

# STORM WATER POLLUTION PREVENTION INFORMATION FOR COMMERCIAL WASHERS

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# **MANAGING THE DISCHARGES OF WASH WATER FROM COMMERCIAL WASHERS**

## **BACKGROUND**

In September 2006, the Regional Water Quality Control Board (RWQCB) of the State of California issued a National Pollutant Discharge Elimination System (NPDES) Permit to the following entities:

- Pacific Grove
- Monterey
- Seaside
- Sand City
- Del Rey Oaks
- Marina
- Monterey County

This NPDES Permit requires these entities to implement a storm water management program intended to eliminate sources of storm water pollution to the maximum extent possible. The program that was approved for these entities by the RWQCB is titled the *Monterey Regional Storm Water Management Program* (MRSWMP). The MRSWMP contains Best Management Practices (BMPs) and Measurable Goals which must be fulfilled in order for these entities to be in compliance with the Permit.

In addition to these entities, the City of Carmel-by-the-Sea will have its permit issued in the near future, and is implementing the same Storm Water Management Program as these other entities.

One of these BMPs was to adopt a Storm Water Ordinance containing requirements pertaining to discharges to their storm sewer systems. Since water entering the storm sewer systems typically receives no type of treatment before it is discharged to receiving water such as a creek, lake, or the ocean, these requirements limit discharges to the storm sewer system to rainfall runoff and certain types of unpolluted water. All other types of discharges are prohibited. An excerpt from the Storm Water Ordinance pertaining to prohibited discharges is attached as Attachment A.

This paper describes the proposed approach to managing discharges from mobile washers and certain types of car washers, so that these discharges will not cause storm water pollution.

## **CATEGORIES OF COMMERCIAL WASHERS**

### **Categories of Mobile Washers and Incidental Car Washers:**

1. Mobile car washers and car detailers
2. Pressure washers and others involved in the washing and/or cleaning of surfaces such as sidewalks, parking lots, building exteriors, etc.
3. Automotive facilities that do car washing as an incidental business activity, e.g. new and used car dealers, car rental agencies, auto body shops, etc.

## **Description of Discharges Generated by Each Category of Washer**

1. **Mobile Car Washers and Car Detailers.** These are businesses that go to a vehicle owner's location to wash or detail their vehicles.

If a resident has a mobile car washer or detailer come to his/her residence to wash his/her vehicle, the Management Committee has determined that this type of discharge is exempted under the Model Ordinance, as provided for in Section 9, paragraph (a)15. However, BMPs to minimize the amount of discharge to the storm sewer from residential car washing should still be employed, e.g. collect water and discharge to land or to sanitary sewer system, when possible.

Businesses that go to non-residential (commercial) locations to wash or detail vehicles are not exempted under the Model Ordinance, and are prohibited under the Model Ordinance, in Section 9 paragraphs b. and c., from discharging this wash water to the storm water system.

2. **Washers and Cleaners.** Washers and cleaners are mobile businesses that perform washing and/or cleaning of sidewalks, parking lots, building exteriors, and other surfaces, normally using high pressure water spraying equipment. These also include businesses that perform this type of washing and/or cleaning in-house, using their own equipment and personnel, as an incidental business activity. This type of washing and/or cleaning may or may not involve the use of soaps and other cleaning products.

These types of businesses are prohibited under the Model Ordinance, in Section 9 paragraph k., from discharging this wash water to the storm water system. Regardless of whether cleaning products are used, the wash water must be discharged to the sanitary sewer, or percolated on land, and not discharged to the storm water system.

3. **Automotive Facilities that do Car Washing as an Incidental Business Activity.** These are businesses that deal in selling, repairing, renting, or performing other types of services involving vehicles, and that wash these vehicles as an incidental business activity. These types of businesses are prohibited under the Model Ordinance, in Section 9 paragraphs b., c., and d., from discharging this wash water to the storm water system. The only exception to this is that essentially clean water from exterior rinsing of vehicles can be discharged to the storm drain system, providing that (1) it contains no soaps or other cleaning products, and (2) that it does not come from washing inside wheel wells, the vehicle's underbody, or under the hood.

## **DISCHARGE MANAGEMENT APPROACH**

In order to help make complying with the requirements of the Storm Water Ordinance as easy and as inexpensive as possible for Commercial Washers, the entities that are governed by the NPDES Permit are using the following approach to managing these discharges so that they will not cause storm water pollution.

Owners of these types of businesses were invited to attend a Public Workshop held in Seaside on April 16, 2008. At that Workshop a presentation of much of the material contained in this booklet was made, and numerous questions from attendees were answered. Representatives of the attending businesses were informed that they are not allowed to discharge their wastewater to the storm drain system. The requirements of the Storm Water Ordinances pertaining to these types of discharges was explained, and the business owners were informed that the wastewater must either be (1) discharged to the sanitary sewer, or (2) allowed to percolate on land.

For certain types of discharges from Category 3 businesses, the wash water may be discharged to the storm drain system if it meets certain requirements, as described above.

If businesses in Categories 1 or 2 wish to discharge to the sanitary sewer, they will have to obtain permission to do so from the wastewater authority which serves the location where the discharges will occur. For the cities of Pacific Grove, Monterey, Seaside, Sand City, Del Rey Oaks, and Marina this is the Monterey Regional Water Pollution Control Agency (MRWPCA). For the city of Carmel-by-the Sea this is the Carmel Area Wastewater District (CAWD). In the portions of the County of Monterey to which the requirements apply there are no municipal wastewater authorities. Therefore, wastewater generated in those areas will have to be discharged to the most convenient wastewater authority. This will most likely be the MRWPCA, since it serves the Castroville and Salinas areas.

Obtaining permission to discharge to the sanitary sewer will probably involve filling out a short application and paying a once-a-year fee to the wastewater authority.

Once this has been done, the business will be authorized to discharge its wastewater to the sanitary sewer, or for certain types of Category 3 discharges to the storm drain system, at the location(s) where the work is being performed. For discharges to the sanitary sewer the most appropriate point of disposal located on the site where the work is being performed, e.g. toilet, floor drain, deep-sink, cleanout, etc. will have to be used. No discharges to manholes or cleanouts located within the public right-of-way will be allowed.

Businesses in Category 3 will have to provide a suitable vehicle washing area and connect its drainage to the sanitary sewer. Making this connection will require submitting an application to their wastewater authority and following their connection procedures. These types of discharges will likely have to have an oil and sand separator installed on them to provide some pretreatment of the wash water before it enters the

sanitary sewer. The discharge will likely also involve obtaining a Discharge Permit from the waste water authority.

It is important to be aware that there are enforcement provisions in the Storm Water Ordinances for violating the requirements contained in them. Members of the city and County staffs, as well as members of the public, who observe violations will likely report them to the enforcement officials within these entities. Violations may lead to fines and/or other penalties. Therefore, it will be beneficial for Commercial Washers to ensure that they are conducting their operations in compliance with these requirements.

## ATTACHMENT A

### EXCERPT FROM STORM WATER ORDINANCE PERTAINING TO DISCHARGE PROHIBITIONS

#### Division II.

##### Discharge Prohibitions.

###### Section 9. Prohibition of Illegal Discharges.

No person shall discharge or cause to be discharged into the municipal storm drain system or watercourses any materials, including but not limited to pollutants or waters containing any pollutants that cause or contribute to a violation of applicable water quality standards, other than storm water.

Illegal discharges from industrial and/or commercial activities include, but are not limited to, the following, and are prohibited, unless the discharge is permitted under a separate NPDES permit or as allowed by BMPs published or approved by the City Public Works Department.

- a. Water from the cleaning of gas stations, vehicle service garages, or other types of vehicle service facilities.
- b. Water, cleansers, or solvents from the cleaning of vehicles, machinery or equipment, and other such commercial and industrial operations.
- c. Water from the washing or rinsing of vehicles containing soap, detergents, solvents, or other cleaners.
- d. Water from the washing or rinsing of vehicles, with or without soap, from auto body repair shops.
- e. Water from the cleaning or rinsing of vehicle engine, undercarriage, or auto parts cleaning.
- f. Vehicle fluids.
- g. Mat wash and hood cleaning water from food service facilities.
- h. Food and kitchen cleaning water from food service facilities.
- i. Leakage from dumpsters or trash containers.
- j. Water from the cleaning or rinsing of garbage dumpster areas and areas where garbage is stored or contained.
- k. Water from pressure washing, steam cleaning, and hand scrubbing of sidewalks, gutters, plazas, alleyways, outdoor eating areas, steps, building exteriors, walls, driveways, and other outdoor surfaces.

- l. Wastewater or cleaning fluids from carpet cleaning.
- m. Swimming pool and spa water;
- n. Wash out from concrete trucks;
- o. Runoff from areas where hazardous substances, including diesel fuel, gasoline and motor oil are stored, except as allowed by Chapter 6.50 of this code.
- p. Super-chlorinated water normally associated with the disinfection of potable water systems.

The discharge of sewage or other forms of polluted water from recreational activities including boating and camping, and from recreational vehicles and boats, to the municipal storm drain system or watercourses is prohibited.

The commencement, conduct or continuance of any illegal discharge to the storm drain system is prohibited except as described as follows:

- (a) Discharges from the following activities will not be considered a source of pollutants to the storm drain system and to waters of the U.S. when properly managed to ensure that no potential pollutants are present, and therefore they shall not be considered illegal discharges unless determined to cause a violation of the provisions of the Porter-Cologne Act, Clean Water Act, or this ordinance:
  - 1. Water line flushing;
  - 2. Landscape irrigation;
  - 3. Diverted stream flows;
  - 4. Rising ground waters;
  - 5. Uncontaminated ground water infiltration (as defined at 40 CFR §35.2005(20)) to separate storm sewers;
  - 6. Uncontaminated pumped ground water;
  - 7. Discharges from potable water sources;
  - 8. Foundation drains;
  - 9. Air conditioning condensation;
  - 10. Irrigation water;
  - 11. Springs;
  - 12. Water from crawl space pumps;
  - 13. Footing drains;
  - 14. Lawn watering;
  - 15. Individual residential car washing;
  - 16. Flows from riparian habitats and wetlands
  - 17. Dechlorinated swimming pool discharges
  - 18. Flows from fire fighting activities

**ATTACHMENT B**

**BMPS**

# **BMPS APPLICABLE TO MOBILE CAR WASHERS AND CAR DETAILERS**

The Goal and Purpose of these BMPs is to minimize or prevent the discharge of pollutants into storm drains from vehicle and equipment cleaning operations by either (1) discharging wash waters to the sanitary sewer, (2) containing wash water for offsite disposal, or (3) directing wash water (without cleaners) to landscaped areas.

## **Use These Best Management Practices:**

**BMP-1 Planning:** Determine what collection method you will be using and where you are going to discharge wash water before starting a new job. Identify where all storm drains are located in the vicinity of the jobsite. Never discharge wastewater into a street, ditch, storm drain, or maintenance hole. Obtain all necessary permits and authorizations. If you are going to discharge into the sanitary sewer system at the job site, or on unpaved areas at the job site, always obtain the property owner's permission.

**BMP-2 Pre-Clean the Work Area:** Before starting work sweep or vacuum the work area to pick up litter, trash, debris, dirt, and other materials which could become mixed in with the wash water. Use absorbents (such as rags, absorbent mats or pads, rice hull ash, cat litter, vermiculite, or sand) to pick up greasy or oily materials and spills. Waste materials from pre-cleaning may often be disposed of in the trash. Check with the local solid waste authority to be sure. Rags may be sent to an industrial laundry. Know which pre-cleaning wastes may be hazardous wastes. If there is any question as to whether a wash water, or waste material, is considered to be a hazardous material, check with the Monterey County Division of Environmental Health to make this determination and properly dispose of these materials.

**BMP-3 Washing and Detailing:** Minimize the amount of water used during washing and detailing to reduce the amount of wash water that will need to be disposed. Avoid cleaning products that contain hazardous substances (e.g. hydrofluoric acid, muriatic acid, sodium hydroxide, bleach, etc.) that can create hazardous waste. When possible, avoid using soap and solvents- even biodegradable soap is harmful to the environment. If soap is used, use phosphate-free, non-toxic, biodegradable soap. Any soap, including those labeled "biodegradable" does not belong in creeks, ocean or ground-water. They are harmful to aquatic life and should never be misconstrued as safe for direct disposal to surface waters (i.e., storm drains).

**BMP-4 Wash Water Containment and Collection:** Contain and collect the wash water and dispose of it as described below. Decide what is the best method of collection (e.g., berms, storm drain cover mats, containment pools, vacuums/pumps, vacuum boom, inflatable pipe plug, etc). Locate property high and low spots to determine where wash water can be pooled for collection.

Wash water that contains visible debris or residue, soap, detergent or other cleaning agents, hazardous waste, or excessive amounts of any pollutant, may not be left on paved surfaces to evaporate because the residues will eventually be discharged to the storm drain system. However, small amounts of wash water that cannot reasonably be collected may be allowed to evaporate on a paved surface.

Wash water from the rinsing of new or used vehicles for dust removal only, using no soap may be discharged to the storm drain or and unpaved area, if the wash water does not flow through oil deposits or other surface contaminants.

Promptly clean up any spill of liquid or solid wastes. Do not hose down an area to clean up a spill, unless the liquid will be completely contained, cleaned up and disposed of to sanitary sewer or offsite as appropriate for the waste type.

If Possible, Either:

1. Use a designated wash area that is paved and protected by permanent or movable berms, dikes, and mats. Contain the wash-water and vacuum it up or otherwise collect it for disposal. Do not allow wash water to leave the property. If the driveway is an avenue for runoff it must be bermed to contain the wash-water.

OR

2. Conduct washing and detailing on a pervious unpaved area such as lawn, dirt, or gravel so that the wash water will be retained and percolate within these areas. Keep washing activities away from storm drains or water conveyances, so that the wash water will infiltrate into the ground and not flow to the storm drains or creeks. This option applies to sites where only one or two vehicles are cleaned every couple of weeks. Do not use this option just before or after a rainstorm.

If Neither of These Approaches is Feasible:

Collect and contain the wash water and prevent it from flowing into any storm drains by sealing or plugging them, or by protecting them with a berm or other means. For information about containing wash water, see the Section titled “*Devices That May be Used to Contain and Collect Wash Water.*”

**BMP-5 Wash Water Disposal:** Do not discharge wash water to storm drain. Once wash water has been collected, either (1) discharge it to the sanitary sewer, or septic system via the sanitary sewer clean-out or sanitary sewer inlet at the point of generation (job site), (2) discharge it to landscaping or other suitable unpaved areas, or (3) collect it in a container for later disposal at an appropriate off-site location. Such locations could include a liquid waste receiving facility at a municipal wastewater treatment plant, such as MRWPCA’s Regional Treatment Plant located north of the City of Marina, or the sanitary sewer at the pressure washer’s place of business using the sewer clean out. Use of disposal options (1) and (2) require the property owner’s permission.

Discharges to the sanitary sewer must comply with the discharge requirements of the appropriate wastewater authority. The requirements of the two principal wastewater authorities within the area covered by the Monterey Regional Storm Water Management Program (MRSWMP) are described in the Section titled “*Requirements for Discharge to the Sanitary Sewer.*”

When cleaning surfaces such as buildings and decks without loose paint, sidewalks, or plazas without soap, thorough dry cleanup should normally be sufficient to allow the wash water to be discharged to the sanitary sewer without pretreatment. However, if any debris is present in the wash water it should first pass through a “20 mesh” or finer screen to remove the material before discharging it to the sanitary sewer. The material that is removed should be disposed of in the trash.

Discharges of wash water to a septic system must be approved by the Monterey County Division of Environmental Health. Discharges that contain hazardous waste, have the potential to harm septic systems, or are likely to contaminate groundwater, *will not* be approved.

With the property owner's permission wash water can sometimes be disposed of to landscaping or other unpaved areas. If this means of disposal is being considered, first check the slope of the intended disposal area to be sure there will be no runoff into a street, gutter, or waterway. Also, ensure that the wash water will not create a nuisance condition or contain food products or contaminants (i.e. solvents, cleaners, oils, metals, etc.) that may constitute a hazardous waste. If disposal to landscaped areas is being considered, avoid damage to plants and soil by minimizing or eliminating the use of soaps, detergents, and chemicals. In addition, minimize the use of water to avoid wash water overflowing from these areas. Repeated discharges to landscaped areas may result in an accumulation of contaminants, thus damaging vegetation and increasing contaminant levels in the soil. If the soil is very dry, wet it down thoroughly before discharging, so that wash water will soak into the soil instead of running off to the street, gutter, or storm drain. Wash water disposal to land must not create a nuisance condition. Wash water containing garbage, food wastes, or visible trash may not be discharged to land.

Be sure to read cleaning product labels before disposing of wash water. Follow use and disposal instructions carefully. If there is any question as to whether a wash water, or waste material, is considered to be a hazardous material, check with the Monterey County Division of Environmental Health to make this determination and properly dispose of these materials. Depending on the condition of the surface being cleaned, the wastewater generated could be classified as hazardous waste. Some examples include:

- Wastewater generated from parking lots, storage areas, and gas stations may contain oil, gas, solvents, antifreeze, metals, and/or pesticides.
- Washing building exteriors with paint made prior to 1978 may contain lead.

Generating hazardous waste may dramatically increase operating costs and limit disposal options. Contact the Monterey County Division of Environmental Health for more information on hazardous waste determination and disposal.

## **BMPS APPLICABLE TO THE WASHING AND/OR CLEANING OF EXTERIOR SURFACES, E.G. SIDEWALKS, PARKING LOTS, BUILDING EXTERIORS, ETC.**

The Goal and Purpose of these BMPs is to minimize or prevent the discharge of pollutants into storm drains from washing and/or cleaning operations by either (1) discharging wash waters to the sanitary sewer, (2) containing wash water for offsite disposal to a suitable discharge facility, or (3) directing wash water to landscaped or other unpaved areas.

These BMPs apply to cleaning and/or power washing of surfaces including, but not limited to, sidewalks and plazas; parking areas; driveways, drive-throughs; restaurant/food handling cleaning and storage areas; building exteriors, roofs and decks; painted surfaces being cleaned to remove paint or graffiti; and graffiti removal.

### **Use These Best Management Practices:**

**BMP-1 Planning:** Determine what collection method you will be using and where you are going to discharge wastewater before starting a new job. Identify where all storm drains are located in the vicinity of the jobsite. Never discharge wastewater into a street, ditch, storm drain, or maintenance hole. Obtain all necessary permits and authorizations. If you are going to discharge into the sanitary sewer system at the job site, or on unpaved areas at the job site, always obtain the property owner's permission.

**BMP-2 Surface Pre-Cleaning:** Before washing use dry methods for surface pre-cleaning whenever possible. In many cases the amount of wash water that will need to be collected and disposed of can be reduced, if this process is followed:

1. Use absorbents (such as rags, absorbent mats or pads, rice hull ash, cat litter, vermiculite, or sand) to pick up greasy or oily materials and spills.
2. Sweep or vacuum to pick up litter, trash, debris, dirt, and used absorbents.
3. Waste materials from dry cleanup such as absorbents, paint chips, etc. may often be disposed of in the trash. Check with the local solid waste authority to be sure. Rags may be sent to an industrial laundry. Know which pre-cleaning wastes may be hazardous waste

**BMP-3 Washing and Cleaning:** Minimize the amount of water used during washing and cleaning to reduce the amount of wash water that will need to be disposed. Avoid cleaning products that contain hazardous substances (e.g. hydrofluoric acid, muriatic acid, sodium hydroxide, bleach, etc.) that can create hazardous waste. Avoid acidic, caustic, and other products that may damage paved or coated surfaces. When possible, avoid using soap - even biodegradable soap is harmful to the environment. Before using soap, test to see whether hot water under pressure will do the job. Avoid using solvent-based cleaners (especially chlorinated solvent cleaners).

Beware of pressure washing surfaces that contain lead-based paint, or areas with freestanding liquids (e.g. oil, solvents, antifreeze, etc.). Pressure washing these types of surfaces may generate hazardous waste (e.g., lead-based paint chips, oil/grease, hydrofluoric acid, muriatic acid, etc.). Generating hazardous waste may dramatically increase your operating costs and limit your disposal options. For more information on hazardous waste determination call the Monterey County Division of Environmental Health at (831) 647-7654 or 755-4511.

**BMP-4 Wash Water Containment and Collection:** Contain and collect the wash water and dispose of it as described below. Decide what is the best method of collection (e.g., berms, storm drain cover mats, containment pools, vacuums/pumps, vacuum boom, inflatable pipe plug, etc). Locate property high and low spots to determine where wash water can be pooled for collection.

A simple and acceptable method for collecting wash water on private property requires only a drain plug, small sump pump, and a length of hose. If a small parking-lot-type catch basin is available, remove the grate, plug the drain pipe (usually 2, 3, or 4 inches in diameter), and place the pump in the catch basin, attached to a garden hose which will discharge to disposal (see section below regarding disposal). Vacuum booms are another option for capturing and collecting wash water. Sand bags can be used to create a barrier around storm drains, and plugs or rubber mats can be used to seal storm drain openings. Other common equipment used for containing and collecting wash water generated during pressure washing activities include: vacuum pumps, booms/berms, portable containment areas, weighted storm drain covers, oil/water separators, holding tanks, portable sump pumps, absorbents, and more. These are described in more detail below.

Avoid mixing non-hazardous wash water with wash water known to contain hazardous levels of pollutants. This will increase the volume of waste that requires treatment and/or disposal as a hazardous waste, thus increasing disposal costs. Do not leave areas of wash water on paved surfaces for evaporation. Sweep up any visible solids and sediments remaining after all the wash water has been collected.

Surface cleaning wastewater that contains visible debris or residue, soap, detergent or other cleaning agents, hazardous waste, or excessive amounts of any pollutant, may not be left on paved surfaces to evaporate because the residues will eventually be discharged to the storm drain system.

For additional information about containing wash water, see the Section titled “*Devices That May be Used to Contain and Collect Wash Water.*”

**BMP-5 Wash Water Disposal:** Do not discharge wash water to storm drain. Once wash water has been collected, either (1) discharge it to the sanitary sewer, or septic system via the sanitary sewer clean-out or sanitary sewer inlet at the point of generation (job site), (2) discharge it to landscaping or other suitable unpaved areas, or (3) collect it in a container for later disposal at an appropriate off-site location. Such locations could include a liquid waste receiving facility at a municipal wastewater treatment plant, such as MRWPCA’s Regional Treatment Plant located north of the City of Marina, or the sanitary sewer at the pressure washer’s place of business using the sewer clean out. Use of disposal options (1) and (2) require the property owner’s permission.

Discharges to the sanitary sewer must comply with the discharge requirements of the appropriate wastewater authority. The requirements of the two principal wastewater authorities within the area covered by the Monterey Regional Storm Water Management Program (MRSWMP) are described in the Section titled “*Requirements for Discharge to the Sanitary Sewer.*”

When cleaning surfaces such as buildings and decks without loose paint, sidewalks, or plazas without soap, thorough dry cleanup should normally be sufficient to allow the wash water to be discharged to the sanitary sewer without pretreatment. However, if any debris is present in the wash water it should first pass through a “20 mesh” or finer screen to remove the material before discharging it to the sanitary sewer. The material that is removed should be disposed of in the trash.

Discharges of surface cleaning wastewater to a septic system must be approved by the Monterey County Division of Environmental Health. Discharges that contain hazardous waste, have the potential to harm septic systems, or are likely to contaminate groundwater, *will not* be approved.

With the property owner's permission wash water can sometimes be disposed of to landscaping or other unpaved areas. If this means of disposal is being considered, first check the slope of the intended disposal area to be sure there will be no runoff into a street, gutter, or waterway. Also, ensure that the wash water will not create a nuisance condition or contain food products or contaminants (i.e. solvents, cleaners, oils, metals, etc.) that may constitute a hazardous waste. If disposal to landscaped areas is being considered, avoid damage to plants and soil by minimizing or eliminating the use of soaps, detergents, and chemicals. In addition, minimize the use of water to avoid wash water overflowing from these areas. Repeated discharges to landscaped areas may result in an accumulation of contaminants, thus damaging vegetation and increasing contaminant levels in the soil. If the soil is very dry, wet it down thoroughly before discharging, so that wash water will soak into the soil instead of running off to the street, gutter, or storm drain. Wash water disposal to land must not create a nuisance condition. Wash water containing garbage, food wastes, or visible trash may not be discharged to land.

Be sure to read cleaning product labels before disposing of wash water. Follow use and disposal instructions carefully. If there is any question as to whether a wash water, or waste material, is considered to be a hazardous material, check with the Monterey County Division of Environmental Health to make this determination and properly dispose of these materials. Depending on the condition of the surface being cleaned, the wastewater generated could be classified as hazardous waste. Some examples include:

- Wastewater generated from parking lots, storage areas, and gas stations may contain oil, gas, solvents, antifreeze, metals, and/or pesticides.
- Washing building exteriors with paint made prior to 1978 may contain lead.

Generating hazardous waste may dramatically increase operating costs and limit disposal options. Contact the Monterey County Division of Environmental Health for more information on hazardous waste determination and disposal.

## **ATTACHMENT C**

### **EXAMPLES OF DEVICES THAT MAY BE USED TO CONTAIN AND COLLECT WASH WATER**

## EXAMPLES OF DEVICES THAT MAY BE USED TO CONTAIN AND COLLECT WASH WATER

The following are examples of devices that may be used to contain and collect wash water. The collection devices described are not endorsed and are only provided as a reference tool. In addition, there may be other containment devices available, which are not listed. Note: When working with electrical equipment in wet environments, it is important to understand and comply with applicable health/safety and electrical codes, and well as utilize appropriate safety equipment (e.g. Ground Fault Interrupters, etc.)

For information about where equipment and materials of these types can be obtained, see the Section titled “*Sources of Equipment and Supplies.*”

### *Berms*

Berms may be used to prevent wastewater from entering a storm drain by placing a protective barrier around the storm drain inlet, thus allowing wastewater to pool around the inlet prior to proper collection and disposal. This type of containment may be less effective or ineffective when the storm drain is located at the bottom of a slope and/or a large amount of wastewater is generated.



### *Storm Drain Covers/Mats*

These devices are placed on top of the storm drain cover grate, creating a quick seal, thus preventing wastewater from entering the storm drain system.

#### *Storm drain covers/mats*

(magnetic vinyl mats, PVC drain covers, polyurethane mats, and others) allow wastewater to accumulate on top of it until the pressure washing activity is complete and the wash water can be collected for proper disposal. Storm drain covers/mats are frequently used along with a vacuum device that diverts wastewater into the sanitary sewer.



### *Containment Pools*

A portable or temporary containment pool is another option which may be used to collect

Wash water. Containment pools are easy to assemble, provide an immediate work area, and allow wash water to be collected in a manner that will prevent pollutants from entering the storm drain system. Containment pools vary in size and material and can also be used for washing equipment and vehicles.



### *Vacuums/Pumps*

Devices such as wet/dry vacuums, sump pumps, and vacuum pumps may be used to collect and dispose of wash water after pressure washing. Vacuum devices typically have an extension (vacuum boom)



which allows the water to be collected efficiently. In addition, many vacuum devices are equipped with a hose that can run from the pump to the sanitary sewer, a treatment device, or a holding tank depending on the disposal method.

### *Vacuum Boom*

Vacuum booms are an attachment for the vacuum device. The boom typically rests flush on the ground and draws wastewater through small holes on the bottom of the boom. In addition, different varieties of vacuum booms are available for areas with steep slopes or rough terrain.



### *Inflatable Pipe Plug*

Inflatable pipe plugs prevent wash water from entering a storm drain system by blocking the pipe leading from the drain inlet. Unlike the storm drain mats/covers that block the storm drain grates, the inflatable pipe plug is inserted into the storm drain pipe and uses the inlet structure beneath the grate to collect the wash water. Once inserted, the plug is inflated to make a snug fit. Once the wash water has been contained, it can be collected and disposed by using a portable pump device. Note: inflatable pipe plugs should only be used in storm drains on private property. They are not authorized to be used in public storm drain inlets or pipes.



**ATTACHMENT D**

**REQUIREMENTS FOR DISCHARGE TO THE SANITARY SEWER**

## **REQUIREMENTS FOR DISCHARGE TO THE SANITARY SEWER**

To be in compliance with environmental regulations, proper disposal of surface cleaning wastewater depends on the nature of the pollutants in the wastewater. It is the responsibility of the generator to determine the proper collection and disposal method for this wastewater. To avoid unanticipated costs, delays, and violations, this determination should always be made prior to starting any job. All disposal methods are subject to requirements, restrictions, and prohibitions outlined below.

Discharges may only be made to the sanitary sewer system at the customer's site, and with the customer's permission, or at the service provider's facility, through a private connection such as an onsite sink, toilet, or lateral cleanout, at a flow rate that will not cause an overflow or backup of the system. No discharges may be made to a manhole or other sanitary sewer access point within the public right-of-way.

Discharges must be in compliance with the wastewater authority's Sewer Use Ordinance, or other applicable regulations of the authority. For the Monterey Regional Water Pollution Control Agency (MRWPCA), the applicable Ordinances are MRWPCA's Sewer Use Ordinance 92-02 and Sewer Use Ordinance 93-03, which amended Ordinance 92-02. For the Carmel Area Wastewater District (CAWD), the applicable Ordinance is CAWD's Ordinance 91-03.

The following are pertinent excerpts from MRWPCA's Sewer Use Ordinance 93-03, which amended Ordinance 92-02, describing the kinds of materials that may not be discharged to the sanitary sewer within the area served by MRWPCA:

*11§2.10.1 No person shall discharge wastewater containing in excess of:*

- 0.42 mg/l arsenic*
- 3.4 mg/l cadmium*
- 4.3 mg/l copper*
- 0.73 mg/l cyanide*
- 3.0 mg/l lead*
- 0.018 mg/l mercury*
- 3.5 mg/l nickel*
- 2.3 mg/l silver*
- 2.7 mg/l total chromium*
- 2.6 mg/l zinc*

***b) Section 2.10.2 Amended.***

*Section 2.10.2 is hereby deleted in its entirety and replaced and amended with a new section, to read as follows:*

***11§2.10. 2 No person shall discharge any wastewater:***

- a) Having a temperature higher than 150 F (65.50 C).*
- b) Having a pH lower than 6.0 or higher than 10.5.*
- c) Containing in excess of 8.1 mg/l phenolic compounds.*
- d) Containing toxic inorganic pollutants in such quantities to cause or to contribute significantly to: 1) impairment of treatment plant worker safety; 2) disruptions of treatment plant-operations; 3) exceedances of plant NPDES discharge limitations, or 4) violations of plant sludge disposal restrictions. Significant dischargers of toxic inorganics shall implement best practicable technologies for reducing the toxic organics content of their discharges.*
- e) Containing toxic organic chemicals in such quantities to cause or to contribute significantly to: 1) impairment of treatment plant worker safety; 2) disruptions of treatment plant operations; 3) exceedances of plant NPDES discharge limitations; 4) violations of plant sludge*

*disposal restrictions; or 5) violations or air toxics regulations. Significant dischargers of toxic organics shall implement best practicable technologies for reducing the toxic organics content of their discharges.*

*f) Containing oil and grease of animal, vegetable, petroleum or mineral origin in such quantities to cause or to contribute significantly to: 1) disruptions of sewer lines and other collection system components; 2) interference with treatment plant operations, or 3) exceedances of plant NPDES discharge limitations. Significant dischargers of oil and grease shall implement best practicable technologies for reducing the oil and grease content of their discharges.*

*g) Containing ammonia in such quantities to cause or to contribute significantly to: 1) impairment of treatment plant worker-safety; 2) disruptions of treatment plant operations; 3) exceedances of plant NPDES discharge limitations; or 4) violations of plant sludge disposal restrictions. Significant dischargers of ammonia shall implement best practicable technologies for reducing the ammonia content of their discharges.*

*h) Containing BOD and/or TSS in such quantities to cause or to contribute significantly to: 1) disruptions of treatment plant operations; or 2) exceedances of plant NPDES discharge limitations for BOD/TSS. Significant dischargers of BOD and TSS shall implement best practicable technologies for reducing the BOD/TSS content of their discharges.*

The following are pertinent excerpts from CAWD's Pretreatment Ordinance 91-03 describing the kinds of materials that may not be discharged to the sanitary sewer within the area served by CAWD:

### **2.1.1 General Discharge Prohibitions**

*No User shall discharge or cause to be discharged to the District's sewerage systems, or to any public sewer that directly or indirectly connects to the District's sewerage system, any waste which will interfere with the operation or performance of the POTW—and or may have an adverse or harmful effect on sewers, maintenance personnel, personnel or equipment, treatment plant processes or the quality of treatment plant effluent or residue, public or private property, or wastes which may otherwise endanger the public, the environment, or create a public nuisance. No User shall discharge or cause to be discharged to the District's sewerage systems, or to any public sewer that directly or indirectly connects to the District's sewerage systems, any wastes which adversely affect water reclamation processes or the quality of reclaimed water, cause or contribute to a violation of any National Pollutant Discharge Elimination System (NPDES) requirements, or place the District in noncompliance with any of the statutory authorities listed in Title 40, Code of Federal Regulations (CFR), whether or not the User is subject to National Categorical Pretreatment Standards or any other National, State, or local Pretreatment Standards or Requirements.*

*No User shall discharge or cause to be discharged to a public sewer, which directly or indirectly connects to the District's sewerage systems, the following wastes or wastes in quantities or concentrations in excess of the following restrictions:*

- (a) Any liquids, solids or gases which by reason of their nature or quantity are, or may be, sufficient either alone or by interaction with other substances to cause fire or explosion or be injurious in any other way to the sewerage system, the POTW, or to the operation of the POTW. This includes but is not limited to waste streams with a closed cup flashpoint of less than 104/F or 60 /C using the test methods specified in 40 CFR 261.21. At no time, shall two successive readings on an explosion hazard meter, at the point of discharge into the system or at any point in the system be more*

than ten percent (10%) nor any single reading over twenty percent (20%) of the Lower Explosive Limit (LEL) of the meter. Prohibited materials include, but are not limited to, gasoline, kerosene, naphtha, benzene, toluene, xylene, ethers, alcohols, ketones, aldehydes, solvent, fuel oil, peroxides, chlorates, perchlorates, bromates, carbides, hydrides and sulfides and any other substances which the District, the State or EPA has notified the User is a fire hazard or a hazard to the system.

- (b) Solid or viscous substances which may cause obstruction to the flow in a sewer or other interference with the operation of the wastewater treatment facilities such as, but not limited to: grease, any garbage or waste, other than domestic wastewater, that is not ground sufficiently to pass through a 3/8 inch screen, dead animals, animal guts or tissues, paunch manure, bones, hair, hides or fleshing, entrails, whole blood, feathers, offal, ashes, cinders, sand, spent lime, stone or marble dust, metal, glass, straw, industrial process shavings, diatomaceous earth, grass clippings, rags, spent grains, spent hops, wood, plastics, tar, asphalt residues, mud, or glass grinding wastes or polishing wastes, paper dishes, paper cups, milk containers or other similar paper products whole or ground or materials which tend to solidify in the sewer and obstruct wastewater flow.
- (c) Any wastewater having a pH less than 6.0, a pH greater than 8.5, or having any other corrosive or detrimental characteristics capable of causing damage or hazard to the sewerage system or to structures, equipment, and/or personnel of the POTW.
- (d) Any wastewater containing toxic or poisonous solids, liquids or gas pollutants in sufficient quantity, either singly or by interaction with other pollutants, to injure or interfere detrimentally with any wastewater treatment process, constitute a hazard to humans, animals, or the environment, create a toxic effect in the receiving waters of the POTW, cause a public nuisance, cause any hazardous condition to occur in the sewerage system, or to exceed the limitation set forth in a Categorical Pretreatment Standard. A toxic pollutant shall include but not be limited to any pollutant identified pursuant to Section 307(a) of the Act.
- (e) Any wastewater containing toxic pollutants which result in the presence of toxic gases, vapors or fumes within the POTW and/or the sewerage system in a quantity that may cause acute worker health and safety problems.
- (f) Any waste containing excessive quantities or concentrations as defined by the General Manager of petroleum or mineral based cutting oils, commonly called soluble oil which form persistent water emulsions.
- (g) Any waste containing excessive quantities or concentrations which result in the clogging or plugging of the collection system or as defined by the General Manager of dispersed biodegradable oils, fats, and greases, such as lard, tallow or vegetable oil.
- (h) Any wastes containing excessive quantities or concentrations of the following parameters: iron, boron, cyanide, chromium, phenols, plastic resins, copper, nickel, zinc, lead, mercury, cadmium, selenium, silver, arsenic; or any other materials toxic to humans, animals, the local environment or to biological wastewater treatment processes.

- (i) *Any noxious or malodorous liquids, gases, or solids which either singly or by interaction with other wastes are sufficient to create a public nuisance or hazard to life or are sufficient to prevent entry into the sewers for maintenance and repair.*
- (j) *Any substance which may cause the POTW's effluent or any other product of the POTW as residues, sludge, or scum, to be unsuitable for reclamation and reuse or to interfere with the reclamation process. In no case, shall a substance discharged to the POTW cause the POTW to be in non-compliance with sludge use or disposal criteria, guidelines or regulations developed under Section 405 of the Act; any criteria, guidelines, or regulations affecting sludge use or disposal developed pursuant to the Solid Waste Disposal Act, the Clean Air Act, the Toxic Substances Control Act, or State criteria applicable to the sludge management method being used.*
- (k) *Any substance which will cause the POTW to violate its NPDES and/or State Disposal System Permit or the receiving water quality standards.*
- (l) *Any wastewater with objectionable color not removed in the treatment process, producing discoloration of the POTW's effluent such as, but not limited to, dye wastes and vegetable tanning solutions.*
- (m) *Any wastewater having a temperature of 60/C (140/F) or higher, or which may cause the temperature of the treatment plant influent to exceed 40/C (104/F).*
- (n) *Any wastes with a concentration of chlorine in excess of 10 mg/L.*
- (o) *Any waste containing excessive quantities or concentrates of toxic aromatic hydrocarbons, chlorinated hydrocarbon or organic phosphorous-type compounds.*
- (p) *Any waste containing substances that may precipitate, solidify, gel, polymerize or become viscous under conditions normally found in the sewerage system.*
- (q) *Any garbage or waste, other than domestic wastewater, that is not ground sufficiently to pass through a 3/8 inch mesh screen.*
- (r) *Any waste containing excessive quantities or concentrations [as defined by the General Manager] of detergents, surface active agents, or other substances, which may cause foaming in the wastewater system.*
- (s) *Any waste containing excessive quantities or concentrations of fluorides, sulfates, borates or any other materials that can pass through treatment facilities and degrade water quality or limit reuse of the wastewater.*
- (t) *Any waste containing excessive quantities or concentrations, as defined by the General Manager, of ammonia.*
- (u) *Any waste containing excessive quantities or concentrations, as defined by the General Manager, of cyanide.*
- (v) *Any waste containing excessive quantities or concentrations, as defined by the General Manager, of undissolved or dissolved solids.*

- (w) *Any waste containing excessive quantities or concentrations, as defined by the General Manager, of BOD, COD, or other oxygen demanding substances.*
- (x) *Any waste containing excessive quantities or concentrations, as defined by the General Manager, of mercaptans, sulfides, phenols, or any strongly odorous material or material tending to create odors.*
- (y) *Any wastes containing dissolved sulfides above a concentration of 0.1 mg/L or wastes which contribute to excessive sulfide production, as defined by the General Manager.*
- (z) *Any amount of Hazardous Substance in excess of those defined in Section 1.2 of this Ordinance.*
- (aa) *Any hazardous waste discharged to any portion of the POTW or treatment plant by truck, rail or dedicated pipe line.*
- (ab) *Any pollutants, including oxygen demanding pollutants (BOD, etc.) released at a flow rate and/or pollutant concentration which a User knows or has reason to know will cause Interference to the POTW. In no case shall a slug load have a flow rate or contain concentration or qualities or pollutants that exceed for any time period longer than fifteen (15) minutes more than five (5) times the average twenty-four (24) hour concentration, quantities, or flow during normal operation.*
- (ac) *Any wastewater containing any radioactive wastes or isotopes of such half life or concentration as may exceed limits established by the General Manager in compliance with applicable State or Federal regulations.*
- (ad) *Any wastewater which causes a hazard to human life or creates a public nuisance.*

## **2.5 Federal Categorical Pretreatment Standards**

*Upon the promulgation of the Federal Categorical Pretreatment Standards for a particular industrial categorical, the Federal Standard, if more stringent than limitations imposed under this Ordinance for sources in that subcategory, shall immediately supersede the limitations imposed under this Ordinance. The General Manager shall notify all affected Users of the applicable reporting requirements under 40 CFR, Section 403.12.*

**ATTACHMENT E**

**RESOURCES FOR MORE INFORMATION ON COLLECTION AND  
CONTAINMENT DEVICES AND RELATED EQUIPMENT AND  
SUPPLIES**

## **RESOURCES FOR MORE INFORMATION ON COLLECTION AND CONTAINMENT DEVICES AND RELATED EQUIPMENT AND SUPPLIES**

Delco Cleaning Systems of Fort Worth  
2513 Warfield Street, Fort Worth, Texas 76106-7554  
U.S./Canada Wats: 800-433-2113, Fax: 817-625-2059, Local: 817-625-4213  
email: delco@dcs1.com  
<http://www.dcs1.com>

Power Washers of North America (PWNA )  
P.O. Box 469, Wood Dale, IL 60191 • Fax 1.651.699.6709  
Toll Free: 1-800-393-7962  
<http://www.ThePWNA.org>  
Email: info@ThePWNA.org

United Association of Mobile Contract Cleaners  
Phone: 817-529-6630 or 1-800-211-0290  
Fax: 817-624-4409  
Address: 2513 Warfield Street, Fort Worth, TX 76106  
<http://www.uamcc.org/>  
Email: info@uamcc.org or webmaster@uamcc.org

Cleaning Equipment Trade Association  
1601 North Bond Street, Suite 303  
Naperville, IL 60563  
Toll Free: 800-441-0111  
Phone: 630-369-7784  
Fax: 630-369-3773  
<http://www.ceta.org/contact.html>

The International Carwash Association  
401 N. Michigan Ave., Suite 2200  
Chicago, IL 60611  
phone: 888-ICA-8422  
email: info@CarCareCentral.com  
<http://www.carcarecentral.com/>

New Pig Corporation  
Public Relations  
One Pork Avenue  
P.O. Box 304  
Tipton, PA 16684-0304  
[www.newpig.com](http://www.newpig.com)

Lab Safety  
Supply 1-800-356-0783  
[www.labsafety.com](http://www.labsafety.com)

C&H Distributors, LLC.  
770 South 70th Street  
P.O. Box 14770  
Milwaukee, WI 53214-0770  
Phone:1-800-558-9966  
[www.chdist.com](http://www.chdist.com)

W.W. Grainger 1-408-433-9889  
[www.grainger.com](http://www.grainger.com)

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