Permeable Pavement Maintenance for Homeowners

The permeable pavement on your property is required for stormwater management. Prior to submitting your biennial Stormwater Management Facility Operation and Maintenance Inspection Form, use this fact sheet to review your permeable pavement and ensure it is in compliance.

Permeable Pavement: A paved surface which allows water to percolate through during storms instead of pooling and running off. Ideal for residential driveways, patios, and sidewalks. Designs often use rectangular pavers spaced apart, placed over a gravel bed which stores and infiltrates water.

<u>A Well-Maintained Permeable Pavement</u>



This example has:

- Pavers in good condition, no shifting, sinking, settling, or rutting.
- Gaps are visible between pavers with gravel flush with the surface.
- No debris, dirt, moss, or weeds in the gaps.



Clogging. Sediment, organic debris, moss, and weeds make their way into the gaps between the pavers. Pull plants and clean material out regularly to prevent clogging. Gaps should be vacuumed or clogged gravel removed and replaced. Pressure washing or rinsing is not ideal, and can wash sediment deeper into the gravel, creating inaccessible clogs.



Settling. If the gravel between the pavers settles substantially, fill in new #8 or #9 gravel to prevent the pavers from migrating and to keep organic material from filling the gaps in. Do not use sand.



Additional Maintenance Guidance

Inspection for the above items should occur at a minimum every other year, during the biennial inspection cycle. More frequent inspections and spot maintenance can reduce work and prevent the need for multiple inspection form submissions during the biennial inspection cycle.

In addition to the item listed above, inspect your permeable pavement for:

- Rutting or paver shifting. As long as the gaps between the pavers are clear, these structural changes won't affect stormwater function, but may be considered an eyesore.
- No substantial standing water in the observation well within 48 hours of a storm. This might indicate clogging of the gravel bed.
- The observation well cap should be in good condition. Broken caps create a tripping hazard.
- Erosion onto the pavement from surrounding areas, which could be controlled or stopped.

Pretreatment:

Some permeable pavements have pretreatment, which captures sediment and debris before they enter the pavement. If you have pretreatment, the inspection form you fill out may prompt you for an extra photo showing it. Types include:

- **Stone diaphragm:** A shallow strip of gravel. Keep the gravel clean, tidy, and together.
- **Gutter guard:** Debris screens covering roof gutters. Have your gutters periodically cleaned.



Key Elements of Permeable Pavement

Some elements vary with different designs or as guidelines are updated over time.



Pavers—Provides a stable surface for walking or driving.

Gaps—Provides a path for water to infiltrate between the pavers.

Gravel—Enables rapid infiltration from the surface and stores water, allowing it to percolate into the surrounding soil.

Edge Restraint—Keeps surrounding soil from clogging the pavers.

Observation Well—Present in most, but not all, pavements. Often made of PVC pipe with a metal cleanout cap. Enables inspection to ensure water is percolating into the soil and not standing in the gravel for extended periods.

Planter Box Design Criteria:

<u>Arlington's Stormwater Manual: A Guide to Stormwater Requirements for Land Disturbing Activities in</u> <u>Arlington County</u>