# **Climate Element**

Goals, Policies, and Implementation Actions

# City of Tumwater 2025 Comprehensive Plan

Balancing Nature and Community: Tumwater's Path to Sustainable Growth



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# Acronyms and Abbreviations Used in Document

**ASD** – Administrative Services Department.

**CBO – Community Based Organization** 

**CCA** – The <u>Climate Commitment Act</u> (CCA) (Chapter 310, Laws of 2021) caps and reduces GHG emissions from Washington's largest emitting sources and industries, allowing businesses to find the most efficient path to lower carbon emissions. This program works alongside other critical climate laws and policies to help Washington achieve its commitment to reducing GHG emissions by 95% by 2050. The CCA also puts environmental justice and equity at the center of climate policy, making sure communities that bear the greatest burdens from air pollution today breathe cleaner, healthier air as the state cuts GHGs. Finally, funds from the auction of emission allowances support new investments in climate-resiliency programs, fund clean transportation, and address health disparities across the state.

**CDD** – Tumwater Community Development Department

City – City of Tumwater

**Commerce** - Washington State Department of Commerce

**County** – Thurston County

**CPAT** – Climate Policy Advisory Team

**DAHP** – Washington State Department of Archaeology and Historic Preservation

**EDC** – Thurston Economic Development Council

**EV** – Electric Vehicle

**EXD** – Tumwater Executive Department

Fire & EMS – Fire and Emergency Medical Services Department.

**FIN** – Tumwater Finance Department

**GHG** – Greenhouse Gas

**LID** – Low Impact Development

PRFD - Tumwater Parks, Recreation, & Facilities Department

**RCW** – Revised Code of Washington

**TCAT –** Thurston Climate Action Team

**TED** – Tumwater Transportation & Engineering Department

TMC - Tumwater Municipal Code

**Tribes** – Nisqually Indian Tribe, Squaxin Island Tribe, and the Confederated Tribes of the Chehalis Reservation

TRPC – Thurston County Regional Planning Council

**UFMP** – Urban Forestry Management Plan

WRS – Tumwater Water Resources & Sustainability Department

**WSDOT** - Washington State Department of Transportation

# **Key Terms and Definitions**

**15-minute neighborhood:** An urban planning concept referring to neighborhoods in cities in which most daily necessities, services, and amenities (e.g., work, education, health care, shopping, recreational opportunities) can be reached by a 15-minute walk, bicycle ride, or public transportation trip. These neighborhoods tend to be relatively walkable and support a greater baseline of residential density.

**Climate:** The "average weather" generally over a period of three decades. Measures of climate include temperature, precipitation, and wind.

**Climate change:** Any significant change in the average climate of a region lasting for decades or longer. Can be measured through substantial changes in temperature, precipitation, or wind. Climate change may result from natural factors and from human activities that change the atmosphere's composition and land surface.

**Climate refugia:** Areas that continue to resist the impacts of anthropogenic climate change, allowing valued and culturally significant physical, ecological, and socio-cultural resources to continue to survive and even thrive amidst a changing landscape.<sup>1</sup>

**Environmental Justice (EJ):** The fair treatment and meaningful involvement of all people regardless of race, color, national origin, or income with respect to environmental laws, rules, and policies (RCW) 70A.02.010(8). Environmental justice includes addressing unfair environmental and health impacts in all laws, rules, and policies by:

- prioritizing vulnerable populations and overburdened communities,
- the equitable distribution of resources and benefits, and
- eliminating harm.

**Food Justice:** Assumes consistent access to nutritious, affordable, and culturally relevant food to be a human right that should be secured and protected.

<sup>&</sup>lt;sup>1</sup> Morelli, T.L.; Millar, C. 2018. Climate Change Refugia. USDA Forest Service Climate Change Resource Center. https://www.fs.usda.gov/ccrc/topics/climate-change-refugia

**Frontline Community<sup>2</sup>:** Those communities that experience the effects of climate change "first and worst" while also having significantly lower capacity to adapt and reduced access to resources and political power to respond to those risks. Though not limited to these groups, frontline communities generally include communities of color, Indigenous peoples, and low-income communities. These communities have also not historically had access to City decision making processes.

**Gray-green infrastructure:** stormwater management systems used in places where gray infrastructure cannot be entirely phased out without losing functionality, but some green elements can be introduced to increase the resilience of the system and improve the local ecology.

**Green infrastructure:** Stormwater management systems that mimic natural systems, capturing and absorbing or diverting rainwater where it falls.

**Greenhouse gas (GHG):** Any gas that absorbs heat in the atmosphere; examples include carbon dioxide, methane, nitrous oxide, ozone, and water vapor.

**Managed retreat:** The voluntary movement and transition of communities away from regions likely to become unsustainable for life due to climate change impacts. Primarily a tool used in coastal regions to move communities away from sea level rise impacts, but increasingly a tool used in planning for other climate hazards.

**Native species:** Any plant, fungus, or animal species native to our area. In the US, this only includes species present in the region prior to the arrival of European settlers.<sup>3</sup>

**Overburdened Community<sup>4</sup>:** According to RCW 70A.02.010 (11), denotes a geographic area where vulnerable populations face combined, multiple environmental harms and health impacts, and includes, but is not limited to, highly impacted communities as defined in RCW 19.405.020.

**Passive survivability:** Building to ensure that residences will remain at a safe temperature for occupants if the power goes out and that they will overall require less power to keep at a regulated temperature. Can also entail building single-family residences with one room designed to maintain comfortable temperatures or multifamily residences with a designated common area designed to serve this same function. Building for passive survivability also reduces demand on local energy infrastructure.

<sup>&</sup>lt;sup>2</sup> In the Climate Element the term "frontline community" is preferred as it does not carry the disempowering and othering connotations of the terms "overburdened community" and "vulnerable population." However, the latter terms carry legislative meaning, with precise definitions in Washington State law and policies that direct funding for and engagement with these groups. All three terms will be used throughout the goals, policies, and implementation actions contained in this Element. "Frontline communities" will be the preferred term where the legislative context is not relevant, while "overburdened community" and "vulnerable population" will be used where the precise definitions are key to enacting the policy

<sup>&</sup>lt;sup>3</sup> United States Department of Agriculture, n.d. "What is a native plant?" https://www.usda.gov/peoples-garden/gardening-advice/why-native-species-matter

<sup>&</sup>lt;sup>4</sup> See Note 1

**Vulnerable Populations**<sup>5</sup>: According to RCW 70A.02.010 (14), includes population groups that are more likely to be at higher risk for poor health outcomes in response to environmental harms, due to: adverse socioeconomic factors, high housing and transportation costs relative to income, limited access to nutritious food and adequate health care, linguistic isolation, and other factors that negatively affect health outcomes and increase vulnerability to the effects of environmental harms; and sensitivity factors, such as low birth weight and higher rates of hospitalization. Vulnerable populations can include but are not limited to: racial or ethnic minorities, low-income populations, populations disproportionately impacted by environmental harm, and populations of workers experiencing environmental harm.



<sup>&</sup>lt;sup>5</sup> See Note 1

### 1. Introduction

The Climate Element is part of Tumwater's Comprehensive Plan that was created to meet the State Growth Management Act (Chapter 36.70A RCW) requirements to adapt to and mitigate the effects of a changing climate.

This section of the Climate Element specifies goals, policies, and actions meant to set forth a direction to advance equity, sustainability, and resilience in Tumwater. The goals, policies, and actions also serve to ensure coordination with separate Comprehensive Plan Elements, regional plans, and County-Wide Planning Policies. Additionally, they serve as the plan for implementing certain actions within the Climate Element.

#### A. How to Read this Element

The City's Vision, Mission, and Belief Statements provide overarching direction for the future of the community are found in the Comprehensive Plan Summary.

The Summary of Element Goals and Strategies provides a high-level overview of the Climate Element's sixteen goals and supporting policies and actions.

The remaining document presents each goal in full detail, with introductory text, explanation of the lead and timeline for each policy and implementation action, and identification of priority items.

# 2. Growth Management Act – Element Goals

The State Growth Management Act (Chapter 36.70A RCW) requires that the City show that each Element in its Comprehensive Plan meets the relevant fifteen planning goals contained within the Act. The fifteen goals guide the development and adoption of the City's Comprehensive Plan and development regulations.

The following is a summary of how the new Climate Element addresses the goal related to climate change and resiliency. The state legislature added this goal in 2023.

15. Climate change and resiliency. Ensure that comprehensive plans, development regulations, and regional policies, plans, and strategies under RCW 36.70A.210 and chapter 47.80 RCW adapt to and mitigate the effects of a changing climate; support reductions in greenhouse gas emissions

and per capita vehicle miles traveled; prepare for climate impact scenarios; foster resiliency to climate impacts and natural hazards; protect and enhance environmental, economic, and human health and safety; and advance environmental justice.

The Conservation Element, Land Use Element, and Transportation Plan of the Comprehensive Plan will need to address this as a new goal in coordination with the new Climate Element. A new overarching Comprehensive Plan goal will address the dual goals of increasing climate resiliency and mitigating Tumwater's contributions to climate change by promoting sustainability, reducing pollution, promoting healthy habitats, and supporting clean air and water.

# 3. County-Wide Planning Policies

The Growth Management Act requires that comprehensive plans be consistent with Thurston County's County-Wide Planning Policies, as amended in 2015. The following is a list of the relevant policies that apply to this Element of the Comprehensive Plan. All County-Wide Planning Policies are adopted as Appendix B to the Comprehensive Plan. The relevant sections of the County-Wide Planning Policies to this Element are cited below.

The Climate Element has goals, policies, and actions that address County-Wide Planning Policies 1.1 through 1.14. These goals, policies, and actions support Tumwater and Thurston County's vision for a sustainable and resilient Tumwater whose communities will thrive in the face of climate change impacts and lead regional efforts to mitigate future impacts.

- II. Urban Growth Areas
  - 2.2 The boundaries of designated urban growth areas must meet the following criteria:

[...]

 d. be compatible with the use of designated resource lands and critical areas.

*[...]* 

- III. Promotion of Contiguous and Orderly Development, Provision of Urban Services, and Protection of Rural Areas
  - 3.4 Provide Capacity to accommodate planned growth by:

[...]

b. Protecting ground water supplies

from contamination and maintaining groundwater in adequate supply by identifying and reserving future supplies well in advance of need.

[...]

- VII. Economic Development and Employment
  - 7.2 Support the recruitment, retention, and expansion of environmentally sound and economically viable commercial, public sector, and industrial development and resource uses, including the provision of assistance in obtaining funding and/or technical assistance.

Resource uses and resource land protection are addressed in Chapters 2 through 4.

7.5 Build a vital, diverse, and strong local economy, including job opportunities that support community and household resilience, health, and wellbeing, by;

[...]

- f. Nurturing urban and rural agricultural and food-oriented businesses.
- g. Protecting resource lands.
- h. Encouraging the utilization and development of areas designated for industrial use, consistent with the environmental policies in these countywide policies.

- Connecting economic health with personal health and well-being and the advancement of environmental health.
- j. Adding incentives for business to demonstrate their environmental sustainability including reduction in greenhouse gas emissions.

[...]

#### X. Environmental Quality

- 10.1 Recognize our dependence on natural systems and maintain a balance between human uses and the natural environment.
- 10.2 Establish a pattern and intensity of land and resource use that is in concert with the ability of land and resources to sustain such use, reduce the effects of the built environment on the natural environment, conserve natural resources, and enable continued resource use, through:

[...]

c. Planning for the amount of population that can be sustained by our air, land and water resources without degrading livability and environmental quality.

[...]

10.3 Protect the soil, air, surface water, and groundwater quality, including through:

Reducing dependence on the use of chemicals and other products that pollute and, when their use is

necessary, minimizing releases to the environment.

- Ensuring adequate clean water is available to support household and commercial needs while sustaining ecological systems through conservation, balancing of uses, and reuse.
- Protecting ground and surface water and the water of the Puget Sound from further degradation by adopting and participating in comprehensive, multijurisdictional programs to protect and monitor water resources for all uses.
- 10.5 Acknowledge that changing weather and climate patterns will impact the human, natural, and built environments and plan for impact such as increase wildfire, flooding, and sea-level rise.
- 10.6 Protect and restore natural ecosystems, such as, forests, prairies, wetlands, surface and groundwater resources, that provide habitat for aquatic and terrestrial plants and animals.
- 10.7 Provide for public access to natural resource lands, while ensuring that uses and economic activity, which are allowed within those lands, are sustainable.
- 10.8 Provide for parks and open space and maintain significant wildlife habitat and corridors.

The Climate Element is based upon the themes of

equity, sustainability, and resilience.



# 4. Summary of Element Goals

The sixteen goals of this Climate Element are guided by the County-wide planning goals discussed above, the City's general goals, and by the vision of a Tumwater that is a vibrant city that fosters sense of place, active transportation, local business prosperity, and provides a safe environment for our coming climate challenges.

Goals are not listed in order of priority.

## A. Overarching Climate Goals

- Goal CL-1 Ensure environmental justice by providing all members of the Tumwater community with an equitable opportunity to learn about climate impacts, influence policy decisions, and take actions to enhance community resilience.
- Goal CL-2 Increase the City's capacity to implement climate action and adaptation priorities.
- Goal CL-3 Address that changing weather and climate patterns driven by human-generated emissions will affect every aspect of life in Tumwater, and plan for impacts such as increased heat, wildfire, and flooding while working to reduce local emissions.

# B. Greenhouse Gas Reduction Goals

- Goal CL-4 Reduce greenhouse gas emissions from all building types through energy conservation measures prioritizing the deployment of financial resources and programs that help finance or subsidize improvements across Tumwater.
- Goal CL-5 Expand the use of on-site renewable energy technology (e.g., solar photovoltaics, battery storage, etc.) across all building types through providing funds, code changes, and educational programs.
- Goal CL-6 Reduce greenhouse gas emissions by making it easier for people to shift to low-/zero-carbon transportation modes through policy, programming, and regional partnerships.
- Goal CL-7 Reduce vehicle miles traveled by using permitting, regulatory, and other land use tools to promote multimodal transportation options and the use of public transit throughout and beyond Tumwater.

Goal CL-8 Strengthen existing policy and regulations to deploy and enhance natural carbon solutions that are ecosystem-appropriate, store carbon, and offer co-benefits such as pollution reduction, wildlife habitat, and climate resilience.

#### C. Climate Resilience Goals

- Goal CL-9 Ensure that buildings and energy infrastructure can accommodate renewable energy opportunities, keep the community safe, and can withstand and recover from extreme weather and natural hazards worsened by climate change.
- Goal CL-10 Increase preparedness for acute climate impacts and improve the resilience of Tumwater's people and systems against climate hazards.
- Goal CL-11 Preserve, protect, and sustain cultural sites and resources in alignment with the values and needs of Tribes and frontline communities.
- Goal CL-12 With climate, growth, and environmental changes in mind, identify and elevate the protection of key habitats, ecosystem services, and wildlife corridors.
- Goal CL-13 Ensure that zoning and development decisions support compact urban development and city-wide resilience, including a resilient local economy.
- Goal CL-14 Ensure that the local transportation system, including infrastructure, routes, and non-motorized travel modes, fosters connectivity and can withstand and recover quickly from climate impacts.
- Goal CL-15 Protect and improve water quality and availability.
- Goal CL-16 Expand local food justice to address climate impacts and increase access to nourishing, affordable, culturally appropriate, and climate-friendly foods while expanding local use of composting.

# 5. Element Goals, Policies, and Implementation Actions

# A. Overarching Climate Goals

Goal CL-1 Ensure environmental justice by providing all members of the Tumwater community with an equitable opportunity to learn about climate impacts, influence policy decisions, and take actions to enhance community resilience.

Environmental justice must be central to any effort to mitigate and adapt to climate change. Tumwater's frontline communities<sup>6</sup> who experience the impacts of climate change "first and worst" are already feeling the burden of climate impacts, while having contributed the least to causing and worsening climate change. The City must create opportunities for members of frontline communities to make meaningful changes to climate policy and must also ensure frontline communities have access to resources to adapt to climate impacts.

Policies and Implementation Actions	Lead	Period	Notes
CL-1.1 Conduct intentional outreach with frontline communities to create opportunities for equitable engagement in climate adaptation, mitigation, and education.	WRS, Community Organizers	<b>Start:</b> 2025	Equity-focused
CL-1.1.1 Build and support partnerships with existing organizations (i.e. CBOs) that have the capacity and existing relationships needed to convene diverse coalitions of community members and collaboratively empower their communities to develop and implement climate resilience and mitigation actions and work to address underlying disparities that impact these communities.	City	Start: 2025 Implement: Ongoing	Equity-focused

<sup>&</sup>lt;sup>6</sup> Policies CL-1.1 and CL 1.3 and action CL-11.9.3 will help the City identify where Tumwater's frontline communities live, work, and play and form relationships within these communities and with existing CBOs that have existing relationships.

Policies and Implementation Actions	Lead	Period	Notes
CL-1.1.2 Create and implement tailored outreach and education initiatives that will empower frontline communities to respond to climate change threats.	WRS	Start: 2025 Complete: est. 2 years <sup>7</sup>	Equity-focused
CL-1.1.3 Attend pop-up events with existing CBOs and hold focus groups, office hours, and other events to build trust in both group settings and one-on-one with Tumwater's frontline community members.	WRS, Community Organizers	Start: 2025 Implement: Ongoing	Equity-focused
CL-1.1.4 Conduct outreach and listening sessions in frontline communities to understand existing needs and opportunities and to educate on projected climate impacts.	WRS & ED	Start: 2026 Implement: Ongoing	Equity-focused
CL-1.2 Prioritize the people of Tumwater and their needs, values, and goals in all future planning efforts by developing and implementing all climate-related adaptation and mitigation tasks in collaboration with equitable representation from all Tumwater communities.	WRS	<b>Start:</b> 2025	Equity-focused
CL-1.2.1 Prioritize recruiting frontline community members most impacted by climate change when forming any City of Tumwater working group, committee, or task force on climate-related issues. Strive to form all working groups and committees with equitable representation.	WRS	Start: 2025 Implement: Ongoing	Equity-focused

<sup>&</sup>lt;sup>7</sup> Estimated times required for completing each action are estimates only based on current projected funding, staff capacity, and alignment with broader City goals. Unforeseen circumstances could cause timelines to be extended beyond estimated completion timelines.

Policies and Implementation Actions	Lead	Period	Notes
CL-1.2.2 Plan and conduct community engagement activities to ensure all policies and tasks are co-created with the community and to share new plan information upon completion and update throughout implementation.	WRS	Start: 2025 Implement: Ongoing	Equity-focused
CL-1.3 Develop programs and resources to promote equitable financial access to climate resilience and mitigation activities.	WRS, Finance, & ED	<b>Start:</b> 2026	Equity-focused
CL-1.3.1 Identify funding sources for subsidies for overburdened communities to offset costs associated with climate impacts and mitigation actions. Covered funding could include potential cost increases associated with changing to non-fossil-fuel energy sources, increased energy usage to maintain livable indoor temperatures, and home hardening projects.	WRS, Finance, & ED	Start: 2026 Complete: est. 1-2 years	Equity-focused
CL-1.3.2 Establish and initiate a process to consult with frontline communities to identify ways to equitably distribute climate funding.	WRS	Start: 2027 Complete: est. 3-5 years	Equity-focused

# Goal CL-2 Increase the City's capacity to implement climate action and adaptation priorities.

The goals, policies, and implementation actions contained in this Element will only lead to effective climate mitigation and adaptation if the City devotes appropriate resources to implement all aspects of the Element.

Policies and Implementation Actions		Lead	Period	Notes
CL-2.1	Fully staff City positions needed to	WRS, EXD	<b>Start:</b> 2026	
	support the actions outlined in the			
	Climate Element.			

Policies and Implementation Actions	Lead	Period	Notes
CL-2.1.1 Review actions outlined in the Climate Element to determine whether additional support staff (including emergency management personnel) are required.	WRS, EXD	Start: 2026 Ongoing Every 2 years	
CL-2.1.2 Fill any existing vacant positions that will allow implementation of Climate Element actions, and post and fill any positions identified in CL-2.1.1.	WRS, EXD	Start: 2026 Ongoing Every 2 years	
CL-2.1.3 Develop a fellowship position to help meet Element goals.	WRS, EXD	<b>Start:</b> 2027	
CL-2.2 Develop a program funding strategy to support equitable access to climate mitigation and adaptation programs developed by the City.	WRS, EXD	<b>Start:</b> 2026	Equity-focused
CL-2.2.1 Review actions outlined in the Climate Element to determine what kinds of funding will be needed to support the programs created therein.	WRS, EXD	Start: 2026 Ongoing Every 2 years	
CL-2.3 Educate City Staff and the public on the Climate Element's goals, policies, and actions.		<b>Start:</b> 2025	
CL-2.3.1 Develop training materials for the City employees responsible for implementing actions outlined in the Climate Element. Require designated employees to undergo training and offer opportunities to ask clarifying questions.		Start: 2025 Ongoing	
CL-2.3.2 Develop educational outreach materials on the Climate Element to share with members of the Tumwater community so that they can learn how they can be involved in future climate planning efforts and how they will be impacted by forthcoming policies.		Start: 2025 Ongoing	

# Goal CL-3 Address that changing weather and climate patterns driven by humangenerated emissions will affect every aspect of life in Tumwater, and plan for impacts such as increased heat, wildfire, and flooding while working to reduce local emissions.

This goal is at the heart of why Tumwater is climate planning. Human-generated emissions are driving unprecedented climate changes, and that fact drives the GHG Reduction Sub-Element, whose goals strive to curb human emissions. Simultaneously, Tumwater and all communities globally must prepare for the inevitable impacts already set in motion.

Policies and Implementation Actions	Lead	Period	Notes
CL-3.1 Assess and address the City's	WRS	<b>Start:</b> 2026	
vulnerability to climate change.			
CL-3.1.1 Conduct a comprehensive	WRS	<b>Start:</b> 2026	Equity-focused
Vulnerability Assessment that		Complete:	
considers climate impacts to		est. 1 year	
communities, physical assets, and City operations and services,			
including impacts from extreme			
heat and flooding.			
CL-3.1.2 Utilize community outreach efforts	WRS	Start: 2026	Equity-focused
(see policies CL-1.1, CL-1.2) to		Implement:	' '
discuss community climate impacts		Ongoing	
and work with any community			
groups that desire additional			
adaptation or mitigation planning			
beyond existing city efforts.	W/DC	Ctt- 2027	
CL-3.1.3 Review climate impacts to City operations and adjust operations	WRS	Start: 2027 Complete:	
plans as needed to mitigate climate		est. 3-5	
impacts on services.		years	
CL-3.1.4 Develop and implement plans to	WRS	Start: 2027	
reduce impacts and vulnerabilities		Complete:	
for any existing City facilities,		est. 10-15	
utilities, infrastructure, or other		years for all	
assets vulnerable to projected		facilities	
climate change hazard. Plans will incorporate renewable energy,			
green infrastructure, and other			
sustainable additions.			
CL-3.2 Address climate change impacts in all	WRS,	Start: 2027	
City planning efforts.	CDD, EXD		

Policies and Implementation Actions	Lead	Period	Notes
CL-3.2.1 Integrate planning methods that identify and prioritize multiple	WRS, CDD, EXD	Start: 2027 Complete:	
potential adaptation pathways into all planning efforts to mitigate the risk of bad investments and account for changes in climate projections.		Ongoing	
CL-3.2.2 Develop a systematic review process to assess the City's plan to build and maintain roads, buildings, utilities, and other facilities for potential climate vulnerabilities to planned facilities, utilities, and infrastructure	WRS, TED, PRD, CDD, EXD	Start: 2028 Complete: Ongoing, every 2 years	
projects (e.g. the Capital Facilities Plan) and address prior to installation.			

# **Greenhouse Gas Reduction Sub-Element**

This sub-element contains five goals that aim to help the City of Tumwater reach its new goal of net-zero emissions by 2045, ahead of the State's emissions target. The policies and actions in this element focus on continuing the City's progress on Climate Mitigation.



# B. Greenhouse Gas Reduction Targets

Under HB 1181, cities and counties that are required to prepare Climate Elements as part of their Comprehensive Plans must include a sub-element on greenhouse gas (GHG) emissions reduction. The City of Tumwater's **GHG Reduction Sub-Element dictates the** City's approach to eliminating GHG emissions towards achieving net-zero emissions by 2045. The City has identified specific interim targets for municipal emissions (i.e., emissions from City-owned assets, operations, and services) and community-wide emissions (i.e., emissions from various sectors across the city of Tumwater, including but not limited to residential, commercial, and transportation sectors).

#### **Municipal GHG Emissions Targets**

- Reduce municipal emissions by 50% from 2023 levels by 2030.
- Achieve net-zero municipal emissions by 2045.

#### **Community-wide GHG Emissions Targets**

- Reduce community-wide emissions by 45% from 2023 levels by 2030, and 70% by 2040.
- Achieve net-zero community-wide emissions by 2045.

The goals and policies identified in Section C (Greenhouse Gas Reduction Goals) are designed to move Tumwater towards these emissions reduction milestones. As with other components of this Climate Element, these goals and policies were developed based on present information and community feedback, but they are subject to revision over time as regulations and technology evolve.

#### C. Greenhouse Gas Reduction Goals

**Goal CL-4** Reduce greenhouse gas emissions from all building types through energy conservation measures prioritizing the deployment of financial resources and programs that help finance or subsidize improvements across Tumwater.

Greenhouse gas (GHG) emissions from buildings and energy use account for over half of the community-wide emissions across Thurston County. This presents significant opportunities for action and impact, which can include prioritizing energy conservation measures and funding programs and incentives that will reduce the City's municipal and community-wide GHG emissions. Community members expressed support for energy efficiency measures to provide financial benefits, particularly for renters and low-income residents.

Policies and Implementation Actions		Lead	Period	Notes
CL-4.1	Reduce energy use across building types.			

Policies	and Implementation Actions	Lead	Period	Notes
CL-4.1.1	Provide educational resources and/or technical assistance to industry professionals and building owners and managers on energy-efficient building design, retrofits, and operations for new and existing buildings.	CDD, WRS	Start: 2025 Ongoing	
CL-4.1.2	Partner with public, private, non- profit, and faith-based organizations to construct and highlight high-profile demonstration buildings that use innovative energy efficiency and/or technology to limit energy use.	CDD, WRS	Start: 2026 Ongoing	
CL-4.1.3	Establish policies and programs to lower costs and pollution from fossil fuel consumption by incentivizing green building standards (i.e., building frameworks that are environmentally responsible and resource-efficient). (see CL. 5.2, 5.3, 5.4).	CDD, WRS	Start: 2026 Ongoing	
CL-4.1.4	Develop data methodology to monitor use and impacts of green building incentives (i.e., encouraging buildings that are environmentally responsible and resource-efficient) and inform recommendations for policy or programs.	CDD, WRS	Start: 2026 Ongoing	
CL-4.1.5	Partner with Puget Sound Energy (PSE) to promote and/or deploy energy efficiency programs, local funds, and customer enrollment in clean energy projects and programs.	CDD, WRS	Start: 2025 Ongoing	
CL-4.2 Redu	ace energy use in existing residential bu	uildings.		
CL-4.2.1	Require energy performance ratings and disclosures for dwelling units at times of listing for sale so that prospective buyers are informed before making purchasing decisions.	CDD, WRS	Start: 2026 Ongoing	

Policies and Implementation Actions	Lead	Period	Notes
CL-4.2.2 Require energy performance ratings and disclosures for rental dwelling units at times of application so that tenants are informed before making rental decisions.	CDD, WRS	Start: 2027 Complete: est. 1-5 years	Equity- focused
CL-4.2.3 Provide education and outreach to prospective home buyers and renters to ensure that incentives for energy efficiency upgrades are readily available to them, with focus on low-to middle-income earners.	CDD, WRS	Start: 2026 Ongoing	
CL-4.2.4 Develop and adopt policies that require existing dwelling units undertake an energy audit during a substantial remodel.8	CDD, WRS	Start: 2029 Ongoing	
CL-4.2.5 Provide incentives for property owners who take part in energy efficiency programs such as property tax breaks for installing energy conservation measures in rental housing.	CDD, EXD, FIN, WRS	Start: 2025 Complete: est. 1-5 years	
CL-4.2.6 Require baseline levels of energy efficiency as part of building permit review.	CDD	Start: 2029 Ongoing	This measure was brought up by community members to benefit renters and low-income residents.  Equity-focused

<sup>&</sup>lt;sup>8</sup> "Substantially rehabilitate", or remodel, refers to extensive structural repair or extensive modeling of premises that requires a permit such as a building, electrical, plumbing, or mechanical permit, and that results in the displacement of an existing tenant (RCW 59.18.200).

CL-4.3 Reduce energy use in existing nonresidential buildings.					
CL-4.3.1 Require for no disclose for ter sales s	re energy performance ratings nresidential buildings be sed at the time of application nants and at time of listing for so that owners, tenants, and ective buyers are informed e making purchasing or rental	CDD, WRS	Start: 2027 Complete: est. 1-5 years		
buildir	nue to install LED lighting in City ngs and infrastructure as ng becomes available.	TED, PRFD	Ongoing Complete: est. 1-2 years		
installa walls o reduce	e an incentive program for the ation of cool roofs <sup>9</sup> and living on nonresidential buildings to e energy consumption and the heat island effect.	CDD, WRS	Start: 2027 Ongoing		
standa buildir smalle which state [	ergy efficiency performance ards for existing nonresidential ags with gross floor areas are than 20,000 square feet are not yet covered under the Department of Commerce's Building Performance ards.	CDD & WRS	Start: 2028 Ongoing		
CL-4.4 Reduce ene	ergy use in new construction, red	evelopment, and	deconstruction	•	
buildir certific such a	rivize projects that meet greening or net-zero carbon cation through land use tools is floor area ratio, density height bonus, or parking tions.	CDD	Start: 2027 Ongoing		
buildir	ort CDD staff pursuing greening accreditations and cations from green building lists.	CDD	Start: 2025 Ongoing		
decon	e developing guidelines for struction and salvaging ials for reuse.	CDD	Start: 2026 Complete: est. 5 years		
CL-4.5 Convert to	alternative fuel sources.				

<sup>&</sup>lt;sup>9</sup> Roofs designed to reflect more sunlight, thus lowering building temperatures.

CL-4.5.1 Educate community members on	WRS	<b>Start:</b> 2025	
options for electric appliances and		Ongoing	
the benefits of pairing electrification			
with the installation of renewable			
energy. Create incentives to support			
fuel switching.			

**Goal CL-5** Expand the use of on-site renewable energy technology (e.g., solar photovoltaics, battery storage, etc.) across all building types through providing funds, code changes, and educational programs.

Local on-site renewable technology, such as solar photovoltaics and battery storage, will provide increased renewable energy options to Tumwater community members. Additionally, the development of local renewable energy resources strengthens Tumwater's resilience during future extreme weather events. Developing local renewable energy resources can also strengthen the local economy through job creation.

Policies and Implementation Actions	Lead	Period	Notes
CL-5.1 Increase the production of local renewable	e energy.		
CL-5.1.1 Install solar photovoltaics on all available and feasible municipal sites (including building rooftops, city hall, police and fire stations, community centers, parking lots, and municipal water pump sites) in collaboration with key community partners, like Olympia Community Solar and/or Puget Sound Energy	TED, PRFD	Start: 2025 Complete: est. 1-5 years	
CL-5.1.2 Support and implement local development code amendments that require solar-ready construction for all building types.	CDD	Start: 2025 Complete: est. 1-5 years	
CL-5.1.3 Pursue public-private partnerships to seek funding sources to accelerate clean energy projects.	WRS	Start: 2025 Complete: est. 5-10 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-5.1.4 Support existing community solar	WRS	<b>Start:</b> 2025	
initiatives from Olympia Community		Complete:	
Solar and PSE by providing		est. 1-5 years	
educational resources, promoting			
programs, and identifying			
opportunities for Tumwater			
residents to participate.			

**Goal CL-6** Reduce greenhouse gas emissions by making it easier for people to shift to low-/zero-carbon transportation modes through policy, programming, and regional partnerships.

Transportation is the second largest source of GHG emissions in Thurston County. Tumwater can significantly reduce emissions by creating policies and programs that support zero emissions transportation modes, including increasing the number of electric vehicles and charging stations throughout the city and encouraging active transportation such as biking and walking. Community members strongly expressed the desire for improved sidewalks and an increased number of bike lanes to enable active transit.

Policies and Implementation Actions	Lead	Period	Notes
CL-6.1 Promote increased use of active forms of t	ravel such as b	oicycling, walki	ng, and other
nonmotorized options.			
CL-6.1.1 Coordinate with the bike and pedestrian plans of the and other cities toward a large regional plan to expand walking and bicycling infrastructure, per goals laid out in the Transportation Plan to maximize funding mechanisms and opportunities.	TED, WRS	Start: 2025 Complete: est. 1-5 years	Community members expressed a strong desire for increased biking and walking infrastructure. Many people want to bike or walk more but feel unsafe due to lack of bike lanes or sidewalks.
CL-6.1.2 Promote biking, walking, and rolling by investing in accessible and attractive street-level elements per goals included in the Transportation Plan like seating, shaded sidewalks, ADA ramps, enhanced signals and crossings, and protected bike lanes.	TED, CDD	Start: 2025 Complete: est. 1-5 years	Equity-focused

Policies and Implementation Actions	Lead	Period	Notes
CL-6.1.3 Develop a rebate program for community members who wish to buy a bicycle or electric bicycle, with priority for low-income residents or households with greater barriers to vehicles.	WRS	Start: 2026 Complete: est. 1-5 years	Equity-focused
CL-6.1.4 Continue support for InterCity Transit's Walk N Roll program that focuses on a walking and bicycling incentive program with safety education for families, in coordination with Tumwater School District.	TED, WRS	Ongoing	Equity-focused
CL-6.1.5 Reevaluate long term plans, such as the Transportation Plan and Capital Facilities Plan, and update to prioritize non-motorized transportation. Set goals and plans for shifting to non- motorized transportation, like developing carfree corridors in commercial and mixed-use areas to encourage mode shift.	TED	Start: 2025, Complete: est. 3 years	Equity-focused
CL-6.2 Increase adoption of electric vehicles (EVs)			
CL-6.2.1 Partner with industry experts and environmental organizations to increase consumer awareness about EV options and incentives for use and purchase.	WRS	Start: 2025 Complete: est. <1 year	
CL-6.2.2 Provide educational resources for community members seeking to install EV chargers at home, with specific incentive support for smaller-scale and multi-family property owners.	WRS, CDD	Start: 2025 Complete: est. 1-5 years	Equity-focused
CL-6.2.3 Explore more opportunities to expand the city's publicly available EV charging network.	WRS, TED, PRFD	Ongoing	Equity-focused

**Goal CL-7** Reduce vehicle miles traveled by using permitting, regulatory, and other land use tools to promote multimodal transportation options and the use of public transit throughout and beyond Tumwater.

In addition to increasing the adoption of electric vehicles and encouraging active transportation in Tumwater, increasing multimodal options and public transit ridership can greatly affect the city's GHG emissions. Promoting public transit ridership includes short term efforts, such as public awareness campaigns and expand transit lines, and long-term efforts, such as urban planning to reduce urban sprawl. Land use tools, such as street network connectivity improvements, can also contribute to reduced vehicle miles traveled, or VMT, which in turn lead to reduced emissions, air pollution, and traffic congestion.

Policies and Implementation Actions	Lead	Period	Notes
CL-7.1 Continue land use policies that support	rt increased urban o	density and ef	fficient transportation
networks and reduce urban sprawl.			
CL-7.1.1 Develop and implement a strategy for eliminating parking minimums and establishing parking maximums, in alignment with statewide requirements.	CDD	Start: 2025 Complete: est. 1-5 years	
CL-7.1.2 Create a safe, regionally well-connected, and attractive bike and pedestrian network to encourage active transportation both within Tumwater and between neighboring jurisdictions.	CDD, TED	Ongoing Complete: est. 5-10 years	Community members expressed interest in increased transit to centralized commercial hubs.
CL-7.1.3 Collaborate with City departments to increase the number of 15-minute neighborhoods (i.e., walkable environment, destinations that support a range of basic living needs and a residential density), in coordination with goals outlined in the Land Use Element. Help identify key infrastructure components needed to increase the number of 15-minute neighborhoods, prioritizing low- and middle- income residents, then change	CDD	Ongoing Complete: est. 5 years	Equity-focused

cc m n	oning and codes if needed and oordinate with other cities to nake public investments where ecessary.			
CL-7.2 Increase	se efficiency of the transportation	on system.		
Pl pr tr re er tr in sp rc in	Is part of the Transportation lan, fund programs and rojects to increase ransportation efficiency, educe delay, and reduce missions. Examples include raffic signal timing mprovements, reevaluating peed limits, deploying bundabouts vs. signalized intersections, promoting street onnectivity, and other traffic	TED	Ongoing	Added benefits are decreased pollution due to idling and improved fuel efficiency leading to cost savings.
fle	ow control tools.			
aı pı si bı	Develop educational campaigns and programs about benefits of properly inflated tires, including ignage at gas stations and local susinesses and partnering with chools.	TED, WRS, Stream Team	Start: 2025 Complete: est. <1 year	Benefits of proper tire inflation include reduced GHG emissions, increased fuel efficiency, safety, salmon recovery, etc.
in rc fc n a o se aı eı re	Vork with Intercity Transit to increase local public transit outes or frequency with a ocus on ensuring the greatest number of riders have access to low-carbon transportation of ervice should include an nalysis of climate impacts to insure the program does not esult in an increase in reenhouse gas emissions.	CDD, TED	Start: 2025 Complete: est. 1-5 years	
CL-7.2.4 W id p m re st	Vork with Intercity Transit to dentify and implement rograms that help people nove to and from transit, educe GHG emissions, and use treet-level improvements to onnect neighborhoods	CDD, TED	Start: 2025 Complete: est. 1-5 years	Equity-focused

**Goal CL-8** Strengthen existing policy and regulations to deploy and enhance natural carbon solutions that are ecosystem-appropriate, store carbon, and offer co-benefits such as pollution reduction, wildlife habitat, and climate resilience.

Natural carbon solutions play an important role in the local environment by sequestering carbon through tree canopy and natural open space. In conjunction with reducing greenhouse gas emissions at the source, natural carbon solutions reduce atmospheric carbon, pollutions, and reduce urban heat. Community members have expressed strong support of preserving the tree canopy in Tumwater.

Policies and Implementation Actions	Lead	Period	Notes
CL-8.1 Preserve tree canopy and support habita carbon.	at restoration a	ind conservation	on to sequester
CL-8.1.1 Adopt and implement a coordinated reforestation and afforestation program guided by the UFMP with goals and policies to support stormwater management. Consider how existing or future tree canopy can support stormwater management and water quality improvements in receiving waters. Include goals for maintaining or increasing canopy in overburdened communities.	WRS	Start: 2026 Complete: est. 1-5 years	Equity-focused
CL-8.1.2 Establish goals for preserving existing mature tree canopy in alignment with TMC 16.08. Include guidelines and incentives for maintaining larger, more established trees.	WRS	Start: 2025 Complete: est. >1 year	

Policies and Implementation Actions	Lead	Period	Notes
CL-8.1.3 Support implementation of habitat conservation plans (HCPs) that allow for state required development and provide for preservation and restoration of prairie habitat for endangered and threatened prairie species.	CDD	Ongoing	
CL-8.1.4 Continue to champion statewide conservation efforts to protect, restore, and manage wetlands and riparian habitat.	CDD	Ongoing	
CL-8.1.5 Build relationships and capacity among regional partners to ensure successful and effective data coordination and program alignment.	WRS	Ongoing	
CL-8.1.6 Maximize tree canopy coverage in surface parking lots. Establish an initiative for identifying impervious surfaces across parking lots for potential reforestation or conversion.	WRS, CDD	Start: 2025 Complete: est. 1-5 years	

# **Resilience Sub-Element**

This sub-element contains eight goals that aim to help the City of Tumwater guide climate adaptation efforts to protect its communities against unavoidable climate impacts. The policies and actions in this element focus on expanding and improving the City's work on Climate Adaptation.



#### D. Climate Resilience Goals

Goal CL-9 Ensure that buildings and energy infrastructure can accommodate renewable energy opportunities, keep the community safe, and can withstand and recover from extreme weather and natural hazards worsened by climate change.

Tumwater's energy infrastructure and buildings need to be protected against projected climate impacts, creating safe and reliable space for community members. Renewable energy does not just offer climate mitigation benefits: locally generated and stored renewable energy is also more resilient under an uncertain climate future.

Policies and Implementation Actions	Lead	Period	Notes
CL-9.1 Require that planned facilities, utilities, and infrastructure projects and existing vulnerable sites be built or hardened to avoid or withstand climate impacts, including extreme heat, extreme precipitation, and sea level rise.	CDD, WRS	<b>Start:</b> 2028	
CL-9.1.1 Identify potential funding sources to bury existing power lines and associated infrastructure, or to make more resilient to climate impacts where burial is not feasible.	CDD, TED, WRS	Start: 2028 Complete: Ongoing	Developed from CPAT recommended action
CL-9.1.2 Identify potential funding sources to develop and maintain a grant program that will enable affordable housing development projects to bury new power lines and associated infrastructure as required, or to make more resilient to climate impacts where burial is not feasible.	WRS, CDD	Start: 2028 Complete: Ongoing	Developed from CPAT recommended action Equity-focused
CL-9.1.3 Review existing and planned capital facilities to ensure they will be able to function as intended over their planned life cycle, creating and implementing plans to strengthen any capital facilities with identified vulnerabilities.	TED, PRFD, WRS	Start: 2028 Complete: Ongoing	

Policies and Implementation Actions	Lead	Period	Notes
CL-9.2 Plan energy infrastructure to be able to integrate with an increase in renewable energy sources, including increasing energy storage capacity to improve energy grid resilience.	CDD, WRS, Fire and EMS	<b>Start:</b> 2026	
CL-9.2.1 Identify key public facilities that must remain operational during a hazard event that impacts power availability.	CDD, TED, PRFD, WRS, Fire and EMS	Start: 2026 Complete: est. <1 year	
CL-9.2.2 Identify sites to install local microgrid solar and battery storage facilities that will lead to negligible or low impacts on local habitats, infrastructure, and human health.	TED, PRFD, WRS, CDD	Start: 2027 Complete: est. 2-3 years	Developed from CPAT recommended action
CL-9.2.3 Install locally distributed renewable energy generation and battery storage infrastructure at identified key public facilities to ensure continuity of operations for a minimum of 24 hours.	TED, PRFD, WRS, CDD	Start: 2030 Complete: est. 5-10 years	Developed from CPAT recommended action
CL-9.3 Require buildings in high-risk areas <sup>10</sup> to be designed and built to be resilient to natural hazards and extreme weather worsened by climate change.	CDD	<b>Start:</b> 2028	
CL-9.3.1 Adopt and enforce fire-resilience standards for new and redeveloped sites in high-risk wildfire areas identified by the State of Washington's Wildland-Urban Interface Map (forthcoming).	CDD	Start: 2028 Complete: est. 4-5 years	Period contingent on release of revised WUI map.
CL-9.3.2 Require a hazard assessment and climate risk planning for new and existing buildings in designated high-risk areas, designing for enhanced resilience and mandating building practices that.	CDD, WRS	Start: 2032 Ongoing	

<sup>&</sup>lt;sup>10</sup> High risk areas to be identified by the City's Comprehensive Vulnerability Assessment, which should be completed by 2028. Weatherization and hardening building codes should be developed based on identified risks and land use designations of at-risk land parcels.

Policies and Implementation Actions	Lead	Period	Notes
CL-9.3.3 Develop and maintain a fund to subsidize the cost of hazard risk assessments and climate risk planning for low-income property owners and low-income housing development projects.	CDD, WRS, FIN	Start: 2028 Ongoing	
CL-9.3.4 Amend Tumwater building code to require that all residential development and redevelopment projects be appropriately weatherized and built to be livable and comfortable during extreme weather events. Requirements may include installing heat pumps or air conditioning units if it cannot be proved the building is built for passive survivability. 11	CDD, WRS	Start: 2030 Complete: est. 10 years	Developed from community engagement suggestion.
CL-9.4 Encourage property owners to increase the resilience of existing buildings to natural hazards and extreme weather worsened by climate change.	CDD, WRS	<b>Start</b> : 2028	
CL-9.4.1 Develop Climate Resilience Guidelines demonstrating how to design buildings for passive survivability, at a minimum providing one common room for residents that provides refuge from heat and power during extended outages for medical necessities. Share this guidance with developers and property owners through outreach activities.	CDD, WRS	Start: 2028 Complete: est. 5 years	Developed from community engagement suggestion.
CL-9.4.2 Secure and maintain funding for an incentive program for retrofit of existing buildings to meet established Climate Resilience Standards.	CDD, WRS	Start: 2033 Ongoing	

<sup>&</sup>lt;sup>11</sup> See Part 2: Technical Information for more information on heat projections, passive survivability, and building code.

Policies and Implementation Actions	Lead	Period	Notes
CL-9.4.3 Develop and maintain a rebate program for low-income residents who do not qualify for weatherization assistance through the Community Action Council or whose dwellings are considered vulnerable, such as manufactured homes, to weatherize their homes against extreme weather.	WRS	Start: 2028 Complete: Ongoing	Developed from community engagement suggestion Equity-focused
CL-9.5 Work with energy utilities to improve the safety and reliability of infrastructure vulnerable to climate change.  CL-9.5.1 Establish partnerships with all regional energy utilities and develop short- and long-range plans to assess and mitigate the risk of climate hazard impacts on energy generation and transmission infrastructure.	WRS, Puget Sound Energy, CDD WRS, Puget Sound Energy	Start: 2025 Complete: est. 3-5 years	
CL-9.5.2 In partnership with local energy utilities, explore large-scale energy storage options to use in Tumwater as part of a transition to reliable renewable energy.	WRS, Puget Sound Energy, CDD, Fire and EMS	Start: 2026 Complete: est. 3 years	

# Goal CL-10 Increase preparedness for acute climate impacts and improve the resilience of Tumwater's people and systems against climate hazards.

Research has shown that climate change impacts frontline communities first and worst, while these communities also contribute the least to worsening climate change. System-wide changes need to be implemented to protect all of Tumwater's community members from both chronic and acute climate harm, with particular attention to frontline communities.

Policies and Implementation Actions	Lead	Period	Notes
CL-10.1 Improve community outreach on and	WRS & ED	<b>Start:</b> 2025	Developed from
response capabilities for climate health			CPAT recommended
and hazard issues, prioritizing frontline			policy
communities to address economic,			
social, and health disparities.			

Policies and Implementation Actions	Lead	Period	Notes
CL-10.1.1 Partner with a philanthropic organization or a CBO to build a volunteer network to develop and manage a vulnerable population database that includes community members who require aid and/or check-in calls during and after emergencies. This database can be built on the existing Lifeline Program	WRS, Fire and EMS, County	Start: 2025 Complete: est. 1 year	Developed from CPAT recommended action Equity-focused
members.  CL-10.1.2 Transition management of the vulnerable population database to the City and secure long-term funding and staffing to keep the database up to date and oversee its use during emergencies.  CL-10.1.3 Develop and adopt a Pre-Event Recovery Ordinance using American Planning Association's guidance that will allow the City to establish a Local Recovery Management	WRS, Fire and EMS, County  CDD, EXD, City Attorney, County, Fire & EMS	Start: 2028 Complete: est. 1-2 years  Start: 2026 Complete: < 1 year	Developed from CPAT recommended action Equity-focused
Organization (LRMO) charged with planning for long-term, resilient disaster recovery and coordinating with the Tumwater Disaster Recovery Group and County Disaster Recovery Team after a disaster to align long-term planning with short-term needs.			
CL-10.1.4 Develop climate-resilient redevelopment guidelines to help guide disaster recovery decisions. Utilize recommendations from FEMA's Pre-Disaster Recovery Planning Guide for Local Governments.	CDD, EXD, Fire and EMS, LRMO	Start: 2030 Complete: est. 1-5 years	Developed from CPAT recommended action

Policies and Implementation Actions	Lead	Period	Notes
CL-10.1.5 Require that all City employees that participate would serve a role in EOC activation complete FEMA training courses on disaster recovery and achieve functional expertise in FEMA post-disaster processes.	City	Ongoing	
CL-10.2 Develop resources to mitigate the risks posed by extreme heat.	City	<b>Start:</b> 2025	Developed from CPAT recommended policy
CL-10.2.1 Implement the Thurston County Extreme Heat, Emergency Response, and Illness Prevention Plan.	WRS, County, Fire and EMS	<b>Start:</b> 2026	Developed from CPAT recommended action Equity-focused
CL-10.2.2 Preserve and expand tree and shade cover to reach the 2040 goal of 39% recommended in the UFMP to reduce urban heat.	WRS	Start: 2027 Complete: est. 10-15 years	Developed from CPAT recommended action
CL-10.2.3 Assess potential partnerships with CBOs and regional agencies that can serve as resilience hubs that provide resources such as heat pumps and emergency supplies for community members to check out during emergencies.	WRS, Fire and EMS, Community- Based Organizatio ns, County	Start: 2026 Complete: est. 3-5 years	Equity-focused
CL-10.2.4 Explore feasibility of implementing and maintaining a program to distribute portable cooling units and install heat pumps, prioritizing households with residents most vulnerable to extreme temperature events such as renters and low-income seniors.	WRS	Start: 2025 Complete: est. 1-2 years	Developed from community engagement suggestion Equity-focused
CL-10.3 Increase regional wildfire resilience, preparedness, and response capabilities in Tumwater.	WRS, Fire and EMS	<b>Start:</b> 2025	
CL-10.3.1 Collaborate with regional partners to develop a community wildfire protection plan.	WRS, Fire and EMS	Start: 2030 Complete: est. 3-5 years	Later expected start due to uncertainty around WUI mapping

Policies and Implementation Actions	Lead	Period	Notes
CL-10.3.2 Collaborate with emergency managers and fire experts to educate and empower homeowners to make changes to their homes and properties that lower their wildfire risk, encouraging measures that do not decrease canopy cover where possible. Enroll 75% of residents in	WRS, Fire and EMS, Thurston Conservatio n District	Start: 2030 Complete: est. 5-7 years	Longer expected period due to uncertainty around WUI mapping
wildfire risk areas in the Wildfire Ready Neighbors program.  CL-10.3.3 Incentivize communities and homeowners in the WUI to invest in wildfire hardening and mitigation strategies to protect their homes and properties, encouraging measures that do not decrease canopy cover where possible.  Mitigate wildfire risk for at least 60% of homes.	CDD, Fire and EMS	Start: 2030 Complete: est. 5-7 years	Longer expected period due to uncertainty around WUI mapping
CL-10.3.4 Secure funding to provide grants to low-income community members to follow recommended changes to their homes and properties to lower their wildfire risk.	CDD, Fire and EMS	Start: 2030 Complete: est. 2 years	
CL-10.3.5 Provide educational resources to aid community members in developing personal wildfire evacuation plans, prioritizing residents in the WUI.	WRS, Fire and EMS	Start: 2025 Complete: est. 2 years	
CL-10.4 Collaborate with regional partners to develop resources that address projected increases in risks and impacts associated with climate change.	WRS	<b>Start</b> : 2026	
CL-10.4.1 Develop and share guidance for navigating post-disaster mental health and social resources, translated into multiple languages.	WRS, Fire and EMS	Start: 2026 Complete: < 2 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-10.4.2 Coordinate with the County and	City &	<b>Start:</b> 2030	
LeMay Pacific Disposal to develop an	LeMay	Complete:	
emergency waste management plan	Pacific	est. 5 years	
that includes contingencies for	Disposal		
waste pickup schedules in the event	Thurston		
of flooding predictions or other	County		
hazards that can be mitigated in			
advance.			
CL-10.4.3 Develop and implement a regional	WRS, Fire	<b>Start:</b> 2025	
wildfire and smoke resilience and	and EMS,	Complete:	
response strategy.	ORCAA	est. 5-7	
		years	
CL-10.4.4 Develop a protocol for using the	WRS, Fire	<b>Start:</b> 2027	
County emergency alert system to	and EMS,	Complete:	
issue alerts for wildfire risk, smoke	ORCAA,	est. 3-5	
exposure, and evacuation	County	years	
information. Create alert messaging			
that uses plain language to			
communicate risks and information.			
CL-10.5 Improve community resilience, health	TED, WRS,	<b>Start:</b> 2027	Developed from
equity, and environmental justice by	PRFD		community
ensuring that all community members			engagement
can walk or roll to public green spaces			suggestion
within ½ a mile and connected by			
sidewalks or protected walkways.			Equity-focused
CL-10.5.1 Utilize data from the Trust for	WRS	<b>Start</b> : 2027	Equity-focused
Public Land and from community		Complete:	
outreach efforts to find any gaps in		est. 1-2	
equitable access to public green		years	
spaces.			- · · · · ·
CL-10.5.2 Engage community members who	TED, WRS,	<b>Start:</b> 2030	Equity-focused
lack equitable access to green	PRFD	Complete:	
spaces to determine how they		est. 1-5	
would like to improve their access.		years	
Options can include better			
transportation options, addition of			
new green space, and improved			
safety of active transportation			
routes, among others.			

Policies and Implementation Actions	Lead	Period	Notes
CL-10.5.3 Obtain funding to finish the Deschutes Valley Trail, aiming to	TED, WRS, PRFD	Start: 2028 Complete:	
complete construction by 2040.	r IXI D	est. 10 years	
CL-10.6 Position the city to qualify for more	WRS	<b>Start:</b> 2028	
funding opportunities to adapt to			
climate impacts.			
CL-10.6.1 Explore opportunities to partner with academic research institutions to study hazard events of all magnitudes to provide a fuller understanding of the community's hazard characteristics — including those affected by climate change.	WRS, SPSCC, Evergreen State College, St. Martins University	Start: 2028 Complete: est. 1-3 years	
CL-10.6.2 Analyze how well the municipal water system would maintain adequate pressure during a major wildfire event with multiple structures burning. and how it will look under current and projected drought conditions. Generate a report with specific recommendations for increasing the resilience of the water system.	WRS	Start: 2028 Complete: est. 2-3 years	
CL-10.6.3 Incorporate findings from the City's Comprehensive Vulnerability Assessment into the Tumwater Annex of the Thurston County Hazard Mitigation Plan. Identify specific projects and opportunities that the City can leverage to maximize funding.	CDD	Start: 2029 Complete: est. 2-3 years	
CL-10.6.4 Develop a specific, phased plan for completing a large-scale tree planting program to secure funding for this program.	WRS	Start: 2027 Complete: est. 3-4 years	
CL-10.7 Increase understanding of how climate change impacts vector-borne disease outbreaks. Make a plan to protect against projected increases in frequency and severity.	WRS, County Health Department	<b>Start:</b> 2027	

Policies and Implementation Actions	Lead	Period	Notes
CL-10.7.1 Identify and map areas in	WRS, TED,	<b>Start</b> : 2027	
Tumwater that are at high risk to	County Health	Complete:	
become disease vectors, including developed areas with poor drainage	Department	est. 2 years	
and standing water that serves no	Department		
ecological purpose.			
CL-10.7.2 Coordinate with the County	WRS,	<b>Start:</b> 2029	
Health Department to develop	County	Complete:	
strategies to mitigate projected	Health	est. 3 years	
increases in disease and pest risk.	Department		_
CL-10.8 Develop programs that enable and	WRS	<b>Start:</b> 2027	Equity-focused
empower community members to			
protect themselves from poor air quality.			
CL-10.8.1 Collect data to determine how	WRS	Start: 2027	Equity-focused
many Tumwater community	VIIIS	Complete:	Equity rocused
members are vulnerable to poor air		est. 1-2	
quality and the neighborhoods in		years	
which these residents live, using			
both quantitative and qualitative			
data from tools like EJScreen and			
from community outreach efforts.			
Use collected data to set target thresholds for shelter occupancy			
and locations and air			
conditioner/heat pump and air			
filtration distribution programs.			
CL-10.8.2 Establish and maintain a stable	WRS,	<b>Start:</b> 2029	Developed from
funding source to distribute	Thurston	Complete:	CPAT recommended
personal protective equipment to	County	est. 1-2	action
populations vulnerable to poor air	Health	years	Facility for accord
quality.	Department , &	Maintain: ongoing	Equity-focused
	, & Community	Oligolis	
	Based		
	Organizatio		
	ns		

Policies and Implementation Actions	Lead	Period	Notes
CL-10.8.3 Identify facilities that serve highrisk populations to create incentive programs encouraging infrastructure updates for clean indoor air. Updates should include HVAC system improvements.	WRS	Start: 2030 Complete: est. 1-5 years	Equity-focused
CL-10.9 Ensure community members have resources to shelter in place or to adequately reach temporary shelter.	WRS	<b>Start</b> : 2025	Developed from CPAT recommended policy Equity-focused
CL-10.9.1 Coordinate with other agencies and jurisdictions to provide more cooling centers with 24-hour capacity. Offer 24-hour capacity for all of Tumwater's heat-vulnerable residents including seniors, low-income, and houseless individuals. Shelter locations should be sited equitably throughout the city, with priority for opening locations near the highest concentrations of heat-vulnerable residents.	WRS, County Health Department	Start: 2025 Complete: est. 5-10 years	Equity-focused
CL-10.9.2 Coordinate with local businesses, community centers, and other neighborhood hubs to assess the potential of using these spaces as cooling centers. Provide sites that agree to participate in this program with resources detailing how to set up an equitable and functional cooling center.	WRS, County Health Department	Start: 2025 Complete: est. 5-10 years	Equity-focused
CL-10.9.3 Develop outreach programs or materials to increase awareness and education on individual emergency preparedness (e.g. Two Weeks Ready).	Fire and EMS, WRS	Start: 2025 Complete: est. <1 year	
CL-10.10 Increase language accessibility of emergency services, plans, and resources.	ASD, CDD, WRS	<b>Start:</b> 2025	Equity-focused

Policies and Implementation Actions	Lead	Period	Notes
CL-10.10.1 Establish on-call contracts for	ASD, CDD,	<b>Start:</b> 2025	Equity-focused
language interpretation and	WRS	Complete:	
translation services, including ASL.		est. <1 year	
CL-10.10.2 Utilize on-call contracts for	ASD, CDD,	Ongoing	Equity-focused
language services to translate all	WRS	upon	
emergency resources and plans.		adoption	
		of relevant	
		plans	

#### Goal CL-11 Preserve, protect, and sustain cultural sites and resources in alignment with the values and needs of Tribes, traditional stewards, and frontline communities.

Tumwater is built on land traditionally stewarded by the Coast Salish people. Their descendants in the Nisqually, Squaxin Island, and Chehalis Tribes continue to live on and steward the land today but are also unfairly impacted by climate change and excluded from key climate decision-making. Tumwater must elevate the goals, values, and needs of the region's Indigenous communities.

Policies and Implementation Actions	Lead	Period	Notes
CL-11.1 Enhance partnership between the Tribes and the City, integrating Tribal expertise, opinions, and values into climate planning efforts, projects, and programs.	ED, WRS, Tribes	<b>Start:</b> 2025	Equity-focused
CL-11.1.1 In collaboration with the Tribes, establish guidelines and standards for incorporating Traditional Ecological Knowledge into City programs and planning efforts to adapt to climate change impacts.	WRS, Tribes	Start: 2025 Complete: est. 5 years	Developed from CPAT recommended action Equity-focused
CL-11.1.2 Integrate the Tribal Stewards Curriculum or an alternative approved by Tribal representatives into regular City training schedules.	WRS, Tribes	Start: 2030 Complete: est. 5 years	Developed from CPAT recommended action Equity-focused

Policies and Implementation Actions	Lead	Period	Notes
CL-11.2 In accordance with Tribal treaty rights, protect, enhance, and restore ecosystems and culturally important consumptive and non-consumptive resources including foods, medicinal plants, places, and materials that could be adversely impacted by climate change.	WRS, Tribes	<b>Start:</b> 2025	Equity-focused
CL-11.2.1 Work with local partners, especially representatives of the Tribes, to establish and sustain a native plant nursery and seed bank to support long-term ecological restoration and ensure continued access to culturally significant plants.	WRS, Tribes	Start: 2026 Complete: est. 4 years	Equity-focused
CL-11.2.2 In collaboration with the Tribes, identify consumptive and non-consumptive resources that will be adversely impacted by climate change.	WRS, Tribes	Start: 2025 Complete: est. 3 years	Equity-focused
CL-11.2.3 In collaboration with the Tribes, develop and implement a plan to protect, enhance, restore, and/or preserve cultural resources that have been identified as threatened by climate change.	WRS, Tribes	Start: 2028 Complete: est. 5 years	Equity-focused
CL-11.3 Collaborate with the Tribes to ensure the preservation of archaeological sites and traditional cultural properties that are vulnerable to climate impacts.	WRS, CDD, PRFD, Tribes	<b>Start:</b> 2026	Equity-focused
CL-11.3.1 Request recommendations from the Tribes for actions the City can take to preserve historic sites and cultural properties.	WRS, PRFD, Tribes, DAHP	Start: 2026 Complete: est. 3 years	Equity-focused
CL-11.3.2 In collaboration with the Tribes, develop guidelines for protecting, enhancing, and restoring affected historic sites and cultural properties.	WRS, Tribes	Start: 2029 Complete: est. 5 years	Equity-focused

#### Goal CL-12 With climate, growth, and environmental changes in mind, identify and elevate the protection of key habitats, ecosystem services, and wildlife corridors.

Protecting Tumwater's local ecosystems is key to building both ecological and community resilience to expected climate impacts. Resilient ecosystems will ensure vital native species are able to survive and thrive in the coming decades, while also continuing to provide key ecosystem services to Tumwater's human residents.

Policies and Implementation Actions	Lead	Period	Notes
CL-12.1 Manage Tumwater's urban forest in line with the most recent UFMP and current climate projections and guidance.	City	<b>Start:</b> 2025	
CL-12.1.1 Enact the updated Tree Ordinance.	City	Start: 2025 Complete: < 1 year	
CL-12.1.2 Protect and enhance the climate resilience of urban forests by implementing the most recent UFMP. Prioritize implementation of UFMP actions that provide benefits for frontline communities.	WRS	Ongoing	Equity-focused
CL-12.1.3 Update the UFMP every five years, including updated tree species selection and planting guidance, and integrate the most recent available climate data into each new edition of the Plan.  Climate guidance consideration should include projections for heat, precipitation, pests, and any other relevant emergent information.	WRS	Start: 2027 Reassess every 5 years	Developed from CPAT recommended action
CL-12.1.4 Develop and share guidance with community members that identifies native drought- and pest-resistant trees, shrubs, and grasses.  Encourage their use over nonnative, non-resilient species in urban forest plantings and in restoration efforts to support climate resilience.	WRS	Start: 2027 Complete: est. 2 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-12.1.5 Develop a program to analyze and address the climate impacts and risks of pests and disease on Tumwater's urban forest.	WRS	Start: 2027 Complete: est. 5-7 years	
CL-12.1.6 Assess tree canopy and forests including parks, greenbelts and urban forests to identify potential wildfire risk zones and develop strategies to mitigate that risk.	WRS, PRFD	Start: 2038 Complete: est. 8 years	
CL-12.2 Protect, restore, and connect streams, riparian zones, estuaries, wetlands, and floodplains to increase resiliency to climate change and reduce flood risk.	WRS, CDD	<b>Start:</b> 2028	
CL-12.2.1 Conduct inventory of watersheds throughout Tumwater, including an assessment of overall health and connectivity and the type and degree of restoration or protection needed	WRS	Start: 2028 Complete: est. 3 years	
CL-12.2.2 Protect and restore wetlands and corridors between wetlands to provide biological and hydrological connectivity that fosters resilience to climate impacts.	WRS, CDD	Start: 2031 Complete: est. 8 years	Developed from CPAT recommended action
CL-12.2.3 Protect and restore riparian vegetation to reduce erosion, provide shade, and support other functions that improve the climate resilience of streams.	WRS, CDD	Start: 2031 Complete: est. 8 years	Developed from CPAT recommended action
CL-12.2.4 Collaborate with relevant parties to prioritize where and how beavers can be incorporated strategically to address climate change impacts on water quality, streamflow volume, and riparian habitat without causing any adverse impacts to Oregon Spotted Frog habitat.	WRS	Start: 2028 Complete: est. 2 years	Developed from CPAT recommended action
CL-12.3 Manage Tumwater's natural resources to protect, restore, and connect native ecosystems and foster habitats that are resilient to climate change.	CDD, WRS	<b>Start:</b> 2030	

Policies and Implementation Actions	Lead	Period	Notes
CL-12.3.1 Collaborate with other regional	WRS,	<b>Start:</b> 2032	
partners to inventory potential	Tribes,	Complete:	
climate refugia sites in Tumwater	County,	est. 5 years	
that will require protection and to	TRPC,		
assess existing habitat protections,	Climate		
habitat quality levels, and	Refugia		
connectivity.	Coalition		
CL-12.3.2 Develop an Ecosystem Restoration	WRS	<b>Start:</b> 2030	Use National Fish,
Plan or a Natural Resource		Complete:	Wildlife and Plants
Management Plan and adopt		est. 5 years	Climate Adaptation
relevant measures from other			Strategy
relevant existing plans. The plan(s)			
must address existing stressors,			
consider climate change impacts,			
emphasize taking a precautionary			
approach to reduce risk of			
environmental harm, and guide			
adaptive management.			
CL-12.3.3 Locate funding to implement the	WRS, CDD	<b>Start:</b> 2035	
Ecosystem Restoration Plan and/or		Complete:	
Natural Resource Management Plan		est. 2 years	
CL-12.4 Increase the climate resilience of	WRS	<b>Start:</b> 2025	
native fish species and aquatic			
ecosystems by reducing the impact of			
threats such as aquatic invasive			
species, invasive plants, pollutants, and			
changes in seasonal water flow.	) A (D.C.	6 2025	
CL-12.4.1 Conduct a study of existing threats	WRS,	<b>Start:</b> 2025	
to native fish and aquatic	TRPC	Complete:	
ecosystems to prioritize which		est. 2 years	
threats are addressed.	MADC	Ct 2027	
CL-12.4.2 Develop an Aquatic Resilience	WRS	Start: 2027	
Strategy that addresses each unique threat identified.		Complete:	
	M/DC	est. 1 year	
CL-12.4.3 Implement the Aquatic Resilience	WRS	Start: 2028	
Strategy.		Complete:	
		est. 5 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-12.5 Advocate for prioritizing maintenance of habitat integrity and function when working with regulatory agencies to determine allowed activities and uses within protected wetlands and Fish and Wildlife Habitat Conservation Areas (FWHCAs).	WRS	<b>Start:</b> 2025	
CL-12.5.1 Identify programs that will have a substantive impact on fish and wildlife habitat.	WRS	Start: 2025 Complete: est. 3 years	
CL-12.5.2 Review and amend local policies, rules, and management activities to eliminate potential negative impacts on fish and wildlife habitat and take advantage of opportunities to incorporate positive impacts.	WRS, TED, PRFD, CDD	Start: 2028 Ongoing	
CL-12.6 Take early action to eliminate or control non-native invasive species, including insects and plants that take advantage of climate change, especially where invasives threaten native species or ecosystem function.	WRS	<b>Start</b> : 2026	
CL-12.6.1 Develop and implement a monitoring plan to assess how invasive species are spreading and impacting local plant communities.	WRS	Start: 2026 Complete: est. 2 years	
CL-12.6.2 Partner with regional stakeholders and experts to develop an Invasive Insect and Pest Management Plan based on collected data. Utilize an integrated approach that includes a wide variety of strategies, including at a minimum:  (a) management of established pest infestations,  (b) widespread use of and restoration of native plants resilient to regional pest threats;  (c) regular monitoring activities, and (d) requirements to include invasive species prevention plans in future projects.	WRS	Start: 2028 Complete: est. 5 years	

# Goal CL-13 Ensure that zoning and development decisions support compact urban development, prevent displacement, and foster system-wide resilience, including a resilient local economy.

Compact, walkable, and transit-oriented cities are vital to building community resilience. Zoning decisions should support this future, while also striving to ensure equity in decision-making.

Policies and Implementation Actions	Lead	Period	Notes
CL-13.1 Develop anti-displacement programs in overburdened communities when increasing densities.	CDD, WRS	<b>Start:</b> 2025	Equity-focused
CL-13.1.1 Review existing anti-displacement and equity decision-making tools and use these to develop guidance specific to Tumwater for future housing and zoning decisions.	CDD, WRS	Start: 2025 Complete: est. 2 years	Equity-focused
CL-13.1.2 Conduct extensive outreach activities in frontline communities at risk of displacement to collaboratively develop a set of antidisplacement strategies.	CDD, WRS	Start: 2027 Complete: est. 3 years	Equity-focused
CL-13.1.3 Review land use maps and Comprehensive Vulnerability Assessment findings to identify regions at high-risk of disaster displacement such as barriers to rebuilding housing in high-risk areas and develop strategies in collaboration with impacted communities to develop solutions.	CDD, WRS	Start: 2028 Complete: est. 5 years	Equity-focused
CL-13.2 Form a working group to secure	EXD, WRS	<b>Start:</b> 2025	
Tumwater's economic resilience.  CL-13.2.1 Develop partnerships within the local business community and in collaboration with existing economic organizations and other stakeholders to set up a working group to analyze projected economic impacts on Tumwater.	EXD, WRS, Chambers of Commerce, EDC	Start: 2027 Complete: est. 2 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-13.2.2 Provide resources to the local Economic Resilience Working Group to inform the development of an economic resilience component of the Economic Development Plan.	EXD, WRS	Start: 2029 Complete: est. 1-2 years	
CL-13.2.3 Coordinate with partners to incorporate continuity of operations thinking into the County's Comprehensive Emergency Management Plan.	EXD, WRS, Economic Resilience Working Group, County	Start: 2029 Complete: est. 4 years	
CL-13.2.4 Form partnerships with organizations that aid workers affected by climate change who are transitioning to new fields of employment to share their services with Tumwater community members.	EXD, WRS	Start: 2025 Complete: est. 7 years	Developed from CPAT recommended action Equity-focused
CL-13.3 Embed environmental justice in City land use decisions.	CDD, WRS	<b>Start:</b> 2025	Developed from CPAT recommended policy  Equity-focused
CL-13.3.1 Develop an Environmental Justice Audit process, using the State Department of Ecology guidance as well as US EPA guidance to inform Tumwater's audit process.	CDD, WRS	Start: 2025 Complete: 3 years	Equity-focused
CL-13.3.2 Conduct a city-wide environmental justice audit prior to amending land use designations.	WRS & CDD	Start: 2028 Ongoing as needed	Equity-focused
CL-13.4 Restore and maintain critical areas, non-regulated open space areas, and the floodplain to maximize climate resilience and ecosystem benefits.	WRS	<b>Start:</b> 2026	
CL-13.4.1 Inventory existing and projected vulnerabilities of critical areas, open spaces, and floodplain-adjacent parcels.	WRS	Start: 2026 Complete: est. 2 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-13.4.2 Identify maintenance and restoration actions needed to keep critical areas and open spaces resilient. Prepare a report outlining the recommended actions which should incorporate green and graygreen infrastructure that will enhance natural systems into recommended actions.	WRS & TED	Start: 2028 Complete: 3 years	
CL-13.4.3 When new State best available science is issued, update critical areas ordinances.	CDD	Ongoing	
CL-13.4.4 Coordinate with FEMA to update floodplain and flood risk maps for the region based on projected extreme precipitation, increased winter streamflow, and sea-level rise due to climate change.	CDD, FEMA	Start: 2026 Complete: est. 6 years	
CL-13.4.5 Review best available science for buffers and setbacks for steep slopes vulnerable to erosion exacerbated by climate change, and establish new minimums, if necessary, so that improvements are not required to protect structures during their expected life.	CDD	Start: 2026 Reassess every 2 years	
CL-13.5 Identify and implement strategies for reducing residential development pressure in the wildland-urban interface.	CDD	<b>Start:</b> 2030	
CL-13.5.1 Identify areas with high fire risk and explore the feasibility of land use changes to reduce further development in these areas.	CDD	Start: 2032 Complete: est. 1-3 years	Longer expected period due to uncertainty around WUI mapping
CL-13.5.2 Establish incentives and regulations to maintain open space buffers to reduce wildfire risk.	WRS, CDD	Start: 2030 Complete: est. 3-5 years	Developed from CPAT recommended action
CL-13.6 Encourage the location of new development in areas where exposure to climate hazards is low and ecological impacts are minimized.	CDD	<b>Start:</b> 2025	Developed from CPAT recommended policy

Policies and Implementation Actions	Lead	Period	Notes
CL-13.6.1 Develop design guidelines for climate-resilient multi-use development. Guidelines should require residential development to be designed for passive survivability under future climate projections.	CDD	Start: 2030 Complete: est. 5 years	
CL-13.6.2 Update the regional Transfer of Development Rights program to meet state-mandated growth requirements while preventing urban sprawl and protecting key ecosystems.	County, CDD	Start: 2028 Complete: est. 1-2 years	Developed from CPAT recommended action
CL-13.6.3 Develop hazard-specific overlay zones and create design guidelines, codes, and guidebooks that will lead to climate resilient development.	WRS, CDD, TED	Start: 2028 Complete: est. 10 years	
CL-13.6.4 Update development regulations on a regular basis to incorporate best practices for reducing the risk of wildfire, extreme heat, flooding, and other climate-exacerbated hazards.	CDD	Start: 2025 Reassess every 5 years	
CL-13.7 Support local businesses' efforts to bolster climate preparedness and continuity of operations.	EXD, WRS	<b>Start:</b> 2035	
CL-13.7.1 In partnership key stakeholders, draft recommendations for new building codes and incentive programs that help installation of on-site renewable energy and battery storage.	EXD, Chambers of Commerce, Thurston EDC, Economic Resilience Working Group	Start: 2035 Complete: est. 3 years	
CL-13.8 In areas with significant vulnerability to climate hazards, facilitate and support long-term community visioning including consideration of managed retreat.	CDD, WRS	<b>Start:</b> 2026	

Policies and Implementation Actions	Lead	Period	Notes
CL-13.8.1 Utilize information from the Comprehensive Vulnerability Assessment to identify areas at high risk from climate impacts that will require substantial adaptation activities or the managed retreat of the entire community.	CDD, WRS	Start: 2028 Complete: est. 7 years	
CL-13.8.2 Conduct regular outreach activities with identified high-risk communities and other key stakeholders (Transportation, developers, etc.) to educate them on risks.	CDD, WRS	Start: 2028 Ongoing	
CL-13.8.3 Review adaptation plans for communities in other cities and neighborhoods facing similar risks.	CDD, WRS	Start: 2026 Complete: est. 1 year	
CL-13.8.4 Establish long term action plans with at-risk communities, with distinct phases for different increasing levels of risk.	CDD, WRS	Start: 2027 Complete: est. 3-5 years	

# Goal CL-14 Ensure that the local transportation system, including infrastructure, routes, and non-motorized travel modes, fosters connectivity and can withstand and recover quickly from climate impacts.

Although the Tumwater Transportation Plan lays out a framework for an equitable, accessible, and multimodal future for the City, it is important to address the intersection of Transportation planning and climate resilience.

Policies and Implementation Actions	Lead	Period	Notes
CL-14.1 Improve street connectivity, transit	TED	<b>Start:</b> 2028	Developed from
accessibility, and walkability, including			CPAT recommended
sidewalks and street crossings, to ease			policy & from
emergency evacuation.			community
			engagement
			suggestion

Policies and Implementation Actions	Lead	Period	Notes
CL-14.1.1 Assess Tumwater's street network to find gaps in street connectivity and transit access.	TED	Start: 2028 Complete: est. 5 years	Developed from CPAT recommended action & from community engagement suggestion
CL-14.1.2 Redesign streets in alignment with complete streets mandate where possible, eliminating connectivity gaps to facilitate smoother evacuations and create whole communities connected by safe walking routes.	TED	Start: 2035 Complete: est. >10 years	Developed from CPAT recommended action & from community engagement suggestion
CL-14.1.3 Work with Intercity Transit to expand their transit program that provides evacuation aid to community members who do not or cannot drive, utilizing the vulnerable population database established by CL-10.1.2.	Intercity Transit, Fire and EMS	Start: 2029 Complete: est. 8 years	Equity-focused
CL-14.2 Prioritize access to and restoration of water bodies and water-adjacent sites when designing and siting new and expanded transportation infrastructure.	TED, WRS	Ongoing	
CL-14.3 Improve habitat connectivity wherever possible when constructing and redeveloping roadways.	TED, WRS. WSDOT	<b>Start:</b> 2028	Developed from CPAT recommended policy
CL-14.3.1 Integrate habitat connectivity considerations into road construction and redevelopment projects, reviewing plans for opportunities to make roads more permeable for both aquatic and terrestrial species through actions like widening culverts.	TED, WRS, WSDOT	Start: 2028 Ongoing	Developed from CPAT recommended action
CL-14.4 Facilitate quick recovery of the whole multimodal transportation system after disruption from disasters or extreme weather events.	TED	<b>Start:</b> 2028	Developed from community engagement suggestion

Policies and Implementation Actions	Lead	Period	Notes
CL-14.4.1 Develop transportation recovery	TED	<b>Start:</b> 2028	Developed from
plans that ensure recovery of one		Complete:	community
aspect of the transportation system		est. 5 years	engagement
does not inhibit recovery of other			suggestion
forms of transportation. For			
example, snow plowing should not			
restrict access to bike lanes.			
CL-14.4.2 Prioritize infrastructure needed	TED,	Ongoing	Developed from
for the recovery of Intercity Transit	Intercity		community
in the aftermath of an extreme	Transit		engagement
weather event.			suggestion

#### Goal CL-15 Protect and improve water quality and availability.

Climate change will cause drastic and uncertain impacts to regional watersheds. Tumwater needs to prepare for potential droughts, changes in seasonal water flow, and impacts to aquatic life.

Policies and Implementation Actions	Lead	Period	Notes
CL-15.1 Manage Tumwater's water sustainably, ensuring there is adequate quantity and quality of water available for future generations.	WRS	<b>Start:</b> 2025	Developed from CPAT recommended policy
CL-15.1.1 Develop guidance for Tumwater residents, businesses, and developers on sustainable water management practices. Topics may include smart irrigation, drought tolerant plant selection, etc.	WRS	Start: 2025 Complete: est. 1-2 years	
CL-15.1.2 Study projected climate hazard impacts on water quality & quantity and develop strategies to protect and preserve water for Tumwater's future.	WRS	Ongoing (as new projections are available)	

Policies and Implementation Actions	Lead	Period	Notes
CL-15.1.3 Evaluate the long-term adequacy of water delivery infrastructure to ensure that changes in hydrological patterns can be anticipated and managed effectively. Changes in hydrological patterns may include increases in flooding frequency or reduction of late-summer water availability associated with climate change.	WRS	Start: 2028 Complete: est. 3-4 years	
CL-15.1.4 Assess current groundwater reservoirs for any projected climate impacts, including saltwater intrusion, contamination, and reduced quantities. If necessary, develop and implement strategies to mitigate impacts.	WRS	Start: 2028 Complete: est. 4-5 years	
CL-15.2 Improve the City's drought resilience through water reclamation and conservation measures, drought-tolerant landscape design, and advocacy.	WRS, CDD	<b>Start:</b> 2025	
CL-15.2.1 Expand use of reclaimed water at City facilities when resources are available and expand municipal reclaimed water systems.	WRS	Start: 2026 Reassess every 2 years	Developed from CPAT recommended action
CL-15.2.2 Allow onsite non-potable water systems such as rain cisterns to reduce water demand in private-sector commercial and residential buildings.	WRS	Start: 2025 Complete: est. 4-6 years	
CL-15.2.3 Promote rain gardens, dormant lawns and lawn alternatives, as well as native and drought-tolerant landscaping choices. Secure funding to establish an incentive or rebate program for community members who use native and drought-tolerant landscaping options.	WRS	Start: 2025 Ongoing	Developed from CPAT recommended action

Policies and Implementation Actions	Lead	Period	Notes
CL-15.2.4 Establish a demonstration area for	WRS &	<b>Start:</b> 2026	Developed from
lawn alternatives that highlights	Parks,	Complete:	CPAT recommended
native and drought-tolerant	Recreation,	est. 1 year	action
landscaping.	& Facilities		
	Department		
CL-15.2.5 Lobby at the county health	WRS	<b>Start:</b> 2025	Developed from
department and state level agencies		Ongoing	CPAT recommended
for the reuse of greywater on-site in			action
buildings for flushing toilets,			
irrigation.	14/00		
CL-15.2.6 Lobby at state level to prioritize	WRS	<b>Start:</b> 2025	Developed from
using water resources in alignment		Ongoing	CPAT recommended
with public interests.	WDC	Ctt- 202C	action
CL-15.3 Develop and implement a	WRS	<b>Start:</b> 2026	
comprehensive drought resilience strategy that factors in projected			
climate impacts and sets action levels			
for different drought stages.			
CL-15.3.1 Conduct outreach to understand	WRS	<b>Start</b> : 2026	
current water resource needs (i.e.	WIG	Complete:	
water-reliant livelihoods).		est. 1 year	
CL-15.3.2 Draft measures to ensure low-	WRS	Start: 2027	
income residents and residents		Complete:	
whose income relies on water		est. 2 years	
availability continue to receive		,	
water at a fair rate.			
CL-15.4 Increase use of Low-Impact	WRS	<b>Start:</b> 2025	
Development (LID) infrastructure			
projects that help capture, filter, store,			
and reuse stormwater runoff.			
CL-15.4.1 Continue to prioritize funding for	WRS	Ongoing	
LID infrastructure projects using			
Stormwater Utility Funds.			
CL-15.4.2 For all stormwater project designs,	WRS	Ongoing	
require use of improved stormwater			
runoff modeling that uses future			
rainfall projections.	WDC	Chart. 2025	
CL-15.4.3 Share guidance for different types	WRS	Start: 2025	
of LID best management practices with developers to use in future		Ongoing	
projects.			
ρι υjects.			

Policies and Implementation Actions	Lead	Period	Notes
CL-15.5 Assess current and projected future	WRS	<b>Start:</b> 2030	
water demand and water storage.			
CL-15.5.1 Evaluate current water storage	WRS	<b>Start:</b> 2030	
capacity against projected water		Complete:	
availability and population growth		est. 2 years	
to discover whether additional			
storage is required.			
CL-15.5.2 Identify preferred methods and	WRS	<b>Start:</b> 2032	
sites for more water storage		Complete:	
through community outreach and a		est. 3 years	
comprehensive review of water			
storage options.			
CL-15.5.3 Construct and maintain new	WRS	Ongoing	
water-storage systems as needed.			

# Goal CL-16 Expand local food justice to address climate impacts and increase access to nourishing, affordable, culturally appropriate, and climate-friendly foods while expanding local use of composting.

Climate change will have inevitable impacts on access to nourishing and culturally appropriate foods, but Tumwater has an opportunity to secure a sustainable food future. At the same time, the City can address waste reduction goals by shifting food waste into composting waste streams.

Policies and Implementation Actions	Lead	Period	Notes
CL-16.1 Improve local food justice through collaboration, education, and advocacy.	WRS	<b>Start:</b> 2025	
CL-16.1.1 Implement the Food System Plan, updating it periodically as necessary.	CDD, WRS	Start: 2025 Complete: est. 1-2 years	
CL-16.1.2 Identify relevant stakeholders who can further sustainable, climate-adapted, and equitable food distribution in Tumwater.	CDD, WRS	Start: 2025 Complete: est. 1 year	Equity-focused
CL-16.1.3 Establish opportunities for the community to provide and engage in local and sustainable food production and consumption, such as farmers markets and community gardens.	WRS	Start: 2025 Complete: est. 2-5 years	

Policies and Implementation Actions	Lead	Period	Notes
CL-16.1.4 Work with urban farms and community gardens to invest in climate-resilient water storage solutions such as natural rainwater collection.	WRS	Start: 2027 Complete: est. 3 years	Developed from CPAT recommended action
CL-16.1.5 Advocate for state-wide regulations that protect producers and consumers from climate change impacts on the food system.	WRS	Ongoing	
CL-16.1.6 Collaborate with community members to identify culturally important foods and develop strategies to secure access to these, incorporating strategies into an update to the Food System Plan.	WRS	Start: 2030 Complete: est. 2-3 years	
CL-16.2 Increase composting in urban agriculture and by private residences.	WRS	<b>Start:</b> 2026	
CL-16.2.1 Develop outreach materials to promote and educate on composting methods and systems.	WRS	Start: 2026 Complete: est. 1 year	
CL-16.2.4 Develop an incentive program for residents to install and utilize composting systems.	WRS	Start: 2031 Complete: 1-2 years	
CL-16.3 Expand consistent access to food for Tumwater community members.	WRS	<b>Start:</b> 2025	Developed from CPAT recommended policy Equity-focused
CL-16.3.1 Coordinate with the County to expand access to food bank services.	WRS, County	Start: 2025 Complete: est. 1-3 years	Equity-focused
CL-16.3.2 Conduct community outreach to find gaps and barriers in consistent access to nutritious food.	WRS	Start: 2026 Complete: est. 1 year	Equity-focused