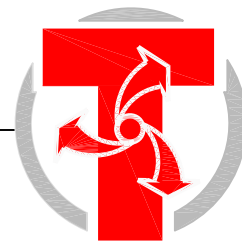


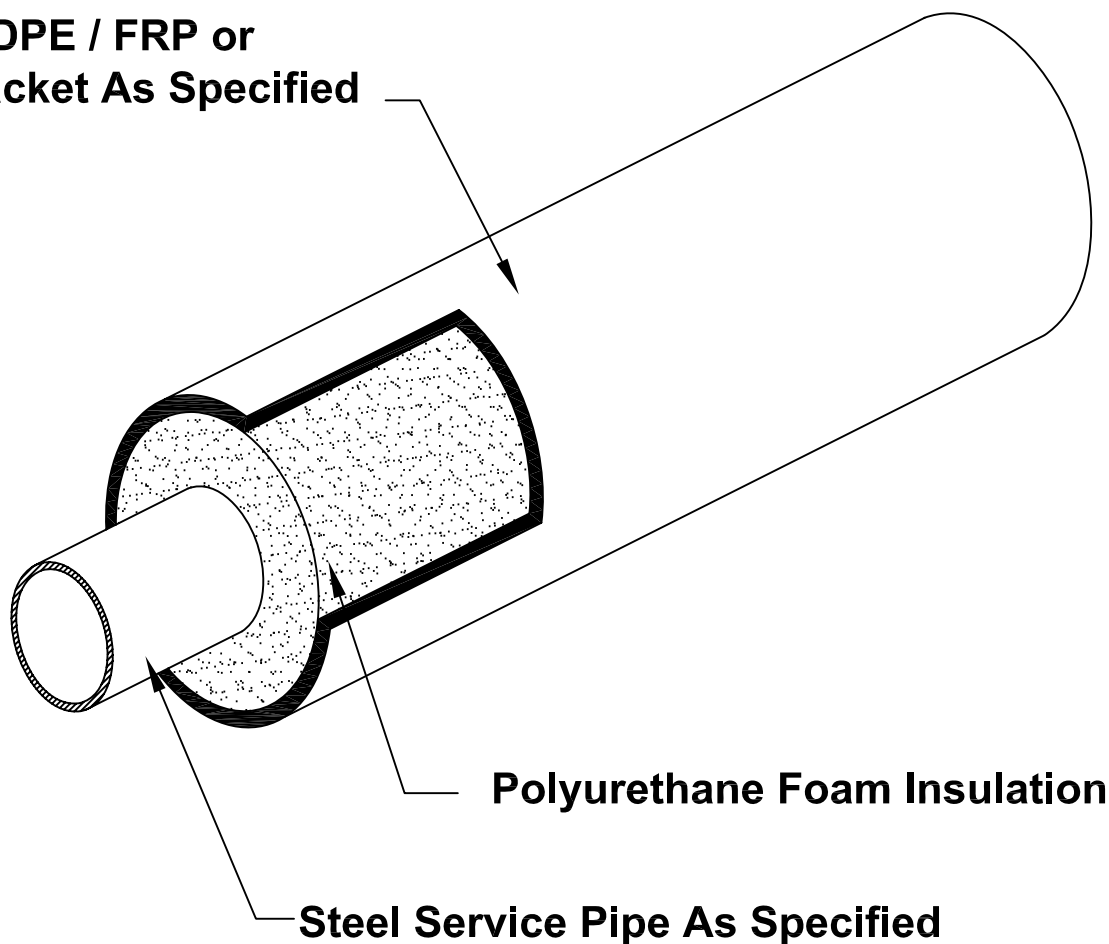
TRICON STEEL 250 SYSTEM



For Applications Up To 250° F Below And Above Ground

- | | |
|------------------------------------------|---------------------------------------------|
| <input type="checkbox"/> Chilled Water | <input type="checkbox"/> Low Pressure Steam |
| <input type="checkbox"/> Condensate | <input type="checkbox"/> Heating Hot Water |
| <input type="checkbox"/> Condenser Water | <input type="checkbox"/> Process Piping |

**PVC / HDPE / FRP or
Metal Jacket As Specified**



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Tel: 315.697.8787 Fax: 315.697.8788

TABLE 1

| Pipe Size | Minimum Insulation Thickness | PVC Jacket O.D. | PVC Jacket Wall |
|-----------|------------------------------|-----------------|-----------------|
| 1/2" | 1.76" | 4.50" | .070" |
| 3/4" | 1.66" | 4.50" | .070" |
| 1" | 1.53" | 4.50" | .070" |
| 1 1/4" | 1.35" | 4.50" | .070" |
| 1 1/2" | 1.23" | 4.50" | .070" |
| 2" | 1.81" | 6.14" | .070" |
| 2 1/2" | 1.56" | 6.14" | .070" |
| 3" | 1.25" | 6.14" | .070" |
| 4" | 1.75" | 8.16" | .080" |
| 5" | 1.25" | 8.16" | .080" |
| 6" | 1.69" | 10.20" | .100" |
| 8" | 1.69" | 12.24" | .120" |
| 10" | 1.65" | 14.32" | .140" |
| 12" | 1.47" | 16.00" | .160" |

Service Pipe:

Carbon steel service pipe shall be standard weight A53 ERW or A106 seamless beveled for welding. Condensate return piping shall be Schedule 80. (Stainless Steel piping shall be Type 304L or 316L.) All joints for pipe 2 1/2" and larger in size shall be butt-welded. Sizes 2" and smaller shall be socket welded. Straight lengths of piping will be supplied with 6" of piping exposed at each end for field joint fabrication. Pipe lengths to be supplied in 21-42 ft. lengths.

Insulation:*

The insulation shall be a foamed in place closed cell polyurethane which completely fills the annular space between the carrier pipe and the exterior casing. The insulation shall have the following physical properties:

Minimum Density (lb./cu. ft.) 2.0 ASTM D-1621
 90-95 % Closed Cell ASTM D-2856
 "K" Factor BTU/Hr. sq. ft. °F/in. . . .147 ASTM C-177

Exterior Casing:**

The exterior casing shall be

- (1) Seamless, extruded white PVC Type 1, Grade 1
 Class 12454-B per ASTM D-1784 or
- (2) High Density Polyethylene (H.D.P.E.)
 ASTM D-1248 with the following physical properties:
 ASTM D-3350...Resin Type III, Grade P34
 ASTM D-638...Ultimate Elongation 850%
 ASTM D-638...Tensile Yield Strength 3300 psi
 ASTM D-790...Tangent Flexural Modules 175,000 psi

No polyethylene tape casings will be allowed.

TABLE 2

| Pipe Size | Minimum Insulation Thickness | HDPE Jacket O.D. | HDPE Jacket Wall |
|-----------|------------------------------|------------------|------------------|
| 1/2" | 1.68" | 4.50" | .150" |
| 3/4" | 1.58" | 4.50" | .150" |
| 1" | 1.44" | 4.50" | .150" |
| 1 1/4" | 1.27" | 4.50" | .150" |
| 1 1/2" | 1.15" | 4.50" | .150" |
| 2" | 2.00" | 6.63" | .150" |
| 2 1/2" | 1.73" | 6.63" | .150" |
| 3" | 1.43" | 6.63" | .150" |
| 4" | 1.58" | 8.00" | .150" |
| 5" | 1.00" | 8.00" | .150" |
| 6" | 1.51" | 10.00" | .175" |
| 8" | 1.73" | 12.43" | .175" |
| 10" | 1.48" | 14.06" | .175" |
| 12" | 1.39" | 15.87" | .175" |
| 14" | 1.72" | 17.83" | .175" |

Sub-Assemblies:

All fittings, anchors, end seals, other accessories shall be prefabricated or field fabricated dependant upon engineer's option and/or site conditions.

Field Joints:

After welding and hydrostatic testing, PVC jacketed straight field joints shall be insulated with polyurethane foam to the thickness specified, PVC sleeve and pressure sensitive tape. HDPE jackets will use polyurethane foam and a heat shrinkable sleeve.

Expansion Compensation: ***

Expansion and contraction within the piping system shall be accommodated with factory prefabricated internal expansion elbows, z-bends, expansion loops, and anchors specifically designed for each application. External expansion compensation can be provided with the use of flexible foam bolsters.

Installation:

No Piping shall be installed in standing water. Trenches shall be maintained dry until final field closure is complete.

The installing contractor shall handle the piping system in accordance with the directions furnished by the manufacturer and as approved by the architect and engineer. The carrier piping shall be hydrostatically tested to 1-1/2 times the operating pressure, or as specified in the contract documents. The test shall be maintained for a minimum time of 1 hour. **EXERCISE DUE CARE WHEN INSTALLING AND TESTING THE PIPING SYSTEM.**

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 P.O. Box 361
 Canastota, NY 13032

Tel: 315-697-8787
 Fax: 315-697-8788
 www.triconpiping.com

Backfill:

A 4-inch layer of sand or fine gravel, less than ½" in diameter, shall be placed and tamped in the trench to provide uniform bedding for the **Steel 250** system. Once the system is in place, the trenches shall be carefully backfilled with similar material and hand tamped in 6" layers until a minimum of 12" above the top of the preinsulated pipe has been achieved. The remainder of the backfill shall be void of rocks, frozen earth and foreign material. The trench shall be compacted to comply with H-20 Highway loading.

Accessories:

Heat Tracing

System Options:

- * Insulation thickness will vary depending on the type of insulation specified and the operating temperature. Contact your Tricon representative for available sizes and system options.
- ** Optional metallic casings for above grade applications include Spiral Lockseam in Galvanized, Aluminum or Stainless Steel.
- ** Optional non-metallic casings for below grade offered include, Filament Wound FRP.
- *** Optional push-on expansion couplings are available upon request.

Backfill:

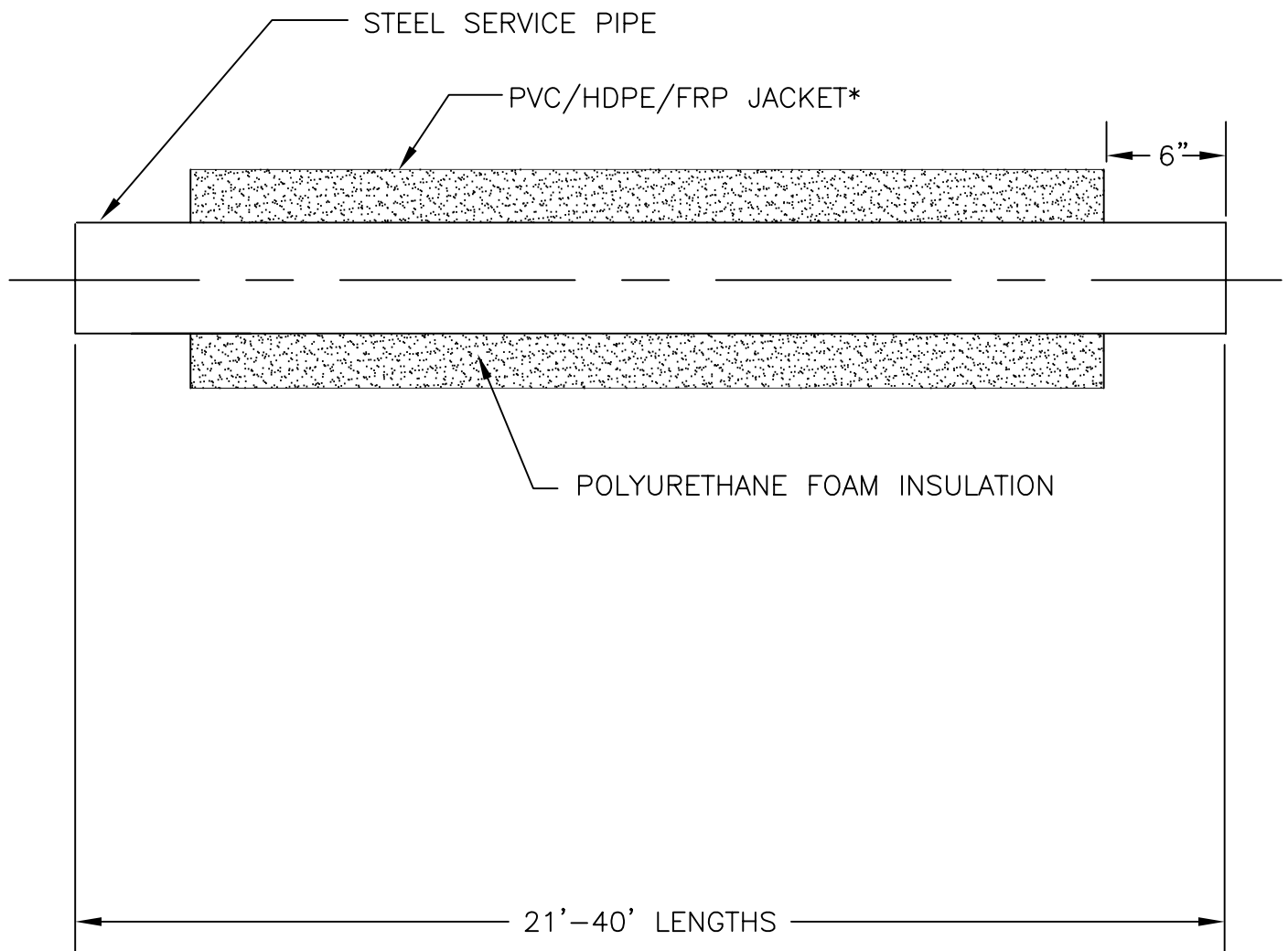
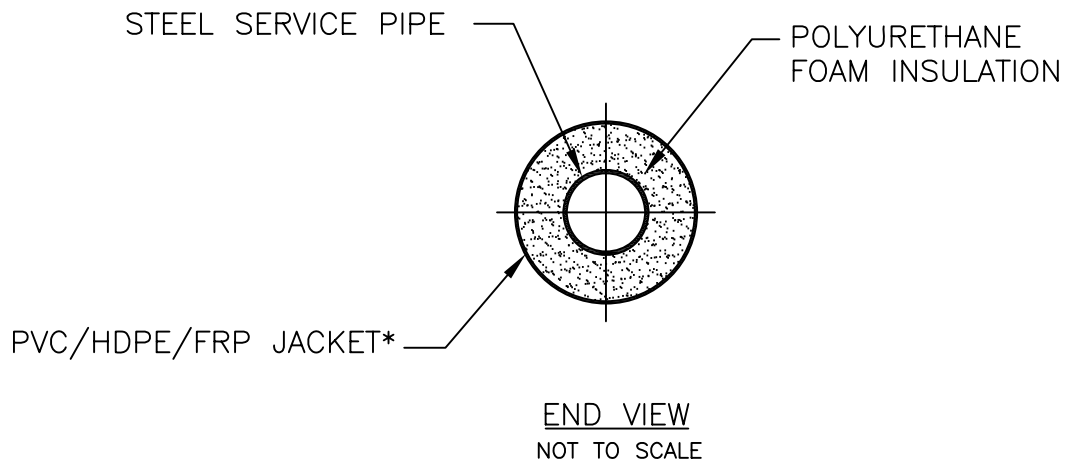
A 4-inch layer of sand or fine gravel shall be placed and tamped in the trench to provide stable and uniform bedding for the piping system. Once the system is in place, the trenches shall be carefully backfilled and hand tamped in 6" layers until a cover of at least 24" from the top of the pipe has been achieved. The first 12" of backfill shall be sand or fine gravel less than 1/2" in diameter. The remainder of the backfill shall be void of rocks, frozen earth and foreign material over 2" in diameter. The trench shall be compacted to comply with H-20 Highway loading.

Accessories:

Heat Tracing

System Options:

- * Insulation thickness will vary depending on the type of insulation specified and the operating temperature. Contact your Tricon representative for available sizes and system options.
- ** Optional metallic casings for above grade applications include Spiral Lockseam in Galvanized, Aluminum or Stainless Steel.
- ** Optional non-metallic casings for below grade offered include, Filament Wound FRP.



*OPTIONAL METAL JACKET AVAILABLE FOR ABOVE GRADE APPLICATION.

STEEL 250 STRAIGHT LENGTH DETAIL

TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-1

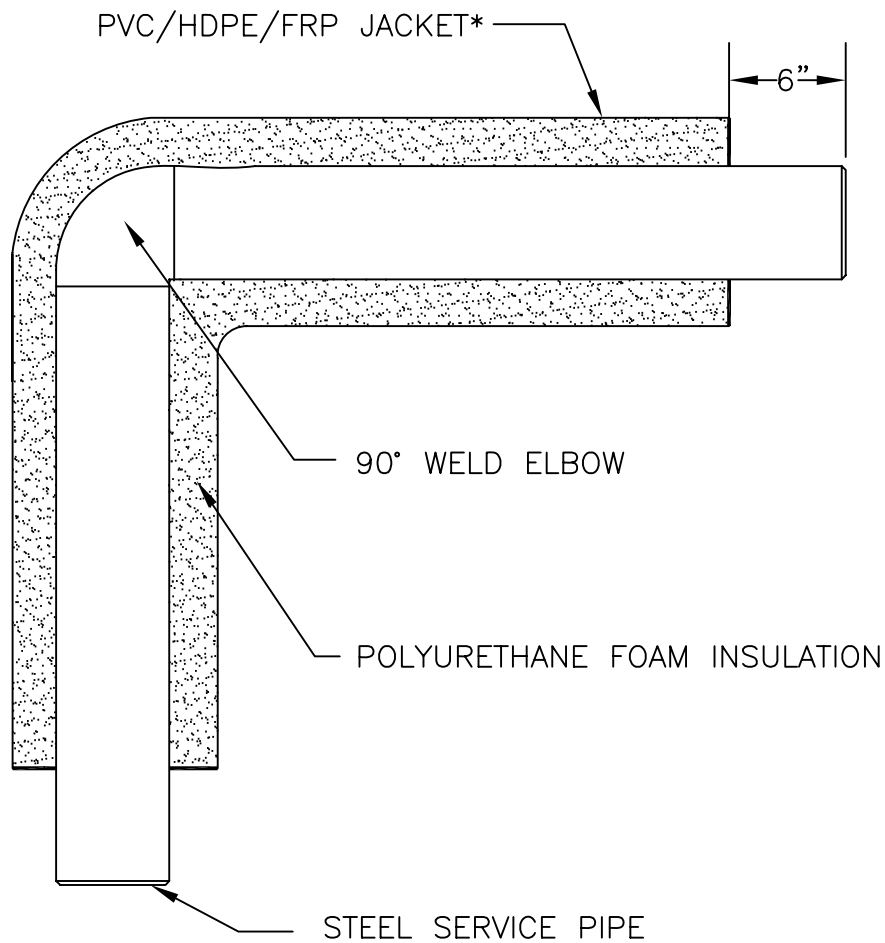
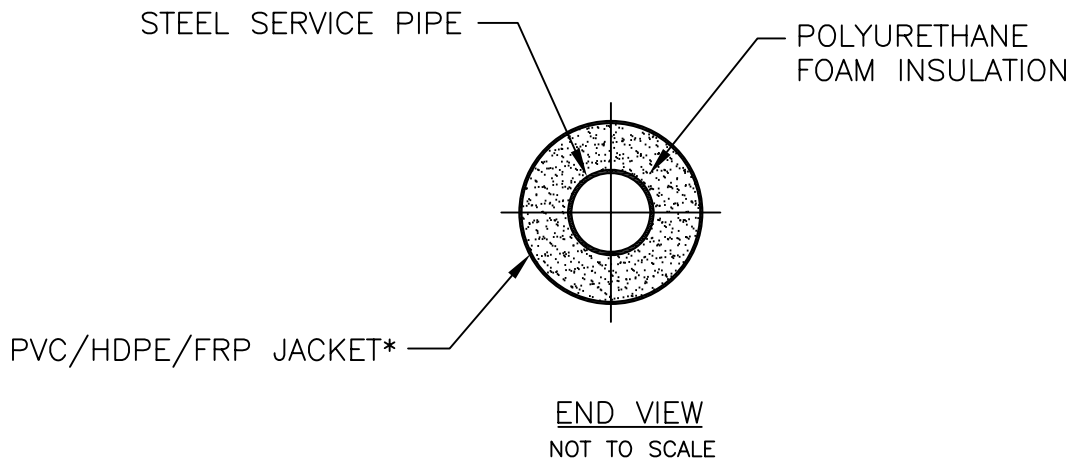
Rev.:



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*OPTIONAL METAL JACKET AVAILABLE FOR ABOVE GRADE APPLICATION.

STEEL 250 PREFABRICATED 90° ELBOW DETAIL

TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-2

Rev.:

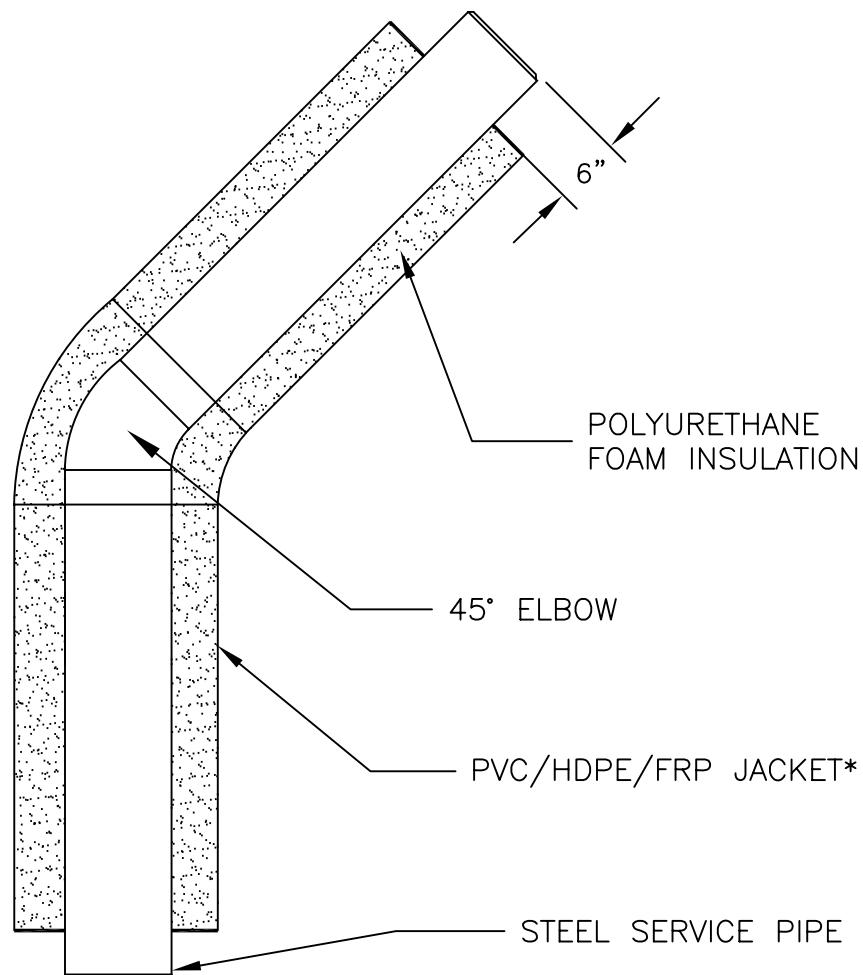
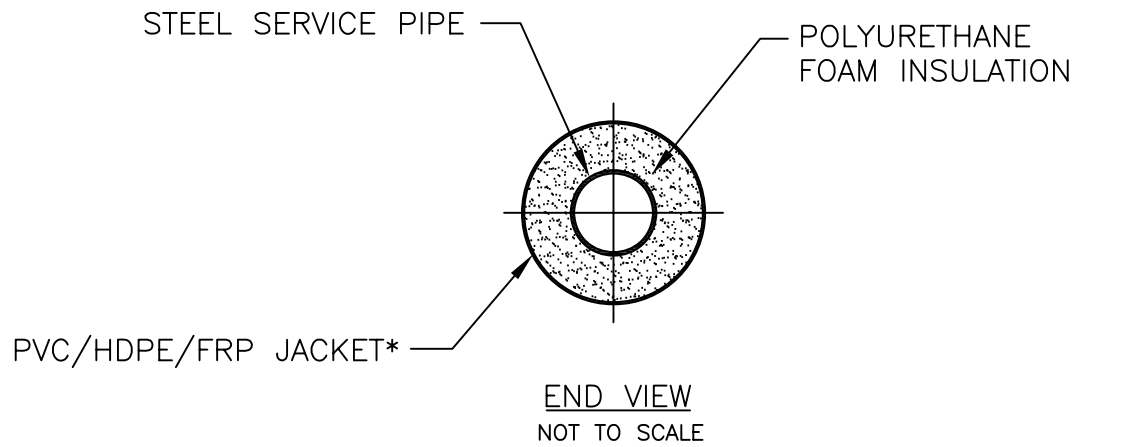


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*OPTIONAL METAL JACKET AVAILABLE FOR ABOVE GRADE APPLICATION.

STEEL 250 PREFABRICATED 45° ELBOW DETAIL

TRICON STEEL-250

Date: 03/09/06

Dwg. No.: S250-3

Rev.:

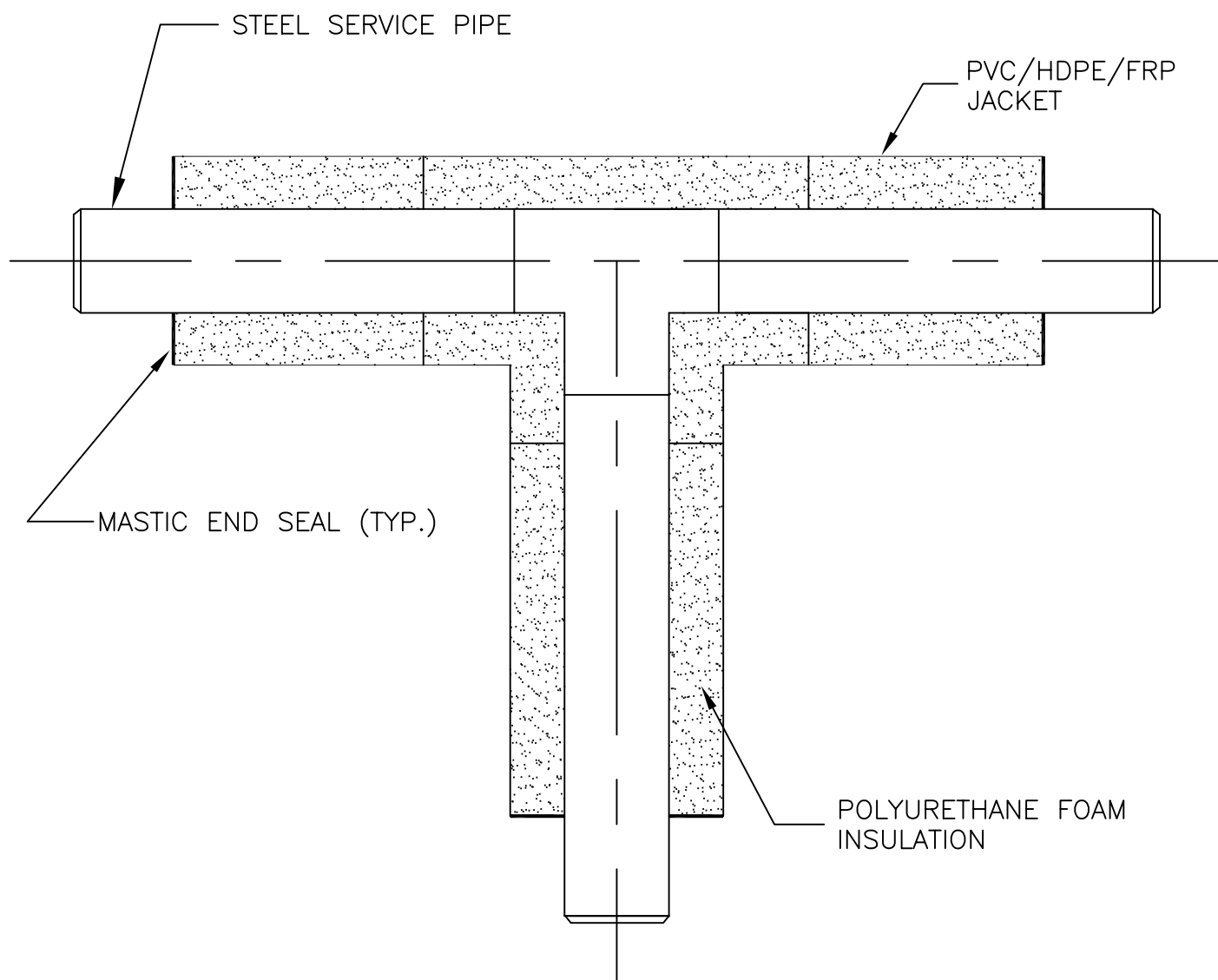
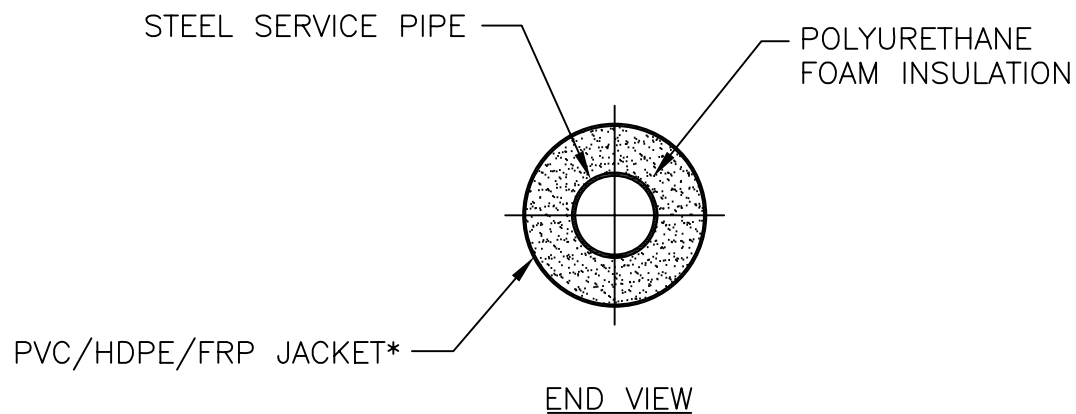


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* OPTIONAL METAL JACKET AVAILABLE FOR ABOVE GRADE APPLICATION.

STEEL 250 PREFABRICATED TEE DETAIL

TRICON STEEL-250

Date: 03/09/06

Dwg. No.: S250-4

Rev.:



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CONCRETE ANCHOR BLOCK MUST BE
KEYED INTO UNDISTURBED EARTH

POLYURETHANE
FOAM INSULATION

CASING

SHRINK SLEEVE

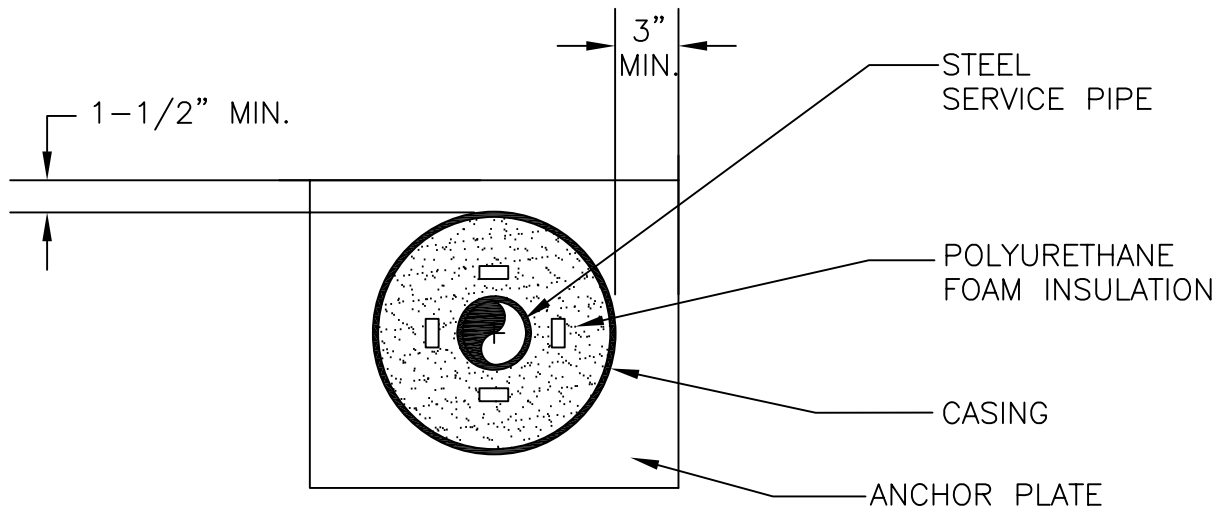
STEEL
SERVICE PIPE

STEEL RING

ANCHOR PLATE

CONTINUOUSLY WELDED
TO STEEL RING,
& SERVICE PIPE

SIDE VIEW
NOT TO SCALE



END VIEW
NOT TO SCALE

STEEL 250 SQUARE ANCHOR DETAIL

TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-5A

Rev.:



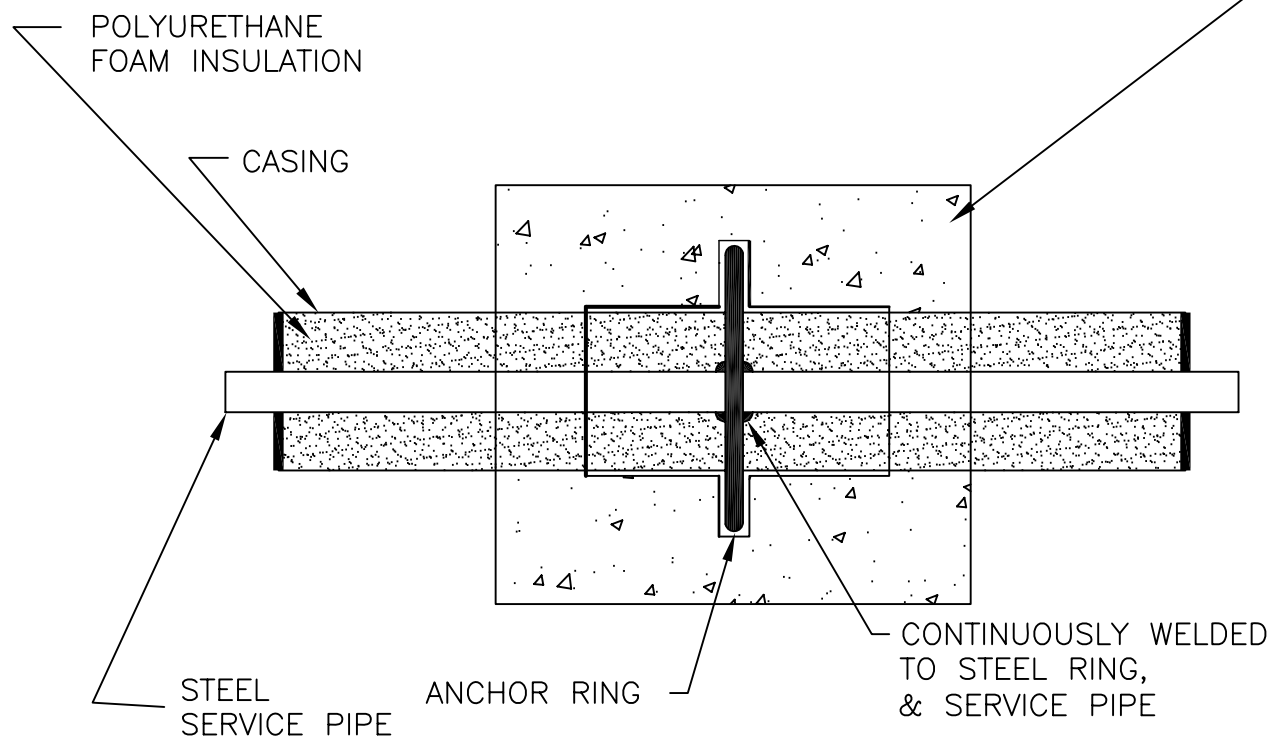
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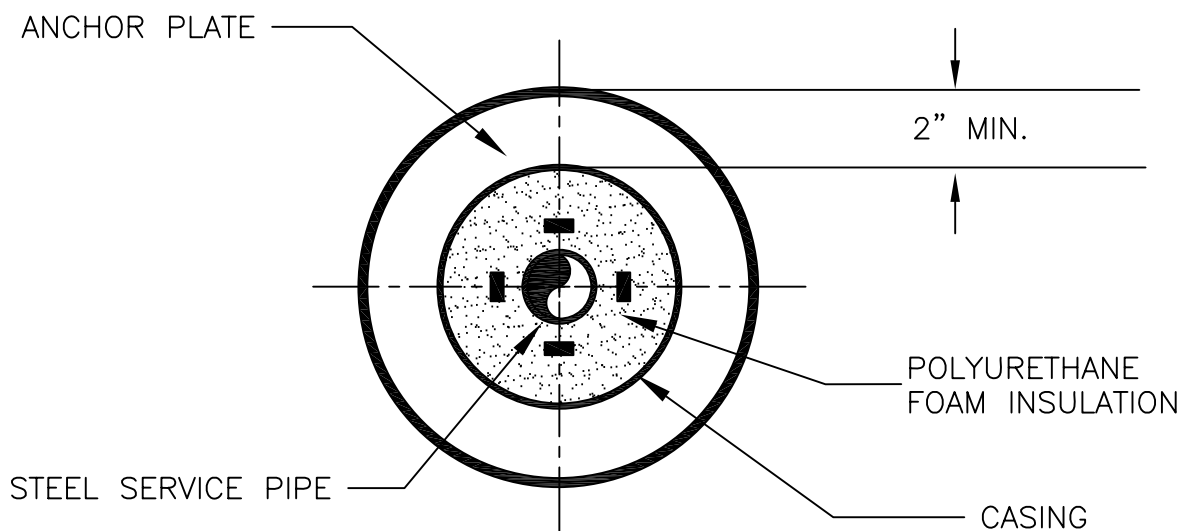
Tel: 315.697.8787 Fax: 315.697.8788

NOTE: ANCHOR BLOCK MUST BE KEYED INTO
UNDISTURBED EARTH



SIDE VIEW

NOT TO SCALE



CROSS SECTION

NOT TO SCALE

STEEL 250 ROUND ANCHOR DETAIL



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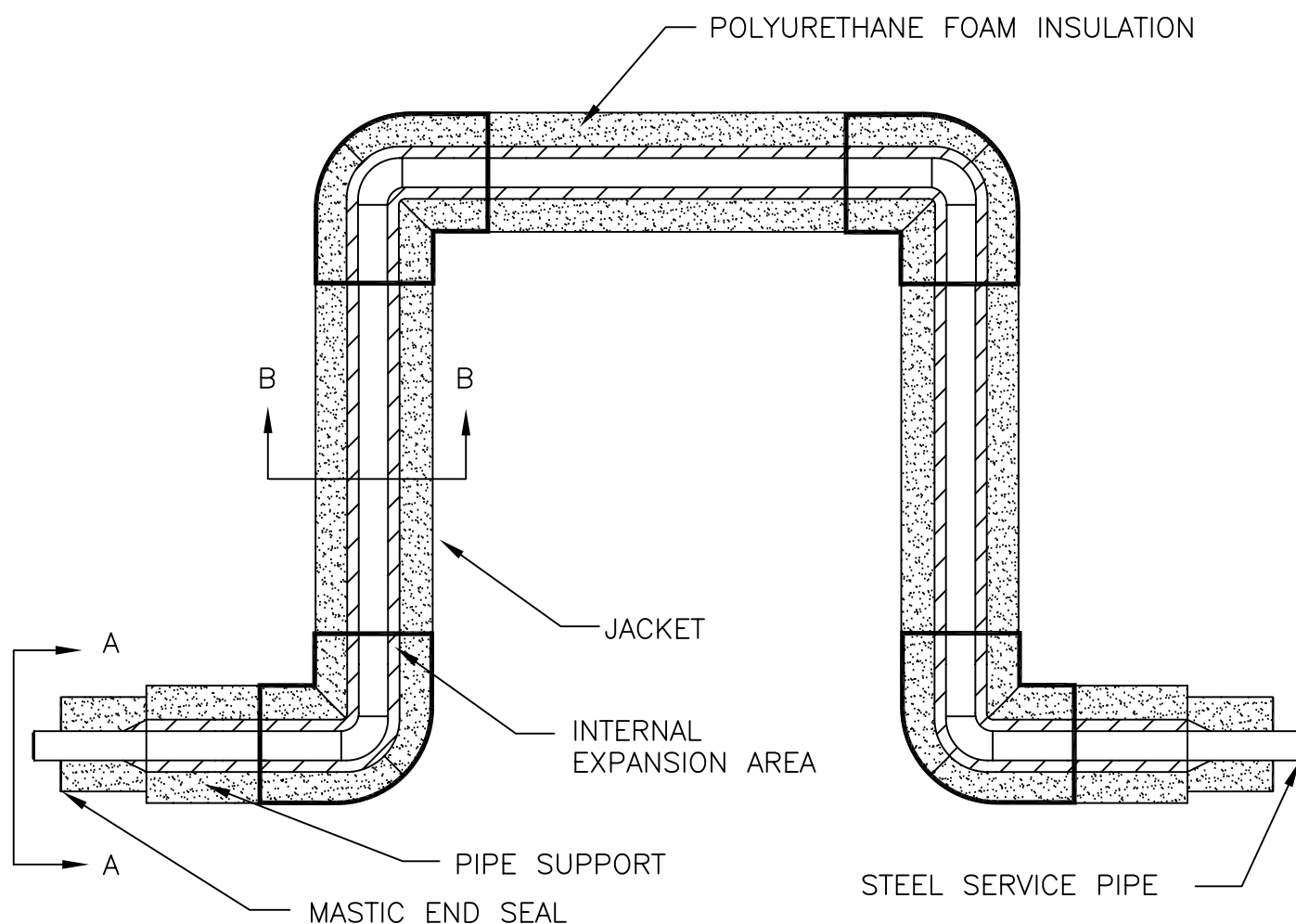
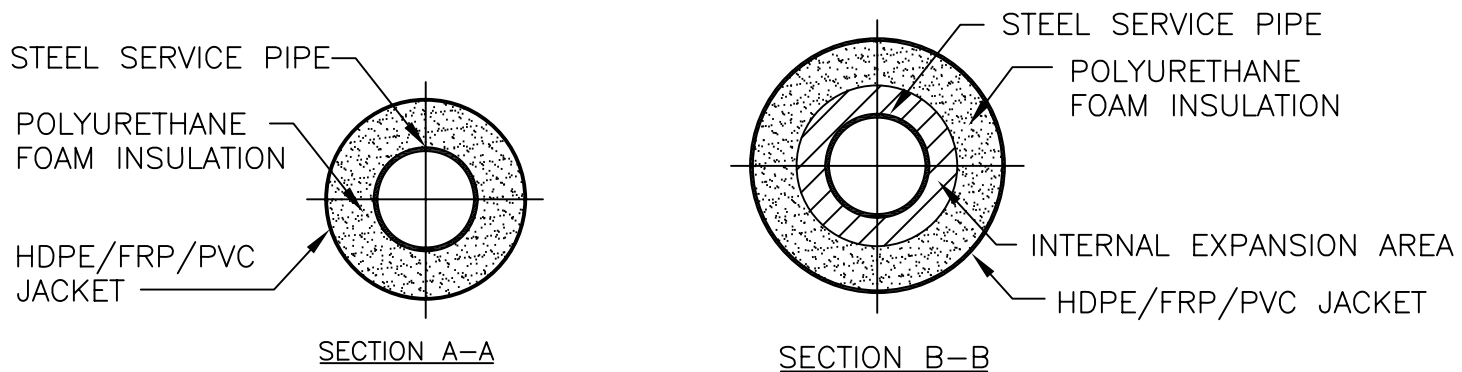
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TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-5B

Rev.:



STEEL 250 EXPANSION LOOP DETAIL WITH
INTERNAL EXPANSION

TRICON STEEL 250

Date: 03/09/06

Dwg. No. S250-6

Rev.:

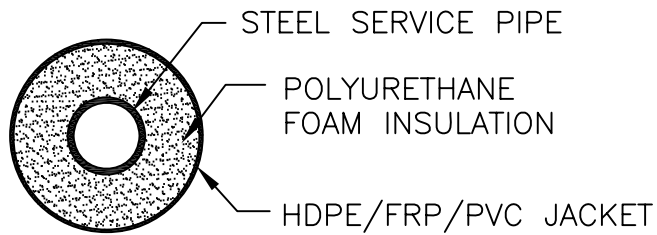


TRICON

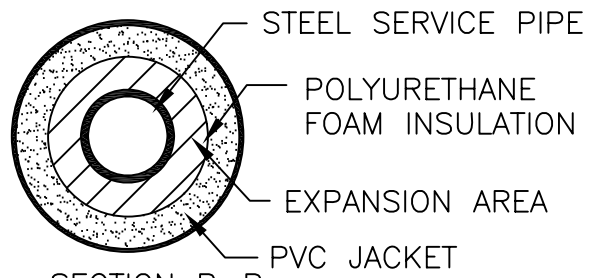
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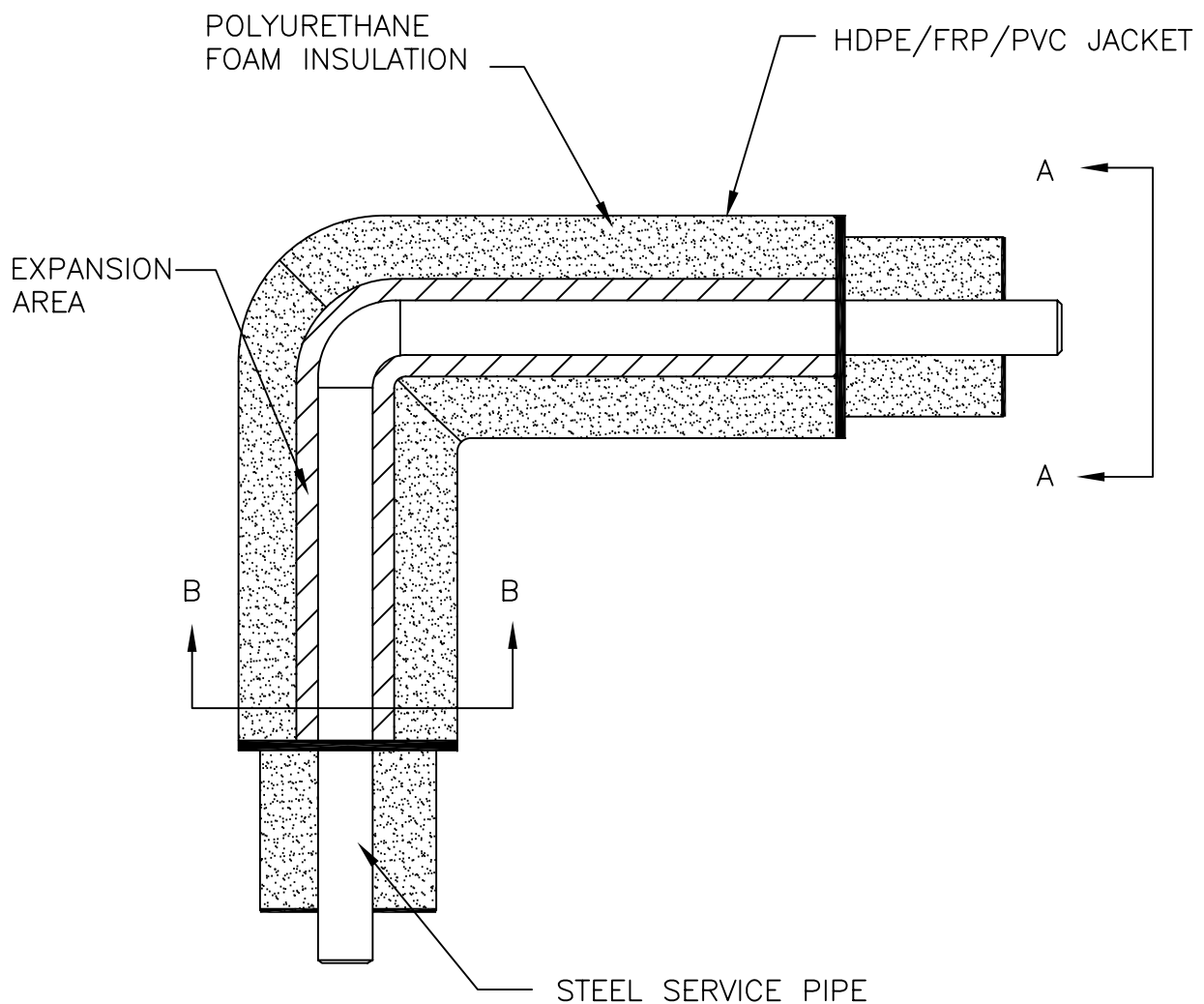
Tel: 315.697.8787 Fax: 315.697.8788



SECTION A-A



SECTION B-B



STEEL 250 EXPANSION 90° ELBOW DETAIL WITH
INTERNAL EXPANSION

TRICON STEEL 250

Date: 03/09/06

Dwg. No. S250-6A

Rev.:

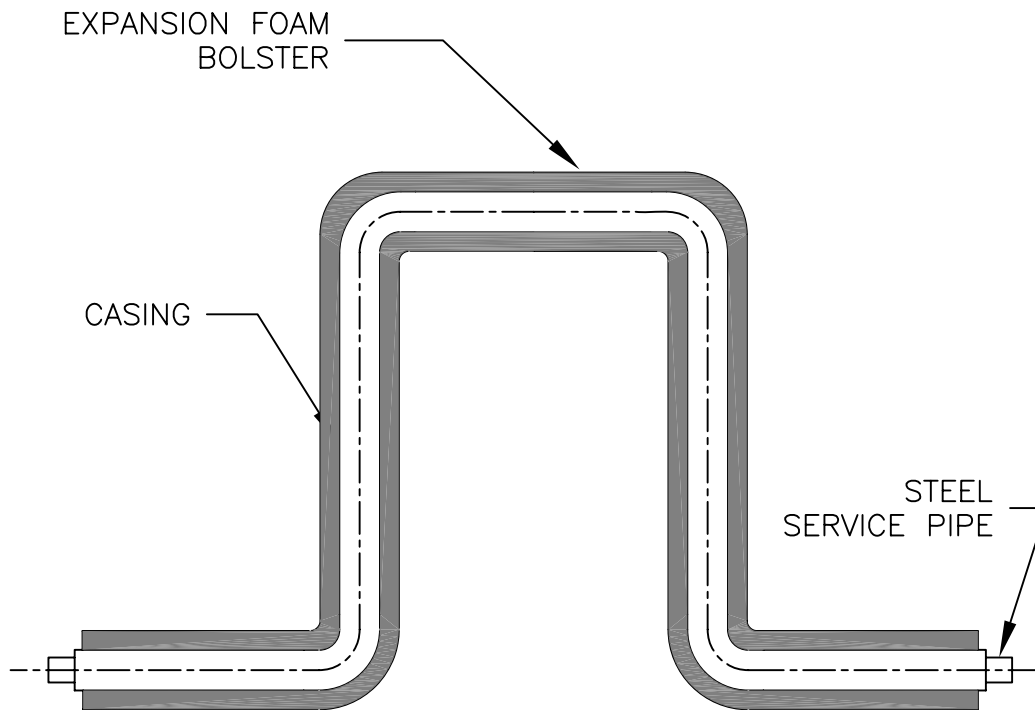


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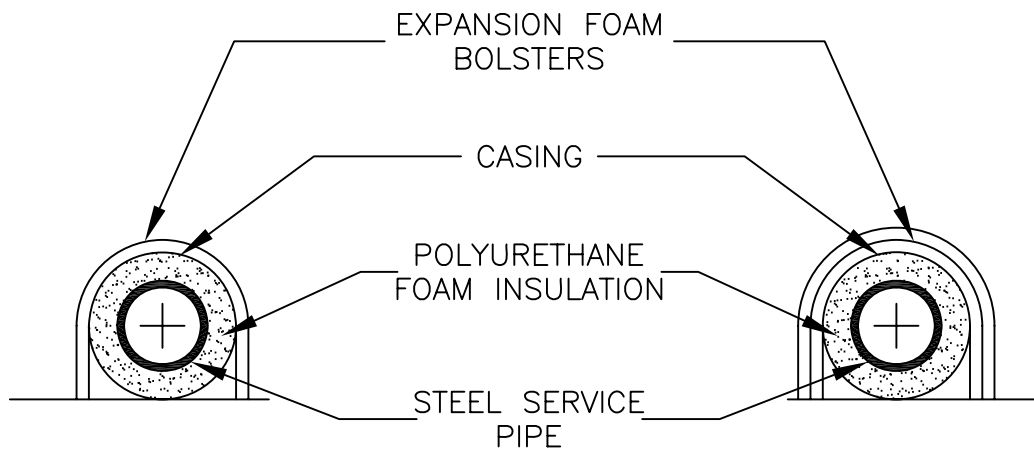
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1. EXPANSION PADDING MATERIAL IS SUPPLIED IN PRECUT LENGTHS AND WIDTHS.
2. WRAP PADDING AROUND THE JACKET FOR A SNUG FIT.
HOLD IN PLACE WITH BEDDING SAND.



1 LAYER CROSS SECTION

2 LAYER CROSS SECTION

STEEL 250 EXPANSION LOOP DETAIL WITH
EXTERNAL EXPANSION PADDING

TRICON STEEL 250

Date: 03/09/06

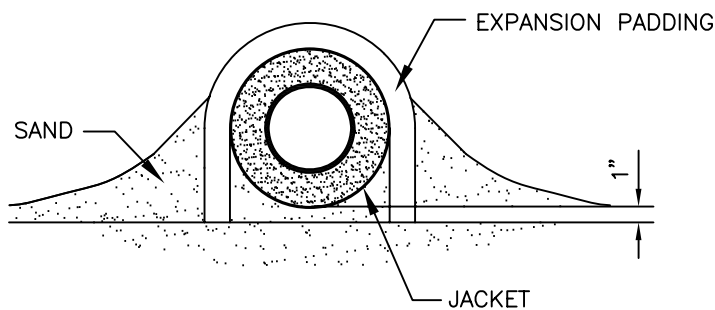
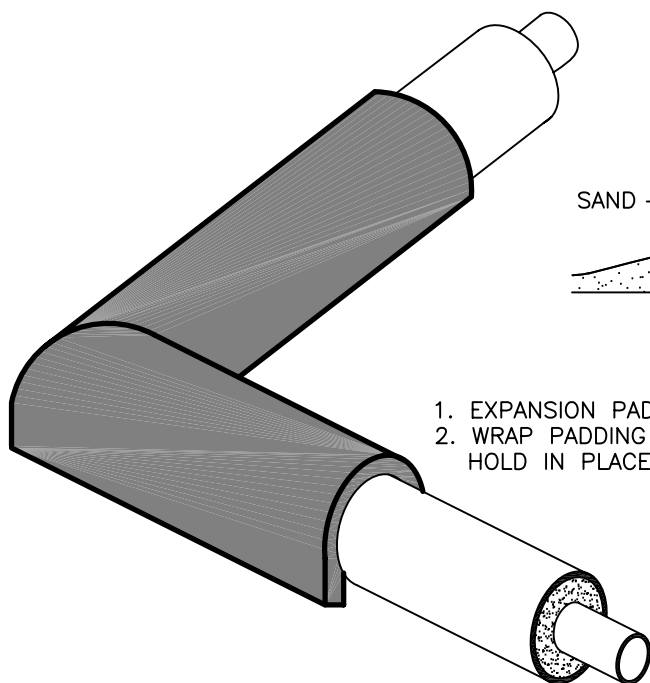
Dwg. No.: S250-7

Rev.:



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Tel: 315.697.8787 Fax: 315.697.8788



1. EXPANSION PADDING MATERIAL IS SUPPLIED IN PRECUT LENGTHS AND WIDTHS.
2. WRAP PADDING AROUND THE JACKET FOR A SNUG FIT.
HOLD IN PLACE WITH BEDDING SAND.

PROCEDURE

1. EXPANSION PADDING MATERIAL IS SUPPLIED IN PRECUT SIZES
2. WRAP PADDING AROUND THE JACKET FOR A SNUG FIT.

MAKE SURE TO COVER 90° ELBOW COMPLETELY.

HOLD IN PLACE WITH BEDDING SAND.

| LOCATION | LENGTH OF PRECUT PADDING REQUIRED IN FEET, ON <u>EACH</u> SIDE OF ELBOW. | | |
|----------|-----------------------------------------------------------------------------|------------|-----------|
| | FIRST LEG | SECOND LEG | THIRD LEG |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |
| | | | |

STEEL 250 EXPANSION 90° ELBOW DETAIL WITH
EXTERNAL EXPANSION PADDING

TRICON STEEL 250

Date: 03/09/06

Rev.:

Dwg. No.: S250-7A

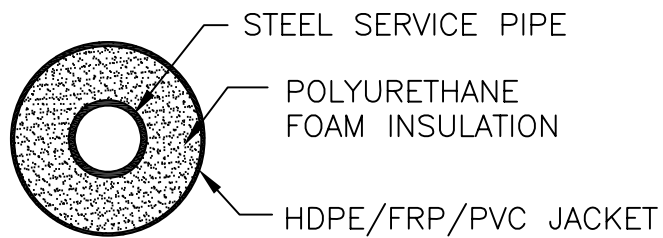


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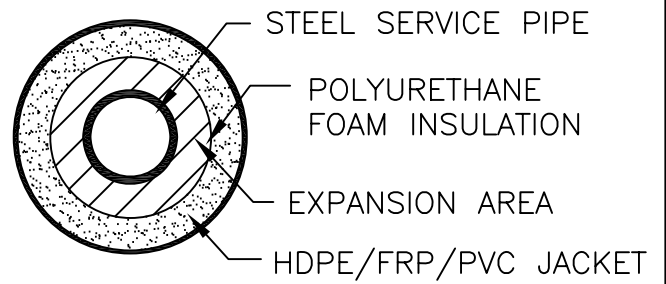
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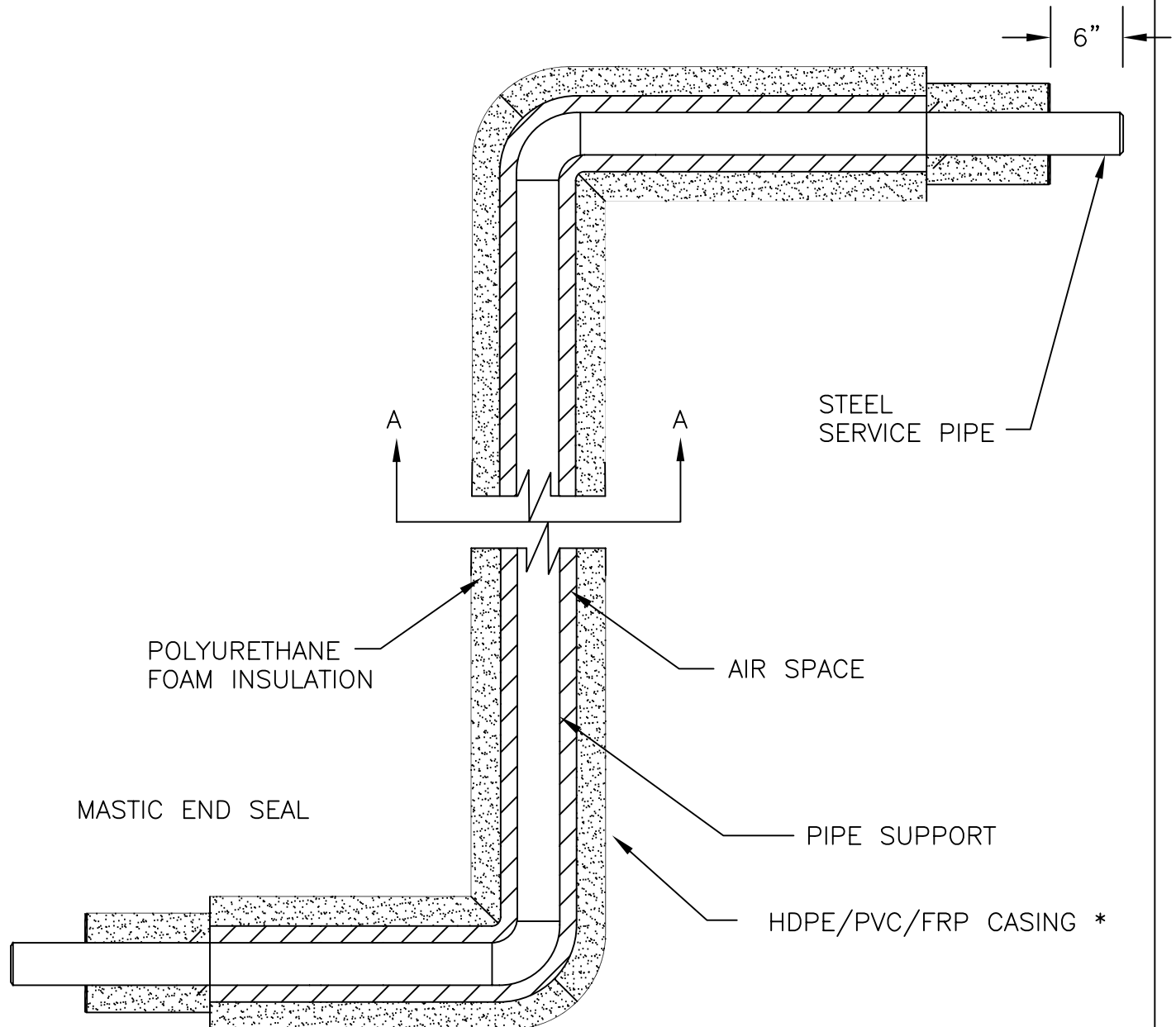
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SECTION A-A



SECTION B-B



TRICON STEEL-250 EXPANSION "Z" BEND

* CONSULT MANUFACTURER FOR ADDITIONAL CASINGS

STEEL 250 EXPANSION "ZEE" BEND DETAIL WITH
INTERNAL EXPANSION

TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-8

Rev.:

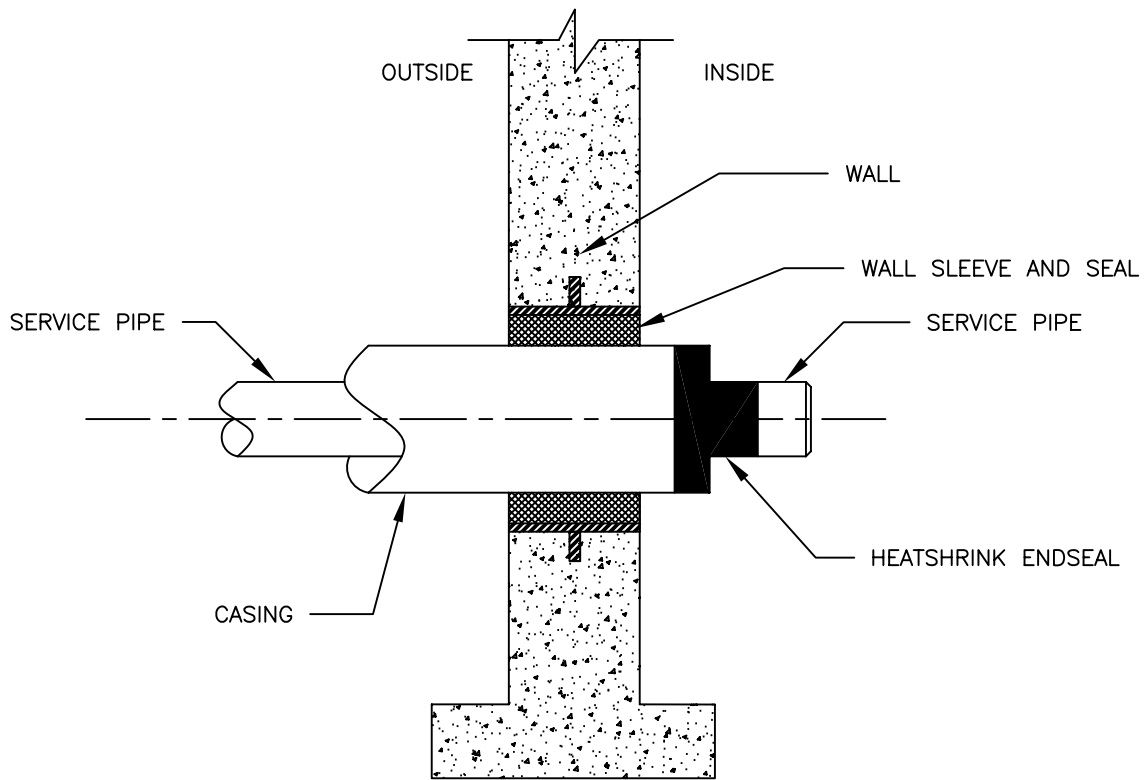


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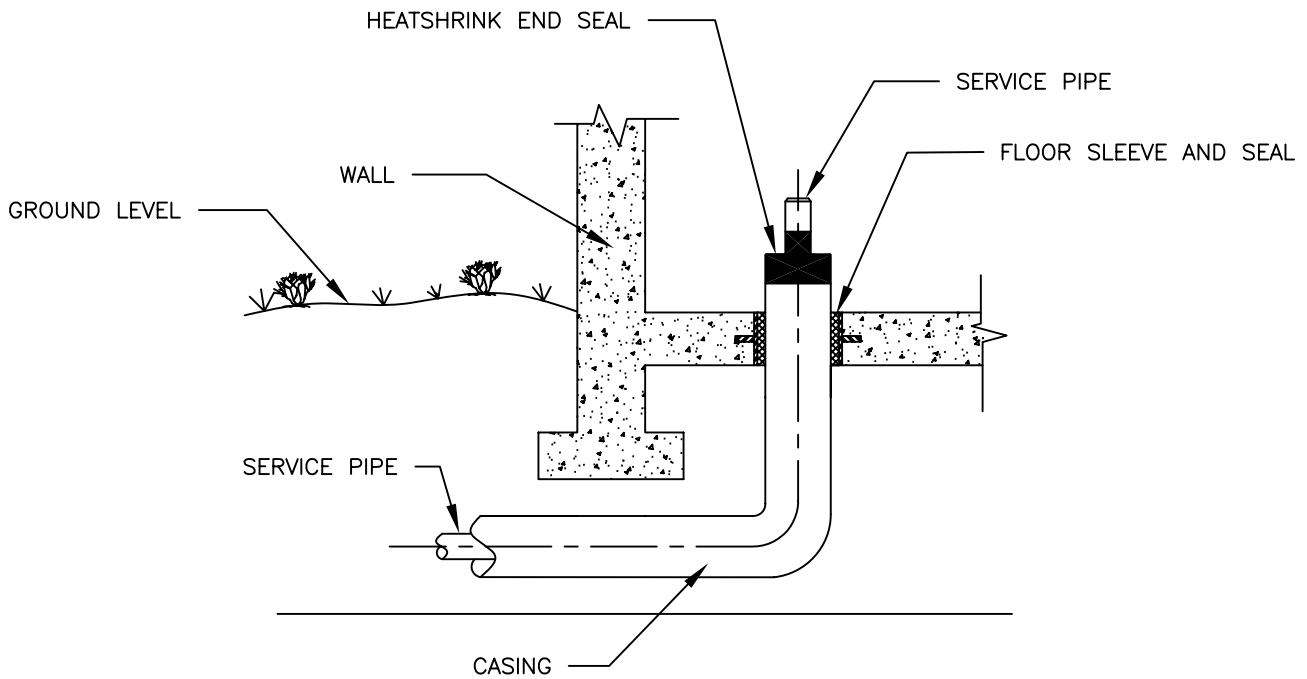
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WALL PENETRATION DETAIL



BUILDING RISER DETAIL

HEATSHRINK END SEAL DETAIL



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TRICON STEEL 250

Date: 03/09/06

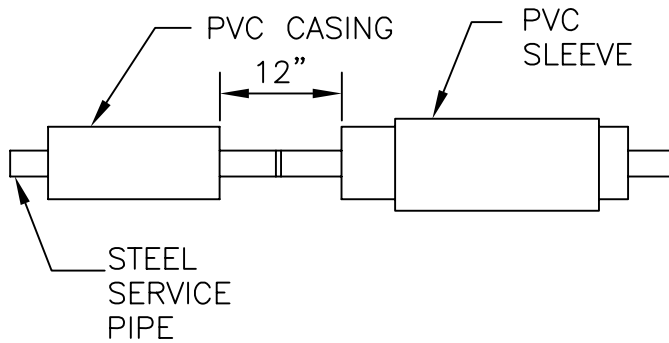
Dwg. No.: S250-9

Rev.:

P.O. Box 361, Canastota, New York 13032

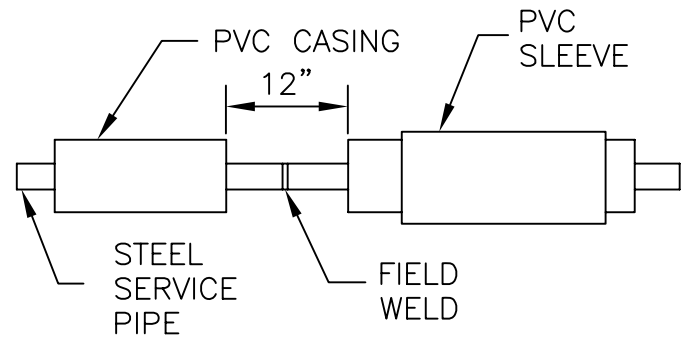
Tel: 315.697.8787 Fax: 315.697.8788

PHASE 1



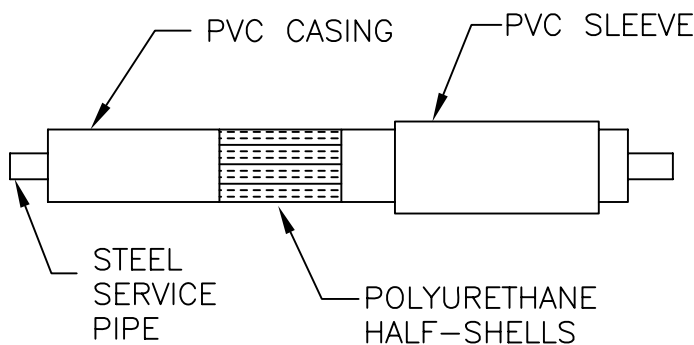
PRIOR TO WELDING SERVICE PIPE, SLIDE PVC SLEEVE OVER CASING AND MOVE AWAY FROM WELD POINT TO PREVENT DAMAGE.

PHASE 2



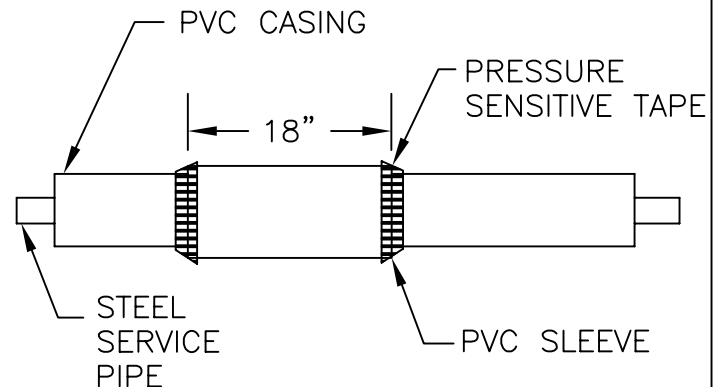
AFTER WELDING PIPE, TEST/CHECK ALL WELDS AS REQUIRED.

PHASE 2



FIT POLYURETHANE FOAM HALF SHELLS OVER SERVICE PIPE AND SECURE IN PLACE.

PHASE 4



SLIDE PVC SLEEVE INTO CENTER OF JOINT OVER INSULATION. APPLY A WRAP OF PRESSURE SENSITIVE TAPE AROUND THE AREA WHERE THE CASING AND SLEEVE MEET. ALLOW A 2" OVERLAP OF TAPE ONTO BOTH SURFACES.

IN COLDER WEATHER, TAPE MUST BE KEPT WARM UNTIL TIME OF USE.

STEEL 250 FIELD JOINT KIT DETAIL WITH
RIGID POLYURETHANE FOAM & PVC CASING

TRICON STEEL 250

Date: 03/09/06

Dwg.No.:S250-10A

Rev.:



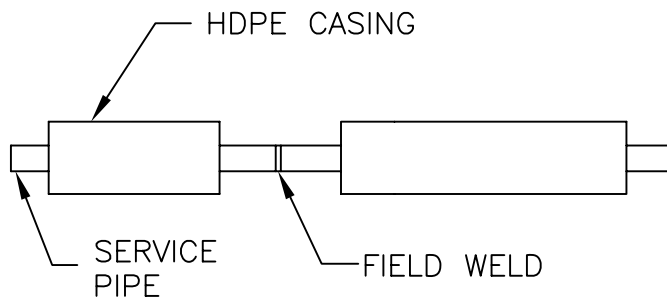
TRICON

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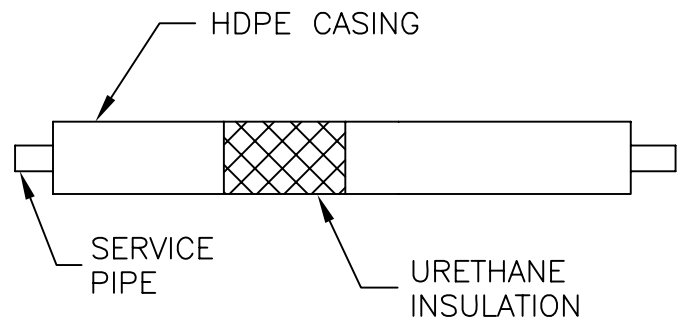
Tel: 315.697.8787 Fax: 315.697.8788

PHASE 1



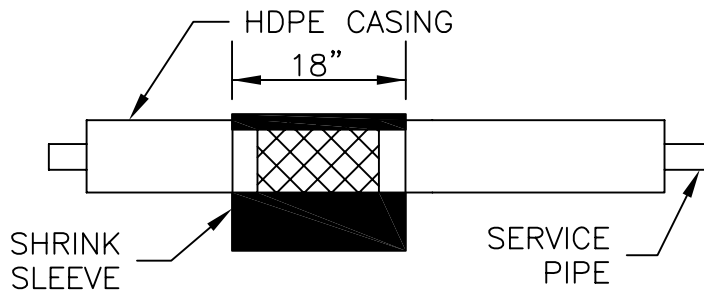
AFTER WELDING SERVICE PIPE, CHECK/TEST ALL WELDS AS REQUIRED. PREPARE PIPE AND CASING FOR INSULATION.

PHASE 2



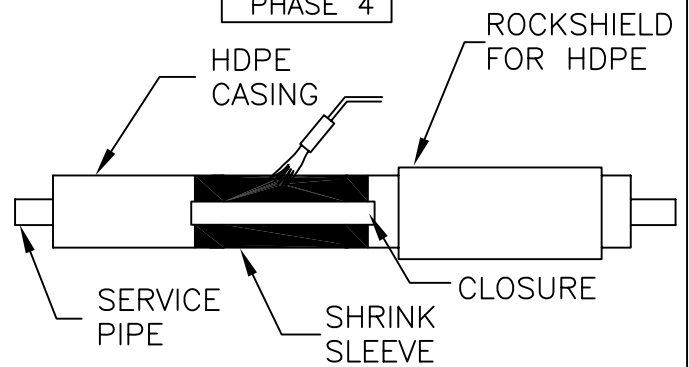
MAKE SURE THAT PIPE AND CASING ARE CLEAN AND DRY. INSTALL LAYER OF PIPE INSULATION OVER JOINT AND SECURE IN PLACE.

PHASE 3



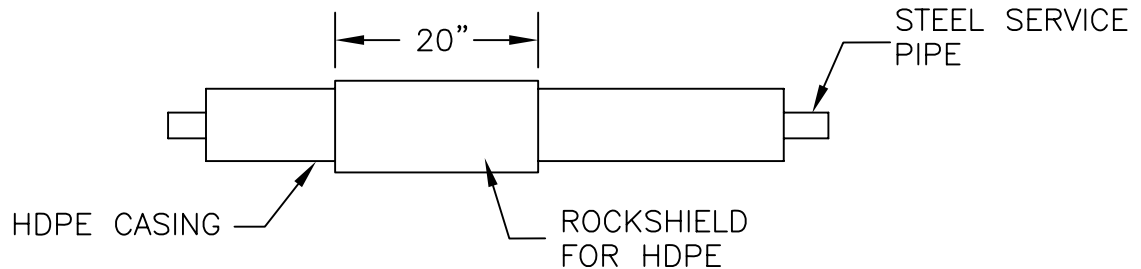
REMOVE RELEASE LINER AND PLACE SHRINK SLEEVE AROUND JOINT AND PIPE INSULATION. OVERLAP SLEEVE AT THE 10 TO 12 O'CLOCK POSITION. GENTLY HEAT BACKING OF SLEEVE AND CLOSURE. PRESS THE CLOSURE FIRMLY INTO PLACE. GENTLY HEAT CLOSURE AND PAT DOWN.

PHASE 4



WITH LOW YELLOW FLAME, HEAT THE SHRINK SLEEVE FROM THE MIDDLE TOWARD EACH SIDE OF THE SLEEVE UNTIL RECOVERY IS COMPLETE. SHRINKING HAS BEEN COMPLETED WHEN ADHESIVE OZZES FROM SIDES. AVOID EXCESSIVE HEAT TO OVERLAP AREA.

PHASE 5



AFTER SHRINK SLEEVE HAS COOLED, INSPECT THE SLEEVE TO ENSURE FULL CONTACT WITH CASING AND THAT ADHESIVE HAS FLOWED BEYOND BOTH SLEEVE EDGES. MAKE SURE THAT NO CRACKS OR HOLES ARE IN SLEEVE. INSTALL HDPE ROCKSHIELD OVER SHRINK SLEEVE WITH A MINIMUM 2" OVERLAP OF SLEEVE.

STEEL 250 FIELD JOINT KIT DETAIL WITH
RIGID POLYURETHANE FOAM & HDPE CASING



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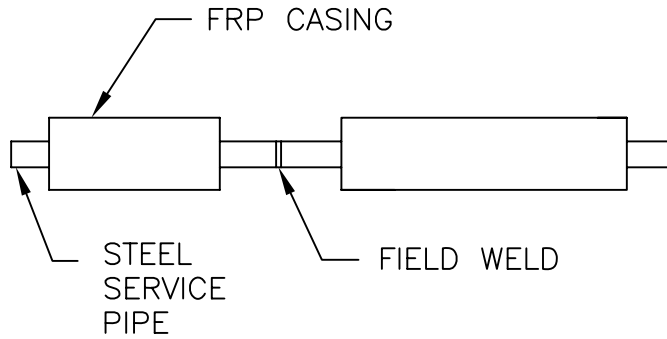
TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-10B

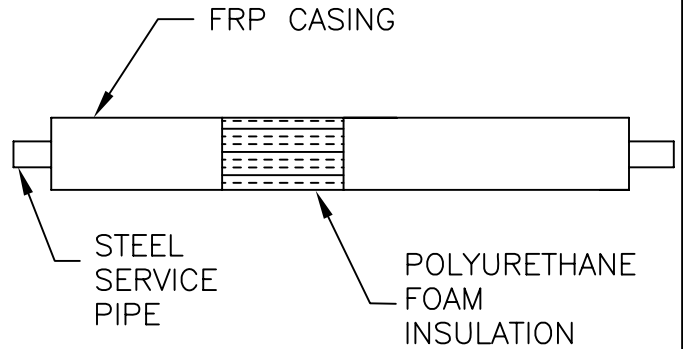
Rev.:

PHASE 1



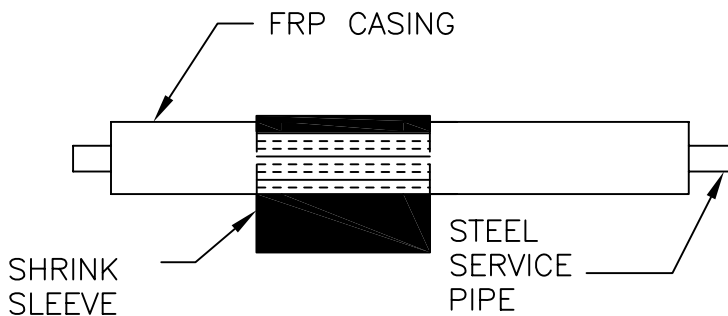
AFTER WELDING SERVICE PIPE, CHECK/TEST ALL WELDS AS REQUIRED. PREPARE PIPE AND CASING FOR INSULATION.

PHASE 2



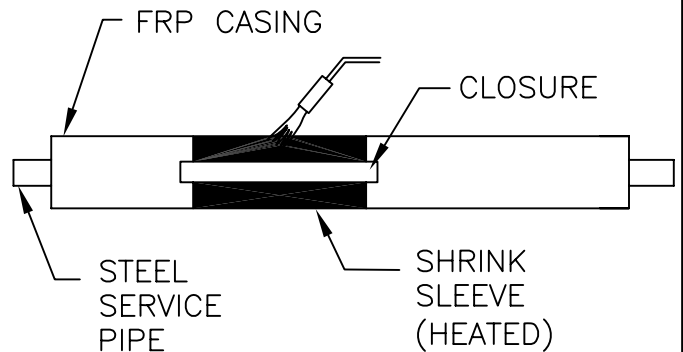
INSTALL RIGID URETHANE INSULATION TO PIPE SECURE IN PLACE TO FRP CASING.

PHASE 3



REMOVE RELEASE LINER AND PLACE SHRINK SLEEVE AROUND JOINT AND PIPE INSULATION. OVERLAP SLEEVE AT THE 10 TO 12 O'CLOCK POSITION. GENTLY HEAT BACKING OF SLEEVE AND CLOSURE. PRESS THE CLOSURE FIRMLY INTO PLACE. GENTLY HEAT CLOSURE AND PAT DOWN.

PHASE 4



WITH LOW YELLOW FLAME, HEAT SHRINK SLEEVE USING CIRCUMFERENTIAL STROKES. AVOID EXCESSIVE HEAT TO OVERLAP AREA. DO NOT BACKFILL UNTIL SHRINK SLEEVE IS COOL TO THE TOUCH.

STEEL 250 FIELD JOINT KIT DETAIL WITH RIGID POLYURETHANE FOAM & FRP CASING

TRICON STEEL 250

Date: 03/09/06

Dwg. No.: S250-10C

Rev.:



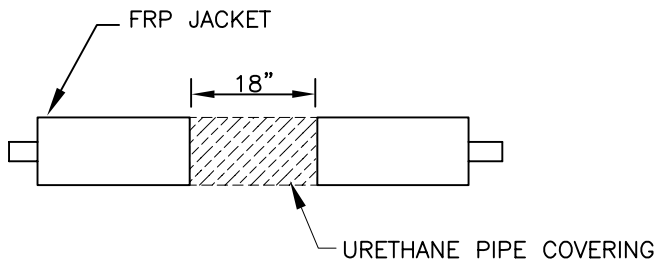
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P.O. Box 361, Canastota, New York 13032

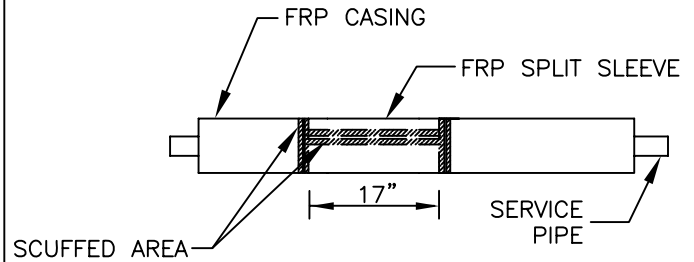
Tel: 315.697.8787 Fax: 315.697.8788

STEP 1



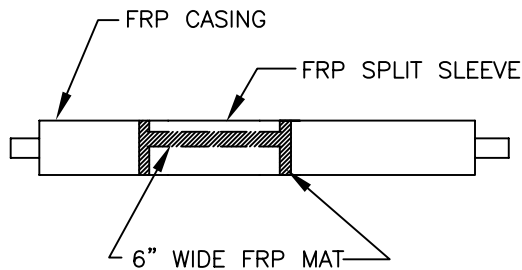
AFTER WELDING SERVICE PIPE, APPLY URETHANE PIPE COVERING IN PLACE AND SECURE.

STEP 2



PLACE SPLIT FRP SLEEVE AROUND INSULATION WITH THE HORIZONTAL SPLIT AT THE 10 O'CLOCK POSITION. CREATE A GOOD BINDING SURFACE FOR THE HAND LAY-UP BY SCUFFING THE ENDS OF FRP SPLIT SLEEVE AND JACKET.

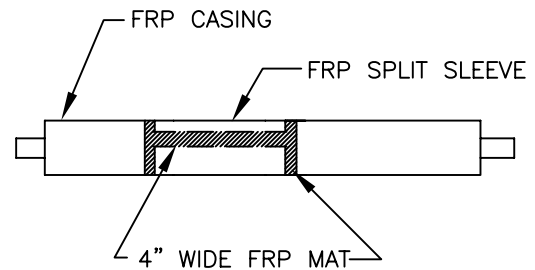
STEP 3



TAKE 3 LAYERS OF PRECUT 6" WIDE FIBERGLASS MAT AND SATURATE WITH FRP RESIN. (MIX 1/2 GAL. OF FRP RESIN WITH 1/2 OZ. OF CATALYST AND STIR. IT IS IMPERATIVE THAT YOU HAVE A GOOD MIX BETWEEN RESIN AND CATALYST.) PICK UP THE THREE (3) STRIPS OF SATURATED MAT AND AND PLACE ONE END AT THE 12 O'CLOCK POSITION AND THE OTHER AT THE 6 O'CLOCK POSITION.

Note: Cold temperatures will cause longer curing time.

STEP 4



ROLL INTO PLACE WITH FRP ROLLER UNTIL MATT LIES FLAT AND AIR BUBBLES ARE OUT. REPEAT FOR OTHER SIDE AND FOR OTHER CIRCUMFERENTIAL JOINT. FOR HORIZONTAL JOINT REPEAT PREVIOUS PROCEDURE EXCEPT LAY MATERIAL IN HORIZONTAL POSITION AND ROLL.

STEEL 250 FIELD JOINT KIT DETAIL WITH
RIGID POLYURETHANE FOAM & FRP HAND LAY-UP

TRICON STEEL 250

Date: 03/09/06 Dwg. No.: S250-10D

Rev.:



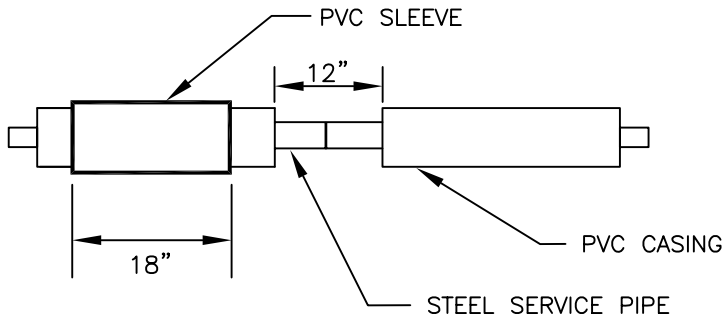
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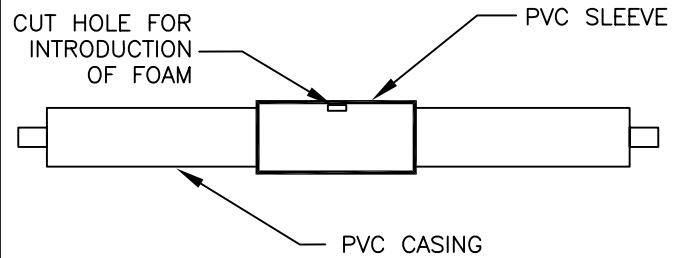
Tel: 315.697.8787 Fax: 315.697.8788

STEP 1



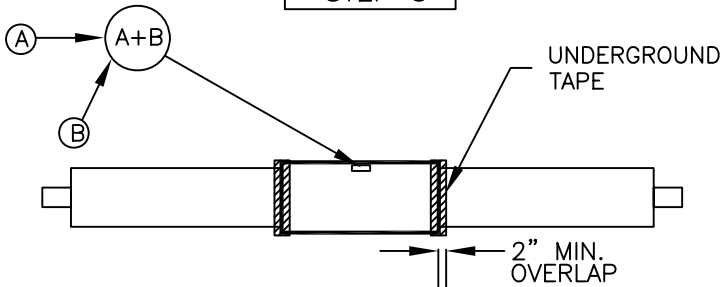
SLIDE SPLIT PVC SLEEVE OVER END OF PIPE CASING. TEST ALL WELDED JOINTS AS REQUIRED.

STEP 2



CENTER PVC SLEEVE OVER JOINT AND SECURE IN PLACE. CUT HOLE IN TOP OF PVC SLEEVE FOR INTRODUCTION OF POLYURETHANE FOAM MIXTURE.

STEP 3

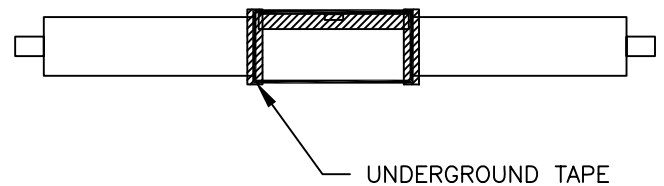


APPLY UNDERGROUND TAPE WHERE PVC SLEEVE AND CASING MEET. PROVIDE FOR A MINIMUM OVERLAP OF 2".

REFER TO CHART BELOW FOR FOAM AMOUNT BASED ON JACKET SIZE. POUR FOAM INTO OPENING.

WHEN FOAM REACTS, TEMPORARILY SEAL THE OPENING WITH DUCT TAPE TO MAXIMIZE INSULATION VOLUME IN CAVITY.

STEP 4



TRIM OFF EXCESS MATERIAL AFTER CURING IS COMPLETE. APPLY ADDITIONAL UNDERGROUND TAPE TO HOLE IN PVC SLEEVE.

POLYURETHANE FOAM MIXTURE CHART

| JACKET SIZE | FIELD JOINT |
|-------------|-------------|
| 3 | 3 |
| 4 | 4 |
| 5 | 5 |
| 6 | 6 |
| 8 | 8 |
| 10 | 10 |
| 12 | 12 |
| 14 | 14 |
| 16 | 16 |

CHART INDICATES THE PROPORTIONS OF EACH COMPONENT (NAMESLY "A" & "B") TO BE MIXED PRIOR TO INTRODUCTION INTO PIPE CAVITY. A NOMINAL INSULATION THICKNESS OF 1-1/2" IS ASSUMED FOR THE PURPOSES OF THIS CHART. FOR THICKNESS OTHER THAN 1-1/2" , CONTACT TRICON FOR QUANTITIES. EXAMPLE: FOR AN 8 INCH JACKET, 8 OUNCES OF "A" AND 8 OUNCES OF "B" ARE REQUIRED. REQUIRED PROPORTIONS MAY VARY AS A RESULT OF CHANGES IN WEATHER CONDITIONS. NOTE THAT CHEMICAL REACTION WILL TAKE LONGER IN COLDER WEATHER.

IN COLDER WEATHER, TAPE MUST BE KEPT WARM UNTIL TIME OF USE.

STEEL 250 STANDARD POUR IN PLACE
FIELD JOINT KIT DETAIL WITH PVC CASING

TRICON STEEL 250

Date: 03/09/06 Dwg.No.:S250-10E

Rev.:



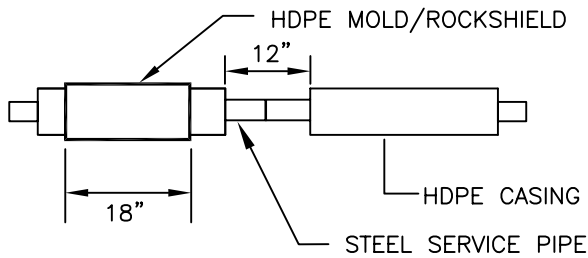
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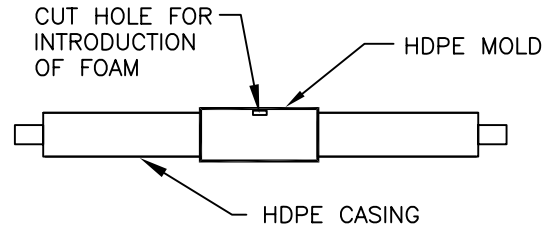
Tel: 315.697.8787 Fax: 315.697.8788

STEP 1



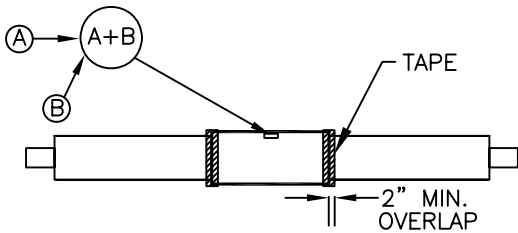
TEST ALL WELDED JOINTS AS REQUIRED.
SLIDE SPLIT HDPE MOLD OVER JOINT.

STEP 2



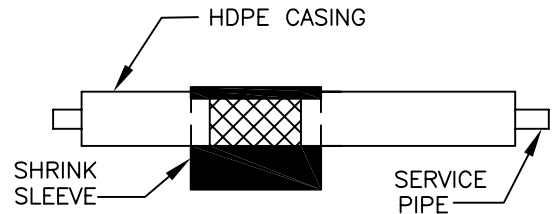
CENTER HDPE MOLD OVER JOINT AND SECURE IN PLACE. CUT HOLE IN TOP OF HDPE MOLD FOR INTRODUCTION OF POLYURETHANE FOAM MIXTURE.

STEP 3



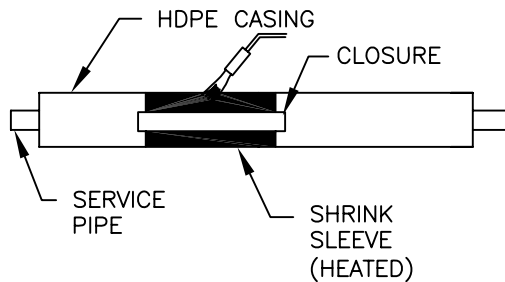
APPLY UNDERGROUND TAPE WHERE HDPE MOLD AND CASING MEET. PROVIDE FOR A MINIMUM OVERLAP OF 2". REFER TO CHART BELOW FOR FOAM AMOUNT BASED ON JACKET SIZE. POUR FOAM INTO OPENING. WHEN FOAM REACTS, TEMPORARILY SEAL THE OPENING WITH DUCT TAPE TO MAXIMIZE INSULATION VOLUME IN CAVITY.

STEP 4



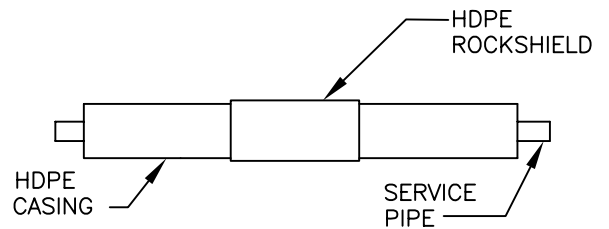
AFTER FOAM HAS REACTED, TRIM OFF ANY EXCESS AND REMOVE MOLD. PLACE SHRINK SLEEVE AROUND JOINT AND URETHANE OVERLAP SLEEVE BETWEEN THE 10 & 12 O'CLOCK POSITION

STEP 5



WITH LOW YELLOW FLAME, HEAT SHRINK SLEEVE USING CIRCUMFERENTIAL STROKES. AVOID EXCESSIVE HEAT TO OVERLAP AREA.

STEP 6



WHEN SHRINK SLEEVE HAS COOLED DOWN, APPLY HDPE ROCKSHIELD AND SECURE IN PLACE. FIELD JOINT IS NOW COMPLETE.

POLYURETHANE FOAM MIXTURE CHART

| JACKET SIZE | FIELD JOINT | JACKET SIZE | FIELD JOINT |
|-------------|-------------|-------------|-------------|
| 3 | 3 | 10 | 10 |
| 4 | 4 | 12 | 12 |
| 5 | 5 | 14 | 14 |
| 6 | 6 | 16 | 16 |
| 8 | 8 | | |

CHART INDICATES THE PROPORTIONS OF EACH COMPONENT ("A" & "B") TO BE MIXED PRIOR TO INTRODUCTION INTO PIPE CAVITY. INSULATION THICKNESS OF 1-1/2" IS ASSUMED FOR THE PURPOSES OF THIS CHART.

EXAMPLE: FOR AN 8 INCH JACKET, 8 OUNCES OF "A" AND 8 OUNCES OF "B" ARE REQUIRED.

PROPORTIONS MAY VARY AS A RESULT OF CHANGES IN WEATHER CONDITIONS.

NOTE: CHEMICAL REACTION WILL TAKE LONGER IN COLDER WEATHER. CONTACT TRICON FOR ADVICE DURING INCLEMENT WEATHER.

STEEL 250 STANDARD POUR IN PLACE FIELD JOINT KIT DETAIL WITH HDPE CASING

TRICON STEEL 250

Date: 03/09/06

Dwg.No.:S250-10F

Rev.:

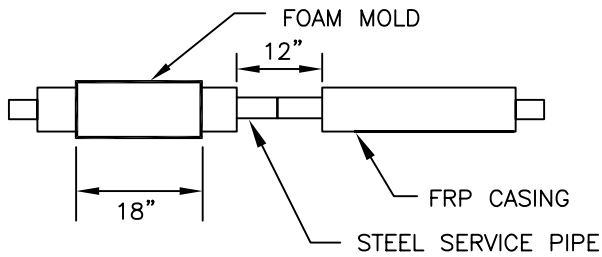


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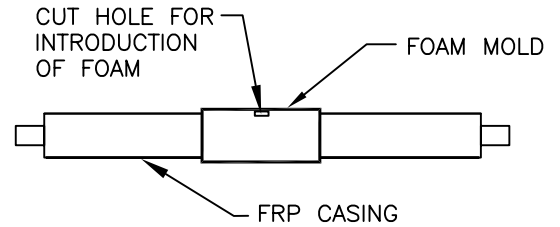
Tel: 315.697.8787 Fax: 315.697.8788

STEP 1



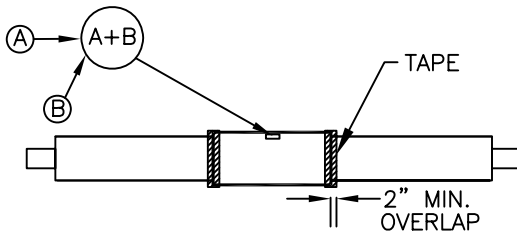
TEST ALL WELDED JOINTS AS REQUIRED.
SLIDE FOAM MOLD OVER JOINT.

STEP 2



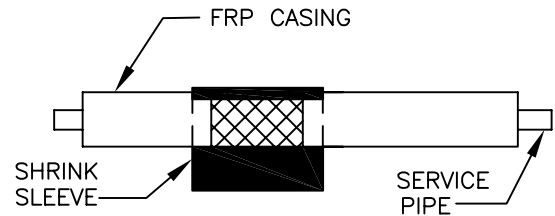
CENTER FOAM MOLD OVER JOINT AND SECURE IN PLACE. CUT HOLE IN TOP OF FOAM MOLD FOR INTRODUCTION OF POLYURETHANE FOAM MIXTURE.

STEP 3



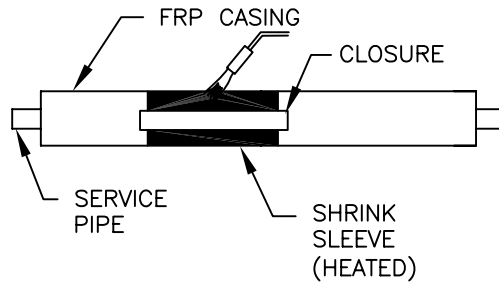
APPLY UNDERGROUND TAPE WHERE FOAM MOLD AND CASING MEET. PROVIDE FOR A MINIMUM OVERLAP OF 2". REFER TO CHART BELOW FOR FOAM AMOUNT BASED ON JACKET SIZE. POUR FOAM INTO OPENING. WHEN FOAM REACTS, TEMPORARILY SEAL THE OPENING WITH DUCT TAPE TO MAXIMIZE INSULATION VOLUME IN CAVITY.

STEP 4



AFTER FOAM HAS REACTED, TRIM OFF ANY EXCESS AND REMOVE MOLD. PLACE SHRINK SLEEVE AROUND JOINT AND URETHANE OVERLAP SLEEVE BETWEEN THE 10 & 12 O'CLOCK POSITION

STEP 5



WITH YELLOW FLAME, HEAT SHRINK SLEEVE USING CIRCUMFERENTIAL STROKES. AVOID EXCESSIVE HEAT TO OVERLAP AREA. DO NOT BACKFILL UNTIL SHRINK SLEEVE IS COOL TO THE TOUCH.

POLYURETHANE FOAM MIXTURE CHART

| JACKET SIZE | FIELD JOINT | JACKET SIZE | FIELD JOINT |
|-------------|-------------|-------------|-------------|
| 3 | 3 | 10 | 10 |
| 4 | 4 | 12 | 12 |
| 5 | 5 | 14 | 14 |
| 6 | 6 | 16 | 16 |
| 8 | 8 | | |

CHART INDICATES THE PROPORTIONS OF EACH COMPONENT ("A" & "B") TO BE MIXED PRIOR TO INTRODUCTION INTO PIPE CAVITY. INSULATION THICKNESS OF 1-1/2" IS ASSUMED FOR THE PURPOSES OF THIS CHART.

EXAMPLE: FOR AN 8 INCH JACKET, 8 OUNCES OF "A" AND 8 OUNCES OF "B" ARE REQUIRED.

PROPORTIONS MAY VARY AS A RESULT OF CHANGES IN WEATHER CONDITIONS.

NOTE: CHEMICAL REACTION WILL TAKE LONGER IN COLDER WEATHER. CONTACT TRICON FOR ADVICE DURING INCLEMENT WEATHER.

STEEL 250 STANDARD POUR IN PLACE FIELD JOINT KIT DETAIL WITH FRP CASING

TRICON STEEL 250

Date: 03/09/06

Dwg.No.:S250-10G

Rev.:



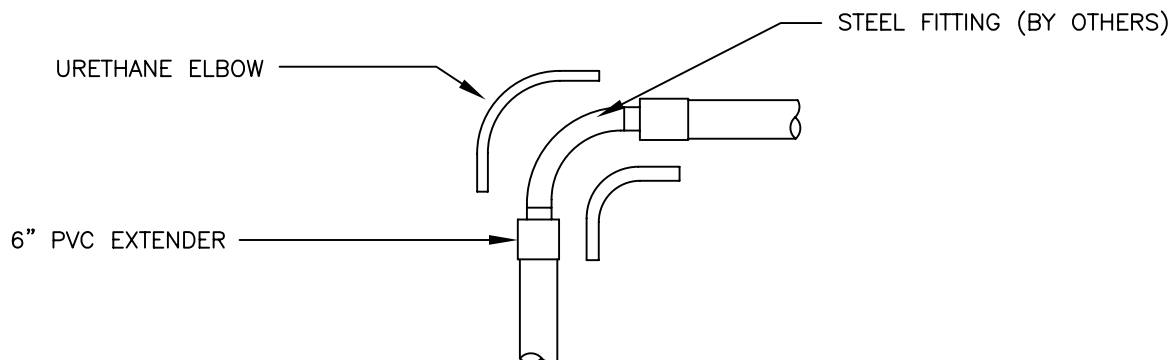
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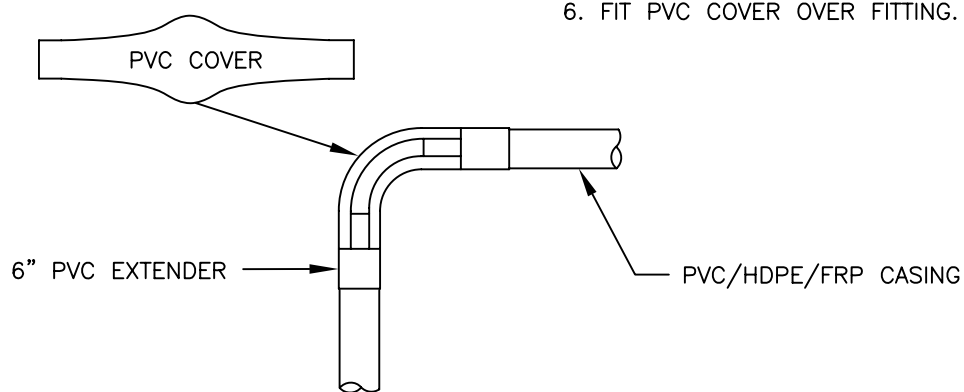
Tel: 315.697.8787 Fax: 315.697.8788

STEP 1



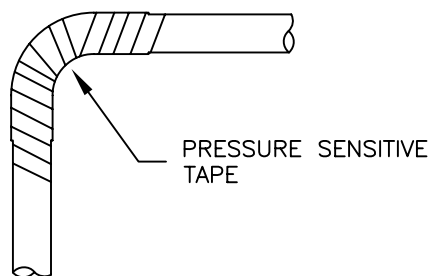
1. SLIDE 6" PVC SLEEVE EXTENDERS ONTO END OF PIPE CASING BEFORE ELBOW IS WELDED.
2. TEST ALL WELD JOINTS AS REQUIRED.
3. FIT POLYURETHANE FOAM INSULATION OVER FITTING AND SECURE IN PLACE.
4. CUT AND FIT STRAIGHT PIPE COVERING INTO PLACE THAT URETHANE ELBOW DOES NOT COVER.
5. SLIDE EXTENDERS IN PLACE AND SECURE WITH POLYKEN TAPE

STEP 2



6. FIT PVC COVER OVER FITTING.

STEP 3



7. WRAP FITTING WITH PRESSURE SENSITIVE TAPE AS SHOWN.

IN COLDER WEATHER, TAPE MUST BE
KEPT WARM UNTIL TIME OF USE.

STEEL 250 FIELD INSULATED ELBOW
FITTING KIT DETAIL WITH RIGID INSULATION



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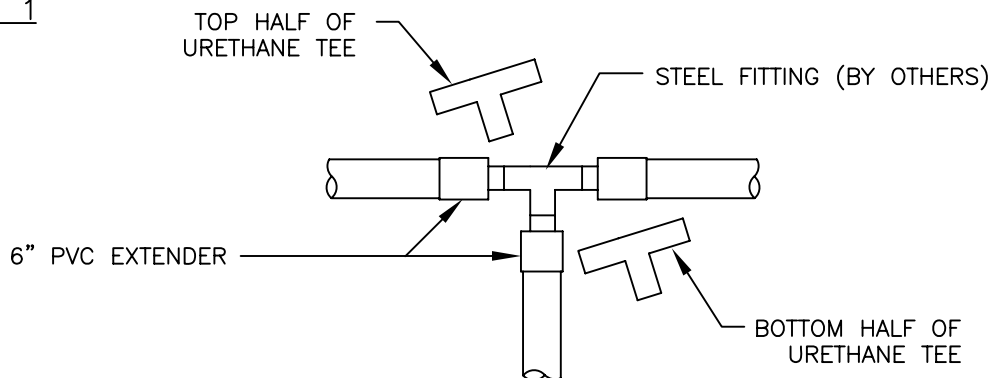
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TRICON STEEL 250

Date: 03/09/06 Dwg. No. S250-11

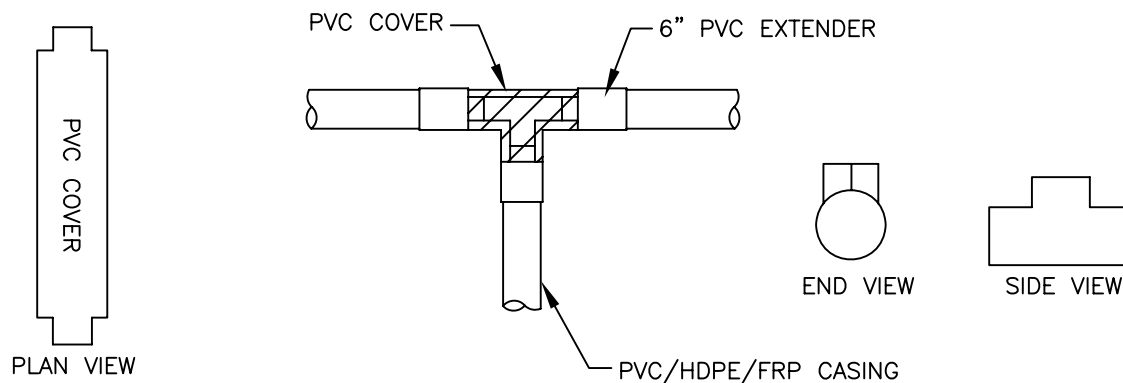
Rev.:

STEP 1



1. SLIDE 6" PVC SLEEVE EXTENDERS ONTO END OF PIPE CASING BEFORE TEE IS WELDED.
2. HYDRO-TEST ALL WELDED JOINTS AS REQUIRED.
3. FIT POLYURETHANE FOAM INSULATION OVER FITTING AND SECURE IN PLACE.
4. CUT AND FIT STRAIGHT PIPE COVERING INTO PLACE THAT URETHANE TEE DOES NOT COVER.
5. SLIDE EXTENDERS IN PLACE AND SECURE WITH POLYKEN TAPE

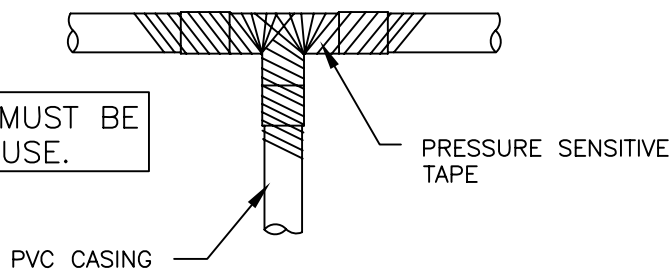
STEP 2



6. FIT PVC COVER OVER FITTING.

STEP 3

IN COLDER WEATHER, TAPE MUST BE KEPT WARM UNTIL TIME OF USE.



7. SPIRALLY WRAP FITTING WITH PRESSURE SENSITIVE TAPE AS SHOWN.

STEEL 250 FIELD INSULATED TEE FITTING KIT DETAIL WITH RIGID INSULATION

TRICON STEEL 250

Date: 03/09/06

Dwg. No. S250-12

Rev.:



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