CITY OF SEATTLE

RESOLUTION 32040

A RESOLUTION relating to the City Light Department; affirming the City Light Department's Clean Energy Implementation Plan as required under Washington State's Clean Energy Transformation Act.

WHEREAS, in 2019 the Washington State Legislature passed the Clean Energy Transformation Act (CETA) requiring Washington State utilities to be carbon-neutral by 2030 and use 100 percent non-emitting resources by 2045; and

WHEREAS, CETA further requires utilities to compile and submit a Clean Energy Implementation Plan every four years to show progress in meeting the underlying requirements of CETA; and

WHEREAS, the Seattle City Council ("Council") passed Resolution 31312 in 2011, establishing the goal of zero net greenhouse gas emissions by 2050 and an interim target of a 58 percent reduction from 2008 levels by 2030; and

WHEREAS, The City of Seattle's 2013 Seattle Climate Action Plan (CAP) identifies specific strategies and actions designed to meet the City's climate goals; and

WHEREAS, Resolution 31447 in 2013 endorsed the CAP, Resolution 31714 in 2016 reaffirmed the CAP, and Resolution 31757 in 2017 affirmed Seattle's commitment to the Paris Agreement; and

WHEREAS, climate change threatens Seattle residents' health, well-being, and economic vitality, and climate impacts; and

WHEREAS, the City Light Department's ("City Light") Clean Energy Implementation Plan takes into account strategies outlined in the 2013 Climate Action Plan as those strategies relate to City Light to help meet the City's climate goals; and

WHEREAS, City Light's Clean Energy Implementation Plan will assist in further reductions in carbon emissions that may improve residents' health, well-being, and economic vitality through the specific actions outlined in the plan; NOW, THEREFORE,

BE IT RESOLVED BY THE CITY COUNCIL OF THE CITY OF SEATTLE, THE MAYOR CONCURRING, THAT:

Section 1. The City Light Department's Clean Energy Implementation Plan, which is attached to this resolution, is hereby adopted as the City's plan for compliance with Washington State's Clean Energy Transformation Act.

Adopted by the City Council the 1st day of February, 2022, and signed by me in open session in authentication of its adoption this 1st day of February, 2022.

Debora Juarez

President _____ of the City Council

The Mayor concurred the 3rd day of February, 2022.

Bruce A. Harrell

Bruce A. Harrell, Mayor

Filed by me this 3rd day of February, 2022.

Monica Martinez Simmons

Monica Martinez Simmons, City Clerk

(Seal)

Attachments:
Attachment 1 - 2021 Clean Energy Implementation Plan Report
Exhibit A - City Light Department 2021 Clean Energy Implementation Plan
Exhibit B - Clean Energy Equity Plan

Seattle City Light

SEPTEMBER 2021

2021 Clean Energy Implementation Plan Report

OVERVIEW

The Clean Energy Transformation Act (CETA) adopted into law in 2019 seeks to decarbonize the economy of Washington state. CETA requires utilities like the City's City Light Department ("City Light") to plan for that outcome and to seek our governing board's approval of four and ten-year plans to do so – referred to as our Clean Energy Implementation Plan (CEIP). This report to the Mayor and City Council is intended to familiarize the City's elected officials with City Light's first four-year CEIP. This report summarizes the work performed in developing both the plan and the CEIP template that will be submitted to the Washington state Department of Commerce (Commerce) to demonstrate City Light's compliance with this new state law. City Light's planning and outreach processes have guided and informed City Light's CEIP and sets the stage for how City Light plans to support Highly Impacted Communities and Vulnerable Populations as we transition to a 100% clean electric system.

City Light's history is one of focus and action on environmental responsibility and stewardship. The generating resources City Light uses are predominately hydroelectric, and the service we have provided to our customers has been over 90% carbon free for nearly two decades. Operationally, we have been net-zero carbon neutral since 2005, utilizing high-quality offsets for those emissions that we have been unable to avoid.

City Light's CEIP also reflects City Light's long-standing environmental and social justice commitments and sets forth our anticipated path forward to continue to improve as we embrace the future. The Excel workbook attached to this report constitutes the compliance filing we will be making with Commerce at the end of the year. This template contains the detailed information on each area of effort and our planned actions as required by the Clean Energy Transformation Act (CETA) and the Department's rules. The information contained in this report and the attached template reflects our consideration of the

public input we've received to date and identifies our path for continued and expanded community engagement during our transition to a clean energy economy.

This first CEIP for City Light addresses the following three critical requirements:

- Explains the steps City Light is taking over the next four years (2022 through 2025) to make progress towards serving customers with 100% non-emitting or renewable resources no later than 2045
- Develops the foundation to measure and ensure equitable access to clean energy
- Describes the outreach to our customer-owners that has informed this plan

City Light's CEIP is not only consistent with the Integrated Resource Plan (IRP) as CETA requires, but is also informed by City Light's 2022-2026 Strategic Plan and City Light's internal Clean Energy Equity Plan (CEEP) developed to support this CEIP, which is also attached for reference.

Another important element of the CEIP is the baseline it establishes from which City Light will measure its progress. The attached CEIP template (Excel workbook) will be submitted to Commerce after City Council review and approval. This template provides the technical baseline from which our progress towards a 100% clean portfolio and improvements in the equity of how we deliver services will be understood.

A changing resource mix and new loads from decarbonization across transportation, buildings and industries will require City Light to expand beyond hydropower resources. Exciting, new technology is on the horizon and in 2022, City Light will begin piloting customer demand response and energy storage solutions. One example is the use of large battery storage to support the Washington State Ferry system's ferry electrification plans. Demand response and energy storage are important available solutions for achieving long-term clean energy goals and in the coming years City Light will be testing ways to incorporate these technologies into its resource plans.

CLEAN ENERGY EQUITY PLAN & CUSTOMER ENGAGEMENT

CETA requires City Light to identify those communities and populations that have a disproportionate share of environmental risks and who may be vulnerable to our clean energy actions. City Light must ensure that these Highly Impacted Communities and Vulnerable Populations benefit equitably from our actions. City Light developed an internal Clean Energy Equity Plan (CEEP) to guide the utility's integration of equity into its planning, programs, and projects. The CEEP's core audience is intended to be internal to support City Light in achieving an equitable transition to a 100% greenhouse gas-free, electric future in fulfillment of the objectives and intentions of CETA.

Box 1 - Equitable Clean Energy Just Transition Principles

1. City Light is committed to racial diversity, social justice, and the equitable provision of services to all.
2. City Light recognizes past and current energy injustices and understands that taking a restorative approach should guide us to advance energy justice by conferring benefits first to communities most burdened by these injustices.
3. City Light's approach is rooted in community-centered collaboration and engagement to design equitable, inclusive solutions.
4. City Light is dedicated to reducing pollutants that impact public health where communities live, work, learn, play, and worship.
5. City Light will make decisions that are transparent to all communities and customers.

City Light developed *Equitable Clean Energy Just Transition Principles* that inform and ground City Light's decisions and processes (Box 1). These principles are intended to support the objective for all utility customers to equitably benefit from the transition to clean energy. They are explicitly designed to focus attention and efforts on Highly Impacted Communities and Vulnerable Populations as defined by CETA (Box 2). In the Seattle area, like in the rest of the country, Highly Impacted Communities and Vulnerable Populations experience a disproportionate share of environmental risk from environmental burdens and are often Black, Indigenous, and People of Color, low-income residents, people with limited English proficiency, and immigrants and refugees.

Box 2 – CETA Definitions

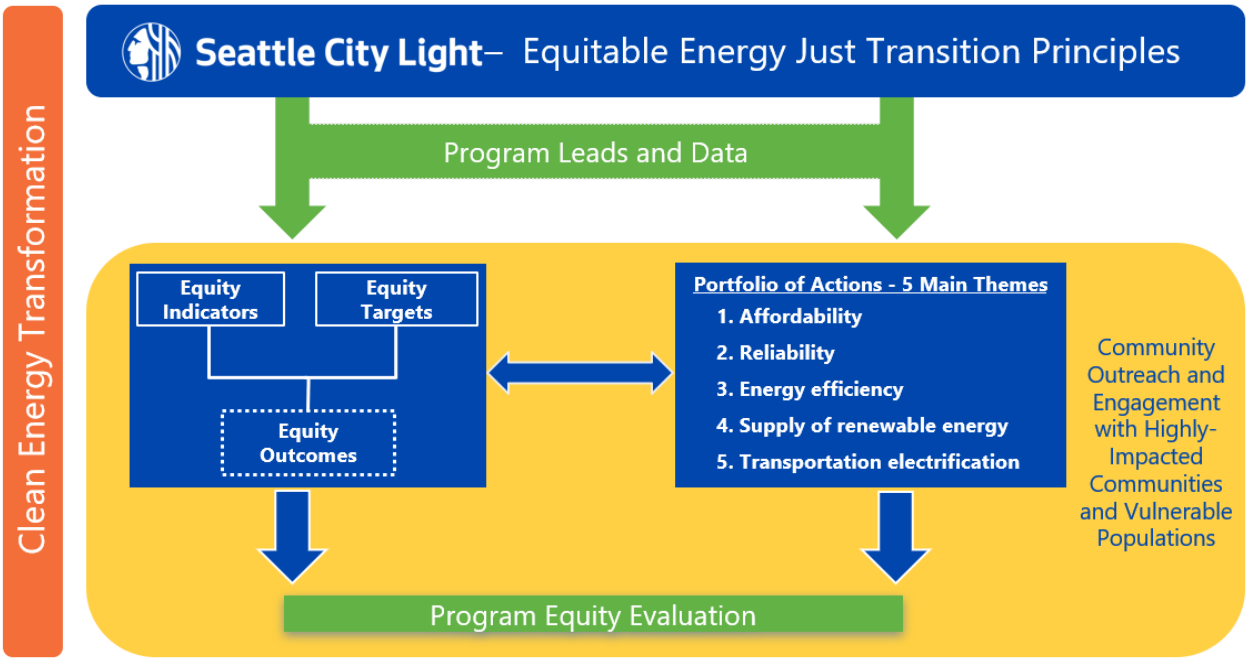
Highly Impacted Communities
Communities designated by the Department of Health based on cumulative impact analyses or a community located in census tract fully or partially identified as being on "Indian country."

Vulnerable Populations
Communities that experience disproportionate cumulative risk from environmental burdens due to adverse socioeconomic factors and sensitivity factors.

City Light developed equity indicators to measure and track progress towards elevating equity – particularly racial equity – aligning with the vision of Seattle's Race and Social Justice Initiative. Ten preliminary indicators target the equitable distribution of energy and non-energy benefits across a range of Energy Equity Areas classified by CETA and are designed to measure progress in achieving six equity outcomes described by City Light. These outcomes relate to community assets and collaboration, economic opportunities and youth pathways, equitable access, healthy planet and healthy lives, and affordable and reliable electricity.

The CEEP describes an initial portfolio of actions representing a collection of existing programs and projects that have the greatest opportunity to influence an equitable transition. This portfolio also includes emerging programs and projects that may provide additional opportunities for equitably distributed energy and nonenergy benefits, reduced burdens, improved public health and environmental risk, and advanced energy security and resiliency. The portfolio of actions is grouped into five themes: affordability, reliability, energy efficiency, supply of renewable energy, and transportation

electrification (see figure below). These actions and the indicators they address are designed to be dynamic and adaptable over time.



City Light has engaged and will continue to engage with its customers, others within the service territory, and with those located in remote locations where electricity is generated and transmitted to implement this plan. Market research conducted by a third-party consultant to identify customer priorities when developing the 2019-2024 Strategic Plan identified three top priorities for the utility: to be a leader in the environment and renewable energy, invest in technology for operational improvements, and keep costs down. Building on these engagement efforts, a community outreach plan is designed to share the overall approach to engagement for CETA, engagement objectives, collaboration with targeted audiences, and tactics and metrics to promote and advance an equitable transition.

Accountability to customers and transparency into the distribution of both energy and non-energy benefits is established through a series of protocols that follow a City Light *Equity Impacts Assessment Framework*. This framework prioritizes Highly Impacted Communities and Vulnerable Populations and provides strategies for elevating equity to increase and improve equity outcomes through the portfolio of actions. City Light program managers can execute these and similar strategies in their program implementation with the aid of an Equity Coordinator. The CEEP contains an implementation plan to identify responsible parties and outline schedule, budget, and reporting requirements.

In addition to presenting our initial work to the Integrated Resource Plan Technical Advisory Committee and the City Light Environmental Advisory Committee, we will be presenting the CEIP to our City Light Review Panel in November for their consideration and feedback.

During the month of August we emailed a short survey to 180,000 customers and heard back from 4,522. The results include the following:

- 94% are concerned about climate change
- 80% of our customers were not aware that City Light is carbon neutral or has a 90%+ clean energy portfolio.
- The three most important benefits our customers expect from the transition to a 100% clean energy economy include reducing climate change impacts, decreased reliance on fossil fuels and a reduction in environmental impacts.
- The three greatest concerns were bill increases, the negative impacts of clean energy technology and the risk to reliability.

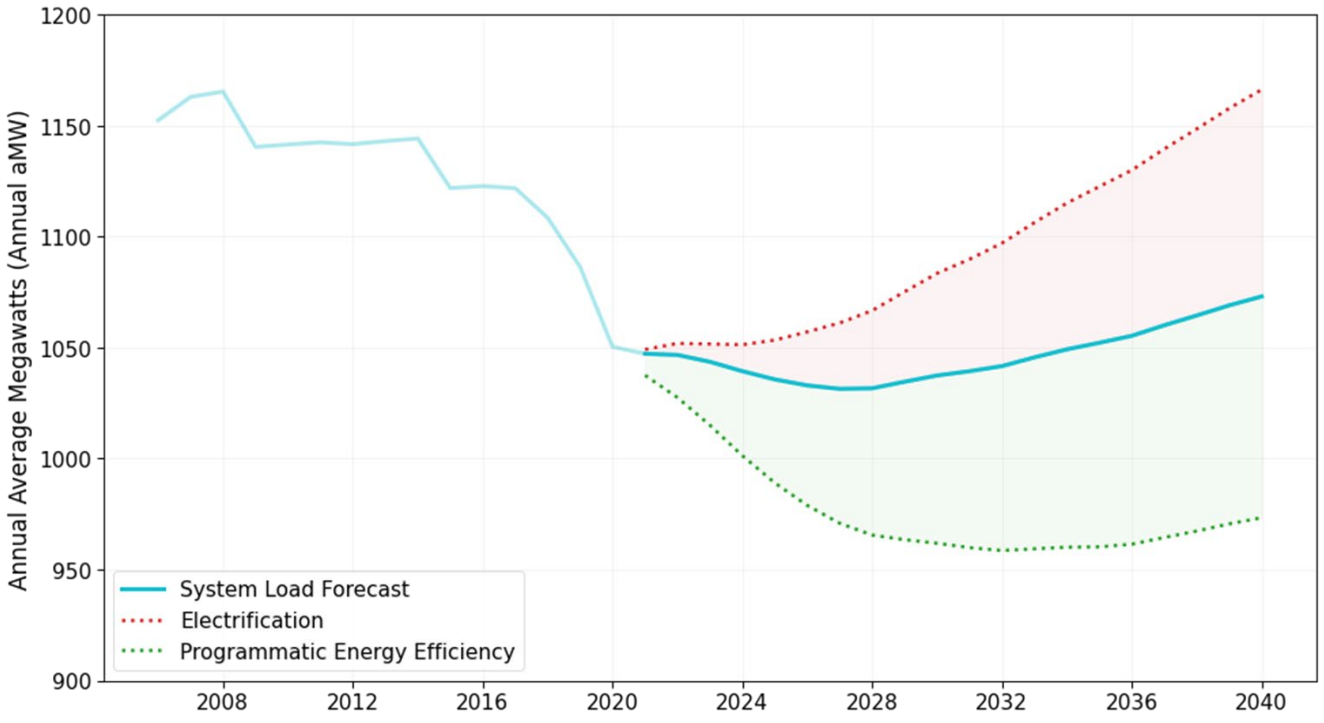
Notably, our survey did not receive a statistically proportionate response from customers who self-identify as Black/African American or as Native American. Our communications team is working on strategies to improve our outreach to these populations as well as devising strategies for improved outreach to BIPOC communities, traditionally underserved communities, and renters.

ENERGY

City Light recently completed its Conservation Potential Assessment (CPA) and a Demand Response Potential Assessment (DRPA) in support of both our I-937/Energy Independence Act and CETA compliance. These studies also support our IRP, the development of our load forecasts, and are the foundation for programmatic planning based upon the results of the biennial study. Applying a more holistic portfolio analysis that takes into account related factors like seasonal resource adequacy needs (sufficient resource across a wide range of events) and the current Bonneville Power Administration (BPA) contract, we were able to identify additional value for energy efficiency efforts. While cost-effectiveness remains a challenge for other demand side resources, the portfolio analysis also shows that these resources hold promise through demonstration of other substantial system benefits, program design innovations, and if costs continue to decline through market transformation. Our total potential for energy efficiency over the next two years declined by 12%, while remaining heavily reliant upon our commercial customers to achieve that potential. The major drivers of these changes are, on the "down" side, less technical potential, with notably less lighting potential, fewer low-cost measures still available; and on the "up" side, the revamped IRP framework better reflecting the value of other higher cost energy efficiency by considering timing, resource adequacy and greenhouse gas requirements, as well as introducing appliance programs into the mix.

Foundationally, we will be proactively seeking customer and community voices to inform our program design and to affirm that the opportunities we will pursue are those that best meet the needs of the communities we serve. We continue to develop innovative programs in the commercial space, such as pay-for-performance, and are developing tools for customers to better manage their energy use. We will be targeting programs that maximize the value of conservation, whether through programs focused on low-income, multi-family dwellings, geographically targeting programs to Highly Impacted

Communities and addressing the seasonality of conservation value (e.g. greater value for delivered energy savings in Dec-Jan and Jul-Aug). We are also deploying programs that support our trade allies who work with our customers to deliver energy savings and support family-wage jobs in the communities we serve. Lastly, as we expand our electrification offerings in alignment with our Transportation Electrification Strategic Investment Plan (TESIP), as well as emerging strategies in Building Electrification, there is and will be a natural synergy to the product offerings as illustrated below. Continued success in energy efficiency will enable our existing resources to support expanded transportation and building electrification.



System Load Forecast

RESOURCE ACQUISITIONS

Consistent with the 2020 IRP Progress Report, City Light's power supply is built on a robust hydropower portfolio and investment in energy conservation that will meet our power supply needs for several years to come. However, with faster reductions in fossil fuel use changing the regional power supply mix and taking into account the pandemic recovery, the IRP resource adequacy framework concludes that City Light will need new supply resources in 2026-2027. Simply put, the historical supply resource surplus that City Light has come to expect in recent memory appears likely to change. Summer emerges as the primary season for new resource adequacy investments driven mainly by hydroelectric supply variability from evolving water conditions. The IRP portfolio analysis used in setting targets for the CPA and the CEIP shows that conservation investments alone will not be sufficient beyond 2025 for meeting City Light's resource needs.

In 2026 and 2027, City Light plans to increase its renewable energy purchases with new solar, wind or other CETA compliant resources. The magnitude of the investments in 2026 and 2027 are approximately 140 aMW of renewable and non-emitting resources, which is about 14% of anticipated 2026 retail load. City Light may seek up to 525 MW in total nameplate capacity of solar and wind resources, between 2026 and the early 2030s. These resources along with future investments in renewable energy, demand response and energy storage in the 2030s will ensure that City Light can achieve its CETA compliance requirements. The 2022 IRP work will continue to refine with customers and stakeholders a resource strategy that takes into consideration customer programs (like the approved Renewable Plus program) and other emerging opportunities that enable additional equitable climate change action.

GREENHOUSE GASES

Due to our 17-year history of being greenhouse gas neutral, our planning work centers on looking at our resources and related matters in a more holistic manner than in the past and identifying those areas of effort that would be most beneficial and cost effective for our customers. For example, the nature of the next BPA power supply contract will have a tremendous impact on our CETA compliance efforts when it is executed in the mid-2020s and implemented in 2028.

Another significant variable is the development of a more coordinated approach to resource adequacy across the Western United States and as climate change leads to more extreme weather events and new stresses on energy infrastructure. As Washington, Oregon and California decarbonize and utilities across the Western U.S. recognize greater benefits of renewable energy, more innovative tools are necessary for a more dependable, affordable, and clean generating mix. Under the administration of the Northwest Power Pool, a Western Resource Adequacy program is being built that brings utilities that are not part of the California ISO together to coordinate and assure a high likelihood of adequate supply to meet customer demand under a wide array of scenarios.

This new program and innovations like the Western Energy Imbalance Market (WEIM) which City Light recently joined, create more robust wholesale energy markets and improve affordability for our customers. Every credible study of what will be required to decarbonize Washington state recognizes that Washington state cannot go it alone. To achieve CETA's goal of effective, economy-wide decarbonization in Washington state will require some form of regionalization of planning and operations to optimize the dispatch of all generation and transmission across the West. Regulatory support for innovations in reliability and wholesale energy markets and the future BPA contract offering will have a substantial impact on City Light's compliance with this state law, as well as the wider success sought in decarbonization of our state's economy.

ACTION PLANS

City Light is building its plan toward a greenhouse gas-free future, which will include valuable public input – including the use of technology to make public engagement more convenient and simpler and more accessible information on how we can all access cleaner energy options and prepare for the future. City Light's CEIP calls for the public to help define and shape a cleaner environment, not just in helping City Light make resource choices but making energy benefits more equitable for all.

In working with the Mayor and City Council, City Light wants to invite innovative new partnerships to help inspire our customers to become more active in creating a clean energy future. We want to support them in our mutual goals for a more sustainable and socially equitable future. By supplying the public with information about City Light's existing supply and the types of resource choices ahead, everyone can participate in a shared understanding and be an active participant in designing a better quality of life.

City Light's ongoing and/or proposed action plans designed to support the advancement of safe, reliable, affordable, and environmentally responsible energy services include:

- Launch a new public engagement campaign prioritizing impacted communities to improve the equitable distribution of energy and non-energy benefits.
- An improved portfolio model that uses information from the CPA (setting the biennial energy efficiency targets for I-937) and incorporating demand response, recognizing seasonal resource adequacy needs and sectoral level resource adequacy contributions of energy efficiency programs or measures (a more granular measure of reliability) to develop a more holistic IRP resource strategy than in the past.
- Develop an integrated planning approach that weaves together traditional bulk supply portfolio planning with transmission and distribution system planning – effectively incorporating Distributed Energy Resources (DERs) into the resource portfolio.
- Implement one or more demand response program pilots and update City Light's large commercial solar tariff in 2022.
- Completing implementation of the Renewable Plus Program to support our largest customers sustainability goals in a manner that complements existing renewable energy programs for all customers.
- Collaborate with the public power community and BPA on a post-2028 BPA contract that provides a 100% clean power supply (CETA compliant), with a proposed final contract drafted in late 2025 for a new contract period starting on Oct. 1, 2028.
- Work toward development of well-functioning organized wholesale market(s) that can enforce the provisions and rules of CETA while establishing the tools required for a regional dispatch that optimizes the use of transmission and generation assets cost-effectively.
- Sponsor, support and complete implementation of the Western Resource Adequacy Program with Northwest Power Pool members, increasing electric system reliability and affordability by pooling supply and demand to assist during stressed system conditions.
- Submit our relicensing request for the Skagit River Hydroelectric Project by April 2025 and the South Fork Tolt Hydroelectric Project by 2027.
- Advocate for the US delegation to negotiate a new Columbia River Treaty seeking a fair distribution of benefits from treaty storage and operations.
- Update and refine modeling of clean energy policies in City Light's electric power price forecast.
- Include transportation and building electrification scenarios being developed by a separate City-wide electrification study process.
- Coordinate consistent inputs for evaluation of demand side resource potential at the distribution system level.

- Develop resource strategies recognizing climate change as a scenario in the 2022 IRP with a plan to incorporate climate change in the base case for the 2024 IRP.

CONCLUSION

While City Light's history of over a century of low carbon electrical service has positioned City Light and its customers for success in a decarbonized future, much work remains to ensure our ability to deliver on that promise. Whether it is in the acquisition of carbon-free resources to serve our customers' needs, in harmonizing disparate state rulemakings in Olympia or working across the West to better partner and collaborate to solve long-standing and vexing challenges, City Light's CEIP starts the utility and our customers on a path for complete decarbonization, while aspiring to create an energy system that is demonstrably more equitable than the one that preceded it.

EXHIBITS:

CLEAN ENERGY IMPLEMENTATION PLAN (CEIP) EXCEL WORKBOOK

CLEAN ENERGY EQUITY PLAN (CEEP)

Clean Energy Transformation Act, **Clean Energy Implementation Plan**
Publish: August 12, 2021

Deadline: January 1, 2022
Submission: Email this workbook and all supporting documentation to **CETA@commerce.wa.gov**
Questions: Glenn Blackmon, Sarah Vorpahl, Austin Scharff, State Energy Office, **CETA@commerce.wa.gov**

Washington State Department of Commerce

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Do not modify blue-shaded fields.

RCW 19.405.060
Clean energy implementation plan—Compliance criteria—Incremental cost of compliance.

(2)(a) By January 1, 2022, and every four years thereafter, each consumer-owned utility must develop and submit to the department a four-year clean energy implementation plan for the standards established under RCW 19.405.040(1) and 19.405.050(1) that: (i) Proposes interim targets for meeting the standard under RCW 19.405.040(1) during the years prior to 2030 and between 2030 and 2045, as well as specific targets for energy efficiency, demand response, and renewable energy; (ii) Is informed by the consumer-owned utility's clean energy action plan developed under RCW 19.280.030(1) or other ten-year plan developed under RCW 19.280.030(5); (iii) Is consistent with subsection (4) of this section; and (iv) Identifies specific actions to be taken by the consumer-owned utility over the next four years, consistent with the utility's long-range resource plan and resource adequacy requirements, that demonstrate progress towards meeting the standards under RCW 19.405.040(1) and 19.405.050(1) and the interim targets proposed under (a)(i) of this subsection. The specific actions identified must be informed by the consumer-owned utility's historic performance under median water conditions and resource capability and by the consumer-owned utility's participation in centralized markets. In identifying specific actions in its clean energy implementation plan, the consumer-owned utility may also take into consideration any significant and unplanned loss or addition of load it experiences.

(b) The governing body of the consumer-owned utility must, after a public meeting, adopt the consumer-owned utility's clean energy implementation plan. The clean energy implementation plan must be submitted to the department and made available to the public. The governing body may adopt more stringent targets than those proposed by the consumer-owned utility and periodically adjust or expedite timelines if it can be demonstrated that such targets or timelines can be achieved in a manner consistent with the following: (i) Maintaining and protecting the safety, reliable operation, and balancing of the electric system; (ii) Planning to meet the standards at the lowest reasonable cost, considering risk; (iii) Ensuring that all customers are benefiting from the transition to clean energy: Through the equitable distribution of energy and nonenergy benefits and reduction of burdens to vulnerable populations and highly impacted communities; long-term and short-term public health and environmental benefits and reduction of costs and risks; and energy security and resiliency; and (iv) Ensuring that no customer or class of customers is unreasonably harmed by any resulting increases in the cost of utility-supplied electricity as may be necessary to comply with the standards.

(3)(a) An investor-owned utility must be considered to be in compliance with the standards under RCW 19.405.040(1) and 19.405.050(1) if, over the four-year compliance period, the average annual incremental cost of meeting the standards or the interim targets established under subsection (1) of this section equals a two percent increase of the investor-owned utility's weather-adjusted sales revenue to customers for electric operations above the previous year, as reported by the investor-owned utility in its most recent commission basis report. All costs included in the determination of cost impact must be directly attributable to actions necessary to comply with the requirements of RCW 19.405.040 and 19.405.050.

(b) If an investor-owned utility relies on (a) of this subsection as a basis for compliance with the standard under RCW 19.405.040(1), then it must demonstrate that it has maximized investments in renewable resources and nonemitting electric generation prior to using alternative compliance options allowed under RCW 19.405.040(1)(b).

(4)(a) A consumer-owned utility must be considered to be in compliance with the standards under RCW 19.405.040(1) and 19.405.050(1) if, over the four-year compliance period, the average annual incremental cost of meeting the standards or the interim targets established under subsection (2) of this section meets or exceeds a two percent increase of the consumer-owned utility's retail revenue requirement above the previous year. All costs included in the determination of cost impact must be directly attributable to actions necessary to comply with the requirements of RCW 19.405.040 and 19.405.050.

(b) If a consumer-owned utility relies on (a) of this subsection as a basis for compliance with the standard under RCW 19.405.040(1), and it has not met eighty percent of its annual retail electric load using electricity from renewable resources and nonemitting electric generation, then it must demonstrate that it has maximized investments in renewable resources and nonemitting electric generation prior to using alternative compliance options allowed under RCW 19.405.040(1)(b).

(5) The commission, for investor-owned utilities, and the department, for consumer-owned utilities, must adopt rules establishing the methodology for calculating the incremental cost of compliance under this section, as compared to the cost of an alternative lowest reasonable cost portfolio of investments that are reasonably available.

WAC 194-40-200
Clean energy implementation plan.

(1) **Specific actions.** Each utility must identify in each CEIP the specific actions the utility will take during the next interim performance period or GHG neutral compliance period to demonstrate progress toward meeting the standards under RCW 19.405.040(1) and 19.405.050(1) and the interim targets under subsection (2) of this section and the specific tar gets under subsection (3) of this section. Specific actions must be consistent with the requirements of RCW 19.405.060 (2)(a)(iv).

(2) **Interim target.** The CEIP must establish an interim target for the percentage of retail load to be served using renewable and nonemitting resources during the period covered by the CEIP. The interim target must demonstrate progress toward meeting the standards under RCW 19.405.040(1) and 19.405.050(1), if the utility is not already meeting the relevant standard.

(3) **Specific targets.** The CEIP must establish specific targets, for the interim performance period or GHG neutral compliance period covered by the CEIP, for each of the following categories of resources:

(a) **Energy efficiency.** (i) The CEIP must establish a target for the amount, expressed in megawatt-hours of first-year savings, of energy efficiency resources expected to be acquired during the period. The energy efficiency target must comply with WAC 194-40-330(1). (ii) A

utility may update its CEIP to incorporate a revised energy efficiency target to match a biennial conservation target established by the utility under RCW 19.285.040 (1)(b) and WAC 194-37-070.

(b) **Demand response resources.** The CEIP must specify a target for the amount, expressed in megawatts, of demand response resources to be acquired during the period. The demand response target must comply with WAC 194-40-330(2).

(c) **Renewable energy.** The utility's target for renewable energy must identify the quantity in megawatt-hours of renewable electricity to be used in the period.

(4) **Specific actions to ensure equitable transition.** To meet the requirements of RCW 19.405.040(8), the CEIP must, at a minimum:

(a) Identify each highly impacted community, as defined in RCW 19.405.020(23), and its designation as either: (i) A community designated by the department of health based on cumulative impact analyses; or (ii) A community located in census tracts that are at least partially on Indian country.

(b) Identify vulnerable populations based on the adverse socioeconomic factors and sensitivity factors developed through a public process established by the utility and describe and explain any changes from the utility's previous CEIP, if any;

(c) Report the forecasted distribution of energy and nonenergy costs and benefits for the utility's portfolio of specific actions, including impacts resulting from achievement of the specific targets established under subsection (3) of this section. The report must: (i) Include one or more indicators applicable to the utility's service area and associated with energy benefits, nonenergy benefits, reduction of burdens, public health, environment, reduction in cost, energy security, or resiliency developed through a public process as part of the utility's long-term planning, for the provisions in RCW 19.405.040(8); (ii) Identify the expected effect of specific actions on highly impacted communities and vulnerable populations and the general location, if applicable, timing, and estimated cost of each specific action. If applicable, identify whether any resource will be located in highly impacted communities or will be governed by, serve, or otherwise benefit highly impacted communities or vulnerable populations in part or in whole; and (iii) Describe how the specific actions in the CEIP are consistent with, and informed by, the utility's longer-term strategies based on the analysis in RCW 19.280.030 (1)(k) and clean energy action plan in RCW 19.280.030(1)(l) from its most recent integrated resource plan, if applicable.

(d) Describe how the utility intends to reduce risks to highly impacted communities and vulnerable populations associated with the transition to clean energy.

(5) **Use of alternative compliance options.** The CEIP must identify any planned use during the period of alternative compliance options, as provided for in RCW 19.405.040 (1)(b).

(6) The CEIP must be consistent with the most recent integrated resource plan or resource plan, as applicable, prepared by the utility under RCW 19.280.030.

(7) The CEIP must be consistent with the utility's clean energy action plan developed under RCW 19.280.030(1) or other ten-year plan developed under RCW 19.280.030(5).

(8) The CEIP must identify the resource adequacy standard and measurement metrics adopted by the utility under WAC 194-40-210 and used in establishing the targets in its CEIP. (9) If the utility intends to comply using the two percent incremental cost approach specified in WAC 194-40-230, the CEIP must include the information required in WAC 194-40-230(3) and, if applicable, the demonstration required in WAC 194-40-350(2).

(10) Any utility that is not subject to RCW 19.280.030(1) may meet the requirements of this section through a simplified reporting form provided by commerce.

Utility name:	Seattle City Light
Report date:	2021
Contact name/Dept:	Robert Cromwell/Customer Energy Solutions
Phone:	206-684-3856
Email:	robert.cromwell@seattle.gov
Web address of published CEIP:	https://powerlines.seattle.gov/2021/08/05/clean-energy-future-survey/
Small utility:	No

A small utility is a utility that is not required by RCW 19.280.030(1) to prepare an integrated resource plan.

Seattle City Light

Interim target: Percentage of retail load to be served using renewable and nonemitting resources (WAC 194-40-200(2))

Resource	2022	2023	2024	2025	4-year Period
Renewable	92%	92%	93%	93%	92%
Nonemitting	5%	5%	5%	5%	5%
Total	97%	97%	97%	97%	97%

[Small utilities may enter a single value in cell G6 and leave the remaining cells blank.]

Describe how the target demonstrates progress toward meeting the 2030 and 2045 CETA standards (WAC 194-40-200(2)). ***This section is not required if the value in cell G6 is 80% or greater*** **:**

Specific targets (WAC 194-40-200(3)):

Resource	Amount	
Energy Efficiency	310,603 (cum. savings thru 2025)	MWh to be acquired over the interim performance period (measured in first-year savings)

Renewable energy	31,821,434	MWh to be used during the interim performance period
Demand response	0	MW to be acquired over the interim performance period

Identify and describe the specific actions the utility will take over the next interim performance period to demonstrate progress toward meeting the utility's interim targets and the 2030 GHG neutral and 2045 clean electricity standard (WAC 194-40-200(1)):	
Specific action proposed	**Description of how the action demonstrates progress toward meeting interim targets and the standards**
Proactively seek customer and community voice	Design and refine demand-side programs and clean energy strategies to ensure alignment with equitable outcomes and customer choices.
Conservation program equitable program design	Create new opportunities for conservation (target highly impacted communities and vulnerable populations, geography, and season; pivot away from lighting; look towards efficient electrification)
Demand Response	City Light's IRP did not select demand response products. That said, City Light plans to launch time of day rates by 2023, residential/small business demand response pilots by 2022, and managed electric vehicle charging pilots by 2025.
RFP for CETA and I-937 eligible resources	The selection of resources will use City Light's IRP framework which includes goalposts for meeting the 2030 and 2045 standards, resource adequacy, I-937 and Seattle's existing carbon neutral policy. Seattle City Light plans to pursue demand side and supply side resource thru customer programs and RFP processes to meet future needs identified and updated through its IRP framework. All plans are centered around conservation, demand response and renewable energy. Guidance for resource decision come from SCL's Strategic Plan, Clean Energy Equity Plan and are consistent with the Clean Energy Implementation Plan and the IRP framework.
2022 & 2024 IRP updates and 2024 CPA updates	Continue to refine inputs including new load forecasts and generation forecasts reflecting new regulations, codes and UW Climate Impacts workgroup climate change data for SCL with input from technical advisors in the 2022 IRP process and inclusive of customer input into future plans.
2020 IRP Progress Report	Follow through on actions identified in the 2020 IRP Progress Report pg. 22 http://www.seattle.gov/Documents/Departments/CityLight/2020IRPProgessReport.pdf

Seattle City Light

Highly impacted communities (WAC 194-40-200(4))

Report each Highly Impacted Community in the table below.

Highly Impacted Community is defined in RCW 19.405.020(23) as:
(23) "Highly impacted community" means a community designated by the department of health based on cumulative impact analyses in RCW 19.405.140 or a community located in census tracts that are fully or partially on "Indian country" as defined in 18 U.S.C. Sec. 1151.

Department of Health has designated Highly Impacted Communities as those ranking 9 or 10 on the Environmental Health Disparities map. Visit the Department of Health website for instructions on how to identify Highly Impacted Communities:
https://www.doh.wa.gov/DataandStatisticalReports/WashingtonTrackingNetworkWTN/ClimateProjections/CleanEnergyTransformationAct/CETAUtilityInstructions

Census Tract (enter 11 digit FIPS code)	County Name	Tribal Lands (Yes/No)	Environmental Health Disparities Topic Rank
53033000100	King	No	9
53033001200	King	No	9
53033007300	King	No	9
53033007402	King	No	10
53033008002	King	No	10
53033008100	King	No	10
53033008200	King	No	9
53033008500	King	No	10
53033008600	King	No	10
53033008700	King	No	10
53033009000	King	No	10
53033009200	King	No	10
53033009300	King	No	10
53033009400	King	No	9
53033010001	King	No	9
53033010002	King	No	9
53033010100	King	No	9
53033010300	King	No	9
53033010401	King	No	9
53033010702	King	No	9
53033010800	King	No	9
53033010900	King	No	10
53033011001	King	No	9
53033011002	King	No	10

53033011101	King	No	9
53033011102	King	No	9
53033011200	King	No	10
53033011300	King	No	10
53033011401	King	No	9
53033011700	King	No	10
53033011800	King	No	10
53033011900	King	No	10
53033026001	King	No	9
53033026500	King	No	10

Seattle City Light

Vulnerable populations (WAC 194-40-200(4))

Please list all indicators developed through a public process and used to identify Vulnerable Populations based on the definition in RCW 19.405.020(40):

(40) "Vulnerable populations" means communities that experience a disproportionate cumulative risk from environmental burdens due to:
(a) Adverse socioeconomic factors, including unemployment, high housing and transportation costs relative to income, access to food and health care, and linguistic isolation; and
(b) Sensitivity factors, such as low birth weight and higher rates of hospitalization

Factor	Details	Source	Date Last Updated	Approximate number of households in service territory (if applicable)
Ex. COVID cases	*Cases by race and ethnicity*	*Department of Health COVID-19 data dashboard*	*2021*	*1,000*
Racial & Social Equity Composite Index	Identified index scores by census tract	City of Seattle's Office of Planning & Community Development	2011-2015 for the Racial and Social Equity Index. The household count by census tract is based on data from 2013-2017.	59643 listed as "highest disadvantage"
Displacement Index	Identified moderate and high index scores by census tract	Puget Sound Regional Council	Index created in 2019 with data ranging from 2011-2016	252,662 at high and moderate
Duwamish Valley	The Duwamish Valley is an identified environmental justice ne	Duwamish Valley Action Plan / American Community Survey 5-Year Estimates	2016	5600
Vulnerable groups	(1) black, indigenous, and people of color (BIPOC), (2) low income, (3) limited English proficiency, and (4) immigrants and refugees	City of Seattle's Equity & Environment Agenda	TBD	TBD

Describe and explain any changes to the indicator from the utility's previous CEIP, if any:

This is the first CEIP so no changes in indicators have occured relative to a previous version.

Indicators are provided on the 'Forecast of Impacts' tab.

Vulnerable populations were identified based on City of Seattle's Office of Planning & Community Development Racial and Social Equity Composite Index that combines information by census tract on race, ethnicity, and related demographics with data on socioeconomic and health disadvantages to identify where priority populations make up relatively large proportions of neighborhood residents. Additional information used to identify vulnerable populations is a displacement index created by Puget Sound Regional Council (PSRC), referenced in the Seattle 2035 Equity Analysis. Displacement risk is a composite of indicators representing five elements of neighborhood displacement risks: socio-demographics, transportation qualities, neighborhood characteristics, housing, and civic engagement. These vulnerable populations are shown within the table on the Indentify HIC tab. Another resource used to identify vulnerable poplulations is City Light's Transportation Electrification Strategic Implementation Plan (TESIP), which identifies environmental justice neighborhoods and recognizes the Duwamish Valley as containing some of Seattle's most underserved populations. Finally, City of Seattle identified four groups through its Equity & Environment Agenda that could be considered vulnerable: (1) black, indigenous, and people of color (BIPOC), (2) low income, (3) limited English proficiency, and (4) immigrants and refugees.

Seattle City Light

Distribution of energy and non-energy costs and benefits (WAC 194-40-200(4))

Please report one or more indicators, developed through a public process, and used to identify the forecasted distribution of energy and non-energy costs and benefits for the utility's portfolio of specific actions, including impacts resulting from achievement of the specific targets established under WAC 194-40-200(3).

Indicators must be associated with one of the following categories: energy benefits, non-energy benefits, reduction of burdens, public health, environment, reduction in cost, energy security, or resiliency.

Category	Indicator	Details	Source	Date Last Updated
Ex. Resiliency	*Number of outages in utility census tracts*	*Use SAIDI, CAIDI and SAIFI data geolocated across service territory*	*Utility data*	*2021*
Energy benefits, Energy security, and Resiliency	1. Expenditures of existing and planned community energy projects	Total dollars expended on existing and planned community energy projects	Utility data	Source Date TBD
Energy benefits, Energy security, and Resiliency	2. Locations of existing and planned community energy projects	Geographic extent of projects in targeted Highly-Impacted Communities	Utility data	Source Date TBD

Non-energy benefits, Reduction of cost, and Resiliency	3. Career Development	Includes percentage change in VP participation in City of Seattle apprenticeships and jobs. Advances local, good paying jobs that have high development potential and provide career pathways for youth.	TBD	Source Date TBD
Reduction of energy burdens and Reduction of cost	4. Public Outreach	Percent of change in education programming targeted to HICs and VPs on energy planning, projects, personal choices, and safety.	Utility data	Source Date TBD
Public health, Energy security, and Resiliency	5. Public energy education	Percent of change in education programming targeted to HICs and VPs on energy planning, projects, personal choices, and safety.	Utility data	Source Date TBD

Energy benefits, Reduction of energy burdens and Reduction of cost	6. Burden (cost) to program participation	Percent change in program participant costs and rates of participation from HICs and VPs. Address challenges to participating in programs due to cost of entry.	Utility data and JD Power indicators	Source Date TBD and JD Power Annually
Energy benefits, Reduction of cost, Energy security, and Resiliency	7. Accessibility to non-single-family homeowners	Percent change of utility program dollars allocated to non-single-family homeowners for pilot projects, grants, rebates, or other incentives to provide alternative energy sources. Provides access to alternative energy sources such as solar or net metering programs that are difficult for multifamily residents and renters to implement.	Utility data	Source Date TBD

Public health and Environment	8. Outdoor air quality (Concentration of diesel particulate matter in air and reduction of greenhouse gas emissions)	Percent change of air quality indices such as particulate matter or emissions. Track long-term air quality and emission volume, especially along heavily trafficked corridors that impact communities; however, cannot be tracked as individual City Light impacts due to multiple contributions acting as a whole and would be measured and tracked by others.	Washington Tracking Network, https://www.epa.gov/outdoor-air-quality-data/air-data-daily-air-quality-tracker, https://epa.maps.arcgis.com/apps/webappviewer/index.html?id=5f239fd3e72f424f98ef3d5def547eb5&extent=-146.2334,13.1913,-46.3896,56.5319	Source Date Varies; Multiple Sources
Energy benefits, Energy security, and Resiliency	9. Feeder outages	Percent change in SAIDI and SAIFI values in HICs and VPs.	Utility data	Source Date TBD

Energy benefits, Energy security, and Resiliency	10. Response time to outages	Percent change of average response and restoration times in HICs and VPs. Identifies how long it takes for an outage to be resolved in communities..	Utility data	Source Date TBD

Please report the forecasted distribution of energy and non-energy costs and benefits on identified highly impacted communities and vulnerable populations for the utility's portfolio of specific actions, including impacts resulting from achievement of the specific targets established under WAC 194-40-200(3). You must do a separate row for each action and for each population affected.

Identify the expected effect of specific actions on highly impacted communities and vulnerable populations and the general location, if applicable, timing, and estimated cost of each specific action. If applicable, identify whether any resource will be located in highly impacted communities or will be governed by, serve, or otherwise benefit highly impacted communities or vulnerable populations in part or in whole.

Utility Specific Action (e.g. name of resource)	**Population affected? (select one per row)**	**Indicator**	**Detail (describe distribution of energy and non-energy benefits on named population)**	**Location of Resource (if applicable)**
Ex. Replace substation	*Tribe*	*resiliency*		*substation address*
Utility Discount Program	Low income	4. Public outreach 6. Burden (cost) to program participation	Rate assistance program, applied to a customer's bills going forward (60% reduction in City Light bill).	Throughout service territory
Emergency Low Income Assistance	Low income	4. Public outreach 6. Burden (cost) to program participation	For 2021, assistance is available twice in a 12-month period and the program is not conditional on shutoff notices, it applies to customers with balances of $250 or more	Throughout service territory

Project Share	Low income	4. Public outreach 6. Burden (cost) to program participation	Project Share funds are used for customers currently enrolled in the UDP and have also received the ELIA benefit to help them achieve a zero balance on their active electric account. The program provides one-time per year assistance up to $500 towards a customer's City Light bill.	Throughout service territory
Budget Billing Program	Low income	4. Public outreach 6. Burden (cost) to program participation	A monthly billing plan option that enables customers to spread energy costs evenly throughout the year, providing certainty to each bill and assists customers in avoiding high bills during peak demand.	Throughout service territory
Energy Equity Rate Pilot	Low income	6. Burden (cost) to program participation	Offers a suite of wrap-around benefits for income-qualified customers with high energy burdens: a reduced rate for electrical consumption; energy efficiency upgrades and weatherization projects; and a balance forgiveness program upon successful completion of agreed upon payments that fit household budgets.	Throughout service territory
HomeWise	Low income	5. Public energy education 6. Burden (cost) to program participation	Offers weatherization services to income eligible households, with the aim of decreasing each participating household's energy bills while also increasing comfort, health, and safety.	Throughout service territory
Direct Install Services Program (Powerful Neighborhoods)	Low income	4. Public outreach 5. Public energy education 6. Burden (cost) to program participation	Provides free energy efficiency improvements for individual units and multifamily building common areas.	Throughout service territory
Small Business Program	Small business	4. Public outreach 6. Burden (cost) to program participation	Installs energy efficient lighting and equipment at no- and low-cost to the participating businesses to assist in lessening the affordability pressures in this high cost region.	Throughout service territory

Multifamily Retrofit Programs	Multifamily residents	4. Public outreach 5. Public energy education 6. Burden (cost) to program participation	Provides a wide range of retrofit energy efficiency solutions for capital improvement, operations & maintenance, and behavioral improvements, across existing multifamily buildings.	Throughout service territory
Built Smart	Multifamily residents and developers	4. Public outreach 5. Public energy education 7. Accessibility to non-single-family homeowners	Encourages developers of new multifamily buildings to reach beyond standard energy code and develop additional electricity savings through financial incentives.	Throughout service territory
Multifamily Weatherization	Multifamily residents and owners	4. Public outreach 5. Public energy education 6. Burden (cost) to program participation 7. Accessibility to non-single-family homeowners	Incentivizes owners of existing multifamily properties to invest in insulation, window, and exterior door upgrades.	Throughout service territory
Green Up Community	NA	6. Burden (cost) to program participation 7. Accessibility to non-single-family homeowners	Incentivizes new solar arrays hosted by affordable housing and other low-income service providers through the purchase of renewable energy credits (RECs) acquired by Green Up participants.	Throughout service territory

Green Up	NA	4. Public outreach 7. Accessibility to non-single-family homeowners	A voluntary green power program that allows any utility customer to purchase renewable energy through a self-selected additional charge on their utility bill.	Throughout service territory
Renewable Power Purchase Agreements	NA	1. Expenditures of existing and planned community energy projects 2. Locations of existing and planned community energy projects	City Light has three main renewable energy purchased power agreements: Columbia Ridge Landfill Gas, Stateline Wind, and King County Wastewater Treatment Plant; and various smaller contracts for renewable energy credits.	Arlington, OR; Walla Walla, WA; King County, WA
Virtual Net Metering	Solar customers	1. Expenditures of existing and planned community energy projects 2. Locations of existing and planned community energy projects 6. Burden (cost) to program participation	City Light is developing virtual net metering functionality, which will enable eligible customers with solar installations to virtually distribute excess solar generation to multiple customer meters.	Throughout service territory

Public Transit Projects	NA	1. Expenditures of existing and planned community energy projects 2. Locations of existing and planned community energy projects 8. Outdoor air quality	Collaborating on electrifying public transportation with King County Metro, Washington State Ferries, and Port of Seattle.	Throughout service territory and nearby communities
Public Charging Station Pilot	EV users	1. Expenditures of existing and planned community energy projects 2. Locations of existing and planned community energy projects 8. Outdoor air quality	Public charging stations serve populations that need public charging options; City Light is installing 26 DC fast chargers across the service territory.	Throughout service territory

Personal Mobility Program	Under development	1. Expenditures of existing and planned community energy projects 2. Locations of existing and planned community energy projects 8. Outdoor air quality	City Light is developing new program opportunities for personal mobility. Program(s) are expected to launch in 2022.	Throughout service territory
Fleets Programs	Under development	1. Expenditures of existing and planned community energy projects 2. Locations of existing and planned community energy projects 8. Outdoor air quality	City Light is identifying new program opportunities for commercial, government, and non-profit fleets. Program(s) are expected to launch in 2022.	Throughout service territory and nearby communities

Seattle City Light

Integrated resource plan compliance (WAC 194-40-200(6))

This CEIP is consistent with the most recent integrated resource plan or resource plan, as applicable, prepared by the utility under RCW 19.280.030. **Select yes or no.**

Yes

Clean energy action plan compliance (WAC 194-40-200(7))

The CEIP is consistent with the utility's clean energy action plan developed under RCW 19.280.030(1) or other ten-year plan developed under RCW 19.280.030(5). **Select yes or no.**

Yes

Long-term plans (WAC 194-40-200(4)(c)(iii))

Describe how the specific actions in the CEIP are consistent with, and informed by, the utility's longer-term strategies based on the analysis in RCW 19.280.030 (1)(k) and clean energy action plan in RCW 19.280.030 (1)(l) from its most recent integrated resource plan, if applicable:

The specific actions were developed as part of the 2020 IRP progress report and have been updated with information from the 2022 Conservation potential assessment. The 2022 Conservation Potential Assessment included an assessment of demand response and considered how renewable energy would be part of City Light's actions using the new developed IRP Framework presented in the 2020 IRP Progress report.

Seattle City Light

Risk (WAC 194-40-200(4)(d))

Describe how the utility intends to reduce risks to highly impacted communities and vulnerable populations associated with the transition to clean energy.

In order to meet the intent of CETA, for customer programs with a strong equity link, City Light program managers will complete a racial equity analysis and set annual equity targets that will aim to reduce risk and increase benefits to highly-impacted communities and vulnerable populations. Additionally, program managers, assisted by Communications staff, will engage with highly impacted communities and vulnerable populations to define equity indicators and enhance City Light's likelihood of achieving equity outcomes. Staff will endeavor to remove barriers to engagement to minimize burdens for public participation. Finally, program managers will develop and implement strategies to address equity targets and achieve equity outcomes.

As programs are carried out, program managers will gather data to track performance against the established equity targets. These data should be mapped or connected to the affected highly-impacted communities and vulnerable populations. At regular intervals, data will be reviewed to see if progress is being made toward the targets and that the implemented strategies are supporting the intended equity outcomes. If progress is off target, adjustments will be made to program design and execution to elevate equity.

A dedicated equity coordinator will guide completion of racial equity analyses, set annual program targets, identify data to be collected, report metrics to community members and the Department of Commerce, and provide feedback to program managers and City Light's Executive Team.

Implementing and evaluating actions to elevate equity and engaging with customers may incur additional programmatic costs.

Seattle City Light

Public participation (WAC 194-40-200(4), -220(1))

Provide a summary of the public input process conducted in compliance with WAC 194-40-220. Describe how public comments were reflected in the specific actions under WAC 194-40-200(4), including the development of one or more indicators and other elements of the CEIP and the utility's supporting integrated resource plan or resource plans, as applicable.

A small team at Seattle City Light from multiple divisions collaborated to draft an initial list of 33 equity indicators based on guidance from the Department of Commerce and other resources such as the City's Duwamish Valley Action Plan. They examined these against equity principles and if the indicators could be measured and track a desired outcome either by City Light or others. This group also scored the indicators on how they affected 8 Energy Equity Areas required by CETA and 5 racial equity opportunity areas adhering to the guiding principles of the City of Seattle's Race and Social Justice Initiative. This process narrowed the list of possible indicators to 10 for additional discussion with stakeholders and public.

On July 30, 2021 a presentation focused on the draft indicators was presented to the IRP Technical Advisory Group. This group is comprised of a diverse set of stakeholders including those from the environmental community, BPA, and local and regional organizations such as NWEC and Climate Solutions. Feedback from the group was used to revise the indicators.

Seattle City Light serves a population of approximately 900,000 residents. On August 6, 2021 City Light sent an email to approximately 180,000 City Light residential customers inviting them to learn more about Washington State's Clean Energy Transformation Act, City Light's progress to date, and a request to provide feedback and help shape our collective energy future by taking a brief survey. The questions in the survey were based on the equity indicators that City Light identified. We had 4,522 City Light customers complete the survey, including 641 Black, Indigenous, and People of Color (BIPOC), 1,328 renters, and 417 customers with an annual household income under $50,000.

Key learnings from the survey include: 1) the vast majority of respondents across all demographics are concerned about climate change, 2) the top three perceived benefits/concerns with transitioning to 100% clean energy by 2045 for each demographic, 3) majority of non-renters (regardless of other demographic) use a personal automobile as their primary method of transportation, 4) top three drivers for transportation decisions for each demographic, 5) EV adoption 50% less among renters/low-income customers, and 6) the majority of people across all demographics are very comfortable with going all electric in their daily lives.

We gathered thousands of responses from customers where they provided the names of trusted community-based organizations as well as new and different programs and services respondents would like to see City Light offer. We continue to evaluate the responses to ensure the voices of vulnerable populations and highly-impacted communities are well represented in our future planning. We will continue to use the survey results to help inform future utility outreach activities and program planning.

In addition to the learnings gathered from the survey, the Clean Energy Implementation Plan (CEIP) equity analysis was discussed with City Light's Environmental Advisory Committee on August 25, 2021. This Committee is comprised of local and national environmental organizations and is focused on the environmental mission of Seattle City Light.

City Light will be bringing the draft CEIP to a City Light Review Panel Meeting on November 23, 2021. The Seattle City Light Review Panel is made up of nine members including City Light's customers, tasked with reviewing and assessing City Light's strategic plan and providing an opinion on the merits of the plan and future revisions to it to the Mayor and City Council, and other roles as laid out by Seattle City Ordinance 123256. We look forward to hearing feedback from the Review Panel as we continue to build out our final CEIP.

Seattle City Light

Use of alternative compliance options (WAC 194-40-200(5))

Identify any planned use during the period of alternative compliance options, as provided for in RCW 19.405.040(1)(b):

Alternative compliance payments:	0	Dollars
Unbundled renewable energy credits:	0	Credits
Credits from energy transformation projects:	0	MWh
Electricity from the Spokane municipal solid waste to energy facility:	0	MWh

Seattle City Light

Resource adequacy standard (WAC 194-40-200(8))

Identify the resource adequacy standard and measurement metrics adopted by the utility under WAC 194-40-210 and used in establishing the targets in the CEIP.

Resource adequacy standard

The resource adequacy standard used by Seattle City Light is the Loss of Load Events (LOLEV), based on a probabilistic assessment of energy resource adequacy using hourly simulations of temperature and hydro conditions (30 temperature years, 39 hydro years). For SCL, LOLEV is the expected number of deficit events over the total number of simulations after accounting for hydro flexibility and market reliance. It is measured by month for the 20 year planning horizon. For more detail about the Resource Adequacy standard see pages 13-14 for Resource Adequacy Standard.
http://www.seattle.gov/Documents/Departments/CityLight/2020IRPProgessReport.pdf

Methods of measurement

Based on the costs and benefits of market reliance, and given our resources hydro flexibility, City Light has established the RA standard of LOLEV=0.2, or shortfall events not exceeding 2 every ten years. This standard is used in establishing the energy resource adequacy needs for City Light's critical months for the next 20 years. These critical months are July/August in the summer, and December/January in the winter. Based on City Light's portfolio and loads, the energy RA needs for July/August starts at about 145aMW in 2026 and rises gradually to about 270aMW by 2041. City Light has enough hydro in January to meet all of the RA needs in January, there is not RA need in January. However, the December need starts at about 35aMW in 2026 and rises to about 120aMW by 2041. Energy Resource Adequacy Contributions:

Energy Resource Adequacy Contributions

Resources	Summer - August				Winter - December			
	2026	2030	2035	2040	2026	2030	2035	2040
Conservation								
Commercial	0.35	0.46	0.65	0.95	-0.43	-0.50	0.37	0.95
Industrial	0.21	0.23	0.82	1.33	-0.55	-0.65	1.19	0.82
Residential	0.20	0.22	0.99	1.07	-0.20	-0.29	1.08	1.05
Demand Response								
Residential Water Heat DLC	0.02	0.02	0.04	0.08	0.09	0.14	0.11	0.09
Residential Space Heat DLC	0.02	0.02	0.03	0.06	0.08	0.11	0.09	0.08
Comml & Ind Curtailment	0.02	0.02	0.03	0.06	0.08	0.11	0.09	0.07
Renewables								
Gorge Wind	0.34	0.45	0.39	0.38	0.30	0.28	0.30	0.27
Central WA Solar	0.32	0.36	0.40	0.39	0.11	0.10	0.12	0.07
Southeast OR Solar	0.37	0.41	0.44	0.41	0.13	0.11	0.15	0.10

Seattle City Light

Annual cost threshold (WAC 194-40-200(9))

Enter information in the blue column only. The rest will pre-populate.

Do not complete this section unless the utility intends to comply using the 2% incremental cost approach specified in WAC 194-40-230.

Year	Retail revenue requirement	Annual amount from revenue increase equal to 2% of prior year revenue requirement	Number of years in effect	Threshold amount over four years	Sum of threshold amounts	Annual threshold amounts
2021						
2022		$	4	$.00	$.00	$.00
2023		$	3	$.00		
2024		$	2	$.00		
2025		$	1	$.00		
Annual threshold ammount as a percentage of average retail revenue requirement						#DIV/0!

Incremental cost

Itemize all costs the utility intends to incur during this interim period in order to comply with the requirements of RCW 19.405.040 and 19.405.050.	Expected cost	Alternative lowest reasonable cost	The cost is incurred during this interim reporting period. **Select yes or no.**	The cost is part of the lowest reasonable cost and reasonably available portfolio of resources that results in compliance with the GHG Neutral Standard and 100% Clean Standard. **Select yes or no.**	The cost is additional to the costs that would be incurred for the lowest reasonable cost and reasonably available resource portfolio that would have been selected in absence of the GHG Neutral Standard and 100% Clean Standard. **Select yes or no.**	The cost is not required to meet any statutory, regulatory, or contractual requirement or any provision of CETA other than the GHG Neutral Standard and 100% Clean Standard. **Select yes or no.**	Summarize and cite documentation of the expected cost of the utility's planned resource portfolio and the expected cost of the alternative lowest reasonable cost and reasonably available portfolio. Clearly label all documentation with the itemized name in the first column of this table. Attach documentation to the email submitted with the CEIP.

Seattle City Light

Clean Energy Equity Plan

September 30, 2021

Executive Summary

Seattle City Light (City Light) developed this Clean Energy Equity Plan (CEEP/Plan) to guide the utility's integration of equity into its planning, programs, and projects. The plan's core audience is intended to be internal to support City Light in achieving an equitable transition to a 100% greenhouse gas-free, electric future in fulfillment of the objectives and intentions of the 2019 Washington Clean Energy Transformation Act (CETA).

Box 1 - Equitable Clean Energy Just Transition Principles

1. City Light is committed to racial diversity, social justice, and the equitable provision of services to all.
2. City Light recognizes past and current energy injustices and understands that taking a restorative approach should guide us to advance energy justice by conferring benefits first to communities most burdened by these injustices.
3. City Light's approach is rooted in community-centered collaboration and engagement to design equitable, inclusive solutions.
4. City Light is dedicated to reducing pollutants that impact public health where communities live, work, learn, play, and worship.
5. City Light will make decisions that are transparent to all communities and customers.

City Light developed *Equitable Clean Energy Just Transition Principles* that inform and ground City Light's decisions and processes (Box 1). These principles are intended to support the objective for all utility customers to equitably benefit from the transition to clean energy. They are explicitly designed to focus attention and efforts on Highly Impacted Communities and Vulnerable Populations as defined by CETA (Box 2). In the Seattle area, like in the rest of the country, Highly Impacted Communities and Vulnerable Populations experience a disproportionate share of environmental risk from environmental burdens and are often Black, Indigenous, and People of Color, low-income residents, people with limited English proficiency, and immigrants and refugees.

Box 2 – CETA Definitions

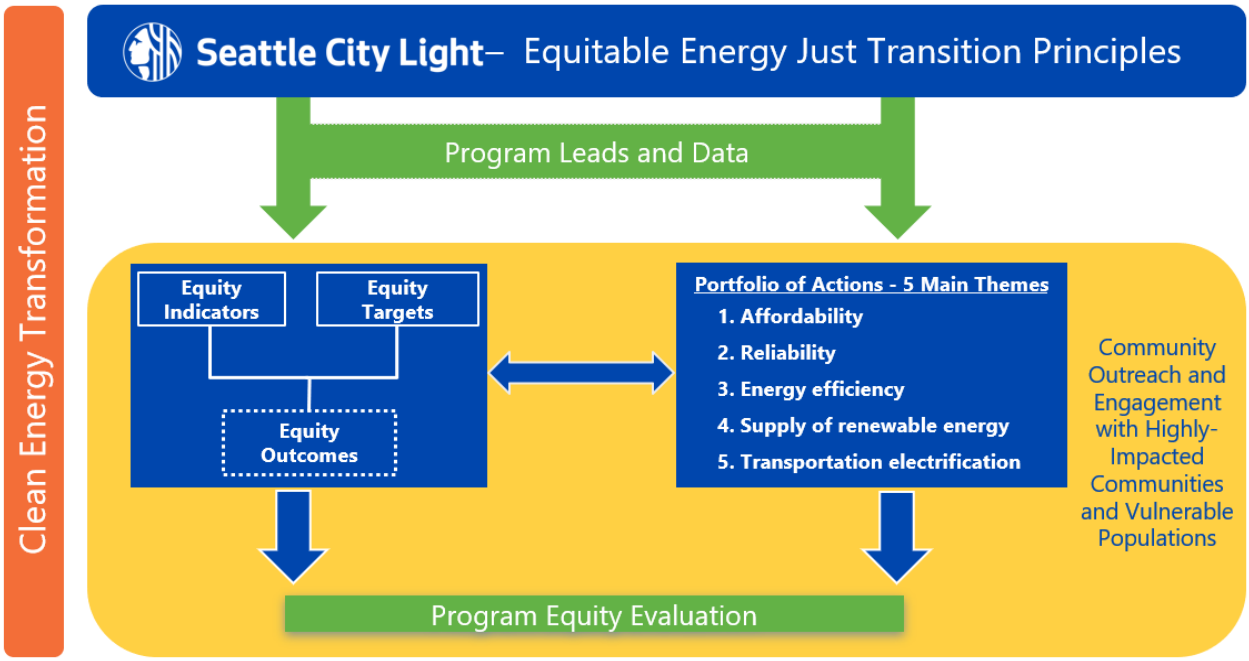
Highly Impacted Communities
Communities designated by the Department of Health based on cumulative impact analyses or a community located in census tract fully or partially identified as being on "Indian country."

Vulnerable Populations
Communities that experience disproportionate cumulative risk from environmental burdens due to adverse socioeconomic factors and sensitivity factors.

City Light developed equity indicators to measure and track progress towards elevating equity, particularly racial equity, aligning with the vision of Seattle Race and Social

Justice Initiative. Ten preliminary indicators target the equitable distribution of energy and non-energy benefits across a range of Energy Equity Areas classified by CETA and are designed to measure progress in achieving six equity outcomes described by City Light. These outcomes relate to community assets and collaboration, economic opportunities and youth pathways, equitable access, healthy planet and healthy lives, and affordable and reliable electricity.

The CEEP describes an initial portfolio of actions representing a collection of existing programs and projects that have the greatest opportunity to influence an equitable transition. This portfolio also includes emerging programs and projects that may provide additional opportunities for equitably distributed energy and nonenergy benefits, reduced burdens, improved public health and environmental risk, and advanced energy security and resiliency. The portfolio of actions is grouped into five themes: affordability, reliability, energy efficiency, supply of renewable energy, and transportation electrification (see figure below). These actions and the indicators they address are designed to be dynamic and adaptable over time.



City Light has engaged and will continue to engage with its customers, others within the service territory, and with those located in remote locations where electricity is generated and transmitted to implement this plan. Previous engagement efforts with environmental justice community leaders and stakeholders identified three top priorities for the utility in transportation electrification: to be a leader in the environment and renewable energy, invest in technology for operational improvements, and keep cost down. Building on these engagement efforts, a community outreach plan is designed to share the overall approach to engagement for CETA, engagement objectives, collaboration with targeted audiences, and tactics and metrics to promote and advance an equitable transition.

Accountability to customers and the assurance of the equitable distribution of both energy and non-energy benefits is established through a series of protocols that follow a City Light *Equity Impacts Assessment Framework*. This framework prioritizes Highly Impacted Communities and Vulnerable Populations and provides strategies for elevating equity to increase and improve equity outcomes through the portfolio of actions. Program managers can execute these and similar strategies in their program implementation with the aid of an Equity Coordinator. An implementation plan is presented to identify responsible parties and outline schedule, budget, and reporting requirements.

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Appendices

Acronyms List

Acronym	Full Description
4(8)	RCW 19.405.040(8)
AMLP	Asset Management and Large Projects Division
BIPOC	Black, Indigenous, People of Color
CBO	Community-based organization
CCES	Customer Care and Energy Solutions Business Unit
CIA	Cumulative Impact Analysis (by DOH)
CEIP	Clean Energy Implementation Plan
CEEP	Clean Energy Equity Plan
CHIA	Cumulative Health Impacts Analysis
CCES	Customer Care and Energy Solutions Business Unit
DOC	Department of Commerce
DOH	Washington State Department of Health
DON	Department of Neighborhoods
EIR	Energy Innovation & Resources Business Unit
EERP	Energy Equity Rate Pilot
ELL	Environment, Land, and Licensing Business Unit
EV	Electric Vehicle
HIC	Highly Impacted Community
OSE	Office of Sustainability and Environment
PPA	Power Purchase Agreement
PTA	Parent Teacher Association
REC	Renewable Energy Credit
RET	Racial Equity Toolkit
TESIP	Transportation Electrification Strategic Investment Plan
TNC	Transportation Network Company
VP	Vulnerable Population
VNM	Virtual Net Metering
EHD	Washington Environmental Health Disparities Map
WTN	Washington Tracking Network

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1 Purpose

City Light's Clean Energy Equity Plan (CEEP) lays out a framework for operationalizing equity as the utility enables communities to transition to a clean, affordable, reliable, and equitable energy future. This framework is grounded in five equity principles focused on a portfolio of actions the utility can take to facilitate equitable outcomes centered on Highly Impacted Communities and Vulnerable Populations. The CEEP is intended to guide an equitable transition to a 100% greenhouse gas-free, electric future through actions described in the utility's Clean Energy Implementation Plan (CEIP). The CEIP, required by the 2019 Washington Clean Energy Transformation Act, will be reviewed by the Mayor's Office and Transportation and Utilities City Council subcommittee prior to formal submission to the Department of Commerce (DOC) in January 2022, and every four years thereafter.

2 Background

Governor Jay Inslee signed the Washington Clean Energy Transformation Act (CETA), Engrossed Second Substitute Senate Bill 5116 in 2019. The law is intended to facilitate a transition to clean energy. A clean energy transition is stipulated for utilities to:

- By 2026 – eliminate coal-fired resources from their portfolios
- By 2030 – provide 100% greenhouse gas-neutral electricity (up to 20% alternative compliance options allowed)
- By 2045 – deliver 100% electricity from renewable, non-emitting sources (no alternative compliance options allowed)

Because the transition to clean energy has the potential to increase utility costs beyond conventional operations, maintenance, and improvement projects, the law seeks to avoid rate shocks and other consequences from the transition that could have disparate impacts on vulnerable customers. Thus, the transition path must be an equitable path whereby all customers benefit from the transition of electric power to 100% clean energy. This provision of the law is captured in RCW 19.405.040(8), which mandates:

> "an electric utility must… ensure that all customers are benefiting from the transition to clean energy: Through the equitable distribution of energy and nonenergy benefits and reduction of burdens to Vulnerable Populations and Highly Impacted Communities; long-term and short-term public health and environmental benefits and reduction of costs and risks; and energy security and resiliency."

Following the passage of CETA, the DOC began a process to draft rules to guide implementation of CETA for consumer-owned utilities, such as City Light. Rulemaking was completed in 2020 and these rules went into effect January 30, 2021, as codified in WAC 194-40-200. Rulemaking provided processes for ensuring equitable distribution though identifying communities, developing indicators, and forecasting impacts of energy efficiency, renewable energy, and demand response targets. Rulemaking also required public input process in

planning WAC 194-40-220 and a summary of the public process conducted must be submitted with the CEIP.

> *"Our commitment must be to a just society that ensures all people have access to critical products and services, including energy services."*
>
> ~Debra Smith, Feb. 22, 2021

City Light's vision is **to create a shared energy future by partnering with our customers to meet their energy needs in whatever way they choose**. One of City Light's five values, which underly and support this vision, is Equitable Community Connections; it states: *"We are proud to be a local, community-owned utility. We are visible and actively involved in the communities we serve. We are rooted in our commitment to racial diversity, social justice and the equitable provision of services to all."*

3 Equitable Clean Energy Just Transition Principles

As part of this project, City Light staff identified five principles to guide choices, decisions, and influences that the utility can make to equitably transition all customers and communities to a cleaner energy future. These just transition principles include:

1. City Light is committed to racial diversity, social justice, and the equitable provision of services to all.
2. City Light recognizes past and current energy injustices and understands that taking a restorative approach should guide us to advance energy justice by conferring benefits first to communities most burdened by these injustices.
3. City Light's approach is rooted in community-centered collaboration and engagement to design equitable, inclusive solutions.
4. City Light is dedicated to reducing pollutants that impact public health where communities live, work, learn, play, and worship.
5. City Light will make decisions that are transparent to all communities and customers.

City Light developed these just transition principles after reviewing the following sources: City Light's Transportation Electrification Strategic Investment Plan (TESIP); rulemaking comments from Front and Centered to the DOC; City Light's Mission/Vision/Values; and SSE's Just Transition Strategy.

4 Highly Impacted Communities and Vulnerable Populations

One of the main objectives of CETA is to ensure that all utility customers benefit from the transition to clean energy. The goal of designating Highly Impacted Communities and Vulnerable Populations is to highlight groups that are currently experiencing a disproportionate share of environmental risk factors and that must, according to CETA, benefit equitably from the transition to a clean energy economy.

CETA defines ***Vulnerable Populations*** as communities that experience a disproportionate cumulative risk from environmental burdens due to adverse socioeconomic factors (e.g., unemployment, high housing and transportation costs relative to income, access to food and health care, linguistic isolation, etc.). Also included in the definition are sensitivity factors, such as low birth weight and higher rates of hospitalization.

CETA defines **Highly Impacted Communities** as communities designated by the Department of Health (DOH) based on the cumulative impact analyses in Section 24 of this Act or a community located in census tracts that are fully or partially on "Indian country" (as defined in 18 U.S.C. Sec. 1151).[1]

In order for utilities to measure and demonstrate that the transition to clean energy is equitable, City Light needs to identify Highly Impacted Communities and Vulnerable Populations.

4.1 Identifying a Highly Impacted Community

CETA did not strictly identify Highly Impacted Communities, which are geographic communities, but it did instruct the DOH to develop a cumulative impact analysis to designate the communities highly impacted by fossil fuel pollution and other environmental or socioeconomic factors in Washington state. As a result, the DOH created a tool that ranks Environmental Health Disparities (EHD) by community. This interactive tool, which is part of the Washington Tracking Network, combines the most comprehensive data available (last published December 2019) to numerically rank – on a scale of 1 (least impacted) to 10 (most impacted) – Washington communities according to the risk each faces from environmental factors that influence health outcomes. The DOH designates as a Highly Impacted Community any census tract with a 9 or 10 overall rank on the EHD map, or any census tract with tribal lands. Since City Light does not have any customers in a community located in census tracts that are fully or partially on "Indian country" (as defined in 18 U.S.C. Sec. 1151) that are not already deemed a 9 or a 10 rank on the EHD map, only the communities designated by the DOH as a Highly Impacted Community with a 9 or 10 overall rank on the EHD map will be identified.

The EHD ranking considers environmental threats from fossil fuel exposure as well as social and health vulnerability measures in four main themes:

- Environmental exposures
- Environmental effects

[1] 18 U.S.C Sec. 2251 defines Indian country as "…(a) all land within the limits of any Indian reservation under the jurisdiction of the United States Government, and, including rights-of-way running through the reservation, (b) all dependent Indian communities within the borders of the United States whether within the original or subsequently acquired territory thereof, and whether within or without the limits of a state, and (c) all Indian allotments, the Indian titles to which have not been extinguished, including rights-of-way running through the same."

- Socioeconomic factors
- Sensitive populations

Each of these four themes contains several indicators to create the overall EHD ranking for each community. The map in Figure 1 details the EHD rankings within City Light service territory. City Light service territory is to the left of the black line drawn in the map below. The DOH EHD index places a heavier weight on areas with greater fossil fuel exposure and areas of greater social and health risks. When looking at environmental exposures alone, the areas of highest risk extend to City Light's entire service territory and surround the I-5 corridor. The environmental effects of hazardous waste have largely impacted the southern portion of the service territory. Socioeconomic factors and sensitive populations also generally have higher risk indexes in the southern part of the service territory. Areas highly impacted (Index 9/10) in City Light's service territory are mostly in the southern fraction and downtown, as well as a few census tracts near Shoreline and Lake City.

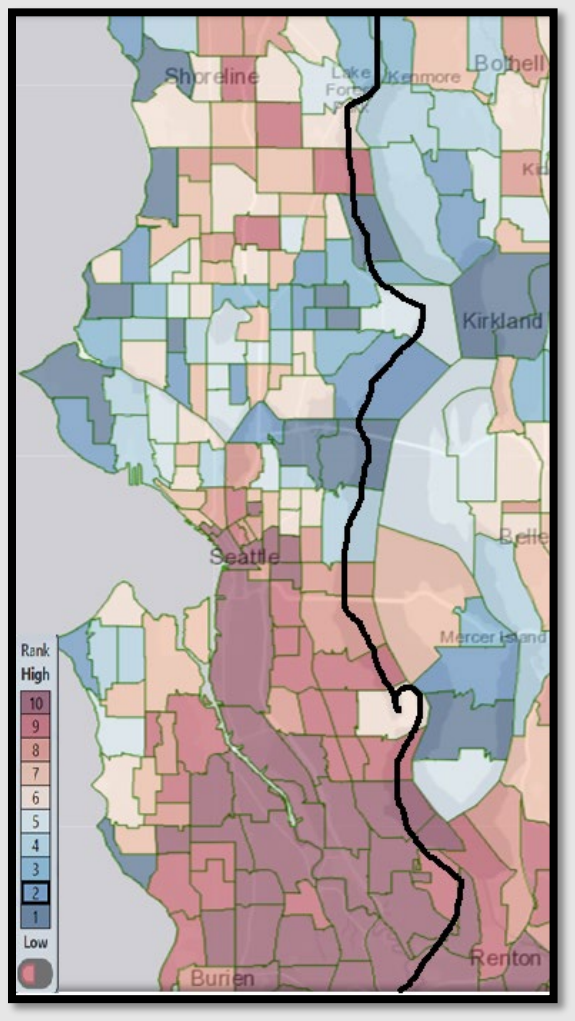


Figure 1 *DOH EHD Highly Impacted Communities in City Light's Service Territory*

4.2 Identifying Vulnerable Populations

While the DOH EHD Index identifies the Highly Impacted Communities (index 9 or 10) of focus for City Light in accordance with CETA, no such index or direction exists in CETA for identifying Vulnerable Populations. As a proxy, the City of Seattle ("City") Office of Planning & Community Development has a Racial and Social Equity Composite Index that combines information by census tract on race, ethnicity, and related demographics with data on socioeconomic and health disadvantages to identify where priority populations make up relatively large proportions of neighborhood residents.

This Composite Index is composed of three sub-indices:

1. *Race, English Language Learners, and Origins Index*: ranks census tracts by an index of three measures weighted as follows: Person of color (weight = 1), English Language Learner (weight = 0.5), and Foreign Born (weight = 0.5).
2. *Socioeconomic Disadvantage Index:* ranks census tracts by an index of two equally weighted measures: Income below 200% of poverty level and educational attainment less than a bachelor's degree.
3. *Health Disadvantage Index:* ranks census tracts by an index of seven equally weighted measures: No leisure time physical activity, diagnosed diabetes, obesity, poor mental health, asthma, low life expectancy at birth, and disability.

The combination of these sub-indices results in the *composite index*, which establishes a level of disadvantage for the tract. For example, a tract that falls in the highest 20% of disadvantaged tracts would be considered "Highest Disadvantaged", a tract that falls in the middle 40-60% would be considered "Middle Disadvantaged", and a tract that falls in the lowest 20% would be "Lowest Disadvantaged".

The map in Figure 2 below shows the City Racial & Social Equity Composite Index broken down by census tract. The toolkit can also display the map with the individual sub-indices only, by checking/unchecking them in the left pane. The map in Figure 2 shows that the downtown and south end of City Light's service territory contains most of the highest disadvantaged communities, which is also the same area where the DOH EHD identified many Highly Impacted Communities (Fig. 1).

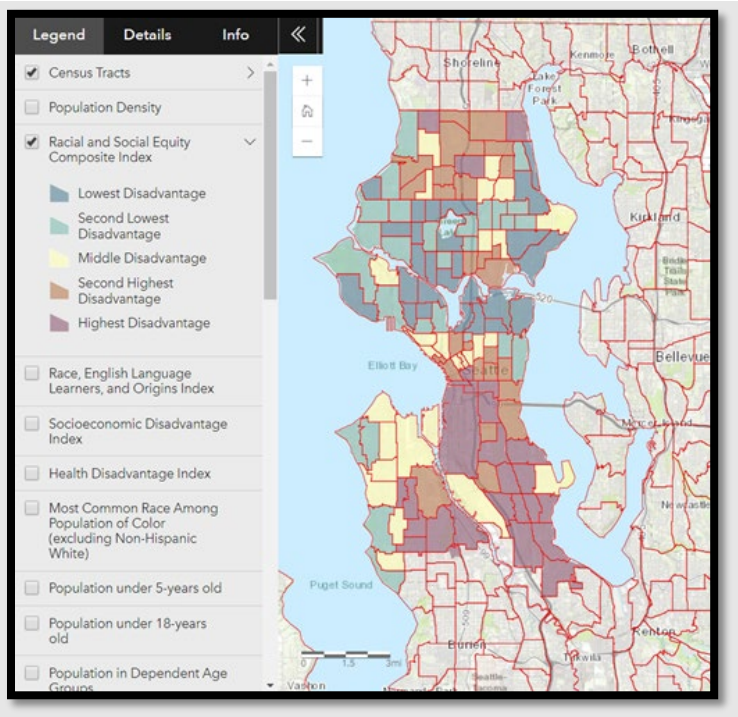


Figure 2 *City Racial & Social Equity Composite Index*

The Puget Sound Regional Council (PSRC) also created a *displacement index,* referenced in the Seattle 2035 Equity Analysis. Recent regional economic growth and housing market pressures have caused rapid changes in neighborhood conditions, forcing residents and businesses to move This tool identifies which neighborhoods have higher risk of displacement. Displacement risk is a composite of indicators representing five elements of neighborhood displacement risks: socio-demographics, transportation qualities, neighborhood characteristics, housing, and civic engagement. Figure 3 shows this displacement risk for the Seattle area.

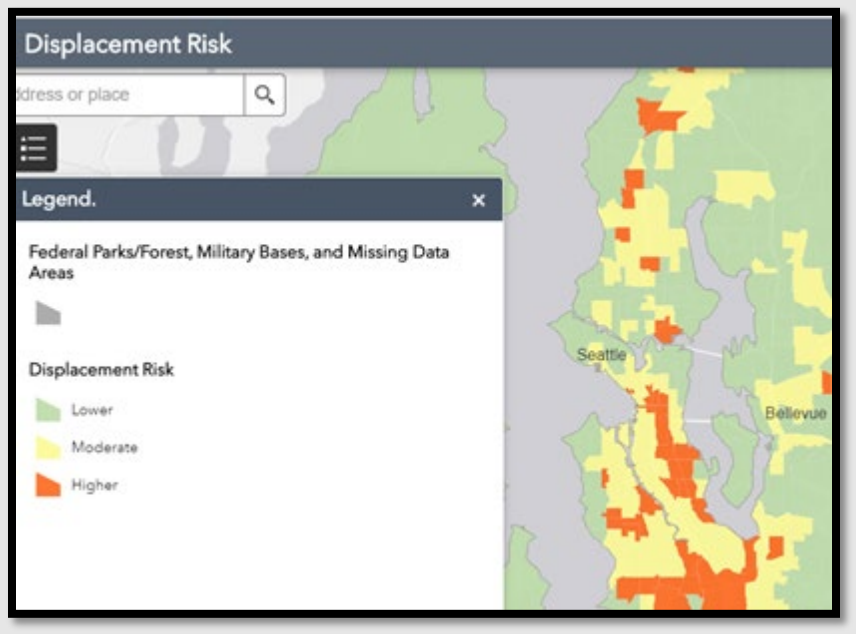


Figure 3 *Puget Sound Regional Council Displacement Risk Index in Seattle area*

The PSRC displacement index is listed by census track in Table 1, which also shows how these different indexes compare with the EHD Index that will be used for CETA, where the EHD Index is a 9 or 10. The CETA EHD Index geographic classification is at the census tract level, which aligns with City Light's internal data collection of the census tract for City Light service locations in the billing system; this measurement alignment makes it substantially easier to broadly use census tract across the utility for geographic analysis. There are 182 census tracts in City Light's service territory (2010 census), and 60 census tracts with EHD Index values of 9 or 10. There are 34 census tracts that contain an EHD Index of 9 or 10, a Race & Social Equity Composite Index of 'Middle' to 'Highest' disadvantaged, and a PSRC Displacement Risk Index of 'Moderate' to 'High' (Fig. 4).

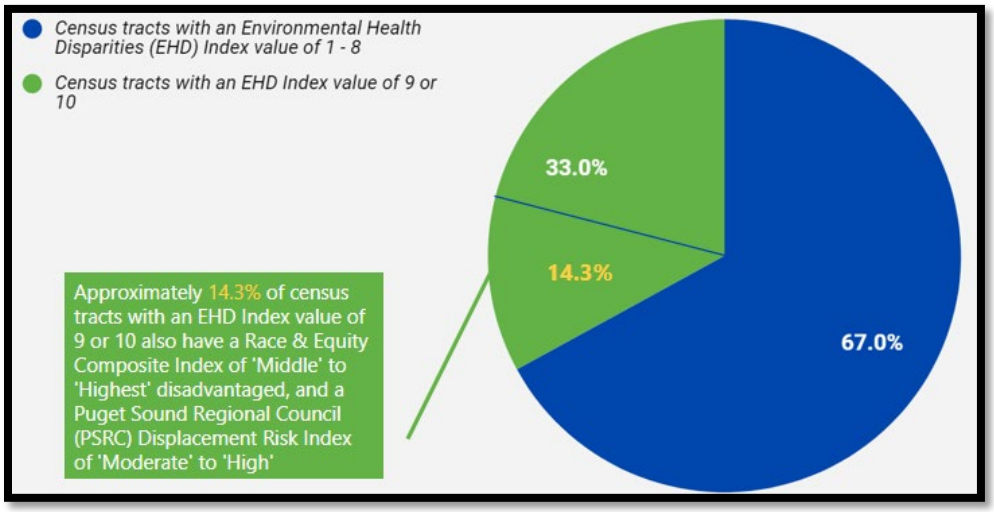


Figure 4 *Percentage of City Light's service territory census tracks out of 182 with different indices used to identify Highly Impacted Communities and Vulnerable Populations*

City Light's Transportation Electrification Strategic Implementation Plan (TESIP) identifies environmental justice neighborhoods and recognizes the Duwamish Valley as containing some of Seattle's most underserved populations. These neighborhoods reflect City Light's partnerships with neighborhood organizations for outreach; therefore, a cross comparison of the EHD Index with neighborhoods is shown in Table 1. Due to neighborhoods' overlapping multiple census tracts, multiple values may be listed below. There are some areas of downtown Seattle that are not identified by a TESIP neighborhood.

Table 1 - Highly Impacted Communities (HIC) & Vulnerable Populations (VP) By Census Tract

Census Tract	HIC DOH EHD Index	VP Race & Social Equity Index	VP PSRC Index	TESIP Neighborhood Overlap
53033000100	9	Highest priority/Most disadvantaged	moderate	Lake City
53033001200	9	Highest priority/Most disadvantaged	high	Haller Lake
53033007300	9	Second highest	moderate	
53033007402	10	Second highest	moderate	
53033008002	10	Second highest	high	
53033008100	10	Second highest	moderate	International District
53033008200	9	Middle	moderate	
53033008500	10	Highest priority/Most disadvantaged	high	International District
53033008600	10	Second highest	high	Central District
53033008700	10	Second highest	high	Central District
53033009000	10	Highest priority/Most disadvantaged	high	Central District, International District, Beacon Hill
53033009200	10	Highest priority/Most disadvantaged	high	International District
53033009300	10	Highest priority/Most disadvantaged	moderate	Central District, International District, Beacon Hill
53033009400	9	Highest priority/Most disadvantaged	high	Beacon Hill, International District

Census Tract	HIC DOH EHD Index	VP Race & Social Equity Index	VP PSRC Index	TESIP Neighborhood Overlap
53033010001	9	Highest priority/Most disadvantaged	high	Beacon Hill, Rainier Valley
53033010002	9	Second highest	high	Beacon Hill
53033010100	9	Highest priority/Most disadvantaged	high	Beacon Hill, Rainier Valley
53033010300	9	Highest priority/Most disadvantaged	high	Beacon Hill, Rainier Valley
53033010401	9	Highest priority/Most disadvantaged	high	Beacon Hill, Rainier Valley
53033010702	9	Highest priority/Most disadvantaged	high	Delridge
53033010800	9	Second highest	moderate	South Park, Delridge
53033010900	10	Middle	moderate	Beacon Hill
53033011001	9	Highest priority/Most disadvantaged	high	Beacon Hill, Rainier Valley
53033011002	10	Highest priority/Most disadvantaged	high	Rainier Valley
53033011101	9	Highest priority/Most disadvantaged	high	Beacon Hill, Rainier Valley
53033011102	9	Highest priority/Most disadvantaged	moderate	Rainier Valley
53033011200	10	Highest priority/Most disadvantaged	high	South Park, Delridge
53033011300	10	Highest priority/Most disadvantaged	moderate	South Park, Delridge, White Center
53033011401	9	Highest priority/Most disadvantaged	moderate	Delridge
53033011700	10	Highest priority/Most disadvantaged	moderate	Beacon Hill, Rainier Valley, Rainier Beach
53033011800	10	Highest priority/Most disadvantaged	high	Rainier Valley, Rainier Beach
53033011900	10	Highest priority/Most disadvantaged	moderate	Bryn Mawr, Rainier Valley, Rainier Beach

Census Tract	HIC DOH EHD Index	VP Race & Social Equity Index	VP PSRC Index	TESIP Neighborhood Overlap
53033026001	9	Highest priority/Most disadvantaged	moderate	Bryn Mawr, Rainier Valley, Rainier Beach
53033026500	10	Highest priority/Most disadvantaged	high	South Park, Delridge, White Center

Table 2 – Highly Impacted Communities (HIC) & Vulnerable Populations (VP) by Neighborhood

Neighborhood	HIC DOH EHD Index	VP PSRC Disp. Index	VP Race & Social Equity Index	VP Duwamish Valley (98108)
Chinatown-International District	10,9	High, Moderate	Highest, Second Highest	Yes
Central District	10	High, Moderate	Highest, Second Highest	Yes
Beacon Hill	9, 10, 8	High, Moderate	Highest	Yes
Rainier Valley	9, 10	High, Moderate	Highest	Yes
Rainer Beach	10, 9	Moderate, High	Highest	Yes
South Park	10, 9	Moderate, High	Second Highest, Highest	Yes
Delridge	10, 9	High, Moderate	Highest, Second Highest	Yes
Haller Lake	9	High	Highest	No
Lake City	9	Moderate	Highest	No
White Center	10, 9	Moderate, High	Highest, Second Highest	Yes
Bryn Mawr	10, 9	Moderate, High	Outside City Limits	No

There can be risks of outdated information associated with certain data by census tract. However, absent better data types, the above summary can serve as a useful starting place for City Light staff working towards an equitable transition to clean energy.

Another approach, besides the geographically based indexes described above, identifies Vulnerable Populations based on demographic information. The City describes four groups

through its Equity & Environment Agenda (EEA), in no particular order, that could be considered vulnerable:

- Black, Indigenous, and People of Color (BIPOC)
- Low income[2]
- Limited English proficiency
- Immigrants and refugees

In addition to these four groups, the EEA also identifies youth from these communities as a priority in environmental justice-centered policymaking. The City's Racial Equity Toolkit (RET), developed by Seattle Race and Social Justice Initiative (RSJI), also confirmed the same four groups listed above. The Seattle RSJI lays out a process and a set of questions to guide the development, implementation and evaluation of policies, initiatives, programs, and budget issues to address impacts on racial equity. Information on Vulnerable Populations can be acquired from customer demographics.

US federally recognized tribes and Canadian First Nations[3] have cultural or economic interests in the vicinity of City Light-owned hydroelectric projects and associated transmission infrastructure. These interests are based on their traditional tribal territories, existing ethnographic information, or self-identification. While these tribes and First Nations may not wholly fit the CETA definition of a Vulnerable Population, City Light seeks to reduce vulnerabilities to these populations and continue ongoing collaborations as described more in Section 6.3.

The ability to identify Highly Impacted Communities and Vulnerable Populations helps facilitate the planning and targeting of certain CETA-related programs. To help assess where these groups are located and map program impacts over time, City Light has developed a Clean Energy Transformation Act Project Data Portal described and demonstrated in Appendix A.

5 Indicators

5.1 Identifying Indicators

CETA Section 4(8) requires utilities to develop indicators to measure and track specific targets for equitable distribution of energy and non-energy benefits across a range of Energy Equity Areas. The DOC defines an ***indicator*** as it pertains to CETA as an:

> "Attribute, either quantitative or qualitative, of a condition, resource, program or related distribution investment that is tracked for the purpose of evaluating change over time in CEIP; indicators associated with: energy benefits, nonenergy

[2] For more information about City Light low income programs and eligibility, visit http://www.seattle.gov/utilities/your-services/discounts-and-incentives/utility-discount-program

[3] The term "First Nation" or "Nation" is used to refer to aboriginal peoples in Canada who are not Métis or Inuit. There are several First Nations and bands with cultural interests in the Skagit Project vicinity.

benefits, reduction of burdens, public health, environment, reduction in cost, energy security, or resiliency; develop through public process."

City Light approached the identification of indicators as equity indicators by first considering the proposed indicators presented in *Appendix A* of the DOCs Section 4(8) Guidance Document. The table of suggested indicators within this guidance is robust and provided a solid starting point for City Light staff to brainstorm additional equity indicators based on existing data and programs that the utility already has established. Some equity indicators were developed knowing that data and programming gaps exist and will need to be addressed through future utility investments should stakeholders prioritize these equity indicators as highly important during the public process.

An initial set of 33 equity indicators was developed through a City Light staff brainstorming process and a literature review of other organizations' research including:

- The City's *Duwamish Valley Action Plan*
- *Duwamish Cumulative Health Impacts Analysis (CHIA)* completed by the Duwamish River Cleanup Coalition
- *Our People, Our Planet, Our Power*, a South Seattle climate justice report completed by Got Green and Puget Sound Sage
- A comprehensive review of the Washington Environmental Health Disparities Map health indicators and associated metadata for and Highly Impacted Communities and Vulnerable Populations developed through the Washington Tracking Network
- City Light's *Transportation Electrification Strategic Investment Plan*
- A review of City Light's energy programs

City staff narrowed the initial set of 33 equity indicators down to ten equity indicators by filtering with scoring discussed in Section 5.2 along the following attributes:

1. How well each equity indicator aligned with City Light's Equitable Clean Energy Transition Principles (Section 3).
2. Whether the metric could measure and track change over time for a desired equity outcome from a utility action (investments in projects and programming)
3. How the metric affects City Light's identified Highly Impacted Communities and Vulnerable Populations and in eight (8) Energy Equity Areas required by CETA, and five (5) Racial Equity Opportunity Areas, adhering to the guiding principles of the Seattle RSJI.

The eight (8) Energy Equity Areas defined by CETA and five (5) Racial Equity Opportunity Areas defined by the City are as follows:

Energy Equity Areas designated in CETA:

1. *Energy Benefits* – Equitable access to clean energy solutions (solar, other renewables, programs and projects facilitating electrification)

2. *Nonenergy Benefits* – Benefits resulting from energy investments and increased access to clean energy programs that are not directly related to energy, such as increased use of community spaces and lower crime due to path and streetlighting projects, public funding for community enhancement as a component of energy projects, etc.
3. *Reduction of Burdens* – "Energy burden" means the share of annual household income used to pay annual home energy bills. Burdens can be reduced through better jobs, efficient appliances, utility programs that provide energy cost assistance in the form of discount programs, conservation education, and localized infrastructure investments.
4. *Public Health* – Attributes related to physical, emotional, mental health, and community wellbeing.
5. *Environment* – Attributes that relate to environmental elements such as water, air, land, fish and wildlife, and forests and vegetation.
6. *Reduction of Cost* – Attributes that provide access to programs that provide cost reductions to individuals and communities that are scalable to level of impacts and need.
7. *Energy Security* – Attributes that provide reliable power with minimal disruptions.
8. *Resiliency* – Attributes that increase the ability of customers or communities to withstand and recover from disturbances or disruptions.

Racial Equity Opportunity Areas – adhering to the guiding principles of the Seattle RSJI (aligned with Duwamish Valley Action Plan Racial Equity Outcomes):

1. *Education* – Increase opportunities of communities of color, immigrants, refugees, Native peoples, people with low incomes, youth, limited English proficiency individuals, women- and minority-owned businesses, and people of color-led organizations, to have access to education and training about programs and projects that will reduce energy burdens.
2. *Community Development* – Increase opportunities to develop safe, connected, and accessible communities with amenities and physical improvements that benefit Highly Impacted Communities and Vulnerable Populations including communities of color, immigrants, refugees, Native peoples, people with low incomes, youth, limited English proficiency individuals, women- and minority-owned businesses, and people of color-led organizations.
3. *Health* – Reduce health disparities and cumulative impacts related to water quality, air quality, soil contamination, noise pollution, access to healthy food, and climate change that disproportionately affect communities of color, immigrants, refugees, Native peoples, people with low incomes, youth, and limited English proficiency individuals.
4. *Environment* – Reduce localized and regional environmental impacts related to water quality, air quality, soil contamination, noise pollution, plants and animals, and climate change that disproportionately affects communities of color, immigrants, refugees, Native peoples, people with low incomes, elder, youth, and limited English proficiency individuals.

5. *Jobs* – Increase opportunities of communities of color, immigrants, refugees, Native peoples, people with low incomes, youth, limited English proficiency individuals, women- and minority-owned businesses, and people of color-led organizations, to have economic mobility and opportunity through access to education, training, funding, and support programs, as well as pathways out of poverty through jobs and careers related to the transition to clean energy and project and program development.

During the development of the equity indicator framework, city staff acknowledged these key components:

- Equity indicators that City Light staff developed are considered preliminary and will be used as initial guiding parameters for the public input process.
- Equity indicators are not locked into a specific Energy Equity Area or Racial Equity Opportunity Area; they can serve to measure benefits across multiple Energy Equity Areas.
- The public input process will heavily weight the final selection of equity indicators based on community importance and prioritization.
- Not all equity indicators will be able to measure direct outcomes from utility investments. Partnerships with other industry contributors to impacts may be necessary to measure benefits such as health and air quality improvements.

5.2 Equity Indicator Scoring

Once the initial selection of 33 equity indicators had been developed, defined, and analyzed to determine if City Light had existing programs or data to support them, City Light staff developed a scoring criterion to narrow the selection to provide a framework for community stakeholders during the public input process. These pared-down equity indicators will serve as the "bumper rails" for public input to both encourage ideas on measurable and important equity indicators specific to how they will personally affect stakeholders.

The equity indicators were scored through an evaluation of cumulative impacts based on two weighted sliding scales for Energy Equity Areas and Racial Equity Opportunity Areas. Energy Equity Areas were assigned a score of 0 – Unsure of impact, 1- Indirect impacts, or 2 – Direct impacts. Racial Equity Opportunity Areas were given a score of either 1 – Low, 2 – Medium, or 3 – High. The purpose of the difference in scoring values was to give slightly more weight to Racial Equity Outcomes by ensuring that every indicator received a score higher than 0 in these categories. Each equity indicator was assigned a cumulative score by adding each value assigned for Energy Equity Area and Racial Equity Opportunity Area score. Additionally, to aid in understanding how influential each Energy Equity Area and Racial Equity Opportunity Area were across all equity indicators, a cumulative score was assigned by adding all values of indicators within each of these categories. Due to the qualitative subjectivity of the scoring values, the initial indicators selected through this process were not all the highest scored indicators. The CETA Equity Team recognized the importance of ensuring that the selected indicators represent

all scoring categories and therefore opted to keep some lower scoring indicators so that the community will have the opportunity to evaluate the importance to them, not just the utility.

Ten (10) equity indicators were kept as the guiding equity indicators for the public input process. Four (4) equity indicators (color-coded blue in Appendix B) had the highest cumulative score across all equity areas. Six (6) indicators (color-coded light orange in Appendix B) were selected because they could potentially be important to identified Vulnerable Populations and Highly Impacted Communities as perceived by the CETA Equity Team. These six equity indicators did not receive a high total from City Light subjective scoring under the equity area's total score but warrant input from community stakeholders. Several higher scoring equity indicators were ultimately eliminated from initial selection due to lack of data or existing program support, or concern that is difficult to measure in a meaningful way.

The sliding scale for Racial Equity Opportunity Areas was more heavily weighted than Energy Equity Areas as the City is committed to racial equity, acknowledging past harms and the need for reparations across all departments and programs. This additional layer of indicator evaluation also lends credence to the commitment of City Light to ensure that clean energy implementation does not adversely affect our most Vulnerable Populations: customers who have low English proficiency, are BIPOC, are surviving on low incomes, or are immigrants and refugees. The ten equity indicators were further refined through discussion with Integrated Resources Plan (IRP) stakeholder group, such as shifting from *awareness* indicator to *public engagement* indicator.

The descriptions of the ten (10) draft **equity indicators** are as follows:

1. *Expenditures of existing and planned community energy projects* – Total dollars expended on existing and planned community energy projects.
2. *Locations of existing and planned community energy projects* – Geographic extent of projects in targeted Highly Impacted Communities .
3. *Public outreach* – Percent change in the annual amount of public outreach focused on engaging customers and communities in building a clean energy future through a suite of engagement strategies.
4. *Public energy education* – Percent of change in education programming targeted to Highly Impacted Communities and Vulnerable Populations on energy planning, projects, personal choices, and safety.
5. *Career development* – Includes percent change in Vulnerable Population participation in City apprenticeships and jobs. Advances local, good paying jobs that have high development potential and provide career pathways for youth.
6. *Burden (cost) to program participation* – Percent change in program participant costs and rates of participation from Highly Impacted Communities and Vulnerable Populations. Address challenges to participating in programs due to cost of entry (ability to purchase energy efficient appliances, affordability of conservation programs, ability to pay bills).

7. *Accessibility to non-single-family homeowners* – Percent change of utility program dollars allocated to non-single-family homeowners for pilot projects, grants, rebates, or other incentives to provide alternative energy sources. Provides access to alternative energy sources such as solar or net metering programs that are difficult for multifamily residents and renters to implement.
8. *Outdoor air quality* (Concentration of diesel particulate matter in air and reduction of greenhouse gas emissions) – Percent change of air quality indices such as particulate matter or emissions. Track long-term air quality and emission volume, especially along heavily trafficked corridors that impact communities; however, cannot be tracked as individual City Light impacts due to multiple contributions acting as a whole and would be measured and tracked by others.
9. *Feeder outages* (causes, number, locations, average duration, average response time) by census tract – Percent change in SAIDI and SAIFI values in Highly Impacted Communities and Vulnerable Populations.
    a. SAIDI (System Average Interruption Duration Index) – a system index of average duration of interruption in the power supply indicated in minutes per customer.

$$\text{SAIDI} = \frac{\text{total } \textit{duration} \text{ of interruptions for a group of customers}}{\text{Number of all customers}}$$

    b. SAIFI (System Average Interruption Frequency Index) – a system index of average frequency of interruptions in power supply

$$\text{SAIFI} = \frac{\text{total } \textit{number} \text{ of interruptions for a group of customers}}{\text{Number of all customers}}$$

10. *Response time to outages* – Percent change of average response and restoration times in Highly Impacted Communities and Vulnerable Populations. Identifies how long it takes for an outage to be resolved in communities.

All thirty-three (33) of the initial equity indicators, the full scoring matrix, and the equity indicator definitions can be found in Appendix B: Indicator and Scoring Analysis.

5.3 Equity Outcomes

Equity Outcomes are the results of utility actions where it is assumed all communities and populations do not start with equal opportunities to participate in or benefit from programs and investments. Therefore, Highly Impacted Communities and Vulnerable Populations must be specifically, but not exclusively, identified and targeted for utility investments to bring all communities to a place of equal benefit.

Equitable Distribution

"A fair and just, but not necessarily equal, allocation intended to mitigate disparities in benefits and burdens, and based on current conditions, including existing legacy and cumulative impacts, which are informed by

> *the assessment described in RCW 19.280.030(1)(k) from the most recent integrated resource plan."*
>
> ~The Washington Utilities and Transportation Commission

To ensure that the benefits of City Light's transition to clean energy are distributed equitably, staff identified six (6) Equity Outcomes. These outcomes build upon the five (5) guiding principles of a just transition to clean energy defined in Section 3. Equity Outcomes were developed through a process of analysis using the City's *Racial Equity Toolkit*, public input, alignment with the Racial Equity Outcomes[4] detailed in the City's *Duwamish Valley Action Plan*, and the Equity Outcomes identified in City Light's *Transportation Electrification Strategic Investment Plan*. The equity indicators will measure how City Light's programs, projects, and investments in clean energy transformation contribute to the realization of these outcomes for Highly Impacted Communities and Vulnerable Populations.

The six (6) **Equity Outcomes** are defined below:

1. *Community Collaboration* – Highly Impacted Communities and Vulnerable Populations see their wants and needs reflected in City Light energy programs.
2. *Healthy Planet, Healthy Lives* – Reduce emissions that impact local air quality and public health where environmental justice communities live, learn, work and play. Reduce carbon emissions that have a disproportionate burden on the most Vulnerable Populations and communities.
3. *Equitable Access* – Highly Impacted Communities and Vulnerable Populations learn about our energy programs, can readily understand and access materials and resources, see themselves reflected in communications, and participate in and benefit from City Light's energy programs.
4. *Community Assets* – City Light's programs invest in infrastructure that are community assets so Highly Impacted Communities and Vulnerable Populations can enjoy the benefits and avoid negative impacts from energy infrastructure projects and programs in their current neighborhoods.
5. *Economic Opportunities and Youth Pathways* – City Light enables Highly Impacted Communities and Vulnerable Populations to participate in and benefit from the local energy economy through vocational program participation (internships, apprenticeships, Lighting Design Lab trainings)
6. *Affordable and Reliable Electricity* – Electrification investments increase revenue to put downward pressure on electricity prices.

Staff aligned each equity indicator with an equity outcome based on the intent of what the equity indicator is meant to track and how well it relates to and will provide data for an Equity Outcome as defined (Table 3). For example, the equity indicator *Expenditures of existing and*

[4] A racial equity outcome names a desired increase in benefit or a decrease in disparities and detriment for specifically identified racial groups impacted by a City action, program, or service.

planned community energy projects is defined as: Total dollars expended on existing and planned community energy projects. The equity outcome *Community Assets* is characterized as: City Light's programs invest in infrastructure that are community assets so Highly Impacted Communities and Vulnerable Populations can enjoy the benefits of energy infrastructure projects and programs in their current neighborhoods. Based on a basic understanding that a utility action or program should result in progress towards achieving an equity outcome and that the equity indicator is the metric that measures the progress, it was determined that expended dollars for community projects most closely aligns with communities realizing benefits provided by such expenditures, such as street lighting projects and reliability projects. These become tangible assets that specifically benefit a community.

Table 3 – List of Equity Indicators and Associated Equity Outcomes

No.	Equity Outcome	Equity Indicator
1	Community Assets	• Expenditures of existing and planned community energy projects
2	Community Collaboration	• Locations of existing and planned community energy projects
3	Economic Opportunities and Youth Pathways	• Career development
4	Equitable Access	• Public outreach • Public energy education • Burden to program participation • Accessibility to non-single-family homeowners
5	Healthy Planet, Healthy Lives	• Outdoor air pollution
6	Affordable & Reliable Electricity	• Feeder outages by census tract • Response time to outages

6 Portfolio of Actions

6.1 Background

Ensuring that all customers equitably benefit from the transition to clean energy is one of CETA's central tenets. The purpose of this section is to identify **current** program offerings within City Light that can equitably distribute energy and nonenergy benefits, reduce burdens to Highly Impacted Communities and Vulnerable Populations, improve public health and environmental risks, and advance energy security and resiliency.

The programs listed below comprise City Light's current *portfolio of actions* related to CETA and are tracked by our indicators as identified in Section 5. Potential metrics to help measure these indicators include those listed below.

- Total number of participants in 2020
- The ratio of total number of participants from Highly Impacted Communities and Vulnerable Populations vs. total number of participants per year
- Accessibility of the program (renters/language/etc...)
- 2020 budget
- Average dollar value received by a participant in 2020
- Outreach efforts to advance program awareness
- Burden and barriers to program participation
- Non-energy benefits

This portfolio is a subset of programs, current as of spring 2021. However, the portfolio is expected to evolve over time as new programs are developed, existing offerings are assessed

and recalibrated to better meet customer and utility goals, including equity, and some offerings are retired.

6.2 Utility Program Identification

City Light has a long history of developing, building, and evaluating innovative, public facing programs that promote clean energy. The next section describes City Light programs which have a strong equity link and organize them into five main themes:

1. Affordability
2. Reliability
3. Energy efficiency
4. Supply of renewable energy
5. Transportation electrification

Each offering has program-specific eligibility requirements (e.g., low income, commercial sector, etc.) and qualification processes, which means they all have the ability to demonstrate and support CETA equity outcomes. Reduced energy burden through affordability programs and energy efficiency programs available to low-income customer, renters, and multifamily housing are a key component of CETA.

6.2.1 Affordability

Utility Discount Program (UDP): The UDP is a rate assistance program, applied to a customer's bills going forward after acceptance (60% reduction in City Light bill, 50% reduction for SPU bills). This program is available for income qualifying customers, tiered by household size.

Emergency Low Income Assistance (ELIA): ELIA participants, who have received at least a 10-day shutoff notice on balances of $250 or more, may receive assistance up to 100% of their bill, up to a maximum of $500. For 2021, assistance is available twice in a 12-month period and the program is not conditional on shutoff notices. It applies to customers with balances of $250 or more.

Emergency Rental Assistance (ERA) Program: The federal Coronavirus Response and Relief Supplemental Appropriations Act (CRRSA) provides state funding for the ERA program, which provides rental and utility arrears assistance for individuals and households impacted by the COVID-19 pandemic. The Washington state legislature then appropriated $325 million of that funding for emergency rental and utility assistance. As of August 2021, Seattle City Light has received $1 million of these federal funds to disburse as credits to income-qualified customers within the city limits of Seattle.]

Project Share: Project Share is funded by customer donations and provides a one-time per year assistance toward a customer's City Light bill. Project Share funds are used for customers currently enrolled in the UDP who have also received the ELIA benefit to help them achieve a

zero balance on their active electric account. The program provides one-time per year assistance up to $500 toward a customer's past due City Light bill.

Budget Billing Program: This is a monthly billing plan option that enables customers to spread energy costs evenly throughout the year. This provides certainty to each bill and assists customers in avoiding high bills during peak demand.

Energy Equity Rate Pilot (EERP): Offers a suite of wrap-around benefits for income-qualified customers with high energy burdens that reside within the city limits of Seattle: a reduced rate for electrical consumption; energy efficiency upgrades and weatherization projects (depending upon housing type and ownership or renter status); and a balance forgiveness program (balance management arrangement) upon successful completion of agreed upon payments that fit household budgets. This pilot is administered in partnership with Byrd Barr Place and is limited to the City; it has the potential for expansion to franchise cities after the pilot is evaluated. This pilot is operational through the end of 2021 but may be extended.

City Light's affordability programs can be tracked by multiple metrics, including those listed below. Some cautions: these metrics are a starting point and are not comprehensive of all metrics that could be tracked, data – and standard definitions for what they entail- do not yet exist for all potential metrics, nor are they universally applicable to all programs. These metrics will need to be refined over time.

Table 4 – Potential Metrics for Tracking Affordability Programs

Program	Number of 2020 partici-pants	Percent of HIC and VC/total partici-pants	Accessibility to non-single family homeowners [low-high]	2020 Expend-itures	Average $ value received by a participant in 2020	Awareness of and access to programs	Burden to program participa-tion - a qualitative scale or describe each step to participate
Utility Discount Program	36,000	100%	High	$22.2M	*$*617	*Need to define*	*Need to define*
Emergency Low Income Assistance	384	100%	High	$99,000	$257	*Need to define*	*Need to define*
Project Share	832	100%	High	$200,000	$240	*Need to define*	*Need to define*
Budget Billing	5,800	N/A	High	$0	*N/A*	*Need to define*	*Need to define*

Energy Equity Rate Pilot	69	100%	High	Difficult to calculate. Customer rates were reduced by 70%	Difficult to calculate. Customer rates were reduced by 70%	*Need to define*	*Need to define*

6.2.2 Reliability

Miller Community Center Microgrid: The Miller Community Center Microgrid demonstration project includes an installation of solar generation and on-site storage that provides backup power in the event of a power outage. The system includes microgrid controls that enables the system to switch between an islanded mode when there is an outage in the grid, and a grid connected mode, where generated power can be injected onto the grid and the community center can also draw power from the grid. With this microgrid the Miller Community Center can provide backup power to nearby neighborhoods during emergency events.

Demand Response Pilot: City Light is developing a demand response pilot. Scheduled to launch in 2022, the pilot is expected to last at least 18 months. Pending pilot outcomes, City Light may develop a portfolio of demand response offerings.

Table 5 – Potential Metrics for Tracking Reliability Programs

Program	Number of 2020 partici-pants	Percent of HIC and VC/total partici-pants	Accessibility to non-single family home-owners [low-high]	2020 Expendi-tures	Average $ value received by a partici-pant in 2020	Awareness of programs (Outreach Medium/ Year)	Burden to program participa-tion - a qualitative scale or describe each step to participate
Miller Community Center Microgrid Demonstra-tion	1	NA	low	$387,500	$387,500	NA	*Need to define*
Demand Response Pilot	NA – not yet launched	NA	NA	NA	NA	NA	*Need to define*

6.2.3 Energy Efficiency

HomeWise: Offers weatherization services to income eligible households, with the aim of decreasing each participating household's energy bills while also increasing comfort, health,

and safety. The program partners with the Seattle Office of Housing to replace/upgrade key areas of energy efficiency (e.g., insulation windows/doors, heating sources) to income qualifying residential and multifamily buildings. Services are provided through federal, state, and local utility funding. The HomeWise program is also an add-on component of the Energy Equity Rate Pilot described above. HomeWise was temporarily suspended in 2020 due to the pandemic.

Direct Install Services Program (Powerful Neighborhoods): Provides free energy efficiency improvements for individual units and multifamily building common areas. In 2020, due to the pandemic, this program ceased in-home installation and adapted to provide free energy saving kit to directly to customers and food pantries. These free improvements include LED light bulbs, efficient showerheads and/or faucet aerators to reduce energy burden to renters.

Small Business Program: Installs energy efficient lighting and equipment at no- and low-cost to the participating businesses to assist in lessening the affordability pressures in this high cost region. Through the Small Business Energy Solutions program, City Light aims to help small business customers impacted by COVID-19 by providing resources to lower and better manage their energy costs. Small business participation will be prioritized in Highly Impacted Communities and for Vulnerable Populations, and the program aims to promote regional economic recovery and workforce development.

Multifamily Retrofit Programs: Provides a wide range of retrofit energy efficiency solutions for capital improvement, operations & maintenance, and behavioral improvements, across existing multifamily buildings. These programs lower owner and tenant energy use, thereby reducing renter energy burdens.

Built Smart: Encourages developers of new multifamily buildings to reach beyond standard energy code and develop additional electricity savings through financial incentives. The program recruits both affordable and market-rate developments.

Multifamily Weatherization: incentivizes owners of existing multifamily properties to invest in insulation, window, and exterior door upgrades.

City Light's energy efficiency programs can be tracked by multiple metrics, including those listed below. Some cautions: these metrics are a starting point and are not comprehensive of all metrics that could be tracked, data – and standard definitions for what they entail- do not yet exist for all potential metrics, nor are they universally applicable to all programs. These metrics will be refined over time.

Table 6 – Potential Metrics for Tracking Energy Efficiency Programs

Program	Number of 2020	Percent of HIC and	Accessibility to non-single family	2020 Expendi-tures	Average $ spent per	Awareness of programs	Burden to program participa-

	partici-pants	VC/total partici-pants	home-owners [low-high]		participa nt in 2020	(Outreach Medium/ Year)	tion - a qualitative scale or describe each step to participate
HomeWise	233* This program was suspended due to COVID	100%	high	$1,100,000	$4650	*Need to define*	*Need to define*
Powerful Neighbor-hoods	2020 is not a representa tive year due to COVID	Above average	100%	$381,200		*Need to define*	Super-easy to participate
Small Business Support	194	55%	N/A	$129k	$630	*Need to define*	*Need to define*
Commercial and Industrial Retrofit	220 sites	Unknow n	N/A	$6.1 million	$27,700	*Need to define*	*Need to define*
Built Smart	59 projects	Unknow n	100%	$1.1 million	$18,600	*Need to define*	*Need to define*
Multifamily Weatherizati on	20 projects	Unknow n	100%	$193,000	$9,600	*Need to define*	*Need to define*

6.2.4 Renewable Energy

Green Up Community: Incentivizes new solar arrays hosted by affordable housing and other low-income service providers through the purchase of renewable energy credits (RECs) acquired by Green Up participants.

Green Up: Green Up is Seattle City Light's voluntary green power program that allows any utility customer to purchase renewable energy through a self-selected additional charge on their utility bill. The program is based in RECs and customers may either match their billed electricity consumption or purchase 100 kWh blocks.

Existing Renewable Hydroelectric Resources: The utility owns two major power sources: The Boundary Hydroelectric Project, and the Skagit Hydroelectric Project, (which includes the Ross, Diablo and Gorge hydroelectric plants). These sources, combined with three small hydroelectric

facilities, the Newhalem Creek Hydroelectric Project, the Cedar Falls Hydroelectric Project, and the South Fork Tolt River Hydroelectric Project, generated approximately 6.4 million megawatt hours ("MWh") of electrical energy in 2018, which was about 46% of City Light's total resources.

Renewable Power Purchase Agreements: City Light has three main renewable energy purchased power agreements: Columbia Ridge Landfill Gas, Stateline Wind, and King County Wastewater Treatment Plant; and various smaller contracts for RECs. Columbia Ridge is a landfill gas-to-energy resource located in Arlington, Oregon; Stateline is a wind project near Walla Walla, Washington; and the King County Wastewater Treatment Plant is a local digestor gas plant. All of these contracts come with either renewable energy or RECs, and offer compliance options for I-937, which is the Washington Portfolio Standard legislation introduced in 2006.

Renewable Plus Program: Seattle City Light intends to launch a program offering a new renewable energy product that allows large commercial customers to offset a portion of their energy with renewable energy sourced from a newly-constructed renewable energy resource. As part of this offering, City Light will sign a 15+ year power purchase agreement (PPA) with a resource developer for the new resource, likely located in eastern WA and with transmission secured to deliver the energy back to City Light's load. Participating customers will enroll accounts into the program and will pay a per kWh adder on top of their retail bill for this "bundled energy". Customers will receive quarterly and annual reports from City Light verifying that their enrolled load is covered by renewable energy certificates (RECs) retired by City Light towards that load.

Virtual Net Metering: City Light is currently developing virtual net metering functionality. Virtual net metering will enable eligible customers with solar installations to virtually distribute excess solar generation to multiple customer meters. For example, a multifamily affordable housing site with a solar installation would first be able to offset the load of the house meter, then share the excess generation with the residential units, reducing their energy burden through net metering. Virtual Net Metering will help facilitate more equitable benefits to tenants of multifamily buildings and may enable future community solar programs.

City Light's renewables offerings can be tracked by multiple metrics, including those listed below. Some cautions: these metrics are a starting point and are not comprehensive of all metrics that could be tracked, data – and standard definitions for what they entail- do not yet exist for all potential metrics, nor are they universally applicable to all programs. These metrics will be refined over time.

Table 7 – Potential Metrics for Tracking Renewables Programs

Program	Number of 2020 partici-pants	Percent of HIC and VC/total partici-pants	Accessibility to non-single family home-owners [low-high]	2020 Expendi-tures	Average $ value received by a partici-pant in 2020	Awareness of programs (Outreach Medium/ Year)	Burden to program participation - a qualitative scale or describe each step to participate
Green Up Community	0	NA	low	NA	NA	Direct outreach to eligible participants, webinar	Eligibility and application
Green Up	10,700	unknown	high	$800,000	NA	Bill inserts, website	Any City Light customer may participate
Renewable Purchase Power Agreements	NA	NA	NA		NA	NA	NA
Virtual Net Metering	NA	NA	NA	NA	NA	Direct conversation on with 3 exemplary bldg projects	NA

6.2.5 Transportation Electrification

In 2020, City Light released the *Transportation Electrification Strategic Investment Plan* (TESIP) in response to the Washington state legislature's 2019 passage of House Bill 1512, which enabled electric utilities to incorporate transportation electrification into utility modernization.

The Plan outlined three broad areas – public transit, fleets, and personal mobility – where City Light will invest to deliver the types of programs identified by more than 35 community stakeholder groups. Significantly, the Plan also identified key equity outcomes to incorporate accountability to communities. In 2021, City Light is embarking on a second phase of community and stakeholder engagement that will continue to refine these priorities and uphold our commitment to community collaboration in program design and delivery.

In 2021, City Light in partnership with the Office of Sustainability, the Department of Transportation and the Office of Economic Development, released Seattle's Transportation

Electrification Blueprint, setting out how to plan for an equitable future where vehicles that move people, goods and services are electric, and setting ambitious goals for the transportation and electricity sector to see results by 2030, including:

- 100 Percent of Shared Mobility is Zero Emissions - As shared mobility services like bikes, scooters, taxis, Uber, Lyft, carshare services and others continue to expand in Seattle, the city will ensure those options will be electric and emissions free.
- 90 Percent of All Personal Trips are Zero Emission - By 2030, nine out of 10 trips must be walking, biking, electric transit or in an electric vehicle (or avoided all together).
- 30 Percent of Goods Delivery is Zero Emissions - Goods movement is a growing cause of congestion and emissions on our roads, as more and more of the goods we buy and the food we eat are purchased online and delivered.
- 100 Percent City Fleet is fossil-fuel free (Executive Order 2018-02) - Continuing to lead by example, Seattle will operate a large municipal fleet with zero fossil fuels by 2030.
- One or More 'Green & Healthy Streets' in Seattle (C40 Fossil Fuel Free Streets declaration, 2017) - A major area of our city will have zero emissions from transportation including streets or blocks that restrict cars and promote walking, biking, electrified transit, and electric goods delivery and services.
- Electrical Infrastructure Required to Stay Ahead of TE Adoption is Installed and Operational Infrastructure investments will enable a rapid transition to an electrified transportation system.

Below are City Light's initial transportation electrification public offerings. These offerings will expand and evolve with planned public engagement.

Public Transit Projects: King County Metro, Washington State Ferries, and Port of Seattle electrification projects. Public transit has been identified as high priority in TESIP. These projects also will have environmental benefits for South Seattle/Duwamish, which have been identified as Highly Impacted Communities.

Public Charging Station Pilot: Public charging stations serve populations living in multifamily building that need public charging options. The City Light public charging pilot is installing 26 DC fast chargers across the service territory to demonstrate access to charging to current/future EV owners (address DC gaps in private charging companies), establish lessons learned, and drive adoption in areas with low EV ownership in support of the mayoral *Drive Clean Seattle Initiative*. Stakeholder and community outreach has been conducted, prior to install, using neighborhood associations, with the intention of determining cost-effective, equitable, and accessible station locations.

Personal Mobility Programs: City Light is developing new program opportunities for personal mobility. Program(s) are expected to launch in 2022.

Fleets Programs: City Light is identifying new program opportunities for commercial, government, and non-profit fleets. Program(s) are expected to launch in 2022.

City Light's transportation electrification offerings can be tracked by multiple metrics, including those listed below. Some cautions: these metrics are a starting point and are not comprehensive of all metrics that could be tracked, data – and standard definitions for what they entail- do not yet exist for all potential metrics, nor are they universally applicable to all programs. These metrics will be refined over time.

Table 8 – Potential Metrics for Tracking Transportation Electrification

Program	Number of 2020 partici-pants	Percent of HIC and VC/total partici-pants	Accessibility to non-single family home-owners [low-high]	2020 Expendi-tures	Average $ value received by a participant in 2020	Awareness of programs (Outreach Medium/ Year)	Burden to program participation - a qualitative scale or describe each step to participate
Public Transit Projects			NA			*Need to define*	*Need to define*
Public Charging Station Pilots	16 sites	37% 6 sites	*Need to define*	$15,000	NA	*Need to define*	*Need to define*
Personal Mobility Program(s)	NA – not yet launched	NA	NA	NA	NA	*Need to define*	*Need to define*
Fleets Program(s)	NA – not yet launched	NA	NA	NA	NA	*Need to define*	*Need to define*

6.3 Outside Service Territory

The initial suite of programs described above as City Light's portfolio of actions provides a starting point for elevating equity as City Light supports clean energy transformation. However, City Light recognizes that Highly Impacted Communities and Vulnerable Populations extend outside the service territory in and around Seattle. City Light owns and operates generation facilities and transmission infrastructure in and across five Washington State counties. These remote resources, some more than 500 miles outside Seattle, generate and deliver electricity to our residential, commercial, and industrial customers in Seattle and surrounding franchise cities.

Highly Impacted Communities and Vulnerable Populations may be found near City Light's transmission corridors, generation facilities, and future renewable resource supplies. Investments

in infrastructure and maintenance in these areas supports the transition to clean energy and has the potential to impact Highly Impacted Communities and Vulnerable Populations. The approaches to addressing the needs of these groups within and adjacent to our Hydroelectric project boundaries are primarily through the Federal Energy Regulatory Commission (FERC) relicensing process. This 5-year process culminates in a project license with legally-binding expenditures on programs over the life of a 30–50-year license. During the relicensing process, many studies are undertaken that address the project's impacts to environmental elements such as water, air, land, fish and wildlife, forests and vegetation, recreation, and cultural resources, which are of interest to tribes and first nations. City Light's Cedar Falls Hydroelectric Project predates FERC licensing requirements and operates under a Habitat Conservation Plan (HCP) for the watershed that has expenditure program commitments, committees, and reporting similar to a FERC license and ongoing collaborations with tribes.

During a relicensing process, City Light actively engages in broad outreach to tribes and first nations to make them aware of the process and their rights to participate. Several tribes and first nations that have entered into formal agreements with City Light in previous licenses and current relicensing processes; however, for a variety of reasons, not all tribes and first nations ultimately choose to participate in the relicensing process. City Light also consults with a broader group of stakeholders that include tribes that may or may not have formal license agreements with the utility. Consultations include areas such as project permitting and salmon recovery efforts.

Investments in these area outside City Light's service territory could provide opportunities for energy and nonenergy benefits to these groups, as well as generate unintentional burdens that CETA is trying to avoid. City Light acknowledges these connections and intends to expand the portfolio of actions over time with additional assessments of these investments, collaboration with affected groups, and through applying lessons learned from the initial portfolio of actions.

7 Community Outreach

7.1 General Approach

City Light's outreach plan for this CETA equity report seeks to conduct inclusive and equitable outreach that is intentional and purposeful to build a clean energy future with customers. City Light will engage communities within its service territory about the benefits of clean energy and any barriers to accessing it. The outreach will approach this using a story narrative such as:

> Once upon a time there was…. *Community*
> Most days, they struggled because of… *a challenge*
> One day…. *Seattle City Light made a plan and took actions*
> The Community's life improved because… *the actions created benefits that addressed their challenges*

Staff plan to conduct outreach and engagement in two phases:

Phase 1

- Initial community and stakeholder outreach and engagement activities
- Identify priorities for where City Light should focus efforts
- Broad customer survey
- Prioritize meeting with environmental justice community leaders and stakeholder groups

Phase 2

- More in-depth engagement with Highly Impacted Community members and Vulnerable Populations
- Work with community-based organizations to conduct outreach and engagement activities
- Develop a long-term strategy to engage with Highly Impacted Communities and Vulnerable Populations

7.1.1 Objectives

The objectives for outreach associated with developing a clean energy future include:

- Engage with community-based organizations (CBOs) to identify and develop customer benefits that will reach Highly Impacted Communities and Vulnerable Populations
- Develop communication strategies and programs that are inclusive and equitable and adapt to the changing needs of customers in City Light's service territory
- Recognize that different people have different priorities and needs; address them accordingly
- Target and engage the groups identified above in discussions
- Develop metrics that help City Light measure equity in electric energy planning and decision-making for CETA
- Identify and mitigate barriers to customer participation
- Prepare materials to explain City Light goals and initiatives for CETA
- Determine innovative and creative ways to engage with our customers to discuss CETA
- Develop a short-term and long-term outreach plan for CETA

7.1.2 Target Audiences

Staff plan to direct outreach with state-identified targeted audiences as well as those identified though City's Equity and Environment Agenda and City Light's target audiences. The state-identified target audiences include Highly Impacted Communities and Vulnerable Populations as described in Section 4. Based on the data on Highly Impacted Communities, 60 out of 182 areas in City Light's service territory rank 9-10 on the Environmental Health Disparities map.

Staff identified four demographic groups as Vulnerable Populations though the City's Equity and Environment Agenda and City Light Target Audiences. These include:

- Black, Indigenous, People of Color (BIPOC) customers

- Low-income customers
- Limited English Speaking (LES) customers
- Immigrant and refugee communities

7.2 Tactics and Metrics

The following tactics are examples of the specific methods and channels that City Light will take to engage with community members (Table 9). City Light is in the process of hiring an Outreach Coordinator who could help with implementing these tactics.

Table 9 – List of Potential Public Engagement Tactics

Digital	Print	Other/Community
• Email • Social Media (Facebook, Twitter, LinkedIn, Instagram) • Ethnic Media • Neighborhood blogs / community newsletters / organizations • City Blogs & newsletters (including franchise cities) • Social Media Toolkit (other City departments) • Local media	• Billboards • Buses (interiors/exteriors) • Ethnic Media • Valpak • Direct Mail • Local media	• Radio • Existing community and advocacy group meetings • Focus groups (in-language) • Schools/PTAs • Racial Equity Toolkit (partially completed) • Translation and interpretation services • City commissions, advisory boards, elected officials • Events • Webinars

Metrics are used to measure success of outreach and engagement activities. These could include:

- Participation by a certain number of CBOs
- Participation by a certain number of customers
- Pre- and Post-surveys
- Number of outreach engagements (events, collateral, etc.)
- Results of all tactics

7.3 Previous Outreach Efforts and Market Research

City Light has gained insights through past market research with customers. In 2017, City Light conducted market research to identify customer priorities when developing the 2019-2024 Strategic Plan. The research, conducted by a third-party consultant, over sampled low-income customers (UDP participants). This research found that City Light customers want the utility to plan for the future while keeping costs down.

Their top three priorities for the utility were:

- Be leaders in environment and renewable energy (51% of residential customers ranked clean energy as a top priority)
- Invest in technology for operational improvements
- Keep costs down

Customer priorities were also heard though Transportation Electrification Strategic Investment Plan (TESIP) outreach and engagement efforts. At City Light, we are redefining electricity services to meet the evolving demands of our customers and our rapidly growing metropolitan area. City Light envisions a utility of the future that is responsive to the wants and needs of community members most impacted by environmental inequities, operates a modernized grid that enables real-time smart technology interaction and provides economic opportunities through infrastructure investments and upgrades. A modernized electric grid will allow for resource optimization and prepare the region to withstand growing climate change impacts.

City Light is seizing transportation electrification as an opportunity to deliver on this vision. With our clean energy, the Pacific Northwest is in a unique position to electrify the transportation sector and deliver a triple win for our customers, the environment, and the utility.

City Light partnered with the Seattle Department of Neighborhoods (DON) to engage environmental justice communities in outreach and engagement efforts. City Light engaged with 25 environmental justice community leaders, four environmental justice organizations, eight major commercial fleets, four environmental advocacy organizations, five labor unions and labor councils, and three shared mobility transportation network companies (TNCs) and taxi companies.

The input received from these conversations informed the transportation electrification investment priorities for City Light over the next four years. The **main priorities** heard from environmental justice community leaders and stakeholder groups included:

1. *Conduct customer and stakeholder outreach and awareness on transportation electrification:* Many environmental justice community members are unfamiliar with electric vehicles (EVs). Communicating in local languages, highlighting communities of color in advertising, and focusing on multimodal transportation electrification can help increase equitable access.
2. *Prioritize buses for electrification:* This was the number one priority for both community leaders and stakeholders. Low-income communities and communities of color are more likely to depend on buses for most, if not all, of their transportation needs. Electrifying public transit will benefit communities who most rely on public transit by reducing air and noise pollution where impacts are greatest.
3. *Electrify commercial and local government fleets that run through the Duwamish Valley:* Environmental justice communities are exposed to—and concerned about—poor air

quality and suffer from geographic and social health disparities. Commercial fleet electrification can reduce harmful tailpipe emissions in the Duwamish Valley.

4. *Expand at-home and near-home charging for multifamily residents:* Currently, there is a lack of access to EV charging for multifamily units. Expanding at-home and near-home charging solutions for multifamily residents in environmental justice communities will increase equitable access to transportation electrification as 52% of City Light's customers are renters and a majority live in multifamily properties.
5. *Electrify high-mileage ride-hailing vehicles:* High-mileage ride-hailing vehicles (e.g., TNCs and shared mobility, such as Lyft, Uber, taxis) drive three to five times more than regular passenger vehicles and electrifying them can have a large impact on tailpipe emissions. In addition, high-mileage ride-hailing vehicles are frequently driven by immigrants and members of communities of color and targeted incentives can increase equitable access to transportation electrification.

Additional resources that can inform understanding of customers desires and priorities include:

- Duwamish Valley Action Plan
- CHIA Clean Health Impact Analysis
- Washington Environmental Health Disparities Map
- City Department of Neighborhoods (DON) Seattle/Neighborhood Snapshots data
- Got Green and Puget Sound Sage publication: Our People, Our Planet, Our Power
- Puget Sound Sage publication: Powering the Transition: Community Priorities for a Renewable and Equitable Future
- Green Job Pathways
- Equity and Environmental Agenda – deep engagement with Environmental Justice Initiative – green job pathways, environmental justice communities have leverage and power, building capacity for them to influence environmental justice within the City
- TESIP ongoing efforts

7.4 Next Steps

Outreach with customers will benefit from coordination with DON, which requires building a Memorandum of Agreement (MOA) between DON and City Light. The MOA will establish terms, conditions, scope of work, community and stakeholder outreach and engagement activities, and payment information for DON to provide strategic-level communications and outreach support services. To draft a MOA, City Light staff plan to provide:

- Background information (what?)
- Term of agreement (time frame)
- Roles and responsibilities (the work to be completed and by who)

Additionally, a budget will need to be developed to support outreach efforts. Outreach will require funds to support DON's involvement, to hire additional staff such as an Outreach Coordinator, to potentially hire consultants for engagement activities, and to foster participation by customers and CBOs.

8 Protocols

8.1 Equity Impacts Assessment Framework

CETA requires City Light to report forecasts and achievements of energy and non-energy costs and benefits for the utility's selected Portfolio of Actions (see Section 6) on Highly Impacted Communities and Vulnerable Populations every four years. The following framework outlines how the core components of CETA should be linked for equity and program assessment (Figure 4).

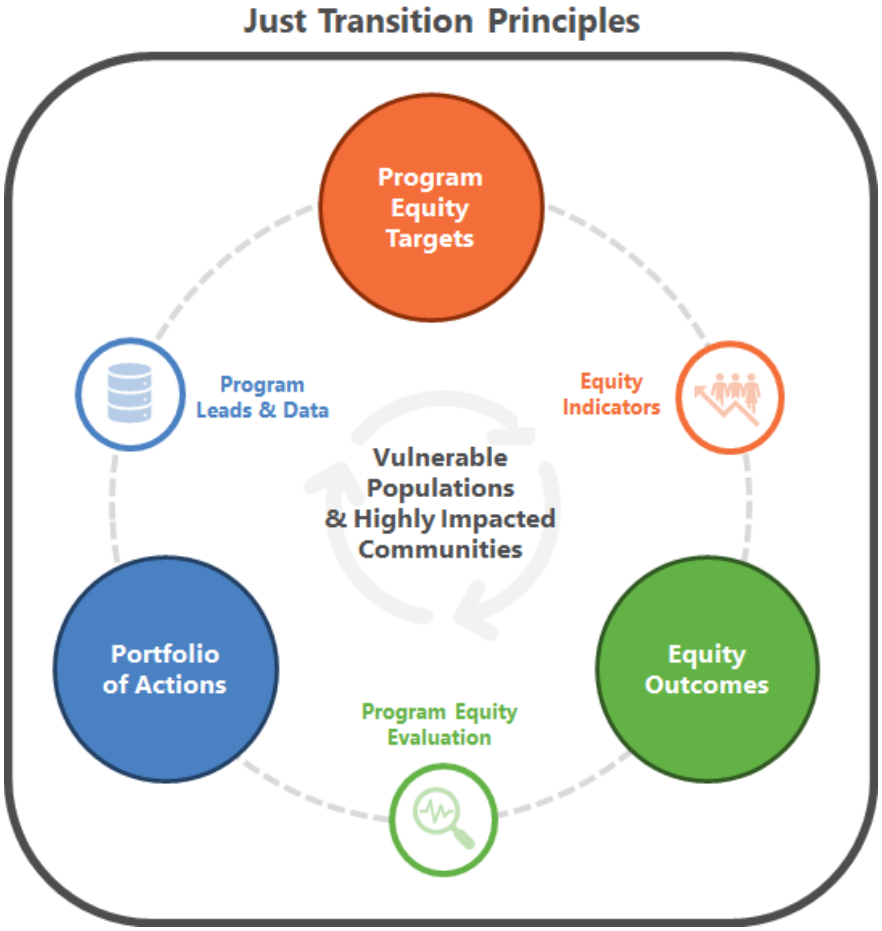


Figure 5 *Equity Impacts Assessment Framework*

Each component of Figure 4 is part of a continuous evaluation process as detailed below.

Equitable Clean Energy Just Transition Principles (Section 3): These are City Light's guiding principles to ensure an equitable and just transition to a clean energy future for Highly Impacted Communities and Vulnerable Populations. The components of the equity assessment framework should support these principles.

Highly Impacted Communities and Vulnerable Populations (Section 4): CETA requires City Light to identify Highly Impacted Communities and Vulnerable Populations that are within its service territory or near transmission or generation assets. These groups experience a disproportionate share of environmental and socioeconomic risk factors.

Equity Outcomes (Section 5): Equity outcome are characterized as a desired future state which improves the livelihood of Highly Impacted Communities and Vulnerable Populations. Equity outcomes are the results of utility actions where it is assumed all communities and populations do not start with equal opportunities to participate in or benefit from programs and investments and therefore, must specifically, but not exclusively, be identified and targeted for investments to bring all communities to a place of equal benefit.

CETA does not make any specific reference to or establish a reporting requirement for equity outcomes. City Light established this concept because it is essential to have a comprehensive set of equity goals and targets driving the assessment framework. The reporting requirements of CETA, specifically related to equity indicators, are easier to interpret and implement by including the concept of equity outcomes.

Equity Indicators (Section 5): CETA requires City Light to set metrics to track the impacts of City Light's actions on Highly Impacted Communities and Vulnerable Populations[5]. Equity indicators help determine if equity outcomes are being achieved and per CETA should be informed by a public input process.

Portfolio of Actions (Section 6): CETA requires City Light to develop a Portfolio of Actions. The Portfolio of Actions includes:

- A subset of City Light programs or projects, mostly customer-facing, that staff have identified as having a strong equity link.
- Programs or projects that directly connect to required CETA targets for Energy Efficiency, Renewable Energy or Demand Response.

The Portfolio of Actions is dynamic, and program offerings can be added or removed over time to reflect evolving policies, customer preferences, utility needs, and equity outcomes.

Program Equity Targets: These are yearly goals for individual City Light programs that enable the achievement of desired equity outcomes. The goals should be measurable and linked to equity indicators for Equity Evaluation.

Program Leads and Program Data: Portfolio Program Leads from City Light's Customer Care and Energy Solutions and other programs and projects should set annual Program Equity Targets with equity outcomes and equity indicators in mind. This can leverage two existing internal processes:

[5] As stated in WAC 194-40-200 Section 4a and 4cii

1. City Light Customer Care and Energy Solutions' Program Portfolio management structure, which sets annual programmatic goals that are tracked monthly/yearly
2. The RET process

Data from programs should be collected to align with equity indicators. For projects that are in the Portfolio of Actions but not part of the Customer Care and Energy Solutions Portfolio, targets should be developed to align with the specific project's workplan or schedule.

Program Equity Evaluation: Programs included in the Portfolio of Actions should be holistically evaluated against their program targets and equity outcomes and indicators. If equity outcomes are not being achieved, then program targets should be adjusted, or new programs may need to be created or added to the Portfolio of Actions.

8.2 CETA Equity Cost and Benefits Reporting Requirements

The formal CETA requirements for reporting forecasts and achievements of energy and non-energy costs and benefits are unclear and subject to interpretation. CETA is not prescriptive in identifying exactly which types of utility actions are subject to the equity cost and benefits reporting requirements. We interpreted the applicable Washington Administrative Code sections which establish the equity cost and benefits reporting requirements as follows:

8.2.1 Interpretation of WAC 194-40-200(4)(c)

Per WAC 194-40-200(4)(c), City Light must report the "forecasted distribution of energy and nonenergy costs and benefits of programs identified in the Portfolio of Actions including impacts resulting from achievement of specific targets for energy efficiency, demand response and renewable energy."

This language establishes that City Light is required to submit a report that generally identifies forecasts and achievements of equity targets for programs included in City Light's Portfolio of Actions; however, it is unclear what distribution of energy and nonenergy costs and benefits refers to. For this reason, Section 4c does not provide sufficient detail to establish a formal reporting requirement in and of itself.

WAC 194-40-200(4)(c)(iii) provides more detail and should be viewed as the formal equity cost and benefits reporting requirement. City Light should "*identify the expected effect of specific actions on Highly Impacted Communities and Vulnerable Populations and the general location, if applicable, timing, and estimated costs of each specific action. If applicable, identify whether any resource will be located in Highly Impacted Communities or will be governed by, serve or otherwise benefit Highly Impacted Communities or Vulnerable Populations in part or in whole.*"

8.2.2 Leveraging City Light's Existing Equity Work for CETA Cost Benefit Reporting

The equity cost and benefits reporting requirements outlined in WAC 194-40-200(4)(c) are, in part, already in place at City Light through the RET process, provided that the RET processes are

resourced and completed. City Light can meet (or exceed) the CETA reporting requirements through the Equity Impacts Assessment Framework described in Figure 4 through:

1. Setting equity targets for programs and projects included in City Light's Portfolio of Actions.
2. Tracking relevant equity data through the Program Equity Targets and the Equity Indicators processes.
3. Performing holistic Equity Evaluations where advancement in City Light's equity outcomes is measured using equity indicators and achievement of Program Equity Targets.

Coordinating this effort on an ongoing basis and for future CETA compliance will be a substantial new body of work. This will require supporting staff resources such as a CETA Equity Coordinator position and potentially additional staff support to bolster the existing RET process. The protocols for each of the three steps listed above are described in more detail in the Equity Impacts Assessment Protocols section below.

8.3 Equity Impact Assessment Protocols

The City Light programs and projects included in the Portfolio of Actions are identified in Section 6. Each program or project should establish a process for setting Equity Targets, which can be used to inform equity indicators and help drive equity outcomes.

The key parts of this process are described in more detail in the list below. These proposed protocols should be viewed as initial recommendations that can be built out and revised as the program equity evaluation framework moves into an implementation stage.

8.3.1 Setting Program Equity Targets

For programs that are in included in the Portfolio of Actions, Customer Care and Energy Solutions Program Managers should work with the CETA Equity Coordinator to complete a Racial Equity Toolkit, if one has not already been performed, or is out of date. The RET will identify the important equity links that can then be tied to related CETA Equity Outcomes and Equity Indicators. Customer Care and Energy Solutions Managers and Program Managers will set annual Program Targets that will help achieve Equity Outcomes. This will require collaboration with impacted communities, the CETA Equity Coordinator, and existing City Light Portfolio Teams, which currently set program targets. Program data should be collected so that it can inform equity indicators. This will require discretion from program leads and the CETA Equity Coordinator. To the extent possible, program targets should be informed by measurable program data that can be reliably collected.

8.3.2 Tracking Data for Programs and Equity Indicators

Highly Impacted Communities and Vulnerable Populations are the central focus of CETA. To track impacts on Highly Impacted Communities and Vulnerable Populations, program and

equity data must, at a minimum, be tracked in a way that can tie back to these groups. The CETA Equity Coordinator, Customer Energy Solutions Program Managers, and other portfolio of action Program Leads should:

1. Establish a mapping process so that the geographic location of Highly Impacted Communities and Vulnerable Populations is readily available to Program Leads and well maintained.
2. The equity mapping data should be organized so that it can be applied to programs identified in the Portfolio of Actions.
3. Develop data collection framework to track demographic information of program participants.

For City Light programs to meet the minimum for CETA compliance, program data should be collected in a manner that indicates what portion of the program will serve Highly Impacted Communities and Vulnerable Populations. This data would be collected and maintained by Program Leads and provided to the CETA Equity Coordinator at least annually to inform Indicators. This data should include, at a minimum:

1. Geographic location of program participation and their mapping (i.e., connection) to Highly Impacted Community or Vulnerable Population
2. Program expenditures and their mapping to Highly Impacted Communities and Vulnerable Populations
3. Program implementation timing
4. If possible, benefits and costs for program participants in Highly Impacted Communities or Vulnerable Populations as it relates to the equity indicators. This will be program specific and could include factors like realized reduction in energy burden, improvement in living conditions, positive environmental attributes, or increased reliability of service. The measurable effects of certain programs or projects could also have a negative effect on Highly Impacted Communities or Vulnerable Populations and, if this is the case, these also should be reported. These impacts should be identified initially as part of the RET process.

For equity indicators that are only indirectly impacted by City Light programs or informed by third party data, for example Indicators related to Air Quality or Greenhouse Gas Emissions, the CETA Equity Coordinator should:

1. Establish an internal process to clearly identify the primary external data source for equity indicator tracking.
2. Establish a process to compile and archive any external data and ensure correct mapping with Highly Impacted Communities and Vulnerable Populations.
3. Work with Program Leads to collect any relevant data that might indirectly contribute to these indicators.

8.3.3 Performing Evaluations for City Light Equity Outcomes and Program Equity Targets

City Light's equity outcomes represent the end goal of the Equity Impacts Assessment Framework; to this end, the CETA Equity Coordinator should regularly evaluate if these outcomes are being achieved and use equity indicators as outlined in Section 5 to determine if positive progress is being made to achieve equity outcomes. If progress is not being made on certain equity outcomes, the CETA Equity Coordinator should re-evaluate program targets, tweak existing actions, or recommend development of new actions.

Evaluation of Program Equity Targets should occur in tandem with Equity Outcome Evaluation. Program Leads should work with the CETA Equity Coordinator to determine if achievement or lack of achievement of equity outcomes is being driven by program performance. If program performance is limiting progress of equity outcomes, then Program Leads should work with the CETA Equity Coordinator to determine what barriers to success may be occurring and develop an action plan to adjust the program strategies accordingly.

If certain equity outcomes are not being achieved because existing programs are insufficient, then the CETA Equity Coordinator should identify this as an equity opportunity for new program development. Examples of strategies to enhance energy benefits to realize equity outcomes through existing programs can be found in Appendix C.

9 Implementation Plan

9.1 Ongoing Process Improvement

Implementation of the CEEP recognizes the living nature of the plan and the evolving understanding of fostering equity while transitioning to a clean energy future. During the development of the CEEP, several challenges were identified that will take time and effort to address. To not lose sight of these challenges while beginning to undertake equitable actions, they are captured below for continued dialog and process improvement as the plan is implemented. The Equity Coordinator will help facilitate addressing these issues as the CEIP is carried out over the next four years.

Table 10 – Challenges or issues to be worked on during CEIP implementation

Focal Area	Challenge or Issue
Indicators	Measurement development for indicators; aligning CETA equity metrics with (internal) annual goals, metrics, and dashboards.
Indicators	Burden (Cost) to Participate: Cost needs to be better defined in future iterations of the plan. Cost can mean more than just dollar such as time requirements to participate. However, the indicators were developed with dollars as the primary barrier to entry in program participation.

Outreach	Expanding outreach including co-creation of indicators, community priorities, what can be achieve over time and meeting expectation, building relationships
Reporting	Collecting the right data to report to the state and then reporting to the state
Staffing	Adequately staffing this effort, particularly around the equity coordinator, RET support, and outreach
Utilities	Aligning with PSE (shared territory_=) and neighboring utilities on equity metrics; shared/common approaches

9.2 Scope of Implementation

In order to meet the intent of CETA, City Light program managers in Customer and Energy Solutions and other Program Leads will implement the framework described in Section 8: Protocols and implementation schedule in Figure 5. For each of the programs identified in the Portfolio of Actions (Section 6), program managers will complete a racial equity analysis using the RET and set annual equity targets that will yield benefits to Highly Impacted Communities and Vulnerable Populations. Additionally, program managers, assisted by Communications staff, will engage with Highly Impacted Communities and Vulnerable Populations to enhance City Light's likelihood of achieving equity outcomes. Staff will endeavor to remove barriers to engagement to minimize burdens for public participation. Finally, program managers will develop strategies to address equity targets and achieve equity outcomes.

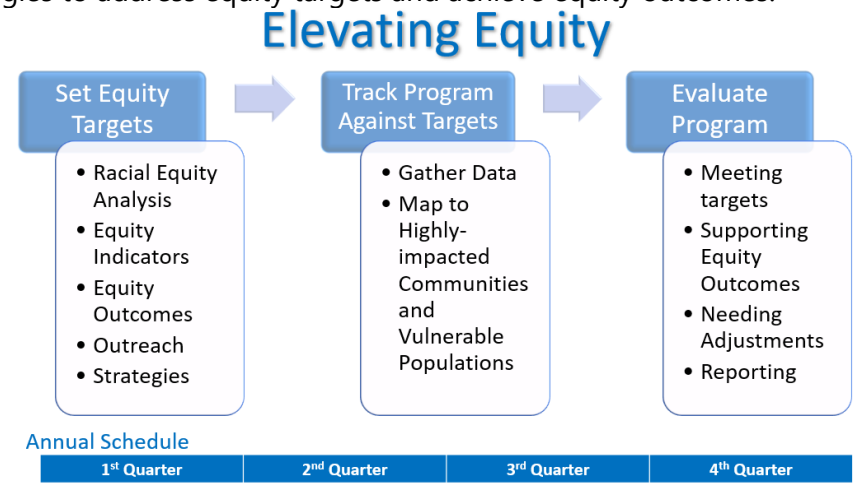


Figure 6 *Implementation Schedule for Elevating Equity*

As programs are carried out, program managers will gather data to track performance against the established equity targets. These data should be mapped or connected to the affected Highly Impacted Communities and Vulnerable Populations. Annually, programs will be reviewed by Customer Care and Energy Solutions managers and supervisors to see if progress is being made toward the targets and that the implemented strategies are supporting the intended equity outcomes. If progress is off target, adjustments will be made to program design and execution to elevate equity (Figure 5). Implementation for expanding the portfolios of actions to

areas outside the City Light service territory will require future work developed with the Equity Coordinator and City Light leadership.

9.3 Responsible Parties, Schedule, and Budget

Each Program Manager for the programs listed in the Portfolio of Actions (Section 6) will be responsible for implementing equity in their program following the implementation framework described in Section 10.1 and Figure 5. Equity targets will be set in the first quarter of each year with performance tracking occurring throughout the year. Regular program evaluation will occur to initiate programmatic adjustments. The Equity Coordinator (described in Section 8.2) will assist in target setting and program evaluation. Once hired, the Outreach Coordinator will be responsible for building enduring community relationships and facilitating community engagement related to the portfolio of actions and clean energy transformation.

Implementing and evaluating actions to elevate equity and engaging with customers may incur additional programmatic costs. These anticipated costs will be incorporated in each program manager's annual budget.

9.4 Reviews and Reporting

The Equity Coordinator will be responsible for performing a review of programs in the Portfolio of Actions biennially starting the first quarter of the third year following implementation. This review will focus on each program's processes for elevating equity as well as its effectiveness at meeting equity outcomes. The Equity Coordinator will provide this feedback to program managers and City Light's Executive Team. Each program's progress will be compiled by the Equity Coordinator and reported to DOC and others as required. Reporting to the DOC will be provided at end of each 4-year period (2021-2025) aligned with the CEIP, starting in 2026.

10 Resources

Title of Resource	Brief Resource Description	Author(s) and/or Contributor(s)	Resource Date	Access
Internal Seattle City Light Resources				
Energy Transformation Projects (ETPs) – White Paper	This document analyzes Washington State's Clean Energy Transformation Act (CETA) to understand its jurisdictions and limitations regarding ETPs and their use for compliance by City Light.	Trevor Lessard, Seattle City Light	2020	Contact Annette Pearson to obtain a copy of this document.
Local Resources (City, County, and/or Region)				
Seattle City Light Transportation Electrification Strategic Investment Plan	This plan describes how the utility is using strategic investments and previous analyses to achieve an equitable, carbon-neutral, modernized, and future-enabled vision for the community. This plan is a result of the Washington legislature's 2019 passage of House Bill 1512 which seeks to enable electric utilities to incorporate	Seattle City Light	2020	Document live link: TESIP.pdf (seattle.gov)

	transportation electrification into utility modernization.			
Equity & Environment Agenda	The Equity & Environment Initiative was launched in 2015 and is jointly owned by the City of Seattle and the community. The Equity & Environment Agenda was created to provide goals and strategies that can serve as a roadmap for sectors to collaborate on efforts to advance environmental equity in Seattle.	Community Partners Steering Committee for the Seattle Equity & Environment Initiative, Seattle Office of Sustainability & Environment	2015/2016	Website link: Equity & Environment Initiative - Environment | seattle.gov Document live link: SeattleEquityAgenda.pdf
Racial Equity Toolkit	"The Racial Equity Toolkit lays out a process and a set of questions to guide the development, implementation and evaluation of policies, initiatives, programs, and budget issues to address the impacts on racial equity."	Seattle Race and Social Justice Initiative, Seattle Office for Civil Rights	Unknown	Resource live link: Racial Equity Toolkit_FINAL_August 2012_with new cncl districts(0).pdf (seattle.gov)
Seattle Strategic Climate Action Plan (SCAP)	This plan provides a "five-year blueprint for County climate action, integrating climate change into all areas of County operations and work with King County cities, partners, communities, and residents. The SCAP outlines King County's priorities and commitments for climate action to residents and partners."	King County	2020	Website: 2020 Strategic Climate Action Plan (SCAP) - King County Entire plan live link: https://your.kingcounty.gov/dnrp/climate/

	Section II: Sustainable & Resilient Frontline Communities addresses those communities that are hit first and the hardest by climate change impacts.			documents/scap-2020-approved/2020-king-county-strategic-climate-action-plan.pdf Section II: Sustainable & Resilient frontline Communities live link: 2020-scap-sustainable-and-resilient-frontline-communities-section.pdf (kingcounty.gov)
Duwamish Valley Action Plan	Promotes a city-community shared vision to guide City investment and planning in the Duwamish Valley. Its objective is to identify near-, mid-, and long-term actions that the City can take to promote community health and well-being.	Office of Sustainability & Environment (OSE) and the Office of Planning & Community Development (OPCD)	2018	Plan live link: DuwamishValleyActionPlan_June2018.pdf (seattle.gov)
City of Tacoma Equity Index	The Equity Index is an interactive tool to highlight disparities in the city of Tacoma to help City staff and partners ensure they are	City of Tacoma	Unknown	Equity Index - City of Tacoma

	making data-informed decisions that benefit their community. The site offers additional resources and presentations on the index.			
Washington State Resources				
Clean Energy Transformation Act (CETA) SSB 5116	Washington law passed on May 7, 2019 by Governor Jay Inslee which commits Washington to an electricity supply free of greenhouse gas emissions by 2045.	Washington State Legislature	May 2019	Brief overview: CETA Overview (wa.gov) Chapter 19.405 RCW: WASHINGTON CLEAN ENERGY TRANSFORMATION ACT Live link: https://lawfilesext.leg.wa.gov/biennium/2019-20/Pdf/Bills/Session%20Laws/Senate/5116-S2.SL.pdf
Washington Department of Commerce Rules and	The Washington Dept. of Commerce rules apply to public and District 9 utilities. Additionally, there is draft guidance for	Washington Department of Commerce	December 2020	CETA-Adopted-Rules-Combined-File.pdf (wa.gov)

Section 4(8) Guidance	implementing RCW 19.405.040(8), the equity requirement.			
2021 State Energy Strategy – Chapter A	A draft blueprint for eliminating the use of fossil fuels with an overarching equity focus laid out in Chapter A.	Washington Department of Commerce	2021	2021 State Energy Strategy - Washington State Department of Commerce
Dismantle Poverty in Washington	An organization dedicated to reducing poverty and inequality in Washington state. They have identified 8 strategies and 60 recommendations for poverty reduction. They also have a 10-year Plan Action Toolkit to assist organizations.	Dismantle Poverty in Washington, Poverty Reduction Work Group	N/A	Website: Poverty Reduction Work Group | Dismantle Poverty in Washington 10-Year Plan: Final10yearPlan.pdf (dismantlepovertyinwa.com) Action Toolkit: ActionToolkit.pdf (dismantlepovertyinwa.com)

Reducing Poverty & Inequality in Washington State: 10-Year Plan for the Future	The Poverty Reduction Work Group (PRWG) was formed in 2017 by the departments of Commerce, Employment Security, and Social & Health Services as a result of a directive by Governor Inslee. The plan is a culmination of first-hand experiences and evidence-based solutions. They prioritize a commitment to equity, particularly racial equity.	Poverty Reduction Work Group	January 2020 (coordinating draft)	Informational PowerPoint: Welcome (wa.gov) Executive Summary: 2020_Jan_21_PRWG_10_year_plan_EXECUTIVE_SUMMARY.pdf (dismantlepovertyinwa.com) Coordinating Draft live link: 2020_Jan_21_PRWG_10_year_plan_COORDINATING_DRAFT.pdf (dismantlepovertyinwa.com)
Environmental Justice Task Force: Recommendations for Prioritizing EJ in Washington	The Environmental Justice Task Force (EJTF) created a blueprint for a shared vision of environmental justice in Washington state including measurable goals, model policy, environmental health disparities map, and community engagement.	Environmental Justice Task Force	November 2020	Document live link: COMMUNITY ENGAGEMENT PLAN GUIDANCE (wa.gov)

State Government				
Community Report on Environmental Justice	Builds on the recommendations presented in the November 2020 'Environmental Justice Task Force: Recommendations for Prioritizing EJ in Washington State Government'. Explores and presents themes that went into forming the Task Force, which provides a deeper understanding of Washington's environmental health disparities and their causes.	Front and Centered	2020/2021	Document live link: Front and Centered - EJ TF Community Report
Washington Environmental Health Disparities Map	A tool to assess multiple, combined environmental risks in Washington state. A collaborative effort among University of Washington Department of Environmental & Occupational Health Sciences (DEOHS), Front and Centered, Washington State Department of Health (DOH), Washington State Department of Ecology (ECY) and the Puget Sound Clean Air Agency (PSCAA).	University of Washington Department of Environmental & Occupational Health Sciences	2019	WA state link: Washington Environmental Health Disparities Map :: Washington State Department of Health UW DEOHS link: Washington Environmental Health Disparities Map Project | Environmental & Occupational Health Sciences

				Document link: Washington_Environmental_Health_Disparities_Map.pdf Interactive Map: Information by Location | Washington Tracking Network (WTN)
Washington Department of Health (DOH) COVID-19 Data Dashboard	Interactive COVID-19 data dashboard with maps and information about how COVID-19 has impacted Washington state.	Washington Department of Health	2020	COVID-19 Data Dashboard :: Washington State Department of Health
National Resources				
Low-Income Energy Affordability Data (LEAD) Tool	Uses 2018 state census data to visualize energy burden and cost across different areas of the United States at the state, county, census tract, and city levels.	Department of Energy, Office of Energy Efficiency & Renewable Energy	Unknown	LEAD Tool | Department of Energy

Lifting the High Energy Burden in America's Largest Cities: How Energy Efficiency Can Improve Income and Underserved Communities	An analysis on energy burden in cities across the U.S. with a focus on "high home energy burdens faced by select groups in major metropolitan areas." The report analyzes data from the US Census Bureau's 2011 and 2013 American Housing Survey and discusses strategies to alleviate high energy burdens in specific households.	American Council for an Energy-Efficient Economy	April 2016	Document live link: u1602.pdf (aceee.org)
A Guidebook on Equitable Clean Energy Program Design for Local Governments and Partners	A guidebook that "introduces a process and principles that local governments and their partners can use to design equitable clean energy programs in their communities." Centers equity in its clean energy design and planning.	Prepared by The Cadmus Group for the Urban Sustainability Directors Network	September 2018	Document live link: A Guidebook on Equitable Clean Energy Program Design for Local Governments and Partners - September 2018 (cadmusgroup.com)
Solving the Climate Crisis: The Congressional Action Plan for a Clean Energy Economy and a Healthy,	"Provides a roadmap for Congress to build a prosperous, clean energy economy that values workers, advances environmental justice, and is prepared to meet the challenges of the climate crisis." It establishes a goal of reaching net-zero	House Select Committee on the Climate Crisis, Majority Staff Report	June 2020	Website link: Solving the Climate Crisis: The Congressional Action Plan for a Clean Energy Economy and a Healthy and Just America | Select

Resilient, and Just America	greenhouse gas emissions in the U.S. by no later than 2050.	116th Congress		Committee on Climate Crisis (house.gov) Report live link: Climate Crisis Action Plan.pdf (house.gov) One-pager live link: SCCC summary.pdf (house.gov)
Energy Democracy Scoreboard and Flipbook	"This flipbook offers communities a guide to find out where they are on the energy spectrum and provides an opportunity to envision what energy democracy could look like in their community. This flipbook can be used by communities to share with their elected officials what they are experiencing and what would be necessary in order to transition to energy democracy. This flipbook provides an education tool, an assessment, and an accountability mechanism."	Emerald Cities Collaborative	January 2020	Document live link: FINAL Flipbook.indd (nnjcf.org)

The State of Equity Measurement: A Review for Energy-Efficiency Programs	This document explores current discourse around equity and provides definitions and measurement schemes for equity in service fields beyond energy-efficiency.	Carlos Martin, The Urban Institute Jamal Lewis, Green & Healthy Homes Initiative Metropolitan Housing and Communities Policy Center	September 2019	Document link: The State of Equity Measurement | Urban Institute
Greenlink Equity Map (GEM)	GEM is a product of Greenlink Analytics, an energy research and consulting non-profit that offers data and industry knowledge on clean energy. GEM was created with the intention of helping communities create and visualize equity-related issues using maps and data.	Greenlink Analytics	2020	Home | GEM (equitymap.org)
Local and Regional Government Alliance on Race & Equity (GARE)	A national network of governments "working to achieve racial equity and advance opportunities for all." They have tools and resources, and host events and trainings.	GARE, Race Forward, Othering and Belonging Institute at UC Berkeley	N/A	Website: Government Alliance on Race and Equity (racialequityalliance.org)

				Tools and resources page: Tools & Resources | Government Alliance on Race and Equity (racialequityalliance.org)
Other Resources				
SEE Supporting A Just Transition	SSE plc is a UK-listed energy company that operates throughout the UK and Ireland. This document outlines SSE's strategy to support energy transition in a "socially just and fair way".	SSE: We power change | SSE	November 2020	Document link: sse-just-transition-strategy-final.pdf (ssethermal.com)

APPENDICES

Appendix A

City Light's Clean Energy Transformation Act Project Data Portal

A City Light web-based Geographic Information System (GIS) viewer is available to support the CETA project, with analysis, communication, or reporting. The viewer combines internal City Light and City data such as transmission lines, service territories, hydroelectric dams with a variety of categorically themed data from city, local, county, regional, state, and federal sources.

The viewer is intended to compliment other GIS resources such as the Washington Tracking Network (WTN) to assist in the identification of Highly Impacted Communities (HIC). WTN data is also available in the viewer to allow program managers to interactively explore and identify the characteristics of Highly Impacted Communities within and beyond City Light's service territory by neighborhood and census tract to discover key indicators such as languages spoken, poverty rates or proximity to hazardous waste sites.

Current categorical GIS data themes include:

- **Administrative**
  Includes a variety of boundary data such as zip codes, neighborhood city limits, and county boundaries.
- **Census**
  Data sources includes both decennial census and American Community Survey data. King County census data is also leveraged.
- **Equity Data/WA Tracking Network data**
  19 indicators from The Washington Tracking Network are included in the GIS viewer to visualize City light data alongside the WTN data. "The Washington Environmental Health Disparities Map depicts cumulative health impact as a ranking from 1 to 10, with 10 indicating the highest impact. These rankings reflect the risk each community faces from multiple environmental hazards and the degree to which a community is more vulnerable to those hazards because of sociodemographic factors."
- **Equity Data/City Light Equity Matrix**

This data is based on Table 1: Highly Impacted Communities (HIC) & Vulnerable Populations (VP) By Census Tract.

- **Hydrography**
  Streams and water bodies for reference.
- **Property**
  Assessor parcels and City Light owned properties and easements.
- **Transportation**
  Roads, streets, and transportation networks for reference.
- **Utility Data**
  Utility assets such as transmission towers, lines, and dams.

Types of data used in Viewer:

The viewer can consume a variety of source data from file-based formats that are published to internal City Light servers, to direct connections to rest-end services hosted and managed by external agencies.

The viewer data library will evolve as new and refreshed data becomes available. Demographic based data is primarily based on 2010 Census and American Community Survey data.

As of May 2021 (excluding base and administrative boundaries) the viewer contains over 40 layers that have an equity and or census theme. Much of the census data uses the 2010 decennial Census; however, some metadata does not provide a published date. Additional research or outreach to the agencies that host this data will be required to definitively assess these date(s). Washington Tracking Network Data published dates can be assessed from this link.

List of Viewer Data:

Theme	Category	Name
Administrative	**Administrative**	Cities (Detailed)
		City and UGA Boundaries
		County Boundary
		FERC Boundary (Skagit Project - G2T)
		FERC Project Boundary (SCL- P2144)
		Municipal Boundary (WSDOT)
		SCL Service Area
		State
		Tribal Lands
		Zip_Codes
Census	**Census**	2018 Housing Affordability by ZIP Code
		Census Tract (2010)
	City of Seattle	All City by Race
	King County Demographics	Percent American Indian or Alaskan Native
		Percent Asian
		Percent Black or African American
		Percent Hispanic or Latino
		Percent Native Hawaiian or Pacific Islander
		Percent People of Color
		Percent speak Chinese
		Percent speak English less than very well
		Percent speak Korean
		Percent speak Russian
		Percent speak Spanish
		Percent speak Vietnamese
		Percent Two or more Races
		Percent White
Equity Data	**Equity Data**	Census Tracts by Displacement Risk and Access to Opportunity type
		Racial and Social Equity Composite Index Current
	Puget Sound Regional Council	Displacement Risk
		Opportunity_Region
		Opportunity_UGA
	SCL Equity Matrix	Displacement Risk
		Duwamish
		EHD Rank
		RSJI
		TESIP (Yes/No per neighborhood)
		TESIP Neighborhood Name
	WA Tracking Network	ACS Limited English Proficiency
		Death from Cardiovascular Disease
		Diesel_Emissions
		Environmental Health Disparities
		Heavy_Traffic
		Lead_Risk_from_Housing
		Low_Birth_Weight
		No_High_School_Diploma
		Ozone_Concentration
		People_of_Color
		PM25_Concentration
		Population Unemployed
		Population_Living_in_Poverty
		Proximity to Hazardous Waste Treatment Storage and Disposal Facilities (TSDFs)
		Proximity to National Priorities List Facilities (Superfund Sites)
		Proximity to Risk Management Plan (RMP) Facililties
		Socioeconomic Factors Ranking
		Toxic Releases from Facilities (RSEI Model)
		Transportation Expense
		Tribal
		Unaffordable Housing (>30% of Income)
		Wastewater Discharge
Hydrography	**Hydro**	River/Stream (Principal)
		Water Bodies (Principal)
Property	**King County Assesor**	King Co Assessor Parcels (Service Area)
	SCL - Real Property	SCL Current Easement Property Rights
		SCL Current Fee Property Rights
Transportation	**Census**	Primary Roads
		Primary Roads Labels
		Secondary Roads
		Secondary Roads Labels
	Transportation	Freight Network
		Heavy Haul Network
		Transit Classification
Utility Assets	**Utility Assets**	Dams
		SCL Hydro Projects
		Transmission - Support Structures
		Transmission Lines

Viewer Access:

Viewer access can be shared withing City Light (not accessible by other city departments or general public) by forwarding a URL to desired recipients. The recipient must be connected to City Light's network on premise or via VPN.

The URL is unique in that it reflects the extent of the map and the GIS layers that are added to the table of contents. This can be a particularly useful functionality to focus the user's attention on a particular geography and theme.

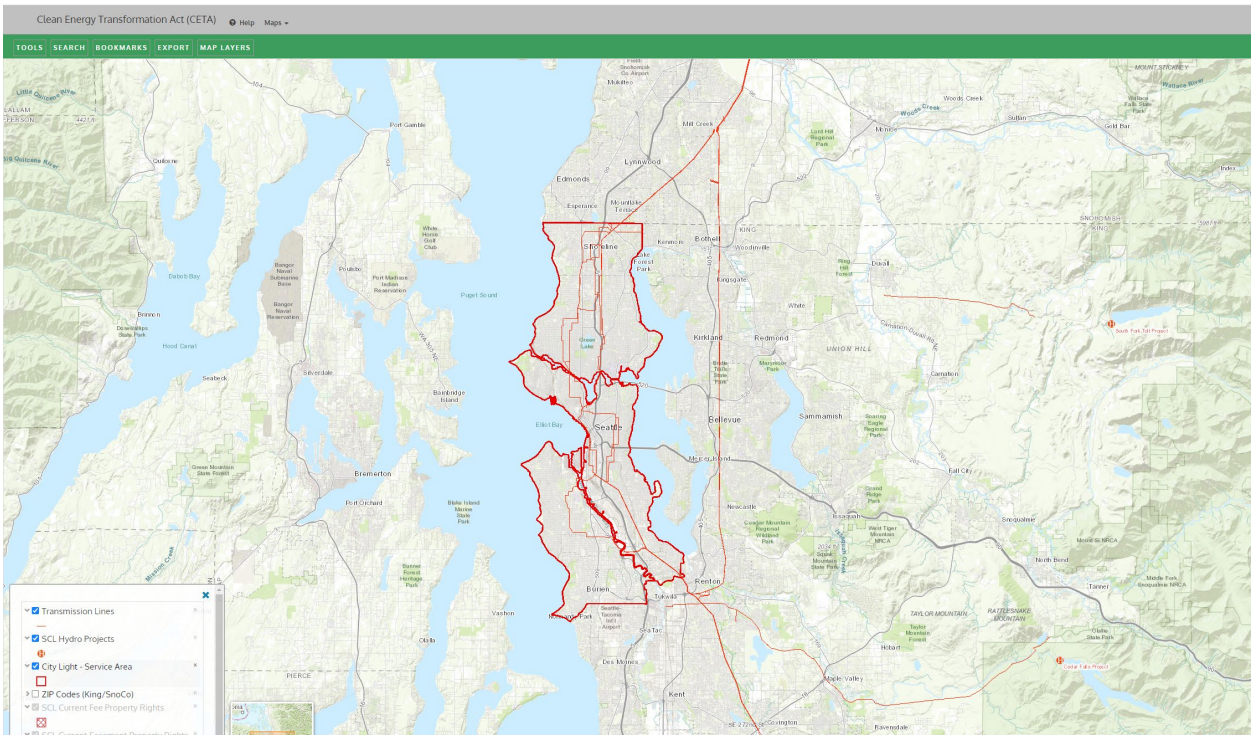
This viewer is compatible with many web browsers provisioned by Seattle IT with the exception of Internet Explorer.

Examples of custom URLs:

Each URL below opens the CETA viewer in a specific geographical areas with custom data in the legend.

- http://sclellgisd/ELL_CETA/#11/47.6008/-122.1844/fc93a5ef9419e78fd48aa440d4f9
- http://sclellgisd/ELL_CETA/#18/47.53312/-122.31910/fc93a5ef9419d4f9
- http://sclellgisd/ELL_CETA/#15/47.5371/-122.2974/

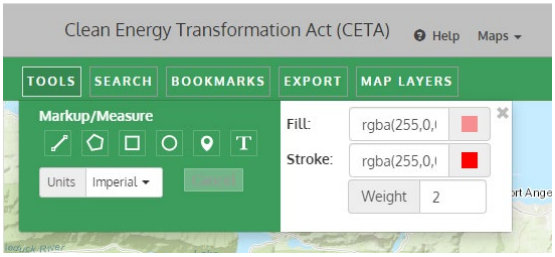
This image shows City Lights service territory.



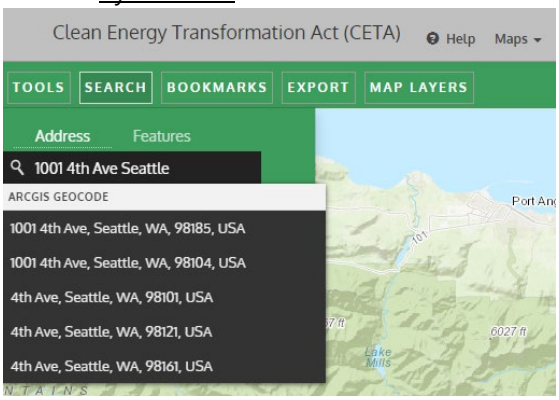
Functionality:

Some examples of the functionality of the tool are demonstrated below.

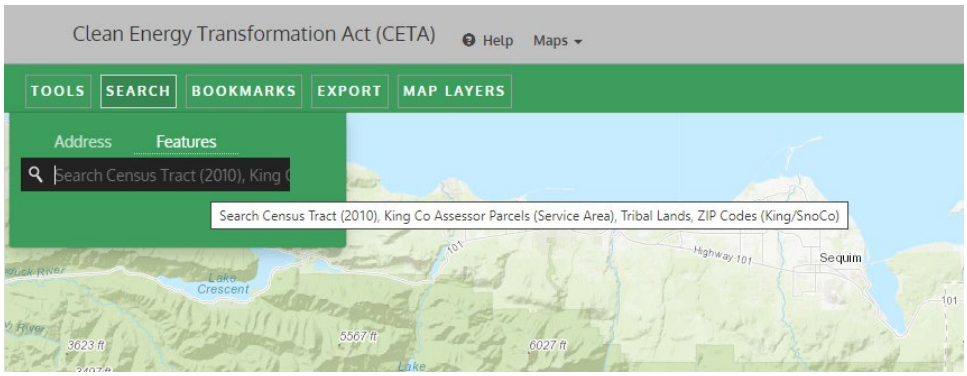
- **Tools** – Includes common measurement and annotation tools

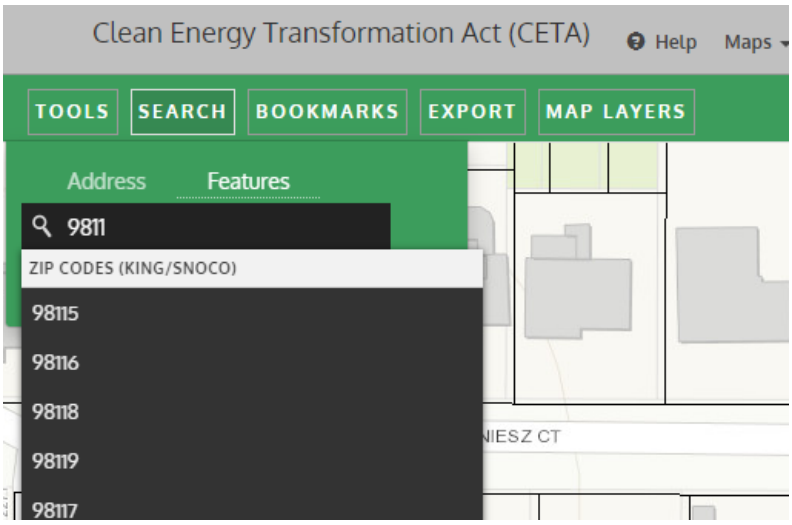


- **Search** – There are two search options:
  By Address.

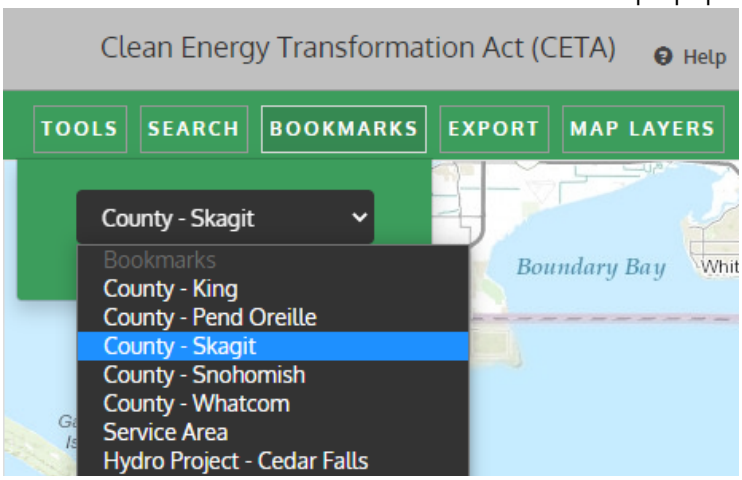


  By Feature. Most GIS layers can be made searchable by specific attributes, i.e., ZIP Code, Census Tract or Parcel number. The comma separated popup displays the currently searchable features.

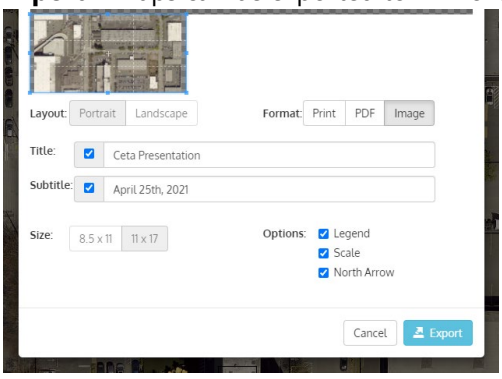


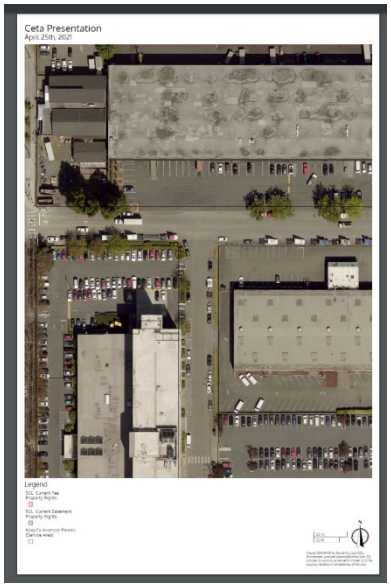


- **Bookmarks** – Some common bookmarks are prepopulated in the dropdown menu.



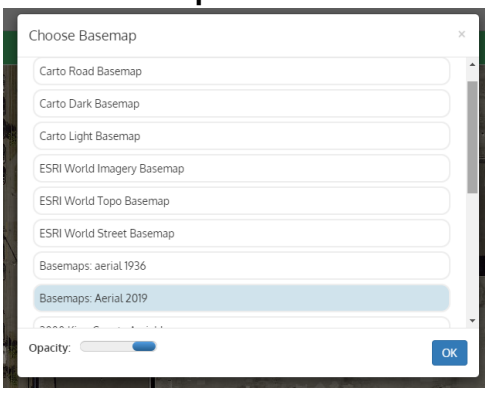
- **Export** – Maps can be exported to PDF or JPEG file formats or sent directly to printer.



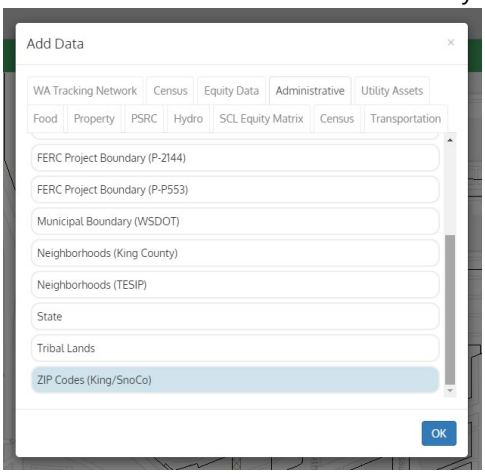


- **Map Layers** – This menu allows the user to change the default basemap and add GIS data to the map.

  Basemap – Select from over a dozen base maps including aerial photography.



  GIS Data – Select from a variety of categorically themed data.



  GIS data can be explored interactively by clicking on a map feature. The intersected layers will display the feature attributes via a 'pop-up' table.

- **Help** – An extensive help menu is available at the URL below.
  http://sclellgisd/VIEWER_APPLICATION_CORE_CODE/help.htm

Appendix B
Indicators Scoring Analysis

Table B-1 - Ten (10) Selected Indicators Scoring Matrix

	Indicator	Equity Area (0=unsure, 1=indirect, 2=direct)								Racial Equity Opportunities (L=1, M=2, H=3)					Total
		Energy Benefits	Non-energy Benefits	Reduction of Energy Burdens	Public Health	Environment	Reduction of Cost	Energy Security	Resilience	Education	Community Development	Health	Environment	Jobs	
1	Expenditures of existing and planned community energy projects	2	1	0	1		1	2	2	1	3	1	1	1	16
2	Locations of existing and planned community energy projects	2	1		1		1	2	2	1	3	1	1	1	16
3	Awareness of programs	1	1	2			2	1	1	3	2	1	1	1	16
4	Public energy education	1	1	1	2	1	1	2	2	3	2	2	1	1	20
5	Jobs		1	0			1		1	1	1	2	1	3	11
6	Burden (cost) to program participation	2		2			2	1		2	2	1	1	1	14
7	Accessibility to multi-family residents	2	1	1			2	2	2	1	3	1	1	1	17
8	Outdoor air quality (Concentration of diesel particulate matter in air and reduction of greenhouse gas emissions)		1	1	2	2	0			1	2	3	2	1	15
9	Feeder outages (causes, number, locations, average duration, average response time) by census tract	2	1	1	1		1	2	2	1	3	1	1	2	18
10	Response time to outages	2	1	1	1		1	2	2	1	3	1	1	2	18
	Total	27	36	23	28	13	26	26	29	36	65	47	39	37	

The ten (10) indicators that were selected to serve as the baseline metrics and will further evaluated through the public input process. Blue indicators represent the highest scores in the analysis. Orange represents indicators that while not the highest scored, are important to equitable distribution of benefits over time. The full scoring analysis can be found in Table B-2: Thirty-Three (33) Indicators Scoring Matrix.

Note: Indicator No. 5: Jobs was changed to Career Development for the final selection and discussion in Section 5: *Indicators* as this is more representative of long-term equitability in economic pathways, rather than jobs which are often finite and lack opportunity for growth. Indicator No. 8: Outdoor Air Quality is a combination of No. 24: Outdoor Air Quality, and No. 26: Reduction of Greenhouse Gas Emissions in the full scoring matrix in Table B-2: Thirty-Three (33) Indicators Scoring Matrix. These indicators were similar and shared the desired outcome of Healthy Planet, Healthy Lives.

Table B-2 - Thirty-Three (33) Indicators Scoring Matrix

	Indicator	Equity Area (0=unsure, 1=indirect, 2=direct)								Racial Equity Opportunities (L=1, M=2, H=3)					Total
		Energy Benefits	Non-energy Benefits	Reduction of Energy Burdens	Public Health	Environment	Reduction of Cost	Energy Security	Resilience	Education	Community Development	Health	Environment	Jobs	
1	Expenditures of existing and planned community energy projects	2	1	0	1		1	2	2	1	3	1	1	1	16
2	Locations of existing and planned community energy projects	2	1		1		1	2	2	1	3	1	1	1	16
3	Renewables in portfolio	1	1		1	2		0	0	1	2	1	2	1	12
4	Conservation programs in portfolio	2	1	2	1	1	1	2	1	1	2	1	2	1	18
5	Amount of investment financed	2	1	2			2	1	1	1	2	1	1	1	15
6	Awareness of programs	1	1	2			2	1	1	3	2	1	1	1	16
7	Public energy education	1	1	1	2	1	1	2	2	3	2	2	1	1	20
8	Public participation in planning	1	1	1	1		1	2	2	1	3	1	1	1	16
9	Avoided displacement		2		1				1	1	3	1	1	1	11
10	1% for Art		2		1					1	2	1	1	1	9
11	Improved housing stock		1	1			1	1	1	1	2	1	1	1	11
12	Economic development activity	1	2		1			1	1	1	2	1	1	2	13
13	Jobs		1	0			1		1	1	1	2	1	3	11
14	Burden (cost) to program participation	2		2			2	1		2	2	1	1	1	14
15	Accessibility to multi-family residents	2	1	1			2	2	2	1	3	1	1	1	17
16	Household factors														0
17	Affordable and healthy food		1		2				1	1	2	3	1	1	12
18	Incidents of accidents caused by energy infrastructure or appliances		2		2					1	2	3	1	1	12
19	Reduced flood exposure		1		1	2	0	1	1	1	1	2	2	1	13
20	Heart Disease Rate per 100,000		1		1	1				1	1	2	2	1	10
21	Lung Cancer Death Rate Per 100,000		1		1	1				1	1	2	2	1	10
22	Childhood (0-17) Asthma Hospitalization Rate per 100,000		1		1	1				1	1	2	2	1	10
23	Reduction in noise (think freight electrification)		1		1	1				1	2	1	1	1	9
24	Outdoor air quality (Concentration of diesel particulate matter in air and reduction of greenhouse gas emissions)		1	1	2	2	0			1	2	3	2	1	15
25	Indoor air quality	0	1	1	2	1	1	0		1	2	3	2	1	15
26	Reduced greenhouse gas emissions	1	2	0	2	2				1	2	3	3	1	17
27	Energy and cost savings for customers in aggregate	2	2	2	1		2		1	1	2	1	1	1	16
28	Participation and attrition rate of programs, locations and monetary benefits received		1	1			2		1	1	2	2	1	1	12
29	Feeder outages (causes, number, locations, average duration, average response time) by census tract	2	1	1	1		1	2	2	1	3	1	1	2	18
30	Redundant energy sources	2	1	1	1		1	2	2	1	3	1	1	2	18
31	Response time to outages	2	1	1	1		1	2	2	1	3	1	1	2	18
32	End-user focused strategies	2	2	2	1		2	1	1	1	2	2	1	1	18
33	Geographic or demographic distribution of customer service complaints		1	1			1	1	1	1	2	1	1	1	11
	Total	28	38	23	30	15	26	26	29	37	67	50	42	38	

Table B-3 - Thirty-Three (33) Indicator Descriptions, Data Sources and Needs

No.	INDICATOR	DESCRIPTION	DATA SOURCES (NEEDS AND CURRENT PROGRAMS)
1	Expenditures of existing and planned community energy projects	Amount of money expended on existing and planned community energy projects.	
2	Locations of existing and planned community energy projects	Location of money expended on existing and planned community energy projects.	
3	Renewables in portfolio	The fraction of renewables in a utilities portfolio of energy supply, as compared to fossil fuel sources.	
4	Conservation programs in portfolio	The fraction of a utilities portfolio of energy resources covered by conservations (i.e., not using energy)	
5	Amount of investment financed	Amount of money in energy investments that is financed	
6	Awareness of programs	Awareness of programs provided by City (e.g., utility discount program)	JD Power corporate citizenship indicators "Aware of utility effort to impact environment" "Aware of utility programs"
7	Public energy education	Providing education to public on energy: planning, projects, personal choices, safety.	Determine what education to track, # of info campaigns, website views, etc..
8	Public participation in planning	Amount of public participation in planning by the utility, such as IRP	
9	Avoided displacement	Avoided displacement of people from their communities - supporting thriving in place	
10	1% for Art	Funding from projects that support art	
11	Improved housing stock	Providing housing stock for diversity of needs, such as low income	KC Assessor/Bldg Condition, SDCI
12	Economic development activity	Amount of economic development occurring in neighborhoods	
13	Career development	Advances local, good paying jobs.	
14	Burden (cost) to program participation	Challenges to participating in programs - how easy is it?	This requires customer feedback, no one source of data, J.D Power survey has awareness of programs could monitor % of "yes-but not participating"
15	Accessibility to non-single-family homeowners	Accessibility to alternative energy sources such as solar or net metering programs that are difficult for non-single-family households to implement	CCES Salesforce Platform (Powerpath), CCB, Solar generation lists, type of renewable programs

16	Household factors	Factors tied to households, such as income, marital status, heating type, race.	Washington Tracking Network
17	Affordable and healthy food	Access to affordable and healthy food	Potentially leverage KC assessor data for land use to identify supermarkets. Food delivery is going to complicate this. Washington Tracking Network has Indicator of Limited Access to Healthy Food mRFEI, https://www.ers.usda.gov/data-products/food-access-research-atlas/go-to-the-atlas.aspx
18	Incidents of accidents caused by energy infrastructure or appliances	Incidents such as power surges, carbon monoxide poisoning from using BBQs, gas stoves, generators indoors during weather events, oil heating issues, lack of air conditioning during warm weather events.	https://lni.wa.gov/safety-health/preventing-injuries-illnesses/workplace-injuries-fatalities/
19	Reduced flood exposure	Investments and related projects that mitigate flood hazard threats to energy infrastructure (such as relocating distribution lines out of flood zones).	https://msc.fema.gov/portal/home
20	Heart Disease Rate per 100,000	identifies trends and patterns in the occurrence of heart disease in populations. Normalized by 100,000 population.	Washington Tracking Network-Cardiovascular Disease Mortality - Age Adjusted Rate per 100,000 (census tract, data lagged back to 2018)
21	Lung Cancer Death Rate Per 100,000	identifies trends and patterns in the occurrence of asthma hospitalization in populations. Normalized by 100,000 population.	Washington Tracking Network-Lung Cancer Rate (zipcode data, data reflects 10 yr increments, lagged to 2010)
22	Childhood (0-17) Asthma Hospitalization Rate per 100,000	This indicator can be used to identify trends and patterns in the occurrence of asthma hospitalizations across time and space. Asthma is one of the most common long-term diseases of children, but adults can have asthma, too. Asthma affects all races, ages, and genders. Asthma attacks can happen when you are exposed to asthma triggers. We don't know all the things that can cause asthma, but we do know that genetic, environmental, and occupational factors have been linked to developing asthma.	Washington Tracking Network-Asthma Hospitalization Age-Adjusted Rate per 10,000 (zipcode data, data is lagged too many years to see current values)
23	Reduction in noise (think freight electrification)	This indicator can be used to measure overall noise volume in impacted communities due to traffic congestion.	Noise (dBA)-https://maps.dot.gov/BTS/NationalTransportationNoiseMap/ (Flight travel overwhelms noise map)

24	Outdoor air quality (Concentration of diesel particulate matter in air)	To track long-term air quality, especially along heavily trafficked corridors that impact communities. Cannot be tracked as individual City Light impacts due to multiple contributions acting as a whole.	Washington Tracking Network, https://www.epa.gov/outdoor-air-quality-data/air-data-daily-air-quality-tracker, https://epa.maps.arcgis.com/apps/webappviewer/index.html?id=5f239fd3e72f424f98ef3d5def547eb5&extent=-146.2334,13.1913,-46.3896,56.5319
25	Indoor air quality	Indicator used to track particulate concentration that might be reduced through use of better HVAC for homes. (air conditioning, central air, purifiers)	Residential estimates based on property characteristics, fuel sources.
26	Reduced greenhouse gas emissions	To track long-term emission volume, especially along heavily trafficked corridors or industrialized areas that impact communities. Cannot be tracked as individual City Light impacts due to multiple contributions acting as a whole.	Greenhouse Gas Reporting by City Light (Kiyomi Morris). Can be used to measure Utility's performance in reducing emissions. OSE tracks EUI for large buildings (sqft) and fossil fuel consumption.
27	Energy and cost savings for customers in aggregate	Indicator to track energy usage and associated costs in aggregated communities.	Energy Burden Calculation (GEM). Will account for non-electric fuel costs.
28	Participation and attrition rate of programs, locations and monetary benefits received	Indicator to track internal program participation (green power, rebate programs, etc).	CCES Salesforce Platform (Powerpath) and CCB
29	Feeder outages (causes, number, locations, average duration, average response time) by census tract	Resiliency indicator that can be tracked using SAIDI and SAIFI metrics, worst performing feeder analyses over time.	Outage Management System (OMS)/Dispatcher Logging System General Log
30	Redundant energy sources	Resiliency indicator to track City Light investments in providing redundant energy feeds into communities (additional feeders, distributed energy, localized solar, generator programs, etc)	
31	Response time to outages	Identifies how long it takes for an outage to be resolved in communities.	Outage Management System (OMS)/Dispatcher Logging System General Log
32	End-user focused strategies	Indicator to track customer based programs .	
33	Geographic or demographic distribution of customer service complaints	Tracks customer complaints in communities/populations to determine response effectiveness of customer programs.	CCB Customer Contact data. Customer Escalations data.

Appendix C
Strategies to Enhance Energy, Non-Energy and Assistance Benefits

Coding Key for Opportunities & Strategies		Color
Energy Benefit		Green
Non-Energy Benefit		Blue
Assistance Benefit (Rates or Credits)		Orange
Program	**Brief Description**	**Equity Opportunities/Strategies**
Affordability		
Utility Discount Program (<70% SMI)	Rate assistance program, applied to a customer's bills going forward (60% reduction in City Light bill, 50% reduction for SPU bills). This program is available for income qualifying customers, tiered by household size.	• Improve consistency in income eligibility • Incorporate age of children eligibility. Should meet the criteria: consistent, updated annually, and include additional considerations for geographic region, family composition, and age of children • Expand outreach and education about programs • Reach out to community action agency to inform and help with outreach • Streamline eligibility and signup with other programs – make it easier (cross programs) • Create simpler pathways to participate. There are many families that qualify but don't participate due to bureaucracy, language barriers, distrust of government • Make it easier to requalify

Emergency Low Income Assistance (ELIA) and Project Share (<80% SMI)	ELIA-- Customers who have past due balances of $250 or more, may receive assistance up to 100% of their bill, up to a maximum of $500. For 2021, assistance is available twice in a 12-month period. Project Share--Funds which are entirely donations from the public, are used for customers currently enrolled in the UDP and have also received the ELIA benefit to help them achieve a zero balance on their active electric account. The program provides one-time per year assistance pledges up to $500 (with a match required above $250) towards a customer's City Light bill.	• Enhance contributions to Project Share (credit) • Increase the funding thresholds (Project Share) • Assess the effectiveness of the use of languages and improve • Map and target ELIA and Project Share to Highly Impacted Communities and Vulnerable Populations by leveraging outreach and qualification • Leverage City influence and power to elevate ELIA and Project Share through both donating and applying Highlight positive stories, for example: campaign to donate your federal tax return, assist local community members. • Create a program matrix to assist community members in identifying programs for which they qualify • Complete an equity analysis on ELIA and Project Share. Tell the equity story as part of outreach campaigns
Budget Billing Program	Billing plan that allows customers to spread energy costs evenly throughout the year. This provides certainty to each bill and assists customers in avoiding high bills during peak demand.	• Assess Budget Billing Program effectiveness and adjust to help community members avoid surprises • Complete a survey of participants to help evaluate program effectiveness • Make budget billing an opt out. Require everyone to participate
Energy Equity Rate Pilot (<70% SMI)	Suite of wrap-around benefits for a maximum of 300 income-qualified customers with high energy burdens that reside within the city	• This pilot is time limited and may be exited. Due to COVID restrictions, there have been only limited opportunities for energy efficiency upgrades and/or weatherization • NOTE – this pilot might be exiting

	limits of Seattle: a reduced rate for electrical consumption; energy efficiency upgrades and weatherization projects (depending upon housing type and ownership or renter status); and a balance forgiveness program (balance management arrangement) upon successful completion of agreed upon payments that fit household budgets.	
Reliability		
Demand Response	This new pilot is scheduled to launch in 2022 and is expected to last at least 18 months. Pending pilot outcomes, City Light may develop a portfolio of demand response offerings.	• Invest in DR pilots in Highly Impacted Communities
Miller Community Center microgrid	City Light partnered with Seattle Parks and Recreation to implement a microgrid project at Miller Community Center, located in the Capitol Hill neighborhood. The project includes installation of a battery energy storage system, solar panels and microgrid controls.	• Invest in portfolio of microgrid projects in Highly Impacted Communities
Energy Efficiency		
HomeWise	Weatherization services to income eligible households, by decreasing their energy bills and increasing	• Streamline eligibility and signup with other programs • Use existing income data to bypass red-tape in qualifying; increase convenience

	their comfort and safety. Administered by Seattle Office of Housing. Funding provided by federal, state, and utility sources.	• Develop robust social media marketing campaign • Complete a racial equity analysis for HomeWise. Identify what Highly Impacted Communities and Vulnerable Populations are missing? Evaluate how these communities overlap with our equity and program maps • HomeWise should be provided in multiple language and outreach should be completed through trusted community groups • Develop a HomeWise campaign to target renters
Direct Install Services Program (Powerful Neighborhoods)	Provides free energy efficiency improvements for individual units and multifamily building common areas. Items include complimentary installation of LED light bulbs and efficient showerheads and/or faucet aerators.	• Assess what opportunities are left in multi-family sector and transition move to other customers within Highly Impacted Communities and Vulnerable Populations • Utilize the success of this program as model for other programs. Develop a roadshow to highlight the success and demonstrate the strategies that worked for this program • Overhaul Direct Install to go beyond Energy Efficiency. Develop innovative program to include alternative local energy generation such as renewables, batteries, demand response, etc.) • Ensure Direct Install is completed by crews that speak different languages and coordinate the appropriate crew to the community language need for each project
Commercial and Industrial (C&I) Retrofit Programs	Provides retrofits measures for HVAC, weatherization, and lighting in existing commercial, industrial, and multifamily buildings.	• For commercial buildings, ensure the upgrades improve the environment for the workforce (health) • Play up health benefits of all the programs ○ Higher comfort, lower asthma.

Built Smart	Encourages developers of new multifamily buildings to surpass the standard energy code and develop additional electricity savings through financial incentives.	• Leverage the program goals that include a target of 50% signed agreements with affordable housing projects. Develop outreach campaign to target Highly Impacted Communities and Vulnerable Populations
Renewable Energy		
Green Up Community	Incentivizes new solar development hosted by affordable housing and other low-income service providers through the purchase of renewable energy credits (RECs) acquired by Green Up participants.	• Develop innovative marketing campaign to incorporate outreach to more low income providers • Invest in Green Up projects in Highly Impacted Communities and Vulnerable Populations areas shown on the maps
Renewable Purchased Power Agreements	City Light has three main renewable energy purchased power agreements: Columbia Ridge Landfill Gas, Stateline Wind, and King County Wastewater Treatment Plant; and various smaller contracts for renewable energy credits (RECs).	• All of these contracts come with either renewable energy, RECs, or both, and offer compliance options for I-937, which is the Washington Portfolio Standard legislation introduced in 2006 • Develop pathway to purchase from Women- and Minority-owned Business Enterprises (WMBE) • Evaluate and report on how these developments have impacted their local Highly Impacted Communities and Vulnerable Populations • Analyze the racial makeup of the LOCAL communities impacted by Renewable Purchased Power Agreements • Require Power Purchase Agreement bidders to have diverse workforce

Virtual Net Metering	Net metering allows our customers, with solar installations, to "bank" their generated electricity to be used when needed instead of during the period it was generated, which encourages on-site generation and distributed generation.	• Leverage current development of Virtual Net Metering in at City Light to help facilitate more equitable benefits to tenants of multifamily buildings. This provides the ability to share excess generation across multiple accounts, allowing excess generation at multifamily buildings to be credited to the tenant accounts
		• Develop portfolio of projects and commit to investment to implement
Transportation Electrification		
Public Charging Stations	Public charging stations serve populations living in multifamily building that need public charging options. The City Light public charging pilot will distribute 26 DC fast chargers across the service territory to demonstrate access to charging to current and future EV owners.	• Stakeholder and community outreach has been conducted, prior to install, using neighborhood associations, with the intention of determining cost-effective, equitable, and accessible station locations • Focused effort for the 'last mile' • Take advantage of the Climate Commitment Act, Low Carbon Fuels Standards and similar legislation for flexibility in spending/projects
		• Develop near- and at- home charging solutions ○ Partner with Seattle organizations to develop policy to leverage changes in building codes for new construction • Develop data collection program to analyze demographic usage data • Leverage ongoing opportunity study on personal mobility - including multifamily
Large Transit Projects	King County Metro, Washington State Ferries, and Port of Seattle electrification projects. Public transit has been identified as high priority in TESIP.	• Invest in power reliability projects in Highly Impacted Communities to reduce risks from outages that impact large scale transit
		• Invest in large scale transit projects that will have environmental benefits for South Seattle and Duwamish communities • Locate projects where health benefits are maximized such as along highly trafficked corridors that have high localized diesel emissions

		• Facilitate more thorough awareness

Appendix D

Definitions

General

Clean Energy Transformation Act (CETA): Washington law that applies to all electric utilities serving retail customers in Washington and sets specific milestones to reach the required 100% clean electricity supply. CETA includes safeguards to protect consumers from excessive rates or unreliable service.

Equitable Clean Energy Just Transition Principles: City Light's guiding principles to ensure an equitable and just transition to a clean energy future for Highly Impacted Communities and Vulnerable Populations. The components of the equity assessment framework should support these principles.

Racial Equity Toolkit (RET): Toolkit to assess policies, initiatives, services, programs, and budget issues and help set outcomes and weigh potential impacts on racial inequity.

Section 4 – Highly Impacted Communities and Vulnerable Populations

Highly Impacted Communities: Communities designated by the DOH based on the cumulative impact analyses in Section 24 of CETA or a community located in census tracts that are fully or partially on "Indian country" (as defined in 18 U.S.C. Sec. 1151).

Vulnerable Populations: Populations that experience a disproportionate cumulative risk from environmental burdens due to adverse socioeconomic factors.

Washington Tracking Network: Program implemented by the Washington State Department of DOH to develop tools to make public health data accessible.

Environmental Health Disparities Index (EHD): Index created for CETA by the Washington State DOH. A Highly Impacted Community is defined as any census tract with a EHD index value of 9 or 10 or any census tract with tribal lands.

Racial and Social Equity Composite Index: Index created by the Citye which combines information on race, ethnicity, and related demographics with data on socioeconomic and health disadvantages to identify census tract where priority populations make up relatively large proportions of neighborhood residents.

PSRC Displacement Risk Index: Index created by the Puget Sound Regional Council to measure the conditions that force residents to move and measure displacement risk by census tract.

Section 5 - Indicators

Equity Outcomes: Equity Outcomes are the results of utility actions where it is assumed all communities and populations do not start with equal opportunities to participate in or benefit from programs and investments. Therefore Highly Impacted Communities and Vulnerable Populations must be specifically, but not exclusively, identified and targeted for utility investments to bring all communities to a place of equal benefit.

Equity Indicator: Indicator is an attribute, either quantitative or qualitative, of a condition, resource, program, or related distribution investment that is tracked for the purpose of evaluating change over time in the CEIP; indicators associated with: energy benefits, nonenergy benefits, reduction of burdens, public health, environment, reduction in cost, energy security, or resiliency; develop through public process. CETA requires City Light to set metrics to track the impacts of City Light's actions on Highly Impacted Communities and Vulnerable Populations. Indicators help determine if equity outcomes are being achieved and per CETA should be informed by a public input process.

Energy Equity Areas: Eight Energy Equity Areas are required by CETA for the purpose of developing measurable indicators that track the equitable distribution of utility action outcomes. These areas include the following: energy benefits, non-energy benefits, reduction of burdens, public health, environment, reduction of cost, energy security, and resiliency.

Racial Equity Opportunity Areas: Five Racial Equity Opportunity Areas are provisions for enhancing the benefits provided by projects in which investments are made and to address historical racism and make reparations towards disparities in the distribution of those benefits. The opportunity areas include the following: education, community development, health, environment, and jobs.

System Average Interruption Duration Index (SAIDI): Index of average duration of interruption in the power supply, in minutes per customer.

System Average Interruption Frequency Index (SAIFI): Index of average frequency of interruptions in power supply, in number of interruptions per customer.

Equitable Distribution - A fair and just, but not necessarily equal, allocation intended to mitigate disparities in benefits and burdens, and based on current conditions, including existing legacy and cumulative impacts, which are informed by the assessment described in RCW 19.280.030(1)(k) from the most recent integrated resource plan (The Washington Utilities and Transportation Commission).

Section 6 - Portfolio of Actions

Portfolio of Actions: As require by CETA, City Light identified a portfolio of actions as a subset of City Light offerings, mostly customer-facing, which staff have identified as having the strongest links to CETA-defined equity. This portfolio is dynamic, and program offerings can be added or removed over time to reflect evolving policies, customer preferences, utility needs, and Equity Outcomes.

Utility Discount Program (UDP): A rate assistance program applied to a customer's bills going forward (60% reduction in City Light bill, 50% reduction for SPU bills). This program is available for income qualifying customers, tiered by household size.

Emergency Low Income Assistance (ELIA): ELIA participants, who have received at least a 10-day shutoff notice on balances of $250 or more, may receive assistance up to 100% of their bill, up to a maximum of $500. For 2021, assistance is available twice in a 12-month period and the program is not conditional on shutoff notices, it applies to customers with balances of $250 or more.

Project Share: Funded by customer donations, this one-time per year assistance up to $500 towards a customer's City Light bill.

Budget Billing: A monthly billing plan option that enables customers to spread energy costs evenly throughout the year. This provides certainty to each bill and assists customers in avoiding high bills during peak demand.

Energy Equity Rate Pilot (EERP): A rate pilot offering a suite of wrap-around benefits for income-qualified customers with high energy burdens that reside within the city limits of Seattle.

HomeWise: Energy efficiency program which offers weatherization services to income eligible households, with the aim of decreasing each participating household's energy bills while also increasing comfort and safety.

Powerful Neighborhoods: City Light's direct install program providing free energy efficiency improvements for individual units and multifamily building common areas. These free improvements include LED light bulbs, efficient showerheads and/or faucet aerators.

Commercial and Industrial (C&I) Retrofit: Provides a wide range of retrofit energy efficiency solutions for capital improvement, operations & maintenance, and behavioral improvements, across existing commercial, industrial, and multifamily buildings.

Built Smart: Energy efficiency program encouraging developers of new multifamily buildings to reach beyond standard energy code and develop additional electricity savings through financial incentives.

Green Up: City Light's voluntary green power program that allows utility customers to commit to a small dollar amount (as low as $1 per month or a percentage-based match of consumption) to purchase Renewable Energy Credits from renewable resources both regionally and within City Light's service territory.

Renewable Purchased Power Agreements: A contractual agreement to source renewable electricity from a qualified third-party facility. These are generally large, utility scale renewable electricity purchases.

Renewable Energy Credits (RECs): A tradable certificate of proof of one megawatt-hour of an eligible renewable resource. The certificate includes all of the nonpower attributes associated with that one megawatt-hour of electricity and the certificate is verified by a renewable energy credit tracking system per RCW 19.285.030.

I-937: The Energy Independence Act (EIA), or Initiative 937 (I-937), requires electric utilities serving at least 25,000 retail customers to use certain amounts of renewable energy and energy conservation.

Virtual Net Metering: Virtual net metering will enable customers with solar installations to "bank" their generated electricity, and then apply that bank of generated electricity to the billing period needed instead of during the period it was generated, which encourages on-site generation and distributed generation.

Transportation Electrification Strategic Investment Plan (TESIP): A plan describing how the utility is using strategic investments and building upon previous analyses shaped by a values framework to achieve a vision of the healthy future that the region depends on: equitable, carbon-neutral, modernized, and future-enabled. The Plan is a result of the Washington state legislature's 2019 passage of House Bill 1512, which enables electric utilities to incorporate transportation electrification into utility modernization.

Section 7 - Protocols

Program Equity Targets: Yearly goals for individual City Light programs that enable the achievement of desired Equity Outcomes. The targets should be measurable and linked to Equity Indicators for Equity Evaluation (refer to Section 5).

Program Leads and Program Data: Customer Care and Energy Solutions should set annual Program Equity Targets with Equity Outcomes and Equity Indicators in mind. This can leverage two existing internal processes: 1) City Light Customer Care and Energy Solutions' Program Portfolio management structure, which sets annual programmatic goals that are tracked monthly or yearly and 2) the City's Racial Equity Toolkit (RET) process. Data from programs should be collected to align with Equity Indicators.

Program Equity Evaluation: Programs should be holistically evaluated against their program targets and equity outcomes and indicators. If equity outcomes are not being achieved, then program targets should be adjusted, or new programs may need to be created or added to the Portfolio of Actions.