1. THE OPERATOR SHALL REMOVE FROM THE SITE, RECYCLE, OR DISPOSE OF ALL BUILDING MATERIALS.

2. AT ANY TIME DURING THE CONSTRUCTION SHOULD EVIDENCE OF A POSSIBLE SINKHOLE BE SUBMITTED THAT PROVIDED THE SOIL BEARING CAPACITY.

GEOTECHNICAL ENGINEERING EVALUATION REPORT WAS GROUND IMPROVEMENT PROCEDURES IF WARRANTED. A GEOTECHNICAL ENGINEER TO PERFORM A SUBSURFACE.

THE APPLICANT SHALL ENGAGE THE SERVICES OF A

1. SHOULD UNFORESEEN EROSIVE CONDITIONS DEVELOP DURING CONSTRUCTION, IMMEDIATELY WITH EMERGENCY PROBLEMS OF EROSION.

PREVENT DAMAGE TO ADJACENT PROPERTIES AS A RESULT OF INCREASED RUNOFF.

1. THE LOT OWNER OF RECORD IS RESPONSIBLE FOR THE OPERATION AND MAINTENANCE OF THE

FOR WILDLIFE.

1. THE OPERATOR SHALL ENTER INTO AN AGREEMENT WITH ANOTHER PERSON INCLUDING A CONSERVATION DISTRICT, FOR ANY PROPERTY CONTAINING A PCSM BMP, THE PERMITTEE OR CO-PERMITTEE SHALL RECORD.

UNTIL THE PERMITTEE OR CO-PERMITTEE HAS RECEIVED WRITTEN APPROVAL OF A NOTICE OF TERMINATION AND HAS AGREED TO LONG-TERM OPERATION AND MAINTENANCE OF PCSM BMPS.

OF ALL PCSM BMPS ON THE PROJECT SITE AND IS RESPONSIBLE FOR VIOLATIONS OCCURRING ON TILLER TERMINATION, THE PERMITTEE OR CO-PERMITTEE WILL REMAIN RESPONSIBLE FOR COMPLIANCE WITH PCSM BMPS.

OF THE PCSM BMP IS A COVENANT THAT RUNS WITH THE LAND THAT IS BINDING UPON AND SUBJECT PROPERTY. THE RECORDED INSTRUMENT MUST IDENTIFY WITH THE PCSM BMP, PROVIDE.

ENTER INTO AN AGREEMENT WITH ANOTHER PERSON INCLUDING A CONSERVATION DISTRICT, FOR ANY PROPERTY CONTAINING A PCSM BMP, THE PERMITTEE OR CO-PERMITTEE SHALL RECORD.

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### Bio-Retention Area Construction Notes:

1. Rough grade the vegetated swale. Equipment shall avoid excavation needed in periods of little rain or drought. Vegetation should be planted the swale at a time of year when successful establishment is established as soon as possible to prevent erosion and scour.

2. Inspect the vegetation after planting. Excavate soil to the depth specified, placing temporary erosion and sediment controls.

3. Scarify bottom and all sides of excavation.

4. If inspection indicates that soil or sediment has entered any of the bio-retention areas are not compacted.

5. Begin placement of stone in a maximum loose lift thickness of 12 inches (12") ensuring that no sediment or soil enters the trench area.

6. Install outlet structure and associated outlet pipe. Installation of outlet structure should be performed concurrently with the placement of stone that no sediment or soil enter the stone. The stone aggregate shall be checked by professional knowledgeable in the design and construction of stormwater BMP's, as shown on details.

7. The bio-retention areas shall be protected from compaction due to heavy equipment operation or storage of fill or construction material.

8. The bio-retention areas should be addressed.

### Bio-Retention/Retention/Storm Water Construction Details:

#### Surface Bio-Retention/Retention Construction Details:

- **BIO-RETENTION MIX (ERN MIX '80)**
- **SEED MIX**
- **SOIL MIX**
- **EROSION CONTROL**
- **SILT CONTROL**
- **EQUIPMENT OPERATION**
- **MACHINE SHIELDS**
- **FILL STABILIZATION**
- **FLUSHING**
- **WASHING**
- **DEBRIS CONTROL**

### Construction Notes:

- **EXCESSIVE COMPACTION AND/OR LAND DISTURBANCE. EXCAVATING AS SHOWN ON PLANS.**
- **BIO-RETENTION AREA CONSTRUCTION NOTES:**
  - **EXCESSIVE COMPACTION AND/OR LAND DISTURBANCE. EXCAVATING AS SHOWN ON PLANS.**
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### Table:

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<th>Material</th>
<th>Grade</th>
<th>Type</th>
<th>Description</th>
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<td>Sand</td>
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<tr>
<td>Gravel</td>
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</table>

### Channel Cross-Section:

- **15" RCP OUTLET PIPE**
- **INV. 157.50**
- **ELEV. 159.50**
- **WIDTH**
- **DEPTH**

### Observation Well:

- **SURFACE BIO-RETENTION/DETENTION**
- **BIO-RETENTION DETAIL**
- **Z2**

### Conditions:

- **NOT FOR CONSTRUCTION**

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**Specifications and Details:**

- Specification A
- Specification B
- Specification C

**Construction Drawings:**

- Drawing A
- Drawing B
- Drawing C

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**Owner:**

- **Contractor:**
- **Engineer:**
- **Architect:**

---

**Sheet Information:**

- **Sheet 9503**
- **Drawing Date:**
- **Revision:**
- **Scale:**

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**Legal Disclaimer:**

- **Owner's Association from all claims, damages, losses and expenses arising out of or resulting therefrom.**
- **Contractor to be suitable for reuse by owner or others on specific purpose intended will be at owner's risk.**
- **Pennoi Associates, and owner shall indemnify and hold harmless Pennoi Associates and owner from all claims, damages, losses and expenses arising out of or resulting therefrom.**

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**Signatures:**

- **Architect:**
- **Engineer:**
- **Contractor:**
THE PERMEABLE PAVEMENT SHOULD BE CONSTRUCTED PER SPECIFICATIONS CONSISTENT WITH THE

VPOB 12" DEPTH (MIN)

ONCE THE STONE TRENCH HAS BEEN INSTALLED TO THE RECOMMENDATIONS OF THE PAVER

5. BEGIN PLACEMENT OF STONE AGGREGATE IN A MAXIMUM LOOSE LIFT THICKNESS OF TWELVE INCHES (12"),

4. PLACE GEOTEXTILE ON THE BOTTOM AND SIDES OF THE TRENCH AS INDICATED ON THE DETAIL, ENSURING

THAT NO SEDIMENT OR SOIL ENTERS THE STONE. THE STONE AGGREGATE SHOULD BE CHECKED

PREFERABLY THE DESIGN ENGINEER SHALL BE ON-SITE TO MONITOR THE FOLLOWING STAGES OF THE

PROFESSIONAL KNOWLEDABLE IN THE DESIGN AND CONSTRUCTION OF STORMWATER BMP'S,

BE RETAINED TO FIELD SURVEY CRITICAL ASPECTS OF THE PERMEABLE PAVERS. A LICENSED

SHOULD BE TAKEN TO ENSURE THAT THE AREA WITHIN THE TRENCH IS NOT COMPACTED.

CONSTRUCTION CLASS 1.

CLOGGING THE INFILTRATION SCM.

CONSTRUCTION. APPROPRIATE MEASURES ARE TO BE TAKEN IN THE EVENT OF SEDIMENT ENTERING AND

WITH PERVIOUS GEOTEXTILE MEETING THE SPECIFICATIONS OF PENNDOT PUBLICATION 408, SECTION 735,

INSPECT THAT THE GEOTEXTILE FABRIC IS FREE OF DEFECTS AND INSTALLED AS SHOWN ON DETAILS.

INSPECT AND VERIFY THAT THE PERMEABLE PAVERS ARE CLEAN.

INSPECT BOTTOM OF BMP PRIOR TO INSTALLATION PERMEABLE PAVERS. AREA SHALL BE FREE OF

ANY DEBRIS.

THE SIDES AND BOTTOM OF THE STONE TRENCH FOR THE PERMEABLE PAVER AREAS SHALL BE COVERED

AREAS THAT ARE COMPACTED OR GRADED SHALL BE REMEDIATED TO RESTORE SOIL COMPOSITION AND

PERMEABLE PAVER CONSTRUCTION SEQUENCE:

3. AREAS THAT ARE COMPACTED OR GRADED SHALL BE REMEDIATED TO RESTORE SOIL COMPOSITION AND

CROSS-SECTION

END VIEW

SIDE VIEW

NOTE TO UTILITIES BEFORE YOU EXCAVATE, DRILL OR

BEFORE YOU DIG ANYWHERE IN PENNSYLVANIA

BLAST PENNSYLVANIA ONE-CALL SYSTEM, INC.

CALL 1-800-242-1776

PERVIOUS ASPHALT PAVING DETAIL

" PERVIOUS PAVING

3" CHOKER COURSE

AASHTO #3 STONE

FILTER FABRIC

UNCOMPACTED

AASHTO #57

NOT FOR CONSTRUCTION