

NOTES

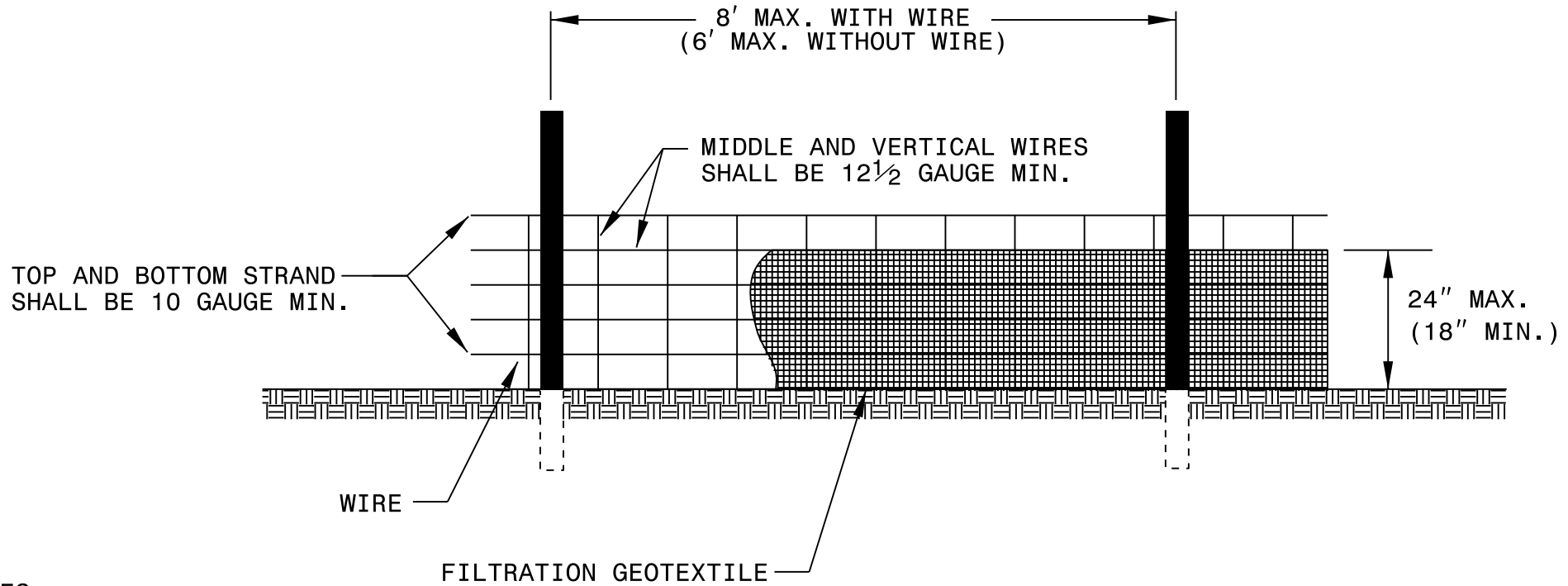
INSTALL RAILROAD EROSION CONTROL MEASURES PRIOR TO PERFORMING ANY WORK IN THE RAILROAD RIGHT-OF-WAY.

ADDITIONAL EROSION CONTROL MEASURES FOR PROTECTION OF RAILROAD DITCHES MAY BE REQUIRED AS DIRECTED.

MAKE NO SEPARATE PAYMENT FOR RAILROAD EROSION CONTROL MEASURES.

EXTEND LIMITS OF SILT FENCE AND FILTRATION GEOTEXTILE PARALLEL TO RAILROAD A MINIMUM OF 10'-0" OUTSIDE EDGE OF SUPERSTRUCTURE OR TOE OF SLOPE ON CONSTRUCTION. A GREATER LENGTH OF SILT FENCE OR FILTRATION GEOTEXTILE MAY BE REQUIRED AS DIRECTED.

NAIL FILTRATION GEOTEXTILE TO TIMBER RAIL TIES WITH PRIME SOURCE "GRIP CAP" OR EQUIVALENT. SECURE FILTRATION GEOTEXTILE ON SHOULDER AS DIRECTED BY THE RAILROAD AND NCDOT.



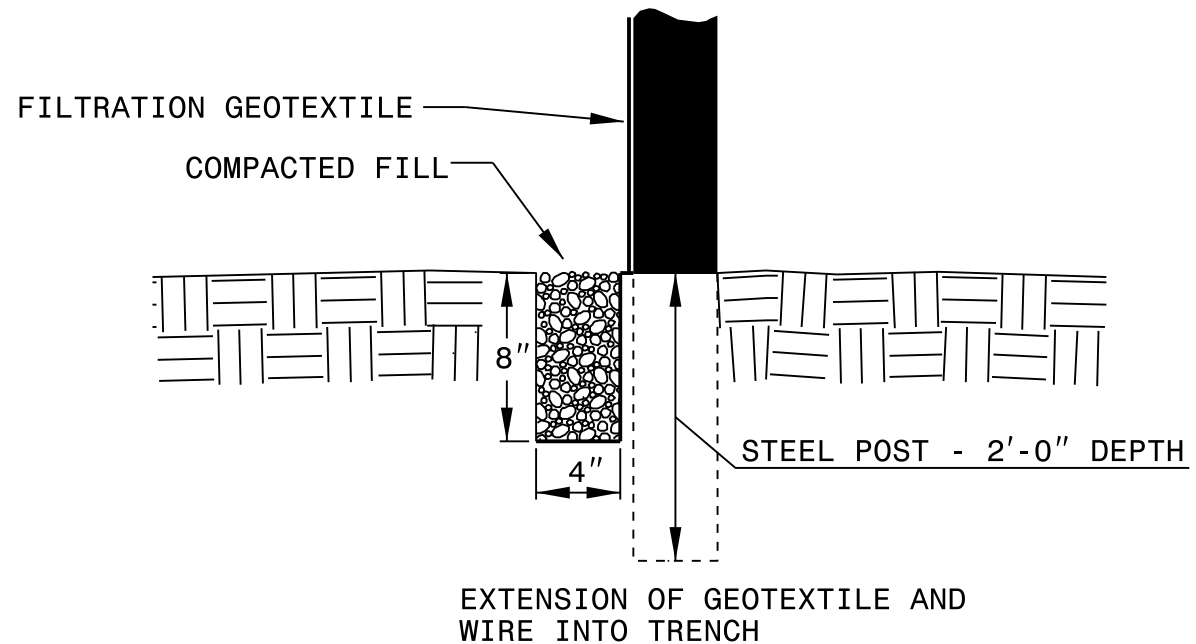
NOTES

USE WIRE A MINIMUM OF 32" IN WIDTH AND WITH A MINIMUM OF 6 LINE WIRES WITH 12" STAY SPACING.

USE FILTRATION GEOTEXTILE A MINIMUM OF 36" IN WIDTH AND FASTEN ADEQUATELY TO THE WIRE AS DIRECTED.

PROVIDE 5'-0" STEEL POST OF THE SELF-FASTENER ANGLE STEEL TYPE.

FOR MECHANICAL SLICING METHOD INSTALLATION, GEOTEXTILE SHALL BE A MAXIMUM OF 18" ABOVE GROUND SURFACE.



ENGLISH STANDARD DRAWING FOR
SPECIAL SEDIMENT CONTROL FENCE

NOTES

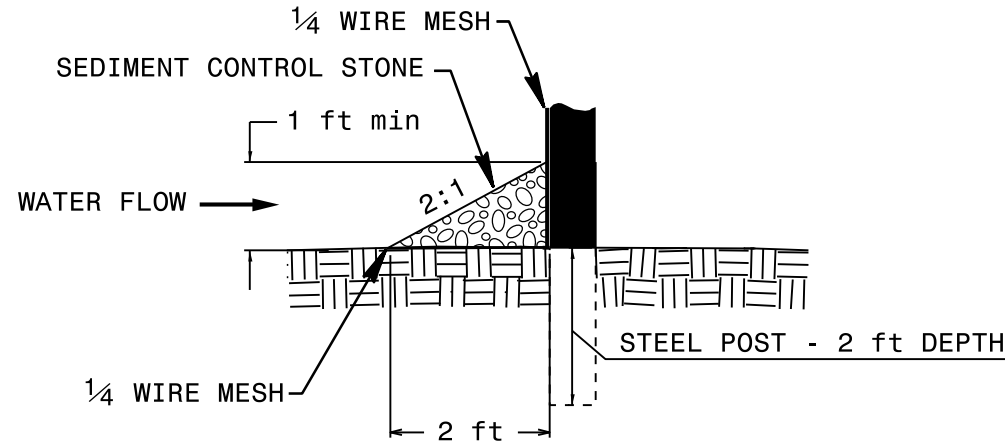
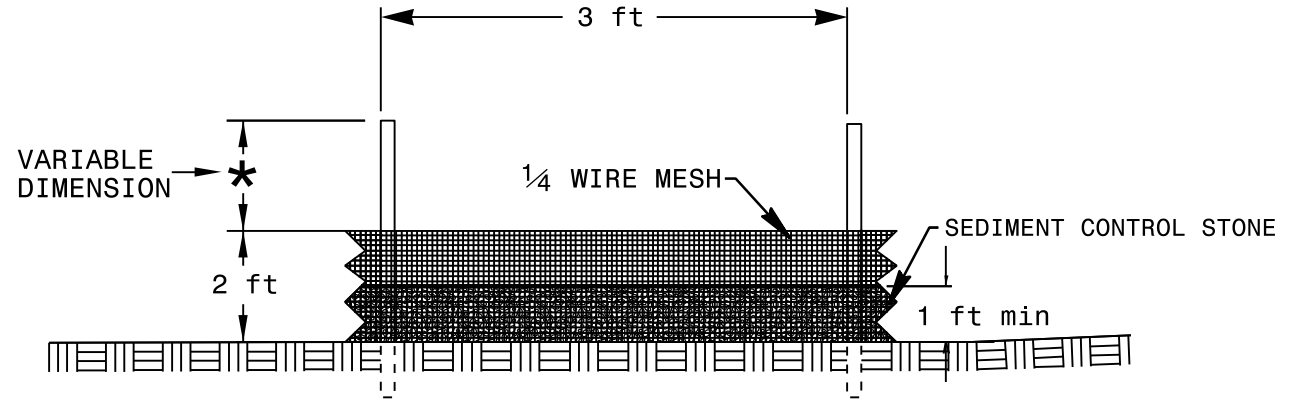
USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL STONE.

USE HARDWARE CLOTH 24 GAUGE WIRE MESH WITH 1/4 INCH MESH OPENINGS.

INSTALL 5 FT. SELF FASTENER ANGLE STEEL POST 2 FT. DEEP MINIMUM.

SPACE POST A MAXIMUM OF 3 FT.

FOR INSTALLATION BETWEEN SECTIONS OF SILT FENCE, EXTEND SEDIMENT CONTROL STONE A MINIMUM OF 12" IN WIDTH ON EACH SIDE OF SPECIAL SEDIMENT CONTROL FENCE SECTION.

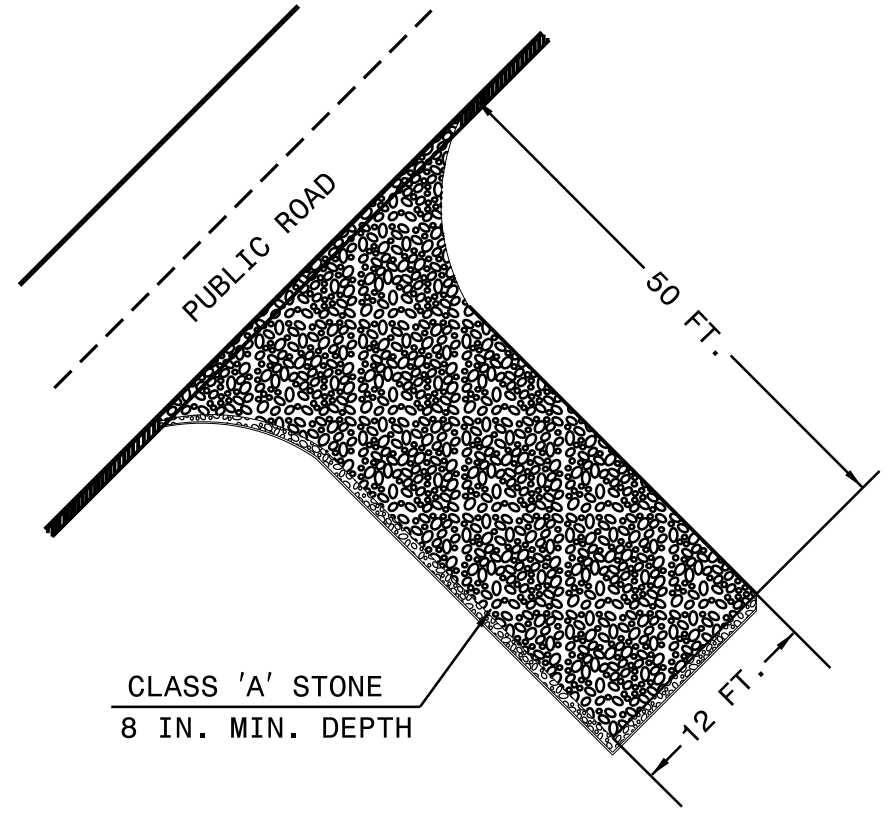


ENGLISH STANDARD DRAWING FOR
SPECIAL SEDIMENT CONTROL FENCE

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ENGLISH STANDARD DRAWING FOR
GRAVEL CONSTRUCTION ENTRANCE



NOTES

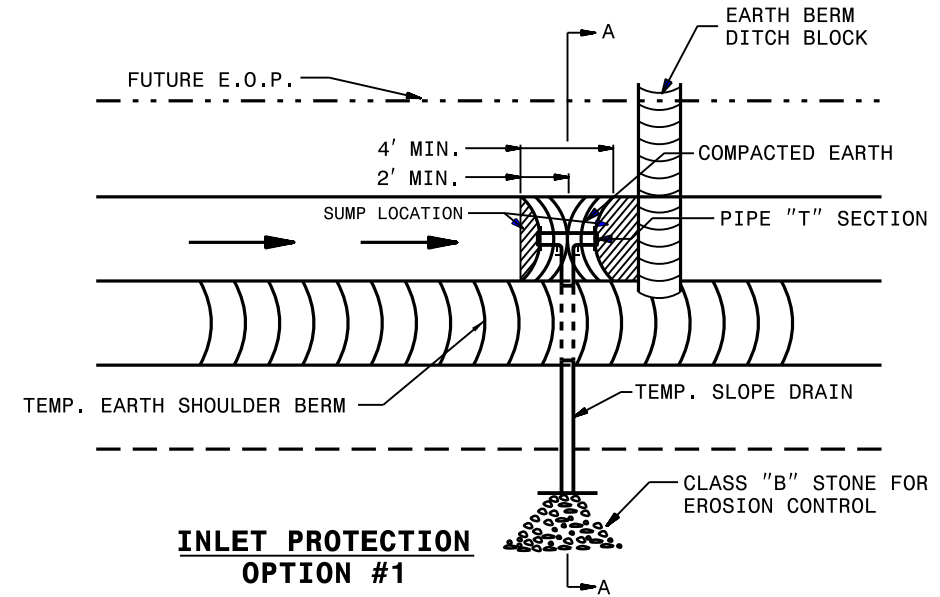
1. PROVIDE TURNING RADIUS SUFFICIENT TO ACCOMMODATE LARGE TRUCKS.
2. LOCATE ENTRANCES TO PROVIDE FOR UTILIZATION BY ALL CONSTRUCTION VEHICLES.
3. MUST BE MAINTAINED IN A CONDITION WHICH WILL PREVENT TRACKING OR DIRECT FLOW OF MUD ONTO STREETS. PERIODIC TOPDRESSING WITH STONE WILL BE NECESSARY.
4. ANY MATERIAL TRACKED ONTO THE ROADWAY MUST BE CLEANED UP IMMEDIATELY.
5. LOCATE GRAVEL CONSTRUCTION ENTRANCE AT ALL POINTS OF INGRESS AND EGRESS UNTIL SITE IS STABILIZED. PROVIDE FREQUENT CHECKS OF THE DEVICE AND TIMELY MAINTENANCE.
6. NUMBER AND LOCATION OF CONSTRUCTION ENTRANCES TO BE DETERMINED BY THE ENGINEER.
7. USE CLASS 'A' STONE OR OTHER COARSE AGGREGATE APPROVED BY THE ENGINEER.
8. INSTALL CONSTRUCTION ENTRANCES IN A WAY TO PREVENT VEHICLES FROM BYPASSING CONSTRUCTION ENTRANCE LEAVING PROJECT SITE.

NOTE: PLACE FILTRATION GEOTEXTILE BENEATH STONE

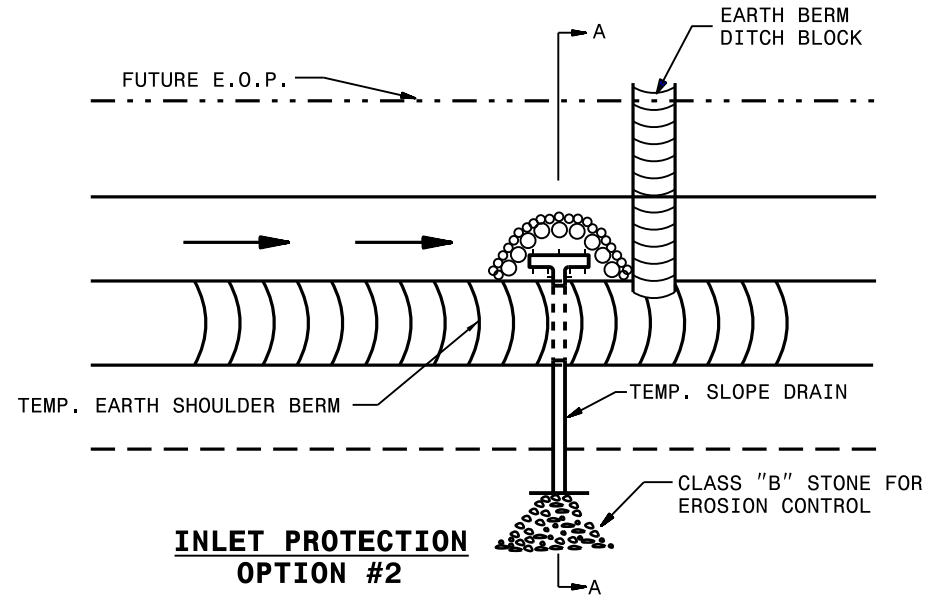
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ENGLISH STANDARD DRAWING FOR
GRAVEL CONSTRUCTION ENTRANCE

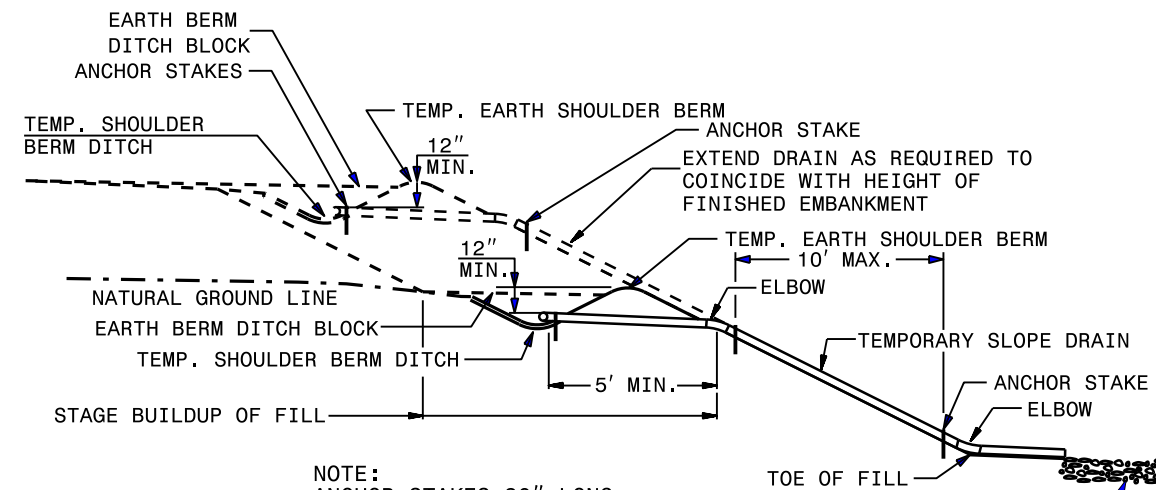


**INLET PROTECTION
OPTION #1**



**INLET PROTECTION
OPTION #2**

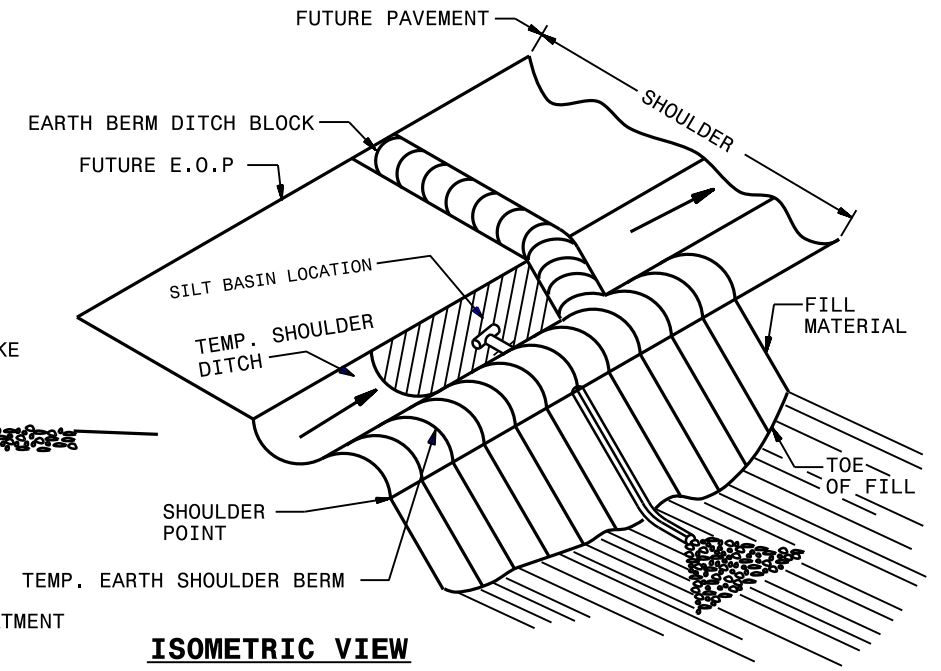
DESIGN SILT BASIN VOLUME FOR 3600 CUBIC FEET OF SEDIMENT STORAGE PER DISTURBED ACRE.



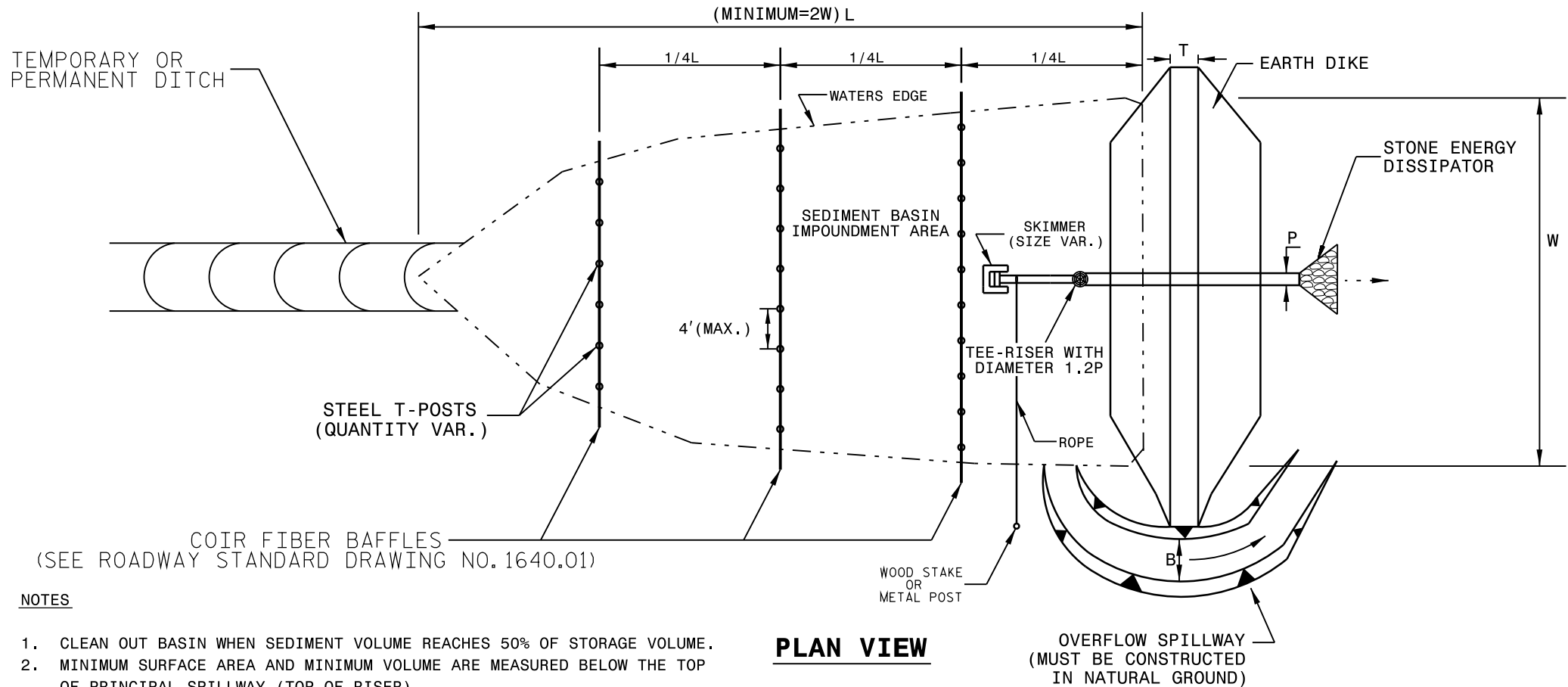
**TEMPORARY SLOPE DRAIN
SECTION A-A**

NOTES

1. OPEN END PIPE WITH MINIMUM SETBACK AND PROPER COMPACTION IS AN ACCEPTABLE INLET TREATMENT FOR STAGED CONSTRUCTION WHEN NOT LEFT IN PLACE FOR MORE THAN 30 DAYS.
2. DESIGN INLET PROTECTION OPTION #1 FOR 3600 CUBIC FOOT OF SEDIMENT STORAGE PER DISTURBED ACRE AND PROVIDE NON-VERTICAL SIDESLOPES WITH NOT GREATER THAN 1.5:1 SLOPE.
3. DESIGN SILT BASINS WITH A 2:1 LENGTH TO WIDTH RATIO MINIMUM.
4. USE CLASS B STONE FOR EROSION CONTROL AT OUTLET LOCATIONS SUBJECT TO SCOURING. SILT BASINS AND/OR OTHER EROSION CONTROL DEVICES MAY ALSO BE UTILIZED TO PREVENT SCOUR AT OUTLET LOCATIONS.
5. USE MAXIMUM SLOPE DRAIN SPACING OF 200 FT.



ISOMETRIC VIEW



PLAN VIEW

NOTES

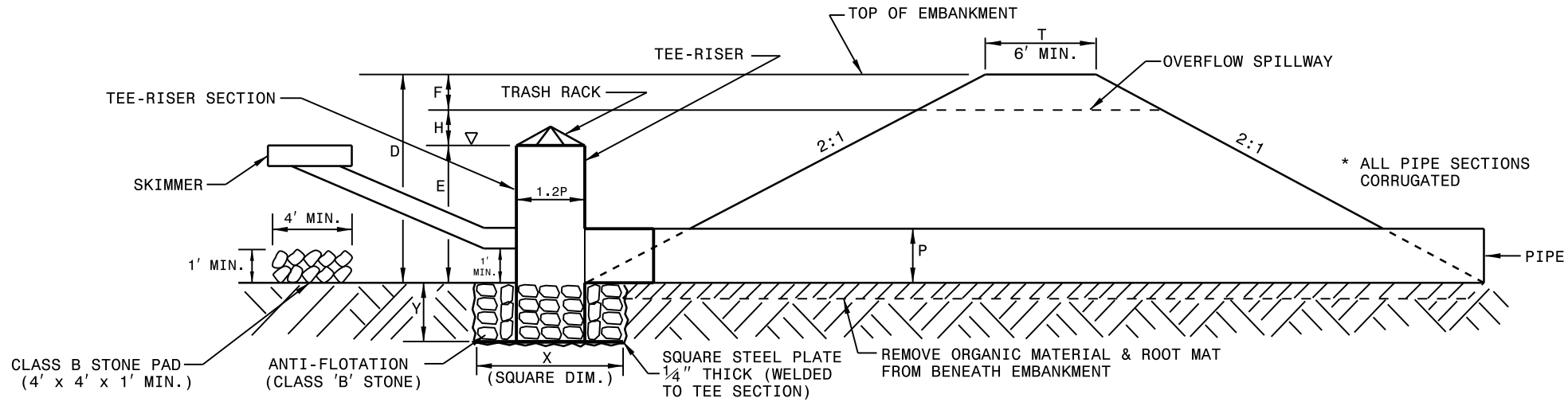
- CLEAN OUT BASIN WHEN SEDIMENT VOLUME REACHES 50% OF STORAGE VOLUME.
- MINIMUM SURFACE AREA AND MINIMUM VOLUME ARE MEASURED BELOW THE TOP OF PRINCIPAL SPILLWAY (TOP OF RISER).
- MINIMUM SURFACE AREA SHALL BE 435 FT² PER CFS OF Q₁₀ PEAK INFLOW, AND MINIMUM SEDIMENT STORAGE VOLUME SHALL BE 1800 FT³ PER ACRE OF DISTURBED AREA.
- THE EARTH DIKE MAY BE CONSTRUCTED ALONG ONE OR MORE SIDES. EXCAVATION MAY BE REQUIRED TO PROVIDE MINIMUM SURFACE AREA AND/OR MINIMUM STORAGE VOLUME.
- CONSTRUCT THE DIKE OF MATERIAL SUITABLE FOR AND MEETING ROADWAY EMBANKMENT SPECIFICATIONS.
- TO FACILITATE DETERMINATION OF MAINTENANCE CLEANOUT REQUIREMENT, PLACE A MARKER IN THE BASIN INDICATING THE 50% VOLUME LEVEL.
- THE MINIMUM RISER PIPE DIAMETER IS 1.2 TIMES THE BARREL PIPE DIAMETER.
- ATTACH SKIMMER TO RISER PIPE A MINIMUM OF 1 FOOT FROM BOTTOM OF BASIN.
- PROVIDE A STONE ENERGY DISSIPATOR PAD AT THE OUTLET OF THE RISER BARREL IN ACCORDANCE WITH ROADWAY STANDARD DRAWING NO. 876.02 FOR PIPE OUTLET WITHOUT DITCH.
- SEED AND PLACE MATTING FOR EROSION CONTROL ON ALL INTERIOR AND EXTERIOR SLOPES OF BASIN.

STANDARD BASIN DIMENSIONS

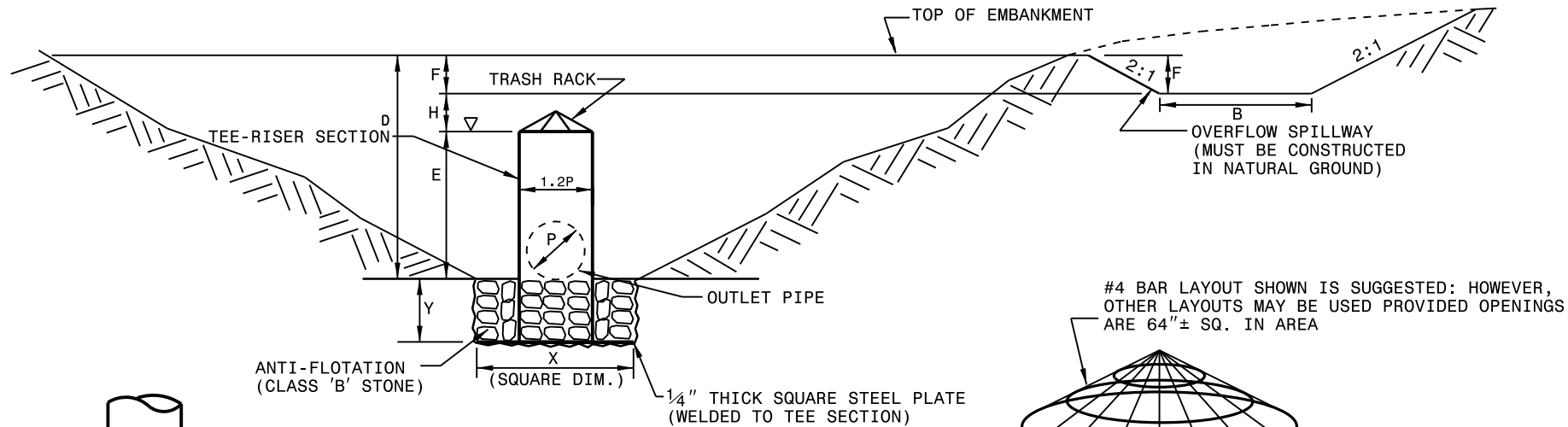
P	H	T (MIN)	D*	E	F	B (MIN)	X (MIN)	Y (MIN)	X1 (MIN)	Y1 (MIN)
IN.	FT.	FT.	FT.	FT.	FT.	FT.	FT.	FT.	FT.	FT.
15	1.0	6.0	6.0	4.0	1.0	3.0	2.7	1.0	2.5	1.0
18	1.0	6.0	6.5	4.5	1.0	4.0	3.5	1.0	3.2	1.0
24	1.0	6.0	8.0	6.0	1.0	8.0	5.5	1.0	5.0	1.0
30	1.0	6.0	9.5	7.0	1.5	8.0	7.6	1.0	6.9	1.0

* SHALL NOT EXCEED 12'

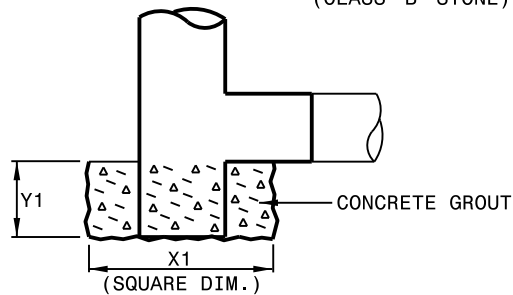
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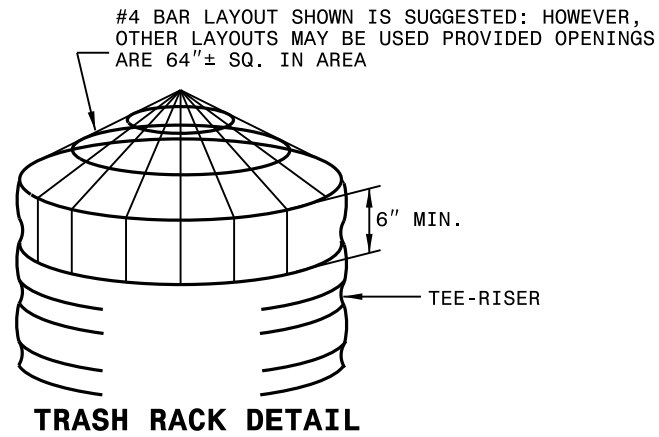
SECTIONAL VIEW



PROFILE VIEW

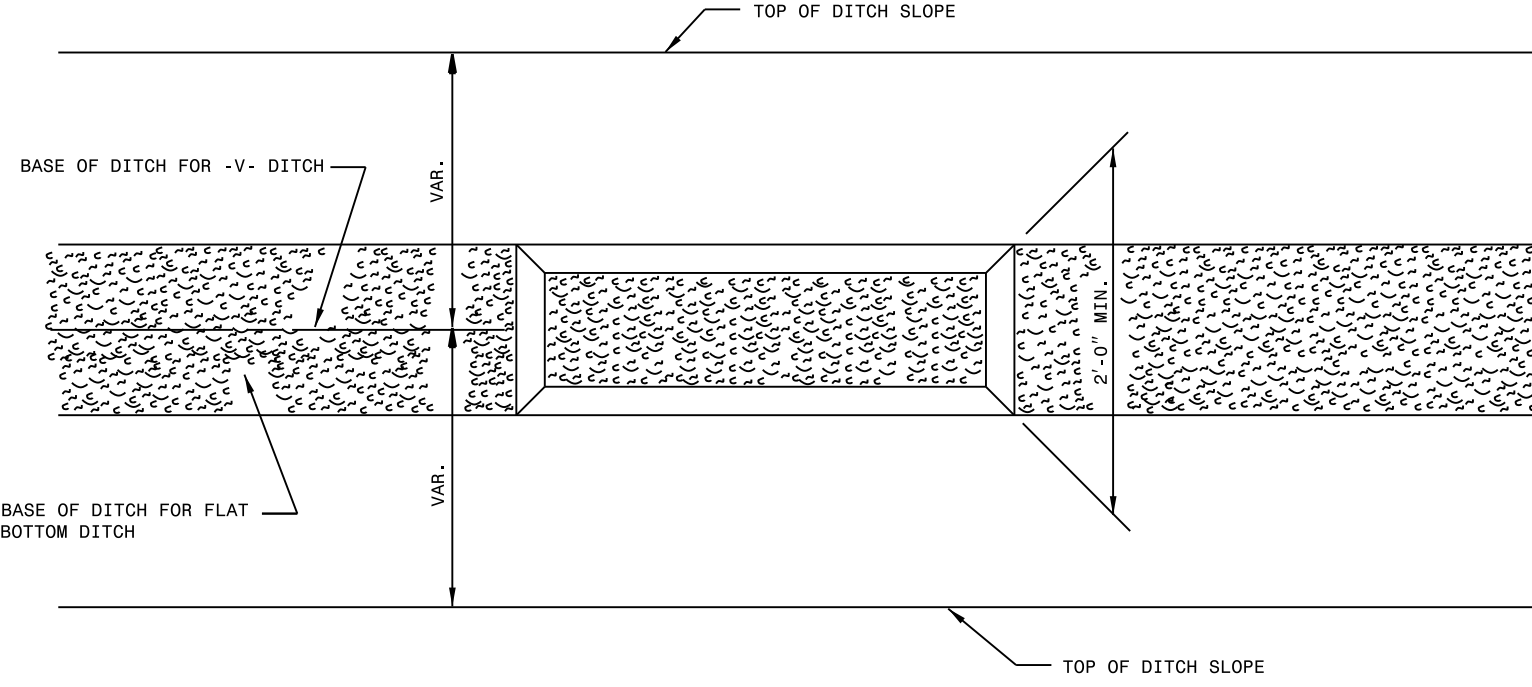


ALTERNATE ANTI-FLOTATION METHOD

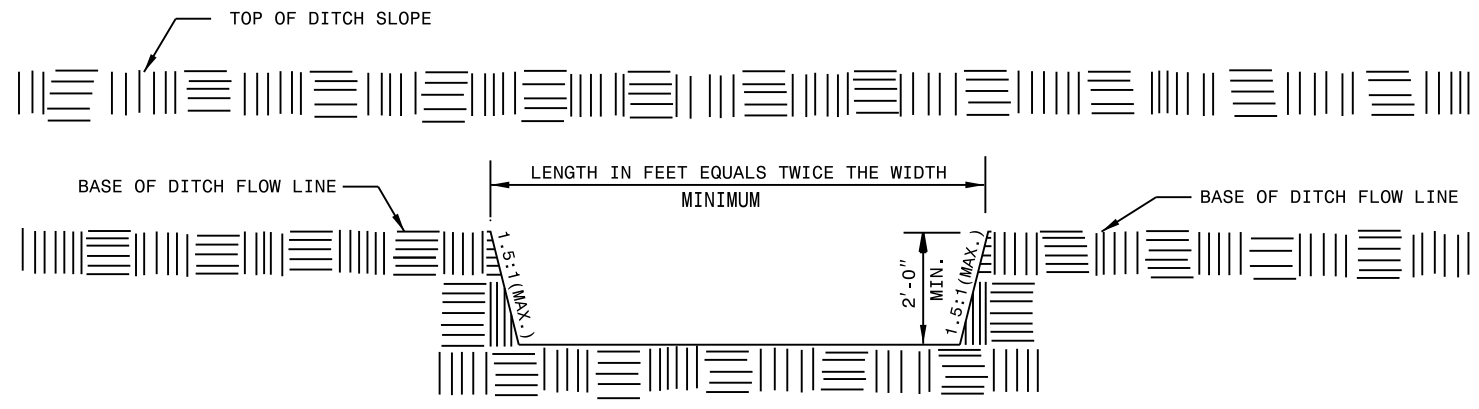


TRASH RACK DETAIL

NOT TO SCALE



PLAN



ELEVATION

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ENGLISH STANDARD DRAWING FOR
SILT BASIN TYPE B

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 DEPT. OF TRANSPORTATION
 DIVISION OF HIGHWAYS
 RALEIGH, N.C.

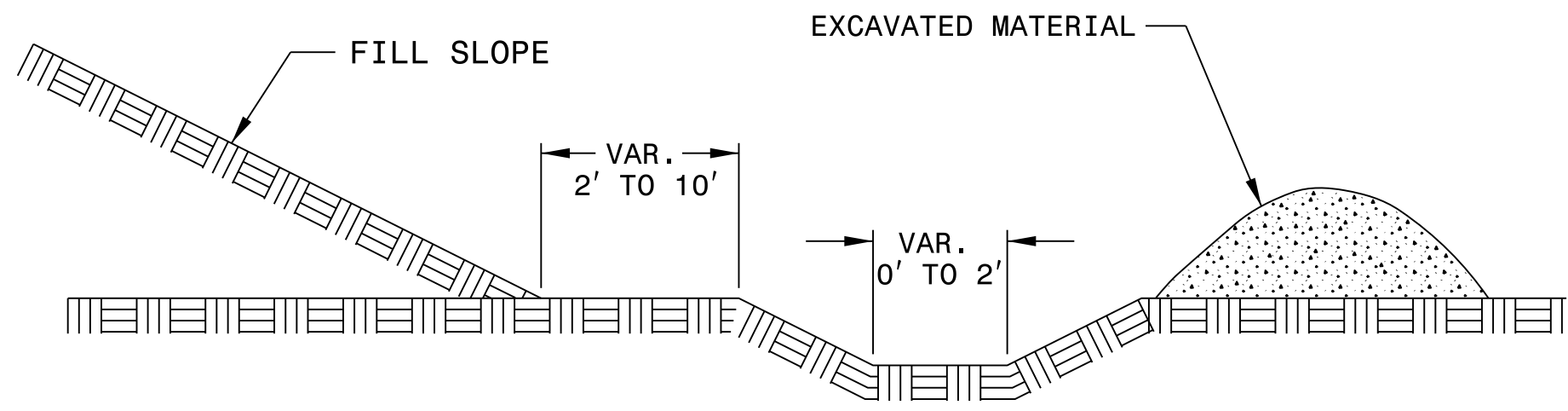
1-12

ENGLISH STANDARD DRAWING FOR
SILT BASIN TYPE B

NOTES

EXCAVATE TEMPORARY SILT DITCH WITH NON-VERTICAL SIDE SLOPES AND NOT GREATER THAN 1.5:1 SLOPE.

SEED BERM CREATED BY EXCAVATED MATERIAL AS DIRECTED.



CROSS SECTIONAL VIEW

NOTES

INSTALL COIR FIBER BAFFLES IN ACCORDANCE WITH ROADWAY STANDARD DRAWING NO. 1640.01.

INSTALL THE TOP OF THE COIR FIBER BAFFLE A MINIMUM OF 6" LOWER THAN THE TOP OF THE STILLING BASIN BERMS.

USE THE TYPICAL SECTION SHOWN FOR THE STILLING BASIN AS A GUIDE. THE BASIN MAY HAVE ANY TYPE CONFIGURATION AS LONG AS SUFFICIENT VOLUME IS PROVIDED AND PROVISIONS ARE MADE FOR A PERMEABLE STONE DRAIN.

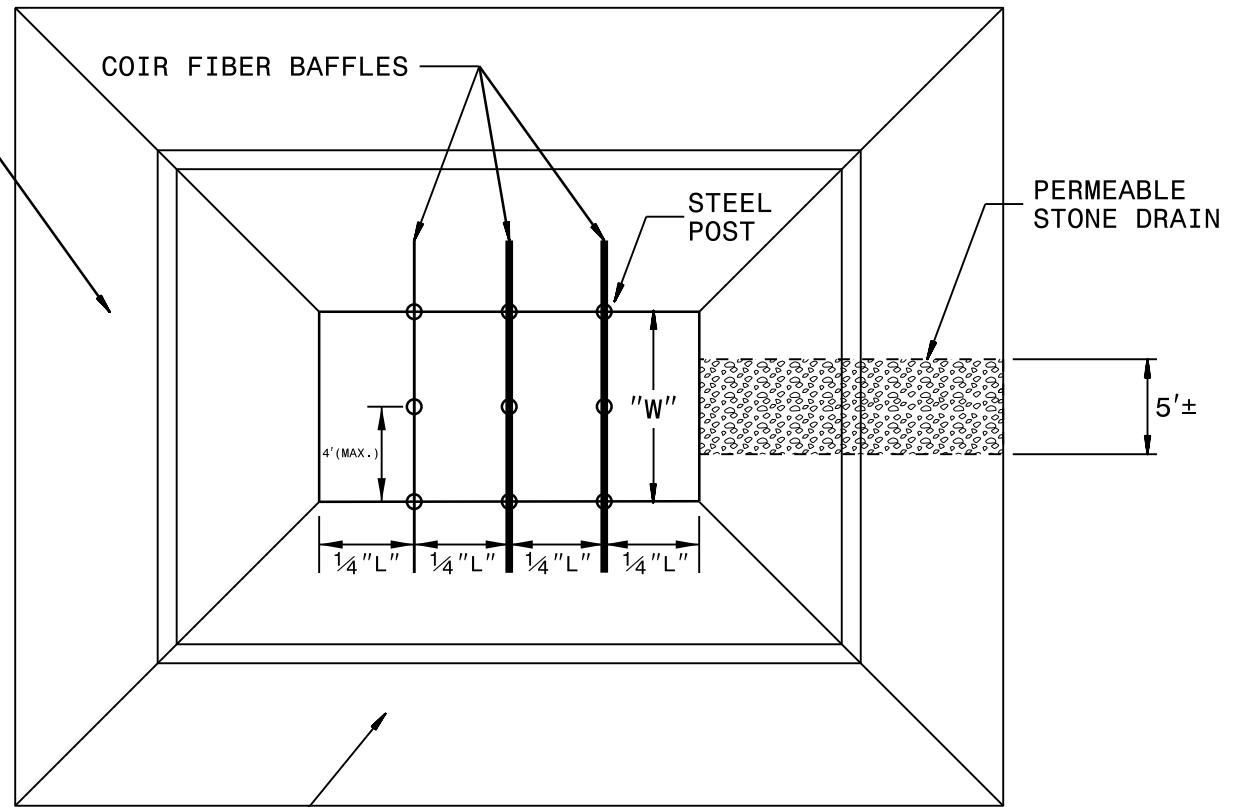
DO NOT EXCEED 5 FT. IN HEIGHT FOR THE EARTH DIKES REQUIRED FOR STILLING BASINS. ADDITIONAL DEPTHS MAY BE ATTAINED BY EXCAVATING BELOW THE NATURAL GROUND LEVEL.

THE STILLING BASIN SIZE IS VARIABLE AND DEPENDENT ON SPECIFIC SITE REQUIREMENTS AS WELL AS PROPOSED CONSTRUCTION OPERATIONS.

SUBMIT THE SIZE, LOCATION AND PERMEABLE STONE DRAIN MATERIAL FOR APPROVAL PRIOR TO CONSTRUCTION.

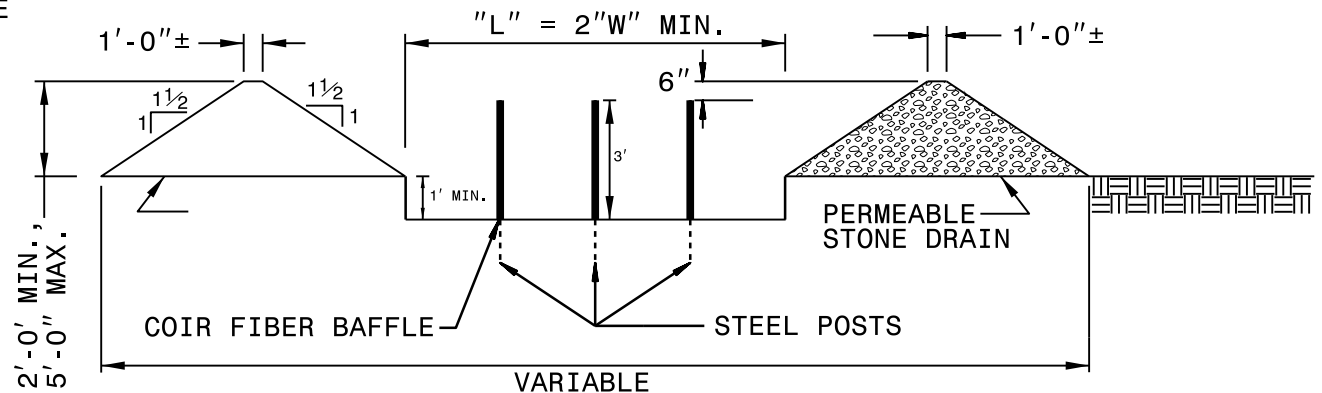
PUMP THE EFFLUENT INTO THE STILLING BASIN TO A MAXIMUM DEPTH OF 3 FEET.

UNCLASSIFIED
EARTH MATERIAL



EARTH DIKE

PLAN VIEW

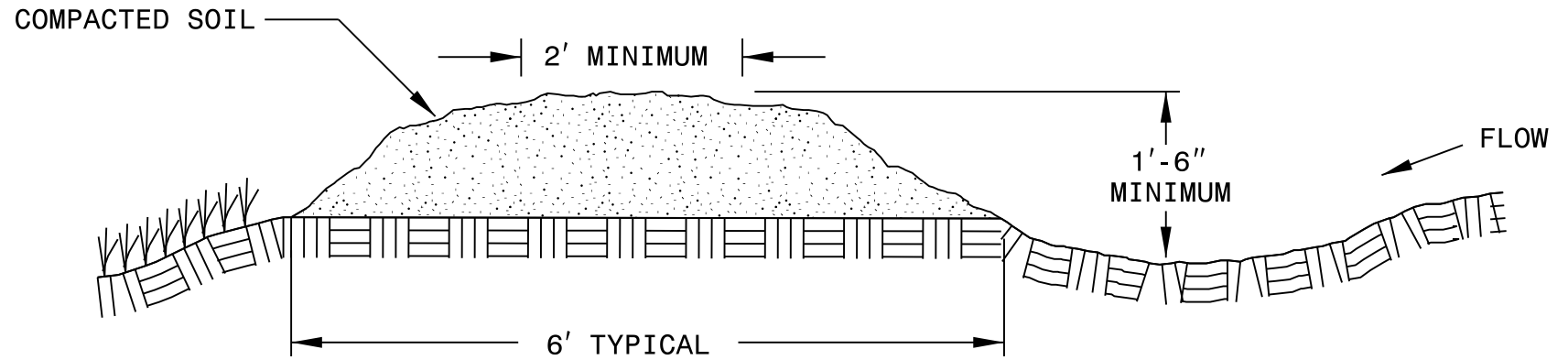


TYPICAL SECTION VIEW

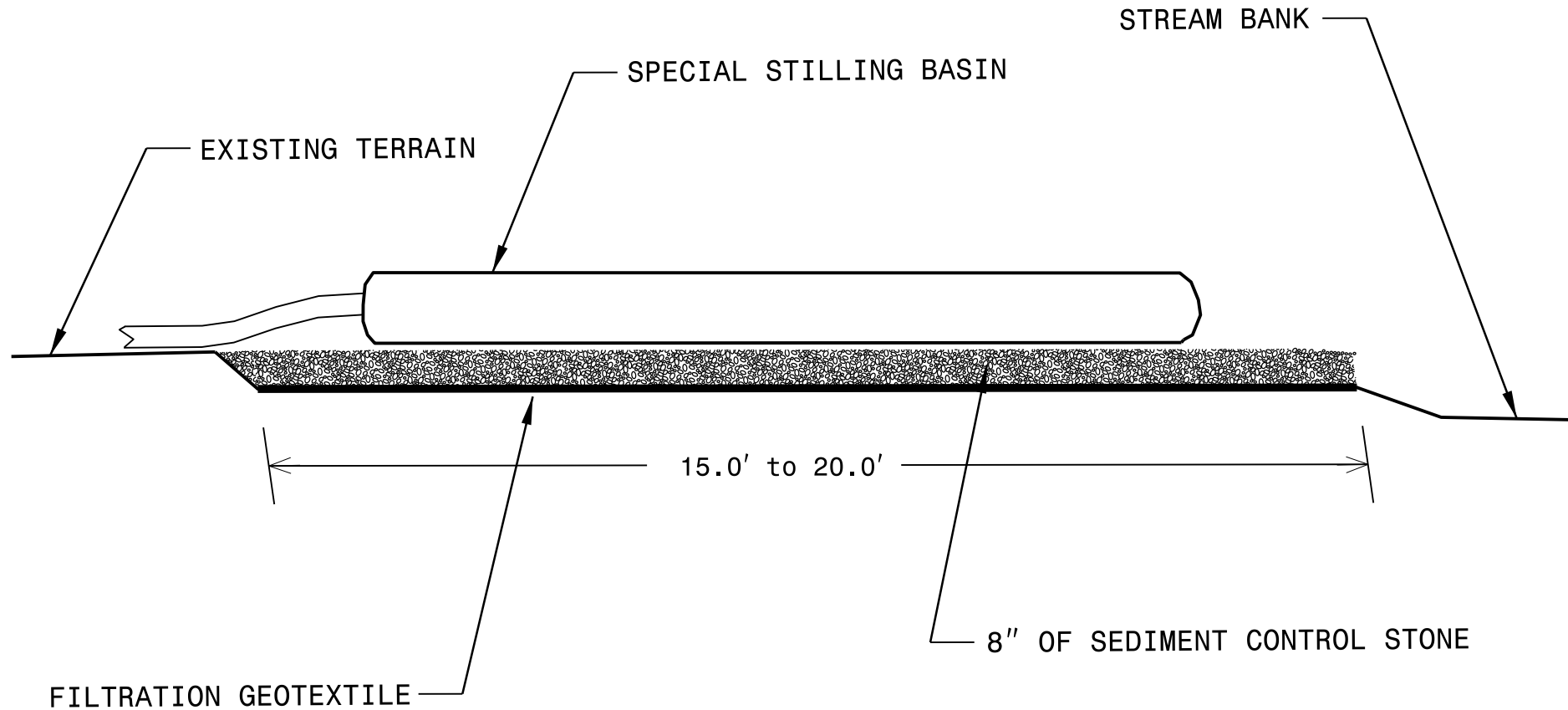
NOTES

EXCAVATE TEMPORARY DIVERSION WITH NON-VERTICAL SIDE SLOPES AND NOT GREATER THAN 1.5:1 SLOPE.

SEED BERM CREATED BY COMPACTED SOIL AS DIRECTED.



CROSS SECTIONAL VIEW

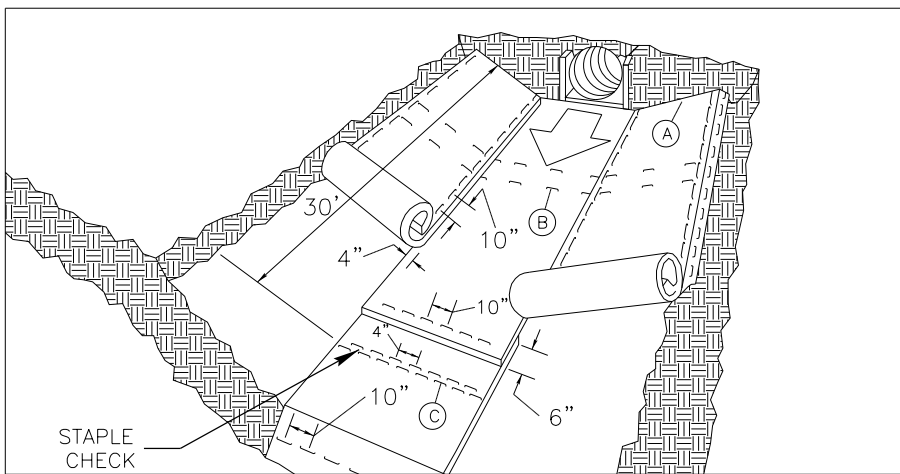


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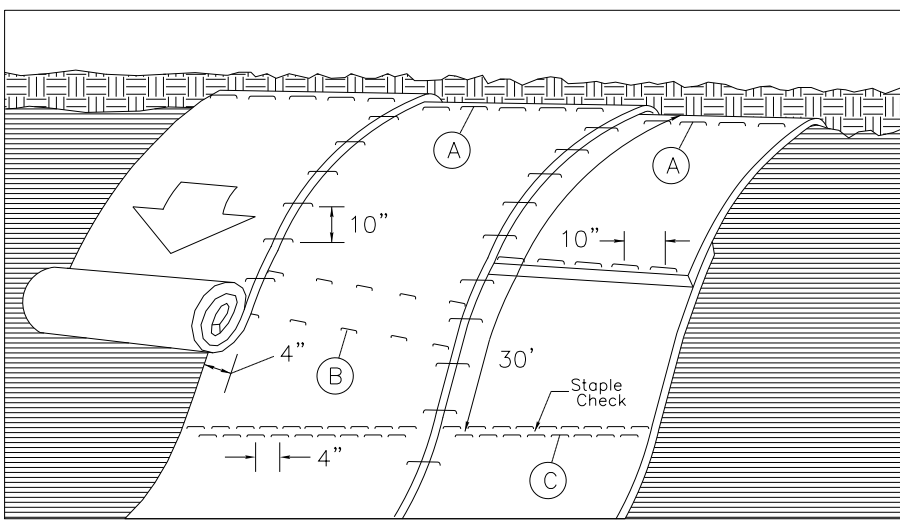
USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL STONE.

PROVIDE STABILIZED OUTLET TO STREAM BANK.
 WOOD PALLETS MAY BE USED IN LIEU OF STONE AND GEOTEXTILE AS DIRECTED. A SUFFICIENT NUMBER OF PALLETS MUST BE PROVIDED TO ELEVATE THE ENTIRE SPECIAL STILLING BASIN ABOVE NATURAL GROUND.

NOT TO SCALE



MATTING IN DITCHES



MATTING ON SLOPES

NOTES:
 THIS DETAIL APPLIES TO STRAW, EXCELSIOR, AND PERMANENT SOIL REINFORCEMENT MAT (PSRM) INSTALLATION.
 STAPLES SHALL BE NO. 11 GAUGE STEEL WIRE FORMED INTO A "U" SHAPE WITH A MINIMUM THROAT WIDTH OF 1 INCH AND NOT LESS THAN 6 INCHES IN LENGTH.

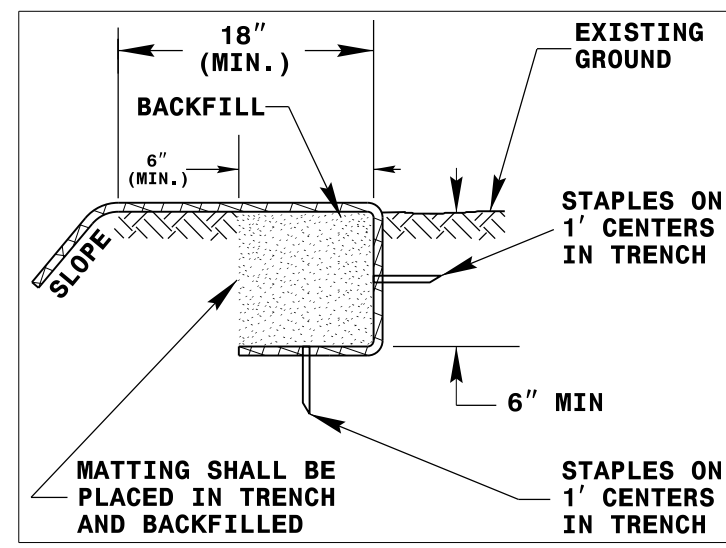


DIAGRAM (A)

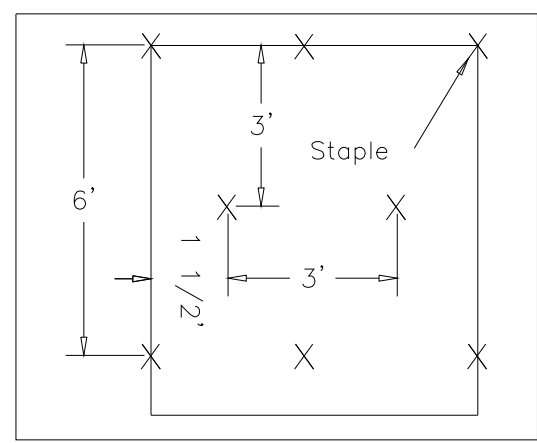


DIAGRAM (B)

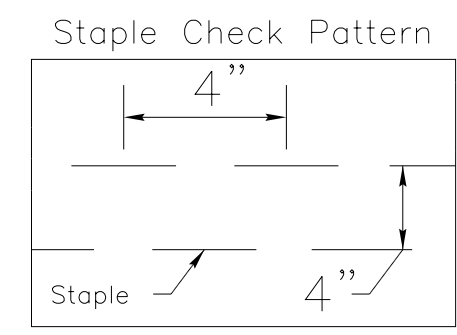


DIAGRAM (C)

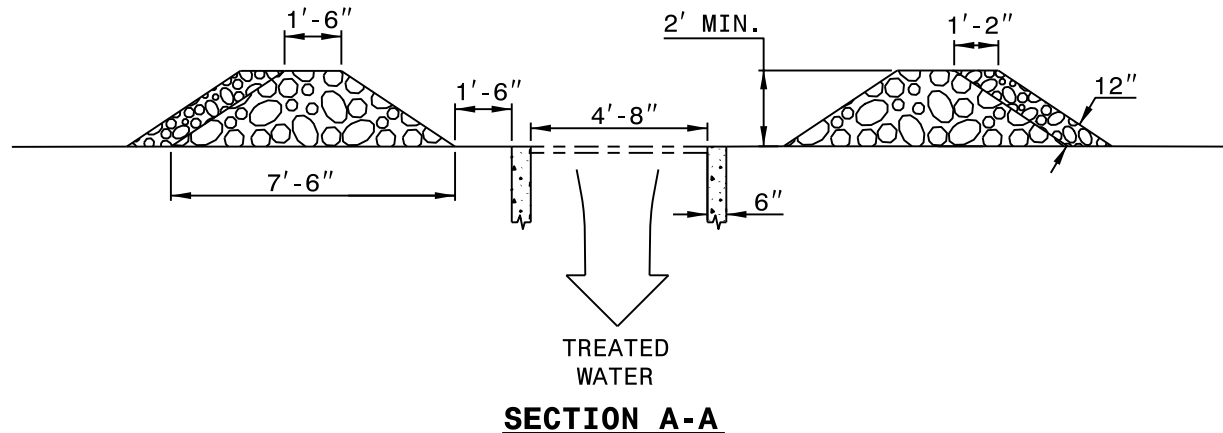
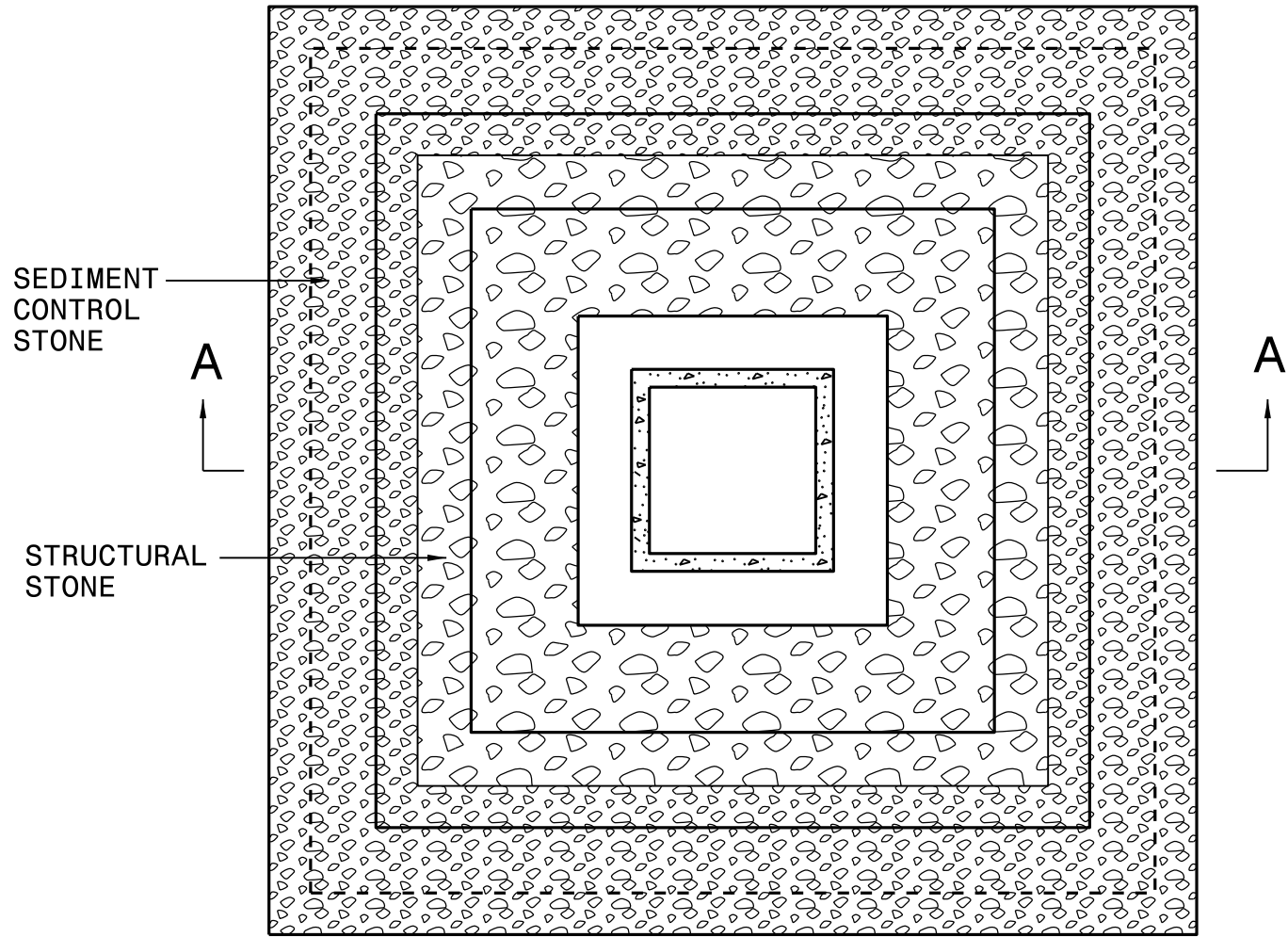
NOT TO SCALE

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ENGLISH STANDARD DRAWING FOR
ROCK INLET SEDIMENT TRAP TYPE A

SHEET 1 OF 1
1632.01



SECTION A-A

NOTES

CLEAN SEDIMENT WHEN
 1/2 FULL AND AS DIRECTED.
 USE NO. 5 OR NO. 57 STONE
 FOR SEDIMENT CONTROL STONE.
 USE CLASS B STONE FOR
 STRUCTURAL STONE.
 CONSTRUCT TOP OF BERM
 A MINIMUM OF ONE FOOT
 BELOW THE SHOULDER OR
 ANY DIVERSION POINT.

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ENGLISH STANDARD DRAWING FOR
ROCK INLET SEDIMENT TRAP TYPE A

SHEET 1 OF 1
1632.01

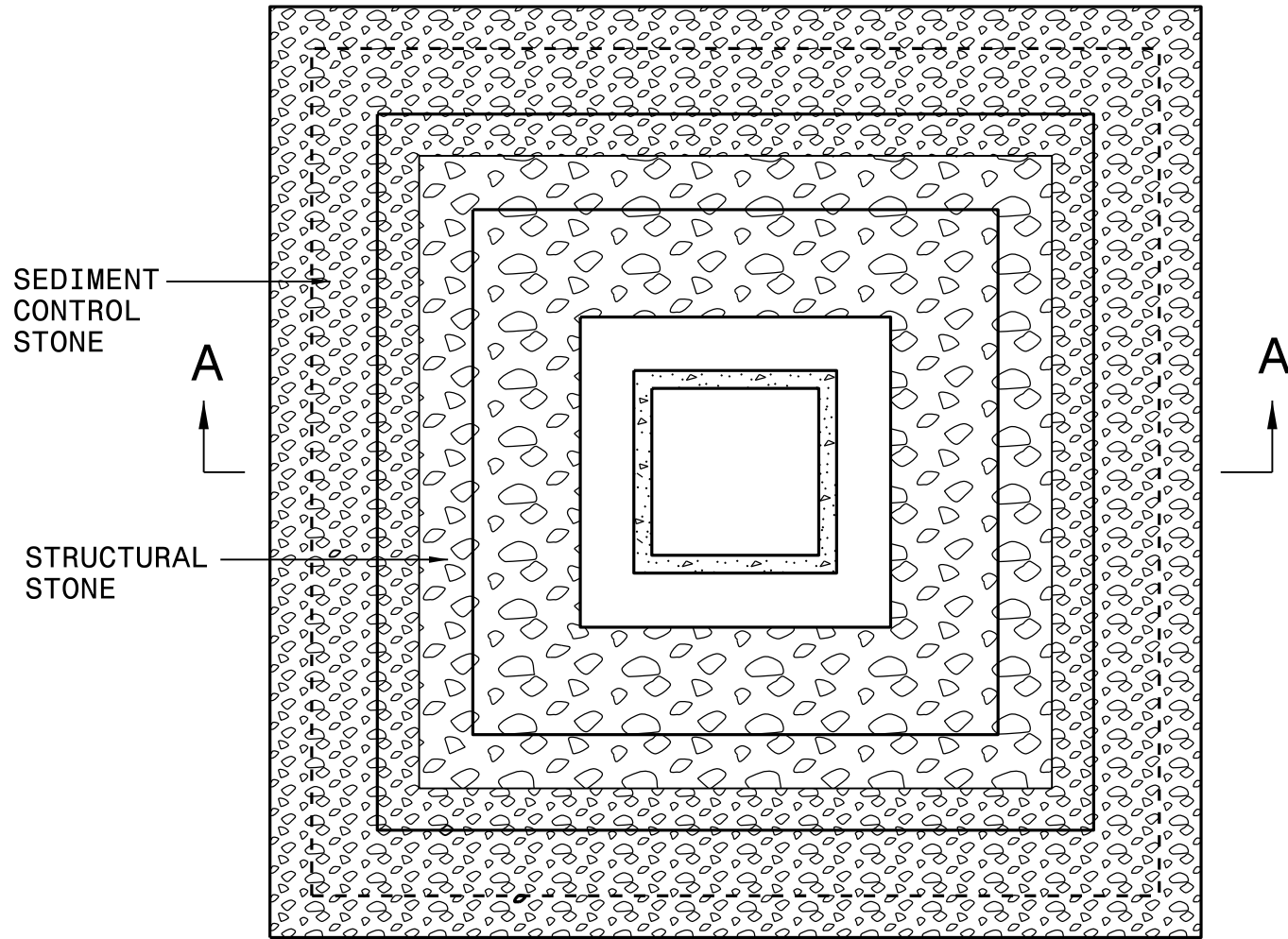
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ENGLISH STANDARD DRAWING FOR
ROCK INLET SEDIMENT TRAP TYPE B

SHEET 1 OF 1

1632.02

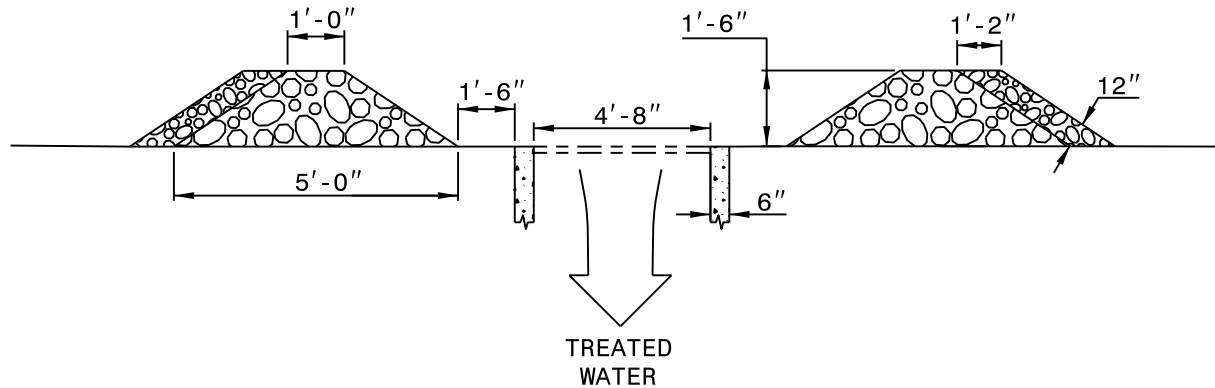


SEDIMENT CONTROL STONE

A

STRUCTURAL STONE

A



SECTION A-A

NOTES

CLEAN SEDIMENT WHEN 1#2 FULL AND AS DIRECTED.
 USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL STONE.
 USE CLASS A STONE FOR STRUCTURAL STONE.
 CONSTRUCT TOP OF BERM A MINIMUM OF ONE FOOT BELOW THE SHOULDER OR ANY DIVERSION POINT.

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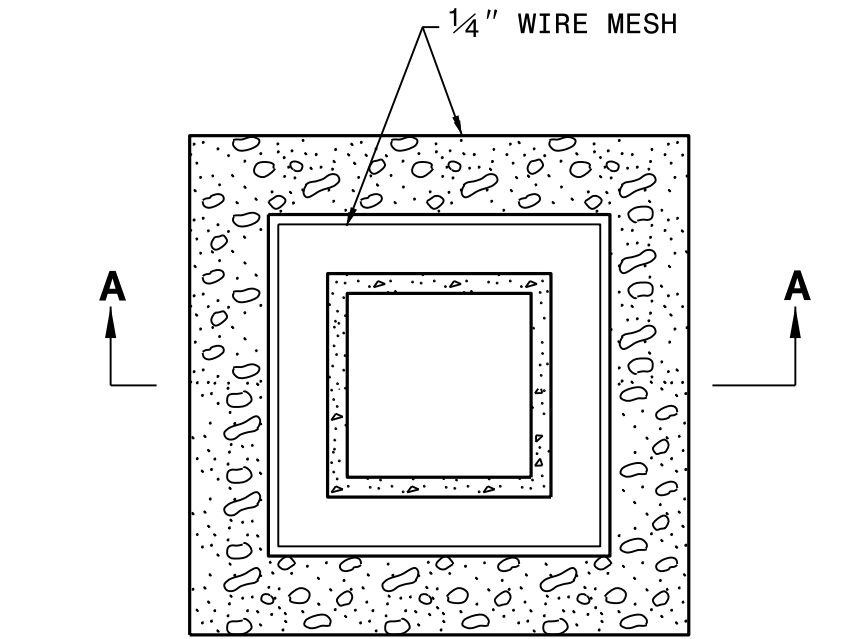
1-12

ENGLISH STANDARD DRAWING FOR
ROCK INLET SEDIMENT TRAP TYPE B

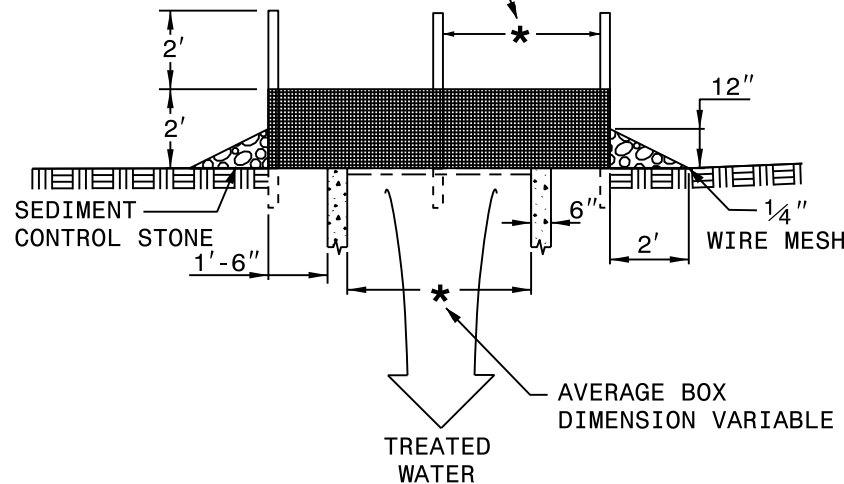
SHEET 1 OF 1

1632.02

ENGLISH STANDARD DRAWING FOR
ROCK INLET SEDIMENT TRAP TYPE C



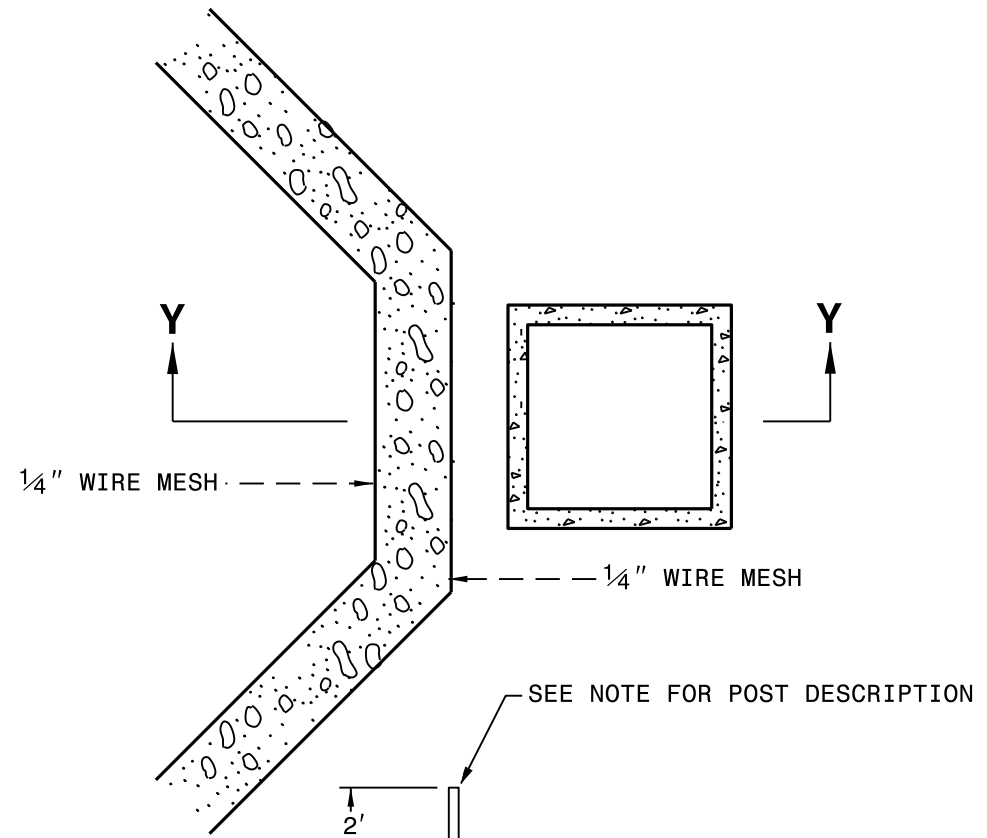
MAXIMUM POST SPACING 4 FT.



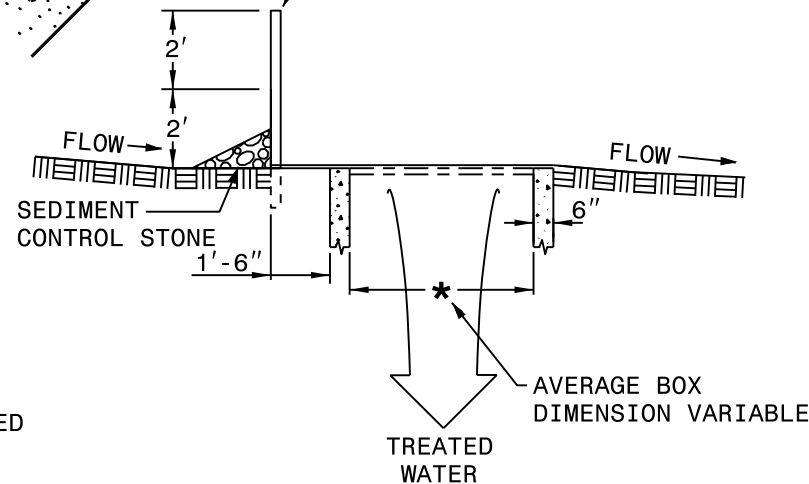
SECTION A-A

MULTI-DIRECTIONAL FLOW

NOTE
USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL STONE.
USE 24 GAUGE MINIMUM WIRE MESH HARDWARE CLOTH WITH 1/4 INCH MESH OPENINGS.
PLACE TOP OF WIRE MESH A MINIMUM OF ONE FOOT BELOW THE SHOULDER OR ANY DIVERSION POINT.
INSTALL WIRE MESH UNDER SEDIMENT CONTROL STONE.
USE 5' STEEL POST, INSTALLED 1.5' DEEP MINIMUM, AND OF THE SELF-FASTENER ANGLE STEEL TYPE.
SPACE POST A MAXIMUM OF 4'.



SEE NOTE FOR POST DESCRIPTION

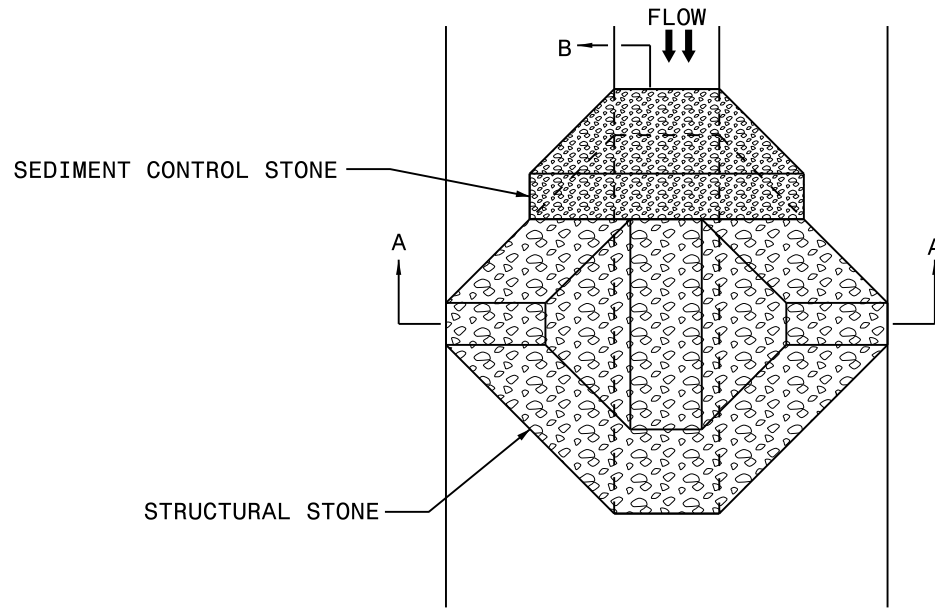


SECTION Y-Y

SINGLE-DIRECTIONAL FLOW

ENGLISH STANDARD DRAWING FOR
ROCK INLET SEDIMENT TRAP TYPE C

ENGLISH STANDARD DRAWING FOR
TEMPORARY ROCK SILT CHECK TYPE A

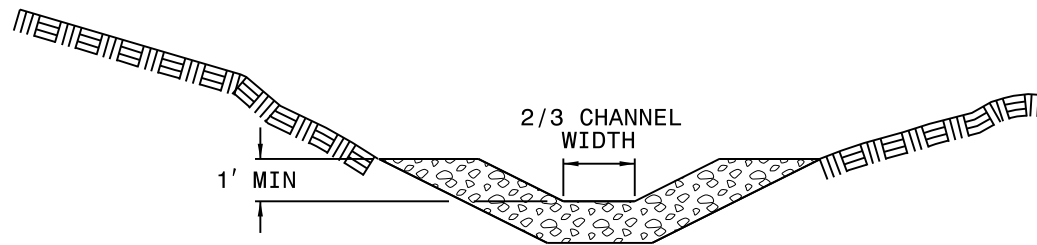


PLAN

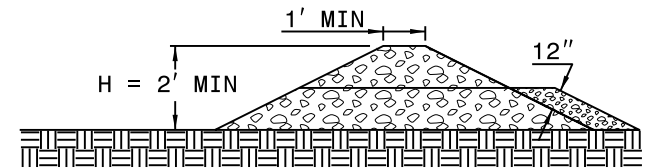
NOTE

USE CLASS B EROSION CONTROL STONE
 FOR STRUCTURAL STONE.

USE NO. 5 OR NO. 57 STONE FOR SEDIMENT
 CONTROL.

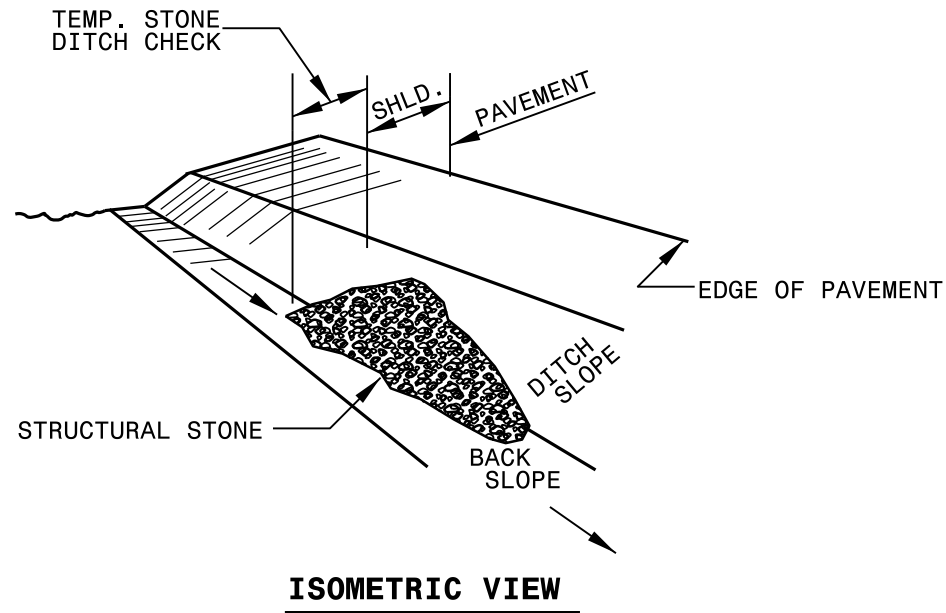


SECTION A-A



SECTION B-B

ENGLISH STANDARD DRAWING FOR
TEMPORARY ROCK SILT CHECK TYPE A

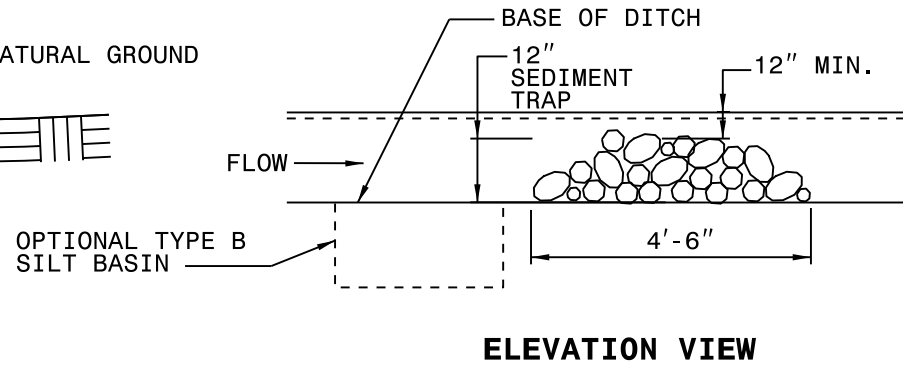
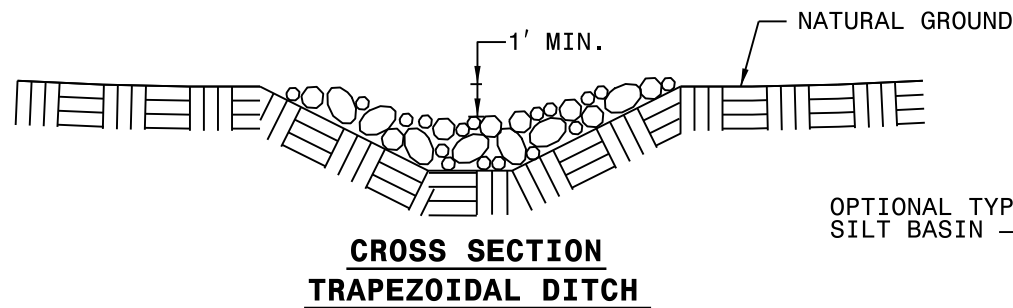
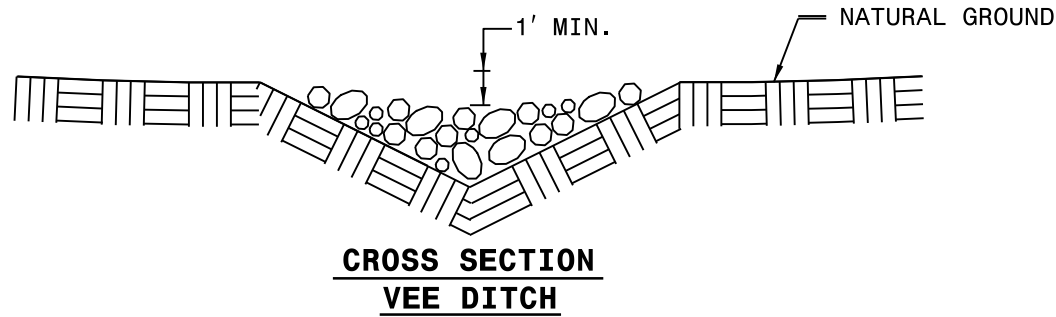


NOTES:

USE CLASS B EROSION CONTROL STONE FOR STRUCTURAL STONE.

THE ENGINEER MAY DIRECT THE OPTION OF CLASS A STONE FOR SITES HAVING LESS THAN ONE (1) ACRE DRAINAGE AREA AND A DITCH GRADE LESS THAN 3%.

USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL. PLACE SEDIMENT CONTROL STONE AS DIRECTED.



ENGLISH STANDARD DRAWING FOR
TEMPORARY ROCK SEDIMENT DAM TYPE A

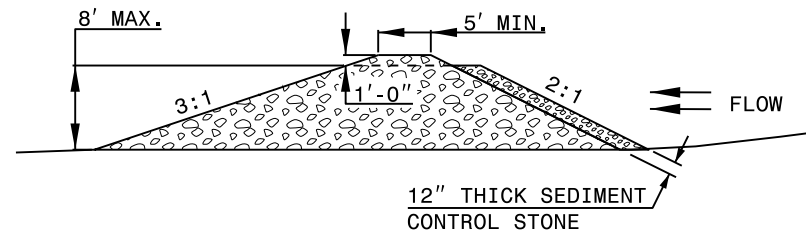
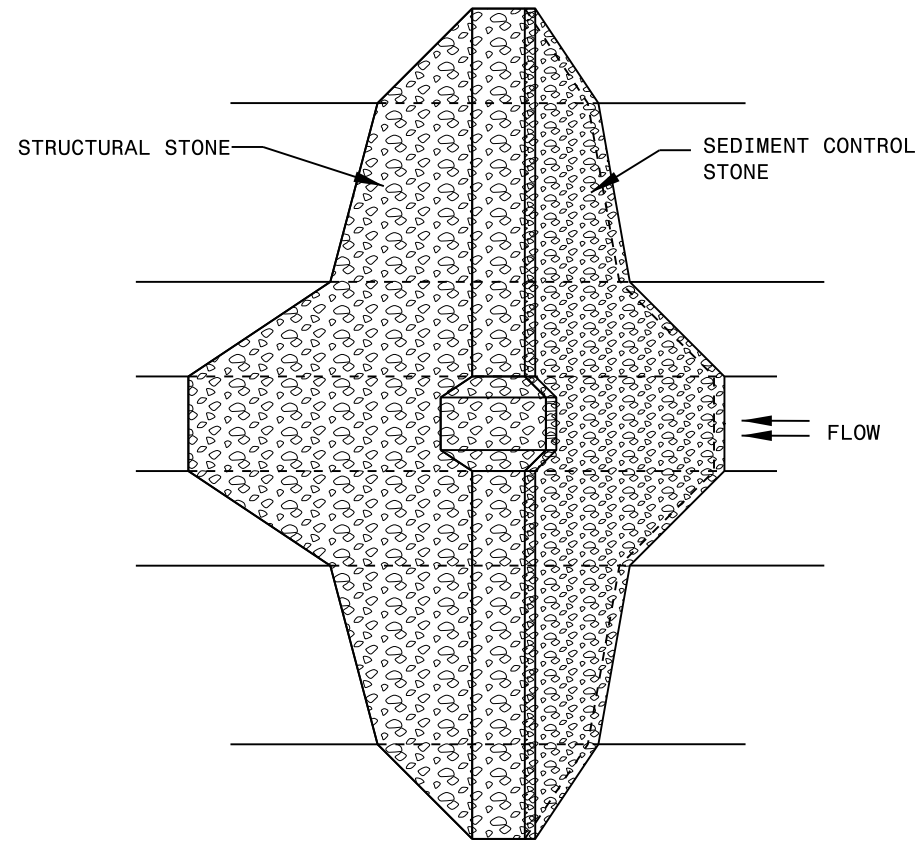
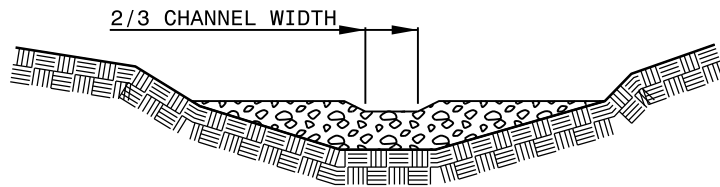
NOTES

USE CLASS I RIP RAP FOR STRUCTURAL STONE.

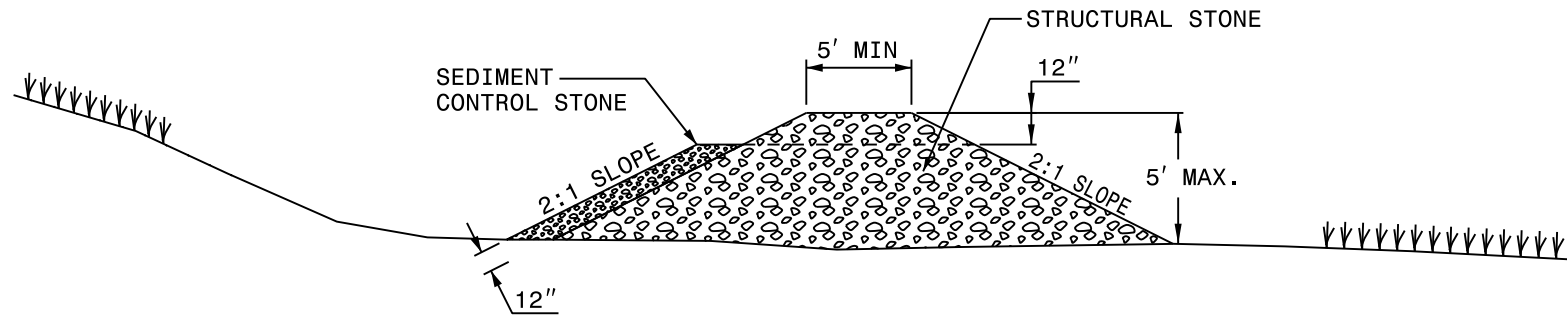
USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL

DO NOT PLACE SEDIMENT DAM IN A LIVE STREAM.

INSTALL 3 COIR FIBER BAFFLES ON UPSTREAM SIDE OF SEDIMENT DAM WITH A SPACING OF 15 FEET IN ACCORDANCE WITH ROADWAY STANDARD DRAWING NO 1640.

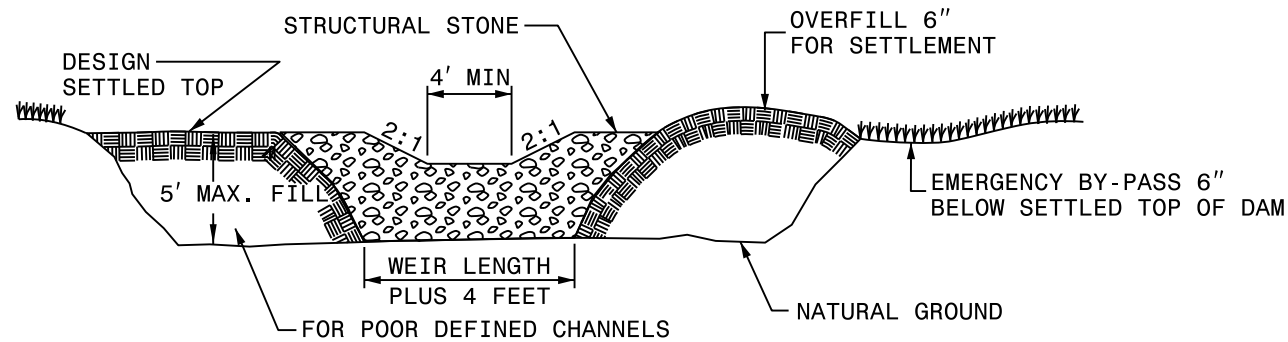


ENGLISH STANDARD DRAWING FOR
TEMPORARY ROCK SEDIMENT DAM TYPE A



PROFILE SECTION

DRAINAGE AREA (ACRES)	WEIR LENGTH (FT)
1	4.0
2	6.0
3	8.0
4	10.0
5	12.0



CROSS SECTION

NOTES

USE CLASS B EROSION CONTROL STONE FOR STRUCTURAL STONE.

USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL STONE.

DIKE MAY EXTEND ALONG MORE THAN ONE SIDE OF THE TRAP AREA. PROVIDE A TOTAL SEDIMENT STORAGE VOLUME OF 3600± CUBIC FEET PER ACRE OF DISTURBED AREA. SOME OF THE REQUIRED VOLUME MAY BE PROVIDED BY OTHER UP OR DOWNSTREAM CONTROLS.

AN UNDERLAY OF STRUCTURAL STONE WITH FILTRATION GEOTEXTILE MAY BE REQUIRED AS DIRECTED.

INSTALL COIR FIBER BAFFLES ON THE UPSTREAM SIDE OF THE DAM IN ACCORDANCE WITH ROADWAY STANDARD DRAWING NO. 1640.

SEED AND PLACE MATTING FOR EROSION CONTROL ON ALL INTERIOR AND EXTERIOR SLOPES OF SEDIMENT BASIN AS DIRECTED.

NOTES

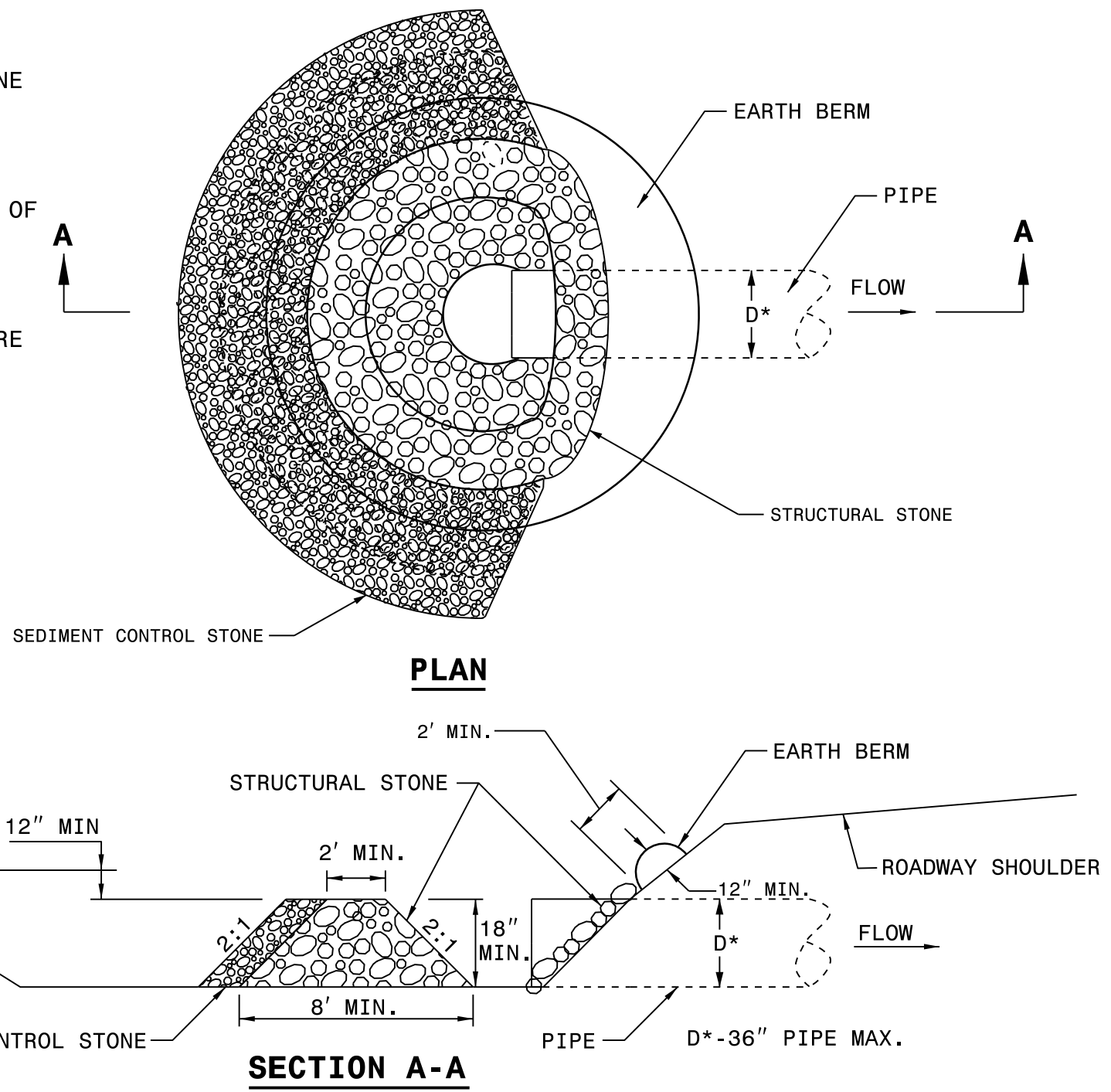
USE CLASS B EROSION CONTROL STONE FOR STRUCTURAL STONE.

USE NO. 5 OR NO. 57 STONE FOR SEDIMENT CONTROL STONE.

CONSTRUCT TOP OF BERM A MINIMUM OF ONE FOOT BELOW THE SHOULDER OR DIVERSION POINT.

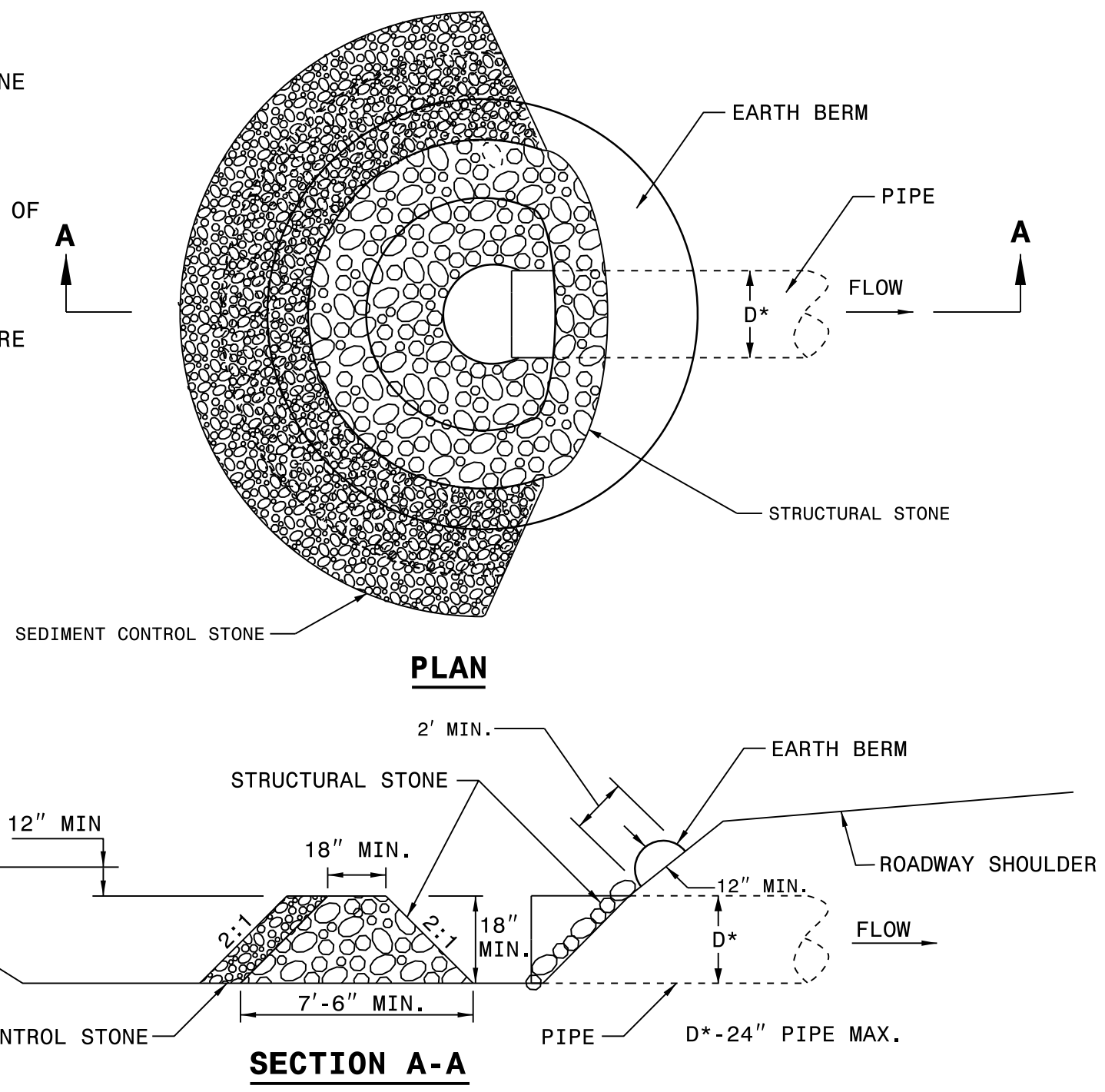
PROVIDE A TOTAL SEDIMENT TRAP VOLUME OF 3600± CUBIC FEET PER ACRE OF DISTURBED AREA. SOME OF THE REQUIRED VOLUME MAY BE PROVIDED BY UP OR DOWNSTREAM CONTROLS.

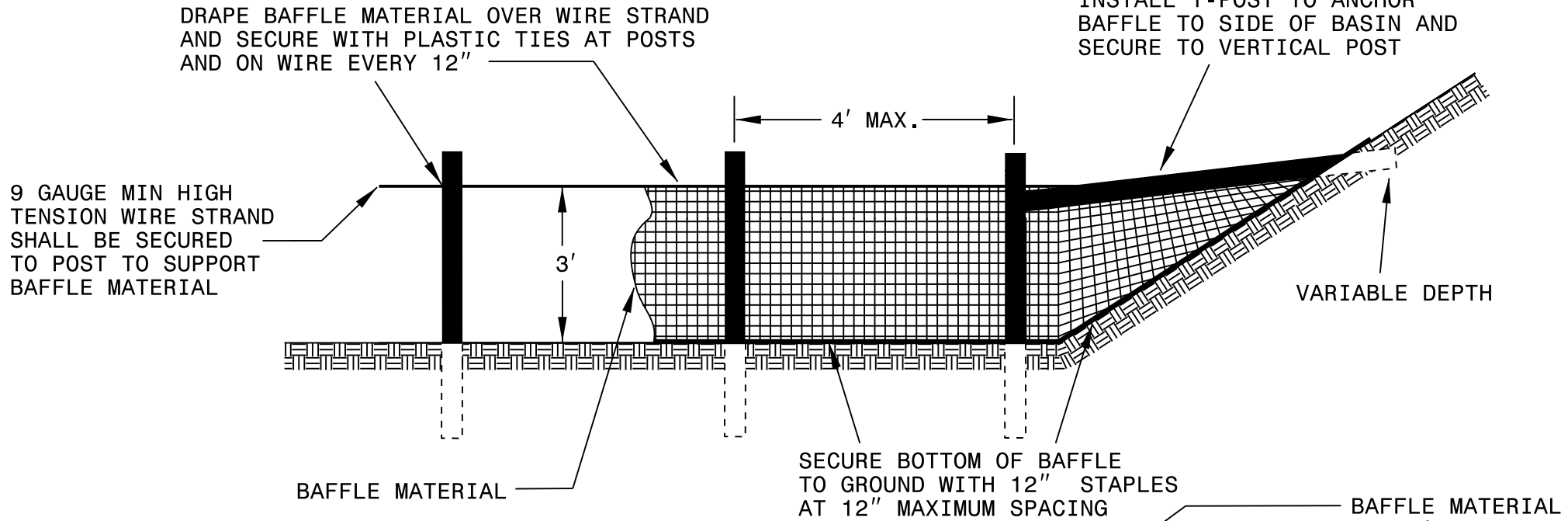
DO NOT INSTALL WHEN DEVICE WILL BE WITHIN 30 FEET OF VEHICULAR TRAVEL LANE.



NOTES

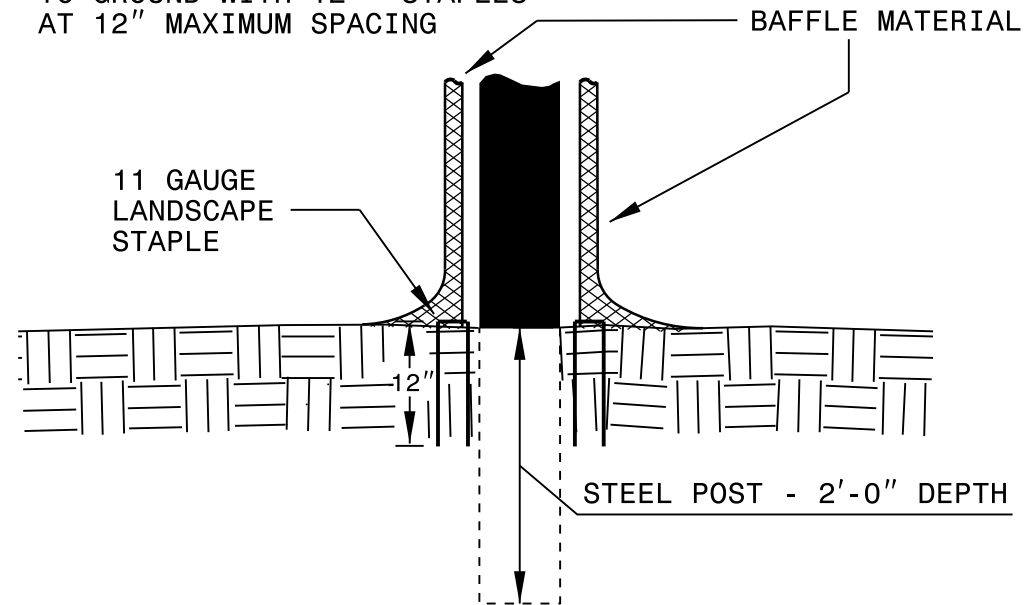
USE CLASS A EROSION CONTROL STONE FOR STRUCTURAL STONE.
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 CONSTRUCT TOP OF BERM A MINIMUM OF ONE FOOT BELOW THE SHOULDER OR DIVERSION POINT.
 PROVIDE A TOTAL SEDIMENT TRAP VOLUME OF 3600± CUBIC FEET PER ACRE OF DISTURBED AREA. SOME OF THE REQUIRED VOLUME MAY BE PROVIDED BY UP OR DOWNSTREAM CONTROLS.



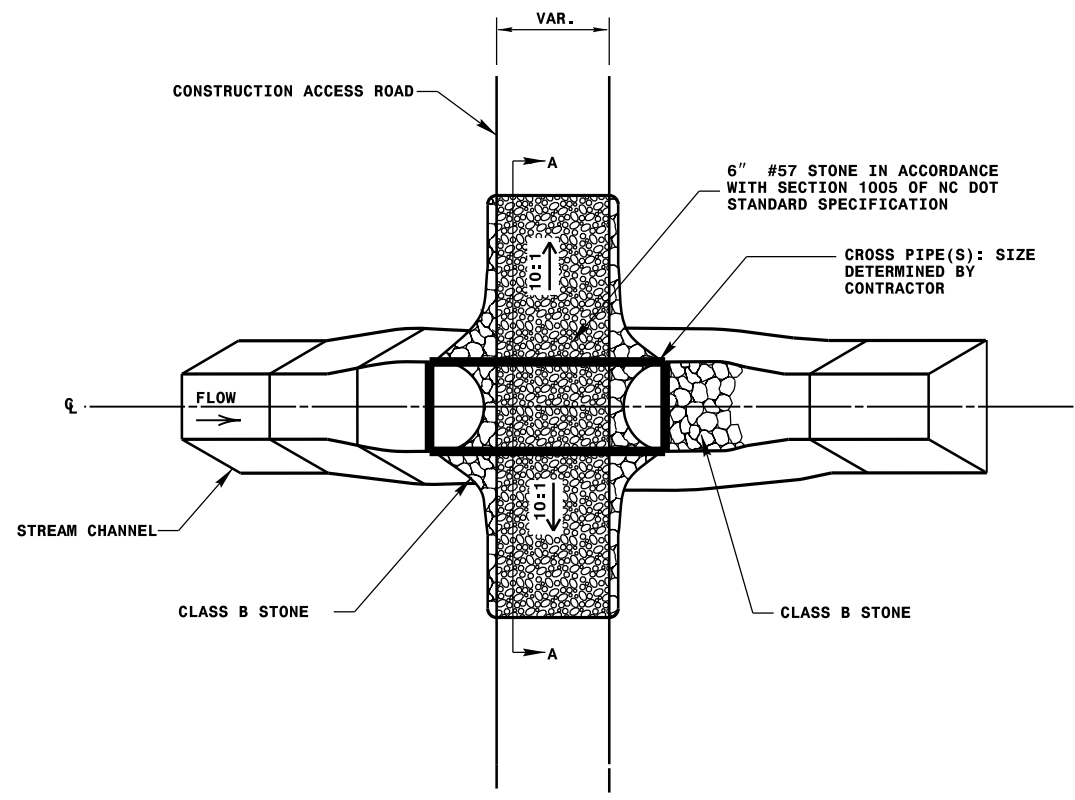


NOTES:

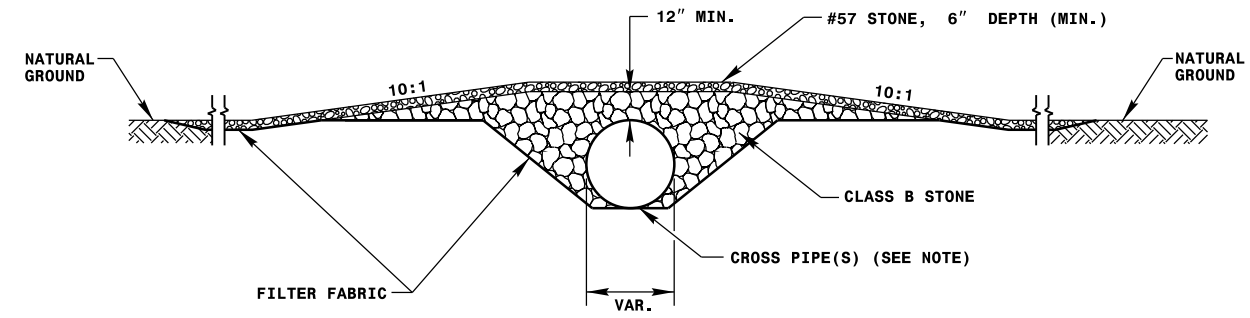
1. INSTALL THREE(3) COIR FIBER BAFFLES IN SILT BASINS AND SEDIMENT DAMS AT DRAINAGE OUTLETS WITH A SPACING OF $\frac{1}{4}$ THE BASIN LENGTH.
2. TWO(2) COIR FIBER BAFFLES CAN BE INSTALLED IN SILT BASINS AND DAMS LESS THAN 20 FT. IN LENGTH WITH A SPACING OF $\frac{1}{3}$ THE BASIN LENGTH.
3. TOP HEIGHT OF COIR FIBER BAFFLES SHALL NOT BE BELOW BASE OF EMERGENCY SPILLWAY ELEVATION.



BAFFLE MATERIAL SHALL BE SECURED TO THE BOTTOM AND SIDES OF BASIN USING 12" LANDSCAPE STAPLES



PLAN VIEW



SECTION A-A
 NOT TO SCALE

NOTE: PIPE(S) FOR TEMPORARY STREAM CROSSING SHALL BE DESIGNED TO PASS THE PEAK OR BANKFULL FLOW, WHICHEVER IS LESS, FROM A 2-YEAR PEAK STORM, WITHOUT OVER TOPPING.