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OLD STEAM PLANT STEAM AND  
CONDENSATE PIPE PIPE REPLACEMENT  
PROJECT NUMBER H27-2338-B  
COLUMBIA, SC  
CONSTRUCTION DOCUMENTS

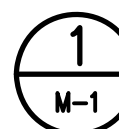
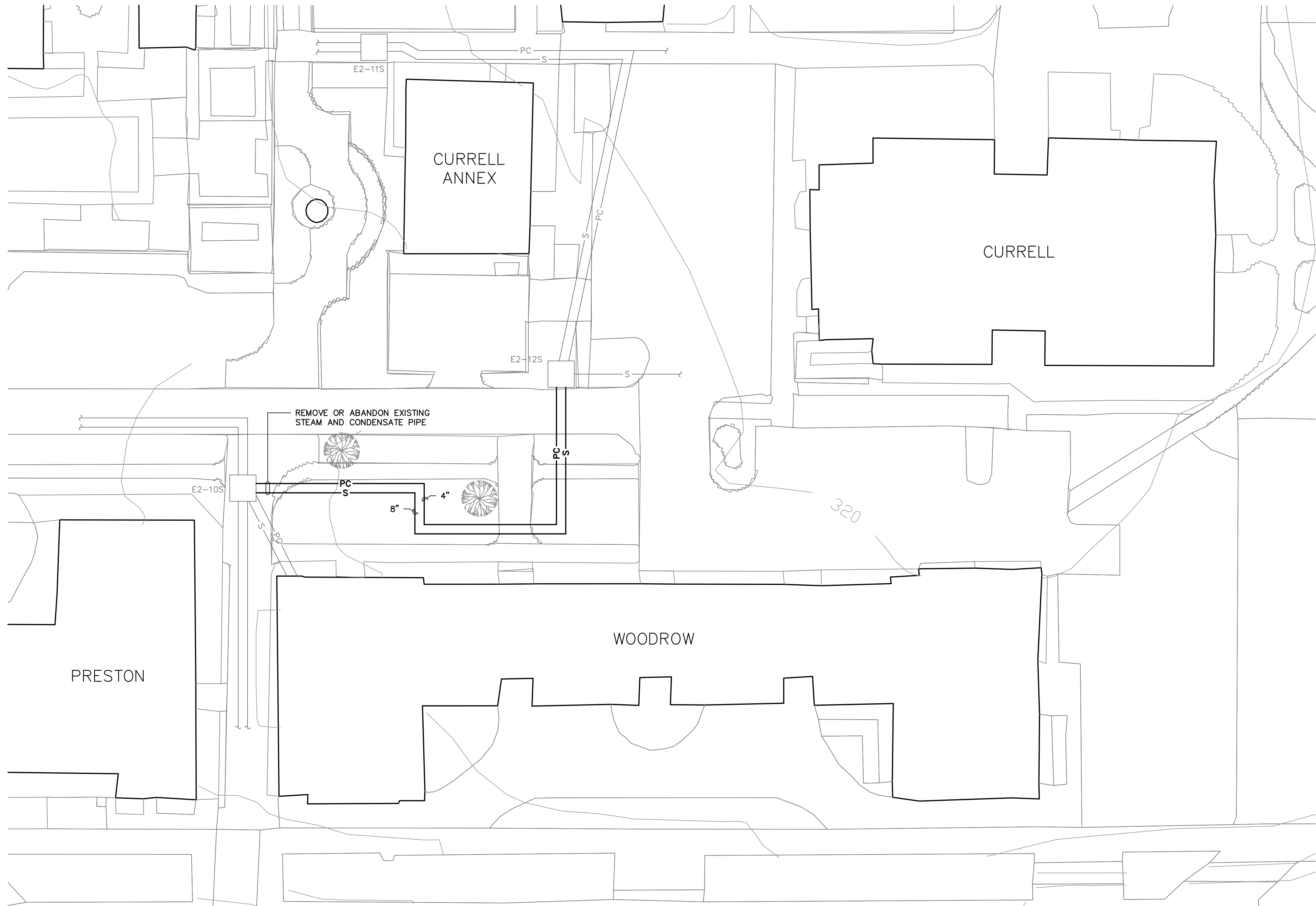
DRAWING INDEX	
<div>GENERAL</div> <div>T-1TITLE SHEET</div> <div>MECHANICAL</div> <div>M-1SITE PLAN</div> <div>M-2DETAILS, NOTES, MANHOLE DIAGRAMS AND LEGEND</div>	
CAMPUS PLANNING AND CONSTRUCTION COLUMBIA, SC 29208	
SEAL:	
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PROJECT TITLE: OLD STEAM PLANT STEAM AND CONDENSATE PIPE PIPE REPLACEMENT	
PROJECT # H27-2338-B	
University of South Carolina	
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Swygert & Associates

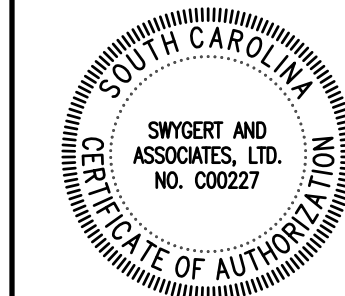
CONSULTING ENGINEERS

DBA Swygert & Assoc., Ltd. Telephone: (803) 791-9300  
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**SITE PLAN**  
SCALE: 1" = 20'



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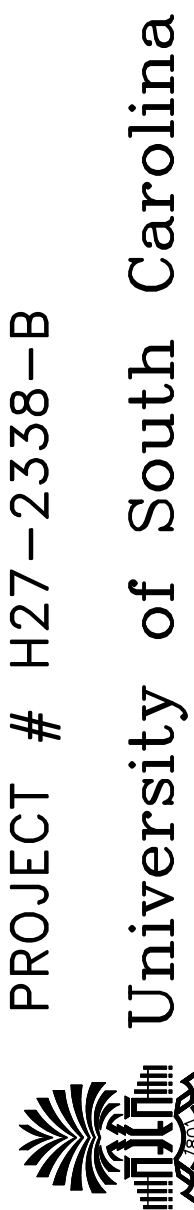
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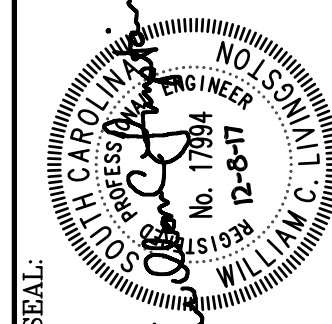
PROJECT TITLE: **OLD STEAM PLANT STEAM AND CONDENSATE PIPE PIPE REPLACEMENT**

PROJECT # **H27-2338-B**

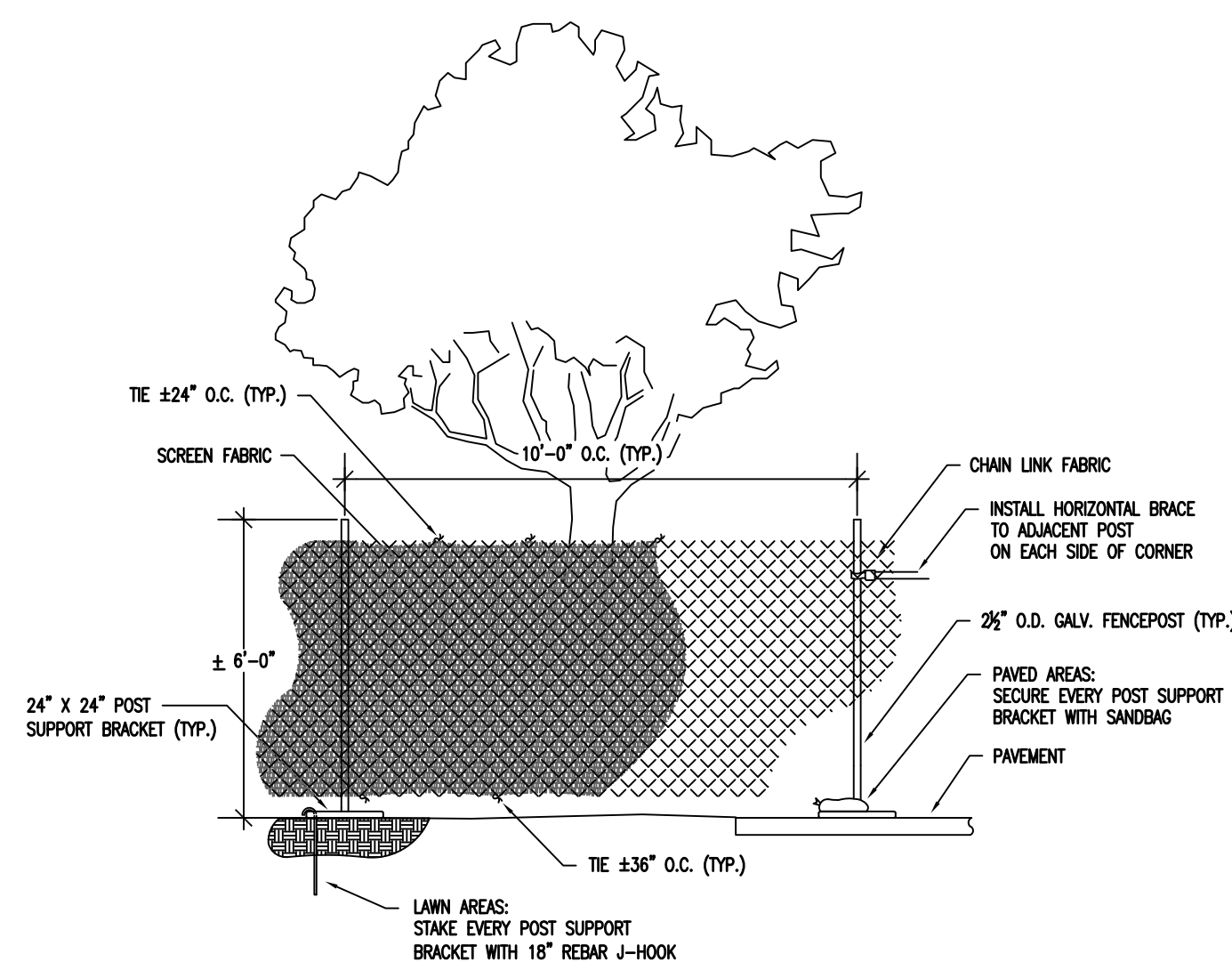


University of South Carolina

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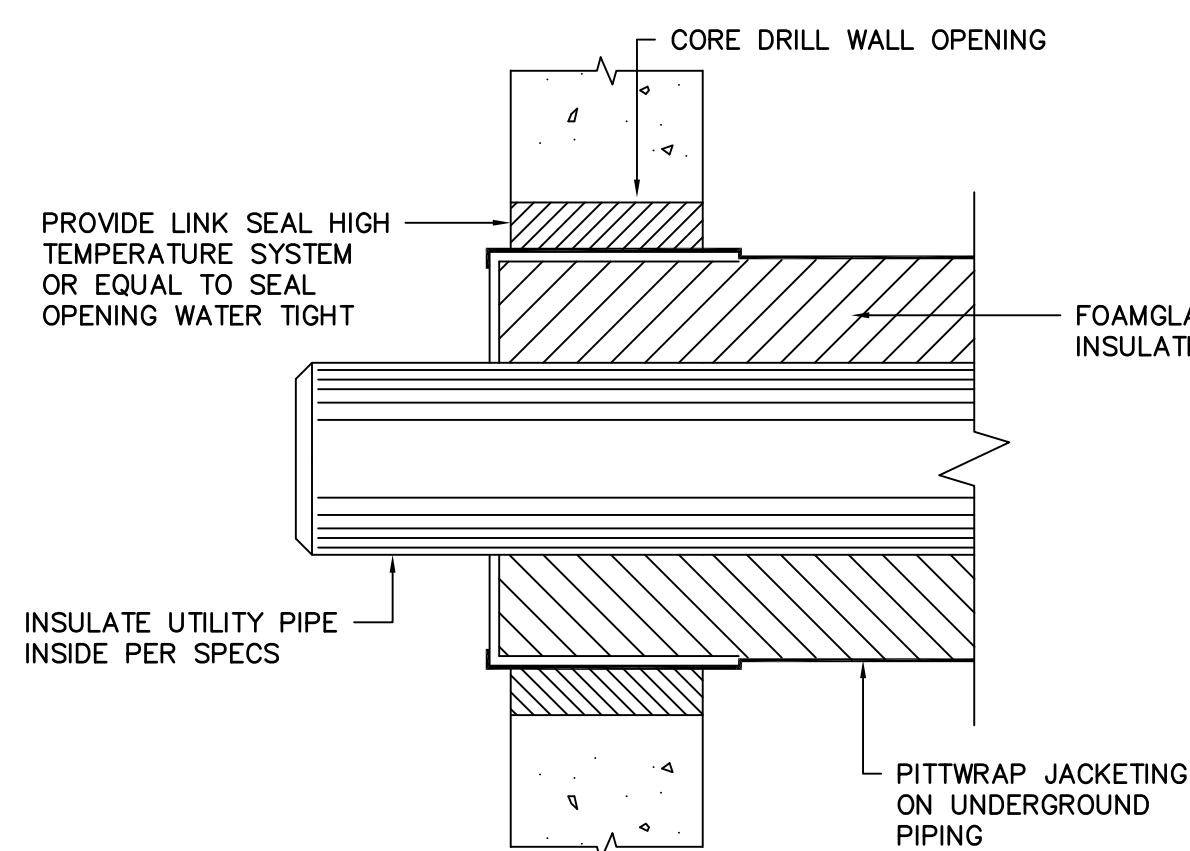
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COLUMBIA, SC 29208



- NOTES:
1. TREE PROTECTION FENCING SHALL BE PLACED BETWEEN ALL EXISTING TREES AND AROUND PROJECT WORK AREA AS APPROVED BY USC.
  2. SEE "USC SUPPLEMENTAL GENERAL CONDITIONS FOR CONSTRUCTION PROJECTS" FOR ADDITIONAL INFORMATION.
  3. PROVIDE PROTECTION FENCING FOR ALL TREES TO REMAIN.
  4. PROTECTION FENCING TO BE PLACED OUTSIDE OF DRILLPIE OF TREE CANOPY UNLESS OTHERWISE APPROVED BY USC PROJECT MANAGER.
  5. 4" LAYER OF HARDWOOD MULCH SHALL BE PLACED OVER TREE PROTECTION AREA.
  6. PROTECTION FENCING SHALL BE IN PLACE AND HARDWOOD MULCH PLACED PRIOR TO BEGINNING OF CONSTRUCTION.
  7. REQUESTS FOR PAYMENT SHALL NOT BE APPROVED UNTIL PROTECTION FENCING AND MULCH IS IN PLACE.
  8. LOCATION OF PROTECTION FENCING SHALL BE MARKED BY USC ARBORIST AND APPROVED BY USC PROJECT MANAGER BEFORE INSTALLATION. WHERE CONSTRUCTION IS LIKELY TO OCCUR WITHIN 5' OF PROPOSED LOCATION OF PROTECTION FENCING, THE LOCATION OF PROTECTION FENCING SHALL BE MARKED BY SURVEY BEFORE PROTECTION FENCING IS INSTALLED.
  9. SCREEN FABRIC SHALL BE DARK GREEN 85% OPAQUE, POLYETHYLENE, 18" HIGH, 100% UV PROTECTED, 100% RECYCLED, 100% P.S.I.

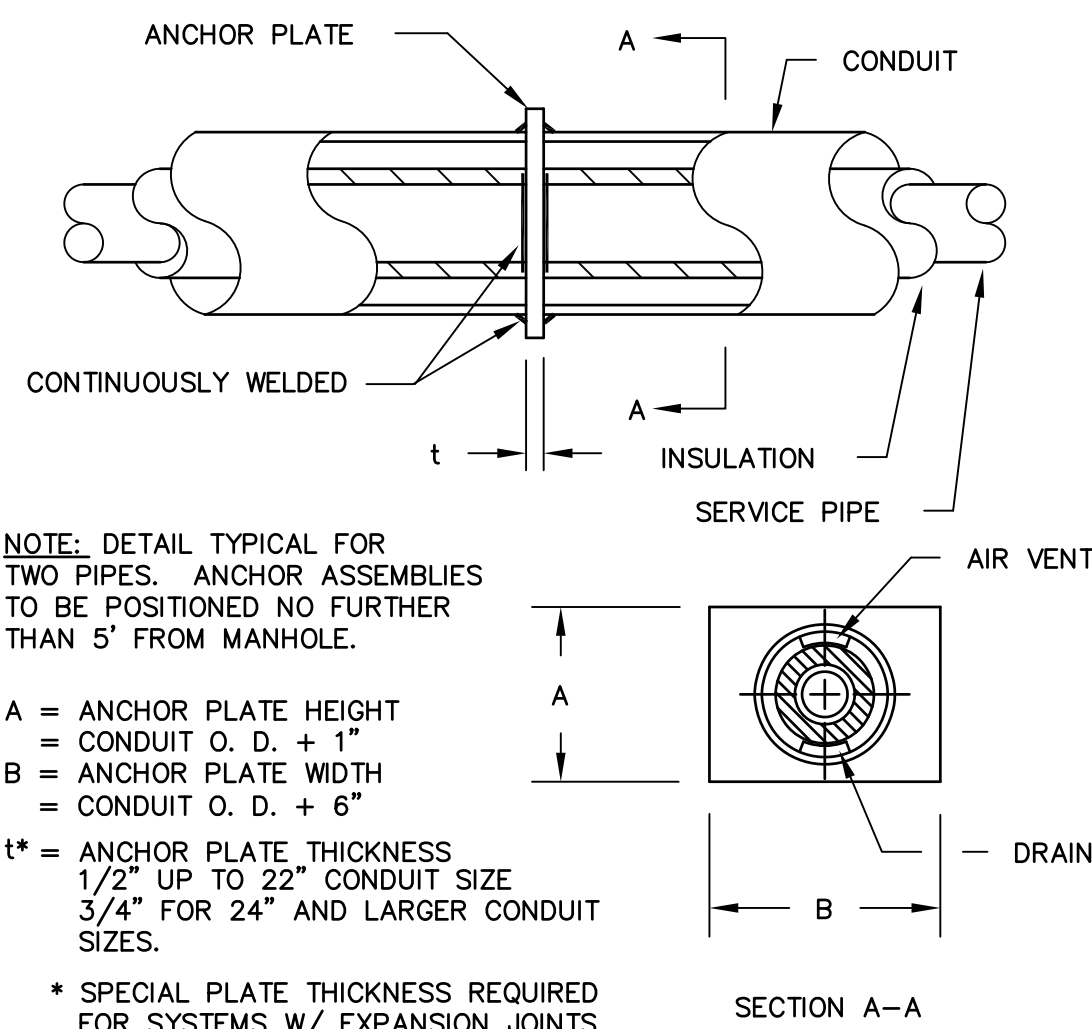
WORK AREA SCREENING AND  
TREE PROTECTION FENCE PANEL DETAIL

NO SCALE



## UTILITY PIPE ENTRY DETAIL

NO SCALE



**NOTE:** DETAIL TYPICAL FOR TWO PIPES. ANCHOR ASSEMBLIES TO BE POSITIONED NO FURTHER THAN 5' FROM MANHOLE.

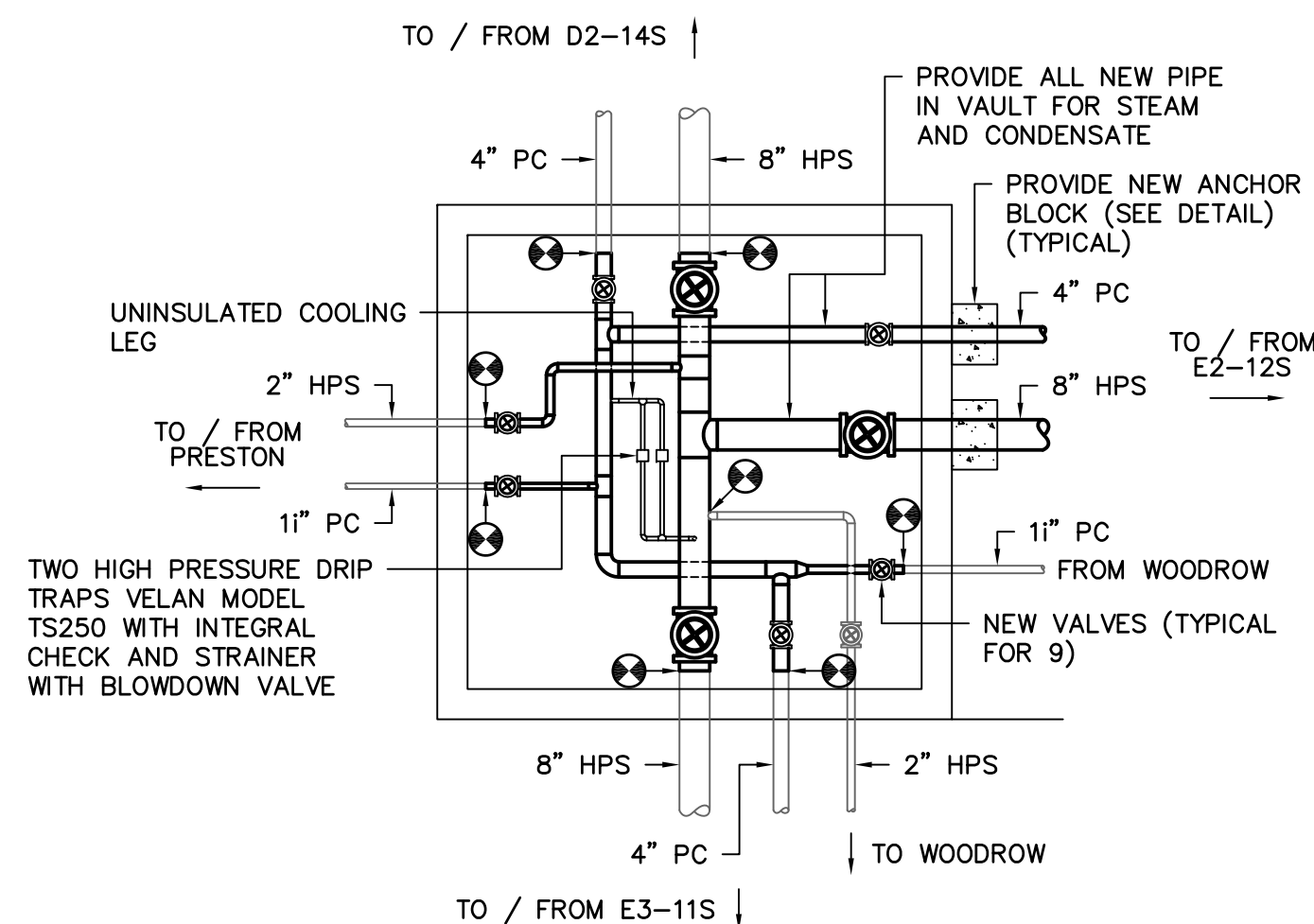
A = ANCHOR PLATE HEIGHT  
= CONDUIT O. D. + 1"  
B = ANCHOR PLATE WIDTH  
= CONDUIT O. D. + 6"  
t\* = ANCHOR PLATE THICKNESS  
1/2" UP TO 22" CONDUIT SIZE  
3/4" FOR 24" AND LARGER CONDUIT SIZES.

\* SPECIAL PLATE THICKNESS REQUIRED FOR SYSTEMS W/ EXPANSION JOINTS

NOTE: A CONCRETE BLOCK SHALL BE CAST OVER THE PLATE AND CONDUIT AND SHALL BE AT LEAST 30" IN LENGTH AND SHALL EXTEND A MINIMUM OF 9" BEYOND THE TOP AND BOTTOM OF ANCHOR PLATE.

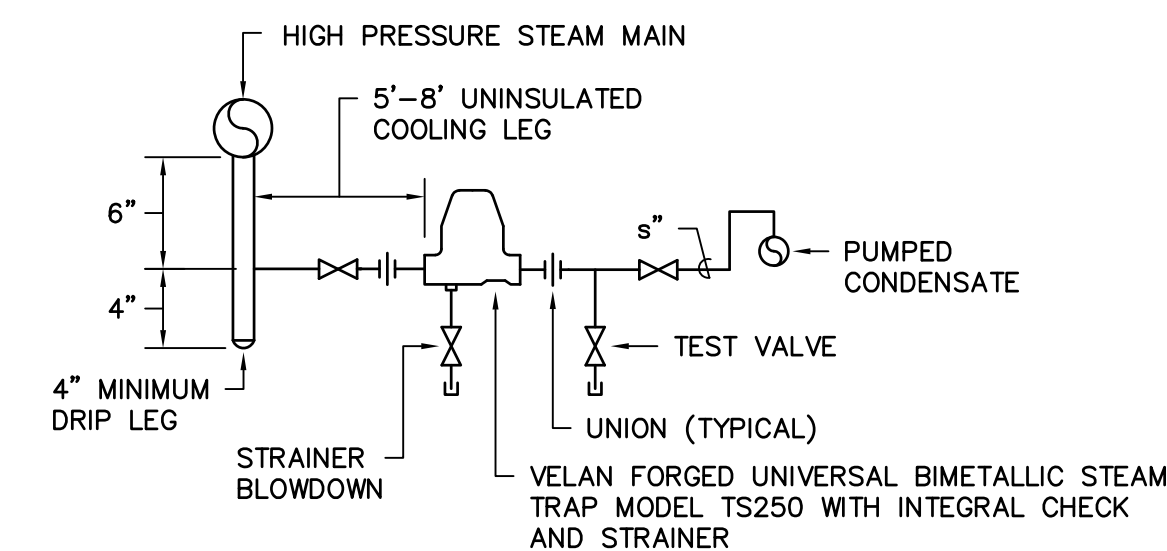
## STANDARD ANCHOR ASSEMBLY

NO SCALE



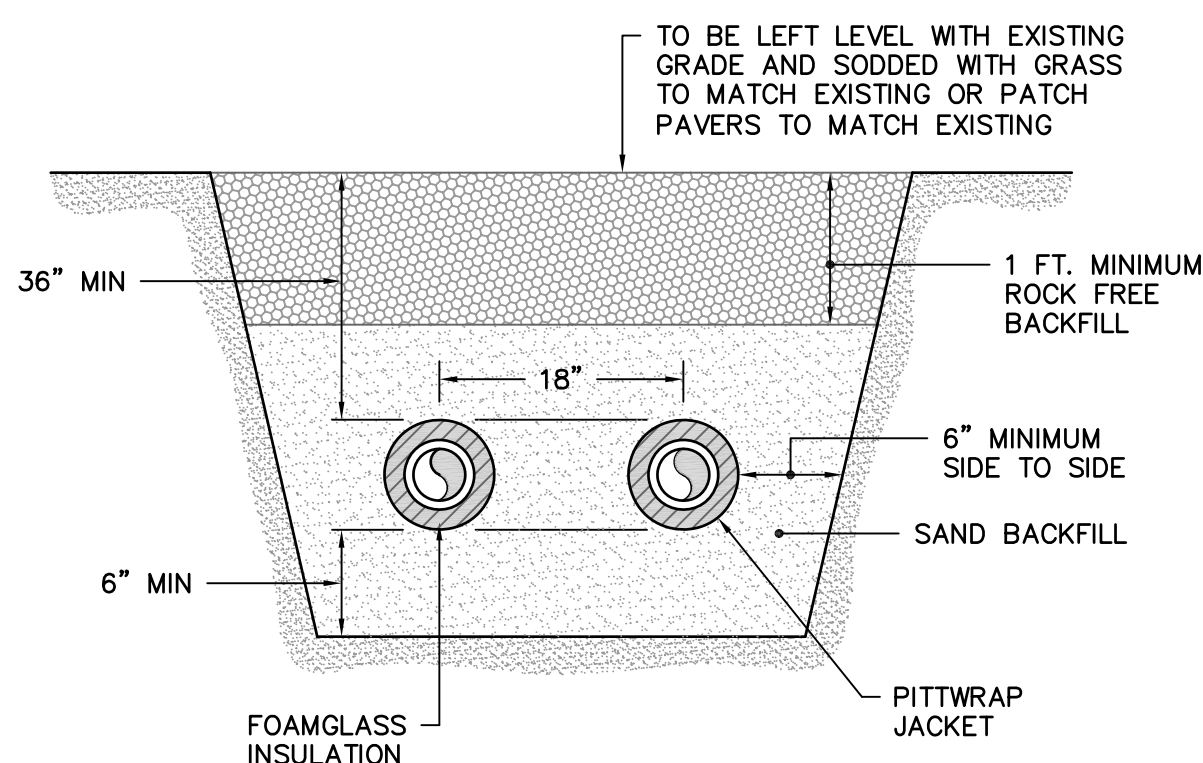
MANHOLE E2-10S

NO SCALE



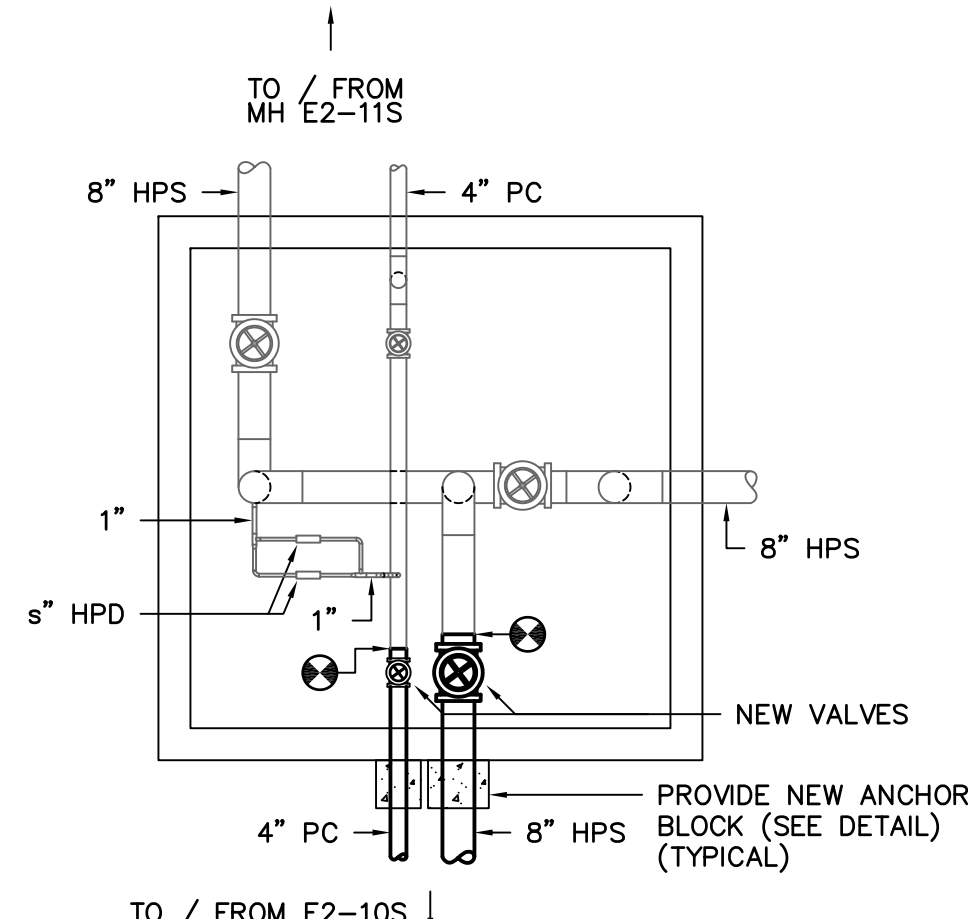
## HIGH PRESSURE DRIP POINT

NO SCALE



## BACKFILL DETAIL

NO SCALE



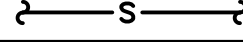




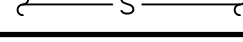




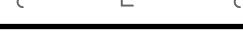
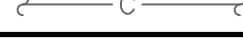





MANHOLE E2-12S

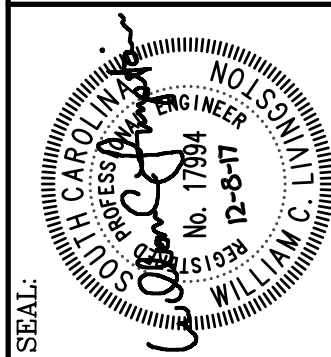
NO SCALE

## GENERAL NOTES

1. DO NOT SCALE DRAWINGS. VERIFY ALL REQUIRED INFORMATION IN THE FIELD BY VISITING SITE PRIOR TO SUBMITTING BID.
2. EXACT ROUTING OF PIPING SHALL BE SET IN FIELD TO MINIMIZE CONFLICTS WITH ALL ABOVE AND UNDERGROUND STRUCTURES, TREES, FENCES, WALKS, WALLS, AND UTILITIES.
3. ALL PIPING IS SHOWN DIAGRAMMATIC. HOWEVER, CONTRACTOR SHALL PROVIDE ALL REQUIRED FITTINGS, PIPING, AND INSULATION FOR ALL OFFSETS AND/OR CHANGES IN ELEVATIONS. WHERE NECESSARY DUE TO INTERFERENCE, CONTRACTOR SHALL MODIFY EXISTING PIPING, EQUIPMENT, ETC.
4. ALL VALVES AND SPECIALTIES SHALL BE LINE SIZE UNLESS INDICATED OTHERWISE ON DRAWINGS.
5. ALL STEAM AND PUMPED CONDENSATE SHALL PITCH DOWN A MINIMUM OF ONE INCH PER FIFTY FEET.
6. ALL OPENINGS THROUGH EXISTING STRUCTURES SHALL BE CORE DRILLED.
7. COLD SPRING ALL STEAM LINES FIFTY (50) PERCENT.
8. WHERE PIPING ENTERS MANHOLE CONSTRUCT ENTRY AS REQUIRED. ALL PIPES TO BE SLEEVED AND LINK SEALED TO MAKE WATERTIGHT.
9. ALL PIPING AND FITTINGS IN MANHOLES TO BE INSULATED, SEE SPECIFICATIONS.
10. CONTRACTOR SHALL COORDINATE AND OBTAIN APPROVAL FROM OWNER FOR INTERRUPTIONS AND CONNECTIONS TO EXISTING UTILITY SYSTEMS.
11. CONTRACTOR SHALL COORDINATE TREE AND LANDSCAPING REPLACEMENT WITH USC. IN GENERAL USC WILL REPLACE SMALL TREES THAT ARE NOTED TO BE REPLACED. CONTRACTOR IS RESPONSIBLE FOR SOD REPLACEMENT.
12. CONTRACTOR IS RESPONSIBLE FOR REMOVAL AND REPLACEMENT OF ALL BRICK PAVERS TO MATCH THE EXISTING CONDITION.
13. CONTRACTOR SHALL CONTACT PALMETTO UTILITY PROTECTION SERVICES TO LOCATE UTILITIES PRIOR TO DIGGING. INFORMATION OBTAINED FROM PALMETTO UTILITY PROTECTION SERVICES AND DURING DIGGING SHALL BE INDICATED ON THE AS-BUILT DRAWINGS.
14. CONSTRUCT TEMPORARY FENCING AROUND PROJECT AREA TO PROTECT THE SITE AND PEDESTRIANS.

### LEGEND

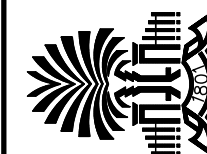
SYMBOL	DESCRIPTION
	NEW HIGH PRESSURE STEAM LINE
	NEW PUMPED CONDENSATE LINE
	EXISTING PIPE TO BE REMOVED OR ABANDONED
	EXISTING PUMPED CONDENSATE LINE
	EXISTING HIGH PRESSURE STEAM LINE
	EXISTING GRAVITY CONDENSATE LINE
	EXISTING CHILLED WATER RETURN LINE
	EXISTING CHILLED WATER SUPPLY LINE
	EXISTING HIGH VOLTAGE ELECTRICAL LINE
	EXISTING COMMUNICATIONS LINE
	EXISTING ELECTRICAL AND COMMUNICATIONS PRIMARY DUCT
	EXISTING SANITARY SEWER LINE
	EXISTING HIGH PRESSURE GAS LINE
	EXISTING LOW PRESSURE GAS LINE
	EXISTING STORM DRAIN LINE
	VELAN GATE VALVE, SEE SPECS
	CONNECTION POINT OF NEW TO EXISTING



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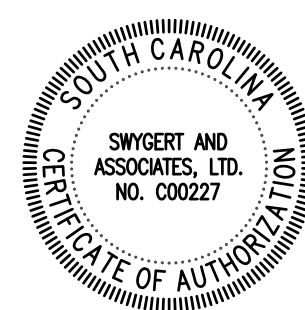
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OF

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