

# CONSTRUCTION AND MAINTENANCE BEST MANAGEMENT PRACTICES

The proper use of Best Management Practices (BMPs) is essential for safeguarding LaRC's stormwater system: the network of inlets, drains, and ditches that channel unfiltered surface water from the Center to the Chesapeake Bay. BMPs, including erosion control measures, help keep sediment on-site and protect our waterways.

Personnel must adhere to the specific environmental requirements outlined for their construction and maintenance projects. This includes following any relevant project plans, such as waste management, erosion and sediment control, stormwater management, and pollution prevention plans, which have been reviewed and approved by the LaRC Environmental Management Office (EMO).

Below are common BMPs used on projects across the Center, along with potential issues and practical tips for preventing or addressing them.

## Street Sweeping

### Why It's Important:

Sediment and debris on impervious surfaces, such as roads, pavements and curbs, can wash into storm drains.

### What You Need to Do:

- Sweep paved areas on and near project sites at regular intervals, especially after heavy traffic and soil-disturbing activities.
- Use sweeping equipment and methods designed to capture and remove debris, rather than pushing it into drainage areas.
- Sweep thoroughly, paying extra attention to areas near storm drains and inlets.



# Inlet Protection

## Why It's Important:

Inlet protection prevents sediment and debris from entering the storm system.

## What You Need to Do:

- Use devices like waddles, storm drain filters, block and gravel bags, or sediment traps around inlets (catch basins, storm drains, curb inlets).
- Ensure proper installation, with barriers fully covering the inlet while allowing controlled water flow to prevent flooding.
- Inspect regularly, especially after storms, to ensure protection measures are intact and effective.
- Check for signs of failure, such as sagging barriers or excessive sediment buildup.
- Clean or replace devices to maintain proper function.

# Dewatering

## Why It's Important:

Improper dewatering can allow sediment-laden water into the stormwater system. Sediment is a top pollutant of the Chesapeake Bay and is heavily regulated in Virginia.

## What You Need to Do:

- If water may contain pollutants (metals, oil/grease, chemicals, etc.), do not pump it out. Contact the EMO.
- Use filtration devices (filter bags, sediment traps) to treat water before discharge.
- Ensure pumps and devices are correctly sized.
- Ensure devices are securely attached to discharge hoses.
- Place devices onto grassy areas away from stormwater inlets.
- Regularly monitor devices for effectiveness and replace or clean filters as needed to prevent overflow.
- Projects greater than one (1) acre and with a Virginia Construction General Permit (CGP) are under different rules that prohibit any dewatering discharge from leaving the site.

# Concrete Washout

## Why It's Important:

Concrete washout can introduce hazardous chemicals to stormwater.

## What You Need to Do:

- Do NOT discharge concrete washout water to the ground or down a drain.
- Ensure the washout area is large enough for the project, clearly marked, and placed away from drainage systems.
- Position washout area near concrete work, but far enough from other vehicle traffic to prevent damage or spills.
- Whenever possible, avoid placing washout areas on slopes exceeding a 2% grade.
- Regularly inspect for leaks or overflows, and clean as needed to remove hardened concrete.
- Do not fill the washout pit beyond 75% capacity. If full, schedule proper removal of the hardened concrete and replace the liner as needed.
- Immediately clean up any spilled washout materials, placing them back into the containment or disposing of them per project requirements.
- Dispose of hardened concrete properly once removed.



## LF 461 Submission Requirement for Environmental Impact Review

Before initiating any project that involves discharging or draining water, altering water-generating processes, installing new equipment with a water discharge, or introducing a new product into an existing system, LaRC requires the submission of an LF 461. This form enables the EMO to conduct an environmental impact review and identify any necessary requirements, permits, or additional project plans needed for compliance.

The EMO is here to support your projects. For any questions or assistance, please contact: Sarat Calamur (757.864.4791), Ande Remington (757.864.8332), or James Griczin (757.864.5030). In an emergency or spill, always call 911 (from a Center phone) or 757.864.2222 (from a cell phone).