## 2022 Construction Stormwater General Permit



Construction Stormwater Program – Summer 2023



#### Presentation Overview

- NPDES Construction Stormwater General Permit Background
- High-level review of 2022 CGP requirements

# Statewide Permit Background

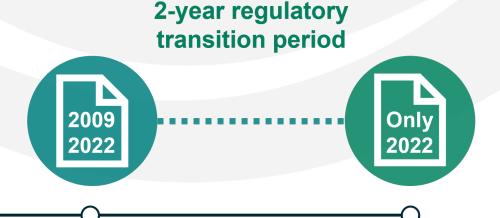
- The federal Clean Water Act requires certain stormwater discharges to waters of the United States to be regulated by an NPDES permit
- The State Water Board adopted the existing statewide NPDES Construction Stormwater General Permit in 2009
- The 2009 permit expired in 2014 and is administratively extended



# 2022 CGP: Effective Date and Regulatory Transition Period







September 8, 2022

State Water Board adopts the 2022 CGP

**December 17, 2022** 

Statewide programmatic permitting, under the 2009 CGP, available to implement Executive Order N-72-20

September 1, 2023

2022 CGP becomes effective

September 1, 2025

Regulatory transition period ends, the 2022 CGP is the only effective permit

# Review of 2022 CGP Requirements



### 2022 CGP Requirements

Applying for Permit Coverage	Total Maximum Daily Load Implementation
Post-Construction Plan Submittals	Active Treatment Systems
Programmatic Permitting for Linear Projects	Passive Treatment
Notice of Non-Applicability	Exceptions to the California Ocean Plan
QSD/QSP Responsibilities	Dewatering Activities
Stormwater Professional Training	Surface Water Buffers
Qualifying Precipitation Events	Changes of Information
Site Inspections	Inactive Project Status
Stormwater Discharge Monitoring	Reducing Acreage for Residential Lots
Non-Visible Pollutant Monitoring	Notice of Termination

### Applying for Permit Coverage

- Projects that disturb one or more acres of land require permit coverage
- Projects that are less than one acre but are part of a larger common plan of development require permit coverage
  - Projects are not considered part of a larger common plan of development if separate by ¼ mile or more
- Permit requirements vary between traditional and linear projects
- Application includes Notice of Intent, Site Drawings and Maps, SWPPP, applicable post-construction plans, and the first annual fee

#### Post-Construction Plan Submittals

- Linear underground/overhead projects are not required to submit postconstruction plans
- Dischargers complying with city or county post-construction requirements are required to submit with their permit application:
  - An attachment or web-source containing the applicable city or county requirements
  - Preliminary or approved post-construction plans and calculations
  - If the discharger submitted preliminary post-construction plans, they must submit the final plans within 14 days of the city or county's approval
- Dischargers complying with the 2022 CGP's post-construction requirements are to submit post-construction plans and calculations with their permit application
  - The Regional Water Board staff may review and request revisions if necessary

# Programmatic Permitting

- Per Order Section III.B.4, dischargers may cover multiple, non-contiguous linear projects under a <u>regional</u> programmatic permit if the projects:
  - Are located within one Regional Water Board jurisdictions;
  - Are a group of projects of similar scopes with common construction activities; and,
  - Have the same Legally Responsible Person



### Notice of Non-Applicability (NONA)

- Dischargers may file a NONA to show that the site is not hydrologically connected to waters of the United States and does not require permit coverage
- The NONA option is not intended for construction sites that discharge to a constructed basin due to their potential to fail, resulting in discharge to a waters of the United States
- A California licensed professional engineer or geologist with hydrological expertise must prepare a site-specific No Discharge Technical Report

Monitoring Requirements



# Qualified SWPPP Developer/Practitioner (QSD/QSP) Responsibilities

- QSDs are required to prepare the site-specific SWPPP and conduct inspections:
  - Start of construction, when replacing a QSD, twice annually, and following a numeric action level exceedance
- QSPs oversee monitoring and implementation of the SWPPP and conduct inspections:
  - Once per month, pre-qualifying precipitation event, following a numeric action level exceedance, and for the Notice of Termination
- The 2022 permit allows the Water Boards to suspend or rescind QSD/QSP certifications as an enforcement action

#### Stormwater Professional Training

- The Construction General Permit Training Team will revise the QSD QSP Training Program curricula to include content on the 2022 CGP
- QSD/QSPs certified through the California Stormwater Quality Association are required to complete 6 hours of continuing education annually
- State Water Board staff can consider recommendations for additional QSD/QSP prerequisite training courses
- QSPs opting to delegate responsibilities shall provide training to the delegate(s) based on the guidelines set by the Construction General Permit Training Team

### Qualifying Precipitation Event Definition

Per the 2022 CGP Glossary:

A qualifying precipitation event is any weather pattern that is forecast to have a 50 percent or greater Probability of Precipitation and a Quantitative Precipitation Forecast (QPF) of 0.5 inches or more within a 24-hour period. The event begins with the 24-hour period when 0.5 inches has been forecast and continues on subsequent 24-hour periods when 0.25 inches of precipitation or more is forecast.











#### Qualifying Precipitation Event Examples

NWS Forecast Weather Table Interface

Date		Thu N	1ar 09			Fri Ma	ar 10			Sat N	1ar 11			Sun N	1ar 12			Mon N	1ar 13			Tue N	lar 14		Wed Mar 15			
High Temp(F)		5	2			5	9		56				63				60				60				59			
Low Temp(F)	38				49			47			51			52			51				42							
Time	4am	10am	4pm	10pm	4am	10am	4pm	10pm	4am	10am	4pm	10pm	4am	10am	4pm	10pm	4am	10am	4pm	10pm	4am	10am	4pm	10pm	4am	10am	4pm	10pm
Temp(F)		50	51	51	51	54	57	51	48	50	56	53	52	58	60	54	52	57	59	56	52	56	56	48	43	54	58	48
Dew Point(F)		40	47	48	50	52	48	47	47	49	50	51	51	55	53	52	52	54	54	53	50	50	46	44	41	45	46	43
Relative Humidity(%)		69	86	88	96	92	70	87	96	96	80	95	99	89	77	91	98	88	84	92	94	78	69	87	95	74	64	84
Wind Direction		SE	SE	S	S	S	SW	S	W	W	S	S	S	S	S	SE	SE	SE	S	S	S	S	SW	S	NW	NW	W	W
Wind Speed(mph)		15	28	33	22	14	7	6	6	6	7	8	10	14	12	8	10	13	17	16	15	14	13	9	10	12	12	9
Wind Gust(mph)		23	41	41	38	20	12	8	8	9	10	13	14	22	17	12	15	20	25	23	22	21	18	14	15	17	16	14
Cloud Cover(%)		75	100	90	90	75	80	75	80	85	80	85	80	80	75	80	85	95	90	85	70	65	60	60	60	55	50	50
Prob. of Precip(%)		10	100	70	80	30	70	60	65	70	75	75	75	65	60	70	80	90	90	70	60	45	40	40	40	35	30	25
6 Hr. Precip(in)		0.36	0.46	0.48	0.28	0.07	0.06	0.10	0.12	0.15	0.14	0.14	0.12	0.19	0.07	0.13	0.18	0.24	0.26	0.32	0.30	0.26	0.17	0.12	0.03	0.00	0.00	0.00

### Qualifying Precipitation Example #1

December 31				January 1				Janua	ary 2			January 3				
Time	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p
PoP	55	95	100	40	15	-	-	-	-	5	50	55	30	30	30	35
QPF	0.02	0.13	0.83	0.07	0.00	0.00	0.00	0.00	0.00	0.00	0.05	0.1	0.01	0.01	0.01	0.04
QPE	1st QPE – Start & End			No QPE				No QPE				No QPE				

	January 4				January 5				Janua	ary 6			January 7				
Time	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p	
PoP	35	45	60	80	75	55	35	30	20	15	15	15	-	-	-	-	
QPF	0.05	0.11	0.28	0.51	0.35	0.30	0.27	0.11	0.07	0.05	0.00	0.00	0.00	0.00	0.00	0.00	
QPE	No QPE 2 <sup>nd</sup> QPE – I			Day 1 (Start) 2 <sup>nd</sup> QPE – D				Day 2 (End) No				QPE		No QPE			

PoP = Probability of Precipitation

QPF = Quantitative Precipitation Forecast

QPE = Qualifying Precipitation Event

### Qualifying Precipitation Example #2

March 9				March	า 10			Marcl	า 11			March 12				
Time	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p
PoP	-	10	100	70	80	30	70	60	65	70	75	75	75	65	60	70
QPF	0.00	0.36	0.46	0.48	0.28	0.07	0.06	0.10	0.12	0.15	0.14	0.14	0.12	0.19	0.07	0.13
QPE	No QPE Day 1			(Start) Day				ay 2 Da			Da	у 3		Day 4		

	March 13				Marcl	า 14			March	า 15			March 16					
Time	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p	4a	10a	4p	10p		
PoP	80	90	90	70	60	45	40	40	40	35	30	25	-	-	-	-		
QPF	0.18	0.24	0.26	0.32	0.30	0.26	0.17	0.12	0.03	0.00	0.00	0.00	0.00	0.00	0.00	0.00		
QPE	Day 4 Da			Day 6				(End) No				QPE		No QPE				

PoP = Probability of Precipitation

QPF = Quantitative Precipitation Forecast

QPE = Qualifying Precipitation Event

#### Site Inspections



- Weekly inspections to ensure best management practices are properly implemented and functioning correctly
  - Pre-, during-, and post-qualifying precipitation event inspections may count towards the weekly inspection requirement
- Pre-, during-, and post-qualifying precipitation event inspections
  - Pre-qualifying precipitation event inspections must occur within 72 hours and up to 120 hours prior to event
  - Post-qualifying precipitation event inspections must occur within 96 hours of the last 24-hour period with 0.25 inches or more precipitation

### Who can perform specific inspections?

Inspection Type	Qualified SWPPP Developer (QSD)	Qualified SWPPP Practitioner (QSP)	Trained Delegate
Weekly	X	X	Х
Pre-Precipitation Event	X	X	
During Precipitation Event	X	X	Х
Post-Precipitation Event	X	X	Х
Inactive Projects (14 days after Change of Information approval)	X		
Inactive Projects (Monthly Inspection and Pre-Precipitation Event)	X	X	Х
Active Projects (Monthly Inspection)	X	X	
Twice Annual Site Inspection	X		
Within 30 days of construction commencing or replacing QSD	X		
Within 14 days of NAL exceedance	X	X	
Prior to NOT and COI submission(s)	X	X	

#### Stormwater Discharge Monitoring

- Risk Level 1 dischargers are not required to sample stormwater discharges for pH and turbidity
- Risk Level 2 and 3 dischargers are required to obtain <u>one</u> sample from each actively discharging location, per 24-hour period of a Qualifying Precipitation Event
- Risk Level 2 and 3 dischargers shall use a calibrated field meter to analyze the sample for pH and turbidity
- As only one sample is required, there is <u>no daily averaging</u> per discharge location or site

### Non-Visible Pollutant Monitoring



- Non-visible pollutant monitoring is required for <u>all</u> dischargers only when a pollutant may be discharged due to:
  - Failure to implement best management practices;
  - A container spill or leak; or,
  - A best management practice breach, failure, or malfunction
- Dischargers must collect at least one sample each 24-hour period until necessary corrective actions are completed
- Dischargers are not required to sample if the corrective actions are completed before a discharge occurs

Additional Requirements (Attachments F - J)



# Total Maximum Daily Load (TMDL) Implementation

- TMDLs assign waste load allocations to contributing point sources of a pollutant
- NPDES permits include requirements or limitations to meet the allocation
- Responsible Discharger are those that discharge to a watershed/waterbody identified in a TMDL and have identified one or more TMDL pollutants present on-site
- There are four categories of implementation requirements for Responsible Dischargers

#### **Compliance Categories**

Comply with General Permit

Erosion and Sediment Controls paired with RUSLE2 modeling

Numeric Action Levels

Numeric Effluent Limitations

Total Maximum Daily Load (TMDL) Implementationv

**Step 1:** Determine if project discharges to TMDL-listed watershed or waterbody

**Step 2:** Perform site-specific pollutant source assessment

**Step 3:** Refer to Attachment H for applicable implementation requirements



### TMDL Sampling Requirements



Sampling is required when conditions 1 – 3 occur

- 1. Project is in a TMDL watershed, and directly or indirectly discharges to the impaired waterbody
  - Applicable numeric action level or effluent limitation
- 2. Discharger identifies a TMDL pollutant source in the pollutant source assessment
- 3. Non-visible sampling requirements are triggered (spill, best management practice failure, etc.)
- 4. An exceedance is when Steps 1 3 occur:
  - With multiple samples above the numeric action level or numeric effluent limitation,
  - Within the same drainage area; and,
  - During the same reporting year

#### **Active Treatment Systems**



- The requirements of Attachment F apply to dischargers using Active Treatment Systems to remove pollutants from discharge
- The 2022 CGP includes a new pH numeric effluent limitation (6.0 9.0)
- Dischargers are now permitted to bypass the active treatment system if the discharge complies with applicable numeric action levels, numeric effluent limitations, and receiving water limitations
- The discharger must visually observe operations with on-site staff or remote personnel that can safely shutdown the system
- The discharger must upload an Active Treatment Plan as an attachment to SMARTS at least 14 days prior to planned operation

#### **Passive Treatment**



- The requirements in Attachment G apply to dischargers applying passive treatment products to water (liquid treatment chemicals, powders, blocks)
- Applying products directly to receiving waters is prohibited
- Passive treatment products must meet specific criteria (non-cationic, food grade, charge density, molecular weight, etc.)
- Passive treatment products must be used in tandem with erosion and sediment control best management practices to capture settled solids
- The discharger must submit the QSD-prepared Passive Treatment Plan through SMARTS at least 14 days prior to applying products

#### Exceptions to the California Ocean Plan

- Construction stormwater discharges to Areas of Special Biological Significance (ASBS) are prohibited unless the State Water Board grant's an exception to the California Ocean Plan
- Attachment I contains specific requirements for dischargers with an exception:
  - Ocean Plan Core Discharge Monitoring parameters may apply such as oil and grease, total suspended solids, turbidity, pH, pesticides, metals, nutrients, and indicator bacteria
  - Ocean Receiving Water Monitoring (individual or regional integrated program)
- Dischargers are required to submit a report to the State Water Board within 30 days of receiving sample results that demonstrate the stormwater discharge caused or contributed to the alteration of natural ocean water quality

#### **Dewatering Activities**

- The requirements in Attachment J apply to dischargers that are not subject to a separate NPDES permit for their dewatering activities
- Dewatering is mechanical pumping or siphoning non-potable water from excavations, foundations, vaults, impoundments, and groundwater removal specifically related to construction activities
- Dewatering discharges must comply with pH (6.5 8.5) and turbidity (250 NTUs) numeric action levels
- Dischargers may not dewater in areas where there is known soil and/or groundwater contamination could cause pollution or nuisance
- Dischargers shall notify the Regional Water Board 24 hours prior to the anticipated dewatering discharge

#### Surface Water Buffers

- Attachment D/E Section II.G requires a 50-foot natural buffer
- Buffers are not required where infeasible, consistent with U.S. EPA Construction and Development Effluent Guidelines
- Dischargers may use RUSLE2 or other Regional Water Boardapproved methods to calculate equivalent sediment load reductions
- Water body-dependent construction, Clean Water Act section 404 permitted projects, and non-existent natural buffer projects (channelized water courses) are exempt

Revising and Changing Permit Coverage



### Changes of Information

Change of Information Type	2009 CGP	2022 CGP
Site Information (e.g., start and end dates)	X	X
Risk Determination	X	X
Segments (Linear)	X	X
Increase or Decrease Disturbed Acreage	X	X
Update SWPPP and Site Map	X	
Upload Final Post-Construction Plans		X
Change Project to Inactive Status		X

# Projects with Inactive Status

#### Order Section III.G:

- Allows dischargers to reduce monitoring when construction is suspended
- Requires revised site map and photos of temporary stabilization
- Requires periodic site inspections



# Reducing Acreage for Residential Lots

Order Section III.F.2.b allows dischargers to remove residential lots from permit coverage by meeting the following criteria:



 Home is sold to individual homeowners



Lot is less than an acre of disturbance



 Install temporary stabilization BMPs and contract to maintain until stabilized



### Notice of Termination







- The NOT process requires that:
  - A Qualified SWPPP Practitioner conduct an NOT final inspection
  - The discharger submit photos demonstrating final stabilization and post-construction best management practices
  - The discharger submit a final site map detailing completed construction features and permanent erosion control and post-construction best management practices
  - The discharger include a long-term maintenance plan for post-construction best management practices
- An NOT will be automatically approved if the Regional Water Board does not deny, return, or accept the NOT for review within 30 days

#### Break

We will take a 10-minute break before moving on to Q&A





#### What's Next?

- Additional workshops this summer
- 2022 CGP Reissuance Review
- Updated map tools (TMDL, high-risk receiving waters, K factor, LS factor)
- Guidance documents
- SMARTS Virtual Workshop(s)

#### **Contact Information**



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