

Section 3.1 Impervious Surface Removal (ISR)



Impervious Surface Removal is the demolition and disposal of impervious surfaces and includes remediation of the subsoil, adding topsoil, and vegetation establishment or other best management practice. Impervious surfaces include hardscape and pavement materials such as asphalt, concrete, brick, and densely graded stone aggregate.

A. Purpose

- This practice is not intended to provide cost share for structure removal (roof, buildings, pools, decking, etc.)
- ISR can be a standalone practice where the area beneath the removed surface is stabilized with grass or landscaping.
- When ISR is followed by the installation of a VCAP practice except for permeable pavement, the applicant will submit two applications: one for ISR, and a second for the replacement practice. The applicant is eligible for cost share for both practices up to their caps, as outlined in the District Guide, except when replacing with permeable pavement.

B. Site Criteria

- This practice has no minimum size or drainage area limitations.
- There are no limitations for the practice on steep slopes or in floodplains. Additional erosion control measures may be necessary during the project demolition and vegetation establishment.

C. Design Criteria

- Removal must include the impervious surface and all underlying base stone aggregate. All removed materials must be disposed of properly.
- The exposed subsoil shall be scarified to a depth of at least 2 inches. Appropriate topsoil applied to match existing topography.
- The practice must include a plan for vegetation establishment or approved practice.
- When vegetation is to be established on site, the practice should be initiated as closely as possible to the optimum time for vegetation establishment. Temporary cover must be established within 14 calendar days if permanent vegetation cannot be established. Vegetation establishment requires proper soil preparation, which includes soil testing. Deep tillage may be needed to address soil

compaction. Addition and incorporation of topsoil or organic matter may be necessary for proper vegetation establishment.

D. Design Components

- The district must be notified of any proposed changes to the approved design. Changes to the approved design may jeopardize cost share reimbursement. The Steering Committee has discretion to approve or deny cost share reimbursement in the event of design changes.
- Information required in the design plan includes (see VCAP Submission Checklist for a comprehensive list):
 - Photo documentation of site and resource concern.
 - Soil preparation plan including plan to acquire soil test and amend soil appropriately.
 - Soil map with description of soil via Web Soil Survey.
 - Aerial photo with an outline of practice location and/or impervious area removed.
 - Sketch of project plan including practice dimensions and total impervious surface area to be removed.
 - Installation requirements including timeline for completion.
 - A plan for fragmenting, removal and disposal of existing impervious cover.
 - A plan for final site stabilization.
 - Erosion and Sediment Control Plan, if applicable.
 - Confirm local policies, such as land disturbance, grass heights, etc.

E. Operation and Maintenance

- Site specific maintenance items depend on final stabilization plan.
- Routine Maintenance includes:
 - If vegetated, ensuring full vegetative cover remains intact.
 - Weeds and invasive species are controlled.
- No impervious surface built over the practice area.

F. Cost-Share Rates

- See **District Guide to VCAP** for practice cost-share rates and caps.
- Eligible costs may include: demolition (removal and disposal of surface material and aggregate), soil testing, seedbed preparation (harrowing/raking/amending soil), permanent seed, mulch, sod, erosion and sediment controls when needed.

G. Technical References

- Virginia Stormwater Management Handbook, Version 1.0. 2024. Virginia Department of Environmental Quality.
 - Chapter 7: Topsoiling
 - Chapter 8: Compost Amendments