

DRAFT ATTACHMENT C
RISK LEVEL 1 REQUIREMENTS

NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM (NPDES)
GENERAL PERMIT FOR STORMWATER DISCHARGES
ASSOCIATED WITH CONSTRUCTION AND LAND DISTURBANCE
ACTIVITIES

I. RISK LEVEL 1 MINIMUM BEST MANAGEMENT PRACTICES (BMP)

Risk Level 1 dischargers shall implement and maintain all of the following minimum BMPs, to the extent feasible, to reduce or prevent pollutants in construction stormwater discharges.

A. Good Site Management "Housekeeping"

1. Risk Level 1 dischargers shall implement good site management (i.e., "housekeeping") measures for construction materials that could potentially be a threat to water quality if discharged or exposed to stormwater. At a minimum, to the extent feasible, Risk Level 1 dischargers shall implement the following good housekeeping measures:
 - a. Identify and protect the products used and/or expected to be used and the end products that are produced and/or expected to be produced from exposure to stormwater. This does not include materials and equipment that are designed to be outdoors and exposed to environmental conditions (e.g., poles, equipment pads, cabinets, conductors, insulators, bricks, etc.);
 - b. Apply appropriate BMPs to erodible stockpiled construction materials (e.g., soil, spoils, aggregate, fly-ash, stucco, hydrated lime, etc.) to prevent erosion;
 - c. Store chemicals in watertight containers with appropriate secondary containment to prevent any spillage or leakage or in a completely enclosed storage shed;
 - d. Minimize exposure of construction materials to precipitation. This does not include materials and equipment that are designed to be outdoors and exposed to environmental conditions (e.g., poles, equipment pads, cabinets, conductors, insulators, bricks, etc.);
 - e. Implement BMPs to prevent the off-site tracking of loose construction and landscape materials; and,

- f. Prevent the discharge of plastic materials and limit the use of plastic materials when more sustainable, environmentally friendly alternatives exist. The discharger shall consider the use of plastic materials resistant to solar degradation where plastic materials are deemed necessary.
2. Risk Level 1 dischargers shall implement good housekeeping measures for waste management, which, at a minimum to the extent feasible, shall consist of the following:
 - a. Minimize the discharge of pollutants from equipment and vehicle washing, wheel wash water, masonry wash waters, and other wash waters. Wash waters must be captured and treated prior to discharge, or disposed of at a permitted facility that can accept that waste, to mitigate impacts to water quality;
 - b. Provide containment (e.g., secondary containment) of sanitation facilities (e.g., portable toilets) to prevent discharges of pollutants to the stormwater drainage system or receiving water;
 - c. Clean or replace sanitation facilities and inspect them regularly for leaks and spills;
 - d. Keep debris or trash in waste containers if it is subject to transport from the site by wind or runoff;
 - e. Cover waste disposal containers at the end of every business day and during a precipitation event;
 - f. Prevent discharges from waste disposal containers to the stormwater drainage system or receiving water (e.g., containers with solid bottoms and regular maintenance);
 - g. Contain and securely protect stockpiled waste material from wind and precipitation at all times unless actively being used; and,
 - h. Secure and contain concrete washout areas and other washout areas that may contain additional pollutants so there is no discharge into the underlying soil and onto surrounding areas. Washout areas shall be covered at the end of every business day and during a precipitation event.
3. Risk Level 1 dischargers shall implement good housekeeping for vehicle/equipment storage and maintenance, which, at a minimum to the extent feasible, shall consist of the following:
 - a. Containment of fuel, grease, and oil to prevent them from leaking into ground, storm drains, or surface waters;

- b. Place all equipment or vehicles, which are to be fueled, maintained, and/or stored in a designated area fitted with appropriate BMPs; and,
 - c. Clean leaks immediately and dispose of leaked materials properly.
 4. Risk Level 1 dischargers shall implement good housekeeping for landscape materials, which, at a minimum to the extent feasible, shall consist of the following:
 - a. Contain and protect stockpiled materials such as mulches and topsoil, or other erodible landscape materials, from wind and precipitation at all times unless being actively used;
 - b. Contain packaged landscape materials (e.g. fertilizers) when they are not being actively used;
 - c. Discontinue the application of any erodible landscape material at least 2 days before a forecasted precipitation event as defined in Appendix 2 or during periods of precipitation; and,
 - d. Apply erodible landscape material at quantities and rates in accordance with manufacturer recommendations or based on written specifications by knowledgeable and experienced field personnel;
 5. Risk Level 1 dischargers shall implement good housekeeping measures on the construction site to control the aerial deposition of site materials and from site operations, to the extent feasible. Such particulates can include, but are not limited to, bacteria, metals, nutrients, oil and grease, organics, sediment, and trash.
 6. Risk Level 1 dischargers shall document all housekeeping BMPs in the SWPPP in accordance with the nature and phase of the construction activities. Construction phases at traditional land development projects include demolition and pre-development site preparation phase, grading and land development phase, streets and utilities phase, vertical construction phase, and final landscaping and site stabilization phase.

B. Non-Stormwater Management

1. Dischargers shall implement the following measures to control all non-stormwater discharges during construction, to the extent feasible:
 - a. Wash vehicles in such a manner as to prevent non-stormwater discharges to surface waters or MS4 drainage systems;

- b. Clean streets in such a manner as to prevent unauthorized non-stormwater discharges from reaching surface water or MS4 drainage systems; and,
- c. Eliminate any non-stormwater discharges not authorized in Section IV.A of this General Permit's Order.

C. Preserve Existing Topsoil

1. Risk Level 1 dischargers shall implement the following practices to preserve existing topsoil, to the extent feasible:
 - a. Stockpile existing topsoil during construction and deploy when feasible to reestablish native vegetation prior to termination of coverage, and;
 - b. Stabilize disturbed topsoil during construction and as part of final stabilization Notice of Termination requirements.

D. Erosion Control

1. Risk Level 1 dischargers shall implement the following practices to eliminate or minimize site erosion, to the extent feasible:
 - a. Implement effective wind erosion control;
 - b. Preserve existing vegetation;
 - c. Schedule earthwork to minimize the amount of disturbed area during periods of high rainfall potential when feasible;
 - d. Stabilize exposed soils disturbed by construction activities by designing, installing, and maintaining BMPs that minimize erosion. Temporary or permanent BMPs shall be applied within 14 days of completing earthwork in a specific area or prior to a forecasted precipitation event, whichever is sooner;
 - e. Erosion control BMPs must be available on-site with trained staff able to deploy the product under the direction of the Qualified SWPPP Practitioner;
 - f. Reestablish vegetation or non-vegetative erosion controls as soon as practicable;
 - g. Divert up gradient run-on water from contacting areas of exposed soils disturbed by construction activities or convey run-on through the site in a manner that prevents erosion from areas of

construction and does not compromise the effectiveness of erosion, sediment, and perimeter controls;

- h. Run-on water flowing onto a managed site from off-site areas may be separated from a site's stormwater discharge to eliminate commingled contribution. Run-on diversion shall occur prior to entering an area affected by construction activity. Run-on flow diversion shall be conveyed through or around the construction activity in plastic pipe or an engineered conveyance channel in a manner that will not cause erosion due to flow diversion. Run-on combined with a site's stormwater discharge is considered a stormwater discharge.
 - i. Limit the use of plastic materials when more sustainable, environmentally friendly alternatives exist. Where plastic materials are deemed necessary, the discharger shall consider the use of plastic materials resistant to solar degradation;
 - j. Control stormwater and non-stormwater discharges to minimize downstream channel and bank erosion; and,
 - k. Control peak flowrates and total volume of stormwater and authorized non-stormwater discharges to minimize channel and streambank erosion and scour in the immediate vicinity of discharge points.
2. Risk Level 1 dischargers that stabilize soil using bonded-fiber matrices, hydromulches, spray tackifiers, or other land-applied products containing anionic or nonionic treatment chemicals shall:
- a. Apply the product according to the manufacturer's instructions and guidance; and,
 - b. Apply the product 48 hours prior to a forecasted precipitation event or according to the manufacturer's guidance, whichever is longer, to allow for ample cure time and to prevent treatment chemicals from being transported by runoff.

E. Sediment Controls

1. Risk Level 1 dischargers shall implement, to the extent feasible, the following site sediment controls:
 - a. Establish and maintain effective perimeter controls;
 - b. Stabilize all construction entrances and exits to sufficiently control erosion and sediment discharges from the site;

- c. Design, install, and maintain effective sediment controls to minimize the discharge of pollutants utilizing site-specific BMPs. Dischargers utilizing sediment basins shall complete installation prior to other land disturbing activities, when feasible; and,
- d. At a minimum, design sediment basins according to the method provided in CASQA's Construction BMP Handbook.¹

F. Surface Water Buffer

1. Provide and maintain natural buffers and/or equivalent erosion and sediment controls when a water of the U.S. is located within 50 feet of the site's earth disturbances.
2. The discharger must comply with one of the following alternatives for any discharges to waters of the U.S. located within 50 feet of a site's earth disturbances:
 - a. Provide and maintain a 50-foot undisturbed natural buffer from the edge of the disturbed area to the top of bank;
 - b. Provide and maintain an undisturbed natural buffer that is less than 50 feet and is supplemented by erosion and sediment controls that achieve, in combination, the sediment load reduction equivalent to a 50-foot undisturbed natural buffer; or
 - c. Implement erosion and sediment controls to achieve the sediment load reduction equivalent to a 50-foot undisturbed natural buffer when infeasible to provide and maintain an undisturbed natural buffer of any size.

G. Pesticide Application

1. Risk Level 1 dischargers shall only apply pesticides that have been authorized for use through California Department of Pesticide Regulation. The application of pesticides must follow manufacturer's guidance.
2. Risk Level 1 dischargers are prohibited from exposing pesticide treated soil to a precipitation event. All areas treated with pesticide including but not limited to pre-construction application of pesticide for termites

¹ California Stormwater Quality Association (CASQA), [Construction BMP Handbook](https://www.casqa.org/sites/default/files/casqa-handbook-construction/master_hanbook_file_2015_sec.pdf) (January 2015), <https://www.casqa.org/sites/default/files/casqa-handbook-construction/master_hanbook_file_2015_sec.pdf> [as of May 20, 2021] (CASQA Construction BMP Handbook)

must be covered with an impermeable barrier such as concrete or plastic sheeting prior to a precipitation event.

H. Demolition of existing structure

1. Risk Level 1 dischargers shall prevent demolition materials from being exposed to precipitation when feasible. Demolition materials should be covered with an impermeable barrier such as, but not limited to, plastic sheeting prior to precipitation to prevent known contaminants from being mobilized. Dischargers unable to cover demolished material shall sample for any non-visible pollutants in stormwater discharges that may be present such as, but not limited to, asbestos, leaded paint, or PCBs when the demolished structure² was built or renovated between January 1, 1950 and January 1, 1980.

I. Maintenance and Repair

1. Risk Level 1 dischargers shall maintain, repair, or implement design changes (review alternatives that have not been used yet) to BMPs within 72 hours of identification of failures or other shortcomings.
2. Risk Level 1 dischargers shall have all BMP maintenance and repair be performed or supervised by a Qualified SWPPP Practitioner (QSP) representing the discharger. The QSP may delegate maintenance and repair activities to personnel under their supervision appropriately trained to do the task(s).

II. RISK LEVEL 1 MONITORING REQUIREMENTS

A. General Requirements

1. The Risk Level 1 discharger shall implement the Construction Site Monitoring Program in compliance with this Section at the time of the commencement of construction activity and shall continue implementation until the project is complete and the project site is stabilized as defined in Section III.H in the Order.

B. Monitoring Exceptions

1. The Risk Level 1 discharger shall conduct visual inspections and collect samples to meet the requirements of this Attachment. The discharger is not required to physically conduct visual inspections or collect samples under the following conditions:

² "Structure", in this instance, must have been constructed with floor space (such as a building).

- a. During dangerous weather conditions such as flooding, high winds above 35 miles per hour, and electrical storms;
 - b. Outside of scheduled site operating hours; or,
 - c. When the project site is not accessible to personnel.
2. Risk Level 1 sites that are inactive may reduce the visual inspection frequency and suspend sampling per Section III.G of the Order.
 3. The Risk Level 1 discharger shall provide photo documentation and an explanation for all missed visual inspections or sampling required by this Attachment, to be included in the Annual Report.

C. Visual Inspection Requirements

1. The Risk Level 1 discharger shall perform visual inspections in accordance with Table 1 below. The purpose of visual inspections is to identify and record BMPs that need maintenance to operate effectively, that have failed, or that could fail to operate as intended. Inspectors shall be the QSD, QSP, or be trained by the QSP.

Table 1 – Visual Inspection Schedule

Risk Level	Weekly	Pre-Precipitation Event	Daily Precipitation Event	Post-Precipitation Event
1	Not Applicable	X	X	X

2. The Risk Level 1 discharger shall have a QSP conduct a pre-precipitation event inspection within 72 hours prior to any forecasted precipitation event of 0.5 inches or more in a 24-hour period. Precipitation forecast information shall be obtained from the [National Weather Service Forecast Office](https://www.weather.gov/) (e.g. by entering the zip code of the project’s location at <https://www.weather.gov/>) and must be included as part of the inspection checklist weather information. The pre-precipitation event inspection shall include an inspection of the following:
 - a. All stormwater drainage areas to identify leaks, spills, or uncontrolled pollutant sources and when necessary implement appropriate corrective actions to control pollutant sources.
 - b. All BMPs to identify whether they have been properly implemented in accordance with the SWPPP and when necessary implement appropriate corrective actions to control pollutant sources.

- c. All stormwater storage and containment areas to detect leaks and check for available capacity to prevent overflow.
3. The Risk Level 1 discharger shall conduct daily visual inspections at least once every 24-hour period during qualifying precipitation events, a precipitation event that results in at least 0.5 inches within a 24-hour period. Qualifying precipitation events are extended for each subsequent 24-hour period resulting in at least 0.25 inches of precipitation. The qualifying precipitation event ends when there are two consecutive 24-hour periods of less than 0.25 inches of precipitation. Daily precipitation event visual inspections are not required on days that result in less than 0.25 inches of precipitation.
4. The Risk Level 1 discharger shall conduct post-precipitation event visual inspections within two business days (48 hours) after each qualifying precipitation event to:
 - a. Identify if BMPs were adequately designed, implemented, and effective;
 - b. Identify BMPs that require repair or replacement due to damage; and,
 - c. Identify any additional BMPs that need to be implemented and revise the SWPPP accordingly.
5. The Risk Level 1 discharger shall conduct visual inspections during scheduled site operating hours.
6. For each required inspection, the Risk Level 1 discharger shall develop and complete an inspection checklist that, at a minimum includes:
 - a. Inspection type (pre-precipitation daily precipitation or post-precipitation event);
 - b. Inspection date and time the inspection report was written;
 - c. Weather information, including the presence or absence of precipitation, an estimate of the beginning of the precipitation event, duration of the event, time elapsed since the last storm, and the approximate amount of precipitation in inches (using an on-site measurement device or gauge);
 - d. Site information, including stage of construction, activities completed, and approximate area of the site exposed;

- e. A description of any BMPs evaluated and any deficiencies noted, including those that may have resulted in the release of non-visible pollutants;
- f. A list of the inspections of all BMPs including erosion controls, sediment controls, chemical and waste controls, and non-stormwater controls;
- g. A list of the results of visual inspections at all relevant outfalls, discharge points, downstream locations, and any projected maintenance activities;
- h. Report of the presence or absence of any floating and suspended materials, odors, discolorations, turbidity, visible sheens, and any sources of pollutants in discharges and contained stormwater;
- i. Any corrective actions required, including any necessary changes to the SWPPP and the associated implementation dates;
- j. Photographs of areas of concern and the QSP’s description of the problem, if any; and,
- k. Inspector’s name, title, and certification.

D. Water Quality Monitoring Requirements

The Risk Level 1 discharger shall collect samples of discharges in accordance with Table 2 below, to monitor water quality and assess compliance with the requirements of this General Permit. Samplers shall be the QSD, QSP, or be trained by the QSP.

Table 2 – Sample Collection Schedule

Risk Level	Stormwater Discharge Sample Collection	Receiving Water Sample Collection	Non-Visible Sample Collection (when applicable)
1	Not Applicable	Not Applicable	X

- 1. Non-Visible Pollutant Monitoring Requirements
 - a. The Risk Level 1 discharger shall implement sampling and analysis requirements to monitor non-visible pollutants associated with:
 - i. Activities producing pollutants that are not visually detectable in stormwater discharges; and,
 - ii. Activities which could cause or contribute to an exceedance of water quality objectives in the receiving waters.

- b. The Risk Level 1 discharger shall conduct sampling and analysis for non-visible pollutants when pollutants associated with construction activities have the potential to be discharged with stormwater runoff due to a failure to implement BMPs, spill, breach, malfunction, failure, and/or any BMP leak. The discharger is not required to sample if one of the conditions described above (e.g., breach or spill) occurs and is immediately cleaned of the material and pollutants and/or BMPs are implemented prior to the next precipitation or snowmelt event.
- c. The Risk Level 1 discharger shall collect at least one sample from each discharge location down-gradient from where the visual inspections triggered the monitoring.
- d. The Risk Level 1 discharger shall collect samples during the first two hours of discharge that occurs during site operating hours if possible; otherwise as close in time to the beginning of the storm event as practicable.
- e. The Risk Level 1 discharger shall collect and analyze representative discharge samples in the field or by a laboratory as specified in Section II.F of this Attachment for the following:
 - iii. All identified non-visible pollutant parameters, including applicable TMDL-related pollutants listed in Table H-2 in Attachment H; and or,
 - iv. Indicator parameters including, but not limited to pH, specific conductance, dissolved oxygen, conductivity, salinity, and Total Dissolved Solids (TDS).

E. Sample Collection and Handling Instructions

1. The Risk Level 1 discharger shall:
 - a. Identify all the parameters to be tested for each stormwater discharge location
 - b. Request the laboratory provide the appropriate number of sample containers, types of containers, sample container labels, blank Chain of Custody forms, and sample preservation instructions.
 - c. Use the appropriate sample shipping method to the laboratory. The laboratory should receive samples within 48 hours of the physical sampling (unless otherwise required by the laboratory). The options are to either deliver the samples to the laboratory, arrange to have the laboratory pick them up, or ship them overnight to the laboratory.

- d. Use only the sample containers provided/specified by the laboratory to collect and store samples. Use of any other type of containers could cause sample contamination.
 - e. Prevent sample contamination by not touching or putting anything into the sample containers before collecting stormwater samples.
 - f. Not overfill sample containers. Overfilling can change the analytical results.
 - g. Secure each sample container cap without stripping the cap threads.
 - h. Label each sample container. The label shall identify the date and time of sample collection, the person taking the sample, and the sample collection location or discharge point. The label should also identify any sample containers that have been preserved.
 - i. Carefully pack sample container into an ice chest or refrigerator to prevent breakage and maintain temperature during shipment; frozen ice packs or ice is placed into the shipping container to keep sample close to 4° C (39° F) until arriving at the laboratory (do not freeze samples).
 - j. Complete a Chain of Custody form with each set of samples. The Chain of Custody form shall include the discharger's name, address, and phone number, identification of each sample container and sample collection point, person collecting the samples, the date and time each sample container was filled, the analysis that is required for each sample container, and both the signatures of the persons relinquishing and receiving the sample containers.
2. Personnel shall be designated and trained for the collection, maintenance, and shipment of samples in accordance with the above sample protocols and laboratory-specific practices.
 3. Risk Level 1 dischargers shall perform all sampling and preservation protocols in accordance with the 40 Code of Federal Regulations Part 136 and the current edition of "Standard Methods for the Examination of Water and Wastewater" (American Public Health Association).³

³ Unless other test procedures have been specified in this General Permit or by the Water Boards.

4. The Risk Level 1 discharger may refer to the Surface Water Ambient Monitoring Program’s (SWAMP) Quality Assurance Program Plan (QAPrP) for more information on sampling collection and analysis.⁴

F. Analytical Methods Requirements

1. The Risk Level 1 discharger shall refer to Table 3 for applicable test methods, detection limits, and reporting units.

Table 3 - Test Methods, Detection Limits, and Reporting Units

Parameter	Test Method	Method. Detection Limit	Reporting Units
Non-Visible Pollutant Parameter(s)	U.S. EPA-approved test method for the specific pollutant parameter	Dependent on the test method	Dependent on the test method

2. All monitoring instruments and equipment shall be calibrated and maintained in accordance with manufacturers' specifications to ensure accurate measurements.
3. All analyses shall be sent to and conducted at a laboratory certified for such analyses by the State Water Board Environmental Laboratory Accreditation Program (ELAP), with the exception of field analysis conducted by the discharger for turbidity and ph.
4. The Risk Level 1 discharger shall assign a value of zero (0) for all non-visible pollutant analytical results less than the minimum level (reporting limit), as reported by the laboratory, used in calculations required by this permit (e.g., numeric action level and numeric effluent limitation exceedance determinations), so long as a sufficiently sensitive test method was used as evidenced by the reported method detection limit and minimum level.

⁴ Additional information regarding [SWAMP's QAPrP](https://www.waterboards.ca.gov/water_issues/programs/swamp/quality_assurance.html#qapr) can be found at: <https://www.waterboards.ca.gov/water_issues/programs/swamp/quality_assurance.html#qapr>. [as of May 20, 2021]

G. Exceedance Response Requirements⁵

1. Risk Level 1 dischargers with non-visible pollutants may be subject to the applicable TMDL-related numeric action levels (NAL) and/or numeric effluent limitations (NEL) as shown in Table 6 below.

Table 6 - Numeric Action Levels and Numeric Effluent Limitations

Parameter	Discharger Type	Numeric Action Level	Numeric Effluent Limitation
TMDL-related Pollutant	Responsible Dischargers	Refer to Table H-2 in Attachment H	Refer to Table H-2 in Attachment H

2. Whenever analytical results indicate that the discharge exceeds an applicable TMDL-related NAL, the Risk Level 1 discharger shall determine the source(s) of the pollutant and immediately implement corrective actions to:
 - a. Meet BAT and BCT requirements;
 - b. Reduce or prevent pollutants in stormwater and authorized non-stormwater discharges from causing further TMDL-related NAL exceedances.
3. The source evaluation shall be kept with the SWPPP and specifically address what corrective actions were taken or will be taken and provide a schedule for their completion.

III. RISK LEVEL 1 REPORTING REQUIREMENTS

A. Visual Inspections

1. The Risk Level 1 discharger shall keep all completed inspection checklists and related documentation with the SWPPP on-site or electronically.

⁵ Terms including, but not limited to, numeric action level, numeric effluent limitation and exceedances are defined in Appendix 2 of this General Permit.

B. Water Quality Monitoring

1. Non-Visible Pollutant Monitoring Reporting⁶
 - a. The Risk Level 1 discharger that conducted non-visible pollutant monitoring shall electronically submit through SMARTS all field and/or analytical sampling results within 30 days after obtaining the analytical result or within 10 days after if the analytical results demonstrate the exceedance of an applicable TMDL-related numeric action level or numeric effluent limitation.
 - b. The Risk Level 1 discharger that exceeded an applicable TMDL-related numeric action level shall prepare a Numeric Action Level Exceedance Report when requested, in writing, from a Regional Water Board delegate and shall submit and certify each Numeric Action Level Exceedance Report through SMARTS within 30 days of receiving the written request, in accordance with Section IV of this General Permit's Order.
 - c. A Risk Level 1 discharger that prepared a Numeric Action Level Exceedance Report shall retain a copy of the report for a minimum of three years after the date the exceedance report is certified and submitted.
 - d. The Numeric Action Level Exceedance Report shall include:
 - i. The analytical method(s), method reporting unit(s), and method detection limit(s) for each parameter;
 - ii. The date, place, time of sampling, visual inspections, and/or measurements, including precipitation; and,
 - iii. An assessment of the existing BMPs associated with the sample that exceeded the numeric action level, a description of each corrective action taken including photographs, and date of implementation.
 - e. All dischargers that exceed an applicable TMDL-related numeric effluent limitation must comply with the water quality based corrective action requirements in Section VI.R of the Order.

⁶ Terms including, but not limited to, numeric action level, numeric effluent limitations, and exceedances are defined in Appendix 2 of this General Permit.