

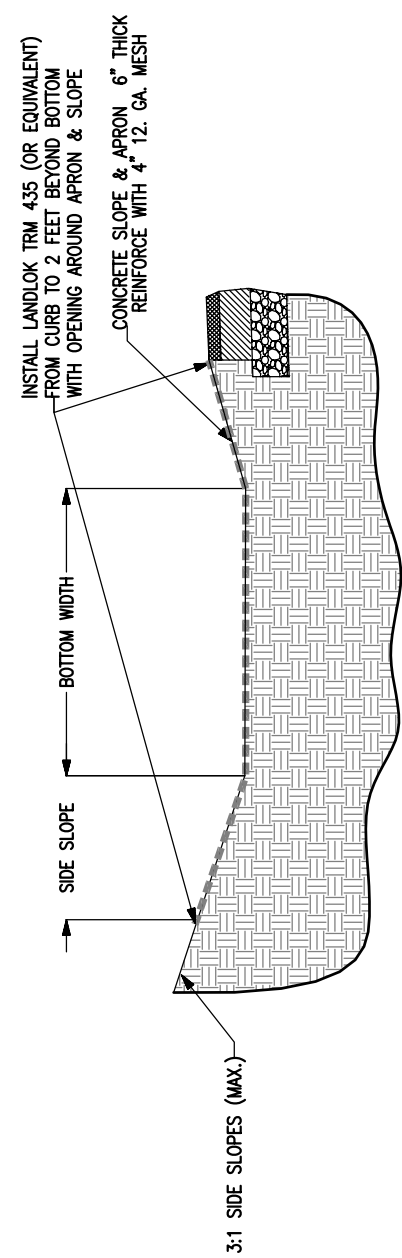
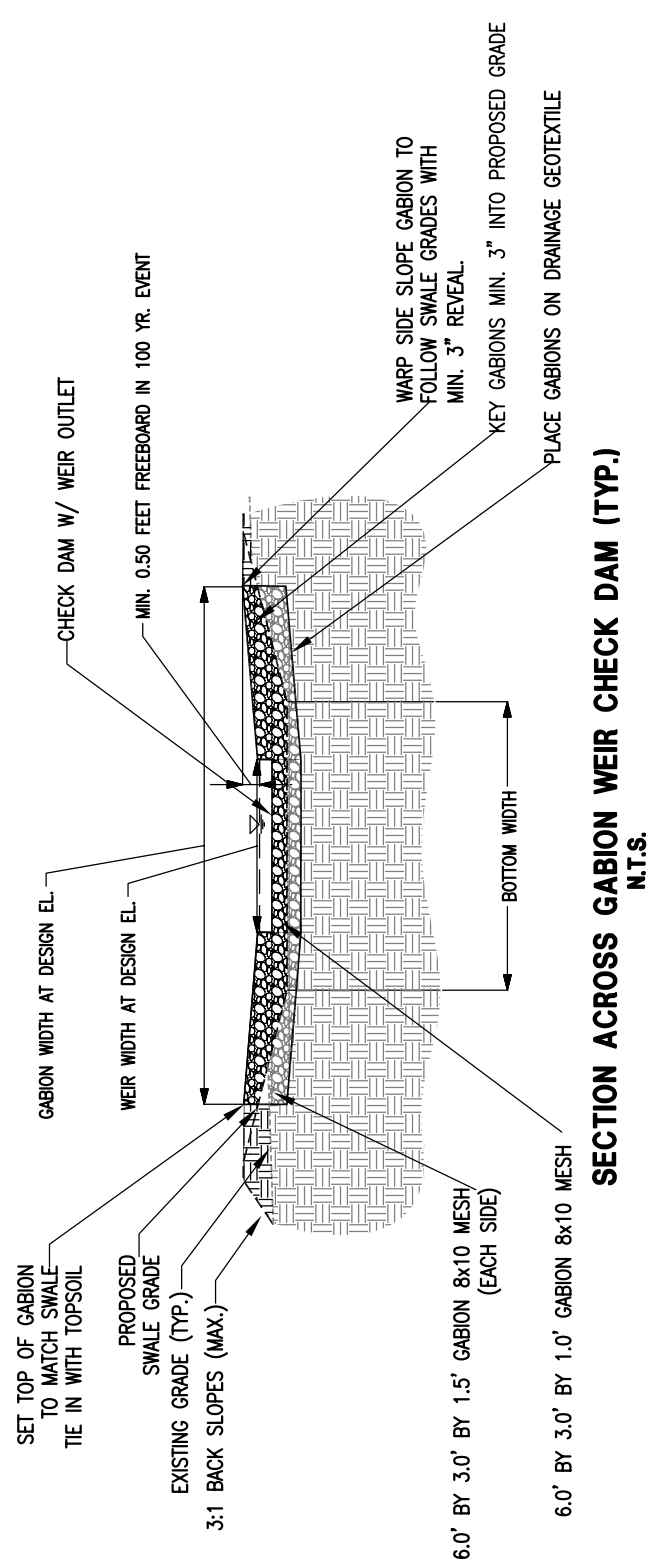
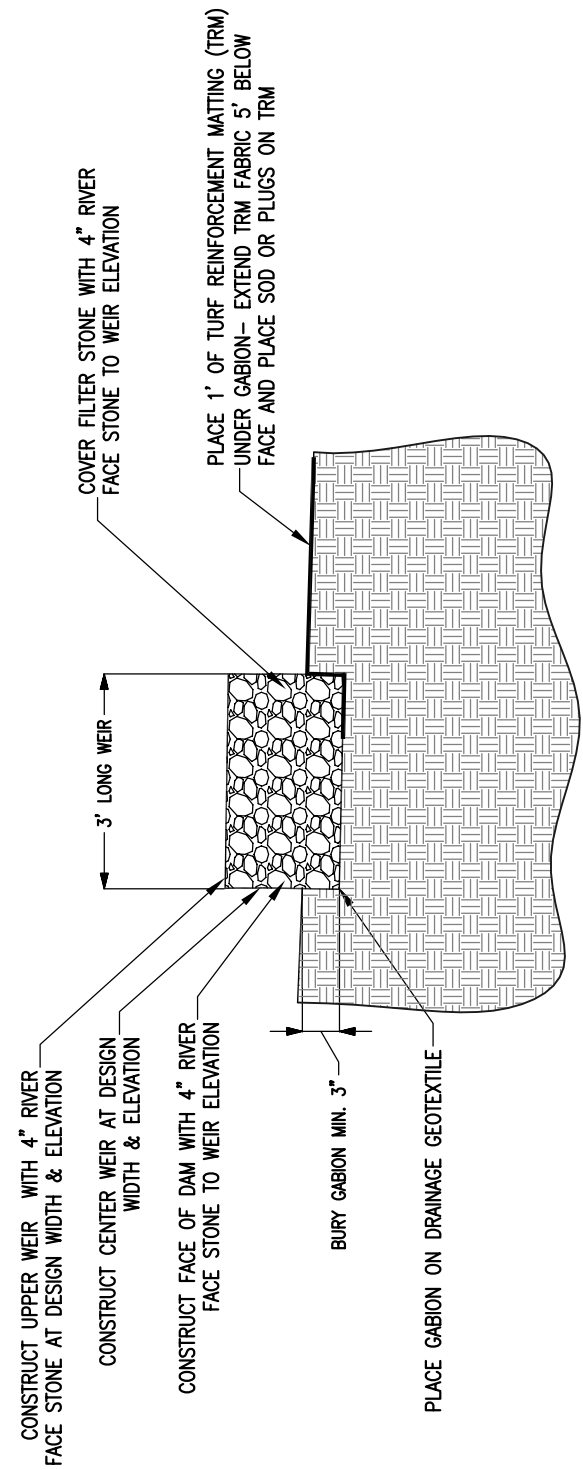
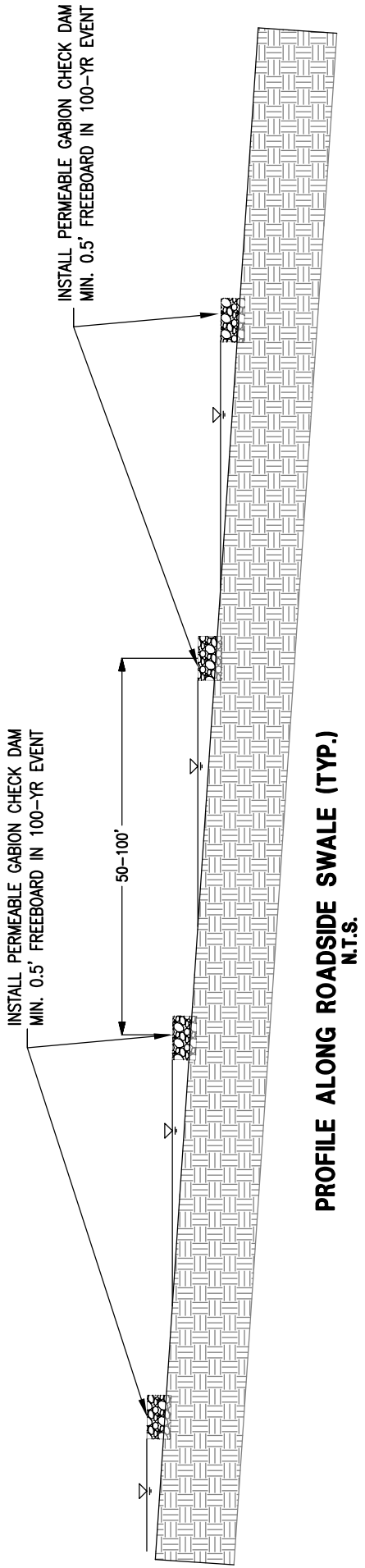
**USGS QUAD LOCATION MAP**  
(HIGH BRIDGE, NOT TO SCALE)

- LEGEND**
- - - DRAINAGE AREA
  - · - · - STREAM
  - SOILS
  - PROPOSED BMP RETROFIT LOCATION
  - >>>> RUNOFF FLOW DIRECTION

**SOILS:**  
 BhnB - Birdsboro Silt Loam, 2-6% Slopes  
 PdtmB - Pattenburg Gravelly Loam, mod wet, 2-6% Slopes



<b>SITE PLAN</b>	
<b>INTERSTATE 78 SWALE &amp; WETLAND RETROFIT</b>	
DATE: DECEMBER 14, 2007	RIGHT OF WAY, BLOCK 12, LOT 1 UNION TOWNSHIP HUNTERDON COUNTY, NEW JERSEY
SCALE: 1" = 100'	OMNI ENVIRONMENTAL
SHT. NO. 1 of 1	321 WALL STREET PRINCETON, NJ 08540 PH: (609) 924-8821 FAX: (609) 924-8851

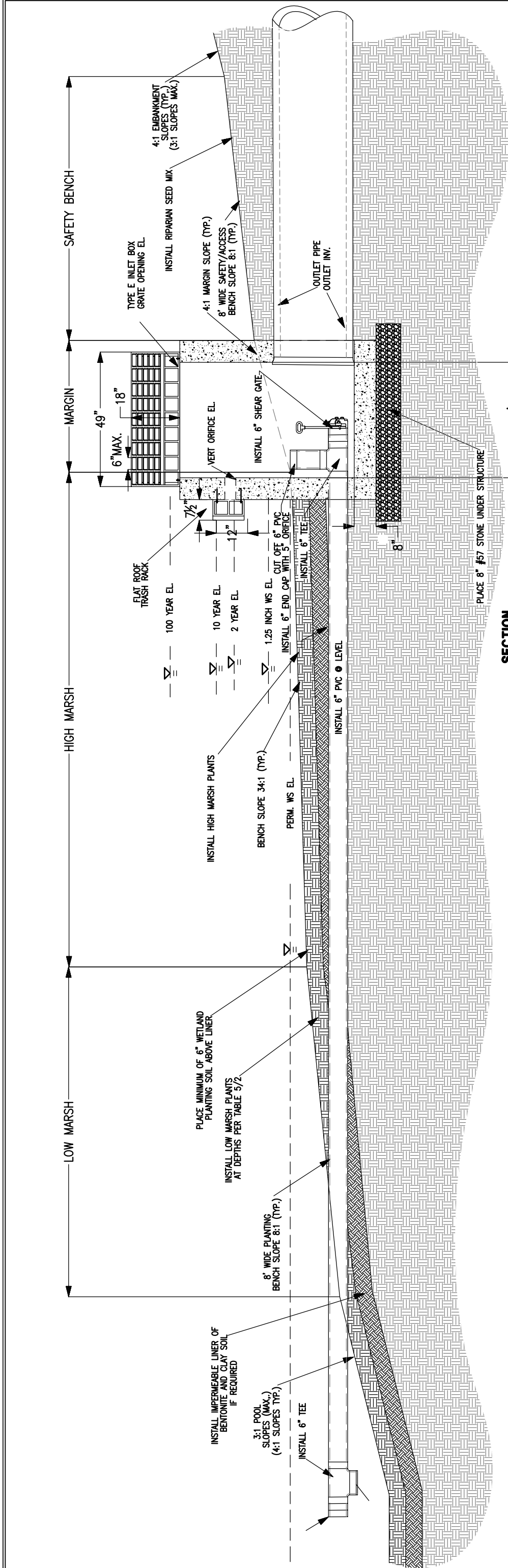


NOTE: BMP DETAILS ARE GENERIC AND ARE NOT MEANT FOR DETAILED BMP DESIGN.

ROADSIDE SWALE DESIGN NOTES:

1. WHERE SPACE ALLOWS, DESIGN SWALE GEOMETRY IN COMPLIANCE WITH THE NEW JERSEY SEDIMENT EROSION AND SEDIMENT CONTROL STANDARDS AND SEED SWALE WITH ROADSIDE SWALE SEED MIX.
2. WHERE A STABLE CONDITION CANNOT BE REACHED, LINE EXISTING DITCH WITH RIP-RAP.
3. ALLOWABLE VELOCITY RANGES FROM 3.0-5.0 FEET PER SECOND FOR MOST SOILS IN THE STUDY AREA.

<b>ROADSIDE SWALE DETAILS</b>	
<b>MULHOCKAWAY CREEK STORMWATER BMP RETROFITS</b>	
DATE: DECEMBER 14, 2007	SCALE: NTS
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**STORMWATER WETLAND BMP DETAIL (TYP.)**  
N.T.S.

SECTION

SUNNY RIPARIAN SEED MIX	
%	COMMON NAME
33%	Oats
12%	Eastern Gama Grass
10%	Switch Grass, Shelter
9%	Canada Wild Rye
8%	Red Top
8%	Little Bluestem, Camper
5%	Partridge Pea
5%	Indian Grass, Hoit
4%	Plains Coreopsis
3%	Nimble-will
3%	Fowl Bluegrass

SEED AT 60 LB./ACRE

**RIPARIAN ZONE SEED MIX**

**PLANTING NOTES:**

- CONTACT VENDORS FOR SEED PRICING AND AVAILABILITY.
- SHADE SEED MIX TO BE SEEDED IN BASINS BETWEEN SHRUB PLANTINGS. SUNNY SEED MIX TO BE PLACED ON EXPOSED BASIN SLOPES.
- ALL MULCH TO BE DOUBLED-SHREDDED HARDWOOD MULCH, AGED FOR AT LEAST ONE YEAR. IN LOCATIONS WHERE FLOWS ARE CONCENTRATED ENOUGH TO MOBILIZE THE MULCH, MULCH SHALL BE COVERED WITH A WEED CONTROL GEOTEXTILE, STIMPLED TO THE SOIL.
- ALL SEEDED AREAS ON SLOPES SHALL BE STABILIZED WITH A BIODEGRADABLE EROSION CONTROL BLANKET SUCH AS LANDLOCK C2, NORTH AMERICAN GREEN S150, OR EQUIVALENT MATERIAL, UNLESS OTHERWISE DIRECTED BY THE ENGINEER. SEE PLAN FOR LOCATION OF EROSION CONTROL BLANKET.

**RIPARIAN ZONE PLANTING NOTES**

WETLAND PLANT SPECIES: (PLANT 1800 AT 2' O.C. ON PLANTING BENCHES)				
PERCENT	NUMBER	DEPTH	BOTANICAL NAME	COMMON NAME
40%	720	6-18"	<i>Pontederia cordata</i>	Pickerelweed
50%	900	6-12"	<i>Sagittaria latifolia</i>	Duck-Potato
10%	180	12-18"	<i>Scirpus atrovirens</i>	Green Bulrush

**LOW MARSH PLANTING SCHEDULE**

WETLAND PLANT SPECIES: (PLANT 3400 AT 2' O.C. ON PLANTING BENCHES)				
PERCENT	NUMBER	DEPTH	BOTANICAL NAME	COMMON NAME
25%	850	0-6"	<i>Iris versicolor</i>	Blueflag
25%	850	0-12"	<i>Juncus effusus</i>	Soft Rush
20%	680	0-6"	<i>Lobelia cardinalis</i>	Cardinal Flower
15%	510	0-6"	<i>Saururus cernuus</i>	Lizard Tail
15%	510	0-12"	<i>Sporogonium americanum</i>	Lesser Bur-reed

**HIGH MARSH PLANTING SCHEDULE**

NOTE: BMP DETAILS ARE GENERIC AND ARE NOT MEANT FOR DETAILED BMP DESIGN.

**STORMWATER WETLAND DETAILS**

**MULHOCKAWAY CREEK  
STORMWATER BMP RETROFITS**

DATE: DECEMBER 14, 2007

SCALE: NTS

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