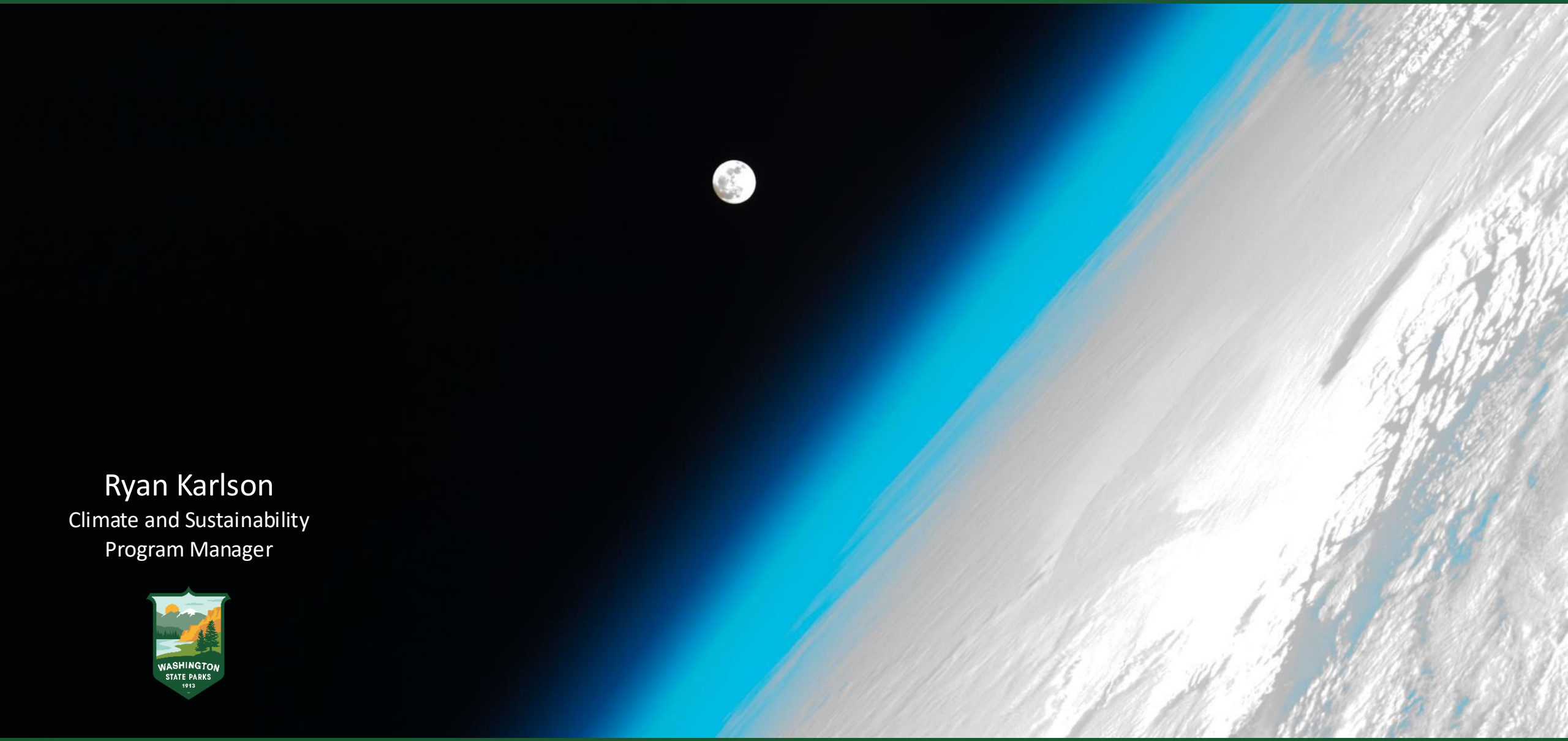
Climate and Sustainability Program Update



Ryan Karlson
Climate and Sustainability
Program Manager

Today's Objectives

Provide staff update on:

2025 Commission Priority # 9:
Implement greenhouse gas reduction strategies/projects and make substantive progress implementing the agency's climate change adaptation plan.

- Overview of greenhouse gas emission reduction metrics
- Summary of clean energy transition investment efforts

Climate Resilience Framework

Adapt

Preparing the park system for emerging climate realities

Mitigate

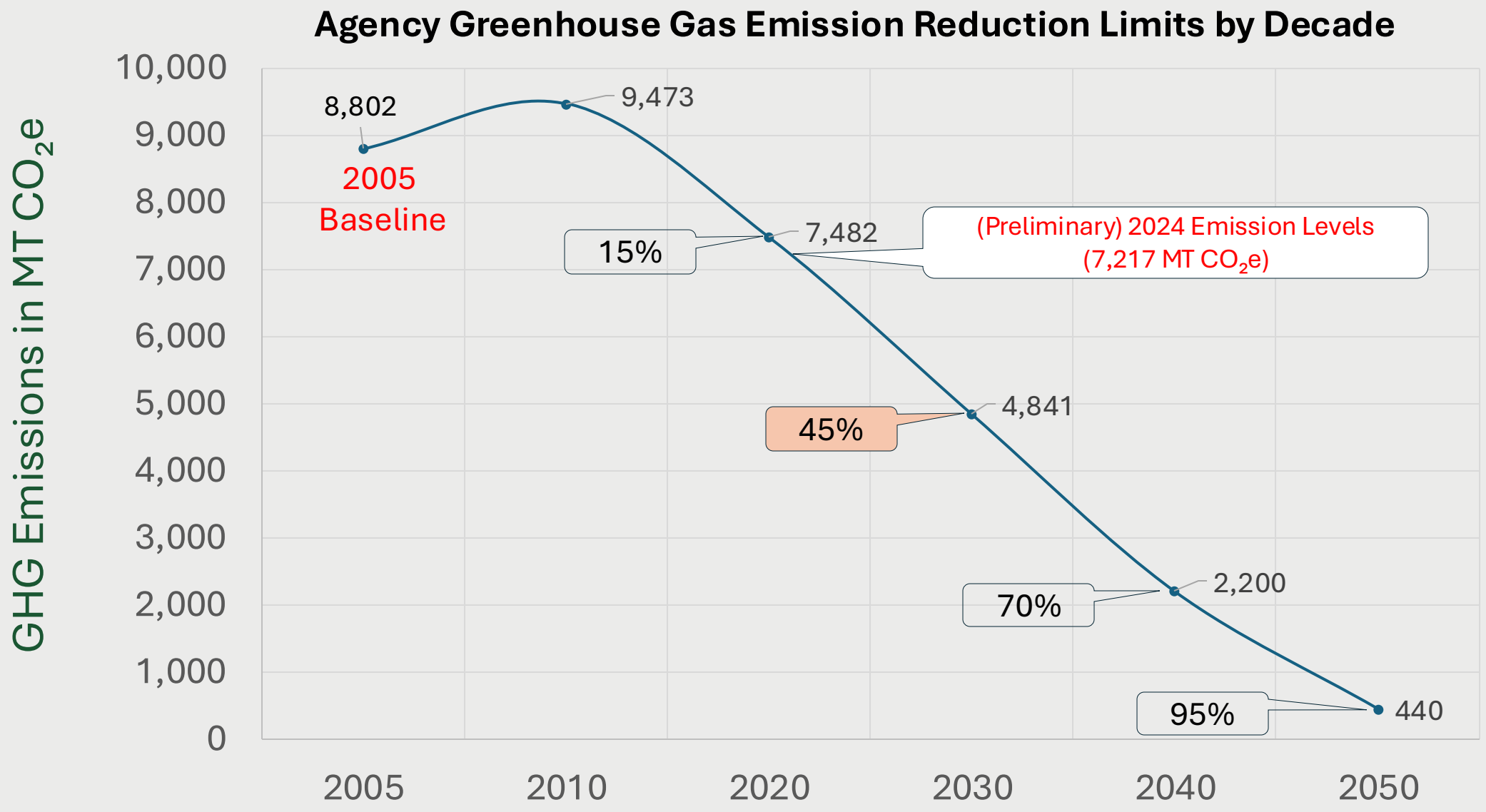
Addressing the agency's contributions to climate change

Educate

Building a shared awareness of climate impacts on the park system

Mainstreaming climate-informed practices into the development, operation and stewardship of the Washington state park system.

RCW 70A.45.050 - Greenhouse gas emission limits for state agencies

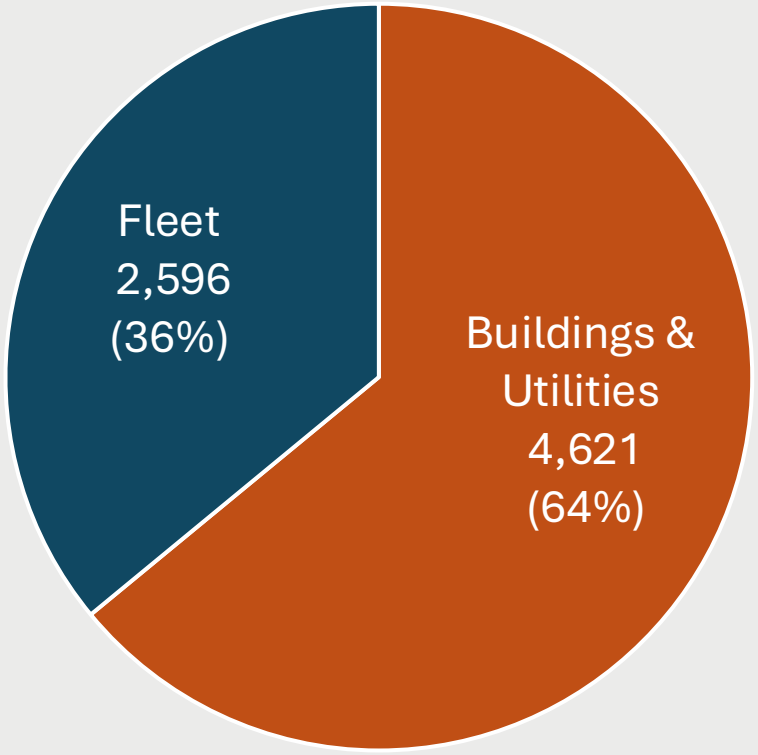


Our “Reported” Carbon Footprint

2024 Agency Reported Greenhouse Gas Emissions

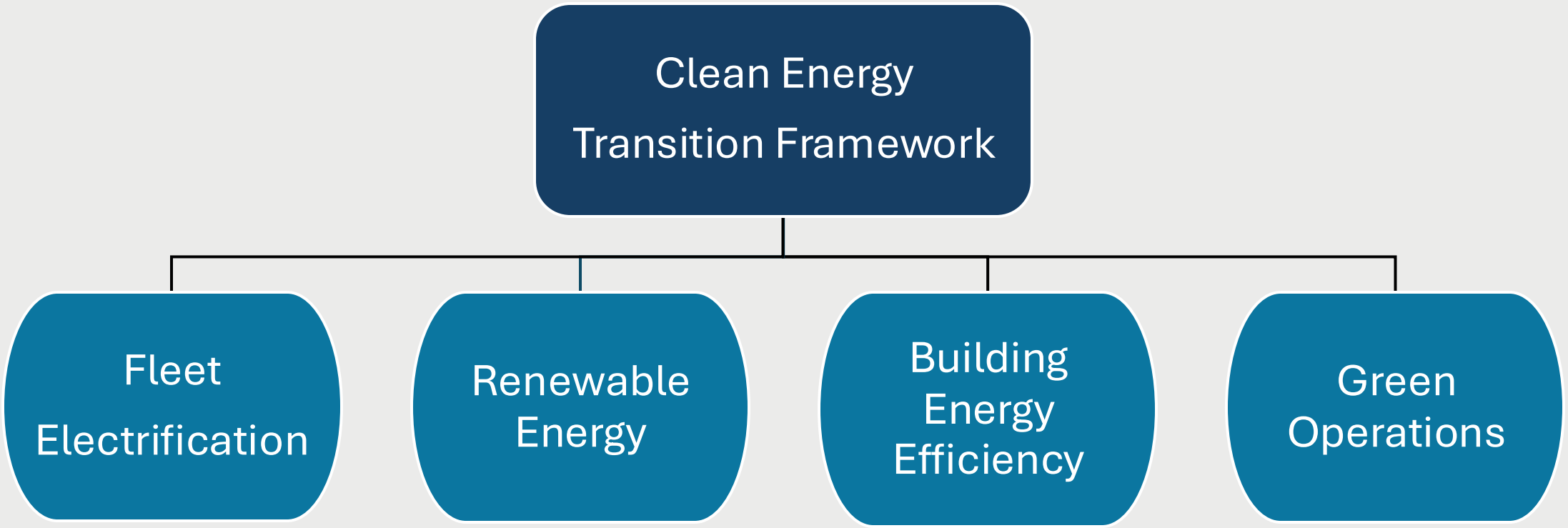
in Metric Ton Carbon Dioxide Equivalent (MT CO_2e)

(Preliminary Total = 7,217 MT CO_2e)



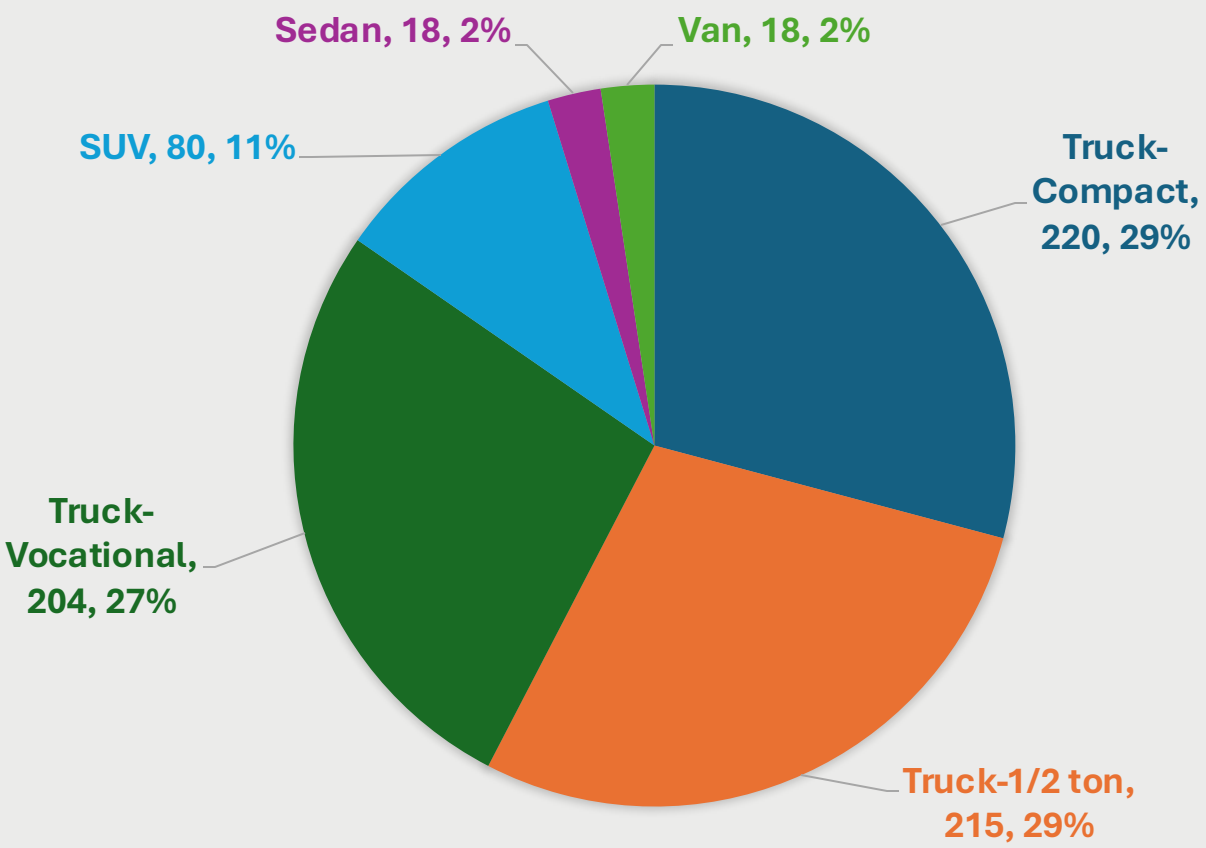
Primary Data Source:
Resource Use Form (RUF)

Greenhouse Gas Emission Reduction Strategy (RCW 70A.45.050)



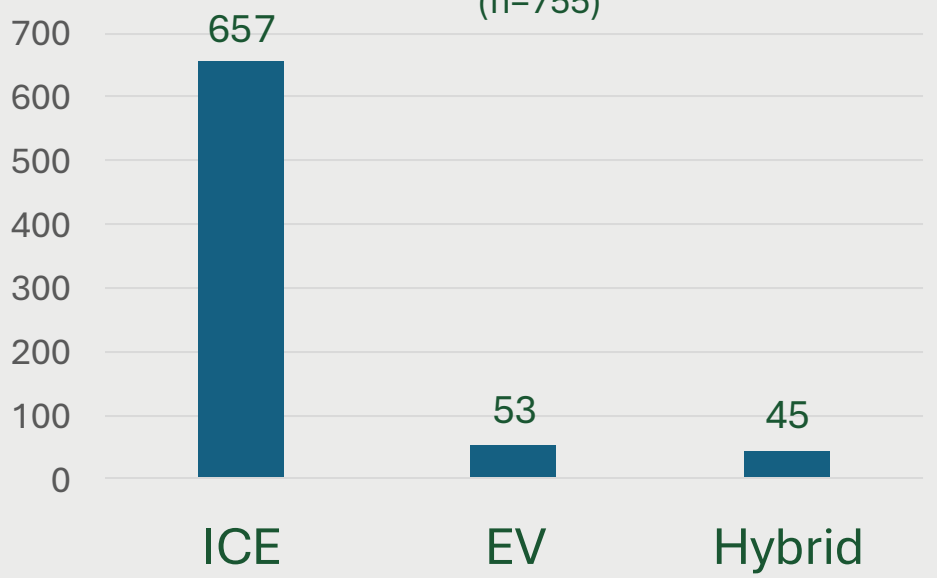
Fleet Electrification

2024 Agency Vehicle Fleet Distribution by Type
(n=755)



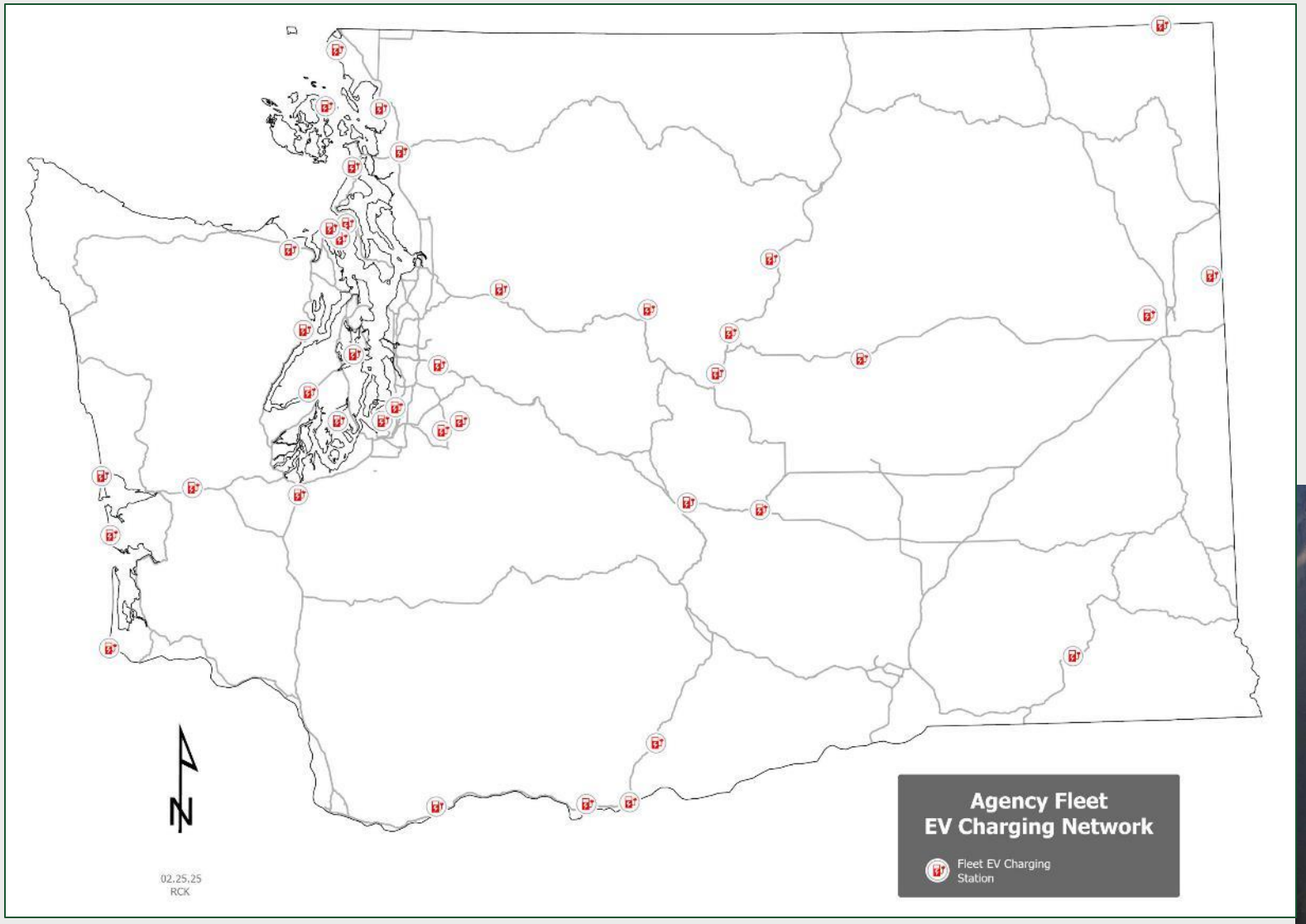

Ford F150 Lightning

2024 Agency Vehicle Fleet by Engine Type
(n=755)



ICE = Internal Combustible Engine EV = Electric Vehicle

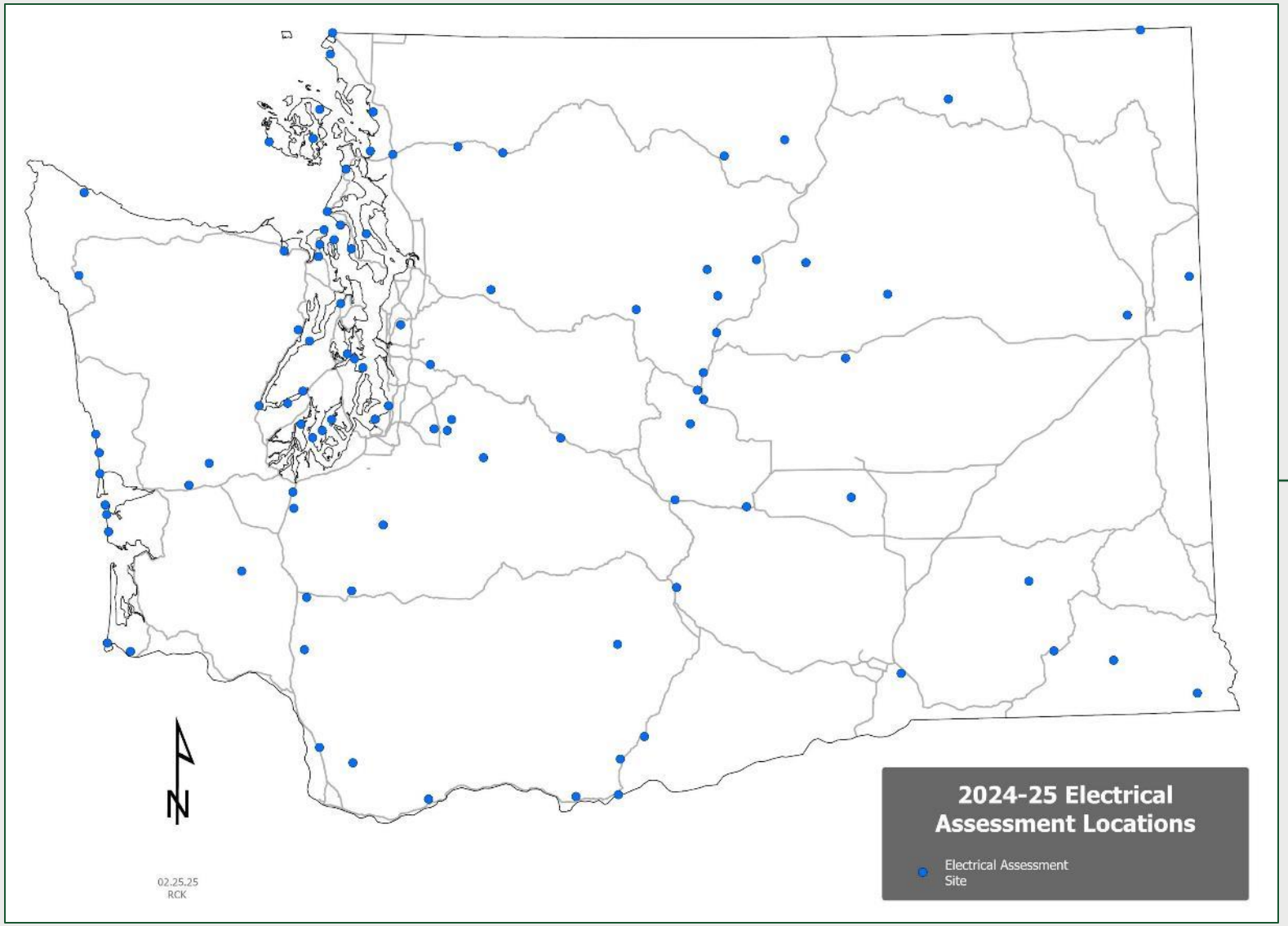
Fleet Electric Vehicle Charging Network



Lessons Learned
(from initial phase)

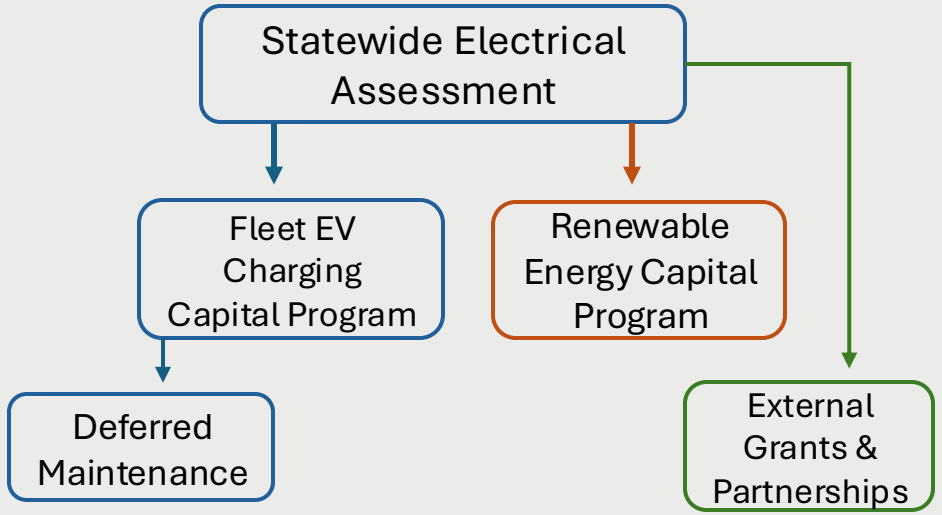
- Some sites don't have electrical capacity for basic EV charging service
- Current chargers are not networked limiting reporting of electricity use and clean energy credits

Statewide Electrical Systems Assessment

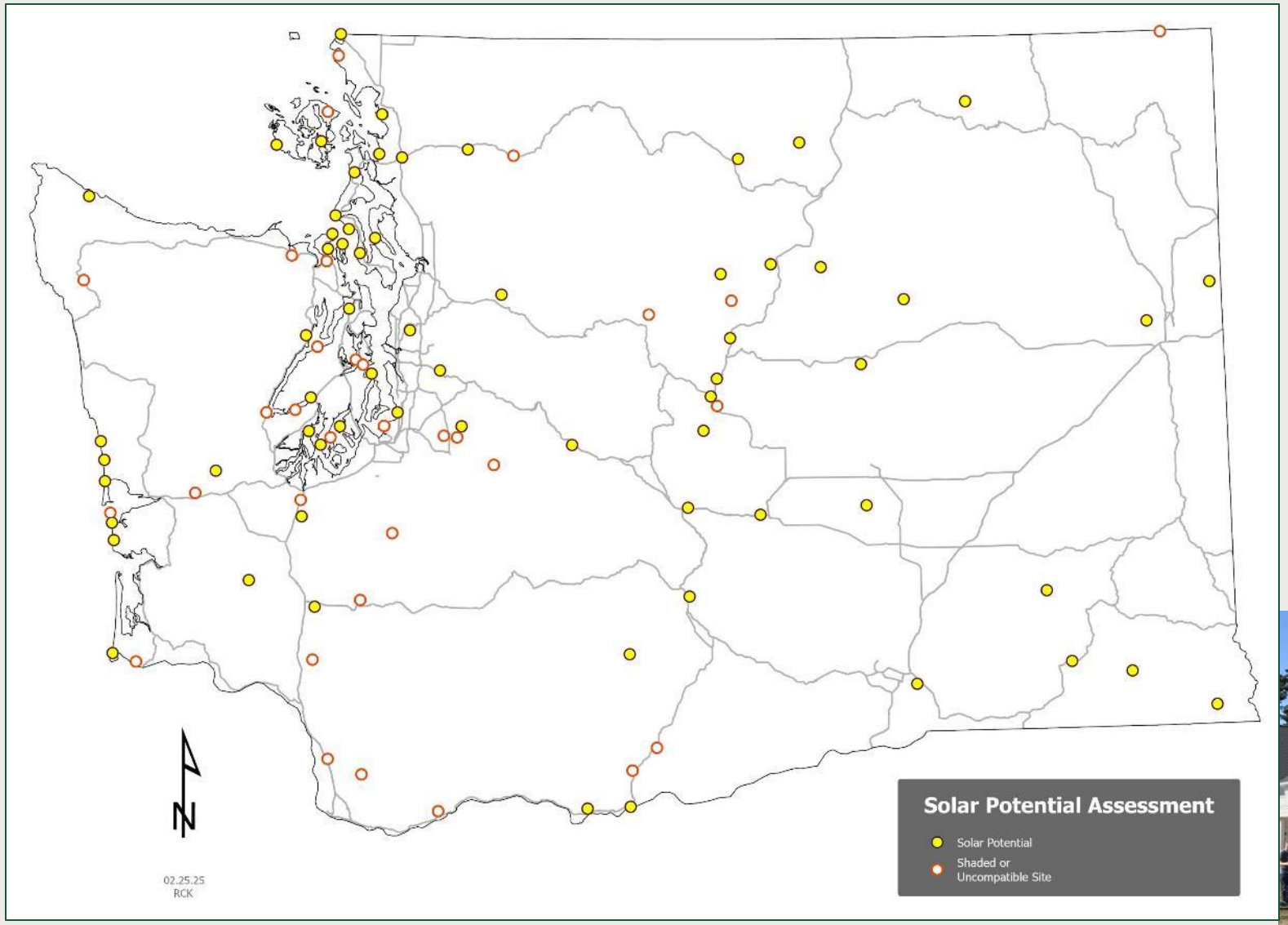


Key (EV charging) Takeaways:

- Many park electrical systems are at or near capacity and need upgrades
- Existing electrical systems have very limited Level 3 EV charging capacity
- Feasibility of adding EV charging capability can be subject to utility provider capacity



Statewide Solar Energy Feasibility Assessment

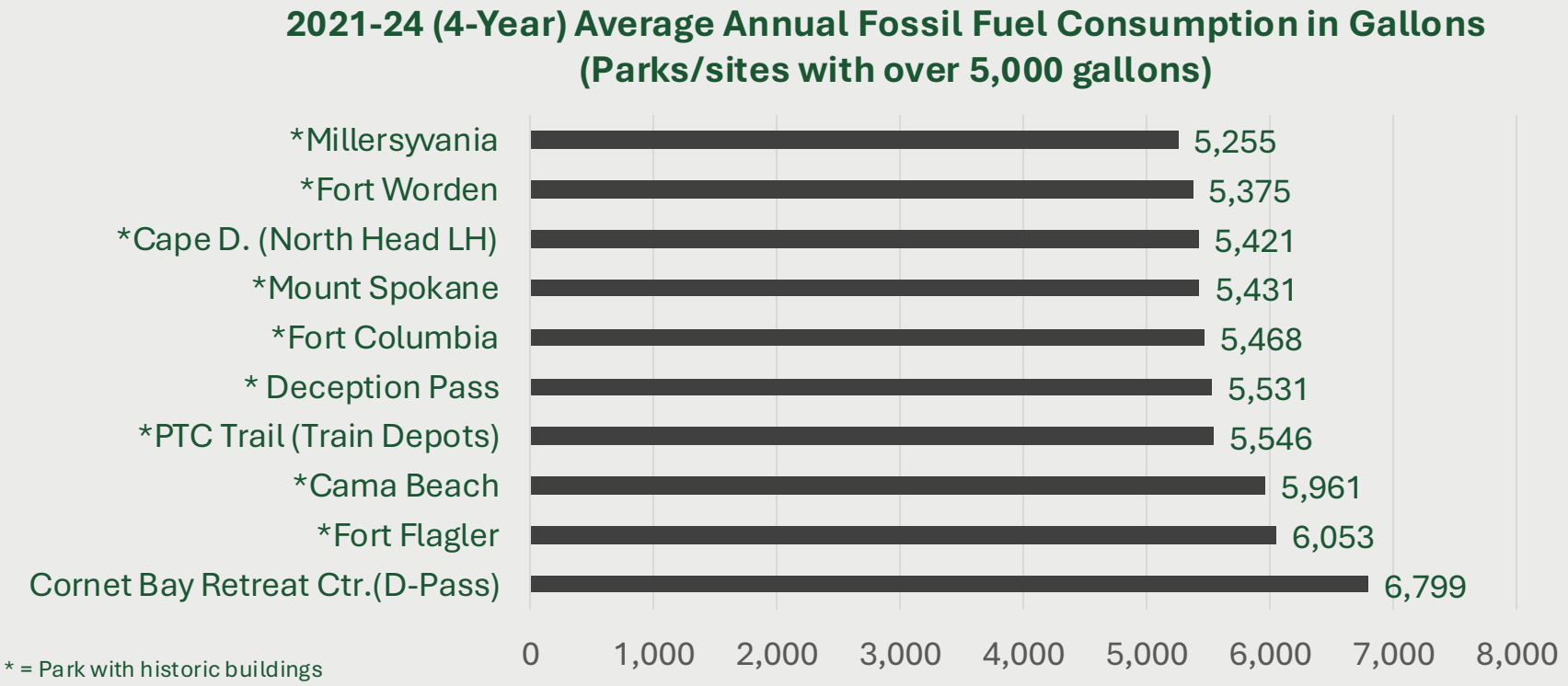


Key Takeaways:

- 60+ of 97 sites assessed have some level of solar generation potential
- The most common potential is rooftop solar panels while other sites are candidates for pole or ground array mounting systems
- Solar facility siting guidelines are needed to identify and minimize impacts on building and environment conditions

Fort Worden Historical State Park

Building Energy Efficiency



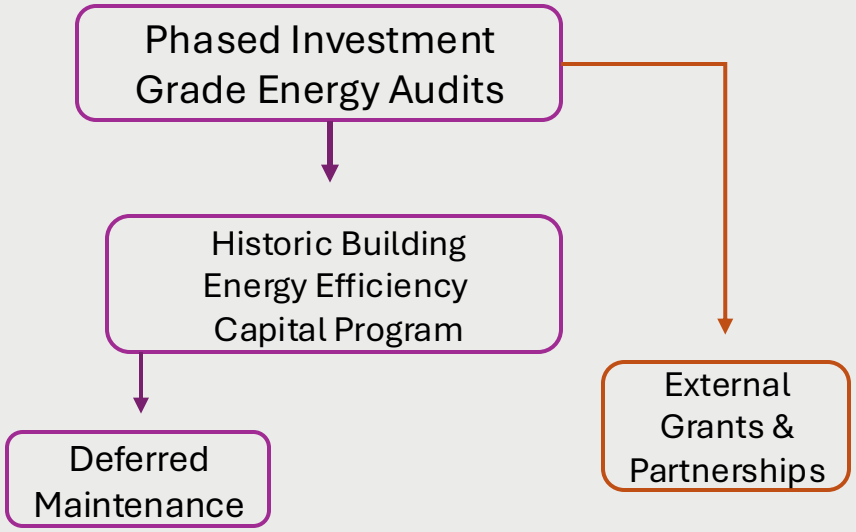
* = Park with historic buildings

Key Goals

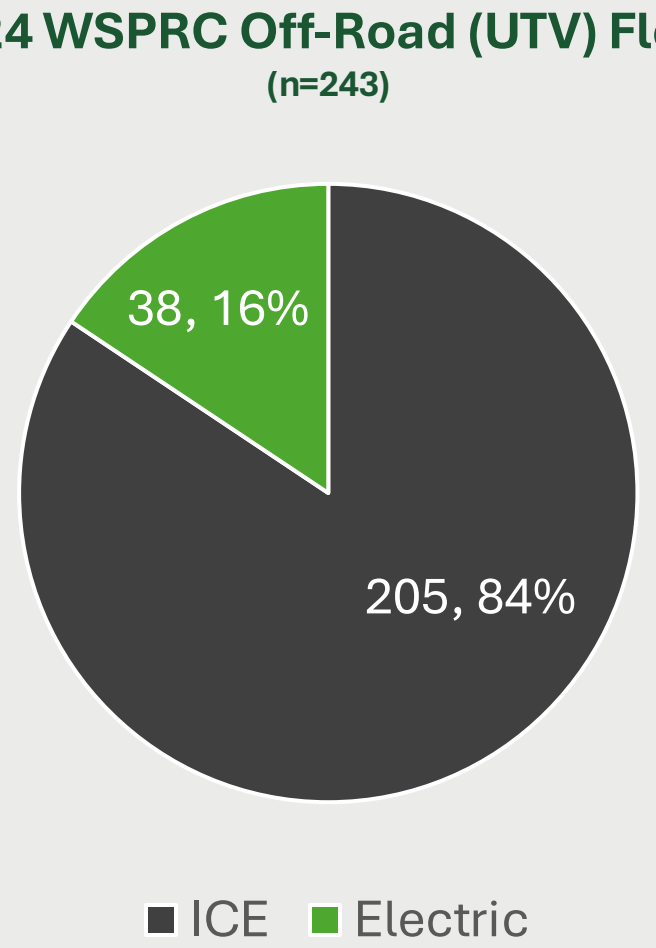
- Reduce carbon footprint of building operation (fossil fuel to electric conversion)
- Optimize energy use and consider on-site generation
- Reduce long-term operating and maintenance costs

Investment Grade Energy Audits

- Approximately 265 historic buildings heated/cooled with electric and fossil fuel sources
- Phase 1 Energy Audit Scope (22 historic buildings)
  - Fort Columbia
  - Fort Flagler
  - North Head Lighthouse Keeper's (Cape D)



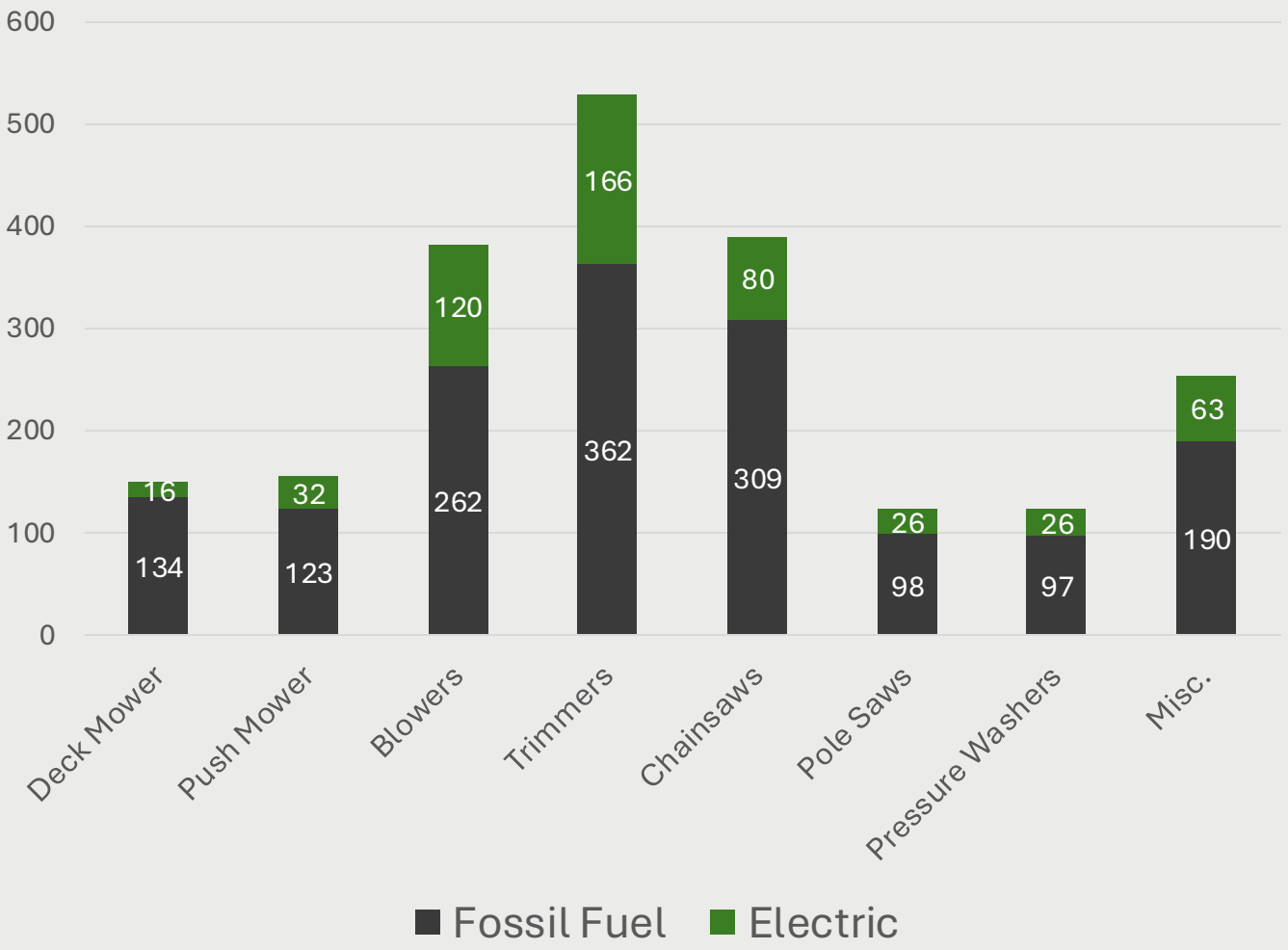
Green Operations

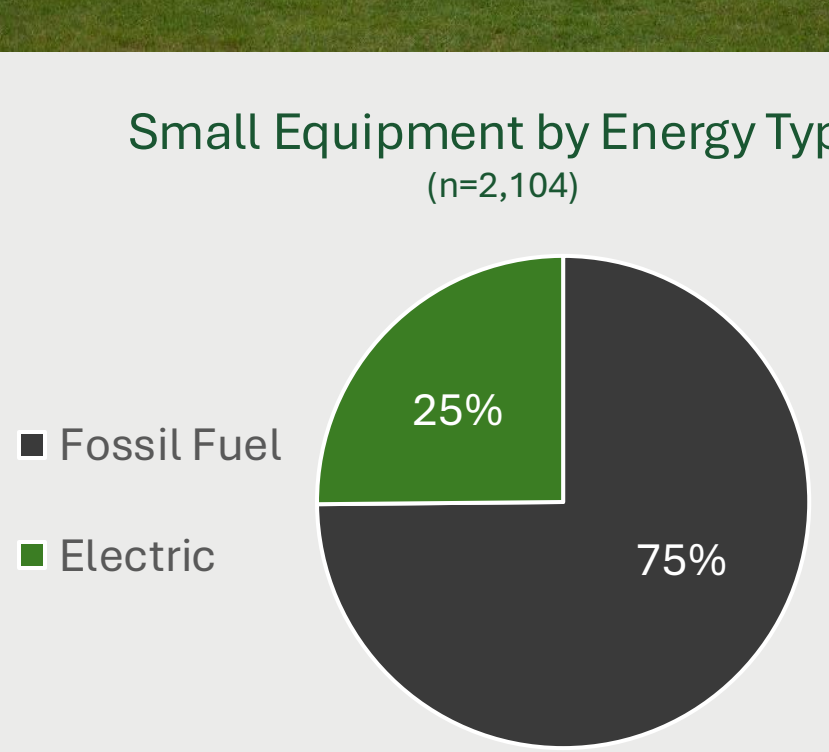


UTV = Utility Terrain Vehicle

ICE = Internal Combustible Engine

Green Operations – Small Equipment Survey





2025-27 Clean Energy Transition Budget Request

Budget Item	Agency 2025-27 Request	Governor's 2025-27 Budget
Master Equipment Program (MEP)	$1,500,000 (Operating)	Carryforward (Operating)
Equipment Replacement	$2,100,000 (Operating)	$0
Phase 2 Historic Building Energy Audits	$600,000 (Operating)	$0
Statewide: Fleet EV Charging & Renewable Energy Project	$2,000,000 (Capital)	$0
Statewide: Historic Building Energy Efficiency Project	$2,500,000 (Capital)	$2,500,000 (Capital)

Questions?

The agency's efforts to transition to clean energy sources, and meet codified greenhouse gas emission limits, will require a targeted, sustained investment in electrical infrastructure and equipment.