



**Stormwater Pollution Prevention Plan (SWPPP) and
Water Pollution Control Program (WPCP) Preparation
Manual**

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List of Abbreviations

°C	Degrees Celsius	ELAP	Environmental Laboratory Accreditation Program
cfs	cubic feet per second	ESA	Environmentally Sensitive Area
°F	Degrees Fahrenheit	IH	Information Handout
kg	kilogram	JTU	Jackson Turbidity Units
L	liter	LID	Low Impact Development
lf	linear feet	LRP	Legally Responsible Person
mph	miles per hour	LTCGP	Lake Tahoe Hydrologic Unit Construction General Permit
s	second	LUP	Linear Underground/Overhead Projects
AC	Asphalt Concrete	MEP	Maximum Extent Practicable
ADL	Aerially Deposited Lead	MS4	Municipal Separate Storm Sewer System
AS	Approved Signatory	NAL	Numeric Action Level
ASBS	Areas of Special Biological Significance	NEL	Numeric Effluent Limitation
ASTM	American Society of Testing Materials	NOAA	National Oceanic and Atmospheric Administration
ATS	Active Treatment System	NPDES	National Pollutant Discharge Elimination System
BAT	Best Available Technology	NTR	National Toxics Rule
BCT	Best Conventional Technology	NTU	Nephelometric Turbidity Units
BMP	Best Management Practice	NWS	National Weather Service
BOD	Biochemical Oxygen Demand	NS	Non-Stormwater
CASQA	California Stormwater Quality Association	NOI	Notice of Intent
CCR	California Code of Regulations	NOT	Notice Of Termination
CEQA	California Environmental Quality Act	O&M	Operation and Maintenance
CPESC	Certified Professional in Erosion and Sediment Control	PCC	Portland Cement Concrete
COC	Chain of Custody	POC	Pollutants of Concern
CWA	Clean Water Act	PoP	Probability of Precipitation
CFR	Code of Federal Regulations	PRDs	Permit Registration Documents
CSWPPP	Conceptual Stormwater Pollution Prevention Plan	QA/QC	Quality Assurance/Quality Control
CEM	Construction Engineering Management Forms	QRE	Qualifying Rain Event
CGP	Construction General Permit	QSD	Qualified SWPPP Developer
CSMP	Construction Site Monitoring Program	QSP	Qualified SWPPP Practitioner
CTR	California Toxics Rule	RE	Resident Engineer
DFW	Department of Fish and Wildlife	REAP	Rain Event Action Plan
DHS	Department of Health Services	ROWD	Report of Waste Discharge
DSA	Disturbed Soil Area	RULSE	Revised Universal Soil Loss Equation
DTSC	Department of Toxic Substance Control	RW	Receiving Water
DWQ	Division of Water Quality		

RWQCB	Regional Water Quality Control Board
SAP	Sampling and Analysis Plan
SC	Sediment Control
SS	Soil Stabilization
SMARTS	Storm Water Multi Application Reporting and Tracking System
SS	Settleable Solids
SSC	Suspended Sediment Concentration
SWAMP	Surface Water Ambient Monitoring Program
SWMP	Storm Water Management Program
SWPPP	Storm Water Pollution Prevention Plan
SWRCB	State Water Resources Control Board
TMDL	Total Maximum Daily Load
TSS	Total Suspended Solids
TC	Tracking Controls
USACOE	U.S. Army Corps of Engineers
USEPA	United States Environmental Protection Agency
USGS	United States Geological Service
V:H	Vertical versus Horizontal
WDID	Waste Discharge Identification Number
WDR	Waste Discharge Requirement
WM	Waste Management
WPCD	Water Pollution Control Drawing
WPC Manager	Water Pollution Control Manager
WPCP	Water Pollution Control Program
WPSC	Water Polution Control Schedule
WQPT	Water Quality Planning Tool
WQS	Water Quality Standards
WRCC	Western Regional Climate Center
WE	Wind Erosion

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Section 1

Introduction and Background

1.1 Purpose and Scope of this Manual

Caltrans has a commitment to prevent pollution in stormwater runoff from Caltrans properties, facilities, and activities. This manual is part of Caltrans comprehensive and coordinated statewide effort to prevent pollution in stormwater runoff from Caltrans construction sites.

This document guides Contractors and Caltrans staff through the process of preparing a Stormwater Pollution Prevention Plan (SWPPP) or a Water Pollution Control Program (WPCP). The organization of this Manual is shown below. Working details and instructions for the implementation of construction site Best Management Practices (BMPs) are presented in the Standard Plans, Contract Plans, Standard Specifications and Contract Special Provisions. The *Caltrans Construction Site Best Management Practices Manual* should be used as guidance for determining site BMPs not specified in the contract documents.

- Section 1 provides the purpose and scope of this Manual and background information on the National Pollutant Discharge Elimination System (NPDES) regulations including the Caltrans Statewide NPDES Permit, the Construction General Permit and the Lake Tahoe Hydrologic Unit Construction General Permit.
- Section 2 provides information of the determination of site Best Management Practices (BMPs).
- Section 3 provides detailed instructions for the preparation of a SWPPP.
- Section 4 provides detailed instructions for the preparation of a WPCP.
- Appendix A provides definitions of terms used throughout this Manual.
- Appendix B provides a list of standard Caltrans Construction Site BMP symbols to be used on Water Pollution Control Drawings (WPCDs).

1.1.1 Storm Water Pollution Prevention Plan

The Storm Water Pollution Prevention Plan (SWPPP) is a document that addresses water pollution control for a construction project. The Construction General Permit (CGP) and the Lake Tahoe Construction General Permit (LTCGP) require that all stormwater discharges associated with construction activity, where said activity results in soil disturbance of one acre or more of land area, must be permitted under the CGP or the LTCGP and have a fully developed site SWPPP on-site prior to beginning any soil disturbing activities. Caltrans or the Regional Board may require the development of a SWPPP for projects with disturbed soil areas (DSAs) of less than one acre if it is determined that the project pose a significant water quality risk.

The CGP and the LTCGP require the development of a project-specific SWPPP. The SWPPP must include the information needed to demonstrate compliance with all the requirements of the CGP or the LTCGP. Figure 1-1, Caltrans SWPPP Process Flow Chart, summarizes the typical SWPPP documentation preparation process for a Caltrans project. These processes will be explained in detail in Section 3 of this Preparation Manual. The SWPPP document must be prepared by a Qualified SWPPP Developer (QSD). Caltrans specifications require that a Water Pollution Control Manager (WPC Manager) be responsible for the implementation of a SWPPP. The WPC Manager must have the same qualifications as a QSD. Details pertaining to individuals who qualify as a QSD/ WPC Manager are explained in Section 1.4.1. The SWPPP template allows for an alternate WPC Manager to be included in case the site's WPC Manager is unavailable. This alternate WPC Manager must have the training and qualifications necessary to ensure the SWPPP is in full compliance.

It should be noted that construction projects with a DSA of less than one acre do not require coverage under the CGP or the LTCGP. However, Caltrans requires that a WPCP be prepared for construction projects with less than one acre of DSA. Caltrans specifications require that the project specific WPCP be prepared by a Qualified SWPPP Practitioner (QSP). The WPC Manager responsible for implementation of the WPCP must have the same qualifications as a QSP.

1.2 Federal Regulations

Federal regulations for controlling discharges of pollutants from municipal separate storm sewer systems, construction sites, and industrial activities, were brought under the NPDES permit process by the 1987 amendments to the Clean Water Act (CWA), and the subsequent 1990 promulgation of federal stormwater regulations issued by the U.S. Environmental Protection Agency (USEPA). The USEPA regulations require municipal and industrial stormwater discharges to comply with an NPDES permit. In California, the USEPA delegated authority to issue NPDES permits to the State Water Resources Control Board (SWRCB) and the nine Regional Water Quality Control Boards (RWQCBs).

1.3 Caltrans Statewide NPDES Permit

The SWRCB issued a Statewide Stormwater NPDES Permit (Caltrans Permit) to Caltrans, to regulate stormwater and non-stormwater discharges from Caltrans properties and facilities, and discharges associated with operation and maintenance of the State highway system. The Caltrans Permit contains three basic requirements:

1. Caltrans must comply with the requirements of the CGP or the LTCGP;
2. Caltrans must implement a year-round program in all parts of the State to effectively control stormwater and non-stormwater discharges; and
3. Caltrans stormwater discharges must meet water quality standards through implementation of permanent and temporary (Construction Site) BMPs and other measures.

The Caltrans Permit gives RWQCBs the option to specify additional requirements they may consider necessary to meet water quality standards. In addition, RWQCBs retain the authority to issue NPDES permits for individual projects or adopt Regional Permits. Copies of the Caltrans Permit can be downloaded from the SWRCB website, at:

http://www.waterboards.ca.gov/water_issues/programs/stormwater/caltrans.shtml

1000. SWPPP Preparation and Approval

1100. Extract all storm water related plans and standard specifications from the contract documents: detail sheets for BMPs, locations of BMPs, SWPPP standard specifications, temporary and permanent BMP Special Provisions.

1200. Contractor should seek all appropriate documents from Caltrans: NOI, conceptual SWPPP (if applicable), Storm Water Data Report, Hydraulics/Hydrology Report, Geotechnical Report, other plans, permits, etc.

1300. Obtain Caltrans SWPPP Preparation Manual and appropriate SWPPP Templates. (RL1, RL2, RL3, or LTCGP template)

1400. Contractors QSD prepares SWPPP using SWPPP Preparation Manual and Template and submits to Caltrans for review and authorization.

1500. Caltrans will authorize the SWPPP. Contractor shall make required copies and maintain an up to date copy on site at all times.

2000. SWPPP Implementation

2100. BMP Implement
BMPs in Compliance with SWPPP

2200. Training Conduct Ongoing Training in accordance with SWPPP, Document in SWPPP Attachments E & F (CEM-2023 and CEM-2024 respectively if directed by RE).

2300. CONSTRUCTION SITE MONITORING PLAN (CSMP)

2400. Active Treatment System (ATS) The Contractor shall implement the ATS plan as required by plans referenced in the SWPPP Section 700.2.6.

2500. Record keeping
The Contractor shall maintain all records as required by SWPPP Section 900.1.

2600. Annual Certification and Annual Report The Contractor shall prepare an annual compliance certification form CEM-2070 by July 1 of each year. The Annual Report consists of CEM-2075 and all file category items for the fiscal year to be submitted to the Regional Board by September 1 of each year. (LTCGP requires CEM-2075T by Nov 30)

2700. Amendments
Amend SWPPP- WPCM or QSD must amend or revise SWPPP and maintain in SWPPP Attachment AA and log in SWPPP Section 100.3

2360.0 Sampling and Associated Forms

2310. Monitor NWS forecast daily and document chance of rain and precipitation amount. The actual rainfall amount shall be recorded by reading the onsite rain gauge daily.

2320. Contractor QSP shall conduct site inspections weekly, before, during, and after rain events, and quarterly for non-storm water discharges. Contractor shall complete form CEM-2030 Stormwater Site Inspection Report for each inspection. RL&3 project Contractors shall conduct daily inspections of all access roads. LTCGP projects must use CEM-2031T for daily site inspections.

2330. Contractor shall check the WPCBMP List in the SWPPP and complete form CEM-2034 Monthly Stormwater Best Management Status Report.

2340. Contractor shall complete applicable form (CEM-2045) for REAP 48 hours prior to a 50% chance of precipitation based on the NWS forecast (SWPPP Section 600.3) (30% chance or greater for LTCGP)

2350. Contractor shall maintain and document calibrated meters.

2321. If Contractor identifies an unauthorized discharge. Contractor shall complete form CEM-2061

2322. Contractor shall document all corrective actions by completing form CEM-2035 or CEM-2035T Stormwater Corrective Actions Summary

2361. Contractor shall identify discharge points from Attachment EE of SWPPP. Contractor will notify RE prior to rain event sampling to coordinate scheduling of verification sampling.

2362. Contractor shall collect samples in accordance with section 700.2.3 after each rain event where a breach, malfunction, leak or spill could potentially discharge non-visible pollutants.

2363. If Risk Level 2 or 3, Contractor shall collect samples from discharge points identified on Attachment EE for that rain event and analyze for pH and turbidity, and non-visible pollutants (if applicable) for each qualifying rain event. (Since it is not known when the precipitation will add up to 0.5 inches, samples will be collected from first discharge with adequate volume to collect a sample.)

2364. If Risk Level 2 or 3, even if it rains without a REAP and runoff is adequate to collect a storm water sample, the WPC Manager shall implement sampling and analysis following the procedures of section 700 of SWPPP

2365. Before discharging dewatering effluent, Contractor shall amend SWPPP if an NEL is exceeded in accordance with SWPPP Section 700.2.3.1

2366. Risk Level 3 projects will sample for SSC and conduct receiving water sampling if an NEL is exceeded in accordance with SWPPP Section 700

2367. After samples are collected, the Contractor shall document sampling on form CEM-2051. The Contractor shall analyze field samples and document results on form CEM-2052. For laboratory samples the Contractor shall document results including appropriate Chain of Custody

2370 Data Evaluation

2371. If Risk Level 2 or 3 and sampling results average exceeds NALs (250 NTU, <6.5 or >8.5 pH) Contractor shall complete form CEM-2062 or CEM-2062T and implement immediate corrective actions

2372. If Risk Level 3 and sampling results average exceeds NELs (500 NTU, <6.0 or >9.0 pH), Contractor shall complete form CEM-2063 or CEM-2063T and implement immediate corrective actions.

Figure 1-1. Caltrans SWPPP Process Flow Chart

For construction projects, the Caltrans Permit requires projects to obtain coverage for stormwater discharges associated with construction activities under Order No. 2009-0009- Division of Water Quality (DWQ) Statewide Construction General Permit (CGP), and associated amendments (Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ) or for construction projects within the Lake Tahoe Hydrologic Unit, the Caltrans Permit requires Caltrans to obtain coverage for stormwater discharges associated with construction activities under the Lake Tahoe Construction General Permit (LTCGP) Order No. RGT-2011-0019 NPDES No. CAG616002. The Caltrans Permit imposes electronic filing, notification, reporting and contractor requirements for certain construction projects, and imposed limitations on types of materials that may be used during construction which may have an impact on post-construction discharges. Furthermore, the Caltrans Permit requires Caltrans to meet water quality standards for any discharges from a site through implementation of permanent BMPs and other measures. This manual does not intend to include all permit requirements. For information and complete listing of all requirements, refer to the Caltrans, the CGP or the LTCGP Permits.

Caltrans has developed the SWPPP templates to comply with the requirements of the Caltrans Permit, the CGP and the LTCGP. Table 1-1 shows where Caltrans Permit requirements are incorporated into the SWPPP.

Table 1 1. Caltrans Permit Requirements

Caltrans Permit Reference	Requirement	SWPPP Section
E.2.f	SWPPP contains all elements required in the Construction General Permit and Lake Tahoe Construction General Permit	100 - 900
E.2.f. 1	Construction related activities will obtain coverage under the Construction General Permit (CGP)	100-900
E.2.f.1	Construction related activities in the Lake Tahoe Hydrologic Unit will obtain coverage under the Lake Tahoe Construction General Permit (LTCGP)	100-900 and Tahoe SWPPP Template
E.2.f.2	Construction related activities not subject to the Construction General Permit are required to implement BMPs to control the discharge of pollutants to the Maximum Extent Practicable (MEP) and will implement region specific WDRs	Section 4 of this Manual, WPCP template
E.2.f.3	The SWPPP contains RWQCB WDR requirements for projects that reuse Aerially Deposited Lead (ADL). (Applicable only for projects that reuse ADL soils.)	500.4.1
E.2.e.3	SWPPP BMPs will not constitute a hazard for wildlife	500
E.2.e.4	SWPPP will utilize wildlife friendly 100 percent biodegradable erosion control products wherever feasible	500
E.2.g	Industrial facilities as defined in the Statewide Industrial General Permit (IGP) will obtain coverage under the IGP for each batch plant and industrial facility (please check with your NPDES Coordinator to determine applicability in your District)	100-900
E.5.c.3.a	The minimum inspection frequency for construction sites [within ASBS areas] shall be weekly during the rainy season	600

1.3.1 Areas of Special Biological Significance

The Caltrans permit requires Caltrans to develop and implement an ASBS Compliance Plan to address the 77 locations specified in Attachment III of the Caltrans permit. Table 1-1a below includes these ASBS name and locations. Construction projects that discharge into these locations must ensure compliance with Section 600 of the SWPPP Templates and Section 40.5 of the WPCP Template as well as indicate its applicability in CEM-2030.

Caltrans has developed an ASBS Location map that can be used to determine whether a project location is within an ASBS area and is subject to specific requirements imposed under the Caltrans permit.

Moreover, the Water Quality Planning Tool (WQPT) developed by Caltrans and available at

<http://svctenvims.dot.ca.gov/wqpt/wqpt.aspx> has an ASBS layer along with PM and Caltrans Districts.

Figure 1-1a depicts the WQPT with the ASBS and Caltrans District layer activated. Caltrans staff can also view the ASBS interactive map via the Caltrans Portal; if you do not have access to the Portal, contact your District NPDES Coordinator.

Table 1 1a. ASBS Priority Discharge Locations (Caltrans Permit, Attachment III)

Sample ID	RWQCB	Caltrans District	ASBS Name	Longitude	Latitude	
SAU020	1	1	Saunders Reef	-123.65329	38.86177	
SAU019				-123.65328	38.86161	
SAU016				-123.65178	38.85683	
SAU017				-123.65164	38.85692	
SAU012				-123.65019	38.8543	
SAU011				-123.64983	38.85387	
SAU021				-123.64868	38.85176	
SAU008				-123.6478	38.8521	
SAU006				-123.64727	38.85041	
SAU002				-123.64709	38.84988	
RED026			Redwoods National Park	-124.10221	41.59516	
RED027				-124.10126	41.59657	
RED028				-124.10101	41.59729	
RED029				-124.10046	41.59976	
RED030				-124.1003	41.60084	
RED031				-124.10026	41.6013	
RED065				-124.09299	41.28217	
FIT011	2	4	James V. Fitzgerald	-122.51771	37.53154	
AN0030	3		Ano Nuevo	-122.30121	37.11334	
AN0033				-122.29881	37.11202	
AN0032				-122.29764	37.1113	
AN0034				-122.297	37.11084	
AN0035				-122.29297	37.10714	

Table 1 1a. ASBS Priority Discharge Locations (Caltrans Permit, Attachment III)

Sample ID	RWQCB	Caltrans District	ASBS Name	Longitude	Latitude
CAR007	3	5	Carmel Bay	-121.9247	36.52453
CAR006				-121.92457	36.52469
MUG002	4	7	Laguna Point to Latigo Point	-119.0618833	34.08635
MUG005				-119.0382833	34.08393
MUG009				-119.0367	34.08367
MUG007				-119.0363667	34.08378
MUG008				-119.0363667	34.08378
MUG010				-119.0149833	34.07098
MUG013				-118.9931667	34.0653
MUG016				-118.9869833	34.06287
MUG017				-118.98675	34.06268
MUG028				-118.97405	34.0589
MUG029				-118.9730167	34.05835
MUG031				-118.9683	34.05622
MUG041				-118.9645	34.0534833
MUG046				-118.96085	34.05205
MUG048				-118.9594833	34.05172
MUG049				-118.9594333	34.05165
MUG051				-118.9581	34.05033
MUG052				-118.9574333	34.04982
MUG053				-118.95645	34.04943
MUG059				-118.9514167	34.04738
MUG058				-118.9506	34.04778
MUG060				-118.9499	34.04728
MUG061				-118.94985	34.04723
MUG077				-118.9345833	34.04513
MUG078				-118.9341	34.0451333
MUG070				-118.932	34.046
MUG066				-118.9252333	34.04612
MUG073				-118.9236833	34.04577
MUG135				-118.89858	34.0401
MUG147				-118.89558	34.03921
MUG150				-118.89198	34.03906
MUG187				-118.87051	34.0369
SAD0950				-118.83855	34.02699
SAD0960				-118.8375	34.02619
SAD0970				-118.83646	34.02535

Table 1 1a. ASBS Priority Discharge Locations (Caltrans Permit, Attachment III)

Sample ID	RWQCB	Caltrans District	ASBS Name	Longitude	Latitude
SAD0980				-118.83486	34.02435
MUG318				-118.8342	34.02389
SAD0990				-118.83266	34.02302
SAD1000				-118.83034	34.02123
MUG355				-118.8292	34.02056
SAD1030				-118.82632	34.0181
SAD1040				-118.82566	34.01748
SAD1050				-118.82492	34.017
SAD1060				-118.82254	34.01559
MUG347				-118.78343	34.02196
MUG346				-118.78314	34.02207
MUG283				-118.76586	34.0255
IRV020		8	Irvine Coast	-117.8402333	33.5740167
IRV009				-117.8312	33.5653
IRV007				-117.8281667	33.5645
IRV003				-117.823917	33.56195
IRV002				-117.8221	33.5606

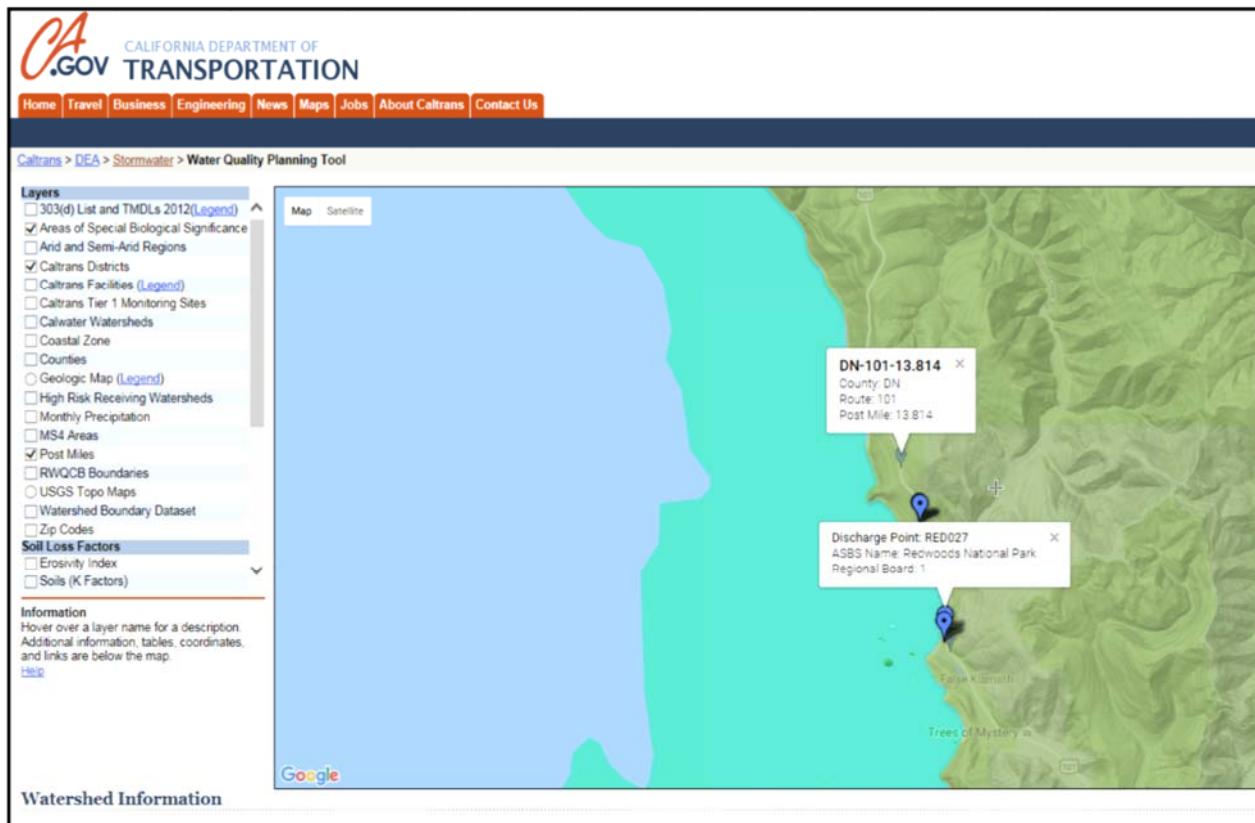


Figure 1-1a. Depiction of WQPT showing Caltrans District and ASBS areas

1.4 Construction General Permits

The Caltrans Permit requires Caltrans projects to comply with the Construction General Permit and/or the Lake Tahoe Construction General Permit. In 2009, the SWRCB adopted “NPDES General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities (Order No 2009-0009-DWQ, NPDES No. CAS000002),” commonly referred to as Construction General Permit (CGP). A summary of the significant aspects of the CGP Order No. 2009-0009-DWQ (and associated amendments), NPDES No. CAS000002 are listed in Table 1-2.

Table 1.2. Significant Aspects of the CGP

Construction General Permit (Order No 2009-0009-DWQ, NPDES No. CAS000002) as modified by Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ	
Qualifications for Certification and Training Requirements	Requires that the QSD, implementer and inspector have documented qualifications and training. See Section 1.4.1 for elaboration of training requirements.
Risk-Based Permitting Approach	Establishes three levels of calculated risk possibilities for a project. Risk is determined from erodability of soil and receiving water impairments.
Receiving Water Limitations	Requires construction –related activities that cause or contribute to an exceedance of a water quality standard must be addressed.
Effluent Standards and Monitoring	Requires effluent monitoring for pH and turbidity in stormwater discharges from Qualifying Rain Events (QREs). Monitoring is used to evaluate compliance with Numeric Effluent Limitations (NELs) and Numeric Action Levels (NALs) included in the GGP.

Table 1.2. Significant Aspects of the CGP

**Construction General Permit (Order No 2009-0009-DWQ, NPDES No. CAS000002)
as modified by Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ**

Monitoring, Sampling, Reporting and Record Keeping	Requires visual site monitoring and monitoring effluent for water quality standards. The CGP has specific reporting and record keeping requirements.
Minimum Requirements Specified	Imposes and specifies minimum BMPs requirements.
Rain Event Action Plan (REAP)	Requires certain projects to develop and implement a REAP that is designed to protect exposed areas of the project within 48 hours prior to a likely forecasted storm event.
Active Treatment System (ATS) Requirements	Discharges choosing to implement an ATS on construction site shall comply with all the requirements of CGP Attachment F.
Annual Reporting	Requires all projects that are enrolled for more than one continuous three-month period to submit information and annually certify that the project has remained in compliance.
Post-Construction Stormwater Performance Standards	Specifies runoff reduction requirements for all projects not covered by a Phase I or Phase II Municipal Separate Storm Sewer System (MS4) NPDES permit, to avoid, minimize and/or mitigate post-construction stormwater runoff impacts.

In 2011, the Lahontan Regional Board adopted “General Waste Discharge Requirements (WDRs) and NPDES Permit for Storm Water Discharges Associated with Construction Activity in The Lake Tahoe Hydrologic Unit, Counties of Alpine, Eldorado, And Placer”, commonly referred to as the Lake Tahoe Construction General Permit (LTCGP) Order No. RGT-2011-0019 NPDES No. CAG616002. A summary of the significant aspects of the LTCGP are listed in Table 1-3.

Table 1 3. Significant Aspects of the LTCGP

LTCGP (Order No. RGT-2011-0019 NPDES No. CAG616002)	
Qualifications for Certification and Training Requirements	Requires that the QSD, implementer and inspector have documented qualifications and training. See Section 1.4.1 for elaboration of training requirements.
Receiving Water Limitations	Requires construction –related activities, wastes and materials that cause or contribute to an exceedance of a water quality standard must be addressed.
Effluent Standards and Monitoring	Requires effluent monitoring for turbidity in stormwater discharges. Monitoring is used to evaluate compliance with NELs and NAL for pH included in the General Permit.
Numeric Effluent Limits	Includes Maximum Daily Effluent Limitations for Discharge to Surface Waters or municipal separate storm sewer systems for Total Nitrogen, Total Phosphorus, Total Iron, Turbidity, Grease and Oil.
Monitoring, Sampling, Reporting and Record Keeping	Requires visual site monitoring and monitoring effluent for water quality standards. The LTCGP has specific reporting and record keeping requirements.
Minimum Requirements Specified	Imposes and specifies minimum BMPs requirements.
REAP	Requires projects to develop and implement a REAP that is designed to protect all exposed areas of the project within 24 hours prior to any anticipated precipitation as rainfall.
Active Treatment System (ATS) Requirements	Dischargers choosing to implement an ATS on construction site shall comply with all the requirements of LTCGP Attachment E.
Annual Reporting	Requires all projects that are enrolled to submit information and annually certify that the project has remained in compliance. Must be submitted annually on or before November 30.
Post-Construction Stormwater Performance Standards	Must meet the requirements in the respective MS4 permits. Dischargers shall implement Low Impact Development (LID) techniques. At a minimum, permanent stormwater infiltration facilities must be designed and constructed to infiltrate runoff generated by the 20 year, 1-hour storm which equates to approximately one inch of runoff during a 1-hour period.
Final Report	All requirements of the Annual Report and any modifications to the proposed storm water collection treatment, or disposal facilities or restoration work, changes in amount of impervious area.
Restoration Projects	Specific Pre- and Post-project requirements as outlined in Section IX.

In March 2016, The Lahontan Regional Board adopted Order No.R6T-1016-0010 which becomes effective on January 1, 2017. This Order will replace the existing LTCGP Order No. RGT-2011-0019 and will include additional requirements/revisions such as:

- Elimination of winter requirement to sample rain events. Requires completing visual monitoring and BMP maintenance.
- Elimination of requirement to collect samples outside of active working/business days (e.g., holidays, weekends). Permit will still require visual inspection during daylight hours on any day.
- Added language to require a written Qualified Storm Water Practitioner (QSP) management plan to achieve better onsite management by the QSP – can't operate remotely without a communication plan that ensures active QSP oversight.
- Added language to prohibit use of non-photo/biodegradable materials (such as plastic netting) in permanent BMPs.

The Lake Tahoe SWPPP template will be revised after January 2017 to include the revised requirements.

It is important to note that the CGP and the LTCGP apply to projects that are greater than or equal to one acre, or less than an acre if the construction activity is part of a larger common plan of development. Construction sites that are small (1 to 5 acres) and that obtain an approved Rainfall Erosivity Waiver authorized by the U.S. EPA Phase II regulations do not fall under jurisdiction of the CGP as outlined in Section 1.4.2.1 of this Manual.

The Regional Water Boards are responsible for implementation and enforcement of the CGP and the LTCGP. Therefore, the CGP and the LTCGP recognize the authority of the Regional Water Boards to alter, approve, exempt, or rescind permit authority granted by the permit to protect the beneficial uses of receiving waters and prevent degradation of water quality. Summarized below are the requirements to comply with the CGP and the LTCGP.

1.4.1 Qualifications for Certification and Training Requirements

The CGP and the LTCGP require certification of the SWPPP and mandates that all persons responsible for implementing the requirements of the CGP and the LTCGP meet appropriate training. Training should be both formal and informal and occur on an ongoing basis. Training should include those provided by recognized governmental agencies or professional organizations.

1.4.1.1 Qualifications for Certification Requirements

The SWPPP document can only be written, amended and certified by a QSD. The QSD must have appropriate experience and have a professional registration or certifications required by the CGP or the LTCGP. Moreover, the QSD must have Caltrans approved storm water management training described on the Department's Construction Storm Water and Water Pollution Control website. For Caltrans projects, the WPC Manager must have the same qualifications as a QSD.

The CGP and the LTCGP require that the implementer of the BMPs specified in the SWPPP have the qualifications- certification of a QSP. For Caltrans projects, the WPC Manager responsible for implementing the SWPPP must meet the qualifications-certification for a QSD. For Caltrans WPCP projects, the WPCP developer and WPC Manager must have at least the qualifications- certification for a QSP.

1.4.1.2 Training Requirements

The CGP and the LTCGP require training for all individuals responsible for:

- Activities associated with compliance with the CGP or the LTCGP,
- BMP installation, maintenance and repair, and
- Overseeing and revising, and amending the SWPPP

Caltrans requires water pollution control (WPC) training for project managers, supervisory personnel, subcontractors, and employees. Employees involved in WPC work must be trained in stormwater BMP implementation, maintenance standards and repair.

All employees, including subcontractor's employees, must be trained in the following subjects:

- Water pollution control rules and regulations
- Implementation and maintenance for:
 - 2.1. Temporary Soil Stabilization
 - 2.2. Temporary Sediment Control
 - 2.3. Tracking Control
 - 2.4. Wind Erosion Control
 - 2.5. Material Pollution Prevention and Control

- 2.6. Waste Management
- 2.7. Non-stormwater Management

WPC training must be completed prior to working on the job.

Caltrans contract specifications require that the Contractor conduct ongoing weekly training meetings that cover:

- WPC BMPs deficiencies and corrective actions,
- BMPs that are required for work activities during the week,
- Spill prevention and control,
- Material delivery, storage, use, and disposal,
- Waste management, and
- Non-stormwater management procedures.

Personnel that will be responsible for collecting water quality samples shall be trained; training must include project specific Construction Site Monitoring Program (CSMP) review, health and safety reviews, and sampling simulations. Sampling and analysis training requirements are explained in this manual and further discussed in the Caltrans *Construction Site Monitoring Program Guidance Manual*.

Record keeping of all documentation required for training and responsible parties must be included in the SWPPP. Documentation of all training for persons responsible for implementing the requirements of the CGP and the LTCGP must be submitted as part of the Annual Report.

1.4.2 Risk Determination Requirements

A requirement for the development and approval of the SWPPP that is regulated under the CGP is the calculation of the project's sediment risk and receiving water risk during periods of Disturbed Soil Areas (DSA) exposure. The calculated risk determines the Risk Level (s) using the Risk Determination Worksheet. Any project that spans two or more planning watersheds must have a separate Risk Level calculation for each planning watershed.

The project's risk level determination(s) must be reported to the SWRCB as part of the Permit Registration Documents (PRDs) via the Stormwater Multi-Application Reporting and Tracking System (SMARTS). If the project is determined to have more than one Risk Level, it is up to the discretion of the RWQCB to break the project into separate levels of implementation.

Caltrans will provide the Contractor documentation of the project's Risk Level determination. The duration of construction based on the start date and end date of construction is an important factor in project Risk Level determination. If a project is delayed during construction or additional work is added by change order that increase the project duration, the project's Risk Level should be re-evaluated. The methods described below for determining the Risk Level for a project are provided as reference.

1.4.2.1 Rainfall Erosivity Waiver

Projects that have a DSA between one (1) and less than five (5) acres may qualify for a rainfall erosivity waiver under the CGP if the rainfall erosivity factor (R factor) is less than a value of 5. The R factor takes into account project location, length of construction period, and time of year, so projects that begin and complete construction within a short period are likely to qualify for a rainfall erosivity waiver.

Projects that qualify for a rainfall erosivity waiver do not need to prepare a SWPPP but must file proper PRD documents via SMARTS. In addition, a WPCP must be prepared by the Contractor as outlined in Section 4 of this Manual.

The R factor is calculated using the *EPA Rainfall Erosivity Calculator* at:

<http://water.epa.gov/polwaste/npdes/stormwater/Welcome-to-the-Rainfall-Erosivity-Factor-Calculator.cfm>

Although use of the EPA Rainfall Calculator for Erosivity Waiver and the R Factor calculation is required by the CGP, the link is not always available. Use the manual tabular method as described in EPA 833-F-00-014 USEPA Fact Sheet 3.1 available at:

<https://www.epa.gov/sites/production/files/2015-10/documents/fact3-1.pdf>

1.4.2.2 Determining Risk Level

The Risk Level of a project is determined by the combination of calculated project sediment risk and receiving water risk. A project's sediment risk determination is defined as the relative amount of sediment that can be discharged, given project and location details. The receiving water risk is determined by assessing the risk sediment discharges pose to receiving waters.

Caltrans has stand-alone guidance for assessing risk required by the CGP. The CGP is a risk-based permit that establishes three levels of environmental risk possible for a construction site. Caltrans PEs and Consultants should use this guidance to determine if a project has a Risk Level 1, 2 or 3. The CGP Risk Level (RL) determination quantifies sediment and receiving water characteristics and uses these results to determine the project's overall RL. Highly erodible soils, in higher rainfall areas, on steep slopes increase the 'sediment risk'. Monitoring and reporting requirements increase as the RL goes from 1 to 3. Refer to the Caltrans Project Risk Level Determination Guidance document at the following web page for information on determining the project risk level:

<http://www.dot.ca.gov/hq/oppd/stormwtr/risk-guidance.htm>

The combined risk determines the Risk Level of the project. The Risk Level determines the constraints and the required monitoring for the project. Table 1-4 specifies how the combined risk determines the Risk Level of a project.

Table 1 4. Combined Risk Level Matrix			
Receiving Water Risk	Sediment Risk		
	Low	Medium	High
Low	Level 1		Level 2
High	Level 2		Level 3

Risk Level 1 projects are subject to minimum BMP and visual monitoring requirements.

Risk Level 2 projects are subject to minimum BMPs, visual monitoring requirements, Numeric Action Levels (NALs) and some additional monitoring requirements.

Risk Level 3 projects are subject to minimum BMPs, visual monitoring requirements, and more rigorous monitoring requirements such as receiving water monitoring and in some cases bioassessment.

1.4.3 Receiving Water Limitations

Construction-related activities that cause or contribute to an exceedance of water quality standards must be addressed. As part of the monitoring requirements of the CGP and the LTCGP for sampling and analysis, procedures will aide in determining whether the installed and maintained BMPs are functioning properly in preventing pollutants from discharging into receiving water. If stormwater runoff from construction sites contains pollutants, there is a risk that pollutants could enter the surface waters and

cause or contribute to an exceedance of water quality standards. The primary method to ensure compliance with receiving water limitations is to implement BMPs that will be effective in preventing stormwater runoff from conveying pollutants away from the construction site.

The CGP and the LTCGP require that projects ensure that all stormwater discharges and authorized non-stormwater discharges to any surface or ground water will not adversely affect human health or the environment. Discharge that occurs may not contain pollutants in quantities that threaten to cause pollution or a public nuisance. Moreover, stormwater discharges and authorized non-storm water discharges may not cause or contribute to an exceedance of any applicable water quality objectives or water quality standards. Water quality standards are published in Basin Plans adopted by each Regional Water Board, the California Toxics Rule (CTR), the National Toxics Rule (NTR), and the Ocean Plan. Projects located within the watershed of a CWA 303(d) impaired water body, with an approved Total Maximum Daily Load (TMDL) from the U.S. EPA, must comply with the approved TMDL if it identifies “construction activity” or land disturbance as a source of the pollution. The website links to watersheds with TMDLs and the list of 303(d) water bodies is provided below.

Watersheds with TMDLs:

http://www.swrcb.ca.gov/water_issues/programs/tmdl/

303(d) listed Water Bodies:

http://www.swrcb.ca.gov/water_issues/programs/tmdl/integrated2010.shtml

Projects can determine the applicable water quality standards by contacting the Regional Board staff or by consulting the following online source. The actual Basin Plans that contain the water quality standards can be viewed at the website of the appropriate Regional Board for regional plans or the State Water Board for statewide plans. A map displaying the different Regional Water Board areas is provided as Figure 1-2. Additional information is provided in the Table 1-5.



Figure 1-2. Water Board Region Map

Table 1 5. Online Resources for Regional Basin Plans

Region	Region Name	Caltrans District	Online Resource
1	North Coast	1 & 2	http://www.waterboards.ca.gov/northcoast/water_issues/programs/basin_plan
2	San Francisco Bay	4	http://www.waterboards.ca.gov/sanfranciscobay/basin_planning.shtml
3	Central Coast	5	http://www.waterboards.ca.gov/centralcoast/publications_forms/publications/basin_plan/
4	Los Angeles	7	http://www.waterboards.ca.gov/losangeles/water_issues/programs/basin_plan/
5	Central Valley	1 & 2; 3, 6 & 10	http://www.waterboards.ca.gov/centralvalley/water_issues/basin_plans/
6	Lahontan	2,3,8, 9 &10	http://www.waterboards.ca.gov/lahontan/water_issues/programs/basin_plan/
7	Colorado River	8 & 11	http://www.waterboards.ca.gov/coloradoriver/water_issues/programs/basin_planning/
8	Santa Ana	8 & 12	http://www.waterboards.ca.gov/santaana/water_issues/programs/basin_plan/index.shtml
9	San Diego	11&12	http://www.waterboards.ca.gov/sandiego/water_issues/programs/basin_plan/index.shtml

1.4.4 Effluent Standards

All projects are subject to the narrative effluent limitations specified in the CGP and the LTCGP. The narrative effluent limitations require storm water discharges associated with construction activity to meet all applicable provisions of Sections 301 and 402 of the CWA. These provisions require controls of pollutant discharges that utilize Best Available Technology (BAT) and Best Conventional Technology (BCT) to reduce pollutants and any more stringent controls necessary to meet water quality standards.

1.4.4.1 Effluent Standards and Limitations

Stormwater discharges and authorized non-storm water discharges regulated by the CGP as shown in Table 1-6 and Table 1-7 for LTCGP may not contain a hazardous substance equal to or in excess of reportable quantities established in 40 C.F.R.117.3 and 302.4, unless a separate NPDES Permit has been issued to regulate the discharge.

Table 1 6. Effluent Standards and Limitations Required under the CGP

Parameter	Test Method	Discharge Type	Min. Detection Limit	Units	Numeric Action Level	NEL	Receiving Water Monitoring Trigger
pH	Field test with calibrated portable instrument	Risk Level 2	0.2	pH Units	Lower NAL= 6.5 Upper NAL= 8.5	N/A	N/A
		Risk Level 3					Lower NEL= 6.0 Upper NEL= 9.0
Turbidity	EPA 0180.1 and/or field test with calibrated portable instrument	Risk Level 2	1	NTU	250 NTU	N/A	N/A
		Risk Level 3					500 NTU
		For ATS discharges	1	NTU	N/A	10 NTU for Daily Weighted Average & 20 NTU for any Single Sample	10 NTU for Daily Weighted Average & 20 NTU for any Single Sample
SSC	American Society of Testing Materials (ASTM) Method D3977-97	Risk Level 3 (if Receiving Water Monitoring Trigger Exceeded)	5	mg/L	N/A	N/A	N/A

Table 1 7. Effluent Standards and Limitations Required under the LTCGP

Parameter	Test Method	Discharge Type	Min. Detection Limit	Units	Numeric Action Level	NEL	Receiving Water Monitoring Trigger
pH	Field test with calibrated portable instrument	All SWPPP Projects	0.2	pH Units	Lower NAL= 6 Upper NAL=9	N/A	N/A
							Lower NEL= 6.0 Upper NEL=9.0
Turbidity	EPA 0180.1 and/or field test with calibrated portable instrument	All SWPPP Projects	1	NTU	N/A	20	N/A
		For ATS discharges	1	NTU	N/A	10 NTU for Daily Weighted Average & 20 NTU for any Single Sample	10 NTU for Daily Weighted Average & 20 NTU for any Single Sample
SSC	ASTM Method D3977-97	(If Receiving Water Monitoring Trigger is Exceeded)	5	mg/L	N/A	N/A	N/A

The SWPPP must minimize or prevent pollutants in stormwater discharges and authorized non-storm water discharges through the use of controls, structures, and management practices that achieve BAT for toxic and non-conventional pollutants and BCT for conventional pollutants.

Risk Level 2 projects that pose a medium risk to water quality are subject to technology-based NALs for pH and turbidity. Risk level 3 projects that pose a high risk to water quality are subject to technology-based NALs for pH and turbidity. ATS discharges are subject to NELs for turbidity.

1.4.4.2 Effluent Monitoring

Federal regulations require effluent monitoring for discharges subject to NALs and NELs. Subsequently, all CGP Risk Level 2 and 3 projects must perform sampling and analysis of effluent discharges to characterize discharges associated with construction activity from the entire project disturbed area. The same is true for all SWPPP projects in the Lake Tahoe Hydrologic Unit. Samples must be collected for a Qualifying Rain Event (QRE) that produces precipitation of 0.5 inch or greater at the time of discharge under the CGP. A Qualifying Rain Event in the Lake Tahoe Hydrologic Unit is any rain event that causes stormwater runoff from the project site. Sampling results are part of the Annual Report and must be reported to the Resident Engineer (RE).

1.4.5 Monitoring, Sampling, Reporting and Record Keeping

The CGP and LTCGP require that a Construction Site Monitoring Program (CSMP) be developed by a QSD for all projects. The CSMP must be developed before beginning work and revised to reflect current construction activities. The CSMP will include sections based on a project's risk level determination for projects regulated under the CGP. Sampling and Analysis Plan (SAP) requirements for each risk level are listed below in Table 1-8 and requirements for projects regulated under the LTCGP are listed in Table 1-9.

Table 1 8. Monitoring Requirements for CGP

Risk Level	Visual Inspection	Sampling		
		Non-visible Pollutant	Effluent	Receiving Water
1	Three types required for all Risk Levels: daily, weekly and quarterly	All Risk Levels SAP required	Where applicable	Not required
2			pH and turbidity SAP required	Not required
3			pH, turbidity and ATS SAP required	If receiving water monitoring trigger exceeded (pH, SSC, and Turbidity). Bioassessment for sites 30 acres or greater. SAP required

Table 1 9. Monitoring Requirements for LTCGP

Visual Inspection	Non-visible Pollutant	Effluent*	Receiving Water
Non-storm water, pre-storm, during (daily storm BMP) and post-qualifying rain events.	SAP required	pH, turbidity and ATS SAP required	If receiving water monitoring trigger exceeded (pH and Turbidity), bioassessment for sites 30 acres or greater. SAP required

*Sampling results must be submitted within five days after storm event

1.4.5.1 Visual Site Monitoring

All CGP projects are required to conduct quarterly non-storm water visual site monitoring inspections. Quarterly inspections shall occur in the following inspection periods: January-March, April-June, July-September, and October-December. Quarterly monitoring specifically serves to document the presence or evidence of any non-storm discharge (authorized or unauthorized), pollutant characteristics, and potential pollutant source accounting. For these inspections, the WPC Manager or their representative must visually observe each drainage area for the presence of (or indications of prior) unauthorized and authorized non-storm water discharges and identification of their sources. BMPs must be assessed for effectiveness and integrity. Observations of stormwater or non-stormwater conveyed through and off of the project site must include notice of the presence of floating and suspended materials, oil sheen on the water or ground surface, water discoloration, turbidity, foul or nuisance odors, and sources of observed pollutants for flowing and contained stormwater.

For storm-related visual site monitoring inspections, the WPC Manager or their trained representative must perform a pre-storm inspection within two business days prior to a 50 percent forecasted rain event that may produce 0.10 inches of rain or greater. Qualifying rain events trigger sampling and analysis of stormwater runoff from all discharge locations, to be analyzed for pH and turbidity (only turbidity for the LTCGP). Caltrans defines a qualifying rain event to be any 50 percent forecasted storm that produces or is forecasted to produce at least 0.50 inch of precipitation at the time of discharge, with a 72-hour dry period between events for projects regulated under the CGP. The 2015 standard specifications will be applicable to any project that is Ready to List after June 2016. The 2015 specifications follow the CGP definition for QREs which define it as any 50 percent forecasted storm that produces or is forecasted to produce at least a 0.50 inch of precipitation at the time of discharge, with a 48-hour or greater period between events. For LTCGP projects, the WPC Manager or their trained representative must comply with the inspection requirements as outlined in Appendix C of the LTCGP which include 24 hours before an anticipated precipitation event in the form of rain (defined as chance of precipitation is forecasted at 30 percent or greater). A QRE under the LTCGP is defined as a 30 percent forecasted rain event that causes stormwater runoff from the project limits or to an active MS4. During the pre-storm inspections, it is important to identify any spills, leaks, or uncontrolled pollutant sources. If needed, corrective actions should be implemented and all BMPs must be inspected to identify whether they have been properly implemented in accordance with the SWPPP. All corrections to the BMPs must be made before the forecasted rain event. When there is a 50 percent forecasted rain event which is forecasted to produce 0.10 inches of rain or more and lasts greater than 24-hours, a visual inspection must be made during business hours of each successive working day. If spills or leaks are not cleaned properly after identifying them in the pre-storm inspection, Section 700 SAP for non-visibles must be implemented as outlined in Section 1.4.5.3 of this Manual.

Post-storm visual site monitoring is required under the CGP within 48 hours of a qualifying rain event. A qualifying event is a storm that produces precipitation of 0.5 inch or greater at the time of discharge. Post-qualifying rain event inspections require projects to identify whether BMPs were adequately designed, implemented, and effective. Additionally, the visual inspection must include the identification of BMPs necessary and revisions to the SWPPP accordingly. The LTCGP require inspections within 24 hours after actual storm events.

The WPC Manager must maintain on-site records of all visual observations, personnel performing the observations, observation dates, weather conditions, locations observed, and corrective actions taken in response to the observations.

1.4.5.2 SAPs

The CSMP must include the SAPs necessary to monitor the effectiveness of the WPC practices and meet the CGP and LTCGP monitoring requirements. As many as six separate SAPs may be required as part of the CSMP. All CSMPs shall have the following SAPs:

- General,
- Non-visible Pollutants, and
- Non-stormwater Discharges

If applicable, the CSMP will include SAPs:

- Stormwater pH and Turbidity,
- Monitoring Required by Regional Board, and
- Monitoring of ATS

The SAPs must include a site health and safety plan and all personnel involved with the sampling must be trained to collect water quality samples and operation of sampling equipment. The training must be documented and included in the SAP.

Additionally, the SAPs included in the CSMP must include all the water quality sampling procedures that will be used for the project. The procedures must include the calibration, O&M of the sampling equipment that will be used for sample collection. Procedures that must be described in the SAPs include:

- Laboratory selection and certification,
- Sample preparation, collection, labeling and preservation,
- Sample collection and chain-of-custody (COC) documentation,
- Field measurement methods and parameters,
- Analytical methods,
- Data management and reporting, and
- Quality assurance and quality control.

Samples collected and submitted to a laboratory for analysis must follow water quality sampling procedures and be submitted to a State-certified laboratory under 40 CFR Part 136 "Guidelines Establishing Test Procedures for the Analysis of Pollutants". The SAP must establish the identity of the State-certified laboratory, sample containers, preservation requirements, holding times, and analysis method required. A list of State-certified laboratories can be found online at:

<http://www.cdph.ca.gov/certlic/labs/Pages/ELAP.aspx>

Sample collection or no sample collection must be documented during precipitation. If dangerous weather conditions such as flooding or electrical storm occurs, or if the QRE occurs outside of scheduled work hours, physical sample collection is not required, however, documentation must show/support the weather conditions were too dangerous to sample. To support QRE reporting, a rain gauge must be installed and maintained on the project site.

Sample locations must be identified on SWPPP drawings (WPCDs). If discharge or sampling locations change due to work activities or a change in site conditions, the WPC Manager must update the potential sampling locations list and update the WPCDs.

1.4.5.3 Non-Visible Pollutant Monitoring

A SAP must be developed to monitor pollutants that are not visually detectable in stormwater. Construction discharges that contain pollutants of concern (POC) may be found in materials used in large quantities at construction sites.

Water quality standards that apply to materials such as cement, fly ash, and other recycled materials and byproducts depend on their composition. Although some pollutants are not listed as California Toxics Rule (CTR) pollutants, they may have a numeric water quality objectives listed in the Basin Plan for the watershed(s) in which the project is located. WPC Managers are encouraged to discuss concerns about water quality standards with RWQCB staff and other local jurisdictional water quality professionals.

Although preventing and eliminating the exposure of pollutants at construction sites is not always possible, it is essential to institute proper storage, disposal, and application of material to minimize the potential for non-visible pollutant monitoring. The SAP for non-visible pollutants must include a list that contains potential pollutants based on a review of potential sources. The QSD must review existing environmental and real estate documentation to determine the potential pollutants that could be present in a project area as a result of current or past land use activities. The application of soil amendments, which include soil stabilization materials that could potentially change the pH or contribute toxic pollutants to stormwater, must be included in the SAP.

The SAP for non-visible pollutants must include sampling procedures and schedule for sample collection. Specifically, sample collection should be conducted as follows: during the first two hours of rain events that generate runoff, during work hours, target each non-visible pollutant source, and include location and instructions for an uncontaminated control sample collection. Control samples should be collected from a location that does not come in contact with materials, wastes or areas associated with potential non-visible pollutants or DSAs within the project site limits.

1.4.5.4 Receiving Water Monitoring

For Risk Level 3 projects receiving water monitoring triggers were identified for pH and Turbidity as shown in Table 1.4-5. For projects with temporary Active Treatment Systems (ATS) that discharge directly into a receiving water, to meet receiving water limitations discharges are subject to NELs. When receiving water monitoring trigger or ATS NEL is exceeded, upstream and downstream receiving water monitoring for pH, turbidity, and SSC is required. The receiving water sampling points must be indicated on the WPCDs.

1.4.5.4.1 Bioassessment Monitoring

Bioassessment monitoring is required for projects that are determined to be Risk Level 3 and the project discharges directly to a freshwater wadeable stream that is either listed as impaired due to sediment and/or tributary to a downstream waterbody that is listed for sediment; or for projects with a total project-related ground disturbance greater than 30 acres. Bioassessment monitoring is conducted to assess the effect of the project on the biological integrity of receiving waters. For Caltrans projects, Caltrans will perform bioassessment monitoring when required.

Bioassessments must include the collection and reporting of specified in-stream biological data and specified in-stream physical habitat data. Macroinvertebrate samples must be collected both before any soil has been disturbed and after the project has been completed. The post-construction sample must be collected at a minimum of one winter season following completion of construction. Both preconstruction and post-construction samples must be collected upstream and downstream from the project area.

Field sampling methods and handling must comply with the specified techniques listed in “Standard Operating Procedures for Collecting Benthic Macroinvertebrate Samples and Associated Physical and

Chemical Data for Ambient Bioassessments in California" (Ode 2007). This document can be found online at:

http://www.waterboards.ca.gov/water_issues/programs/swamp/docs/swamp_sop_bio.pdf

To qualify for bioassessment exception the project must complete a series of steps. For more information regarding exemption procedures contact the RWQCB for approval of sampling exceptions.

1.4.5.5 Records and Reporting Requirements

All documents for stormwater monitoring information and copies of all reports (including the Annual Report) must be kept for a period of three years. All projects must keep all records on-site while construction is ongoing. Documentation requirements depend on the project's Risk Level or if the project is in the Lake Tahoe Hydrologic Unit. Applicable records that must be in the SWPPP files include:

- Site inspection reports which must document the:
 - Date, place, time of facility inspections, sampling, visual observation, and/or measurements, including precipitation
 - Individual(s) who performed the facility inspections, sampling, visual inspections, and/or measurements
- Sampling and analysis results which must document the:
 - Date and approximate time of analyses
 - Individual(s) who performed the analyses
- A summary of all analytical results from the last three years, TMDLs and reporting units, and the analytical techniques or methods used
- Rain gauge readings taken at project site
- Quality assurance/quality control records and results
- Non-storm water discharge visual monitoring inspections and stormwater discharge visual monitoring inspection records
- Visual inspection and sample collection exception records
- Any corrective actions and follow-up activities that resulted from analytical results, visual monitoring inspections, or site inspections
- Permits obtained by Caltrans such as Fish & Wildlife permits, US Army Corps of Engineers (USACOE) permits, RWQCB 401 Certifications, and RWQCB WDRs for Aerially Deposited Lead (ADL) Reuse, etc.

Section 900 of the SWPPP template contains the file categories for these records. The file categories will assist in the assembly of the annual report. The numbering system for file categories generally corresponds to Caltrans form numbers.

1.4.5.5.1 Water Quality Analytical Results and Evaluation

An electronic and printed copy of water quality analytical results, and quality assurance and quality control must be submitted within 48 hours of field analysis sampling by completing and submitting CEM-2052 Stormwater Sample Field Test Report. Samples that were submitted to a laboratory for analysis must be reported within 30 days of collection. Included in the submittal must be an evaluation of the collected downstream in relation to the control sample. If the downstream sample indicates an increased level of pollution, the WPC practices must be assessed along with the site conditions, and surrounding influences that could contribute to the increased level of the pollution.

Acceptable electronic file formats include MS Excel (.xls extension), MS Word (.doc extension), text files (.txt extension), or comma-delimited files (.csv extension). All submittals must include:

- Sample identification number
- Contract number
- Constituent
- Reported value
- Analytical method
- Method detection limit
- Reported limit

1.4.5.5.2 NAL Exceedance Report

If the effluent sample exceeds an NAL for Risk Level 2 or Risk Level 3 projects, then the RE must be notified and a NAL Exceedance Report must be submitted. All Risk Level 3 projects must electronically submit all qualifying rain event sampling results to the State and Regional Boards through the electronic data system no later than five days after the conclusion of a qualifying rain event, if a NAL was exceeded. In the event that any effluent sample exceeds an applicable NAL, all Risk Level 2 projects must electronically submit all qualifying rain event sampling results to the State and Regional Boards no later than ten days after conclusion of the QRE. The RWQCBs have the authority to require the submittal of an NAL Exceedance Report.

Specifically, the NAL Exceedance Report is required to contain:

- The analytical method(s), method reporting unit(s), and method detection limit(s) of each analytical parameter (analytical results that are less than the method detection limit are to be reported as “less than the method detection limit or <TMDL”)
- The date, place, and time of sampling
- Any visual observations (inspections)
- Any measurements, including precipitation
- A description of the current BMPs associated with the effluent sample that exceeded the NAL and any proposed corrective actions taken

1.4.6 Minimum Requirements Specified

Dischargers shall minimize or prevent pollutants in stormwater discharges and non-stormwater discharges through the use of controls, structures, and management practices that achieve BAT for toxic and non-conventional pollutants and BCT for conventional pollutants.

The CGP specifies minimum required BMPs (based on project’s Risk Level) for:

- Good Site Management “Housekeeping”
- Non-stormwater Management
- Erosion Control
- Sediment Controls
- Run-on and Runoff Controls

The CGP and the LTCGP specify requirements for BMP inspection, maintenance and repair. Inspections must be performed weekly and at least once each 24-hour period during extended QREs. Some BMPs need to be inspected daily under the CGP, as well as, all BMPs need to be inspected daily under the LTCGP. Caltrans specifications and plans, and SWPPP Section 500 include the CGP and the LTCGP minimum required BMPs.

1.4.7 Rain Event Action Plan

For Risk Level 2 and 3 projects, a REAP must be prepared for each forecasted storm event to protect all exposed portions of the project site. REAPs must be developed by the WPC Manager to protect the jobsite at least 48 hours before a forecasted storm event. The CGP requirement is that a REAP be prepared for any likely precipitation event which would include events with forecasted precipitation of 0.10 inch or more of precipitation. To avoid unnecessary REAPs and project delays based on precipitation events that produce a small amount of measurable precipitation, such as overcast days with ground fog along the coast, Caltrans has interpreted forecasted storm events to be storm events where both the chance for precipitation is 50 percent or greater and the amount of precipitation could cause run-off from the project site at a .10 of an inch or greater. In order for the forecasted storm event to trigger a REAP the probability of precipitation (PoP) must have at least 50 percent chance of occurrence of a 0.10 of an inch or greater within the following 72 hours. The WPC Manager must monitor the National Weather Service Forecast Office on a daily basis. NWS real-time forecasts are available online at:

<http://www.wrh.noaa.gov/index.php>

The REAP must be available onsite at least 48 hours prior to a forecasted storm event. A printed copy of each REAP (CEM 2045 or CEM-2045T) must be at every job site and included in the SWPPP. The REAP must use approved forms and include:

- Site location
- Risk level
- Contact information including 24-hour emergency phone numbers for:
 - WPC Manager
 - Erosion and Sediment Control providers or subcontractors
 - Storm water sampling providers or subcontractors
- Storm Information
- Construction phase:
 - Highway Construction including active and inactive areas for work activities for building roads and structures
 - Plant Establishment including maintenance on vegetation installed for final stabilization where areas are inactive
 - Suspension where work activities are suspended and areas are inactive
- Construction phase information including:
 - Construction activities
 - Subcontractors and trades on the job site
 - Pre-storm activities including:
 - Responsibilities of the WPC manager
 - Responsibilities of the crew and crew size
 - Stabilization for active and inactive DSAs
 - Stockpile management
 - Corrective actions for deficiencies identified during pre-storm visual inspection
 - Time of crew deployment
 - Activities to be done during forecasted storm events including:

- Responsibilities of the WPC manager
- Responsibilities of the crew and crew size
- BMP maintenance and repair
- Description of flood contingency measures

The REAP must be implemented and crews must be mobilized to complete necessary activities no later than 24 hours before precipitation occurs.

If the WPC Manager or the RE identifies a deficiency in the implementation of the accepted SWPPP, the deficiency must be corrected immediately unless the RE authorizes an agreed date for correction. The correction must occur before the onset of precipitation.

If failure to correct the deficiency by the scheduled date or by the onset of precipitation occurs, Caltrans may correct the deficiency and deduct the cost of correcting the deficiency from payment. Failure to comply with the corrective action may result in the suspension of work by the RE until the project complies with the requirements of the SWPPP.

For projects subject to the LTCGP, a REAP is required during any period in which construction activity is ongoing. A WPC Manager must submit a REAP no later than 24 hours prior to any weather pattern that is forecast to have a 30 percent or greater chance of producing precipitation as rainfall in the project area. The QSP shall obtain, for each day of construction operations, a printed copy of precipitation forecast information from the National Weather Service (NWS) Forecast Office and keep the copy with the SWPPP monitoring records.

1.4.8 ATS Requirements

An ATS treatment system is one that uses chemical coagulant, chemical flocculation, or electrocoagulation in order to reduce turbidity caused by fine suspended sediment. ATS is used for instances where traditional erosion and sediment controls do not effectively control accelerated erosion. Under such circumstances, where stormwater discharges leaving the site may cause or contribute to an exceedance of water quality standards, the use of an ATS may be necessary. Additionally, it may be appropriate to use an ATS when site constraints inhibit the ability to construct a sediment basin large enough to detain the volume of all forecasted storm events required to eliminate sediment sized particles from the discharge waters of said basin, or for sites with a larger fraction of clays, silts, or other colloidal sized particles within the site soils distribution, or for sites with highly erosive soils, clay and/or highly erosive soils are present, or when the site is very steep across long slope lengths.

The CGP and the LTCGP established NELs for discharges from construction sites that utilize an ATS. These systems lend themselves to NELs for turbidity and pH because of known treatment standards. The design standard for an ATS is a 10-year, 24-hour storm event.

Operators must be trained to effectively operate and maintain an ATS safely. Appropriate operator training ensures that all State Water Board monitoring and sampling requirements are met. The CGP and the LTCGP require that all ATS operators have training specific to using ATS's liquid coagulants. Additional information is included in the PPDG Section 6.4.4.4 and its Appendix C.3.

1.4.9 Stormwater Annual Reporting Requirements

The Contractor must prepare a Stormwater Annual Report each year. The RE must ensure that an Annual Report is electronically submitted by September 1 of each year to the SWRCB for all projects enrolled for more than one continuous three-month period under the CGP. The Annual Report serves to annually certify project compliance. Management of documentation and thorough record keeping are required to ensure compliance with reporting requirements. The Annual Report must include documentation to

support that the monitoring objectives and qualified training have been met. An electronic or paper copy of each Annual Report must be kept by Caltrans for a period of three years after project completion.

The LTCGP requires an Annual Report for all projects enrolled in Storm Water Multi Application Reporting and Tracking System (SMARTS) and it must be submitted by November 30 of each year.

The WPCM or QSD should use the following CEM forms to compile the information needed for the Annual Report:

- Stormwater Training Record Form CEM-2023
- Stormwater Training Log Form CEM-2024
- Stormwater Site Inspection Reports documented in CEM-2030
- Daily Stormwater Site Inspection Reports documented in CEM-2031T for projects in the Lake Tahoe Hydrologic Unit
- Stormwater Corrective Action Summary Reports CEM-2035
- Rain Event Action Plan forms, CEM-2045 or CEM-2045T for projects in the Lake Tahoe Hydrologic Unit
- Stormwater Sampling and Testing Activity Log CEM-2051
- Stormwater Sample Field Test Report form using CEM-2052
- Notice of Discharge Report CEM-2061 or CEM-2061T for projects in the Lake Tahoe Hydrologic Unit
- NAL Exceedance Report, CEM-2062 or CEM-2062T for projects in the Lake Tahoe Hydrologic Unit
- NEL Violation Report Form, CEM-2063 or CEM-2063T for projects in the Lake Tahoe Hydrologic Unit

The SWRCB has prepared a CGP Annual Report SMARTs help guide that can be accessed at:

http://www.swrcb.ca.gov/water_issues/programs/stormwater/docs/construction/cgp_annual_report.pdf

1.4.10 Monitoring Documentation

The Annual Report requires that monitoring documentation be submitted. Record keeping of sampling and other action items conducted throughout the reporting year must be saved to ensure that the requirements of the Annual Report are met. Monitoring documentation must include:

- A summary and evaluation of all sampling and analysis results, this includes copies of laboratory reports associated with samples collected throughout the reporting year
- Analytical method(s), method reporting unit(s), and method detection limit(s) of each analytical parameter. Moreover, analytical results that are less than the method detection limit shall be reported as “less than the method detection limit”
- A summary of corrective actions taken to correct BMPs used
- Any compliance activities or corrective actions that were not implemented
- A summary of any violations of the CGP or LTCGP that occurred during the reporting period
- The names of individual(s) who performed the facility inspections, sampling, visual observations (inspections), and/or measurements
- The date, place, time of facility inspections, sampling, visual observation (inspections), and/or measurements, including precipitation (rain gauge)
- Visual observation and sample collection exception records and reports that are determined by the Risk Level of the project site

1.4.10.1 Training Documentation

Documentation of all training for individuals responsible for activities associated with BMP installation, inspection, maintenance, and repair must be included. Additionally, training and training documentation

is required for individuals that are responsible for overseeing, revising, and amending the SWPPP. Training material includes documentation of informal and formal training conducted by the WPC Manager, QSD, QSP, or a qualified trainer. Documentation for informal on-site training should include topics covered, time, date, attendees, and trainer.

1.4.11 Post-Construction Requirements

The CGP and LTCGP require stormwater performance standards that specifically address water quality and channel protection for forecasted storm events. Runoff reduction requirements apply to projects, unless the project area is subject to post-construction standards of an active Phase I or II municipal separate storm sewer system (MS4) permit that has an authorized Stormwater Management Program (SWMP).

Post-construction standards require that through the use of non-structural and structural measures the project must meet pre-project water balances for the smallest storms up to the 85th percentile storm event. The Regional Board must be informed at least 30 days prior to the use of any structural control measure for compliance with this requirement. When seeking approval to use a structural control measure the infeasibility of a non-structural practice must be documented and must demonstrate that there will be fewer water quality impacts through using structural practices.

The Caltrans Permit is an MS4 permit that incorporates post-construction treatment control requirements specific to Caltrans projects statewide. Caltrans projects are therefore exempt from the post-construction requirements of the CGP. Non-Caltrans projects must still comply with the CGP post-construction requirements (such as encroachment permits or locally funded projects). The projects' SWDR will provide the analysis and form the basis for the inclusion of appropriate Treatment (post-construction) BMPs.

1.5 Storm Water Multiple Application and Report Tracking System

All projects subject to the CGP or LTCGP are required to upload relevant documents (including SWPPPs) to the online SMARTS system developed and managed by the SWRCB. Typically, the RE, DSWC or other Caltrans designated staff will review and upload all SMARTS entries. The Contractor's prepared documents such as the submitted SWPPP, REAPs, Inspection reports, Corrective Action Reports are reviewed and accepted by Caltrans and subsequently uploaded to SMARTS as required by the CGP, the LTCGP and/or the Caltrans Permit. Other reports such as effluent or non-visible sampling, Rainfall Erosivity Waivers, or IGP NOI might also be required based on site conditions or as directed by the RE.

Caltrans has developed a SMARTS manual to assist staff when filling or preparing PRDs or other SMARTS's submittals, it is located here

http://www.dot.ca.gov/hq/construc/stormwater/documents/SMARTS_Manual.pdf

Section 2

Determination of Construction Site Best Management Practices

This section provides instructions for the determination of some construction site BMPs. The Caltrans *Construction Site BMPs Manual* should be used as guidance for determining project site BMPs. It is important to note that the requirements of this Section are based on Caltrans minimum requirements, and that contract special provisions and plans may impose more stringent requirements on a project-by-project basis. Any changes to the BMP implementation after approval of the SWPPP or WPCP will require updating or amending the SWPPP or WPCP.

2.1 Definitions

2.1.1 Stormwater Discharge

Stormwater discharges consist only of those discharges that originate from precipitation events. Stormwater is defined in the CFRs (40 C.F.R. § 122.26(b)(13)) as stormwater runoff, snowmelt runoff, and surface runoff and drainage. During precipitation events, stormwater picks up and transports pollutants into and through MS4s and ultimately to waters of the United States.

2.1.2 Non-Stormwater Discharge

Non-storm water discharges consist of all discharges that do not originate from precipitation events. Generally, non-stormwater discharges to an MS4 are prohibited, conditionally exempt from prohibition, or regulated separately by an NPDES permit. The categories of conditionally exempt non-stormwater discharge are specified at 40 CFRs section 122.26(d)(2)(iv)(B)(1). Non-stormwater discharges that are regulated by a separate NPDES permit are not subject to the discharge prohibition. Prohibited non-stormwater discharges include conditionally exempt discharges that are found to be a source of pollutants to waters of the United States. Illicit discharges must also be prohibited. An illicit discharge is defined in 40 CFRs section 122.26(b)(2) as "any discharge to a municipal storm sewer that is not composed entirely of storm water except discharges pursuant to an NPDES permit (other than the NPDES Permit for discharges from the MS4) and discharges resulting from firefighting activities." Provision B of the Caltrans Permit addresses non-storm water discharge. Non-storm water discharges to an MS4 with a discharge to an Areas of Special Biological Significance (ASBS) are subject to a different set of conditions as stated in Finding 22.a of the Caltrans Permit.

2.1.3 Disturbed Soil Area (DSA)

DSAs are areas of exposed, erodible soil that are within the construction limits and that result from construction activities. The following are not considered DSAs:

- Areas where temporary soil stabilization, erosion control, or slope protection have been applied and associated drainage facilities are in place, functional, and stabilized.
- Roadways, construction roads, access roads or contractor's yards that have been stabilized by the placement of compacted sub-base, base material, or paved surfacing.

- Areas where construction has been completed in conformance with the contract plans and permanent erosion control is in place and functional or permanent vegetation is established.
- For areas without permanent hard covers, soil stabilization is considered functional when a uniform vegetative cover equivalent to 70 percent of the native background vegetation coverage has been established or equivalent stabilization measures have been employed.

2.1.4 Active Areas and Inactive Areas

Active Areas are construction areas where soil-disturbing work activities have occurred at least once within 15 days. Inactive Areas are areas where soil-disturbing work activities have not occurred within 15 days. The SWPPP applies to all areas and item work of the project. A water pollution control schedule must be submitted with the SWPPP and must be updated regularly to ensure all areas, item work and associated temporary BMPs are adequately installed, maintained and documented. The RE will conduct a review of the existing water pollution control schedule and active areas on a regular basis to determine if an inactive status should be applied to some DSAs.

2.1.5 Slope Length and Benches

Slope length is measured or calculated along the continuous inclined surface. Each discrete slope is between one of the following: top to toe, top to bench, bench to bench, and bench to toe.

Benches are drainage facilities that intercept surface flow, break up slope lengths and convey the resulting concentrated flow away from a slope. For the purpose of determining slope lengths, fiber rolls or other appropriate BMPs can be considered equivalent to a bench.

2.2 Temporary Soil Stabilization and Sediment Control Implementation Guidance

Stormwater pollution control measures are required to be implemented on a year-round basis at an appropriate level. The requirements must be implemented in a proactive manner during all seasons while construction is ongoing. California has varied rainfall patterns throughout the state; therefore, the appropriate level of BMP implementation will also vary throughout the state. The temporary soil stabilization and sediment control BMPs specified in this section are based on rainfall patterns (time frames, intensities, and amounts), general soil types, seasons, slope inclinations and slope lengths. Appropriate water pollution control includes the implementation of an effective combination of both soil stabilizing erosion and sediment control BMPs.

The following subsections describe both general principles and specific guidance for selecting and implementing temporary soil stabilization and sediment control BMPs. See Table 2-1 for a summary of the required temporary soil stabilization and sediment control BMPs.

Table 2 1. Required Temporary Soil Stabilization and Sediment Control BMPs⁽¹⁾

Risk Level	Temporary BMP Type	Options for Temporary BMPs
		BMP Number ⁽²⁾
1	SOIL STABILIZATION ⁽³⁾	SS-1, SS-2, single or combination of SS-3 to SS-8, SS-10
	PERIMETER SEDIMENT BARRIER ⁽⁴⁾	single or combination of SC-1 or SC-5, SC-6, SC-8, SC-9
	RUN-ON	SC-5, SC-6, SC-8, SS-9
	RUN-OFF	SC-4, SS-9, SS-10, SS-11, SS-12
	TRACKING	TC-1 and SC-7 (at minimum), TC-2, TC-3
2	SOIL STABILIZATION ⁽³⁾⁽⁵⁾	SS-1, SS-2, single or combination of SS-3 to SS-8, SS-10
	SEDIMENT BARRIER ⁽⁴⁾	single or combination of SC-1 or SC-5, SC-6, SC-8, SC-9
	RUN-ON	SC-5, SC-6, SC-8, SS-9
	RUN-OFF	SC-4, SS-9, SS-10, SS-11, SS-12
	TRACKING	TC-1 and SC-7 (at minimum), TC-2, TC-3
	GRADE BREAK ⁽⁶⁾	SC-5, SC-6 or SC-8
3	SOIL STABILIZATION ⁽³⁾⁽⁵⁾	SS-1, SS-2, single or combination of SS-3 to SS-8, SS-10
	SEDIMENT BARRIER ⁽⁴⁾	single or combination of SC-1 or SC-5, SC-6, SC-8, SC-9
	RUN-ON	SC-5, SC-6, SC-8, SS-9
	RUN-OFF	SC-4, SS-9, SS-10, SS-11, SS-12
	TRACKING	TC-1 and SC-7 (at minimum), TC-2, TC-3
	GRADE BREAK ⁽⁶⁾	SC-5, SC-6 or SC-8

(1) BMPs requirements of the CGP with associated Caltrans approved BMP options to meet the requirements.

(2) BMP numbers from the Caltrans Construction Site BMPs Manual.

(3) Required immediately for inactive DSAs which include all finished slopes and disturbed areas of construction not scheduled to be re-disturbed for at least 15 days.

(4) Sediment controls and barriers include all temporary sediment control construction BMPs identified in the SWMP.

(5) Required for active areas at least 24 hours prior to a forecasted storm event.

(6) Grade break BMPs are linear barriers that must be installed perpendicular to flow in accordance with the following: flat to 25 percent slopes maximum every 20-foot spacing, 25-50 percent slopes maximum every 15-foot spacing, and steeper than 50 percent slopes maximum every 10-foot spacing.

2.2.1 Scheduling

Construction scheduling shall consider the amount and duration of soil exposed to erosion by wind, rainfall, runoff, and vehicle tracking. Construction activities should be scheduled to minimize DSA during the time of the year when rainfall can be expected. A graphical water pollution control schedule (WPCS) shall be prepared that shows the sequencing of construction activities with the installation and maintenance of soil stabilization and sediment control BMPs. The WPCS should be updated routinely to ensure it reflects site conditions.

2.2.2 Preservation of Existing Vegetation

Preserving existing vegetation to the maximum extent possible and for as long as possible on a construction site reduces or eliminates erosion in those areas. To facilitate this practice, temporary fencing should be installed prior to commencement of clearing, grubbing or other soil-disturbing activities in areas where no construction activity is planned.

2.2.3 Stormwater Run-on and Concentrated Flows

The diversion of stormwater run-on and conveyance of concentrated flows must be considered in determining the appropriateness of the BMPs chosen. BMPs to divert or manage concentrated flows in a non-erodible fashion may be required on a project-by-project basis to divert off-site drainage through or around the construction site or to properly manage construction site stormwater runoff.

2.2.4 DSA Management

The DSA management guidelines are based on rainfall patterns (time frames, intensities, and amounts), general soil types, seasons, slope inclinations, and slope lengths. All of these factors must be considered in order to develop the appropriate levels of soil stabilizing and sediment control measures.

2.2.5 DSA Size Limitations

Limiting the amount of disturbed soil is a critical component in conducting an effective stormwater management program.

The Caltrans Standard Specifications place no limitations on the size of the project's total DSA. The limitation on DSA has been removed because of the risk based approach taken by the CGP and the requirements for year round sediment and erosion control BMPs. The contractor can opt to utilize DSA size limitations as a BMP.

DSAs shall be protected as follows:

- Temporary control practices for inactive DSAs shall be implemented in accordance with Table 2-1 of this Manual and shown on the water pollution control schedule.
- Temporary control practices for active DSAs shall be implemented in accordance with Table 2-1 of this Manual.

For inactive DSAs, limit the erosive effects of stormwater flow on slopes by implementing BMPs such as fiber rolls to break up the slope lengths as follows:

1. Slope inclination 1:4 (Vertical versus Horizontal [V:H]) and flatter: BMPs shall be placed on slopes at intervals no greater than 20 feet.
2. Slope inclination between 1:4 (V:H) and 1:2 (V:H): BMPs shall be placed on slopes at intervals no greater than 15 feet.
3. Slope inclination 1:2 (V:H) or greater: BMPs shall be placed on slopes at intervals no greater than 10 feet.

For inactive DSAs, permanent erosion control shall be applied to areas deemed complete as soon as possible but may need to be delayed until the project's defined seeding window.

Provide construction site BMPs in addition to those specified in Table 2-1 to convey concentrated flows in a non-erodible fashion.

Do not use fiber rolls on slopes where soil conditions do not warrant (slopes prone to surface failure).

2.2.6 Soil Stockpiles

Temporary soil stockpiles shall be protected with temporary soil stabilization and/or sediment controls when required per Caltrans Standard Specifications and Standard Plans. Section 500 of the SWPPP or Section 30 of the WPCP lists various materials that can be used for soil stockpile management.

Caltrans specifications require Contractors to cover active and inactive soil stockpiles with soil stabilization material or a temporary cover and surround them with a linear sediment barrier.

2.2.7 Sediment/Desilting Basins

The nature of linear projects and constrained rights-of-way inherent to Caltrans work may prohibit the use of sediment/desilting basins at some locations on certain projects and on some projects altogether. Sediment basins shall, at minimum, be designed according to Caltrans requirements or the method provided in California Stormwater Quality Association's (CASQA)'s Construction BMP Guidance Handbook. The required sediment/desilting basin shall be constructed in accordance with contract documents and in conjunction with other soil stabilization and sediment control measures.

2.3 Guidance for Implementation of Other BMPs

2.3.1 Mobile Operations

Mobile operations common to the construction of a project include asphalt recycling, concrete mixing, crushing and the storage of materials. BMPs shall be implemented as necessary, to control potential pollution that mobile operations may create.

The Caltrans Permit requires Caltrans to obtain coverage for any stormwater discharges associated with industrial activities under the Statewide Industrial General Permit for each batch plant and industrial facility, as defined in the Statewide Industrial General Permit. Please check with your District NPDES coordinator to determine specific regional requirements or exemptions.

The State Board website specifically addresses this issue noting that: "...if a contractor plans to operate: (1) a batch plant to manufacture Portland Cement Concrete, Hot Mixed Asphalt, or other material, or (2) a crushing plant to produce rock or aggregate, as part of a Caltrans project, either outside the job site or within the job site, that serves 1 or more contracts, the contractor must obtain coverage under the Industrial General Permit."¹.

2.3.2 Wind Erosion Controls

Wind erosion controls shall be considered for all DSAs on the project site that are subject to wind erosion and when significant wind and dry conditions are anticipated during construction of the project. Refer to the Caltrans Standard Specifications for BMP line items for Wind Erosion Control BMPs, Caltrans Standard Specifications and for further reference see the *Construction Site BMPs Manual*.

2.3.3 Tracking Controls

Tracking controls shall be implemented, as needed, to reduce the tracking of sediment and debris from the construction site. At a minimum, entrances and exits shall be inspected daily, and controls implemented as needed. Refer to the Caltrans Standard Specifications for BMP line items for Tracking Control BMPs (including Street Sweeping), Caltrans Standard Plans and for further reference see the *Construction Site BMPs Manual*.

2.3.4 Job Site Management (Non-Stormwater and Waste Management and Materials Pollution Controls)

The objective of the job site management (non-stormwater and waste management and materials pollution controls) is to reduce the discharge of materials other than stormwater to the stormwater drainage system or to receiving waters. These controls shall be implemented year-round for all applicable activities, material usage, and site conditions. Refer to the Caltrans Standard Specifications and for further reference see the *Construction Site BMPs Manual*.

¹ State Water Resources Control Board, Frequently Asked Questions, Caltrans Construction, available at http://www.waterboards.ca.gov/water_issues/programs/stormwater/caltrans.shtml

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Section 3

Preparing a Storm Water Pollution Prevention Plan

3.1 Preparation and Authorization of a SWPPP

The contractor must prepare a Stormwater Pollution Prevention Plan (SWPPP) for projects that will create one acre or more of soil disturbance. For projects that are less than 5 acres and qualify for an EPA Rainfall Erosivity Waiver (see Section 1.4.2.1 of this Manual), the contractor shall prepare a WPCP. The SWPPP must comply with the CGP or the LTCGP, Contract Special Provisions, Caltrans Standard Specifications Section 13 Water Pollution Control, and it must be prepared in accordance with the procedures and general format set forth in this Manual. Refer to the following website for more information on Caltrans Construction Contract Standards:

http://www.dot.ca.gov/hq/esc/oe/construction_standards.html

This section provides instructions that contractors' QSDs shall use to prepare the project SWPPP. This section also contains instructions for the preparation of SWPPP Attachments and Appendices. The Permit requires that the SWPPP apply to all areas that are directly related to the construction activity, including but not limited to asphalt and/or concrete batch plants solely for the project, staging areas, storage yards, material borrow areas, access roads, etc., whether or not they reside within the Caltrans rights-of-way.

The contractor's QSD shall prepare and submit a complete SWPPP to the RE for review and authorization. If revisions are required, as determined by the RE, the contractor's QSD shall revise the SWPPP as noted. The time frames for SWPPP submittal, review, and resubmittal are specified in the contract special provisions or Caltrans Standard Specifications Section 13 Water Pollution Control. No construction activity having the potential to cause water pollution, as determined by the RE, shall be performed until the SWPPP has been authorized by the RE.

Three copies of the SWPPPs shall be submitted to Caltrans in a 3-ring binder with dividers and tabs for the Department's review. When the SWPPP is authorized, submit 4 printed copies in 3-ring binders with dividers and tabs and an electronic file (Adobe® Portable Document Format ("pdf")) of the SWPPP.

After the SWPPP has been authorized, the SWPPP will require updates and may require amendments or revisions. Updates are minor and may be made by the WPC Manager and then submitted to the RE. SWPPP amendments and revisions require RE approval. Updates to the SWPPP include:

- Adding information into SWPPP file categories such as REAPs, schedule updates and stormwater site inspection reports
- Increasing the quantity of a BMP shown in the SWPPP requires update to WPCDs
- Location change of a BMP shown on the WPCDs required because of field conditions requires update to WPCDs
- Additional BMPs are required by a REAP

Amendments to the SWPPP must be certified and are required when:

- There are amendments to the Permits

- There are any changes in construction activities or operations that may affect the discharge of pollutants from the construction site to surface waters, groundwater, or municipal separate storm sewer system (MS4)
- There are Permit violations
- The general objective of reducing pollutants in stormwater discharges is not achieved. For example, a BMP not shown in the SWPPP is necessary, such as when silt fences are needed in addition to fiber rolls

Revision of the SWPPP is required when:

- The number of SWPPP amendments or the amount of information contained in the amendments makes implementation of the SWPPP confusing
- Contractor requests to revise the SWPPP based on planned changes in construction activities that would require a major SWPPP amendment
- The project risk level changes

3.2 Information Provided by Caltrans

Caltrans may supply certain water quality-related information developed during the design process for use by the contractor, by way of the Information Handout (IH) and contract documents. This information is intended to provide the contractor with information that substantiates Caltrans' generation of quantities for selected construction site temporary BMPs, as well as show the location of placement of the construction site temporary and post-construction permanent BMPs. The contractor may use provided information to prepare a SWPPP.

3.2.1 Contract Bid Items, Specifications, and Details

Caltrans will provide contract bid items and minimum quantities for temporary BMPs. The contractor shall use these items to prepare the project SWPPP. The method of payment for these items will be specified in the contract special provisions and/or standard specifications section 13. It should be noted that the location of these BMPs when shown on the plans are approximate. The actual locations shall be determined by the contractor and shown on SWPPP Attachment BB, WPCDs, and listed on SWPPP Attachment CC, Water Pollution Control BMPs List.

3.2.2 Job Site Management

Job Site Management BMPs include Non-Stormwater Management Pollution Control BMPs and Waste Management and Materials Pollution Control BMPs that are not identified in the contract as separate contract bid items but are necessary for the project and must be included in the SWPPP.

3.2.3 Stormwater IH for SWPPP Preparation

The following stormwater information necessary for the preparation of a project SWPPP should be provided in the project IH or should be requested from the project RE. The Stormwater Data Report (SWDR) prepared by Caltrans for the project should contain most of the following information.

Vicinity Map. A map extending approximately one quarter mile (1,320 feet) beyond the property boundaries of the construction site showing: the construction site, surface water bodies (including known springs and wetlands), known wells, an outline of offsite drainage areas that discharge into the construction site, general topography, and the anticipated discharge location(s) where stormwater discharges to a municipal storm drain system or other water bodies. A U.S. Geological Survey (USGS) quad map may be used for showing the project site and a one-quarter mile (1,320 feet) extension beyond the property boundaries of the construction site.

Risk Level. Caltrans will provide the Risk Level Determination for the projects regulated under the CGP, which will dictate the type of BMPs that must be implemented on the site and CSMP Requirements. Attention must be paid to the construction dates used for the calculation for the R value, if the dates have changed, the values should be recalculated to ensure Risk Level is still applicable.

List of Pre-Construction (Existing) BMPs. A list and/or written descriptions of existing pre-construction BMPs, if any, that are already in place to reduce sediment and other pollutants in stormwater discharges. These pre-construction BMPs may consist of rock slope protection, infiltration basins, detention basins, biofiltration swales and strips, media filters, etc. If there are no pre-construction BMPs, then this may be indicated.

List of Permanent (Post-Construction) Stormwater BMPs. A written listing and narrative descriptions of post- construction permanent BMPs that have been included and incorporated in the project; this information should be in the SWDR. Narrative descriptions may also include O&M procedures for the permanent BMPs, O&M short term and long term funding, and a statement indicating that the Maintenance Department will be responsible for O&M of the post construction BMPs.

Layout Sheets Showing Suggested Temporary BMP Locations. The contract plan layouts sheets will show the location of anticipated construction site BMPs or the BMPs will be shown on contract plan quantity summary sheets. The contract plan layout sheets may show suggested location of anticipated contractor staging areas and other contractor support facilities.

Explanation of Construction Site (Temporary) BMPs. A brief narrative explanation of the various temporary BMPs that may be implemented in the project, including any existing permanent BMPs that may be present within the project limits that can be used during construction, as well as any permanent BMPs that should be constructed early for use as a temporary BMP during construction, such as early application of permanent soil stabilization measures in areas that will no longer experience soil disturbance during construction.

Copy of Notice of Intent (NOI). For Caltrans projects, a copy of the NOI for the project shall be submitted by Caltrans. The contractor shall insert a copy of the NOI and the WDID Number receipt letter issued for the project into Attachment B of the SWPPP.

For non-Caltrans projects, the Local Agency / Private Entity administering the project should have submitted a NOI for the project. A copy of the NOI and the WDID Number receipt letter issued for the project shall be inserted into Attachment B of the SWPPP.

Other Plans/Permits/Agreements. Other agencies may have issued permits or agreements (such as USACOE permit or Department of Fish and Game agreement) or have plan requirements for the construction of the project or imposed certain conditions. If so, a written description of the permit/agreement conditions and a copy of the permit/agreement will be provided by Caltrans for inclusion in Attachment F to the SWPPP.

For construction oversight projects, the Local Agency/Private Entity who administers the project is responsible for securing and providing all necessary permits, agreements, and approvals to Caltrans. The Local Agency / Private Entity who administers the project shall include copies of the permit/agreement in Attachment F of the SWPPP.

Construction Site Estimates. The IH may contain the SWDR which includes for the project site an estimate of the:

- Construction site area in acres
- Total disturbed area in acres
- Runoff coefficient of the construction site before and after construction

- Percentage of the area of the construction site that is impervious (e.g., pavement, building, etc.) before and after construction

3.2.4 Other Stormwater Information

The IH may also include any other information that would explain the decisions or rationale behind the selection and deployment of temporary construction site and permanent BMPs chosen by the designer. Examples include the designer's estimated staging of the project and estimated time of year for those stages; and any specific BMP deployments that are considered to be critical to the success of the contractor's SWPPP.

Stormwater Data Report (SWDR). The IH may include the SWDR or relevant portions. The SWDR may include the subsequent information below as well as preliminary designs for permanent BMPs.

Drainage Information. The IH may include a copy of the drainage information, such as the drainage report for the project, hydrology maps, delineation of drainage boundaries, concentrations of runoff, and runoff coefficients sufficient to determine peak discharges or run-on flowcharts.

Soils/Geotechnical Report, Project Materials Report and/or Other Reports. To the extent information is available from the soils/geotechnical report, the project materials report, site investigation report developed by the Hazardous Waste Section, or other regulatory or environmental compliance documentation, the IH may include a description of all toxic materials known to have been treated, stored, disposed, spilled, or leaked in significant quantities onto the construction site, and any WDRs issued by the RWQCB related to toxic materials.

The Nature of Fill Material and Existing Data Describing the Soil. The IH may include a copy of the project materials report (geotechnical report). The contractor must describe the conditions of the fill material and the soil that can be found at the construction site (i.e., types of soils, groundwater location and conditions, dewatering operations that may be necessary, etc.). Fill material should be described as whether it is native or non-native, contaminated or uncontaminated, and its coverage technique (i.e., native soil coverage, asphalt or concrete coverage, and/or landscape).

Conceptual SWPPP. In some cases, Caltrans may prepare a Conceptual SWPPP (CSWPPP) for a project. The CSWPPP will provide additional direction and convey specific BMP expectations to the contractor. However, the CSWPPP shall not be considered a complete SWPPP and shall not replace the contractor's SWPPP, since CSWPPPs are prepared assuming standard construction practices and may not reflect the contractor's actual methods of construction, access requirements or project phasing. When a CSWPPP has been prepared, the information is made available to the contractor as part of the IH. The contractor shall use the CSWPPP as a guide and reference tool to develop and submit the contract SWPPP that includes all elements of the CSWPPP and any additional elements required to complete the SWPPP in conformance with the contract special provisions, Caltrans Standard Specifications, the Permits, any other local requirements, and the procedures and general format set forth in this Manual.

3.3 SWPPP Builder

This section provides step-by-step SWPPP preparation procedures, Caltrans SWPPP Builder Instructions, and examples / example text. The SWPPP Builder has been developed in Microsoft® Access with the following objectives:

1. Provide easy data entry for contractor's QSD to prepare SWPPPs (instructions can be viewed in the SWPPP Builder sections while the SWPPP is being prepared).
2. Provide consistency in content and format of all SWPPPs prepared and submitted to Caltrans (thus making the SWPPP review process more efficient).

Instructions for using the electronic version of the SWPPP Builder:

1. Download the appropriate SWPPP Builder from the Caltrans Web site at:
<http://www.dot.ca.gov/hq/construc/stormwater>
2. Complete all applicable sections of the SWPPP Builder. Sections contain fields for information entry that will populate the necessary fields in Adobe® PDF. A preview section of the SWPPP with completed text for each section, including instructions, can be printed.
3. The final SWPPP can be viewed to perform final edits, as necessary. Instructions on printing will be provided at the end of this Section.

The SWPPP Builder shown in this section includes step-by-step instructions and section examples where appropriate for the following:

SWPPP Title Page

SWPPP Table of Contents

- | | |
|-------------|--|
| Section 100 | SWPPP Certifications and Acceptance |
| Section 200 | Objectives |
| Section 300 | Project and Contractor Information |
| Section 400 | References Other Plans, Permits and Agreements |
| Section 500 | Determination of Construction Site BMPs |
| Section 600 | Project Site Implementation Program |
| Section 700 | Construction Site Monitoring Program |
| Section 800 | Post Construction Control Practices |
| Section 900 | SWPPP Reporting Requirements |

Guidance for preparing SWPPP Section 700 CSMP is available in Caltrans *Construction Site Monitoring Program Guidance Manual*. Step-by-step CSMP template instructions and SAP examples are provided where appropriate in the Caltrans *Construction Site Monitoring Program Guidance Manual*.

The SWPPP Builder includes instructions within the database. Examples are generally included with instructions.

3.3.1 SWPPP Builder Instructions

This section provides instructions on how to begin the preparation of a SWPPP using the Caltrans SWPPP Builder. The SWPPP Builder uses the primary entry information to create necessary SWPPP sections to populate. Information given within the first two windows will hide unnecessary sections or provide necessary information. Information is used to automate section text within portions of the SWPPP Builder. Information used to generate portions of the SWPPP is:

- Administering entity
- Calculated Risk Level
- ‘Yes’ or ‘no’ answers to Quick Answers

For the remainder of Section 3, SWPPP Builder Instructions are displayed in **blue text**. Examples and Example Text are displayed in **green text**.

Getting Started Instructions

Open the SWPPP Builder application. When the application has been opened the home Screen will appear (Figure 3-1). Use the computer mouse and click-on **Create a New SWPPP**.

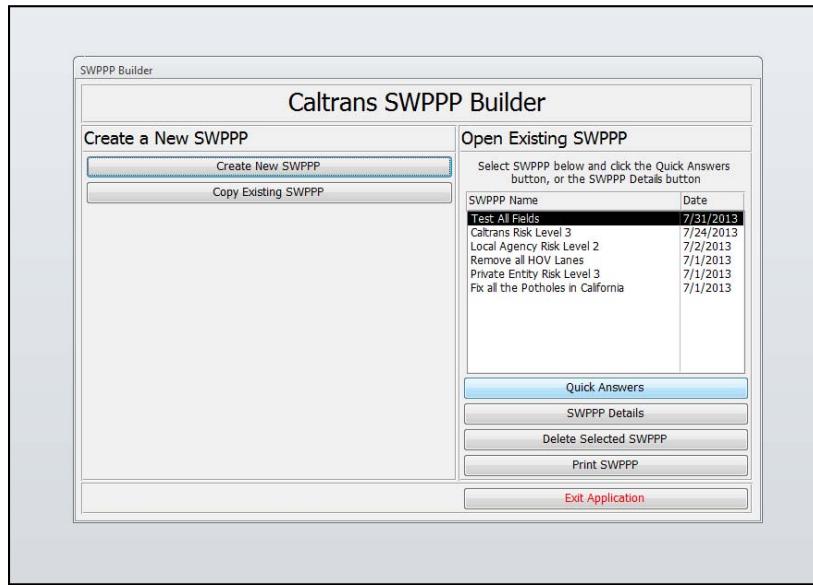


Figure 3-1. Caltrans SWPPP Builder Home Screen

The window will change to a new window to populate initial project information (Figure 3-2). The date that the SWPPP was created will automatically populate. Enter the project name in SWPPP Name and press enter:

The screenshot shows a 'New SWPPP' dialog box. It has fields for 'SWPPP Name' (with a placeholder 'Project Name'), 'Who Administer' (a dropdown menu), 'Risk Level' (a dropdown menu), and a date field 'Date Created' set to '8/12/2013'. At the bottom are 'Quick Answers' and 'Close' buttons.

Figure 3-2. New SWPPP Form

Use the drop-down windows to choose who will administer the project (Figure 3-3). SWPPP Builder creates fields based on the primary information provided. Next choose from the drop-down the calculated Risk Level of the project (Figure 3-4).

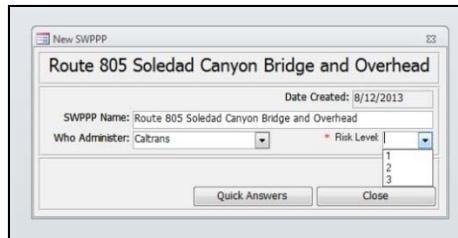


Figure 3-3. New Project Name

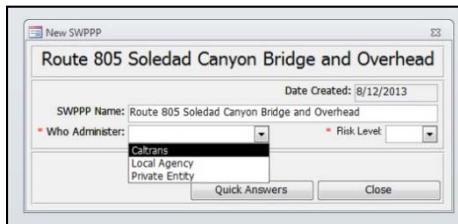


Figure 3-4. New SWPPP Project Administration Choice

Click-on **Quick Answers** to continue creating the SWPPP (Figure 3-5). The window will change to a series of ‘yes’ or ‘no’ checkboxes that are based on section specific questions. Based on the whether ‘yes’ or ‘no’ are checked, different sections will be made available. The process is described below.

Section #	Section Title	Question	Answer
Title		The WPC Manager must be a QSD. Is there a separate QSD (from the WPC Manager) for the project?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
Title		Is there a separate QSP (from the WPC Manager) for the project?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
100.1	Legally Responsible Person Certification and Caltrans Approval	Has the Local Agency LRP authorized the RE as Approved Signatory?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
300.3	Construction Sites Estimates	Does the project site receive run-on from off-site areas?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
300.6	Contact Information for Responsible Parties	Does the Contractor have a site manager separate from the WPC Manager?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
500.1.2	Potential Pollutants from Site Features or Known Contaminants	Did the project site have Former Industrial Operations	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
500.1.2	Potential Pollutants from Site Features or Known Contaminants	Did the project site have Historic Contamination	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
700.2.1.2	Monitoring Preparation	Will samples be collected by the Contractor?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No
700.2.1.2	Monitoring Preparation	Will samples be collected by a Consultant or Laboratory?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No

Figure 3-5. Quick Answers Screen

Quick Answers Instructions

The Quick Answers pop-up window consists of 17 questions which determine which sections will be available to populate during SWPPP Detail Population. Questions are ‘yes’ or ‘no’ format. It is advised that these questions are answered first. See Table 3-1 for a complete set of Quick Answers Questions.

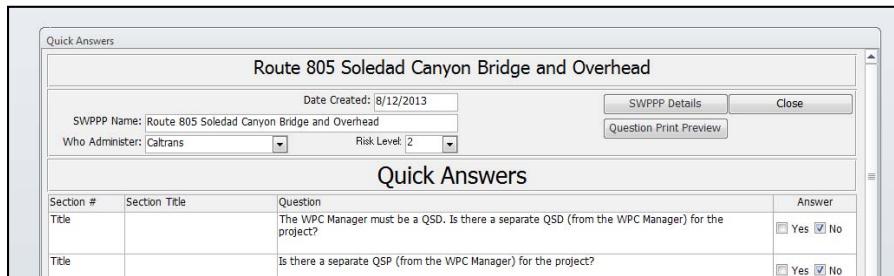
Table 3 1. Quick Answers Questions and Affected Sections

Section	Title	Quick Answers Question	Affected Section
Title	Title Page	The WPC Manager must be a QSD. Does the WPC Manager meet the QSD requirements?	This question is a preliminary question to ensure that the WPC Manager is a QSD.
		Is there a separate QSD (from the WPC Manager) for the project?	This question is a preliminary question to ensure there is a designated QSD, either WPC Manager or a separate QSD.
		Is there an alternate WPC Manager for the project?	This question is a preliminary question to ensure there is a designated alternate WPC Manager in case designated WPCM is unavailable.
300.3	Construction Sites Estimates	Does the project site receive run-on from off-site areas?	This populates the checkbox in Section 300.3 with a 'yes' or 'no'.
300.6	Contact Information for Responsible Parties	Does the Contractor have a site manager separate from the WPC Manager?	This question is a preliminary question to ensure there SWPPP has a complete contact information for the site's responsible party
500.1.2	Potential Pollutants from Site Features or Known Contaminates	Did the project site have Former Industrial Operations?	This populates the checkbox in Section 500.1.2 with a 'yes' or 'no'.
		Did the project site have Historic Contamination?	
700.2.1.2	Monitoring Preparation	Will samples be collected by the Contractor?	This question is a preliminary question to ensure that Monitoring Preparation has occurred.
		Will samples be collected by a Consultant or Laboratory?	
700.2.2.5	Sample Analysis	Will some non-visible pollutant measurements be taken in the field (e.g., chlorine by field test kit)?	This populates the checkbox in Section 700.2.2.5 with a 'yes' or 'no', answer dependent.
700.2.3	SAP for Non-stormwater Discharges	Does the project have a dewatering permit?	Checking 'yes' or 'no' in Quick Answers will affect the fields provided in 700.2.3.1 and 700.2.3.3.1.
700.2.3.1	Scope of Monitoring Activities	Does this project have dewatering operations?	Whether 'yes' or 'no' is checked for Quick Answers 700.2.3, additional entry sections are available for dewatering. See Instructions for 700.2.3.1.
700.2.4	SAP for Stormwater pH and Turbidity	Is the risk level determination for this project based on high receiving water risk?	Whether 'yes' or 'no' are checked for Quick Answers, automated SWPPP text will be modified to include sediment sensitive receiving water body.
700.2.4.3.2	Potential Sampling Locations	Does the Project site have discharge locations that discharge directly to sediment-sensitive-listed water body?	By checking Yes, Sections 700.2.3.3.2.3 and 700.2.4.3.2.4 are made available.
		Does the project receive run-on with the potential to combine with stormwater discharges?	
700.2.5	SAP for Monitoring Required by Regional Board	Is the RWQCB requiring additional monitoring from parameters already required by the CGP?	By checking Yes in Quick Answers 700.2.5, the entire 700.2.5 will be made available to populate. If No is checked, Section 700.2.5 will remain blank.

Table 3 1. Quick Answers Questions and Affected Sections

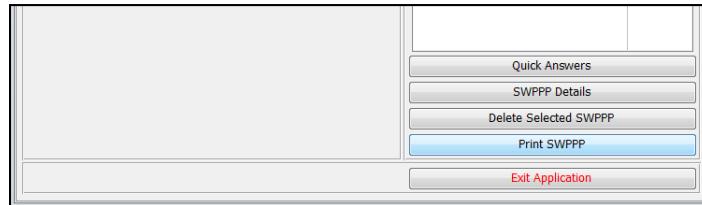
Section	Title	Quick Answers Question	Affected Section
700.2.5.3.2	Potential Sampling Locations	Does the project receive run-on with the potential to combine with stormwater that discharges directly to the impaired water body?	By checking Yes in Quick Answers 700.2.5, this section will be available to populate. When Yes has been checked for Quick Answer 700.2.5.3.2, an additional field is available. See instructions for Section 7002.5.3.2 for further detail.
700.2.6	SAP for Monitoring of ATS	Is an ATS to be deployed on site?	By checking Yes in Quick Answers, section 700.2.6 will be available to populate.

Once Quick Answers have been completed, the user has the option to close out of the window by clicking-on **Close** or continue (**SWPPP Details**) to populate SWPPP sections with the necessary information. See instructions in Figure 3-6 below.

**Figure 3-6. Close Quick Answers Screen**

Printing Instructions

From the SWPPP Builder Home Screen, select **Print SWPPP** (Figure 3-7).

**Figure 3-7. Access Print Screen Window**

From the Print Screen, the SWPPP Sections can be previewed or a PDF of a section or the entire SWPPP can be created and saved in the PDF Folder Location shown Figure 3-8 at the bottom of the window.

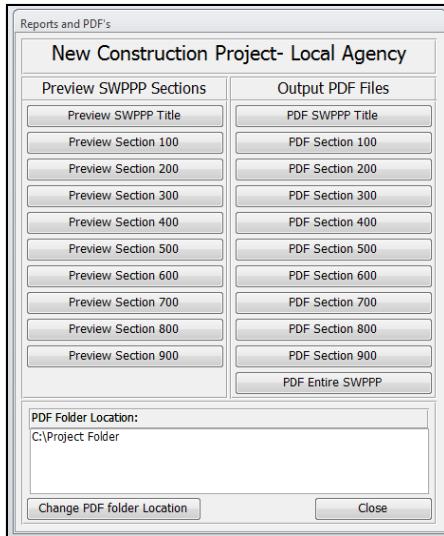


Figure 3-8. Print Screen Window

A warning will come up when the **PDF Entire SWPPP** is selected that the process will re-create (overwrite) section PDF's created in the folder. Select **Yes** to continue saving the file or **No** to cancel.

SWPPP Detail Instructions

The **SWPPP Detail** section provides the framework for the SWPPP document. Risk Level and Quick Answer based sections are provided to populate with project information. Entered information can be viewed throughout the process and before final export into PDF.

SWPPP Detail can be accessed from either the startup window or the Quick Answers window (Figure 3-9).

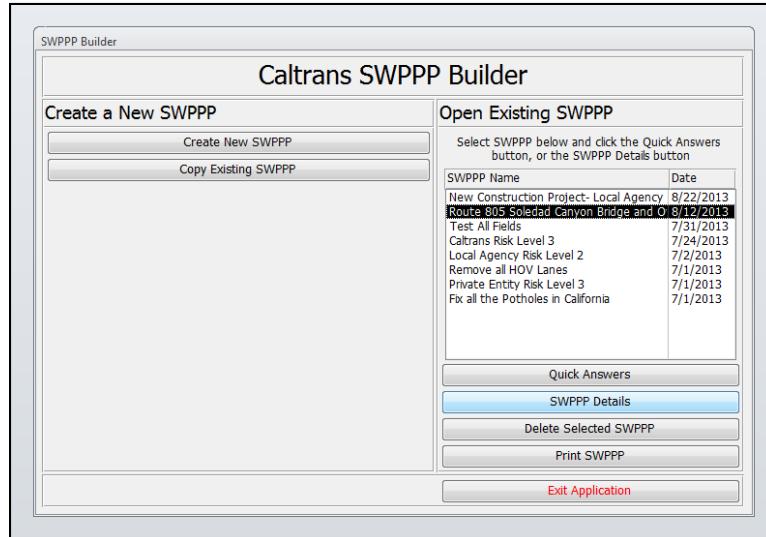


Figure 3-9. Startup Window

Click-on SWPPP Details button. A new entry window will appear that shows the different required sections to populate for the SWPPP (Figure 3-10). Sections contain automated required text. Each listed section will either have narrative text, lists, and/or tables to populate for section completion. This manual addresses the required information needed to complete listed SWPPP sections.

Section	Was Viewed	Is Completed
Title	Y	N
100.1	Y	N
100.2	Y	N
100.3.1	Y	N
300.1	Y	N
300.3	Y	N
300.4	N	N
300.5	N	N
300.6	N	N
300.7	N	N
300.8	N	N
400	N	N
500.1.1	Y	N
500.1.2	N	N
500.1.3	N	N

Figure 3-10. SWPPP Details Screen

Main Menu

Once the SWPPP Details Main Menu is open, the list of sections is available for viewing and editing. This menu will also indicate if a section is completed.

To View a Section:

To navigate from section to section click-on the **Section Number** listed on the right of the screen. Once a section has been viewed, a **Y** will appear in the **Was Viewed** column (Figure 3-11).

Select Section	Viewed	Completed
Section	Was Viewed	Is Completed
Title	Y	N
100.1	N	N
100.2	N	N
100.3.1	N	N

Figure 3-11. Section Navigation

The section will appear in the window (Figure 3-12). Sections typically have tabs for Instructions and for information entry on the upper left side of the viewing window.

Figure 3-12. Section Instructions Tab

The user can go back to sections to make edits at any time.

To Review a Section:

Once the information has been entered, the user can click-on **Preview Section**. A pop-up window will appear (Figure 3-13) with the automated required SWPPP text which is populated with the construction site specific information entered by the user. At the bottom of the pop-up window, the user can click forward to review additional pages.

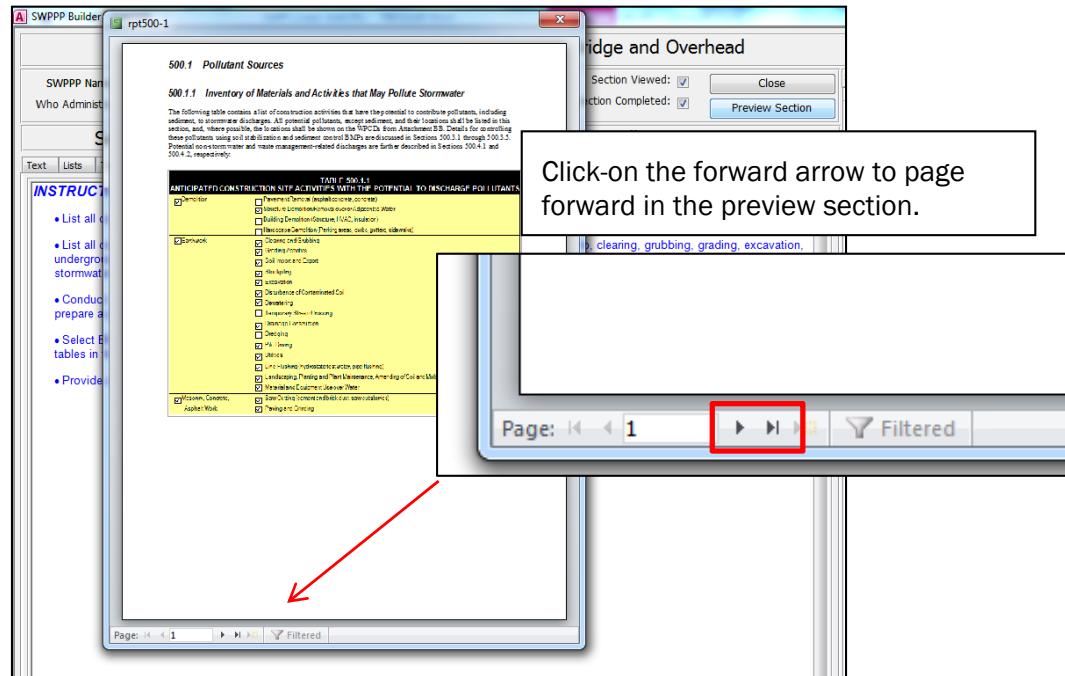


Figure 3-13. Preview Section Screen

To Complete a Section:

Once a section has been completed, the user can check the box for **Section Completed**. Once this box has been checked, a Y will appear in the **Is Completed** column associated with the section. This assists in keeping track of which sections have been completed.

The user may then either **Close** the window, which saves information added to continue at a later date, or select another Section to complete.

Title

To complete this section, the user must enter the following information in the provided fields, regardless of Risk Level:

Leave the WDID Number blank on the initial SWPPP submittal. The WDID number will be obtained by Caltrans or the Local Agency/Private Entity administering the project. When you receive the WDID number, insert it by writing or typing it on the SWPPP cover page.

The title page information fields for the information listed below:

- Construction Project Name
- Caltrans Contract Number and Project Identifier Number
- If a Local Agency/Private Entity is administering the project, insert the Caltrans encroachment permit number issued to the Local Agency/Private Entity and Caltrans encroachment permit number issued to the Contractor. Note: The Encroachment Permit Number for the Local Agency and for the Contractor number will automatically populate Section 100.2
- Identification and address of Lead Agency (Caltrans or Local Agency)
- RE Name and Telephone Number
- Contractor's Name, Address, Telephone Number and Contact Person, note the Water Pollution Control (WPC) Manager, QSD, or QSP
- Job Site Address and Telephone Number, if any
- If there is a separate QSD for the project, provide the name and title of Contractor's QSD, as well as the WPC Manager and QSP. The WPC Manager must be a certified QSD, so the WPC Manager and the QSD may be the same person. The QSD is responsible for writing, amending, and certifying the SWPPP. Also provide the name of the WPCM alternate if one is designated
- If a separate QSP is appointed for the project, the QSP shall be responsible for SWPPP implementation, inspection and repairs, and shall be available at all times throughout the duration of the project (see also Section 700.1). If a QSP is not appointed, the WPC Manager or the QSD shall perform the responsibilities of the QSP
- Name of the company that developed the SWPPP (if it was prepared by an outside consultant), including name and title of preparer if different from the WPC Manager and the QSD listed above
- SWPPP Date

The remaining portion of Section 3 presents SWPPP Preparation Guidance Instructions, Examples, and Sample Text for the SWPPP Template and provides additional information and instructions specific to using the SWPPP Builder. The information is presented for each section of the SWPPP.

SECTION 100

SWPPP CERTIFICATIONS AND ACCEPTANCE

100.1 *Legally Responsible Person (LRP) Certification and Caltrans Acceptance*

SWPPP GUIDANCE INSTRUCTIONS

Include a Separator and Tab for Section 100 for ready reference. This section is based on the checked box for Quick Answer 100.1, automated text is supplied for the section depending on who the authorized AS is or the LRP. Additional information is provided below to assist in the SWPPP process. There is no additional information needed to be entered in the SWPPP Builder for this section.

CALTRANS ADMINISTERED PROJECTS

- The SWPPP, as part of the PRDs, must be certified by the LRP or a person legally authorized to sign and certify PRDs (the LRP's Approved Signatory); in conformance with Section IV.I and Section IV.J of CGP (CAS000002, Order No. 2009- 009-DWQ) and its associated amendments (Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ).
- The District Director, or RE as an authorized AS, shall sign and date the approval certificate.
- Print the District Director's or RE's name and telephone number.
- Include the LRP authorization for the RE to be the AS as Attachment A.
- Include a copy of the NOI and documentation of SWRCB-issued WDID Number as Attachment B.

LOCAL AGENCY ADMINISTERED PROJECTS

- The SWPPP, as part of the PRDs must be certified by the LRP or a person legally authorized to sign and certify PRDs (the LRP's Approved Signatory); in conformance with Section IV.I and Section IV.J of the CGP (CAS000002, Order No. 2009- 009-DWQ) and its associated amendments (Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ).
- The Local Agency LRP, or Local Agency RE when authorized, shall sign and date the approval certification.
- Print the Local Agency LRP or Local Agency RE's name and telephone number.
- The Caltrans Oversight Engineer shall sign and date the SWPPP.
- Print the Caltrans Oversight Engineer's name and telephone number.
- Include a copy of the SWRCB-issued WDID Number and NOI form as Attachment B.

PRIVATE ENTITY ADMINISTERED PROJECTS

- The SWPPP, as part of the PRDs, must be certified by the LRP; in conformance with Section IV.I and Section IV.J of the CGP (CAS000002, Order No. 2009-009-DWQ) and its associated amendments (Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ).
- The Private Entity LRP shall sign and date the approval certification.
- Print the Private Entity LRP name, title and telephone number.
- The Caltrans Oversight Engineer shall sign and date the SWPPP.
- Print the Caltrans Oversight Engineer's name and telephone number.
- Include a copy of the SWRCB-issued WDID Number and NOI form as Attachment B.

100.2 *Contractor and QSD SWPPP Certification*

For this Section, the administering agency for the SWPPP determines which fields will be provided to populate.

SWPPP Builder Instructions

Caltrans: Enter the QSD's Title.

Local Agency or Private Entity: Enter the Contractor's Owner/Representative's Title and the QSD's Title.

SWPPP GUIDANCE INSTRUCTIONS

- The Contractor is required to certify the SWPPP.
- The Contractor is required by the contract specifications to have a QSD develop, amend, and certify the SWPPP, and have a QSD implement the SWPPP.
- The SWPPP shall be submitted to the RE for review and authorization.

If a Local Agency/Private Entity is administering the project, type the project name, the Caltrans encroachment permit number issued to the Local Agency/Private Entity, and the Caltrans encroachment permit number issued to the Contractor in the fields provided in the Title Section. For an Encroachment Permit project, the LRP for the initial project will also be the LRP for this SWPPP.

The contractor's Certification shall be signed by Contractor; specifically, the person responsible for overall management of the site, such as a corporation officer or person assigned the responsibility by a corporation officer, according to corporation procedures.

The QSDs certification statement shall be signed and dated by Contractor's QSD who developed the SWPPP.

100.3 Amendments

100.3.1 SWPPP Amendments Certification and Acceptance

SWPPP GUIDANCE INSTRUCTIONS

When changes in the authorized SWPPP are required, the Contractor's WPC Manager shall prepare changes to the SWPPP. Amendments to SWPPP require the following:

- The WPC Manager must be a qualified QSD and maintain one of the registrations or certifications required by the CGP for a QSD.
- The WPC Manager shall certify SWPPP amendments and submit them to the RE for review and approval.
- Be used as the cover sheet for each amendment.
- All amendments shall be recorded on CEM-2009 SWPPP/WPCP Amendment Log, available in Appendix B. Amendment Logs shall be kept in SWPPP File Category 20.02: Stormwater Pollution Prevention Plan Amendments. A copy of the Amendment Log shall be inserted into Attachment AA.
- Authorized amendments should be inserted into the appropriate SWPPP section or attachment when possible and a copy shall be kept in Attachment AA.
- The Contractor amendment certification and Caltrans amendment approval by the LRP, or RE if authorized AS, as provided in the CEM-2008 SWPPP/WPCP Amendment Certification and Acceptance form, shall be attached to the SWPPP amendment and inserted into Attachment AA.
- The following information shall be described in each amendment:
 - Who requested the amendment
 - The location of proposed change
 - The reason for the change
 - The original BMPs proposed, if any
 - The new BMP proposed
 - Any existing implemented BMP(s)

The SWPPP Amendment Certification and Acceptance form (CEM-2008) shall be used as the cover sheet for each amendment and shall include the following information:

- The printed project name, Caltrans contract number, and if applicable, the Caltrans encroachment permit number
- The printed Contractor's name and telephone number
- The Contractor's signature and the date
- The printed name of the Caltrans LRP, or RE if authorized Approved Signatory, and telephone number

When the amendment is accepted, the Caltrans LRP, or RE if authorized as the AS, shall sign and date the SWPPP Amendment Certification and Approval form (CEM-2008).

- Accepted amendments shall be inserted into the SWPPP in Attachment AA. SWPPP/WPCP Amendment Certification and Acceptance forms shall be included in Attachment AA.
- All SWPPP amendments shall be documented in the Amendment Log (CEM-2009) and kept in SWPPP File Category 20.02: Stormwater Pollution Prevention Plan Amendments. A copy of the Amendment Log shall also be inserted into Attachment AA.

SWPPP Builder Instructions

Enter narrative text for SWPPP Amendments Certification and Accepted Section. When an amendment is made it should include: who requested the amendment; the location of proposed change; the original BMP proposed, if any; the new BMP proposed; and any existing implemented BMP(s).

100.4 Annual Compliance and Approval

This section is based on the checked box for Quick Answer 100.1, automated text is supplied for the section depending on who administers the project. Additional information is provided below to assist in the SWPPP development process. There is no additional information needed to be entered in the SWPPP Builder for this section.

SWPPP GUIDANCE INSTRUCTIONS

- A blank copy of CEM-2070 SWPPP/WPCP Annual Certification of Compliance form and Contractor's Annual Certification of Compliance form to be signed by the LRP is provided in Appendix C.
- Include completed and signed Annual Certification of Compliance forms in SWPPP File Category 20.70: Annual Certification of Compliance.

CALTRANS ADMINISTERED PROJECTS

- The LRP or authorized AS shall certify annually that construction activities comply with the requirements of the CGP or the LTCGP and the SWPPP.
- The Contractor's Annual Certification of Compliance shall be completed by the Contractor before July 15 of each year and submitted to the RE. This Certification is based upon the site inspections required in Section 700 of this Manual.

LOCAL AGENCY / PRIVATE ENTITY ADMINISTERED PROJECT

- When a Local Agency is administering the project, then the LRP for the Local Agency, or the RE if authorized to be the AS, must sign the Annual Certification of Compliance.
- When a Private Entity is administering the project, then the Private Entity LRP must sign the Annual Certification of Compliance and submit the completed Annual Certification of Compliance to the Caltrans Oversight Engineer by July 15 of each year.
- When a Local Agency / Private Entity is administering the project, then the Caltrans Oversight Engineer must review and sign that the Annual Certification of Compliance if accepted.

SECTION 200

OBJECTIVES

SWPPP GUIDANCE INSTRUCTIONS

This section contains required text that has been automated into the SWPPP process. There is no additional information needed to be entered in the SWPPP Builder for this section. For SWPPP submission:

- Include a Separator and Tab for Section 200 for ready reference.
- The five primary SWPPP objectives are described in the CGP, Section XIV, SWPPP Requirements, and are automatically populated into this section. Pollutant source identification and BMP selections shall be documented in the SWPPP to support the five SWPPP objectives.
- If the project falls under the LTCGP, the four primary SWPPP objectives are described in the LTCGP Section IX and are automatically populated into this section. Pollutant source identification and BMP selections shall be documented in the SWPPP to support the four SWPPP objectives.

SECTION 300

PROJECT AND CONTRACTOR INFORMATION

SWPPP GUIDANCE INSTRUCTIONS

For the printed submission of this section include a Separator and Tab for Section 300 for ready reference.

300.1 Project Description

SWPPP Builder Instructions

In the narrative text area, provide the project description (county, cities, route and post-mile). Name the receiving waters and describe proximity to receiving waters to which the project will discharge, including surface waters, drainage channels, and drainage systems (identify who owns the drainage system; e.g., municipality or agency.). An example of a project description is provided below.

Figure 3-14. Section 300.1 Project Description

EXAMPLE TEXT

The construction project is located in Any County, in Any City, on State Route 42 from Post mile X to Post mile Y. The project will upgrade the westbound two-lane span by replacing the existing substandard steel truss bridge with a four-lane suspension bridge (which includes one high-occupancy vehicle (HOV) lane and a bicycle/pedestrian lane). The receiving water is the Salmon River, and the new suspension bridge consists of two towers in the Strait and a north and south anchorage. The existing maintenance facility will be demolished. This project also includes constructing a vista point at the north end of the bridge and a bicycle lane from the Route 80/29 separation to the south end of the bridge.

300.2 *Project Risk Level*

The previously entered Risk Level is automatically inserted into the required text that has been automated into the SWPPP process. There is no additional information needed to be entered in the SWPPP Builder for this section.

300.3 *Construction Sites Estimates*

SWPPP GUIDANCE INSTRUCTIONS

Provide an estimate of the features identified below.

- Construction site area (acres).
- Runoff coefficient before and after construction.
- Percentage impervious area before and after construction.
- Anticipated stormwater run-on to the construction site from off site in cubic feet per second (cfs).

- Show run-on flow calculations using the Rational Method ($Q = CIA$) or a comparably appropriate method:

Area Runoff Coefficient	= (A)
Area Rainfall Intensity	= in/hour (B)
Drainage Area	= acres (C)
Site Area Run-on	
Discharge (A) x (B) x (C)	= cfs (D)
- Item A. The runoff coefficient represents the percent of water that will run off the ground surface during the storm. Values of the coefficient, "C", can be determined from Figure 819.2A, Runoff Coefficients for Undeveloped Areas (included in Example 2 below), and Figure 819.2B, Runoff Coefficients for Developed Areas (included as part of these instructions), from *Caltrans Highway Design Manual*.

Refer to the *Caltrans Highway Design Manual*, Topic 819 – Estimating Design Discharge, for a more detailed explanation of calculating weighted runoff coefficients for areas containing varying amounts of different cover.

- Item B. Rainfall intensity, "I", in inches per hour, is the average rainfall intensity for the selected frequency. Refer to the County Flood Control, USACOE manuals, and/or locally approved drainage manuals for project-specific rainfall intensity values.
- Item C. Drainage area, "A", in acres, includes impervious and pervious areas and surfaces covered by buildings.
- QSD shall provide calculations for off-site run-on if flow quantities are not available via the project design documents (Drainage Report, Hydrology Report, etc.)
- The rational method should not be used for drainage areas greater than 320 acres (1.3 km²). See *Caltrans, Highway Design Manual*, Section 819.2.

Table 3 2. Runoff Coefficients for Developed Areas

Type of Drainage Area	Runoff Coefficient
Business:	
Downtown areas	0.70 - 0.95
Neighborhood areas	0.50 - 0.70
Residential:	
Single-family areas	0.30 - 0.50
Multi-units, detached	0.40 - 0.60
Multi-units, attached	0.60 - 0.75
Suburban	0.25 - 0.40
Apartment dwelling areas	0.50 - 0.70
Industrial:	
Light areas	0.50 - 0.80

Table 3 2. Runoff Coefficients for Developed Areas	
Type of Drainage Area	Runoff Coefficient
Heavy areas	0.60 - 0.90
Parks, cemeteries	0.10 - 0.25
Playgrounds	0.20 - 0.40
Railroad yard areas	0.20 - 0.40
Unimproved areas	0.10 - 0.30
Lawns:	
Sandy soil, flat, 2%	0.05 - 0.10
Sandy soil, average, 2-7%	0.10 - 0.15
Sandy soil, steep, 7%	0.15 - 0.20
Heavy soil, flat, 2%	0.13 - 0.17
Heavy soil, average, 2-7%	0.18 - 0.22
Heavy soil, steep, 7%	0.25 - 0.35
Streets:	
Asphaltic	0.70 - 0.95
Concrete	0.80 - 0.95
Brick	0.70 - 0.85
Drives and walks	0.75 - 0.85
Roofs	0.75 - 0.95

Taken from the Caltrans Highway Design Manual (HDM) Figure 819.2B

Include references for all calculation input parameters. Show the run-on area(s) and note the run-on flow rate(s) on the WPCD(s).

If there is no anticipated stormwater run-on to the site, describe the existing flow conditions that would preclude run-on. For example, if potential run-on is handled by an existing stormwater diversion feature, such as a lined ditch, then calculations would not be necessary. If the existing diversion feature would be affected by construction, then run-on flow calculations are necessary to design BMPs to protect the site from run-on.

For potential run-on, refer to Section 500.3.1 for the run-on control BMPs that will be designed to control the calculated run-on.

EXAMPLE 1:

Refer to Worksheet 300.3 provided below.

WORKSHEET 300.3: PRE- AND POST-CONSTRUCTION SITE RUNOFF COEFFICIENTS	
Total Project Area: <u>49 Acres</u>	Overall Soil Type for the site: <u>D</u>
Step 1: Pre-Construction Land Use Conditions:	
43.34 acres of impervious hardscaped area with a Commercial/Industrial Land Use	
Impervious Runoff Coefficient C1: 0.90	
Sub-area/Total Area = 88.45%	
<u>5.66</u> acres of pervious landscaped areas	
Pervious Runoff Coefficient C2: 0.45	
Sub-area/Total Area = 11.55%	
Overall Pre-Construction Site Runoff Coefficient = C1(%) + C2(%) =	
0.90(.8845) + 0.45(.1155) = <u>0.85</u>	
Step 2: Post-Construction Land Use Conditions:	
42.47 acres of impervious hardscaped area with a Commercial/Industrial Land Use	
Impervious Runoff Coefficient C1: 0.90	
Sub-area/Total Area = <u>86.67%</u>	
6.53 acres of pervious landscaped areas and pervious pavers	
Pervious Runoff Coefficient C2: 0.45	
Sub-area/Total Area = <u>13.33%</u>	
Overall Post-Construction Site Runoff Coefficient = C1(%)	
= 0.9(.8667) + 0.45(.1333) = <u>0.84</u>	

Anticipated drainage patterns following the completion of grading activities are shown on the WPCDs. Run-on from off-site areas anticipated:

Run-on from off-site areas will be prevented from flowing through areas that have been disturbed by construction unless appropriate conveyance systems are in place.

Hydrology calculations for all of the drainage areas affecting the project site can be found in the Project Drainage Report. The CGP requires that a construction project's SWPPP must show all calculations for anticipated stormwater run-on based on the size of the drainage area, rainfall intensity, and run-off coefficient. Based on the size and land use of the drainage areas discharging to the site, the Rational Formula can be used to calculate stormwater run-on.

The Rational Formula consists of $Q = CIA$: Q = run-on flow (ft³/sec or cfs)

C = run-off coefficient for drainage area

I = rainfall intensity (inches/hour)

A = area draining onto the site (acres)

Table 2, found on page 82 of the City Drainage Design Manual, is used for determining the runoff coefficients for the rational method formula. C-values specific to each area discharging run-on to the site will be used for the run-on calculations.

Rainfall intensity is the average rainfall intensity for the selected frequency. This data is typically available on intensity-duration-frequency (IDF) curves for the selected frequency and duration. The 2-year, 6-hour storm event will be adequate for determining the temporary controls and is used for the run-on calculations. Since the Civil-D computer program, specifically coded for the City Drainage Design

Manual, including the applicable IDF curves, was used to calculate the flow rates in and around the project, the intensity for each area can be found in the Civil-D output (hydrology calculations) in Appendix A of the Project Drainage Report or in the IDF Curves, found on page 83 of the City Drainage Design Manual.

Three drainage areas discharge runoff onto the site from the northeast corner of Cain and Abel Roads. The westernmost discharge point is approximately 250 feet north of the intersection, where a section of the parking area drains to Cain Road and flows south toward the project. Run-on from this area will be designated Q1. The parking area adjacent to Abel Road drains south onto the site. Run-on from this area will be designated Q2. Runoff from the northeastern corner of the parking area is collected by a storm drain lateral, which connects to the inlet approximately 200 feet east of the intersection. Run-on from this area will be designated Q3. See WPCD 1 for further clarification. Any run-on occurring in this area prior to the implementation of permanent stabilization measures will need to be diverted away from DSAs and other BMPs. The run-on currently is collected and conveyed to an existing 48-inch-diameter storm drain at the intersection, which discharges the runoff to San Diego Bay.

Calculation of stormwater run-on from the three drainage areas described above, by $Q = CIA$

Q = run-on flow (cfs)

C = run-off coefficient for drainage area

I = rainfall intensity (in/hour)

A = area draining onto the site (acre)

Land Use: Parking Lot & Hardscape

Hydrologic Soil Group: D Percent Impervious1: 59 percent C-value1: 0.63

Percent Impervious2: 90 percent C-value2: 0.95

Percent Impervious3: 95 percent C-value3: 0.97

Intensity1 at Node 1140: 1.896 in/hr Area1: 0.75 acre

Intensity2 at Node 1075: 2.159 in/hr Area2: 1.45 acre

Intensity3 at Node 1065: 2.490 in/hr Area3: 0.91 acre

$$Q1 = 0.63 \times 1.896 \times 0.75 = 1.19 \text{ cfs}$$

$$Q2 = 0.95 \times 2.159 \times 1.45 = 2.97 \text{ cfs} \quad \text{See WPCD 1 for locations and flow rates.}$$

$$Q3 = 0.97 \times 2.490 \times 0.91 = 2.20 \text{ cfs}$$

It is recommended that construction activities in the aforementioned areas be completed during the dry season; otherwise, BMPs should be utilized to direct run-on away from disturbed areas. Inappropriate management of run-on and runoff can result in excessive physical impacts to receiving waters from sediment and increased flows.

EXAMPLE 2:

Existing Site Conditions:

Area Runoff Coefficient	= <u>0.32</u> (A)
Area Rainfall Intensity	= <u>0.50 in/hour</u> (B)
Drainage Area	= <u>175 acres</u> (C)
Site Area Run-on	
Discharge (A) x (B) x (C)	= <u>28 cfs</u> (D)

(A) The runoff coefficient represents the percent of water for the area that will run off the ground surface during the storm. The value for the runoff coefficient, 0.32, was determined from Figure 819.2A below, based on the site characteristics (terrain, type of soil, vegetation, etc.) for an undeveloped area.

(B) Rainfall intensity, in inches per hour, is the average rainfall intensity for the selected frequency and duration (2-year, 1-hour storm). The Rainfall Depth versus Return Period chart, from the San Bernardino County Flood Control Hydrology Manual gives a value of 0.5 in/hour for the site area.

(C) Drainage area, in acres, defined in the Project Drainage Report, is 175 acres.

Table 3.3-1. FIGURE 819.2A: RUNOFF COEFFICIENTS FOR UNDEVELOPED AREAS

	Extreme	High	Normal	Low
Relief	0.28 - 0.35 Steep, rugged terrain with average slopes above 30 percent	0.20 - 0.28 Hilly, with average slopes of 10 to 30 percent	0.14 - 0.20 Rolling, with average slopes of 5 to 10 percent	0.08 - 0.14 Relatively flat land with average slopes of 0 to 5 percent
Soil Infiltration	0.12 - 0.16 No effective soil cover; either rock or thin soil mantle of negligible infiltration capacity	0.08 - 0.12 Slow infiltration rate; clay or shallow loam soils of low infiltration capacity, imperfectly or poorly drained	0.06 - 0.08 Normal infiltration rate; well drained light or medium textured soils, sandy loams, silt and silty loams	0.04 - 0.06 High infiltration rate; deep sand or other soil that takes up water readily, very light, well-drained soils
Vegetative Cover	0.12 - 0.16 No effective plant cover; bare or very sparse cover	0.08 - 0.12 Poor to fair plant cover; clean cultivation crops or poor natural cover (less than 20 percent of drainage area with good cover)	0.06 - 0.08 Fair to good plant cover; ~50 percent of area with good grassland or woodland cover, not more than 50 percent of area in cultivated crops	0.04 - 0.06 Good to excellent plant cover; ~90 percent of area with good grassland, woodland or equivalent cover
Surface Storage	0.10 - 0.12 Negligible surface storage; a few shallow surface depressions; drainage ways steep and small, no marshes	0.08 - 0.10 Low surface storage; well-defined system of small drainage ways; no ponds or marshes	0.06 - 0.08 Normal surface storage; considerable surface depression storage; lakes and pond marshes	0.04 - 0.06 High surface storage; drainage system not sharply defined; large flood plain storage or large number of ponds or marshes.

Given: An undeveloped watershed consisting of
 1) rolling terrain with average slopes of 5 percent
 2) clay type soils
 3) good grassland area, and
 4) normal surface depressions.

Solution:

Relief	0.14
Soil Infiltration	0.08
Vegetative Cover	0.04
Surface Storage	0.06

Find: The runoff coefficient, C, for the above watershed

C= 0.32

SWPPP Builder Instructions

A narrative text box has been provided to enter a narrative to provide runoff estimates for the construction site. Use the examples provided above and in the guidance instructions to complete this section.

300.4 Vicinity and Site Map

SWPPP GUIDANCE INSTRUCTIONS

- Include both a vicinity and site map in the SWPPP.
 - The Vicinity Map shall be an 8-1/2" x 11" color copy of a USGS map or equal, and shall extend approximately one-quarter mile beyond the property boundaries of the construction site (an 11" x 17" may be used if needed). The Office of Water Programs, Water Quality Planning Tool website can be used to obtain images of USGS topographic maps by selecting the 'USGS Topo Maps' option on the webpage at: <http://svctenvims.dot.ca.gov/wqpt/wqpt.aspx> To meet the site map requirement, insert a reduced copy (8-1/2" x 11" or 11" x 17") of the project's Title Sheet in Attachment D and make reference to it in Section 300.4
 - Provide a brief narrative description of the vicinity to support the map in Attachment D. Describe important features, drainage areas, or receiving waters that could not be shown on the map.
- The vicinity map shall show those items listed below:
 - Easily identifiable major roadways
 - Geographic features or landmarks
 - Water bodies within or adjacent to the construction limits
 - Construction site perimeter
 - Staging areas and storage yards
 - Known wells
 - Outline of the off-site drainage area(s) that discharge into the construction site
 - Identification of anticipated discharge location(s) where the stormwater from the construction site discharges to a municipal separate storm sewer system or other water body
 - General topography.

SWPPP Builder Instructions

A narrative text box has been provided to enter a brief narrative that describes the vicinity to support the map in Attachment D and to provide additional information about run-on potential. The brief narrative should describe important features, drainage areas, or receiving waters that could not be shown on the map. The brief narrative automatically populates Section 300.4 along with required text.

When potential exists for run-on, the narrative shall include:

- run-on calculations
- and calculation input parameters

When existing conditions preclude run-on, enter supporting narrative.

300.5 Unique Site Features

SWPPP Builder Instructions

Section 300.5 has two separate tabs for information entry: Text and 300.5 Tab (Figure 3-15).

Section 300.5: Unique Site Features																					
<input type="button" value="Text"/> <input checked="" type="button" value="300.5"/> <input type="button" value="Instructions"/>	<div style="border: 1px solid black; padding: 5px;"> <p>Provide (1) Narrative Text(s)</p> <p>If there are unique project features, add narrative text describing features.</p> <div style="border: 1px solid #ccc; padding: 5px; min-height: 100px;"> <p>The site is underlain by Huerhuero loam, Olivenhain cobbly loam, Redding-Urban land complex, Riverwash, Terrace escarpments, and Urban land (fill of unknown origin). Testing has determined the fill to have been mechanically placed. Mechanically placed fills generally are medium dense silty and clayey sands (typically with Standard Penetration Test (SPT) blow counts of 10 to 15) whereas the hydraulically placed fills are loose, poorly graded fine to medium sands (typically with SPT blow counts of 5 to 10). Some concrete and asphalt was encountered buried in the fills during the geotechnical investigation. The total fill thickness ranges from about 15 to 25 feet. Pile foundations for previous structures have been installed into this formation.</p> </div> </div> <div style="float: right; margin-top: -100px;"> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr><td>100.2</td></tr> <tr><td>100.3</td></tr> <tr><td>100.3.1</td></tr> <tr><td>100.3.2</td></tr> <tr><td>100.4</td></tr> <tr><td>200</td></tr> <tr><td>300</td></tr> <tr><td>300.1</td></tr> <tr><td>300.2</td></tr> <tr><td>300.3</td></tr> <tr><td>300.4</td></tr> <tr><td>300.5</td></tr> <tr><td>300.6</td></tr> <tr><td>300.7</td></tr> <tr><td>300.8</td></tr> <tr><td>400</td></tr> <tr><td>500.1.1</td></tr> <tr><td>500.1.2</td></tr> <tr><td>500.1.3</td></tr> <tr><td>500.2</td></tr> </table> </div>	100.2	100.3	100.3.1	100.3.2	100.4	200	300	300.1	300.2	300.3	300.4	300.5	300.6	300.7	300.8	400	500.1.1	500.1.2	500.1.3	500.2
100.2																					
100.3																					
100.3.1																					
100.3.2																					
100.4																					
200																					
300																					
300.1																					
300.2																					
300.3																					
300.4																					
300.5																					
300.6																					
300.7																					
300.8																					
400																					
500.1.1																					
500.1.2																					
500.1.3																					
500.2																					

Figure 3-15. Section 3.0.5 Unique Site Features Text Table

Text Tab:

- Describe the source and conditions of the fill material and soils at the construction site (i.e., types of fills/soils, groundwater location and conditions, dewatering operations that may be necessary, etc.). A general description can usually be found in the geotechnical report or other environmental documents. Include any restrictions on construction or additional requirements based on the condition of the soil or the presence of groundwater.
- Provide a brief description of any unique site features (water bodies, wetlands, environmentally sensitive areas (ESAs), endangered or protected species, etc.) and significant or high-risk construction activities that may impact stormwater quality. Include any unique features or activities within or adjacent to water bodies (such as dredging, dewatering, re-use of aerially deposited lead material, large excavations, or work within a water body).

EXAMPLE TEXT

The site is underlain by Huerhuero loam, Olivenhain cobbly loam, Redding-Urban land complex, Riverwash, Terrace escarpments, and Urban land (fill of unknown origin). Testing has determined the fill to have been mechanically placed. Mechanically placed fills generally are medium dense silty and clayey sands (typically with Standard Penetration Test (SPT) blow counts of 10 to 15) whereas the hydraulically placed fills are loose, poorly graded fine to medium sands (typically with SPT blow counts of 5 to 10). Some concrete and asphalt was encountered buried in the fills during the geotechnical investigation. The total fill thickness ranges from about 15 to 25 feet. Pile foundations for previous structures have been installed into this formation.

Huerhuero loam is described as loam, underlain by clay to clay loam. The Olivenhain cobbly loam is described as cobbly loam, underlain by very cobbly loam and clay. Redding-Urban land complex is described as gravelly loam, underlain by gravelly clay and loam. The Riverwash is a drainage way, which must be protected in place during construction. The terrace escarpments are highly erodible slopes and must be protected in place during construction. The fill material is described as silty sand with some

clayey sand. The average soil characteristics from the test borings in Appendix B (Lab Testing in Appendix D) of the Project Geotechnical Report are as follows: density is 99.5pcf; resistance value is 55; and plastic index is 40.

In the geotechnical borings drilled at the site, groundwater was first encountered at more than 6.5 feet, except in the drainage way. At the time of previous explorations and in one recent boring (Boring B-133), groundwater was encountered at approximately 15 to 20 feet below existing grades. Since the groundwater level is expected to fluctuate with seasonal variations, a high groundwater level of +8 feet NAVD88 has been adopted for the project.

The Salmon River is located within the project limits. In order to properly construct the towers, a portion of the construction will occur within the river. An existing culvert will be demolished, and will be replaced by a larger reinforced concrete box within the tributary. Groundwater dewatering and dredging will be required for this portion of the project. Precautions will be taken to ensure the protection of the waterway during construction activities, in accordance with the CWA Section 404 Permit requirements. The permit application (33 CFR 325) is available for review.

300.5 Tab: Select in the check boxes the fill material, Hydrologic Soil Group, soil erodibility, and the unique features onsite. Click on the top of the tab to move between entry windows (Figure 3-16).

Section 300.5: Unique Site Features		
Text	300.5	Instructions
300.5 Unique Site Features		
Project has Fill Material:		<input checked="" type="radio"/> Yes <input type="radio"/> No
Project has Native Material:		<input checked="" type="radio"/> Yes <input type="radio"/> No
Hydrologic Soil Group:		<input checked="" type="checkbox"/> A (high infiltration rate) <input type="checkbox"/> B (moderate infiltration rate) <input checked="" type="checkbox"/> C (slow infiltration rate) <input type="checkbox"/> D (very slow infiltration rate)
Soil Erodibility:		<input checked="" type="checkbox"/> Slight <input type="checkbox"/> Moderate <input type="checkbox"/> Severe
Unique Features Onsite:		<input checked="" type="checkbox"/> Water Bodies <input type="checkbox"/> Wetlands <input type="checkbox"/> Endangered or Protected Species <input checked="" type="checkbox"/> Environmentally Sensitive Areas <input type="checkbox"/> Other <input checked="" type="checkbox"/> None
		100.2 100.3 100.3.1 100.3.2 100.4 200 300 300.1 300.2 300.3 300.4 300.5 300.6 300.7 300.8 400 500.1.1 500.1.2 500.1.3 500.2 500.3 500.3.1 500.3.2 500.3.3

Figure 3-16. Section 300.5 Unique Site Features Tab

The combined tabs with automatically populate the section and can be previewed before finalizing Section 300.5.

300.6 Contact Information for Responsible Parties

SWPPP Builder Instructions

Section 300.6 has two separate tabs for information entry: Text and Field Tab.

This section provides two tabs to enter required information. The Second tab, Text, a narrative text box to include additional names, their associated responsibilities, and contact information for parties responsible for the SWPPP. Click on the top of the tab to move between the entry windows.

Field Tab: Enter the contact information for the primary contacts for SWPPP implementation. Required information is to include:

- For the following responsible parties, provide name, title, company or agency, address, phone number, emergency phone number (24/7), and email address:
 - WPC Manager/QSD
 - Alternate WPC manager/ alternate QSD
 - RE
 - Contractor
 - Contractor Site Manager (if different than Contractor)
 - QSP (if appointed) and any alternate QSPs
 - Erosion and Sediment Control Provider
 - Stormwater Sampling and Testing Agent

Text Tab: Include additional names, their associated responsibilities, and contact information for parties responsible for the SWPPP. Required information is to include:

- Provide contact information for anyone who will assist the Contractor's WPC Manager in performing the WPC Manager duties, such as an alternate, a QSP or stormwater inspector. Edit the template below to enter the name, title, company, address, telephone number, emergency telephone number (24/7), and email address. Also provide training records of other Contractor- designated responsible water pollution control personnel in Attachment E.
- If an ATS is used, provide contact information for the person responsible for the ATS. Edit the template below to enter the name, title, company, address, telephone number, emergency phone number (24/7) and email address.
- The contact information provided in this section is required by Section VII.B.5 of the CGP. The SWPPP must include a list of names of all Contractors, subcontractors, and individuals who will be directed by the WPC Manager or the alternate WPC manager.

300.7 List of Subcontractor and Materials Suppliers

SWPPP Builder Instructions

This section provides one tab with separate field lists to enter required information. The **Subcontractor List** is to enter the subcontractor Name/Company and SWPPP Responsibility List (Figure 3-17). The second list, **Material Suppliers**, is to include the material suppliers name or company (Figure 3-18). Click on the list in the Select List column to move between the entry windows.

Section 300.7: List of Subcontractor and Materials Suppliers																	
Lists	Instructions																
Subcontractor Name/Company <table border="1"> <tr> <td>► Subcontractor 1</td> <td>David Turk Named Chair of the New Mexico Floodplain Managers Association</td> <td>Select List</td> </tr> <tr> <td>Subcontractor 2</td> <td>Rain</td> <td>Subcontractors</td> </tr> <tr> <td>Subcontractor 3</td> <td>Snow</td> <td>Material Suppliers</td> </tr> <tr> <td>Subcontractor 4</td> <td>Ice</td> <td></td> </tr> <tr> <td>*</td> <td></td> <td></td> </tr> </table>		► Subcontractor 1	David Turk Named Chair of the New Mexico Floodplain Managers Association	Select List	Subcontractor 2	Rain	Subcontractors	Subcontractor 3	Snow	Material Suppliers	Subcontractor 4	Ice		*			100.1 100.2 100.3 100.3.1 100.3.2 100.4 200 300 300.1 300.2 300.3 300.4 300.5 300.6 300.7 300.8 400 500.1.1 500.1.2
► Subcontractor 1	David Turk Named Chair of the New Mexico Floodplain Managers Association	Select List															
Subcontractor 2	Rain	Subcontractors															
Subcontractor 3	Snow	Material Suppliers															
Subcontractor 4	Ice																
*																	

Figure 3-17. Section 300.7 Subcontractor Name/Company

Section 300.7: List of Subcontractor and Materials Suppliers	
Lists	Instructions
Material suppliers Name/Company List	
<ul style="list-style-type: none"> ▶ Material Supplier 1 Material Supplier 12 Material Supplier 3 Material Supplier 4 David Turk Named Chair of the New Mexico Floodplain Managers Association * 	Select List Subcontractors Material Suppliers 100.1 100.2 100.3 100.3.1 100.3.2 100.4 200 300 300.1 300.2 300.3 300.4 300.5 300.6 300.7 300.8 400 500.1.1 500.1.2 500.1.3 500.2 500.3

Figure 3-18. Section 300.7 List of Material Suppliers

To complete the lists:

- List the names of all subcontractors. Provide subcontractor contact information in SWPPP File Category 20.21: Subcontractor Contact Information and Notification Letters. Include each subcontractor's name, type of work performed, contact name, phone number and emergency telephone number (24/7). This information will be used by the WPC Manager to implement REAPs.
- A sample subcontractor SWPPP Notification letter and sample subcontractor contact log are provided in Appendix D. The subcontractor SWPPP Notification letter should include pertinent subcontractor water pollution control requirements and address subcontractor responsibility for compliance with SWPPP, CGP or LTCGP. Include copies of subcontractor notification letters in SWPPP File Category 20.21: Subcontractor Contact Information and Notification Letters.

If additional subcontractors are added during the progress of the work:

- Add the subcontractor to the subcontractor contact log in SWPPP File Category 20.21: Subcontractor Contact Information and Notification Letters, include appropriate contact information
- Send the subcontractor a SWPPP Notification Letter
- Include a copy of SWPPP Notification Letter in SWPPP File Category 20.21: Subcontractor Contact Information and Notification Letters.

A SWPPP amendment is not required when adding subcontractors.

List the names of major material suppliers who will delivery materials to the project site who must comply with requirements of the SWPPP. Notify the suppliers of pertinent water pollution control BMP(s) that apply to the type(s) of materials that they will deliver to the project site. It is the material supplier's responsibility to comply with the SWPPP.

A sample SWPPP Notification Letter and sample contact log are provided in Appendix D for the project's material suppliers. Include copies of material supplier notification letters in SWPPP File Category 20.22: Material Supplier Contact Information and Notification Letters.

300.8 Training

SWPPP GUIDANCE INSTRUCTIONS

- List the training, SWPPP experience, other such qualifications, and training organizations for the following individuals responsible for the SWPPP:
 - WPC Manager
 - QSD, if SWPPP not developed by WPC Manager
 - QSP, if assisting WPC Manager
 - Subcontractor, if assisting the WPC Manager
- The Contractor's WPC Manager (QSD) shall have stormwater pollution prevention training and required qualifications and training under the CGP and LTCGP, Section VII, Training Qualifications and Certification Requirements or the LTCGP, Section VII.
- Training of water quality sampling personnel shall be in accordance with the Caltrans *Construction Site Monitoring Program Guidance Manual*.
- Informal stormwater training shall be documented using CEM-2023 Stormwater Training Record provided in Appendix E.
- Formal stormwater training shall be documented using CEM-2023 Stormwater Training Record and by providing class completion documentation. Documentation shall be submitted to the RE within five days of completion of training.
- A log of all stormwater training shall be maintained that can be used to prepare the Stormwater Annual Report. Form CEM-2024 Stormwater Training Log (Optional) is provided in Appendix F.
- Training records shall be filed in SWPPP File Category 20.23: Contractor Personnel Training Documentation.
- Training information, consisting of the following, shall be provided in the Stormwater Annual Report:
 - Documentation of all training for individuals responsible for all activities associated with CGP or LTCGP compliance
 - Documentation of all training for individuals responsible for BMP installation, inspection, maintenance, and repair
 - Documentation of all training for individuals responsible for overseeing, revising, and amending the SWPPP

SWPPP Builder Instructions

Section 300.8 has two separate tabs for information entry: Field and Lists Tab (Figure 3-19).

Caltrans Construction Site Monitoring Program Guidance Manual's Date of Latest Edition	4/4/2013
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Figure 3-19. Section 300.8 Training Fields Tab

Field Tab: Provide the date of the latest edition used of the Caltrans *Construction Site Monitoring Program Guidance Manual*.

Lists Tab: Provide the qualification and training information of personnel that are responsible for the SWPPP in the fields provided. Click-on the top of the tab to move between the entry windows (Figure 3-20).

WPC Manager Other Such Qualification 1
WPC Manager Other Such Qualification 2
WPC Manager Other Such Qualification 3
WPC Manager Other Such Qualification 4
*

Figure 3-20. Section 300.8 Training Lists Tab

SECTION 400

REFERENCES, OTHER PLANS, PERMITS AND AGREEMENTS

SWPPP GUIDANCE INSTRUCTIONS

- Include a Separator and Tab for Section 400 for ready reference.
- Identify and prepare a list of the documents referenced in the SWPPP. Contract plans and specifications, reports, design, and stormwater management-related documents used to prepare the SWPPP shall also be included in the references. Documents that shall be referenced are: all permits that apply to the project (federal, state and local), such as Fish and Game, USACOE, California Department of Toxic Substances Control (DTSC) ADL Reuse Variance, local RWQCB permits or specific requirements, etc.
- Referenced materials may also include: on-site project information such as the Contract Plans and Specifications, Geotechnical Report, Drainage Report, SWDR, District-prepared CSWPPP, other reports provided by the owner, regulatory guidance from federal or state agencies, and published technical specifications.
- The reference for each document shall include:
 - Complete name of the referenced document
 - Number of the document (if applicable)
 - Author
 - Date published
 - Document date/revision that applies
- Referenced documents shall be kept on site and be readily available for review.
- The SWPPP shall incorporate appropriate elements of other plans or permits required by local, state, or federal agencies.
- A copy of the Caltrans Permit No. CAS000003, and either the CGP or the LTCGP shall be included in Attachment F.
- Any special requirements for each permit shall be described. Additional bullets should be inserted as needed. Bullets should be deleted if not needed.
- A copy of all other plans/permits/agreements shall be included in Attachment F of the SWPPP.

SWPPP Builder Instructions

Section 400 has two separate tabs for information entry: Field and Lists Tab. Use the Section 400 SWPPP guidance information to populate the necessary fields (Figure 3-21).

Section 400: REFERENCES, OTHER PLANS, PERMITS AND AGREEMENTS		
Fields	Lists	Instructions
Complete (6) Fields		
Contract Plans and Special Provisions' Contract Number	453541345	
Contract Plans and Special Provisions' Date	12/12/2012	
Contract Plans and Special Provisions' Preparer	John Doe	
Caltrans Statewide Storm Water Management Plan (SWMP)'s Month and Year	5/2006	
Caltrans SWPPP/WPCP Preparation Manual's Month and Year	5/2007	
Title of Applicable RWQCB Basin Plan	Basin Plan	

Figure 3-21. Section 400 References, Other Plans, Permits and Agreements Fields Tab

List Tab: Click-on the list's titles to enter the reference(s), plan(s) and permit(s) information for the project (Figure 3-22). Use the general SWPPP instructions provided above as guidance.

Section 400: REFERENCES, OTHER PLANS, PERMITS AND AGREEMENTS		
Fields	Lists	Instructions
Other Documents Made Part of the SWPPP by Reference List		
RWQCB, Los Angeles Region, Waiver of Clean Water Act Section 401 Water Quality Certification, dated xx/xx/xx		
U.S. Army Corps of Engineers, Clean Water Act Section 404, Nationwide Permit 26- authorization letter, dated xx/xx/xx		
California Department of Fish and Games, Streambed Alteration Agreement II 564-xx, dated xx/xx/xx		
*		

Select List

Other References

Plans and permits

Figure 3-22. Section 400 References, Other Plants, Permits and Agreements Lists Tab

The combined tabs will automatically populate the section and can be previewed before finalizing the section.

SECTION 500

DETERMINATION OF CONSTRUCTION SITE BEST MANAGEMENT PRACTICES

500.1 *Pollutant Sources*

SWPPP GUIDANCE INSTRUCTIONS

- Include a Separator and Tab for Section 500 for ready reference.
- List all construction materials that will be used that have the potential to contribute to the discharge of pollutants to stormwater.
- List all construction activities (i.e., any construction or demolition activity, including, but not limited to, clearing, grubbing, grading, excavation, underground improvements, hardscape and/or landscape improvements) that have the potential to contribute sediment or other pollutants to stormwater discharges.
- Conduct an assessment of materials and equipment expected to be used on site that have the potential to contaminate stormwater runoff and prepare a plan to prevent or minimize the opportunity of potential pollutants to come into contact with stormwater or non-stormwater discharges.
- Select BMPs to eliminate or reduce the potential pollutants identified in the assessment of materials and equipment. Use the example and the BMP selection tables in the following sub-sections to confirm that all appropriate BMP controls are included. Include minimum BMPs as listed in table 2-1 of this Manual in accordance with CGP or LTCGP.
- Provide a narrative description of each BMP selected, along with its implementation and maintenance plan.

500.1.1 *Inventory of Materials and Activities that May Pollute Stormwater*

The SWPPP is to include an assessment of materials and equipment expected to be used on site that have the potential to contaminate stormwater runoff, and shall prepare a Materials Management Plan. The WPC Manager (or QSD) shall consider the following as part of the Materials Management Plan:

- The quantity, physical characteristics (e.g., liquid, powder, solid), and locations of each potential pollutant source handled, produced, stored, recycled, or disposed at the site
- The degree to which pollutants associated with those materials may be exposed to and mobilized by contact with stormwater
- The direct and indirect pathways that may result in exposure of pollutants to stormwater or authorized non-stormwater discharges
- The effectiveness of BMPs to reduce or prevent pollutants in stormwater discharges and authorized non-stormwater discharges.
- From this assessment, the WPC Manager shall determine the best strategy for preventing the contact of potential pollutants—during delivery, staging, usage, storage, and waste management—from coming in contact with stormwater. The Potential Pollutant Inventory must include all non-visible pollutants that are known or should be known to occur on the construction site, including, but not limited to, materials that:
 - Are being used in construction activities
 - Are being stored on the construction site
 - Were spilled during construction operations and not cleaned up
 - Were stored (or used) in a manner that created the potential for a release of the materials during past land use activities
 - Were spilled during previous land use activities and not cleaned up
 - Were applied to the soil as part of past land use activities.
- The following is a list of materials or substances commonly associated with construction activities as described in the Standard Specifications and the *Construction Site Monitoring Program Guidance Manual*, Section 5:
 - Dust palliative products (e.g. magnesium chloride, calcium chloride, and natural brines)
 - Waste materials associated with demolition activities [e.g., asbestos, wood debris; Freon; aluminum, zinc, masonry block rubble, and PCC rubble]
 - Materials and waste associated with roadway paving operations (e.g., hot asphalt, asphalt emulsion, liquid asphalt, any type of asphalt concrete, cold mix, crumb rubber, acidity, alkalinity, and sawcutting slurries)
 - Materials and waste associated with hardscape improvements, such as drainage structures, median barriers, and bridge construction (e.g. Portland cement, masonry blocks, sealants, steel slag, metals, foundry sand, fly ash, mortar, treated wood, and rinse water)

- Base, subbase, and stockpiled materials associated with hardscape and underground improvements (e.g., cement-bound granular mixtures, hydraulic road binder bound mixtures, soil cement, and soil treated by hydraulic road binder) contaminated soil [e.g., methyl tert-butyl ether (MTBE), benzene, and total petroleum hydrocarbons (TPH)]
- Cleaning products (e.g., acids, chlorine, detergents, solvents, thinners, ammonia, lye, caustic sodas, bleaching agents, chromate salts, and tri-sodium phosphate)
- Joint and curing compounds (e.g., patching compounds, levelers, drywall joint compounds, polymeric compounds, water reducing admixtures, sealants, and waterproofing coatings)
- Concrete curing compounds (e.g., floor hardeners, methacrylate, and epoxy resin products)
- Painting products (e.g., paint, dyes, stripping pigments, sanding residue, paint strippers, acetone, methyl ethyl ketone, resins, sealants, solvents, thinners, lacquers, varnish, enamels, gum spirit, and turpentine)
- Sandblasting materials and waste products (e.g. sandblasting abrasives, rust, rubble, and paint)
- Raw landscaping materials and wastes (e.g., plant materials, aluminum sulfate, elemental sulfur, herbicides, organic and inorganic fertilizers and nutrients such as nitrogen, phosphorous, and potassium, pesticides, gypsum, lime, mulch, sand, gravel, and topsoil)
- Soil amendments/stabilization products (e.g. polymer/copolymer, straw/mulch, lignin sulfonate, psyllium, guar/plant gums, and gypsum)
- Treated wood products (e.g., Ammoniacal-copper-arsenate, Ammoniacal-copper-zinc-arsenate, borate, copper-chromium-arsenic, copper naphthenate, and creosote)
- Materials and waste associated with building construction (e.g. volatile organic compounds [VOCs], metals, phenolics and mineral spirits; copper, formaldehydes, and creosote; phenolics, asbestos, benzene, phenols and naphthalene; metals, plated products, acidity/alkalinity, chromium, lead, zinc, tin, copper, aluminum, treated wood products, sediments, minerals, and asbestos)
- Line flushing products (e.g., chlorinated water)
- Vehicle and equipment fluids (e.g., TPH and fuels, oils and grease, coolants/antifreeze, solvents, sealers, acids, benzene and derivatives, lubricants, and discharges from batteries)
- Portable toilet waste products [e.g., bacteria, biochemical oxygen demand (BOD), pathogens, and sanitary wastes]
- General litter (e.g., plastic, paper, cigarettes, other dry garbage, wood products, steel, and packaging).

This list is not all-inclusive and the WPC Manager shall update the Materials Management Plan and the Potential Pollutant Inventory in accordance with on-site conditions, documenting all materials or equipment that have been received or produced on site that are not designed to be outdoors and exposed to environmental conditions and are potential sources of stormwater contamination. An inventory form has been included as part of the CSMP to document any additional potential pollutants. Some construction activities have the potential to generate pollutants in stormwater discharges if no BMPs are implemented. Construction activities can be grouped into categories for the purpose of

identifying likely pollutants. Activities and areas, such as concrete pours and curing, concrete waste management areas, soil amendments (e.g. fly ash and lime), and mortar and stucco mixing, application, and waste management areas, should be monitored for high pH in site discharges.

All potential pollutants and their locations shall be listed on the Potential Pollutant Inventory. Details for controlling erosion and potential pollutant transport are discussed in Sections 500.3.1 through 500.3.5. Potential non-stormwater and waste management-related discharges are further described in Sections 500.4.1 and 500.4.2, respectively.

SWPPP Builder Instructions

Section 500.1.1 has three separate tabs for information entry: Text, Lists, and Table 500.1.1 (Figure 3-23).

Section 500.1.1: Inventory of Materials and Activities that May Pollute Stormwater

Text Lists Table 500.1.1 Instructions

Identify stockpiles that will be covered and bermed prior to a likely precipitation events List

► Soil amendments and contaminated soil
Stockpiles of loose soil materials
*

Select List

Stockpiles covered
Materials off ground
Materials stored
Dumpsters covered
Areas inspected for leaks

Figure 3-23. Section 500.1.1 List of Covered Stockpiles Before Precipitation Event

Text Tab: Include text regarding the assessment of all potential pollutants and the material management plan to be implemented onsite. Example entries are provided below.

EXAMPLE TEXT

Vehicles and equipment area will be placed in a bermed/contained area if:

- They need to be cleaned
- They are leaking
- They need maintenance
- They need to be refueled
- They are not designed to be exposed to inclement weather

Waste materials will be stored in specific dumpsters based on whether they are a potential pollutant, designed to be outdoors, or recyclable. Waste material will be cleaned up at the end of each day and disposed of properly. Waste- containing asbestos shall be properly handled and contained at all time.

Petroleum hydrocarbons and trichloroethene (TCE) will be identified by visual methods. Petroleum hydrocarbon is usually visible as a sheen, a bright band of color, or a brownish layer. TCE is denser than water and usually is found in a globular form. If there is a leak or spill of these potential pollutants, one of the methods described below will be employed to clean up the area. Refer to the Spill Response and Implementation Plan for additional guidance and disposal requirements.

- Pumping the pollutant into a container.
- Containing the pollutant using trenches or sumps in the adjacent excavation.
- Trapping the pollutant using absorbent booms (hydrocarbons only).
- Trapping the pollutant in red-flagged soils.

Lists Tab: For the List tab, there are five categories of lists to be completed. Complete the lists for:

1. Stockpiles covered;
2. Materials off ground;
3. Materials stored;
4. Dumpsters covered; and
5. Areas inspected for leaks.

To select a list, click-on the list title and entry fields will appear to the left.

List the inventory of materials and activities that pose a pollutant stormwater risk. Of significant concern for construction discharges are the pollutants found in materials used in large quantities, which are exposed to direct precipitation, such as recycled materials or by-products of combustion. Some materials, such as soil amendments, are designed to be used in a manner that will result in exposure to stormwater. In these cases, the materials shall be applied according to the manufacturer's instructions and at a time when they are unlikely to be washed away. Other construction materials must be stored, applied, and disposed of properly, in a manner protective of water quality. Examples for list entries are provided below.

EXAMPLE TEXT

Stockpiles covered:

- Contaminated soil
- Soil amendments

Materials off ground:

- Calcium chloride
- Portland cement

Materials Stored:

- Acetone
- Methyl ethyl ketone
- Diesel (secondary containment)
- Fuel oil (secondary containment)

Dumpsters covered:

- Dumpsters containing hazardous particulate
- Roll off bins containing concrete washout

Areas inspected for leaks:

- Vehicle and equipment storage and maintenance areas
- Portable toilets

Table 500.1.1 Tab: The following table contains a list of construction activities that have the potential to contribute pollutants, including sediment, to stormwater discharges. All potential pollutants, except sediment, and their locations shall be listed in this section, and, where possible, the locations shall be shown on the WPCDs in Attachment BB. Details for controlling these pollutants using soil stabilization and sediment control BMPs are discussed in Sections 500.3.1 through 500.3.5. Potential non-storm water and waste management-related discharges are further described in Sections 500.4.1 and 500.4.2, respectively. The WPC Manager shall update the list of potential pollutants in accordance with onsite conditions, documenting all materials or equipment that have been received or produced onsite that are not designed to be outdoors and are potential sources of stormwater contamination.

Complete Table 500.1.1 by checking the categories of work that is to be performed and include activities which have the potential to discharge pollutants (Figure 3-24).

Section 500.1.1: Inventory of Materials and Activities that May Pollute Stormwater	
TABLE 500.1.1 ANTICIPATED CONSTRUCTION SITE ACTIVITIES WITH THE POTENTIAL TO DISCHARGE POLLUTANTS	
<input checked="" type="checkbox"/> Demolition	<input checked="" type="checkbox"/> Check All
	<input checked="" type="checkbox"/> Pavement Removal (asphalt/concrete/concrete) <input checked="" type="checkbox"/> Structure Demolition Removal over or Adjacent to Water <input checked="" type="checkbox"/> Building Demolition (Structures, HVAC, insulation) <input checked="" type="checkbox"/> Landscape Demolition (Parking areas, curbs, gutters, sidewalks)
<input checked="" type="checkbox"/> Earthwork	<input checked="" type="checkbox"/> Check All
	<input checked="" type="checkbox"/> Cleaning and Grubbing <input checked="" type="checkbox"/> Grading Activities <input checked="" type="checkbox"/> Soil Import and Export <input checked="" type="checkbox"/> Stockpiling <input checked="" type="checkbox"/> Excavation <input checked="" type="checkbox"/> Disturbance of Contaminated Soil <input checked="" type="checkbox"/> Dewatering <input checked="" type="checkbox"/> Temporary Stream Crossing <input checked="" type="checkbox"/> Sewerage Construction <input checked="" type="checkbox"/> Dredging <input checked="" type="checkbox"/> Piping <input checked="" type="checkbox"/> Utilities <input checked="" type="checkbox"/> Line Flushing (hydrostatic test, water line flushing) <input checked="" type="checkbox"/> Landscaping, Planting and Plant Maintenance, Amending of Soil and Mulching <input checked="" type="checkbox"/> Material and Equipment Use over Water
<input checked="" type="checkbox"/> Masonry, Concrete, Asphalt Work	<input checked="" type="checkbox"/> Check All
	<input checked="" type="checkbox"/> Saw Cutting (concrete and brick/dust, saw cut slurry) <input checked="" type="checkbox"/> Paving and Grinding <input checked="" type="checkbox"/> Concrete Placement (concrete chucks) <input checked="" type="checkbox"/> Concrete Curing (curing and placing compounds) <input checked="" type="checkbox"/> Concrete Finishing (surface finishes) <input checked="" type="checkbox"/> Concrete Waste Management
<input checked="" type="checkbox"/> Building Construction	<input checked="" type="checkbox"/> Check All
	<input checked="" type="checkbox"/> Paint Preparation, Painting, Stenciling, and Etching <input checked="" type="checkbox"/> Material Use <input checked="" type="checkbox"/> Material Delivery and Storage <input checked="" type="checkbox"/> Adhesives (plastics, resins, epoxy synthetics, caulk, sealants, putty, sealing agents and caulk/tape) <input checked="" type="checkbox"/> Cleaning, Polishing (metal, ceramic, tile) and Sandblasting Operations <input checked="" type="checkbox"/> Painting (golden/lead, etc., flux (tinc chloride), pipe flange)

Figure 3-24. Section 500.1.1 Table of Anticipated Construction Site Activities with the Potential to Discharge Pollutants

500.1.2 Potential Pollutants from Site Features or Known Contaminants

SWPPP GUIDANCE INSTRUCTIONS

- Show and/or describe existing site features that, as a result of known past usage, may contribute pollutants to stormwater (e.g., toxic materials that are known to be treated, stored, disposed, or have been spilled or leaked onto the construction site).
- Review the contract documents and associated environmental documents to determine the known site contaminants and list them in this section.

SWPPP Builder Instructions

Section 500.1.2 has two separate tabs for information entry: Text and Lists (Figure 3-25).

If there were former industrial operations onsite, describe the former operations.
Case Number H06091-000 – A petroleum hydrocarbon-impacted groundwater plume exists along the western perimeter of the site. This plume consists of benzene, MTBE, and TPH. The two cases for this plume were closed by the California Department of Public Health (CDPH) because the levels of contaminants of concern were determined to not pose a significant risk to human health and the environment. In addition, the County of San Diego's Department of Environmental Health (DEH) granted closure on the cases based on the condition that the current use of the property remain as a transportation corridor

If historic contamination exists on site, insert additional text on how to prevent or minimize contact between the contaminants and discharges.
Exposed soil areas will be routinely tested for contamination. Excavated soils will be tested for contamination. In event that contamination is found, contaminated soil will be shipped to a hazardous waste facility for disposal.

Figure 3-25. Section 500.1.2 Potential Pollutants from Site Features or Known Contaminants

Text Tab: The text tab provides two separate text areas for entering information regarding former industrial operations of a site and actions that will be taken in event of known historic contamination.

When the project area was a site of former industrial operations, provide the narrative as to the type of operations were conducted there. In addition, if the site also contains known contamination due to the industrial operations, include in the narrative the nature of the contamination.

If historic contamination exists on site, provide narrative text on how to prevent or minimize contact between the contaminants and stormwater/non-stormwater discharges, otherwise do not enter any text.

Lists Tab: When a project site has known contaminants, enter the list of all contaminants known.

Examples of known contaminants are:

- Lead
- TPH
- Diesel
- Benzene

500.1.3 Risk Level Determination

SWPPP GUIDANCE INSTRUCTIONS

- Summarize the risk level determination. Risk level determination is dependent on the results of the sediment risk assessment performed for the site in conjunction with the receiving water risk assessment performed for the site. Information regarding risk level determination requirements can be found in Section 1.4.2 of this *Manual*. Provide a copy of the sediment risk factor worksheet using the Excel spreadsheet from Appendix 1 (Risk Determination Worksheet) of the CGP, Attachment C.
- If applicable, provide a copy of the USEPA Rainfall Erosivity Factor Calculator Pages to document the R factor used. Include the Date Entry and Location pages as well as the R values pages in Attachment C. The Erosivity Waiver information can be found in Section 1.4.2.1 of this *Manual*.
- Note: Changing the dates of construction can significantly reduce the R value, which may enable the project to be eligible for a Rainfall Erosivity Waiver.
- If the combination KLS factor is used from the map provided, include a copy in Attachment C of the map with the site location shown. The combined KLS should be included in the Excel worksheet as either the K or LS factor and the other one should be entered as one (1).
- In Attachment C provide a copy of the Receiving Water Risk Factor Worksheet using the Excel spreadsheet from Appendix 1 of the CGP.
- In Attachment C provide a copy of the Combined Risk Level Matrix using the Excel spreadsheet from Appendix 1 of the CGP.

SWPPP Builder Instructions

Enter narrative text in the text area provided that addresses the risk level determination. An example is provided below.

EXAMPLE TEXT

Construction of the proposed project improvements is scheduled to occur from 10/10/2010 to 10/10/2011. The USEPA Rainfall Erosivity Factor Calculator and KLS map were used to calculate the sediment risk. The R factor is 41.9. The site location is shown on the KLS map and the associated combined KLS factor is 3.1. The resultant sediment risk is high (115.2). Copies of the Erosivity Index Calculator Results and the Sediment Risk Factor Worksheet are included in Attachment C, as well as the KLS map.

The disturbed area portion of the project site does not discharge to a sediment impaired water body or one that possess the beneficial uses of Cold, Spawn and Migratory, either directly or indirectly. Therefore, the receiving water risk is low. Using the combined risk level matrix, the Project Combined Risk is Level 2. The Receiving Water Risk Worksheet and Combined Risk Level Matrix are included in Attachment C.

500.2 Pre-Construction Existing Stormwater Control Measures

SWPPP GUIDANCE INSTRUCTIONS

- Identify the existing control measures in place prior to construction. Pre-construction control measures may include any measures used to reduce erosion, sediment or other pollutants in stormwater discharges. Pre-construction control measures may include but are not necessarily limited to: detention basins, infiltration basins, sediment basins, oil water separators, bridge slope protection, rock slope protection, existing erosion control, existing landscaping, lined ditches, and energy dissipaters.
- Describe how the existing control measures will be impacted by the project and how these existing measures will be incorporated into or modified during project implementation.

SWPPP Builder Instructions

Section 500.2 has two separate tabs for information entry: Text and Lists (Figure 3-26).

Existing (pre-construction) stormwater control measures List	
Landscaping on northern slopes	
Oil water seperator	
*	

Select List

Existing control measures

Figure 3-26. Section 500.2 List of Existing (Pre-Construction) Stormwater Control Measures

Lists Tab: In the fields provided, list existing stormwater control measures that are present in the project area.

EXAMPLE TEXT

- Detention basin located at the southeast end of the project. This basin was designed as a combination flood control and permanent treatment control measure. It is anticipated that the basin will be used as a temporary sediment basin during construction, and will be restored to original condition prior to project completion.
- Slopes under the existing bridge are protected with concrete. No disturbance to these slopes is anticipated.
- Two existing slopes have permanent rock slope protection; they are shown on WPCD 6. No disturbance is anticipated on these slopes.

Text Tab: If there are no pre-construction existing stormwater control measures, provide narrative text explanation.

500.3 BMP Selection for Erosion and Sediment Control

SWPPP Builder Instructions

Section 500.3 has two separate tabs for information entry: Text and Lists (Figure 3-27).

Section 500.3: BMP Selection for Erosion and Sediment Control		
Text	Lists	Instructions
Principles that will be followed to control erosion and sediment control in disturbed soil areas List		
<ul style="list-style-type: none"> Fit grading to the surrounding terrain. Time grading operations to minimize soil exposure Retain existing vegetation whenever feasible. Vegetate and mulch or otherwise stabilize disturbed areas. * 		<div style="border: 1px solid black; padding: 5px; width: 150px;"> Select List Soil cover provided for Erosion control principals </div>

Figure 3-27. Section 500.3 List of Principles to Control Erosion and Sediment in DSAs

Lists Tab: In the fields provided, erosion and sediment control measures that will be employed onsite. Examples of erosion control principles are:

- Fit grading to the surrounding terrain.
- Time grading operations to minimize soil exposure.
- Retain existing vegetation whenever feasible.
- Vegetate and mulch or otherwise stabilize disturbed areas.
- Minimize the length and steepness of slopes.
- Keep runoff velocities low.
- Prepare drainage ways and outlets to handle concentrated runoff until permanent drainage structures are constructed.
- Trap sediment on site.
- Inspect and maintain control measures frequently.

Text Tab: Provide additional narrative text regarding BMP selection. If there is no additional text to include, leave the text area blank. An example of additional narrative text is:

EXAMPLE TEXT

Temporary erosion and sediment control BMPs shall be deployed according to the Water Pollution Control Schedule (WPCS) in Section 500.7 and the Materials Management Plan in Section 500.1.1. A more concise listing of the BMP control measures to be implemented and maintained at the project site are denoted in the BMP selection tables provided in the following sub-sections.

SECTIONS 500.3.1 TO 500.3.5:**SWPPP GUIDANCE INSTRUCTIONS****BMP SELECTION PROCESS**

- Based on the potential for erosion and sediment deposition throughout the site, the BMP selection process shall identify the BMPs necessary to reduce or eliminate sediment-laden discharges from the site.
- All contract-required BMPs and any other BMPs required by the contract special provisions, contract plans, standard plans, and standard specifications, shall be identified for each of the sub-sections of Section 500.3, identified below. If a non-standard BMP is to be used, it shall be identified in the applicable BMP selection table and a narrative description of its use and implementation shall be provided.
 - 500.3.1 Temporary Run-on Control BMPs
 - 500.3.2 Soil Stabilization (Erosion Control) BMPs
 - 500.3.3 Sediment Control BMPs
 - 500.3.4 Tracking Control BMPs
 - 500.3.5 Wind Erosion Control
- The example text provided in Sections 500.3.1 to 500.3.5 and the example WPCDs provided in Attachment BB are provided only as examples. Copying example text without modifying it to pertain to project-specific conditions does not necessarily meet the requirements of the NPDES permits referenced in Sections 1.3 and 1.4 of this Manual.
- BMPs shall be selected to eliminate or reduce erosion on site and discharge of sediment off site.
- The instructions and the BMP selection tables shall be used to confirm that all appropriate CGP risk level BMP or LTCGP BMP requirements are included. The BMP selection table in each of the sub-sections of Section 500.3 shall be completed and a detailed narrative description shall be provided of the BMPs selected.
- Identify the selected BMPs on the Project Water Pollution Control BMPs List in Attachment CC and show the locations or make a note of the selected BMPs on the WPCDs in Attachment BB.

500.3.1 *Temporary Run-on Control BMPs***SWPPP GUIDANCE INSTRUCTIONS**

- Control for site run-on shall be implemented if needed to protect water quality objectives. Run-on from off-site shall be directed away from all disturbed areas or shall collectively be in compliance with the effluent limitations stated in the CGP and LTCGP.
- Run-on control BMPs can incorporate both soil stabilization and sediment control.
- Soil stabilization consists of source control measures that are designed to prevent soil

particles from detaching and becoming suspended in stormwater runoff, while sediment controls are designed to intercept runoff and capture suspended soil particles through a settlement or filtration process. Therefore, sediment controls are used to complement and enhance the selected soil stabilization measures.

- The sequence of steps, described below, shall be used to identify temporary run-on control BMPs to be included in the SWPPP.
 - Step 1: Incorporate the temporary run-on control BMPs that are described in:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications

If the BMPs required in Step 1 are inadequate to address run-on control requirements, then:

- Step 2: Incorporate run-on controls, using one or more of the Caltrans minimum requirements listed in Table 2-1 of this Manual
- Step 3: If the BMPs selected from Steps 1 and 2 are inadequate to control run-on, then refer to the Caltrans Statewide SWMP for additional guidance with respect to construction site BMPs. For the fact sheets on these BMPs, see the *Construction Site BMPs Manual*.
- For Steps 1 through 3 above, the tables and guidance in Section 2 of this Manual may be used to help identify the run-on control BMPs to be used on the project site.
- When selecting BMPs for the project site:
 - Consider the locations and uses of the disturbed areas
 - Consider the degree to which pollutants associated with those areas may be mobilized by contact with stormwater
 - Consider the direct and indirect pathways that run-on may affect those areas
- Complete the BMP selection table in this section to identify the run-on control BMPs that have been selected for use on the project. If a particular BMP will not be used or is not applicable check “Not Used” and enter a brief explanation. Include non-standard or alternative BMPs selected for the project in the BMP selection table.
- Provide a detailed narrative description of the selected BMPs. Explain the general approach of how selected BMPs will be implemented at points of potential run-on. See Section 300.3 for the estimated run-on flow rate(s), including the calculations and calculation input parameters.

Discuss the onsite availability of run-on control materials and proposed mobilization and implementation of temporary diversion BMPs in the event of a forecasted storm. Sufficient material(s) need to be available on site to protect DSAs from run-on. Areas that have already been protected from erosion using temporary or permanent physical stabilization or established vegetation stabilization BMPs are not considered to be “exposed DSAs” for purposes of this requirement.

- List selected run-on control BMPs by location on the Water Pollution Control Best Management Practices List (WPCBMPL) in Attachment CC.
- Show the BMPs selected to divert off-site drainage around and/or through the construction project on the WPCDs in Attachment BB. Show or note any additional BMPs used to protect disturbed soil from run-on.

SWPPP Builder Instructions

Section 500.3.1 has three separate tabs for information entry: Text, Lists, and Standard Table (Figure 3-28).

Narrative Text Regarding Project-Specific Temporary Run-on Control BMP Implementation List	
SS-1 Scheduling – The Contractor/WPC Manager will schedule as many soil disturbing activities as possible during the dry season, leaving as much soil undisturbed as possible.	Select List Additional list
SS-2 Preservation of Existing Vegetation – The slopes will be protected in place. Only BMPs needed to divert run-on away from the site will disturb the slopes. No vehicle or foot traffic will be allowed on the slopes.	
SS-9 Temporary Drainage Swales – Drainage swales will be cut in during grading and used to capture run-on from north of the site and convey it around the site and into the retention basins.	
SS-10 Outlet Protection / Velocity Dissipation Devices – Outlet protection will be used to prevent scour and reduce discharge velocities at the outlets of pipe slope drains, drainage swales, gravel filter berms, and/or retention basins.	
Once installed, run-on control BMPs may remain in place, except where they interfere with construction activities or access to and from the site.	
*	

Figure 3-28. Section 500.3.1 List of Narrative Text Regarding Project-Specific Temporary Run-on Control BMP Implementation

Text Tab: The text tab provides two separate text areas for entering information regarding CGP and LTCGP run-on requirements and selected temporary run-on control BMPs.

Narrative Text (1) run-on requirements:

Enter narrative text regarding CGP run-on requirements with respect to the project risk level following the provided SWPPP Guidance instructions and example. An example of narrative text is:

EXAMPLE TEXT

The CGP states that sites with low risk of impacting water quality are not subject to run-on and runoff control requirements unless an evaluation indicates that they are necessary or visual inspections show that such controls are required. Therefore, temporary diversion BMPs shall be implemented when deemed necessary by the WPC Manager to protect the site from run-on.

Since additional stormwater on the construction site can adversely impact construction activities and the deployment of other BMPs, thereby increasing costs, the methods for managing run-on have been addressed fully in this SWPPP. The implementation strategy is described in this section and the locations of temporary diversion BMPs are shown on the WPCDs in Attachment BB.

Anticipated drainage patterns following the completion of grading activities are shown on the WPCDs. Run-on from off-site areas shall be prevented from flowing through areas that have been disturbed by construction unless appropriate conveyance systems are in place. Calculations for anticipated stormwater run-on are shown in Section 300.3.

Stormwater from off site should be diverted around the project site or directed to an interior drain so that it does not impact disturbed soil or material storage areas. Within the project limits, the following actions will be employed to enhance the effectiveness of other BMPs:

- Divert water away from areas of soil disturbance
- Divert water from the top of disturbed slopes, which aids greatly in reducing erosion of slopes
- Divert water around stockpiles, material storage areas or other sensitive areas
- Place BMPs so that diverted water is safely directed to an inlet, temporary conveyance, or infiltrated into a vegetated area

The CGP requires that the SWPPP for a construction project describe all BMPs implemented to divert off-site drainage around or through the construction project. The BMP Fact Sheets for the selected temporary run-on control BMPs will be adhered to and can be found in the Caltrans *Construction Site BMPs Manual*. Temporary run-on control BMPs are listed by location in the WPCBMPL in Attachment CC and are shown on the WPCDs in Attachment BB. The Contractor may need temporary run-on control BMPs in other project locations as work progresses to keep run-on from entering disturbed areas of the site. These measures will be determined by the Contractor in the field; if measures are changed in the field, SWPPP Attachment BB and SWPPP Attachment CC will be updated. Use of alternative BMPs will require a SWPPP amendment and written approval by the RE. The following table explains how the selected BMPs shall be incorporated into the project.

Narrative Text (2)-Selected temporary run-on control BMPs:

Enter detailed narrative text regarding project specific BMP implementation following the provided SWPPP Guidance instructions and example. Explain the general approach of how selected BMPs will be implemented at points of potential run-on. See Section 300.3 for estimated run-on flow rate(s), including the calculations. An example of narrative text is:

EXAMPLE TEXT

BMPs will be deployed in a sequence to follow the progress of grading and construction. As the locations of soil disturbance change, temporary diversion controls will be adjusted accordingly to prevent run-on from impacting disturbed soil.

This project will implement the following practices for effective temporary DSA protection during construction. Once installed, run-on control BMPs may remain in place, except where they interfere with construction activities or access to and from the site.

Lists Tab: List the different temporary run-on control BMPs checked in the standard table. Example entries and narratives are provided below.

EXAMPLE TEXT

SS-1 Scheduling – The Contractor/WPC Manager will schedule as many soil disturbing activities as possible during the dry season, leaving as much soil undisturbed as possible.

SS-2 Preservation of Existing Vegetation – The slopes will be protected in place. Only BMPs needed to divert run-on away from the site will disturb the slopes. No vehicle or foot traffic will be allowed on the slopes.

SS-9 Temporary Drainage Swales – Drainage swales will be cut in during grading and used to capture run-on from north of the site and convey it around the site and into the retention basins. Pipe slope drains and/or gravel filter berms may be used in conjunction with swales if deemed necessary by the contractor.

SS-10 Outlet Protection / Velocity Dissipation Devices – Outlet protection will be used to prevent scour and reduce discharge velocities at the outlets of pipe slope drains, drainage swales, gravel filter berms, and/or sediment/detention basins.

SC-4 Temporary Check Dams – Check dams may be used to reduce scour and channel erosion within drainage swales or in conjunction with gravel filter berms. One hundred gravel bags and 250 linear feet (lf) of fiber roll shall be stored on site for mobilization prior to forecasted storm events. The gravel bags shall be stacked two high in swale 1, every 50 feet, and the fiber rolls shall be installed every 75 feet in swale 3.

SC-5 Fiber Rolls – Fiber rolls will be used to protect staged materials and stockpiles from run-on. Materials, stockpiles, and waste will not be stored near concentrated flow paths. 500 lf of fiber roll shall be stored in the staging area for mobilization prior to forecasted storm events.

An agricultural area is situated adjacent to the east of the project. The run-on calculations for this area indicate 10 cfs of flow will occur during the design rain event. The run-on flow is not currently diverted. To protect disturbed areas from run-on during construction, the following BMPs will be implemented:

SC-6 gravel bag berm – A row of gravel bags will be stacked two high to divert the flow from the agricultural area adjoining the project. The gravel bags will be placed almost on a level contour but with a slight elevation change to direct the water to the existing concrete-lined ditch to the south. Five hundred gravel bags will be stockpiled in the northwest corner of the site for mobilization prior to forecasted storm events.

Table 500.3.1: Complete the table by checking off which run-on control BMPs will be incorporated into the project as required (Figure 3-29).

Section 500.3.1: Temporary Run-on Control BMPs								
TABLE 500.3.1 TEMPORARY RUN-ON CONTROL BMPs								
CONSTRUCTION BMP ID NO. (1)	BMP NAME	CONTRACT HIN REQUIREMENT (2)	CONTRACT BID ITEM	BMP USED <input checked="" type="radio"/> Yes <input type="radio"/> No	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON			
SS-1	Scheduling	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> Yes <input type="radio"/> No				
SS-2	Preservation of Property/ Preservation of Existing Vegetation	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> Yes <input type="radio"/> No				
SS-9	Earth Moving/Drainage Swales & Lined Swales	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> Yes <input type="radio"/> No				
SS-10	Outlet Protection / Velocity Dissipation Devices	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> Yes <input type="radio"/> No				
SS-11	Slope Drains	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> Yes <input type="radio"/> No				
ALTERNATIVE SEDIMENT CONTROL BMPs USED (3)								
<input type="radio"/> Yes <input checked="" type="radio"/> No								
CONSTRUCTION BMP ID NO. (1)	BMP NAME	IF USED STATE REASON						

NOTE:
(1)The BMP designations (SS-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
(2)Contract minimum requirements are based on Contract Minimum Requirements, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QD or WPC Manager.
(3)Use of alternative BMPs will require written approval by the RE.

Figure 3-29. Section 500.3.1 Table of Temporary Run-on Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- Choose 'yes' or 'no' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.3.2 Soil Stabilization (Erosion Control)

SWPPP GUIDANCE INSTRUCTIONS

- Soil stabilization consists of source control measures that are designed to prevent soil particles from detaching and becoming suspended in stormwater runoff. Soil stabilization BMPs protect the soil surface by covering and/or binding the soil particles.
- Described below is the sequence of steps that shall be used to identify soil stabilization BMPs to be included in the SWPPP.
 - Step 1: Incorporate the temporary soil stabilization (erosion control) BMPs that are described in:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications

If the BMPs required in Step 1 are inadequate to address soil stabilization requirements, then:

- Step 2: Incorporate the temporary soil stabilization (erosion control) BMPs using one or more of the Caltrans minimum requirements listed in Table 2-1 of this Manual.
- Step 3: If the BMPs selected from Steps 1 and 2 are inadequate to address soil stabilization requirements, then refer to the SWMP for additional guidance with respect to construction site BMPs. For the fact sheets on these BMPs, see the *Construction Site BMPs Manual*.
- For Steps 1 through 3 above, the tables and guidance in Section 2 of this Manual may be used to help identify the soil stabilization BMPs to be used on the project.
- When selecting BMPs for the project site:
 - Consider the quantity, physical characteristics (e.g., liquid, powder, solid), and locations of each potential pollutant source handled, produced, stored, recycled, or disposed of at the site
 - Consider the degree to which pollutants associated with those materials may be exposed to a mobilized by contact with stormwater
 - Consider the direct and indirect pathways that pollutants may be exposed to stormwater or authorized non-stormwater discharges. This shall include an assessment of past spills or leaks, non-stormwater discharges, and discharges from adjoining areas
- Complete the BMP selection tables in this section to indicate the Soil Stabilization BMPs that have been selected for use on the project. If a particular BMP will not be used or is not applicable, check “Not Used” and enter a brief explanation. Include non-standard or alternative BMPs selected for the project in the BMP selection table.
- Provide a detailed narrative description of temporary soil stabilization BMPs. Give a general approach on how temporary soil stabilization BMPs will be implemented on the project.

- Discuss the on-site availability of temporary soil stabilization materials (materials kept for temporary soil stabilization BMPs) and proposed mobilization and implementation of temporary soil stabilization BMPs in the event of a forecasted storm. Sufficient material(s) needed to install temporary soil stabilization BMPs necessary to protect the exposed portions (DSAs) of the site from erosion shall be stored on site. Areas that already have been protected from erosion using temporary or permanent physical stabilization or established vegetation stabilization BMPs are not considered to be “exposed DSAs” for purposes of this requirement.
- List selected soil stabilization BMPs by location on the WPCBMPL in Attachment CC.
- Show the locations or make a note of the selected soil stabilization BMPs on the WPCDs in Attachment BB.

SWPPP Builder Instructions

Section 500.3.2 has three separate tabs for information entry: Text, Lists, and Standard Table (Figure 3-30).

Soil Stabilization BMPs Used List	
SS-1, SS-2 Scheduling and Preservation of Existing Vegetation: Construction activities shall be sequenced to include the installation of both soil stabilization and sediment control measures.	Select List
SS-6 Straw Mulch: Straw mulch will be applied to the disturbed areas adjacent to excavations and on shallow slopes surrounding the site.	BMP's Used
SS-7 Geotextiles, Plastic Covers and Erosion Control Blankets/Mats Geotextile blankets will be used to provide temporary and permanent stabilization for the flow line of the uncontrolled runoff on the western boundary of the project .	
SC-10 Velocity Dissipation Devices—where the diversion at the upgradient edge of the project flows to the existing lined ditch, a velocity dissipation device consisting of 3- to 6-inch-diameter gravel will be used.	
*	

Figure 3-30. Section 500.3.2 List of Soil Stabilization BMPs Used

Text Tab: Add a detailed narrative description of temporary soil stabilization BMPs that were selected for use on the project. Give a general approach on how BMPs will function and comply with CGP requirements. Discuss on-site availability of BMP materials and implementation of BMPs. Examples of narrative text entries are:

EXAMPLE TEXT

- DSAs will be stabilized with temporary or permanent soil stabilization (erosion control) within 14 days of when an area becomes inactive
- DSAs will be stabilized with temporary or permanent soil stabilization (erosion control) before forecasted storm events
- DSAs that are substantially complete will be stabilized with permanent soil stabilization (erosion control) until hardscaping or landscaping can be completed
- Temporary soil stabilization BMPs will be deployed, inspected and maintained to Caltrans Standard Specifications and Standard Plans prior to forecasted storm events
- The project schedule shall sequence construction activities with the installation of both soil stabilization and sediment control measures. The construction schedule shall be arranged as much as practicable to leave soil undisturbed until immediately prior to clearing/grading.
- Existing vegetation shall be preserved where indicated on the WPCDs.

- The WPC Manager shall monitor weather using NWS reports to track conditions and alert crews with regard to forecasted storm events (<http://www.weather.gov/>).
- Prior to forecasted storm events (50 percent or greater chance of at least 0.10 inches of precipitation within 24- hours), all DSAs and temporary soil stabilization BMPs shall be inspected, and maintenance performed or additional BMPs deployed if necessary.
- Sufficient soil stabilization materials shall be maintained on site to allow implementation in conformance with this SWPPP. This includes implementation requirements for active and inactive areas that require BMP deployment before the onset of rain.
- Soil stabilization shall consist of covering disturbed soils with mulch, soil binders, geotextiles, or vegetation.
 - Soil cover such as hydraulic or wood mulch or soil binders shall serve to reduce the erosion potential by absorbing the energy of raindrops, promoting infiltration in lieu of runoff, and reducing the velocity of runoff, but will generally require a minimum curing time of 24 hours prior to a forecasted storm event.
 - Temporary soil stabilization (erosion control) measures shall be deployed in active and inactive areas as required. Such measures shall be redeployed as necessary to maintain effectiveness.
 - The application of any erodible landscape material shall be discontinued within two days prior to a forecasted storm event or during periods of precipitation.
- DSAs in which construction activities have been substantially completed shall be stabilized using permanent soil stabilization (erosion control) methods until hardscaping or landscaping can be completed.
- The Contractor must provide temporary stabilization, or initiate permanent stabilization, of disturbed areas within 15 calendar days of the most recent land disturbance in areas where construction support activities have been temporarily suspended or have permanently ceased, except as stated below.
 - When vegetative stabilization methods are being used at a site, but the site is located in an arid area during dry or drought conditions, vegetative stabilization measures shall be initiated as soon as practicable, when growing conditions are best for planting or seeding.
 - Where disturbed areas are awaiting vegetative stabilization for periods greater than 15 calendar days after the most recent disturbance, non-vegetative methods of stabilization shall be employed.
- During the grading process, permanent drainage swales shall be cut into place. These permanent features may be used during construction, but the inlets will need to be protected in place. In addition, any sedimentation will have to be cleaned out prior to the end of construction, with care being taken to maintain the final grade according to plan.
- Control erosion in concentrated flow paths (drainage swales) will be achieved by applying erosion control blankets, check dams, erosion control seeding, or lining swales.
- BMPs that employ plastic materials shall be replaced by more sustainable, environmentally friendly alternatives where feasible. Where plastic materials are deemed necessary, the Contractor shall use plastic materials resistant to solar degradation.
- Prior to completion of construction, permanent erosion control methods shall be applied to all remaining DSAs.
- Temporary erosion control BMPs shall be removed after the protected areas are stabilized.

Deployment of Temporary Erosion Control

Construction activities will be sequenced to incorporate the installation of both soil stabilization and sediment control measures. The construction schedule will be arranged as much as practicable to leave existing vegetation undisturbed until immediately prior to clearing/grading.

BMPs will be deployed in a sequence to follow the progress of grading and construction and shown on the current water pollution control schedule. As the locations of soil disturbance change, soil stabilization and sedimentation controls will be adjusted accordingly to control stormwater runoff at the downgrade perimeter and drain inlets. The WPC Manager will monitor weather using NWS reports to track conditions and alert crews to the onset of rainfall events.

Lists Tab: List the different temporary soil stabilization BMPs checked in the standard table. Example entries and narratives are:

EXAMPLE TEXT

SS-1, SS-2 Scheduling and Preservation of Existing Vegetation: Construction activities shall be sequenced to include the installation of both soil stabilization and sediment control measures. BMPs will be deployed in a sequence that follows the progress of grading and construction and will be shown on a current water pollution control schedule as described in section 500.7 of this Manual. The construction schedule will be arranged as much as practicable to leave existing vegetation undisturbed until immediately prior to grading.

Run-off Controls: Check dams – gravel bag diversions will result in a concentrated flow that will be checked with dams to prevent erosion. SC-10 Velocity Dissipation Devices–where the diversion at the upgradient edge of the project flows to the existing lined ditch, a velocity dissipation device consisting of 3- to 6-inch-diameter gravel will be used to slow the flow and to protect the area immediately above the concrete-lined ditch from erosion.

SS-6 Straw Mulch: Straw mulch will be applied per Standard Specifications to the disturbed areas adjacent to excavations and on shallow slopes surrounding the site. See the WPCDs in Attachment BB and WPCBMPL in Attachment CC of this SWPPP for locations where straw mulch will be used.

SS-7 Plastic Cover and Rolled Erosion Control Products: Geotextile blankets will be used to provide temporary and permanent stabilization for the flow line of the vegetated swale on the western boundary of the project per Standard Plan T 55. Polyethylene covers will be used throughout the project area to cover small exposed soil areas prior to forecasted storm events, and will be anchored to prevent damage by wind per Standard Plan T 53. Loose stockpiled construction materials that are not actively being used (e.g., soil, spoils, aggregate, fly-ash, stucco, hydrated lime) will be covered and placed in a bermed area per Standard Plan T 53.

Standard Table Tab: Complete the table by checking off which soil stabilization BMPs will be incorporated into the project as required (Figure 3-31).

Section 500.3.2: Soil Stabilization (Erosion Control)								
TABLE 500.3.2 TEMPORARY EROSION CONTROL BMPs								
CONSTRUCTION BMP ID NO. ⁽¹⁾	BMP NAME	CONTRACT MIN REQUIREMENT ⁽²⁾	CONTRACT BID ITEM	BMP USED	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON			
SS-1	Scheduling	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>				
SS-2	Preservation of Existing Vegetation	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>				
SS-3	Temporary Hydraulic Mulch (Bondoed Synthetic Fiber Matrix)	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>				
SS-4	Temporary Hydraulic Mulch (Polymer Stabilized Fiber Matrix)	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	Soil stabilization to be provided with temporary seeding			
ALTERNATIVE SEDIMENT CONTROL, BMPs USED: <input checked="" type="radio"/> Yes <input type="radio"/> No								
CONSTRUCTION BMP ID NO. (1)	BMP NAME ⁽²⁾	IF USED STATE REASON						

Notes:
(1)The BMP designations (SS-1, SS-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
(2)Contract minimum requirements shall be determined from the Contract Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
(3)Use of alternative BMPs will require written approval by the RE.

Figure 3-31. Section 500.3.2 Table of Temporary Erosion Control BMPs

The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used. Choose 'yes' or 'no' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.3.3 Sediment Control

SWPPP GUIDANCE INSTRUCTIONS

- Sediment controls are used to complement and enhance the selected soil stabilization measures. Sediment controls are designed to intercept runoff and capture suspended soil particles through a settlement or filtration process.
- Described below is the sequence of steps that shall be used to identify temporary sediment control BMPs to be included in the SWPPP.
 - Step 1: Incorporate the temporary sediment control BMPs that are described in the following documents:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications

If the sediment control BMPs required in Step 1 are inadequate to address temporary sediment control requirements, then:

- Step 2: Incorporate the temporary sediment control BMPs using one or more of the Caltrans minimum requirements listed in Table 2-1 of this Manual.

- Step 3: If the sediment control BMPs selected from Steps 1 and 2 are inadequate to address temporary sediment control requirements, then incorporate the temporary sediment control BMPs that are described in the SWMP. For reference on these BMPs, see the *Construction Site BMPs Manual*.
- For Steps 1 through 3 above, the tables and guidance in this Manual, Section 2 may be used to help identify the sediment control BMPs that may be required for the project.
- Complete the BMP selection tables in this section to indicate the temporary sediment control BMPs that have been selected for use on the project. If a particular BMP will not be used or is not applicable, check “Not Used” and enter a brief explanation. Include non-standard or alternative BMPs selected for the project in the BMP selection table.
- List selected temporary sediment control BMPs on the WPCBMPL in Attachment CC.
- Show selected temporary sediment control BMPs on the WPCDs from Attachment BB. Show BMPs used to divert off-site drainage around and/or through the construction project on the WPCDs.
- Provide a detailed narrative description of temporary sediment control BMPs. Give a general approach on how temporary sediment control BMPs will be implemented on the project at the draining perimeter of DSAs, at the toes of slopes, and at inlets and outfall areas at all times.
- Discuss the on-site availability of temporary sediment control materials (materials kept for temporary sediment control BMPs) and proposed mobilization and implementation of temporary sediment control BMPs in the event of a forecasted storm.

SWPPP Builder Instructions

Section 500.3.3 has three separate tabs for information entry: Text, Lists, and Standard Table (Figure 3-32).

Temporary Sediment Control BMPs and how they will be incorporated into the project List	
SC-1 Temporary Silt Fence- Silt fences will be deployed along the toes of exterior cut and fill slopes to settle out soil particles from stormwater runoff.	
SC-4 Temporary Check Dam- Used on: top of cut slope channel along Coyote Creek between Station 230+00 and 235+00; northerly fill slope between Stations 238+00 and 240+00; and also along Griffith Road between Stations 261+00 and 263+00.	
SC-5 Temporary Fiber Rolls- As shown on drawing. Fiber rolls installed during Stage 1 will be left and protected in place during Stage 2 between Stations 236+00 and 237+00 and also between Stations 241+00 and 250+00.	
*	

Figure 3-32. Section 500.3.3 List of Temporary Sediment Control BMPs

Text Tab: Add a detailed narrative description of temporary sediment control BMPs. Give a general approach on how BMPs will be implemented on the project, on the on-site availability, and proposed mobilization and implementation of BMPs.

Lists Tab: Provide narrative descriptions of the sediment control BMPs chosen in the Standard Table that will be incorporated into the project. Below are examples of entries for the List tab.

EXAMPLE TEXT

SC-1 Temporary Silt Fence: Silt fences will be deployed along the toes of exterior cut and fill slopes to settle out soil particles from stormwater runoff. Temporary silt fences will be installed and maintained per Standard Specifications and Standard Plan T 51.

SC-4 Temporary Check Dam: Temporary check dams will be installed during construction of the temporary earthen channels at the following locations: top of cut slope channel along Coyote Creek between Station 230+00 and 23 5+00; northerly fill slope between Stations 23 8+00 and 240+00; and also along Griffith Road between Stations 26+00 and 5 1+00.

SC-5 Temporary Fiber Rolls: Temporary fiber rolls will be installed using installation method Type 2 of the Standard Specifications and Standard Plans along cut and fill slopes at locations shown on the drawings. Fiber rolls installed during Stage 1 will be left and protected in place during Stage 2 between Stations 236+00 and 237+00 and also between Stations 241+00 and 250+00.

SC-6 Temporary Gravel Bag Berm: Temporary gravel bag berms will be installed along the temporary earthen swales between Stations 206+00 and 225+00 along the southerly edge of the project limits, and also along the sides of the roadway between Stations 209+00 to 218+00 during stage 2.

SC-7 Street Sweeping: Street sweeping is described in Section 500.3.4.

SC-10 Temporary Drainage Inlet Protection: Storm drain inlet protection will be used at all operational internal inlets to the storm drain system, as shown on the WPCDs. Drain inlet protection type is shown on the WPCDs for each inlet associated with each stage of construction.

Standard Table Tab: Complete the table by checking off which sediment controls will be incorporated into the project (Figure 3-33).

Section 500.3.3: Sediment Control						
TABLE 500.3.3 TEMPORARY SEDIMENT CONTROL BMPs						
CONSTRUCTION BMP ID NO. ⁽¹⁾	BMP NAME	CONTRACT MINIMUM REQUIRE- MENT ⁽²⁾	CONTRACT BID ITEM	BMP USED	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON	
SC-1	Temporary Silt Fence	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/>	<input type="radio"/>	
SC-2	Temporary Sediment Basin	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/>	<input type="radio"/>	
SC-4	Temporary Check Dam	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input type="radio"/>	
SC-5	Fiber Rolls	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input type="radio"/>	
SC-6	Temporary Gravel Bag Berm	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/>	<input type="radio"/>	
ALTERNATIVE SEDIMENT CONTROL BMPs USED ⁽³⁾						
<input type="radio"/> Yes <input checked="" type="radio"/> No						
CONSTRUCTION BMP ID NO. ⁽¹⁾	BMP NAME [*]	IF USED STATE REASON				

Notes:

(1)The BMP designations (SC-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.

(2)Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to all contracts. Some requirements may be determined by the QSD or VPC Manager.

(3)Use of alternative BMPs will require written approval by the RE.

Figure 3-33. Section 500.3.3 Table of Temporary Sediment Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- Choose 'yes' or 'no' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.3.4 Tracking Control

SWPPP GUIDANCE INSTRUCTIONS

- Described below is the sequence of steps that shall be used to identify temporary tracking control BMPs to be included in the SWPPP.
 - Step 1: Incorporate the temporary tracking control BMPs that are described in:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications
- If the tracking control BMPs required in Step 1 are inadequate to address tracking control requirements, then:
 - Step 2: Incorporate the temporary tracking control BMPs using one or more of the Caltrans minimum requirements listed in Table 2-1 of this Manual.
 - Step 3: If the tracking control BMPs selected from Steps 1 and 2 are inadequate to address tracking control requirements, then incorporate the temporary tracking control BMPs that are described in the SWMP. For reference on these BMPs see the *Construction Site BMPs Manual*.
- For Steps 1 through 3 above, the tables and guidance in this Manual, Section 2 may be used to help identify the tracking control BMPs that may be required for the project.
- Complete the BMP selection table in this section to indicate the temporary tracking control BMPs that have been selected for use on the project. If a particular BMP will not be used or is not applicable, check “Not Used” and enter a brief explanation. Include non-standard or alternative BMPs selected for the project in the BMP selection table.
- List selected temporary tracking control BMPs on the WPCBMPL in Attachment CC.
- Tracking controls shall be considered and implemented year round and throughout the duration of the project. Show selected tracking control BMPs on the WPCDs in Attachment BB.
- Provide a detailed narrative description of temporary tracking control BMPs. Give a general approach on how temporary tracking control BMPs will be implemented on the project at all access (ingress/egress) points to the project site where vehicles and/or equipment may track sediment from the construction site onto public or private roadways.

SWPPP Builder Instructions

Section 500.3.4 has three separate tabs for information entry: Text, Lists, and Standard Table (Figure 3-34).

Section 500.3.4: Tracking Control		
Text	Lists	
Temporary Tracking Control BMPs and how they will be incorporated into the project List		
<p>TC-1 Temporary Construction Entrance- construction site entrances and exits, equipment yards, PCC batch plants and crushing plants, water filling areas for water trucks, and the project office location, as shown on the site map.</p> <p>TC-2 Stabilized Construction Roadway- Refer to the WPCDs for entrance/exit and construction roadway locations. Stabilization material will be 3- to 6-inch-diameter crushed aggregate.</p> <p>SC-7 Street Sweeping- Road sweeping and vacuuming will occur during soil hauling and as necessary to keep streets clear of tracked material and debris.</p> <p>*</p>	<p>Select List</p> <table border="1"> <tr> <td>Temporary Tracking Control BMP's</td> </tr> </table>	Temporary Tracking Control BMP's
Temporary Tracking Control BMP's		

Figure 3-34. Section 500.3.4 List of Temporary Tracking Control BMPs

Text Tab: Add a detailed narrative description of tracking control BMPs. Give a general approach on how BMPs will be implemented on the project following the section instructions.

Lists Tab: Provide a detailed narrative descriptions of the tracking control BMPs chosen in the Standard Table that will be incorporated into the project. Below are examples of entries for the List tab.

EXAMPLE TEXT

TC-1 Temporary Construction Entrance: A stabilized construction entrance/exit will be constructed and maintained at construction site entrances and exits, equipment yards, PCC batch plants and crushing plants, water filling areas for water trucks, and the project office location, per Standard Plan T 58 as shown on the site map.

The site entrance/exit will be stabilized to reduce tracking of sediment as a result of construction traffic. The entrance will be designated and graded to prevent runoff from leaving the site. Stabilization material will be 3- to 6- inch-diameter crushed aggregate. The entrance will be flared where it meets the existing road to provide an adequate turning radius. A site entrance/exit shall only be installed to reduce tracking of sediment during soil-hauling activities that extend over a one-week time period.

BMPs will be implemented to prevent the off-site tracking of loose construction and landscape materials.

TC-2 Temporary Construction Roadway: The construction roadway through the site will also be designated and stabilized to prevent erosion and to control tracking of mud and soil material onto adjacent roads. The roadway will be clearly marked for with a low speed limit to control dust. Refer to the WPCDs for entrance/exit and construction roadway locations. Stabilization material will be 3- to 6-inch-diameter crushed aggregate. A regular maintenance program will be conducted to replace sediment-clogged stabilization material with new stabilization material.

SC-7 Street Sweeping: Road sweeping and vacuuming will occur during soil hauling and as necessary to keep streets clear of tracked material and debris at the minimum frequency stated in the Standard Specifications. Washing of sediment tracked onto streets into storm drains will not occur.

Standard Table: Complete the table by checking off which tracking controls will be incorporated into the project (Figure 3-35).

Section 500.3.4: Tracking Control

TABLE 500.3.4 TEMPORARY TRACKING CONTROL BMPs						
CONSTRUCTION BMP ID NO.(1)	BMP NAME	CONTRACT MIN REQUIRE- MENT (2)	CONTRACT BID ITEM	BMP USED	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON	
				<input type="radio"/> Yes <input checked="" type="radio"/> No		
SC-7	Street Sweeping	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>		
TC-1	Temporary Construction Entrance	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>		
TC-2	Stabilized Construction Roadway	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>		
TC-3	Temporary Entrance / Outlet Tire Wash	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>		

ALTERNATIVE SEDIMENT CONTROL BMPs USED (3)		
IF USED STATE REASON		
CONSTRUCTION BMP ID NO. (1)	BMP NAME *	

Notes:
 (1)The BMP designations (SS-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the BMPs are required.
 (2)Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
 (3)Use of alternative BMPs will require written approval by the RE.

Figure 3-35. Section 500.3.4 Table of Temporary Tracking Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- Choose 'yes' or 'no' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.3.5 Wind Erosion Control

SWPPP GUIDANCE INSTRUCTIONS

- Described below is the sequence of steps that shall be used to identify wind erosion control BMPs to be included in the SWPPP.
 - Step 1: Incorporate the temporary wind erosion control BMPs that are described in:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications
- If the wind erosion control BMPs required in Step 1 are inadequate to address wind erosion control requirements, then:
 - Step 2: Incorporate the temporary wind erosion control BMPs that are described in the SWMP. For reference on these BMPs see the *Construction Site BMPs Manual*.
- For Steps 1 and 2 above, the tables and guidance in this Manual, Section 2 may be used to help identify the wind erosion control BMPs that may be required for the project.
- Complete the BMP selection table in this section to indicate the temporary wind erosion control BMPs that have been selected for use on the project. If a particular BMP will not be used or is not applicable, check “Not Used” and enter a brief explanation. Include non-standard or alternative BMPs selected for the project in the BMP selection table.
- List selected wind erosion control BMPs on the WPCBMPL in Attachment CC.
- Provide a detailed narrative description of wind erosion control BMPs. Give a general approach on how wind erosion control BMPs will be implemented on the project to control dust during construction operations, including stockpile operations, at all times.

SWPPP Builder Instructions

Section 500.3.5 has three separate tabs for information entry: Text, Lists, and Standard Table (Figure 3-36).

Figure 3-36. Section 500.3.5 List of Temporary Wind Erosion Control BMPs

Text Tab: Add a detailed narrative description of wind erosion BMPs. Give a general approach on how BMPs will be implemented on the project following the section instructions.

EXAMPLE TEXT

Potable water shall be applied to DSAs of the project site to control dust and maintain optimum moisture levels for compaction. The water will be applied using water trucks. As shown on the project schedule, project soils will be disturbed and exposed from approximately May 1 through December 15. Water applications will be concentrated during the late summer and early fall months and especially during the embankment construction operations scheduled for July. The total water to be applied is expected to be between 0.8 and 1.3 million gallons.

Wind erosion control and water conservation practice BMPs will be implemented to provide dust control and prevent discharges from dust control activities and water supply equipment. Water application rates will be minimized as necessary to prevent runoff and ponding, and leaks from water equipment will be repaired immediately.

During windy conditions [forecast or actual wind conditions of approximately 25 miles per hour (mph) or greater], dust control measures will be applied to DSAs, including haul roads, to adequately control wind erosion.

Stockpiles will be managed using plastic covers to prevent wind dispersal of sediment from stockpiles.

Lists Tab: Provide narrative descriptions of the wind erosion BMPs chosen in the Standard Table that will be incorporated into the project.

Standard Table: Complete the table by checking off which wind erosion controls will be incorporated into the project (Figure 3-37).

Section 500.3.5: Wind Erosion Control					
Text	Lists	Standard Table	Instructions		
TABLE 500.3.5 TEMPORARY WIND EROSION CONTROL BMPs					
CONSTRUCTION BMP ID NO.(1)	BMP NAME	CONTRACT MIN REQUIRE- MENT(2)	CONTRACT BID ITEM	BMP USED Yes No	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON
WE-1	Wind Erosion Control	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
TC-1	Temporary Construction Entrance	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
TC-2	Stabilized Construction Roadway	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
—	All Soil Stabilization Measures included in Section 500.3.2	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
ALTERNATIVE SEDIMENT CONTROL BMPs USED (3)					
<input type="radio"/> Yes <input checked="" type="radio"/> No					
CONSTRUCTION BMP ID NO. (1)	BMP NAME *	IF USED STATE REASON			
—					
Notes: (1)The BMP designations (SS-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document. (2)Contract minimum requirements are defined in the Contract Documents, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager. (3)Use of alternative BMPs will require written approval by the RE.					

Figure 3-37. Section 500.3.5 Table of Temporary Wind Erosion Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- Choose 'yes' or 'no' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.4 *BMP Selection for Job Site Management***GENERAL SWPPP GUIDANCE INSTRUCTIONS FOR SECTIONS 500.4.1 TO 500.4.4:****BMP SELECTION PROCESS**

- Using the identified potential pollutant sources in Section 500.1, the BMP selection process identifies the BMPs necessary to reduce or eliminate pollutant discharges from the site.
- All contract required BMPs and any other BMPs required by the contract special provisions, contract plans, standard plans, and standard specifications will be identified for each section. If a non-standard BMP will be used, it will be identified in the BMP implementation table and a narrative description of its use and implementation will be provided.
- The example text provided in Sections 500.4.1 to 500.4.2 and the example WPCDs provided in Attachment BB are provided only as examples. Copying example text for project-specific activities does not necessarily meet the requirements of the NPDES Permits referenced in Sections 1.3 and 1.4 of this Manual.
- BMPs will be selected to eliminate or reduce the pollutants identified in the Section 500.1.1: Materials Management inventory list. The BMP consideration checklists in each of the following sections will be completed to assist in the selection of project-specific BMPs.
- 500.4.1: Non-Stormwater Site Management
- 500.4.2: Waste Management and Materials Pollution Control
- The selected BMPs on the project Water Pollution Control BMPs List and WPCDs will be identified. The instructions in Section 500.5 and the SWPPP Checklist will be followed to confirm that all WPCD requirements are included. A narrative description of the BMPs selected will be provided in the appropriate section.
- Risk Levels 1, 2 and 3 will all include, at a minimum, good housekeeping practices that must be followed. These are described below and shall be addressed by following the necessary guidelines in the SWPPP template.

500.4.1 Non-Stormwater Site Management

SWPPP GUIDANCE INSTRUCTIONS

The Caltrans Permit defines non-stormwater discharges as follows:

- “Non-stormwater discharges consist of all discharges from a municipal stormwater conveyance which do not originate from forecasted storm events (i.e., all discharges from a conveyance system other than stormwater).”
- The three types of non-stormwater discharges specified in the Caltrans Permit are described below.
 - Discharges Authorized by a Separate NPDES Permit: Since these discharges have a separate permit, they are not addressed by the SWMP.
 - Exempted Discharges: These discharges have not been found to contain pollutants and can therefore be discharged without direct application of BMPs. (Previously described spill prevention, waste management and other practices will be implemented to ensure that these discharges remain uncontaminated.) These discharges include:
 - Flows from riparian habitats or wetlands
 - Diverted stream flows
 - Springs
 - Rising groundwater
 - Uncontaminated groundwater infiltration
 - Conditionally Exempt Discharges: The conditionally exempt discharges and their associated BMPs and/or regulatory requirements are summarized below.
 - Non-stormwater discharges into storm drainage systems or waterways, which are not authorized under the Caltrans Permit or authorized under a separate NPDES permit, are prohibited. Examples of prohibited discharges common to construction activities include:
 - Vehicle and equipment wash water, including concrete washout water
 - Slurries from concrete cutting and coring operations, PCC grinding or asphalt concrete (AC) grinding operations
 - Slurries from concrete or mortar mixing operations
 - Blast residue from high-pressure washing of structures or surfaces
 - Wash water from cleaning painting equipment
 - Runoff from dust control applications of water or dust palliatives
 - Sanitary and septic wastes
 - Chemical leaks and/or spills of any kind including but not limited to petroleum, paints, cure compounds.

- Some non-stormwater discharges are authorized under the Caltrans Permit and need not be prohibited unless identified as a source of pollutants. However, specific control measures may be required to minimize adverse impacts from these discharges. Some RWQCBs may require a separate NPDES permit or specific monitoring and reporting requirements for authorized discharges. Check with the RE or the applicable RWQCB for requirements in the project area. Non-stormwater discharges exempted by the Caltrans Permit include:
 - Flows from riparian habitats or wetlands
 - Diverted stream flows
 - Springs, rising groundwater
 - Uncontaminated groundwater infiltration
- Other discharges such as pumped groundwater, irrigation water, and water line and hydrant flushing (see Caltrans Permit, Order No. 2012-0011-DWQ, NPDES No. CAS000003, Section B, Non-stormwater Discharge Prohibitions Item 2, Conditionally Exempt Discharges, for entire list), are not prohibited if they are identified as not being sources of pollutants to receiving waters or if appropriate control measures (BMPs) to minimize the adverse impacts of such sources are developed and implemented. Some RWQCBs may require a separate NPDES permit or specific monitoring and reporting requirements for the conditionally exempt discharges. Check with the RE regarding what discharges are conditionally exempt.

Use the following steps to identify non-stormwater pollution control BMPs.

- Step 1: Incorporate the non-stormwater pollution control BMPs that are described in:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications
- If the non-stormwater pollution control BMPs required in Step 1 are inadequate to address potential pollutants in non-stormwater discharges, then:
 - Step 2: Incorporate the temporary non-stormwater pollution control BMPs that are described in the SWMP. To reference these BMPs, see the *Construction Site BMPs Manual*.

- For Steps 1 and 2 above, use the following process to identify and select BMPs for non-stormwater management pollution control. List each potential non-stormwater discharge and provide the information requested below.
 - Identify all potential non-stormwater discharges within the project site. Examine all project activities and determine what discharges will be generated or may be required to complete each activity, including mobile-type operations. Discuss how mobile operations, such as maintenance and fueling of large or stationary equipment, will be addressed. Examples of common construction activities that may result in non-stormwater discharges on a project are:
 - Vehicle and equipment cleaning, fueling and maintenance
 - Surface water diversions
 - Dewatering operations
 - Saw-cutting
 - Drilling
 - Boring
 - AC and PCC grinding
 - AC and PCC recycling
 - Concrete mixing
 - Washout of concrete equipment
 - Crushing
 - Bridge cleaning
 - Blasting
 - Painting
 - Hydro-demolition
 - Mortar mixing
 - Air-blown mortar
 - Complete the BMP selection table in this section to indicate the BMPs selected. Identify all contract-required BMPs and any other BMPs required by the contract special provisions. If a particular BMP will not be used or is not applicable, check "Not Used" and enter a brief reason.
 - Describe each planned non-stormwater discharge from the project into the storm drain system or waterway, including flow/quantity and expected pollutants. If a flow or quantity cannot be determined, then fully describe the nature and extent of the activity such that the quantity can be inferred. One-time discharges shall be monitored by the WPC Manager during the time that such discharges are occurring.
 - Describe each non-stormwater source or activity that may generate a discharge; containment facilities and appurtenances that would be employed; and flow paths of discharge to downstream inlets, drainage facilities, and receiving waters. Where possible, depict BMP locations on the WPCDs.

- Indicate the time period and frequency of each activity that generates or may generate a discharge.
- Describe mandatory non-stormwater control BMPs and practices required by Caltrans, the RWQCB (such as WDR requirements for projects that reuse aerially deposited lead soils), other permits, or other federal, state, or local agencies. Provide details and schedules, as appropriate. Include maintenance, inspection, testing, and reporting requirements. Provide permit information for discharges covered by a separate NPDES permit.
- Non-stormwater BMPs by location on the WPCBMPL in Attachment CC.
- Describe contractor-selected non-stormwater control BMPs and practices to minimize, contain, and dispose prohibited discharges or to minimize adverse impacts of authorized discharges from the project into the storm drain system or waterway. BMPs in both the Non-Stormwater Management and the Materials Handling and Waste Management categories may be applicable to non-stormwater discharges. Include maintenance, inspection, testing, and reporting procedures, if applicable. List selected temporary soil stabilization BMPs by location on the WPCBMPL in Attachment CC.
- Indicate how illicit connections and illegal discharges will be handled.

SWPPP Builder Instructions

Section 500.4.1 has two separate tabs for information entry: Text and Standard Table (Figure 3-38).

Figure 3-38. Section 500.4.1 Non-Stormwater Site Management

Text Tab: Add a detailed narrative description of temporary non-stormwater site management BMPs to be implemented. Provide a narrative text listing BMPs checked in the Standard Table. Give a general approach on how BMPs will be implemented on the project following the section instructions.

EXAMPLE TEXT

NS-1 Water Control and Conservation / Potable Water and Irrigation

Water application rates will be minimized, as necessary, to prevent runoff and ponding and water equipment leaks will be repaired immediately. The water truck filling area will be stabilized.

Irrigated areas within the construction limits will be inspected for excess watering. Watering times and schedules will be adjusted to ensure that the appropriate amount of water is being used and to minimize runoff.

The exposure of construction materials to precipitation will be minimized. 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).

NS-3 Paving, Sealing, Sawcutting, and Grinding Operations

The project will include placement of approximately 20 acres of HMA pavement. Paving locations and adjacent storm drain inlets are shown on WPCDs 2, 3, and 5. Paving operations generally will be conducted in August and September, as shown on the Water Pollution Control Schedule in Section 500.7. Paving and Grinding Operation BMPs will be implemented to prevent paving materials from being discharged off site. Grate inlets within the AC paving area will be temporarily covered as shown in the detail on the WPCDs. Inlets outside of the HMA paving area will be protected with the type of drop inlet (DI) protection called out on the WPCDs. Following paving operations, the area will be swept, inlet covers will be removed, and the inlets will be inspected for paving materials. Paving equipment will placed on drip protection when no actively being used. Paving equipment will be brought to the project site in a clean condition. HMA release agents will be non foaming and non toxic materials.

The project includes approximately 1,000 feet of concrete saw-cutting at the on- and off-ramp project limits where traffic signal and ramp metering detection loops will be installed. Saw-cutting locations and adjacent storm drain inlets are shown on WPCDs 2, 3, and 4. Estimated saw-cutting dates are shown on the schedule in Section 500.7. Saw-cutting operations shall not be conducted during or immediately prior to rainfall events. Saw-cutting operations are expected to produce approximately 400 gallons of waste slurry consisting of water and fine PCC grit. The slurry shall be vacuumed up immediately when produced and discharged to the concrete washout facility located at Button Willow Road. Dried and cured concrete wastes shall be disposed off-site during concrete washout maintenance activities.

NS-6 Illegal Connection and Illegal Discharge Detection Reporting

The contractor will implement the Illegal Connection/Illegal Discharge Detection Reporting BMP throughout the duration of the project. If IC/ID is found or observed on the project, the RE will be notified immediately.

NS-8, NS-9, NS-10 Vehicle and Equipment Operations

Several types of vehicles and equipment will be used on site throughout the project, including graders, scrapers, excavators, loaders, paving equipment, rollers, trucks and trailers, backhoes, forklifts, generators, compressors, and traffic control equipment.

Vehicle and equipment fueling, and vehicle and equipment maintenance BMPs will be utilized to prevent discharges of fuel and other vehicle fluids. Except for concrete washout activities, which are addressed in Section 500.4.2, vehicle cleaning will not be performed on site.

A paved temporary fueling area shall be constructed in the contractor's yard as shown on WPCD-14. All wheeled vehicles shall be fueled off site or at the temporary fueling area. Fuel trucks, each equipped with absorbent spill clean-up materials, shall be used for all on-site fueling, whether at the temporary fueling area or for mobile fueling elsewhere on the site. Drip pans shall be used during all mobile fueling. The fueling truck shall be parked on the paved fueling area during overnight storage. Drip pans or absorbent pads shall be used during all vehicle and equipment maintenance activities that involve grease, oil, solvents, or other vehicle fluids. All vehicle maintenance and mobile fueling operations shall be conducted at least 50 feet away from operational inlets and drainage facilities and on a level, graded area.

NS-12, NS-14 Concrete Curing and Finishing

Drain inlets shall be protected prior to the application of curing compounds. Excess cure water and water from high-pressure blasting will be collected and disposed of, and will not be allowed to run off to inlets or swales. Wet blankets will be used wherever possible to eliminate excess cure water.

Standard Table: Complete the table by checking off which non-stormwater site management strategies will be incorporated into the project (Figure 3-39).

Section 500.4.1: Non-Stormwater Site Management								
TABLE 500.4.1 TEMPORARY NON-STORMWATER POLLUTION CONTROL BMPs								
CONSTRUCTION BMP ID NO. (1)	BMP NAME	CONTRACT MIN REQUIREMENT (2)	CONTRACT BID ITEM	BMP USED Yes <input checked="" type="radio"/> No <input type="radio"/>	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON			
NS-1	Water Control and Conservation	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>				
NS-2	Dewatering(3)	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>				
NS-3	Paving, Sealing, Sawcutting, and Grinding Operations	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>				
NS-4	Temporary Stream Crossing(3)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/> <input checked="" type="radio"/>	No stream associated with this project			
NS-5	Clear Water Diversion (3)	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/> <input checked="" type="radio"/>	No stream associated with this project.			
ALTERNATIVE SEDIMENT CONTROL BMPs USED (3)								
<input type="radio"/> Yes <input checked="" type="radio"/> No								
CONSTRUCTION BMP ID NO. (1)	BMP NAME *	IF USED STATE REASON						

Notes:
 (1)The BMP designations (SS-1, SS-2, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
 (2)Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
 (3)Use of alternative BMPs will require written approval by the RE.

Figure 3-39. Section 500.4.1 Table of Non-Stormwater Pollution Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- Choose 'Yes' or 'No' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.4.2 Waste Management and Materials Pollution Control

SWPPP GUIDANCE INSTRUCTIONS

- Waste management consists of implementing procedural and structural BMPs for collecting, handling, storing and disposing of wastes generated by a construction project to prevent the release of waste materials into stormwater discharges. Wastes are going to be generated during construction; however, the methods used to collect, store, and remove the wastes will determine the success of the waste management activities. Construction site wastes can range from residues collected from non-stormwater discharges (e.g., paint removal) to general site litter and debris (e.g., empty marker paint cans).
- Material pollution control (materials handling) measures consist of implementing procedural and structural BMPs for handling, storing and using construction materials to prevent the release of those materials into stormwater discharges. The amount and type of construction materials to be utilized at the site will be dependent upon the type of construction and the length of the construction period. Materials may be used continuously, such as fuel for vehicles and equipment, or may be used for a discrete period, such as fertilizer for occasional landscaping activities.
- Waste management and material pollution control BMPs shall be implemented to minimize stormwater contact with construction materials, wastes and service areas, and to prevent materials and wastes from being discharged off site. The primary mechanisms for stormwater contact that shall be addressed are:
 - Direct contact with precipitation
 - Contact with stormwater run-on and runoff
 - Wind dispersion of loose materials
 - Direct discharge to the storm drain system through spills or dumping
- Extended contact with some materials and wastes, such as asphalt cold mix and treated wood products, can also result in pollutants being leached into stormwater and shall be addressed.
- Disposal of any rinse or wash waters or materials on impervious or pervious site surfaces, or into the storm drain system shall be prevented.
- Containment of sanitation facilities (e.g., portable toilets) will be ensured to prevent discharges of pollutants to the stormwater drainage system or receiving water(s).
- Temporary sanitation facilities shall be cleaned or replaced, and shall be inspected regularly for leaks and spills.
- Waste disposal containers shall be covered at the end of every business day and during a rain event.
- Discharges from waste disposal containers to the stormwater drainage system or receiving water shall be prevented.
- Stockpiled waste material shall be contained and securely protected from wind and rain at all times unless actively being used.

- Procedures shall be implemented that effectively address hazardous and nonhazardous spills.
- Containment of concrete washout areas and other washout areas that may contain additional pollutants shall be provided so there is no discharge into the underlying soil and onto the surrounding areas.
- Use the following steps to identify waste management and materials pollution control BMPs.
 - Step 1: Incorporate the waste management and materials pollution control BMPs that are described in:
 - Contract special provisions
 - Contract plans
 - Standard plans
 - Standard specifications
 - If the waste management and materials pollution control BMPs required in Step 1 are inadequate to address potential pollutants in stormwater and non-stormwater discharges, then:
 - Step 2: Incorporate the temporary non-stormwater pollution control BMPs that are described in the SWMP. For a list of these BMPs, see the *Construction Site BMPs Manual*.
 - For Steps 1 and 2 above, use the following guidelines to help select appropriate BMPs:
 - Review construction activities to identify and quantify likely construction materials and wastes; identify materials and wastes with special handling or disposal requirements such as lead-contaminated soils, concrete saw-cutting liquids, waste chemicals and empty chemical containers (refer to Section 500.4.1).
 - Substitute safer, less polluting products where possible; substitution of materials and products requires approval pursuant to the standard specifications.

SWPPP Builder Instructions

Use the waste management BMP implementation table in this Section to identify Caltrans minimum requirements and additional BMPs selected to address project-specific activities. If a particular BMP will not be used or is not applicable, check “Not Used” in the BMP implementation table and enter a brief explanation.

In the narrative section, list the selected BMPs and describe the proposed facilities for materials storage and waste management (including on-site storage and disposal of waste). Discuss how each stormwater contact mechanism will be addressed. Include schedules, inspection, and maintenance requirements. Show facility locations and details on the WPCDs, where possible.

SWPPP Builder Instructions

Section 500.4.2 has two separate tabs for information entry: Text and Standard Table (Figure 3-40).

The screenshot shows a software window titled "Section 500.4.2: Waste Management and Materials Pollution Control". At the top, there is a tab bar with three options: "Text" (which is selected and highlighted in blue), "Standard Table", and "Instructions". Below the tabs, there is a section header "Provide (1) Narrative Text(s)". To the left of this section, there is a note: "Add additional narrative text for waste management and materials pollution control following section instructions." To the right of the note is a large text area containing the following text:

In general, BMPs shall be implemented to help prevent discharges of construction materials during delivery, storage, and use. The general material storage area shall be located in the Contractor's yard as shown on WPCD-4. A sandbag barrier shall be provided around the storage area to prevent run-on from adjacent areas. The two types of storage/containment facilities, listed below, shall be provided within the storage area to minimize stormwater contact with construction materials:

- Two watertight shipping containers shall be used to store hand tools, small parts, and most construction materials that can be carried by hand, such as paint cans, solvents and grease.

Figure 3-40. Section 500.4.2 Waste Management and Materials Pollution Control

Text Tab: Add a detailed narrative description of waste management controls to be implemented. Provide a detailed narrative text listing waste management controls checked in the Standard Table. Give a general approach on how waste management controls will be conducted on the project following the section instructions. Example of narrative text is provided below.

EXAMPLE TEXT

An inventory of construction activities, materials, and waste is provided in Section 500.4.1. The following BMP consideration checklist indicates the BMPs that have been selected to control construction site wastes and materials. Locations and details of materials handling and waste management BMPs are shown on the WPCDs in Attachment BB and are listed by location in the WPCBMPL in Attachment CC. In the narrative description, a list of waste disposal facilities and the type of waste to be disposed at each facility is provided. The following list of BMPs and associated narratives explain how the selected BMPs will be incorporated into the project.

In general, BMPs shall be implemented to help prevent discharges of construction materials during delivery, storage, and use. The general material storage area shall be located in the Contractor's yard as shown on WPCD-4. A sandbag barrier shall be provided around the storage area to prevent run-on from adjacent areas. The two types of storage/containment facilities, listed below, shall be provided within the storage area to minimize stormwater contact with construction materials:

- Two watertight shipping containers shall be used to store hand tools, small parts, and most construction materials that can be carried by hand, such as paint cans, solvents and grease.
- A separate covered storage/containment facility shall be constructed adjacent to the shipping containers to provide storage for larger items, such as drums and items shipped or stored on pallets. The containment facility shall consist of a 10 foot by 20 foot raised concrete pad with 5-inch-tall curbed sides. A wood frame and corrugated tin roof and sides shall be constructed to protect the facility from sun and rain. The facility shall provide approximately 530 gallons of containment volume. The containment volume is adequate to store nine 55-gallon drums and the rainfall from a 24-hour, 25-year storm, pursuant to the Material Delivery and Storage BMP.

Very large items, such as light standards, framing materials, and stockpiled lumber, shall be stored in the open in the general storage area. Such materials shall be elevated with wood blocks to minimize contact with run-on.

Spill clean-up materials, material safety data sheets, a material inventory, and emergency contact numbers shall be maintained and stored in the southern shipping container.

WM-3 Stockpile Management

BMP WM-3, Stockpile Management shall be implemented to reduce or eliminate pollution of stormwater from stockpiles of soil and paving materials such as PCC rubble, AC, AC rubble, aggregate base, aggregate sub-base, pre- mixed aggregate and asphalt binder (so called “cold mix” asphalt). Stockpiles shall be surrounded with sediment controls (BMP SC-5, Fiber rolls or SC-8, sandbag barrier). Plastic covers, or SS-5, Soil Binders, shall be used. Stockpile BMPs shall be installed and maintained per the Standard Specifications and Standard Plan T 53.

WM-4 Spill Prevention and Control

BMP WM-4, Spill Prevention and Control shall be implemented to contain and clean up spills and prevent material discharges to the storm drain system. Spill prevention is also discussed above in the Material Delivery, Storage and Use BMP, and below in the following waste management section.

WM-5, WM-6 Waste Management

BMP WM-5, Solid Waste Management and BMP WM-6, Hazardous Waste Management BMPs shall be implemented to minimize stormwater contact with waste materials and prevent waste discharges. Solid wastes shall be loaded directly onto trucks for off-site disposal. When on-site storage is necessary, solid wastes shall be stored in watertight dumpsters in the general storage area of the Contractor’s yard. Dumpster locations are shown on WPCD-14. Solid waste, including rubble stockpiles, shall be removed and disposed off-site at least weekly. ABC Waste Disposal (License CA9999999) shall provide solid waste disposal services. Liquid hazardous wastes shall be stored in the covered containment area discussed above for materials storage. Solid hazardous waste shall be stored in the shipping container or in the covered containment area. Hazardous wastes shall be placed in appropriate and clearly marked containers and segregated from other non-waste materials. Wastes shall be stored in sealed containers constructed of a suitable material and shall be labeled as required by Title 22 California Code of Regulations (CCR), Division 4.5 and 49 CFR Parts 172, 173, 178, and 179. All hazardous waste shall be stored, transported, and disposed as required in Title 22 CCR, Division 4.5 and 49 CFR 261-263.

WM-7 Contaminated Soil Management

When contaminated soils are encountered, the RE shall be notified, the contaminated soils shall be contained, covered if stockpiled, and disposed per the Contaminated Soil Management BMP, and the contract special provisions. Employees shall be instructed to recognize evidence of contaminated soil, such as buried debris, discolored soil, and unusual odors.

WM-8 Concrete Residuals and Washout Wastes

This project includes placement of approximately 130 yards³ of concrete in four separate pours, the largest pour being approximately 50 yards³. The estimated maximum washout volume is 3.5 feet³.

Discharges will consist of rinse water and residual concrete (PCC, aggregates, admixture, and water). Estimated pour dates are shown on the project schedule in Section 500.7. Concrete pours shall not be conducted during or immediately prior to rainfall events.

Concrete waste management activities shall be implemented in accordance with contract documents, and maintained at the Contractor’s yard as shown on WPCD-14.

Concrete washout facilities shall be designed in accordance with Standard Detail T59. All excess concrete and concrete washout slurries shall be discharged to the washout facility for drying. BMP maintenance, waste disposal, and BMP removal shall be conducted as described in Concrete Waste Management in the contractor special provision.

WM-9 Sanitary and Septic Wastes

The Contractor shall implement a Sanitary and Septic Waste Management BMP. Portable toilets shall be located and maintained at the Contractors' yard for the duration of the project. Specific locations are shown on WPCD-4. Weekly maintenance shall be provided each Wednesday by ABC Sanitation (license no. CA0Q45W) and wastes shall be disposed off-site. The toilets shall be located away from concentrated flow paths and traffic flow.

Standard Table: Complete the table by checking off which waste management strategies will be incorporated into the project (Figure 3-41).

Section 500.4.2: Waste Management and Materials Pollution Control						
TABLE 500.4.2 TEMPORARY WASTE MANAGEMENT AND MATERIALS POLLUTION CONTROL BMPs						
CONSTRUCTION BMP ID NO. ⁽¹⁾	BMP NAME	CONTRACT MINIMUM REQUIREMENT ⁽²⁾	CONTRACT BID ITEM	BMP USED Yes No	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON	
WM-1	Material Delivery and Storage	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		
WM-2	Material Use	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		
WM-3	Stockpile Management	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		
WM-4	Spill Prevention and Control	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		
WM-5	Solid Waste Management	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		
ALTERNATIVE SEDIMENT CONTROL BMPs USED ⁽³⁾						
<input type="radio"/> Yes <input checked="" type="radio"/> No						
CONSTRUCTION BMP ID NO. (1)	BMP NAME *	IF USED STATE REASON				

Notes:
 (1)The BMP designations (SS-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
 (2)Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
 (3)Use of alternative BMPs will require written approval by the RE.

Figure 3-41. Table 500.4.2 Table: Temporary Waste Management and Materials Pollution Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- Choose 'Yes' or 'No' if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the SWPPP if Yes is not checked.

500.5 WPCDs

SWPPP GUIDANCE INSTRUCTIONS

- Prepare WPCDs in conformance with the following instructions and requirements of the CGP.
- Include the WPCDs as Attachment BB to the SWPPP. The WPCDs shall be no smaller than the “reduced plans” issued by Caltrans (approximately 11” x 17”). Sample WPCDs can be found in Section 3.4.8 of this Manual.
- The WPCDs includes all areas that are directly related to the construction activity, including but not limited to staging areas, storage yards, material borrow areas and storage areas, access roads, etc., whether or not they reside within the Caltrans right-of-way based on the Caltrans Permit.
- The WPCDs shall reflect the Contractor’s phasing and/or construction staging, and shall address the entire scope of the contract work.
 - The WPCDs shall show locations of the BMPs that will be used.
 - A cover sheet(s) listing the BMPs that will be used along with the associated BMP symbols used on the WPCDs shall be included. Standard symbols and line types are shown in this Manual, Appendix B.
 - Temporary WPC details are included in the applicable standard plans and contract plans and shall be included in Attachment BB.
 - Additional details may be necessary to describe site-specific BMP applications. BMP details other than the ones shown in the contract plans and standard plans shall be submitted to the RE for approval. Use project layout, grading, stage construction, drainage sheets and/or erosion sheets as base sheets for the WPCDs. Use Section 500.1.2 as a guide for selecting BMPs based upon identified pollutant sources and construction activities. Select BMPs that are appropriate for the site and show their locations on the site map.
- The base sheets shall show the construction project in detail, including:
 - The construction site perimeter
 - Geographic features within or immediately adjacent to the site; surface waters such as lakes, streams, springs, wetlands, estuaries, ponds, and the ocean, shall be included on the base sheets
 - Site topography before and after construction; roads, paved areas, buildings, slopes, drainage facilities, and areas of known or suspected contamination shall be included on the base sheets
 - Permanent (post-construction) BMPs; these are usually shown on the contract plans

- Also delineate the following on the WPCDs:
 - Discharge points from the project to off-site storm drain systems or receiving waters
 - Tributary areas and drainage patterns across the project area (show using flow arrows) into each on-site stormwater inlet or receiving water
 - Tributary areas and drainage patterns to each on-site stormwater inlet, receiving water or discharge point
 - Off-site tributary drainage areas that generate run-on to the project. (Where off-site tributary drainage areas are too large to depict on the drawings, use map notes or inserts illustrating the upstream drainage areas)
 - Temporary on-site drainage(s) to carry concentrated flows
 - Drainage patterns and slopes anticipated after major grading activities are completed
 - All areas of existing vegetation, soil cover, or native vegetation that will remain undisturbed during the project
 - All areas of soil disturbance (DSAs);
 - Location(s) of contaminated or hazardous soils
 - Potential non-stormwater discharges and activities, such as dewatering operations, concrete saw-cutting or coring, pressure washing, waterline flushing, diversions, cofferdams, and vehicle and equipment cleaning; if operations can't be located, provide a narrative description
- Show proposed locations of all construction site BMPs, such as the following (include additional detail drawings if necessary to convey site-specific configurations):
 - Show temporary soil stabilization and temporary sediment control BMPs that will be used during construction; include temporary on-site drainage(s) to carry concentrated flows, BMPs implemented to divert off-site drainage around or through the construction site, and BMPs that protect stormwater inlets
 - Locate site ingress and egress points and any proposed temporary construction roads
 - Show BMPs to mitigate or eliminate non-stormwater discharges
 - Show BMPs for waste management and materials pollution control, including, but not limited to storage of soil or waste; construction material loading, unloading, storage and access areas; and areas designated for waste handling and disposal
 - Show BMPs for vehicle and equipment storage, fueling, maintenance, and cleaning

SWPPP Builder Instructions

Insert additional narrative text for WPCD in the text box provided. Automated text will populate the SWPPP and can be viewed in Preview Section.

500.6 Water Pollution Control BMP List**SWPPP GUIDANCE INSTRUCTIONS**

- Prepare WPCBMPL in conformance with the following instructions. Include the WPCBMPL as Attachment CC to the SWPPP. A sample WPCBMPL is provided in Section 3.4.9 of this Manual.
 - Include a cover sheet(s) listing the BMPs that will be used.
 - The WPCBMPL shall show by location the BMPs that will be used. The number of locations shown on the WPCBMPL shall be established so that field staff and inspectors can easily identify where BMPs need to be located. The guidance provided below should be used to determine locations.
 - At interchanges, identify locations by quadrants.
 - Use 1/2-mile segments for mainline and provide both post mile and stationing identification.
 - Structures.
 - By road/street in active construction areas.
 - Contractor yard.
 - Staging area.
 - Batch plant or material crushing operation.
 - For mobile BMPs, such as those required for pavement placement or pavement grinding, list the location as Mobile Operation.
 - The WPCBMPL shall reference appropriate WPCD(s) for each location.
 - THE WPCBMPL shall show the estimated DSA for each location.
- List all construction site BMPs on the WPCBMPL. Include necessary additional information to convey site-specific configurations or BMP modifications.
 - List temporary soil stabilization and temporary sediment control BMPs that will be used during construction. Include temporary on-site drainage(s) to carry concentrated flows, BMPs implemented to divert off-site drainage around or through the construction site, and BMPs that protect stormwater inlets.
 - List temporary construction entrances for site ingress and egress points and any proposed temporary construction roads.

- List BMPs to be implemented to mitigate or eliminate non-stormwater discharges.
- List BMPs for waste management and materials pollution control, including, but not limited to storage of soil or waste; construction material loading, unloading, storage and access areas; and areas designated for waste handling and disposal.
- List BMPs for vehicle and equipment storage, fueling, maintenance, and cleaning.
- Prepare the WPCBMPL to reflect the Contractor's phasing and/or construction staging, and shall address the entire scope of the contract work.

Water Pollution Control Best Management Practices List (WPCBMPL) examples can be found in Section 3.4.9 of this Manual.

SWPPP Builder Instructions

Insert additional narrative text for WPCBMPL in the text box provided. Automated text will populate the SWPPP and can be viewed in Preview Section.

500.7 Water Pollution Control Schedule**SWPPP GUIDANCE INSTRUCTIONS**

- A graphical project schedule shall be provided. The project schedule may be used for the WPCS if it includes all WPCS requirements. The schedule shall be updated regularly to match field conditions. At a minimum, it shall be updated on a quarterly basis. The schedule shall contain a level of detail adequate to show major activities sequenced with the implementation of construction site BMPs, including:
 - Project start and finish dates, including each stage of the project
 - SWPPP review and approval
 - Annual certifications
 - Mobilization dates
 - Mass clearing and grubbing/roadside clearing dates
 - Major grading/excavation dates
 - Special dates named in other permits such as Fish and Game and USACOE Permits
 - Dates for submittal SWPPP amendments as required in the contract specifications
 - Implementation schedule, by location, for deployment of:
 - Temporary soil stabilization BMPs
 - Temporary sediment control BMPs
 - Wind erosion control BMPs
 - Tracking control BMPs
 - Non-stormwater BMPs
 - Waste management and materials pollution control BMPs
 - Paving, saw-cutting, and any other pavement-related operations
 - Major planned stockpiling operations
 - Dates for other significant long-term operations or activities that may cause non-stormwater discharges, such as dewatering, grinding, etc.
 - Final stabilization activities staged over time for each area of the project
- Note: Removal of vegetation and disturbance of existing ground surface conditions between October 15 of each year and May 1 of the following year is not allowed for projects located in the Lake Tahoe, Truckee River, East Fork Carson River, or West Fork Carson River Hydrologic Units, and projects above 5,000 feet in elevation in the portions of Mono County or Inyo County within the Lahontan RWQCB; except when an emergency situation exists that threatens the public health or welfare, or when the project is granted a variance by the RWQCB Executive Officer.

Water Pollution Control Schedule (WPCS) examples can be found in Section 3.4.10 of this Manual.

SWPPP Builder Instructions

Insert additional narrative text for WPCS here in the text area provided. Automated text will populate the SWPPP and can be viewed in Preview Section.

SECTION 600

PROJECT SITE IMPLEMENTATION PROGRAM

600.1 WPC Manager Responsibilities

SWPPP GUIDANCE INSTRUCTIONS

- Include a Separator and Tab for Section 600 for ready reference.
- The person responsible for water pollution control during construction is the WPC Manager.
- The WPC Manager must be a qualified QSD in accordance with Section VII.B.1 of the CGP and must sign a certification form located in Section 100.2 of this SWPPP. Documentation of training shall be maintained in the SWPPP files (File Category 20.23).
- The WPC Manager shall be available at all times throughout the duration of the project.
- Duties of the Contractor's WPC Manager include but are not limited to:
 - Ensuring full compliance with the SWPPP and the Permit
 - Implementing all elements of the SWPPP and contract specifications, including but not limited to implementing:
 - Prompt and effective erosion and sediment control measures
 - All non-stormwater management, and materials and waste management activities such as: monitoring discharges (dewatering, diversion devices); performing general site cleanup activities; cleaning vehicles and equipment cleaning, performing fueling and maintenance activities; providing spill control; ensuring that no materials other than
 - Stormwater are discharged in quantities that will have an adverse effect on receiving waters or storm drain systems; etc.
 - Overseeing and ensuring that the following site inspections and visual site monitoring are conducted:
 - Daily required BMP inspections
 - Conducting routine weekly stormwater site BMP inspections
 - Quarterly non-stormwater inspections
 - Pre-storm inspections prior to forecasted storm events
 - Daily inspections during extended forecasted storm events
 - Post-storm inspections for qualifying rain events

- Monitoring the National Weather Forecast
 - For Risk Level 2 and 3 projects, preparing and implementing REAPs for forecasted storm events
 - For Risk Level 2 and 3 projects, submitting NAL exceedance reports to the RE
 - For Risk Level 2 and 3 projects, submitting stormwater sampling and analysis results to the RE
 - Preparing amendments to the SWPPP when required (Section 100.3)
 - Preparing Contractor's SWPPP Annual Compliance Certification
 - Preparing the Stormwater Annual Reports
 - Ensuring elimination of all unauthorized discharges
 - Mobilizing crews to repair, replace, and/or implement additional BMPs due to deficiencies, failures or other shortcomings identified during inspections, to be completed within 72 hours of identification (the Contractor's WPC Manager shall be assigned authority by the Contractor to mobilize crews)
 - Coordinating with the RE to assure that if design changes to BMPs are required due to deficiencies, failures or other shortcomings identified during inspections, the changes are completed as soon as possible and the SWPPP is revised accordingly
 - Mobilizing crews immediately in the event of NAL exceedances to repair existing BMPs and/or implement additional BMPs (the Contractor's WPC Manager shall be assigned authority by the Contractor to mobilize crews)
 - Coordinating with the RE in the event of NAL exceedances to assure that any SWPPP revisions (corrective actions) are made immediately to either prevent pollutants and authorized non-stormwater discharges from contaminating stormwater, or to substantially reduce the pollutants to levels consistently below the NALs, so the project complies with the SWPPP, the CGP and approved plans at all times
 - Submitting Notices of Discharge reports
 - Submitting reports of Illicit Connections or Illegal Discharges
- The Contractor's WPC Manager can appoint an alternate WPC Manager to assist him with the implementation, maintenance, inspection and amendments to the authorized SWPPP.
 - The Contractor's WPC Manager shall have primary responsibility and significant authority for the implementation, maintenance, inspection and amendments to the authorized SWPPP.
 - The Contractor may appoint a QSP or stormwater inspector to assist the WPC Manager with the implementation of the SWPPP BMPs.

SWPPP Builder Instructions

Insert additional narrative text for WPC Manager responsibilities in the text area provided. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section.

600.2 Site Inspections

SWPPP GUIDANCE INSTRUCTIONS

- Site inspections include both BMP inspections and visual monitoring inspections, shown in Section 700 CSMP.
- The purpose of BMP inspections is to:
 - Ensure that BMPs were installed properly
 - Ensure that proper BMP maintenance is being performed
 - Evaluate BMP effectiveness and implement repairs or design changes as soon as feasible
 - Inspections shall be overseen by the contractor's WPC Manager.
 - Inspections shall be conducted by either:
 - WPC Manager
 - Alternate WPC Manager
 - Appointed QSP
 - Stormwater inspector who has completed stormwater training
 - Site inspections shall be documented on Stormwater Site Inspection Report forms (CEM-2030, CEM-2031T) in Appendix G of the SWPPP.
- Site inspections shall be performed at the following frequencies:
 - Daily inspections shall be conducted for projects subject to the LTCGP using CEM-2031T
 - Daily inspections of the following BMPs when applicable:
 - Storage areas for hazardous materials and waste
 - Hazardous waste disposal and transporting activities
 - Hazardous material delivery and storage activities
 - Vehicle and equipment cleaning facilities daily if vehicle and equipment cleaning occurs daily
 - Vehicle and equipment maintenance and fueling areas daily if vehicle and equipment maintenance and fueling occurs daily
 - Vehicles and equipment at the job site must verify that operators are inspecting vehicles and equipment each day of use.
 - Demolition sites within 50 feet of storm drain systems and receiving waters
 - Pile driving areas for leaks and spills daily if pile driving occurs daily
 - Temporary concrete washouts daily if concrete work occurs daily
 - Paved roads at job site access points for street sweeping daily if earthwork and other sediment or debris generating activities occur daily
 - Dewatering work daily if dewatering work occurs daily

- Temporary active treatment system daily if temporary active treatment
 - System activities occur daily
 - Work over water daily if work over water occurs daily
- Weekly routine inspection of BMPs.
- Completed Stormwater Site Inspection Reports (CEM-2030) shall be submitted to the RE within 24 hours of inspection. Copies of the completed reports shall be kept in the SWPPP File Category 20.31: Contractor Stormwater Site Inspection Reports.
- A Stormwater Corrective Actions Summary Report (CEM-2035) shall be completed for any inspection deficiencies in BMPs that were identified. Copies of the completed correction summary reports shall be attached to the corresponding inspection report and shall be kept in SWPPP file category 20.31: Contractor Stormwater Site Inspection Reports. The original CEM-2035 form shall be kept in SWPPP File Category 20.35: Corrective Actions Summary.
- For projects subject to the LTCGP, Completed Daily Stormwater Site Inspection Reports (CEM-2031T) and Stormwater Corrective Actions Summary (CEM-2035T) shall be completed for any inspection deficiencies in BMPs that were identified. Both forms must be submitted to the RE and shall be kept in SWPPP file category 20.31: Contractor Stormwater Site Inspection Reports and CEM-2035T form shall be kept in SWPPP File Category 20.35: Corrective Actions Summary respectively.

SWPPP Builder Instructions

Insert additional narrative text, as-needed, in the text area provided. Automated text will populate the SWPPP and can be viewed in Preview Section.

600.3 Weather Forecast Monitoring

SWPPP GUIDANCE INSTRUCTIONS

- The WPC Manager must monitor the National Weather Service Forecast Office and document forecasts so that appropriate actions are taken prior to a forecasted storm event.
- Enter the project site address or project site latitude and longitude that will be used when obtaining weather forecast information from National Weather Service Forecast Office.
- List actions to be taken prior to a forecasted storm event.
- For projects subject to the LTCGP, a printout of the daily forecast should be kept in the SWPPP.

SWPPP Builder Instructions

Insert additional narrative text with any additional actions to be taken prior to a storm event, as needed, in the text area provided. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section.

600.4 Weather Monitoring

SWPPP GUIDANCE INSTRUCTIONS

- The WPC Manager must monitor the weather at the project site so that appropriate documentation of weather conditions, including the amount of precipitation for each 24-hour period and the total amount of precipitation for each from forecasted storm events, is available.
- Weather monitoring shall be recorded electronically and be made available upon request. The amount of precipitation recorded from the rain gauge at the project site will be shown on stormwater discharge sampling and testing reports and will be used to determine exceedance of the compliance storm event (5 years, 24 hour).
- Actions to be taken for unexpected forecasted storm events shall be listed.
- For Risk Level 3 projects, the amount of precipitation for a compliance storm, based on the project site location, shall be determined using maps available on the following websites:
 - <http://www.wrcc.dri.edu/pcpnfreq/nca5y24.gif>
 - <http://www.wrcc.dri.edu/pcpnfreq/sca5y24.gif>
- For Risk Level 3 projects, information from the NWS weather station nearest the project site, based on project site address or project site latitude and longitude, shall be used for verification of compliance storm event exceedances.
- For Projects subject to the LTCGP, a printed copy of precipitation forecast information from the National Weather Service (NWS) Forecast Office must be kept with the SWPPP monitoring records

SWPPP Builder Instructions

Insert NWS Weather station in the field provided. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section.

600.5 BMPs & Material Inventory Report

SWPPP GUIDANCE INSTRUCTIONS

The WPC Manager must prepare a monthly status report of the water pollution control BMPs that are deployed and water pollution control BMPs that will be deployed the following week. Water pollution control BMP status is to be reported on the CEM-2034 Monthly Stormwater BMPs & Material Inventory Report form, in Appendix H. Copies of the completed forms shall be kept in SWPPP File Category 20.34: Monthly Stormwater BMPs & Material Inventory Reports.

Form CEM-2034 is an optional form; the RE will determine its applicability for the contract.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP and can be viewed in Preview Section 600 when preparing to print the SWPPP.

600.6 REAPs**SWPPP GUIDANCE INSTRUCTIONS**

- REAPs are required for Risk Level 2 and 3 projects subject to the CGP. The REAP must be prepared 72 hours prior to any forecasted storm event, where a forecasted storm event is any weather pattern that is forecasted to have a 50 percent or greater probability of producing 0.1 inches or more of precipitation in the project area within a 24-hour period. If a storm event is forecasted for the following 48 hours, without a 72-hour warning, a REAP must still be prepared.
- LTCGP projects require a REAP be prepared 24 hours prior to any forecasted storm event, where a forecasted storm event is any weather pattern that is forecasted to have a 30 percent or greater probability of producing precipitation as rainfall in the project area
- The WPC Manager is responsible for preparing and implementing the REAP.
- The REAP shall be submitted to the RE 48 hours prior to a forecasted storm event.
- The REAP must be on the jobsite 48 hours before a forecasted storm event and a printed copy must be included as part of the SWPPP at the job site.
- REAPs shall be prepared based on the following construction phases:
 - Highway construction
 - Plant establishment
 - Suspension where work activities are inactive

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 600 when preparing to Print the SWPPP.

SECTION 700

CONSTRUCTION SITE MONITORING PROGRAM

SWPPP GUIDANCE INSTRUCTIONS

- Include a Separator and Tab for Section 700 for ready reference.
- The Construction Site Monitoring Program (CSMP) shall be developed based on a project's Risk Level, any RWQCB monitoring requirements and whether an ATS is to be used on the project site.
- The CSMP shall be prepared following the Caltrans *Construction Site Monitoring Program Guidance Manual*.

700.1 Site Visual Monitoring Inspection

- Site visual monitoring inspections are required to be conducted for all project risk levels as shown in Table 1-8 for CGP projects and 1-9 for LTCGP projects of this Manual.
- The purpose of stormwater site visual monitoring inspections is to:
 - Demonstrate that the site is in compliance with the discharge prohibitions
 - Determine whether non-visible pollutants are present at the construction site and could be potentially causing or contributing to exceedances of water quality objectives
 - Determine whether immediate corrective actions, additional BMP implementation, or SWPPP revisions are necessary to reduce pollutants in stormwater discharges and authorized non-stormwater discharges
 - Determine whether BMPs included in the SWPPP/REAP are effective in preventing or reducing pollutants in stormwater discharges and authorized non-stormwater discharges
 - Document the presence or evidence of any non-storm-water discharge (authorized or unauthorized), pollutant characteristics (floating and suspended material, sheen, discoloration, turbidity, odor, etc.), and source, if applicable, and the response taken to eliminate unauthorized non-stormwater discharges and to reduce or prevent pollutants from contacting non-stormwater discharges

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.1.1 Visual Monitoring Locations

SWPPP GUIDANCE INSTRUCTIONS

- The visual monitoring requirements which must be performed within 48 hours prior to any forecasted storm event (defined as any weather pattern that is forecasted to have a 50 percent or greater probability of producing 0.1 inches or more of precipitation in the project area within a 24 period) are visually observe:
 - Stormwater drainage areas to identify any spills, leaks, or uncontrolled pollutant sources
 - All BMPs to identify whether they have been properly implemented
 - Any stormwater storage and containment areas for leaks and ensure maintenance of adequate freeboard
- The visual monitoring requirements during extended forecasted storm events, and within 48 hours after a qualifying rain events (defined as a rain event that has produced 0.5 inches or more of precipitation at the time of discharge) are visually observe:
 - Stormwater discharges at all discharge locations
 - BMPs to identify and record BMPs that need maintenance to operate effectively, that have failed, or that could fail to operate as intended
 - The discharge of stored or contained stormwater
- The quarterly visual monitoring requirement for non-stormwater discharges consists of: visually observing each drainage area for the presence of or indications of prior unauthorized and authorized non-stormwater discharges.
- The daily visual monitoring requirement for discharges consists of: visually observing the entire construction site for any discharges, either stormwater or non-stormwater.

SWPPP Builder Instructions

Section 700.1.1 has three fields for information entry. Enter the number of drainage areas, storage areas, and discharge locations. Refer to SWPPP Guidance Instructions for more information. Automated text will populate based on Risk Level (Figure 3-42).

Section 700.1.1: Visual Monitoring Locations	
Fields	Instructions
Complete (3) Fields	
Number of Drainage Areas	2
Number of Storage Areas	1
Number of Discharge Locations	3

Figure 3-42. Section 700.1.1 Visual Monitoring Locations

700.1.1.1-3 SWPPP Builder Instructions:

Provide the unique identifier(s) and location(s) for the drainage, storage, and discharge area(s) numbered in Section 700.1.1. Refer to SWPPP Guidance Instructions for more information (Figure 3-43).

Section 700.1.1.1: Drainage Areas	
TABLE 700.1.1.1	
DRAINAGE AREAS	
Drainage Area No.	Location
DA-1	Yard location No. 1 (YD-1) on WPCD - 2
DA-2	Yard location No. 2 (YD-2) on WPCD - 10
*	

Figure 3-43. Section 700.1.1.1 Drainage Areas

700.1.2 Visual Monitoring Schedule**SWPPP GUIDANCE INSTRUCTIONS**

- Visual monitoring inspections of the project site (per Table 1-8 and 1-9 of this Manual) shall be conducted as follows:
 - Daily for discharges
 - Within 48 hours prior to a forecasted storm event
 - At 24-hour intervals during any extended forecasted storm event
 - Within 48 hours after a qualifying rain event
 - Quarterly for non-stormwater discharges

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.1.3 Visual Monitoring Procedures

SWPPP GUIDANCE INSTRUCTIONS

- Contractor personnel, on a daily basis, shall be observant of any discharges. Discharges will be reported to the RE verbally upon discovery and in writing within 24 hours of discovery or occurrence. Form CEM-2061 Notice of Discharge Report for reporting discharges is shown in Appendix K.
- Note: USEPA has issued regulations that define Reportable Quantity (RQ) levels for oil and hazardous substances. These regulations are found in the CFR at 40 CFR Part 110, Part 117, or Part 302. The following are examples of RQs:
 - An oily sheen in stormwater runoff as a result of a spill or release is an exceedance of a RQ level
 - The RQ level for dieldrin, a pesticide, is 1 kilogram (kg); a spill or release of one or more kg of dieldrin is an exceedance of the RQ threshold
- BMPs shall be visually monitored for:
 - Proper installation
 - Proper maintenance
 - Possibility of failure
 - Ability to operate as intended
 - Effectiveness
- Non-stormwater discharge BMPs shall be evaluated for proper installation and effectiveness.
- One-time discharges of non-stormwater shall be inspected when such discharges occur.

SWPPP Builder Instructions

Enter the name and phone number of the primary and alternate inspectors. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700.1.3 (Figure 3-44).

Section 700.1.3: Visual Monitoring Procedures	
Fields	Instructions
Complete (4) Fields	
Assigned Inspector's Name	Inspector Primary
Assigned Inspector's Telephone Number	555-555-5555
Alternate Inspector's Name	Inspector Secondary
Alternate Inspector's Telephone Number	444-444-4444

Figure 3-44. Section 700.1.3 Visual Monitoring Procedures

700.1.4 Visual Monitoring Follow-up and Tracking Procedures

SWPPP GUIDANCE INSTRUCTIONS

Deficiencies identified in visual monitoring site inspection reports and correction of deficiencies will be tracked on the CEM-2035 and CEM-2035T Stormwater Corrective Actions Summary, in Appendix I. Correction summaries shall be submitted to the RE when corrections are completed. Corrections must be completed within five days or prior to a forecasted rain event whichever comes first. For projects subject to the LTCGP corrections must be completed within three days or prior to a forecasted rain event whichever comes first. Completed Corrective Actions Summary must be submitted within five days of a site inspection (CEM-2030 or CEM-2031T).

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.1.5 Data Management and Reporting

SWPPP GUIDANCE INSTRUCTIONS

- The results of visual site monitoring shall be recorded on the CEM-2030 Stormwater Site Inspection Report (and/or CEM-2031T for LTCGP projects) in Appendix G. A copy of each report shall be kept in SWPPP File Category 20.33: Site Visual Monitoring Inspection Reports.
- All CEM-2030 and CEM-2031T reports shall be provided to the RE within 24 hours of the inspection.
- Deficiencies identified during visual monitoring (site inspections) and correction of deficiencies will be tracked on the CEM-2035 Stormwater Corrective Actions Summary or CEM-2035T Stormwater Corrective Actions Summary-Lake Tahoe Hydrologic Unit, shown in Appendix I. Stormwater Corrective Action Summary forms shall be submitted to the RE when corrections are completed but must be submitted within five days of the site inspection. Completed Stormwater Corrective Actions Summary forms shall be filed in SWPPP File Category 20.35: Stormwater Corrective Actions Summary. A copy of the completed Stormwater Corrective Actions Summary form will also be attached to the corresponding inspection and shall be kept in the SWPPP file category 20.33: Site Visual Monitoring Inspection Reports.
- Discharges will be reported to the RE verbally upon discovery, and in writing within 24 hours of discovery. The form required for reporting discharges is in Appendix K CEM-2061 Notice of Discharge forms shall be kept in SWPPP File Category 20.61: Notice of Discharge Reports.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2 SAPs

SWPPP GUIDANCE INSTRUCTIONS

- As many as six separate SAPs may be required as part of the CSMP.
- All CSMPs shall have the following SAPs:
 - General
 - Non-visible Pollutants
 - Non-stormwater Discharges
- If applicable, SAPs shall be prepared for:
 - Stormwater pH and Turbidity
 - Monitoring Required by Regional Board
 - Monitoring of ATS

The information and requirements in the General SAP applies to all specific SAPs.

- Specific instructions for each SAP follow the general instructions in Sections 700.2.1 through 700.2.6.
- For additional information about preparing SAPs, refer to *Construction Site Monitoring Program Guidance Manual*.

700.2.1 General SAP

A SAP describes how samples will be collected, under what conditions, where and when the samples will be collected, what the sample will be tested for, what test methods and detection limits will be used, and what methods/procedures will be performed to ensure the integrity of the sample during collection, storage, shipping and testing (i.e., quality assurance/quality control protocols). Therefore, a SAP shall include the components listed below.

1. Scope of Monitoring Activities
2. Monitoring Preparation
3. Monitoring Strategy
4. Sample Collection and Handling
5. Sampling Analysis
6. Quality Control and Assurance
7. Data Management and Reporting
8. Data Evaluation
9. Change of Conditions

In addition to this General SAP, this CSMP contains specific SAPs for non-visible pollutants and non-stormwater discharges. The CSMP may also contain three additional specific SAPs based on the project risk level, RWQCB sampling and analysis requirements, and monitoring an active treatment system. The information and requirements in this General SAP apply to all specific SAPs unless a specific SAP otherwise specifies.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.1 Scope of Monitoring Activities

SWPPP GUIDANCE INSTRUCTIONS

For specific details with regard to monitoring activities, refer to the specific SAP identified below.

- Non-visible Pollutants (Section 700.2.2.1)
- Non-Stormwater Discharges (Section 700.2.3.1)
- Stormwater pH and Turbidity (Section 700.2.4.1)
- Monitoring required by the Regional Board (Section 700.2.5.1)
- Monitoring for ATS (Section 700.2.6.1)

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.2 Monitoring Preparation***SWPPP GUIDANCE INSTRUCTIONS***

- Train water quality sampling personnel in accordance with the Caltrans Construction Site Monitoring Program Guidance Manual.
- Identify whether samples will be collected by the contractor's personnel, by a commercial laboratory, or by an environmental consultant.
- Identify training and experience of individuals responsible for collecting water samples.
- Identify the health and safety procedures for sampling personnel.
- Identify alternate sampling personnel in case of emergency, sick leave, and/or vacations during stormwater monitoring. Identify training of alternate sampling personnel.
- Identify the state-certified laboratory(ies) that will analyze samples for non-visible, non-stormwater, or dewatering permit-required constituents. For a the list of California state-certified laboratories that are accepted by Caltrans, access the following web site:
www.dhs.ca.gov/ps/lstelap/html/lablist.htm
- Include the appropriate required text to describe the strategy for ensuring that adequate sample collection supplies are available for the project in preparing for a sampling event.
- Describe the strategy for ensuring that appropriate field testing equipment is available for the project in preparing for a sampling event.

Samples will be collected by:

Contractor	<input type="checkbox"/> Yes	<input type="checkbox"/> No
Consultant	<input type="checkbox"/> Yes	<input type="checkbox"/> No
Laboratory	<input type="checkbox"/> Yes	<input type="checkbox"/> No

700.2.1.2.1 Qualified Sampling Personnel

SWPPP GUIDANCE INSTRUCTIONS

Sampling personnel shall be trained to collect, maintain, and ship samples in accordance with the Surface Water Ambient Monitoring Program (SWAMP) 2013 Quality Assurance Program Plan (QAPrP).

SWPPP Builder Instructions

Section 700.2.1.2.1 has two separate tabs for information entry: Fields and Lists (Figure 3-45).

Section 700.2.1.2.1: Qualified Sampling Personnel	
Fields	Lists
Complete (14) Fields	
Identify if "Laboratory" or "Environmental Consultant" is Collecting Samples	Environmental Consultant
Laboratory's/Environmental Consultant's Company Name	EC 1
Laboratory's/Environmental Consultant's Address	1234 Addy way
Laboratory's/Environmental Consultant's City	San Diego
Laboratory's/Environmental Consultant's State	California

Figure 3-45. Section 700.2.1.2.1 Qualified Sampling Personnel Fields Tab

Fields Tab: Provide the information of the consultant or company that is to conduct sampling. The following information is required:

- Company name
- Company address
- Contact name
- Title
- Phone number
- Emergency phone number
- Email

Lists Tab: Enter the training and experience of the primary and alternate sampler (Figure 3-46).

Section 700.2.1.2.1: Qualified Sampling Personnel	
Fields	Lists
Primary Sampler's Training List	
<input checked="" type="checkbox"/> ABC Sampling Protocols- 8-hour surface water sampling course <input type="checkbox"/> * <input type="checkbox"/>	Select List primary_sampler_training primary_sampler_experience alternate_sampler_training alternate_sampler_experience

Figure 3.46. Section 700.2.1.2.1 Qualified Sampling Personnel Lists Tab

700.2.1.2.2 Monitoring Supplies**SWPPP Builder Instructions**

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP. The name of the laboratory or environmental consultant who will provide the monitoring will populate the necessary fields within this section.

700.2.1.2.3 Field Instruments**SWPPP GUIDANCE INSTRUCTIONS**

The instrument(s) shall be maintained in accordance with manufacturer's instructions. The instrument(s) shall be calibrated before each sampling and analysis event.

A Standard Operating Procedure (SOP) for calibration and maintenance of field instruments shall be implemented based on the meter manufacturer's instructions. A copy of the manufacturer's instructions shall be attached to the SOP so that they are readily available.

Instrument maintenance shall be documented. Instrument calibration shall be documented using the following form:

- CEM-2052- Stormwater Sample Field Test (Appendix N) CEM-2058 - Stormwater Meter Calibration Record- Specialty Meters (Appendix L)

SWPPP Builder Instructions

Section 700.2.1.2.3 has two separate tabs for information entry: Text and Lists (Figure 3-47).

Figure 3-47. Section 700.2.1.2.3 Field Instruments

Lists Tab: In the field provided, list field instruments that will be used and the constituents that will be tested by that instrument. Refer to the example provided above.

Text Tab: Insert additional information here pertaining to field instrumentation. Leave blank if there is no additional information to add.

700.2.1.2.4 Testing Laboratory

SWPPP Builder Instructions

Samples collected on the project site which requires laboratory testing must be tested by a laboratory certified by the State Department of Health Services (DHS) (Figure 3-48). Provide the:

- Laboratory name, address, email, phone number, and emergency phone number
- Laboratory contact name and title

Section 700.2.1.2.4: Testing Laboratory	
Fields	
Complete (10) Fields	
Testing Laboratory's Name	Enviromatrix
Testing Laboratory's Address	345 Experiment Way
Testing Laboratory's City	San Diego
Testing Laboratory's State	California
Testing Laboratory's Zip	45698

Figure 3-48. Section 700.2.1.2.4 Testing Laboratory

700.2.1.3 Monitoring Strategy**SWPPP GUIDANCE INSTRUCTIONS**

- Show all sampling locations on the WPCDs.
- Select sampling locations in areas that are safe, accessible, and out of the path of heavy traffic.
- Sampling locations are listed in Table 700.1.1.3

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on previously entered information and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.3.1 Analytical Constituents**SWPPP GUIDANCE INSTRUCTIONS**

Stormwater and non-stormwater discharges shall be monitored for the analytical constituents specified in the specific SAP(s) in this SWPPP.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on previously entered information and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.3.2 Potential Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

Potential sampling locations must be representative of the stormwater and non-stormwater discharges from the construction site. Existing conditions and associated construction activities within each drainage area form the basis for determining representative stormwater sampling locations.

Project drainage areas and potential sampling locations have been determined by:

- Reviewing project plans
- Visiting project site
- Reviewing topography maps

The WPCDs show the demarcation of all drainage areas that are either:

- Within the project site
- Cover part of the project site

Potential stormwater discharge sampling locations were determined where concentrated run-off:

- Leaves the Caltrans right-of-way
- Drains into an MS4
- Discharges into a receiving water

Potential run-on sampling locations were determined where concentrated run-on:

- Enters the right-of-way
- Combines with the stormwater on site and then discharges into an MS4, including the location(s) of discharge into the MS4

The following locations were determined when runoff discharges directly into receiving water bodies:

- The discharge location(s) into the receiving water
- A potential sampling location upstream of all discharge locations
- A potential sampling location downstream from all discharge location(s) into the receiving water

Necessary potential sampling locations were determined when:

- There are potential sources of non-visible pollutants, as discussed in Section 500.1, and discharge locations are downgradient
- Run-on locations are present that may contribute non-visible pollutants
- There are potential non-stormwater discharges and corresponding discharge locations are downgradient
- There are proposed dewatering construction activities

If an ATS is used on site, then sample locations must be included in Section 700.2.6.

Potential stormwater and non-stormwater sampling locations must be shown on the WPCDs in Attachment BB and listed in Attachment EE: Stormwater Sample Locations. The QSD has identified each of the potential sampling locations with a unique sample location identification code, as shown below. The identification code must start with a number and must be different for each location. If the construction site lies in a west-to-east orientation, starting with one (01) from the east, the potential

sampling locations shall be numbered toward the west. If the construction site lies in a south-to-north orientation, the potential sampling locations shall be numbered toward the north.

To further distinguish among the locations, each potential sampling location has been identified with one of the following abbreviations based on the sampling location type:

- Discharge locations leaving Caltrans right-of-way: DL
- Discharge locations from areas with known non-visible pollutants: NVP
- Discharge locations up gradient of areas with known non-visible pollutants: UNVP
- Discharge locations to an MS4: MS
- Run-on locations: RO
- Discharge locations into a receiving water: RW
- Downstream of all discharge locations: RWD
- Upstream of all discharge locations: RWU
- Dewatering discharge locations: DDL
- Contained stormwater discharge locations: CSDL
- Discharge locations for ATS: ATS

The unique sample location identification code shall follow this format, **SSSTTTTXX**, where:

- SSS = sampling location identifier number (e.g., 010)
TTT = sampling location type (e.g. DL)
XX = identifier number for the type of sampling location

For example, the sampling location identification for the 15th sampling location based on starting from the south end of the project for a stormwater discharge location that has been identified to be the ninth discharge location would be **015DL09**.

Potential sampling locations shown on the WPCDs shall be identified with unique sampling location identifiers. Each potential sample location must be listed on Stormwater Sample Locations in Attachment EE. The unique identification of each potential sampling location based on its number and abbreviation of type shall be used on all sampling documentation.

The WPC Manager may have to revise and/or add additional sampling locations during the course of construction as conditions dictate.

[SWPPP Builder Instructions](#)

No action required. Automated text will populate the SWPPP based on previously entered information and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.3.3 Identification of Actual Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

For each forecasted storm event, actual sampling locations will be determined by the WPC Manager based on the strategy described in each specific SAP.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on previously entered information and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.3.4 Sampling Schedule***SWPPP GUIDANCE INSTRUCTIONS***

For the sampling schedule, see the specific SAPs in this CSMP. If a scheduled sampling activity is unsafe because of dangerous weather conditions, such as flooding and electrical storms, then the stormwater sampler shall document why an exception to performing the sampling was necessary.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on previously entered information and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.1.4 Sample Collection and Handling***SWPPP GUIDANCE INSTRUCTIONS***

Sample collection procedures shall be used to ensure that representative samples are collected and that the potential for contamination of samples is minimized. Sample handling procedures are followed to ensure that samples are identified accurately and that the required analysis is clearly documented. COC requirements for samples are necessary to trace the possession of the sample from collection through analysis.

- For sampling collection procedures, refer to the Caltrans Construction Site Monitoring Program Guidance Manual, for general guidance.
- For laboratory analysis, all sampling, sample preservation, and analyses must be conducted according to test procedures under 40 CFR Part 136.
- For a list of California state-certified laboratories that are accepted by Caltrans, access the following website: www.dhs.ca.gov/ps/labs/elap/html/lablist.htm.
- A Sample Information, Identification, and COC Record form is required to be submitted to the laboratory with the samples to trace the possession and handling of samples from collection through analysis (check with the laboratory contracted for specifics).
- A Stormwater Sample Field Test Report (CEM-2052) form is to be completed for each sample or set of samples.
- A Stormwater Sampling and Testing Activity Log (CEM-2051) documents all the details of the sampling events records analyses results for the samples collected. Form CEM-2051 is an optional form; the RE will determine its applicability for the contract.

- Copies of completed sampling and testing forms will be placed in the appropriate SWPPP file category based on the type of sampling and testing performed (see below):
 - Non-visible pollutant sampling and testing (including COC form)– SWPPP File Category 20.51
 - Non-stormwater discharge sampling and testing – SWPPP File Category 20.50
 - Turbidity, pH, and suspended sediment concentration (SSC) sampling and testing – SWPPP File Category 20.52
 - Required RWQCB sampling and testing – SWPPP File Category 20.53
 - ATS sampling and testing – SWPPP File Category 20.54
- Each sample bottle is required to have a proper and complete identification label.
- Run-on samples should be collected using the sheet flow collection procedures or other procedure approved by the RE.
- Describe sample collection procedures to be used on the project site.
- Describe sample handling procedures.
- Describe decontamination waste disposal requirements (e.g., TSP soapy water shall not be discharged to the storm drainage system or receiving water).
- Describe sample collection documentation procedures.
- Describe procedures for recording and correcting sampling data.
- List laboratory that will be used for testing samples (i.e. laboratory for non-visible pollutant testing see Table 700.2.2.5: Sample Collection, Preservation and Analysis for Monitoring Non-Visible Pollutants, in Section 700.2.2.5).

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on previously entered information and can be viewed in Preview Section 700, when preparing to Print the SWPPP. This applies to Sections 700.2.1.4 - 700.2.2. Sections heading and descriptive text of the sections is provided below for reference. Some text provided below is the required text that automatically populates Section 700.

700.2.1.4.1 Sample Collection Procedures**SWPPP GUIDANCE INSTRUCTIONS**

Samples shall be collected, maintained and shipped in accordance with the SWAMP's 2013 QAPrP.

700.2.14.2 Sample Handling Procedures**SWPPP GUIDANCE INSTRUCTIONS**

Immediately following collection, sample bottles to be forwarded for laboratory analytical testing shall be capped, labeled, documented on the Stormwater Sampling Information, Identification, and COC Record form, sealed in a re-sealable storage bag, placed in an ice-chilled cooler, at 0 ± 4 degrees Celsius, and delivered within 24 hours to the laboratory shown in sub-section 700.2.1.2.4.

Immediately following collection, samples used for field analysis shall be tested in accordance with the field instrument manufacturer's instructions and results recorded on the CEM-2052 Stormwater Sample Field Test Report form.

700.2.1.4.3 Sample Documentation Procedures**SWPPP GUIDANCE INSTRUCTIONS**

All original data documented on sample bottle identification labels, and the CEM-2051 Stormwater Sampling and Testing Activity Log (Optional), shall be recorded using waterproof ink. These shall be considered accountable documents. If an error is made on an accountable document, the individual shall make corrections by lining through the error and entering the correct information. The erroneous information shall not be obliterated. All corrections shall be initialed and dated.

The following forms, used for sample documentation, shall be provided in the SWPPP appendices:

- CEM-2051 Stormwater Sampling and Testing Activity Log (Optional), in Appendix M.
Duplicate samples shall be identified in a manner consistent with the numbering system for other samples to prevent the laboratory from identifying duplicate samples. Duplicate samples shall be identified in the CEM-2051 Stormwater Sampling and Testing Activity Log.

700.2.1.5 Sample Analysis**SWPPP GUIDANCE INSTRUCTIONS**

For the analytical methods to be used to determine the presence of pollutant(s), see the specific SAPs in this CSMP.

700.2.1.6 Quality Assurance/Quality Control**SWPPP GUIDANCE INSTRUCTIONS**

For verification of laboratory or field analysis, duplicate samples shall be collected at a rate of 10 percent or 1 minimum duplicate per sampling event. The duplicate sample shall be collected, handled, and analyzed using the same protocols as primary samples. A duplicate sample shall be collected immediately after the primary sample has been collected. Duplicate samples shall not influence any evaluations or conclusions; however, they shall be used as a check on laboratory or field analysis quality assurance.

700.2.1.7 Data Management and Reporting**SWPPP GUIDANCE INSTRUCTIONS**

- Sample test results shall be reported on CEM-2052 Stormwater Sample Field Test Report form in Appendix N.
- A log of stormwater sampling and analysis activities can be identified on optional form CEM-2051 Stormwater Sampling and Testing Activities Log, in Appendix M.
- Sampling information and testing data results shall be provided to the RE within 48 hours of sampling for field analyzed samples and 30 days for laboratory analyzed samples.

700.2.1.8 Data Evaluation

The CGP and LTCGP require that BMPs be implemented on the construction site to reduce pollutants in discharges of stormwater from the construction site. Test results from stormwater discharges must be evaluated to determine if BMPs were properly implemented and are effective.

700.2.1.9 Change of Conditions

Whenever stormwater visual monitoring site inspections indicate a change in site conditions that might affect the appropriateness of sampling locations, sampling and testing protocols shall be revised accordingly. All such revisions shall be implemented as soon as feasible, and the SWPPP updated or amended.

700.2.2 SAP for Non-Visible Pollutants

SWPPP GUIDANCE INSTRUCTIONS

- The CGP requires that effluent monitoring from discharge pipes or other locations be representative of the nature of the discharge. Therefore, the project SWPPP must include a SAP for pollutants that were identified in Section 500.1.1 or 500.1.2 that are not visually detectable in stormwater and non-stormwater discharges. The purpose of this SAP is to determine if BMPs implemented on the construction site are effective in preventing pollutants that are not visually detectable from leaving the construction site and potentially impacting water quality standards.
- All project risk levels are required to include a non-visible pollutant SAP; however, non-visible pollutant monitoring is only required where a discharge can cause or contribute to an exceedance of a water quality standards because:
 - Construction materials or wastes are exposed
 - The site contains historical non-visible pollutants
 - Construction activities have occurred or construction materials have been placed within the past 24 hours that may contribute non-visible pollutants
 - There is run-on to the site that contain non-visible pollutants
 - There is a breach, malfunction leak or spill from a BMP

700.2.2.1 Scope of Monitoring Activities

SWPPP GUIDANCE INSTRUCTIONS

- Materials or wastes as identified in Section 500.1.1 or 500.1.2 containing potential non-visible pollutants that are not stored under watertight conditions.
- Materials or wastes containing potential non-visible pollutants that are stored under watertight conditions, but (1) a breach, leakage, malfunction, or spill is observed; and (2) the leak or spill has not been cleaned up prior to the forecasted storm event; and (3) the potential exists for discharge of non-visible pollutants to surface waters or drainage system.
- Construction activities, such as application of fertilizers, pesticides, herbicides or non-pigmented curing compounds, that have occurred during a qualifying rain event or within 24 hours preceding a forecasted storm event, where the potential exists for a discharge of pollutants to surface waters or drainage system.
- Existing site features contaminated with non-visible pollutants, such as those identified in Section 500.1.2.
- Applications of soil amendments, including soil stabilizing products, with the potential to alter pH levels or other properties of soil (such as chemical properties, engineering properties, or erosion resistance), or contribute toxic pollutants to stormwater runoff, and where the potential exists for discharges of pollutants to surface waters or drainage

- systems (unless independent test data are available that demonstrate acceptable concentration levels of non-visible pollutants in the soil amendment).
- Certain soil amendments identified in the “Pollutant Testing Guidance Table,” of the *Caltrans Construction Site Monitoring Program Guidance Manual*, which do not discharge non-visible pollutants and are not subject to water quality monitoring requirements.
 - Stormwater runoff from an area contaminated by historical usage of the site is observed and the potential exists for discharges of pollutants to surface waters or drainage systems.
 - Stormwater run-on to the Caltrans right-of-way with the potential to contribute non-visible pollutants to discharges from the project.
 - Breaches, malfunctions, leakages, or spills from a BMP.

SWPPP Builder Instructions

Section 700.2.2.1 has two separate tabs for information entry: Text and Lists (Figure 3-49).

Construction material, waste, or activity sources of non-visible pollutants List	
▶	Select List material sources of non-visible pollutants Site feature sources of non-visible pollutants soil amendments

Figure 3-49. Section 700.2.2.1 Scope of Monitoring Activities

List Tab: Provide lists of materials being used onsite that could be the source of non-visible pollution. Examples are provided below.

EXAMPLE TEXT

Materials potential sources of non-visible pollutants:

- Solvents, thinners
- Concrete curing
- Treated wood
- Soil stabilizers
- Lime treated subgrade
- Fertilizers, herbicides, and pesticides

Site feature sources of non-visible pollutants:

- Southwest portion of the construction site was previously used as a municipal landfill until 1987 and volatile organic compounds may be present in the soil.
- North portion of the construction site was a storage area for a metal plating shop until 1960 and metals may be present in the soil.

Soil amendments:

- Potash
- Compost

Text Tab: Provide narrative text of potential run-on non-visible pollutants sources. An example is provided below.

EXAMPLE TEXT

The project has the potential to receive stormwater run-on that may contribute non-visible pollutants to stormwater discharges from the project. Locations of such run-on to the Caltrans right-of-way are shown on the WPCDs in Attachment BB. The potential stormwater run-on locations to the project site are:

- Downgradient of the Millennium Chemical Company chemical plant and the Progress Industrial Park is identified as a run-on location to the construction site
- Two locations along the eastern edge of the construction site boundary are identified as run-on locations
- One location at the northern boundary of the construction site

700.2.2.2 Monitoring Preparation

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general instructions in General SAP Section 700.2.1.2 for monitoring preparation. If additional requirements are necessary for monitoring preparation, insert additional text in this section.

SWPPP Builder Instructions

In the text area provided, insert additional narrative text for monitoring preparation, as needed.

700.2.2.2.1 Qualified Sampling Personnel

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general requirements in General SAP Section 700.2.1.2.1 for Qualified Sampling Personnel.

SWPPP Builder Instructions

Insert additional narrative text for qualified sampling personnel in area provided, as needed.

700.2.2.2.2 Monitoring Supplies

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general information in General SAP Section 700.2.1.2.2 regarding monitoring supplies.

SWPPP Builder Instructions

Insert additional narrative text for monitoring supplies in area provided, as needed.

700.2.2.2.3 Field Instruments**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general information in General SAP Section 700.2.1.2.3 regarding field instruments.

SWPPP Builder Instructions

Insert additional narrative text for field instruments in area provided, as needed.

700.2.2.2.4 Testing Laboratory

Refer to the contact information found in General SAP Section 700.2.1.2.4 for the Testing Laboratory.

SWPPP Builder Instructions

Insert additional narrative text for testing laboratory in area provided, as needed.

700.2.2.3 Monitoring Strategy**SWPPP GUIDANCE INSTRUCTIONS**

The monitoring strategy for non-visible pollutants in stormwater discharges is to identify all potential non-visible pollutants that may be on the project site, non-visible pollutant sources, and water quality indicators that will indicate the presence of the non-visible pollutant in stormwater discharges.

Locations will be identified where sources of non-visible pollutants will be used, stored or exist because of historical use of the project site so that these areas are monitored prior to and during forecasted storm events.

Non-visible pollutant monitoring is only required where a discharge can cause or contribute to an exceedance of a water quality standard based on one of the following triggers:

- Construction materials are waste are exposed
- The site contains historical non-visible pollutants
- Construction activity has occurred or material has been placed within the past 24 hours that may cause an exceedance of a water quality standard
- There is run-on to the site that may contains non-visible pollutants
- There is a breach, malfunction, leak or spill from a BMP

When one of the triggers that indicate a non-visible pollutant source may have come in contact with stormwater is discovered during a site inspection conducted prior to, during or after a forecasted storm event, the WPC Manager will require that sampling and analysis of the stormwater discharge be

conducted for the applicable non-visible pollutant water quality indicator(s).

For the forecasted storm event in which a trigger for a non-visible pollutant sampling and analysis has occurred, the WPC Manager will also require the collection of an uncontaminated sample of runoff as a background sample for comparison with the samples being analyzed for non-visible pollutants. The WPC Manager will perform an evaluation of the analysis results from the non-visible pollutant stormwater discharge sampling location and the analysis results from the uncontaminated run-off sampling location to determine if there is an increased level of the tested non-visible pollutant analyte in the stormwater discharge.

700.2.2.3.1 Analytical Constituents

SWPPP GUIDANCE INSTRUCTIONS

- Identify the specific non-visible pollutants on the project site and list the non-visible pollutants in Table 700.2.2.3.1: Potential Non-Visible Pollutants and Water Quality Indicator Constituents.
- List the non-visible pollutant source, non-visible pollutant name, and water quality indicator.
- Refer to the “Pollutant Testing Guidance Table,” of the *Caltrans Construction Site Monitoring Program Guidance Manual*, for a partial list of some of the common non-visible pollutants and pollutant indicators.
 - Add lines to the table as needed.
 - Do not include visible pollutants such as:
 - Petroleum products: gas, diesel, and lubricants
 - Colored paints
 - Sand, gravel or topsoil
 - Asphalt cold mix

SWPPP Builder Instructions

Section 700.2.2.1 consists of completing the table shown below (Figure 3-50). Use the SWPPP guidance instructions provided as a reference.

Section 700.2.2.3.1: Analytical Constituents		
Table 700.2.2.3.1 Instructions		
TABLE 700.2.2.3.1 POTENTIAL NON-VISIBLE POLLUTANTS AND WATER QUALITY INDICATOR CONSTITUENTS		
Pollutant Source	Pollutant	Water Quality Indicator Constituent
Vehicle Batteries	Lead, Sulfate, acid	Lead, Sulfate, pH
Concrete		
*		

Figure 3-50. Section 700.2.2.3.1 Analytical Constituents

700.2.2.3.2 Potential Sampling Locations

Using the criteria in Section 700.2.1.3.2, the potential sampling locations on the project site for monitoring non-visible pollutants were identified. Sampling locations are based on: proximity to planned

non-visible pollutant storage; occurrence or use; accessibility for sampling and personnel safety; and other factors in accordance with the applicable requirements in the Caltrans Construction Site Monitoring Program Guidance Manual. Sampling locations shall be shown on the WPCDs in Attachment BB and listed on Stormwater Sampling Locations in Attachment EE.

SWPPP Builder Instructions

Complete table by providing the number of non-visible pollutant sampling locations and the number of uncontaminated sampling locations (Figure 3-51). Use the SWPPP guidance instructions provided as a reference.

Section 700.2.2.3.2: Potential Sampling Locations	
Fields	
Complete (2) Fields	
Number of Non-Visible Pollutant Sampling Locations	2
Number of Uncontaminated Sampling Locations	0

Figure 3-51. Section 700.2.2.3.2 Potential Sampling Locations

700.2.2.3.2.1 Potential Non Visible Pollutant Sampling Locations

SWPPP Builder Instructions

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-52).

Section 700.2.2.3.2.1: Potential Non-Visible Pollutant Sampling Locations	
Location Table	
Instructions	
TABLE 700.2.2.3.2.1 POTENTIAL NON-VISIBLE POLLUTANT SAMPLING LOCATIONS	
Sampling Location Identifier	Location Description
SDL-2	South corner of structure
*	

Figure 3-52. Section 700.2.2.3.2.1 Potential Non-Visible Pollutant Sampling Locations

700.2.2.3.2.2 Potential Uncontaminated Non Visible Pollutant Sampling Locations

Potential non-visible pollutant uncontaminated sampling locations shall be shown on the WPCDs in Attachment BB and listed on Stormwater Sampling Locations in Attachment EE.

SWPPP Builder Instructions

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-53).

Section 700.2.2.3.2.2: Potential Uncontaminated Non-Visible Pollutant Sampling Locations	
Location Table Instructions	
TABLE 700.2.2.3.2.2	
POTENTIAL UNCONTAMINATED NON-VISIBLE POLLUTANT SAMPLING LOCATIONS	
Sampling Location Identifier	Location Description
SDL-1	North corner of structure
*	

Figure 3-53. Section 700.2.2.3.2.2 Potential Uncontaminated Non-Visible Pollutant Sampling Locations

700.2.2.3.3 Actual Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

Sampling for non-visible pollutants at any potential non-visible pollutant sampling location will be based on any of the conditions listed below having been identified during the visual monitoring site inspections.

- Locations where materials or wastes containing potential non-visible pollutants are not stored under watertight conditions. Watertight conditions are defined as (1) storage in a watertight container, (2) storage under a watertight roof or within a building, or (3) protected by temporary cover and containment that prevents stormwater contact and runoff from the storage area.
- Locations where materials or wastes containing potential non-visible pollutants are stored under watertight conditions, but (1) a breach, malfunction, leakage, or spill is observed, (2) the leak or spill is not cleaned up prior to the forecasted storm event, and (3) the potential exists for discharge of non-visible pollutants to surface waters or a storm drain system.
- Locations where a construction activity (including but not limited to those identified in Section 500.1.1) with the potential to contribute non-visible pollutants (1) was occurring during or within 24 hours prior to the forecasted storm event, (2) involved the use of applicable BMPs that were observed to be breached, malfunctioning, or improperly implemented, and (3) resulted in the potential for discharge of non-visible pollutants to surface waters or a storm drain system.
- Locations where soil amendments that have the potential to change the chemical properties, engineering properties, or erosion resistance of the soil have been applied, and the potential exists for discharge of non-visible pollutants to surface waters or a storm drain system.
- Locations where stormwater runoff from an area contaminated by historical usage of the site has been observed to combine with stormwater runoff from the site, and the potential exists for discharge of non-visible pollutants to surface waters or a storm drain system.

If the presence of a material storage, waste storage, or operations area where spills have been observed or the potential for the discharge of non-visible pollutants to surface waters or a storm drain system was noted during a site inspection conducted prior to or during a forecasted storm event and such an area has not been identified on the list of potential non-visible pollutant sampling locations, the WPC Manager must identify the corresponding discharge location and the corresponding upgradient sampling

location as actual non-visible sampling locations. The additional sampling location for non-visible pollutant monitoring shall be shown on the WPCDs in Attachment BB and added to Attachment EE: Stormwater Sampling Locations.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.2.3.4 Sampling Schedule**SWPPP GUIDANCE INSTRUCTIONS**

In addition to the general scheduling requirements in General SAP Section 700.2.1.3.4, samples for non-visible pollutant monitoring, including both the non-visible pollutants samples and uncontaminated background samples, shall be collected during the first two hours of discharge from storm events that result in a sufficient discharge for sample collection. Samples shall be collected during working hours.

SWPPP Builder Instructions

Insert additional narrative text for sampling schedule in area provided, as needed.

700.2.2.4 Sample Collection and Handling***SWPPP Builder Instructions***

Refer to the general sample collection and handling instructions in General SAP Section 700.2.1.4. If additional requirements are necessary for sample collection and handling, insert additional text in this section.

700.2.2.4.1 Sample Collection Procedures

Refer to the general procedures for sample collection in General SAP Section 700.2.1.4.1.

SWPPP Builder Instructions

Insert additional narrative text for sample collection procedures in area provided, as needed.

700.2.2.4.2 Sample Handling Procedures

Refer to the general procedures for sample handling in General SAP Section 700.2.1.4.2.

SWPPP Builder Instructions

Insert additional narrative text for sample handling procedures in area provided, as needed.

700.2.2.4.3 Sample Documentation Procedures**SWPPP GUIDANCE INSTRUCTIONS**

In addition to the general sample documentation procedures provided in General SAP Section 700.2.1.4.3, when applicable, the contractor's stormwater inspector will document in the CEM-2030 Stormwater Site Inspection Report, that samples for non-visible pollutants were taken during a storm event, based on the criteria for non-visible pollutant sampling described in Section 700.2.2.3.3.

SWPPP Builder Instructions

Insert additional narrative text for sample documentation procedures in area provided, as needed.

700.2.2.5 Sample Analysis**SWPPP GUIDANCE INSTRUCTIONS**

- Identify the test method and specifications to be used to monitor the non-visible pollutants included in Table 700.2.2.3.1: Potential Non-Visible Pollutants and Water Quality Indicator Constituents, in Section 700.2.2.3.1.
- Fill in Table 700.2.2.5: Sample Collection, Preservation and Analysis for Monitoring Non-Visible Pollutants.
- Identify a test method in Table 700.2.2.5 for each Water Quality Indicator Constituent listed in Table 700.2.2.3.1 in Section 700.2.2.3.1.
- Identify test instruments to be used in the field for analyzing samples, if any.
- Will some measurements be taken in the field?

EXAMPLE if samples will be sent to laboratory:

Table 3.3-3 Section 700.2.2.5 Table Example

TABLE 700.2.2.5 SAMPLE COLLECTION, PRESERVATION AND ANALYSIS FOR MONITORING NON-VISIBLE POLLUTANTS						
Constituent	Analytical Method	Minimum Sample Volume	Sample Bottle	Sample Preservation	Reporting Limit	Maximum Holding Time
VOCs-Solvents	EPA 8260B	3 x 40 mL	VOA-glass	Store at 4 °C, HCl to pH<2	1 µg/L	14 days
SVOCs	EPA 8270C	1 x 1 L	Glass-Amber	Store at 4 °C	10 µg/L	7 days
Pesticides/PCBs	EPA 8081A/8082	1 x 1 L	Glass-Amber	Store at 4 °C	01µg/L	7 days
Herbicides	EPA 8151A	1 x 1 L	Glass-Amber	Store at 4 °C	Check Lab	7 days
BOD	EPA 405.1	1 x 500 mL	Polypropylene	Store at 4 °C	1 mg/L	48 hours
COD	EPA 410.4	1 x 250 mL	Glass-Amber	Store at 4 °C, H ₂ SO ₄ to pH<2	5 mg/L	28 days
DO	SM 4500-O G	1 x 250 mL	Glass-Amber	Store at 4 °C	Check Lab	8 hours
pH	Field test with calibrated portable instrument	1 x 100 mL	Polypropylene	None	Unit less	15 minutes
Alkalinity	SM 2320B	1 x 250 mL	Polypropylene	Store at 4 °C	1 mg/L	14 days
Metals (Al, Sb, As, Ba, Be, Cd, Ca, Cr, Co, Cu, Fe, Pb, Mg, Mn, Mo, Ni, Se, Na, Th, Va, Zn)	EPA 6010B/7470A	1 x 250 mL	Polypropylene	Store at 4 °C, HNO ₃ to pH<2	0.1 mg/L	6 months
Metals (Chromium VI)	EPA 7199	1 x 500 mL	Polypropylene	Store at 4 °C	1.0µg/L	24 hours

Notes:

°C – degrees celsius

BOD – biochemical oxygen demand

COD – chemical oxygen demand

DO – dissolved oxygen

USEPA – United States EPA

HCl – hydrochloric acid nitric acid

H₂SO₄ – sulfuric acid

L – liter

mg/L – milligrams per liter

mL – milliliter

PCB – polychlorinated biphenyls

SM – Standard Method

SVOC – semivolatile organic compound

µg/L – micrograms per liter

VOA – volatile organic analysis

VOC – volatile organic compound

SWPPP Builder Instructions

Insert additional sample analysis narrative text, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.2.6 Quality Assurance/Quality Control

SWPPP GUIDANCE INSTRUCTIONS

Refer to general instructions about Quality Assurance/Quality Control (QA/QC) in General SAP Section

700.2.1.6. If additional requirements are necessary for QA/QC, insert additional text in this section.

SWPPP Builder Instructions

Insert additional quality control/quality assurance narrative text, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.2.7 Data Management and Reporting

SWPPP GUIDANCE INSTRUCTIONS

Refer to general data management and reporting instructions in General SAP Section 700.2.1.7. If additional requirements are necessary for data management and reporting, insert additional text in this section.

SWPPP Builder Instructions

Insert additional data management and reporting narrative text, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.2.8 Data Evaluation

SWPPP GUIDANCE INSTRUCTIONS

- Implement BMPs on the construction site, in accordance with the CGP, to reduce non-visible pollutants in discharges of stormwater from the construction site.
- Evaluate the discharge water quality sample analytical results to determine if the runoff/downgradient sample(s) show significantly elevated concentrations of the tested analyte relative to the concentrations found in the uncontaminated background sample.
- Implement corrective measures if necessary.
- Evaluate the water quality sample analytical results to determine if the runoff and run-on samples show significantly elevated levels of the tested constituent relative to the levels found in the background sample. The run-on sample analytical results shall be used as an aid in evaluating potential off-site influences on water quality results.

SWPPP Builder Instructions

Insert additional narrative text for non-visible pollutant data evaluation, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.2.9 Change of Conditions**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general instructions for change of conditions in General SAP Section 700.2.1.9. If additional requirements are necessary for changes of conditions, then insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for non-visible pollutant change of conditions, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3 SAP for Non-Stormwater Discharges**SWPPP GUIDANCE INSTRUCTIONS**

- The CGP and LTCGP require that effluent monitoring from discharge pipes or other locations be representative of the nature of the discharge. This section addresses all non-stormwater discharges from the site at discharge points.
- Typical non-stormwater pollution sources include, but are not limited to, the following: water trucks, water tanks, concrete cutting and curing operations, hydrant or pipe flushing, washing or rinsing of any kind, and concrete washouts.
- Non-stormwater may be polluted with visible or non-visible pollutants. Section 700.2.2 addresses non-visible pollutants in stormwater discharges at discharge points.
- Does this project have a dewatering permit?

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.1 Scope of Monitoring Activities

SWPPP GUIDANCE INSTRUCTIONS

- Identify the general sources and locations of potential non-stormwater discharges from the project site.
- For projects with dewatering permits, insert:
 - Permit number
 - Name of RWQCB
 - Monitoring parameters
 - Dewatering locations
 - Frequency of monitoring

SWPPP Builder Instructions

Section 700.2.3.1 has three separate tabs for information entry: Fields, Text, and Lists (Figure 3-54).

Complete (2) Fields	
Dewatering Permit Number	RG-2008-0002 (NPDES CAG19002)
Regional Water Board	R9

Figure 3-54. Section 700.2.3.1 Scope of Monitoring Activities Fields Tab

Fields Tab: Provide the dewatering permit number and the issuing regional water board.

Text Tab: Provide the additional narrative text for dewatering scope of monitoring activities and additional text for non-stormwater discharges scope of monitoring activities.

Lists Tab: Complete the three lists when there will be dewatering activities present onsite. Click-on the title of the Select List to navigate from list to list (Figure 3-55). The lists are for dewatering parameters, locations and frequency. Use the reference SWPPP guidance instructions.

List dewatering monitoring parameters List	
► DH	Turbidity
*	

Select List

dewatering parameters
dewatering locations
dewatering frequency

Figure 3-55. Section 700.2.3.1 Scope of Monitoring Activities Lists Tab

700.2.3.2 Monitoring Preparation**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general instructions for monitoring preparation in General SAP Section 700.2.1.2. If additional requirements are necessary for monitoring preparation, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge sample collection and handling, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.2.1 Qualified Sampling Personnel**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general requirements for Qualified Sampling Personnel in General SAP Section 700.2.1.2.1.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge qualified sampling personnel, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.2.2 Monitoring Supplies**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general information regarding monitoring supplies in General SAP Section 700.2.1.2.2.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge monitoring supplies, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.2.3 Field Instruments

SWPPP GUIDANCE INSTRUCTIONS Refer to the general information regarding field instruments in General SAP Section 700.2.1.2.3.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge field instruments, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.2.4 Testing Laboratory

Refer to the contact information for the testing laboratory found in General SAP Section 700.2.1.2.4.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge testing laboratory, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.3 Monitoring Strategy**SWPPP GUIDANCE INSTRUCTIONS**

If additional non-stormwater discharge monitoring strategy requirements are necessary, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge monitoring strategy, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.3.1 Analytical Constituents**SWPPP Builder Instructions**

Section 700.2.3.3.1 has two separate tabs for information entry: Text, and Lists (Figure 3-56).

List potential non-visible pollutant water quality indicator List	
▶ <input checked="" type="checkbox"/> Nutrients	Select List potential non-visible pollutant water quality dewatering constituents

Figure 3-56. Section 700.2.3.3.1 Analytical Constituents

Text Tab: Provide the additional narrative text for non-stormwater discharges analytical constituents and additional text for dewatering permit analytical constituents.

Lists Tab: Complete the two lists for analytical constituents for non-stormwater discharge. Click-on the title of the Select List to navigate from list to list. The lists are for potential non-visible pollutant water quality indicator and dewatering constituents. Use the reference SWPPP guidance instructions.

700.2.3.3.2 Potential Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

Using the criteria in Section 700.2.1.3.2, potential sampling locations on the project site for monitoring dewatering discharges, discharges of impounded stormwater, and other non-stormwater discharges were identified. Sampling locations were based on: proximity to planned non-stormwater dewatering; non-stormwater occurrence or use; accessibility for sampling and personnel safety; and other factors in accordance with the applicable requirements in the *Caltrans Construction Site Monitoring Program Guidance Manual*. Sampling locations shall be shown on the WPCDs in Attachment BB and listed on Stormwater Sampling Locations in Attachment EE.

SWPPP Builder Instructions

Section 700.2.3.3.2 has two separate tabs for information entry: Fields and Text (Figure 3-57).

Section 700.2.3.3.2: Potential Sampling Locations	
Fields	Text
Complete (4) Fields	
Number of Non-stormwater Dewatering Sampling Locations	1
Number of Impounded Stormwater Sampling Locations	2
Number of Sediment-Sensitive Water Body Sampling Locations	

Figure 3-57. Section 700.2.3.3.2 Potential Sampling Locations

Fields Tab: Enter the information, as needed, for:

- Enter number of sampling location(s) on the project site have been identified as potential locations for the collection of non-stormwater dewatering samples.
- Enter number of sampling location(s) on the project site been identified as potential locations for the collection of discharge samples of impounded stormwater.
- Enter the name of the water body that will receive discharge. If there is not a water body that will be directly discharged to, leave blank.
- Enter the name of the sediment-sensitive water body that will receive discharge. If there is not a sediment-sensitive water body that will be directly discharged to, leave blank.

Text Tab: Provide the additional narrative text for non-stormwater discharges potential sampling locations and additional text for stream environment zone or receiving water potential sampling locations.

700.2.3.3.2.1 Potential Non Stormwater Dewatering Sampling Locations**SWPPP Builder Instructions**

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-58).

Section 700.2.3.3.2.1: Potential Non-Stormwater Dewatering Sampling Locations	
Location Table	Instructions
TABLE 700.2.3.3.2.1 POTENTIAL NON-STORMWATER DEWATERING SAMPLING LOCATIONS	
Sampling Location Identifier	Location Description
SDL-1	Carroll Canyon Road bridge foundations as shown on WPCD - 2
*	

Figure 3-58. Section 700.2.3.3.2.1 Potential Non-Stormwater Dewatering Sampling Locations

700.2.3.3.2.2 Potential Impounded Stormwater Discharge Sampling Locations**SWPPP Builder Instructions**

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-59).

Section 700.2.3.3.2.2: Potential Impounded Stormwater Discharge Sampling Locations	
Location Table	Instructions
TABLE 700.2.3.3.2.2 POTENTIAL IMPOUNDED STORMWATER DISCHARGE SAMPLING LOCATIONS	
Sampling Location Identifier	Location Description
N/A	N/A
*	

Figure 3-59. Section 700.2.3.3.2.2 Potential Impounded Stormwater Discharge Sampling Locations

700.2.3.3.2.3 Potential Dewatering/Impounded Stormwater Sampling Locations and Receiving Water Sampling Locations**SWPPP Builder Instructions**

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-60).

3.2.3: Potential Dewatering / Impounded Stormwater Sampling Locations And Receiving Water Sampling Locations	
Table 700.2.3.3.2.3 Instructions	
TABLE 700.2.3.3.2.3	
Dewatering / Impounded Stormwater Sampling Location Identifier	Receiving Water Sampling Location Identifier
SD-1	RW-1
*	

Figure 3-60. Section 700.2.3.3.2.3 Potential Dewatering/Impounded Stormwater Sampling Locations and Receiving Water Sampling Locations

700.2.3.3.3 Actual Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

Actual sampling locations will be determined by the WPC Manager when dewatering activities are in progress based on the potential dewatering discharge sample locations initially selected.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge actual sampling locations, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.3.4 Sampling Schedule

SWPPP GUIDANCE INSTRUCTIONS

Whenever there are dewatering discharges or impounded stormwater discharges, sampling will be performed daily during discharging. Sampling will be performed upon commencement of the dewatering discharge or impounded stormwater discharge, and then a minimum of three (3) samples per day will be collected for analysis.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge sampling schedule and for dewatering permit actual sampling locations, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.4 Sample Collection and Handling**SWPPP GUIDANCE INSTRUCTIONS**

- Refer to the general sample collection and handling instructions in General SAP Section 700.2.1.4. If additional requirements are necessary for sample collection and handling, insert additional text in this section.
- For projects with dewatering permits, insert additional requirements in appropriate sections.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge sample collection and handling, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.4.1 Sample Collection Procedures**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general procedures for sample collection in General SAP Section 700.2.1.4.1.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge sample collection procedures, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.4.2 Sample Handling Procedures**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general procedures for sample handling in General SAP Section 700.2.1.4.2.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharge data management and reporting, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.8 Data Evaluation**SWPPP GUIDANCE INSTRUCTIONS**

Samples collected from dewatering discharges shall be evaluated to determine if the concentrations are less than or equal to the applicable water quality standard.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.3.9 Changes of Conditions***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general instructions for changes of conditions in General SAP Section 700.2.1.9. If additional requirements are necessary for Changes of Conditions, then insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for non-stormwater discharges change of conditions, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4 SAP for Stormwater pH and Turbidity***SWPPP GUIDANCE INSTRUCTIONS***

- The CGP requires dischargers to assess the risk level of a site based both on sediment transport and receiving water risk. Risk levels are established by calculating two factors: (1) the site's sediment risk; and (2) the receiving water risk during periods of soil exposure. Both factors are used to determine the site-specific risk level. The risk level determination for this project is shown in Section 500.1.3. For Risk Level 2 and Risk Level 3 projects, a SAP must be prepared for monitoring turbidity and pH of stormwater discharges.
- For Risk Level 1 projects, the requirements outlined in Sections 700.2.4.1 thru 700.2.4.9 are not required.
- For LTCGP projects, a SAP must be prepared for monitoring turbidity and pH of stormwater discharges.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.1 Scope of Monitoring Activities***SWPPP Builder Instructions***

No action required. Automated text will populate the SWPPP based on Risk Level and will insert the previously entered name of the sediment sensitive water body. This section can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.2 Monitoring Preparation***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general instructions for monitoring preparation in General SAP Section 700.2.1.2. If additional requirements are necessary for monitoring preparation, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for monitoring preparation, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.2.1 Qualified Sampling Personnel

Refer to the general requirements for Qualified Sampling Personnel in General SAP Section 700.2.1.2.1.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity qualified sampling personnel, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.2.2 Monitoring Supplies

Refer to the general information regarding monitoring supplies in General SAP Section 700.2.1.2.2.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity monitoring supplies, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.2.3 Field Instruments***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general information regarding field instruments in General SAP Section 700.2.1.2.3.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity field instruments, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.2.4 Testing Laboratory**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the contact information for the testing laboratory found in General SAP Section 700.2.1.2.4.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity testing laboratory, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.4.3 Monitoring Strategy**SWPPP GUIDANCE INSTRUCTIONS**

- Describe the constituents for which the stormwater discharge samples must be analyzed.
- Describe the potential stormwater discharge sampling locations.
- Describe the sampling locations for monitoring the impacts of direct stormwater discharges from the project to the sediment-sensitive or other water body.
- Describe potential sampling locations where run-on enters the project site.
- Describe how actual sampling locations will be selected for every qualifying rain event.
- Describe the sampling schedule for monitoring the impacts of stormwater discharges to the sediment-sensitive or other water body.

700.2.4.3.1 Analytical Constituents

Stormwater discharge samples are to be analyzed for pH and turbidity.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity analytical constituents, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.4.3.2 Potential Sampling Locations**SWPPP GUIDANCE INSTRUCTIONS**

- Provide location identifier(s) and describe the location(s) of project site discharges and show the discharge locations on the WPCDs in Attachment BB.
- Sampling locations for discharges are based on proximity to identified discharge or run-on location(s), accessibility for sampling, personnel safety, and other factors in accordance with the applicable requirements in the Caltrans *Construction Site Monitoring Program Guidance Manual*.
- Include the required text to identify direct discharge locations to receiving waters and sampling location(s), if applicable.
- To determine potential impairments that originate off site, include the identified locations of run-on to the Caltrans right-of-way from Section 500.3.1 and then identify run-on sampling location(s).
- Does the project site have discharge locations that discharge directly to the sediment-sensitive-listed water body? Yes or No.
- Does the project receive run-on with the potential to combine with stormwater discharges? Yes or No.

SWPPP Builder Instructions

Insert additional narrative text for: stormwater discharge locations; stormwater direct discharge to receiving water sampling locations; stormwater discharge to receiving water sampling locations; run-on sampling locations; and stormwater discharge to receiving water sampling locations. If no additional text is necessary in any category, leave blank. Additional entry requirements are required for projects with direct discharge to sediment-sensitive receiving water. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.4.3.2.1 Stormwater Discharge Locations**SWPPP Builder Instructions**

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-63).

Section 700.2.4.3.2.1: Stormwater Discharge Locations	
Location Table	Instructions
TABLE 700.2.4.3.2.1 STORMWATER DISCHARGE LOCATIONS	
Sampling Location Identifier	Location Description
SDL-1	Existing drain outlet as shown on WPCD-15
SDL-2	Existing drain outlet as shown on WPCD-11
*	

Figure 3-63. Section 700.2.4.3.2.1 Stormwater Discharge Locations

700.2.4.3.2.2 Direct Stormwater Discharge Locations to Sediment Sensitive Waterbody

SWPPP GUIDANCE INSTRUCTIONS

- Provide location identifier(s) and describe the location(s) of direct discharges from the project site to the sediment-sensitive water body, and show the locations of direct discharge on the WPCDs in Attachment BB, if applicable.
- Identify a location upstream of all direct discharge from the construction site that appears to represent the flow of the water body to analyze the prevailing condition of the receiving water without any influence from the construction site. Describe exactly, either using GPS coordinates or post mile designations, where the sample will be collected.

Note: Sampling too far upstream may not show prevailing conditions immediately upstream of the construction site.

- Identify a location immediately downstream from the last point of direct discharge from the construction site that appears to represent the nature of the flow to analyze potential impacts to the sediment-sensitive listed water body from the project. Describe exactly where the sample will be collected. Downstream samples should represent the receiving water mixed with flow from the construction site.

Note: Sampling too far downstream may result in detection of pollutants from other discharges.

- Receiving water sampling locations are based on proximity to identified discharge location(s), accessibility for sampling and personnel safety, and other factors in accordance with the applicable requirements in the Caltrans *Construction Site Monitoring Program Guidance Manual*.

SWPPP Builder Instructions

Complete table by providing the unique discharge location identifier and narrative text location description (Figure 3-64).

Section 700.2.4.3.2.2: Direct Stormwater Discharge Locations To Receiving Waterbody	
Location Table	Instructions
TABLE 700.2.4.3.2.2 DIRECT STORMWATER DISCHARGE LOCATIONS TO RECEIVING WATERBODY	
Discharge location	Location

Figure 3-64. Section 700.2.4.3.2.2 Direct Stormwater Discharge Locations to Receiving Waterbody

700.2.4.3.2.3 Receiving Water Sampling Locations

SWPPP Builder Instructions

Complete table by providing the unique run-on location identifier and narrative text location description (Figure 3-66).

TABLE 700.2.4.3.2.4	
RUN-ON LOCATIONS WITH POTENTIAL TO COMBINE WITH STORMWATER DISCHARGES	
Sampling Location Identifier	Location
RO-1	Near abut of Carroll Cyn Rd Bridge (east of Rte 805 as shown on WPCD-11)
RO-2	Near abut of Carroll Cyn Rd Bridge (east of Rte 805 as shown on WPCD-11)

Figure 3-66. Section 700.2.4.3.2.4 Table

700.2.4.3.2.4 Receiving Water Sampling Locations

SWPPP Builder Instructions

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-67).

TABLE 700.2.4.3.2.5	
RECEIVING WATER SAMPLING LOCATIONS	
Sampling Location Identifier	Location

Figure 3-67. Section 700.2.4.3.2.5 Table

Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

Potential receiving water sampling locations shall be shown on the WPCDs in Attachment BB and listed on Stormwater Sampling Locations Attachment EE.

700.2.4.3.3 Actual Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

- The locations from which samplings are collected are selected to characterize discharges associated with the construction activity from the entire project site. The sampling locations are selected based on drainage areas that have the highest percentage of potentially DSA. Representative sampling for this project is based on sampling 20 percent of the project discharge locations per qualifying rain event. If 20 percent results in fewer than five (5) locations to be sampled, then a minimum of five (5) locations or all discharge locations will be sampled per qualifying rain event.
- Insert the receiving water sampling locations for monitoring the impacts of direct stormwater discharges from the project to the sediment-sensitive or other water body, if applicable.
- Insert run-on sampling locations when there are identified locations of run-on to the Caltrans right-of-way.

SWPPP Builder Instructions

Section 700.2.4.3.3 has two separate tabs for information entry: Text and Field. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

Fields Tab: Provide information regarding (if applicable):

- Receiving Water's Upstream Sampling Location Number
- Receiving Water's Upstream Sampling Location
- Receiving Water's Downstream Sampling Location
- Number of Run-on Sampling Locations
- Risk Level 3 Upstream Sampling Location Number
- Risk Level 3 Upstream Sampling Location
- Risk Level 3 Downstream Sampling Location Number
- Risk Level 3 Downstream Sampling Location

Text Tab: Provide the additional narrative text for stormwater discharge actual sampling locations and additional text for actual run-on sampling locations (Figure 3-68).

Section 700.2.4.3.3: Actual Sampling Locations	
Fields	Text
Complete (9) Fields	
Receiving Water's Upstream Sampling Location Number	2
Receiving Water's Upstream Sampling Location	150 feet west of the south corner of existing Building N.
Receiving Water's Downstream Sampling Location Number	5
Receiving Water's Downstream Sampling Location	200 feet downstream of the upstream sampling location.
Number of Run-on Sampling Locations	1
Risk Level 3 Upstream Sampling Location Number	

Figure 3-68. Section 700.2.4.3.3 Actual Sampling Locations

700.2.4.3.4 Sampling Schedule**SWPPP Builder Instructions**

Insert additional narrative text for stormwater pH and turbidity sampling schedule, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.4 Sample Collection and Handling**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general sample collection and handling instructions in General SAP Section 700.2.1.4. If additional requirements are necessary for sample collection and handling, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity sample collection and handling, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.4.1 Sample Collection Procedures**SWPPP GUIDANCE INSTRUCTIONS**

In addition to the general procedures for sample collection in General SAP Section 700.2.1.4.1, the procedures described below apply to sample collection for monitoring of pH and turbidity.

- Grab samples shall be collected and preserved in accordance with the methods identified in Table 700.2.4.5.1: Sample Collection, Preservation and Analysis for Monitoring Turbidity and pH, provided in Section 700.2.4.5.
- Only personnel trained in proper water quality sampling shall collect samples.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity sample collection procedures, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.4.2 Sample Handling Procedures**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general procedures for sample handling in General SAP Section 700.2.1.4.2.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity sample handling procedures, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.4.3 Sample Documentation Procedures**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general procedures for sample documentation in General SAP Section 700.2.1.4.3.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity sample documentation procedures, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.5 Sample Analysis**SWPPP GUIDANCE INSTRUCTIONS**

- Analytical tests to be used on the project are listed in Table 700.2.4.5.1: Sample Collection, Preservation and Analysis for Monitoring Turbidity and pH.
- For Risk Level 3, include Table 700.2.4.5.2: Sample Collection, Preservation and Analysis for Monitoring SSC.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity sample analysis and field analysis, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.6 Quality Assurance/Quality Control**SWPPP GUIDANCE INSTRUCTIONS**

Refer to general instructions about QA/QC in General SAP Section 700.2.1.6. If additional requirements are necessary for QA/QC, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity QA/QC, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.7 Data Management and Reporting**SWPPP GUIDANCE INSTRUCTIONS**

Refer to general data management and reporting instructions in General SAP Section 700.2.1.7. If additional requirements are necessary for data management and reporting, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity data management and reporting instructions, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.8 Data Evaluation**SWPPP GUIDANCE INSTRUCTIONS**

- The CGP and the LTCGP require that BMPs be implemented on the construction site to prevent a significant change in pH and a significant increase in sediment load in stormwater discharges relative to pre- construction levels.
- Sample results from stormwater discharges shall be evaluated to determine if the concentrations are less than or equal to the applicable water quality standard.
- For receiving waters, the downstream water quality sample analytical results shall be evaluated to determine if the downstream sample(s) show undesirable changes to the levels of the tested constituent relative to the levels found in the upstream sample. The run-on sample analytical results shall be used as an aid in evaluating potential off-site influences on water quality results. If elevated levels of pollutants are identified, additional BMPs must be implemented in an iterative manner to prevent a net increase in pollutants to receiving waters.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity data evaluation, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.4.9 Change of Condition**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general instructions for changes of conditions with regard to SAPs in General SAP Section 700.2.1.9. If additional requirements are necessary for a Change of Conditions, then insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for stormwater pH and turbidity change of conditions, as needed. If no additional text is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5 SAP for Monitoring Required by Regional Board***SWPPP GUIDANCE INSTRUCTIONS***

- The CGP requires stormwater effluent monitoring for any additional parameters required by a RWQCB.
- The RWQCB is requiring additional monitoring? Such as a Water Quality Certification (WQC or 401).
- If there are no additional parameters shown in the contract special provisions, then the RWQCB has not specified any additional parameters and Sections 700.2.5.1 – 700.2.5.9 shall be deleted.

SWPPP Builder Instructions

Insert in the field specified analytical parameter(s) required by the Regional Board (RWQCB), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.1 Scope of Monitoring Activities***SWPPP Builder Instructions***

Provide in the field monitoring requirements for additional RWQCB specified parameter(s), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.2 Monitoring Preparation***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general instructions for monitoring preparation in General SAP Section 700.2.1.2. If additional requirements are necessary for monitoring preparation, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for monitoring preparation for additional RWQCB specified parameter(s), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.2.1 Qualified Sampling Personnel**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general requirements for Qualified Sampling Personnel in General SAP Section 700.2.1.2.1.

SWPPP Builder Instructions

Insert additional narrative text for qualified sampling personnel for the monitoring of additional RWQCB specified parameter(s), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.2.2 Monitoring Supplies**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general information regarding monitoring supplies in General SAP Section 700.2.1.2.2.

SWPPP Builder Instructions

Insert additional narrative text for monitoring supplies for the monitoring of additional RWQCB specified parameter(s), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.2.3 Field Instruments**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general information regarding field instruments in General SAP Section 700.2.1.2.3.

SWPPP Builder Instructions

Insert additional narrative text for field instruments for the monitoring of additional RWQCB specified parameter(s), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.2.4 Testing Laboratory**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the contact information for the testing laboratory found in General SAP Section 700.2.1.2.4.

SWPPP Builder Instructions

Insert additional narrative text for the testing laboratory for the monitoring of additional RWQCB specified parameter(s), as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.3 Monitoring Strategy**SWPPP GUIDANCE INSTRUCTIONS**

- Describe the constituents for which the stormwater discharge samples must be analyzed.
- Describe the potential stormwater discharge sampling locations.
- Describe the sampling locations for monitoring the impacts of direct stormwater discharges from the project to the sediment-sensitive or other water body.
- Describe potential sampling locations where run-on enters the project site.
- Describe how actual sampling locations will be selected for every qualifying rain event.
- Describe the sampling schedule for monitoring the impacts of stormwater discharges to the sediment-sensitive or other water body.

SWPPP Builder Instructions

Insert additional narrative text on impaired water body for monitoring required by the RWQCB in an impaired water body, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.3.1 Analytical Constituents**SWPPP Builder Instructions**

Section 700.2.5.3.1 has three separate tabs for information entry: Field, Texts, and Lists (Figure 3-69).

Insert "Stormwater Discharge" or Receiving Water's Name

Figure 3-69. Section 700.2.5.3.1 Analytical Constituents

Fields Tab: Insert the name of the “stormwater discharge” or receiving water in the field provided.

Text Tab: Insert additional narrative text on analytical constituents for monitoring required by the RWQCB in an impaired water body, as needed. If no entry is necessary, leave blank.

Lists Tab: Complete the list for analytical constituents required by the RWQCB. Tab at the end of each analytical constituents entry to navigate to the next row for multiple analytical constituents.

Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.3.2 Potential Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

- Provide location identifier(s) and describe the location(s) of project site discharges.
- Provide location identifier(s) and describe the location(s) of direct discharges from the project site to the impaired water body and show the locations of direct discharges on the WPCDs, if applicable.
- Identify a location upstream of all direct discharges from the construction site, which appears to represent the flow of the water body, to analyze the prevailing condition of the receiving water without any influence from the construction site. Describe exactly, either using GPS coordinates or post mile, where the sample will be collected. Note: Sampling too far upstream may not show prevailing conditions immediately upstream of the construction site.
- Identify a location immediately downstream from the last point of direct discharge from the construction site, which appears to represent the nature of the flow, to analyze potential impacts to the impaired water body from the project. Describe exactly where the sample will be collected. Downstream samples should represent the receiving water mixed with flow from the construction site. Note: Sampling too far downstream may result in detection of pollutants from other discharges.
- Include the appropriate text to identify whether run-on to the Caltrans right-of-way may combine with stormwater and directly discharge to sediment-sensitive water bodies. If the project does receive run-on, describe the locations of run-on as discussed in Section 500.3.1 and shown the locations on the WPCDs.
- To determine potential impairments that originate off site, include the required text to identify run-on sampling location(s) for projects that have run-on. Describe exactly where the sample will be collected.
- Describe surrounding areas, such as agricultural fields or other sites, which may contribute run-on sediment to the site.
- To minimize backwater affects or poorly mixed flows, do not locate sampling points at point sources or confluences.
- Sampling locations are based on proximity to identified discharge or run-on location(s), accessibility for sampling, personnel safety, and other factors in accordance with the applicable requirements in the Caltrans Construction Site Monitoring Program Guidance Manual.

- Does the project receive run-on with the potential to combine with stormwater that discharges directly to the impaired water body?

SWPPP Builder Instructions

Section 700.2.5.3.1 has two separate tabs for information entry: Field and Text (Figure 3-70).

Figure 3-70. Section 700.2.5.3.2 Potential Sampling Locations

Fields Tab: Insert the name of the impaired receiving water body and receiving water body, if applicable.

Text Tab: Insert additional narrative text, as needed, for:

- Monitoring requirements by RWQCB for run-on sampling locations
- Monitoring requirements by RWQCB of stormwater discharge locations
- Monitoring requirements by RWQCB for direct discharge to receiving water sampling locations
- Monitoring requirements by RWQCB for receiving water sampling locations

Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

Table 700.2.5.3.2.1 Stormwater Discharge Locations Required to Be Monitored by RWQCB

SWPPP Builder Instructions:

Complete table by providing the unique sampling location identifier and narrative text location description of the monitoring locations required by the RWQCB (Figure 3-71).

Figure 3-71. Section 700.2.5.3.2.1 Stormwater Discharge Locations Required to be Monitored by RWQCB

700.2.5.3.2.2 Stormwater Discharge Locations Required to Receiving Water

SWPPP Builder Instructions

Complete table by providing the unique discharge location identifier and narrative text location description of discharge locations to receiving water (Figure 3-72).

Section 700.2.5.3.2.2: Stormwater Discharge Locations To Receiving Water	
Location Table Instructions	
TABLE 700.2.5.3.2.2 STORMWATER DISCHARGE LOCATIONS TO RECEIVING WATER	
Discharge Location Identifier	Location
▶	

Figure 3-72. Section 700.2.5.3.2.2 Stormwater Discharge Locations to Receiving Water

700.2.5.3.2.3 Receiving Water Sampling Locations Required to be Monitored by RWQCB

SWPPP Builder Instructions

Complete table by providing the unique sampling location identifier and narrative text location description of receiving water sampling locations required by the RWQCB (Figure 3-73).

Section 700.2.5.3.2.3: Receiving Water Sampling Locations Required To Be Monitored By Rwqcb	
Location Table Instructions	
TABLE 700.2.5.3.2.3 RECEIVING WATER SAMPLING LOCATIONS REQUIRED TO BE MONITORED BY RWQCB	
Sampling Location Identifier	Location
▶	

Figure 3-73. Section 700.2.5.3.2.3 Receiving Water Sampling Locations Required to be Monitored by RWQCB

700.2.5.3.2.4 Run-on Locations with Potential to Combine with Stormwater Discharge

SWPPP Builder Instructions

Complete table by providing the unique sampling location identifier and narrative text location description of run-on sampling locations with potential to combine with stormwater discharge (Figure 3-74).

Section 700.2.5.3.2.4: Run-On Locations With The Potential To Combine With Stormwater Discharge

Location Table	Instructions
TABLE 700.2.5.3.2.4 RUN-ON LOCATIONS WITH THE POTENTIAL TO COMBINE WITH STORMWATER DISCHARGES	
Sampling Location Identifier	Location
▶	▼

Figure 3-74. Section 700.2.5.3.2.4 Run-on Locations with the Potential to Combine with Stormwater Discharge

700.2.5.3.3 Actual Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

- Describe the sampling schedule for monitoring the impacts of stormwater discharges to the sediment-sensitive or other water body.
- Describe the sampling locations for monitoring the impacts of direct stormwater discharges from the project to the sediment-sensitive or other water body.
- To determine potential impairments that originate from off site, include the required text to identify run-on sampling location(s), for projects that, in Section 500.3.1, identified locations of run-on to the Caltrans right-of-way.

SWPPP Builder Instructions

Complete table by providing the unique sampling location identifier and narrative text location description (Figure 3-75).

Section 700.2.5.3.3: Actual Sampling Locations

Fields	Text	Instructions
Complete (4) Fields		
Receiving Water's Upstream Sampling Location Number		
Analytical Parameters for Upstream Receiving Water Sample		
Analytical Parameters for Downstream Receiving Water Sample		
Receiving Water's Downstream Sample Location Number		

Figure 3-75. Section 700.2.5.3.3 Actual Sampling Locations

SWPPP Builder Instructions

Section 700.2.5.3.1 has two separate tabs for information entry: Field and Text (Figure 3-76).

Impaired Receiving Water Body's Name	
Receiving Water Body's Name	

Figure 3-76. Section 700.2.5.3.2 Potential Sampling Locations

Fields Tab: Insert the information, as needed, for:

- Receiving water's upstream sampling location number
- Analytical parameters for upstream receiving water sample
- Analytical parameters for downstream receiving water sample
- Receiving water's downstream sample location number

Text Tab: Insert additional narrative text, as needed, for:

- Monitoring requirements by RWQCB for actual stormwater discharge sampling locations
- Monitoring requirements by RWQCB for actual receiving water sampling locations
- Monitoring requirements by RWQCB for actual run-on sampling locations

Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.3.4 Sampling Schedule

SWPPP Builder Instructions

Insert additional narrative text on the sampling schedule for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.4 Sample Collection and Handling

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general sample collection and handling instructions in General SAP Section 700.2.1.4. If additional requirements are necessary for sample collection and handling, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text on the sample collection and handling for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.4.1 Sample Collection Procedures***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general procedures for sample collection in General SAP Section 700.2.1.4.1.

SWPPP Builder Instructions

Insert additional narrative text on the sample collection for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.4.2 Sample Handling Procedures***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general procedures for sample handling in General SAP Section 700.2.1.4.2.

SWPPP Builder Instructions

Insert additional narrative text on the sample handling procedures for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.4.3 Sample Documentation Procedures***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general procedures for sample documentation in General SAP Section 700.2.1.4.3.

SWPPP Builder Instructions

Insert additional narrative text on the sample documentation procedures for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.5 Sample Analysis

SWPPP GUIDANCE INSTRUCTIONS

Insert parameters and tests to be used into Table 700.2.5.5: Sample Collection, Preservation and Analysis for Monitoring RWQCB required analytical constituents.

SWPPP Builder Instructions

Section 700.2.5.5 has two separate tabs for information entry: Text and Parameter Table.

Text Tab: Provide the additional monitoring required by the RWQCB and additional text monitoring required by the RWQCB in the field sample analysis.

Parameter Table: List the different parameters required to analyze, per RWQCB requirements (Figure 3-77). Provide the parameter, test method, sample preservation, minimum sample volume, sample bottle, maximum holding time, and minimum detection limit for each parameter listed. Use the reference SWPPP guidance instructions.

Section 700.2.5.5: Sample Analysis						
TABLE 700.2.5.5 SAMPLE COLLECTION, PRESERVATION AND ANALYSIS FOR MONITORING [SPECIFY PARAMETERS]						
Parameter	Test Method	Sample Preservation	Minimum Sample Volume(1)	Sample Bottle	Maximum Holding Time	Detection Limit (min)
Metals (Cd, Cu, and Zn)	EPA 6010B/7470A	Store at 4	1 x 250 mL	Polypropylene	6 months	0.1 ug/L
Pesticides/PCBs	EPA 8081A/8082	store at 4 degrees C	1 x 1L	Glass- Amber	7 days	0.1 ug/L
*						

Figure 3-77. Section 700.2.5.5 Sample Analysis

700.2.5.6 Quality Assurance/Quality Control

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general instructions about QA/QC in General SAP Section 700.2.1.6. If additional requirements are necessary for QA/QC, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for QA/QC for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.7 Data Management and Reporting**SWPPP GUIDANCE INSTRUCTIONS**

Refer to general data management and reporting instructions in General SAP Section 700.2.1.7. If additional requirements are necessary for data management and reporting, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for data management and reporting instructions for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.8 Data Evaluation**SWPPP GUIDANCE INSTRUCTIONS**

- Sample results from stormwater discharges shall be evaluated to determine if the concentrations of RWQCB-requested parameters are less than or equal to the applicable water quality standard or limitations set by the RWQCB.
- For receiving waters, the downstream water quality sample analytical results shall be evaluated to determine if the downstream sample(s) show undesirable changes to the levels of the tested constituent relative to the levels found in the upstream sample. The run-on sample analytical results shall be used as an aid in evaluating potential off-site influences on water quality results. If elevated levels of pollutants are identified, additional BMPs must be implemented in an iterative manner to prevent a net increase in pollutants to receiving waters.

SWPPP Builder Instructions

Insert additional narrative text for data evaluation for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.5.9 Change of Condition**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general instructions for changes of conditions in General SAP Section 700.2.1.9. If additional requirements are necessary for Changes of Conditions, then insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for changes of conditions for monitoring required by the RWQCB, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.6 SAP for Monitoring of ATS***SWPPP GUIDANCE INSTRUCTIONS***

- Is an ATS to be deployed on site?
- If no ATS will be deployed, then Sections 700.2.6.1- 700.2.6.9 shall be deleted.

700.2.6.1 Scope of Monitoring Activities

- ATS effluent samples and measurements must be collected from the discharge pipe or another location representative of the nature of the discharge at project sites where an ATS is deployed.
- If additional requirements are necessary for the Scope of Monitoring Activities, then insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for ATS scope of monitoring activities, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.6.2 Monitoring Preparation***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general instructions for monitoring preparation in General SAP Section 700.2.1.2. If additional requirements are necessary for monitoring preparation, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for ATS monitoring preparation, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.6.2.1 Qualified Sampling Personnel***SWPPP GUIDANCE INSTRUCTIONS***

Refer to the general requirements for Qualified Sampling Personnel in General SAP Section 700.2.1.2.1.

SWPPP Builder Instructions

Insert additional narrative text for qualified sampling personnel for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.2.2 Monitoring Supplies**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general information regarding monitoring supplies in General SAP Section 700.2.1.2.2.

SWPPP Builder Instructions

Insert additional narrative text for monitoring supplies for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.2.3 Field Instruments**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general information regarding field instruments in General SAP Section 700.2.1.2.3.

SWPPP Builder Instructions

Insert additional narrative text for field instruments for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.2.4 Testing Laboratory**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the contact information for the testing laboratory found in General SAP Section 700.2.1.2.4.

SWPPP Builder Instructions

Insert additional narrative text for testing laboratory for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.3 Monitoring Strategy

SWPPP GUIDANCE INSTRUCTIONS

- Refer to the general instructions for monitoring strategy in General SAP Section 700.2.1.3. If additional monitoring strategies are necessary, insert additional text in this section.
- Describe the constituents for which stormwater discharge samples must be analyzed.
- Identify the specific chemical/additive used by the ATS on the project site and list the chemical/additive in Table 700.2.6.3.1: ATS Chemical/Additive and Water Quality Indicator Constituents.
- Describe the potential ATS stormwater discharge sampling locations.

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on ATS use and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.6.3.1 Analytical Constituents

SWPPP GUIDANCE INSTRUCTIONS Stormwater discharge samples are to be analyzed for turbidity, pH and residual chemical/additive.

SWPPP Builder Instructions

Section 700.2.6.3.1 has two separate tabs for information entry: Text and Table 700.2.6.3.1.

Text Tab: Provide the additional for ATS analytical constituents.

Parameter Table: List the different ATS chemical/additive used and the associated water quality indicator constituents. Use the reference SWPPP guidance instructions (Figure 3-78).

Section 700.2.6.3.1: Analytical Constituents		
Text	Table 700.2.6.3.1	Instructions
TABLE 700.2.6.3.1 ATS CHEMICAL/ADDITIVE AND WATER QUALITY INDICATOR CONSTITUENTS		
Chemical/Additive		
		Water Quality Indicator Constituent
<input type="checkbox"/>		

Figure 3-78. Section 700.2.6.3.1 Analytical Constituents

700.2.6.3.2 Potential Sampling Locations

SWPPP GUIDANCE INSTRUCTIONS

Provide location identifier(s) and describe the location(s) of ATS stormwater discharge.

SWPPP Builder Instructions

Section 700.2.6.3.2 has two separate tabs for information entry: Text and Location Table.

Location Table: Complete table by providing the unique sampling location identifier and narrative text location description of ATS stormwater discharge locations.

Text Tab: Provide additional text for ATS potential sampling locations (Figure 3-79).

Figure 3-79. Section 700.2.6.3.2 Potential Sampling Locations

700.2.6.3.3 Actual Sampling Locations

SWPPP Builder Instructions

No action required. Automated text will populate the SWPPP based on ATS use and can be viewed in Preview Section 700, when preparing to Print the SWPPP.

700.2.6.3.4 Sampling Schedule

SWPPP GUIDANCE INSTRUCTIONS

The requirements in General SAP Section 700.2.1.3.4 do not apply to ATS sampling.

When ATS is discharging water from the project site, effluent samples shall be collected and analyzed for turbidity, pH and residual chemical/additive on a daily basis. For turbidity and pH, a minimum of three samples shall be collected daily during working hours. Effluent samples for residual chemical/additive shall be collected within one hour of ATS start-up; a minimum of one sample for every 8 hours of ATS operation shall be collected.

SWPPP Builder Instructions

Insert additional narrative text for sampling schedule for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.4 Sample Collection and Handling**SWPPP GUIDANCE INSTRUCTIONS**

Refer to the general sample collection and handling instructions in General SAP Section 700.2.1.4. If additional requirements are necessary for sample collection and handling, insert additional text in this section.

SWPPP Builder Instructions:

Insert additional narrative text for sample collection and handling for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.4.1 Sample Collection Procedures**SWPPP GUIDANCE INSTRUCTIONS**

In addition to the general requirements for Sample Collection Procedures in General SAP Section 700.2.1.4.1, the following procedures apply to ATS sample collection.

- Grab samples shall be collected and preserved in accordance with the methods identified in Table 700.2.6.5: Sample Collection, Preservation and Analysis for ATS Monitoring, found in Section 700.2.6.5.
- Only personnel trained in proper water quality sampling shall collect samples.
- ATS grab samples shall be collected using one of the following methods:
 - Placing a sample bottle directly into the discharge flow and allowing the sample bottle to fill completely
 - Collecting the sample from the valve provided for sample collection

SWPPP Builder Instructions

Insert additional narrative text for sample collection procedures for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.4.2 Sample Handling Procedures

Refer to the general procedures for sample handling in General SAP Section 700.2.1.4.2.

SWPPP Builder Instructions

Insert additional narrative text for sample handling procedures for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.4.3 Sample Documentation Procedures

Refer to the general procedures for sample documentation in General SAP Section 700.2.1.4.3.

SWPPP Builder Instructions

Insert additional narrative text for sample documentation procedures for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.5 Sample Analysis***SWPPP GUIDANCE INSTRUCTIONS***

- Specific chemicals/additives used by the ATS on the project site and water quality indicator constituents are shown in Table 700.2.6.3.1: ATS Chemical/Additive and Water Quality Indicator Constituents.
- List the chemical/additive parameter(s) in Table 700.2.6.5: Sample Collection, Preservation and Analysis for ATS Monitoring.
- Identify test methods to be used on the project in Table 700.2.6.5.
- Insert into Table 700.2.6.5 information regarding sample preservation, minimum sample volume, bottle type, maximum holding time and detection limit.

SWPPP Builder Instructions

Section 700.2.6.5 has three separate tabs for information entry: Fields, Text, and Parameter Table (Figure 3-80).

Section 700.2.6.5: Sample Analysis

Fields Text Parameter Table Instructions

Complete (1) Fields

Specify ATS Chemical/Additive Residue Test Parameters

Figure 3-80. Section 700.2.6.5 Sample Analysis Fields Tab

Fields Tab: Insert the specified ATS chemical/additive residue test parameters

Text Tab: Provide the additional text for ATS sample analysis.

Parameter Table: List the different parameters required to analyze for ATS monitoring (Figure 3-81). Provide the parameter, test method, sample preservation, minimum sample volume, sample bottle, maximum holding time, and minimum detection limit for each parameter listed. Use the reference SWPPP guidance instructions.

Section 700.2.6.5: Sample Analysis						
TABLE 700.2.6.5 SAMPLE COLLECTION, PRESERVATION AND ANALYSIS FOR ATS MONITORING						
Parameter	Test Method	Sample Preservation	Minimum Sample Volume(1)	Sample Bottle	Maximum Holding Time	Detection Limit (min)
Turbidity	Field test with calibrated portable instrument	Store at 4° C (39.2° F)	100 mL	Polypropylene or Glass	48 hours	1 NTU
pH	Field test with calibrated portable instrument	Store at 4° C (39.2° F)	100 mL	Polypropylene	15 minutes	0.2
*						

Figure 3-81. Section 700.2.6.5 Sample Analysis Parameter Table Tab

700.2.6.6 Quality Assurance/Quality Control

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general instructions about QA/QC in General SAP Section 700.2.1.6. If additional requirements are necessary for QA/QC, insert additional text in this section.

SWPPP Builder Instructions

Insert additional narrative text for QA/QC procedures for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.7 Data Management and Reporting

SWPPP GUIDANCE INSTRUCTIONS

Refer to general data management and reporting instructions in General SAP Section 700.2.1.7. If additional requirements are necessary for data management and reporting, insert additional text in this section.

SWPPP Builder Instructions

Section 700.2.6.7 has two separate tabs for information entry: Text and Parameter Table.

Text Tab: Insert additional narrative text for data management and reporting instructions for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

Parameter Table: List the different parameters required to analyze for ATS monitoring (Figure 3-82). Provide the parameter, test method, sample preservation, minimum sample volume, sample bottle, maximum holding time, and minimum detection limit for each parameter listed. Use the reference SWPPP guidance instructions.

Section 700.2.6.7: Data Management and Reporting						
TABLE 700.2.6.7 NELs FOR MONITORING RESIDUAL CHEMICALS AND TURBIDITY						
Parameter	Test Method	Sample Preservation	Minimum Sample Volume(1)	Sample Bottle	Maximum Holding Time	Detection Limit (min)
Residual Chemical	Discharger selected test method meeting LTP requirements (1)	Store at 4 degree C	Per testing method	Per testing method	= < 10%	
Turbidity	Field test with calibrated portable instrument	Store at 4 degree C	100 mL	Polypropylene or glass	48 hours	1
*						

Figure 3-82. Section 700.2.6.7 Data Management and Reporting

700.2.6.8 Data Evaluation

SWPPP GUIDANCE INSTRUCTIONS

The CGP requires an ATS to comply with NELs of 10 NTU for the daily flow weighted average and 20 NTU for any single sample.

SWPPP Builder Instructions

Text Tab: Insert additional narrative text for data evaluation for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

700.2.6.9 Change of Condition

SWPPP GUIDANCE INSTRUCTIONS

Refer to the general instructions for changes of conditions in General SAP Section 700.2.1.9. If additional requirements are necessary for Changes of Conditions, then insert additional text in this section.

SWPPP Builder Instructions

Text Tab: Insert additional narrative text for changes of conditions for ATS monitoring, as needed. If no entry is necessary, leave blank. Automated text will populate the SWPPP based on Risk Level and can be viewed in Preview Section 700, when preparing to print the SWPPP.

SECTION 800

POST-CONSTRUCTION CONTROL PRACTICES

800.1 Post-Construction Control Practices

SWPPP GUIDANCE INSTRUCTIONS

- Post-Construction BMPs are permanent measures installed during construction that are designed to reduce or eliminate pollutant discharges from the site after construction is completed. Caltrans may provide listings, descriptions, and special operations and maintenance requirements for post- construction BMPs in the Stormwater IH, which includes the Stormwater Data Report.
- Provide descriptions of the BMPs employed after all construction stages have been completed at the site (Post-Construction BMPs). Direct reference to the Stormwater Data Report may be made if one is available for the project. Examples of post-construction measures are:
 - Infiltration basins
 - Detention basins
 - Biofiltration strips and/or swales
 - Permanent erosion control, seeding and planting
 - Outlet protection/velocity dissipation devices
 - Earth dikes, drainage swales, and lined ditches;
 - Bridge slope protection
 - Rock slope protection
 -

SWPPP Builder Instructions

Section 800.1 has two separate tabs for information entry: Text and Lists (Figure 3-83).

Section 800.1: Post-Construction Control Practices

Text Lists Instructions

Post-construction BMPs List

Outlet protection/ velocity dissipation devices at all culverts outlets.	Select List
Concrete slope protection in slopes under and adjacent to bridges.	post-construction BMP's
Exposed slopes protected with Erosion Type D.	
Biofiltration strips and swales.	
Infiltration basins.	
*	

Figure 3-83. Section 800.1 Post-Construction Control Practices

Text Tab: Insert additional narrative text in the text area provided, as needed. Otherwise leave blank.

Lists Tab: Use the SWPPP Guidance Instructions to provide the list for post-construction BMPs for the project site. The following are examples of post-construction BMPs for the project site:

- Outlet protection/velocity dissipation devices at all culvert outlets
- Rock slope protection in slopes under and adjacent to all bridges
- Erosion Control Type D seeding on all other slopes; seeded areas will be planted and protected with wood mulch
- Biofiltration strips and swales an infiltration basin

Refer to the SWDR or contract plans for a complete summary and description of post-construction BMPs.

800.2 Post-Construction Operation/ Maintenance

SWPPP GUIDANCE INSTRUCTIONS

- List the parties responsible for long-term O&M of permanent BMPs. One of three alternatives must be included: (1) Caltrans regional maintenance staff; (2) a local agency or municipality; or (3) Caltrans maintenance staff and local agency or municipality (if the project maintenance will be shared or a portion of the project is to be maintained by a local agency). This information may be provided by Caltrans.
- Describe the short- and long-term funding sources for operations and maintenance.
- For a project site that is, or has a portion that is, not under the jurisdiction of the Caltrans Stormwater Management Plan (e.g., encroachment permit projects), the following additional requirements apply on and after September 2, 2012, unless modified by the RWQCB. This information may be provided by Caltrans or the local Agency or private entity administering this project (see Section 100.1 Approval and Certification for local Agency or private entity identification).
 - Include the map and worksheets submitted with the NOI that demonstrate compliance with the Post-Construction Standards of the CGP Section XIII. Describe the non- structural controls to be used, or the structural controls used if it was demonstrated that non-structural controls were infeasible or that structural controls would produce a greater reduction in water quality impacts. Describe the controls used that will replicate the pre- project water balance (defined as the volume of rainfall that ends up as runoff) for the smallest storms up to the 85th percentile storm event (or the smallest storm event that generates runoff, whichever is larger).
 - Describe how the volume that cannot be addressed using nonstructural practices shall be captured in structural practices. Include documentation of approval by the RWQCB.
- Summarize the infeasibility of using non-structural practices on the project site, or the documentation that there will be fewer water quality impacts through the use of structural practices.

SWPPP Builder Instructions

Section 800.2 has two separate tabs for information entry: Text and Fields (Figure 3-84).

Section 800.2: Post-Construction Operation/Maintenance		
Fields	Text	Instructions
Complete (3) Fields		
Language Describing Short-Term Funding Source	Caltrans District 11 Maintenance	
Language Describing Long-Term Funding Source	Caltrans District 11 Maintenance	
Responsible party for long term maintenance on post-construction BMPs (Enter One of Three Alternatives Listed in the Section Instructions)	Caltrans District 11 Maintenance	

Figure 3-84. Section 800.2 Post Construction Operation/Maintenance

Fields Tab: Provide the list of parties responsible for long-term maintenance and the short- and long-term funding for the maintenance of the post-construction BMPs. Refer to the example provided in the figure above.

Text Tab: Provide narrative text that describes the short- and long-term funding and maintenance. If needed, enter additional language provided by Caltrans or Local agency or private entity administering the project.

SECTION 900

SWPPP REPORTING REQUIREMENTS

SWPPP Builder Instructions

No action required for Section 900. Automated text will populate the SWPPP and can be viewed in Preview Section 900 when preparing to print the SWPPP. Below is the automated text that is provided.

900.1 Recordkeeping

SWPPP GUIDANCE INSTRUCTIONS to manage the various documents required by the SWPPP and to provide easy access to the documents, the following SWPPP file categories will be used to file SWPPP compliance documents:

File Category 20.01.....	Stormwater Pollution Prevention Plan (SWPPP)
File Category 20.02.....	SWPPP Amendments
File Category 20.03.....	Water Pollution Control Schedule Updates
File Category 20.05.....	NOI
File Category 20.06.....	LRP or Authorization of AS
File Category 20.10.....	Correspondence
File Category 20.21.....	Subcontractor Contact Information and Notification Letters
File Category 20.22.....	Material Supplier Contact Information and Notification Letters
File Category 20.23.....	Contractor Personnel Training Documentation
File Category 20.31.....	Contractor Stormwater Site Inspection Reports
File Category 20.32.....	Caltrans Stormwater Site Inspection Reports
File Category 20.33.....	Site Visual Monitoring Inspection Reports
File Category 20.34.....	Monthly Stormwater BMPs and Materials Inventory Reports
File Category 20.35.....	Corrective Actions Summary
File Category 20.40.....	Weather Monitoring Logs
File Category 20.51.....	Non-Visible Pollutant Sampling and Test Results
File Category 20.52.....	Turbidity, pH and SSC Sampling and Test Results
File Category 20.53.....	Required Regional Water Board Monitoring Sampling and Test Results

File Category 20.54	ATS Monitoring Sampling and Test Results
File Category 20.55	Field Testing Equipment Maintenance and Calibration Records
File Category 20.61	Notice of Discharge Reports
File Category 20.62	NAL Exceedance Reports
File Category 20.63	NEL Violation Reports
File Category 20.70	Annual Certification of Compliance
File Category 20.80	Stormwater Annual Reports
File Category 20.90	Notice of Termination

Records shall be retained for a minimum of three years for the following items:

- Authorized SWPPP document and amendments
- Stormwater Site Inspection Reports
- Corrective Action Summary Reports
- REAPs
- Notice of Discharge Reports
- NAL Exceedance Reports
- NEL Violation Reports
- Sampling records and analysis reports
- Annual Compliance Certifications
- Copies of all applicable permits

900.2 *Stormwater Annual Report*

A Stormwater Annual Report will be prepared for this project to document the stormwater monitoring information and training information.

The stormwater monitoring information listed below shall be included in the Stormwater Annual Report.

- A summary and evaluation of all sampling and analysis results, including copies of laboratory reports.
- The analytical method(s), method reporting unit(s), and method detection limit(s) of each analytical parameter.
- A summary of all corrective actions taken during the compliance year.
- Identification of any compliance activities or corrective actions that were not implemented.
- A summary of all violations of the CGP.
- The names of individual(s) who performed site inspections, sampling, site visual monitoring inspections and/or measurements.
- The date, place, and time of site inspections, sampling, site visual monitoring inspections, and/or measurements, including precipitation (rain gauge).
- Any site visual monitoring inspection and sample collection exception records.
- The stormwater training information listed below shall be included in the Stormwater Annual Report.
- Documentation of all training for individuals responsible for all activities associated with compliance with the CGP.
- Documentation of all training for individuals responsible for BMP installation, inspection, maintenance, and repair.
- Documentation of all training for individuals responsible for overseeing, revising and amending the SWPPP

900.3 *Discharge Reporting*

Discharges will be reported to the RE verbally upon discovery and in writing within 24 hours of occurrence or discovery or as required in the Special Provisions. A Notice of Discharge form for reporting discharges shall be included in Appendix K and completed forms shall be kept in File Category 20.61: Notice of Discharge Reports.

- Note: USEPA has issued regulations that define Reportable Quantity (RQ) levels for oil and hazardous substances. These regulations are found in the CFR at 40 CFR Part 110, Part 117, or Part 302.

900.4 *Regulatory Agency Notice or Order Reporting*

Regulatory agency notices or orders will be reported to the RE verbally upon receiving the notice or order. A written report with a copy of the notice or order shall be submitted to the RE within three days of receiving a notice or order.

900.5 *Illicit Connection/Illegal Discharge Reporting*

If the Contractor discovers an illicit connection or illegal discharge during a stormwater site visual monitoring site inspection or while performing work on the project, the RE shall be notified verbally upon discovering the illicit connection or illegal discharge. A written report about the illicit connection or illegal discharge shall be submitted to the RE within three days of discovering the illicit connection or illegal discharge. The RE will follow up with the District NPDES Coordinator for additional inspection and elimination.

3.4 SWPPP Attachments

3.4.1 Attachment A: LRP Authorization of Approved Signatory

The CGP Section VII B. SWPPP Certification Requirements states that the LRP shall list in the SWPPP, the name of the AS, and provide a copy of the written agreement or other mechanism that provides the authority from the LRP in the SWPPP. For Caltrans projects, the written agreement from the District Director authorizing the RE to be an AS is Form CEM-2006 LRP Authorization of AS. Request a copy of completed form CEM-2006 from the RE and include it in Attachment A. For projects subject to LTCGP, use CEM 2006-T and include it in Attachment A.

For non-Caltrans projects, the Local Agency must provide written agreement for LRP Authorization of AS. Caltrans does not allow the LRP for a Private Entity to delegate responsibility to an AS.

If the LRP has not authorized an AS then the following statement should be included in Attachment A.

"The LRP for this project is:

Name

Title

There is no Approved Signatory for this project."

Include one of the following in Attachment A:

- Form CEM-2006 LRP Authorization of AS.
- Local Agency written agreement for LRP Authorization of AS.
- LRP statement that there is no Approved Signatory for the project.

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

Both CEM2006 and CEM-2006T (for LTCGP projects) are optional forms; the RE will determine their applicability for the contract.

3.4.2 Attachment B: NOI

For Caltrans projects, a copy of the NOI and the WDID Number issued for the project should be requested from the RE for the project.

For non-Caltrans projects, the Local Agency or Private Entity administering the project should have submitted a NOI for the project to the SWRCB. This attachment will need to be left blank for the original submittal until the SWPPP is authorized and WDID number is received from SWRCB. A copy of the NOI and the WDID Number issued for the project should be requested from the RE for the project.

Include in Attachment B the NOI and WDID Number.

3.4.3 Attachment C: Risk Level Determination

The CGP contains a risk-based permitting approach by establishing three levels of risk possible for a construction site. Risk level (RL) is calculated in two parts: 1. project sediment risk, and 2. receiving water risk. The RL determination quantifies sediment and receiving water characteristics and uses these results to determine the overall site RL, defined as either Level 1, 2 or 3. Level 3 is the highest RL and requires more extensive monitoring and reporting compared to Level 1. The complete methodology used by Caltrans for determining the RL for a project is available at:

<http://www.dot.ca.gov/hq/oppd/stormwtr/risk-guidance.htm>

The project Risk Level determination will be provided by Caltrans for inclusion in Attachment C to the SWPPP.

- Include in Attachment C a copy of the project Risk Level determination.

3.4.4 Attachment D: Vicinity Map and Site Map

Include both a vicinity and site map in the SWPPP.

- The Vicinity Map shall be an 8-1/2" x 11" color copy of a USGS map or equal, and shall extend approximately one-quarter mile beyond the property boundaries of the construction site (an 11" x 17" may be used if needed). Insert the vicinity map as Attachment D and place a reference in Section 300.4. The Office of Water Programs, Water Quality Planning Tool website can be used to obtain images of USGS topographic maps by selecting the 'Post Miles' option on the webpage at:
<http://stormwater.water-programs.com/>
- To meet the site map requirement, insert a reduced copy (8-1/2" x 11" or 11" x 17") of the project's Title Sheet in Attachment D.

The vicinity map shall show:

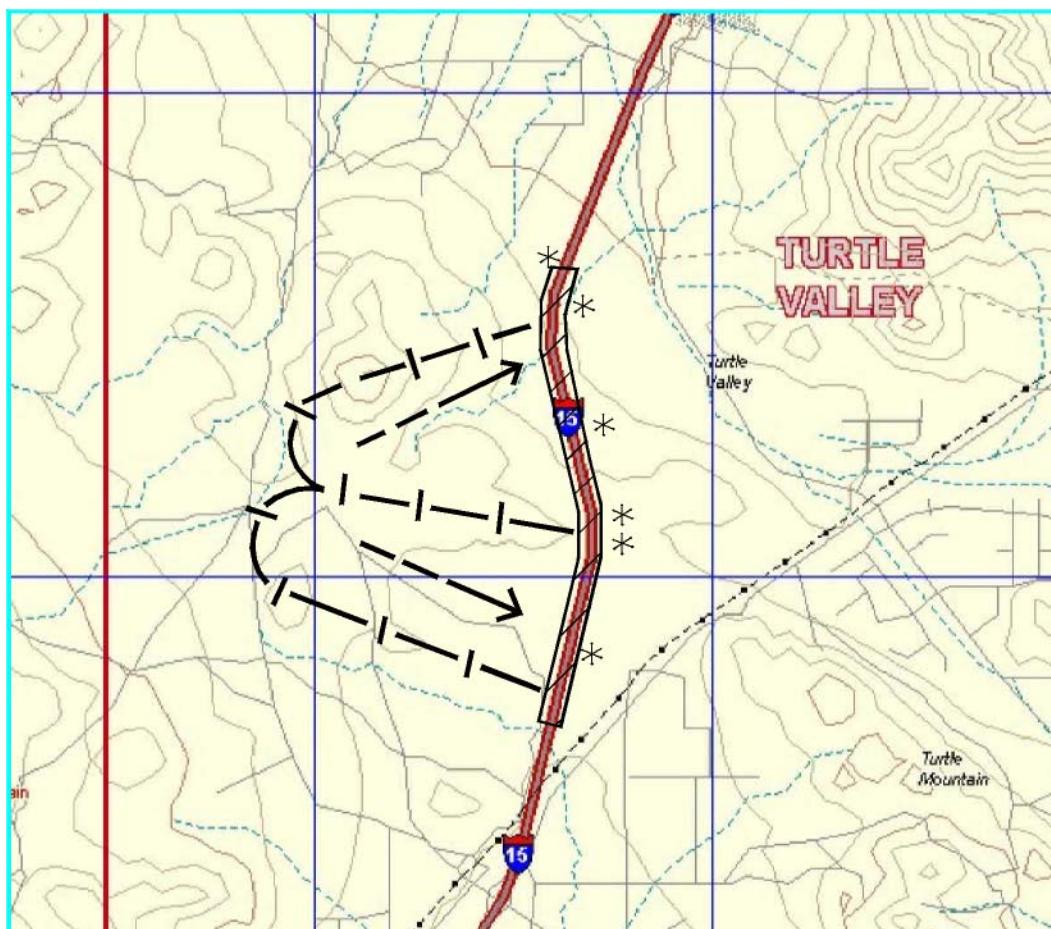
- Easily identifiable major roadways
- Geographic features or landmarks
- Water bodies within or adjacent to the construction limits
- Construction site perimeter
- Staging areas and storage yards
- Known wells
- Outline of the off-site drainage area(s) that discharge into the construction site
- Identification of anticipated discharge location(s) where the stormwater from the construction site discharges to a municipal separate storm sewer system or other water body
- General topography

Attachment D Vicinity Map

SAMPLE VICINITY MAP

FOR

THE CONSTRUCTION ON STATE HIGHWAY 15
IN SAN BERNARDINO COUNTY NEAR BARSTOW
FROM 1.5 miles NORTH OF POWERLINE ROAD
OVERCROSSING TO WILDWASH BRIDGE



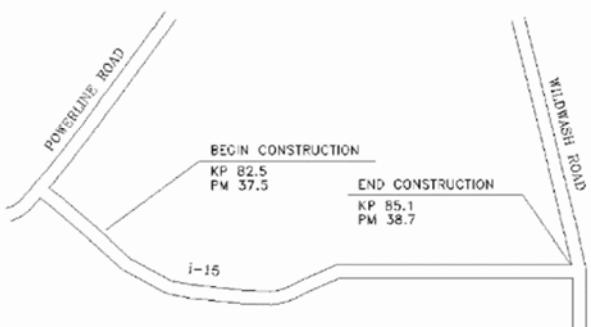
LEGEND:

- PROJECT AREA
- * DISCHARGE POINTS
- OFFSITE DRAINAGE AREAS
DISCHARGING ON TO SITE



Attachment D

Site Map Sample

<p>STATE OF CALIFORNIA DEPARTMENT OF TRANSPORTATION</p> <p>PROJECT PLANS FOR CONSTRUCTION ON STATE HIGHWAY</p> <p>IN SAN BERNARDINO COUNTY NEAR BARSTOW</p> <p>FROM 1.5 miles NORTH OF POWERLINE ROAD OVERCROSSING TO WILDWASH BRIDGE</p> <p>To be supplemented by Standard Plans dated July, 1996</p>													
													
													
<small>The State of California or its officers or agents shall not be responsible for the accuracy or completeness of electronic copies of site plan sheet.</small>													
													
<p>SWPPP SITE MAP</p> <table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 25%;">Project Number:</td> <td style="width: 25%;">Contract No.:</td> <td style="width: 25%;">Date:</td> <td style="width: 25%;">Prepared by:</td> </tr> <tr> <td>Project Number: 00-00000</td> <td>Contract No. 00-00000B</td> <td>Date: 00-00-0000</td> <td>Prepared by: 00-00-0000</td> </tr> </table>						Project Number:	Contract No.:	Date:	Prepared by:	Project Number: 00-00000	Contract No. 00-00000B	Date: 00-00-0000	Prepared by: 00-00-0000
Project Number:	Contract No.:	Date:	Prepared by:										
Project Number: 00-00000	Contract No. 00-00000B	Date: 00-00-0000	Prepared by: 00-00-0000										
<small>The Contractor shall possess the Class (or classes) of license as specified in the "Notice to Contractors".</small>													
<small>Form DC-01-02-PP (Rev. 3/90)</small>													
<small>FOR REDUCED PLAN ORIGINAL SCALE 1:10 IN MILLIMETERS</small>													
<small>0 20 40 60 80</small>													
<small>LEAVE BLANK FOR FILE - NO DRAWINGS</small>													
<small>CU 00000 EA 00000</small>													

3.4.5 Attachment E: Contractor Personnel Stormwater Training

A summary of formal stormwater training for the project manager/superintendent, WPC Manager, QSP, stormwater inspector, stormwater discharge sampler and tester, and their respective alternates, as well as other employees responsible for BMP installation, maintenance and repair and all contractor employees must be included in Attachment E. Use Caltrans Form CEM-20DCON.

For subcontractors a summary of formal stormwater training, for subcontractor foreman and all subcontractor employees responsible for BMP installation, maintenance and repair must be included in Attachment E. Use Caltrans Form CEM-20DSUB.

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

3.4.6 Attachment F: Other Plans/Permits/Agreements

Include in Attachment F a copy of the Caltrans Permit CAS000003. Caltrans Permit is available at:

http://www.waterboards.ca.gov/water_issues/programs/stormwater/caltrans.shtml

Include in Attachment F a copy of the CGP CAS000002 and associated amendments (Orders No. 2010-0014-DWQ and No. 2012-0006-DWQ) and appropriate CGP Attachment C, D or E based on project risk level, or

If the project is subject to the LTCGP, Include the latest adopted LTCGP Order No. RGT-2011-0019 NPDES No. CAG616002.

Include in Attachment F copies of other local, state, and federal plans, permits, and agreements. Other plans, permits, and agreements shall be listed in Section 400 of the SWPPP. Example plans, permits and agreements include:

- RWQCB Waiver of CWA Section 401 Water Quality Certification
- USACOE, CWA Section 404, Nationwide Permit 26-authorization letter
- California Department of Fish and Wildlife (DFW) Streambed Alteration
- General Dewatering Permit issued by a RWQCB

3.4.7 Attachment AA: SWPPP Amendments

When changes in the authorized SWPPP are required, the contractor's WPC Manager shall prepare changes to the SWPPP. Amendments to the SWPPP require the following:

- The WPC Manager shall certify SWPPP amendments.
- The contractor shall certify SWPPP amendments and submit them to the RE for review and acceptance.
- The SWPPP Amendment Certification and Acceptance form shall be used as the cover sheet for each amendment. A copy of the form is shown in SWPPP Appendix A.
- All amendments shall be recorded in the SWPPP amendment log in Attachment AA.
- Accepted amendments should be inserted into the appropriate SWPPP Section or Attachment when possible and a copy shall be kept in Attachment AA.
- When an amendment to the SWPPP is accepted by the LRP, or RE if authorized AS, form CEM-2008 SWPPP/WPCP Amendment Certification and Authorization shall be attached to the SWPPP amendment and inserted into Attachment AA.

All accepted SWPPP amendments shall be shown on CEM-2009 SWPPP/WPCP Amendment Log form in Attachment AA. The amendment log shall include:

- Amendment number
- Date
- Brief description of the amendment
- Requested by
- Amendment approval date

Caltrans form CEM-2009 SWPPP/WPCP Amendment Log shall be used to record SWPPP amendments.

Include in Attachment AA the following:

- Form CEM- 2009 SWPPP/WPCP Amendment Log. Enter the project name, Caltrans contract number, Caltrans project identifier number. For non-Caltrans projects, enter the encroachment permit number in the contract number box.

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

3.4.8 Attachment BB: WPCDs

The WPCDs are the component of the project SWPPP that show the necessary BMPs by project phase/stage for the project to be in compliance with the Construction General Permit. The Caltrans Permit states: "The SWPPP shall apply to all areas that are directly related to the construction activity, including but not limited to staging areas, storage yards, material borrow areas and storage areas, access roads, etc., whether or not they reside within the Caltrans rights-of-way." The WPCDs shall reflect the Contractor's phasing and/or construction staging, and shall address the entire scope of the contract work.

The construction activity phases that the WPCDs should address in the SWPPP are the Preliminary Phase, Grading Phase, Highway Construction Phase, and the Highway Planting/Erosion Control Establishment Phase. These phases are defined below.

3.4.8.1 Preliminary Phase (Pre-Construction Phase – Part of the Grading Phase)

Construction stage, including rough grading or disking, clearing and grubbing operations, or any soil disturbance prior to mass grading.

3.4.8.2 Grading Phase

Includes reconfiguring the topography for the highway including; excavation for roadway and necessary blasting of hard rock, highway embankment construction (fills); mass grading, and stockpiling of select material for capping operations.

3.4.8.3 Highway Construction Phase

Highway construction phase includes both highway and structure construction. Highway construction includes final roadway excavation, placement of base materials and highway paving, finish grading, curbs, gutters and sidewalks, public utilities, public water facilities including fire hydrants, public sanitary sewer systems, storm drain systems and/or other drainage improvements, highway lighting, traffic signals and/or other highway electrical work, guardrail, concrete barriers, sign installation, pavement markers, traffic stripping and pavement markings. Structure construction includes structure footings, bridges, retaining walls, major culverts, overhead sign structures and buildings.

3.4.8.4 Highway Planting/Erosion Control Establishment Phase

Highway planting including clearing and grubbing operations, soil preparation (grading, incorporation of soil amendments, placement of topsoil), irrigation (trenching, installation, trench backfilling), minor grading (top dressing, fine grading lawn and ground cover areas), hardscaping, planting (seeding and planting of plants), mulch (application of wood chips or other mulches) and plant establishment (weeding, plant replacement and if needed: fertilizer application, irrigation maintenance, reapplication of mulch). Erosion control includes placement of permanent erosion control materials and maintenance of temporary sediment controls during the erosion control establishment period.

The WPCDs for the grading phase and highway construction phase may need to show different stages to completely identify all required BMPs. The stage construction sheets of the project plans may be used as base sheets for the WPCDs when staging is required.

The WPCDs provide field staff with the information on where to install BMPs so that they are effective. The WPCDs, Water Pollution Control Best Management List and Water Pollution Control Schedule provide the necessary tools for a contractor to plan and implement BMPs to meet the requirements of the project SWPPP.

Prepare WPCDs in conformance with the following instructions and requirements. The WPCDs shall be no smaller than the “reduced plans” (approximately 11”x17”) issued by Caltrans.

- The WPCDs shall show locations for the BMPs that will be used.
- Include cover sheet(s) listing the BMPs that will be used along with the associated BMP symbols used on the WPCDs. Standard symbols and line types are shown in this Manual, Appendix B.
- Temporary WPC details are included in the applicable Standard Plans, contract plans and Attachment BB.
- Additional details may be necessary to describe site-specific BMP applications. BMP details other than the ones shown in the contract plans and Standard Plans shall be submitted to the RE for approval.

Use project layout, grading, stage construction, drainage sheets and/or erosion sheets as base sheets for the WPCDs. Use Section 500.1.2 as a guide to identify pollutant sources and BMPs for construction activities. Select BMPs that are appropriate for the site and show their locations on the WPCDs. The base sheets shall show the construction project in detail, including:

- The construction site perimeter
- Geographic features within or immediately adjacent to the site. Include surface waters such as lakes, streams, springs, wetlands, estuaries, ponds, and the ocean
- Site topography before and after construction. Include roads, paved areas, buildings, slopes, drainage facilities, and areas of known or suspected contamination
- Permanent (post-construction) BMPs. These are usually shown on the contract plans.

The CSMP requires information for stormwater and non-stormwater monitoring be shown on the WPCDs. See Caltrans *Construction Site Monitoring Program Guidance Manual* for required information to be shown on WPCDs. Delineate the following site information on the WPCDs:

- Discharge points from the project to site storm drain systems or receiving waters
- Tributary areas and drainage patterns across the project area (show using flow arrows) into each onsite stormwater inlet or receiving water
- Tributary areas and drainage patterns to each onsite stormwater inlet, receiving water or discharge point

- Off-site tributary drainage areas that generate run-on to the project. (Where off-site tributary drainage areas are too large to depict on the drawings, use map notes or inserts illustrating the upstream drainage areas)
- Temporary onsite drainage(s) to carry concentrated flows
- Drainage patterns and slopes anticipated after major grading activities are completed;
- Outline all areas of existing vegetation, soil cover, or native vegetation that will remain undisturbed during the project
- Outline all areas of soil disturbance, DSAs
- Identify location(s) of contaminated or hazardous soils
- Locate potential non-stormwater discharges and activities, such as dewatering operations, concrete saw-cutting or coring, pressure washing, waterline flushing, diversions, cofferdams, and vehicle and equipment cleaning. If operations can't be located, provide a narrative description

Show proposed locations of all construction site BMPs on the WPCDs. Include additional detail drawings if necessary to convey site-specific configurations.

- Show temporary soil stabilization and temporary sediment control BMPs that will be used during construction. Include temporary onsite drainage(s) to carry concentrated flows, BMPs implemented to divert off-site drainage around or through the construction site, and BMPs that protect stormwater inlets
- Locate site ingress and egress points and any proposed temporary construction roads
- Show BMPs to mitigate or eliminate non-stormwater discharges
- Show BMPs for waste management and materials pollution control, including, but not limited to storage of soil or waste; construction material loading, unloading, storage and access areas; and areas designated for waste handling and disposal
- Show BMPs for vehicle and equipment storage, fueling, maintenance, and cleaning

Sample WPCDs are shown on the following pages.

Attachment BB

WPCDs Example 1

WATER POLLUTION CONTROL DRAWINGS (WPCDs)
FOR
ROUTE BB

STAGE 1
ANYTOWN, ANY COUNTY
CALTRANS CONTRACT NO. 00-00000

PREPARED BY:
ZZZ CONSTRUCTION COMPANY

SAMPLE WPCD NOTE: DO NOT SIMPLY COPY THE FOLLOWING NOTES FOR PROJECT SPECIFIC USE. COPYING TEXT FROM THESE SAMPLE WPCDs DOES NOT NECESSARILY MEET NPDES PERMIT REQUIREMENTS. USE PROJECT SPECIFIC NOTES.

LEGEND

 CWM	WM-8 Concrete Waste Management
 SC-10	Storm Drain Inlet Protection
 ESA	Environmentally Sensitive Area
	Surface Flow Direction
	Pipe/Underground Flow Direction
	NS-8 Vehicle & Equipment Cleaning
	NS-9 Vehicle & Equipment Fueling
	NS-10 Vehicle & Equipment Maintenance
	SS-2 Preservation of Existing Vegetation
	SS-4 Hydroseeding
	SS-6 Straw Mulch
	SS-5 Soil Binders
	Permanent Seeding
	TC-1 Stabilized Construction Entrance/Exit
	SS-11 Slope drains
	SS-9 Earth Dike/Drainage Swales and Lined Ditches
	SC-4 Check Dams
	SC-1 Silt Fences
	SC-3 Sediment Traps
	SC-5 Fiber Rolls
	SC-8 Sandbag Barrier
	Stormwater Discharge Location

GENERAL WATER POLLUTION CONTROL NOTES

- THE INFORMATION ON THESE DRAWINGS ARE ACCURATE FOR WATER POLLUTION CONTROL PURPOSES ONLY.
- THE INFORMATION ON THIS PLAN IS INTENDED TO BE USED AS A GUIDELINE FOR THE CONTRACTOR AND SUBCONTRACTORS TO INSTALL WATER POLLUTION CONTROL DEVICES AT GENERAL LOCATIONS THROUGHOUT THE SITE. THESE DRAWINGS ARE TO BE USED IN CONJUNCTION WITH THE NARRATIVE SECTION OF THE STORM WATER POLLUTION PREVENTION PLAN (SWPPP).
- FIELD CONDITIONS MAY NECESSITATE MODIFICATIONS TO THESE DRAWINGS.
- PERMANENT EROSION CONTROL WILL BE INSTALLED AS AREAS ARE DETERMINED TO BE SUBSTANTIALLY COMPLETE.

STORM WATER POLLUTION CONTROL CONSTRUCTION NOTES:

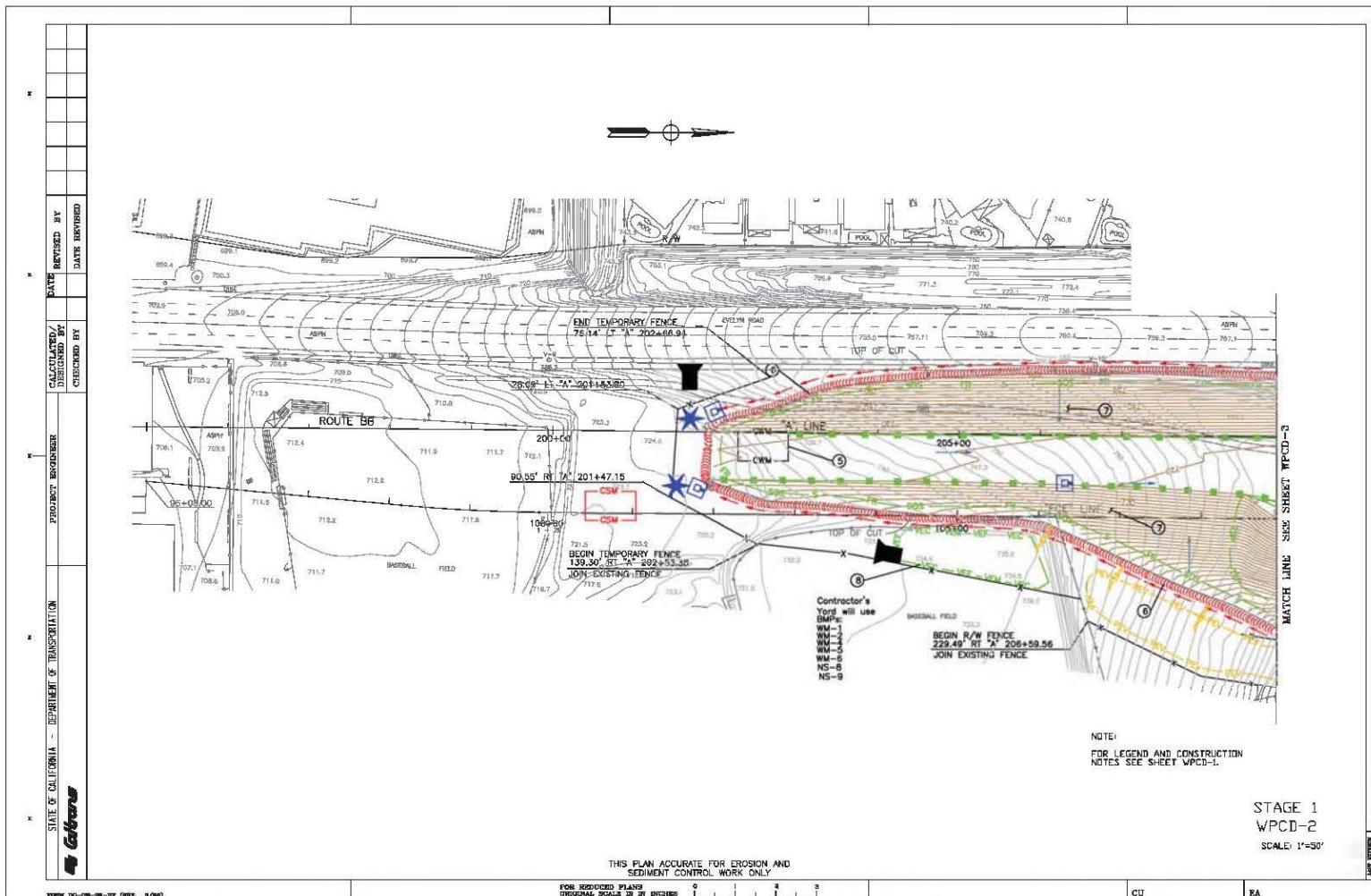
- Rock check dams.
- Gravel bag check dams
- Install hydroseeding BMP's SS-4
- Contractor proposed alternate concrete washout detail, Type-1 Below Ground. See WPCD-14 for detail.
- Contractor proposed alternate concrete washout detail, Type-2 Above Ground. See WPCD-14 for detail.
- Earth berms installed during excavation staging.
- Surface roughening required on all slope areas before applying soil binders (on active slope or roadway) and/or straw mulch (on inactive slopes only). Inactive slopes greater than 60 feet in height will be hydroseeded.
- Temporary slope drain without energy dissipation.
- Combined Vehicle Cleaning, Fueling and Maintenance area.

WPCD-1

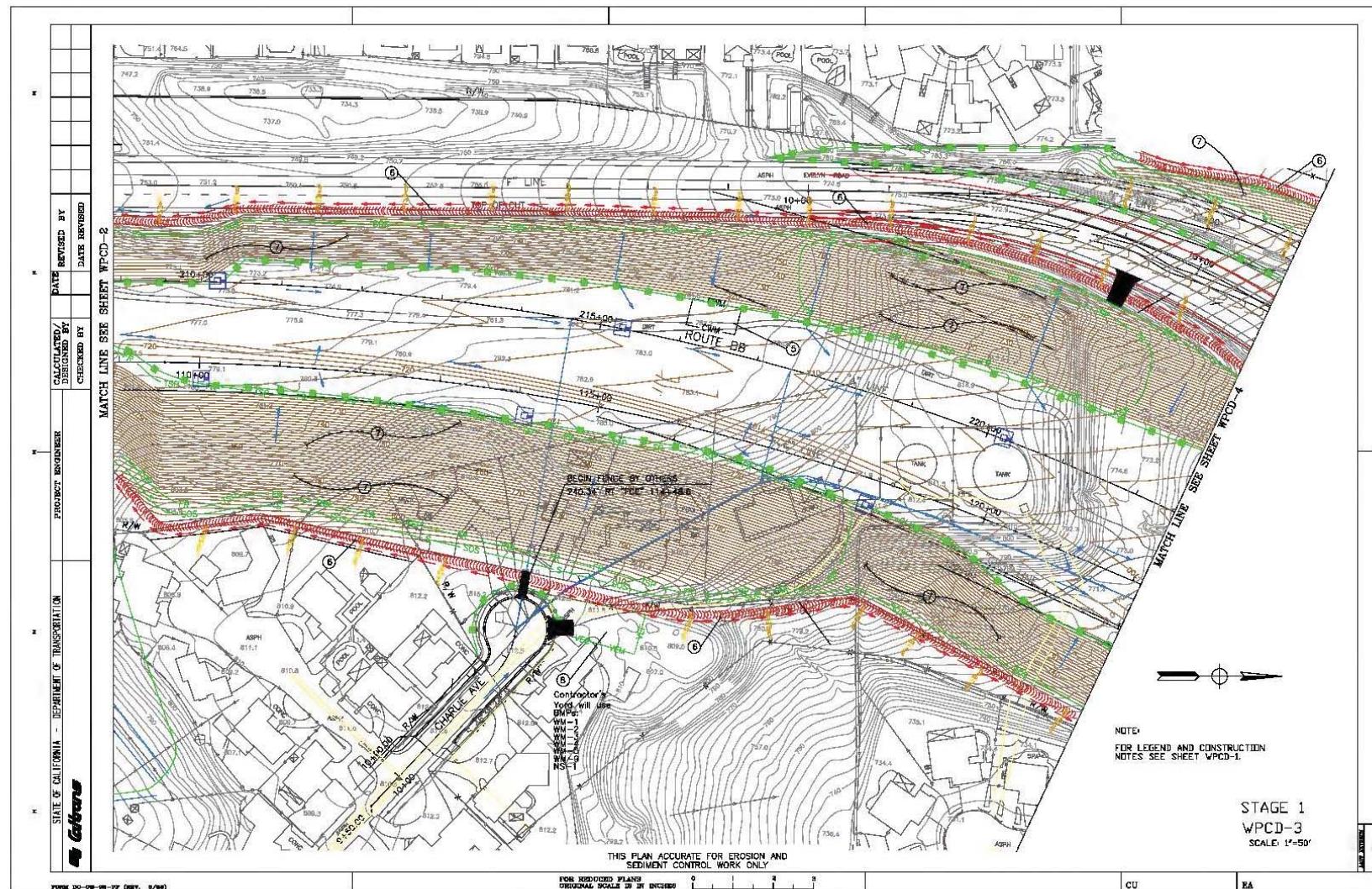
ZZZ CONSTRUCTION COMPANY	WATER POLLUTION CONTROL DRAWINGS TITLE SHEET			
DRAWN D.J.D.	SCALE NONE	DATE 11/00	REV 0	sheet 1 of 14
APPROVED				

Attachment BB

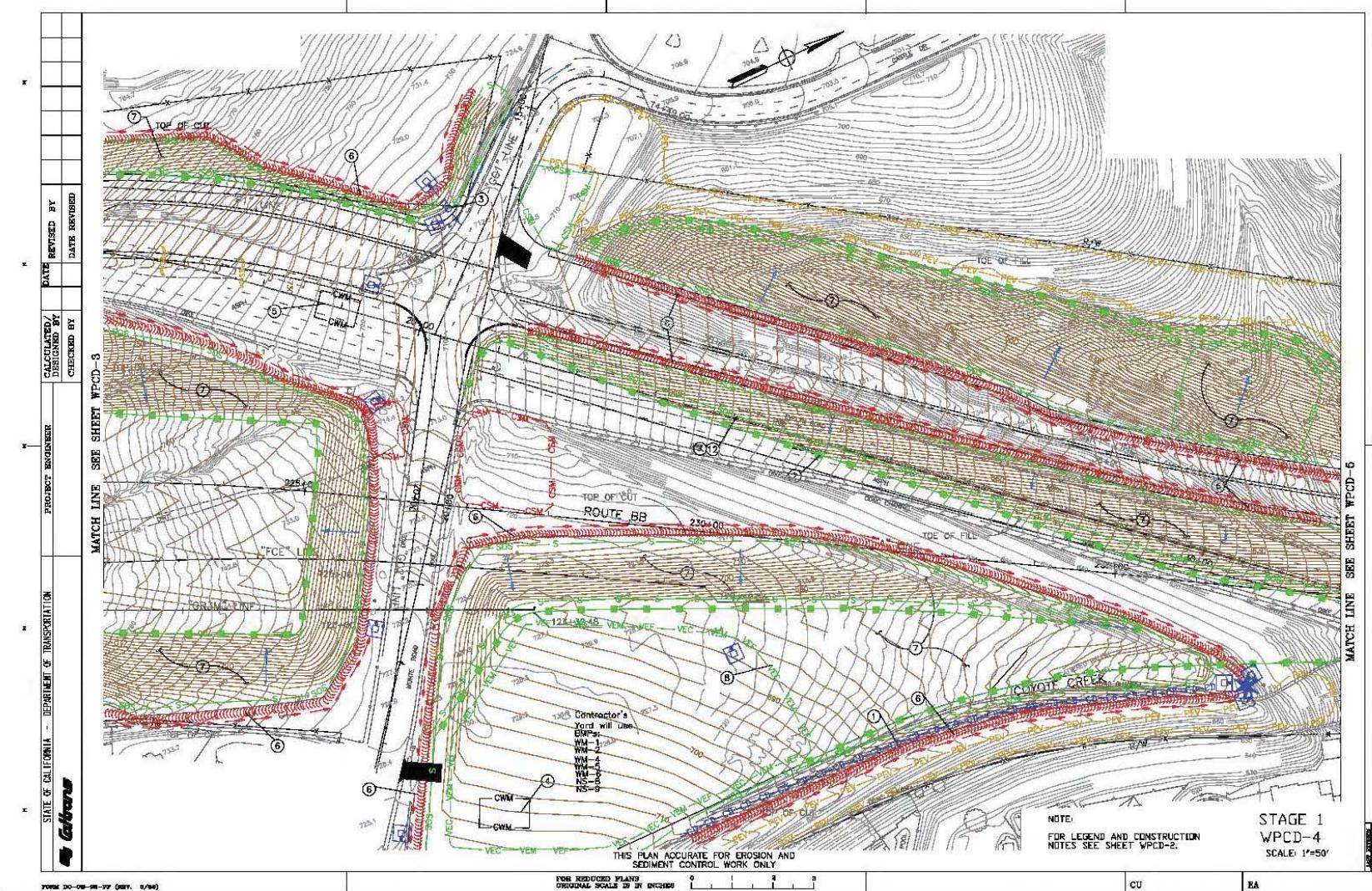
WPCDs Example 2



Attachment BB WPCDs Example 3

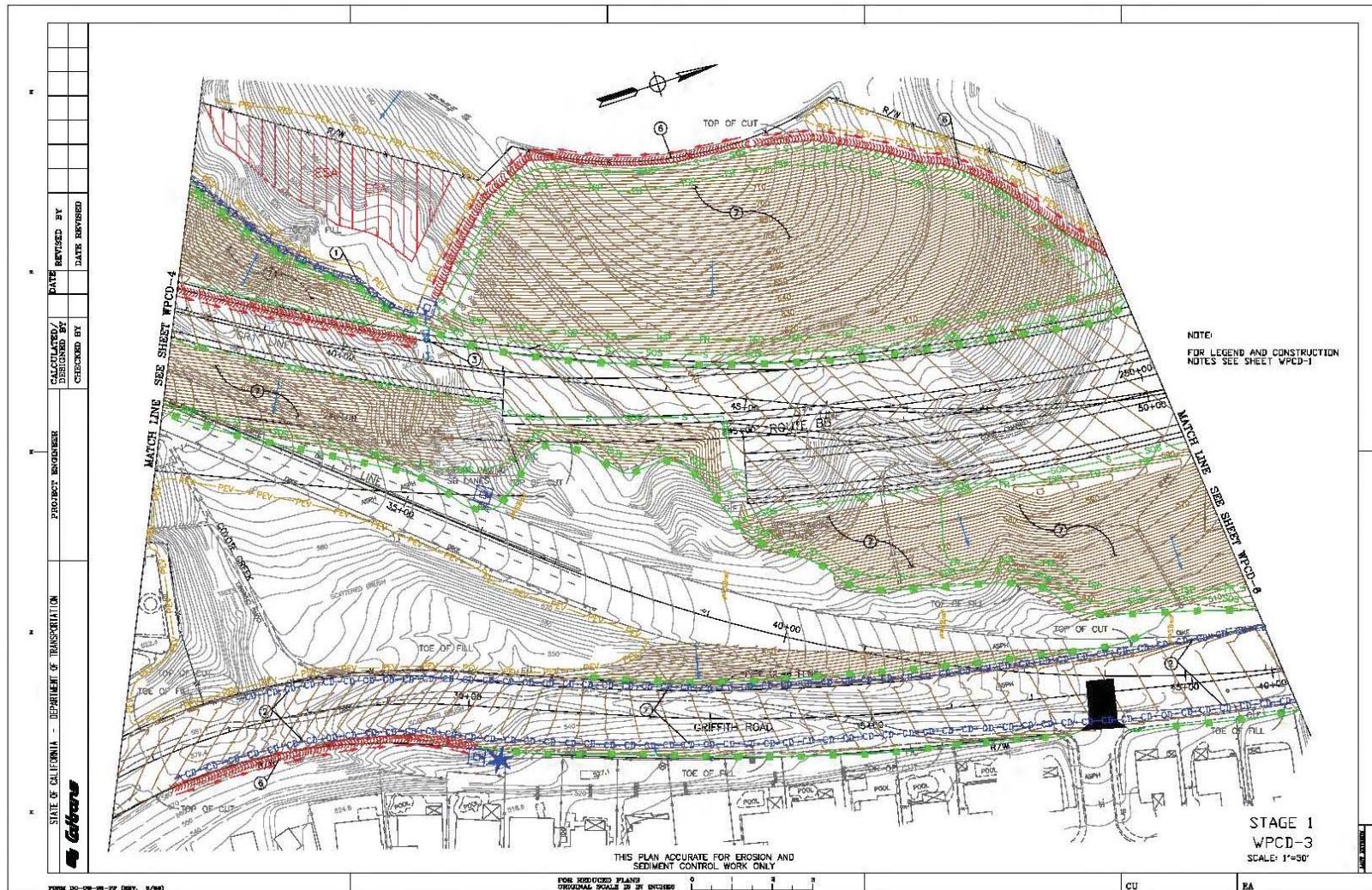


Attachment BB WPCDs Example 4

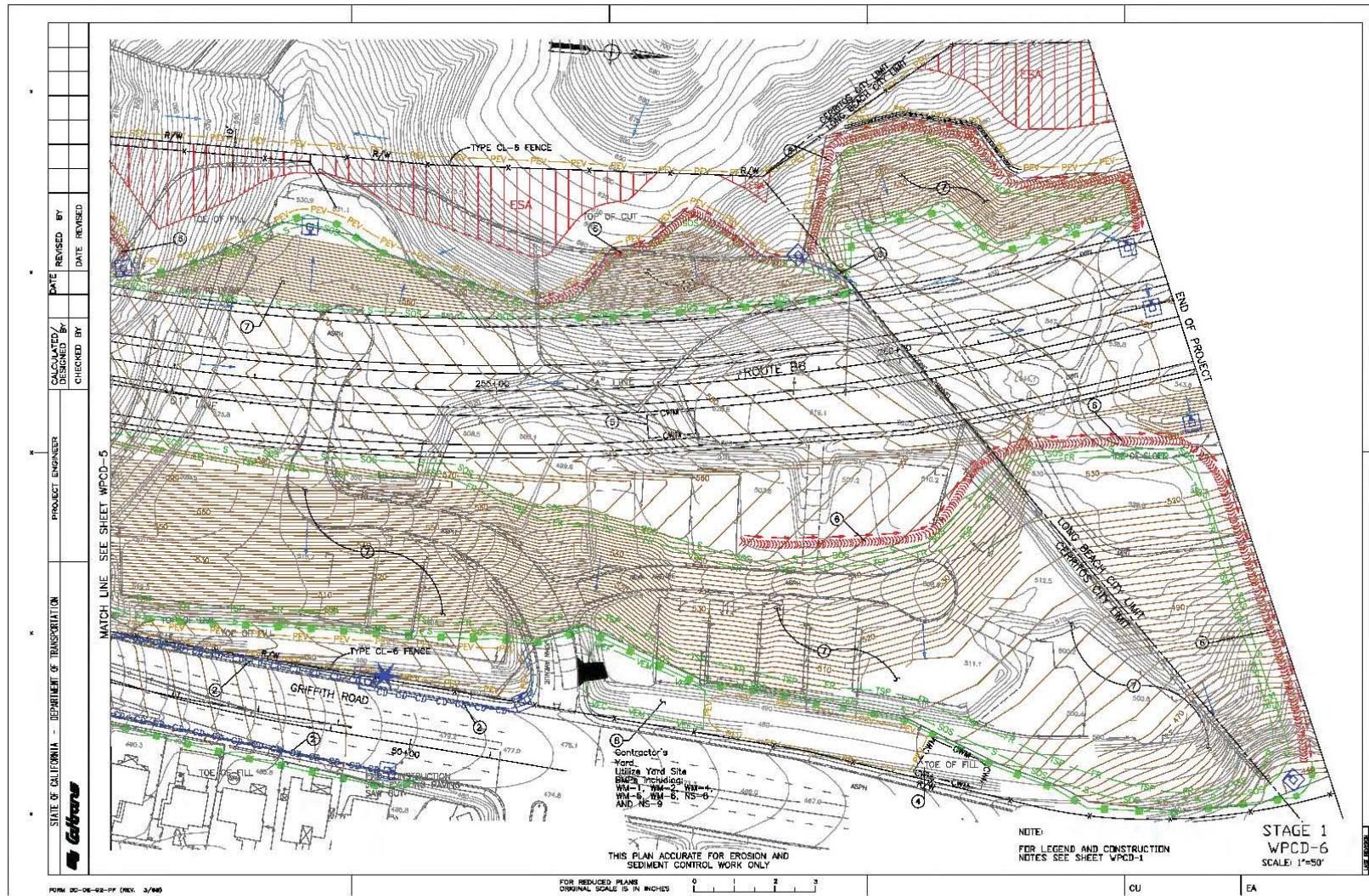


Attachment BB

WPCDs Example 5



Attachment BB WPCDs Example 6



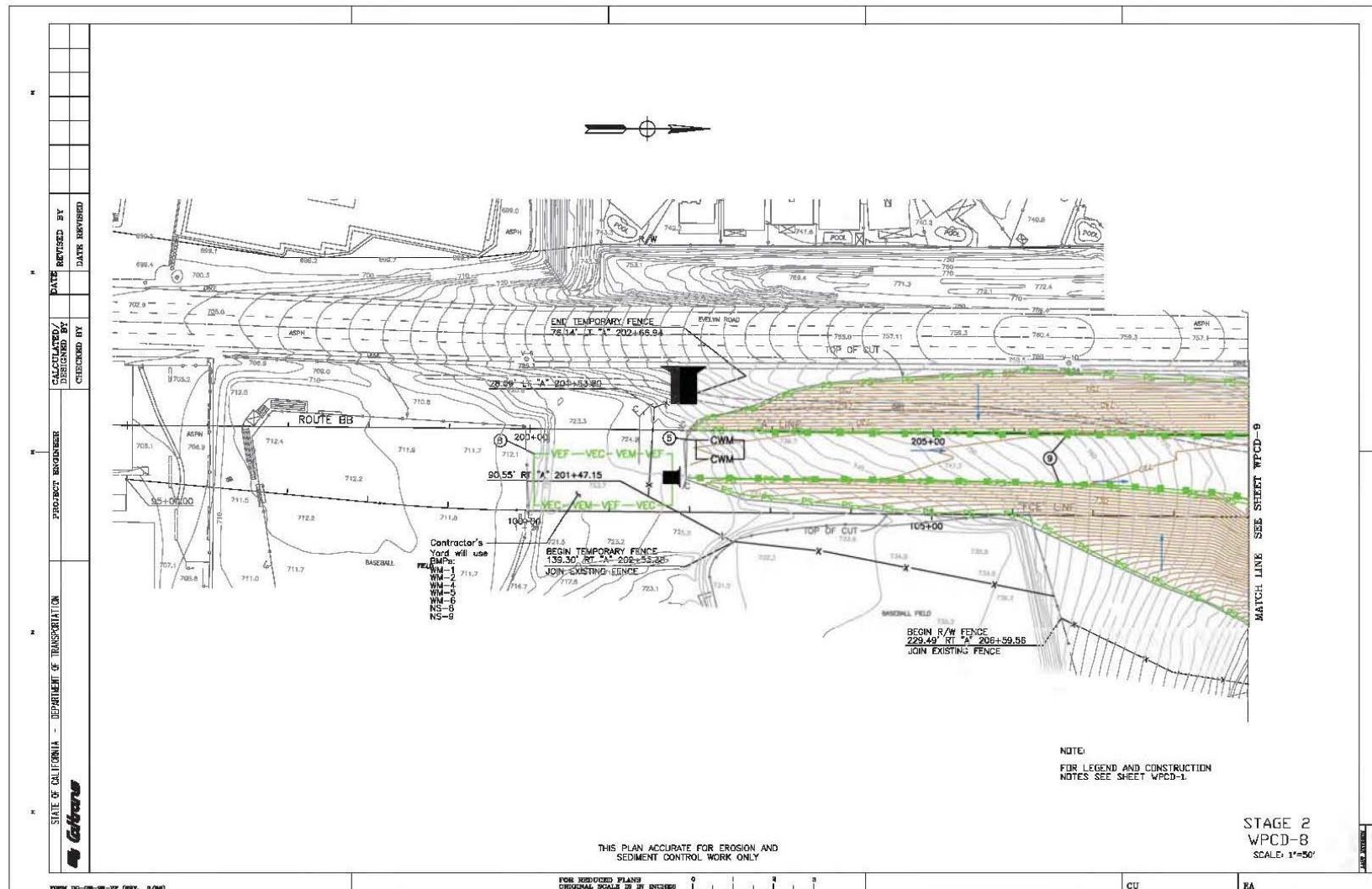
Attachment BB

WPCDs Example 7

WATER POLLUTION CONTROL DRAWINGS (WPCDs)			
LEGEND <ul style="list-style-type: none"> CWM WM-8 Concrete Waste Management SC-10 Storm Drain Inlet Protection ESA Environmentally Sensitive Area Surface Flow Direction Pipe/Underground Flow Direction CSM WM-7 Contaminated Soil Management VEC NS-8 Vehicle & Equipment Cleaning VEF NS-9 Vehicle & Equipment Fueling VEM NS-10 Vehicle & Equipment Maintenance PEV SS-2 Preservation of Existing Vegetation TSP SS-4 Hydroseeding S SS-6 Straw Mulch SOS SS-5 Soil Binders PS Permanent Seeding TC-1 Stabilized Construction Entrance/Exit TSD SS-11 Slope drains CD SS-9 Earth Dike/Drainage Swales and Lined Ditches CD SC-4 Check Dams SC-1 Silt Fences ST SC-3 Sediment Traps FR SC-5 Fiber Rolls SB SC-8 Sandbag Barrier Stornwater Discharge Location DW NS-2 Dewatering Operations 	FOR ROUTE BB STAGE 2 ANYTOWN, ANY COUNTY CALTRANS CONTRACT NO. 00-00000 PREPARED BY: ZZZ CONSTRUCTION COMPANY		
SAMPLE WPCD NOTE: DO NOT SIMPLY COPY THE FOLLOWING NOTES FOR PROJECT SPECIFIC USE. COPYING TEXT FROM THESE SAMPLE WPCDs DOES NOT NECESSARILY MEET NPDES PERMIT REQUIREMENTS. USE PROJECT SPECIFIC NOTES.			
STORM WATER POLLUTION CONTROL CONSTRUCTION NOTES: (LOCATIONS OF CIRCLED NUMBERS ARE SHOWN ON THE WPCD SHEETS)			
① Install Type 1 inlet protection at drop inlet structures. ② Install Type 3 inlet protection at drop inlet structures. ③ Temporary slope drain without energy dissipation. ④ Contractor proposed alternate concrete washout detail, Type-1 Below Ground. See WPCD-14 for detail. ⑤ Contractor proposed alternate concrete washout detail, Type-2 Above Ground. See WPCD-14 for detail. ⑥ Dewatering operations may be necessary during trenching for pipe installation. ⑦ Pipe outlet energy dissipator. ⑧ Combined Vehicle Cleaning, Fueling and Maintenance area. ⑨ Silt fence to be removed after final stabilization is complete.			
WPCD-7			
<table border="1" style="width: 100%; border-collapse: collapse;"> <tr> <td style="width: 50%; vertical-align: top; padding: 5px;"> ZZZ CONSTRUCTION COMPANY <small>BY NAME</small> D.J.D. </td> <td style="width: 50%; vertical-align: top; padding: 5px;"> WATER POLLUTION CONTROL DRAWINGS TITLE SHEET <small>SIZE</small> A <small>SCALE</small> NONE <small>DATE</small> 11/00 <small>REV</small> 0 <small>SPRINT</small> 7 or 14 </td> </tr> </table>		ZZZ CONSTRUCTION COMPANY <small>BY NAME</small> D.J.D.	WATER POLLUTION CONTROL DRAWINGS TITLE SHEET <small>SIZE</small> A <small>SCALE</small> NONE <small>DATE</small> 11/00 <small>REV</small> 0 <small>SPRINT</small> 7 or 14
ZZZ CONSTRUCTION COMPANY <small>BY NAME</small> D.J.D.	WATER POLLUTION CONTROL DRAWINGS TITLE SHEET <small>SIZE</small> A <small>SCALE</small> NONE <small>DATE</small> 11/00 <small>REV</small> 0 <small>SPRINT</small> 7 or 14		

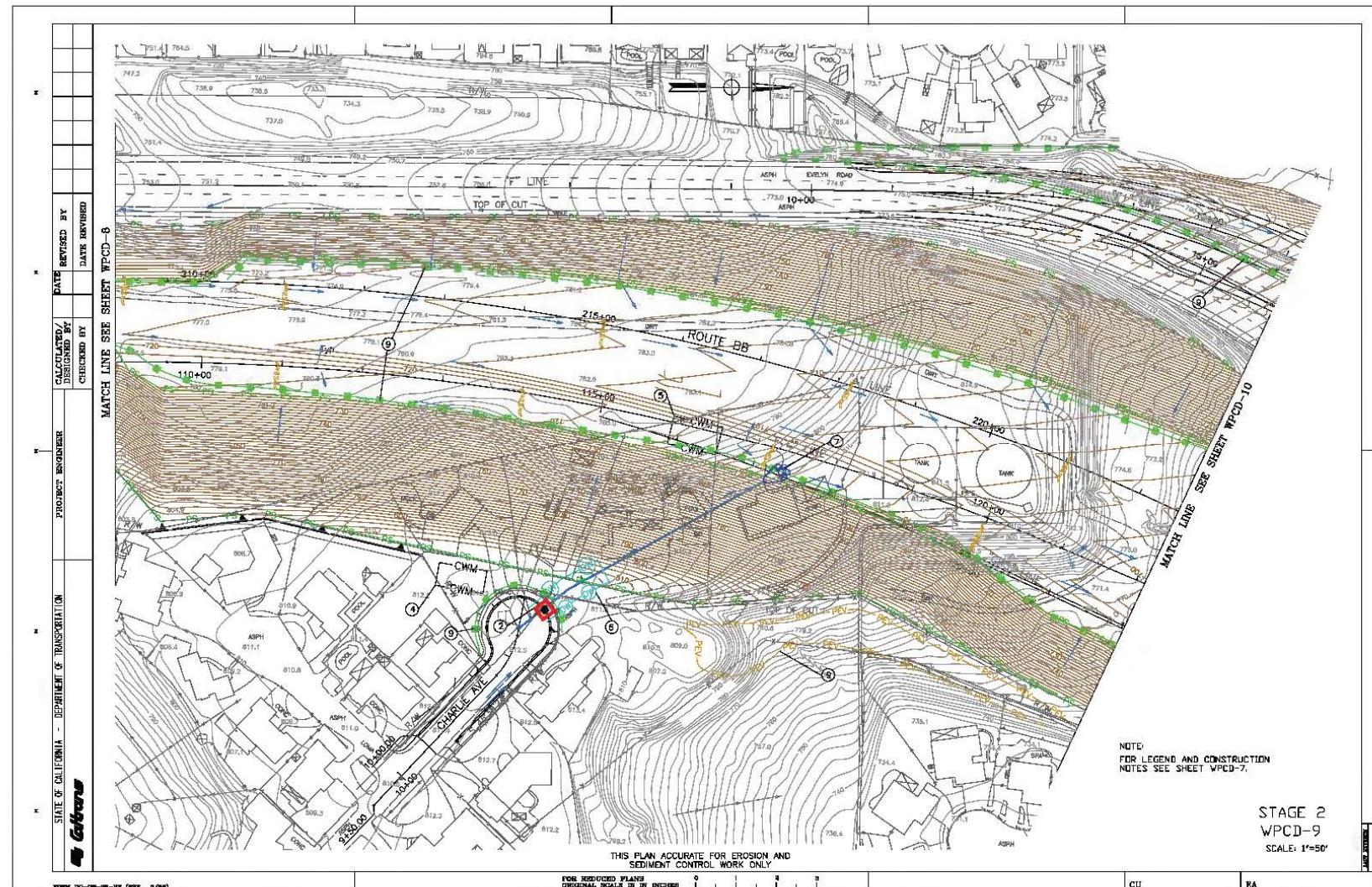
Attachment BB

WPCDs Example 8

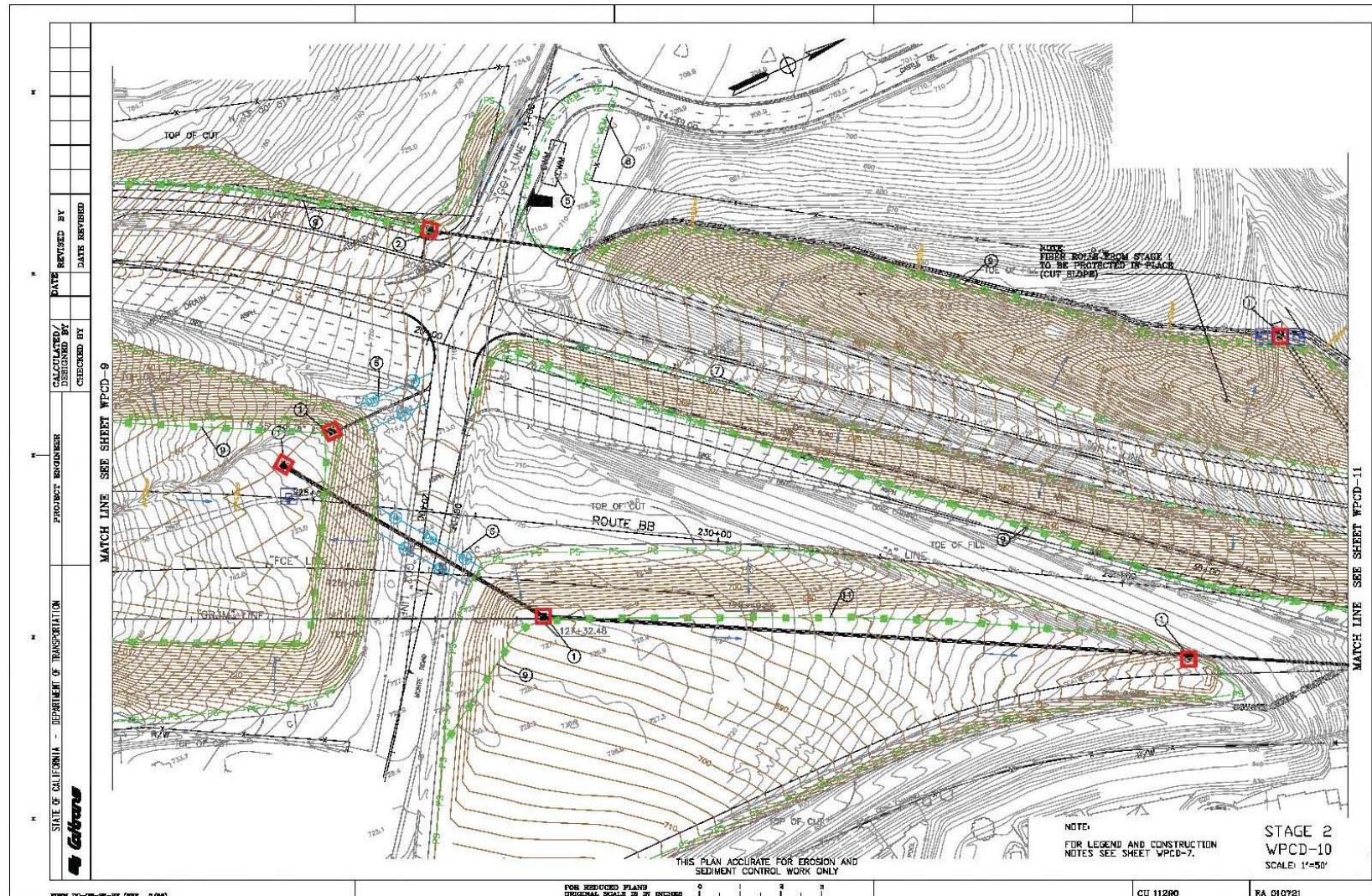


Attachment BB

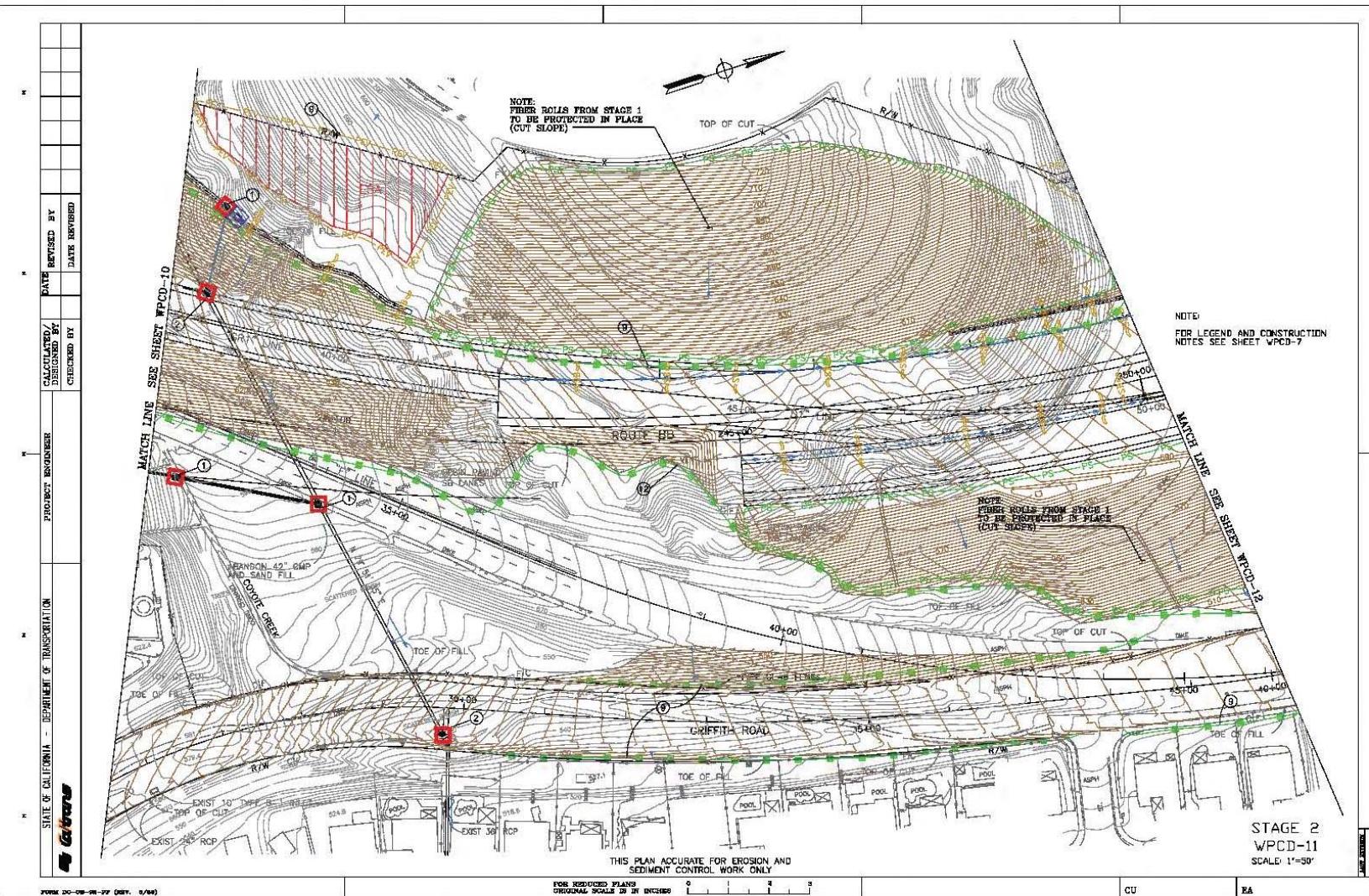
WPCDs Example 9



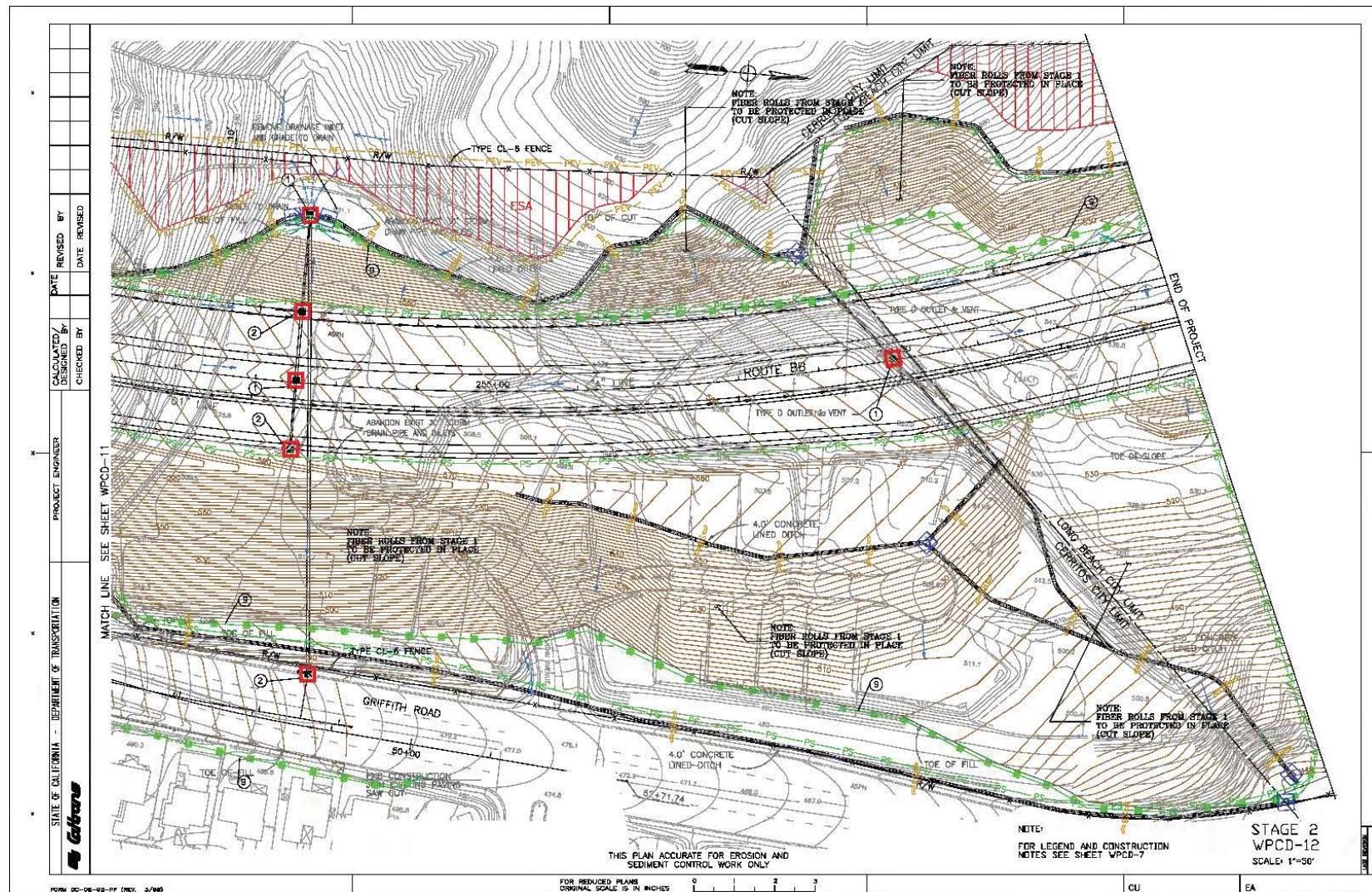
Attachment BB WPCDs Example 10



Attachment BB WPCDs Example 11

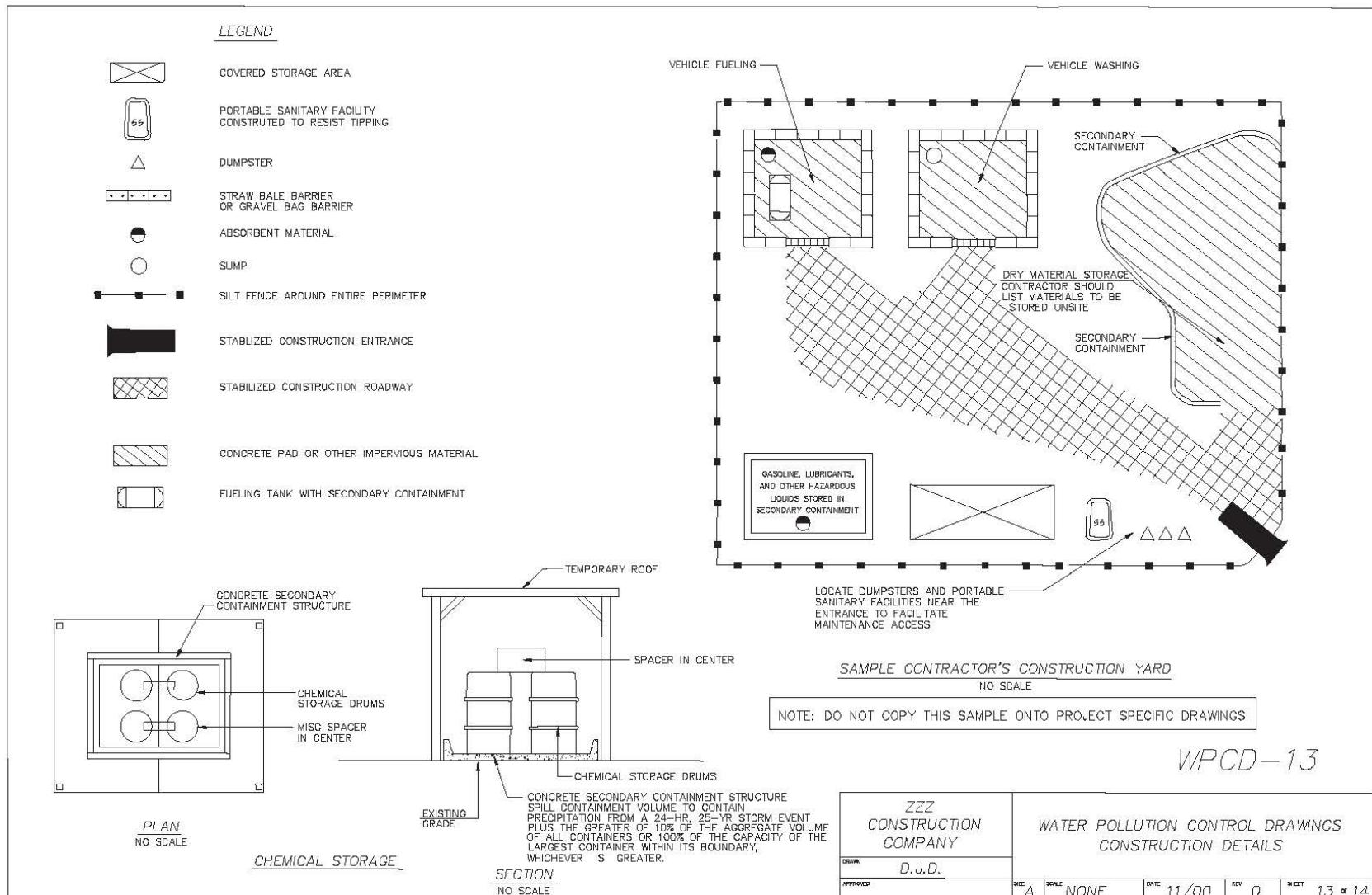


Attachment BB WPCDs Example 12



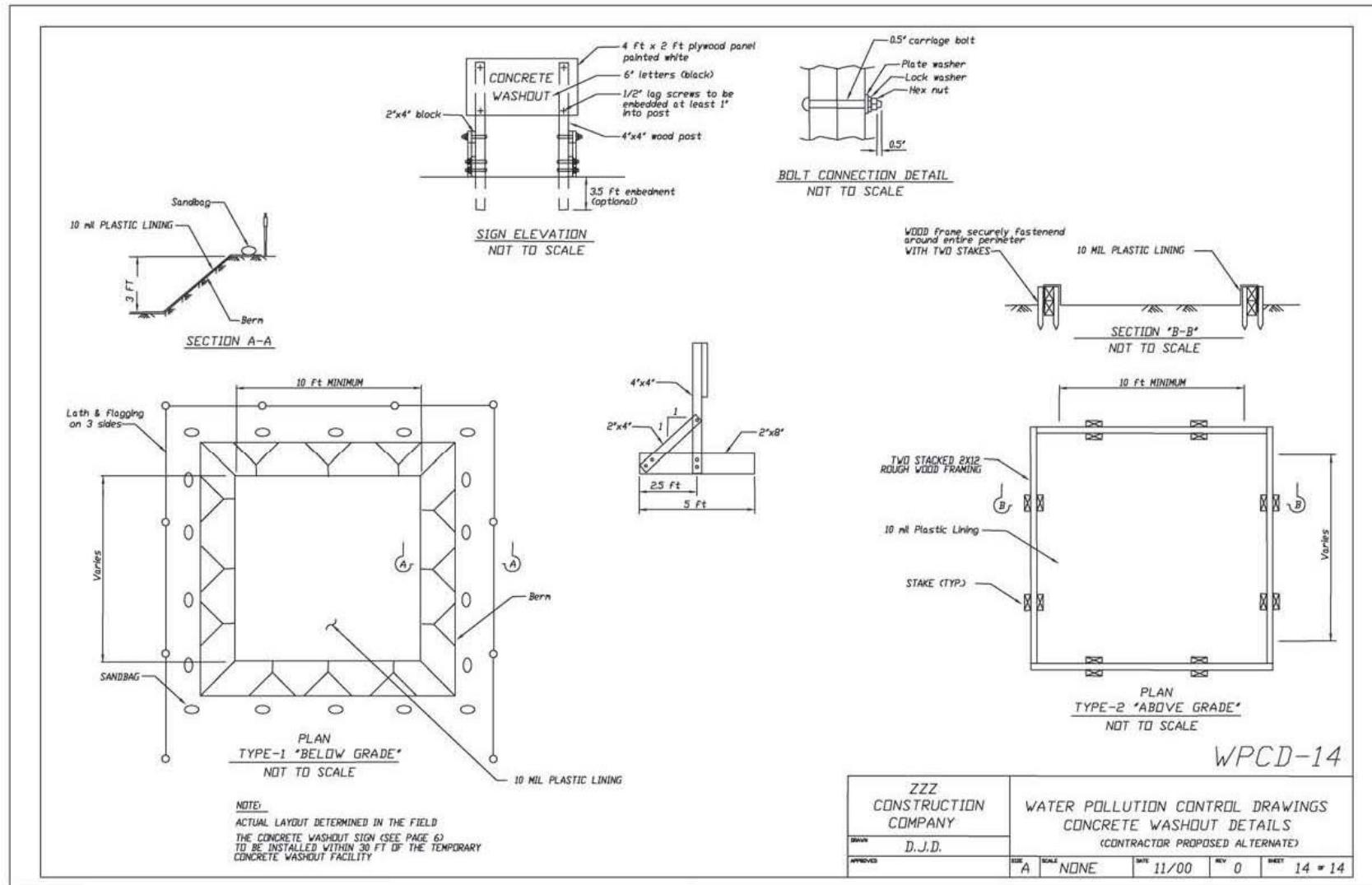
Attachment BB

WPCDs Example 13



Attachment BB

WPCDs Example 14



3.4.9 Attachment CC: Water Pollution Control Best Management Practices List

The Water Pollution Control Best Management Practices List (WPCBMPL), Form CEM-20CC, provides by location and project phase/stage the necessary BMPs for the project to be in compliance with the CGP or LTCGP. The WPCBMPL shall reflect the Contractor's phasing and/or construction staging, and shall address the entire scope of the contract work. The WPCBMPL provides field staff with both a list of necessary BMPs and estimated quantity for each BMP by location and phase/stage of the project.

The construction activity phases that the WPCBMPL may need to address are the Preliminary Phase, Grading Phase, Highway Construction Phase, and the Highway Planting / Erosion Control Establishment Phase. These phases are defined below.

3.4.9.1 Preliminary Phase (Pre-Construction Phase – Part of the Grading Phase)

Construction stage including rough grading/or disking, clearing and grubbing operations, or any soil disturbance prior to mass grading.

3.4.9.2 Grading Phase

Includes reconfiguring the topography for the project including; excavation for roadway including necessary blasting of hard rock, highway embankment construction (fills); mass grading, and stockpiling of select material for capping operations.

3.4.9.3 Highway Construction Phase

Highway construction phase includes both highway and structure construction. Highway construction includes final roadway excavation, placement of base materials and highway paving, finish grading, curbs, gutters and sidewalks, public utilities, public water facilities including fire hydrants, public sanitary sewer systems, storm drain systems and/or other drainage improvements, highway lighting, traffic signals and/or other highway electrical work, guardrail, concrete barriers, sign installation, pavement markers, traffic stripping and pavement markings. Structure construction includes structure footings, bridges, retaining walls, major culverts, overhead sign structures and buildings.

3.4.9.4 Highway Planting/Erosion Control Establishment Phase

Highway planting including clearing and grubbing operations, soil preparation (grading, incorporation of soil amendments, placement of topsoil), irrigation (trenching, installation, trench backfilling), minor grading (top dressing, fine grading lawn and ground cover areas), hardscaping, planting (seeding and planting of plants), mulch (application of wood chips or other mulches) and plant establishment (weeding, plant replacement and if needed: fertilizer application, irrigation maintenance, reapplication of mulch). Erosion control includes placement of permanent erosion control materials and maintenance of temporary sediment controls during the erosion control establishment period.

For the grading phase and highway construction phase, the WPCBMPL may need to include different stages to completely identify all required BMPs for each location. The stage construction sheets of the project plans may be used as the basis for identifying stages on the WPCBMPL.

The WPCBMPL, the WPCDs and the WPCS provide the necessary tools for a contractor to plan and implement BMPs to meet the requirements of the project SWPPP. The BMPs listed on the WPCBMPL are the baseline for site inspections and visual monitoring.

Prepare the WPCBMPL in conformance with the following instructions:

- Include a cover sheet(s) listing the BMPs that will be used.
- The WPCBMPL shall show by location the BMPs that will be used. The number of locations shown on the WPCBMPL shall be established so that field staff and inspectors can easily identify where BMPs

need to be located. Typical project locations that should be listed on the WPCBMPL and clearly delineated on the WPCDs are:

- At interchanges identify locations by quadrants
- Use half mile segments for mainline and provide both post mile and stationing identification
- Structures
- City street or county road
- Contractor yard
- Staging area
- Batch plant or material crushing operation
- List location for mobile BMPs such as pavement placement and grinding location as Mobile Operation
- The WPCBMPL shall reference appropriate WPCDs for each location.
- The WPCBMPL shall show the estimated DSA for each location.

List all construction site BMPs on the WPCBMPL. Include necessary additional information to convey site-specific configurations or BMP modifications. The WPCBMPL shall include:

- Temporary soil stabilization and temporary sediment control BMPs that will be used during construction. Include temporary onsite drainage(s) to carry concentrated flows, BMPs implemented to divert off-site drainage around or through the construction site, and BMPs that protect stormwater inlets
- Temporary construction entrances BMP for site ingress and egress points and any proposed temporary construction roads
- BMPs to mitigate or eliminate non-stormwater discharges
- BMPs for waste management and materials pollution control, including, but not limited to storage of soil or waste; construction material loading, unloading, storage and access areas; and areas designated for waste handling and disposal
- BMPs for vehicle and equipment storage, fueling, maintenance, and cleaning

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

3.4.10 Attachment DD: Water Pollution Control Schedule

The Water Pollution Control Schedule (WPCS) is the component of the project SWPPP that shows the timeline for when BMPs will be installed so that the project is in compliance with the CGP or the LTCGP. The WPCS provides field staff with the information necessary to plan for adequate materials and crews to install BMPs at the right time so that they are effective. The WPCS, WPCBMPL and WPCDs provide the necessary tools for a contractor to plan and implement BMPs to meet the requirements of the project SWPPP. The WPC schedule must be current and updated as frequently as necessary, but at a minimum on a quarterly basis.

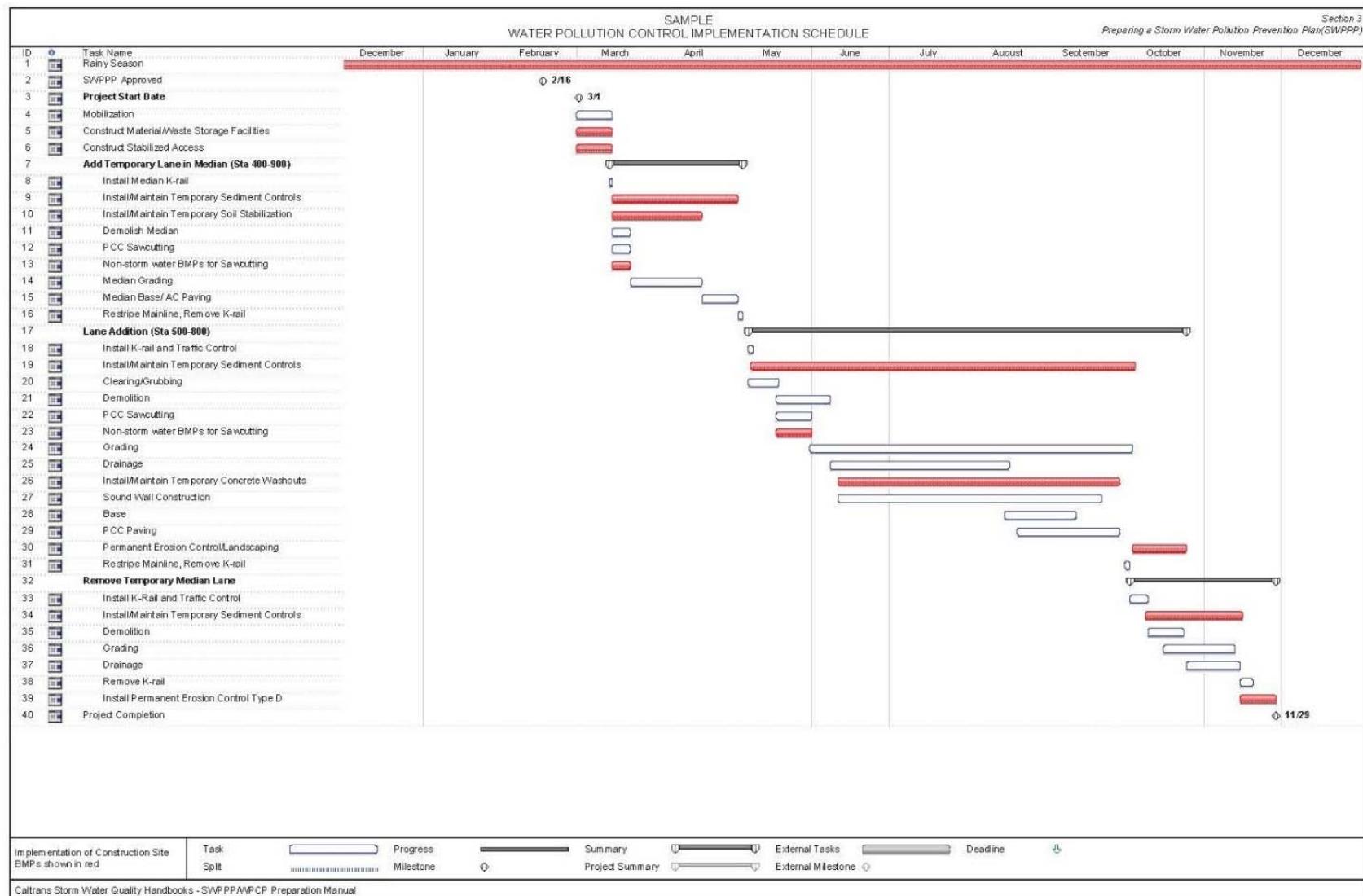
The WPCS shall be a graphical project schedule. The project schedule may be used for the WPCS if the project schedule includes all WPCS requirements. The schedule shall contain an adequate level of detail to show major activities sequenced with implementation of construction site BMPs, including:

- Project start and finish dates, including each stage of the project
- SWPPP review and approval
- Annual certifications
- Mobilization dates
- Mass clearing and grubbing/roadside clearing dates
- Major grading/excavation dates
- Special dates named in other permits such as Fish and Game and USACOE Permits
- Dates for submittal SWPPP Amendments required by the contract specifications
- Implementation schedule by location for deployment of:
 - Temporary soil stabilization BMPs
 - Temporary sediment control BMPs
 - Wind erosion control BMPs
 - Tracking control BMPs
 - Non-stormwater BMPs
 - Waste management and materials pollution control BMPs
- Paving, saw-cutting, and any other pavement related operations
- Major planned stockpiling operations
- Dates for other significant long-term operations or activities that may cause non-stormwater discharges such as dewatering, grinding, etc.
- Final stabilization activities staged over time for each area of the project

Projects located in the Lake Tahoe, Truckee River, East Fork Carson River, or West Fork Carson River Hydrologic Units, and projects above 5,000 feet in elevations in the portions of Mono County or Inyo County within the Lahontan RWQCB are not allowed to perform removal of vegetation nor disturbance of existing ground surface conditions between October 15 of each year and May 1 of the following year; except when there is an emergency situation that threatens the public health or welfare, or when the project is granted a variance by the RWQCB Executive Officer.

Attachment DD

Water Pollution Control Schedule



3.4.11 Attachment EE: Stormwater Sampling Locations

The Caltrans *Construction Site Monitoring Program Guidance Manual* provides instructions on determining potential stormwater sampling locations to be shown on Attachment EE. Use Caltrans Form CEM-20EE.

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

3.5 SWPPP Appendices

3.5.1 SWPPP Appendices A through P

SWPPP Appendices A through C and E through P shall contain Caltrans CEM forms used to document and report information necessary for SWPPP implementation. A copy of these documents must be included in the SWPPP binder. For implementing the SWPPP the contractor must use the most recent Caltrans CEM forms available at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

The following appendices are to be included in the SWPPP:

- Appendix A CEM-2008 SWPPP/WPCP Amendment Certification and Acceptance Form
- Appendix B CEM-2009 SWPPP/WPCP Amendment Log Form
- Appendix C CEM-2070 SWPPP/WPCP Annual Certification of Compliance Form
- Appendix D Subcontractor/Material Supplier Notification Letter and Contact Information
- Appendix E CEM-2023 Stormwater Training Record Form
- Appendix F CEM-2024 Stormwater Training Log Form (Optional)
- Appendix G CEM-2030 Stormwater Site Inspection Report and/or
CEM 2031 Daily Stormwater Site Inspection Report– Lake Tahoe Hydrologic Unit
- Appendix H CEM-2034 Stormwater BMPs Status Report Form (Optional)
- Appendix I CEM-2035 Stormwater Corrective Actions Summary or
CEM-2035T Stormwater Corrective Actions Summary- Lake Tahoe Hydrologic Unit
- Appendix J CEM-2045 REAP or
CEM-2045T REAP- Lake Tahoe Hydrologic Unit
- Appendix K CEM-2051 Stormwater Sampling and Analysis Log (Optional)
- Appendix L CEM 2052 Stormwater Sample Field Test Report Form
- Appendix M CEM-2058 Stormwater Meter Calibration Record Form
- Appendix N CEM-2061 Notice of Discharge Report Form or
CEM-2061T Notice of Discharge Report - Lake Tahoe Hydrologic Unit Stormwater Sample Field Test Report/Receiving Water Monitoring Report
- Appendix O CEM-2062 NAL Exceedance Report Form/ Receiving Water Monitoring Trigger Report or
CEM-2062T NAL Exceedance Report Form- Lake Tahoe Hydrologic Unit
- Appendix P CEM-2063 NEL Violation Report Form-ATS Discharge or
CEM-2063T NEL Violation Report Form- Lake Tahoe Hydrologic Unit

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Appendix A

CEM-2008 SWPPP Amendment and Certification Form

- Required for projects with a SWPPP to document amendments approval.
- Caltrans, Local and private agencies have a LRP authorize the project RE to be the AS for SWPPP acceptance.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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SWPPP/WPCP AMENDMENT CERTIFICATION AND ACCEPTANCE

CEM-2008 (REV 11/2013)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM	
	PROJECT IDENTIFIER NUMBER	
	WDID NUMBER	
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL	
	<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP
	<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.
	<input type="checkbox"/> Risk Level 3	

Storm Water Pollution Prevention Plan (SWPPP)/Water Pollution Control Program (WPCP)**Amendment Number _____**

CONTRACTOR WATER POLLUTION CONTROL MANAGER SIGNATURE	DATE
CONTRACTOR WATER POLLUTION CONTROL MANAGER NAME	PHONE NUMBER

Contractor Certification of SWPPP or WPCP Amendment

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or persons directly responsible for gathering the information, the information submitted, to the best of my knowledge and belief, is true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

CONTRACTOR SIGNATURE	DATE
CONTRACTOR NAME	PHONE NUMBER
TITLE	

Resident Engineer Acceptance of SWPPP or WPCP Amendment

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted, to the best of my knowledge and belief, is true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

RESIDENT ENGINEER SIGNATURE	DATE OF AMENDMENT ACCEPTANCE
RESIDENT ENGINEER NAME	PHONE NUMBER

SWPPP/WPCP AMENDMENT CERTIFICATION AND ACCEPTANCE

CEM-2008 (REV 11/2013)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Required for Private Entity Administered Projects

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those directly responsible for gathering the information, the information submitted, to the best of my knowledge and belief is true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

LEGALLY RESPONSIBLE PERSON SIGNATURE	DATE
LEGALLY RESPONSIBLE PERSON NAME	PHONE NUMBER

TITLE

Required for Local Agency/Private Entity Administered Project

Caltrans Oversight Engineer's Concurrence With SWPPP/WPCP Amendment	
I and personnel acting under my direction and supervision have reviewed this SWPPP/ WPCP and find that it meets the requirements set forth in the contract Special Provisions, Caltrans Standard Specifications, and the Caltrans SWPPP/WPCP Preparation Manual.	
OVERSIGHT ENGINEER SIGNATURE	DATE OF AMENDMENT CONCURRENCE
OVERSIGHT ENGINEER NAME	PHONE NUMBER

SWPPP/WPCP AMENDMENT CERTIFICATION AND ACCEPTANCE

CEM-2008 (REV 11/2013)

Instructions**General Information**

- The information on CEM-2008 is required for projects with either a Stormwater Pollution Prevention Plan (SWPPP) or a Water Pollution Control Program (WPCP) to document amendment acceptance and certification.
- SWPPP amendments must be certified by the approved signatory as identified in CEM-2006 or 2006T, "Legally Responsible Person Authorization of Approved Signatory," signed by the legally responsible person (LRP).
 1. For Caltrans, the LRP is the district director. The LRP may authorize the project resident engineer to be approved signatory.
 2. For a local agency, the LRP is either a principal executive officer or a ranking elected official. The local agency LRP may authorize the project resident engineer to be approved signatory.
 3. For a private entity performing work in the state right-of-way under an encroachment permit, the LRP must be one of the following:
 - a. For a corporation, a responsible corporate officer.
 - b. For a partnership or sole proprietorship, a general partner or the proprietor, respectively.The private entity LRP may not authorize an approved signatory.
- 4. Attach a completed copy of CEM-2008 to each SWPPP or WPCP amendment, and include it in the SWPPP Attachment DD or the WPCP Attachment C.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number. For projects without one, write "N/A" in the field.

WDID Number

For projects that have a Water Pollution Control Program enter "WPCP" in this field.

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Appendix B

CEM-2009-SWPPP Amendment Log Form

- Required for projects with a SWPPP to document authorized amendments.
- To be authorized by the RE.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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SWPPP/WPCP AMENDMENTS LOG

CEM-2009 (REV 11/2013)

Page 1 of 1

SWPPP/WPCP AMENDMENTS LOG

CEM-2009 (REV 11/2013)

Instructions

General Information

- Projects with either a Stormwater Pollution Prevention Plan (SWPPP) or Water Pollution Control Program (WPCP) require the information on this form to track amendments.
- Attach a completed copy of the form to each accepted SWPPP/WPCP amendment, and include in SWPPP Attachment DD or WPCP Attachment C.

Form

Contract Number/Co/Rte/PM

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a project identifier number. For projects without one, write "N/A" in the field.

WDID Number

For projects with WPCP enter "WPCP" in this field.

When the resident engineer has accepted SWPPP or WPCP amendments, enter:

1. The amendment number.
2. The date the Water Pollution Control Manager signed form CEM-2008.
3. A brief description of the amendment.
4. The name and title of person who requested the amendment.
5. The date the resident engineer accepted form CEM-2008.

Appendix C

CEM-2070 SWPPP Annual Certification of Compliance Form

- To be submitted to Caltrans for Annual Compliance.
- Ensures that the project site and activities are in compliance with either the CGP or the LTCGP.
- Ensures that water pollution control measures are being implemented in accordance with the SWPPP.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	SWPPP PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit <input type="checkbox"/> Risk Level 3 and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.

**Stormwater Pollution Prevention Plan (SWPPP)/Water Pollution Control Program (WPCP)
Annual Certification of Compliance**

Water Pollution Control Manager Certification

This certification for the project site is based on an inspection of the project site conducted on (date) _____

I certify based on my inspection of the project site that:

- Yes No Water pollution control measures are being implemented in accordance with the SWPPP or WPCP approved for the project, including approved SWPPP/WPCP amendments.
- Yes No The project site and activities thereon are in compliance with the Caltrans Statewide NPDES Permit No. CAS000003, the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES Permit No. CAS000002, or Order No. R6T-2011-0019, NPDES No. CAG-616002, whichever is applicable.

Contractor Water Pollution Control Manager signature	Date
Contractor Water Pollution Control Manager name	Phone number

Contractor Annual Certification of Compliance

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Contractor signature	Date
Contractor name	Phone number
Title	

SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

**Required for Private Entity Administered Projects
Private Entity Legally Responsible Person Annual Certification of Compliance**

I certify that the project is in compliance with the project site approved Stormwater Pollution Prevention Plan or Water Pollution Control Program including approved amendments. The project site and activities thereon are in compliance with the Caltrans Statewide NPDES Permit No. CAS000003, the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES Permit No. CAS000002, or Order No. R6T-2011-0019, NPDES No. CAG-616002, whichever is applicable.

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Legally responsible person signature	Date
Legally responsible person name	Phone number
Title	

SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

Page 3 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Resident Engineer Approval of Annual Certification of Compliance

An inspection of the project site for annual certification of compliance was conducted on (date) _____

Annual Certification of Compliance project site inspection conducted by _____

I certify that I, or personnel acting under my direction and supervision, have inspected the project site and find the following:

- Yes No Water pollution control measures are being implemented in accordance with the SWPPP or WPCP approved for the project, including approved SWPPP/WPCP amendments.
- Yes No The project site and activities thereon are in compliance with the Caltrans Statewide NPDES Permit No. CAS000003, the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES Permit No. CAS000002, or Order No. R6T-2011-0019, NPDES No. CAG-616002, whichever is applicable.

The box above is checked "no" based on the project site annual certification inspection, and the following corrective actions are necessary for the project to be in compliance with SWPPP/WPCP or NPDES Permits

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Resident engineer signature	Date of approval
Resident engineer name	Phone number

Required for Local Agency or Private Entity-Administered Project**Caltrans Oversight Engineer's Concurrence With Annual Certification of Compliance**

I, or personnel acting under my direction and supervision, have reviewed this Annual Certification of Compliance and concur that the project is in compliance with SWPPP or WPCP approved for the project, including approved SWPPP/WPCP amendments and applicable NPDES Permits.

Oversight engineer signature	Date of concurrence
Oversight engineer name	Phone number

SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

Page 4 of 4

Instructions**General Information**

- Projects with either a Stormwater Pollution Prevention Plan (SWPPP) or Water Pollution Control Program (WPCP) require an Annual Certification of Compliance by July 15th of each year.
- Document the project site inspection for annual certification on form CEM-2030, "Stormwater Site Inspection Report."
- A legally responsible person (LRP) or a signatory approved by the LRP must certify the Stormwater Pollution Prevention Plan Annual Certification of Compliance.
 - For Caltrans, the LRP is the district director. The LRP may authorize the project resident engineer to be the approved signatory.
 - For a local agency, the LRP is either a principal executive officer or ranking elected official. The local agency's LRP may authorize the project resident engineer to be the approved signatory. If the local agency's LRP has not approved the local agency's resident engineer to be an approved signatory then the local agency's LRP must sign in the resident engineer signature box of the Annual Certification of Compliance.
 - For a private entity performing work in the state right-of-way under an encroachment permit, the LRP must be one of the following:
 - For a corporation—a responsible corporate officer.
 - For a partnership or sole proprietorship—a general partner or the proprietor, respectively.
 - The private entity's LRP may not authorize an approved signatory.
- File a completed copy of this form in SWPPP/WPCP file category 20.70, Annual Certification of Compliance.
- This form is used for Annual Certification as well as replaces form CEM-2001.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write 'N/A' in the field.

WDID Number

For projects that have Water Pollution Control Program, enter "WPCP" in this field.

SWPPP Projects Site Risk Level

Check the box for the appropriate SWPPP risk level, or N/A for projects residing in the Lake Tahoe Hydrologic Unit, or N/A for projects that have Water Pollution Control Program.

Appendix D

Subcontractor/Material Supplier Notification Letter and Contact Information

- Ensures that the project site and activities are in compliance with the CGP or LTCGP.
- Include subcontractor/material supplier SWPPP notification letters.
- Include a log of all subcontractor and material suppliers and their contact information.

Appendix D shall include a sample subcontractor/material supplier SWPPP notification letter. All subcontractors and material suppliers shall be notified that the project is covered by the following permits issued by the SWRCB or the Lahontan RWQCB:

- SWRCB Order No. 2012-011-DWQ, NPDES No. CAS000003 ("Caltrans Permit"), NPDES Permit, Statewide Storm Water Permit and WDRs for the State of California, Department of Transportation. July 1, 2013
- SWRCB Order No. 2009-0009-DWQ, NPDES General Permit No. CAS000002, NPDES General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities, September 02, 2009, and (Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ), or
- If the project is subject to the LTCGP, Include the latest adopted LTCGP Order No. RGT-2011-0019 NPDES No. CAG616002.

Each subcontractor and material supplier shall also be notified that the project has a SWPPP and the pertinent water pollution control best management practices that the subcontractor or material supplier must comply with. A sample notification letter is shown on the next page.

Appendix D shall also contain the log to be used to record subcontractor and material supplier notification and contact information.

Contact information for each subcontractor will be provided in SWPPP Notification log in SWPPP file category 20.21 Subcontractor Notification Letters and Contact Information. Contact information shall include subcontractor name, type of work performed, contact name, phone number and emergency telephone number (24/7).

Contact information for each material supplier will be provided in SWPPP Notification log in SWPPP file category 20.22 Material Supplier Notification Letters and Contact Information. Contact information shall include company name, type of material supplied, contact name and phone number.

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Appendix D Subcontractor/Material Supplier Notification Letter and Contact Information

ABC Construction Inc.,
123 Rock Road
Rock City, CA 90000

[Date]

Dear Sir/Madam,

Be advised that this project must comply with the requirements of Order No. 99-06-DWQ, NPDES No. CAS000003 (“Permit”), National Pollutant Discharge Elimination System (NPDES) Permit, Statewide Storm Water Permit and Waste Discharge Requirements (WDRs) for the State of California, Department of Transportation, adopted by California State Water Resources Control Board (SWRCB) on July 15, 1999. This project must also comply with the requirements of Order No. 2009-0009-DWQ, NPDES General Permit No. CAS000002, National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities, adopted by SWRCB on September 02, 2009.

[Contractor] has developed a Storm Water Pollution Prevention Plan (SWPPP) in order to implement the requirements of the Permits. Be aware of and comply with the following water pollution control Best Management Practices (BMPs) [use one of the following 1) related to your work on 2) when delivering materials to] the project site:

[insert list of BMPs]

You are required to comply with the SWPPP and Permits for any work that you perform on the project site. Any person who violates condition of the Permits may be subject to substantial penalties in accordance with state and federal law. You are encouraged to advise each of your employees working on the project site of the requirements of the SWPPP and the Permits. All employees prior to working on the project site must have completed basic water pollution control training that includes water pollution control laws and regulations and implementation and maintenance requirements for water pollution control Best Management Practices (BMPs).

A copy of the Permits and project SWPPP are available for your review at the construction office. If you have further questions contact me at [email address] or [phone number].

Sincerely,

John Doe
Project Superintendent

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APPENDIX D NOTIFICATION LOG

CEM-20DAPP (NEW 9/2012)

CONTRACT NUMBER/CO/RTE/PM PROJECT IDENTIFIER NUMBER WDID NUMBER DATE

SUBCONTRACTOR SWPPP NOTIFICATION LOG

MATERIAL SUPPLIER SWPPP NOTIFICATION LOG

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Appendix E

CEM-2023 Stormwater Training Record Form

- To be submitted to Caltrans for annual compliance.
- To document stormwater training for all employees with compliance with the CGP or LTCGP and contract specifications.
- To ensure review and record keeping of stormwater training logs.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER TRAINING RECORD

CEM-2023 (REV 11/2013)

Page 1 of 3

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM						
	PROJECT IDENTIFIER NUMBER						
	WDID NUMBER						
CONTRACTOR NAME AND ADDRESS	<p>PROJECT SITE RISK LEVEL</p> <table> <tr> <td><input type="checkbox"/> Risk Level 1</td> <td><input type="checkbox"/> N/A. WPCP</td> </tr> <tr> <td><input type="checkbox"/> Risk Level 2</td> <td><input type="checkbox"/> N/A. Project Resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.</td> </tr> <tr> <td><input type="checkbox"/> Risk Level 3</td> <td></td> </tr> </table>	<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP	<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project Resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.	<input type="checkbox"/> Risk Level 3	
<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP						
<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project Resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.						
<input type="checkbox"/> Risk Level 3							
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE						

Stormwater Training Record

Training Course Title or Specific Training Objective	Location	Date of Training
<p>Stormwater Topics</p> <input type="checkbox"/> Temporary soil stabilization <input type="checkbox"/> Temporary sediment control <input type="checkbox"/> Tracking controls <input type="checkbox"/> Wind erosion control <input type="checkbox"/> Non-stormwater management <input type="checkbox"/> Stormwater discharge sampling <input type="checkbox"/> Waste management and materials pollution control <input type="checkbox"/> Pre-storm activities <input type="checkbox"/> Spill prevention and control <input type="checkbox"/> Permanent soil stabilization <input type="checkbox"/> BMPs required for work activities current week <input type="checkbox"/> Initial project training <input type="checkbox"/> Stormwater pollution prevention plan <input type="checkbox"/> Water pollution control program	Instructor Name	Training Audience
	Instructor Title	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP
	Instructor Phone Number	
	Course Length (hours)	

Attendee Roster

STORMWATER TRAINING RECORD

CEM-2023 (REV 11/2013)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Attendee Roster (Continued)

Review and Record Keeping

Has training information been entered into the optional Stormwater Training Log (CEM-2024)?

Yes No

I have reviewed this document and, based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief the information submitted is true, accurate, and complete.

Water Pollution Control Manager (name)

Date

Water Pollution Control Manager (signature)

STORMWATER TRAINING RECORD

CEM-2023 (REV 11/2013)

Page 3 of 3

Instructions**General Information**

- Projects with either a Stormwater Pollution Prevention Plan (SWPPP) or Water Pollution Control Program (WPCP) require the information on this form to document stormwater training for contractor and subcontractor managers, supervisors, and employees. Include the form and required training documentation in the stormwater annual report for SWPPP projects.
- Use this form to document training for employees responsible for activities associated with Construction General Permit compliance and contract specifications. Use this form to document required weekly stormwater training.
- Provide this training record and an updated copy of CEM-2024 (CEM-2024 is an optional form used at the WPCM's discretion) "Stormwater Training Log," to the resident engineer (RE) within five days of the date of training.
- Attach additional copies of page 2 of this form if necessary to record all individuals attending this training.
- Stormwater training needs to be completed at the frequency stipulated in the project specifications and/or the SWPPP, whichever is more frequent.
- Names may be written or typed. Initials must be original. Originals are filed with RE as stipulated above.
- Attach copy of training material/topic with submittal to RE.

Form

- **Contract Number/Co/Rte/PM**
For local agency encroachment permit projects write the encroachment permit number in the Contract Number field.
- **Project Identifier Number**
Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.
- **WDID Number**
For projects with Water Pollution Control Program, enter "WPCP."
- **Attendee Roster**
Enter employee name, contractor or subcontractor company name and employee phone number.
- **Training Audience**
Enter one of the following responses:
 - General—Training for individuals responsible for activities associated with compliance with the Construction General Permit.
 - BMPs—Training for individuals responsible for BMP installation, inspection, maintenance, and repair.
 - SWPPP—Training for individuals responsible for overseeing, revising, and amending the SWPPP.

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Appendix F

CEM-2024 Stormwater Training Log Form

- To be submitted to Caltrans for annual compliance. The form is optional; the RE will decide whether the form should be used.
- Documents stormwater training for contractors and subcontractor managers, supervisors, and employees
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER TRAINING LOG - OPTIONAL

CEM-2024 (REV 11/2013)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL
	<input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002. <input type="checkbox"/> Risk Level 3

SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)

DATE

STORMWATER TRAINING LOG

Date of Training	Training Audience	Number of Training Attendees	Stormwater Training Course Title or Topics Covered	Date Training Documentation (CEM-2023) Provided to Resident Engineer
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			

STORMWATER TRAINING LOG - OPTIONAL**Instructions****General Information**

- For projects with either a Stormwater Pollution Prevention Plan (SWPPP) or a Water Pollution Control Program (WPCP) the information shown on this form may be used to document stormwater training for contractor and subcontractor managers, supervisors, and employees. The stormwater annual report for SWPPP projects will include required training documentation and the information on this form, or in another form used at the discretion of the Water Pollution Control Manager (WPCM).
- If this form is used, provide an updated copy of CEM-2024 with attached training documentation to the resident engineer within five days of training, along with CEM-2023 and a copy of training materials and topic(s) covered.
- This form is optional, and provided as a management tool for the WPCM to assist in compiling and organizing information required of the annual report.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

WDID Number

For projects with Water Pollution Control Program enter "WPCP" in this field.

Training Audience

Check one of the following responses:

General—training for individuals responsible for activities associated with compliance with the General Construction Permit.

BMPs—training for individuals responsible for BMP installation, inspection, maintenance, and repair.

SWPPP—training for individuals responsible for overseeing revising and amending the SWPPP.

Appendix G

CEM-2030 Stormwater Site Inspection Report

- All areas of a jobsite to be reported and inspected.
- Risk level 1, 2 and 3 requirements.
- Complete BMP repair or design changes within 72 hours of identifications.
- To be submitted to the RE within 24 hours of inspection.
- For LTCGP projects, use CEM 2031-T Daily Stormwater Site Inspection Report to document daily inspections.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM PROJECT IDENTIFIER NUMBER WDID NUMBER				
CONTRACTOR NAME AND ADDRESS		PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in The Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-019, NPDES No. CAG616002 <input type="checkbox"/> Risk Level 3				
Submitted by contractor (print and sign name)				Date		
Water Pollution Control Manager name and company name		Phone number Emergency (24/7) phone number				
General Information						
Inspector's Name		Accompanied by Caltrans staff? <input type="checkbox"/> YES <input type="checkbox"/> NO If Yes, Name/Initials: _____			Date of Inspection	
Weather Condition		Precipitation Condition <input type="checkbox"/> None <input type="checkbox"/> Misty <input type="checkbox"/> Heavy rain <input type="checkbox"/> Light rain <input type="checkbox"/> Hail <input type="checkbox"/> Rain <input type="checkbox"/> Snow		Wind Condition <input type="checkbox"/> None <input type="checkbox"/> Less than 5 mph <input type="checkbox"/> Greater than 5 mph		
Construction Phase		Site Information Total project area: _____ acres Total project disturbed soil area: _____ acres Current phase disturbed soil area: _____ acres Current phase inactive disturbed soil: _____ acres				
Inspection Type Check appropriate box(es)		Storm Information				
<input type="checkbox"/> Weekly <input type="checkbox"/> Quarterly non-stormwater		Time elapsed since last storm _____ days		Precipitation amount from last storm _____ inches		
<input type="checkbox"/> Pre-storm		Time storm is expected _____ (time) _____ (date)		Expected precipitation amount _____ inches		
<input type="checkbox"/> During storm event		Time elapsed since storm began _____ hours-minutes		Precipitation amount from storm recorded from site rain gauge _____ inches		
<input type="checkbox"/> Post storm		Time elapsed since storm _____ hours-minutes		Precipitation amount from storm recorded from site rain gauge _____ inches		
Date	Daily Site Inspection of Best Management Practices (BMP) List Daily inspections for previous calendar week. Do not include weekly inspection.	Daily inspection performed by	Any corrective actions identified as completed or new?		If yes, were the actions added or verified on CEM-2035, as appropriate?	Date shown on corrective action form
			YES	NO		
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
			<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Site Inspection of Best Management Practices

If this form will be completed by hand in the field, click on "Show Entire Form" button at the top of page one to expand the sections, then print the form to take to the field. If the inspection form does not contain enough lines for all locations, use the "Add Item" button so that all BMP locations are inspected and reported.

Notes:

1. If it has been 14 days since a DSA has had active construction activities, the DSA is inactive and must be reported as a location on temporary soil stabilization and temporary linear sediment barriers.
 2. DSAs must have erosion control and have temporary linear sediment barriers installed prior to a storm event.

STATE OF CALIFORNIA • DEPARTMENT OF TRANSPORTATION
STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS							CONTRACT NUMBER/CO/RTE/PM
							PROJECT IDENTIFIER NUMBER
							WDID NUMBER

Site Inspection of Best Management Practices, continued
For project specific BMPs, insert the BMP name and additional inspection requirements below.

Temporary Linear Sediment Barriers		Right location?		Properly installed or cross barriers installed?		Maintenance performed when 1/3 height or repair needed?		Photos?	Comments and Required Actions				Action No.
<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No	Yes	No	Yes	No	Yes	No						
Location 1													
Location 2													
Location 3													
Storm Drain Inlet Protection		All inlets protected?		Properly installed?		Maintenance or repair needed?		Photos?	Comments and Required Actions				Action No.
<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No	Yes	No	Yes	No	Yes	No						
Location 1													
Location 2													
Location 3													
Stockpile Management		Date stockpile created	Is the stockpile listed as a location on stockpile management inactive stockpiles? If yes, stop here.			Is there a storm event forecasted? If yes, stop here and take action.		Is stockpile being actively used? If yes, stop here.	If no to previous question, what is the last day stockpile was actively used?	How long since stockpile actively used?	Has it been 3 days since the stockpile has been actively used? If yes, take action.		
<input checked="" type="checkbox"/> Yes	<input type="checkbox"/> No	Date	Yes	No	Yes	No	Yes	No	Date	Days	Yes	No	
Location 1													
Location 2													

Notes:

1. If it has been 3 days (72 hours) since a stockpile has been active then the stockpile is inactive and must be reported as a location on stockpile management inactive stockpiles.
2. Stockpiles must be covered and have perimeter control installed prior to a storm event.

Location Number	Comments / Corrective Actions	Photos?	Action No.
		<input type="checkbox"/> Yes	
1			
2			

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS					CONTRACT NUMBER/CO/RTE/PM								
					PROJECT IDENTIFIER NUMBER								
					WDID NUMBER								
Inactive Stockpile Management <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Type of Material or Waste			Is the stockpile properly located?		Is the stockpile covered?		Does the stockpile have a perimeter control?		Does the stockpile need maintenance or repair?		
					Yes	No	Yes	No	Yes	No	Yes	No	
Location 1													
Location 2													
Location Number		Comments / Corrective Actions								Photos?	Action No.		
												Yes	
1													
2													
Sediment and Desilting Basins <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Are basin inlets, outlets, and spillways in working order?	Is water contained in basin?		Is maintenance needed to provide required retention or detention?		Photos?	Comments and Required Actions				Action No.	
		Yes	No	Yes	No	Yes	No					Yes	
Location 1													
Location 2													
Location 3													
Tracking Controls <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Do all entrances and exits have tracking controls?	Is pavement free from visible sediment tracking?		Does sediment need to be removed from rock or ribbed plates?		Is daily sweeping done?	Photos?	Comments and Required Actions				Action No.
		Yes	No	Yes	No	Yes	No	Yes					
Location 1													
Location 2													
Location 3													
Wind Erosion Control <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Water trucks on-site?	Visible dust?		Photos?	Comments and Required Actions						Action No.	
		Yes	No	Yes	No							Yes	
Location 1													
Location 2													
Location 3													

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS							CONTRACT NUMBER/CO/RTE/PM					
							PROJECT IDENTIFIER NUMBER					
							WDID NUMBER					
Dewatering Operations <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Dewatering currently active?	Dewatering conforms with RWQCB permit?		Dewatering discharge within discharge specified limitations?	Photos?	Comments and Required Actions			Action No.		
			Yes	No	Yes						No	Yes
Location 1												
Location 2												
Location 3												
Temporary Stream Crossing <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Constructed as shown on the plan?	Conforms to 404 permit and 1601 agreement requirements?		Maintenance or repair required?	Photos?	Comments and Required Actions			Action No.		
			Yes	No	Yes						No	Yes
Location 1												
Location 2												
Location 3												
Material Storage <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Located away from drainage courses and water courses?	Areas protected from run on and runoff?		Bagged and boxed materials stored on pallets?		Areas reasonably clean and free of spills, leaks, and other material?	Is material inventory up to date?		Liquid materials in secondary containment?	Photos?	
		Yes	No	Yes	No	Yes	No	Yes	No	Yes		No
Location 1												
Location 2												
Location 3												
Comments and Required Actions											Action No.	
Location 1												
Location 2												
Location 3												

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS				CONTRACT NUMBER/CO/RTE/PM								
				PROJECT IDENTIFIER NUMBER								
				WDID NUMBER								
Waste Management Sanitation Facilities <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Located away from drainage courses and water courses?		Secured to ground or foundation?		Clean and has adequate capacity?		Ground checked for any spills or leaks?		Any spills or leaks found?		Photos?	
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	
Location 1												
Location 2												
Location 3												
Location Number	Comments / Corrective Actions										Action No.	
1												
2												
3												
Project-specific BMP	Properly located?		Properly installed?		Maintenance or repair needed?		Photos?	Comments and Required Actions				Action No.
<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No												
Location 1	Yes	No	Yes	No	Yes	No	Yes					
Location 2												
Location 3												
Project-specific BMP	Properly located?		Properly installed?		Maintenance or repair needed?		Photos?	Comments and Required Actions				Action No.
<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No												
Location 1	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	
Location 2												
Location 3												
Comments and Required Actions												Action No.
Location 1												
Location 2												
Location 3												

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Site Inspection Report General Comments

Are the BMPs installed as required by the Stormwater Pollution Prevention Plan for the phase of construction?

 Yes No

Does the SWPPP need to be amended?

 Yes No

Does the SWPPP currently reflect the current site conditions and contractor operations?

 Yes No

Is hazardous waste stored on the jobsite?

 Yes No

Are there water pollution control concerns on the project site not addressed by the comments and required actions shown above for BMPs, based on the field review of the jobsite?

 Yes No*If yes, provide details, comments, and required actions below for each location.*

Location	Water Pollution Control Concern	Comments and Required Actions	Action No.

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Inspection Report Certification

I certify under penalty of law that this Stormwater Inspection Report was performed in accordance with the General Permit. The information contained in this inspection report was gathered from a field site inspection. I am aware that Section 309 (c)(4) of the Clean Water Act provides for significant penalties, including fines and imprisonment for knowingly submitting a false material statement, representation, or certification.

Stormwater Inspector (Name)	Date Report Completed
-----------------------------	-----------------------

Stormwater Inspector (Signature)

I certify under penalty of law that this Stormwater Inspection Report was performed in accordance with the General Permit by me or under my direction or supervision. The information contained in this inspection report was gathered and evaluated by qualified personnel prior to submittal. Based on my review of the information and inquiry of those who gathered and evaluated the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete.

I am aware that Section 309 (c)(4) of the Clean Water Act provides for significant penalties, including fines and imprisonment for knowingly submitting a false material statement, representation, or certification.

Water Pollution Control Manager (Name)	Date
--	------

Water Pollution Control Manager (Signature)

Stormwater Inspection Report Acceptance

If hazardous waste is stored on the jobsite, the resident engineer should notify the district hazardous waste coordinator.

Was the District Hazardous Waste Coordinator notified?

- N/A, no hazardous waste stored on the jobsite
- YES, Date _____ Time _____
- NO

Accepted by Resident Engineer (Print Name)	Date
--	------

Resident Engineer (Signature)

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

Page 9 of 9**Instructions****General Information**

- Construction General Permit attachments C, D, and E, Section G.5. require the information on this form.
- If the inspection form does not contain enough lines to report all locations on a jobsite, click on the "Add Item" button so that all locations are inspected and reported.
- Obtain forecasted precipitation information from the National Weather Service Forecast Office website, <http://www.srh.noaa.gov/forecast>.
- Weather information should be the best estimate of the beginning of the storm event, duration of the event, and time elapsed since the last storm.
- Rainfall amounts should be recorded from the project site rain gauge.
- "Daily Site Inspection of Best Management Practices" section is to be filled out by the water pollution control manager.

Storm Visual Inspections

- For non-visible pollutant inspections, report on all locations shown in the Stormwater Pollution Prevention Plan.

Required Actions

- All corrective actions identified in this report must also be recorded on Form CEM-2035, "Stormwater Corrective Actions Summary."
- Locations identified where BMPs are failing or have other shortcomings require implementation of repairs or design changes within 72 hours of identification, and BMP repairs or other changes must be completed as soon as possible.

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DAILY STORMWATER SITE INSPECTION REPORT - LAKE TAHOE HYDROLOGIC UNIT

CEM-2031T (NEW 07/2015)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT RESIDES IN THE LAKE TAHOE HYDROLOGIC UNIT AND IS REGULATED UNDER ORDER NO. R6T-2011-0019, NPDES NO. CAG616002.
Submitted by contractor (print and sign name)	Date
Water pollution control manager name and company name	Phone number
	Emergency (24/7) phone number

DAILY STORMWATER SITE INSPECTION REPORT - LAKE TAHOE HYDROLOGIC UNIT

CEM-2031T (NEW 07/2015)

DAILY STORMWATER SITE INSPECTION REPORT - LAKE TAHOE HYDROLOGIC UNIT

CEM-2031T (NEW 07/2015)

Daily Stormwater Inspection Report Certification

I certify under penalty of law that this Stormwater Inspection Report was completed in accordance with the General Permit. The information contained in this inspection report was gathered from a field site inspection. I am aware that Section 309 (c)(4) of the Clean Water Act (CWA) provides for significant penalties, including fines and imprisonment for knowingly submitting false material statement, representation or certification.

Stormwater Inspector Name	Date Report Completed
---------------------------	-----------------------

Stormwater Inspector Signature

I certify under penalty of law that this Stormwater Inspection Report was performed in accordance with the General Permit by me or under my direction or supervision. The information contained in this inspection report was gathered and evaluated by qualified personnel before submittal. Based on my review of the information and inquiry of those who gathered and evaluated the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete.

I am aware that Section 309 (c)(4) of the Clean Water Act (CWA) provides for significant penalties, including fines and imprisonment for knowingly submitting false material statement, representation, or certification.

Water Pollution Control Manager Name	Date
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Water Pollution Control Manager Signature

Daily Stormwater Inspection Report Acceptance

Accepted by Resident Engineer (Name)	Date
--------------------------------------	------

Resident Engineer Signature

General Information

- If the inspection form does not contain enough lines to report all locations on a jobsite, attach additional copies of Page 2 of the form to report that all locations have been inspected.
- Required actions reported on this form must also be reported on form CEM-2035, "Stormwater Site Inspection Report Corrective Actions Summary."
- Locations identified where BMPs are failing or have other shortcomings require repairs or design changes within 72 hours of identification and complete BMP repairs or other changes as soon as possible.

Form

- Contract/Co/Rte/PM
For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.
- Project Identifier Number
Caltrans projects starting July 1, 2010, will have a Project Identifier Number. For projects without a project identifier number, write N/A in the field.
- WDID Number
For projects with Water Pollution Control Program, enter "WPCP" in this field.

Appendix H

CEM-2034 Monthly Stormwater BMPs & Material Inventory Report

- To be submitted monthly to the RE. This form is optional form; the RE will determine its applicability for the contract.
- Includes the status of all required locations of BMPs
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002 <input type="checkbox"/> Risk Level 3
Water Pollution Control Manager (print name and sign)	Date
Submitted by contractor (print name and sign)	Date

Provide a monthly list of stored best management practices and materials on site.

<p>Construction Phase</p> <p><input type="checkbox"/> Highway construction</p> <p><input type="checkbox"/> Plant establishment</p> <p><input type="checkbox"/> Suspension of work (inactive site)</p>	<p>Site Information</p> <p>_____ Total project area (acres)</p> <p>_____ Total project disturbed soil area (acres) .</p> <p>_____ Current phase disturbed soil area (acres)</p> <p>_____ Current phase inactive disturbed soil (acres)</p>
--	---

Stormwater Best Management Practices and Materials on Site

MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Best Management Practices and Materials on Site

MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 3 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Best Management Practices and Materials on Site

MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS

INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 4 of 4

Instructions

General Information

- The Water Pollution Control Manager must oversee preparation of this form and submit a copy to the resident engineer every month.
- Attach additional copies of page 2 and page 3 of this form to include all required locations.
- Insert consecutive numbers for each location when using page 2 or page 3 of this form

BMP Name	BMP ID
Temporary Soil Stabilization	
Preservation of existing vegetation	SS-02
Hydraulic mulch	SS-03
Hydroseeding	SS-04
Soil binders	SS-05
Straw mulch	SS-06
Geotextiles, mats, plastic covers, and lined ditches	SS-07
Wood mulching	SS-08
Earth dikes, drainage swales and lined ditches	SS-09
Outlet protection and velocity dissipation devices	SS-10
Slope drains	SS-11
Streambank stabilization	SS-12
Temporary Sediment Control	
Silt fence	SC-01
Sediment or settling basin	SC-02
Sediment trap	SC-03
Checkdams	SC-04
Fiber rolls	SC-05
Gravel bag berm	SC-06
Sandbag barrier	SC-08
Straw bale barrier	SC-09
Storm drain inlet protection	SC-10
Wind Erosion Control	
Wind erosion control	WE-01
Tracking Controls	
Stabilized construction entrance and exit	TC-01
Stabilized construction roadway	TC-02
Entrance and exit tire wash	TC-03
Street sweeping	TC-04

BMP Name	BMP ID
Non-Stormwater Management	
Water conservation practices	NS-01
Dewatering operations	NS-02
Paving and grinding operations	NS-03
Temporary stream crossing	NS-04
Clear water diversion	NS-05
Illegal connection or discharge detection and reporting	NS-06
Potable water and irrigation	NS-07
Vehicle and equipment cleaning	NS-08
Vehicle and equipment fueling	NS-09
Vehicle and equipment maintenance	NS-10
Pile-driving operations	NS-11
Concrete curing	NS-12
Material and equipment use over water	NS-13
Concrete finishing	NS-14
Structure demolition or removal over or adjacent to water	NS-15
Waste Management and Pollution Control	
Material delivery and storage	WM-01
Material use	WM-02
Stockpile management	WM-03
Spill prevention and control	WM-04
Solid waste management	WM-05
Hazardous waste management	WM-06
Contaminated soil management	WM-07
Concrete waste management	WM-08
Sanitary or septic waste management	WM-09
Liquid waste management	WM-10

Appendix I

CEM-2035 Stormwater Corrective Actions Summary

- Required by the CGP or LTCGP.
- Verifies stormwater corrective actions identified in a stormwater site inspection report were documented and corrected.
- Corrective actions must begin within 72 hours of the site inspection, if a rain event is forecasted, corrective actions must be completed prior to the rain event to prevent sediment or other materials from being carried by stormwater and discharged.
- For LTCGP projects, use CEM-2035T Stormwater Corrective Actions Summary- Lake Tahoe Hydrologic Unit
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER CORRECTIVE ACTIONS SUMMARY

CEM-2035 (REV 11/2013)

Page 1 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM	
		PROJECT IDENTIFIER NUMBER	
		WDID NUMBER	
CONTRACTOR NAME AND ADDRESS		SWPPP PROJECT SITE RISK LEVEL	
		<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP
		<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.
Submitted by contractor (print and sign name)			Date
Implement required actions identified in this Stormwater Corrective Actions Summary as soon as possible, but actions must begin within 72 hours of the site inspection, or be completed before the next predicted rain event, whichever is sooner.			
Corrective action number	Verification of Stormwater Site Inspection Corrective Actions		Date Corrective Actions Identified:
	BMP Type		Location
	Required Action		Comments
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type		Location
	Required Action		Comments
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type		Location
	Required Action		Comments
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type		Location
	Required Action		Comments
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type		Location
	Required Action		Comments
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type		Location
	Required Action		Comments
	Date Completed	Verified by (print name and title)	Verified by (signature)

STORMWATER CORRECTIVE ACTIONS SUMMARY

CEM-2035 (REV 11/2013)

Page 2 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Site Inspection Report Corrective Action Summary Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the people who manage the system or are directly responsible for gathering the information, the information submitted is true, accurate, and complete to the best of my knowledge and belief. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
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Water Pollution Control Manager (signature)

Stormwater Site Inspection Report Corrective Action Summary Acceptance

Resident Engineer (name)	Date
--------------------------	------

Resident Engineer (signature)

Instructions**General Information**

- If the summary form does not have enough lines to report all required actions, use additional copies of this form's page 1 to report all required corrective actions from an inspection form.
- On page 1 of this form and additional copies of page 1, insert consecutive numbers for each required corrective action.

Required Actions

- Identified locations—where BMPs are failing or have other shortcomings—require repairs or design changes within 72 hours of identification and complete BMP repairs or other changes as soon as possible, or before the next predicted rain event, whichever is sooner, per the Lake Tahoe Hydrologic Unit Permit.
- Daily inspections required for waste containers (covered at end of shift), tracking, and others per project specifications.

PROJECT INFORMATION NAME AND SITE ADDRESS:	CONTRACTOR NAME AND ADDRESS:	CONTRACT NUMBER/CO/RTE/PM: PROJECT IDENTIFIER NUMBER:
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME):	DATE:	WDID NUMBER:

Implement required actions identified in this Stormwater Corrective Actions Summary as soon as possible, but required action must be completed within 72 hours of the site inspection, or be completed before the next predicted rain event, whichever is sooner.

Week Ending:

Water Pollution Control Manager Signature

Date:

Caltrans Resident Engineer Signature:

Date:

STORMWATER CORRECTIVE ACTIONS SUMMARY-**LAKE TAHOE HYDROLOGIC UNIT**

CEM-2035T (NEW 05/2015)

Page 2 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS:	CONTRACT NUMBER/CO/RTE/PM:
	PROJECT IDENTIFIER NUMBER:
	WDID NUMBER:

Stormwater Site Inspection Report Corrective Action Summary Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the people who manage the system or are directly responsible for gathering the information, the information submitted is true, accurate, and complete to the best of my knowledge and belief. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Water Pollution Control Manager (name):	Date:
---	-------

Water Pollution Control Manager (signature):
--

Stormwater Site Inspection Report Corrective Action Summary Acceptance

Resident Engineer (name):	Date:
---------------------------	-------

Resident Engineer (signature):

Instructions

- If the summary form does not have enough lines to report all required actions, use additional copies of this form's page 1 to report all required corrective actions from an inspection form.
- On page 1 of this form and additional copies of page 1, insert consecutive numbers for each required corrective action.

Required Actions

- Identified locations—where best management practices are failing or have other shortcomings—require repairs or design changes within 72 hours of identification and complete best management practices repairs or other changes as soon as possible, or before the next predicted rain event, whichever is sooner, per the Lake Tahoe Hydrologic Unit Permit.
- Daily inspections required for waste containers (covered at end of shift), tracking, and others per project specifications.

Appendix J

CEM-2045 REAP Highway Construction Phase

- The REAP should be implemented in accordance with the CGP Risk Levels 2 and 3 and for all LTCGP projects.
- To document actions required before predicted rain event.
- For a CGP risk level 2 or risk level 3 project, submit a rain event action plan at least 48 hours before a forecasted storm event if the NWS predicts a storm event with at least a 50 percent probability of precipitation within 72 hours.
- For LTCGP projects, use CEM-2045T, Rain Event Action Plan –Lake Tahoe Hydrologic Unit
- For a project in the Lake Tahoe Hydrologic Unit, submit a rain event action plan at least 24 hours before a forecasted storm event if the NWS predicts a storm event with at least a 30 percent probability of precipitation in the project area within 72 hours.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 1 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL
	<input type="checkbox"/> Risk Level 2 <input type="checkbox"/> Risk Level 3

Submitted by contractor (print and sign name) Date

Water Pollution Control Manager name and company name	Phone number
	Emergency (24/7) phone number
Erosion and sediment control provider or subcontractor name and company	Phone number
	Emergency (24/7) phone number
Stormwater sampling and testing agent or subcontractor name and company	Phone number
	Emergency (24/7) phone number

Storm Information

Attach forecasted precipitation information from the National Weather Service Forecast Office website, <http://www.srh.noaa.gov/forecast>.

Project site ZIP code	Date forecast checked	Time forecast checked
Forecast percentage probability of precipitation in 0 - 24 hours	Expected precipitation amount	Date
Forecast percentage probability of precipitation in 24 - 48 hours	Expected precipitation amount	Date
Forecast percentage probability of precipitation in 48 - 72 hours	Expected precipitation amount	Date
Will predicted weather pattern rain event produce 1/2-inch or more rain? <input type="checkbox"/> Yes <input type="checkbox"/> No	Note: A qualifying rain event happens when a predicted weather pattern will produce 1/2-inch or more of precipitation. A qualifying rain event will require stormwater visual monitoring site inspections and sampling and analysis of stormwater discharges.	

Phase Information Highway Construction Phase Plant Establishment Phase Inactive**Sampling Schedule**

Based on the weather forecast, stormwater discharge sampling is required to begin on _____ (date) at approximately _____ (time).
 Stormwater discharge sampling is required every 24 hours during an extended storm event based on the predicted duration of the storm event. It is required on the following dates:

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 2 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM
		PROJECT IDENTIFIER NUMBER
		WDID NUMBER

Activities Associated with Highway Construction Projects, Plant Establishment, Inactive Projects

Check ALL boxes below that apply to current project site.

- | | | |
|--|---|---|
| <input type="checkbox"/> Cleaning and grubbing | <input type="checkbox"/> Finish grading | <input type="checkbox"/> Traffic striping and pavement markings |
| <input type="checkbox"/> Earthwork | <input type="checkbox"/> Structure construction | <input type="checkbox"/> Highway planting |
| <input type="checkbox"/> Culvert construction | <input type="checkbox"/> Soundwall construction | <input type="checkbox"/> Soil amendments |
| <input type="checkbox"/> Rough grading | <input type="checkbox"/> Curbs, gutters, and sidewalks | <input type="checkbox"/> Plant establishment |
| <input type="checkbox"/> Storm drain installation | <input type="checkbox"/> Paving operations | <input type="checkbox"/> Material delivery and storage |
| <input type="checkbox"/> Utility installation water-gas-sewer | <input type="checkbox"/> Finishing roadway | <input type="checkbox"/> Equipment maintenance and fueling |
| <input type="checkbox"/> Structure foundations (including piles) | <input type="checkbox"/> Metal beam guard rail installation | <input type="checkbox"/> Erosion and sediment control |
| <input type="checkbox"/> Subgrade grading | <input type="checkbox"/> Sign installation | <input type="checkbox"/> Other _____ |
| <input type="checkbox"/> Subbase and base placement | <input type="checkbox"/> Highway electrical work | <input type="checkbox"/> Other _____ |

Subcontractors or Trades Active on Site for Highway Construction, Plant Establishment, Inactive Projects

Check All boxes below that apply to current project site.

- | | |
|---|--|
| <input type="checkbox"/> Grading (operating engineers) | <input type="checkbox"/> Curb, gutter and sidewalk (carpenters, laborers and concrete finishers) |
| <input type="checkbox"/> Underground storm drain (operating engineers and laborers) | <input type="checkbox"/> Lighting and signals (operating engineers and electricians) |
| <input type="checkbox"/> Underground utilities (operating engineers and laborers) | <input type="checkbox"/> Metal beam guard rail (operating engineers and laborers) |
| <input type="checkbox"/> Underground utilities (public or private utility company) | <input type="checkbox"/> Signs (operating engineers) |
| <input type="checkbox"/> Pile installation (pile butts) | <input type="checkbox"/> Traffic striping and pavement markings |
| <input type="checkbox"/> Concrete foundations (carpenters, laborers, and concrete finishers) | <input type="checkbox"/> Masonry soundwalls (masons and laborers) |
| <input type="checkbox"/> Bar reinforcement placement | <input type="checkbox"/> Erosion and sediment control |
| <input type="checkbox"/> Structure construction (carpenters and laborers) | <input type="checkbox"/> Highway planting |
| <input type="checkbox"/> Concrete placement (operating engineer, laborers and concrete finishers) | <input type="checkbox"/> Other _____ |
| <input type="checkbox"/> Hot mix asphalt placement (operating engineers and laborers) | <input type="checkbox"/> Other _____ |

Trade (Subcontractor) Information Provided

Check ALL boxes below that apply to current project site.

- | | |
|---|---|
| <input type="checkbox"/> Project SWPPP Handout | <input type="checkbox"/> Tailgate Meetings |
| <input type="checkbox"/> Contract Specifications | <input type="checkbox"/> Poster and Signage |
| <input type="checkbox"/> Educational Material Handout | <input type="checkbox"/> Other _____ |
| <input type="checkbox"/> SWPPP Training Workshop | <input type="checkbox"/> Other _____ |

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 3 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Predicted Rain-Event-Triggered Actions

Activity	Actions Required Before Predicted Rain Event
Information and Scheduling	<p><input type="checkbox"/> Project superintendent informed of predicted rain at _____ (time) on _____ (date).</p> <p><input type="checkbox"/> Foreman and subcontractors informed of predicted rain.</p> <p><input type="checkbox"/> Erosion control or sediment control provider notified to provide:</p> <ul style="list-style-type: none"> <input type="checkbox"/> Pre-storm crew with at least _____ people <input type="checkbox"/> Pre-storm crew to start implementing storm event actions by _____ (time) on _____ (date) <p><input type="checkbox"/> Sample collection and testing provider alerted if non-visible pollutant sampling and testing required.</p> <p>List of non-visible pollutant sampling locations and parameters:</p> <ol style="list-style-type: none"> 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ <p><input type="checkbox"/> Check that adequate erosion and sediment control materials are on hand for:</p> <ul style="list-style-type: none"> <input type="checkbox"/> Pre-storm required actions <input type="checkbox"/> Extended storm event maintenance and repair <p><input type="checkbox"/> Confirm that the BMP site map is updated and provide a copy to erosion and sediment control provider or subcontractor.</p> <p><input type="checkbox"/> Other _____</p> <p><input type="checkbox"/> Other _____</p> <p><input type="checkbox"/> Other _____</p> <p><input type="checkbox"/> Other _____</p>
	Additional Actions Required Before a Qualifying Rain Event
	<p><input type="checkbox"/> Pre-storm stormwater site inspection completed.</p> <p><input type="checkbox"/> Listed corrective actions identified by pre-storm stormwater site inspection that must be corrected before storm event on page 7 of this REAP.</p> <p><input type="checkbox"/> Staff scheduled for inspections during storm.</p> <p><input type="checkbox"/> Erosion control or sediment control provider notified at _____ (time) on _____ (date) to provide crew during the storm event of at least _____.</p> <p><input type="checkbox"/> The attached contingency plan is to be implemented in the event of flooding:</p>

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 4 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Predicted Rain-Event-Triggered Actions, continued

Activity	Construction Site Monitoring Program Actions Required Before a Qualifying Rain Event
Information and Scheduling	<ul style="list-style-type: none"> <input type="checkbox"/> Review the discharge location site map for the current phase of the project and include additional non-visible pollutant sampling locations identified during pre-storm stormwater site inspection. <input type="checkbox"/> Alert sample collection and testing provider that sampling will be required and provide the following: <ul style="list-style-type: none"> <input type="checkbox"/> Updated discharge location site map <input type="checkbox"/> The required number of sampling locations for this phase of the project: <ul style="list-style-type: none"> <input type="checkbox"/> _____ Discharge points <input type="checkbox"/> _____ Run-on locations <input type="checkbox"/> _____ Receiving waters for Risk Level 3 <input type="checkbox"/> _____ Non-visible potential discharge points <p>Run-on Sampling Locations</p> <ol style="list-style-type: none"> 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ <p>Discharge Sampling Locations</p> <ol style="list-style-type: none"> 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ <p>Receiving Water Sampling Locations</p> <ol style="list-style-type: none"> 1. _____ 2. _____ 3. _____ 4. _____ 5. _____

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 5 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Predicted Rain-Event-Triggered Actions, continued

Activity	Construction Site Monitoring Program Actions Required Before a Qualifying Rain Event
Information and Scheduling	<p><input type="checkbox"/> Identify non-visible pollutant testing locations and parameters on page 3.</p> <p><input type="checkbox"/> Sampling will be needed beginning at approximately _____ (time) on _____ (date).</p> <p>* Note: Sample for constituents (turbidity, pH, etc.) per SWPPP.</p>

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 6 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Predicted Rain-Event-Triggered Actions, continued

Activity	Actions Required Before Predicted Rain Event
Material Storage Areas	<input type="checkbox"/> Material covered or in sheds (ex treated woods and metals) <input type="checkbox"/> Stockpiles covered and perimeter control installed <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____
Waste Management Areas	<input type="checkbox"/> Dumpsters closed <input type="checkbox"/> Drain holes plugged <input type="checkbox"/> Recycling bins covered <input type="checkbox"/> Sanitary stations bermed and protected from tipping <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____
Concrete Rinse Out Areas	<input type="checkbox"/> Wash-out bins covered <input type="checkbox"/> Adequate capacity for rain <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____
Operations	<input type="checkbox"/> Operations to shut down for rain event <ul style="list-style-type: none"> <input type="checkbox"/> Grading <input type="checkbox"/> Concrete pours <input type="checkbox"/> Hot mix asphalt paving <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____ <input type="checkbox"/> Soil amendments not to be applied within the 24 hours before a rain event <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____

RAIN EVENT ACTION PLAN

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM PROJECT IDENTIFIER NUMBER WDID NUMBER
---	---

Predicted Rain-Event-Triggered Actions, continued

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 8 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Certification of Rain Event Action Plan

I certify under penalty of law that this Rain Event Action Plan (REAP) will be implemented in accordance with the Construction General Permit by me or under my direction or supervision. The information contained in this REAP was gathered and evaluated by qualified personnel before submittal. Based on my review of the information and inquiry of those who gathered and evaluated the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete.

I am aware that Section 309 (c)(4) of the CWA provides for significant penalties, including fines and imprisonment for knowingly submitting false material statement, representation or certification.

Water Pollution Control Manager name	Date
--------------------------------------	------

Water Pollution Control Manager signature

Accepted by resident engineer name	Date
------------------------------------	------

Resident engineer signature

RAIN EVENT ACTION PLAN

CEM-2045 (REV 11/2013)

Page 9 of 9

Instruction**General Information**

- This form must be completed for Risk Level 2 and Risk Level 3 projects with the chance for precipitation of 50 percent or greater, within 72 hours of the forecast date. The Rain Event Action Plan (REAP) must be developed 48 hours prior to any likely precipitation rain event (any weather pattern that is forecast to have a 50 percent or greater probability of producing precipitation in the project area).
- The CGP requires a pre-storm inspection within two business days (48 hours) prior to a "qualifying rain event" which is defined as any event producing precipitation of 0.5 inch or more over the duration of the rain event. Because the size of a rain event cannot be accurately predicted, Caltrans requires a pre-storm inspection based on a forecasted storm event, which is defined as any rain event that is forecasted to produce 0.1 inch or more of precipitation within any 24-hour period. The trigger for a pre-storm event visual inspection is the same as for a Rain Event Action Plan: 50 percent or greater probability of producing 0.1 inch or more of precipitation within any 24-hour period in the project area based on the National Weather Service Forecast Office (National Oceanic and Atmospheric Administration).
- Within 24 hours prior to a storm event, the REAP must be submitted to the resident engineer. The REAP must be made available on site and implementation begun no later than 24 hours prior to the likely precipitation event.
- File this form in SWPPP File Category 20.45.

Form

- **Contract Number/Co/Rte/PM**
For encroachment permit projects, write the local agency or private entity encroachment permit number in the contract number field.
- **Project Identifier Number**
For projects without a number, write N/A in the field.

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RAIN EVENT ACTION PLAN—LAKE TAHOE HYDROLOGIC UNIT

CEM-2045T (REV 05/2015)

Page 1 of 5

PROJECT INFORMATION NAME AND SITE ADDRESS:	CONTRACT NUMBER/CO/RTE/PM:	
CONTRACTOR NAME AND ADDRESS:	PROJECT RESIDES IN THE LAKE TAHOE HYDROLOGIC UNIT AND IS REGULATED UNDER ORDER NO. R6T-2011-0019, NPDES NO. CAG616002.	
Submitted By Contractor (Print and Sign Name):	Date:	
Water Pollution Control Manager Name and Company Name:	Phone Number:	
	Emergency (24/7) Phone Number:	
Erosion and Sediment Control Provider or Subcontractor Name and Company:	Phone Number:	
	Emergency (24/7) Phone Number:	
Stormwater Sampling and Testing Agent or Subcontractor Name and Company:	Phone Number:	
	Emergency (24/7) Phone Number:	
Storm Information		
Attach forecasted precipitation information from the National Weather Service Forecast Office website, http://www.srh.noaa.gov/forecast ; if accessible attach the Forecast weather table interface.		
Project Site ZIP Code:	Date Forecast Checked:	Time Forecast Checked:
Forecast Percentage Probability of Precipitation in 0 - 24 Hours:	Expected Precipitation Amount:	Date:
Forecast Percentage Probability of Precipitation in 24 - 48 Hours:	Expected Precipitation Amount:	Date:
Forecast Percentage Probability of Precipitation in 48 - 72 Hours:	Expected Precipitation Amount:	Date:
Is predicted weather pattern anticipated to produce run off? <input type="checkbox"/> Yes <input type="checkbox"/> No	Note: A qualifying rain event happens when a predicted weather pattern will produce precipitation in the form of rain that causes run off. A qualifying rain event will require stormwater visual monitoring site inspections and sampling and analysis of stormwater discharges.	

Prestorm/Corrective Actions Summary Information

Pre-storm Inspection Date: _____ Corrective Actions Summary Deficiency Completed Yes No Date Completed: _____

Sampling Schedule

Based on the weather forecast, stormwater discharge sampling is required to begin on _____ (date) at approximately _____ (time) _____ (AM/PM).

Stormwater discharge sampling is required every 24 hours during an extended storm event based on the predicted duration of the storm event on the following dates:

RAIN EVENT ACTION PLAN—LAKE TAHOE HYDROLOGIC UNIT

CEM-2045T (REV 05/2015)

Active Work Areas/Locations, Type of Work, Temporary BMPs

List all active work locations with each type of work. List what type of temporary BMPs will be installed prior to the onset of rain.

Work Area Location Number	Work Area/Location	Types of Work	Temporary BMPs to be installed prior to onset of rain

Pre-storm Inspection Identified Corrective Action Items to be Completed Prior to the Onset of Rain

Work Area Location Number	Identified Deficiency Location	Deficiency	Required Action	Deficiency Number from CEM-2035

Pre-storm Inspection Identified Corrective Actions	Corrective Action Number			
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____
	_____	_____	_____	_____

RAIN EVENT ACTION PLAN—LAKE TAHOE HYDROLOGIC UNIT

CEM-2045T (REV 05/2015)

Sampling Locations

Priority Number	Work Area/Location	Sample Location Identification	Sample Type	Analysis	Lab Sample Number, if sent
1					
2					
3					
4					
5					
6					
7					
8					
9					
10					

Sample Type:

- Discharge Location (D)
- Run-on Location (RO)
- Receiving Water Location (RW)

Note: • Take sample for constituents (turbidity, pH, etc.) per SWPPP.

- Prioritize sample discharge locations for active work locations for representative construction site run off.
- All sampling discharge locations must be sampled during a qualifying rain event.

RAIN EVENT ACTION PLAN—LAKE TAHOE HYDROLOGIC UNIT

CEM-2045T (REV 05/2015)

Predicted Rain Event-Triggered Actions**Actions Required Before Predicted Rain Event**

- Pre-storm crew with at least _____ people
- Pre-storm crew to start implementing storm event actions by _____ (time)
on _____ (date)
- Check for adequate erosion and sediment control materials on hand for
- Pre-storm required actions
 - Extended storm event maintenance and repair
- Pre-storm stormwater site inspection completed.
- Corrective actions identified by pre-storm stormwater site inspection that must be corrected before storm event and listed on page 2 of this Rain Event Action Plan.
- Staff scheduled for inspections during storm.

Construction Site Monitoring Program Actions Required Before a Qualified Rain Event

- Review the discharge location site map for the current phase of the project, prioritize and include additional non-visible pollutant sampling locations identified during pre-storm stormwater site inspection.

RAIN EVENT ACTION PLAN—LAKE TAHOE HYDROLOGIC UNIT

CEM-2045T (REV 05/2015)

Page 5 of 5

Certification of Rain Event Action Plan (REAP)

I certify under penalty of law that this REAP will be implemented in accordance with the Lake Tahoe Hydrologic Unit Permit by me or under my direction or supervision. The information contained in this REAP was gathered and evaluated by qualified personnel before submittal. Based on my review of the information and inquiry of those who gathered and evaluated the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete.

I am aware that Section 309(c)(4) of the Clean Water Act provides for significant penalties, including fines and imprisonment for knowingly submitting false material statement, representation or certification.

Water Pollution Control Manager Name:	Date:
---------------------------------------	-------

Water Pollution Control Manager Signature:

Accepted by Resident Engineer Name:	Date:
-------------------------------------	-------

Resident Engineer Signature:

Instructions**General Information**

- This form must be completed for projects in the Lake Tahoe Hydrologic Unit with the chance for precipitation of 30 percent, or greater, within 48 hours of the forecast date. The REAP must be developed no later than 24 hours before any anticipated precipitation rain event (any weather pattern that is forecast to have a 30 percent, or greater, probability of producing precipitation in the project area).
- Within 24 hours before an anticipated rain event, the REAP must be submitted to the resident engineer. The REAP must be made available on site and implementation begun no later than 24 hours before the anticipated precipitation rain event.
- File this form in SWPPP File Category 20.45.

Form

- **Contract Number/Co/Rte/PM**
For encroachment permit projects, write the local agency or private entity encroachment permit number in the contract number field.
- **Project Identifier Number**
For projects without a number, write N/A in the field.

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Appendix K

CEM-2051 Stormwater Sampling and Testing Activity Log (Optional)

Optional form to document details of all sampling events and to record results for samples; the RE will determine its applicability for the contract.

- The most recent Caltrans forms are available at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER SAMPLING AND ANALYSIS LOG - OPTIONAL

CEM-2051 (REV 1/2014)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG816002. <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> Risk Level 3
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE

STORMWATER SAMPLING AND ANALYSIS LOG REVIEW

I have reviewed this document and based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete.

Are laboratory test results attached to this stormwater sampling and analysis log submittal?

YES NO

Water Pollution Control Manager Signature	Date
---	------

STORMWATER SAMPLING AND ANALYSIS LOG - OPTIONAL

CEM-2051 (REV 1/2014)

CONTRACT NUMBER/CO/RT/EP/M		PROJECT IDENTIFIER NUMBER		WDID NUMBER		DATE		
STORMWATER SAMPLING AND ANALYSIS LOG								
Log Number	Date of Sampling	Sampling Location	Time Sample Taken	Amount of Precipitation	Sample Identification	Analysis	Daily Average Analysis Result	Lab Report Attached
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No
					<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/>			<input type="checkbox"/> Yes <input type="checkbox"/> No

STORMWATER SAMPLING AND ANALYSIS LOG - OPTIONAL

CEM-2051 (REV 1/2014)

Instructions**General Information**

- The information shown on this form is required for projects with a Stormwater Pollution Prevention Plan (SWPPP) to document stormwater sampling and analysis. The information on this form is required for the stormwater annual report for SWPPP projects.
- Complete this form after every storm event that requires sampling and analysis.
- Complete this form weekly for logging non-stormwater sampling and analysis, and indicate in the sampling location column the reason for non-stormwater samples, such as sample from dewatering operation.
- This form is provided as an optional management tool, to be used at the discretion of the water pollution control manager.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

Log No.

Log numbering should be consecutive starting from the first storm event to the last storm event for a project.

Amount of Precipitation

Enter the cumulative amount of precipitation from the storm event at the time each sample is taken.

Analysis Result

For turbidity and pH, a minimum of three samples is required to determine the daily average. If more than three daily samples are taken, use two rows to report all samples, and report the daily average in the second row.

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Appendix L

CEM-2052 Stormwater Sample Field Test Report Form

- Required by the Caltrans Permit, CGP or LTCGP to document compliance with permit requirements.
- All sampling and sample preservation must be in accordance with the current American Public Health Association edition of "Standard Methods for the Examination of Water and Wastewater."
- Samples are collected, maintained, and shipped according to the Surface Ambient Monitoring Program's 2013 Quality Assurance Program Plan.
- A separate Stormwater Sample Laboratory Analysis Report shall be completed for each sampling location daily.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER SAMPLE FIELD TEST REPORT/ RECEIVING WATER MONITORING REPORT

CEM-2052 (REV 7/2014)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002. <input type="checkbox"/> Risk Level 3
Submitted by contractor (print and sign name)	Date

Stormwater Samples Analysis

Date of sampling

Sample location identification number	Date of Analysis
Sample Analyzed By (signature)	Samples to be analyzed for parameters
Sampled Analyzed By (print name)	<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____
Analyzer Phone Number () Company	

Turbidity Analysis Information

Meter Manufacturer	Model Number	Serial Number	Calibration Date
Analytical Method	Method Reporting Unit	Method Detection Limit	

pH Analysis Information

pH Meter Manufacturer	Model Number	Serial Number	Calibration Date
Analytical Method	Method Reporting Unit	Method Detection Limit	

STORMWATER SAMPLE FIELD TEST REPORT/ RECEIVING WATER MONITORING REPORT

CEM-2052 (REV 7/2014)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Turbidity Calibration Record

pH Calibration Record

Buffer Solution Expiration Date: pH4.0 Date _____ pH7.0 Date _____ pH10.0 Date _____

Stormwater Sample Analysis Results - Discharge Points

Stormwater Sample Analysis Results - Run-On Points

Sample Identification	Exception See Instructions	pH	NTU	Parameter Analysis *		
				Time Sample Collected	Time Sample Read	Sample Value and Units
Qualifying Rain Event Daily Average Analysis Result						

* Complete and attach CEM-2058 to document calibration of instruments used to analyze these parameters.

**STORMWATER SAMPLE FIELD TEST REPORT/
RECEIVING WATER MONITORING REPORT**

CEM-2052 (REV 7/2014)

Page 3 of 4

Receiving Water Sample Analysis Results

Sample Identification	Exception See Instructions	pH	NTU	SSC	Parameter Analysis *		
					Time Sample Collected	Time Sample Read	Sample Value and Units
Qualifying Rain Event Daily Average Analysis Result							

Review and Record Keeping

Test results entered into sampling and testing activity log?	Numeric action level exceedance? <input type="checkbox"/> Yes <input type="checkbox"/> No	Receiving water monitoring triggers exceeded? <input type="checkbox"/> Yes <input type="checkbox"/> No	ATS NEL exceeded? <input type="checkbox"/> Yes <input type="checkbox"/> No
--	---	--	--

* Complete and attach CEM-2058 to document calibration of instruments used to analyze these parameters.

**STORMWATER SAMPLE FIELD TEST REPORT/
RECEIVING WATER MONITORING REPORT**

CEM-2052 (REV 7/2014)

Page 4 of 4

Instructions**General Information**

- This form is required for compliance with provisions in Section I of Attachments C, D, and E of the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES No. CAS000002 and provisions of General Waste Discharge Requirements and National Pollutant Discharge Elimination System Permit for Lake Tahoe Hydrologic Unit Order No. R6T-2011-0019 NPDES No. CAG616002.
- The Caltrans, *Construction Site Monitoring Program Guidance Manual*, latest edition, contains sampling guidance.
- Complete form CEM-2058 if other parameters are tested.
- Sampling and sample preservation must be in accordance with the current edition of "Standard Methods for the Examination of Water and Wastewater" (American Public Health Association).
- Collect, maintain, and ship samples according to the State Water Resources Control Board's (SWRCB), Surface Water Ambient Monitoring Program's (SWAMP) Quality Assurance Program Plan (QAPrP), latest edition.
- Complete a separate stormwater sample field analysis report daily for each sampling location.
- Include a copy of the completed form in the project Stormwater Pollution Prevention Plan files.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Analysis Result

Analytical results less than the method detection limit must be reported as "less than the method detection limit".

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, enter N/A in the field.

Qualifying Rain Event Daily Average Analysis Result

A minimum of three daily samples are required to calculate the daily average for a qualifying rain event.

Sample pH Analysis

Sample pH reading must be done within 15 minutes of sample collection.

Numeric Action Level Exceedance

In the event that any daily average effluent samples analysis results exceeds an applicable Numeric Action Level (NAL), complete form CEM-2062 "Numeric Action Level Exceedance Report," and submit all storm event sampling results to the State Water Resources Control Board (SWRCB) no later than ten days after the conclusion of the storm event.

Receiving Water Monitoring Trigger (RWMT) Exceedance

In the event that any daily average RWMT is exceeded, complete form CEM-2062, "Numeric Action Level Exceedance Report / Receiving Water Monitoring Trigger Report" and submit all storm event sampling results to the resident engineer within six hours.

Add Exceptions Reasons:

- N - No Run-off at time of inspection
- O - Outside of normal business hours
- U - Unsafe conditions/unsafe access

Appendix M

CEM-2058 Stormwater Meter Calibration Record Form

- Required for projects with Construction Site Monitoring Program as part of the SWPPP to document stormwater analyses meter calibration.
- Conductivity Meter Calibration Record
- Dissolved-Oxygen Meter Calibration Record
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER METER CALIBRATION RECORD - SPECIALTY METERS

CEM-2058 (REV 12/2013)

Page 1 of 3

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002. <input type="checkbox"/> Risk Level 3

SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE
---	------

MeterMulti-meter: YES NO

Meter Manufacturer	Meter Model Number	Meter Serial Number
--------------------	--------------------	---------------------

Conductivity Meter Calibration Date

Standard Solution (uS/cm)	Cal Standard Solution Expiration Date	Initial Calibration		Re-Calibration		Drift Check		Notes	Initials		
		Time		Time		Time					
		Cal	Read	Cal	Read	Read	Acceptable Performance				

Meter Manufacturer	Meter Model Number	Meter Serial Number
--------------------	--------------------	---------------------

Dissolved Oxygen Meter Calibration Date

Standard	Cal Standard Solution Expiration Date	Initial Calibration		Re-Calibration		Drift Check		Notes	Initials		
		Time		Time		Time					
		Cal	Read	Cal	Read	Read	Acceptable Performance				

STORMWATER METER CALIBRATION RECORD - SPECIALTY METERS

CEM-2058 (REV 12/2013)

Page 2 of 3

PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM
		PROJECT IDENTIFIER NUMBER
		WDID NUMBER

Meter Manufacturer	Meter Model Number	Meter Serial Number
--------------------	--------------------	---------------------

Meter Calibration Date

Standard	Cal Standard Solution Expiration Date	Initial Calibration		Re-Calibration		Drift Check		Notes	Initials		
		Time		Time		Time					
		Cal	Read	Cal	Read	Read	Acceptable Performance				

Meter Manufacturer	Meter Model Number	Meter Serial Number
--------------------	--------------------	---------------------

Meter Calibration Date

Standard	Cal Standard Solution Expiration Date	Initial Calibration		Re-Calibration		Drift Check		Notes	Initials		
		Time		Time		Time					
		Cal	Read	Cal	Read	Read	Acceptable Performance				

Date	Notes

Review

I have reviewed this document and, based on my inquiry of the person or persons who manage the system of those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete.

Water Pollution Control Manager	Date
---------------------------------	------

Water Pollution Control Manager Signature

STORMWATER METER CALIBRATION RECORD - SPECIALTY METERS

Instructions

General Information

- Projects with a Construction Site Monitoring Program require the information on this form as part of the Stormwater Pollution Prevention Plan for specialty stormwater analysis meter calibration if a specialty meter was used. This form is not intended to be used with a turbidity or pH meter.
- Completed forms shall be filed in project file category 20.55, Field Testing Equipment Maintenance and Calibration Records.

Form

Contract Number/Co/Rte/PM

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write "N/A" in the field.

Acceptable performance for conductivity drift is ± 10 percent, and acceptable performance for dissolved oxygen is ± 10 percent.

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Appendix N

CEM-2061 Notice of Discharge Form

- Required by Caltrans to document compliance with the Caltrans Permit and CGP or LTCGP.
- To be completed when discharges are causing or contributing to an exceedance of an applicable water quality standard.
- Sampling guidance is found in the current edition of the Caltrans *Construction Site Monitoring Program Guidance Manual*.
- For LTCGP projects, use CEM-2061T Notice of Discharge Report - Lake Tahoe Hydrologic Unit Stormwater Sample Field Test Report/Receiving Water Monitoring Report
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM	
	PROJECT IDENTIFIER NUMBER	
	WDID NUMBER	
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL	
	<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP
<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.	
<input type="checkbox"/> Risk Level 3		

Submitted by contractor (print and sign name)

Date

Notice of Discharge General Information

Location			Date discharge discovered	
Discharge identified by stormwater visual site inspection?	Discharge discovered by contractor during daily work?	Discharge samples taken?	Discharge type	Exceedance of applicable water quality standard
			<input type="checkbox"/> Stormwater	<input type="checkbox"/> Turbidity
<input type="checkbox"/> YES	<input type="checkbox"/> YES	<input type="checkbox"/> YES	<input type="checkbox"/> Authorized non-stormwater	<input type="checkbox"/> pH
<input type="checkbox"/> NO	<input type="checkbox"/> NO	<input type="checkbox"/> NO	<input type="checkbox"/> Non-authorized non-stormwater	<input type="checkbox"/> _____
Discharge identified by Regional Water Quality Control Board?		Discharge identified by State Water Resources Control Board?		Date and time water pollution control manager notified of discharge
<input type="checkbox"/> YES		<input type="checkbox"/> YES		Date and time resident engineer notified of discharge
<input type="checkbox"/> NO		<input type="checkbox"/> NO		

Storm Event Information*Complete this section for stormwater discharges*

Start of storm event	End of storm event	Duration of storm event	Storm event precipitation amount recorded from site rain gauge	Storm event precipitation amount recorded from governmental rain gauge
<u>Date</u> <u>Time</u>	<u>Date</u> <u>Time</u>	<u>Hours : Minutes.</u>	<u> inches</u>	<u> inches</u>

Notice of Discharge Information

Photographs

The nature and cause of the water quality standard exceedance, based on a visual observation of the discharge location	<input type="checkbox"/> YES <input type="checkbox"/> NO
BMPs currently installed at the location of the discharge	<input type="checkbox"/> YES <input type="checkbox"/> NO
Additional BMPs that will be implemented to prevent or reduce pollutants causing or contributing to exceedance of a water quality standard	

Implementation schedule for additional BMPs

NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Notice of Discharge Information (continued)

Maintenance or repair of BMPs

Implementation schedule for BMPs maintenance or repair

Other required corrective actions

Implementation schedule for corrective actions

Summary of actions taken to reduce the pollutants causing or contributing to the water quality standard exceedance

Sampling and Analysis Results

Required when discharge samples are taken. Attach CEM-2052 or lab results report

- Are discharge samples taken? YES NO
- Is CEM-2052 attached? YES NO N/A
- Is lab results report attached? YES NO RESULTS PENDING
- If applicable, provide lab information: lab name, contract name, date samples sent, attach a copy of chain of custody, etc.

NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

Page 3 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Notice of Discharge Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
--	------

Water Pollution Control Manager (signature)

For Caltrans Use

Accepted by Resident Engineer (name)	Date
--------------------------------------	------

Resident Engineer(signature)

Discharge reported by telephone or email to the Regional Water Quality Control Board (RWQCB) within 48 hours of discovery?	Date discharge reported to RWQCB	Resident engineer initials
--	----------------------------------	----------------------------

A. Immediately and no later than 24 hours after discovery? <input type="checkbox"/> YES <input type="checkbox"/> NO B. Within 5 working days? <input type="checkbox"/> YES <input type="checkbox"/> NO C. As soon as possible but within 48 hours? <input type="checkbox"/> YES <input type="checkbox"/> NO		
---	--	--

Notice of Discharge Report submitted to RWQCB within 14 days (3 days for District 7 and District 11)?	Date report submitted to RWQCB	Resident engineer initials
---	--------------------------------	----------------------------

A. Within 24 hours? <input type="checkbox"/> YES <input type="checkbox"/> NO B. Within 14 days (3 days for District 7 and 11)? <input type="checkbox"/> YES <input type="checkbox"/> NO		
--	--	--

Discharge reported orally to the Lahontan RWQCB within 24 hours of discovery? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date called Lahontan RWQCB	Resident engineer initials
--	----------------------------	----------------------------

Electronic submittal of NEL exceedance sample results to Lahontan RWQCB and SMARTS within 5 business days? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date report submitted	Resident engineer initials
---	-----------------------	----------------------------

NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

Page 4 of 4

Instructions**General Information**

- This form is required for compliance with provisions in Section E-2, "Receiving Water Limitations for Construction," of the National Pollutant Discharge Elimination System (NPDES) Permit Statewide Storm Water Permit and Waste Discharge Requirements (WDRs) for the State of California, Department of Transportation (Caltrans), Order No. 99-06-DWQ, NPDES No. CAS000003.
- This form is to be completed when the contractor, Caltrans, State Water Resources Control Board, or Regional Water Quality Control Board staff determines that stormwater discharges, authorized non-stormwater discharges, or non-authorized, non-stormwater discharges are causing or contributing to an exceedance of an applicable water quality standard.
- This form is appropriate when there is evidence of a discharge that occurred outside of business hours where no sampling occurred.
- Water quality standards are contained in the Statewide Water Quality Control Plan or applicable Regional Water Quality Control Boards (RWQCBs) Basin Plan.
- Water quality standards are contained in the Statewide Water Quality Control Plan or applicable Regional Water Quality Control Boards (RWQCBs) Basin Plan.
- Sampling guidance is found in the current edition of the *Construction Site Monitoring Program Guidance Manual*.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.

Form

- **Project Identifier Number**
Caltrans projects starting July 1, 2010, will have a project identifier number. For projects without a number, write N/A in the field.
- **Contract Number/Co/Rte/PM**
For encroachment permit projects, write the local agency or private entity encroachment permit number in the contract number field.
- **Storm Event Information**
Leave section blank if box is checked for either authorized or non-authorized non-stormwater discharge.
- **Discharge Information**
Do not leave any subsection blank. Caltrans permit specifically requires Caltrans to submit the information in this section to RWQCBs. For non-stormwater discharges, describe the construction operation or activity that caused the discharge.
- **Sampling and Analysis Results**
Leave this section blank if the no box is checked for discharge samples taken.
- **Analysis Results**
Analytical results less than the method detection limit shall be reported as "Less than the method detection limit."
- **Analysis Information**
Leave section blank if the no box is checked for discharge samples taken.
- **Notice of Discharge Report Certification**
For instruction on reporting timelines, see Section 9.4, Noncompliance Reporting, of Statewide Stormwater Management Plan, May 2003.

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT**STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

CEM-2061T (REV 05/2015)

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PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM
		PROJECT IDENTIFIER NUMBER
		WDID NUMBER
CONTRACTOR NAME AND ADDRESS		PROJECT RESIDES IN THE LAKE TAHOE HYDROLOGIC UNIT AND IS REGULATED UNDER ORDER NO. R6T-2011-0019, NPDES NO. CAG616002.

Submitted by contractor (print and sign name)

Date

Notice of Discharge General Information

Location			Date discharge discovered	
			Discharge type	
Discharge identified by visual site inspection? <input type="checkbox"/> YES <input type="checkbox"/> NO	Discharge discovered by contractor during daily work? <input type="checkbox"/> YES <input type="checkbox"/> NO	Discharge samples taken? <input type="checkbox"/> YES <input type="checkbox"/> NO	<input type="checkbox"/> Stormwater	Exceedance of applicable water quality standard <input type="checkbox"/> Turbidity (NEL) <input type="checkbox"/> pH (NAL) <input type="checkbox"/> _____
			<input type="checkbox"/> Authorized non-stormwater	
			<input type="checkbox"/> Non-authorized non-stormwater	
Discharge identified by Regional Water Quality Control Board? <input type="checkbox"/> YES <input type="checkbox"/> NO		Date and time water pollution control manager notified of discharge		
		Date and time resident engineer notified of discharge		

Storm Event Information*Complete this section for stormwater discharges*

Start of storm event Date Time	End of storm event Date Time	Duration of storm event Hours : Minutes.	Storm event precipitation amount recorded from site rain gauge _____ inches	Storm event precipitation amount recorded from governmental rain gauge _____ inches
--	--	---	--	--

Notice of Discharge Information

Photographs

The nature and cause of the water quality standard exceedance, based on a visual observation of the discharge location

 YES
 NO

BMPs currently installed at the location of the discharge

 YES
 NO

Additional BMPs that will be implemented to prevent or reduce pollutants causing or contributing to exceedance of a water quality standard

Implementation schedule for additional BMPs

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT**STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

CEM-2061T (REV 05/2015)

Page 2 of 5

Notice of Discharge Information (continued)

Maintenance or repair of BMPs

Implementation schedule for BMPs maintenance or repair

Other required corrective actions

Implementation schedule for corrective actions

Summary of actions taken to reduce the pollutants causing or contributing to the water quality standard exceedance

Sampling and Analysis Information

Required when discharge samples are taken. Attach lab results report if applicable.

- Are discharge samples taken? YES NO
- Is lab results report attached? YES NO RESULTS PENDING
- If applicable, provide lab information: lab name, contract name, date samples sent, attach a copy of chain of custody, etc.

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT
STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT

CEM-2061T (REV 05/2015)

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Stormwater Samples Analysis

Date of sampling

Sample location identification number	Date of analysis
Sample analyzed by (signature)	Samples to be analyzed for parameters
Sample analyzed by (print name)	<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____
Analyzer phone number ()	
Company	

Field Turbidity Analysis Information

Meter Manufacturer	Model Number	Serial Number	Calibration Date
Analytical Method	Method Reporting Unit	Method Detection Limit	

Field pH Analysis Information

pH Meter Manufacturer	Model Number	Serial Number	Calibration Date
Analytical Method	Method Reporting Unit	Method Detection Limit	

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT**STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

CEM-2061T (REV 05/2015)

Page 4 of 5

Notice of Discharge Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
--	------

Water Pollution Control Manager (signature)

For Caltrans Use

Accepted by Resident Engineer (name)	Date
--------------------------------------	------

Resident Engineer(signature)

Discharge reported orally to the Lahontan RWQCB within 24 hours of discovery?	Date called Lahontan RWQCB	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		
Electronic submittal of NEL exceedance sample results to Lahontan RWQCB and SMARTS within 5 business days?	Date report submitted	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT**STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

CEM-2061T (REV 05/2015)

Page 5 of 5

INSTRUCTIONS**General Information**

- This form is to be completed when the contractor, Department of Transportation (Caltrans), State Water Resources Control Board (SWRCB), or Regional Water Quality Control Board (RWQCB) staff determines that storm water discharges, authorized non-stormwater discharges, or nonauthorized, non-stormwater discharges are causing or contributing to an exceedance of an applicable water quality standard.
- This form is appropriate when there is evidence of a discharge that occurred outside of business hours where no sampling occurred.
- Water quality standards are contained in the Statewide Water Quality Control Plan or applicable RWQCB Basin Plan.
- Sampling guidance is found in the current edition of the *Construction Site Monitoring Program Guidance Manual*.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.
- Complete Form CEM-2058, "Stormwater Meter Calibration Record- Specialty Meters," if other parameters are tested.
- Sampling and sample preservation must be in accordance with the current edition of "*Standard Methods for the Examination of Water and Wastewater*" (American Public Health Association).
- Collect, maintain, and ship samples according to the SWRCB, Surface Water Ambient Monitoring Program's Quality Assurance Program Plan latest edition.
- Complete a separate storm water sample field analysis report daily for each sampling location.

Form**Project Identifier Number**

Caltrans projects starting July 1, 2010, will have a project identifier number. For projects without a number, write N/A in the field.

Contract Number/Co/RTE/PM

For encroachment permit projects write the local agency or private entity encroachment permit number in the contract number field.

Storm Event Information

Leave section blank if box is checked for either authorized or non-authorized non-stormwater discharge.

Discharge Information

Do not leave any subsection blank. Caltrans permit specifically requires Caltrans to submit the information in this section to RWQCBs. For non-stormwater discharges, describe the construction operation activity that caused the discharge.

Sampling and Analysis Results

Leave this section blank if the 'no' box is checked for discharge samples taken.

Analysis Results

Analytical results less than the method detection limit shall be reported as "less than the method detection limit."

Analysis Information

Leave section blank if the 'no' box is checked for discharge samples taken.

Qualifying Rain Event Daily Average Analysis Result

A minimum of three daily samples are required to calculate the daily average for a qualifying rain event.

Sample pH Analysis

Sample pH reading must be done within 15 minutes of sample collection.

Receiving Water Monitoring Trigger (RWMT) Exceedance

In the event that any daily average RWMT is exceeded, complete Form CEM-2062, "Numeric Action Level Exceedance Report I Receiving Water Monitoring Trigger Report" and submit all storm event sampling results to the resident engineer within six hours.

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Appendix O

CEM-2062 NAL Exceedance Report Form

- Required by the Caltrans Permit, CGP or LTCGP to document compliance with permit requirements.
- To be submitted within 48 hours after conclusion of the storm event if requested by RWQCB.
- For projects subject to the LTCGP, use CEM-2062T NAL Exceedance Report, Lake Tahoe Hydrologic Unit
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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NUMERIC ACTION LEVEL EXCEEDANCE REPORT

CEM-2062 (REV 7/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> Risk Level 3
Submitted by contractor (print and sign name)	Date

Numeric Action Level Exceedance Information: Attach CEM-2052**Storm Event Information**

Start of storm event	End of storm event	Duration of storm event	Storm event precipitation amount recorded from site rain gauge	Storm event precipitation amount recorded from governmental rain gauge
<i>Date</i>	<i>Date</i>	<i>Hours : Minutes</i>	<i> inches</i>	<i> inches</i>
<i>Time</i>	<i>Time</i>			

NUMERIC ACTION LEVEL EXCEEDANCE REPORT

CEM-2062 (REV 7/2014)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Exceedance Location Information**Photographs**

Visual observation of location	<input type="checkbox"/> YES <input type="checkbox"/> NO
The nature and cause of the water quality standard exceedance, based on a visual observation of the discharge location	<input type="checkbox"/> YES <input type="checkbox"/> NO
BMPs currently installed at the location of the discharge	<input type="checkbox"/> YES <input type="checkbox"/> NO
Additional BMPs that will be implemented to prevent or reduce pollutants causing or contributing to exceedance of a water quality standard	<input type="checkbox"/> YES <input type="checkbox"/> NO
Implementation schedule for additional BMPs	<input type="checkbox"/> YES <input type="checkbox"/> NO
Maintenance or repair of BMPs	<input type="checkbox"/> YES <input type="checkbox"/> NO
Implementation schedule for BMPs maintenance or repair	<input type="checkbox"/> YES <input type="checkbox"/> NO
Other required corrective actions	<input type="checkbox"/> YES <input type="checkbox"/> NO
Implementation schedule for corrective actions	<input type="checkbox"/> YES <input type="checkbox"/> NO

NUMERIC ACTION LEVEL EXCEEDANCE REPORT

CEM-2062 (REV 7/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Numeric Action Level Exceedance Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those person directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager name	Date
--------------------------------------	------

Water Pollution Control Manager signature

For Caltrans Use

Resident engineer name	Date
------------------------	------

Resident engineer signature

Numeric Action Level Exceedance Report submitted to State Board SMARTS database within 24 hours after NAL exceedance was identified?	Date input	Resident engineer initials
<input type="checkbox"/> YES		
<input type="checkbox"/> NO		

All storm event sampling results submitted to State Water Board SMARTS database within 10 days after the conclusion of the storm event?	Date input	Resident engineer initials
<input type="checkbox"/> YES		
<input type="checkbox"/> NO		

Notice of Discharge Reporting

Discharge reported by telephone or email to the Regional Water Quality Control Board (RWQCB) within 48 hours of discovery?	Date discharge reported to RWQCB	Resident engineer initials
<input type="checkbox"/> YES		
<input type="checkbox"/> NO		

Notice of Discharge Report submitted to RWQCB within 14 days (3 days for District 7 and District 11)?	Date report submitted to RWQCB	Resident engineer initials
<input type="checkbox"/> YES		
<input type="checkbox"/> NO		

Instructions

General Information

- This form is required for compliance with provisions for Numeric Action Level (NAL) Exceedance Report in Section I of Attachment D or E of the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated With Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES No. CAS000002.
- Sampling guidance is found in the Caltrans, *Construction Site Monitoring Program Guidance Manual*, latest edition.
- In the event that any daily average effluent sample analysis result exceeds an applicable NAL, submit all storm event sampling results to the State Regional Water Quality Control Board (RWQCB) no later than 10 days after the conclusion of the storm event.
- RWQCBs have the authority to require the submittal of an NAL Exceedance Report.
- You may submit an NAL Exceedance Report to RWQCB instead of a Notice of Discharge Report.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.

Form

Contract Number/Co/Rte/PM

For local agency encroachment permit projects write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

Storm Event Precipitation Amount at Sample Time

At time of sample collection, record amount of precipitation from onsite rain gauge.

Analysis Results

Analytical results that are less than the method detection limit shall be reported as "Less than the method detection limit."

Qualifying Rain Event Daily Average Analysis Result

A minimum of three daily samples is required to calculate the daily average for a qualifying rain event.

STATE OF CALIFORNIA • DEPARTMENT OF TRANSPORTATION
NUMERIC ACTION LEVEL EXCEEDANCE
REPORT — LAKE TAHOE HYDROLOGIC UNIT

CEM-2062T (REV 2/2014)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	<p>Project Risk Level: N/A</p> <p>Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002</p>
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE

Numeric Action Level Exceedance Information

Location	Parameter Violation <input type="checkbox"/> pH		
Sample location identification number	Date of sampling		
Samples collected by	Date of analysis		
Samples analysis by	Date and time water pollution control manager notified of results		
Analyzer phone number	Date and time resident engineer notified of results		
Sample Identification	Sample Collection Time	Storm Event Precipitation Amount at Sample Time	Analysis (_____)

Analysis daily average

Analysis Information

Meter manufacturer	Model number	Serial number	Calibration date
Analytical method		Method reporting unit	Method detection limit

Note: Meter calibration information available in the SWPPP files.

Storm Event Information

Start of storm event	End of storm event	Duration of storm event	Storm event precipitation amount recorded from site rain gauge	Storm event precipitation amount recorded from governmental rain gauge
Date	Date	Hours : Minutes.		
Time	Time		inches	inches

STATE OF CALIFORNIA • DEPARTMENT OF TRANSPORTATION
NUMERIC ACTION LEVEL EXCEEDANCE
REPORT — LAKE TAHOE HYDROLOGIC UNIT
CEM-2062T (REV 2/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Exceedance Location Information

Photographs

Visual observation of location	<input type="checkbox"/> YES <input type="checkbox"/> NO
The nature and cause of the water quality standard exceedance, base on a visual observation of the discharge location	<input type="checkbox"/> YES <input type="checkbox"/> NO
BMPs currently installed at the location of the discharge	<input type="checkbox"/> YES <input type="checkbox"/> NO

Additional BMPs that will be implemented to prevent or reduce pollutants causing or contributing to exceedance of a water quality standard

Implementation schedule for additional BMPs

BMPs that will be maintained or repaired to prevent or reduce pollutants causing or contributing to exceedance of water quality standard

Implementation schedule for BMPs maintenance or repair

Other required corrective actions

Implementation schedule for corrective actions

ADA Notice

For individuals with sensory disabilities, this document is available in alternate formats. For information, call (916) 654-6410, TTY 711, or write to Records and Forms Management, 1120 N Street, MS-89, Sacramento, CA 95814.

STATE OF CALIFORNIA • DEPARTMENT OF TRANSPORTATION
NUMERIC ACTION LEVEL EXCEEDANCE
REPORT — LAKE TAHOE HYDROLOGIC UNIT
CEM-2062T (REV 2/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Additional Information

Run-on samples taken?	Run-on samples identification
<input type="checkbox"/> Yes <input type="checkbox"/> No	

Numeric Action Level Exceedance Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water pollution control manager name	Date
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Water pollution control manager signature	
---	--

Resident engineer name	Date
------------------------	------

Resident engineer signature	
-----------------------------	--

Was Numeric Action Level exceedance reported by phone or in person to the Lahontan Regional Water Quality Control Board within 24 hours?	Date reported	Resident engineer initials
<input type="checkbox"/> Yes <input type="checkbox"/> No		

All storm event sampling results submitted to State Water Board SMARTS database within 5 days after the conclusion of the storm event?	Date input	Resident engineer initials
<input type="checkbox"/> Yes <input type="checkbox"/> No		

Notice of Discharge Reporting

Discharge reported by telephone or email to the Resident Engineer within 6 hours of discovery?	Date discharge reported to RWQCB	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		

Instructions

General Information

- This form is required for compliance with provisions for Numeric Action Level (NAL) Exceedance Report in the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated With Construction and Land Disturbance Activities, Lake Tahoe Hydrologic Unit Permit Order No. R6T-2011-0019, NPDES No. CAG616002.
- Sampling guidance is found in the Caltrans, *Construction Site Monitoring Program Guidance Manual*, latest edition
- Lahontan Regional Water Quality Control Board has the authority to require the submittal of an NAL Exceedance Report, for pH.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.

Form

Contract Number/Co/Rte/PM

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

Storm Event Precipitation Amount at Sample Time

At time of sample collection record amount of precipitation from onsite rain gauge.

Analysis Results

Analytical results that are less than the method detection limit shall be reported as "Less than the method detection limit."

Qualifying Rain Event Daily Average Analysis Result

A minimum of 3 daily samples is required to calculate the daily average for a qualifying rain event.

Qualifying Rain Event Daily Average Analysis Result

A minimum of 3 daily samples is required to calculate the daily average for a qualifying rain event.

Appendix P

CEM-2063 NEL Violation Report Form

- Required by the Caltrans Permit, CGP or LTCGP to document compliance with permit requirements.
- To be submitted to the State Water Board within 24-hours after an NEL Exceedance has been identified.
- To be submitted to the State Water Board within five days after the conclusion of the storm event when the daily average of effluent samples analysis results exceeds an applicable NEL
- Can be submitted to RWQCB in place of a Notice of Discharge Report.
- For projects subject to the LTCGP, use CEM-2063T NEL Violation Report, Lake Tahoe Hydrologic Unit
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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NUMERIC EFFLUENT LIMITATION VIOLATION REPORT - ATS DISCHARGES

CEM-2063 (REV 12/2013)

Page 1 of 3

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> Risk Level 3
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE

Numeric Effluent Limitation Violation Information
Attach form CEM-2052 or lab results

Storm Event Information
Attach a copy of the governmental rain gauge information.

Start of storm event Date Time	End of storm event Date Time	Duration of storm event Hours : Minutes	Storm event precipitation amount recorded from site rain gauge _____ inches	Storm event precipitation amount recorded from governmental rain gauge _____ inches
Storm event 24-hour maximum precipitation amount recorded from onsite rain gauge _____ inches	Storm event 24-hour maximum precipitation amount from governmental rain gauge _____ inches	ATS Compliance storm (10-year, 24-hour storm) _____ inches	ATS Compliance storm exception (10-year, 24-hour storm) <input type="checkbox"/> Yes <input type="checkbox"/> No	

Additional Information

Run-on samples taken? <input type="checkbox"/> Yes <input type="checkbox"/> No	Receiving water samples taken? <input type="checkbox"/> Yes <input type="checkbox"/> No
Run-on sample identification	Receiving water sample identification

NUMERIC EFFLUENT LIMITATION VIOLATION REPORT - ATS DISCHARGES

CEM-2063 (REV 12/2013)

Page 2 of 3

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Numeric Effluent Limitation Violation Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those person directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager Name	Date
--------------------------------------	------

Water Pollution Control Manager Signature

For Caltrans Use

Resident engineer name	Date
------------------------	------

Resident engineer signature

Numeric Effluent Limitation Violation Report submitted to State Board SMARTS database within 24 hours after NEL exceedance was identified?	Date input	Resident engineer initials
<input type="checkbox"/> Yes <input type="checkbox"/> No		

All storm event sampling results submitted to State Water Board SMARTS database within 5 days after the conclusion of the storm event?	Date input	Resident engineer initials
<input type="checkbox"/> Yes <input type="checkbox"/> No		

Notice of Discharge Reporting

Discharge reported by telephone or email to the Regional Water Quality Control Board (RWQCB) within 48 hours of discovery?	Date discharge reported to RWQCB	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		

Notice of Discharge Report submitted to RWQCB within 14 days (3 days for District 7 and District 11)?	Date report submitted to RWQCB	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		

NUMERIC EFFLUENT LIMITATION VIOLATION REPORT - ATS DISCHARGES

Instructions

General Information

- This form is required for compliance with provisions for Numeric Effluent Limitation (NEL) Violation Report in Attachment F of the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, as amended by 2010-0014-DWQ and 2012-2006-DWQ NPDES No. CAS000002.
- Sampling guidance is found in the Caltrans, *Construction Site Monitoring Program Guidance Manual*, latest edition.
- When the daily average of effluent samples analysis results exceeds an applicable NEL, submit the NEL Violation Report to the State Water Resources Control Board (SWRCB), Storm Water Multi Application and Report Tracking System (SMARTS) within 24 hours after a NEL Exceedance has been identified.
- When the daily average of effluent samples analysis results exceeds an applicable NEL, submit all storm event sampling results to the SWRCB SMARTS within 5 days after the conclusion of the storm event.
- Regional Water Quality Control Boards have the authority to require the submittal of a NEL Violation Report.
- You may submit a NEL Violation Report to RWQCB instead of a Notice of Discharge Report.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

Storm Event Precipitation Amount

Record amount of precipitation from onsite and government rain gauges.

Analysis Results

Analytical results that are less than the method detection limit shall be reported as "Less than the method detection limit."

Compliance Storm Event

The 10-year, 24-hour storm (expressed in tenths of an inch of rainfall), as determined by using the maps.

<http://www.wrcc.dri.edu/pcpnfreq/nca10y24.gif>

<http://www.wrcc.dri.edu/pcpnfreq/sca10y24.gif>

Compliance storm verification must be done by reporting the onsite rain gauge readings as well as nearby governmental rain gauge readings. Attach a copy of the governmental rain gauge readings to this report.

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NUMERIC EFFLUENT LIMITATION VIOLATION REPORT — LAKE TAHOE HYDROLOGIC UNIT

CEM-2063T (REV 2/2014)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE

Numeric Effluent Limitation Violation Information

Analysis Information

Meter manufacturer	Model number	Serial number	Calibration date
Analytical method	Method reporting unit	Method detection limit	

Storm Event Information

Start of storm event	End of storm event	Duration of storm event	Storm event precipitation amount recorded from site rain gauge	Storm event precipitation amount recorded from governmental rain gauge
Date	Date	Hours : Minutes.	inches	inches
Time	Time			
Storm event 24-hour maximum precipitation amount recorded from onsite rain gauge _____ inches	Storm event 24-hour maximum precipitation amount from governmental rain gauge _____ inches	ATS compliance storm (10-year, 24-hour storm)	ATS compliance storm exception (10-year, 24-hour storm) <input type="checkbox"/> Yes <input type="checkbox"/> No	

**NUMERIC EFFLUENT LIMITATION VIOLATION
REPORT — LAKE TAHOE HYDROLOGIC UNIT**

CEM-2063T (REV 2/2014)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Additional Information

Run-on samples taken?	Receiving water samples taken?	For turbidity NEL violation samples taken for suspended sediment concentration (SSC)?
<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input type="checkbox"/> No	<input type="checkbox"/> Yes <input type="checkbox"/> No
Run-on sample identification	Receiving water sample identification	SSC sample identification

Numeric Effluent Limitation Violation Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
--	------

Water Pollution Control Manager (signature)

For Caltrans Use

Resident Engineer (name)	Date
--------------------------	------

Resident Engineer (signature)

Orally notified the Lahontan Regional Water Quality Control Board of the Numeric Effluent Limitation Violation within 24 hours after NEL exceedance was identified?	Date notified	Resident engineer initials
<input type="checkbox"/> Yes <input type="checkbox"/> No		

All storm event sampling results submitted to State Water Resources Control Board SMARTS database within 5 days after the conclusion of the storm event?	Date input	Resident engineer initials
<input type="checkbox"/> Yes <input type="checkbox"/> No		

Notice of Discharge Reporting

Discharge reported by telephone or e-mail to the resident engineer within 6 hours of discovery?	Date discharge reported to RWQCB	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		

Notice of Discharge Report submitted to Lahontan RWQCB and SMARTS within 5 business days?	Date report submitted to RWQCB	Resident engineer initials
<input type="checkbox"/> YES <input type="checkbox"/> NO		

**NUMERIC EFFLUENT LIMITATION VIOLATION
REPORT — LAKE TAHOE HYDROLOGIC UNIT**

CEM-2063T (REV 2/2014)

Page 3 of 3

Instructions**General Information**

- This form is required for compliance with provisions for Numeric Effluent Limitation (NEL) Level Violation Report in the National Pollutant Discharge Elimination System (NPDES) General Permit for Storm Water Discharges Associated With Construction and Land Disturbance Activities in the Lake Tahoe Hydrologic Unit, Permit Order No. R6T-2011-0019, NPDES No. CAG616002.
- Sampling guidance is found in the Caltrans, *Construction Site Monitoring Program Guidance Manual*, latest edition.
- When the daily average of effluent samples analysis results exceeds an applicable NEL, orally notify the Lahontan Regional Water Quality Control Board of the Numeric Effluent Limitation Violation within 24 hours after an NEL exceedance has been identified. See Table 3 in Section IV in the order of the Lake Tahoe Permit and Section 7.2.2 of the SWPPP.
- When the daily average of effluent samples analysis results exceeds an applicable NEL, submit all storm sampling results to the State Water Board SMARTS within 5 days after the conclusion of the storm event. See Table 3 in Section IV in the order of the Lake Tahoe Permit and Section 7.2.2 of the SWPPP.
- The Lahontan Regional Water Quality Control Board has the authority to require the submittal of an NEL Violation Report.
- You may submit an NEL Violation Report to RWQCB instead of a Notice of Discharge Report.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

Storm Event Precipitation Amount at Sample Time

At time of sample collection, record amount of precipitation from onsite rain gauge.

Analysis Results

Analytical results that are less than the method detection limit shall be reported as "Less than the method detection limit."

Qualifying Rain Event Daily Average Analysis Result

A minimum of 3 daily samples is required to calculate the daily average for a qualifying rain event.

Compliance Storm Event

The 20-year, 1 inch per hour storm (expressed in tenths of an inch of rainfall).

Compliance storm verification must be done by reporting the onsite rain gauge readings as well as nearby governmental rain gauge readings. Attach a copy of the governmental rain gauge readings to this report.

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Section 4

Preparing a Water Pollution Control Program

4.1 WPCP Preparation and Approval of a WPCP

The contract specifications require the contractor to prepare a Water Pollution Control Program (WPCP) for each project where the construction work results in less than 1 acre of soil disturbance or for small construction projects (1 to 5 acres of DSA) that have an approved Rainfall Erosivity Waiver authorized by the U.S. EPA and therefore not subject to the requirements of the CGP or the LTCGP. The WPCP prepared for a project must comply with Caltrans Standard Specifications Section 13 Water Pollution Control and the contract special provisions following the procedures and format set forth in this Manual.

This section provides detailed, step-by-step procedures and instructions that contractors shall use to prepare a WPCP. This section also contains instructions for preparation of the WPCP Attachments and Appendices.

The contractor shall prepare and submit a complete WPCP to the Caltrans Resident Engineer (RE) for review and acceptance. If revisions are required, as determined by the RE, the contractor must revise and resubmit the WPCP. The time frames for WPCP submittal, review, and re-submittal are specified in the contract special provisions or Caltrans Standard Specifications Section 13 Water Pollution Control. No activity having the potential to cause water pollution, as determined by the RE, shall be performed until the WPCP has been accepted by the RE. Construction activities that will not threaten water quality, such as traffic control, may proceed without an approved WPCP if authorized by the RE.

The WPCP template allows for an alternate WPCM, QSP and stormwater inspector to be included in case the primary designees are unavailable. Alternate WPCM, QSP and stormwater inspector must have the training and qualifications necessary to ensure the WPCP is in full compliance.

The WPCP shall be submitted to Caltrans in a 3-ring binder with separators and tabs. When the WPCP is accepted submit 4 printed copies in 3-ring binders with dividers and tabs and an electronic file (Adobe® PDF) of the WPCP.

4.1.1 Information Provided by Caltrans

In addition to information in the contract special provisions and shown on the contract plans, Caltrans may supply to the contractor certain information developed during the design process. The stormwater information necessary for the preparation of a project WPCP should be provided in the project Information Handout (IH) or should be requested from the project RE. The contractor shall use this information to prepare the WPCP, as appropriate.

4.1.1.1 Vicinity Map

A map extending approximately one quarter mile (1,320 feet) beyond the property boundaries of the construction site showing: the construction site; surface water bodies (including known springs and wetlands); known wells; an outline of off-site drainage areas that discharge into the construction site; general topography; and the anticipated discharge location(s) where the construction site's stormwater discharges to a municipal storm drain system or other water body. A U.S. Geological Survey (USGS) quad

map may be used for showing the project site and a one-quarter mile (1,320 feet) extension beyond the property boundaries of the construction site.

4.1.1.2 Soils/Geotechnical Report, Project Materials Report and/or Other Reports

Toxic History of the Site: To the extent information is available from the soils/geotechnical report, the project materials report, site investigation report developed by the Hazardous Waste Section, or other regulatory or environmental compliance documentation (e.g. CEQA Initial Study, Phase I Environmental Site Assessment, etc.), the IH may include a description of all toxic materials known to have been treated, stored, disposed, spilled, or leaked in significant quantities onto the construction site.

Site Geotechnical Report: The IH may include a copy of the project materials report (geotechnical report). The contractor must describe the conditions of the fill and native soil materials that can be found at the construction site. Fill material should be described as whether it is native or non-native, contaminated or uncontaminated, and its stabilization technique (i.e., native soil coverage, asphalt or concrete coverage, and/or landscape).

4.1.1.3 List of Pre-Construction (Existing) BMPs

The IH may provide a list and written descriptions of existing pre-construction practices, if any, that are already in place to reduce sediment and other pollutants in stormwater discharges. These permanent BMPs may consist of biofiltration swales and strips, media filters, etc. Indicate whether there are existing pre-construction BMPs.

4.1.1.4 List of Permanent (Post-Construction) Stormwater Control Measures (BMPs)

The IH may provide a written listing and narrative descriptions of post-construction permanent BMPs that have been included in the project. Narrative descriptions may also include operation and maintenance (O&M) procedures for the permanent BMPs, O&M short term and long term funding, and a statement indicating that the Maintenance Department will be responsible for O&M of the post construction BMPs.

4.1.1.5 Layout Sheets Showing Suggested Temporary BMP Locations

The contract plan layouts sheets will show the location of anticipated construction site BMPs or the BMPs will be shown on contract plan quantity summary sheets. The contract plan layout sheets may show the location of anticipated contractor staging areas and other contractor support facilities.

4.1.1.6 Explanation of Construction Site (Temporary) BMPs

The IH may provide a brief narrative explanation of the various temporary BMPs that may be implemented in the project, including any existing permanent BMPs that may be present within the project limits that can be used during construction, as well as any permanent BMPs that should be constructed early for use as a temporary BMP during construction, such as early application of permanent soil stabilization measures in areas that will no longer experience soil disturbance during construction.

4.1.1.7 Drainage Report

The IH may include a copy of the drainage report for the project or appropriate information, such as the hydrology maps, delineation of drainage boundaries, concentrations of runoff, and runoff coefficients.

4.1.1.8 Construction Site Estimates

The IH may contain the SWDR which includes for the project site an estimate of the:

- Construction site area in acres;
- Disturbed soil area in acres;
- Runoff coefficient of the construction site before and after construction; and

- Percentage of the construction site impervious area (e.g., pavement, building, etc.) before and after construction.

4.1.1.9 Other Information

The IH may also include any other information that would explain the decisions or thought process behind the selection and deployment of the temporary BMPs chosen by the designer. Examples include the designer's proposed staging of the project and estimated time of year for those stages, and any specific BMP deployments that are considered to be critical to the success of the contractor's WPCP.

4.1.1.10 Other Plans/Permits/Agreements

Other agencies may have issued permits/agreements or have plan requirements for the construction of the project or imposed certain conditions. If so, a written description of the permit/agreement conditions and a copy of the permit/agreement will be provided by Caltrans for inclusion in an attachment to the WPCP. Hazardous materials must be handled in accordance with specific laws and regulations and disposed of as a hazardous waste. If during the preparation of the contract, it is known that special permits for accomplishing disposal of hazardous waste is known, then a written explanation will be provided to the contractor to be incorporated within this section and it must be consistent with other specifications in the contract. In addition, information regarding other related permits/agreements such as California Department of Fish and Wildlife or U.S. Army Corps of Engineers permits/agreements may also be included. For oversight projects, the Local Agency / Private Entity administering the project, is responsible for securing all necessary permits, certifications, and approvals. Copies of such documents shall be provided by the Local Agency / Private Entity and included as an attachment to the WPCP.

4.1.2 Minimum Requirements for Construction Sites

In order to ensure a minimum level of water pollution control, Caltrans has designated some BMPs as minimum requirements that contractors must implement during construction of highway projects statewide. The minimum required BMPs are specified in the contract standard specifications and contract special provisions. More information about minimum required BMPs can be found in the *Caltrans Construction Site Best Management Practices (BMPs) Manual*.

4.2 WPCP Builder

This section provides step-by-step WPCP preparation guidelines, WPCP Builder instructions (in blue), and examples / example text (in green). The WPCP Builder has been developed in Microsoft® Access with the following objectives:

1. Provide easy data entry for contractors to prepare a WPCP.
2. Provide instructions in the template that can be viewed while the WPCP is being prepared.
3. Provide consistency in content and format of all WPCPs prepared and submitted to Caltrans so that review, approval and implementation of WPCPs on Caltrans projects is more efficient.

Instructions for using the electronic version of the WPCP builder:

1. Download the appropriate template from the Caltrans Web site at:
<http://www.dot.ca.gov/hq/construc/stormwater/>
2. Complete all applicable sections of the WPCP Builder and you may insert additional text where allowed in the builder. A draft WPCP with completed text for each section can be printed from the Print WPCP button on the WPCP Builder home screen.

The WPCP Builder shown in this section includes step-by-step instructions and WPCP section examples where appropriate for the following:

- Section 10 WPCP Certification and Authorization
- Section 20 Project and Contractor Information
- Section 30 Pollution Sources and Control Measures
- Section 40 WPCP Implementation
- Section 50 WPCP Reporting Requirements

The WPCP Builder includes instructions within the database. Examples are generally included with instructions.

Getting Started Instructions

Open the WPCP Builder application (Figure 4-1). When the application has been opened the home Screen will appear. Use the computer mouse, click-on **Create a New WPCP**.

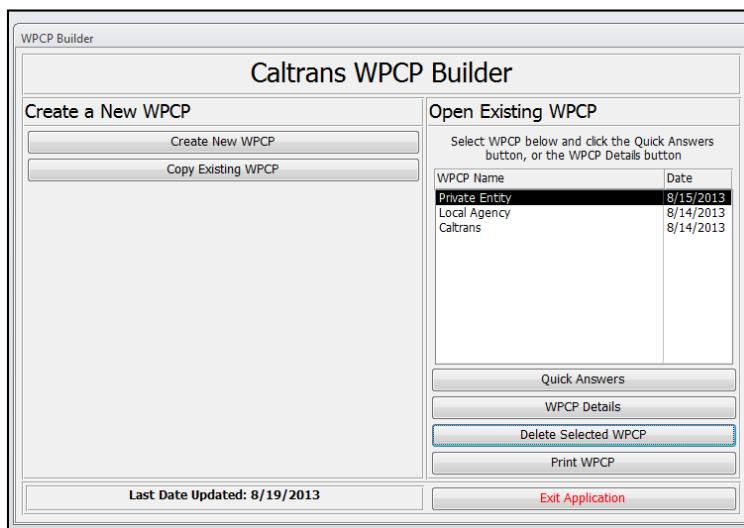


Figure 4-1. WPCP Builder Home Screen

Click-on **Create New WPCP**.

The window will change to a new window to populate initial project information. The date that the SWPPP was created will automatically populate. Enter the project name in **WPCP Name** and press enter.

Use the drop-down windows to choose project administer (Figure 4-2). Choose who will administer the WPCP. Depending on the entity, the WPCP Builder will provide fields for the information.

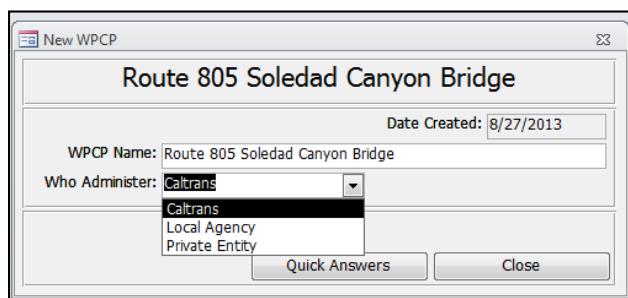


Figure 4-2. WPCP Administration Selection Screen

Click-on **Quick Answers** to continue creating the WPCP. The window will change to a series of yes or no checkboxes that are based on section specific questions. Based on the whether yes or no are checked, different sections will be made available. The process is described below.

Quick Answers Instructions

Quick Answers pop-up window consists of five questions which determine which sections will be available to populate during WPCP Detail Population (Figure 4-3). The questions are yes or no questions. It is advised that these questions are answered first.

Quick Answers			
Section #	Section Title	Question	Answer
20.3	Contact Information for Responsible Parties	Does the Contractor have a site manager separate from the WPC Manager?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
20.4	Training	Will a Stormwater Inspector be assisting the WPC Manager?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
20.4	Training	Is the WPC Manager listed above the preparer of this WPCP?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Title		Is soil disturbance less than 1 acre?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Title		Has a Rainfall Erosivity Waiver Certification been submitted through SMARTS?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

Figure 4-3. Quick Answers Screen

For the last two questions, only one can be answered yes. Either the project is less than one acre or the project has a Rainfall Erosivity Wavier Certification for projects one to five acres in size.

Once Quick Answers have been completed, the user has the option to close out of the window by clicking-on **Close** or continue to populate WPCP sections with the necessary information. See instructions below.

Printing Instructions

From the WPCP Builder Home Screen (Figure 4-4), select **Print WPCP**.

Figure 4-4. Access Print Screen Window

From the Print Screen, the WPCP Sections can be previewed or a PDF of a section or the entire WPCP can be created and saved in the PDF Folder Location shown at the bottom of the window (Figure 4-5).

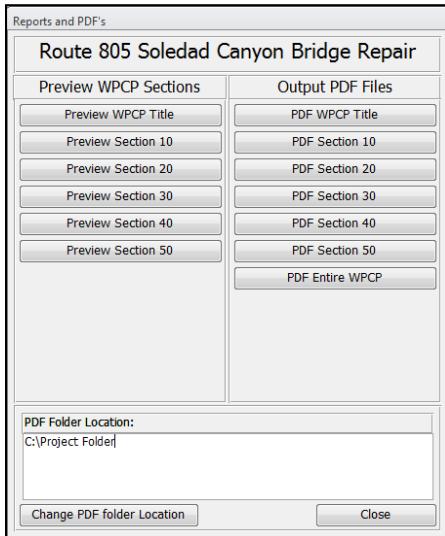


Figure 4-5. Print Screen Window

A warning will come up when the PDF Entire WPCP is selected that the process will re-create (overwrite) section PDF's created in the folder. Select Yes to continue saving the file or No to cancel.

WPCP Detail Instructions

The **WPCP Detail** section provides the framework for the WPCP document. The Quick Answer based section is provided to populate with project information. Entered information can be viewed and changed throughout the process.

WPCP Detail can be accessed from either the Quick Answers window (Figure 4-3) or the Startup Window (Figure 4-6).

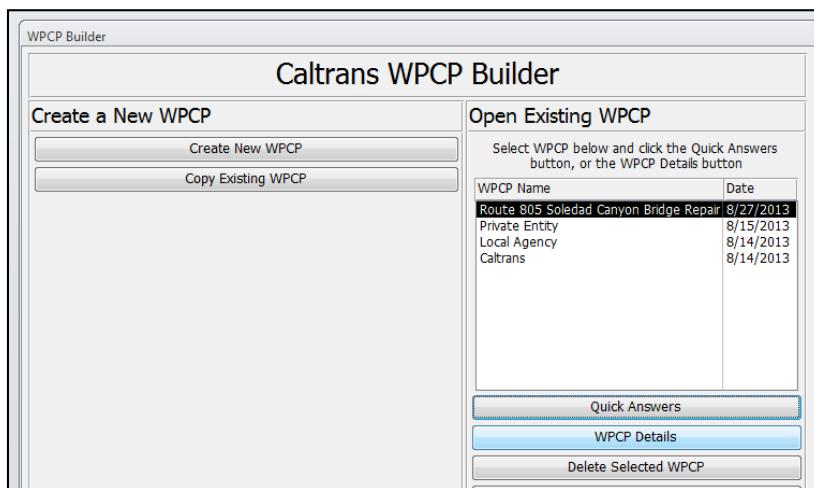


Figure 4-6. Startup Window

Section #	Section Title	Question	Answer
20.3	Contact Information for Responsible Parties	Does the Contractor have a site manager separate from the WPC Manager?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
20.4	Training	Will a Stormwater Inspector be assisting the WPC Manager?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No

Figure 4-7. WPCP Detail Accessed from Quick Answers Window

Click-on **WPCP Details** button. A new entry window will appear (Figure 4-8) that shows the different required sections to populate for the WPCP. Sections contain automated required text. Each listed section will either have narrative text, lists, and/or tables to populate for section completion. This Manual addresses the required information needed to complete listed WPCP sections.

Section	Was Viewed	Is Completed
TOC2	N	N
10.1	N	N
10.2	N	N
10.3	N	N
20	N	N
20.1	N	N
20.2	N	N
20.3	N	N
20.3.1	Y	N

Figure 4-8. WPCP Details Main Menu

Main Menu

Once the WPCP Details Main Menu is open, the list of sections is available for viewing and editing. This menu will also indicate if a section is completed.

To View a Section

To navigate from section to section click-on the **Section Number** listed on the right of the screen. Once a section has been viewed, a **Y** will appear in the **Was Viewed** column (Figure 4-9).

Section	Was Viewed	Is Completed
Title	Y	N
100.1	N	N
100.2	N	N
100.3.1	N	N

Figure 4-9. Section Navigation

The section will appear in the window (Figure 4-10). Sections typically have tabs for Instructions and for information entry (Fields, Text or Tables tab) on the upper left side of the viewing window.

Figure 4-10. Section Instructions Tab

The user can go back to sections to make edits at any time.

To Review a Section

Once the information has been entered, the user can click-on **Preview Section** (Figure 4-11). A pop-up window will appear with the automated required WPCP text which is populated with the construction site specific information entered by the user. At the bottom of the pop-up window, the user can click forward to review additional pages.

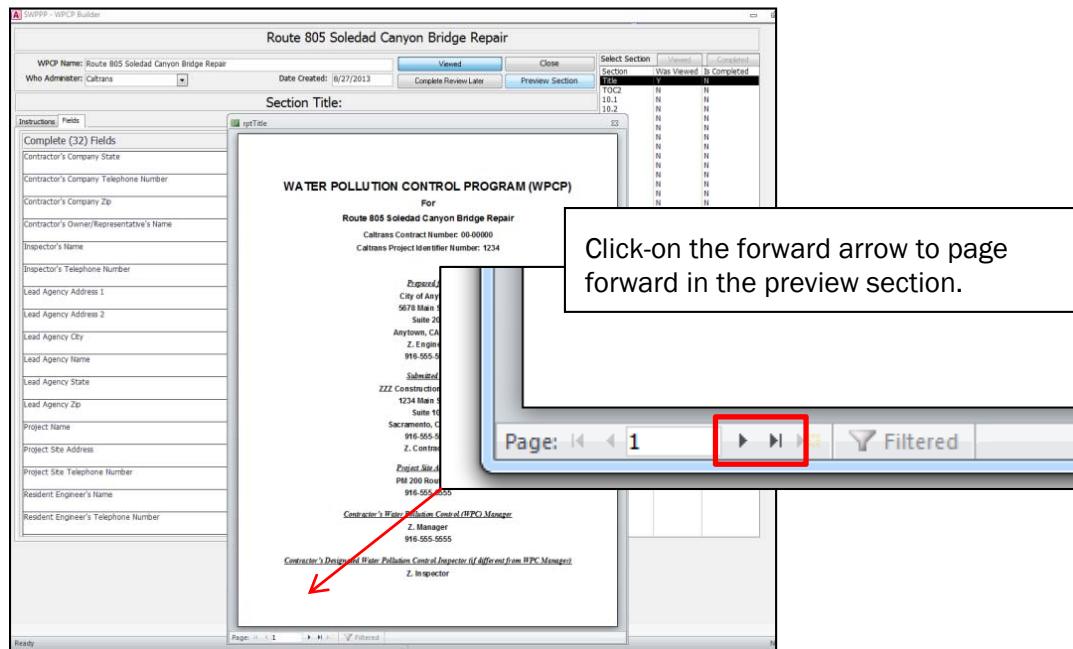
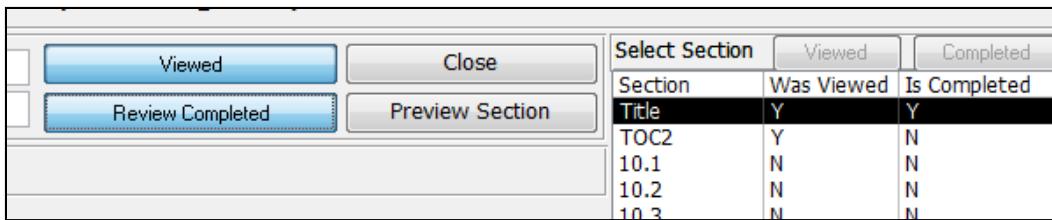


Figure 4-11. Pop-Up Screen with Automated Text

To Complete a Section

Once a section has been completed, the user can check the button for **Complete Review Later/Review Completed** (Figure 4-12). Once this button has been selected, a Y will appear in the **Is Completed** column associated with the section. This assists in keeping track of which sections have been completed.



The screenshot shows a user interface for managing section completion. At the top left are buttons for 'Viewed' (highlighted in blue), 'Close', 'Review Completed' (highlighted with a dotted border), and 'Preview Section'. To the right is a table titled 'Select Section' with columns 'Section', 'Was Viewed', and 'Is Completed'. The table lists sections: Title, TOC2, 10.1, 10.2, and 10.3. The 'Was Viewed' column contains 'Y' for Title, TOC2, and 10.1; and 'N' for 10.2 and 10.3. The 'Is Completed' column contains 'Y' for Title and 'N' for all other sections.

Select Section		Viewed	Completed
Section	Was Viewed	Is Completed	
Title	Y	Y	
TOC2	Y	N	
10.1	N	N	
10.2	N	N	
10.3	N	N	

Figure 4-12. Section Completed Screen

The user then may then either Close the window, which saves information added to continue at a later date, or select another Section to complete.

WPCP Builder Section Instructions

This section provides the instructions for each Section listed in the WPCP Detail window. WPCP Detail sections are based on Quick Answer selection. Instructions provided (unless indicated) are included in the associated section of the WPCP Detail.

Title

To complete this section, the user must enter the following information in the provided fields. The title page shall have the following information:

- Caltrans contract number
- Caltrans project identifier number
- Contractor's name, address, telephone number and Contractor's Owner/Representative's Name
- Inspector's name and telephone number
- Identification and address of Lead Agency (Caltrans or Local Agency)
- If a Local Agency / Private Entity is administering the project enter the Caltrans encroachment permit number for permit issued to the public agency / private entity and the Caltrans encroachment permit number for the permit issued to the contractor
- Project name, site address, and telephone number.
- Caltrans' RE name and telephone number
- Name of the Contractor's WPC Manager and telephone number and alternate if one has been designated. The WPC Manager and alternate must be either a QSD or a QSP
- If water pollution control inspector is different from the WPC Manager, then insert the inspectors name and telephone number
- Name of the company that developed the WPCP (if it was prepared by an outside consultant), including name and title of preparer
- WPCP Date

Section TOC2

WPCP Builder Instructions

As needed, use this section to insert additional attachments and appendices to the WPCP (Figure 4-13).

Figure 4-13. Section TOC2 Attachments and Appendices Screen

The standard attachment and appendix lists are:

Attachments:

- | | |
|--------------|-----------------------------------|
| Attachment A | Water Pollution Control Drawings |
| Attachment B | Water Pollution Control Schedule |
| Attachment C | WPCP Amendments |
| Attachment D | Stormwater Training Documentation |

Appendices:

Appendix A	CEM-2008 SWPPP/WPCP Amendment Certification and Authorization
Appendix B	CEM-2009 SWPPP/WPCP Amendment Log
Appendix C	CEM-2023 Stormwater Training Record
Appendix D	CEM-2024 Stormwater Training Log (Optional)
Appendix E	CEM-2034 Monthly Stormwater BMPs & Material Inventory Report (Optional)
Appendix F	CEM-2030 Stormwater Site Inspection Report
Appendix G	CEM-2035 Stormwater Corrective Actions Summary or CEM-2035T Stormwater Corrective Actions Summary- Lake Tahoe Hydrologic Unit
Appendix H	CEM-2061 Notice of Discharge Report or CEM-2061T Notice of Discharge Report – Lake Tahoe Hydrologic Unit Stormwater Sample Field Test Report/Receiving Water Monitoring Report
Appendix I	CEM-2070 SWPPP/WPCP Annual Certification of Compliance

SECTION 10

WPCP Certification and Acceptance

10.1 *Contractor's Certification and Acceptance by the RE*

The selection made in the Quick Questions determines the certification and acceptance statements required in this section.

WPCP GUIDANCE INSTRUCTIONS

- Include a Separator and Tab for Section 10 for ready reference.
- The WPCP preparer shall certify that qualifications and certification requirements have been met.
- The WPCP shall be certified by the contractor.
- Certification shall be signed and dated by Contractor's staff; specifically, the person responsible for overall management of the site, such as a corporate officer or person assigned the responsibility by a corporate officer, according to corporate procedures.
- Print the name, title and telephone number of the person signing the certification.
- The WPCP shall be submitted to the RE for review and acceptance.

WPCP Builder Instructions

Section 10.1 has two separate tabs for information entry: Fields and Text (Figure 4-14).

The screenshot shows a software interface titled "Section 10.1: WPCP Certification and Acceptance". At the top, there are three tabs: "Instructions" (highlighted in blue), "Fields", and "Text". Below the tabs, a section titled "Provide (1) Narrative Text(s)" contains a text area with the placeholder text: "INSERT ADDITIONAL TEXT HERE OR DELETE THIS LINE (Use the \"FORMAT OPTIONS\" button to insert subtitles and/or paragraphs)". The text area is divided into two columns by a vertical scroll bar.

Figure 4-14. WPCP Certification and Acceptance

Text Tab: Additional text can be added to the certification using the Text tab. This text will appear at the end of the section.

Fields Tab: Insert in the fields provided: Contractor's name, telephone number, and title; WPCP Acceptance Date.

10.2 *Amendments*

An amendment log should be included in Attachment C however no other documentation is required for the initial WPCP preparation.

WPCP GUIDANCE INSTRUCTIONS

- The WPCP shall be amended whenever there is a change in construction or operations that may cause the discharge of significant quantities of pollutants to surface waters, ground waters, municipal storm drain systems, or when deemed necessary by the RE. All WPCP amendments shall be documented in letter format and include revised WPCD sheets, as appropriate. WPCP amendments shall be certified by the contractor and require acceptance by the Caltrans or Local Agency / Private Entity RE (and Caltrans Oversight Engineer if applicable). Accepted amendments shall be attached to the Contractor's on-site WPCP in Attachment C.
- The following items will be included in the amendment, as appropriate:
 - Who requested the amendment
 - Location of proposed change
 - Reason for change
 - The original BMP proposed, if any
 - The new BMP proposed
 - Any revised WPCDs for detail or location changes
- Include a copy of the Amendment Log in Attachment C.
- The certification form shall be included in Attachment C and shall be signed by the contractor and the RE (and Oversight Engineer if applicable) for each amendment. The signed forms shall be included with the Amendment.
- If Caltrans is administering the project, then the Caltrans RE, as the authorized representative of the Department shall be responsible for reviewing and accepting the amendment.
- If a Local Agency / Private Entity is administering the project, then the Local Agency / Private Entity RE shall be responsible for reviewing and accepting. When the amendment is accepted by the Local Agency / Private Entity RE, then form CEM-2008 SWPPP/WPCP Certification and Acceptance shall be provided to the Caltrans Oversight Engineer for concurrence.
- Amendments shall be documented on CEM-2009 SWPPP/WPCP Amendment Log form. Enter the Amendment number, date, brief description, and name of the person who requested the Amendment in the amendment log. Include a copy of CEM-2009 SWPPP/WPCP Amendment Log in WPCP Attachment C.

EXAMPLE AMENDMENT LOG

Table 4.2-1 Example Amendment Log				
AMENDMENT NO.	DATE	BRIEF DESCRIPTION OF AMENDMENT	REQUESTED BY	APPROVAL DATE
001	12/10/2000	Grading schedule changed to begin on Feb.10, 2001, and will include additional 0.2 acres. Amended water pollution control drawings showing 0.2 additional acres.	John Doe, Superintendent	12/20/2000

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 10, when preparing to print the WPCP.

10.3 Contractor's Annual Certification and Acceptance by the RE

WPCP GUIDANCE INSTRUCTIONS

- Annually the WPCP shall be certified by the contractor.
- Certification shall be signed and dated by Contractor's staff; specifically, the person responsible for overall management of the site, such as a corporate officer or person assigned the responsibility by a corporate officer, according to corporate procedures.

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 10, when preparing to print the WPCP. No documentation is required for the initial WPCP preparation.

SECTION 20

Project and Contractor Information

WPCP GUIDANCE INSTRUCTIONS

- Include a Separator and Tab for Section 20 for ready reference.
- Provide narrative text addressing the following topics in a format that can be easily understood by a person who is not familiar with the project.

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 20, when preparing to print the WPCP. No documentation is required for the initial WPCP preparation.

20.1 *Project Description*

WPCP Builder Instructions

Provide narrative text with the following types of information:

- Provide a brief description of the project.
- Describe the type(s) of work that will be performed.
- Provide a brief description of the project location, including descriptive items such as county, route, post mile, city, and street names.
- Describe proximity to receiving waters to which the project will discharge, including surface waters, drainage channels, and drainage systems.
- Identify drainage system owners (municipality or agency).
- Name the receiving waters and describe proximity to receiving waters to which the project will discharge, including surface waters, drainage channels, and drainage systems (identify who owns the drainage system; i.e., municipality or agency.)

EXAMPLE TEXT

The construction project is located in Any County, in Any City, on State Route I-5 from Post mile X to Post mile Y. The project consists of sound wall construction, shoulder work, and PCC pavement removal and replacement along approximately 1300 feet of highway. Project runoff is conveyed approximately 2600 feet south to the Calaveras River via a combination of Caltrans-owned roadside ditches and underground drainage facilities. The Calaveras River discharges to the San Joaquin River approximately 1.9 miles downstream from I-5. The total disturbed area is 0.8 acres.

20.2 Unique Site Features

WPCP Builder Instructions

Provide narrative text with the following types of information:

- Provide a brief description of any unique site features (water bodies, wetlands, ESAs, endangered or protected species, etc.).
- Describe significant or high-risk activities that may impact stormwater quality. Include any unique features or activities within or adjacent to water bodies (such as dredging, re-use of aerially deposited lead material, large excavations, or work within a water body).

EXAMPLE TEXT

The project site is within 1,000 feet of the Calaveras and San Joaquin Rivers.

20.3 Contact Information for Responsible Parties

WPCP Builder Instructions

Section 20.3 has two separate tabs for information entry: Fields and Text (Figure 4-15).

Figure 4-15. WPCP Selection Tab Options

Fields Tab: For the following responsible parties provide name, title, company or agency, address, telephone number, emergency phone number (24/7), email address:

- WPC Manager
- Alternate WPC Manager
- WPCP Preparer (if WPC Manager did not develop WPCP)
- RE
- Contractor Manager responsible for WPCP Certification
- Contractor Site Manager (if different from Contractor Manager)
- Stormwater Inspector and alternate (when appropriate)
- Erosion and Sediment Control Provider

Text Tab: If there are added responsibilities associated with the WPCP insert additional responsibilities and/or names. Examples of text to add are:

- If a stormwater inspector will assist the Contractor's WPC Manager, provide contact information.
- If ATS is used, provide contact information for person responsible for ATS.

20.4 Training

WPCP GUIDANCE INSTRUCTIONS

- Training may be both formal and informal (Caltrans Training Class, CGP training, etc.).
- Formal water pollution control or erosion and sediment control CPESC training sessions may include certification as a CPESC; workshops offered by the SWRCB, RWQCB, Community College or University of California Extension; or other locally recognized agencies or professional organizations such as the International Erosion Control Association (IECA), Association of Bay Area Governments (ABAG), Association of General Contractors (AGC), etc. Contractors are encouraged to contact the RWQCB or the SWRCB to inquire about availability of training.
- A listing of training organizations, subject matter and classes are located at:
<http://www.dot.ca.gov/hq/construc/stormwater/stormwater1.html>
- The Contractor's WPC Manager shall have stormwater pollution prevention training and required qualifications and training for QSD or QSP under the CGP (CAS000002), Section VII, Training Qualifications and Certification Requirements.
- Onsite informal water pollution control training shall be conducted on an ongoing basis.
- Document informal stormwater training using the sample training log sheet provided as Appendix C.
- Document formal stormwater training by providing a list of classes and copies of class completion documentation. Documentation shall be submitted to the RE within 24 hours of completion of training.
- Training records shall be updated, documented and reported in WPCP file category 20.23 Contractor Personnel Training Documentation.

WPCP Builder Instructions

Section 20.3 has two separate tabs for information entry: Fields and Lists (Figure 4-16).

Section 20.4: Training	
Instructions	Fields (Selected)
Lists	
Complete (2) Fields	
QSP Name	
Stormwater Inspectors Name	

Figure 4-16. List QSP and Stormwater Inspector

Fields Tab: List the name of the QSP and the Stormwater Inspector.

Lists Tab: Select from the list on the left by clicking on title to insert:

- Types of training that the contractor's or subcontractor's BMP inspection, maintenance, and repair personnel have received or will receive;

- Types of training provided for all contractor and subcontractor employees that is directly related to water pollution control. Existing contractor and subcontractor employees shall receive training prior to working on the project. New employees shall receive water pollution control training prior to working on the project site and the training records shall be submitted to the RE within five days of training; and
- Training, experience and qualifications for the QSP, Stormwater Inspector, and WPC Manager, as applicable (Figure 4-17).

Section 20.4: Training

Instructions | Fields | Lists

Insert list of SI training course, such as 24-hour Caltrans training

	Delete	Select List
	Delete	Contractor Staff Training QSP Experience QSP Registrations QSP Training Stormwater Inspector Experience Stormwater Inspector Training WPC Manager Experience WPC Manager Registrations WPC Manager Training

Figure 4-17. Section 20.4 Lists Tab Screen

EXAMPLE

WPC Manager Registration: California Registered Professional Civil Engineer, C 0000A

WPC Manager Training: Training Provided by ABC Consultant

WPC Manager Experience:

Has developed 24 WPCPs

Has 15 years of experience as a WPC Manager working on 14 project sites

Stormwater Inspector Training:

Certified Erosion, Sediment and Stormwater Inspector (CESSWI) registered through Enviro Cert International, Inc.

Contractor Staff Training: BMP Best Practices Provided by ABC Consultants

Required text will automatically populate the WPCP and can be viewed in Preview Section 20, when preparing to print the WPCP.

SECTION 30

Pollution Sources and Control Measures

WPCP GUIDANCE INSTRUCTIONS

Include a Separator and Tab for Section 30 for ready reference.

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 10, when preparing to print the WPCP.

30.1 Pollutant Sources

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 10, when preparing to print the WPCP.

30.2 Inventory of Materials and Activities that May Pollute Stormwater

WPCP Builder Instructions

Section 30.1.1 has two separate tabs for information entry: Texts and Lists (Figure 4-18).

list of construction activities that have the potential to contribute sediment to stormwater discharges		
clearing and grubbing	<input type="button" value="Delete"/>	Select List Construction Activities
grading operations	<input type="button" value="Delete"/>	Construction Materials
	<input type="button" value="Delete"/>	

Figure 4-18. Section 30.1.1 Lists Screen

Text Tab: Insert additional narrative text for inventory of materials, as needed. If no additional text is necessary, leave blank. Automated text will populate the WPCP and can be viewed in Preview Section 30, when preparing to print the WPCP.

Lists Tab: This tab has two separate lists to select from to enter required information. Click on the list in the Select List column to move between the entries windows.

- **Construction Activities:** List all construction activities (i.e., any construction or demolition activity, including, but not limited to, clearing, grading, grubbing, or excavation,) that have the potential to contribute sediment or other pollutants to stormwater discharges.

- **Construction Materials:** List all construction materials that will be used and construction activities that will have the potential to contribute to the discharge of pollutants to stormwater.

After entering an item, hit Tab and a new line will be added. Insert as many lines as necessary to complete the inventory.

EXAMPLE

The following is a list of construction materials that will be used and activities that will be performed that will have the potential to contribute pollutants other than sediment to stormwater runoff:

- Vehicle fluids, including oil, grease, petroleum, and coolants
- Asphaltic emulsions associated with asphalt-concrete paving operations
- Cement materials associated with PCC paving operations, drainage structures, median barriers, and bridge construction
- Base and subbase material
- Joint and curing compounds
- Concrete curing compounds (e.g. methacrylate and epoxy resin products)
- Paints
- Solvents, thinners, acids
- Sandblasting materials
- Mortar mix
- Landscaping materials and wastes (topsoil, plant materials, herbicides, fertilizers, pesticides, mulch)
- BMP materials (sandbags, liquid copolymer)
- Treated lumber (materials and wastes)
- PCC rubble
- Masonry block rubble
- General litter

The following is a list of construction activities that have the potential to contribute sediment to stormwater discharges include:

- Clearing and grubbing operations
- Grading operations
- Soil import operations
- Utility excavation operations
- Sandblasting operations
- Landscaping operations

30.1.2 Potential Pollutants from Site Features or Known Contaminants

WPCP GUIDANCE INSTRUCTIONS

Review the contract documents and associated environmental documents to determine the known site contaminants.

WPCP Builder Instructions

Section 30.1.2 has two separate tabs for information entry: Texts and Lists (Figure 4-19).

Figure 4-19. Section 30.1.2 Lists Screen

Text Tab: Insert additional narrative text for contaminants and existing features, as needed. If no additional text is necessary, leave blank. Automated text will populate the WPCP and can be viewed in Preview Section 30, when preparing to print the WPCP.

List Tab: This tab has two separate lists to select from to enter required information. Click on the list in the Select List column to move between the entries windows.

- **Contaminants:** Describe the known contaminants identified and list them in this section.
- **Existing Features:** Describe existing site features related to past usage that may contribute pollutants to stormwater, (e.g., toxic materials that are known to have been treated, stored, disposed, spilled, or leaked onto the construction site).

After entering and item, hit Tab and a new line will be added. Insert as many lines as necessary to complete the inventory.

EXAMPLE

Existing site features: This site includes aerially deposited lead. The lead is located along the right shoulders of both the eastbound and westbound directions primarily as a result of vehicle exhaust containing lead from the combustion of leaded gasoline.

The DTSC issued a statewide Variance regarding the reuse of ADL-impacted soils within Caltrans right-of-way. According to the Variance, soil classified as a non-RCRA hazardous waste (based primarily on ADL content) may be suitable for reuse within Caltrans right-of-way.

ADL-impacted soil reused under the Variance must always be at least 5 feet above the highest groundwater elevation and, depending on lead concentrations, must be covered with at least one foot of non-hazardous soil or a pavement structure.

The ADL study conducted for the proposed project determined that soil conditions encountered at the site generally ranged from very dark brown sandy silt with gravel to very dark brown clayey sand. Surface and groundwater was not encountered at the boring locations.

The concentrations of metals that were detected in the soil samples are within the reported range of background concentrations for California soils. Based on the reported concentrations, offsite reuse and disposal of excavated soil may not be restricted based on lead content.

30.2 ***Soil Stabilization (Erosion Control) and Sediment Control***

WPCP GUIDANCE INSTRUCTIONS

BMP SELECTION PROCESS

- BMPs are selected to reduce or eliminate pollutants in stormwater and non-stormwater discharges associated with construction activities. Described below is the sequence of steps that shall be used to identify BMPs to be included in WPCPs.

Step 1: Incorporate the temporary water pollution control BMPs that are described in:

- Contract special provisions
- Contract plans
- Standard plans
- Standard specifications

If the BMPs required in Step 1 are inadequate to address potential pollutants in stormwater discharges and non-stormwater discharges, then:

Step 2: Incorporate the temporary water pollution control BMPs using one or more of the Caltrans minimum requirements listed in Table 2-1 of this Manual.

Step 3: If the BMPs selected from Steps 1 and 2 are inadequate to address potential pollutants in stormwater discharges and non-stormwater discharges, and then incorporate the temporary water pollution control BMPs that are described in the SWMP. For reference on these BMPs see the *Construction Site BMPs Manual*.

Show the selected BMPs on the WPCDs.

Complete the BMP implementation tables and descriptions in each of the following sections:

- 30.2 Soil Stabilization (Erosion Control) and Sediment Control
- 30.3 Construction Site Management

Use each of the following sections to identify erosion and sediment controls that will be implemented during the project.

- 30.2.1 Soil Stabilization Practices
- 30.2.2 Sediment Control Practices
- 30.2.3 Sediment Tracking Controls
- 30.2.4 Wind Erosion Controls

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 30, when preparing to print the WPCP.

30.2.1 Soil Stabilization BMP

WPCP GUIDANCE INSTRUCTIONS

- Soil stabilization consists of source control measures that are designed to prevent soil particles from detaching and becoming suspended in stormwater runoff. Soil stabilization BMPs protect the soil surface by covering and/or binding the soil particles.
- Show the limits of the soil-disturbed areas on the WPCDs.

WPCP Builder Instructions

Section 30.2.1 has two separate tabs for information entry: Text and Standard Table (Figure 4-20).

Section 30.2.1: Soil Stabilization BMPs	
Instructions	Text
Standard Table	
Provide (1) Narrative Text(s) <small>INSERT NARRATIVE DESCRIBING SELECTED SOIL STABILIZATION BMPs</small> <div style="border: 1px solid black; padding: 5px; height: 60px; width: 100%;">Soil disturbing activities consist of minor grading along the shoulder and trenching for utilities and sound wall footings as shown on WPCD-2. Existing vegetation will be preserved outside the immediate construction zone as shown.</div>	

Figure 4-20. Section 30.2.1 Soil Stabilization BMPs

Text Tab: Provide a brief description of soil-disturbing activities, such as clearing and grubbing, grading, excavation, trenching, etc. Describe the locations and scheduled installations for each selected soil stabilization BMP.

Standard Table: Complete the BMP implementation table for temporary soil stabilization BMPs (Figure 4-21).

Section 30.2.1: Soil Stabilization BMPs						
TABLE 30.2.1 TEMPORARY SOIL STABILIZATION BMPs						
CONSTRUCTION BMP ID NO.(1)	BMP NAME	CONTRACT MIN REQUIREMENT(2)	CONTRACT BID ITEM	BMP USED	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON	
SS-1	Scheduling	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		Delete
SS-2	Preservation of Proprietary Preservation of Existing Vegetation	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		Delete
SS-3 Bonded	Temporary Hydraulic Mulch (Bonded Stabilized Fiber Matrix)	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>		Delete
SS-3 Polymer	Temporary Hydraulic Mulch (Polymer Stabilized Fiber Matrix)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input checked="" type="radio"/>	Other soil stabilization BMPs are being used on this project.	Delete
SS-4	Temporary Erosion Control (Soil Stabilization)	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>		Delete
ALTERNATIVE BMP USED (3) <input type="radio"/> Yes <input checked="" type="radio"/> No <small>Note: You must select "Yes" before you can enter the Alternative BMPs below.</small>						
CONSTRUCTION BMP ID NO. (1)	BMP NAME	IF USED STATE REASON				

Notes:
 (1) The BMP designations (SS-1, SS-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
 (2) Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
 (3) Use of alternative BMPs will require written approval by the RE.

Figure 4-21. Table 30.2.1 Soil Stabilization BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.

- If the project will not create DSAs, state as such and check "No" for all BMPs in the soil stabilization selection BMP implementation table and enter "N/A" as the reason not used.
- Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

EXAMPLE

Soil disturbing activities consist of minor grading along the shoulder and trenching for utilities and sound wall footings as shown on WPCD-2. Existing vegetation will be preserved outside the immediate construction zone as shown.

SS-1 Scheduling

The majority of soil disturbing work will be conducted outside of the wet season, see Attachment C WPCS. Temporary soil stabilization, sediment control, tracking control, wind erosion control, non-storm water management and waste and materials management BMPs are scheduled to coincide with the scheduled soil disturbing activities and other construction activities scheduled that could potentially discharge pollutants to the storm drain system.

SS-2 Preservation of Existing Vegetation

Clearing and grubbing will be limited to the boundaries of active construction as shown on WPCD-2. Surrounding areas of existing vegetation will be protected by installing ESA fencing around the drip lines of the trees.

SS-5 Soil Binders (Copolymer)

BMP SS-5 was selected to minimize interference with the final (permanent) erosion control measures (decorative landscaping). Soil binders will be applied year-round to all inactive DSAs. Soil binders will be installed within 15 days from when DSAs become inactive and before forecasted storm events on active DSAs.

30.2.2 Sediment Control BMPs

WPCP GUIDANCE INSTRUCTIONS

- Sediment controls are used to complement and enhance the selected soil stabilization measures. Sediment controls are designed to intercept runoff and capture suspended soil particles through a settlement or filtration process.
- Show selected BMPs on the WPCDs.

WPCP Builder Instructions

Section 30.2.2 has two separate tabs for information entry: Text and Standard Table.

Text Tab: Provide a description of the soil-disturbed areas that will necessitate sediment control BMPs. References to the WPCDs and/or Section 30.2.1 are often sufficient. Describe the locations and scheduled installations for each selected sediment control BMP.

Standard Table: Complete the BMP implementation table for temporary soil control BMPs (Figure 4-22).

Figure 4-22. Table 30.2.2 Sediment Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- If the project will not create DSAs, state as such and check "No" for all BMPs in the soil stabilization selection BMP implementation table and enter "N/A" as the reason not used.
- Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

EXAMPLE

Temporary fiber rolls will be used at the toe of slopes and as perimeter sediment controls. Sediment controls for this project will be implemented year-round. Sediment controls will be installed within 15 days from when DSAs become inactive and before forecasted storm events on active DSAs. Deployment locations will be as follows:

SC-5 Temporary Fiber Rolls

Fiber rolls will be deployed along the downstream (southern) construction site perimeter as shown on WPCD-2. Once the drainage channel is constructed and lined, fiber rolls will be extended north, along each side of the channel. See SC-4, Temporary Check Dam, below.

SC-4 Temporary Check Dam

Concentrated flows will be conveyed by the drainage channel that runs north-south, adjacent to the shoulder. During channel construction, sediment control will be provided by gravel bag check dams, spaced at 30 feet. Once the channel is lined, temporary fiber rolls will be installed along the channel banks to prevent sediment from entering the channel.

- Under the Standard Table Tab, complete the BMP implementation table for temporary sediment control BMPs. All listed BMPs shall be considered for the project.
 - The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
 - Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

30.2.3 Tracking Control BMPs

WPCP GUIDANCE INSTRUCTIONS

- Tracking controls shall be considered and implemented year round and throughout the duration of the project.
- Show selected sediment tracking control BMPs on the WPCDs in Attachment A.

WPCP Builder Instructions

Section 30.2.3 has two separate tabs for information entry: Text and Standard Table.

Text Tab: Provide a description of the tracking controls BMPs to be used. References to the WPCDs and/or Section 30.2.1 are often sufficient. Describe the locations and scheduled installations for each selected sediment control BMP.

Standard Table: Complete the BMP implementation table for temporary soil control BMPs (Figure 4-23).

TABLE 30.2.3 TEMPORARY TRACKING CONTROL BMPs					
CONSTRUCTION BMP ID NO.(1)	BMP NAME	CONTRACT REQUIREMENT(2)	CONTRACT BID ITEM	BMP USED Yes No	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON
SC-7	Street Sweeping	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
TC-1	Temporary Construction Entrance	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
TC-2	Stabilization Construction Roadway	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	
TC-3	Temporary Entrance / Outlet Tire Wash	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/> <input type="radio"/>	

ALTERNATIVE BMPs USED ()
 Yes No
 Note: You must select "Yes" before you can enter the Alternative BMPs below.

CONSTRUCTION BMP ID NO. (1) IF USED STATE REASON

Note:
 (1)The BMP designations (SS-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
 (2)Minimum requirements are based on the applicable Contract Document, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSO or WPC Manager.
 (3)Use of alternative BMPs will require written approval by the RE.

Figure 4-23. Table 30.2.3 Tracking Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- If the project will not create DSAs, state as such and check "No" for all BMPs in the soil stabilization selection BMP implementation table and enter "N/A" as the reason not used.
- Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

30.2.4 Wind Erosion Control BMPs

WPCP Builder Instructions

Section 30.2.4 has two separate tabs for information entry: Text and Standard Table.

Text Tab: Provide a description of wind erosion control BMPs to be used. Give a general approach on how wind erosion control BMPs will be implemented on the project to control dust during construction operations, including stockpile operations at all times. If the project will not create DSAs, indicate this in the narrative description.

Standard Table: Complete the BMP implementation table for wind erosion control BMPs (Figure 4-24).

TABLE 30.2.4 TEMPORARY WIND EROSION CONTROL BMPs					
CONSTRUCTION BMP ID NO. (1)	BMP NAME	CONTRACT MIN REQUIREMENT (2)	CONTRACT BID ITEM	BMP USED Yes No	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON
WE-1	Wind Erosion Control	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>	
TC-1	Temporary Construction Entrance	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>	
TC-2	Stabilization Construction Roadway	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>	
—	All Soil Stabilization Measures included in Section 30.2.1	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>	

ALTERNATIVE BMPs USED (3)
 Yes No
 Note: You must select "Yes" before you can enter the Alternative BMPs below.

CONSTRUCTION BMP ID NO. (1)	BMP NAME *	IF USED STATE REASON

Notes:
 (1) The BMP designations (SS-1, SC-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
 (2) Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
 (3) Use of alternative BMPs will require written approval by the BE.

Figure 4-24. Table 30.2.4 Wind Erosion Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- If the project will not create DSAs, state as such and check "No" for all BMPs in the soil stabilization selection BMP implementation table and enter "N/A" as the reason not used.
- Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

30.3 Job Site Management

30.3.1 Non-Stormwater Management BMPs

WPCP GUIDANCE INSTRUCTIONS

Non-stormwater discharges which are not authorized under the Caltrans Permit or authorized under a separate NPDES permit are prohibited. Examples of prohibited discharges common to construction activities include:

- Vehicle and equipment wash water
- Concrete washout water
- Slurries from concrete cutting and coring operations or AC grinding operations
- Slurries from concrete or mortar mixing operations
- Blast residue from high-pressure washing of structures or surfaces
- Wash water from cleaning painting equipment
- Runoff from dust control applications of water or dust palliatives
- Sanitary and septic wastes

WPCP Builder Instructions

Section 30.3.1 has two separate tabs for information entry: Text and Standard Table.

Text Tab: Provide a description narrative description of the non-stormwater management BMPs to be used. Give a general approach on how non-stormwater management BMPs will be implemented on the project.

- List all activities that have the potential to produce non-stormwater discharges.
- Consider dewatering operations and any construction activity that requires water use.
- Discuss planned dewatering operations with the RE to determine possible requirement for permits and/or treatment.
- Discuss how mobile operations, such as maintenance and fueling for large or stationary equipment, will be addressed.
- Describe the locations and scheduled installations for each selected Non-Stormwater Management BMPs

Standard Table: Complete the BMP implementation table for non-stormwater management BMPs (Figure 4-25).

Section 30.3.1: Non-Stormwater Management BMPs						
TABLE 30.3.1 Construction Site Management Non-Stormwater Pollution Control BMPs						
CONSTRUCTION BMP ID NO.(1)	BMP NAME	CONTRACT MIN REQUIREMENT (2)	CONTRACT BID ITEM	BMP USED Yes <input type="radio"/> No <input checked="" type="radio"/>	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON	
NS-1	Water Control and Conservation	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input checked="" type="radio"/>	<input type="button" value="Delete"/>
NS-2	Dewatering	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input checked="" type="radio"/>	<input type="button" value="Delete"/>
NS-3	Paving, Sealing, Sawcutting, and Grinding Operations	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input checked="" type="radio"/>	<input type="button" value="Delete"/>
NS-4	Temp Stream Crossing	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input checked="" type="radio"/>	<input type="button" value="Delete"/>
NS-5	Clear Water Diversion	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="radio"/>	<input checked="" type="radio"/>	<input type="button" value="Delete"/>
ALTERNATIVE BMPs USED (3) <input checked="" type="radio"/> Yes <input type="radio"/> No						
Note: You must select "Yes" before you can enter the Alternative BMPs below.				IF USED STATE REASON		
CONSTRUCTION BMP ID NO. (1)	BMP NAME *	<input type="button" value="Delete"/>				
						<input type="button" value="Delete"/>

Notes:
(1) The BMP designations (NS-1, NS-5, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
(2) Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to every project. Applicability to a specific project shall be determined by the QSD or WPC Manager.
(3) Use of alternative BMPs will require written approval by the BE.

Figure 4-25. Table 30.3.1 Non-Stormwater Management BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- If the project will not create DSAs, state as such and check "No" for all BMPs in the soil stabilization selection BMP implementation table and enter "N/A" as the reason not used.
- Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

30.3.2 Waste Management and Materials Pollution Control BMPs

WPCP GUIDANCE INSTRUCTIONS

Waste management consists of implementing procedural and structural BMPs for collecting, handling, storing and disposing of wastes generated by a construction project to prevent the release of waste materials into stormwater discharges. Wastes are going to be generated during construction; however, the methods in which the wastes are collected, stored, and removed will determine the success of the waste management pollution control BMPs. Construction site wastes can range from residues collected from non-stormwater discharges (i.e. paint removal) to general site litter and debris (i.e. empty marker paint cans).

Material pollution control (materials handling) consist of implementing procedural and structural BMPs for handling, storing and using construction materials to prevent the release of those materials into stormwater discharges. The amount and type of construction materials to be utilized at the site will be dependent upon the type of construction and the length of the construction period. The materials may be used continuously, such as fuel for vehicles and equipment, or the materials may be used for a discrete period, such as fertilizer for landscaping.

Waste management and materials pollution control BMPs must be implemented to minimize stormwater contact with construction materials, wastes and service areas, and to prevent materials and wastes from being discharged off-site.

WPCP Builder Instructions

Section 30.3.2 has two separate tabs for information entry: Text and Standard Table.

Text Tab: Provide a narrative description of the waste management and material pollution control BMPs. Give a general approach on how waste management and material pollution control BMPs will be implemented on the project.

- Describe the locations and scheduled installations for each selected waste management and materials pollution control BMPs.
- Review project activities to identify likely construction materials and wastes. Identify materials and wastes with special handling or disposal requirements, such as lead contaminated soils.
- For Solid Waste Management WM-5, a list of waste disposal facilities and the type of waste to be disposed at each facility is provided.

Standard Table: Complete the BMP implementation table for waste management and materials pollution control BMPs.

- Based on the listed materials and wastes, use the following waste management and materials pollution controls BMP consideration checklist to select appropriate BMPs (Figure 4-26).

Section 30.3.2: Waste Management and Materials Pollution Control BMPs						
<input type="button" value="Instructions"/> <input type="button" value="Text"/> <input type="button" value="Standard Table"/> TABLE 30.3.2 Construction Site Management Waste Management and Materials Pollution Control BMPs						
CONSTRUCTION BMP ID NO. ⁽¹⁾	BMP NAME	CONTRACT MIN REQUIREMENT ⁽²⁾	CONTRACT BID ITEM	BMP USED	IF A CONTRACT MINIMUM REQUIREMENT BUT NOT USED, STATE REASON	
WM-1	Material Delivery and Storage	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>		<input type="button" value="Delete"/>
WM-2	Material Use	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>		<input type="button" value="Delete"/>
WM-3	Stoipile Management	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>		<input type="button" value="Delete"/>
WM-4	Spill Prevention and Control	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>		<input type="button" value="Delete"/>
WM-5	Solid Waste Management	<input type="checkbox"/>	<input type="checkbox"/>	<input type="radio"/> <input type="radio"/>		<input type="button" value="Delete"/>

ALTERNATIVE BMPs USED⁽³⁾

Yes No

Note: You must select "Yes" before you can enter the Alternative BMPs below.

CONSTRUCTION BMP ID NO. (1)	BMP NAME [*]	IF USED STATE REASON
		<input type="button" value="Delete"/>

Notes:
(1)The BMP designations (SS-1, SCS, etc.) are solely for maintaining continuity with existing Caltrans documents and are not provided to imply that the Construction Site BMP Reference Manual is a required contract document.
(2)Minimum requirements are based on the required Contract Provisions, Standard Special Provisions, Plans and Specifications. Not all minimum requirements may be applicable to your project and some provisions may be determined by the QSD or WPC Manager.
(3)Use of alternative BMPs will require written approval by the RE.

Figure 4-26. Table 30.3.2 Waste Management and Materials Pollution Control BMPs

- The database will automatically ask for a reason to be stated in the appropriate column for any Contract Minimum BMP that is not used.
- If the project will not create DSAs, state as such and check "No" for all BMPs in the soil stabilization selection BMP implementation table and enter "N/A" as the reason not used.
- Choose Yes or No if Alternative BMPs will be used on the project. This section of the table will not be functional or show up in the WPCP if Yes is not checked.

30.4 Water Pollution Control Drawings (WPCDs)

WPCP GUIDANCE INSTRUCTIONS

The contractor shall include WPCDs in the WPCP to show the locations, applications, and deployment of the BMPs checked in the preceding sections.

The WPCDs shall include one or more drawings at a scale sufficient to clearly show on-site drainage patterns and the location of BMPs. The WPCDs shall be no smaller than the "reduced plans" (approximately 11" x 17") issued by Caltrans. Use the sample WPCCD included in Attachment BB of this manual.

The WPCDs shall include:

- Detail sheets showing construction details for the BMPs that shall be used.
- Location sheets, usually modified layout, grading, stage construction, and/or drainage sheets, showing the locations of BMPs that will be used. Delineation of BMPs to be implemented during project construction will be in the form of construction notes and/or symbols.

WPCP Builder Instructions

Text Tab: Insert additional narrative text for Water Pollution Control Drawings, as needed. If no additional text is necessary, leave blank. Automated text will populate the WPCP and can be viewed in Preview Section 30, when preparing to print the WPCP.

30.5 Water Pollution Control Schedule

WPCP GUIDANCE INSTRUCTIONS

Project Schedule: Provide a written or graphical project schedule. A graphical schedule in the form of an image file can be copied into the form field for the graphical schedule. Alternatively, the graphical schedule can be manually included in the document. The schedule only needs to be detailed enough to show major activities sequenced with the implementation of construction site BMPs, including:

- Project start and finish dates
- Mobilization dates
- Mass clearing and grubbing, roadside clearing dates
- Major grading and excavation dates
- Dates for special activities named in other permits, such as Fish and Game
- Implementation schedule, by location, for deployment of:
 - Temporary soil stabilization BMPs
 - Temporary sediment control BMPs
 - Tracking control BMPs
 - Wind erosion control BMPs
 - Non-stormwater BMPs
 - Waste management and materials pollution control BMPs
- Paving, sawcutting, and any other pavement related operations
- Planned stockpiling operations
- Dates for other significant long-term operations or activities that may plan non-stormwater discharges such as dewatering, grinding, etc.

Note: Projects located in the Lake Tahoe, Truckee River, East Fork Carson River, or West Fork Carson River Hydrologic Units, and projects above 5,000 feet in elevation in the portions of Mono County or Inyo County within the Lahontan RWQCB are not allowed to perform removal of vegetation nor disturbance of existing ground surface conditions between October 15 of each year and May 1 of the following year; except when there is an emergency situation that threatens the public health and safety, or when the project is granted a variance by the RWQCB Executive Officer.

WPCP Builder Instructions

Text Tab: Insert additional narrative text for Water Pollution Control Schedules, as needed. If no additional text is necessary, leave blank. Automated text will populate the WPCP and can be viewed in Preview Section 30, when preparing to print the WPCP.

SECTION 40

WPCP Implementation

40.1 *WPC Manager Responsibilities*

WPCP GUIDANCE INSTRUCTIONS:

- The person responsible for water pollution control during construction is the WPC Manager, the template allows for an alternate to be named to be in charge of the site's water pollution control in the absence of the WPCM.
- The WPC Manager and alternate must be a QSD or QSP with a certification or registration listed in Section 10 of this WPCP and Section VII.B.1 of the Construction General Permit.
- Effective July 1, 2013, the Construction General Permit provides two methods for QSDs to comply with the training requirements: State Water Board-sponsored or State Water Board-approved training. Professional civil engineers, geologists, and engineering geologists in good standing with the California Board of Professional Engineers, Land Surveyors and Geologists are hereinafter referred to licensees (CBPELSG) and may obtain their required QSD training via State Water Board's self-directed QSD training.
- The WPC Manager shall be available at all times throughout the duration of the project.
- Duties of the Contractor's WPC Manager include but are not limited to:
 - Ensuring compliance with the WPCP
 - Implementing all elements of the WPCP and contract specifications, including but not limited to implementing:
 - Prompt and effective erosion and sediment control measures
 - Non-stormwater management, and materials and waste management activities such as: monitoring discharges (dewatering, diversion devices); general site clean-up; vehicle and equipment cleaning, fueling and maintenance; spill control; ensuring that no materials other than stormwater are discharged in quantities which, will have an adverse effect on receiving waters or storm drain systems; etc.

- Overseeing and ensuring that the following site inspections and visual monitoring is conducted
 - Required daily BMP inspections
 - Routine weekly stormwater inspections
 - Quarterly non-stormwater inspections
 - Pre-storm inspections for forecasted storm events
 - Daily inspections during forecasted storm events
 - Post-storm inspections for qualifying rain events
- Preparing Amendments to the WPCP when required
- Ensuring elimination of all unauthorized discharges
- Mobilizing crews in order to make immediate repairs to the control measures (the contractor's WPC Manager shall be assigned authority by the contractor to mobilize crews)
- Coordinating with the RE to assure all of the necessary corrections/repairs are made immediately, and that the project complies with the WPCP and accepted water pollution control drawings at all times
- Submitting Notices of Discharge and reports of Illicit Connections or Illegal Discharges
- The contractor's WPC Manager shall have primary responsibility and significant authority for the implementation, maintenance, inspection and amendments to the accepted WPCP.

WPCP Builder Instructions

Text Tab: Insert additional narrative text for additional responsibilities and/ or names, as needed. If no additional text is necessary, leave blank. Automated text will populate the WPCP and can be viewed in Preview Section 40, when preparing to print the WPCP.

40.2 Weather Forecast Monitoring

WPCP GUIDANCE INSTRUCTIONS

The WPC Manager must monitor the National Weather Service Forecast Office and document forecast so that appropriate actions are taken prior to forecasted storm events.

WPCP Builder Instructions

Fields Tab: Enter the project site address that will be used when obtaining weather forecast information from National Weather Service Forecast Office.

Lists Tab: Enter in the list the actions to be taken when a forecasted storm event is likely.

40.3 *BMPs Status Report*

WPCP GUIDANCE INSTRUCTIONS

The WPC Manager must prepare monthly a status of the water pollution control best management practices that are deployed and the water pollution control practices that will be deployed the following month. Monthly Water pollution control best management practices status is to be reported on form CEM-2034 Monthly Stormwater BMPs & Material Inventory Report, in Appendix E. Copies of the completed forms shall be kept in WPCP File Category 20.34: BMPs Status Reports.

This form is optional; the RE will determine whether it should be used throughout the contract duration to document deployed BMPs' status.

WPCP Builder Instructions

Text Tab: Insert additional narrative text for the BMP Status Report, as needed. If no additional text is necessary, leave blank. Automated text will populate the WPCP and can be viewed in Preview Section 40, when preparing to print the WPCP.

40.4 *Stormwater Site Inspections and Site Visual Monitoring*

WPCP GUIDANCE INSTRUCTIONS

- Site inspections include both BMP inspections and site visual monitoring.
- The purpose of BMP inspections is to:
 - Ensure proper BMP installation
 - BMP maintenance
 - Evaluate BMP effectiveness and implement repairs or design changes as soon as feasible
- Inspections shall be conducted by the Contractor's WPC Manager or other trained staff.
- A Stormwater Site Inspection Report must be completed during each inspection. A blank Stormwater Site Inspection Report is included as Appendix F of the WPCP.
- Inspections are required:
 - Daily for required BMPs
 - Weekly routine inspections of BMPs
 - Daily inspections shall be conducted for projects within the Lake Tahoe Hydrologic Unit and documented on CEM-2031
- The purpose of site visual monitoring is to:
 - Determine whether non-visible pollutants are present at the construction site and could be potentially causing or contributing to exceedances of water quality objectives
 - Determine whether immediate corrective actions, additional BMPs

implementation, or WPCP revisions are necessary to reduce pollutants in storm water discharges and authorized non-storm water discharges

- Document the presence or evidence of any non-storm water discharge (authorized or unauthorized), pollutant characteristics (floating and suspended material, sheen, discoloration, turbidity, odor, etc.), and source, if applicable and the response taken to eliminate unauthorized non-storm water discharges and to reduce or prevent pollutants from contacting non-storm water discharges
- Visual monitoring inspections of the project site shall be conducted:
 - Prior to a forecasted storm event
 - At 24-hour intervals during extended storm events
 - Post qualifying rain event
 - Quarterly for non-stormwater discharges
- A copy of completed inspection reports shall be submitted to the RE within 24 hours of inspection. Completed inspection reports shall be kept in the WPCP File Category 20.31 Contractor Stormwater Site Inspection Reports.
- A Stormwater Corrective Actions Summary shall be completed for any inspection that identifies deficiencies in BMPs. Copies of the completed correction summary reports shall be attached to the corresponding Stormwater Site Inspection Report and shall be kept in the WPCP File Category 20.31 Contractor Stormwater Site Inspection Reports.
- Deficiencies identified in visual monitoring site inspection reports and correction of deficiencies will be tracked on CEM-2035 Stormwater Corrective Actions Summary form in Appendix G. Corrections summaries shall be submitted to the RE when corrections are completed and must be submitted within five days of a site inspection. Copies of the completed correction summary reports shall be attached to the corresponding Stormwater Site Inspection Report and shall be kept in WPCP File Category 20.33 Site Visual Monitoring Inspection Reports.

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 40, when preparing to print the WPCP.

40.5 Stormwater Site Inspections

WPCP GUIDANCE INSTRUCTIONS

Project site inspections of stormwater BMPs are conducted to identify and record:

- What BMPs are properly installed
- What BMPs need maintenance to operate effectively
- What BMPs have failed
- What BMPs could fail to operate as intended

Routine stormwater site inspections shall be conducted by the Contractor's WPC Manager or other properly trained staff at the following minimum frequencies:

- Weekly

Stormwater site inspections will be documented on CEM-2030 Stormwater Site Inspection Report in Appendix F. Completed inspection reports shall be submitted to the RE within 24 hours of inspection. Copies of the completed reports will be kept in WPCP File Category 20.31: Contractor Stormwater Site Inspection Reports.

Deficiencies identified in site inspection reports and correction of deficiencies will be tracked on CEM-2035 Stormwater Corrective Actions Summary, in Appendix G. Corrections summaries shall be submitted to the RE when corrections are completed but must be submitted within five days of a site inspection. Copies of the completed correction summary reports shall be attached to the corresponding Stormwater Site Inspection Report and shall be kept in WPCP File Category 20.31: Contractor Stormwater Site Inspection Reports

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 40, when preparing to print the WPCP.

40.6 Site Visual Monitoring

WPCP GUIDANCE INSTRUCTIONS

Stormwater site visual monitoring inspections shall be conducted at the following minimum frequencies:

- Prior to a forecasted storm event
- At 24-hour intervals during extended forecasted storm events
- Post qualifying rain event that generated site runoff
- Quarterly for non-stormwater discharges

Site visual monitoring inspections for non-stormwater discharges will be conducted once during each of the following periods: January-March, April-June, July-September, and October-December.

If visual monitoring of the site is unsafe because of dangerous weather conditions, such as flooding and electrical storms, the stormwater site inspector shall document the reason for the exception.

Documentation that the site visual monitoring inspection could not be performed shall be filed in WPCP File Category 20.33: Site Visual Monitoring Inspection Reports.

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 40, when preparing to print the WPCP. This applies to all subsections of 40.6. WPCP Guidance Instructions consist of required text that is automated within WPCP Builder.

40.6.1 Visual Monitoring Prior to a Forecasted Storm Event

WPCP GUIDANCE INSTRUCTIONS

Visual monitoring of the project site is required when the forecast for precipitation is greater than 50 percent within the next 24, 48, 72, or 96 hours and the amount of precipitation forecasted for any 24-hour period during the forecasted storm event is 0.10 inch or greater. Site visual monitoring for precipitation events shall be conducted within 48 hours prior to a forecasted storm event. The pre-storm site visual monitoring inspection shall visual observe:

- All stormwater drainage areas to identify any spills, leaks, or uncontrolled pollutant sources
- Any stormwater storage and containment areas to detect leaks and ensure maintenance of adequate freeboard
- All BMPs for proper installation and adequate maintenance

Observations of the site and any recommended corrective actions will be documented on CEM-2030 Stormwater Site Inspection Report. Any photographs used to document observations will be referenced on stormwater site inspection report.

40.6.2 Visual Monitoring During Extended Forecasted Storm Event

WPCP GUIDANCE INSTRUCTIONS

Stormwater visual monitoring site inspections shall be conducted at least once each 24-hour period during extended forecasted storm events. The during storm site visual monitoring inspection shall visual observe:

- Stormwater discharges at all discharge locations
- Any stored or contained stormwater that is derived from and discharged subsequent to the forecasted storm event. Stored or contained stormwater that will likely discharge after working hours due to anticipated precipitation shall be observed prior to the discharge during working hours.

Stormwater discharges and stored or contained stormwater will be observed for the presence or absence of floating and suspended materials, sheen on the surface, discolorations, turbidity, odors, and source(s) of any observed pollutants.

A during forecasted rain event visual monitoring site inspection will include observation of all site BMPs for:

- Proper installation
- Maintenance
- Failure
- BMPs that could fail to operate as intended
- Effectiveness so that design changes can be implemented as soon as feasible

Observations of the site and any recommended corrective actions will be documented on CEM-2030 Stormwater Site Inspection Report. Any photographs used to document observations will be referenced on stormwater site inspection report.

Required corrective actions will be initiated within 72 hours after they are identified and completed as soon as possible.

40.6.3 Visual Monitoring Within 48 Hours After a QRE Generating Site Runoff

WPCP GUIDANCE INSTRUCTIONS

Site visual monitoring post precipitation events shall be conducted within 48 hours of any qualifying rain event that causes site runoff. The post-storm site visual monitoring inspection shall visual observe:

- Stormwater discharges at all discharge locations
- Any stored or contained stormwater that is derived from and discharged subsequent to the qualifying rain event. Stored or contained stormwater that will likely discharge after working hours due to anticipated precipitation shall be observed prior to the discharge during working hours.

Stormwater discharges and stored or contained stormwater will be observed for the presence or absence of floating and suspended materials, sheen on the surface, discolorations, turbidity, odors, and source(s) of any observed pollutants.

Post qualifying rain event stormwater visual monitoring site inspection will include observation of all site BMPs for:

- Proper installation
- Maintenance
- Failure
- BMPs that could fail to operate as intended
- Effectiveness so that design changes can be implemented as soon as feasible

Observations of the site and any recommended corrective actions will be documented on CEM-2030 Stormwater Site Inspection Report. Any photographs used to document observations will be referenced on stormwater site inspection report.

Any corrective actions will be completed as soon as possible but if BMPs require design changes the implementation of changes will begin within 72 hours of identification and the changes will be completed as soon as possible.

40.6.4 Visual Monitoring Non-Stormwater Discharges

WPCP GUIDANCE INSTRUCTIONS

Visual monitoring and observations for non-stormwater discharges will be conducted for the presence or indications of prior unauthorized and authorized non-stormwater discharges and their sources. The presence or absence of non-stormwater discharges based on site observations will be documented on CEM-2030 Stormwater Site Inspection Report.

Documentation of observed non-stormwater discharges will include presence or absence of floating and suspended materials, sheen on the surface, discolorations, turbidity, odors, and source(s) of any observed pollutants.

Observations of the site and the response taken to eliminate any unauthorized non-stormwater discharges and to reduce or prevent pollutants from contacting non-stormwater discharges shall be documented on CEM-2030 Stormwater Site Inspection Report. Any photographs used to document observations will be referenced on the stormwater site inspection report.

If a discharge or evidence of a prior discharge is discovered reporting will comply with the requirements in Section 50-2 Discharge Reporting Requirements.

If an illicit connection or illegal discharge is discovered reporting will comply with the requirements in Section 50-4 Illicit Connection/Illegal Discharge Reporting.

40.6.5 Visual Monitoring Documentation, Follow-up and Tracking Procedures

WPCP GUIDANCE INSTRUCTIONS

Site visual monitoring site inspections will be documented on CEM-2030 Stormwater Site Inspection Report, in Appendix F. Completed inspection reports shall be submitted to the RE within 24 hours of inspection. Copies of the completed reports will be kept in WPCP File Category 20.33: Site Visual Monitoring Inspection Reports.

For deficiencies identified by site visual monitoring inspections the required repairs or maintenance of BMPs shall begin and be completed as soon as possible. For deficiencies identified by visual site inspections that require design changes, including additional BMPs, the implementation of changes will begin within 72 hours of identification and be completed as soon as possible. When design changes to BMPs are required the WPCP shall be amended, including WPCDs.

Deficiencies identified in site visual monitoring inspection reports and correction of deficiencies will be tracked on CEM-2035 Stormwater Corrective Actions Summary, in Appendix G. Corrections summaries shall be submitted to the RE when corrections are completed and must be submitted within five days of the site inspection.

Completed CEM-2035 Stormwater Corrective Actions Summary forms shall be filed in WPCP File Category 20.35: Corrective Actions Summary. A copy of the completed CEM-2035 Stormwater Corrective Actions Summary form will also be attached to the corresponding visual monitoring inspection report and shall be kept in the WPCP File Category 20.33.

SECTION 50

WPCP Reporting Requirements

50.1 Record Keeping

WPCP Builder Instructions

No action required. Required text will automatically populate the WPCP and can be viewed in Preview Section 50, when preparing to print the WPCP. This applies to all subsections of 50. WPCP Guidance Instructions consist of required text that is automated within WPCP Builder.

50.2 Discharge Reporting

WPCP GUIDANCE INSTRUCTIONS

- Discharges will be reported in writing to the RE verbally upon discovery and in writing within 48 hours of occurrence or as required in the Special Provisions. A Notice of Discharge form for reporting discharges shall be included in Appendix H and WPCP File Category: 20.61: Notice of Discharge Reports.
- Note: USEPA has issued regulations that define Reportable Quantity (RQ) levels for oil and hazardous substances. These regulations are found in the CFRs at 40CFR Part 110, Part 117, or Part 302.

50.3 Regulatory Agency Notice or Order Reporting

- Regulatory agency notices or orders will be reported to the RE verbally upon receiving the notice or order. A written report with a copy of the notice or order shall be submitted to the RE within three days of receiving a notice or order.

50.4 Illicit Connection/Illegal Discharge Reporting

If the contractor discovers an illicit connection or illegal discharge during a stormwater site visual monitoring site inspection or while performing work on the project notify the RE verbally upon discovering the illicit connection or illegal discharge.

4.3 WPCP Attachments

WPCP Attachments A-D contain documents referenced by the WPCP. Step-by-step instructions are provided for preparing WPCP Attachments A-D and where appropriate examples of attachments are provided.

Attachment A	WPCDs
Attachment B	Water Pollution Control Schedule
Attachment C	WPCP Amendments
Attachment D	Contractor and Subcontractor Personnel Stormwater Training

4.3.1 Attachment A WPCDs

The WPCDs are the component of the project WPCP that show the necessary BMPs by project phase/stage for the project to be in compliance with Caltrans Standard Specifications and the contract special provisions. The WPCDs shall show all areas that are directly related to the construction activity, including but not limited to staging areas, storage yards, material borrow areas and storage areas, access roads, etc., whether or not they reside within the Caltrans rights-of-way. The WPCDs shall reflect the contractor's phasing and/or construction staging, and shall address the entire scope of the contract work.

When necessary to clearly define water pollution control practices by construction activity phases, the phases that should be shown on the WPCDs are the Preliminary Phase, Grading Phase, Highway Construction Phase, and the Highway Planting / Erosion Control Establishment Phase. These phases are defined below.

4.3.1.1 Preliminary Phase (Pre-Construction Phase – Part of the Grading Phase)

Construction stage including rough grading/or disking, clearing and grubbing operations, or any soil disturbance prior to mass grading.

4.3.1.2 Grading Phase

Includes reconfiguring the topography for the project including; excavation for roadway including necessary blasting of hard rock, highway embankment construction (fills); mass grading, and stockpiling of select material for capping operations.

4.3.1.3 Highway Construction Phase

Highway construction phase includes both highway and structure construction. Highway construction includes final roadway excavation, placement of base materials and highway paving, finish grading, curbs, gutters and sidewalks, public utilities, public water facilities including fire hydrants, public sanitary sewer systems, storm drain systems and/or other drainage improvements, highway lighting, traffic signals and/or other highway electrical work, guardrail, concrete barriers, sign installation, pavement markers, traffic stripping and pavement markings. Structure construction includes structure footings, bridges, retaining walls, major culverts, overhead sign structures and buildings.

4.3.1.4 Highway Planting / Erosion Control Establishment Phase

Highway planting including clearing and grubbing operations, soil preparation (grading, incorporation of soil amendments, placement of topsoil), irrigation (trenching, installation, trench backfilling), minor grading (top dressing, fine grading lawn and ground cover areas), hardscaping, planting (seeding and planting of plants), mulch (application of wood chips or other mulches) and plant establishment (weeding, plant replacement and if needed: fertilizer application, irrigation maintenance, reapplication of

mulch). Erosion control includes placement of permanent erosion control materials and maintenance of temporary sediment controls during the erosion control establishment period.

The WPCDs for grading phase and highway construction phase may need to show different stages to completely identify all required BMPs. The stage construction sheets of the project plans may be used as base sheets for the WPCDs when staging is required.

The WPCDs provide field staff with the information on where to install BMPs so that they are effective. The WPCDs and Water Pollution Control Schedule provide the necessary tools for a contractor to plan and implement BMPs to meet the requirements of the project WPCP.

Prepare WPCDs in conformance with the following instructions and requirements. The WPCDs shall be no smaller than the “reduced plans” (approximately 11”x17”) issued by Caltrans.

- The WPCDs shall show locations for the BMPs that will be used.
- Include cover sheet(s) listing the BMPs that will be used along with the associated BMP symbols used on the WPCDs. Standard symbols and line types are shown in this Manual, Appendix B.
- Temporary WPC details not shown on applicable Standard Plans or contract plans must be shown in Attachment A.
- Additional BMP details may be necessary to describe site-specific BMP applications. BMP details other than the ones shown in the contract plans and Standard Plans shall be submitted to the RE for approval.

Use project layout, grading, stage construction, drainage sheets and/or erosion sheets as base sheets for the WPCDs. Use Section 30.1.2 as a guide to identify pollutant sources and BMPs for construction activities. Select BMPs that are appropriate for the site and show their locations on the WPCDs. The base sheets shall show the construction project in detail, including:

- The construction site perimeter
- Geographic features within or immediately adjacent to the site. Include surface waters such as lakes, streams, springs, wetlands, estuaries, ponds, and the ocean
- Site topography before and after construction. Include roads, paved areas, buildings, slopes, drainage facilities, and areas of known or suspected contamination
- Permanent (post-construction) BMPs. These are usually shown on the contract plans.

Delineate the following site information on the WPCDs:

- Discharge points from the project to site storm drain systems or receiving waters
- Tributary areas and drainage patterns across the project area (show using flow arrows) into each onsite stormwater inlet or receiving water
- Tributary areas and drainage patterns to each onsite stormwater inlet, receiving water or discharge point
- Off-site tributary drainage areas that generate run-on to the project. (Where off-site tributary drainage areas are too large to depict on the drawings, use map notes or inserts illustrating the upstream drainage areas)
- Temporary onsite drainage(s) to carry concentrated flows
- Drainage patterns and slopes anticipated after major grading activities are completed
- Outline all areas of existing vegetation, soil cover, or native vegetation that will remain undisturbed during the project
- Outline all areas of soil disturbance (DSAs)
- Identify location(s) of contaminated or hazardous soils

- Locate potential non-stormwater discharges and activities, such as dewatering operations, concrete saw-cutting or coring, pressure washing, waterline flushing, diversions, cofferdams, and vehicle and equipment cleaning. If operations can't be located, provide a narrative description.

Show proposed locations of all construction site BMPs on the WPCDs. Include additional detail drawings if necessary to convey site-specific configurations.

- Show temporary soil stabilization and temporary sediment control BMPs that will be used during construction. Include temporary onsite drainage(s) to carry concentrated flows, BMPs implemented to divert off-site drainage around or through the construction site, and BMPs that protect stormwater inlets
- Locate site ingress and egress points and any proposed temporary construction roads
- Show BMPs to mitigate or eliminate non-stormwater discharges
- Show BMPs for waste management and materials pollution control, including, but not limited to storage of soil or waste; construction material loading, unloading, storage and access areas; and areas designated for waste handling and disposal
- Show BMPs for vehicle and equipment storage, fueling, maintenance, and cleaning

Samples of WPCDs are shown on the following pages.

Attachment A

WPCDs Examples

WPCDs Example 1

WATER POLLUTION CONTROL DRAWINGS (WPCDs)

FOR
ROUTE BB
STAGE 1

ANYTOWN, ANY COUNTY
CALTRANS CONTRACT NO. 00-00000

PREPARED BY:
ZZZ CONSTRUCTION COMPANY

SAMPLE WPCD NOTE: DO NOT SIMPLY COPY THE FOLLOWING NOTES FOR PROJECT SPECIFIC USE. COPYING TEXT FROM THESE SAMPLE WPCDs DOES NOT NECESSARILY MEET NPDES PERMIT REQUIREMENTS. USE PROJECT SPECIFIC NOTES.

LEGEND

 CWM	WM-8 Concrete Waste Management
 SC-10	Storm Drain Inlet Protection
 ESA	Environmentally Sensitive Area
	Surface Flow Direction
	Pipe/Underground Flow Direction
 CSM	WM-7 Contaminated Soil Management
 VEC	NS-8 Vehicle & Equipment Cleaning
 VEF	NS-9 Vehicle & Equipment Fueling
 VEM	NS-10 Vehicle & Equipment Maintenance
 PEV	SS-2 Preservation of Existing Vegetation
 TSP	SS-4 Hydroseeding
 S	SS-6 Straw Mulch
 SBS	SS-5 Soil Binders
 PS	Permanent Seeding
 TC-1	Stabilized Construction Entrance/Exit
 TSD	SS-11 Slope drains
 SD	SS-9 Earth Dike/Drainage Swales and Lined Ditches
 CD	SC-4 Check Dams
 SF	SC-1 Silt Fences
 ST	SC-3 Sediment Traps
 FR	SC-5 Fiber Rolls
SB	SC-8 Sandbag Barrier
	Stormwater Discharge Location

GENERAL WATER POLLUTION CONTROL NOTES

- 1 THE INFORMATION ON THESE DRAWINGS ARE ACCURATE FOR WATER POLLUTION CONTROL PURPOSES ONLY.
- 2 THE INFORMATION ON THIS PLAN IS INTENDED TO BE USED AS A GUIDELINE FOR THE CONTRACTOR AND SUBCONTRACTORS TO INSTALL WATER POLLUTION CONTROL DEVICES AT GENERAL LOCATIONS THROUGHOUT THE SITE. THESE DRAWINGS ARE TO BE USED IN CONJUNCTION WITH THE NARRATIVE SECTION OF THE WATER POLLUTION CONTROL PROGRAM (WPCP).
- 3 FIELD CONDITIONS MAY NECESSITATE MODIFICATIONS TO THESE DRAWINGS.
- 4 PERMANENT EROSION CONTROL WILL BE INSTALLED AS AREAS ARE DETERMINED TO BE SUBSTANTIALLY COMPLETE.

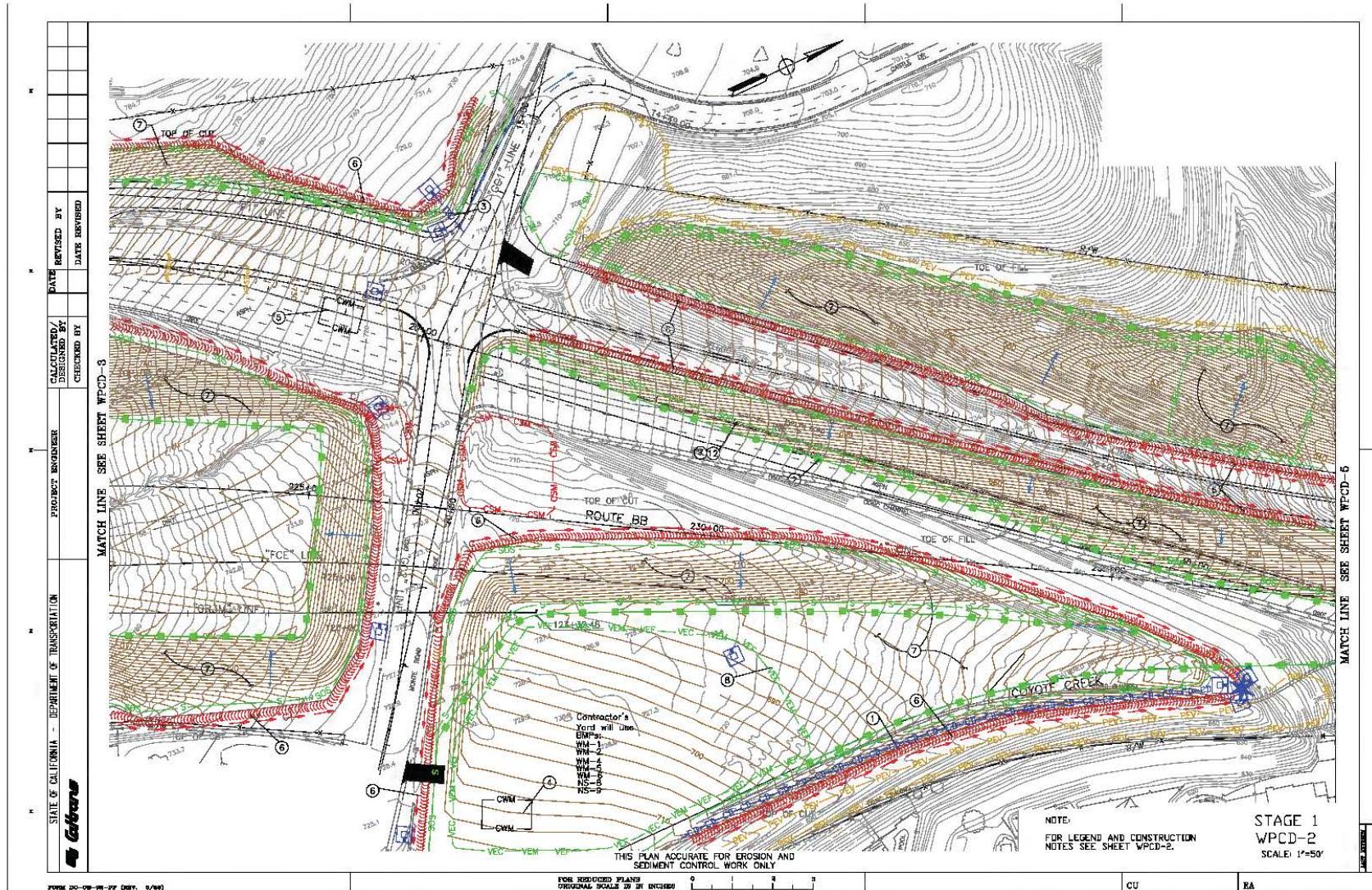
STORM WATER POLLUTION CONTROL CONSTRUCTION NOTES:
(LOCATIONS OF CIRCLED NUMBERS ARE SHOWN ON THE WPCD SHEETS)

- ① Rock check dams.
- ② Gravel bag check dams.
- ③ Temporary slope drain without energy dissipation.
- ④ Contractor proposed alternate concrete washout detail, Type-1 Below Ground. See WPCD-5 for detail.
- ⑤ Contractor proposed alternate concrete washout detail, Type-2 Above Ground. See WPCD-5 for detail.
- ⑥ Earth berms installed during excavation staging.
- ⑦ Surface roughening required on all slope areas before applying soil binders (on active slope or roadway) and/or straw mulch (on inactive slopes only). Inactive slopes greater than 60 feet in height will be hydroseeded.
- ⑧ Combined Vehicle Cleaning, Fueling and Maintenance area.

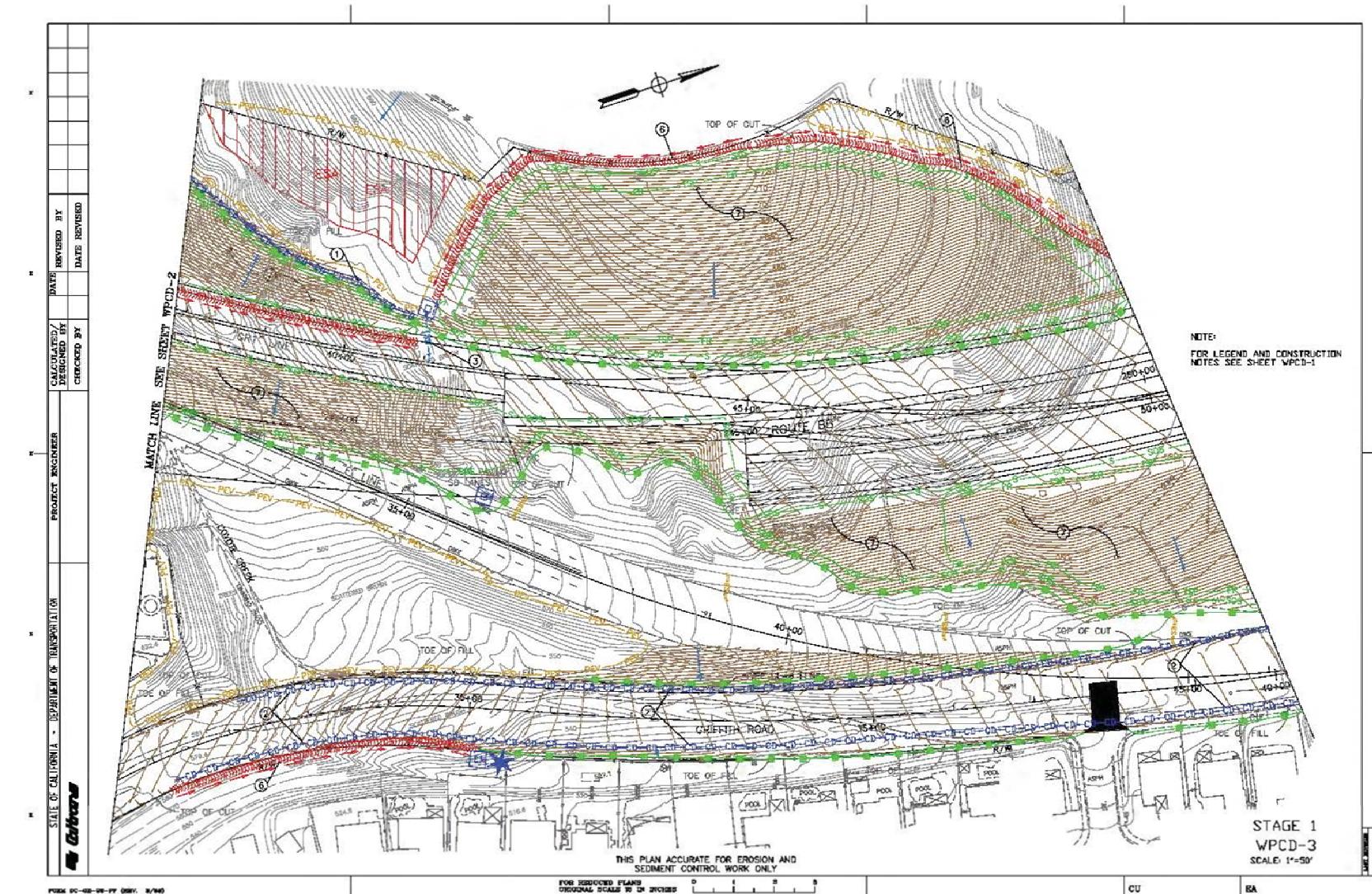
WPCD-1

ZZZ CONSTRUCTION COMPANY	WATER POLLUTION CONTROL DRAWINGS TITLE SHEET
DRAWN D.J.D	
APPROVED	SIZE A SCALE NONE DATE 11/00 REV 0 SHEET 1 of 5

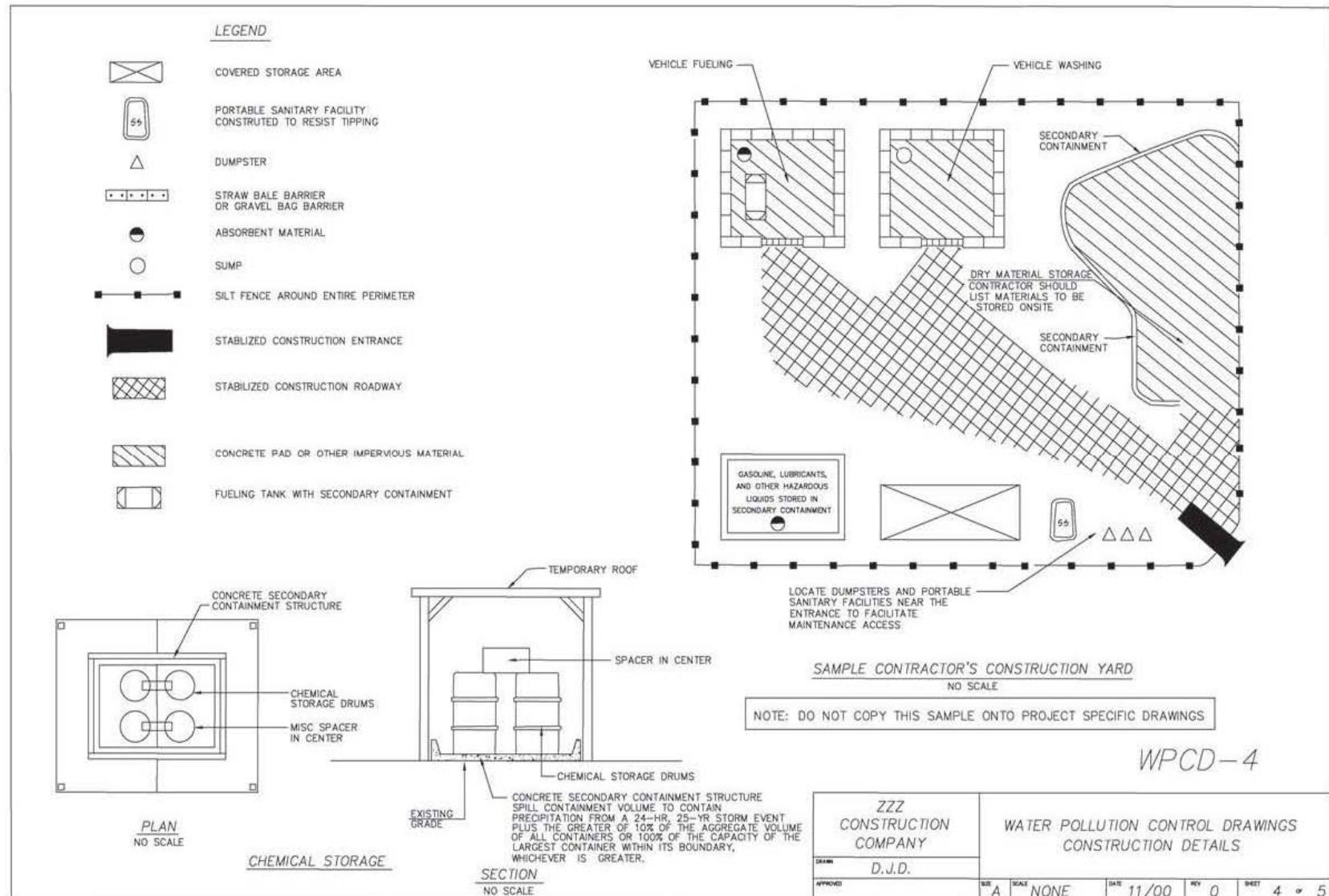
WPCDs Example 2



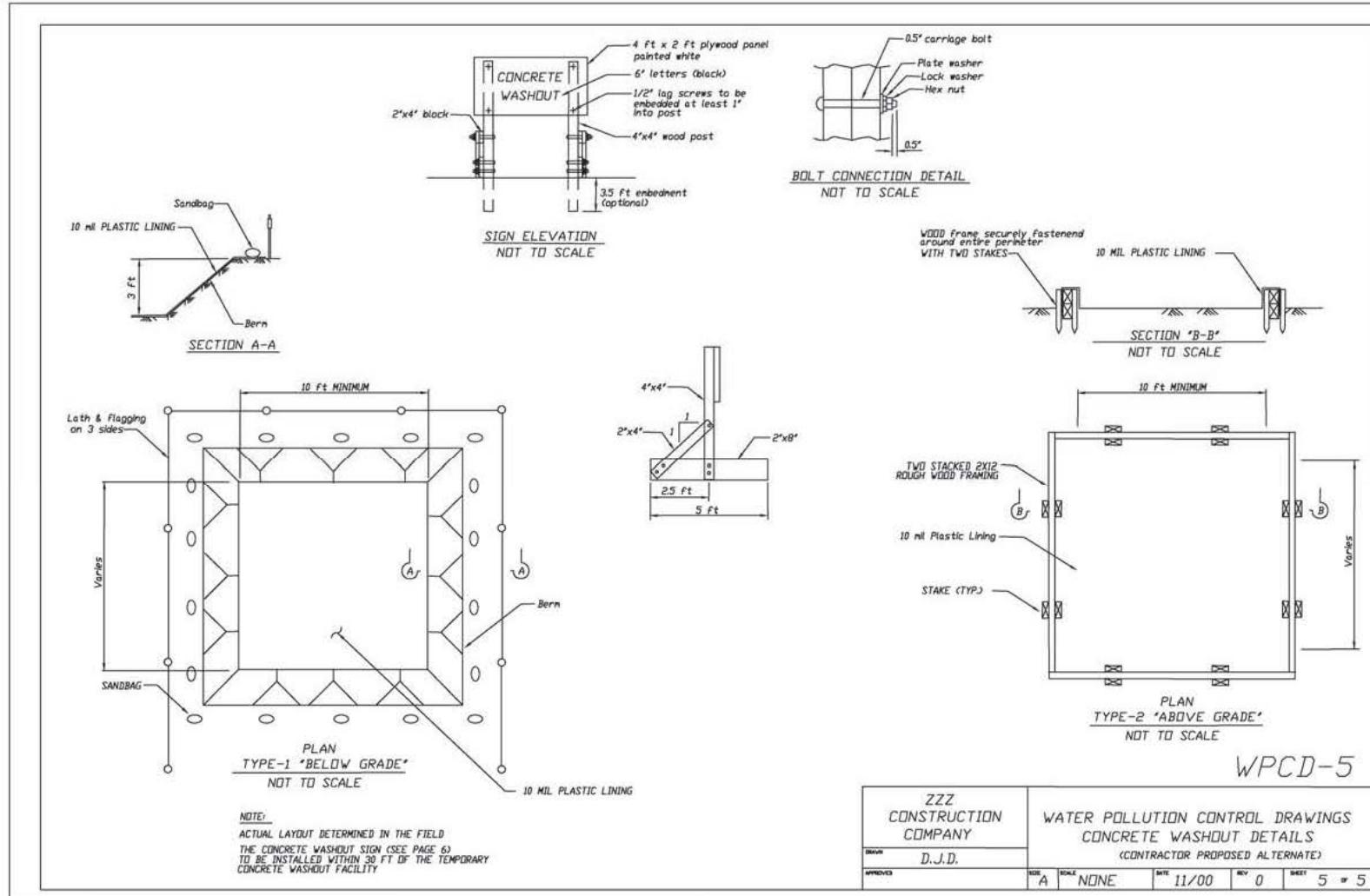
WPCDs Example 3



WPCDs Example 4



WPCDs Example 5



4.3.2 Attachment B Water Pollution Control Schedule

The Water Pollution Control Schedule (WPCS) is the component of the project WPCP that shows the timeline for when BMPs will be installed so that the project is in compliance with Caltrans Standard Specifications and the contract special provisions. The WPCS provides field staff with the information necessary to plan for adequate materials and crews to install BMPs at the right time so that they are effective. The WPCS and WPCDs provide the necessary tools for a contractor to plan and implement BMPs to meet the requirements of the project WPCP.

The WPCS shall be a graphical project schedule. The project schedule may be used for the WPCS if the project schedule includes all WPCS requirements. The schedule shall contain an adequate level of detail to show major activities sequenced with implementation of construction site BMPs, including:

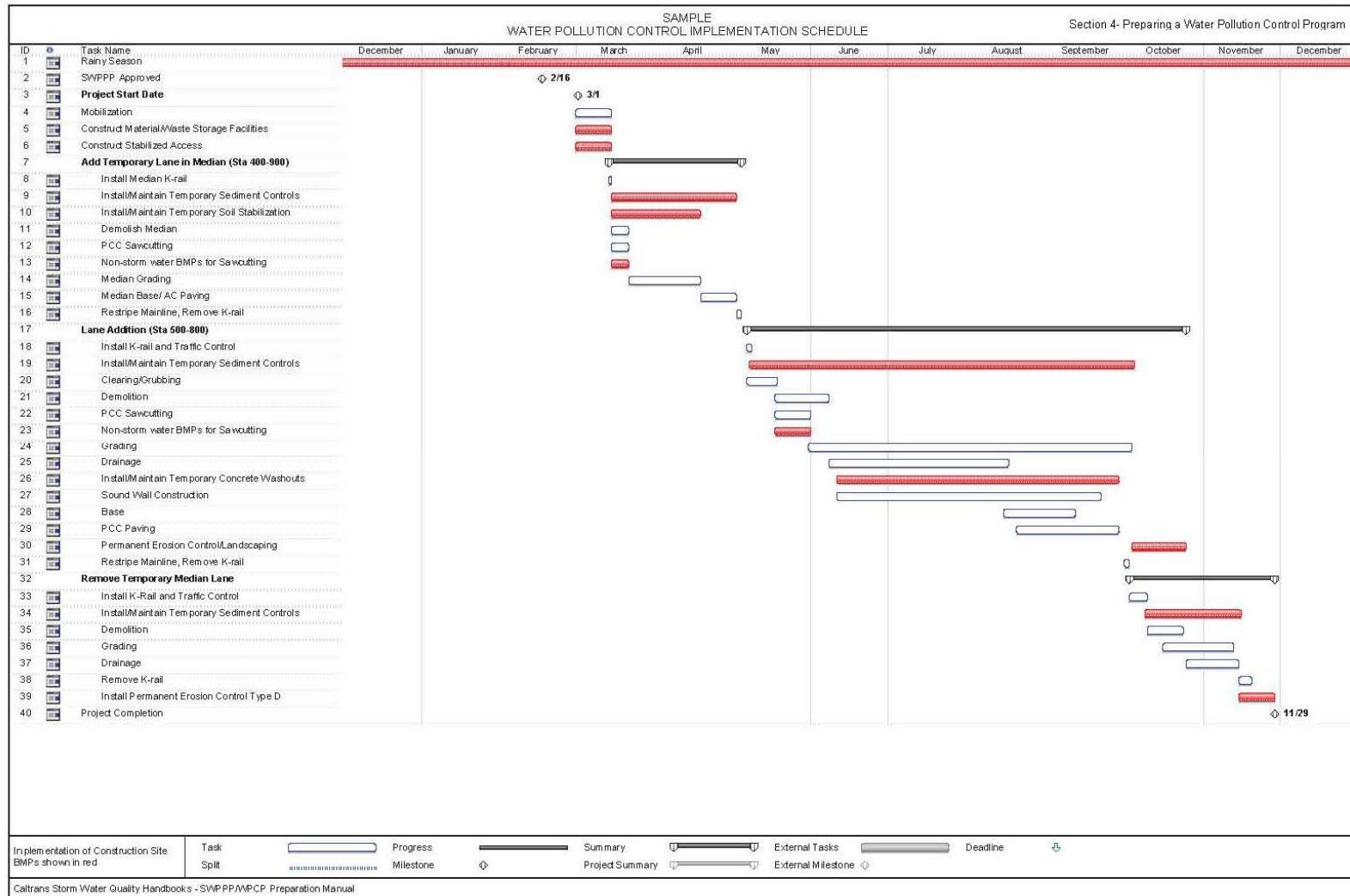
- Project start and finish dates, including each stage of the project
- WPCP review and approval
- Annual certifications
- Mobilization dates
- Mass clearing and grubbing/roadside clearing dates
- Major grading/excavation dates
- Special dates named in other permits such as Fish and Game and USACOE Permits
- Dates for submittal WPCP Amendments required by the contract specifications
- Implementation schedule dates by location for deployment of:
 - Temporary soil stabilization BMPs
 - Temporary sediment control BMPs
 - Wind erosion control BMPs
 - Tracking control BMPs
 - Non-stormwater BMPs
 - Waste management and materials pollution control BMPs
 - Paving, saw-cutting, and any other pavement related operations
 - Major planned stockpiling operations
 - Dates for other significant long-term operations or activities that may cause non-stormwater discharges such as dewatering, grinding, etc.
- Final stabilization activities staged over time for each area of the project

Projects located in the Lake Tahoe, Truckee River, East Fork Carson River, or West Fork Carson River Hydrologic Units, and projects above 5,000 feet in elevations in the portions of Mono County or Inyo County within the Lahontan RWQCB are not allowed to perform removal of vegetation nor disturbance of existing ground surface conditions between October 15 of each year and May 1 of the following year; except when there is an emergency situation that threatens the public health or welfare, or when the project is granted a variance by the RWQCB Executive Officer.

A sample WPCS is shown on the next page.

Attachment B

Example WPCS



4.3.3 Attachment C WPCP Amendments

When changes in the authorized WPCP are required, the contractor's WPC Manager or alternate shall prepare changes to the WPCP. Amendments to the WPCP require the following:

- The WPC Manager shall certify WPCP amendments.
- The contractor shall certify the WPCP amendment and submit them to the RE for review and acceptance.
- The WPCP Amendment Certification and Acceptance form shall be used as the cover sheet for each amendment. A copy of the form is shown in WPCP Appendix C.
- All amendments shall be recorded in the WPCP amendment log in Attachment C.
- When an amendment is accepted by the RE, form CEM-2008 SWPPP/WPCP Amendment Certification and Acceptance shall be attached to the WPCP amendment and inserted into Attachment C.

All accepted WPCP amendments shall be shown on the WPCP Amendment Log in Attachment C. The amendment log shall include:

- Amendment number
- Date
- Brief description of the amendment
- Requested by
- Amendment approval date

Caltrans form CEM-2009 SWPPP/WPCP Amendment Log shall be used to record WPCP Amendments.

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

4.3.4 Attachment D Contractor Personnel Training Records

A summary of formal stormwater training for the project manager/superintendent, WPC Manager and alternate if one is designated, QSP and alternate if one is designated, stormwater inspector and alternate if one is designated, stormwater discharge sampler and tester and alternate if one is designated, employees responsible for BMP installation, maintenance and repair and all contractor employees must be included in Attachment D.

For subcontractors a summary of formal stormwater training for subcontractor foreman and all subcontractor employees must be included in Attachment D.

Caltrans Forms are located at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

4.4 WPCP Appendices

4.4.1 WPCP Appendices A through I

WPCP Appendices A through I are Caltrans CEM forms used to document and report information necessary for WPCP implementation. A copy of these documents must be included in the WPCP binder and available for contractors to download at:

<http://www.dot.ca.gov/hq/construc/stormwater/>

For implementing the WPCP the contractor must use the most recent Caltrans forms available at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

The following Caltrans forms shall be included as appendices to the WPCP:

- Appendix A CEM-2008 SWPPP/WPCP Amendment Certification and Acceptance
- Appendix B CEM-2009 SWPPP/WPCP Amendment Log
- Appendix C CEM-2023 Stormwater Training Record
- Appendix D CEM-2024 Stormwater Training Log (Optional)
- Appendix E CEM-2034 Stormwater Best Management Status Report (Optional)
- Appendix F CEM-2030 Stormwater Site Inspection Report
- Appendix G CEM-2035 Stormwater Site Inspection Report Corrective Actions Summary or
CEM-2035T Stormwater Corrective Actions Summary- Lake Tahoe Hydrologic Unit
- Appendix H CEM-2061 Notice of Discharge Report or
CEM-2061T Notice of Discharge Report - Lake Tahoe Hydrologic Unit Stormwater
Sample Field Test Report/Receiving Water Monitoring Report
- Appendix I CEM-2070 SWPPP/WPCP Annual Certification of Compliance

Appendix A

CEM-2008 SWPPP/WPCP Amendment Log Form

- Required for projects with a Water Pollution Control Plan (WPCP) to document accepted amendments.
- To be accepted by the RE.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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SWPPP/WPCP AMENDMENT CERTIFICATION AND ACCEPTANCE

CEM-2008 (REV 11/2013)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL
	<input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP
	<input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.
	<input type="checkbox"/> Risk Level 3

**Storm Water Pollution Prevention Plan (SWPPP)/Water Pollution Control Program (WPCP)
Amendment Number _____**

CONTRACTOR WATER POLLUTION CONTROL MANAGER SIGNATURE	DATE
CONTRACTOR WATER POLLUTION CONTROL MANAGER NAME	PHONE NUMBER

Contractor Certification of SWPPP or WPCP Amendment

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or persons directly responsible for gathering the information, the information submitted, to the best of my knowledge and belief, is true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

CONTRACTOR SIGNATURE	DATE
CONTRACTOR NAME	PHONE NUMBER
TITLE	

Resident Engineer Acceptance of SWPPP or WPCP Amendment

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted, to the best of my knowledge and belief, is true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

RESIDENT ENGINEER SIGNATURE	DATE OF AMENDMENT ACCEPTANCE
RESIDENT ENGINEER NAME	PHONE NUMBER

SWPPP/WPCP AMENDMENT CERTIFICATION AND ACCEPTANCE

CEM-2008 (REV 11/2013)

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Required for Private Entity Administered Projects

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those directly responsible for gathering the information, the information submitted, to the best of my knowledge and belief is true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

LEGALLY RESPONSIBLE PERSON SIGNATURE	DATE
LEGALLY RESPONSIBLE PERSON NAME	PHONE NUMBER
TITLE	

Required for Local Agency/Private Entity Administered Project**Caltrans Oversight Engineer's Concurrence With SWPPP/WPCP Amendment**

I and personnel acting under my direction and supervision have reviewed this SWPPP/ WPCP and find that it meets the requirements set forth in the contract Special Provisions, Caltrans Standard Specifications, and the Caltrans SWPPP/WPCP Preparation Manual.

OVERSIGHT ENGINEER SIGNATURE	DATE OF AMENDMENT CONCURRENCE
OVERSIGHT ENGINEER NAME	PHONE NUMBER

SWPPP/WPCP AMENDMENT CERTIFICATION AND ACCEPTANCE

CEM-2008 (REV 11/2013)

Page 3 of 3

Instructions**General Information**

- The information on CEM-2008 is required for projects with either a Stormwater Pollution Prevention Plan (SWPPP) or a Water Pollution Control Program (WPCP) to document amendment acceptance and certification.
- SWPPP amendments must be certified by the approved signatory as identified in CEM-2006 or 2006T, "Legally Responsible Person Authorization of Approved Signatory," signed by the legally responsible person (LRP).
 1. For Caltrans, the LRP is the district director. The LRP may authorize the project resident engineer to be approved signatory.
 2. For a local agency, the LRP is either a principal executive officer or a ranking elected official. The local agency LRP may authorize the project resident engineer to be approved signatory.
 3. For a private entity performing work in the state right-of-way under an encroachment permit, the LRP must be one of the following:
 - a. For a corporation, a responsible corporate officer.
 - b. For a partnership or sole proprietorship, a general partner or the proprietor, respectively.The private entity LRP may not authorize an approved signatory.
- 4. Attach a completed copy of CEM-2008 to each SWPPP or WPCP amendment, and include it in the SWPPP Attachment DD or the WPCP Attachment C.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number. For projects without one, write "N/A" in the field.

WDID Number

For projects that have a Water Pollution Control Program enter "WPCP" in this field.

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Appendix B

CEM-2009-SWPPP Amendment Log Form

- Required for projects with a Water Pollution Control Plan (WPCP) to document authorized amendments.
- To be authorized by the RE.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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SWPPP/WPCP AMENDMENTS LOG

CEM-2009 (REV 11/2013)

Page 1 of 1

SWPPP/WPCP AMENDMENTS LOG

CEM-2009 (REV 11/2013)

Instructions

General Information

- Projects with either a Stormwater Pollution Prevention Plan (SWPPP) or Water Pollution Control Program (WPCP) require the information on this form to track amendments.
- Attach a completed copy of the form to each accepted SWPPP/WPCP amendment, and include in SWPPP Attachment DD or WPCP Attachment C.

Form

Contract Number/Co/Rte/PM

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a project identifier number. For projects without one, write "N/A" in the field.

WDID Number

For projects with WPCP enter "WPCP" in this field.

When the resident engineer has accepted SWPPP or WPCP amendments, enter:

1. The amendment number.
2. The date the Water Pollution Control Manager signed form CEM-2008.
3. A brief description of the amendment.
4. The name and title of person who requested the amendment.
5. The date the resident engineer accepted form CEM-2008.

Appendix C

CEM-2023 Stormwater Training Record Form

- To be submitted to Caltrans to document compliance.
- To ensure review and record keeping of stormwater training.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER TRAINING RECORD

CEM-2023 (REV 11/2013)

Page 1 of 3

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM												
	PROJECT IDENTIFIER NUMBER												
	WDID NUMBER												
CONTRACTOR NAME AND ADDRESS	<p>PROJECT SITE RISK LEVEL</p> <table> <tr> <td><input type="checkbox"/></td> <td>Risk Level 1</td> <td><input type="checkbox"/></td> <td>N/A. WPCP</td> </tr> <tr> <td><input type="checkbox"/></td> <td>Risk Level 2</td> <td><input type="checkbox"/></td> <td>N/A. Project Resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.</td> </tr> <tr> <td><input type="checkbox"/></td> <td>Risk Level 3</td> <td></td> <td></td> </tr> </table>	<input type="checkbox"/>	Risk Level 1	<input type="checkbox"/>	N/A. WPCP	<input type="checkbox"/>	Risk Level 2	<input type="checkbox"/>	N/A. Project Resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.	<input type="checkbox"/>	Risk Level 3		
<input type="checkbox"/>	Risk Level 1	<input type="checkbox"/>	N/A. WPCP										
<input type="checkbox"/>	Risk Level 2	<input type="checkbox"/>	N/A. Project Resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.										
<input type="checkbox"/>	Risk Level 3												

SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)		DATE	
Stormwater Training Record			
Training Course Title or Specific Training Objective	Location	Date of Training	
<p>Stormwater Topics</p> <input type="checkbox"/> Temporary soil stabilization <input type="checkbox"/> Tracking controls <input type="checkbox"/> Non-stormwater management <input type="checkbox"/> Waste management and materials pollution control <input type="checkbox"/> Spill prevention and control <input type="checkbox"/> BMPs required for work activities current week <input type="checkbox"/> Stormwater pollution prevention plan <input type="checkbox"/> Water pollution control program	<input type="checkbox"/> Temporary sediment control <input type="checkbox"/> Wind erosion control <input type="checkbox"/> Stormwater discharge sampling <input type="checkbox"/> Pre-storm activities <input type="checkbox"/> Permanent soil stabilization <input type="checkbox"/> Initial project training	Instructor Name Instructor Title Instructor Phone Number Course Length (hours)	
			Training Audience
			<input type="checkbox"/> General
			<input type="checkbox"/> BMPs
			<input type="checkbox"/> SWPPP

Attendee Roster

STORMWATER TRAINING RECORD

CEM-2023 (REV 11/2013)

Review and Record Keeping

Has training information been entered into the optional Stormwater Training Log (CEM-2024)?

Yes No

I have reviewed this document and, based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief the information submitted is true, accurate, and complete.

Water Pollution Control Manager (name)

Date

Water Pollution Control Manager (signature)

STORMWATER TRAINING RECORD

CEM-2023 (REV 11/2013)

Page 3 of 3

Instructions**General Information**

- Projects with either a Stormwater Pollution Prevention Plan (SWPPP) or Water Pollution Control Program (WPCP) require the information on this form to document stormwater training for contractor and subcontractor managers, supervisors, and employees. Include the form and required training documentation in the stormwater annual report for SWPPP projects.
- Use this form to document training for employees responsible for activities associated with Construction General Permit compliance and contract specifications. Use this form to document required weekly stormwater training.
- Provide this training record and an updated copy of CEM-2024 (CEM-2024 is an optional form used at the WPCM's discretion) "Stormwater Training Log," to the resident engineer (RE) within five days of the date of training.
- Attach additional copies of page 2 of this form if necessary to record all individuals attending this training.
- Stormwater training needs to be completed at the frequency stipulated in the project specifications and/or the SWPPP, whichever is more frequent.
- Names may be written or typed. Initials must be original. Originals are filed with RE as stipulated above.
- Attach copy of training material/topic with submittal to RE.

Form

- **Contract Number/Co/Rte/PM**
For local agency encroachment permit projects write the encroachment permit number in the Contract Number field.
- **Project Identifier Number**
Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.
- **WDID Number**
For projects with Water Pollution Control Program, enter "WPCP."
- **Attendee Roster**
Enter employee name, contractor or subcontractor company name and employee phone number.
- **Training Audience**
Enter one of the following responses:
 - General—Training for individuals responsible for activities associated with compliance with the Construction General Permit.
 - BMPs—Training for individuals responsible for BMP installation, inspection, maintenance, and repair.
 - SWPPP—Training for individuals responsible for overseeing, revising, and amending the SWPPP.

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Appendix D

CEM-2024 Stormwater Training Log Form

- To be submitted to Caltrans for annual compliance. The form is optional, the RE will determine its use on this contract.
- Required for projects with a Water Pollution Control Plan (WPCP).
- Documents stormwater training for contractors and subcontractor managers, supervisors, and employees.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER TRAINING LOG - OPTIONAL

CEM-2024 (REV 11/2013)

Page 1 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002. <input type="checkbox"/> Risk Level 3
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME)	DATE

STORMWATER TRAINING LOG

Date of Training	Training Audience	Number of Training Attendees	Stormwater Training Course Title or Topics Covered	Date Training Documentation (CEM-2023) Provided to Resident Engineer
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			
	<input type="checkbox"/> General <input type="checkbox"/> BMPs <input type="checkbox"/> SWPPP			

STORMWATER TRAINING LOG - OPTIONAL

CEM-2024 (REV 11/2013)

Page 2 of 2

Instructions

General Information

- For projects with either a Stormwater Pollution Prevention Plan (SWPPP) or a Water Pollution Control Program (WPCP) the information shown on this form may be used to document stormwater training for contractor and subcontractor managers, supervisors, and employees. The stormwater annual report for SWPPP projects will include required training documentation and the information on this form, or in another form used at the discretion of the Water Pollution Control Manager (WPCM).
- If this form is used, provide an updated copy of CEM-2024 with attached training documentation to the resident engineer within five days of training, along with CEM-2023 and a copy of training materials and topic(s) covered.
- This form is optional, and provided as a management tool for the WPCM to assist in compiling and organizing information required of the annual report.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write N/A in the field.

WDID Number

For projects with Water Pollution Control Program enter "WPCP" in this field.

Training Audience

Check one of the following responses:

General—training for individuals responsible for activities associated with compliance with the General Construction Permit.

BMPs—training for individuals responsible for BMP installation, inspection, maintenance, and repair.

SWPPP—training for individuals responsible for overseeing revising and amending the SWPPP.

Appendix E

CEM-2034 Monthly Stormwater BMPs & Material Inventory Report

- This form is optional; the RE will determine whether it should be used for this contract.
- To be submitted monthly to the RE.
- Includes the status of all required locations of BMPs.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 1 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002 <input type="checkbox"/> Risk Level 3
Water Pollution Control Manager (print name and sign)	Date
Submitted by contractor (print name and sign)	Date

Provide a monthly list of stored best management practices and materials on site.

<p>Construction Phase</p> <p><input type="checkbox"/> Highway construction</p> <p><input type="checkbox"/> Plant establishment</p> <p><input type="checkbox"/> Suspension of work (inactive site)</p>	<p>Site Information</p> <p>_____ Total project area (acres)</p> <p>_____ Total project disturbed soil area (acres)</p> <p>_____ Current phase disturbed soil area (acres)</p> <p>_____ Current phase inactive disturbed soil (acres)</p>
--	---

Stormwater Best Management Practices and Materials on Site

MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Best Management Practices and Materials on Site

MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 3 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Best Management Practices and Materials on Site

MONTHLY STORMWATER BEST MANAGEMENT PRACTICES & MATERIALS

INVENTORY REPORT - OPTIONAL

CEM-2034 (NEW 12/2013)

Page 4 of 4

Instructions

General Information

- The Water Pollution Control Manager must oversee preparation of this form and submit a copy to the resident engineer every month.
- Attach additional copies of page 2 and page 3 of this form to include all required locations.
- Insert consecutive numbers for each location when using page 2 or page 3 of this form

BMP Name	BMP ID
Temporary Soil Stabilization	
Preservation of existing vegetation	SS-02
Hydraulic mulch	SS-03
Hydroseeding	SS-04
Soil binders	SS-05
Straw mulch	SS-06
Geotextiles, mats, plastic covers, and lined ditches	SS-07
Wood mulching	SS-08
Earth dikes, drainage swales and lined ditches	SS-09
Outlet protection and velocity dissipation devices	SS-10
Slope drains	SS-11
Streambank stabilization	SS-12
Temporary Sediment Control	
Silt fence	SC-01
Sediment or distilling basin	SC-02
Sediment trap	SC-03
Checkdams	SC-04
Fiber rolls	SC-05
Gravel bag berm	SC-06
Sandbag barrier	SC-08
Straw bale barrier	SC-09
Storm drain inlet protection	SC-10
Wind Erosion Control	
Wind erosion control	WE-01
Tracking Controls	
Stabilized construction entrance and exit	TC-01
Stabilized construction roadway	TC-02
Entrance and exit tire wash	TC-03
Street sweeping	TC-04

BMP Name	BMP ID
Non-Stormwater Management	
Water conservation practices	NS-01
Dewatering operations	NS-02
Paving and grinding operations	NS-03
Temporary stream crossing	NS-04
Clear water diversion	NS-05
Illegal connection or discharge detection and reporting	NS-06
Potable water and irrigation	NS-07
Vehicle and equipment cleaning	NS-08
Vehicle and equipment fueling	NS-09
Vehicle and equipment maintenance	NS-10
Pile-driving operations	NS-11
Concrete curing	NS-12
Material and equipment use over water	NS-13
Concrete finishing	NS-14
Structure demolition or removal over or adjacent to water	NS-15
Waste Management and Pollution Control	
Material delivery and storage	WM-01
Material use	WM-02
Stockpile management	WM-03
Spill prevention and control	WM-04
Solid waste management	WM-05
Hazardous waste management	WM-06
Contaminated soil management	WM-07
Concrete waste management	WM-08
Sanitary or septic waste management	WM-09
Liquid waste management	WM-10

Appendix F

CEM-2030 Stormwater Site Inspection Report

- All areas of a jobsite to be reported and inspected.
- Complete BMP repair or design changes within 72 hours of identifications.
- To be submitted to the RE within 24 hours of inspection.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

Page 1 of 9

PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM PROJECT IDENTIFIER NUMBER WDID NUMBER					
CONTRACTOR NAME AND ADDRESS		PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in The Lake Tahoe Hydrologic Unit <input type="checkbox"/> Risk Level 3 and is regulated under Order No. R6T-2011-019, NPDES No. CAG616002					
Submitted by contractor (print and sign name)				Date			
Water Pollution Control Manager name and company name		Phone number Emergency (24/7) phone number					
General Information							
Inspector's Name		Accompanied by Caltrans staff? <input type="checkbox"/> YES <input type="checkbox"/> NO If Yes, Name/Initials:			Date of Inspection		
Weather Condition		Precipitation Condition <input type="checkbox"/> None <input type="checkbox"/> Heavy rain <input type="checkbox"/> Clear <input type="checkbox"/> Misty <input type="checkbox"/> Hail <input type="checkbox"/> Partly cloudy <input type="checkbox"/> Light rain <input type="checkbox"/> Snow <input type="checkbox"/> Cloudy <input type="checkbox"/> Rain		Wind Condition <input type="checkbox"/> None <input type="checkbox"/> Less than 5 mph <input type="checkbox"/> Greater than 5 mph			
Construction Phase		Site Information Total project area: _____ acres Total project disturbed soil area: _____ acres Current phase disturbed soil area: _____ acres Current phase inactive disturbed soil: _____ acres					
Inspection Type Check appropriate box(es)		Storm Information					
<input type="checkbox"/> Weekly <input type="checkbox"/> Quarterly non-stormwater		Time elapsed since last storm _____ days		Precipitation amount from last storm _____ inches			
<input type="checkbox"/> Pre-storm		Time storm is expected _____ (time) _____ (date)		Expected precipitation amount _____ inches			
<input type="checkbox"/> During storm event		Time elapsed since storm began _____ hours-minutes		Precipitation amount from storm recorded from site rain gauge _____ inches			
<input type="checkbox"/> Post storm		Time elapsed since storm _____ hours-minutes		Precipitation amount from storm recorded from site rain gauge _____ inches			
Date	Daily Site Inspection of Best Management Practices (BMP) List Daily inspections for previous calendar week. Do not include weekly inspection.		Daily inspection performed by	Any corrective actions identified as completed or new?		If yes, were the actions added or verified on CEM-2035, as appropriate?	Date shown on corrective action form
				YES	NO		

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS							CONTRACT NUMBER/CO/RTE/PM
							PROJECT IDENTIFIER NUMBER
							WDID NUMBER

Site Inspection of Best Management Practices

If this form will be completed by hand in the field, click on "Show Entire Form" button at the top of page one to expand the sections, then print the form to take to the field.
If the inspection form does not contain enough lines for all locations, use the "Add Item" button so that all BMP locations are inspected and reported.

Preservation of Existing Vegetation	Right location?		Properly installed?		Maintenance or repair necessary?	Photos?	Comments and Required Actions			
	Yes	No	Yes	No	Yes					
Location 1										
Location 2										
Location 3										
Disturbed Soil Area (DSA) Management <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No List all potential DSAs by location	Has area been disturbed? If no, stop here.		Date DSA first disturbed?	Is the DSA inactive and listed as a location on both temporary soil stabilization and temporary linear sediment barriers? If yes, stop here.			Is there a storm event forecasted? If yes, stop here and take action.	Are there construction activities currently in progress within the DSA? If yes, stop here.	If no to previous question, what is the last day construction activities were in progress?	How many days has the DSA been active? If more than 14 days, take action.
	Yes	No	Date	Yes	No	Yes	Yes	No	Yes	No
Location 1										
Location 2										

Notes:

1. If it has been 14 days since a DSA has had active construction activities, the DSA is inactive and must be reported as a location on temporary soil stabilization and temporary linear sediment barriers.
2. DSAs must have erosion control and have temporary linear sediment barriers installed prior to a storm event.

Location Number	Comments / Corrective Actions							Action No.			
1											
2											
Temporary Soil Stabilization <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Inactive areas covered?		100% coverage of required areas?		Stabilized areas free from visible erosion?		Photos?	Comments and Required Actions			Action No.
	Yes	No	Yes	No	Yes	No					
Location 1											
Location 2											
Location 3											

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS							CONTRACT NUMBER/CO/RTE/PM
							PROJECT IDENTIFIER NUMBER
							WDID NUMBER

Site Inspection of Best Management Practices, continued*For project specific BMPs, insert the BMP name and additional inspection requirements below.*

Temporary Linear Sediment Barriers	Right location?		Properly installed or cross barriers installed?		Maintenance performed when 1/3 height or repair needed?		Photos?	Comments and Required Actions	Action No.		
	Yes	No	Yes	No	Yes	No				Yes	
Location 1											
Location 2											
Location 3											
Storm Drain Inlet Protection	All inlets protected?		Properly installed?		Maintenance or repair needed?		Photos?	Comments and Required Actions	Action No.		
	Yes	No	Yes	No	Yes	No				Yes	
Location 1											
Location 2											
Location 3											
Stockpile Management	Date stockpile created	Is the stockpile listed as a location on stockpile management inactive stockpiles? If yes, stop here.			Is there a storm event forecasted? If yes, stop here and take action.		Is stockpile being actively used? If yes, stop here.	If no to previous question, what is the last day stockpile was actively used?	How long since stockpile actively used? If yes, take action.		
		Date	Yes	No	Yes	No				Yes	No
Location 1											
Location 2											

Notes:

1. If it has been 3 days (72 hours) since a stockpile has been active then the stockpile is inactive and must be reported as a location on stockpile management inactive stockpiles.
2. Stockpiles must be covered and have perimeter control installed prior to a storm event.

Location Number	Comments / Corrective Actions	Photos? Yes	Action No.
1			
2			

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS					CONTRACT NUMBER/CO/RTE/PM									
					PROJECT IDENTIFIER NUMBER									
					WDID NUMBER									
Inactive Stockpile Management <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Type of Material or Waste				Is the stockpile properly located?		Is the stockpile covered?		Does the stockpile have a perimeter control?		Does the stockpile need maintenance or repair?		
Location 1	Location 2					Yes	No	Yes	No	Yes	No	Yes	No	
		Comments / Corrective Actions								Photos? Yes	Action No.			
1	2													
Sediment and Desilting Basins <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Are basin inlets, outlets, and spillways in working order?	Is water contained in basin?		Is maintenance needed to provide required retention or detention?		Photos?	Comments and Required Actions					Action No.	
Location 1	Location 2	Yes	No	Yes	No	Yes								No
Location 3														
Tracking Controls <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Do all entrances and exits have tracking controls?	Is pavement free from visible sediment tracking?		Does sediment need to be removed from rock or ribbed plates?		Is daily sweeping done?	Photos?	Comments and Required Actions					Action No.
Location 1	Location 2	Yes	No	Yes	No	Yes								
Location 3														
Wind Erosion Control <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No		Water trucks on-site?	Visible dust?		Photos?	Comments and Required Actions					Action No.			
Location 1	Location 2	Yes	No	Yes								No	Yes	
Location 3														

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS							CONTRACT NUMBER/CO/RTE/PM						
							PROJECT IDENTIFIER NUMBER						
							WDID NUMBER						
Dewatering Operations <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Dewatering currently active?	Dewatering conforms with RWQCB permit?	Dewatering discharge within discharge specified limitations?	Photos?	Comments and Required Actions			Action No.					
									Yes	No	Yes	No	Yes
	Location 1												
Location 2													
Location 3													
Temporary Stream Crossing <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Constructed as shown on the plan?	Conforms to 404 permit and 1601 agreement requirements?	Maintenance or repair required?	Photos?	Comments and Required Actions			Action No.					
									Yes	No	Yes	No	Yes
	Location 1												
Location 2													
Location 3													
Material Storage <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Located away from drainage courses and water courses?		Areas protected from run on and runoff?		Bagged and boxed materials stored on pallets?		Areas reasonably clean and free of spills, leaks, and other material?		Is material inventory up to date?		Liquid materials in secondary containment?		Photos?
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	
	Location 1												
Location 2													
Location 3													
Comments and Required Actions													Action No.
Location 1													
Location 2													
Location 3													

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS				CONTRACT NUMBER/CO/RTE/PM								
				PROJECT IDENTIFIER NUMBER								
				WDID NUMBER								
Waste Management Sanitation Facilities <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	Located away from drainage courses and water courses?		Secured to ground or foundation?		Clean and has adequate capacity?		Ground checked for any spills or leaks?		Any spills or leaks found?		Photos?	
	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	
Location 1												
Location 2												
Location 3												
Location Number	Comments / Corrective Actions										Action No.	
1												
2												
3												
Project-specific BMP	Properly located?		Properly installed?		Maintenance or repair needed?		Photos?	Comments and Required Actions				Action No.
<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No												
Location 1	Yes	No	Yes	No	Yes	No	Yes					
Location 2												
Location 3												
Project-specific BMP	Properly located?		Properly installed?		Maintenance or repair needed?		Photos?	Comments and Required Actions				Action No.
<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No												
Location 1	Yes	No	Yes	No	Yes	No	Yes	No	Yes	No	Yes	
Location 2												
Location 3												
Comments and Required Actions												Action No.
Location 1												
Location 2												
Location 3												

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Site Inspection Report General Comments

Are the BMPs installed as required by the Stormwater Pollution Prevention Plan for the phase of construction?

 Yes No

Does the SWPPP need to be amended?

 Yes No

Does the SWPPP currently reflect the current site conditions and contractor operations?

 Yes No

Is hazardous waste stored on the jobsite?

 Yes No

Are there water pollution control concerns on the project site not addressed by the comments and required actions shown above for BMPs, based on the field review of the jobsite?

 Yes No*If yes, provide details, comments, and required actions below for each location.*

Location	Water Pollution Control Concern	Comments and Required Actions	Action No.

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Inspection Report Certification

I certify under penalty of law that this Stormwater Inspection Report was performed in accordance with the General Permit. The information contained in this inspection report was gathered from a field site inspection. I am aware that Section 309 (c)(4) of the Clean Water Act provides for significant penalties, including fines and imprisonment for knowingly submitting a false material statement, representation, or certification.

Stormwater Inspector (Name)	Date Report Completed
-----------------------------	-----------------------

Stormwater Inspector (Signature)

I certify under penalty of law that this Stormwater Inspection Report was performed in accordance with the General Permit by me or under my direction or supervision. The information contained in this inspection report was gathered and evaluated by qualified personnel prior to submittal. Based on my review of the information and inquiry of those who gathered and evaluated the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete.

I am aware that Section 309 (c)(4) of the Clean Water Act provides for significant penalties, including fines and imprisonment for knowingly submitting a false material statement, representation, or certification.

Water Pollution Control Manager (Name)	Date
--	------

Water Pollution Control Manager (Signature)

Stormwater Inspection Report Acceptance

If hazardous waste is stored on the jobsite, the resident engineer should notify the district hazardous waste coordinator.

Was the District Hazardous Waste Coordinator notified?

- N/A, no hazardous waste stored on the jobsite
 YES, Date _____ Time _____
 NO

Accepted by Resident Engineer (Print Name)	Date
--	------

Resident Engineer (Signature)

STORMWATER SITE INSPECTION REPORT

CEM-2030 (REV 3/2014)

Page 9 of 9**Instructions****General Information**

- Construction General Permit attachments C, D, and E, Section G.5. require the information on this form.
- If the inspection form does not contain enough lines to report all locations on a jobsite, click on the "Add Item" button so that all locations are inspected and reported.
- Obtain forecasted precipitation information from the National Weather Service Forecast Office website, <http://www.srh.noaa.gov/forecast>.
- Weather information should be the best estimate of the beginning of the storm event, duration of the event, and time elapsed since the last storm.
- Rainfall amounts should be recorded from the project site rain gauge.
- "Daily Site Inspection of Best Management Practices" section is to be filled out by the water pollution control manager.

Storm Visual Inspections

- For non-visible pollutant inspections, report on all locations shown in the Stormwater Pollution Prevention Plan.

Required Actions

- All corrective actions identified in this report must also be recorded on Form CEM-2035, "Stormwater Corrective Actions Summary."
- Locations identified where BMPs are failing or have other shortcomings require implementation of repairs or design changes within 72 hours of identification, and BMP repairs or other changes must be completed as soon as possible.

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Appendix G

CEM-2035 Stormwater Corrective Actions Summary

- Verifies stormwater site inspection corrective actions identified in a site inspection report were completed.
- Corrective actions must begin within 72 hours of the site inspection or before a rain event.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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STORMWATER CORRECTIVE ACTIONS SUMMARY

CEM-2035 (REV 11/2013)

Page 1 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS		CONTRACT NUMBER/CO/RTE/PM						
		PROJECT IDENTIFIER NUMBER						
		WDID NUMBER						
CONTRACTOR NAME AND ADDRESS		<p>SWPPP PROJECT SITE RISK LEVEL</p> <table style="margin-left: 20px;"> <tr> <td><input type="checkbox"/> Risk Level 1</td> <td><input type="checkbox"/> N/A. WPCP</td> </tr> <tr> <td><input type="checkbox"/> Risk Level 2</td> <td><input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.</td> </tr> <tr> <td><input type="checkbox"/> Risk Level 3</td> <td></td> </tr> </table>	<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP	<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.	<input type="checkbox"/> Risk Level 3	
<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP							
<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.							
<input type="checkbox"/> Risk Level 3								

Submitted by contractor (print and sign name)	Date
---	------

Implement required actions identified in this Stormwater Corrective Actions Summary as soon as possible, but actions must begin within 72 hours of the site inspection, or be completed before the next predicted rain event, whichever is sooner.

Corrective action number	Verification of Stormwater Site Inspection Corrective Actions		Date Corrective Actions Identified:
	BMP Type	Location	
	Required Action	Comments	
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type	Location	
	Required Action	Comments	
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type	Location	
	Required Action	Comments	
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type	Location	
	Required Action	Comments	
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type	Location	
	Required Action	Comments	
	Date Completed	Verified by (print name and title)	Verified by (signature)
	BMP Type	Location	
	Required Action	Comments	
	Date Completed	Verified by (print name and title)	Verified by (signature)

STORMWATER CORRECTIVE ACTIONS SUMMARY

CEM-2035 (REV 11/2013)

Page 2 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Stormwater Site Inspection Report Corrective Action Summary Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the people who manage the system or are directly responsible for gathering the information, the information submitted is true, accurate, and complete to the best of my knowledge and belief. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
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Water Pollution Control Manager (signature)

Stormwater Site Inspection Report Corrective Action Summary Acceptance

Resident Engineer (name)	Date
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Resident Engineer (signature)

Instructions**General Information**

- If the summary form does not have enough lines to report all required actions, use additional copies of this form's page 1 to report all required corrective actions from an inspection form.
- On page 1 of this form and additional copies of page 1, insert consecutive numbers for each required corrective action.

Required Actions

- Identified locations—where BMPs are failing or have other shortcomings—require repairs or design changes within 72 hours of identification and complete BMP repairs or other changes as soon as possible, or before the next predicted rain event, whichever is sooner, per the Lake Tahoe Hydrologic Unit Permit.
- Daily inspections required for waste containers (covered at end of shift), tracking, and others per project specifications.

STATE OF CALIFORNIA • DEPARTMENT OF TRANSPORTATION
STORMWATER CORRECTIVE ACTIONS SUMMARY-
LAKE TAHOE HYDROLOGIC UNIT

CEM-2035T (NEW 05/2015)

Page 1 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS:	CONTRACTOR NAME AND ADDRESS:	CONTRACT NUMBER/CO/RTE/PM: PROJECT IDENTIFIER NUMBER:
SUBMITTED BY CONTRACTOR (PRINT AND SIGN NAME):	DATE:	WDID NUMBER:

Implement required actions identified in this Stormwater Corrective Actions Summary as soon as possible, but required action must be completed within 72 hours of the site inspection, or be completed before the next predicted rain event, whichever is sooner.

Week Ending:

Location:	Best Management Practices Type:	Required Action/Comments:	Date Identified:	Date Completed:	Water Pollution Control Manager/Inspector Initials:	Caltrans Resident Engineer/Inspector Initials:

Water Pollution Control Manager Signature: _____ Date: _____

Caltrans Resident Engineer Signature: _____ Date: _____

STORMWATER CORRECTIVE ACTIONS SUMMARY-**LAKE TAHOE HYDROLOGIC UNIT**

CEM-2035T (NEW 05/2015)

Page 2 of 2

PROJECT INFORMATION NAME AND SITE ADDRESS:	CONTRACT NUMBER/CO/RTE/PM:
	PROJECT IDENTIFIER NUMBER:
	WDID NUMBER:

Stormwater Site Inspection Report Corrective Action Summary Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision according to a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the people who manage the system or are directly responsible for gathering the information, the information submitted is true, accurate, and complete to the best of my knowledge and belief. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment of knowing violations.

Water Pollution Control Manager (name):	Date:
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Water Pollution Control Manager (signature):
--

Stormwater Site Inspection Report Corrective Action Summary Acceptance

Resident Engineer (name):	Date:
---------------------------	-------

Resident Engineer (signature):

Instructions

- If the summary form does not have enough lines to report all required actions, use additional copies of this form's page 1 to report all required corrective actions from an inspection form.
- On page 1 of this form and additional copies of page 1, insert consecutive numbers for each required corrective action.

Required Actions

- Identified locations—where best management practices are failing or have other shortcomings—require repairs or design changes within 72 hours of identification and complete best management practices repairs or other changes as soon as possible, or before the next predicted rain event, whichever is sooner, per the Lake Tahoe Hydrologic Unit Permit.
- Daily inspections required for waste containers (covered at end of shift), tracking, and others per project specifications.

Appendix H

CEM-2061 Notice of Discharge Report

- Required by Caltrans to document compliance with Caltrans Permit.
- To be completed when discharges are causing or contributing to an exceedance of an applicable water quality standard.
- Sampling guidance is found in the current edition of the Caltrans *Construction Site Monitoring Program Guidance Manual*.
- The most recent Caltrans forms are available at:
<http://www.dot.ca.gov/hq/construc/forms.htm>

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NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM	
	PROJECT IDENTIFIER NUMBER	
	WDID NUMBER	
CONTRACTOR NAME AND ADDRESS	PROJECT SITE RISK LEVEL	
	<input type="checkbox"/> Risk Level 1	<input type="checkbox"/> N/A. WPCP
<input type="checkbox"/> Risk Level 2	<input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit and is regulated under Order No. R6T-2011-0019, NPDES No. CAG616002.	
<input type="checkbox"/> Risk Level 3		

Submitted by contractor (print and sign name)

Date

Notice of Discharge General Information

Location			Date discharge discovered	
Discharge identified by stormwater visual site inspection?	Discharge discovered by contractor during daily work?	Discharge samples taken?	Discharge type	
			<input type="checkbox"/> Stormwater	<input type="checkbox"/> Exceedance of applicable water quality standard
<input type="checkbox"/> YES	<input type="checkbox"/> YES	<input type="checkbox"/> NO	<input type="checkbox"/> Turbidity	
<input type="checkbox"/> NO	<input type="checkbox"/> NO		<input type="checkbox"/> pH	
Discharge identified by Regional Water Quality Control Board?			Date and time water pollution control manager notified of discharge	
Discharge identified by State Water Resources Control Board?			Date and time resident engineer notified of discharge	

Storm Event Information*Complete this section for stormwater discharges*

Start of storm event	End of storm event	Duration of storm event	Storm event precipitation amount recorded from site rain gauge	Storm event precipitation amount recorded from governmental rain gauge
Date	Date	Hours : Minutes.	inches	inches
Time	Time			

Notice of Discharge Information

Photographs

The nature and cause of the water quality standard exceedance, based on a visual observation of the discharge location	<input type="checkbox"/> YES <input type="checkbox"/> NO
BMPs currently installed at the location of the discharge	<input type="checkbox"/> YES <input type="checkbox"/> NO

Additional BMPs that will be implemented to prevent or reduce pollutants causing or contributing to exceedance of a water quality standard

Implementation schedule for additional BMPs

NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

Page 2 of 4

PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Notice of Discharge Information (continued)

Maintenance or repair of BMPs

Implementation schedule for BMPs maintenance or repair

Other required corrective actions

Implementation schedule for corrective actions

Summary of actions taken to reduce the pollutants causing or contributing to the water quality standard exceedance

Sampling and Analysis Results

Required when discharge samples are taken. Attach CEM-2052 or lab results report

- Are discharge samples taken? YES NO
- Is CEM-2052 attached? YES NO N/A
- Is lab results report attached? YES NO RESULTS PENDING
- If applicable, provide lab information: lab name, contract name, date samples sent, attach a copy of chain of custody, etc.

NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Notice of Discharge Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
--	------

Water Pollution Control Manager (signature)

For Caltrans Use

Accepted by Resident Engineer (name)	Date
--------------------------------------	------

Resident Engineer(signature)

Discharge reported by telephone or email to the Regional Water Quality Control Board (RWQCB) within 48 hours of discovery?	Date discharge reported to RWQCB	Resident engineer intials
A. Immediately and no later than 24 hours after discovery? <input type="checkbox"/> YES <input type="checkbox"/> NO		
B. Within 5 working days? <input type="checkbox"/> YES <input type="checkbox"/> NO		
C. As soon as possible but within 48 hours? <input type="checkbox"/> YES <input type="checkbox"/> NO		

Notice of Discharge Report submitted to RWQCB within 14 days (3 days for District 7 and District 11)?	Date report submitted to RWQCB	Resident engineer intials
A. Within 24 hours? <input type="checkbox"/> YES <input type="checkbox"/> NO		
B. Within 14 days (3 days for District 7 and 11)? <input type="checkbox"/> YES <input type="checkbox"/> NO		

Discharge reported orally to the Lahontan RWQCB within 24 hours of discovery? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date called Lahontan RWQCB	Resident engineer intials
Electronic submittal of NEL exceedance sample results to Lahontan RWQCB and SMARTS within 5 business days? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date report submitted	Resident engineer intials

NOTICE OF DISCHARGE REPORT

CEM-2061 (REV 11/2013)

Page 4 of 4

Instructions**General Information**

- This form is required for compliance with provisions in Section E-2, "Receiving Water Limitations for Construction," of the National Pollutant Discharge Elimination System (NPDES) Permit Statewide Storm Water Permit and Waste Discharge Requirements (WDRs) for the State of California, Department of Transportation (Caltrans), Order No. 99-06-DWQ, NPDES No. CAS000003.
- This form is to be completed when the contractor, Caltrans, State Water Resources Control Board, or Regional Water Quality Control Board staff determines that stormwater discharges, authorized non-stormwater discharges, or non-authorized, non-stormwater discharges are causing or contributing to an exceedance of an applicable water quality standard.
- This form is appropriate when there is evidence of a discharge that occurred outside of business hours where no sampling occurred.
- Water quality standards are contained in the Statewide Water Quality Control Plan or applicable Regional Water Quality Control Boards (RWQCBs) Basin Plan.
- Water quality standards are contained in the Statewide Water Quality Control Plan or applicable Regional Water Quality Control Boards (RWQCBs) Basin Plan.
- Sampling guidance is found in the current edition of the *Construction Site Monitoring Program Guidance Manual*.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.

Form

- **Project Identifier Number**
Caltrans projects starting July 1, 2010, will have a project identifier number. For projects without a number, write N/A in the field.
- **Contract Number/Co/Rte/PM**
For encroachment permit projects, write the local agency or private entity encroachment permit number in the contract number field.
- **Storm Event Information**
Leave section blank if box is checked for either authorized or non-authorized non-stormwater discharge.
- **Discharge Information**
Do not leave any subsection blank. Caltrans permit specifically requires Caltrans to submit the information in this section to RWQCBs. For non-stormwater discharges, describe the construction operation or activity that caused the discharge.
- **Sampling and Analysis Results**
Leave this section blank if the no box is checked for discharge samples taken.
- **Analysis Results**
Analytical results less than the method detection limit shall be reported as "Less than the method detection limit."
- **Analysis Information**
Leave section blank if the no box is checked for discharge samples taken.
- **Notice of Discharge Report Certification**
For instruction on reporting timelines, see Section 9.4, Noncompliance Reporting, of Statewide Stormwater Management Plan, May 2003.

**NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT
STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

CEM-2061T (REV 05/2015)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	PROJECT RESIDES IN THE LAKE TAHOE HYDROLOGIC UNIT AND IS REGULATED UNDER ORDER NO. R6T-2011-0019, NPDES NO. CAG616002.

Submitted by contractor (print and sign name)

Date

Notice of Discharge General Information

Location			Date discharge discovered	
Discharge identified by visual site inspection? <input type="checkbox"/> YES <input type="checkbox"/> NO	Discharge discovered by contractor during daily work? <input type="checkbox"/> YES <input type="checkbox"/> NO	Discharge samples taken? <input type="checkbox"/> YES <input type="checkbox"/> NO	Discharge type	Exceedance of applicable water quality standard
			<input type="checkbox"/> Stormwater <input type="checkbox"/> Authorized non-stormwater <input type="checkbox"/> Non-authorized non-stormwater	<input type="checkbox"/> Turbidity (NEL) <input type="checkbox"/> pH (NAL) <input type="checkbox"/> _____
Discharge identified by Regional Water Quality Control Board? <input type="checkbox"/> YES <input type="checkbox"/> NO	Discharge identified by State Water Resources Control Board? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date and time water pollution control manager notified of discharge		
			Date and time resident engineer notified of discharge	

Storm Event Information

Complete this section for stormwater discharges

Start of storm event <input type="text"/> Date <input type="text"/> Time	End of storm event <input type="text"/> Date <input type="text"/> Time	Duration of storm event <input type="text"/> Hours : Minutes.	Storm event precipitation amount recorded from site rain gauge <input type="text"/> inches	Storm event precipitation amount recorded from governmental rain gauge <input type="text"/> inches
--	--	--	---	---

Notice of Discharge Information

Photographs

The nature and cause of the water quality standard exceedance, based on a visual observation of the discharge location	<input type="checkbox"/> YES <input type="checkbox"/> NO
BMPs currently installed at the location of the discharge	<input type="checkbox"/> YES <input type="checkbox"/> NO
Additional BMPs that will be implemented to prevent or reduce pollutants causing or contributing to exceedance of a water quality standard	

Implementation schedule for additional BMPs

ADA Notice

For individuals with sensory disabilities, this document is available in alternate formats. For information, call (916) 445-1233, TTY 711, or write to Records and Forms Management, 1120 N Street, MS-89, Sacramento, CA 95814.

**NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT
STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

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Notice of Discharge Information (continued)

Maintenance or repair of BMPs

Implementation schedule for BMPs maintenance or repair

Other required corrective actions

Implementation schedule for corrective actions

Summary of actions taken to reduce the pollutants causing or contributing to the water quality standard exceedance

Sampling and Analysis Information

Required when discharge samples are taken. Attach lab results report if applicable.

- Are discharge samples taken? YES NO
- Is lab results report attached? YES NO RESULTS PENDING
- If applicable, provide lab information: lab name, contract name, date samples sent, attach a copy of chain of custody, etc.

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT
STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT

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Stormwater Samples Analysis

Date of sampling

Sample location identification number	Date of analysis
Sample analyzed by (signature)	Samples to be analyzed for parameters
Sample analyzed by (print name)	<input type="checkbox"/> Turbidity <input type="checkbox"/> pH <input type="checkbox"/> Other _____ <input type="checkbox"/> Other _____
Analyzer phone number ()	
Company	

Field Turbidity Analysis Information

Meter Manufacturer	Model Number	Serial Number	Calibration Date
Analytical Method	Method Reporting Unit	Method Detection Limit	

Field pH Analysis Information

pH Meter Manufacturer	Model Number	Serial Number	Calibration Date
Analytical Method	Method Reporting Unit	Method Detection Limit	

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT
STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT

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Notice of Discharge Report Certification

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, to the best of my knowledge and belief, the information submitted is true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fines and imprisonment for knowing violations.

Water Pollution Control Manager (name)	Date
--	------

Water Pollution Control Manager (signature)

For Caltrans Use

Accepted by Resident Engineer (name)	Date
--------------------------------------	------

Resident Engineer(signature)

Discharge reported orally to the Lahontan RWQCB within 24 hours of discovery? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date called Lahontan RWQCB	Resident engineer initials
Electronic submittal of NEL exceedance sample results to Lahontan RWQCB and SMARTS within 5 business days? <input type="checkbox"/> YES <input type="checkbox"/> NO	Date report submitted	Resident engineer initials

NOTICE OF DISCHARGE REPORT - LAKE TAHOE HYDROLOGIC UNIT**STORMWATER SAMPLE FIELD TEST REPORT/RECEIVING WATER MONITORING REPORT**

CEM-2061T (REV 05/2015)

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INSTRUCTIONS**General Information**

- This form is to be completed when the contractor, Department of Transportation (Caltrans), State Water Resources Control Board (SWRCB), or Regional Water Quality Control Board (RWQCB) staff determines that storm water discharges, authorized non-stormwater discharges, or nonauthorized, non-stormwater discharges are causing or contributing to an exceedance of an applicable water quality standard.
- This form is appropriate when there is evidence of a discharge that occurred outside of business hours where no sampling occurred.
- Water quality standards are contained in the Statewide Water Quality Control Plan or applicable RWQCB Basin Plan.
- Sampling guidance is found in the current edition of the *Construction Site Monitoring Program Guidance Manual*.
- Include a copy of the completed form in the project Storm Water Pollution Prevention Plan (SWPPP) files.
- Complete Form CEM-2058, "Stormwater Meter Calibration Record- Specialty Meters," if other parameters are tested.
- Sampling and sample preservation must be in accordance with the current edition of "*Standard Methods for the Examination of Water and Wastewater*" (American Public Health Association).
- Collect, maintain, and ship samples according to the SWRCB, Surface Water Ambient Monitoring Program's Quality Assurance Program Plan latest edition.
- Complete a separate storm water sample field analysis report daily for each sampling location.

Form**Project Identifier Number**

Caltrans projects starting July 1, 2010, will have a project identifier number. For projects without a number, write N/A in the field.

Contract Number/Co/RTE/PM

For encroachment permit projects write the local agency or private entity encroachment permit number in the contract number field.

Storm Event Information

Leave section blank if box is checked for either authorized or non-authorized non-stormwater discharge.

Discharge Information

Do not leave any subsection blank. Caltrans permit specifically requires Caltrans to submit the information in this section to RWQCBs. For non-stormwater discharges, describe the construction operation activity that caused the discharge.

Sampling and Analysis Results

Leave this section blank if the 'no' box is checked for discharge samples taken.

Analysis Results

Analytical results less than the method detection limit shall be reported as "less than the method detection limit."

Analysis Information

Leave section blank if the 'no' box is checked for discharge samples taken.

Qualifying Rain Event Daily Average Analysis Result

A minimum of three daily samples are required to calculate the daily average for a qualifying rain event.

Sample pH Analysis

Sample pH reading must be done within 15 minutes of sample collection.

Receiving Water Monitoring Trigger (RWMT) Exceedance

In the event that any daily average RWMT is exceeded, complete Form CEM-2062, "Numeric Action Level Exceedance Report | Receiving Water Monitoring Trigger Report" and submit all storm event sampling results to the resident engineer within six hours.

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Appendix I

CEM-2070 SWPPP/WPCP Annual Certification of Compliance

- To be submitted to Caltrans to document Annual Compliance.
- Ensures that water pollution control measures are being implemented in accordance with the WPCP.
- The most recent Caltrans forms are available at:

<http://www.dot.ca.gov/hq/construc/forms.htm>

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SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER
CONTRACTOR NAME AND ADDRESS	SWPPP PROJECT SITE RISK LEVEL <input type="checkbox"/> Risk Level 1 <input type="checkbox"/> N/A. WPCP <input type="checkbox"/> Risk Level 2 <input type="checkbox"/> N/A. Project resides in the Lake Tahoe Hydrologic Unit <input type="checkbox"/> Risk Level 3 NPDES No. CAG616002.

**Stormwater Pollution Prevention Plan (SWPPP)/Water Pollution Control Program (WPCP)
Annual Certification of Compliance****Water Pollution Control Manager Certification**

This certification for the project site is based on an inspection of the project site conducted on (date) _____

I certify based on my inspection of the project site that:

- Yes No Water pollution control measures are being implemented in accordance with the SWPPP or WPCP approved for the project, including approved SWPPP/WPCP amendments.
- Yes No The project site and activities thereon are in compliance with the Caltrans Statewide NPDES Permit No. CAS000003, the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES Permit No. CAS000002, or Order No. R6T-2011-0019, NPDES No. CAG-616002, whichever is applicable.

Contractor Water Pollution Control Manager signature	Date
Contractor Water Pollution Control Manager name	Phone number

Contractor Annual Certification of Compliance

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Contractor signature	Date
Contractor name	Phone number

Title _____

SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

**Required for Private Entity Administered Projects
Private Entity Legally Responsible Person Annual Certification of Compliance**

I certify that the project is in compliance with the project site approved Stormwater Pollution Prevention Plan or Water Pollution Control Program including approved amendments. The project site and activities thereon are in compliance with the Caltrans Statewide NPDES Permit No. CAS000003, the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES Permit No. CAS000002, or Order No. R6T-2011-0019, NPDES No. CAG-616002, whichever is applicable.

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Legally responsible person signature	Date
Legally responsible person name	Phone number
Title	

SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE

CEM-2070 (REV 12/2013)

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PROJECT INFORMATION NAME AND SITE ADDRESS	CONTRACT NUMBER/CO/RTE/PM
	PROJECT IDENTIFIER NUMBER
	WDID NUMBER

Resident Engineer Approval of Annual Certification of Compliance

An inspection of the project site for annual certification of compliance was conducted on (date) _____	Annual Certification of Compliance project site inspection conducted by _____
--	---

I certify that I, or personnel acting under my direction and supervision, have inspected the project site and find the following:

- Yes No Water pollution control measures are being implemented in accordance with the SWPPP or WPCP approved for the project, including approved SWPPP/WPCP amendments.
- Yes No The project site and activities thereon are in compliance with the Caltrans Statewide NPDES Permit No. CAS000003, the NPDES General Permit for Stormwater Discharges Associated with Construction and Land Disturbance Activities, Order No. 2009-0009-DWQ, NPDES Permit No. CAS000002, or Order No. R6T-2011-0019, NPDES No. CAG-616002, whichever is applicable.

The box above is checked "no" based on the project site annual certification inspection, and the following corrective actions are necessary for the project to be in compliance with SWPPP/WPCP or NPDES Permits

I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to ensure that qualified personnel properly gathered and evaluated the information submitted. Based on my inquiry of the person or persons who manage the system or those directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that significant penalties exist for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Resident engineer signature	Date of approval
Resident engineer name	Phone number

Required for Local Agency or Private Entity-Administered Project
Caltrans Oversight Engineer's Concurrence With Annual Certification of Compliance

I, or personnel acting under my direction and supervision, have reviewed this Annual Certification of Compliance and concur that the project is in compliance with SWPPP or WPCP approved for the project, including approved SWPPP/WPCP amendments and applicable NPDES Permits.

Oversight engineer signature	Date of concurrence
Oversight engineer name	Phone number

SWPPP/WPCP ANNUAL CERTIFICATION OF COMPLIANCE**Instructions****General Information**

- Projects with either a Stormwater Pollution Prevention Plan (SWPPP) or Water Pollution Control Program (WPCP) require an Annual Certification of Compliance by July 15th of each year.
- Document the project site inspection for annual certification on form CEM-2030, "Stormwater Site Inspection Report."
- A legally responsible person (LRP) or a signatory approved by the LRP must certify the Stormwater Pollution Prevention Plan Annual Certification of Compliance.
 - For Caltrans, the LRP is the district director. The LRP may authorize the project resident engineer to be the approved signatory.
 - For a local agency, the LRP is either a principal executive officer or ranking elected official. The local agency's LRP may authorize the project resident engineer to be the approved signatory. If the local agency's LRP has not approved the local agency's resident engineer to be an approved signatory then the local agency's LRP must sign in the resident engineer signature box of the Annual Certification of Compliance.
 - For a private entity performing work in the state right-of-way under an encroachment permit, the LRP must be one of the following:
 - For a corporation—a responsible corporate officer.
 - For a partnership or sole proprietorship—a general partner or the proprietor, respectively.
 - The private entity's LRP may not authorize an approved signatory.
- File a completed copy of this form in SWPPP/WPCP file category 20.70, Annual Certification of Compliance.
- This form is used for Annual Certification as well as replaces form CEM-2001.

Form**Contract Number/Co/Rte/PM**

For local agency encroachment permit projects, write the encroachment permit number in the Contract Number field.

Project Identifier Number

Caltrans projects starting July 1, 2010, will have a Project Identifier Number (PIN). For projects without a PIN, write "N/A" in the field.

WDID Number

For projects that have Water Pollution Control Program, enter "WPCP" in this field.

SWPPP Projects Site Risk Level

Check the box for the appropriate SWPPP risk level, or N/A for projects residing in the Lake Tahoe Hydrologic Unit, or N/A for projects that have Water Pollution Control Program.

Appendix A: Definition of Terms

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Appendix A

Definition of Terms

Active Areas. An area where soil disturbing activities have occurred at least once within 15 days.

Areas of Construction. All areas subject to land surface disturbance activities related to the project including, but not limited to, project staging areas, immediate access areas and storage areas.

Active Treatment System (ATS). A treatment system that employs chemical coagulation, chemical flocculation, or electrocoagulation to aid in the reduction of turbidity caused by fine suspended sediment.

Acute Toxicity Test. A chemical stimulus severe enough to rapidly induce a negative effect; in aquatic toxicity tests, an effect observed within 96 hours or less is considered acute.

Air Deposition. Airborne particulates from construction activities.

Approved Signatory. A person who has legal authority to sign, certify, and electronically submit PRDs and Notices of Termination on behalf of the LRP.

Beneficial Uses. As defined in the California Water Code, beneficial uses of the waters of the state that may be protected against quality degradation include, but are not limited to, domestic, municipal, agricultural and industrial supply; power generation; recreation; aesthetic enjoyment; navigation; and preservation and enhancement of fish, wildlife, and other aquatic resources or preserves.

Best Available Technology Economically Achievable (BAT). As defined by USEPA, BAT is a technology-based standard established by the CWA as the most appropriate means available on a national basis for controlling the direct discharge of toxic and nonconventional pollutants to navigable waters. The BAT effluent limitations guidelines, in general, represent the best existing performance of treatment technologies that are economically achievable within an industrial point source category or subcategory.

Best Conventional Pollutant Control Technology (BCT). As defined by USEPA, BCT is a technology-based standard for the discharge from existing industrial point sources of conventional pollutants including BOD, total suspended sediment (TSS), fecal coliform, pH, oil and grease.

Best Management Practices (BMPs). BMPs are scheduling of activities, prohibitions of practices, maintenance procedures, and other management practices to prevent or reduce the discharge of pollutants. BMPs also include treatment requirements, operating procedures, and practices to control site runoff, spillage or leaks, sludge or waste disposal, or drainage from raw material storage.

Caltrans Permit. The Caltrans Statewide NPDES Permit for discharges from Caltrans properties, facilities, and activities (Order No. 2012-011-DWQ, NPDES No. CAS000003), issues by the SWRCB.

Chain of Custody (COC). Form used to track sample handling as samples progress from sample collection to the analytical laboratory. The COC is then used to track the resulting analytical data from the laboratory to the client. COC forms can be obtained from an analytical laboratory upon request.

Coagulation. The clumping of particles in a discharge to settle out impurities, often induced by chemicals such as lime, alum, and iron salts.

Common Plan of Development. Generally, a contiguous area where multiple, distinct construction activities may be taking place at different times under one plan. A plan is generally defined as any piece of documentation or physical demarcation that indicates that construction activities may occur on a common plot. Such documentation could consist of a tract map, parcel map, demolition plans, grading plans or contract documents. Any of these documents could delineate the boundaries of a common plan.

area. However, broad planning documents, such as land use master plans, conceptual master plans, or broad-based CEQA or NEPA documents that identify potential projects for an agency or facility are not considered common plans of development.

Construction Activity. Includes clearing, grading, or excavation and contractor activities that result in soil disturbance.

Construction Site. The area involved in a construction project as a whole.

Construction Site BMPs. Temporary control practices (BMPs) that are required only temporarily to address a short-term stormwater contamination threat. For example, silt fences are located near the base of newly graded slopes that have substantial area of exposed soil. Then, during rainfall, the silt fences allow capture sediment from erosion of the slopes.

Contamination. An impairment of the quality of the waters of the state by waste to a degree that creates a hazard to the public health through poisoning or through the spread of disease including any equivalent effect resulting from the disposal of waste, whether or not waters of the state are affected.

Contractor. Party responsible for carrying out the contract per plans and specifications. The Standard Specifications and contract special provisions contain stormwater protection requirements the contractor must address.

Contractor-Support Facilities. Contractor-support facilities include: Staging areas, storage yards for equipment and materials, mobile operations, batch plants for PCC and HMA, crushing plants for rock and aggregate, other facilities installed for contractor convenience such as haul roads.

Daily Average Discharge. The discharge of a pollutant measured during any 24-hour period that reasonably represents a calendar day for purposes of sampling. For pollutants with limitations expressed in units of mass, the daily discharge is calculated as the total mass of the pollutant discharged during the day. For pollutants with limitations expressed in other units of measurement (e.g., concentration) the daily discharge is calculated as the average measurement of the pollutant throughout the day (40 CFR 122.2). In the case of pH, the pH must first be converted from a log scale.

Debris. Litter, rubble, discarded refuse, and remains of destroyed inorganic anthropogenic waste.

Desert Areas. Areas within the Colorado River Basin RWQCB and the North and South Lahontan RWQCB jurisdictions (excluding the Mono and Antelope areas, East and West Walker River, East and West Carson River, and the Truckee and Little Truckee River).

Direct Discharge. A discharge that is routed directly to waters of the United States by means of a pipe, channel, or ditch (including a municipal storm sewer system), or through surface runoff.

Discharger. The LRP (see definition) or entity subject to this General Permit.

Discharge. Any release, spill, leak, pump, flow, escape, dumping, or disposal of any liquid, semi-solid or solid substance.

Disturbed Soil Areas (DSAs). Areas of exposed, erodible soil, including stockpiles, that are within the construction limits and that result from construction activities.

Dose Rate (for ATS). In exposure assessment, dose (e.g. of a chemical) per time unit (e.g. mg/day), sometimes also called dosage.

Drainage Area. The area of land that drains water, sediment, pollutants, and dissolved materials to a common outlet.

Effluent. Any discharge of water by a discharger either to the receiving water or beyond the property boundary controlled by the discharger.

Effluent Limitation. Any numeric or narrative restriction imposed on quantities, discharge rates, and concentrations of pollutants which are discharged from point sources into waters of the United States, the waters of the contiguous zone, or the ocean.

Environmental Protection Agency (EPA). Agency that issued the regulations to control pollutants in stormwater runoff discharges (The Clean Water Act and NPDES permit requirements).

Erosion. The process, by which soil particles are detached and transported by the actions of wind, water, or gravity.

Erosion Control BMPs. Vegetation, such as grasses and wildflowers, and other materials, such as straw, fiber, stabilizing emulsion, protective blankets, etc., placed to stabilize areas of disturbed soils, reduce loss of soil due to the action of water or wind, and prevent water pollution.

Exempt Construction Activities. Activities exempt from the CGP, including routine maintenance to maintain original line and grade, hydraulic capacity, or original purpose of the facility; and emergency construction activities required to protect public health and safety. Local permits may not exempt these activities.

Existing vegetation. Any vegetated area that has not already been cleared and grubbed.

Fair Weather Prediction. When there is no precipitation in the forecast between the current calendar day and the next working day. The National Weather Service National Oceanic and Atmospheric Administration (NOAA) Weather Radio forecast shall be used. The contractor may propose an alternative forecast for use if authorized by the RE.

Feasible. Economically achievable or cost-effective measures, which reflect a reasonable degree of pollutant reduction achievable through the application of available nonpoint pollution control practices, technologies, processes, site criteria, operating methods, or other alternatives.

Field Measurements. Testing procedures performed in the field with portable field-testing kits or meters.

Final Stabilization. All soil disturbing activities at each individual parcel within the site have been completed in a manner consistent with the requirements in this General Permit.

First Order Stream. Stream with no tributaries.

Flocculants. Substances that interact with suspended particles and bind them together to form flocs.

Forecasted Storm Event. A storm that produces or is forecasted to produce at least 0.10 inch of precipitation within a 24-hour period.

General Permit. The Construction General Permit for Storm Water Discharges Associated with Construction Activity (Order No. 2009-000-DWQ, NPDES Permit CAS000002) and amendments (Order No. 2010-0014-DWQ and Order No. 2012-0006-DWQ) issued by the SWRCB.

Good Housekeeping. A common practice related to the storage, use, or cleanup of materials, performed in a manner that minimizes the discharge of pollutants.

Good Housekeeping BMPs. BMPs designed to reduce or eliminate the addition of pollutants to construction site runoff through analysis of pollutant sources, implementation of proper handling/disposal practices, employee education, and other actions. Grading Phase (part of the Grading and Land Development Phase) Includes reconfiguring the topography and slope including; alluvium removals; canyon cleanouts; rock undercuts; keyway excavations; land form grading; and stockpiling of select material for capping operations.

Grading Phase. Includes reconfiguring the topography for the project including; excavation for roadway including necessary blasting of hard rock, highway embankment construction (fills); mass grading, and stockpiling of select material for capping operations.

Highway Construction Phase. Highway construction phase includes both highway and structure construction. Highway construction includes final roadway excavation, placement of base materials and highway paving, finish grading, curbs, gutters and sidewalks, public utilities, public water facilities including fire hydrants, public sanitary sewer systems, storm drain systems and/or other drainage improvements, highway lighting, traffic signals and/or other highway electrical work, guardrail, concrete

barriers, sign installation, pavement markers, traffic stripping and pavement markings. Structure construction includes structure footings, bridges, retaining walls, major culverts, overhead sign structures and buildings.

Highway Planting/Erosion Control Establishment Phase. Highway planting including clearing and grubbing operations, soil preparation (grading, incorporation of soil amendments, placement of topsoil), irrigation (trenching, installation, trench backfilling), minor grading (top dressing, fine grading lawn and ground cover areas), hardscaping, planting (seeding and planting of plants), mulch (application of wood chips or other mulches) and plant establishment (weeding, plant replacement and if needed: fertilizer application, irrigation maintenance, reapplication of mulch). Erosion control includes placement of permanent erosion control materials and maintenance of temporary sediment controls during the erosion control establishment period.

Hydromodification. Hydromodification is the alteration of the hydrologic characteristics of coastal and non-coastal waters, which in turn could cause degradation of water resources. Hydromodification can cause excessive erosion and/or sedimentation rates, causing excessive turbidity, channel aggradation and/or degradation.

Identified Organisms. Organisms within a sub-sample that is specifically identified and counted.

Inactive Areas of Construction. Areas where soil-disturbing work activities have not occurred within the last 15 days.

Index Period. The period of time during which bioassessment samples must be collected to produce results suitable for assessing the biological integrity of streams and rivers. Instream communities naturally vary over the course of a year, and sampling during the index period ensures that samples are collected during a time frame when communities are stable so that year-to-year consistency is obtained. The index period approach provides a cost-effective alternative to year round sampling. Furthermore, sampling within the appropriate index period will yield results that are comparable to the assessment thresholds or criteria for a given region, which are established for the same index period. Because index periods differ for different parts of the state, it is essential to know the index period for your area.

K Factor. The soil erodibility factor used in the Revised Universal Soil Loss Equation (RUSLE). It represents the combination of detachability of the soil, runoff potential of the soil, and the transportability of the sediment eroded from the soil.

Legally Responsible Person (LRP). The person who possesses the title of the land or the leasehold interest of a mineral estate upon which the construction activities will occur for the regulated site. For linear underground/overhead projects (LUP), it is the person in charge of the utility company, municipality, or other public or private company or agency that owns or operates the LUP.

Likely Precipitation Event. Any weather pattern that is forecasted to have a 50 percent or greater chance of producing precipitation in the project area. The discharger shall obtain likely precipitation forecast information from the National Weather Service Forecast Office (e.g., by entering the zip code of the project's location at <http://www.srh.noaa.gov/forecast>).

Local Permit. An NPDES stormwater permit issued to a District by the RWQCB having jurisdiction over the job site. Requirements of the local permit are generally similar to, but supersede the requirements of the General Permit. The District Stormwater Coordinator should be consulted to identify and to incorporate variances between the local permit and General Permit.

National Pollutant Discharge Elimination System (NPDES) Permit. A permit issued pursuant to the CWA that requires the discharge of pollutants to waters of the United States from stormwater be controlled.

Inactive Construction Area. Any area not considered to be an active construction area. Active construction areas become inactive construction areas whenever construction activities are expected to be discontinued for a period of 14 days or longer.

Non-Storm Water Discharges. Non-Storm Water Discharges are discharges that do not originate from forecasted storm events. They can include, but are not limited to, discharges of process water, air conditioner condensate, non-contact cooling water, vehicle wash water, sanitary wastes, concrete washout water, paint wash water, irrigation water, or pipe testing water.

Non-Visible Pollutants. Pollutants associated with a specific site or activity that can have a negative impact on water quality, but cannot be seen through observation (ex: chlorine). Such pollutants being discharged are not authorized.

Numeric Action Level (NAL). Level is used as a warning to evaluate if best management practices are effective and take necessary corrective actions. Not an effluent limit.

Original Sample Material. The material (i.e., macroinvertebrates, organic material, gravel, etc.) remaining after the subsample has been removed for identification.

pH. Unit universally used to express the intensity of the acid or alkaline condition of a water sample. The pH of natural waters tends to range between 6 and 9, with neutral being 7. Extremes of pH can have deleterious effects on aquatic systems.

Pollution. The man-made or man-induced alteration of the chemical, physical, biological, and radiological integrity of water. An alteration of the quality of the water of the state by waste to a degree, which unreasonably affects either the waters for beneficial uses or facilities that serve these beneficial uses.

Post-Construction BMPs. Structural and non-structural controls which detain, retain, or filter the release of pollutants to receiving waters after final stabilization is attained.

Preliminary Phase (Pre-Construction Phase - Part of the Grading and Land Development Phase). Construction stage including rough grading and/or disking, clearing and grubbing operations, or any soil disturbance prior to mass grading.

Qualified SWPPP Developer (QSD). Individual who is authorized to develop and revise SWPPPs.

Qualified SWPPP Practitioner (QSP). Individual assigned responsibility for non-storm water and storm water visual observations, sampling and analysis, and responsibility to ensure full compliance with the permit and implementation of all elements of the SWPPP, including the preparation of the annual compliance evaluation and the elimination of all unauthorized discharges.

Qualifying Rain Event. Any event that produces 0.5 inches or more precipitation at the time of discharge with a 48 hour or greater period between rain events. (2010 standard specification text defines it as a 72 hour between rain events)

R Factor. Erosivity factor used in the Revised Universal Soil Loss Equation (RUSLE). The R factor represents the erosivity of the climate at a particular location. An average annual value of R is determined from historical weather records using erosivity values determined for individual storms. The erosivity of an individual storm is computed as the product of the storm's total energy, which is closely related to storm amount, and the storm's maximum 30-minute intensity.

Rain Event Action Plan (REAP). Written document, specific for each forecasted storm event, that when implemented is designed to protect all exposed portions of the site within 48 hours of any likely forecasted storm event.

Receiving Waters. All surface water bodies within the permit area.

Regional Water Quality Control Board (RWQCB). California agencies that implement and enforce CWA Section 402(p) NPDES permit requirements, and are issuers and administrators of these permits as delegated by USEPA. There are nine regional boards working with the SWRCB.

Remaining Sub-sampled Material. The material (e.g., organic material, gravel, etc.) that remains after the organisms to be identified have been removed from the subsample for identification. (Generally, no

macroinvertebrates are present in the remaining subsampled material, but the sample needs to be checked and verified using a complete Quality Assurance (QA) plan)

Resident Engineer (RE). The Caltrans representative charged with administration of construction contracts. The RE decides questions regarding acceptability of material furnished and work performed. The RE has "contractual authority" to direct the contractor and impose sanctions if the contractor fails to take prompt and appropriate action to correct deficiencies. The following contractual sanctions can be imposed by the RE: (a) withholding payments (or portions of payments), (b) suspending work, (c) bringing in a separate contractor to complete work items (the contractor is billed for such costs), (d) assessing liquidated damages including passing along fines for permit violations, (e) initiating cancellation of the construction contract.

Routine Maintenance. Activities intended to maintain the original line and grade, hydraulic capacity, or original purpose of a facility.

Runoff Control BMPs. Measures used to divert run-on from off-site and runoff within the site.

Runoff Effect. The effect that a particular soil stabilization product has on the production of stormwater runoff. Runoff from an area protected by a particular product may be compared to the amount of runoff measured for bare soil

Run-on. Discharges that originate off-site and flow onto the property of a separate project site.

Revised Universal Soil Loss Equation (RUSLE). Empirical model that calculates average annual soil loss as a function of rainfall and runoff erosivity, soil erodibility, topography, erosion controls, and sediment controls.

Sampling and Analysis Plan (SAP). Document that describes how the samples will be collected, under what conditions, where and when the samples will be collected, what the sample will be tested for, what test methods and detection limits will be used, and what methods/procedures will be maintained to ensure the integrity of the sample during collection, storage, shipping and testing (i.e., quality assurance/quality control protocols).

Sediment. Solid particulate matter, both mineral and organic, that is in suspension, is being transported, or has been moved from its site of origin by air, water, gravity, or ice and has come to rest on the earth's surface either above or below sea level.

Sedimentation. Process of deposition of suspended matter carried by water, wastewater, or other liquids, by gravity. It is usually accomplished by reducing the velocity of the liquid below the point at which it can transport the suspended material.

Sediment Control BMPs. Practices that trap soil particles after they have been eroded by rain, flowing water, or wind. They include those practices that intercept and slow or detain the flow of storm water to allow sediment to settle and be trapped (e.g., silt fence, sediment basin, fiber rolls, etc.).

Settleable Solids (SS). Solid material that can be settled within a water column during a specified time frame. It is typically tested by placing a water sample into an Imhoff settling cone and then allowing the solids to settle by gravity for a given length of time. Results are reported either as a volume (mL/L) or a mass (mg/L) concentration.

Sheet Flow. Flow of water that occurs overland in areas where there are no defined channels where the water spreads out over a large area at a uniform depth.

Soil Amendment. Any material that is added to the soil to change its chemical properties, engineering properties, or erosion resistance that could become mobilized by storm water.

State Water Resources Control Board (SWRCB). California agency that implements and enforces CWA Section 402(p) NPDES permit requirements, is issuer and administrator of these permits as delegated by EPA. Works with the nine Regional Water Quality Control Boards.

Storm Drain System. Streets, gutters, inlets, conduits, natural or artificial drains, channels and watercourses, or other facilities that are owned, operated, maintained and used for the purpose of collecting, storing, transporting, or disposing of stormwater.

Stormwater. Rainfall runoff, snow melt runoff, and surface runoff and drainage. It excludes infiltration and runoff from agricultural land.

Stormwater Inspector. Contractor's staff member who provides support to the WPC Manager. Performs activities related to WPCP and SWPPP implementation.

Stormwater Pollution Prevention Plan (SWPPP). A plan required by the Permit that includes site map(s), an identification of construction/contractor activities that could cause pollutants in the stormwater, and a description of measures or practices to control these pollutants. It must be prepared and authorized before construction begins.

Structural Controls. Any structural facility designed and constructed to mitigate the adverse impacts of storm water and urban runoff pollution

Suspended Sediment Concentration (SSC). The measure of the concentration of suspended solid material in a water sample by measuring the dry weight of all of the solid material from a known volume of a collected water sample. Results are reported in mg/L.

Temporary Construction Site BMPs. Construction Site BMPs that are required only temporarily to address a short-term stormwater contamination threat. For example, silt fences are located near the base of newly graded slopes that have a substantial area of exposed soil. Then, during rainfall, the silt fences filter and collect sediment from runoff flowing off the slope.

Total Suspended Solids (TSS). The measure of the suspended solids in a water sample includes inorganic substances, such as soil particles and organic substances, such as algae, aquatic plant/animal waste, particles related to industrial/sewage waste, etc. The TSS test measures the concentration of suspended solids in water by measuring the dry weight of a solid material contained in a known volume of a sub-sample of a collected water sample. Results are reported in mg/L.

Toxicity. The adverse response(s) of organisms to chemicals or physical agents ranging from mortality to physiological responses such as impaired reproduction or growth anomalies.

Turbidity. The cloudiness of water quantified by the degree to which light traveling through a water column is scattered by the suspended organic and inorganic particles it contains. The turbidity test is reported in Nephelometric Turbidity Units (NTU) or Jackson Turbidity Units (JTU).

Waste Discharge Identification Number (WDID). The unique project number issued by the SWRCB upon receipt of the NOI.

Water Pollution Control Manager (WPC Manager). The person responsible for the implementation of the SWPPP or WPCP, whichever is applicable for the project. The WPC manager must be a QSP whenever the project requires a WPCP. The WPC manager must be a QSD whenever the project requires a SWPPP.

Water Pollution Control Program (WPCP). A WPCP is a plan to identify water quality management practices to be implemented that must be prepared for all construction projects that do not require preparation of a SWPPP. For Caltrans projects disturbing more than one acre, a SWPPP satisfies the requirement for a WPCP.

Waters of the United States. All waters that are currently used, were used in the past, or may be susceptible to use in interstate or foreign commerce, including all waters subject to the ebb and flow of the tide. Waters of the United States [as defined in 40 CFR 230.3(s)] include all interstate waters and intrastate lakes, rivers, streams (including intermittent streams), mudflats, sand flats, wetlands, sloughs, prairie potholes, wet meadows, playa lakes, or natural ponds the use of which would affect or could affect interstate or foreign commerce. The definition also applies to tributaries of the aforementioned waters. See 40 CFR 122.2 for the complete definition, which is hereby incorporated by reference.

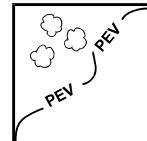
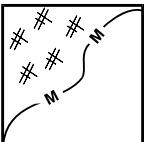
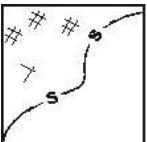
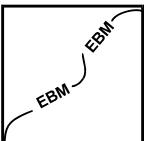
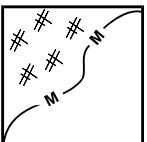
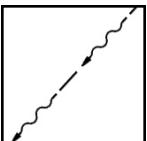
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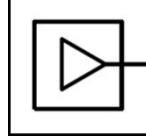
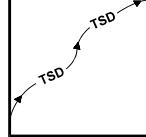
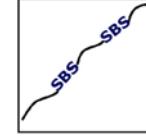
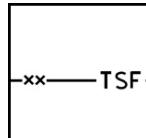
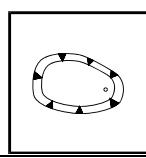
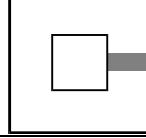
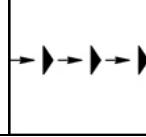
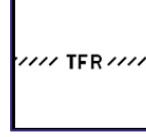
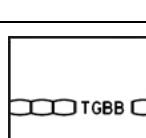
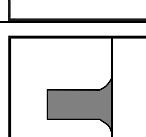
Appendix B: List of Standard BMP Symbols

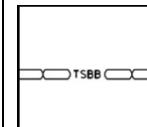
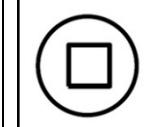
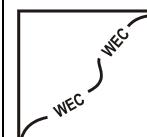
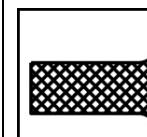
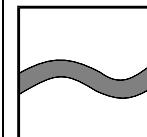
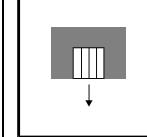
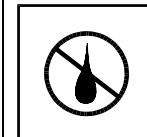
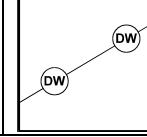
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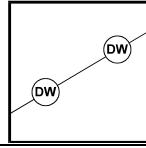
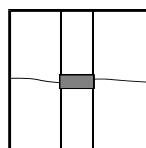
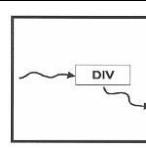
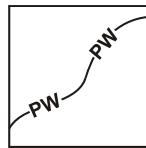
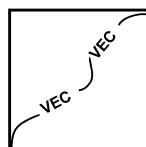
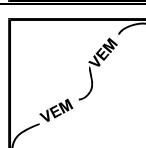
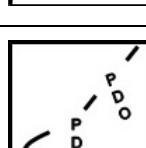
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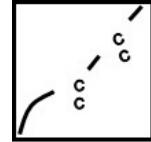
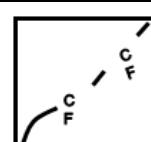
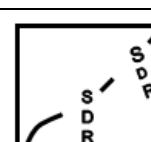
List of Standard BMP Symbols

Water Pollution Control BMP Symbols	
Soil Stabilization	
SS-2: Preservation of Existing Vegetation	 
SS-3: Hydraulic Mulch (Note: Symbol -M- is generic Hydraulic Mulch symbol. Use line type symbol -BFM- for Bonded Fiber Matrix, and CBHM- for Cementitious Binder Hydraulic Mulch)	
SS-4: Hydroseeding	
SS-5: Soil Binders	
SS-6: Straw Mulch	
SS-7: Plastic Cover and Rolled Erosion Control Products	
SS-8: Wood Mulching	
SS-9: Earth Dikes/Drainage Swales and Lined ditches	

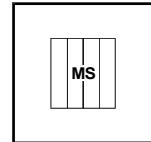
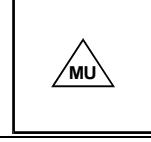
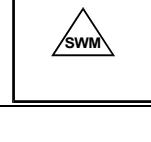
SS-10: Outlet Protection/Velocity Dissipation Devices	
SS-11: Slope Drains	
SS-12: Streambank Stabilization	
Sediment Control	
SC-1: Silt Fence	
SC-2: Sediment/Desilting Basin	
SC-3: Sediment Trap	
SC-4: Check Dams	
SC-5: Fiber Rolls	
SC-6: Gravel Bag Berm	
SC-7: Street Sweeping and Vacuuming	

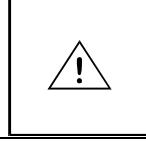
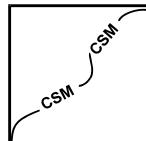
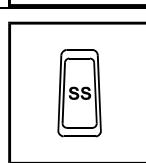
SC-8: Compost Sock	
SC-9: Straw Bale Barrier	
SC-10: Temporary Drainage Inlet Protection	
Wind Erosion Control	
WE-1: Wind Erosion Control	
Tracking Control	
TC-1: Temporary Construction Entrance	
TC-2: Temporary Construction Roadway	
TC-3: Temporary Entrance/Outlet Tire Wash	
Non-Stormwater Management	
NS-1: Water Conservation Practices	
NS-2: Dewatering Operations	

NS-2: Dewatering Operations	
NS-3: Paving, Sealing, Sawcutting and Grinding Operations	
NS-4: Temporary Stream Crossing	
NS-5: Clear Water Diversion	
NS-6: Illicit Connection/Illegal Discharge	
NS-7: Potable Water/Irrigation	
NS-8: Vehicle and Equipment Cleaning	
NS-9: Vehicle and Equipment Fueling	
NS-10: Vehicle and Equipment Maintenance	
NS-11: Pile Driving Operations	

NS-12: Concrete Curing	
NS-13: Material and Equipment Use Over Water	
NS-14: Concrete Finishing	
NS-15: Structure Demolition Over or Adjacent to Water	

Waste Management and Materials Pollution Control

WM-1: Material Delivery and Storage	
WM-2: Material Use	
WM-3: Stockpile Management	
WM-4: Spill Prevention and Control	
WM-5: Solid Waste Management	

WM-6: Hazardous Waste Management	
WM-7: Contaminated Soil Management	
WM-8: Concrete Waste Management	
WM-9: Sanitary and Septic Waste Management	
WM-10: Liquid Waste Management	