

**SIDE ELEVATION**

EXISTING GROUND

70" MIN.

5:1

MOUNTABLE PAVEMENT (OPTIONAL)

FILTER CLOTH

6" MIN.

A

**PLAN VIEW**

70" MIN.

12" MIN.

WASHRACK (OPTIONAL)

10" MIN.

EXISTING PAVEMENT

VDOT #1 COARSE AGGREGATE

POSITIVE BRAGNAGE TO SEDIMENT TRAPPING DEVICE

B

**SECTION A-A**

12" MIN.

5" MIN.

3" MIN.

FILTER CLOTH

**SECTION B-B**

6"-7"

REINFORCED CONCRETE

DRAIN SPACE

\* MUST EXTEND FULL WIDTH OF INGRESS AND EGRESS OPERATION

Plate 3.02-1

\* DISTANCE IS 6' MINIMUM IF FLOW IS TOWARD EMBANKMENT

\* *OPTIONAL STONE COMBINATION*

\* VDOT #3, #357, #5, #56 OR #57 COARSE AGGREGATE TO REPLACE SILT FENCE IN \* HORSESHOE \* WHEN HIGH VELOCITY OF FLOW IS EXPECTED

PLATE. 3.08-1

PLAN VIEW

PIPE OUTLET TO FLAT AREA WITH NO DEFINED CHANNEL

SECTION A-A

FILTER CLOTH KEY IN 6'-0"; RECOMMENDED FOR ENTIRE PERIMETER

PLAN VIEW

PIPE OUTLET TO WELL DEFINED CHANNEL

SECTION A-A

FILTER CLOTH KEY IN 6'-0"; RECOMMENDED FOR ENTIRE PERIMETER

NOTES: 1. APRON LINING MAY BE RIPRAP, GROUTED RIPRAP, GABION BASKET, OR CONCRETE.  
2.  $L_a$  IS THE LENGTH OF THE RIPRAP APRON AS CALCULATED USING PLATES 3.18-3 AND 3.18-4.  
3.  $d = 1.5$  TIMES THE MAXIMUM STONE DIAMETER, BUT NOT LESS THAN 6 INCHES.

Plate 3.18-1

The diagram illustrates the specific application of the inlet protection method at a curb inlet. It shows runoff water flowing over a gravel filter, which is supported by a concrete gutter. A wire mesh is placed over the gravel filter, and filtered water flows into the curb inlet. Dimensions of 12 inches are indicated for the gravel filter and the curb inlet.

**SPECIFIC APPLICATION**

THIS METHOD OF INLET PROTECTION IS APPLICABLE AT CURB INLETS WHERE PONDING IN FRONT OF THE STRUCTURE IS NOT LIKELY TO CAUSE INCONVENIENCE OR DAMAGE TO ADJACENT STRUCTURES AND UNPROTECTED AREAS.

\* GRAVEL SHALL BE VDOT #3, #357 OR 5 COARSE AGGREGATE.

PLATE 3.07-6

ES-9: The contractor shall inspect all erosion control measures periodically and after each runoff rainfall event. Any necessary repairs or cleanup to maintain the effectiveness of the erosion control devices shall be made immediately.

PLATE 305-2

**TOP STIFFENER (IF REQUIRED)**  
IS  $\frac{1}{2}$ "  $\times$   $\frac{1}{2}$ "  $\times$  ANGLE WELDED  
TO TOP AND ORIENTED PERPENDICULAR  
TO CORRUGATIONS.

**TOP IS — GAGE CORRUGATED  
METAL OR 1/8" STEEL PLATE.  
PRESSURE RELIEF HOLES MAY  
BE DRILLED IN TOP IF  
CORRUGATIONS ARE LEFT FULLY  
OPEN WHEN THE TOP IS  
ATTACHED.**

**CYLINDER IS — GAGE CORRUGATED  
METAL PIPE OR FABRICATED FROM  
1/8" STEEL PLATE.**

**NOTES:**  
1. THE CYLINDER MUST BE  
PERPENDICULAR TO THE  
TOP OF THE RISER.  
2. SUPPORT BARS ARE WELDED  
TO THE RISER OR ATTACHED BY STRAPS,  
BOLTED TO TOP OF RISER.

**PLAN VIEW**

**SECTION A-A**

**SECTION B-B**

**DETAILS:**  
PRESSURE RELIEF HOLES 1/2" DIA.  
TACKWELDED ALL AROUND  
D  
H  
P  
WELDED  
SUPPORT BAR SIZE (USE REBAR MIN.)  
RISER DIAMETER  
1/4"  $\times$  1/4" SWAGE BARS (TYPICAL)

PLATE. 3.14-10

**DESIGN ELEVATIONS WITH EMERGENCY SPILLWAY**

DESIGN HIGH WATER (25-YR. STORM ELEV.)

MIN. 1.0' 0.5' MIN. 1.0'

67 C.Y./ AC. DRY STORAGE

67 C.Y./ AC. WET STORAGE

SEDIMENT CLEANOUT POINT (\* WET STORAGE REDUCED TO 34 C.Y./ ACRE)

RISER CREST

DEWATERING DEVICE

**DESIGN ELEVATIONS WITHOUT EMERGENCY SPILLWAY**

DESIGN HIGH WATER (25-YR. STORM ELEV.)

MIN. 0.5' MIN. 1.0' MIN. 2.0' MIN. 3.0'

67 C.Y./ AC. DRY STORAGE

67 C.Y./ AC. WET STORAGE

SEDIMENT CLEANOUT POINT

RISER CREST

DEWATERING DEVICE

(RISER PASSES 25-YR. EVENT)

PLATE. 3.14-2

[illegible]

OUTLET #4:  
UPSTREAM W = 9.0'  
DOWNSTREAM W = 13.0  
L = 10'  
D = 1.5' (D50 = 0.5')

NOTE:  
QUANTITIES SHOWN ARE APPROXIMATIONS MADE  
BY ENGINEER ACCORDING TO THIS PLAN AND  
SHALL ASSIST IN BOND ESTIMATES ONLY.  
ADDITIONAL MATERIALS AND/OR QUANTITIES MAY  
BE REQUIRED FOR COMPLETION OF THE  
PROJECT.

1,500 L.F. SILT FENCE  
1 EA. CONSTRUCTION ENTRANCE  
7 EA. DROP INLET PROTECTION  
4 EA. OUTLET PROTECTION  
4.0 AC. PERMANENT SEEDING