not limited to cyclone seeders, rotary spreaders, drop spreaders, broadcast spreaders, hand spreaders, cultipacker seeder, and hydro-seeders. Cover applied seed by raking or dragging a chain, and then lightly firm the area with a roller or cultipacker.

Mulching

Use mulch with temporary seed applications to retain soil moisture and reduce erosion during the establishment of vegetation. Typical mulch applications include straw, wood fiber, hydromulches, BFM and FGM. Use hydromulches with a minimum blend of 70% wood fibers.

The most commonly accepted mulch used in conjunction with temporary seeding is small grain straw. This straw should be dry and free from mold damage and noxious weeds. The straw may need to be anchored with netting or emulsions to prevent it from being blown or washed away. Apply the straw mulch by hand or machine at the rate 1.5-2 tons per acre (90 pounds per 1000 square feet). Frequent inspections are necessary to check that conditions for growth are good.

Irrigation

Seeded areas should be kept adequately moist. Irrigate the seeded area if normal rainfall is not adequate for the germination and growth of seedlings. Water seeded areas at controlled rates that are less than the rate at which the soil can absorb water to prevent runoff. Runoff of irrigation water wastes water and can cause erosion.

Re-seeding

Re-seed areas where seeding does not grow quickly, thick enough, or adequately to prevent erosion. Base seed selection should on the requirements of local Specifications.

Inspection and Maintenance

- Inspect every 7 calendar days and within 24-hours after each rainfall event that produces ½-inches or more of precipitation.
- Cover seeded with mulch to provide protection. Frequent inspections are necessary to check that conditions for growth are good.
- Supply temporary seeding with adequate moisture. Supply water as needed, especially in abnormally hot or dry weather or on adverse sites. Control water application rates to prevent runoff.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook9

Permanent Seeding

Plan Symbol

PS

Description

Controlling runoff and preventing erosion by establishing a perennial vegetative cover with seed.

When and Where to Use It

A major consideration in the selection of the type of permanent grass to establish is the intended use of the land. Land use is separated in to two categories, high-maintenance and low-maintenance.

High-maintenance

High maintenance areas are mowed frequently, lime or fertilized on a regular basis, and require maintenance to an aesthetic standard. Land uses with high maintenance grasses include homes, industrial parks, schools, churches, and recreational areas such as parks, athletic fields, and golf courses.

Low-maintenance

Low maintenance areas are mowed infrequently, if at all, and lime and fertilizer may not be applied on a regular schedule. These areas are not subject to intense use and do not require a uniform appearance. The vegetation must be able to survive with little maintenance over long periods of time. Grass and legume mixtures are favored in these areas because legumes are capable of fixing nitrogen in the soil for their own use and the use of the grasses around them. Land uses requiring low-maintenance grasses include steep slopes, stream and channel banks, road banks, and commercial and industrial areas with limited access.

Seed Selection

The use of native species is preferred when selecting vegetation. Base plant seed selection on geographical location, the type of soil, the season of the year in which the planting is to be done, and the needs and desires of the permanent land user. Failure to carefully follow agronomic recommendations results in an inadequate stand of permanent vegetation that provides little or no erosion control.

Installation

Topsoil

Apply topsoil if the surface soil of the seedbed is not adequate for plant growth.

Tillage

If the area has been recently plowed, no tillage is required other than raking or surface roughening to break any crust that has formed leaving a textured surface. Disk the soil for optimal germination when the soil is compacted less than 6-inches. If the soil is compacted more than 6-inches, sub-soiled and disk the area.



Soil Testing

Soil testing is available through Clemson University Cooperative Extension Service.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook26

Temporary Seeding

- Base seed selection on local Specifications.
- Re-seed areas where the plants do not grow quick enough, thick enough, or adequately enough to prevent erosion should be re-seeded.



Temporary Seeding

Preventive Measures and Troubleshooting Guide

Field Condition	Common Solutions
Slope was improperly dressed before application.	Roughen slopes. Furrow along the contour of areas to be seeded.
Coverage is inadequate.	Follow recommended application rates. Count the number of seedbags to ensure the correct amount of material is being applied. Reapply to thin areas.
Seeds fail to germinate.	Apply straw mulch to keep seeds in place and to moderate soil moisture and temperature. In arid areas, temporary irrigation may be necessary.
Seeded slope fails.	Fill in rills and re-seed; fertilize, and mulch slopes.
Seeding is washed off slope.	Allow at least 24-hours for the materials to dry before a rain event. Follow manufacturer's recommendations. Reapply where necessary.
Excessive water flows across stabilized surface.	Use other BMPs to limit flow on stabilized area and to reduce slope lengths. Do not use to stabilize areas with swift moving concentrated flows.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook10

Permanent Seeding

Lime

Unless a specific soil test indicates otherwise, apply ½ tons of ground course textured agricultural limestone per acre (70 pounds per 1000 square feet).

Fertilizer

Apply a minimum of 1000 pounds per acre of a complete 10-10-10 fertilizer (23 pounds per 1000 square feet) or equivalent during permanent seeding of grasses unless a soil test indicates a different requirement. Incorporate fertilizer and lime (if used) into the top 4-6 inches of the soil by disking or other means where conditions allow. Do not mix the lime and the fertilizer prior to the field application.

Seeding

Loosen the surface of the soil just before broadcasting the seed. Evenly apply seed by the most convenient method available for the type of seed applied and the location of the seeding. Typical application methods include but are not limited to cyclone seeders, rotary spreaders, drop spreaders, broadcast spreaders, hand spreaders, cultipacker seeder, and hydro-seeders. Cover applied seed by raking or dragging a chain or brush mat, and then lightly firm the area with a roller or cultipacker. Do not roll seed that is applied with a hydro-seeder and hydro-mulch.

Mulching

Cover all permanent seeded areas with mulch immediately upon completion of the seeding application to retain soil moisture and reduce erosion during establishment of vegetation. Apply the mulch evenly in such a manner that it provides a minimum of 75% coverage. Typical mulch applications include straw, wood fiber, hydromulches, BFM and FGM. Use hydromulches with a minimum blend of 70% wood fibers.

The most commonly accepted mulch used in conjunction with permanent seeding is small grain straw. Select straw that is dry and free from mold damage and noxious weeds. The straw may need to be anchored with netting or asphalt emulsions to prevent it from being blown or washed away. Apply straw mulch by hand or machine at the rate 2 tons per acre (90 pounds per 1000 square feet). Frequent inspections are necessary to check that conditions for growth are good.

Irrigation



Keep permanent seeded areas adequately moist, especially late in the specific growing season. Irrigate the seeded area if normal rainfall is not adequate for the germination and growth of seedlings. Water seeded areas at controlled rates that are less than the rate at which the soil can absorb water to prevent runoff. Runoff of irrigation water wastes water and can cause erosion.

Re-seeding

Inspect permanently seeded areas for failure, make necessary repairs and re-seed or overseed within the same growing season if possible. If the grass cover is sparse or patchy, re-evaluate the choice of grass and quantities of lime and fertilizer applied. Final stabilization by permanent seeding of the site requires that it be covered by a 70% coverage rate.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook27

Permanent Seeding




Permanent SeedingPermanent Seeding


Preventive Measures and Troubleshooting Guide

Field Condition	Common Solutions
Areas have eroded.	Re-seed or replace eroded areas.
Vegetation cover is inadequate and rill erosion is occurring.	Overseed and fertilize in accordance with soil test results.
Stand of permanent vegetation has less than 40% cover.	Re-evaluate choice of plant materials and quantities of lime and fertilizer.
Vegetation show signs of wilting before noon.	Water vegetation by wetting soil to a depth of 4-inches.

July 31, 2005South Carolina DHECStorm Water Management BMP Handbook28



STURTE
ENGINEERING
Civil Design & Development



STATE OF SOUTH CAROLINA
NATHAN STURTE
DESIGN & DEVELOPMENT, LLC
No. 6843
2/13/2025

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JEREMY REEDER, PLS
ATLAS SURVEYING
168 BOARDWALK DRIVE, SUITE A
RIDGELAND, SC 29936
SCPLS #: 28139
TEL: 843.645.9277


PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88



REV #	DATE	DESCRIPTION
	02/13/2025	
SHEET NAME		
SWPPP DETAILS		
SHEET NO.		

10



2/13/2025

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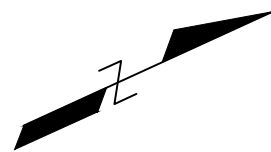
PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88



PLAN

HORIZONTAL SCALE 1" = 120'



REV #	DATE	DESCRIPTION

DATE 02/13/2025

SHEET NAME

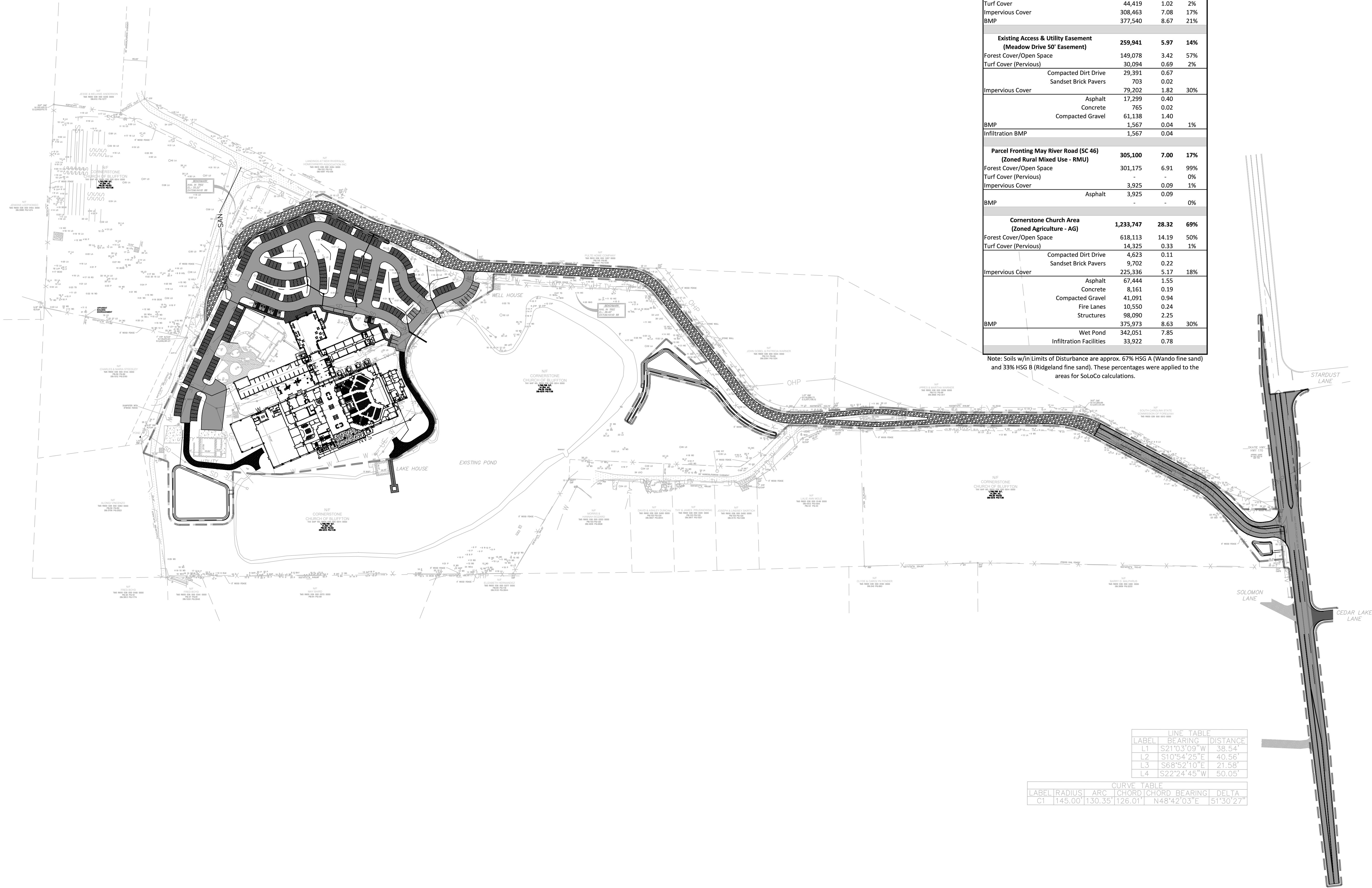
SITE IMPROVEMENTS
OVERVIEW

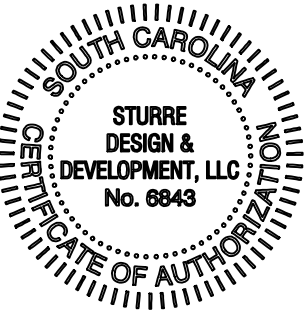
Cornerstone Church Post-Development Area Summary			
Land Cover	SF	AC	%
Total Parcel Area			
Forest Cover/Open Space	1,068,366	24.53	59%
Turf Cover	44,419	1.02	2%
Impervious Cover	308,463	7.08	17%
BMP	377,540	8.67	21%
Existing Access & Utility Easement (Meadow Drive 50' Easement)			
Forest Cover/Open Space	149,078	3.42	57%
Turf Cover (Pervious)	30,094	0.69	2%
Compacted Dirt Drive	29,391	0.67	
Sandset Brick Pavers	703	0.02	
Impervious Cover	79,202	1.82	30%
Asphalt	17,299	0.40	
Concrete	765	0.02	
Compacted Gravel	61,138	1.40	
BMP	1,567	0.04	1%
Infiltration BMP	1,567	0.04	
Parcel Fronting May River Road (SC 46) (Zoned Rural Mixed Use - RMU)			
Forest Cover/Open Space	301,175	6.91	99%
Turf Cover (Pervious)	-	-	0%
Impervious Cover	3,925	0.09	1%
Asphalt	3,925	0.09	
BMP	-	-	0%
Cornerstone Church Area (Zoned Agriculture - AG)			
Forest Cover/Open Space	618,113	14.19	50%
Turf Cover (Pervious)	14,325	0.33	1%
Compacted Dirt Drive	4,623	0.11	
Sandset Brick Pavers	9,702	0.22	
Impervious Cover	225,336	5.17	18%
Asphalt	67,444	1.55	
Concrete	8,161	0.19	
Compacted Gravel	41,091	0.94	
Fire Lanes	10,550	0.24	
Structures	98,090	2.25	
BMP	375,973	8.63	30%
Wet Pond	342,051	7.85	
Infiltration Facilities	33,922	0.78	

Note: Soils w/in Limits of Disturbance are approx. 67% HSG A (Wando fine sand) and 33% HSG B (Ridgeland fine sand). These percentages were applied to the areas for SoLoCo calculations.

LINE TABLE		
LABEL	BEARING	DISTANCE
L1	S21°03'09"W	38.54'
L2	S10°54'25"E	40.56'
L3	S68°52'10"E	21.58'
L4	S22°24'45"W	50.05'

CURVE TABLE				
LABEL	RADIUS	ARC	CHORD	CHORD BEARING
C1	145.00'	130.35'	126.01'	N48°42'03"E





2/13/2025

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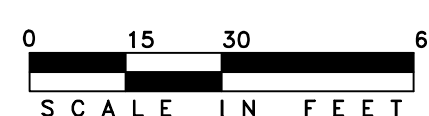
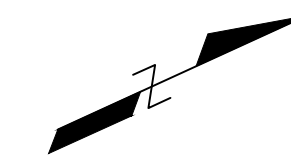
PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88



PLAN

HORIZONTAL SCALE 1" = 30'



REV #	DATE	DESCRIPTION

DATE 02/13/2025

SHEET NAME

SITE IMPROVEMENTS



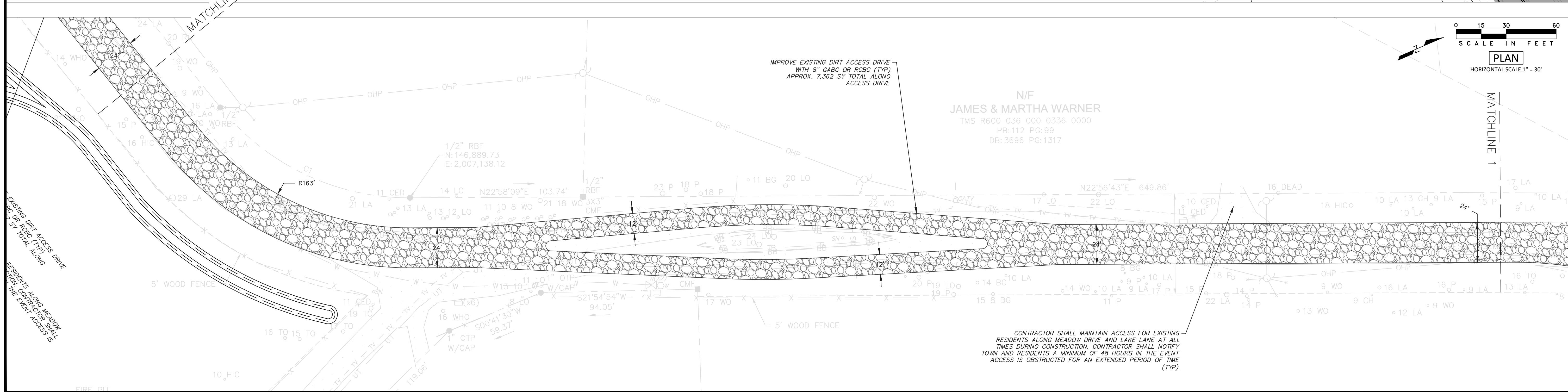
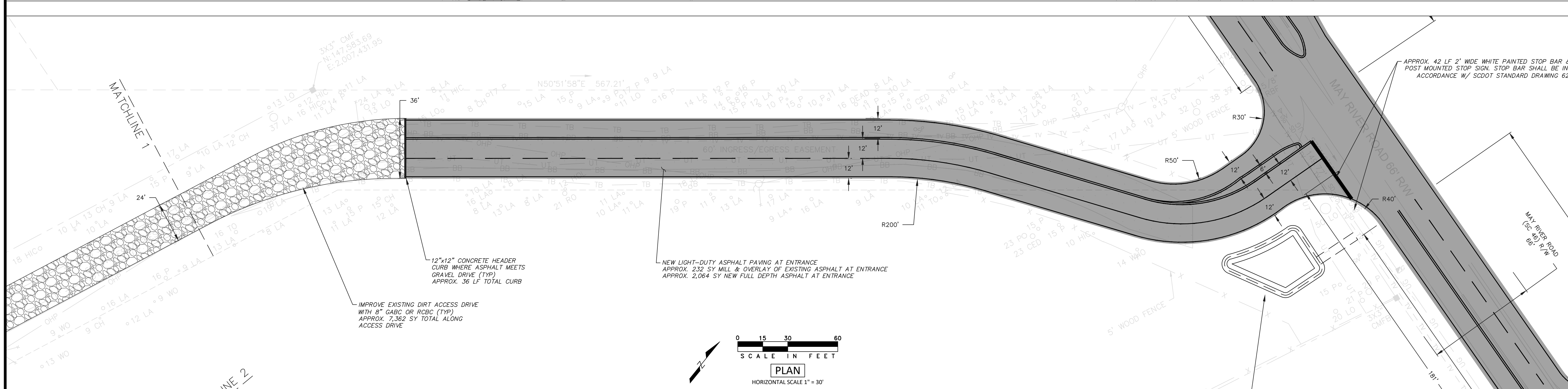
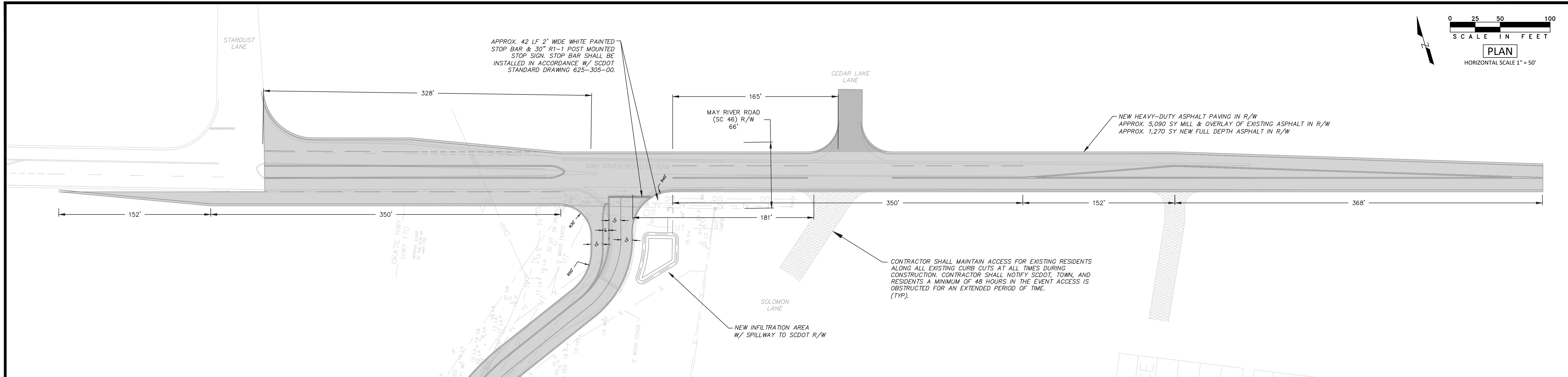
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CORNERSTONE CHURCH

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88

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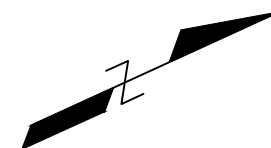
PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

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RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88



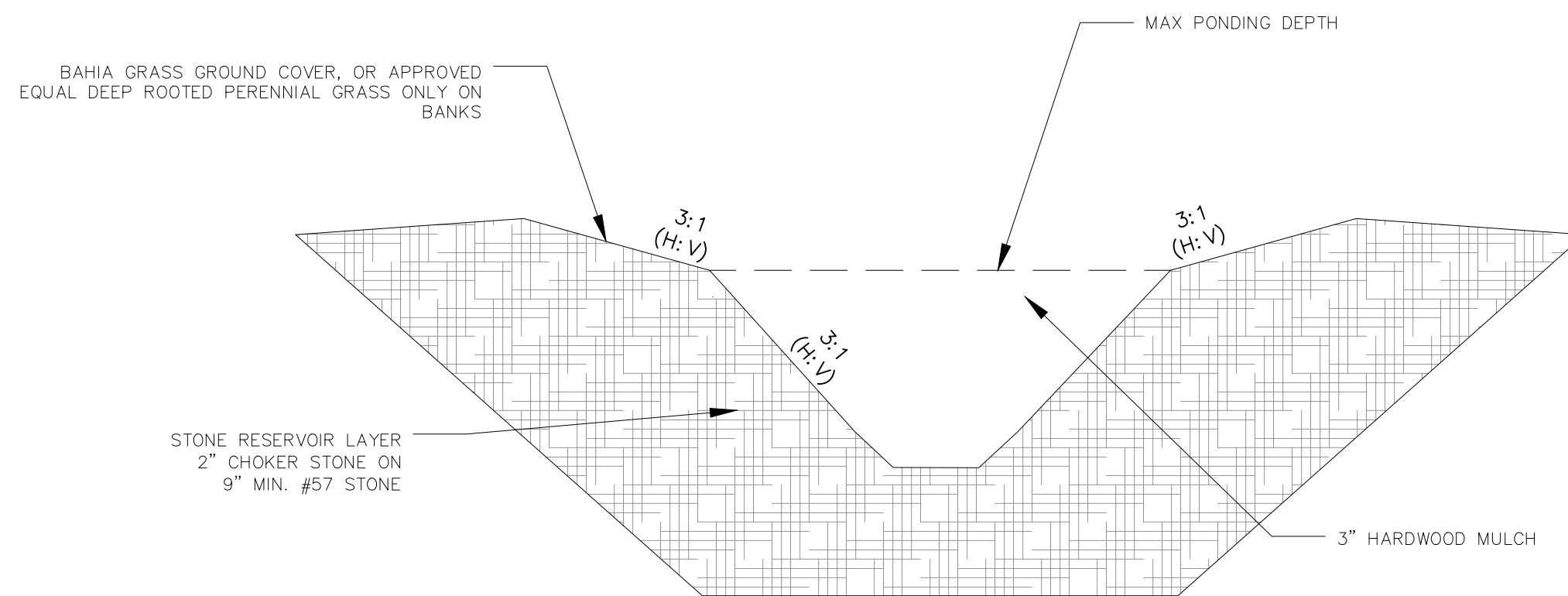
PLAN

HORIZONTAL SCALE 1" = 120'



DATE	02/13/2025
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SHEET NAME STORMWATER COMPLIANCE PLAN



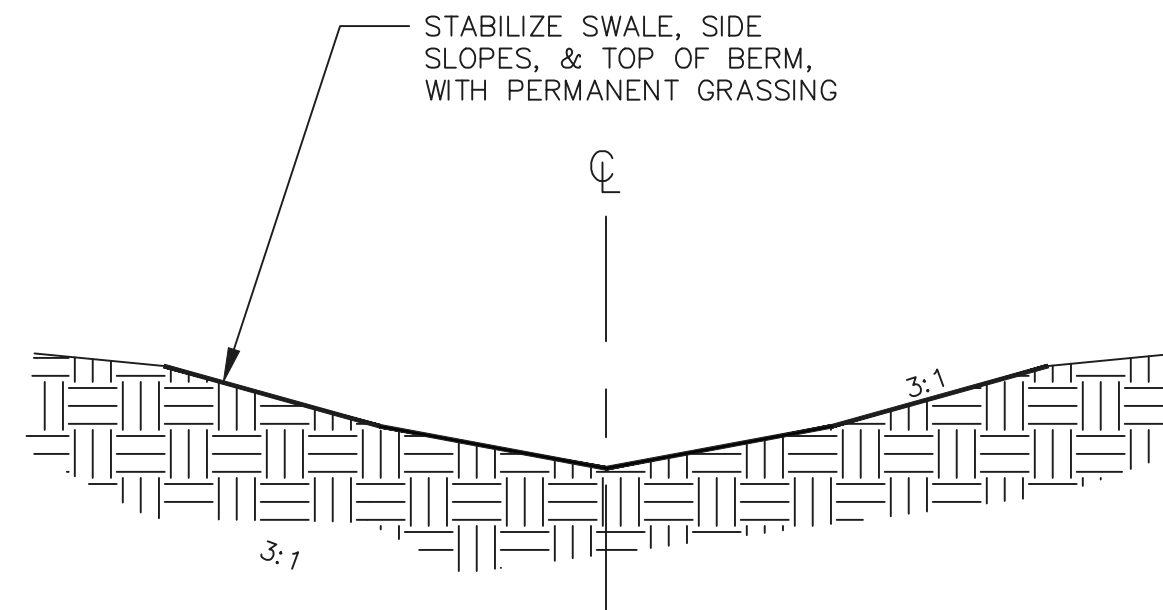
INFILTRATION BASIN

N.T.S.

- NOTE:
1. DETAIL MODIFIED FROM SOUTHERN LOWCOUNTRY STORMWATER DESIGN MANUAL
 2. FILTER MEDIA NOT SPECIFIED AS USDA SOIL REPORT INDICATES SANDY SOILS WITH ADEQUATE INFILTRATION RATES; SOIL AMENDMENTS MAY BE REQUIRED BASED ON RESULTS OF SOIL ANALYSIS AS IDENTIFIED ON THE SITE PLAN. CONTRACTOR SHALL CONTACT ENGINEER FOR ADDITIONAL DETAIL.
 3. CONTRACTOR SHALL COORDINATE WITH ENGINEER IF GROUNDWATER IS DETECTED DURING CONSTRUCTION IN FACILITY.
 4. STABILIZE BANKS, PRETREATMENT AND/OR OUTFALL AREAS WITH VEGETATIVE OR SYNTHETIC MATTING WHERE NECESSARY.
 5. USE FORMED RIGID SURFACE WITH THREE OR FOUR ROWS OF 3/8-INCH PERFORATIONS AT 6 INCHES ON CENTER.
 6. THERE SHOULD BE NO PERFORATION WITHIN 1 FOOT OF THE SURFACE

FOR MAINTENANCE REQUIREMENTS ON PROPOSED INFILTRATION AREAS, PLEASE REFERENCE THE APPLICABLE SECTIONS IN THE SCDHEC BMP HANDBOOK, AVAILABLE AT THE WEBSITE BELOW.

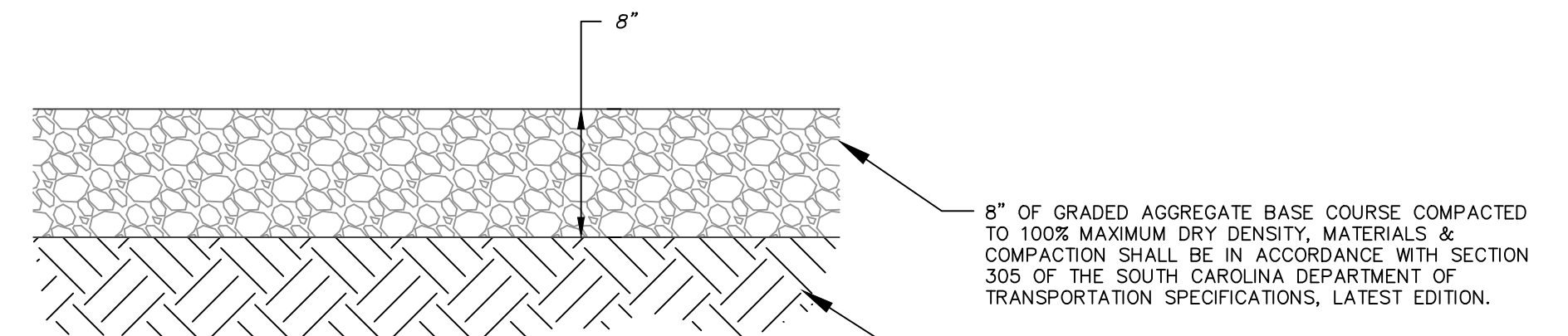
[HTTPS://SCDHEC.GOV/BOW/STORMWATER/BEST-MANAGEMENT-PRACTICES-BMPS/BMP-HANDBOOK](https://scdhec.gov/bow/stormwater/best-management-practices-bmps/bmp-handbook)



SHALLOW SWALE DETAIL

N.T.S

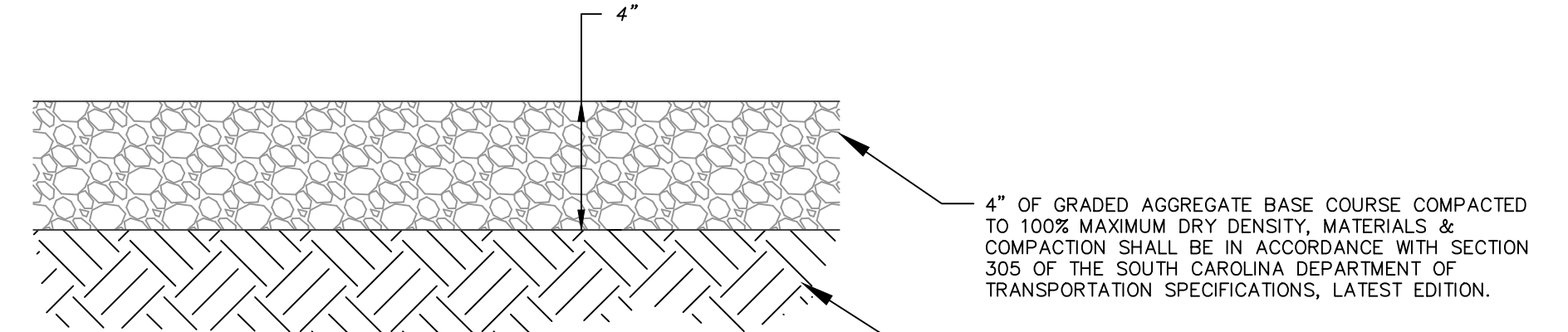
- NOTES:
1. MINIMUM LONGITUDINAL SLOPE 1.0%.
 2. STABILIZE SWALE WITH VEGETATIVE OR SYNTHETIC MATTING WHERE NECESSARY TO PREVENT THE FORMATION OF RILLS AND GULLIES. IF EROSION PERSISTS INSTALL 18" DEEP CLASS A1 RIP RAP ALONG SPILLWAY BOTTOM WITH FILTER FABRIC.



GRAVEL DRIVE DETAIL

N.T.S.

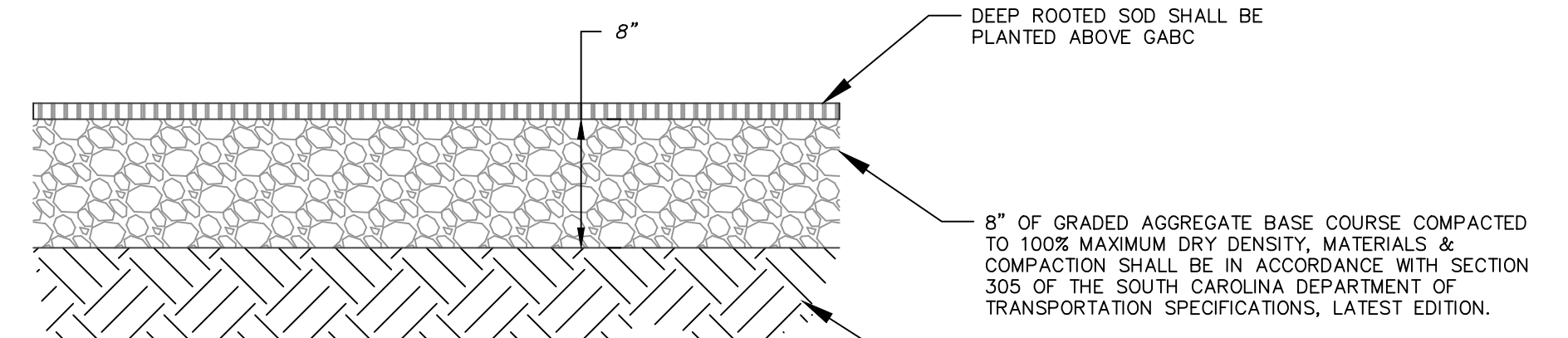
- NOTE:
1. ALL STONE TO BE CLEAN, DOUBLE-WASHED FREE OF ALL FINES.
 2. CONTRACTOR SHALL REFER TO TO PAVEMENT AND SUBGRADE PREP RECOMMENDATIONS PRESENTED IN THE GEOTECHNICAL INVESTIGATION REPORT.



GRAVEL PARKING DETAIL

N.T.S.

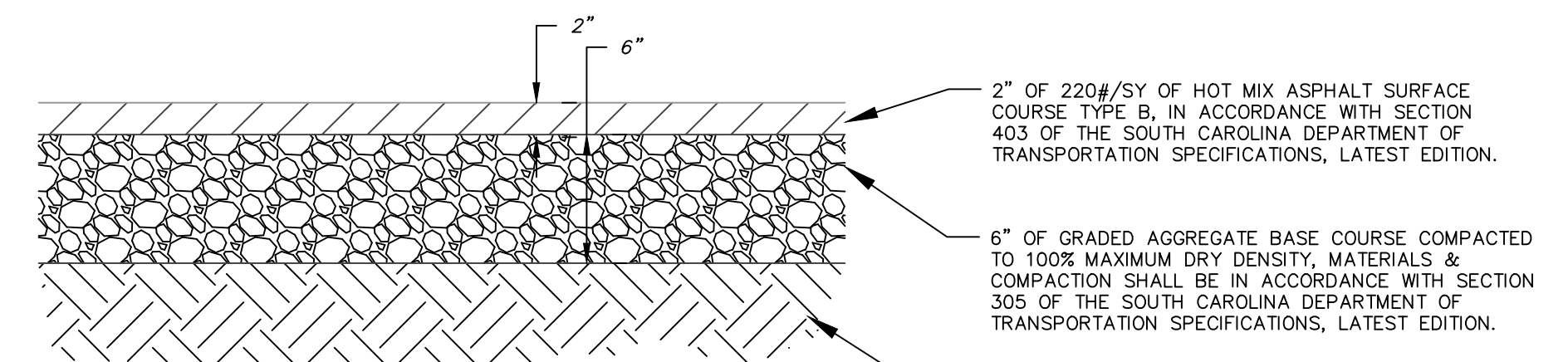
- NOTE:
1. ALL STONE TO BE CLEAN, DOUBLE-WASHED FREE OF ALL FINES.
 2. CONTRACTOR SHALL REFER TO TO PAVEMENT AND SUBGRADE PREP RECOMMENDATIONS PRESENTED IN THE GEOTECHNICAL INVESTIGATION REPORT.



FIRE DRIVE DETAIL

N.T.S.

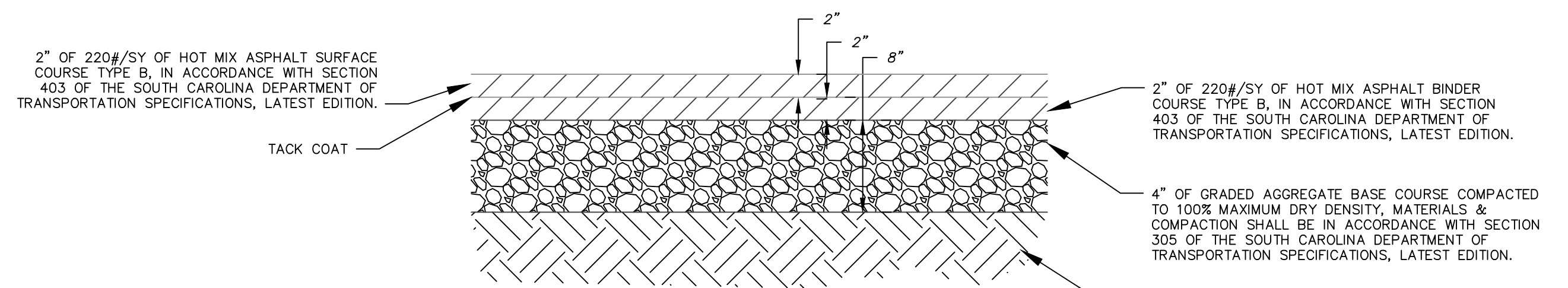
- NOTE:
1. ALL STONE TO BE CLEAN, DOUBLE-WASHED FREE OF ALL FINES.
 2. CONTRACTOR SHALL REFER TO TO PAVEMENT AND SUBGRADE PREP RECOMMENDATIONS PRESENTED IN THE GEOTECHNICAL INVESTIGATION REPORT.



LIGHT-DUTY ASPHALT PAVING DETAIL

N.T.S.

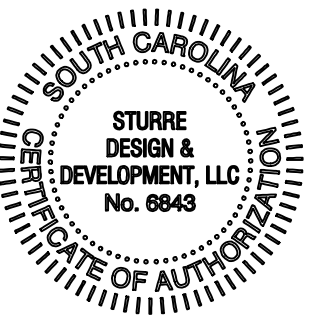
- NOTE:
1. ALL STONE TO BE CLEAN, DOUBLE-WASHED FREE OF ALL FINES.
 2. CONTRACTOR SHALL REFER TO TO PAVEMENT AND SUBGRADE PREP RECOMMENDATIONS PRESENTED IN THE WHITAKER LABORATORY, INC. GEOTECHNICAL INVESTIGATION REPORT.
 3. A MINIMUM MAT TEMPERATURE OF 185°F MUST BE MAINTAINED THROUGH FINAL ROLLER PASS.



HEAVY-DUTY ASPHALT PAVING DETAIL

N.T.S.

- NOTE:**
1. ALL STONE TO BE CLEAN, DOUBLE-WASHED FREE OF ALL FINES.
 2. CONTRACTOR SHALL REFER TO TO PAVEMENT AND SUBGRADE PREP RECOMMENDATIONS PRESENTED IN THE WHITAKER LABORATORY, INC. GEOTECHNICAL INVESTIGATION REPORT.
 3. A MINIMUM MAT TEMPERATURE OF 185°F MUST BE MAINTAINED THROUGH FINAL ROLLER PASS.



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PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88

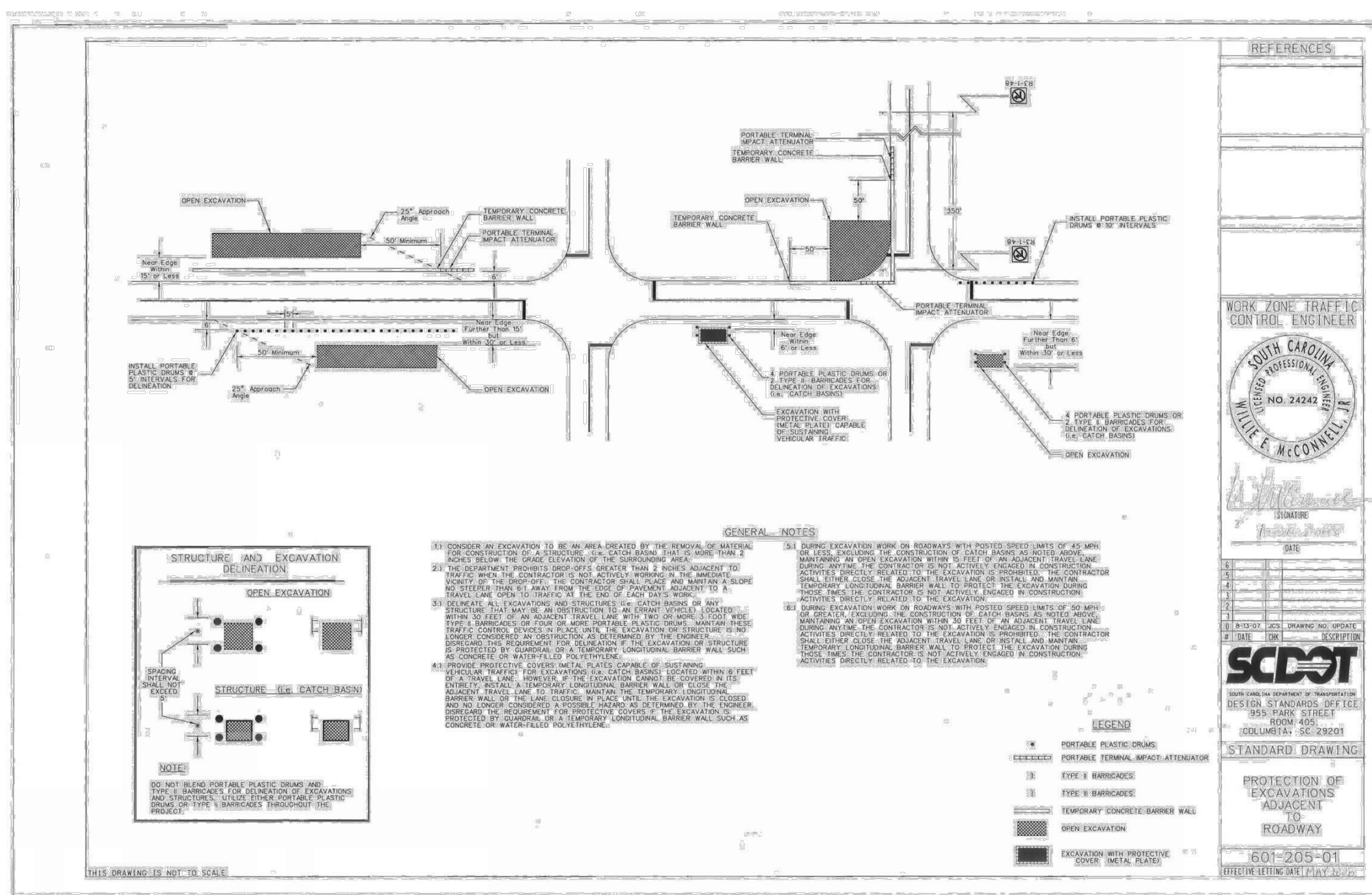


REV #	DATE	DESCRIPTION

DATE 02/13/2025

SHEET NAME

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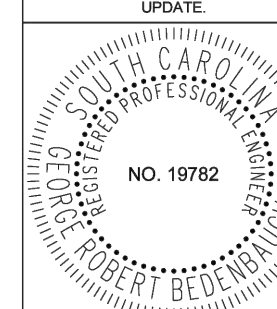
REFERENCES

NATIONAL DOCUMENTS

SCDOT DOCUMENTS	
SCM-714	PCOM-65
QPL 16	QPL 16
714-105-01	714-205-01

RELATED DRAWINGS & KEYWORDS	
714-105-01	714-205-01

THIS DRAWING IS ONLY VALID FOR CONSTRUCTION WHEN SEALED AND SIGNED BY A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF SOUTH CAROLINA. CHECK WWW.SCDOT.ORG FOR LATEST UPDATE.



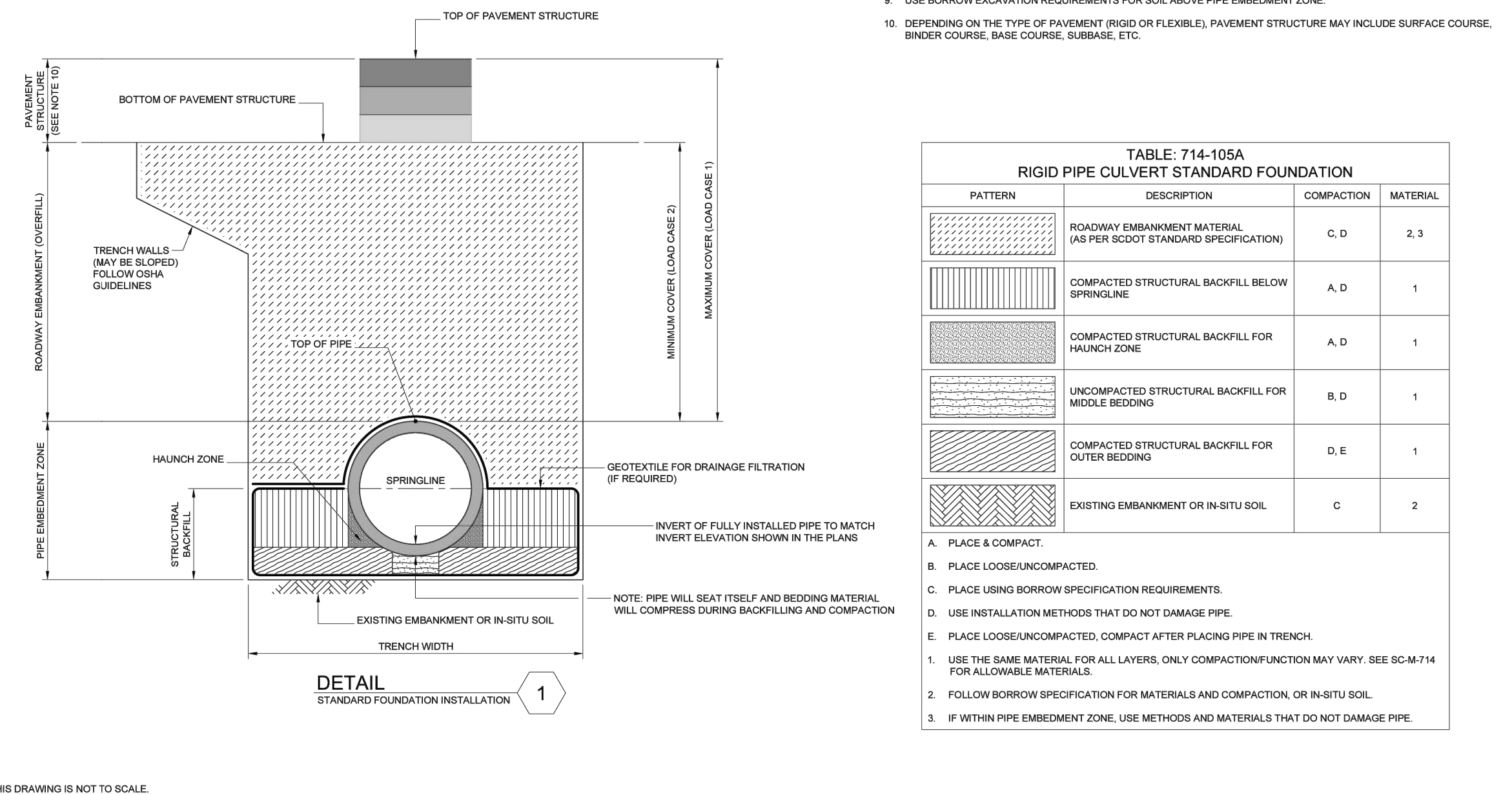
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11/09/20
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SCDOT
SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION
DESIGN STANDARDS OFFICE
1001 PARK STREET
COLUMBIA, SC 29201
ROOM 405
COLUMBIA, SC 29201

STANDARD DRAWING
PIPE CULVERTS
COMPLETED TRENCH
(STANDARD FOUNDATION)

714-105-00
EFFECTIVE/LETTING DATE: JANUARY 2011 THIS DRAWING IS NOT TO SCALE.



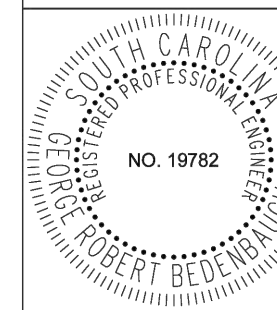
REFERENCES

NATIONAL DOCUMENTS	
AASHTO M81, M170, M198, M266, M302, M315, M336, T16, T104	
ASTM C443, C590	

SCDOT DOCUMENTS	
SCM-714	PCOM-65
QPL 16	QPL 16
714-105-01	714-205-01

RELATED DRAWINGS & KEYWORDS	
714-105-01	714-105-01
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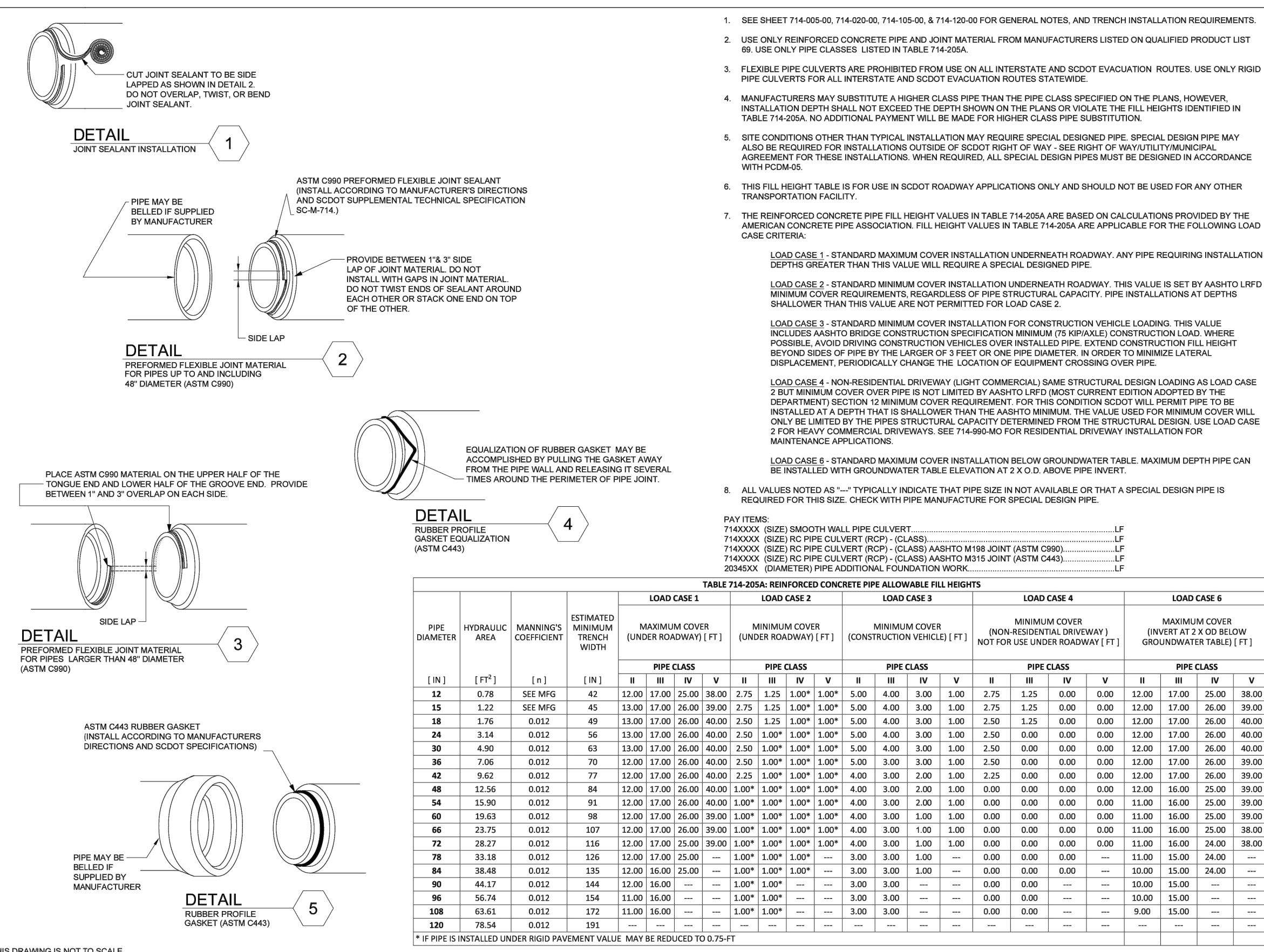
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SCDOT
SOUTH CAROLINA DEPARTMENT OF TRANSPORTATION
DESIGN STANDARDS OFFICE
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ROOM 405
COLUMBIA, SC 29201

STANDARD DRAWING
PIPE CULVERTS
SMOOTH WALL
(RIGID REINFORCED CONCRETE PIPE (RCP))
DETAILS & FILL HEIGHT

714-205-01
EFFECTIVE/LETTING DATE: JULY 2011 THIS DRAWING IS NOT TO SCALE.



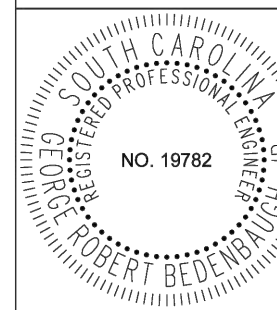
REFERENCES

NATIONAL DOCUMENTS	
AASHTO M264, ASTM D148, ASTM D2321, ASTM D3350, ASTM F477	

SCDOT DOCUMENTS	
SCM-714	PCOM-65
QPL 30	QPL 30

RELATED DRAWINGS & KEYWORDS	
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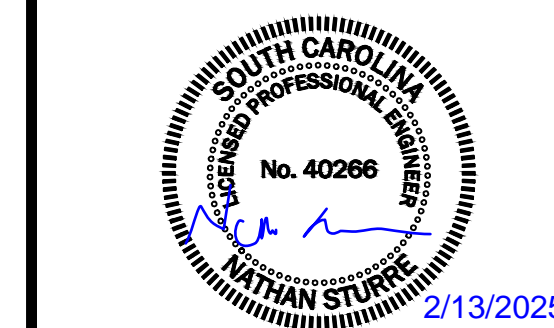
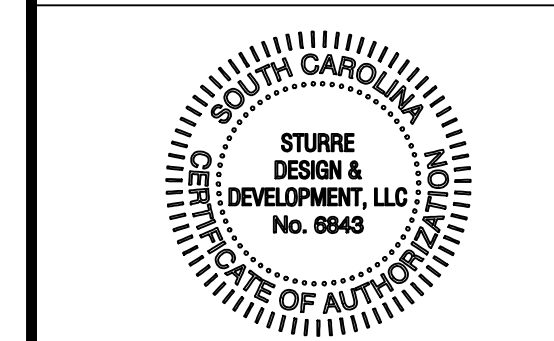
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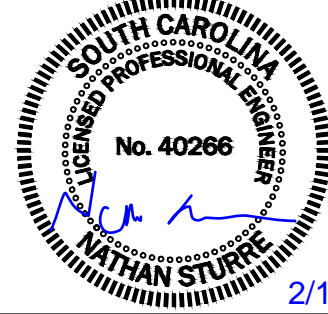
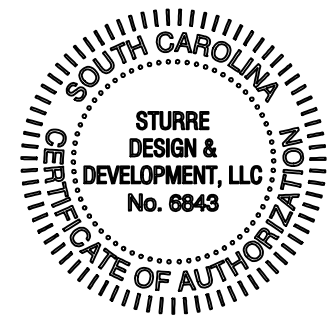


ENGINEER OF RECORD

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843.929.9432

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RIDGELAND, SC 29936
SCPLS #: 28139
TEL: 843.645.9277



2/13/2025

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PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

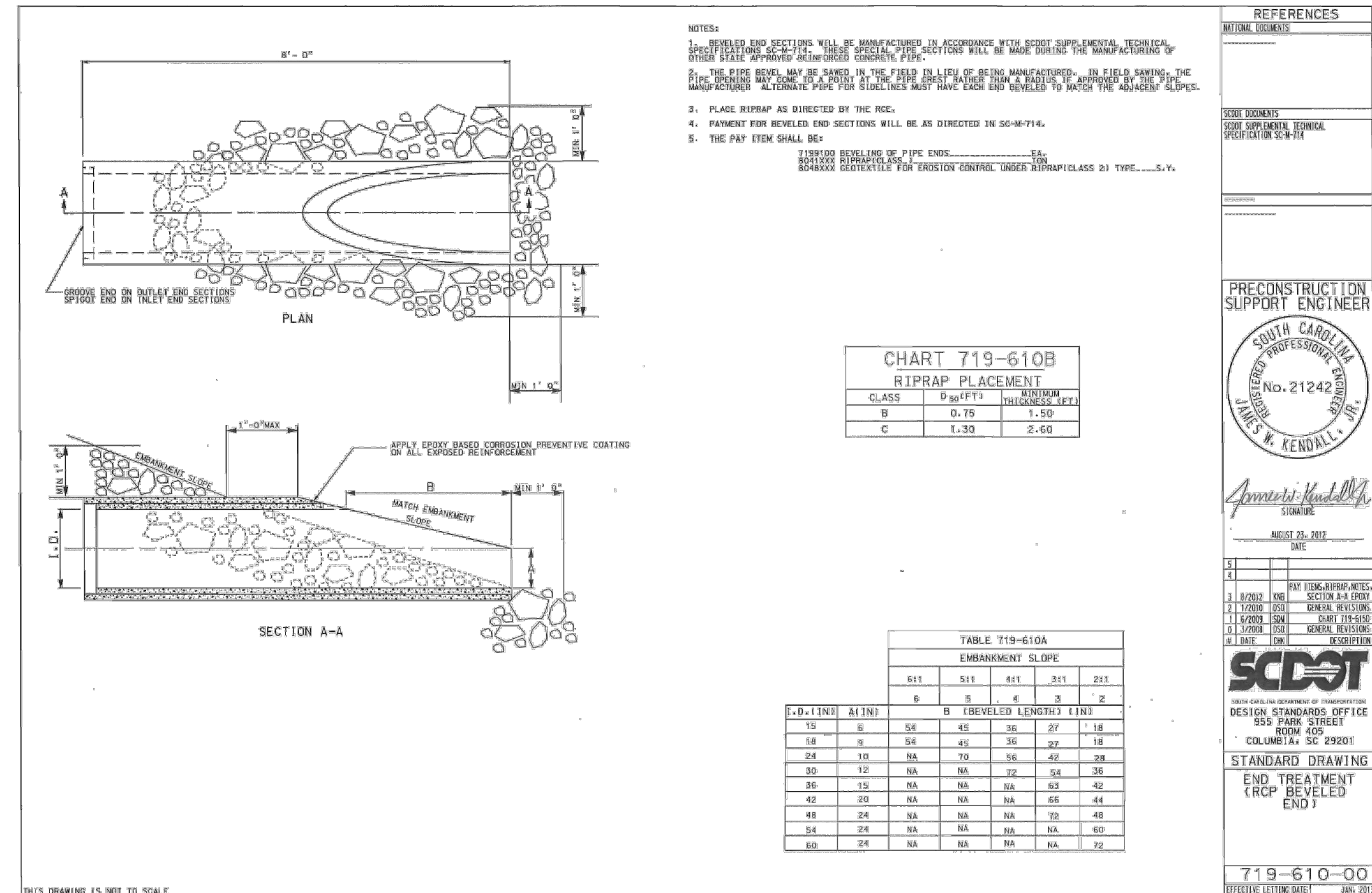
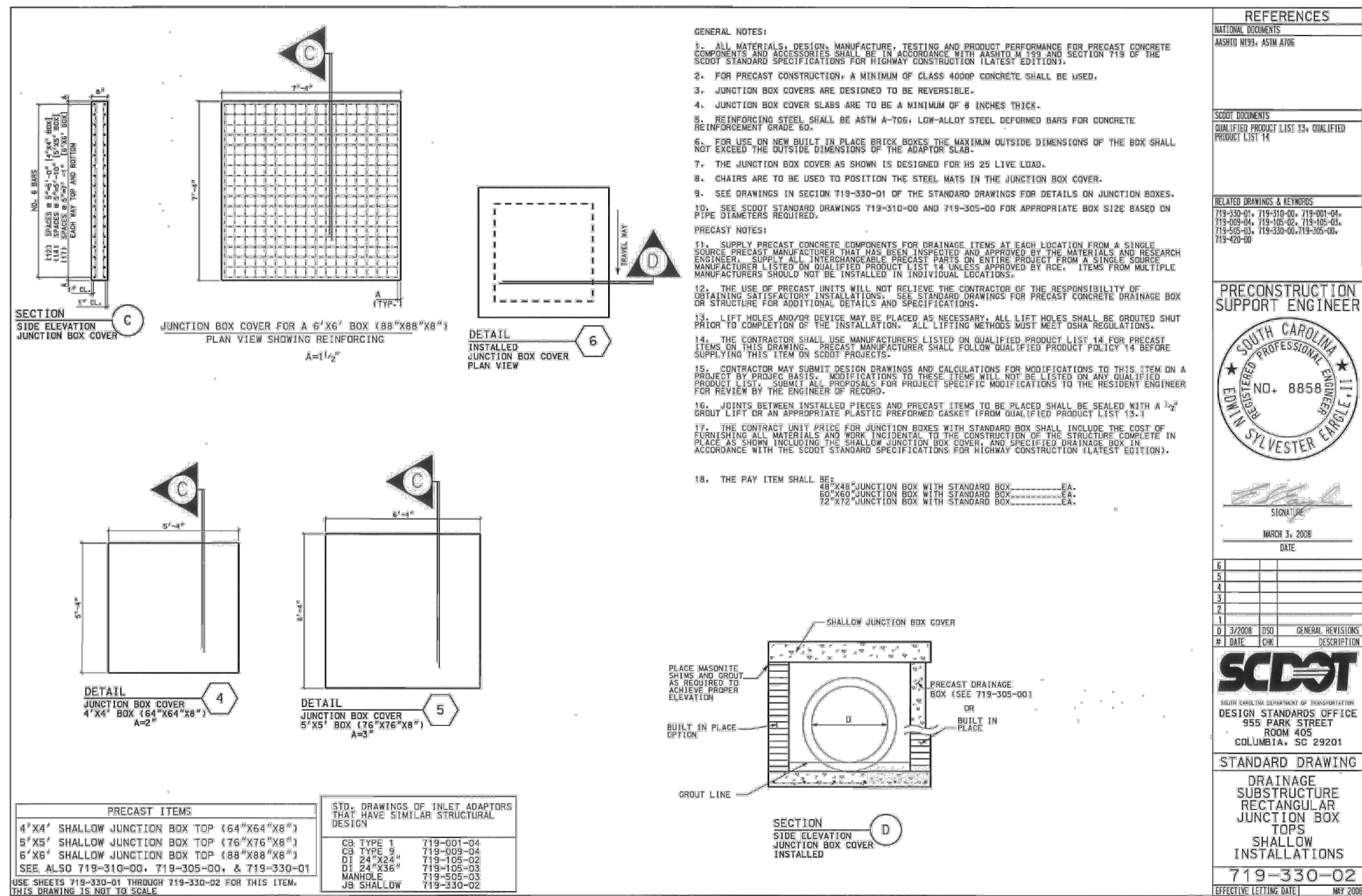
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STATE PLANE: NAD83
VERT. DATUM: NAVD88

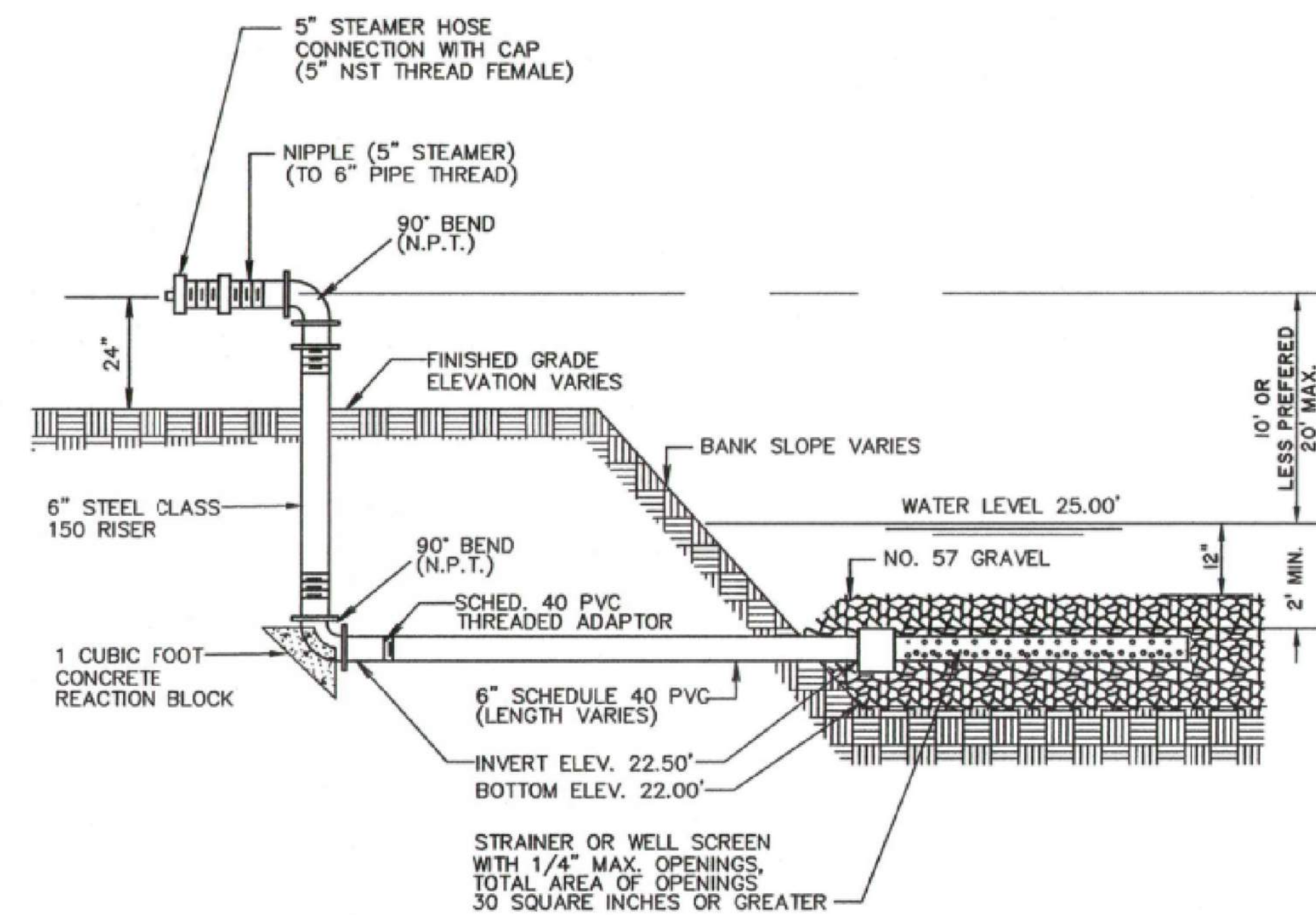
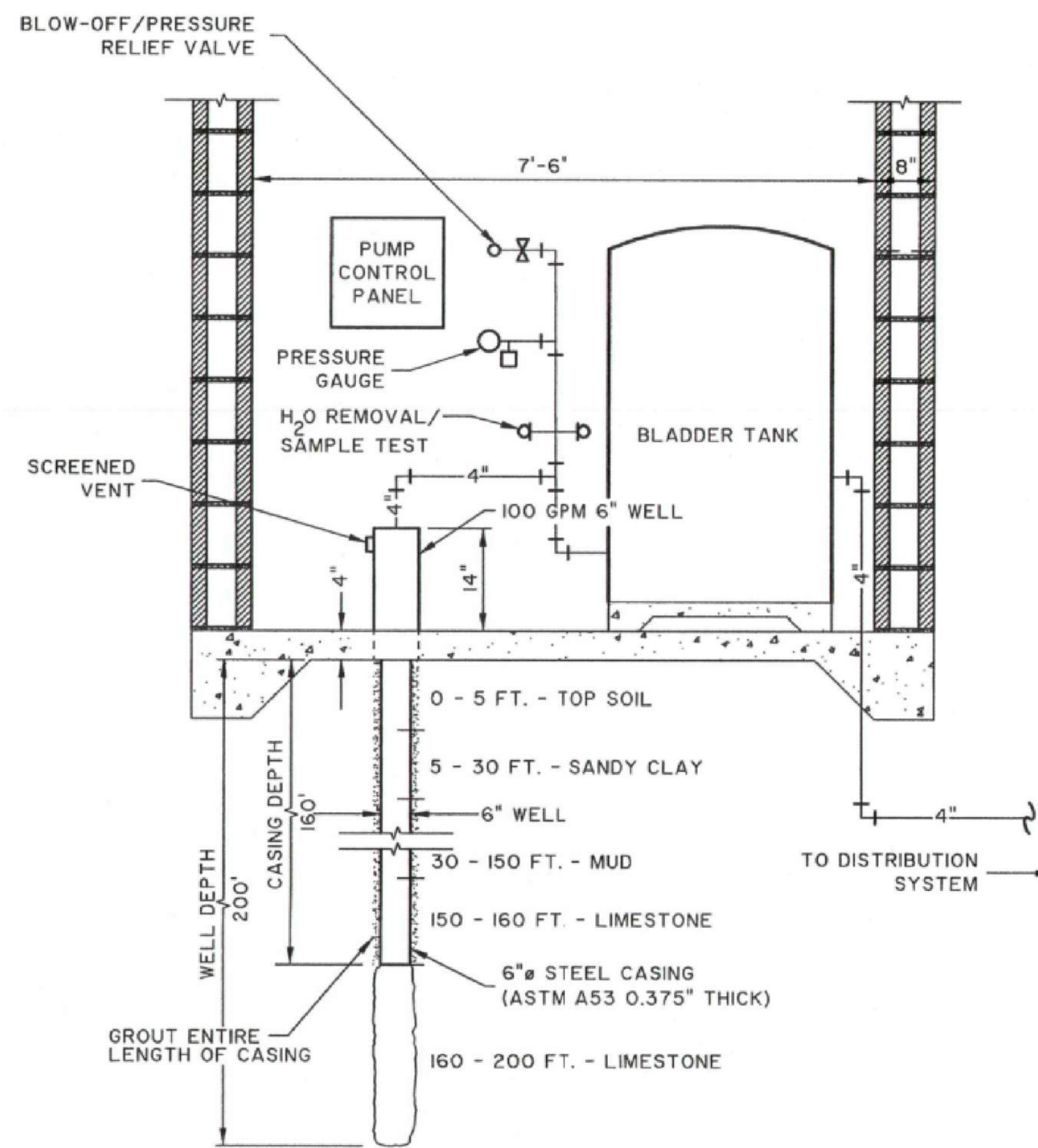
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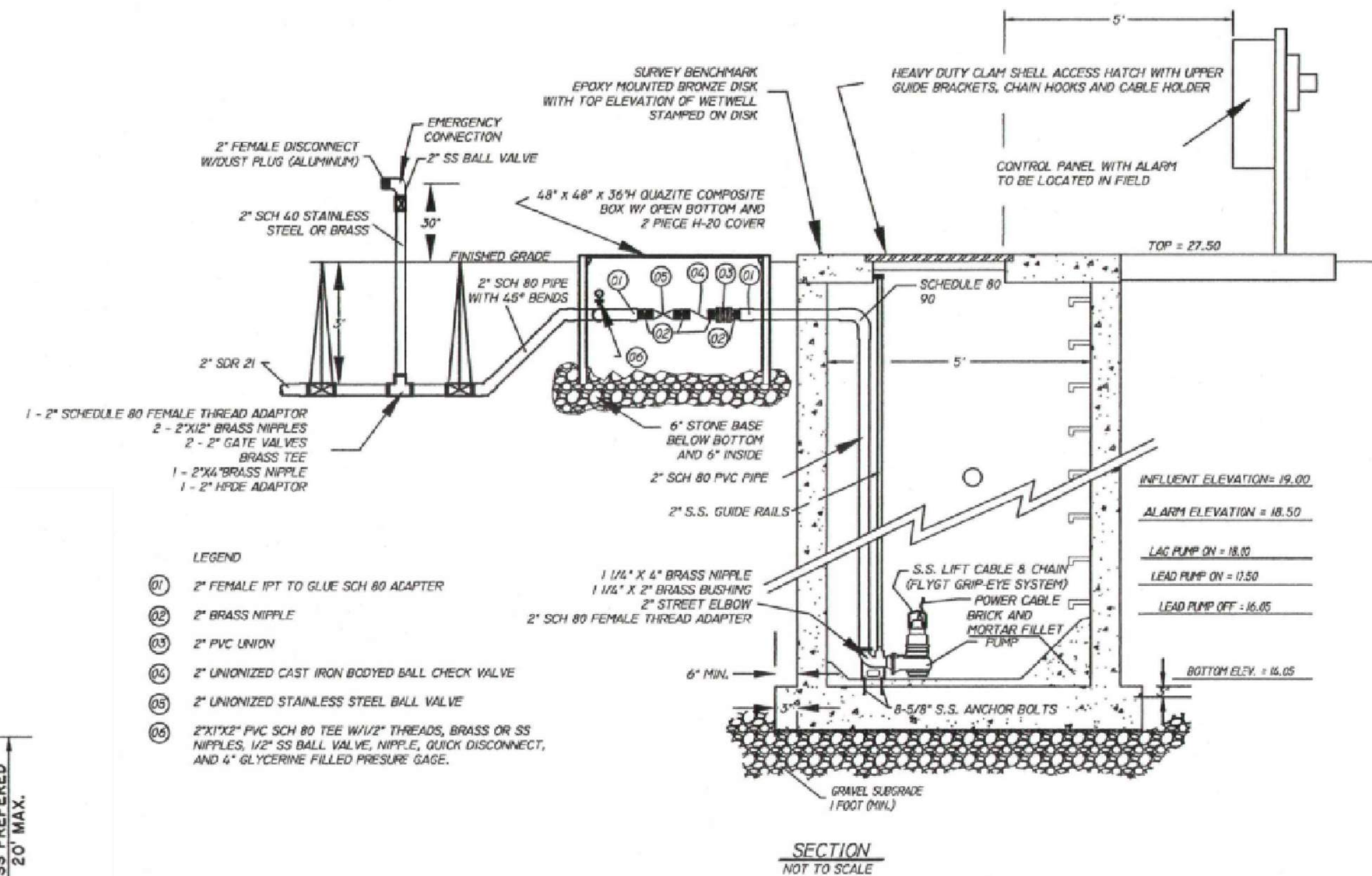
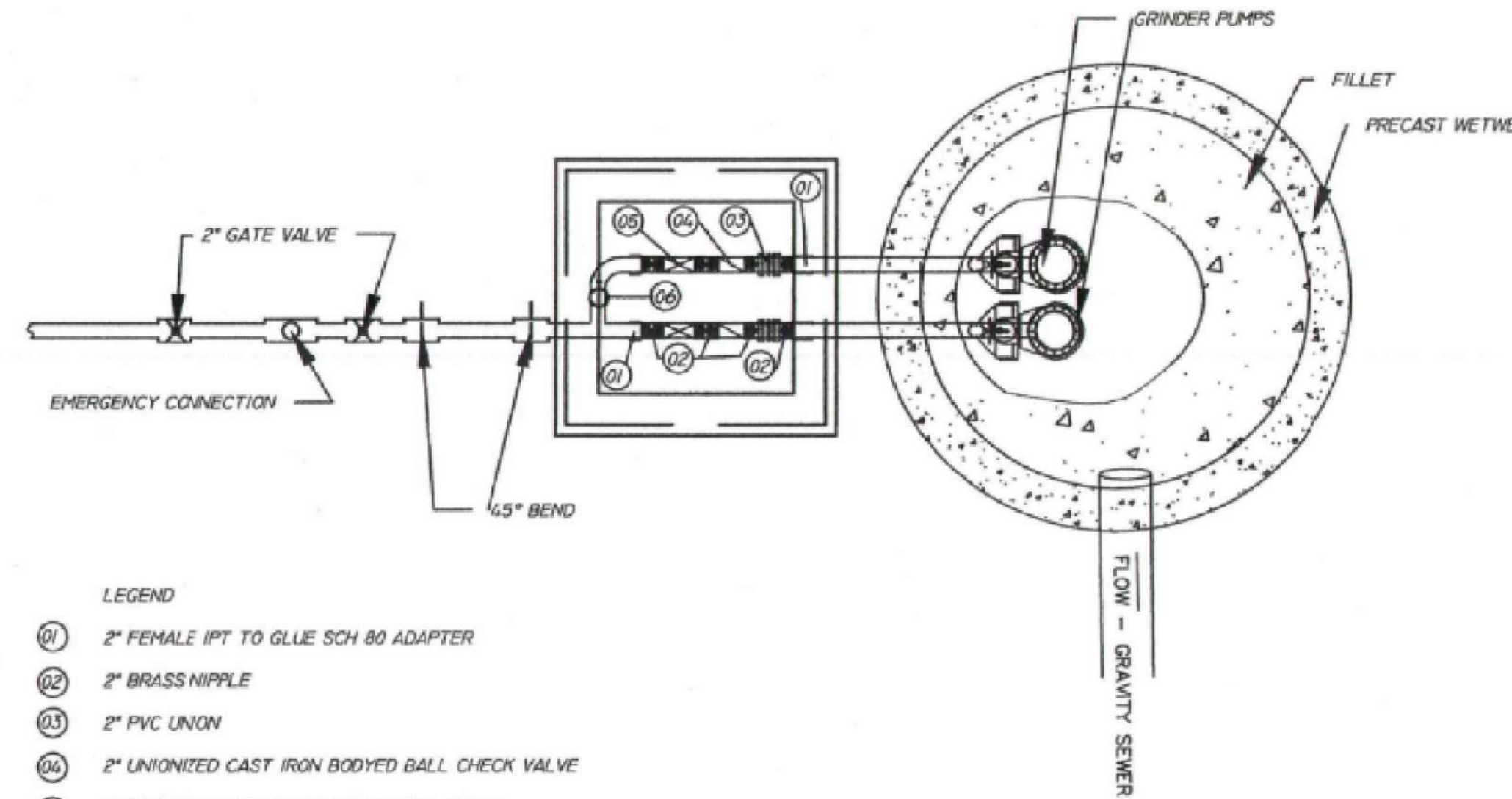
CIVIL DETAILS

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NOTE: THE PRECAST MANUFACTURER IS TO PREPARE AND SUBMIT TO THE ENGINEER DESIGN DETAILS AND CALCULATIONS FOR THE STRUCTURE SHOWN BASED ON THE DESIGN CRITERIA SPECIFIED. THE DESIGN SHALL BE PERFORMED UNDER THE DIRECT SUPERVISION OF, AND SEALED BY A PROFESSIONAL ENGINEER REGISTERED IN THE STATE OF SOUTH CAROLINA AND EXPERIENCED IN THE DESIGN OF PRECAST CONCRETE. THE DESIGN SHALL INCLUDE PROVISIONS FOR HANDLING STRESSES AND CONSTRUCTION LOADS. REPRODUCE COPIES OF ASTM C779 "STANDARD SPECIFICATION FOR REINFORCED CONCRETE BOX SECTIONS FOR CULVERTS, STORM DRAINS AND SEWERS" WILL NOT BE ACCEPTED AS A SUBSTITUTE FOR DESIGN.



EXISTING PUMP STATION

WET WELL DESIGN SCHEDULE

DESCRIPTION	ELEV.
FIN. GRADE ELEV.	27.5
INFLUENT ELEV.	19.00
ALARM ELEV.	18.50
START LAG PUMP	18.00
H.W.L. ELEV.	17.50
L.W.L. ELEV.	16.05
BOTTOM ELEV.	14.05
WET WELL DIA.	5'

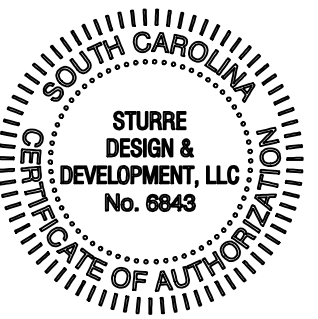
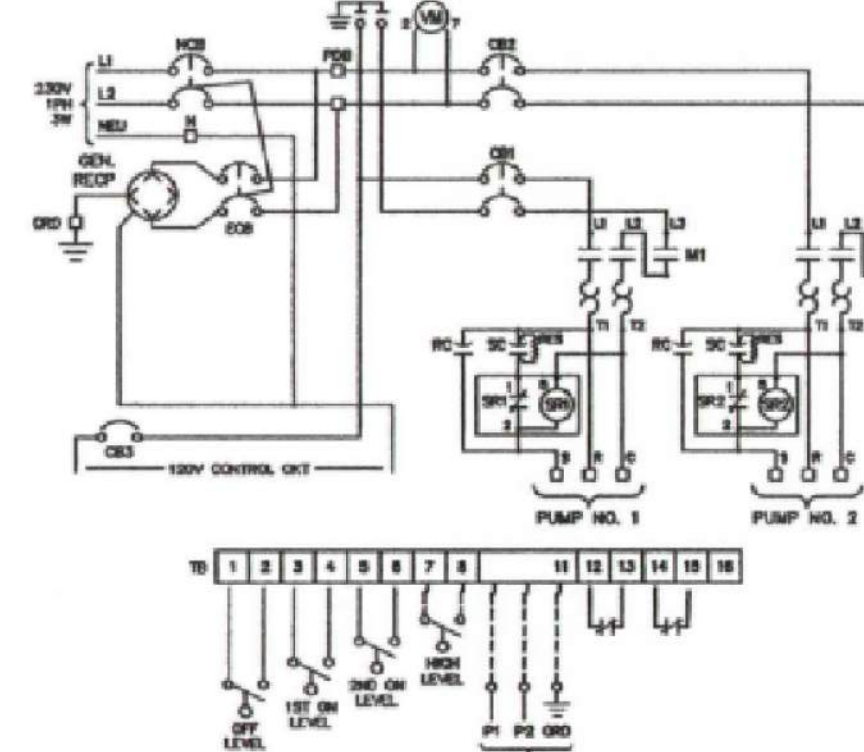
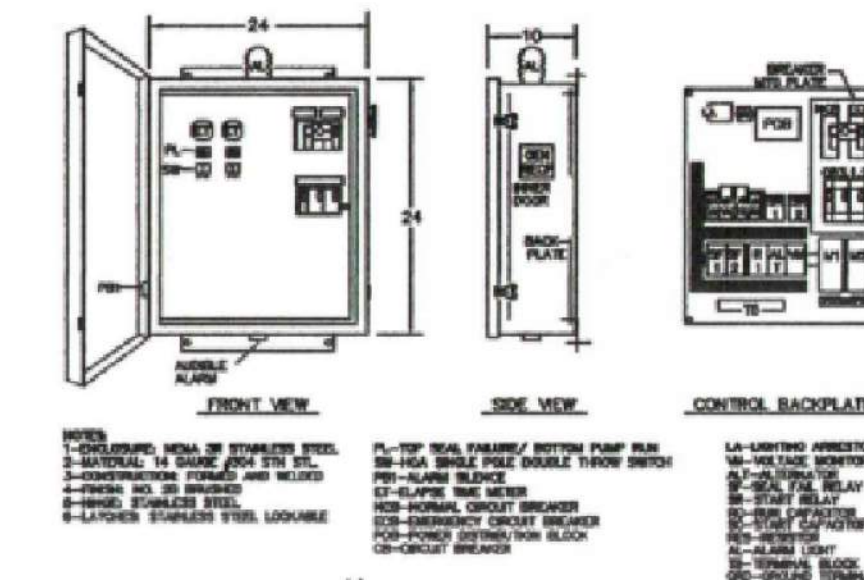
PUMP DESIGN SCHEDULE

DESCRIPTION	PUMP
T-D-H	28
PUMP CAP.(GPM)	20
RPM	3450
PHASE	1
VOLTAGE	230
MIN. HP	21

Furnish two ABS heavy duty submersible grinder pumps. Pump shall be connected to the discharge piping when lowered onto the discharge connection by one 2" dia. Sch40 SDR30.5 Pump. Pump shall be connected with rotating cutter mounted on the pump shaft. The stationary cutter shall be mounted in the adjustable bottom plate. Shredding shall occur between the rotating and stationary cutters. The cutter shall be super abrasive material and hardness of 58-62 Rockwell C. Each pump shall be equipped with two seals. The lower shall be mechanical type with silicon carbide seal. The oil chamber shall be filled with a moisture proof extending from the bottom of the motor housing into the oil chamber. The pump motor shall be air filled and have class "F" insulated motor. Thermal switches. Thermal switches shall be imbedded into each phase of the winding to sense high temperature.

Float holder and upper guide roll brackets shall be made with 304SS only.

Float switches shall be UL listed type "S-RotoFloat" manufactured by Anchor Scientific, Inc. with 30 feet of STG PVC cable.



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PREPARED FOR:

CORNERSTONE CHURCH

PROJECT:

CORNERSTONE CHURCH NEW
RIVERSIDE CAMPUS

HORIZ. DATUM:
STATE PLANE: NAD83
VERT. DATUM: NAVD88

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PLAN REVIEW COMMENTS FOR DP-02-25-019597

Town of Bluffton
 Department of Growth Management
 20 Bridge Street P.O. Box 386 Bluffton, South Carolina 29910
 Telephone 843-706-4522
 NEW RIVERSIDE VILLAGE

Plan Type:	Development Plan	Apply Date:	02/14/2025
Plan Status:	Active	Plan Address:	11 Grassey Lane BLUFFTON, SC 29910
Case Manager:	Dan Frazier	Plan PIN #:	R610 036 000 0014 0000
Plan Description:	<p>A request by Sturre Engineering on behalf of Cornerstone Church for approval of a Preliminary Development Plan application. The project consists of site improvements to accommodate a new assembly hall and offices for church operations including stormwater, parking and associated infrastructure. The property is zoned Agricultural (AG) and Rural Mixed Use (RMU) and consists of approximately 41.3 acres identified by tax map number R610 036 000 0014 0000 and located south of May River Road approximately 600 feet east of Stardust Lane.</p> <p>STATUS: This item will be heard at the March 26, 2025 Development Review Committee meeting.</p>		

Technical Review

Submission #: 1 Received: 02/14/2025 Completed: 03/21/2025

Reviewing Dept.	Complete Date	Reviewer	Status
Watershed Management Review DRC	03/21/2025	Samantha Crotty	Revisions Required

Comments:

1. Provide a pre-development land cover exhibit and a post-development land cover exhibit showing only the land covers outlined in the compliance calculator.
 2. Provide a BMP exhibit only showing areas of BMPs proposed in the compliance calculator.
 3. Infiltration practices do not have underdrains (SWDM 4.5). Change all underdrained infiltration basins to bioretention - standard in the compliance calculator and revise notes/details in the site plans.
 4. Pre-development and post-development area summary tables on sheet 17 of the site plans do not match values in the compliance calculator.
 5. Provide contours and contour labels in all BMPs on the site plans.
- At time of stormwater submittal:
6. Infiltration basin geometry should have side-slopes no steeper than 4H:1V (SWDM 4.5.4). Revise detail.
 7. Provide infiltration basin detail that meets requirements of SWDM 4.3, to include surface stone layer, stone layer, observation well, sand layer, and geotextile fabric.
 8. Show pre-treatment areas for all infiltration BMPs (SWDM 4.5.3).

Fire Department Review	03/21/2025	Dan Wiltse	Approved with Conditions
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Comments:

1. Confirm via third-party certification that dry hydrants will meet 1250 GPM requirement.

Planning Review - Principal	03/21/2025	Dan Frazier	Approved with Conditions
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Comments:

1. Trees proposed to be removed in Landscape Plan (Sheets 501 - 506) conflict with trees proposed to be removed in Tree Exhibit. The Tree Exhibit appears to reflect additional trees that may be removed based the Arborist recommendations. Clarify.
2. Staff may be able to provide flexibility on the "maximum eight parking spaces allowed without a parking island" requirement where it is demonstrated that trees can be saved.
3. Additional information regarding parking lighting will be required at time of final development plan submittal.

Beaufort Jasper Water and Sewer Review	03/21/2025	Matthew Michaels	Approved
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Building Safety Review	03/21/2025	Marcus Noe	Approved
Planning Review - Address	03/21/2025	Diego Farias	Approved
Police Department Review	03/21/2025	Bill Bonhag	Approved
Planning Commission Review	03/07/2025	Angie Castrillon	Approved
Comments: No comments.			
Transportation Department Review	02/18/2025	Mark Maxwell	Approved

Plan Review Case Notes: