

# CLIMATE ACTION PLAN

# EXECUTIVE SUMMARY

Beginning in 2022, Clallam County undertook a significant climate action initiative to develop a Climate Action Plan (CAP) to mitigate greenhouse gas (GHG) emissions from County government operations. The impacts of climate change are already being observed in Clallam County, including warmer maximum temperatures, rising sea levels along coastlines, and increased extreme weather events including drought and flooding.

This CAP sets the **foundation** for future climate action by outlining key strategies and actions across many focus areas that the County and its community can implement to reduce greenhouse gas (GHG) emissions and increase capacity for adapting to the impacts of climate change. This plan **prioritizes actions that can be implemented in the next five years** as the County takes steps toward meaningful climate action.

## Climate Action Planning Process

The CAP was developed in an iterative process that included multiple rounds of discussion and refinement from the County's "**Climate Advisory Committee**" (CAC), an assemblage of County employees across various departments whose expertise and County insight helped to create a CAP that is tailored to Clallam County.

In addition to monthly meetings with the CAC, the CAP development process also included:

- An initial **review of County plans and policies** including the County's Parks Master Plan, Solid Waste Management Plan, and Shoreline Master Plan.
- 2019 communitywide and municipal **GHG inventories**.
- A **forecast** of Clallam County's future GHG emissions under different scenarios including a "no action" future, and a scenario that forecasts the impacts of state and federal climate action legislation.
- An **action-by-action analysis** process to determine benefits that could be provided to the community.

## Greenhouse Gas Emissions

To understand Clallam County's GHG emissions, two types of inventories were prepared:

- A **geographic** inventory accounts for the emissions produced from activities that occur within a geographic or political boundaries of a community or local government.
- A **consumption-based** emissions inventory accounts for the emissions related to a community's carbon footprint, including beyond geographic boundaries, which includes the production, transportation, use, and disposal of goods and services consumed by the community.

These inventories establish a **baseline estimate** that can be used to measure progress into the future and illustrate priority areas for emissions reduction.



## Geographic Emissions Inventories

As part of the CAP development process, two geographic inventories were completed:

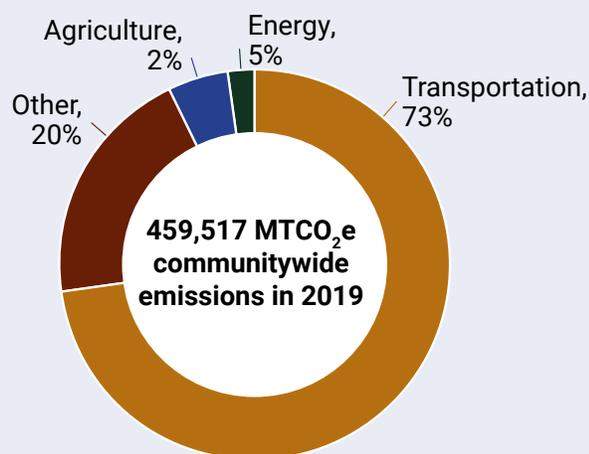
A **communitywide GHG inventory** which includes all emissions that occur within Clallam County's geographic boundaries from residents, businesses, visitors, and industrial facilities.

A **government operations** inventory which includes GHG emissions produced by Clallam County's municipal operations, such as emissions from County fleet vehicles or energy used to power municipal facilities.

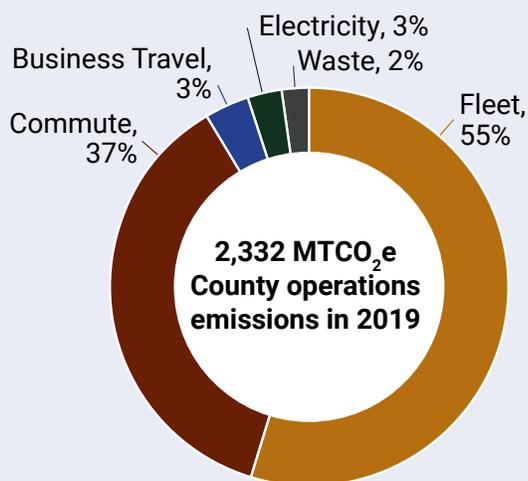
The results of the communitywide GHG inventory indicate that Clallam County's residents, businesses, employees, and visitors produced **459,517 metrics tons of carbon dioxide equivalent (MTCO<sub>2</sub>e)** in 2019, approximately **6 MTCO<sub>2</sub>e per capita**. Figure 1 shows total emissions by sector:

- The **transportation** sector contributed the largest share of total emissions (73%).
- Emissions sources within the "Other" category consist of **industrial process emissions** (10%), **refrigerants** (9%), and **solid waste** (1%).
- **Energy** contributed 5% of total emissions and **agriculture** contributed 2% of emissions.

**Figure 1. 2019 Communitywide Emissions by Sector (%)**



**Figure 2. 2019 County Operations Emissions (MTCO<sub>2</sub>e)**



The results of the government operations emissions inventory show that the County produced **2,332 MTCO<sub>2</sub>e** in 2019 (Figure 2), equivalent to approximately **5 MTCO<sub>2</sub>e per County employee**.

The vast majority (**95%**) of emissions produced by government operations are from transportation (County fleet vehicles, employee commute, business travel).



## Consumption-Based Emissions Inventory

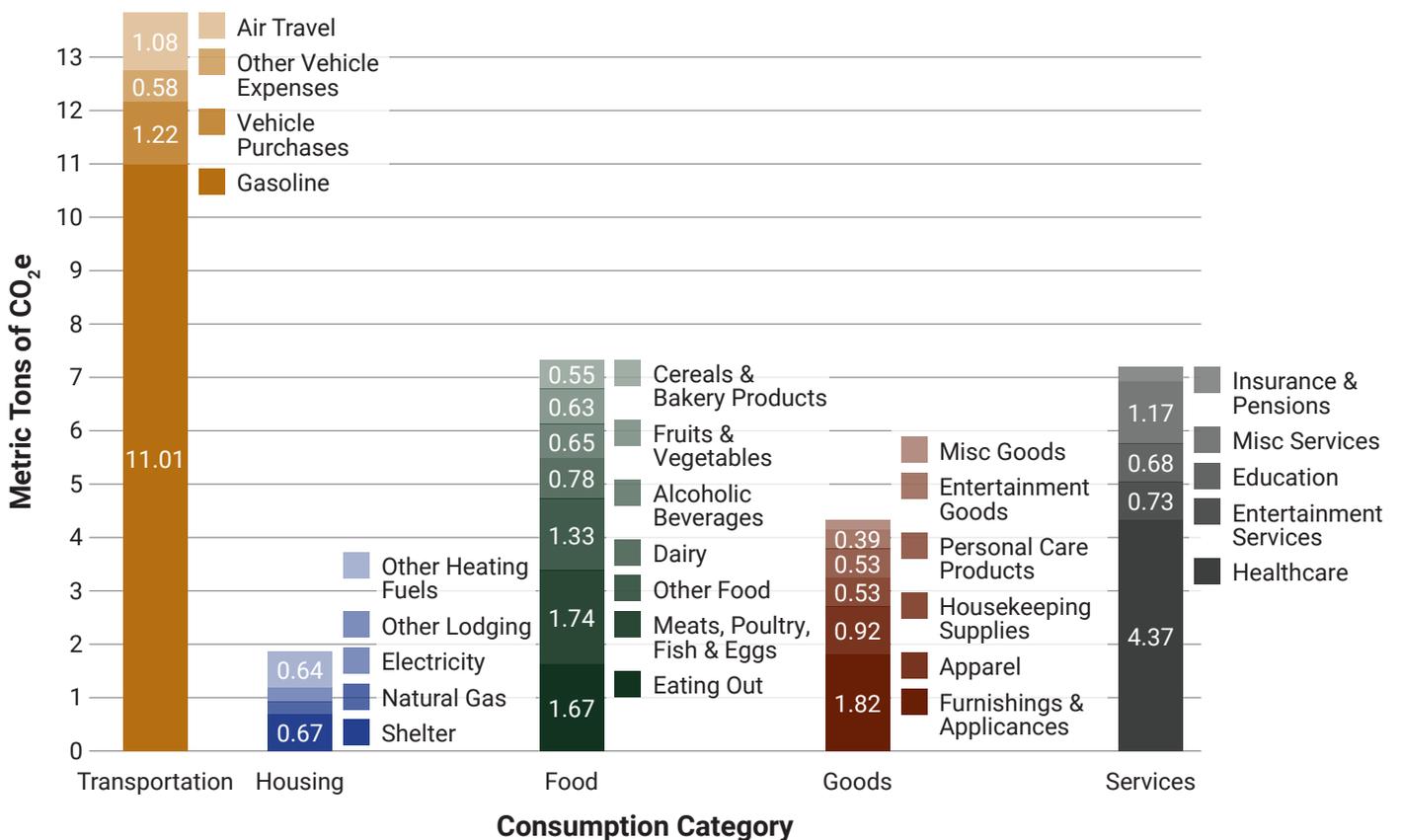
The consumption-based emissions inventory (CBEI) estimated that Clallam County’s residents produced approximately **1.2 million MTCO<sub>2</sub>e** in 2019. This means that on average, each household produced roughly 35 MTCO<sub>2</sub>e per year, or approximately **15 MTCO<sub>2</sub>e per person**.

The CBEI includes five categories: transportation, housing, food, goods, and services.

Figure 3 shows average emissions by source, per household. **Transportation** was the largest emissions category, followed by **food and services**. Overall, **gasoline** was the single largest source of emissions in 2019, followed by **healthcare**.<sup>1</sup>

CBEIs provide the community with insight on how to reduce their personal or household level emissions. The primary focus of this CAP is to outline actions that Clallam County can take to reduce GHG emissions in its facilities and operations going forward. Although the process for developing these strategies and recommendations has not yet included broad community engagement, it is the intention of the Commissioners to undertake a public engagement process for feedback on the approaches outlined in the plan.

Figure 3. 2019 Consumption-Based Emissions (MTCO<sub>2</sub>e/household)

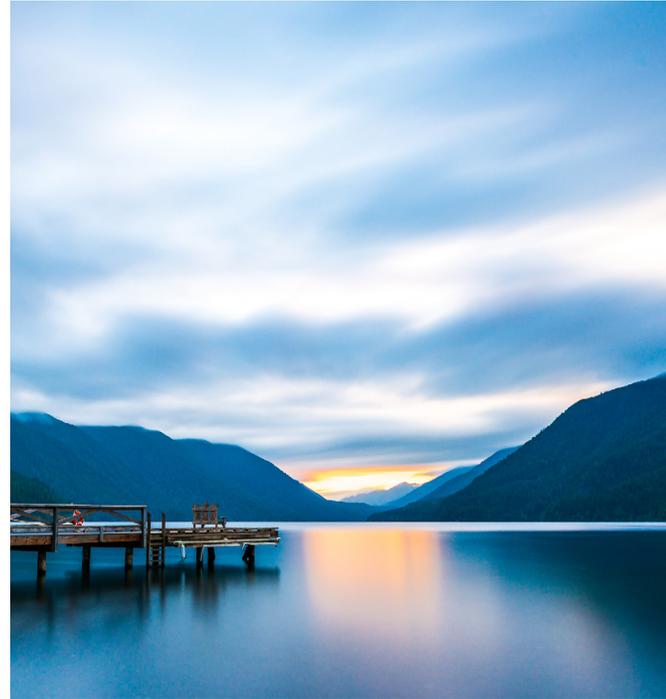


<sup>1</sup> Healthcare emissions include emissions from hospitals, doctor and dentist offices, and other medical facilities; pharmaceutical manufacturing; medical equipment; etc.

## Goals, Strategies, and Actions

The goals, strategies, and actions presented below are a strategic mix of County- and community-focused initiatives and actions designed to reduce governmental and communitywide emissions. Developed with guidance from the County Climate Action Committee (CAC), these strategies and actions work to protect and maintain local natural resources and ecosystems, public health and safety, and economic vitality. Actions were prioritized if **highly impactful, easily implementable, and/or cost-efficient.**

To ensure longevity and success of the CAP, two main takeaways rose to the top during the CAP development process. First, the need for centralized management, monitoring, and implementation of actions and goals outlined in this plan to ensure focused progress and verifiable results. Secondly, the importance of implementing e-government solutions that could significantly impact emissions and the way Clallam government operates.



### Focus Areas



Energy & Built Environment



Consumption & Solid Waste



Transportation



Land Use



Natural Environment



### Energy & Built Environment

**Goal:** Decrease and mitigate emissions through clean energy and energy efficiency in the built environment.

#### Strategy

#### Action Name

Install and incentivize energy-efficient upgrades and retrofits

- 1.1:** Install energy efficiency retrofits at County facilities
- 1.2:** Incentivize energy efficient retrofits and upgrades for residential and commercial buildings

Use cleaner energy-sources and increase resiliency of energy systems

- 1.3:** Invest in community energy projects



## Consumption & Solid Waste

**Goal:** Reduce organic waste stream by half by 2030 through waste diversion and sustainable consumption.

Strategy	Action Name
Increase waste diversion to reuse, repair, and support edible food rescue	<b>2.1:</b> Expand food waste diversion and education programs <b>2.2:</b> Increase waste diversion in County Operations
Promote green purchasing and sustainable consumption	<b>2.3:</b> Expand on County sustainable purchasing policies and reduce paper waste in County Operations



## Transportation

**Goal:** Increase transportation options, incentivize non-motorized transportation options, facilitate and plan for electrification of vehicles.

Strategy	Action Name
Reduce single-occupant vehicle miles traveled and support non-motorized transportation options	<b>3.1:</b> Create a County employee commute reduction program <b>3.2:</b> Develop a non-motorized transportation plan
Promote green purchasing and sustainable consumption	<b>3.3:</b> County fleet electrification and idle reduction <b>3.4:</b> Prepare for EV infrastructure and use



## Land Use

**Goal:** Implement policies for sustainable, smart development that reduces urban sprawl, strengthens food systems, and increases conservation.

Strategy	Action Name
Invest in and support local food systems	<b>4.1:</b> Support existing gardening programs <b>4.2:</b> Invest in Clallam County's agricultural sector



## Natural Environment

**Goal:** Conserve and protect the environmental attributes and critical areas of Clallam County that contribute to the quality of life for all.

Strategy	Action Name
Protect natural resources and conserve water through policies and programs	<b>5.1:</b> Increase tree planting <b>5.2:</b> Increase native plant landscaping