

**SDOT BEST MANAGEMENT PRACTICES
(BMP) REFERENCE MANUAL**

Traffic Management
Curb and Pavement Markings

December 2008

SDOT BEST MANAGEMENT PRACTICES (BMP) REFERENCE MANUAL

Traffic Management Curb and Pavement Markings

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This best management practice (BMP) reference manual was written to assist you, an SDOT field crew member, in preventing pollution from impacting stormwater. Your actions in the field contribute significantly to preventing stormwater pollution and keeping our streams, lakes, and Puget Sound clean. These manuals also help SDOT comply with the City of Seattle's Stormwater Permit.

We would like to receive your feedback on the information this manual contains. Direct feedback; questions regarding any of the BMPs listed; and information about missing work tasks, pollution sources, or missing BMPs should be directed to Maureen Meehan (SDOT's NPDES Stormwater Advisor) at (206) 684-8750.

To report a spill or any illegal dumping issues you observe while in the field, please call the SPU Water Quality Hotline at (206) 684-7587.

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	813	Building and Grounds Maintenance

Description of Work

Maintenance, repair, and upkeep of all maintenance headquarters, yards, and transfer sites, including offices, shops, storage yards, and bridge towers.

Objectives

Use proper techniques for vehicle and equipment maintenance, service, and repair operations to reduce the potential for discharge of pollutants to watercourses or streams.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.

2. **Cleaning and repair of tools and equipment:**
 - Perform vehicle and equipment maintenance, repair, and/or service at designated repair facilities whenever possible.
 - Routinely inspect equipment, tools, and vehicles for leaks or damage.
 - Promptly repair or replace leaking connections, pipes, hoses, and/or valves.

BMP Maintenance During Site Work

1. **Cleaning and repair of tools and equipment:**
 - Prohibit discharge of any wastewaters to stormwater drains.
 - Do not pour material down drains or hose down work areas.
 - Use either dry sweeping or damp mopping.
 - Remove buildup of oils and grease on equipment.
 - Perform equipment maintenance in areas that prevent discharges to the storm drain system.
 - Use drip pans (see Figure 1) under equipment when maintaining, repairing, or servicing in the field.
 - Clean maintenance area storm drain grates regularly.

- Clean surfaces following any discharge or spill incident.

2. *Optional BMPs:*

- Use non-toxic solvents whenever possible.
- Minimize water and detergent use in all washing operations.
- Use phosphate-free detergents when practical.
- Consider recycling washwater by installing a closed-loop water recycling system.



Figure 1. Example of drip pan used for vehicle and/or equipment maintenance.

Site Cleanup

1. **Waste Disposal:**

- Collect and properly manage (recycle or dispose of) used materials such as grease, oil, oil filters, antifreeze, cleaning solutions, lead-acid batteries, hydraulic and transmission fluids, and tires.
- Dispose of these wastes at a recycling facility; municipal solid waste disposal facility; hazardous waste treatment, storage, and disposal (TSD) facility; or the sanitary sewer.
- Do not dispose of collected vegetation in separate storm drainage systems, waterways, water bodies, or greenbelt areas (see Figure 2).

2. *Optional BMP:* Dispose of grass clippings, leaves, sticks, and other collected vegetation by composting, if feasible.



Figure 2. Hand sweeping.

References

Regional Road Maintenance Endangered Species Act Program Guidelines (Regional Road Maintenance Technical Working Group 2002)	Source Control Technical Requirements Manual (Seattle 2009)
1.111 - Vegetation (Equipment/Tools Cleanup and Maintenance)	BMP 3 - Dispose of Fluids and Wastes Properly

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	815	Clean and Repair Equipment and Tools

Description of Work

Cleaning and minor maintenance of equipment performed by field personnel including moving maintenance equipment and the repair of small tools.

Objectives

Use proper techniques for equipment maintenance, service, and repair operations to reduce the potential for discharge of pollutants to watercourses or streams.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.

2. **Equipment and Tool Repairs:**
 - Perform vehicle and equipment maintenance, repair, and service at designated repair facilities whenever possible.
 - Routinely inspect equipment, tools, and vehicles for leaks or damage.
 - Promptly repair or replace leaking connections, pipes, hoses, and valves.

BMP Maintenance During Site Work

1. **Washwater:**
 - Discharge all washwater to a sanitary sewer, process treatment system, or holding tank and not to the stormwater drainage system. If a holding tank is used for the storage of washwater, the contents must be pumped out before the tank is full and then discharged into the sanitary sewer or wastewater treatment system.
 - Conduct pressure washing in a designated area (such as a wash pad) that is provided with a sump drain connected to a sanitary sewer or treatment system, or a blind sump or holding tank. Prevent stormwater run-on using a berm or sump.
 - Prohibit discharge of any wastewaters to stormwater drains.

2. Equipment and Tool Repairs:

- Do not pour material down drains or hose down work areas.
- Use either dry sweeping or damp mopping.
- Remove buildup of oils and grease on equipment.
- Perform equipment maintenance in areas that prevent discharges to the storm drain system.
- Use drip pans (see Figure 1) under equipment when maintaining, repairing, or servicing in the field.
- Clean surfaces following any discharge or spill incident.



Figure 1. Example of drip pan used for equipment maintenance.

3. *Optional BMPs:*

- Use non-toxic solvents whenever possible.
- Minimize water and detergent use in all washing operations.
- Use phosphate-free detergents when practical.
- Consider recycling washwater by installing a closed-loop water recycling system

Site Cleanup

1. **Waste Disposal:**

- Collect and properly manage (recycle or dispose of) used materials such as grease, oil, oil filters, antifreeze, cleaning solutions, lead-acid batteries, hydraulic and transmission fluids, and tires.

- Dispose of these wastes at recycling facilities; municipal solid waste disposal facilities; hazardous waste treatment, storage, and disposal facilities; or the sanitary sewer as required.

References

Regional Road Maintenance Endangered Species Act Program Guidelines (Regional Road Maintenance Technical Working Group 2002)	Source Control Technical Requirements Manual (Seattle 2009)
1.111 - Vegetation (Equipment/Tools Cleanup and Maintenance)	BMP 3 - Dispose of Fluids and Wastes Properly BMP 7 - Cleaning or Washing of Tools, Engines, and Manufacturing Equipment

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	909 910 911 912 913 914 915	Concrete and Asphalt Curb Markings Thermoplastic Crosswalk Thermoplastic Stop Lines Thermoplastic Channelization Buttons and Reflectors Bike Lines, Legends, and Sharrows Maintenance Bike Lines, Legends, and Sharrows Work Instructions

Description of Work

- RCAT 909 Installation of 4-inch diameter line markers on dashed centerline or approach line resulting from resurfacing, rechannelization, or deterioration.
- RCAT 910 Installation of thermoplastic material as markings for school and pedestrian crosswalks.
- RCAT 911 Installation of thermoplastic material as markings for vehicle stop lines.
- RCAT 912 Installation of heated thermoplastic materials as lane designation markings to provide for direction and control of vehicular traffic.
- RCAT 913 Application of buttons (lane line markers) and reflectors.
- RCAT 914 & 915 Installation of heated thermoplastic materials such as bike lines, legends, and sharrows

Objectives

Protect drainage systems and water bodies from spills and contamination.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.
2. **Storm Drain Covers:** Install drain covers (see Figure 1) on any catch basin or storm drain inlets that are connected to the separate storm drain system and are located downslope or adjacent to the work area if chemical materials could discharge to the separate storm drain system.

BMP Maintenance During Site Work

1. **Chemical Containment:** Use only the recommended amounts of chemical materials and apply them in a proper manner to further reduce pollution.

2. *Optional BMP:* Avoid the activity when rain is falling or expected, where feasible.



Figure 1. Storm Drain Cover

Site Cleanup

1. **Storm Drain Covers:** Remove drain covers from catch basin or storm drain inlets.
2. **Waste Disposal:**
 - Follow the regulations and requirements outlined by the Washington State Department of Ecology and, in some cases, King County. Some liquid wastes must be stored and handled according to special guidelines and may require a permit.
 - Dispose of chemicals using the following methods:
 - Dispose of wash-up waters from water-based paints to the sanitary sewer, which is regulated by the King County Industrial Waste Program (206-263-3000).
 - Dispose of wastes from oil-based paints, cleaning solvents, thinners, and mineral spirits through a licensed waste management firm or treatment, storage, and disposal (TSD) facility.

References

Construction Stormwater Control Technical Requirements Manual (Seattle 2009)
C1.15 - Material Delivery, Storage, and Containment
C1.20 - Use of Chemicals During Construction

SDOT Manual Name	RCAT	RCAT Description
Traffic Management	916	Painting Temporary Legends/Stoplines
3. Curb and Pavement Markings	917	Paint White Traffic Lines
	918	Paint Yellow Traffic Lines

Description of Work

RCAT 916 Painting of vehicle stop lines and lane designation markings including painting parking stalls and crosshatching.

RCAT 917 Painting of white traffic lines (dash lines, edge lines, and guidelines).

RCAT 918 Painting yellow traffic lines (center line and two-way left turn lane markings).

Objectives

Protect drainage systems and water bodies from paint spills and contamination.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.
2. **Paint Application:** Train employees in the application and cleanup of paints, finishes, and coatings to reduce misuse and overspraying. Document and keep all training records.
3. **Storm Drain Covers:** Install drain covers (see Figure 1) on any catch basins or storm drains that are located downslope or adjacent to the work area
4. **Paint Storage:** Store paint materials with secondary containment and tight-fitting lids.



Figure 1. Storm Drain Cover.

BMP Maintenance During Site Work

1. Paint Application:

- Use only the recommended amounts of paint and apply them in a proper manner.
 - Continually monitor operations to determine whether paint materials could enter the separate storm drain system. If observations indicate that a violation of water quality standards could occur, stop operations and immediately implement preventative measures such as berms, barriers, secondary containment, and vector trucks.
 - Use a ground cloth, pail, drum, drip pan, tarpaulin, or other protective device for activities such as paint mixing and tool cleaning outside or where spills can contaminate stormwater. Whenever possible, conduct these activities inside or in an enclosed area.
2. *Optional BMP:* Avoid the activity when rain is falling or expected, where feasible.

Site Cleanup

1. **Storm Drain Covers:** Remove drain covers from catch basin or storm drain inlets.
2. **Waste Disposal:**
 - Follow the regulations and requirements outlined by the Washington State Department of Ecology and, in some cases, King County. Some liquid wastes must be stored and handled according to special guidelines and may require a permit.
 - Remove additional waste material from site and dispose of properly.
 - Dispose of unused paint promptly. Recycle paints, paint thinner, solvents, wash water from pressure washers, and any other recyclable materials.
 - Dispose of wash water using the following methods:
 - Wash water from water-based paints may go into a sanitary sewer which is regulated by the King County Industrial Waste Program.
 - Wastes from oil-based paints, cleaning solvents, thinners, and mineral spirits must be disposed of through a licensed waste management firm or treatment, storage, and disposal (TSD) facility.

References

Construction Stormwater Control Technical Requirements Manual (Seattle 2009)	Source Control Technical Requirements Manual (Seattle 2009)
C1.15 - Material Delivery, Storage, and Containment C1.20 - Use of Chemicals During Construction	BMP 21 - Painting, Finishing, and Coating of Vehicles, Boats, Buildings, and Equipment

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	919	Painting/Paint Removal/Grinding

Description of Work

Remove traffic lines or curb marking by grinding or burning.

Objectives

Protect drainage systems and water bodies from paint spills and slurry.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.
2. **Paint removal:** Install drain covers (see Figure 1) on any catch basin or storm drain inlets that are located downslope or adjacent to the work area.



Figure 1. Storm Drain Cover

BMP Maintenance During Site Work

1. **Paint removal:** Contain slurry during the activity to prevent migration off site and do not leave slurry on permanent concrete or asphalt paving.
2. *Optional BMPs:*
 - Avoid the activity when rain is falling or expected, where feasible.
 - Use a sandbag barrier or containment berm to direct stormwater run-on around the construction site (see Figure 2).



Figure 2. Containment berm example.

Site Cleanup

1. **Storm Drain Covers:** Remove drain covers from catch basin or storm drain inlets.

2. **Waste Disposal:**
 - Dispose of collected slurry and wastewater in a manner that does not violate groundwater or surface water quality standards.

 - Do not allow wastewater to drain to any natural or constructed drainage conveyance.

 - Handle and dispose of cleaning waste material and demolition debris in a manner that does not cause contamination of water.

References

Construction Stormwater Control Technical Requirements Manual (Seattle 2009)	Source Control Technical Requirements Manual (Seattle 2009)
C1.15 - Material Delivery, Storage, and Containment C1.20 - Use of Chemicals During Construction C1.35 - Sawcutting and Paving Pollution Prevention	BMP 21 - Painting, Finishing, and Coating of Vehicles, Boats, Buildings, and Equipment

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	940	Parking Meter Stall Work

Description of Work

Installation, removal, or replacement of parking meter heads, posts, signs, and post/head or post/sign combinations; marking, remarking, or removal of stall and curb markings adjacent to a stall; and repainting posts.

Objectives

Prevent sediment, loose aggregate, uncured concrete, grout, or related chemicals from leaving the work site; contain water from exposed aggregate work areas; and contain water from equipment cleanup.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.

1. **Storm Drain Covers and Catch Basin Filter Socks:** Install drain covers (see Figure 1) over any catch basin or storm drain inlets that are located downslope or adjacent to the work area. Install catch basin filter socks in any structures that are **greater than 12 inches deep** (see Figure 2).
 - Place the appropriate size filter sock in the storm drain or catch basin.
 - Place the storm drain or catch basin grate on top of the filter sock to hold it in place.
 - Trim and remove filter sock material that extends beyond the grate.



Figure 1. Storm drain cover.



Figure 2. Catch basin filter sock.

BMP Maintenance During Site Work

1. **Catch Basin Filter Socks:** Clean or remove and replace filter sock when sediment has filled one-third of the available storage (unless a different standard is specified by the product manufacturer).
2. **Concrete Containment:**
 - Vacuum slurry and cuttings during the activity to prevent migration off site and do not leave slurry and cuttings on permanent concrete or asphalt paving overnight (see Figure 3).
 - Continually monitor operations to determine whether slurry, cuttings, or wastewater could enter the stormwater system. If observations indicate that a violation of water quality standards could occur, stop operations and immediately implement preventative measures such as berms, barriers, secondary containment, and vector trucks.
 - Wash off hand tools (e.g., screeds, shovels, rakes, floats, trowels, etc.) only into formed areas awaiting installation of concrete. A temporary sump can also be used to collect and contain wash water.
 - Clean concrete application and mixing equipment or concrete-delivery vehicles on the work site only in a designated area where the rinse water is controlled. Do not discharge to the sanitary sewer without prior approval from King County.



Figure 3. Sawcutting and vacuuming.

3. *Optional BMPs:*
 - Avoid the activity when rain is falling or expected, where feasible.

- Use a sandbag barrier or containment berm to direct stormwater run-on around the construction site (see Figure 4).



Figure 4. Containment berm example.

Site Cleanup

1. **Catch Basin Filter Socks:** Remove the filter sock and dispose of the collected sediment in a suitable container to be hauled offsite. Reuse the filter sock at another site if it remains in good condition (e.g., no rips, tears, or visible staining).
2. **Storm Drain Covers:** Remove drain covers from catch basin or storm drain inlets.
3. **Waste Disposal:**
 - Sweep or shovel loose aggregate chunks and dust and collect the material for recycling or proper disposal at the end of each workday (see Figure 5).
 - Remove waste materials from the site and dispose of them properly. Do not discharge to the sanitary sewer without prior approval from King County.
 - Dispose of collected slurry and cuttings in a manner that does not violate groundwater or surface water quality standards.
 - Perform cleaning of concrete application and mixing equipment or concrete-delivery vehicles on the work site in a designated area where the rinse water is controlled.
4. *Optional BMP:* Recycle broken concrete.



Figure 5. Manual sweeping.

References

Regional Road Maintenance Endangered Species Act Program Guidelines (Regional Road Maintenance Technical Working Group 2002)	Construction Stormwater Control Technical Requirements Manual (Seattle 2009)	Source Control Technical Requirements Manual (Seattle 2009)	Stormwater Management Manual for Western Washington (Ecology 2005)	Highway Runoff Manual (WSDOT 2008)
2.37 - Concrete Containment (2) 2.79 - Inlet Protection	C1.20 - Use of Chemicals During Construction C1.35 - Sawcutting and Paving Pollution Prevention C1.45 - Solid Waste Handling and Disposal E3.25 - Storm Drain Inlet Protection	BMP16 - Concrete Pouring, Concrete/Asphalt Cutting, and Asphalt Application	C151 - Concrete Handling C152 - Sawcutting and Surfacing Pollution Prevention	6A-2.33 - Concrete Handling

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	950	Emergency and Miscellaneous Traffic Maintenance

Description of Work

Other routine maintenance performed on traffic signs, marking, electrical devices, and other meters to accommodate emergency situations or shop support activities including surface mounted Metro frames, bike rack concrete pad pours, and kiosk installations.

Objectives

Prevent sediment, uncured concrete, water from equipment cleanup, or other pollutants from entering drainage systems, sensitive areas, and water bodies.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.
2. **Storm Drain Covers and Catch Basin Filter Socks:** Install drain covers (see Figure 1) over any catch basin or storm drain inlets that are located downslope or adjacent to the work area. Install catch basin filter socks in any structures that are **greater than 12 inches deep** (see Figure 2).
 - Place the appropriate size filter sock in the storm drain or catch basin.
 - Place the storm drain or catch basin grate on top of the filter sock to hold it in place.
 - Trim and remove filter sock material that extends beyond the grate.



Figure 1. Storm drain cover.

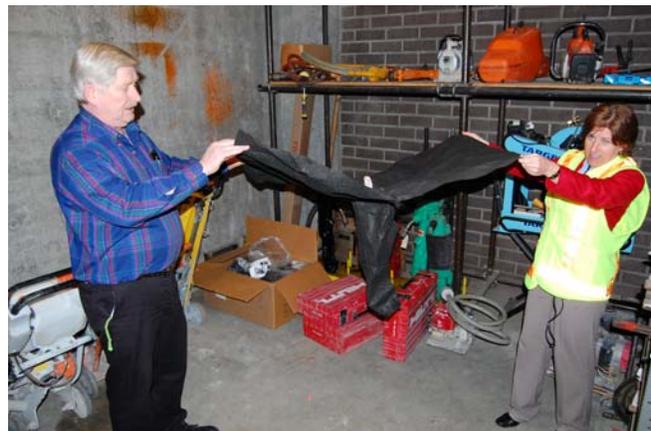


Figure 2. Catch basin filter sock.

Sweeping:

- Sweeping (see Figure 3) and vacuuming may not be effective when sediment is wet or when tracked soil is caked (caked soil may need to be scraped loose).
- Washing is not an alternative to sweeping and vacuuming because of the risk of pollutant transport.



Figure 3. Mechanical street sweeping.

BMP Maintenance During Site Work

1. **Catch Basin Filter Socks:** Clean or remove and replace filter sock when sediment has filled one-third of the available storage (unless a different standard is specified by the product manufacturer).
2. **Sweeping:**
 - Control the number of points where vehicles can leave the site to allow focused sweeping and vacuuming efforts.
 - Control speed of sweeper to minimize airborne particulates and remove maximum amount of debris.
 - Use water spray system on sweeper to reduce dust.
 - Use pickup brooms in sensitive areas.
 - Avoid sweeping up any unknown substance or any object that may be potentially hazardous.
 - Adjust brooms frequently; maximize efficiency of sweeping operations.

- Do not use kick brooms or sweeper attachments.
- Prevent sediment from entering storm drain system.

3. Sawcutting and Concrete Installation:

- Vacuum slurry (see Figure 4) and cuttings during the activity to prevent migration offsite and do not allow the slurry and cuttings to remain on permanent concrete or asphalt paving overnight.
- Collect, treat, and properly dispose of runoff that comes in contact with diesel or coatings used in asphalt applications.
- Continually monitor operations to determine whether cuttings or wastewater could enter the stormwater system. If observations indicate that a violation of water quality standards could occur, stop operations and immediately implement preventative measures such as berms, barriers, secondary containment, and vector trucks.



Figure 4. Sawcutting and vacuuming.

4. *Optional BMPs:*

- Avoid the activity when rain is falling or expected, where feasible.
- Use a sandbag barrier or containment berm to direct stormwater run-on around the construction site (see Figure 5).



Figure 5. Containment berm example.

Site Cleanup

1. **Catch Basin Filter Socks:** Remove the filter sock and dispose of the collected sediment in a suitable container to be hauled offsite. Reuse the filter sock at another site if it remains in good condition (e.g., no rips, tears, or visible staining).
2. **Storm Drain Covers:** Remove drain covers from catch basin or storm drain inlets.
3. **Sweeping:** Inspect and sweep or vacuum visible sediment tracking on a daily basis.
4. **Equipment and Vehicle Maintenance:**
 - Clean equipment and tools off site in an area where pollutants can be contained.
 - Perform equipment and vehicle maintenance in areas that prevent discharges to the storm drain system.
5. **Waste Disposal:**
 - Sweep or shovel loose aggregate chunks and dust and collect the material for recycling or proper disposal at the end of each workday (see Figure 6).
 - Remove waste materials from the site and dispose of them properly. Do not discharge to the sanitary sewer without prior approval from King County.
 - Dispose of collected slurry and cuttings in a manner that does not violate groundwater or surface water quality standards.
 - Perform cleaning of concrete application and mixing equipment or concrete-delivery vehicles on the work site in a designated area where the rinse water is controlled.
6. *Optional BMP:* Recycle broken concrete.



Figure 6. Manual sweeping.

References

Regional Road Maintenance Endangered Species Act Program Guidelines (Regional Road Maintenance Technical Working Group 2002)	Construction Stormwater Control Technical Requirements Manual (Seattle 2009)	Source Control Technical Requirements Manual (Seattle 2009)	Stormwater Management Manual for Western Washington (Ecology 2005)	Highway Runoff Manual (WSDOT 2008)
2.152 - Sweeping 2.37 - Concrete Containment (2) 2.79 - Inlet Protection	E3.25 - Storm Drain Inlet Protection E3.70 - Street Sweeping and Vacuuming C1.20 – Use of Chemicals During Construction C1.35 - Sawcutting and Paving Pollution Prevention C1.45 - Solid Waste Handling and Disposal	BMP16 - Concrete Pouring, Concrete/ Asphalt Cutting, and Asphalt Application BMP 32 - Dust Control at Manufacturing Sites	C151 - Concrete Handling C152 - Sawcutting and Surfacing Pollution Prevention C220 - Inlet Protection	6A-2.33 - Concrete Handling

SDOT Manual Name	RCAT	RCAT Description
Traffic Management 3. Curb and Pavement Markings	963 964 965 966 967	Painting Barriers and Buttons Paint Curb White Paint Curb Red Paint Curb Yellow Paint Curb Gray

Description of Work

RCAT 963	Painting of lane designation markings (barriers and buttons)
RCAT 964	Painting of lane designation markings (white)
RCAT 965	Painting of lane designation markings (red)
RCAT 966	Painting of lane designation markings (yellow)
RCAT 967	Painting of lane designation markings (gray)

Objectives

Protect drainage systems and water bodies from paint spills and contamination.

Site Preparation

1. **Spill Kit:** Keep a spill cleanup kit in a nearby vehicle or next to the work site so that it is easily accessible. Make sure the contents of the spill kit are appropriate for the types and quantities of materials used for this work task. Refill spill kit materials before beginning work.
2. **Paint Application:** Train employees in the application and cleanup of paints, finishes, and coatings to reduce misuse and overspraying. Document and keep all training records.
3. **Paint Storage:** Store paint materials with secondary containment and tight-fitting lids.
4. **Storm Drain Covers:** Install drain covers (see Figure 1) on any catch basin or storm drain inlets that are located downslope or adjacent to the work area.



Figure 1. Storm drain cover.

BMP Maintenance During Site Work

1. Paint Application:

- Use only the recommended amounts of paint and apply them in a proper manner.
 - Continually monitor operations to determine whether paint materials could enter the separate storm drain system. If observations indicate that a violation of water quality standards could occur, stop operations and immediately implement preventative measures such as berms, barriers, secondary containment, and vector trucks.
 - Use a ground cloth, pail, drum, drip pan, tarpaulin, or other protective device for activities such as paint mixing and tool cleaning outside or where spills can contaminate stormwater. Whenever possible, conduct these activities inside or in an enclosed area.
2. *Optional BMP:* Where feasible, avoid the activity when rain is falling or expected.

Site Cleanup

1. **Storm Drain Covers:** Remove drain covers from catch basin or storm drain inlets.
2. **Waste Disposal:**
 - Follow the regulations and requirements outlined by the Washington State Department of Ecology and, in some cases, King County. Some liquid wastes must be stored and handled according to special guidelines and may require a permit. Remove additional waste material from site and dispose of properly.
 - Dispose of unused paint promptly. Recycle paints, paint thinner, solvents, wash water from pressure washers, and any other recyclable materials.
 - Dispose of wash water using the following methods:
 - Wash water from water-based paints may go into a sanitary sewer which is regulated by the King County Industrial Waste Program.
 - Wastes from oil-based paints, cleaning solvents, thinners, and mineral spirits must be disposed of through a licensed waste management firm or treatment, storage, and disposal (TSD) facility.

References

Construction Stormwater Control Technical Requirements Manual (Seattle 2009)	Source Control Technical Requirements Manual (Seattle 2009)
C1.15 - Material Delivery, Storage, and Containment C1.20 - Use of Chemicals During Construction	BMP 21 - Painting, Finishing, and Coating of Vehicles, Boats, Buildings, and Equipment

