

Section 3: General LID information and training resources

This section is intended for use by municipal staff, developers, and technical consultants. It provides relevant training opportunities, certifications, and other LID resources for local governments and developers and includes the following elements:

- [Stormwater requirements matrix:](#)
 - Resource for city and county stormwater requirements in western Washington
 - Links to relevant city and county stormwater and surface water codes
 - Links to relevant jurisdiction-specific addendums, manuals, and engineering standards
- [Western Washington incentives matrix:](#)
 - Showcases the variety of incentives jurisdictions across western Washington offer to encourage developers, property owners, and engineers to implement LID BMPs
- [General information and LID code:](#)
 - General information on LID and stormwater management
 - Technical assistance for jurisdictions on LID code integration
 - Technical manuals for developers and planners on LID implementation
- [LID vendors, costs, and financing:](#)
 - Directory of LID vendors and contractors
 - BMP cost estimates
 - Tools for financing
- [Certifications:](#)
 - Training, certification, and technical assistance resources for developers, civil engineers, geotechnical engineers, landscape designers, planners, and architects

More information and resources

[General information and resources](#)

[Certifications](#)

[LID Code](#)

[LID vendors, costs and financing](#)

[Stormwater requirements matrix](#)

[Western Washington incentive matrix](#)

LID information and resources

Relying on technical consultants

As noted in the Social Marketing Report, developers rely heavily on their civil engineers, geotechnical engineers, landscape designers, and architects to be knowledgeable regarding local stormwater code requirements and best practices. Developers specifically stated that the civil engineer is the person they turn to when making stormwater management decisions. This reliance does not eliminate the other specialists' roles or their need for education; rather it points out which partner the developers appear to rely on most. To be effective in encouraging developers to go "above and beyond" the current stormwater code requirements, jurisdictions should encourage contracting with technical consultants to offer "above and beyond" options and highlight the benefits they will bring to the developer. Jurisdictions can offer training resources or refer to some of the resources listed below.

This section responds to the identified need for technical assistance resources and additional training opportunities for technical consultants.

General information

[Stormwater Management Manual for Western Washington \(SWMMWW\)](#)

A technical manual that provides guidance on the measures necessary to control stormwater quantity and quality in western Washington. The SWMMWW is referenced in the Municipal Stormwater General Permits, so western Washington municipalities covered by the permit are required to adopt the SWMMWW or an equivalent manual to set requirements for new development and redevelopment projects. The SWMMWW is also referenced in the Industrial Stormwater General Permit, the Construction Stormwater General Permit, the Boatyard General Permit, and the Sand and Gravel General Permit. The SWMMWW is used by developers, engineers, and commercial/industrial business owners.

[Low-Impact Development Technical Guidance Manual for Puget Sound](#)

A technical manual targeted to engineers, planners, landscape architects, policy makers, and developers that contains information on site assessment, site planning and layout, and individual BMP design guidelines (e.g., bioretention, permeable pavement, vegetated roofs).

[Rain Garden Handbook for Western Washington](#)

A handbook geared towards homeowners and the general public that describes how to design, install, and maintain a rain garden in western Washington.

[Western Washington LID Operation and Maintenance Guidance Document](#)

A guidance document, targeted to a western Washington municipal audience, that addresses operation and maintenance guidelines to ensure properly functioning LID facilities.

LID design examples

Below are examples of typical LID design details. Designs are not directly applicable across jurisdictions and it is always important to consider site specific conditions.

- City of Edmonds: [SD-600 LID Storm](#)
- City of Renton: [Surface Water Std. Details](#)
- City of Seattle: [Bioretention Standard Details](#)
- City of Tacoma: [Green Stormwater Plans and Typical Details](#)

- LID Technical Guidance Manual: [Bioretention Standard Design Features](#)
- SWMMWW – Volume V: [Example details for LID BMPs](#)

[Interlocking Concrete Pavement Institute \(ICPI\)](#)

Resources for contractors/installers, designers, owners, and policy makers related to concrete paver design and construction.

[Rainwater Interpretive Policy and Rainwater Harvesting Calculator](#)

These tools are provided on the [Washington State Department of Ecology website](#):

- The [rainwater interpretive policy](#) details rainwater collection rules in Washington state.
- The [rainwater harvesting calculator](#) helps users size their rainwater harvesting system based on the typical climate where they live.

[Environmental Protection Agency Green Infrastructure](#)

National resources on building, learning about, and partnering to implement green infrastructure projects.

[Washington Stormwater Center's Resources on LID Planning, Modeling, and Site Design](#)

List of resources that can be used for planning and designing a LID project. Resources include an example LID retrofit plan, LID design manuals from other parts of the country, and case studies.

Sound Impacts

An online portal for all of the region's practitioners and implementers of green infrastructure.

[Greenroads](#)

Provides resources to advance sustainability education and initiatives for transportation infrastructure.

Certifications

LID certifications

[The Online State LID Certificate Program](#)

An online training and certificate program specific to Washington state that covers design and maintenance of LID. Courses span a number of LID topics, including bioretention, permeable pavement, rainwater collection systems, and vegetated roof design and maintenance. The program offers two certificate tracks: LID design and LID operations and maintenance.

[Salmon-Safe](#)

A certification and accreditation for farmers, vineyards, developers, builders, and land managers aimed at encouraging development and management practices that protect and improve watershed health. The program includes a Salmon-Safe developer accreditation in Washington, Oregon, California, and British Columbia.

Green building certifications

[LEED certification](#)

A national green building certification that includes some LID elements, such as rainwater management.

[Evergreen sustainable development standard](#)

A Washington state building performance standard required of all affordable housing projects or programs receiving capital funds from the Housing Trust Fund. The standard encompasses several LID topics, such as surface water management and water reuse.

[Living building challenge certification](#)

A national green building certification that encourages net positive water use for all projects.

[Built Green certification](#)

A regional residential green building certification program of the Master Builders Association of King and Snohomish counties that includes best practices related to site and water management.

[Green Globes certification](#)

A national green building certification that includes LID topics, such as stormwater management and ecological impacts.

[Greenroads certification](#)

The Greenroads Rating System is an easy way to measure and manage sustainability on transportation projects. The rating system is the core publication used in the Greenroads Project Rating Program, which challenges project teams to go above and beyond minimum environmental, social, and economic performance measures and evaluated by an independent, expert, third-party review. Individuals can also become a sustainable transportation professional (STP) and demonstrate their comprehensive understanding of the best practices for green transportation.

Industry certifications

[Interlocking Concrete Pavement Institute \(ICPI\) certification](#)

Guidance on how to become a certified ICPI Concrete Paver Installer. Installers can specialize in residential, commercial, permeable interlocking paver concrete, or sales.

[National Ready Mix Concrete Association](#)

Information on the Pervious Concrete Contractor Certification Program. Three levels of certification are available: technician, installer, and craftsman.

[ecoPRO Sustainable Landscape Professional certification](#)

Certification program for landscape professionals with LID-related topics, including protecting and conserving soils, conserving water, and protecting water and air quality.

[Green Roof Professional Training and Accreditation](#)

Three courses and an accreditation exam that builds competency in green roof design and construction.

[National Green Infrastructure Certification Program](#)

A green infrastructure certification for construction, inspection, and maintenance workers.

LID code

[LID code update and integration training and toolkit](#)

Trainings and resources designed to help western Washington jurisdictions update and revise their codes to require and allow for the use of LID. This resource builds on the information presented in the [Integrating LID into Local Codes guidebook](#).

[Integrating LID into Local Codes](#)

A guidebook for implementing LID effectively and incorporating LID topics into codes, standards, and regulations.

[Nature's Scorecard](#)

Evaluates how well Puget Sound cities and counties are complying with the LID requirements in the National Pollutant Discharge Elimination System (NPDES) municipal stormwater permits by reviewing changes made to municipal codes.

[Association of Washington Cities](#)

Guidance for cities and counties responsible for implementing and explaining LID in their communities.

LID vendors, costs and financing

[Puget Sound stormwater BMP cost database](#)

A summary of cost information and a vendor list for LID projects constructed in the Puget Sound area.

[Washington State Department of Ecology Stormwater Financial Assistance Program](#)

The Department of Ecology's Stormwater Financial Assistance Program (SFAP) funds eligible public stormwater projects—including activities to plan, design and/or construct LID practices in areas of existing development. Jurisdictions can maximize the stormwater benefits associated with public or private development and redevelopment using SFAP for public stormwater facilities that go above and beyond state requirements. Jurisdictions are not eligible for SFAP funding for stormwater facilities that are necessary to comply with state permit requirements for new development and redevelopment, nor can SFAP directly fund private infrastructure.

[International stormwater BMP database](#)

Cost information for a variety of national and international LID projects.

[Washington Stormwater Center's Provider Directory](#)

A list of Washington stormwater-related businesses with contact information.

[RainWise contractors](#)

Provides information on RainWise program eligibility, the rebate process, an approved contractor list, and maintenance.

[Washington Stormwater Center's Funding, Financing, and Foundations list](#)

A guide to funding various green infrastructure projects with links to external resources.

Stormwater requirements matrix

The following matrix is a starting point for locating jurisdiction-specific requirements and materials.

It summarizes which stormwater manual each jurisdiction has adopted and provides a link to the stormwater/surface water code. The matrix also identifies jurisdictions that have established specific thresholds or onsite BMP requirements that are different from Ecology’s requirements and lists additional jurisdiction-specific addendums, manuals, or engineering standards where applicable.

Note: The stormwater manual adoption is sometimes listed in the definitions section within the stormwater/surface water code or as a stand-alone section separate from the definitions section. The references in this matrix may change as municipal code and local documents are updated. If you are designing a project for a specific jurisdiction, you will still need to review the code, manual, addendum (if applicable), and engineering standards (if applicable) in detail.

Jurisdictions Going Above and Beyond

In addition to incentivizing additional LID, jurisdictions can adopt stormwater requirements that go above and beyond Ecology’s requirements. **Jurisdictions with above and beyond requirements are noted with a “Yes” in the city/county specific thresholds column of the matrix.**

City of Bainbridge Island	City of Edmonds
<p>The City of Bainbridge Island’s thresholds for Minimum Requirement #5 are:</p> <ul style="list-style-type: none">• 1,300 square feet (sf) new plus replaced hard surface area (new development)• 800 sf new plus replaced hard surface area (redevelopment) <p>Both thresholds are lower than Ecology’s threshold of 2,000 sf new plus replaced hard surface area (new development and redevelopment), which results in on-site stormwater management requirements for smaller projects.</p>	<p>The City of Edmonds has established a 25% retrofit requirement for existing hard surfaces on a parcel that is being developed.</p> <p>Ecology does not currently have a retrofit requirement for Phase II jurisdictions (only for new development and redevelopment), so this City-specific on-site stormwater management requirement is above and beyond Ecology’s requirements.</p>

Regional Stormwater Manual Key

[Ecology SWMMWW](#): The Washington State Department of Ecology Stormwater Management Manual for Western Washington

[King County SWDM](#): King County Surface Water Design Manual

[Pierce County SSDM](#): Pierce County Stormwater and Site Development Manual

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County- specific thresholds or on- site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Aberdeen	Ecology SWMMWW	Chapter 13.70 Storm and Surface Water Management	No	www.codepublishing.com/WA/Aberdeen	Not applicable
Algona	Ecology SWMMWW	Chapter 13.46 Storm Water Management Regulations and Requirements	No	www.codepublishing.com/WA/Algona	Not applicable
Anacortes	Ecology SWMMWW	Chapter 19.76 Stormwater	No	https://anacortes.municipal.codes	Engineering Standards for Storm Drainage, Chapter 2
Arlington	Ecology SWMMWW	Chapter 13.28 Stormwater Utility	No	https://library.municode.com/wa/arlington/codes/code_of_ordinances	Not applicable
Auburn	Ecology SWMMWW	Chapter 12.04Public Works Construction	No	https://auburn.municipal.codes	City of Auburn Supplemental Manual to the Ecology SWMMWW and Engineering Design Standards
Bainbridge Island	Ecology SWMMWW	Chapter 15.20 Surface and Stormwater Management	Yes	www.codepublishing.com/WA/BainbridgeIsland	City of Bainbridge Island Design and Construction Standards and Specifications

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Battleground	Ecology SWMMWW	Chapter 18.250 Stormwater Control and Drainage	No	www.codepublishing.com/WA/BattleGround	City of Battleground Stormwater Design and Construction Requirements (Section 4)
Bellevue	Ecology SWMMWW	Chapter 24.06 Storm and Surface Water Utility Code	Yes	www.codepublishing.com/WA/Bellevue	Storm and Surface Water Engineering Standards and Surface Water Engineering Details
Bellingham	Ecology SWMMWW	Chapter 15.42 Stormwater Management	Yes	www.codepublishing.com/WA/Bellingham	Packet on Stormwater Permit Submittal Requirements
Black Diamond	Ecology SWMMWW	Chapter 14.04– Stormwater Management and Drainage Design	Yes	www.ci.blackdiamond.wa.us/citycode	Not applicable
Bonney Lake	Pierce County Stormwater Management and Site Development Manual	Chapter 15.13 Stormwater Management	No	www.codepublishing.com/WA/BonneyLake	Not applicable
Bothell	Developed own manual	Title 18 Utilities Infrastructure, Chapter 18.04 Storm Water and Drainage Control Code (Note: Adopted manual can be found in Chapter 18.01)	No	www.codepublishing.com/WA/Bothell	City of Bothell Surface Water Design Manual

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Bremerton	Ecology SWMMWW	Chapter 15.04 Stormwater	No	www.codepublishing.com/WA/Bremerton	City of Bremerton Engineering Design and Construction Standards (Division 4)
Brier	Ecology SWMMWW	Chapter 14.04 Stormwater Management and Regulations	No	www.codepublishing.com/WA/Brier	Not applicable
Buckley	Ecology SWMMWW	Chapter 14.30 Stormwater Management	No	www.codepublishing.com/WA/Buckley	City of Buckley Development Guidelines and Public Works Standards
Burien	King County Surface Water Design Manual	Chapter 13.10.020 Surface Water Management	Yes	www.codepublishing.com/WA/Burien	City of Burien Surface Water Design Manual
Burlington	Ecology SWMMWW	Chapter 14.05 Surface Water Management	No	www.codepublishing.com/WA/Burlington	Not applicable
Camas	Ecology SWMMWW	Chapter 14.02 Stormwater Control	No	https://library.municode.com/wa/camas/codes/code_of_ordinances	City of Camas Stormwater Design Standards Manual
Centralia	Ecology SWMMWW	Chapter 18.15 Adoption of Stormwater Management Documents	No	www.codepublishing.com/WA/Centralia	Not applicable

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Clyde Hill	Ecology SWMMWW	Chapter 15.10 Drainage	No	www.codepublishing.com/WA/ClydeHill	Not applicable
Covington	Ecology SWMMWW	Chapter 13.25 Surface and Stormwater	Yes	www.codepublishing.com/WA/Covington	City of Covington Design and Construction Standards
Des Moines	King County Surface Water Design Manual	Chapter 11.08 Surface Water Management Program	Yes	www.codepublishing.com/WA/DesMoines	Supplemental storm water standards
DuPont	Ecology SWMMWW	Chapter 22.01 Stormwater Management Regulations and Requirements	No	www.codepublishing.com/WA/DuPont	Not applicable
Duvall	King County Surface Water Design Manual	Chapter 9.06 Storm Drainage Utility	No	https://library.municode.com/wa/duvall/codes/code_of_ordinances	Not applicable

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Edgewood	Pierce County Stormwater Management and Site Development Manual	Chapter 13.05 Stormwater Manual – Site Development Regulations	Yes	www.codepublishing.com/WA/Edgewood	Modifications to the Pierce County Manual (PCM)
Edmonds	Ecology SWMMWW	Chapter 18.30 Stormwater Management	Yes	www.codepublishing.com/WA/Edmonds	Edmonds Stormwater Addendum and Edmonds Standard Details
Enumclaw	Ecology SWMMWW	Chapter 14.10 Stormwater Management	No	www.codepublishing.com/WA/Enumclaw	Not applicable
Everett	Ecology SWMMWW	Chapter 14.28 Surface and Storm Drainage	No	www.codepublishing.com/WA/Everett	City of Everett Design and Construction Standards
Federal Way	King County Surface Water Design Manual	Title 16 Surface Water Management	No	www.codepublishing.com/WA/Federal Way	City of Federal Way Addendum to the King County Surface Water Design Manual
Ferndale	Ecology SWMMWW	Chapter 13.34 Stormwater Control	No	www.codepublishing.com/WA/Ferndale	Not applicable
Fife	Ecology SWMMWW	Chapter 15.32 Drainage of Surface Water	No	www.codepublishing.com/WA/Fife	Not applicable
Fircrest	Ecology SWMMWW	Chapter 20.24 Storm Water Management	No	www.codepublishing.com/WA/Fircrest	Not applicable

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Gig Harbor	Developed own manual	Chapter 14.20 Stormwater Management	No	www.codepublishing.com/WA/GigHarbor	City of Gig Harbor Stormwater Management and Site Development Manual
Granite Falls	Ecology SWMMWW	Chapter 13.20 Storm Drainage System	No	www.codepublishing.com/WA/GraniteFalls	Not applicable
Issaquah	Ecology SWMMWW	Chapter 16.26 Clearing, Grading, and Stormwater Management	Yes	www.codepublishing.com/WA/Issaquah	City of Issaquah Stormwater Design Manual Addendum
Kelso	Developed own manual	Chapter 13.09 Stormwater Management	No	www.codepublishing.com/WA/Kelso	City of Kelso Engineering Design Manual
Kenmore	King County Surface Water Design Manual	Title 13 Utilities and Public Works, Division II. Surface and Stormwater Utility	No	www.codepublishing.com/WA/Kenmore	City of Kenmore Surface Water Design Manual Addendum
Kent	King County Surface Water Design Manual	Chapter 7.07 Surface Water and Drainage Code	No	www.codepublishing.com/WA/Kent	City of Kent Surface Water Design Manual
Kirkland	King County Surface Water Design Manual	Chapter 15.52 Storm Water Drainage	Yes	www.codepublishing.com/WA/Kirkland	City of Kirkland Addendum to the 2016 Surface Water Design Manual and Storm Drainage Pre-Approved Plans

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County- specific thresholds or on- site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Lacey	Developed own manual	Chapter 14.27 Stormwater Management	No	www.codepublishing.com/WA/Lacey	City of Lacey Stormwater Design Manual
Lake Forest Park	King County Surface Water Design Manual	Chapter 16.24 Drainage Plans	No	www.codepublishing.com/WA/LakeForestPark	Not applicable
Lake Stevens	Ecology SWMMWW	Chapter 11.06 Stormwater Management	No	www.codepublishing.com/WA/LakeStevens	Not applicable
Lakewood	Ecology SWMMWW	Chapter 12.11 Storm Water Management (Note: Adopted manual can be found in Chapter 12.03)	No	www.codepublishing.com/WA/Lakewood	City of Lakewood Engineering Standards Manual
Longview	Ecology SWMMWW	Chapter 17.80 Stormwater Management	No	www.codepublishing.com/WA/Longview	City of Longview Stormwater Management Guidelines and Standard Plans and Details
Lynden	Ecology SWMMWW	Chapter 13.24 Stormwater Management System	No	https://library.municode.com/wa/lynden/codes/code_of_ordinances	City of Lynden Design and Development Standards
Lynnwood	Ecology SWMMWW	Chapter 13.40 Stormwater Management	Yes	www.codepublishing.com/WA/Lynnwood	City of Lynnwood Supplemental Stormwater Guidelines

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Maple Valley	King County Surface Water Design Manual	Title 13 Surface Water Management	No	www.codepublishing.com/WA/MapleValley	Not applicable
Marysville	Ecology SWMMWW	Chapter 14.15 Controlling Stormwater Runoff from New Development, Redevelopment, and Construction Sites	No	www.codepublishing.com/WA/Marysville	Engineering Design and Development Standards
Medina	Ecology SWMMWW	Chapter 20.43 Land Development Grading and Drainage	No	www.codepublishing.com/WA/Medina	Not applicable
Mercer Island	Ecology SWMMWW	Chapter 15.09 Storm Water Management Program	Yes	www.codepublishing.com/WA/MercerIsland	Not applicable
Mill Creek	Ecology SWMMWW	Chapter 15.14 Surface Water Management Program	No	www.codepublishing.com/WA/MillCreek	City of Mill Creek Standard Specifications and Details
Milton	Ecology SWMMWW	Chapter 13.26 Storm Drainage of Surface Water – Utility, Management and Maintenance	No	www.codepublishing.com/WA/Milton	Not applicable
Monroe	Ecology SWMMWW	Chapter 15.01 Stormwater Management	No	www.codepublishing.com/WA/Monroe	City of Monroe Design and Construction Standards

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County- specific thresholds or on- site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Mountlake Terrace	Ecology SWMMWW	Chapter 16.20 Stormwater	No	www.codepublishing.com/WA/MountlakeTerrace	City of Mountlake Terrace Engineering Standards
Mount Vernon	Ecology SWMMWW	Chapter 13.33 Storm Water Drainage Utility	No	www.codepublishing.com/WA/MountVernon	City of Mount Vernon Engineering Standards
Mukilteo	Ecology SWMMWW	Chapter 13.12 Surface Water Management	No	www.codepublishing.com/WA/Mukilteo	City of Mukilteo Development Standards
Newcastle	King County Surface Water Design Manual	Chapter 13.10 Surface Water Management Code	No	www.codepublishing.com/WA/Newcastle	City of Newcastle Surface Water Design Manual Addendum
Normandy Park	Ecology SWMMWW	Chapter 13.08 Drainage and Water Quality	No	www.codepublishing.com/WA/NormandyPark	Not applicable
Oak Harbor	Ecology SWMMWW	Chapter 12.30 Storm Water Management	No	www.codepublishing.com/WA/OakHarbor	Not applicable
Olympia	Developed own manual	Chapter 13.16 Storm and Surface Water Management	No	www.codepublishing.com/WA/Olympia	City of Olympia Drainage Design and Erosion Control Manual

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Orting	Ecology SWMMWW	Title 9 Water and Sewers, Chapter 5 Stormwater Regulations, Article A Stormwater Management	No	https://codelibrary.amlegal.com/codes/ortingwa/latest/overview	Not applicable
Pacific	King County Surface Water Design Manual	Chapter 24.08 Stormwater Management	No	www.codepublishing.com/WA/Pacific	Not applicable
Port Angeles	Ecology SWMMWW	Chapter 13.63.190 Stormwater – Utility and Regulations	No	https://library.municode.com/wa/port_angeles/codes/code_of_ordinances	City of Port Angeles Urban Services Standards and Guidelines
Port Orchard	Ecology SWMMWW	Chapter 20.150 Stormwater Drainage	Yes	www.codepublishing.com/WA/PortOrchard	City of Port Orchard Public Works Engineering Standards and Specifications
Poulsbo	Ecology SWMMWW	Chapter 12.02 Construction and Development Standards	No	www.codepublishing.com/WA/Poulsbo	City of Poulsbo Construction Standards and Specifications
Puyallup	Ecology SWMMWW	Chapter 21.10 Stormwater Management	No	www.codepublishing.com/WA/Puyallup	City of Puyallup Standards for Public Works Engineering and Construction Manual
Redmond	Ecology SWMMWW	Chapter 15.24 Clearing, Grading, and Stormwater Management	No	www.codepublishing.com/WA/Redmond	City of Redmond Stormwater Technical Notebook

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Renton	Developed own manual	Chapter? 4-6-030 Drainage (Surface Water) Standards	No	www.codepublishing.com/WA/Renton	City of Renton Surface Water Design Manual
Sammamish	King County Surface Water Design Manual	Title 13, Surface Water Management	No	www.codepublishing.com/WA/Sammamish	City of Sammamish Addendum to the 2016 King County SWDM
SeaTac	King County Surface Water Design Manual	Chapter 12.10 Surface and Stormwater Management	No	www.codepublishing.com/WA/SeaTac	City of SeaTac Addendum to the King County SWDM
Seattle	Developed own manual	Title 22 Building and Construction Codes, Subtitle VIII Stormwater Code, Chapter 22.800	Yes	https://library.municode.com/wa/seattle/codes/municipal_code	Seattle Stormwater Manual
Sedro-Woolley	Ecology SWMMWW	Chapter 13.36 Stormwater Management	No	www.codepublishing.com/WA/SedroWoolley	City of Sedro-Woolley Public Works Development Standards
Shelton	Ecology SWMMWW	Chapter 13.02 Stormwater Management	No	www.codepublishing.com/WA/Shelton	City of Shelton Design and Construction Standards

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
Shoreline	Ecology SWMMWW	Chapter 13.10 Surface Water Utility	No	www.codepublishing.com/WA/Shoreline	City of Shoreline Engineering Development Manual
Snohomish	Ecology SWMMWW	Chapter 15.16 Stormwater Management	No	https://snohomish.municipal.codes	City of Snohomish Engineering Design and Construction Standards
Snoqualmie	King County Surface Water Design Manual	Chapter 15.18 Surface Water and Stormwater Management	No	www.codepublishing.com/WA/Snoqualmie	City of Snoqualmie Addendum to the 2016 King County Surface Water Design Manual
Steilacoom	Ecology SWMMWW	Chapter 13.50 Stormwater Management	No	https://townofsteilacoom.org/274/Municipal-Code	Not applicable
Sumner	Ecology SWMMWW	Chapter 13.48 Stormwater Management Regulations	No	www.codepublishing.com/WA/Sumner	City of Sumner Development Specifications and Standard Details
Tacoma	Developed own manual	Chapter 12.08 Wastewater and Surface Water Management – Regulation and Rates	Yes	www.cityoftacoma.org/government/city_departments/CityAttorney/CityClerk/TMC	City of Tacoma Stormwater Management Manual
Tukwila	King County Surface Water Design Manual	Chapter 14.30 Surface Water Management	No	http://records.tukwilawa.gov/WebLink/Browse.aspx	City of Tukwila Infrastructure Design and Construction Standards
Tumwater	Developed own manual	Chapter 13.12 Stormwater System	No	www.codepublishing.com/WA/Tumwater	City of Tumwater Drainage Design and Erosion Control Manual

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
University Place	King County Surface Water Design Manual	Chapter 12.15 Storm Drainage and Surface Water Management (Note: Adopted manual can be found in Chapter 12.10)	No	www.codepublishing.com/WA/UniversityPlace	Not applicable
Vancouver	Ecology SWMMWW	Chapter 14.26 Water Resources Protection	No	https://vancouver.municipal.codes	City of Vancouver, WA General Requirements and Details for the Design and Construction of Water, Sanitary Sewer, and Surface Water Systems
Washougal	Ecology SWMMWW	Chapter 14.32 Stormwater Utility Rates	No	www.codepublishing.com/WA/Washougal	City of Washougal Engineering Standard Details
Woodinville	King County Surface Water Design Manual	Chapter 13.05 Stormwater Runoff and Surface Water and Erosion Control	No	www.codepublishing.com/WA/Woodinville	Not applicable
Clark County	Developed own manual	Chapter 40.386 Stormwater and Erosion Control	No	www.codepublishing.com/WA/ClarkCounty	Clark County Stormwater Manual
Cowlitz County	Developed own manual	Chapter 16.20 Stormwater Management in Rural Areas and Chapter 16.22 Stormwater Management in the Unincorporated Urbanized Area	No	www.codepublishing.com/WA/CowlitzCounty	Cowlitz County Stormwater Drainage Manual

Name	Adopted Manual	Stormwater/ Surface Water Code Reference	City/County-specific thresholds or on-site BMPs?	Weblink to Code	Name of City/ County-specific Addendum or Manual
King County	King County Surface Water Design Manual	Chapter 9.04 Stormwater Runoff and Surface Water and Erosion Control	No	www.kingcounty.gov/council/legislation/kc_code.aspx	King County Surface Water Design Manual
Kitsap County	Developed own manual	Chapter 12.08 Storm Water Drainage	No	www.codepublishing.com/WA/KitsapCounty	Kitsap County Stormwater Design Manual
Pierce County	Pierce County Stormwater Management and Site Development Manual	Title 17A Construction and Infrastructure Regulations – Site Development and Stormwater Drainage	Yes	www.codepublishing.com/WA/PierceCounty	Pierce County Stormwater Management and Site Development Manual
Skagit County	Ecology SWMMWW	Chapter 14.32 Stormwater Management	No	www.codepublishing.com/WA/SkagitCounty	Not applicable
Snohomish County	Developed own manual	Chapter 30.63A Drainage	No	https://snohomish.county.codes	Snohomish County Drainage Manual
Thurston County	Developed own manual	Chapter 15.05 Thurston County Stormwater Standards	Yes	https://library.municode.com/wa/thurston_county/codes/code_of_ordinances	Thurston County Drainage Design and Erosion Control Manual
Whatcom County	Ecology SWMMWW	Title 16 Environment	No	www.codepublishing.com/WA/WhatcomCounty	Whatcom County Development Standards - Chapter 2

Western Washington incentive matrix

The following matrix showcases the variety of incentives that jurisdictions across Western Washington offer to encourage developers, property owners, and engineers to implement LID BMPs. It identifies the type of incentive and eligible development types and provides a short description of the program. Developers and property owners can use the matrix to identify incentives for future projects. Jurisdictions can use the matrix to identify incentive programs that may be suitable for local adoption.

Incentive Type	Eligible Development Type	Jurisdiction/ Organization	Link to Program	Description
Financial	Multi-family residential Commercial	Auburn	Stormwater Rate Reduction	Non-single-family parcels with detention, retention, or water quality treatment facilities are charged a lower stormwater rate than non-single-family parcels without a stormwater facility.
Financial Technical Assistance	Residential	Bellingham	Homeowner Incentive Program	This program connects landowners living in the Lake Whatcom watershed with the technical and financial assistance they need to take action to improve water quality in the lake.
Financial	Commercial Residential	Burien	Neighborhood Matching Fund	The purpose of the neighborhood matching fund is to give residents access to city funds to improve the quality of life in Burien neighborhoods.
Financial	Residential	Everett	Let It Rain Rebate Program	The City of Everett offers up to a \$2,500 rebate to homeowners who volunteer to install an approved rain garden.
Financial	Commercial Residential	King County	GSI Mini Grants	Green Stormwater Infrastructure Mini Grants provide up to \$1,500 for landowners within the King County Wastewater Treatment Division (WTD) service area that are not eligible for other incentive programs. Up to \$4,500 may be provided to income-limited landowners.
Financial	Residential	King County	RainWise	RainWise is a rebate program that helps eligible property owners manage stormwater by installing rain gardens and/or cisterns on private property.

Incentive Type	Eligible Development Type	Jurisdiction/ Organization	Link to Program	Description
Financial	Residential Commercial	King County	RainWise Access Grant	The RainWise Access Grant provides up to an additional \$1,000 for RainWise eligible homeowners and non-profit community organizations (including religious groups) to bridge the gap between rebate amount and actual project costs for income limited and underserved communities.
Financial Technical Assistance	Residential	Kirkland	Yard Smart Rain Rewards	Qualified homes can take advantage of free technical assistance and rebates to install beautiful projects like rain gardens, native landscaping, and cisterns on their property to manage rainwater runoff. The program also includes rebates for disconnecting downspouts and for tree planting.
Financial Technical Assistance	Commercial Residential	Kitsap Conservation District	Kitsap Conservation District Cost Share Program	The Rain Garden and LID Program at KCD works cooperatively with county services, landowners, and local communities to expand knowledge and use of LID practices throughout Kitsap County.
Financial	Residential	Lynnwood	Tree Voucher Program	The Tree Voucher Program provides a coupon that can be used to purchase almost any species of tree and soil amendments from a participating Washington State Landscape and Nursery Association (WSLNA) nursery.
Financial	Commercial Residential	Olympia	Rain Garden Incentive Program	The Storm and Surface Water Utility is offering Olympia property owners the opportunity to apply for up to \$400 reimbursement for plants and/or compost used for the construction of a rain garden
Financial Technical Assistance	Residential	Pierce Conservation District	Pierce Conservation District Cost Share Program	Pierce Conservation District staff work with several homeowners each year to design and install rain gardens on their property.

Incentive Type	Eligible Development Type	Jurisdiction/ Organization	Link to Program	Description
Financial	Commercial Residential	Port Angeles	Stormwater Green Infrastructure Rebates	The City of Port Angeles provides financial assistance to new development or redevelopment projects that result in less than 5000 square feet of new and replaced hard surfaces, and implement two or more of the following: Permeable pavement (\$1 per square foot, up to a maximum of \$1000) Compost amended soils in all disturbed areas not covered by new improvements (voucher for up to 10 yards of compost) Rain gardens (up to \$1000 for materials)
Financial	Commercial Residential	Port Angeles	Rain Garden Retrofit Rebates	The City of Port Angeles provides financial assistance to residents and businesses building rain gardens at their existing home or place of business. Approved applicants can receive a rebate of up to \$1000 for the purchase of materials such as plants, compost, sand, mulch, and rock.
Financial Technical Assistance	Residential	Puyallup	Cost Share Program	Puyallup's Rain Garden Program includes many green stormwater infrastructure elements that help manage stormwater where it falls including permeable pavements, rain barrels, and rain gardens.
Financial	Commercial Residential	Seattle	Stormwater Facility Credit	The Stormwater Facility Credit Program (SFCP) is a credit program for property owners with stormwater systems that help reduce the impact of stormwater on the City's system.
Financial	Commercial Residential	Seattle	RainWise Rebates	RainWise is a rebate program that helps eligible property owners manage stormwater by installing rain gardens and/or cisterns on private property.

Incentive Type	Eligible Development Type	Jurisdiction/ Organization	Link to Program	Description
Financial Technical Assistance	Residential	Seattle	Trees for Neighborhoods program	The Trees for Neighborhoods program provides: Help selecting the right tree and planting location Free trees (up to 4 per household, lifetime max of 6) A watering bag and mulch for each tree Training on proper planting and care Assistance applying for street tree planting permits
Financial	Commercial Residential	Shoreline	Soak It Up Rebate Program	The Surface Water Utility offers rebates up to \$2,000 for Shoreline home or business owners to install a rain garden or native vegetation landscaping on their property.
Financial	Residential	Snohomish Conservation District	Cost Share Program	Qualified properties in Snohomish County and on Camano Island are eligible to receive funding (cost share) from the Snohomish Conservation District.
Financial	Commercial Residential	Tacoma	LID Surface Water Rate Reduction	Property owners may qualify for a surface water rate reduction if they choose to utilize permanent LID BMPs beyond what is required per the Stormwater Management Manual (SWMM) for development or redevelopment or as a retrofit for stormwater management.
Financial Technical Assistance	Residential	Tacoma	Make a Splash Stormwater Project Funding	The City of Tacoma's Environmental Services Department awards up to \$50,000 a year in environmental grants to help educate residents and protect and restore our surface water resources.
Financial	Residential	Tacoma	Tree Coupon Program	Tree coupons are valid for \$30 off each tree purchased, for up to three trees on a residential property, at select local tree retailers. Trees must be woody plants whose height is greater than 15 feet at maturity. Trees may be planted on private property or in right-off-way areas (such as planting strips) abutting private property.

Incentive Type	Eligible Development Type	Jurisdiction/ Organization	Link to Program	Description
Financial	Residential	Thurston County	Storm and Surface Water Utility Rate Credits	The stormwater fee credit program is designed to recognize schools, commercial businesses and other nonresidential property owners whose activities support the County's stormwater management goals by granting these parcel owners up to a 50 % credit on their stormwater rates and charges.
Financial	Residential	Vancouver	Treefund Program	The Treefund Program provides a 50% refund for planting a tree, up to \$50, for up to 5 trees per lot. Existing or new Utility eBilling customers can receive up to \$100 back on their first tree, up to the cost of the tree.

Conclusion

The natural beauty of Washington’s Puget Sound region and its waterways is one of the main draws for people who live, work, and play in our communities. However, continued growth and the increased stormwater runoff that comes with it threaten these natural amenities and the health and beauty of the region. Stormwater runoff from impervious surfaces gathers pollutants before flowing into waterways, contributing to the 14+ million pounds of toxic chemicals that end up in Puget Sound each year (Ecology, [Toxic Chemicals in the Puget Sound](#)).

Jurisdictions and developers can play a key role in ensuring that our communities continue to be beautiful, livable spaces that balance human and ecosystem needs, even as we grow. Working together, we can create a future where:

- LID solutions are normalized and widespread in regional development, filtering and cleaning water, building natural habitat, improving air quality, increasing the beauty of our neighborhoods, and creating community gathering spaces.
- There is clear public demand for LID solutions, and all communities see benefits from LID implementation. LID solutions are promoted, planned, and implemented with an equity lens.
- LID is considered early in the development process, ensuring that developers can maximize their use of BMPs that are low-cost, easy-to-implement and maintain, and add significant social and economic value to meet market demand.

Innovative practices are already being explored in jurisdictions across Washington, as highlighted in the case studies featured throughout the guidebook. By continuing to simplify the design, maintenance, and installation process of LID BMPs—and enhancing developer incentive programs—jurisdictions can move the needle even further on LID “above and beyond” solutions, minimizing pollution from urban stormwater runoff, beautifying our communities, and protecting the quality of Puget Sound’s iconic waterways.

