

A blue-tinted photograph of the Seattle skyline. In the foreground, the Great Wheel is visible on the left, and Pier 56 is on the right. The background is filled with various high-rise buildings.

# 2026 Stormwater Code and Manual Update

## Public Meeting

### January 14, 2026

# Goals for today's session:

- Provide an overview of the proposed 2026 Stormwater Code and Manual changes
- Answer clarifying questions
- Share how to provide input on 2<sup>nd</sup> public review draft
- Share the next steps for the rule making process

# Agenda for today

- Welcome & Introductions
- Project Background & Status Update
- Key Stormwater Code Updates
- Key Stormwater Manual Updates – Volume 1
- Break (5 min)
- Key Stormwater Manual Updates – Remaining Volumes / Appendices
- Next Steps
- Q&A



# Group Agreements



- Use your **computer** to connect to Zoom, if possible.



- Use the **chat function** to submit questions and comments. During the Question & Answer, use the **chat** or the **raise hand** feature.



- Use a **headset** or join from a quiet space to reduce background noise/echo.



- Keep your phone or headset **muted** unless you are speaking to the group.



- Stay focused on the **goal** for today's call...

# Consultant Team



Rebecca Allen  
The Vida Agency  
Senior Project  
Manager



Valeria Herrera  
The Vida Agency  
Community Outreach  
Specialist



Olivia Wright  
Herrera  
Senior Engineer



# City Project Team Leads



**Sherell Ehlers, PE**  
SPU Stormwater  
Policy Advisor



**Matthew Bateman, PE**  
SDCI Senior  
Drainage Reviewer



**Jess Huybregts**  
SPU Stormwater  
Permit Manager



# Project Background, Scope, and Schedule



A Chinook salmon spawning in the reconstructed reach of the Thornton Confluence Floodplain project site. Courtesy Chapin Pier, Seattle Public Utilities, October 2018.

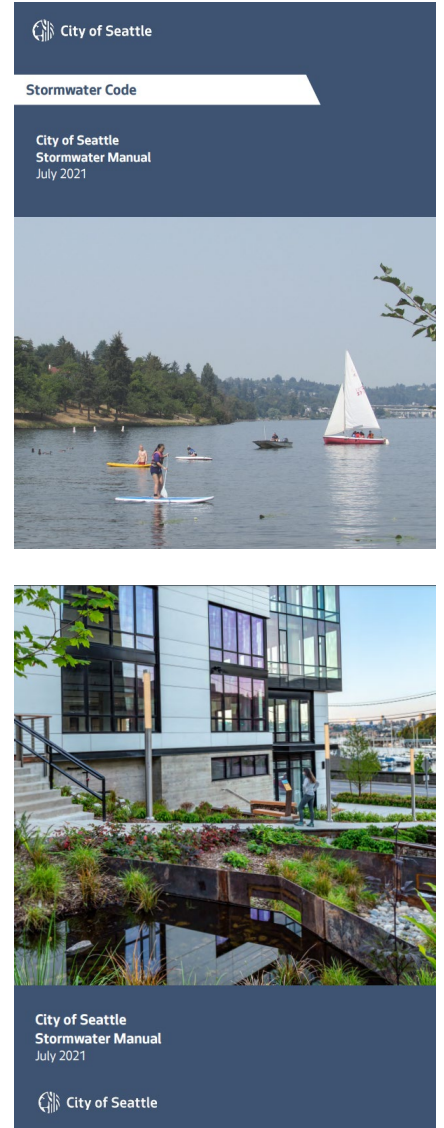
# Project Background

## Why do we have a Stormwater Code?

- Protect life, property, receiving waters from harm
- Meet requirements of state and federal law
- Required under the federal Clean Water Act / National Pollutant Discharge Elimination System (NPDES) Permit

## What is in our current Stormwater Code?

- Source control for ongoing practices
- Construction site pollution prevention
- Permanent stormwater controls





# Why update now?

- New 5-year permit effective August 1, 2024 through July 2029
- Achieve equivalency to [2024 MS4 NPDES Permit](#) & Ecology's 2024 Stormwater Manual by July 1, 2026 📌
- Identify and incorporate policy shifts
- Address stakeholder input, provide clarifications, and improve project implementation

*MS4 = municipal separate storm sewer system*

*NPDES = National Pollutant Discharge Elimination System*

Stormwater Management Manual  
for Western Washington

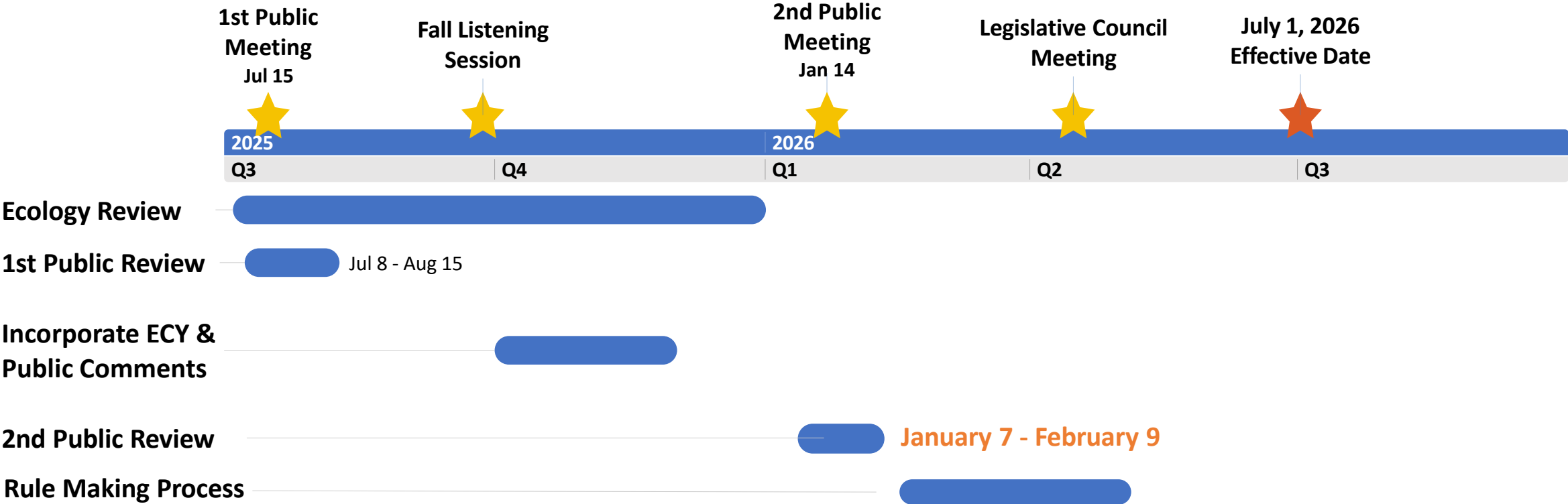


July 2024



Publication Number 24-10-013

# Public Input Schedule



# Slide Legend



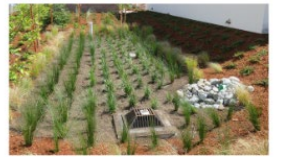
Changes to meet equivalency



Updates between July 2025 and January 2026 Public Review Drafts

\* Note: Changes in blue text in draft documents typically still need Ecology final approval

Stormwater Management Manual  
for Western Washington



July 2024



Publication Number 24-10-013



# Key Stormwater Code Updates



# Key Stormwater Code Updates

(page 1 of 3)

## Overview of changes

- **Revised** utility work and **pavement maintenance** exemptions 📌 ⚡
- **Revised** project **vesting dates** and references 📌 ⚡
- **Revised** “**Closely Related Projects**” definition and criteria 📌 ⚡
- **Added** new definition for **Common Plan of Development or Sale** and added examples of “**Single [Common] Plan**” 📌 ⚡
- **Revised** “Enhanced” to “**Metals**” treatment terminology and updated **Metals Treatment thresholds** 📌
- **Updated** definitions for **new and replaced hard surfaces** 📌 ⚡

# Key Stormwater Code Updates

(page 2 of 3)

## Overview of changes

- Deleted **Single-Family Residential Project** definition / requirements ⚡
- Added **source control** requirements related to buildings with **PCBs** 📌
- Added clarification for **application of thresholds** 📌 ⚡
- Revised existing construction related **flow control requirements** ⚡
- Revised **ensure sufficient capacity threshold** ⚡
- Added section to address **water quality impacts** associated with **pollution-generating surfaces** not previously discharging to receiving water basins ⚡

# Key Stormwater Code Updates






(page 3 of 3)

## Overview of changes

- **Updated** project **On-site Lists** ⚡
- **Increased flow control threshold** for **Parcel-based projects** discharging to small lake basins and capacity-constrained systems from 2,000 sf to 5,000 sf ⚡
- **Revised Roadway Project** thresholds to “new plus replaced” hard surface and removed 5,000 sf “**new**” hard surface for flow control and treatment 📌 ⚡
- **Updated Wetland Protection Standard** 📌 ⚡
- **Added** exception regarding **landscape areas** requiring **metals treatment** ⚡
- **Updated Drainage Control Review** and Application requirements and thresholds 📌 ⚡

# Key Stormwater Code Updates - 22.800.040


## 22.800.040.A – Exemptions

- **Added** that utility work associated with a Parcel-Based Project is not exempt under 22.800.040.A.2.a 
- **Revised** pavement maintenance associated with a Parcel-Based Project or Roadway Project is not exempt under 22.800.040.A.2.b 
- **Added** utility work associated with trail or sidewalk must comply with Section 22.805.040  
- **Added** that ADA work associated with exempt activities is also exempt 



# Key Stormwater Code Updates – 22.800.070 and 22.800.100

## 22.800.070 – Minimum Requirements for City Agency Projects & 22.800.100 – Transition to Revised Stormwater Code








- Revised project vesting dates and references 
  - Projects reviewed under 2016 Stormwater Code must start construction by July 1, 2026, or are required to follow 2026 Stormwater Code
  - Projects reviewed under 2021 Stormwater Code must start construction by July 1, 2031, or are required to follow 2031 Stormwater Code
  - Projects reviewed under 2026 Stormwater Code must start construction by July 1, 2036, or are required to follow 2036 Stormwater Code

# Key Stormwater Code Updates - 22.801

(page 1 of 5)

## 22.801 – Definitions

- **New** definitions

- Closely Related Projects  
  - Moved definition to code and revised criteria
  - Applies during construction in addition to under review
  - Applies to most projects on the same lot 
  - Deleted criteria that are not to be taken into consideration for closely-related projects  
  - Includes “Common plan of development or sale”
- Common Plan of Development or Sale (includes examples of “single [common] plan”)  

# Key Stormwater Code Updates - 22.801

(page 2 of 5)

## 22.801 – Definitions (cont.)

- **New** definitions
  - Metals treatment facility (replaces “enhanced treatment facility”) ⚡
  - Municipal separate storm sewer system (MS4) ⚡
  - Pavement Maintenance Practices 📌 ⚡  
(revised from 22.800.040 Exemptions)
  - Surface waters ⚡
  - Vehicular Use 📌 ⚡  
(revised from Pollution-Generating Impervious Surface definition)

# Key Stormwater Code Updates - 22.801

(page 3 of 5)

## 22.801 – Definitions (cont.)

- Deleted definitions
  - ~~New Impervious Surface~~  
→ Refer to “New Hard Surface” definition
  - ~~Pollution-Generating Impervious Surface~~  
→ Refer to “Pollution-Generating Hard Surface” definition
  - ~~Replaced Impervious Surface~~  
→ Refer to “Replaced Hard Surface” definition
  - ~~Single family residential project~~ ⚡  
→ Refer to 22.805.050 for revised parcel-based project thresholds.



# Key Stormwater Code Updates - 22.801

(page 4 of 5)

## 22.801 – Definitions (cont.)

- Updated definitions
  - Aquatic Life – term only used in relation to “fresh water bodies” and added wetlands ⚡
  - Creek – removed reference to creek “type” (refer to “Stream” definition) 📌 ⚡
  - Development – added “street improvement permit” 📌 ⚡
  - Groundwater – added “perched or otherwise” ⚡
  - High-Use Sites – added “300 total [vehicle] trip ends per day” 📌 ⚡
  - Large Project – lowered “Land Disturbing Activity” threshold from 1 acre to 10,000 sf

# Key Stormwater Code Updates - 22.801

(page 5 of 5)

## 22.801 – Definitions (cont.)

- Updated definitions (cont.)
  - Municipal Stormwater NPDES Permit – corrected to include areas outside the city 📌 ⚡
  - New Hard Surface – revised to bulleted list / added examples 📌 ⚡
  - Project – added reference to “development” definition 📌 ⚡
  - Replaced Hard Surface – clarified that foundation or base course must remain to be considered “replaced” and when modified surfaces are considered “replaced” or “new” hard surfaces 📌 ⚡
  - Site – updated to clarify that “site” may include multiple parcels 📌
  - Small Project – aligned thresholds with Large Project definition ⚡
  - Stream – removed reference to creek “type” and revised 📌 ⚡

# Key Stormwater Code Updates - 22.802

## 22.802.020 – Prohibited Discharges

- **Added** bromine to prohibited discharges ⚡

## 22.802.030 – Permissible Discharges

- **Added** that routine building washdowns (without detergents) and discharges are allowed but dependent on building age and absence of PCBs 📌
- **Clarified**
  - Lawn watering and irrigation runoff discharges are only allowed if water use is minimized
  - Only “non-toxic” tracing dye can be used

# Key Stormwater Code Updates – 22.803.020 and 22.803.030

## 22.803.020 – Minimum Requirements for for all discharges and real property

- **Added** facility components must be kept accessible for inspection and maintenance ⚡

## 22.803.030 – Minimum Requirements for Source Controls for All Real Property

- **Broadened** discharge rule to include more types of dog runs, not just rooftop ones





# Key Stormwater Code Updates - 22.803.040

## 22.803.040 – Minimum ~~Requirements for Source Controls For Businesses and Public Entities~~ for Specific Activities

- **Simplified** title ⚡
- **Revised** so that source control requirements for “specific activities” under one new subsection 22.803.040.A ⚡
- **Revised** 22.803.040.B (formerly 22.803.040.A) to reference Section 22.802.020 instead of subsections 22.802.020.A-D ⚡

# Key Stormwater Code Updates - 22.805.010

## 22.805.010 – Minimum Requirements for Projects - General

- **Added** that in addition to “Closely Related Projects”, thresholds apply to entire “Common Plan of Development or Sale”, “Short Plat”, and “Subdivision” when applying thresholds 📌
- **Revised** “Closely Related Projects” and “Common Plans of Development or Sale” text to align with definitions under 22.801.040.C ⚡
- **Clarified** that the assumed level of hard surface coverage is based on maximum allowable build-out coverage when applying thresholds

# Key Stormwater Code Updates - 22.805.020.D

## 22.805.020.D – Construction stormwater pollution prevention plan

- **Changed** on-site BMP to “infiltration BMP” requiring protection during construction.
- **Removed** reference to "large project" under "12. Control dewatering" section, added specific thresholds; no substantive changes.
- **Added** the requirement to protect downstream properties and receiving waters from “flooding” in addition to “erosion” ⚡
- **Added** controlling “duration” in addition to: “volume, velocity, and peak flow rate” ⚡

# Key Stormwater Code Updates - 22.805.020.H

## 22.805.020.H – Ensure sufficient capacity

- **Added** “all projects with an excavation depth of less than 12 feet located in an area expected to have shallow groundwater depths” to projects that will require dewatering analysis ⚡
- **Added** ensure sufficient capacity for “all projects that alter the drainage pattern from 5,000 square feet or more of an existing, new, or replaced hard surface or 3/4 of an acre or more of a pervious surface from a site to a downstream system not previously connected via discrete conveyance” ⚡

# Key Stormwater Code Updates – 22.805.020.K and 22.805.020.O

## 22.805.020.K – Comply with Side Sewer Code

- Revised authority to only “SPU Director” ⚡

## 22.805.020.O – Minimum requirements for treatment

- New subsection 22.805.020.D for “Minimum requirements for treatment” ⚡

# Key Stormwater Code Updates - 22.805.030

## ~~22.805.030 – Minimum Requirements for Single-Family Residential Projects~~

- **Removed** section ⚡



# Key Stormwater Code Updates - 22.805.050

## 22.805.050 Minimum Requirements for Parcel-Based Projects

- **Revised** small lake basin flow control threshold from 2,000 square feet to 5,000 square feet ⚡
- **Revised** capacity-constrained system flow control threshold from 2,000 square feet to 5,000 square feet ⚡
- **Refer to** Volume 3: Section 5.8.2 – Non-infiltrating Bioretention for revised sizing for On-site List and Peak Standard pre-sizing ⚡
- **Added** Pre-sized Peak Flow Control sizing for Non-infiltrating Bioretention for capacity-constrained basins (not applicable in combined sewer basins) ⚡
- **Updated** On-site List (22.805.070.D.2)



## 22.805.070.D.2 – On-Site List for Parcel-Based Projects

Category	BMPs	Projects Not Discharging to a Designated Receiving Water	Projects Discharging to a Designated Receiving Water or its Basin
1	Full Dispersion	R, S	R, S
	Infiltration Trenches	R, S <sup>e</sup>	R, S <sup>e</sup>
	Drywells	R, S <sup>e</sup>	R, S <sup>e</sup>
	<u>Rainwater Harvesting—Category 1 Sizing</u> 1	<u>X<sup>e</sup></u>	<u>X<sup>e</sup></u>
2	Rain Gardens <u>with or without tree</u>	R <sup>a</sup> , S <sup>a</sup>	R <sup>a</sup> , S <sup>a</sup>
	Infiltrating Bioretention <u>with or without tree</u>	R, S	R, S
	<u>Infiltrating Structural Bioretention with tree</u>	<u>X</u> 3	<u>X</u>
4	<u>Rainwater Harvesting—Category 2 Sizing</u>	<u>X<sup>e</sup></u>	<u>X<sup>e</sup></u>
	Permeable Pavement Facilities <sup>h</sup>	R, S	R, S
	Permeable Pavement Surfaces <sup>i, k</sup> 5	S	S
	Sidewalk/Trail Compost-Amended Strip <sup>k</sup>	S	S
3	<u>Infiltrating Structural Bioretention without tree</u>	<u>X</u> 3	<u>X</u>
	Sheet Flow Dispersion	R, S	R, S
	Concentrated Flow Dispersion	S	S
	Splashblock Downspout Dispersion	R	R
	Trench Downspout Dispersion	R	R
4	Non-infiltrating Bioretention	R <sup>d</sup> , S <sup>d</sup>	R <sup>d</sup> , S <sup>d</sup>
	<u>Non-infiltrating Structural Bioretention with tree</u>	<u>X</u> 3	<u>X</u>
	Rainwater Harvesting—Category 4 Sizing	R <sup>b, f</sup>	X <sup>f</sup>
	Vegetated Roofs	R <sup>c</sup>	<del>X<sup>c</sup></del> 6
	<u>Residential Cistern</u>	<u>X</u>	<u>X</u>
5	Perforated Stub-out Connections	R	R
	Trees <sup>i</sup>	S	S

# Key Stormwater Code Updates - 22.805.040

## 22.805.040 – Minimum Requirements for **Trail & Sidewalk** Projects

- **Updated** On-site List (22.805.070.D.3) ⚡



## 22.805.070.D.3 – On-Site List for Trail and Sidewalk Projects

Category	BMPs	Projects Discharging to a Receiving Water Not Designated by Section 22.801.050, or its Basin	Projects Discharging to a Public Combined Sewer or Capacity-constrained System, <sup>c</sup> or its Basin	Projects Discharging to a Designated Receiving Water, or its Basin
1	Full Dispersion	S	S	S
2	1 Rain Gardens <u>with or without tree</u>	S	S	X
2	2 <u>Infiltrating Soil Cell Bioretention with tree</u> <sup>d</sup>	X	X	X
2	Permeable Pavement Facilities	X	X <sup>a</sup>	X <sup>a, b</sup>
2	3 Permeable Pavement Surfaces <sup>e</sup>	S	S <sup>a</sup>	X <sup>a, b</sup>
2	Sidewalk/Trail Compost-Amended Strip <sup>e</sup>	S	S	X
3	Sheet Flow Dispersion	S	S	S
3	Concentrated Flow Dispersion	S	S	S
4	Trees	S	S	S

# Key Stormwater Code Updates - 22.805.060

## 22.805.060 – Minimum Requirements for Roadway Projects

- **Revised** flow control thresholds to include “new plus replaced” hard surfaces 📌
- **Revised** treatment thresholds to include “new plus replaced” pollution-generating hard surfaces 📌
- **Removed** “**new** hard surface 5,000 square feet” flow control threshold for “Wetlands”, “Non-Listed Creek Basins” and “Small Lake Basins” 📌 ⚡
- **Removed** “**new** pollution-generating hard surface 5,000 square feet” treatment threshold 📌 ⚡
- **Updated** On-site List (22.805.070.D.4) ⚡





## 22.805.070.D.4 – On-Site List for Roadway projects

Category	BMPs	Projects Discharging to a Receiving Water Not Designated by Section 22.801.050, or its Basin	Projects Discharging to a Public Combined Sewer or Capacity-constrained System, <sup>g</sup> or its Basin	Projects Discharging to a Designated Receiving Water or its Basin
1	Full Dispersion	S	S	S
2	1 Rain Gardens <u>with tree</u> <sup>h</sup>	S <sup>a</sup>	S <sup>a</sup>	S <sup>a</sup>
	Infiltrating Bioretention <u>with tree</u> <sup>h</sup>	S	S <sup>b</sup>	S <sup>b, c</sup>
	<u>Infiltrating Structural Bioretention with tree</u> <sup>h</sup>	X 2	X	X
	Permeable Pavement Facilities	X <sup>d</sup>	X <sup>e, f</sup>	X <sup>c, e, f</sup>
	3 Permeable Pavement Surfaces <sup>i</sup>	S <sup>d</sup>	S <sup>e, f</sup>	X <sup>c, e, f</sup>
	Sidewalk/Trail Compost-Amended Strip <sup>i</sup>	S <sup>e</sup>	S <sup>e</sup>	S <sup>e</sup>
3	Sheet Flow Dispersion	S	S	S
	Concentrated Flow Dispersion	S	S	S
4	Trees	S	S	S
	<u>Non-Infiltrating Structural Soil Cell with tree</u> <sup>h</sup>	X 2	X	X



# Key Stormwater Code Updates - 22.805.080

## 22.805.080 – Flow Control

- **Added** that in addition to OSM BMPs, all infiltrating BMPs (e.g., Infiltration Basins) must be used to the maximum extent feasible to meet flow control requirements
- **Updated** Wetland Protection – Method 2 to allowed greater flexibility in matching volume percentages during October-December months 📌
- **Added** requirements if the Wetland Protection Standard cannot be fully met due to the implementation of required on-site stormwater management, water quality, or other Flow Control BMPs ⚡
- **Clarified** that discharges “from the project site” must meet the required flow control standard



# Key Stormwater Code Updates - 22.805.090

## 22.805.090 – Treatment

- **Added** that in addition to OSM BMPs, all infiltrating BMPs (e.g., Infiltration Basins) must be used to the maximum extent feasible to meet water quality treatment requirements.
- **Revised** terminology from “Enhanced” to “Metals” Treatment 
- **Updated** Metals Treatment thresholds 
  - Lowered AADT threshold for roadways
  - Included roadways that provide on-street parking for commercial and industrial areas
  - Added sites that are subject to “industrial activities”
- **Added** exception to metals treatment requirement for landscaped areas 

# Key Stormwater Code Updates - 22.807

## 22.807 – Drainage Control Review and Application Requirements

- **Removed** exemption for drainage review for projects in City owned right-of-way.
- **Lowered** the threshold requiring a Comprehensive Drainage Review to 10,000 square feet of land-disturbing activity
- **Clarified** demolition of a building with roof area of 5,000 square feet or greater requiring a Comprehensive Drainage Review [not Standard Drainage Review] ⚡
- **Edited** text related to applying thresholds for subdivision and short plats in addition to closely related projects including common plans of development or sale 📌 ⚡
- **Clarified** under Inspection and Maintenance Schedule, revised reference from “source controls” to “source control facilities” ⚡
- **Clarified** when a licensed civil engineer must prepare a drainage control plan.

# Key Stormwater Manual Changes

# Key Stormwater Manual Changes

## Overview

- Volume 1 – Project Minimum Requirements
- Volume 2 – Construction Stormwater Control
- Volume 3 – Project Stormwater Control
- Volume 4 – Source Control
- Volume 5 – Enforcement
- Appendices

# Key Stormwater Manual Changes - Volume 1

## Volume 1 – Project Minimum Requirements

### Global / Organizational Changes

- Stormwater Code text will be added to the final manual
- Moved Utility, Pavement Maintenance Projects, Remediation, Retrofit, WSDOT and Special Circumstances Projects moved from Chapter 4, to Chapter 2, Section 2.2 – Identify Project Type
- Deleted Single-family residential project sections ⚡
- Moved Parcel-based project from Section 2.2.5 to Section 2.2.1 ⚡
- Moved Common Plan of Development or Sale under Closely Related Projects Section 2.1.2 ⚡
- Moved Closely Related Projects criteria to Stormwater Code ⚡
- Moved Chapter 7: Site Assessment and Planning to Section 2.4 ⚡
- Moved Chapter 8: Drainage Control Review and Application Requirements to a new Section 2.8 ⚡



# Key Stormwater Manual Changes – V1, Ch 2

(page 1 of 3)

## Volume 1 – Project Minimum Requirements

### Chapter 2 – Determining Minimum Requirements

- **Deleted** Section 2.1.2 Common Plan of Development or Sale section and added reference under the original Section 2.1.2 - Closely Related Projects 📌 ⚡
- **Moved** criteria for Closely-Related Projects (Section 2.1.2) to Stormwater Code 📌 ⚡
- **Deleted** ~~Single-family residential project type (Section 2.2.1)~~ ⚡

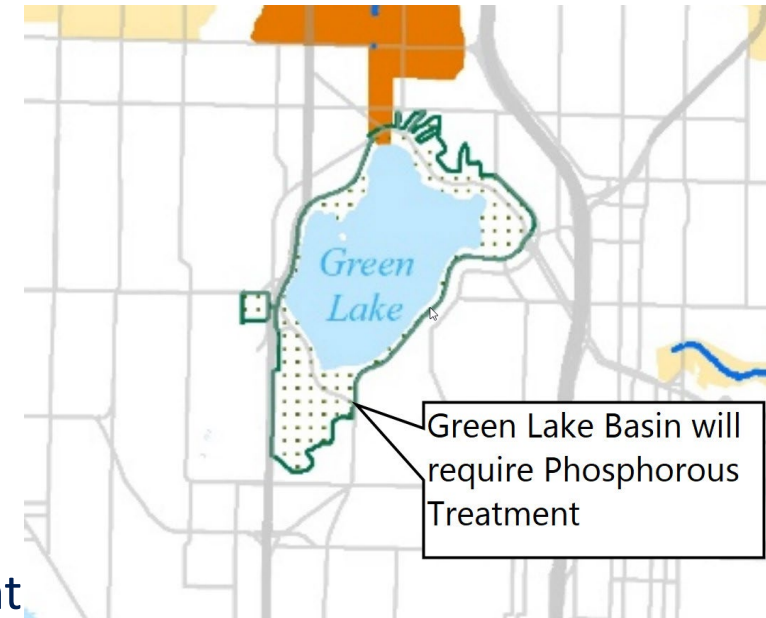
# Key Stormwater Manual Changes – V1, Ch 2

(page 2 of 3)

## Volume 1 – Project Minimum Requirements

### Chapter 2 – Determining Minimum Requirements

- **Added** “rail” and “light rail” projects to list of complex projects.
- **Added** ADA Improvements triggered by Utility or Pavement Maintenance Projects are included within the limits of the exempt project (Section 2.2.5 and 2.2.6)
- **Added** Green Lake Basin as a Nutrient-critical Receiving Waters in Seattle (Section 2.3) 📌 ⚡
- **Emphasized** need to evaluate and plan for Temporary and Permanent Dewatering and Contamination (Section 2.4)



# Key Stormwater Manual Changes – V1, Ch 2

(page 3 of 3)

## Volume 1 – Project Minimum Requirements



### Chapter 2 – Determining Minimum Requirements

- **New** Section 2.5.1 that clarifies how to determine thresholds for Underdrained Sports Fields (3/4-acre pollution-generating pervious for WQT, hard surface for all others) 📌
- **New** Section 2.5.2 describes difference between “new” vs. “replaced” hard surfaces 📌
- **New** Section 2.5.3 that clarifies “replaced hard surfaces” for remodels and reconstruction 📌
- **Added** land disturbing activity to examples of special circumstances projects requiring additional evaluation to determine minimum requirements (Section 2.7.1) ⚡
- **Clarified** elements of projects that require Standard Drainage Review (Section 2.8.2) ⚡
- **Revised** Comprehensive Drainage Review threshold for land disturbing activity from 1 acre to 10,000 square feet and projects with no off-site point of discharge (Section 2.8.3)



# Key Stormwater Manual Changes – V1, Ch 3 & Ch4

## Volume 1 – Project Minimum Requirements

### Chapter 3 – Minimum Requirements for All Projects

- **Added** general Wetland Protection guidelines for all wetlands in Section 3.5 
- **Clarified** what is meant by dispersing runoff into a wetland 

### Chapter 4 – Minimum Requirements Based On Project Type

- See Code changes
- **Deleted** Single-family Residential project type 
- **Moved** Parcel based Projects from Section 4.4 to Section 4.1 

# Key Stormwater Manual Changes – V1, Ch 5

## Volume 1 – Project Minimum Requirements

### Chapter 5 – Minimum Requirements Standards

- **Reference** to Volume 3 for detention sizing when flow control standard is not feasible due to minimum orifice diameter in Section 5.3
- **Referenced** new, alternative method in the SWWMM for meeting Wetland Flow Control for monthly volumes in the summer months and **added** requirements if the Wetland Protection Standard cannot be fully met (Section 5.3.1) 📌 ⚡
- **Changed** Enhanced Treatment terminology to Metals Treatment (Section 5.4.2.3) 📌
- **Clarified** in Manual that landscape management plan cannot be used for artificial turf fields ⚡
- **Clarified** that Green Lake is the only nutrient critical receiving water in Seattle 📌 ⚡

# Break





# Key Stormwater Manual Changes

## Overview

- ✓ Volume 1 – Project Minimum Requirements
- Volume 2 – Construction Stormwater Control
- Volume 3 – Project Stormwater Control
- Volume 4 – Source Control
- Volume 5 – Enforcement
- Appendices

# Key Stormwater Manual Changes – V2, Ch 1 & Ch 2

## Volume 2 – Construction Stormwater Control

### Chapter 1 - Introduction

- **New** Section 1.3.4 - Upstream Analysis of Runoff Entering a Construction Site

### Chapter 2 – Construction Stormwater Control and Soil Management Plans

- **Revised** thresholds for “small projects” and “large projects”: the “large project” threshold is now 5,000 square feet of new plus replaced hard surface (remains the same) and 10,000 SF of land-disturbing activities (down from 1 acre of land disturbing activity)
- **Changed** required duration of CESCL certification from 3 years to the full duration of the project ⚡

### All BMPs

**References** to BMPs with Ecology approved functionally equivalent BMPs



# Key Stormwater Manual Changes – V2, Ch 4

(page 1 of 2)

## Volume 2 – Construction Stormwater Control

### Chapter 4 – Standards and Specifications for Construction Erosion, Sediment, and Flow Control Practices

- **Clarified** when to use high visibility fencing BMP at edges of ECA non-disturbance zones in Section 4.1.2.5
- **Added** filtration systems and sediment tanks sizing requirements for groundwater discharges in 4.3.8
- **Renamed** section title to include Flow Control Practices to reflect the added Flow Control & Dewatering Practices to the chapter ⚡



# Key Stormwater Manual Changes – V2, Ch 4

(page 2 of 2)

## Volume 2 – Construction Stormwater Control

### Chapter 4 – Standards and Specifications for Construction Erosion, Sediment, and Flow Control Practices

- **Clarified** when to use the 10-year storm/recurrence interval for sediment trap sizing (BMP E3.40) ⚡
- **Clarified** requirements for portable sediment tanks (BMP E3.50) ⚡
- **Added** Section 4.4.1 Temporary Flow Control During Construction (BMP E4.10) ⚡
  - Match existing condition duration from  $\frac{1}{2}$  of the 2-year to the 10-year
- **Moved** Temporary Groundwater Dewatering BMP to Section 4.4.2 (BMP E4.20) ⚡



# Key Stormwater Manual Changes – V2, Ch 5

(page 1 of 2)

## Volume 2 – Construction Stormwater Control

### Chapter 5 – Source Control & Monitoring Practices for Construction Pollutants Other than Sediment

- **Added** Section 5.2 Monitoring Practices with the turbidity and pH monitoring requirements ⚡
- **Added** clarifications in Demolition of Buildings Section 5.1.3 for:
  - Providing drain inlets covers during the work day ⚡
  - Stabilizing contaminated soils ⚡
  - Post demolition considerations





# Key Stormwater Manual Changes – V2, Ch 5

(page 2 of 2)

## Volume 2 – Construction Stormwater Control

### Chapter 5 – Source Control & Monitoring Practices for Construction Pollutants Other than Sediment

- Added considerations for PCBs for the following BMPs: 📌
  - Demolition of buildings (Section 5.1.3)
  - Building repair, remodeling, and construction (Section 5.1.4)
  - Solid waste handling and disposal (Section 5.1.7)
  - Disposal of asbestos and PCBs (Section 5.1.8)



# Key Stormwater Manual Changes – V3, Ch 3

## Volume 3 – Project Stormwater Control

### Chapter 3 – BMP Selection and Sizing Approach

- **Revised** setbacks from septic system components to Dispersion or Infiltration facilities (Sections 3.1 and 3.2)
- **Clarified/Revised** minimum measured infiltration rates required to use infiltration BMPs (Section 3.2)
- **Added** requirement to evaluate all infiltration options, in addition to On-site BMPs, before choosing traditional flow control BMPs (Section 3.4)
- **Added** allowance that Infiltrating Bioretention (without underdrain) using the default Bioretention Soil Mix may be used where Phosphorous Treatment is required if it is at least ¼ mile from the phosphorus limited water bodies. Otherwise, the High Performance Bioretention Soil Mix and polishing layer would be required to meet Phosphorous Treatment (Section 3.5) ⚡





# Key Stormwater Manual Changes – V3, Ch 4

## Volume 3 – Project Stormwater Control

### Chapter 4 – General Design Requirements

- **Renamed** the Seattle 158-year Design Precipitation Time Series to “Seattle Extended Precipitation Time Series (SEPTS-99)” (Section 4.1) ⚡
- **Clarified** design criteria for presettling (Section 4.4) ⚡
- **Added** Green Lake as the only nutrient-critical receiving water determined to be impaired due to phosphorus contributed by stormwater (Section 4.4) ⚡
- **Clarified** requirements for small projects with no off-site point of discharge (Section 4.3.2)
- **Clarified** performance goals when modeling infiltrating BMPs (Section 4.5.1)
- **Clarified** 24-hour bioretention drawdown time requirements for water quality design treatment volume (Section 4.5.1) ⚡
- **Added** considerations when infiltrating footing drains (Section 4.5.1)



# Key Stormwater Manual Changes – V3, Ch 5, Section 5.2

## Volume 3 – Project Stormwater Control

### Chapter 5 – BMP Design

- **Section 5.2 - Tree Planting and Protection**


- **Changed** to use Green Factor Tree List rather than SDOT Tree List for parcels ⚡
- **Added** reference to SDOT Approved Street Tree List for ROW ⚡
- **New** way to calculate existing tree canopy (only for determining drainage control benefit)
- **New** tree spacing requirements ⚡
- **New** soil volume requirements for trees in planters ⚡
- **Added** tree protection requirements in Minimum Construction Requirements
- **Added** maintenance/establishment requirements



# Key Stormwater Manual Changes – V3, Ch 5, Sections 5.3

## Volume 3 – Project Stormwater Control

### Chapter 5 – BMP Design

- **Section 5.3 – Dispersion BMPs**
  - **Clarified** when short retaining walls can be in the additional 10-foot setback beyond the vegetated flowpath
  - **Clarified** that infiltration testing is not required for Sidewalk/Trail Compost Amended Strips
  - **New** BMP Section 5.3.8: Light Rail Elevated Guideway Dispersion BMP 

# Key Stormwater Manual Changes – V3, Ch 5, Sections 5.4

## Volume 3 – Project Stormwater Control

### Chapter 5 – BMP Design

- **Section 5.4.2 – Infiltration Trenches**

- **Reduced** minimum measured infiltration rate to 2-inches/hour
- **Added** 3-foot maximum trench vertical depth of aggregate storage reservoir
- **Added** spacing for perforated or slotted pipe (6 feet on-center for trenches that are wider than 8 feet) ⚡

# Key Stormwater Manual Changes – V3, Ch 5, Sections 5.4.4 and 5.8.2 (page 1 of 2)

## Volume 3 – Project Stormwater Control



- **Sections 5.4.4 and 5.8.2 – Infiltrating and Non-Infiltrating Bioretention**
  - **Added** that the Ecology High Performance Bioretention Soil Mix (HPBSM) and polishing layer may be used 📌
  - **Removed** requirements for multiple cells in single bioretention facility
  - **Revised** flow entrance requirements and reduced pre-settling requirements
  - **Added** minimum length of 4 feet when underdrains are used
  - **Changed** the standard bioretention soil mix to 70/30 mix (less compost)
  - **Added** infeasibility for deep, vertical walled bioretention (not required if deeper than 22-inches) and referenced handrail requirements from other codes ⚡

# Key Stormwater Manual Changes – V3, Ch 5, Sections 5.4.4 and 5.8.2 (page 2 of 2)

## Volume 3 – Project Stormwater Control



- **Sections 5.4.4 and 5.8.2 – Infiltrating and Non-Infiltrating Bioretention**
  - **Added** back Pre-sized Peak Flow Control sizing for Non-infiltrating Bioretention for capacity-constrained basins (not applicable in combined sewer basins) ⚡
  - **Revised** the Non-infiltrating Bioretention Pre-sized On-site Stormwater Management (OSM) sizing ⚡
  - **Added** Planter Box Material section for construction materials ⚡
  - **Clarified** Water Quality Treatment facility design requirement to filter 91 percent of the total runoff volume through the bioretention soil ⚡
  - **Added** sizing factors for 2-inch ponding depth for infiltrating and non-infiltrating bioretention with vertical sides ⚡
  - **Added** new figure for Infiltrating Bioretention with a tree in the ponding area ⚡

# Key Stormwater Manual Changes – V3, Ch 5, Section 5.4.6

## Volume 3 – Project Stormwater Control

- **Sections 5.4.6 – Permeable Pavement Facilities**
  - **Added** design criteria for BMPs Equivalent to Permeable Pavement Facilities (e.g. similar infiltration facilities under landscaping)
  - **Clarified** minimum measured infiltration rates (0.3 inches/hour for pre-sized OSM, FC, and WQ - may be lower for modeled BMPs if a Pilot Infiltration Test is used and draw-down time is less than 48-hours)
  - **Clarified** sizing: run-on ratios of 5:1 (or 2:1 if pollution-generating hard surface) must be met even if modeled or other pre-sized factors are used ⚡
  - **Clarified** how run-on should be directed to the facility in a distributed manner via dispersed surface flows or through a pipe can catch basin ⚡



# Key Stormwater Manual Changes – V3, Ch 5, Sections 5.4.10 and 5.8.12

## Volume 3 – Project Stormwater Control

- **New** BMP Sections 5.4.10 and 5.8.12:  
**Infiltrating and Non-infiltrating Soil Cell Bioretention**
  - “Bioretention” in products like Silva Cells, StrataCell, RootSpace under pavement ⚡

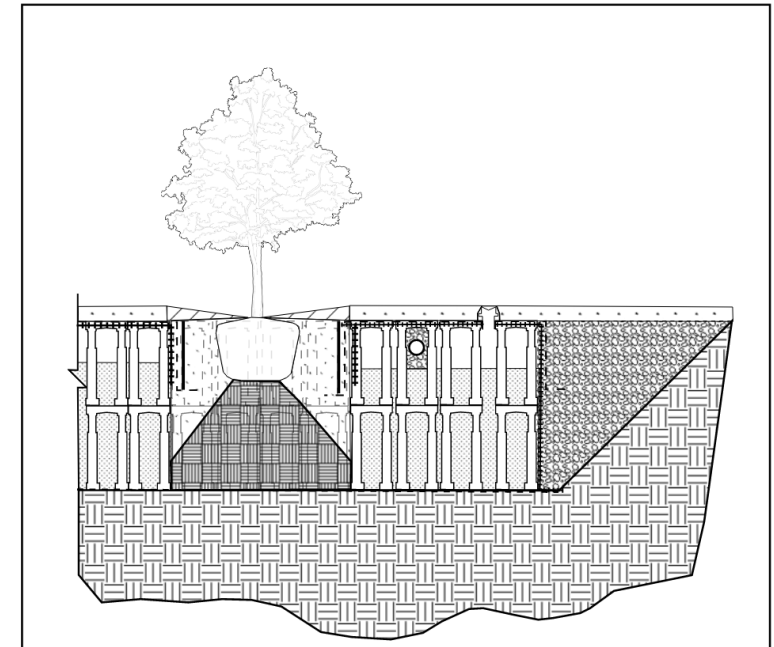


Figure 5.23. Infiltrating Structural Soil Cell BMP without Underdrain.

# Key Stormwater Manual Changes – V3, Ch 5, Sections 5.5.2 and 5.6.2

## Volume 3 – Project Stormwater Control

- **Section 5.5.2 – Residential Cisterns**
  - **Name changed** from “Single Family Residential Cistern” changed to “Residential Cistern”
  - **Allowed** in more residential zones (NR, RSL, LR)
- **Section 5.6.2: Permeable Pavement Surfaces (PPS)**
  - **Clarified** that there is no minimum measured infiltration rate when used only for OSM list approach
  - **Clarified** the minimum measured infiltration rate (0.3 inches/hour for pre-sized FC and WQ credits - may be lower for modeled PPS if a Pilot Infiltration Test is used and draw-down time is less than 48-hr)



# Key Stormwater Manual Changes – V3, Ch 5, Section 5.7.2 (page 1 of 2)

## Volume 3 – Project Stormwater Control

- **Section 5.7.2: Detention Pipes**
  - **Reorganized** some Design Criteria subsections
  - **Added** reference to minimum orifice diameter
  - **Clarified** venting to MH is only required on upstream end
  - **Reduced** spacing for personnel access points along pipe runs to 350 feet
  - **Clarified** observation/maintenance port requirements for private property detention pipes (12-inch diameter w/ spacing at 100 feet min.)
  - **Clarified** flexibility to use access risers in lieu of maintenance holes at the ends of manifolded systems ⚡

# Key Stormwater Manual Changes – V3, Ch 5, Section 5.7.2 (page 2 of 2)

## Volume 3 – Project Stormwater Control

- **Section 5.7.2: Detention Pipes**
  - **Clarified** that the pre-sized equations are not applicable for detention pipes in the ROW
  - **Corrected** pre-sized factor for Pre-developed Pasture Standard using 36-inch diameter pipe (from 2021 Clarification List)

# Key Stormwater Manual Changes – V3, Ch 5, Section 5.8.10

## Volume 3 – Project Stormwater Control

- **Section 5.8.10: Oil/Water Separators**
  - **Clarified** parameters for offline oil rise equation
  - **Clarified** sizing of the forebay in the figures  
(20 square feet area per 10,000 square feet tributary area)

# Key Stormwater Manual Changes – V3, Ch 5, Section 5.8.11

## Volume 3 – Project Stormwater Control

- **Section 5.8.11: Proprietary and Emerging Water Quality Treatment Technologies**
  - **Added** that Mass Loading Ratios are not required for BMPs that only treat under-drained sports fields (if underdrains are surrounded by gravel)
  - **Added** that Mass Loading Ratios are not required for Filterra systems when used solely for Oil Control with treatment rate of 50-inches/hour
  - **Updated** list of approved proprietary and emerging water quality treatment technology and Mass Loading Ratio applicability ⚡
  - **Updated** site considerations to reflect approved proprietary technologies ⚡
  - **Clarified** that proprietary technologies should be sized for the off-line WQ Flowrate (or 2-year flowrate if downstream of detention) ⚡

# Key Stormwater Manual Changes – V4

(page 1 of 6)

## Volume 4 – Source Control

- **Summary of Changes**
  - **Based on Permit requirement/equivalency:**
    - **New background info:** PFAS, 6PPD-q, PAHs, PCBs 📌
    - **One new BMP:** BMP 56 - Light Rail Washing 📌
    - **PCB-specific updates:** Multiple BMPs updated to protect drainage system from PCB-containing buildings 📌
    - **Other edits:** For consistency with Ecology's language 📌 ⚡
  - **Based on inspector experience:**
    - **Clarifications/updates:** Most BMPs, particularly BMPs 1-8 (apply to all real property) 📌 ⚡
    - **"Additional information" section:** For some BMPs to support effective implementation ⚡





# Key Stormwater Manual Changes – V4

(page 2 of 6)

## Volume 4 – Source Control (cont.)



- **Proper Storage of Solid Wastes (BMP 4)**
  - Used cooking oil: Responsibilities of UCO generators vs. container owner; UCO not within 5 ft of grated lid/cover 📌 ⚡
  - Dumpsters: Rules for draining to sanitary vs. storm; roof/canopy when >200 sq ft goes to sanitary sewer 📌 ⚡
- **Cleaning or Washing (BMP 17)**
  - Potable water, parking lots and woonerfs, graffiti, artificial turf, buildings 📌 ⚡
- **Pet/animal areas:**
  - Constructed Dog Runs (BMP 8) – broadened to include at-grade dog runs 📌
  - Commercial Animal Care and Handling (BMP 32) – disinfectants, covers, manure storage 📌 ⚡

# Key Stormwater Manual Changes – V4

(page 3 of 6)

## Volume 4 – Source Control (cont.)

- **Storage-related**
  - Storage of Leachable Erodible Materials (BMP 26) – stockpiles paved, covered *and bermed* 📌 ⚡
  - Portable container storage (BMP 28) – secondary containment *required* for containers of hazardous/dangerous material/wastes and liquids (moved from recommended) 📌
- **Dechlorination and/or debromination**
  - Potable Water Line Flushing (BMP 41) 📌
  - Cleaning/maintenance of pools, spas, hot tubs, fountains (BMP 35) 📌



Source: Pollardwater

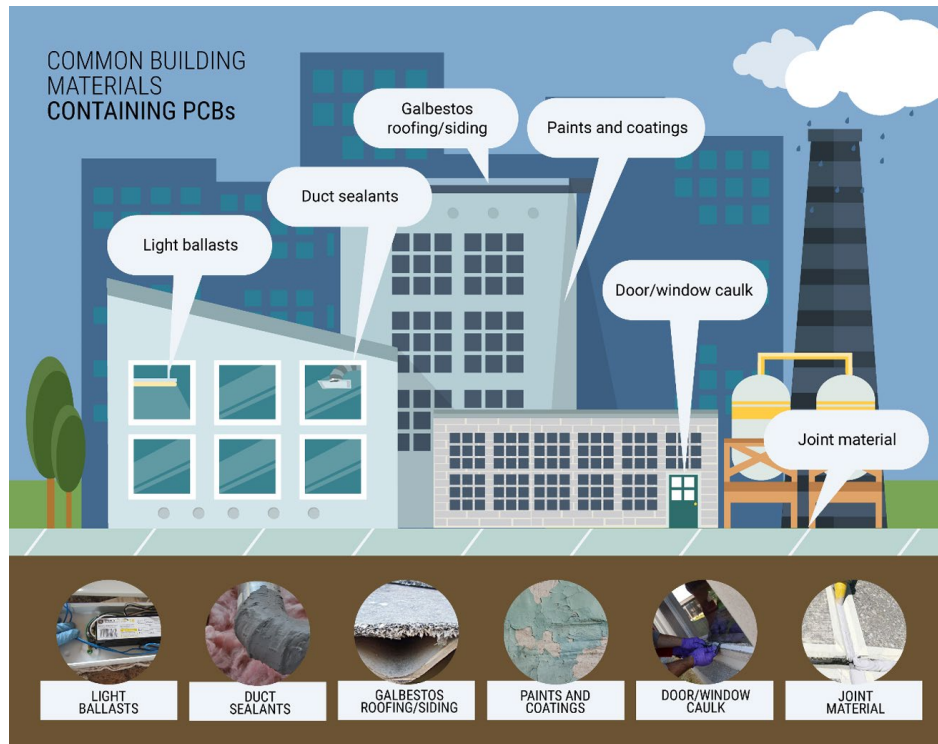
# Key Stormwater Manual Changes – V4

(page 4 of 6)

## Volume 4 – Source Control (cont.)

- **PCB related**











1. Cleaning or Washing (BMP 17) 📌 ⚡
  2. Maintenance and Mgmt of Roofs/Building Surfaces at Industrial/Commercial Buildings (BMP 37) 📌
- Commercial, industrial, institutional, multi-unit residential buildings built/renovated 1950-1980 must be assessed for PCBs before washing building exterior
    - If suspected or confirmed PCBs, no washwater can enter drainage system (must collect) 📌
    - City assumes buildings are suspected of containing PCBs unless wood-framed, single-family, or **data confirms no PCBs** on exterior ⚡
    - Report PCB buildings to SPU 📌



# Key Stormwater Manual Changes – V4

(page 5 of 6)

## Volume 4 – Source Control (cont.)












- **All real property – minor updates to:**
  - Eliminate Illicit Connections and Illicit Discharges (BMP 1)  
  - Perform Routine Maintenance (BMP 2)  
  - Dispose of Fluids and Wastes Properly (BMP 3)  
  - Spill Prevention and Cleanup (BMP 5) – spill kit contents, post-emergency firefighting activities 
  - Provide Oversight and Training for Staff (BMP 6) – PCB buildings 
  - Property Maintenance (BMP 7) – spot cleaning, water conservation  

# Key Stormwater Manual Changes – V4

(page 6 of 6)

## Volume 4 – Source Control (cont.)

- **Sites with specific activities – minor updates to:**

- Fueling at Dedicated Stations (BMP 9) – OWS sizing, notifications  
- Maintenance and Repair of Vehicles and Equipment (BMP 12)  
- Concrete Pouring, Concrete/Asphalt Cutting, Asphalt Application (BMP 14)  
- Recycling Wrecking Yard and Scrap Yard Operations (BMP 15) – incoming material inspection  
- Painting, Finishing, and Coating Activities (BMP 23)  
- Commercial Printing Operations (BMP 24) 

# Key Stormwater Manual Changes – Appendices A & B

## Appendices

- **Appendix A** – Definitions
  - Placeholder (refer to Code for definitions)
- **Appendix B** – Additional Submittal Requirements
  - **Clarified** how to calculate new plus replaced hard surface when the Seattle Zoning Code does not include a maximum lot coverage (of structures) and when existing improvements are proposed to be retained

# Key Stormwater Manual Changes – Appendix C

(Page 1 of 2)

## Appendices

- **Appendix C** – On-site Stormwater Management BMP Infeasibility Criteria
  - **Revised** infeasibility for dispersion and infiltration setbacks from septic systems
  - **New** infeasibility for infiltration where siting may threaten existing or proposed building or structures
  - **Added** infeasibility for infiltration based on required investigation in Appendix D (Groundwater Mounding or Characterization of Receptor analysis, or vertical setbacks to hydraulically restricted layers)
  - **New** infeasibility for depth of vertical walled bioretention ⚡
  - **Added** Infeasibility criteria for new infiltrating and non-infiltrating structural soil cells BMP
  - **Updated** minimum tree size requirements ⚡
  - **Updated** On-site List Infeasibility Criteria tables to reflect criteria that was in Parcel-based Project list but not in Appendix C ⚡



# Key Stormwater Manual Changes – Appendix C

(Page 2 of 2)

## Appendices

- **Appendix C** (cont.) – On-site Stormwater Management **BMP** Infeasibility Criteria
  - **Clarified** bottom slope requirements for rain gardens and infiltrating bioretention ⚡
  - **Added** infeasibility criteria for rain garden and infiltrating bioretention located within ¼ mile of nutrient-critical water body ⚡
  - **Added** that permeable pavement can be considered infeasible for stairs ⚡
  - **Added** reference to Green Factor Tree List and SDOT's Approved Street Tree list for determine if medium or large tree is infeasible ⚡
  - **Added** that permeable pavement can be considered infeasible for stairs ⚡
  - **Added** infeasibility criteria for Soil Cell Bioretention ⚡

# Key Stormwater Manual Changes – Appendices D & E

## Appendices

- **Appendix D** – Subsurface Characterization and Infiltration Testing for Infiltration Facilities
  - No change
- **Appendix E** – Additional Stormwater Design Requirements ~~and Plant Lists~~
  - **Clarified** the minimum allowable weir length is 0.5 inches
  - **Moved** plant list to Appendix J
  - **Updated** Table E.1 to clarify calculations of temporary and permanent level spreaders ⚡
  - **Added** new figures for Presettling
    - E.9. "Fat Pipe" Presettling BMP ⚡
    - E.10. Catch Basin/Maintenance Hole with an Extended Sump and a Baffle ⚡

# Key Stormwater Manual Changes – Appendices F & G

## Appendices

- **Appendix F** – Hydrologic Analysis and Design
  - **Added** saturated soils to wetland rows in continuous modeling tables since wetlands can be modeled as saturated soils.
  - **Updated** the step-by-step procedures for using older versions of MGSFlood when evaluating on-site BMP performance standards (MGS Flood now has an “SPU Pasture Duration Standard Match” option for LID Duration)
- **Appendix G** – Stormwater Control Operations and Maintenance Requirements
  - **Minor updates** including maintaining visibility of MH covers/accesses, preventing tall grass from impeding swale performance, preventing damage to open-celled paving grids when aerating ⚡

# Key Stormwater Manual Changes – Appendices H, I, & J

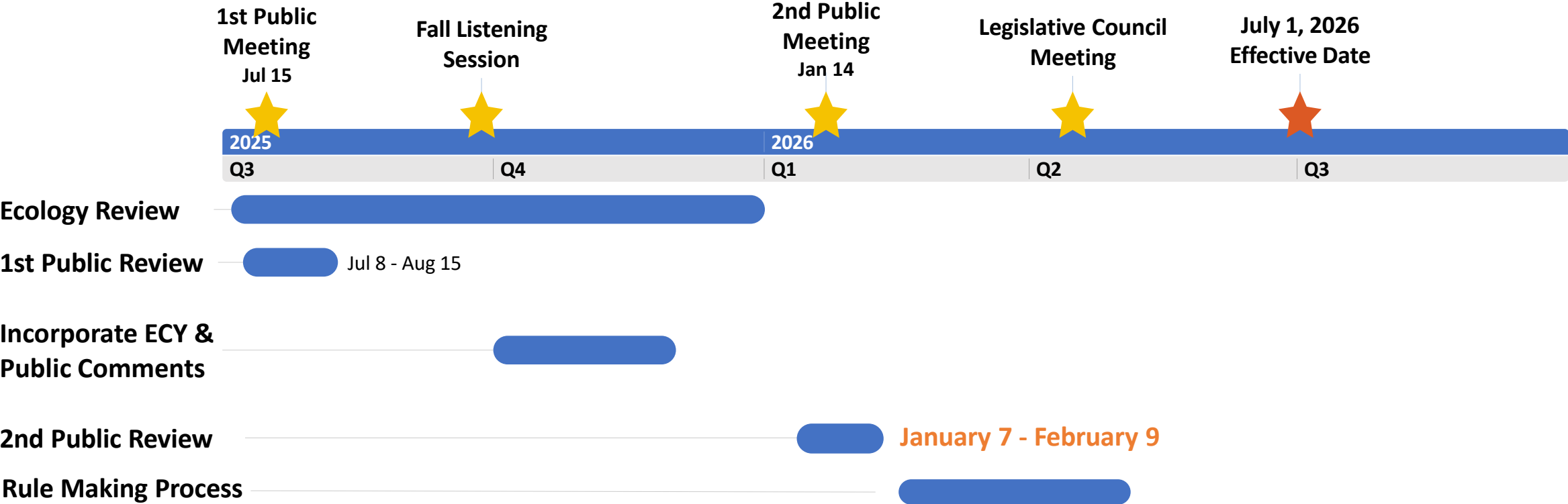
## Appendices

- **Appendix H** – Financial Feasibility Documentation for Vegetated Roofs and Rainwater Harvesting
  - No Change
- **Appendix I** – Landscape Management Plans and Integrated Pest Management Plans
  - No Change
- **Appendix J** – Plant and Tree Lists (moved from Appendix E)
  - Added references to Volume 3 minimum tree requirements for stormwater management ⚡
  - Added reference to Green Factor and SDOT approved plant lists ⚡

# Opportunities to Participate



# Public Input Schedule - Recap



# How to Comment

- Second Public Comment Period is from **January 7<sup>th</sup> through February 9<sup>th</sup>**
  - Comments received after this date will still be considered
- How to Comment:
  1. For detailed comments, use the [Comment Log spreadsheet](#) (Excel format) and e-mail to: [SPUStormwaterCodeRev@seattle.gov](mailto:SPUStormwaterCodeRev@seattle.gov)
  2. For general comments, email [SPUStormwaterCodeRev@seattle.gov](mailto:SPUStormwaterCodeRev@seattle.gov)
  3. Written comments can be mailed to address on [Get Involved](#) webpage
- See [Get Involved](#) webpage for full details



# Q & A

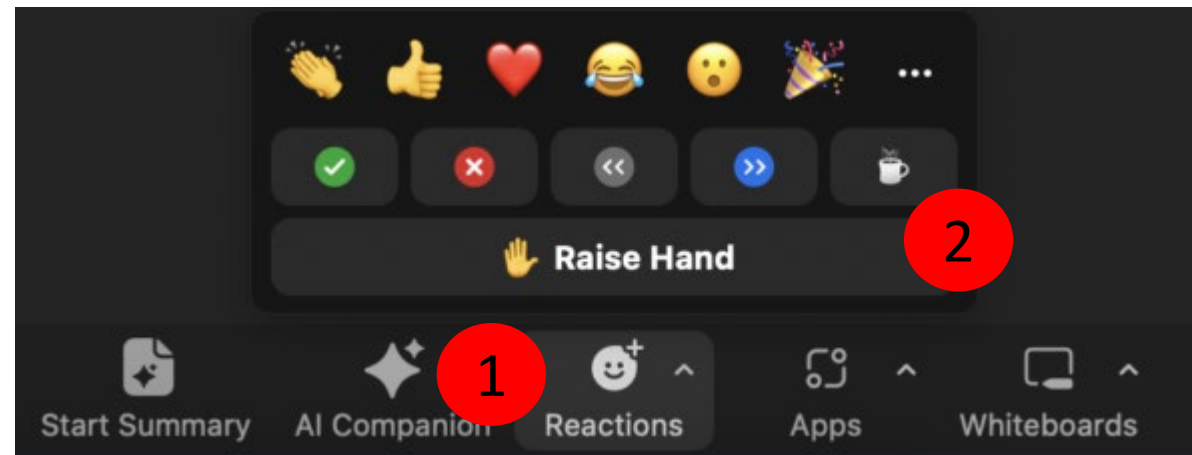


# Q & A



**REMINDER:** Use the **chat** or **hand raise function** to submit questions and comments and/or request to speak to the group.

The **Raise Hand** option is located under the **Reactions** button in the Zoom toolbar.



# Participation Opportunities

- Provide comments on 2<sup>nd</sup> public draft January 7<sup>th</sup> through February 9<sup>th</sup>
- Participate in Spring 2026 Rule Making Process
- Stay tuned for updates sent through the listserv:  
[SDCI Stormwater Code Updates Listserv](#)

# THANK YOU

Sherell Ehlers, PE  
Stormwater Policy Advisor  
SPU

[Sherell.Ehlers@Seattle.gov](mailto:Sherell.Ehlers@Seattle.gov)  
206-386-4576

Matthew Bateman, PE  
Senior Civil Engineer  
SDCI  
[matthew.bateman@seattle.gov](mailto:matthew.bateman@seattle.gov)  
206-615-1229

