SEATTLE PUBLIC UTILITIES
SEPA ENVIRONMENTAL CHECKLIST

Seattle Public Utilities (SPU) has prepared the Preliminary Draft *2022 Solid Waste Plan Update: Moving Upstream to Zero Waste* ("*2022 Plan Update*"), the latest long-range plan directing SPU's management of solid waste. The 2022 Plan Update amends the 2011 Solid Waste Plan Revision, *Picking Up the Pace Toward Zero Waste*. Solid waste plans are reviewed every five years, as required by Washington State law (Revised Code of Washington (RCW) 70A.205.040).

The *2022 Plan Update* does not detail the specific solid waste activities that would be undertaken, but rather, discusses the City's management goals related to solid waste management and the types of activities necessary to achieve those goals in a safe and economical way. More specifically, the 2022 Plan describes how the City would manage the City's solid waste by preventing waste, increasing recycling and composting, and improving services over the next 20 years. Plan implementation would require future evaluation and development of programs and capital improvement projects designed to address SPU's identified solid waste issues and needs.

Before it can be implemented, the *2022 Plan Update* must be adopted by the Seattle City Council and then approved by the Washington State Department of Ecology. Adoption and approval of the *2022 Plan Update* is considered a non-project action under SEPA. This SEPA environmental review of the proposed *2022 Plan Update* has been conducted in accord with the Washington State Environmental Policy Act (SEPA) (RCW 43.21C), State SEPA regulations [Washington Administrative Code (WAC) Chapter 197-11], and the City of Seattle SEPA ordinance (Seattle Municipal Code (SMC) Chapter 25.05). SPU has prepared this SEPA Environmental Checklist under the non-project and phased review provisions of SEPA.

Non-project actions are broader than a single site-specific project (WAC Section 197-11-774, SMC 25.05.774). Phased review covers general matters in a broader environmental document, with subsequent documents more narrowly focused on issues relating to specific projects (WAC Section 197-11-776, SMC 25.05.776). This Checklist addresses both the potential non-project impacts (Subpart D, Supplemental Sheet for Non-project Actions) and the types of anticipated projects and their general range of potential environmental impacts (Subpart B, Environmental Elements). Actions requiring project-specific environmental analysis of impacts will be subject to additional SEPA environmental review before federal, state, and local permits are issued.

A. BACKGROUND

1. Name of proposed project:

Seattle's 2022 Solid Waste Plan Update (*2022 Plan Update*)

2. Name of applicant:

Seattle Public Utilities

3. Address and phone number of applicant and contact person:

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4. Date checklist prepared:

March 31, 2022

5. Agency requesting checklist:

Seattle Public Utilities (SPU)

6. Proposed timing or schedule (including phasing, if applicable):

RCW 70A.205.040 requires local solid waste plans. SPU developed the Preliminary Draft *2022 Plan Update* to describe the City of Seattle's needs for solid waste services and facilities for the period 2022-2027, with an outlook toward the next 20 years, and to explain how those needs are expected to be met and funded. Following public comment, SPU will prepare a Final Draft of the *2022 Plan Update*. SPU anticipates that the Final Draft of the *2022 Plan Update* will be adopted by City Council through a resolution in the fourth quarter of 2022. The adopted *2022 Plan Update* will be transmitted to the Washington State Department of Ecology (Ecology) within 45 days of adoption.

SPU would implement the *2022 Plan Update* in phases. The updated comprehensive plan refers to many policies, programs, and projects that are existing and on-going. Some *2022 Plan Update* recommendations may be implemented immediately upon the City Council's adoption and transmittal of the solid waste plan to Ecology, while others would be implemented in future years. Implementation of some recommendations would be contingent on additional research, funding, and/or legislative action by the City Council.

7. Do you have any plans for future additions, expansion, or further activity related to or connected with this proposal? If yes, explain.

The *2022 Plan Update* describes some programs that are ongoing. The *2022 Plan Update* also describes future programs and projects, which would undergo appropriate environmental review at a future date. SPU would periodically review and update the 2022 Plan Update, as needed. Future updates may undertake additional environmental review under SEPA, depending on the nature of the updates. Refer to Response A.10.

8. List any environmental information you know about that has been prepared, or will be prepared, directly related to this proposal.

In 1998, the City of Seattle adopted a Solid Waste Management Plan titled *On the Path to Sustainability*. The SEPA environmental review for that plan resulted in the issuance of a 1998 Programmatic Environmental Impact Statement (EIS) (SPU 1998). The 1998 plan was amended in 2004 and revised in 2011, and SEPA environmental reviews were conducted. Both reviews determined that neither the 2004 Plan Amendment nor the 2011 Revision would result in any new significant adverse impacts (SPU 2004 and SPU 2012).

The 2004 Plan Amendment updated the 1998 Plan by making a renewed commitment to waste prevention and stewardship, addressing the declining recycling rate, and improving the conditions and functionality of Seattle's solid waste facilities. The 2011 Plan Revision upheld the overall direction of the 2004 Plan and emphasized waste prevention, sustainability, food and yard waste (organics) diversion, and product stewardship. This *2022 Plan Update* amends

the 2011 Plan by capturing the trends in and influences on solid waste management in the 10 years since 2011.

In 2010, the State published its Guidelines for Development of Local Comprehensive Solid Waste Management Plans and Plan Revisions (available at https://fortress.wa.gov/ecy/publications/documents/1007005.pdf). In 2021, the State of Washington updated its plan for managing hazardous and solid waste (titled *The State Solid and Hazardous Waste Plan – Moving Washington Beyond Waste and Toxics ("Beyond Waste")*; https://apps.ecology.wa.gov/publications/documents/2104050.pdf though the planning backdrop continues to evolve, the key guiding principles in the *2011 Plan* prevail in the *2022 Plan Update*: zero waste, waste prevention, sustainability, and product stewardship.

A large body of existing scientific, planning, and environmental information comprising published and unpublished data, analyses, and literature—including previous solid waste plans—provided a basis for the analysis and development of the 1998 Plan, the 2004 Plan Amendment, the 2011 Plan Revision, and the *2022 Plan Update*. That body of information is too extensive to list here. However, SEPA environmental reviews were prepared for the 1998 Plan, the 2004 Plan Amendment, the 2011 Plan Revision, and three major solid waste facilities—all of which are incorporated by reference into this Environmental Checklist. These include:

- SPU. 1998. Solid Waste Plan (*On the Path to Sustainability*) and associated SEPA EIS.
- SPU. 2004. Memorandum from Joy Keniston-Longrie (SPU SEPA Responsible Official) to Project File: SEPA Compliance, 2004 Solid Waste Management Plan Amendment. September 30.
- SPU. 2008a. SEPA Environmental Checklist and Associated Determination of Non-significance for Reconstruction of the South Recycling and Disposal Station. February 19 and 26, respectively.
- SPU. 2008b. SEPA Environmental Checklist and Associated Determination of Non-significance for Reconstruction of the North Recycling and Disposal Station. April 14 and 17, respectively.
- SPU. 2012. SEPA Environmental Checklist and Threshold Determination of Non-significance for 2011 Solid Waste Plan Revision. May 24 and May 31, respectively.
- SPU. 2019. SEPA Environmental Checklist and Associated Determination of Non-significance for South Recycling and Disposal Station Redevelopment Project. January 3 and January 10, respectively.

9. Do you know whether applications are pending for governmental approvals of other proposals directly affecting the property covered by your proposal? If yes, explain.

There are no other applications pending for governmental approvals of other proposals directly affecting this proposal. However, individual projects related to the *2022 Plan Update* may require additional approvals. Such approvals would be sought for those individual projects prior to construction or development, as applicable. Other, unrelated (public and private) proposals and government approvals may be pending that could affect SPU's solid waste management service area.

10. List any government approvals or permits that will be needed for your proposal, if known.

Washington State Law (RCW 70A.205) and guidelines issued by Ecology (*Guidelines for Development of Local Comprehensive Solid Waste Management Plans and Plan Revisions*, February 2010) (https://fortress.wa.gov/ecy/publications/documents/1007005.pdf) require counties and cities to develop a comprehensive solid waste plan on a regular schedule, guided by Ecology's plan (*Beyond Waste*). SPU met with the Department of Ecology on June 23, 2017 at which time Ecology determined that Seattle only needed to amend the 2011 Solid Waste Plan. SPU started drafting the *2019 Solid Waste Plan Amendment* but could not complete the document in a timely manner. Factors hampering timely completion of the amendment included SPU's internal review process; changes in key personnel working on the draft *2019 Solid Waste Plan Amendment*; and, impacts of the COVID-19 pandemic. Following these delays, the Department of Ecology updated its guidance in November 2020, requiring SPU to submit a revision rather than an amendment. SPU's revised comprehensive solid waste management plan from 2011 is the *2022 Solid Waste Plan Update*.

Per Ecology's Guidelines for plan revisions, SPU must include a 21-day SEPA comment and appeal period, 45-day Department of Agriculture review, and 120-day Department of Ecology review of the Preliminary Draft. The 2022 Plan Update will then go to City Council for formal adoption through a resolution. SPU will then transmit the *2022 Plan Update* to the Department of Ecology, which will conduct a 45-day review of the Final Draft for approval.

Some elements of the *2022 Plan Update* are contingent on additional legislative action by the Seattle City Council. For example, all annual budgets implementing SPU's solid waste management activities, changes in rates charged to customers for services, and all "bans" on certain solid wastes require City Council approval and legislative action. Permits and approvals needed to implement specific programs, projects, and activities in the *2022 Plan Update* would be identified during planning and design of these programs, projects, and activities.

Private and public entities external to, but used by, SPU to support or implement its solid waste management are solely responsible for ensuring that their activities are compliant with environmental laws and regulations of the states and local governments in which they occur, including SEPA if applicable.

11. Give a brief, complete description of your proposal, including the proposed uses and the size of the project and site. There are several questions later in this checklist that ask you to describe certain aspects of your proposal. You do not need to repeat those answers on this page.

Regulatory Background

Properly managed solid waste protects public health and the environment. The City of Seattle is required by Washington State law to maintain a coordinated, comprehensive solid waste management plan in a current and applicable condition (RCW 70A.205.040). The plan must meet all of the planning requirements described in RCW 70A.205.045. In a continued effort to provide reliable, efficient, and environmentally conscious utility services to its customers, SPU has prepared the Preliminary Draft *2022 Plan Update* consistent with these requirements.

Plan Summary

The *2022 Plan Update* discusses the City's management goals related to solid waste management and the types of activities necessary to achieve those goals in a safe and economical way. More specifically, the *2022 Plan Update* describes how the City of Seattle would manage the City's solid waste by preventing waste, increasing recycling and composting, and improving services over the next 20 years using capital facilities and operation and maintenance (O&M) activities. Plan implementation would require future evaluation and development of programs and capital improvement projects designed to address SPU's identified solid waste issues and needs.

The *2019 Update* addresses regulatory, social, and industry changes that have occurred in roughly the past 10 years. In addition to updating the discussion of current facilities and programs, the *2022 Plan Update* contains nearly 40 recommendations. Most of these recommendations relate to commitments and refinements to existing, on-going policies, programs, and projects — based on goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities. Many of these policies, programs, and projects have been identified in previous planning documents and analyzed through previous SEPA documents (SPU 1998; SPU 2004; SPU 2012).

The *2022 Plan Update* recommendations are listed in the table on the following page.

Plan Implementation

Full implementation of the *2022 Plan Update* will require additional legislation and completion of capital programs, infrastructure projects, and O&M activities, including the following:

- education programs
- private and public incentive programs
- public/legal mandates
- legislation
- bans on certain solid wastes from certain waste streams
- expanded or changed recycling, reuse, and collections programs
- waste prevention programs.

Recommendation
Overarching
Lead with race and incorporate racial justice in solid waste programs, education, and outreach in support of SPU's commitment to providing racially equitable, inclusive, and culturally competent services.
Maximizing and Measuring Impact
Keep developing overarching goals consistent with waste prevention and reduction activities instead of continuing to emphasize recycling rate goals focused on diversion.
Expand solid waste data analytics, metrics, and evaluation to improve assessment of services and operations.
Waste Prevention and Reuse
Prioritize and support waste prevention with research, data analysis, and metrics.
Increase community awareness of waste prevention through coordinated outreach.
Expand food waste prevention to reduce the amount of wasted food.
Expand efforts to rescue safe, edible food from the waste stream by getting it to those that need it most.
Reduce single-use items and promote durable or reusable alternatives.
Expand support for community organizations working to prevent waste.
Expand support of the City's sustainable and green purchasing policies
Explore and expand market opportunities for reused material and repair services
Promote and support waste prevention for textiles and monitor emerging textiles recycling technologies
Recycling and Composting Policy and Markets
Advocate for responsible recycling policies recommended by the Responsible Recycling Task Force
Continue and expand efforts to reduce the amount of contamination, or non-recyclable material, in the recycling and food and yard waste
Support market and infrastructure development for recycling
Continue to explore and implement product stewardship policies and programs that require producers, manufacturers, and/or retailers to take back and recycle the products they sell
Continue to support and expand industry-led take-back of plastic wrap and bags
Require all single-use food service packaging to be compostable and harmonize acceptance standards for compostable products
Continue to refine and develop strategies to keep more food waste and compostable paper out of the garbage
Continue to support market development for compost products
Assess options for diaper and pet waste recovery
Solid Waste Handling, Collection, and Removal
Conduct research to inform future collection, processing, and disposal contracts
Adopt collection infrastructure requirements in new multifamily construction to ensure tenants have sufficient solid waste services and convenient access to solid waste containers
Explore collection infrastructure requirements for new construction of townhomes and live-work units
Improve alley and public right-of-way access for collection vehicles
Expand the Clean City education campaign to increase awareness of the City's litter and cleanup programs
Solid Waste Transfer, Processing, Disposal, and Emergency Management
Continue to explore opportunities for adaptive reuse of historic landfills, including opportunities to control costs at closed landfills and to bring the land into productive use

Recommendation
Construction and Demolition Debris
Expand construction and demolition debris industry outreach and education
Improve enforcement of and incentives for compliance with C&D system rules
Promote salvage and deconstruction for reusable building materials
Require deconstruction (instead of demolition) for select project sizes and/or project types to increase C&D debris recovery
Expand recycling market development for C&D debris to support diversion of these materials from landfill
Enhance diversion of construction and demolition debris at transfer stations
Outreach, Education, Code Enforcement, and Compliance Support
Continue and expand use of large, color-coordinated, multilingual, and icon-based container decals to encourage proper sorting of waste
Continue and expand use of available metrics to inform outreach strategy and measure outcomes
Continue participating in the regional Communication Consortium to unify solid waste messaging between Seattle and King County municipalities
Expand waste prevention and diversion outreach and education in schools
Expand efforts to increase compliance with solid waste code and requirements across customer sectors
Administration and Financing of the Solid Waste System
Continue to regularly review rates to ensure they provide incentives for program success, are set equitably, and balance affordability and program costs

12. Location of the proposal. Give sufficient information for a person to understand the precise location of your proposed project, including a street address, if any, and section, township, and range, if known. If a proposal would occur over a range of area, provide the range or boundaries of the site(s). Provide a legal description, site plan, vicinity map, and topographic map, if reasonably available. While you should submit any plans required by the agency, you are not required to duplicate maps or detailed plans submitted with any permit applications related to this checklist.

The planning area for the *2022 Plan Update* includes all areas within the municipal limits of the City of Seattle, King County, Washington, including about 82 square miles of land populated by about 745,000 people. SPU owns and operates two major solid waste transfer facilities, the North and South Transfer Stations located at 1350 North 34th Street (zip code 98103) and 130 South Kenyon Street (zip code 98108), respectively; and the North and South Household Hazardous Waste facilities at 12500 Stone Way North (zip code 98133) and 8105 Fifth Avenue South (zip code 98108), respectively.

Non-recyclable solid waste from the recycling and disposal stations is transported to privately owned intermodal facilities, where it is loaded onto railcars and transported to the Columbia Ridge Regional Landfill in Arlington, Oregon. Recyclable materials are transported to or picked up by private recycling business. Compostable materials are transported to Lenz Enterprises or Cedar Grove Composting, both private composting businesses. See Attachment A for a map showing the planning area and major solid waste facilities.

Future solid waste management programs and projects undertaken by SPU to implement the *2022 Plan Update* could occur at various locations within the planning area. Future solid waste management programs and projects undertaken by private entities and other public entities who support SPU's solid waste management activities (via contracts and/or memoranda of agreements) could occur at various locations within and/or beyond the planning area. Precise locations of specific projects would be identified in the future when those individual projects are implemented. Private entities and other public entities who support SPU's solid waste management activities via contracts and/or MOAs would be responsible for complying with all environmental laws and regulations that apply to their proposed programs and projects.

B. ENVIRONMENTAL ELEMENTS

Adoption and approval of the *2022 Plan Update* is a non-project action under SEPA. Non-project (also called programmatic) actions include approval of plans, policies, programs, or regulations that contain standards controlling use of the environment or standards that would guide a group of related future actions. The probable significant adverse environmental impacts analyzed in a non-project SEPA environmental checklist are those impacts foreseeable at this stage before specific project actions are planned. That is, the range of potential impacts of these anticipated types of projects and activities are discussed at a broad level in this Environmental Checklist rather than at a more detailed level of individual project and site-specific impacts.

More specific information on approvals or permits for projects anticipated under the *2022 Plan Update* would be determined during project-level design, environmental review, and permitting. Future actions resulting from the *2022 Plan Update* must comply with applicable federal, state, and local regulations and could require certain federal, state, and local government approvals and permits, including SEPA review, and potentially NEPA review if a project involves federal funding or permits/approvals. Such future projects may use all or part of this Environmental Checklist or other City environmental documents to satisfy the requirements of SEPA in whole or in part.

1. Earth

a. General description of the site: *[Check the applicable boxes]*

☒ Flat ☒ Rolling ☒ Hilly ☒ Steep Slopes ☐ Mountainous
☐ Other: (identify)

In general, the planning area is characterized by a wide variety of topographical features, ranging from stream valleys, ravines, and hillsides adjacent to Lake Washington and the Puget Sound, as well as shallow estuaries, and deep marine waters. The City of Seattle is located on a series of hills and intervening valleys in the Puget Sound lowlands. More specific information on the site topography would be determined during the design, environmental review, and permitting of individual projects.

b. What is the steepest slope on the site (approximate percent slope)?

Slopes in the planning area generally range from 0 to 40 percent, with steeper slopes present. More specific information on site topography would be determined during the design, environmental review, and permitting of individual projects.

c. What general types of soils are found on the site (for example, clay, sand, gravel, peat, muck)? If you know the classification of agricultural soils, specify them and note any agricultural land of long-term commercial significance and whether the proposal results in removing any of these soils.

As the result of several periods of glaciation, compacted or cemented glacial till underlies much of the planning area. Permeable soils overlying the till are shallow, ranging from 2 to 4 feet deep, while impermeable till layers may be quite deep. Compact clay (hardpan) often underlies the surface soils. Predominant soil types in the area are artificial fill, alluvial soils, and the Alderwood series soils. The Alderwood soil series occurs in upland areas and is the most common soil series in King County. Alluvial soils occur in stream and river valleys. Due to previous urban and suburban development, prime farmland is no longer present within Seattle.

Because most of the planning area is densely urbanized, native soils have been extensively altered by excavation, filling, and other disturbances. In addition, soils in the immediate vicinity of existing SPU facilities are likely to include highly disturbed native soils and fill materials as a result of the construction, operation, and maintenance of those facilities. More specific information on soils would be determined during the design, environmental review, and permitting of individual projects.

d. Are there surface indications or history of unstable soils in the immediate vicinity? If so, describe:

Unstable soils in the planning area primarily occur in areas of steep slopes and in areas of artificial fill or alluvial soils with shallow water tables that may lead to soil liquefaction during earthquakes. Areas where these conditions may exist have been mapped by the City of Seattle Department of Construction and Inspections (SDCI) as environmentally critical areas. More specific information on unstable slopes would be determined during the design, environmental review, and permitting of individual projects, as applicable.

e. Describe the purpose, type, total area, and approximate quantities and total affected area of any filling, excavation, and grading proposed. Indicate the source of fill.

In general, the amounts of grading and filling required for most O&M activities would be modest. More specific information on filling and grading would be determined during the design, environmental review, and permitting of individual projects.

f. Could erosion occur as a result of clearing, construction, or use? If so, generally describe:

Operation of SPU solid waste management projects generally would not create or increase the potential for long-term erosion. More specific information on the potential for erosion would be determined during the design, environmental review, and permitting of individual projects.

g. About what percent of the site will be covered with impervious surfaces after project construction (for example, asphalt or buildings)?

Most O&M activities would result in construction of minor amounts of additional impervious surfaces. More specific information on the creation of new impervious

surfaces would be determined during the design, environmental review, and permitting of individual projects.

h. Proposed measures to reduce or control erosion, or other impacts to the earth, if any:

More specific information on the potential for erosion and site-specific erosion control measures would be determined during the design, environmental review, and permitting of individual projects. Any project would be designed and constructed to comply with the applicable stormwater, grading, erosion control, and critical areas provisions of the State and City (such as the City of Seattle's Stormwater Code). When applicable, project construction would use site-specific best management practices (BMPs) and other measures to prevent or reduce potential erosion.

2. Air

a. What types of emissions to the air would result from the proposal [*e.g.*, dust, automobile, odors, industrial wood smoke, greenhouse gases (GHG)] during construction, operation, and maintenance when the project is completed? If any, generally describe and give approximate quantities if known.

Mobile and stationary equipment would be used to implement, construct, operate, and maintain some of the projects and activities contemplated in the *2022 Plan Update*, thus generating emissions due to the combustion of gasoline and diesel fuels (such as oxides of nitrogen, carbon monoxide, particulate matter and smoke, uncombusted hydrocarbons, hydrogen sulfide, carbon dioxide, and water vapor). Emissions during construction would also include normal amounts of dust from grading and hauling activities. Some of those emissions are considered to be greenhouse gases (GHG). Some projects and activities would also generate greenhouse gas in their use of pipe, concrete, asphalt, or other materials (embodied GHG). The current and future quantities and timing of these emissions are not known.

b. Are there any off-site sources of emissions or odor that may affect your proposal? If so, generally describe.

There are no known off-site sources of emissions or odor that would affect this proposal.

c. Proposed measures to reduce or control emissions or other impacts to air, if any:

Generally, the emissions described above are expected to be minimal, localized, and temporary. More specific information on the types and quantities of air emissions, including greenhouse gas emissions, if present, would be determined during the design, environmental review, and permitting of individual projects and activities. Projects and activities would comply with applicable air quality regulations and would control emissions using reasonably available control technologies and City of Seattle standard operating procedures (SOPs) and BMPs for construction. These would include requiring SPU personnel and any contractors to use best available control technologies, use dust control technologies, perform proper vehicle maintenance, and minimize vehicle and equipment idling. Site-specific BMPs and other measures to reduce or control emissions would be developed during project-level environmental review and permitting. Also, the *2022 Plan Update's* emphasis on diverting materials from the landfill (particularly organics) is expected to decrease volumes of methane and other gases generated by

anaerobic decomposition of the City's garbage. The conversion of the collection fleet to fossil free fuels reduced emissions and SPU facility equipment is converting to electric as the technology becomes available.

3. Water

a. Surface:

(1) Is there any surface water body on or in the immediate vicinity of the site (including year-round and seasonal streams, saltwater, lakes, ponds, wetlands)? If so, describe type and provide names. If appropriate, state what stream or river it flows into.

In general, the planning area is characterized by a wide variety of surface water features, including marine areas, rivers, lakes, artificial reservoirs, and streams. Potential projects could occur in the vicinity of the Puget Sound, Lake Washington, the Green/Duwamish River, Green Lake, and various urban streams (Water Resource Inventory Areas 8 and 9). More specific information on surface water bodies near individual sites would be determined during project-level design, environmental review, and permitting.

(**2) Will the project require any work over, in, or adjacent to (within 200 feet) the described waters? If so, please describe, and attach available plans.**

Some of the future capital and O&M projects could occur in and around natural surface waters. Maintenance and other improvement projects could occur near surface waters. The potential for work affecting surface waters would be identified during future design, environmental review, and permitting of individual projects.

(3) Estimate the amount of fill and dredge material that would be placed in or removed from surface water or wetlands, and indicate the area of the site that would be affected. Indicate the source of fill material.

The *2022 Plan Update* does not contemplate fill and/or dredge activity; however, these details would be determined during future design, environmental review, and permitting of individual projects.

(4) Will the proposal require surface water withdrawals or diversions? If so, give general description, purpose, and approximate quantities if known.

The *2022 Plan Update* does not contemplate actions that would require temporary or permanent surface water withdrawals or diversions.

(5) Does the proposal lie within a 100-year floodplain? If so, note location on the site plan.

Some of the future capital and O&M projects contemplated in the *2022 Plan Update* could occur in or near floodplains. More specific information on potential work within 100-year floodplains would be determined during project-level design, environmental review, and permitting.

(6) Does the proposal involve any discharges of waste materials to surface waters? If so, describe the type of waste and anticipated volume of discharge.

Programs, projects, and activities contemplated in the *2022 Plan Update* are not expected to discharge waste materials to surface waters. Wastewater from SPU facilities currently is discharged into public wastewater systems.

b. Ground:

(1) Will groundwater be withdrawn from a well for drinking water or other purposes? If so, give a general description of the well, proposed uses and approximate quantities withdrawn from the well. Will water be discharged to groundwater? Give general description, purpose, and approximate quantities if known.

The *2022 Plan Update* does not contemplate actions that would require temporary or permanent withdrawals from or discharges to ground water. More specific information on potential ground water withdrawals or discharges would be determined during the design, environmental review, and permitting of individual projects.

(2) Describe waste material that will be discharged into the ground from septic tanks or other sources, if any (for example: domestic sewage; industrial, containing the following chemicals…; agricultural, *etc.*). Describe the general size of the system, the number of such systems, the number of houses to be served (if applicable), or the number of animals or humans the system(s) are expected to serve.

Programs, projects, and activities contemplated in the *2022 Plan Update* are not expected to discharge waste materials to ground waters. Wastewater from existing SPU facilities discharges into public wastewater systems.

c. Water Runoff (including storm water):

(1) Describe the source of runoff (including storm water) and method of collection and disposal, if any (include quantities, if known). Where will this water flow? Will this water flow into other waters? If so, describe.

Most capital and O&M projects are not expected to create large areas of additional impervious surface. More specific information on the potential for runoff and identification of receiving waters, if present, would be determined during the design, environmental review, and permitting of individual projects. See also Response B.1.g.

(2) Could waste materials enter ground or surface waters? If so, generally describe.

The *2022 Plan Update* does not contemplate actions that would release waste materials of any kind to ground or surface waters.

(3) Does the proposal alter or otherwise affect drainage patterns in the vicinity of the site? If so, describe.

The *2022 Plan Update* does not propose to alter or otherwise affect drainage patterns for any site. More specific information on the potential for altering or otherwise affecting drainage patterns would be determined during the design, environmental review, and permitting of individual projects.

d. Proposed measures to reduce or control surface, ground, runoff water, and drainage impacts, if any:

Actions contemplated in the *2022 Plan Update* would be designed, constructed, and operated to meet applicable local, state, and federal regulatory and permit requirements to protect water resources, including surface waters, shorelines, floodplains, ground water, stormwater runoff, and the discharge of dredge, fill, and waste materials. Specific measures for reducing or controlling impacts to water resources would be identified during the design, environmental review, and permitting of individual projects, as applicable.

4. Plants

a. Types of vegetation found on the site: *[check the applicable boxes]*

- ☒ Deciduous trees: ☒ Alder ☒ Maple ☒ Aspen
- ☒ Other: cottonwood, various ornamentals
- ☒ Evergreen trees: ☒ Fir ☒ Cedar ☒ Pine
- ☒ Other: hemlock, various ornamentals
- ☒ Shrubs
- ☒ Grass
- ☐ Pasture
- ☐ Crop or grain
- ☐ Orchards, vineyards, or other permanent crops
- ☒ Wet soil plants: ☒ Cattail ☒ Buttercup ☒ Bulrush ☒ Skunk cabbage
- ☒ Other: various native and non-native rushes, sedges, grasses, willows
- ☒ Water plants**:** ☒ water lily ☒ eelgrass ☒ milfoil
- ☐ Other: (identify)
- ☒ Other types of vegetation: various other vascular and non-vascular plants

Generally, the Puget Sound basin is home to an extremely wide diversity of plant species that depend upon marine, estuarine, freshwater, and terrestrial environments. The planning area has a broad variety of vegetation, including upland forest (deciduous, coniferous, and mixed), shrublands, riparian forests, and wetlands. This flora includes species native to the region, as well as many non-native species. Seattle is a densely developed urban area having few remaining areas of native vegetation and high-quality habitat. These remaining fragments of quality native vegetation are found in parklands and open spaces throughout the planning area. The plants found in most urban and suburban areas are those native and non-native species that tolerate or benefit from habitat degradation and disturbance.

Typically, areas on and adjacent to SPU's solid waste facilities have been extensively altered by construction, operation, and maintenance of that infrastructure or facility. Turf and ornamental shrubs dominate on those sites. More specific information on existing vegetation would be determined during the design, environmental review, and permitting of individual projects.

b. What kind and amount of vegetation will be removed or altered?

Programs, projects, and activities contemplated in the *2022 Plan Update* could remove or alter existing vegetation. In general, potential O&M projects would require minimal clearing

of vegetation. Potential future solid waste infrastructure projects would occur in developed urban areas, and the amounts of vegetation to be removed or altered likely would be relatively small, localized, and mostly limited to urban-type vegetation. Vegetation on or adjacent to project sites could be disturbed by construction activities. More specific information on the kind and amount of vegetation to be removed or altered would be determined during the design, environmental review, and permitting of individual projects.

c. List threatened or endangered species known to be on or near the site.

The Puget Sound basin is home to a wide diversity of plant species that depend upon marine, estuarine, freshwater, and terrestrial environments. Species listed as threatened and endangered under the Endangered Species Act (ESA) and found in the Puget Sound region (but not in the planning area) include golden paintbrush (*Castilleja levisecta)*, water howellia (*Howellia aquatilis*), and Kincaid lupine (*Lupinus sulphureus* ssp. *kincaidii*). Any potential project site affected by the *2022 Plan Update* has been previously developed and the native vegetation previously removed or significantly altered, and the potential for these or other threatened or endangered plant species to be present on or near these sites is low. However, more specific information on the presence of threatened or endangered species and their habitats would be determined during the design, environmental review, and permitting of individual projects.

d. Proposed landscaping, use of native plants, or other measures to preserve or enhance vegetation on the site, if any:

Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated, and maintained to minimize impacts to plants and meet applicable local, state, and federal regulatory and permit requirements to protect vegetation, including threatened and endangered plants and their habitats. Specific measures for reducing or controlling impacts to plants—including compensatory mitigation—would be identified during the design, environmental review, and permitting of individual projects, as applicable.

e. List all noxious weeds and invasive species known to be on or near the site.

In King County alone, there are over 100 noxious weeds that have been identified by the King County Noxious Weed Control Board, including yellow-flag iris, reed canarygrass, Scotch broom, Himalayan and evergreen blackberry, English and Irish ivy, and purple loosestrife. In general, existing facilities are landscaped and/or maintained to eliminate/control the growth of noxious weeds or invasive species. More specific information on noxious weeds and invasive species would be identified during the design, environmental review, and permitting of individual projects.

5. Animals

a. List any birds and other animals that have been observed on or near the site or are known to be on or near the site: *[check the applicable boxes]*

Birds: ☒ Hawk ☒ Heron ☒ Eagle ☒ Songbirds
☒ Other: (osprey, bald eagle, peregrine falcon, purple martin, owl (various species), pileated woodpecker, belted kingfisher, waterfowl species, Canada goose. Also, typical urban species associated with urban development such as starling and pigeon.
Mammals: ☒ Deer ☒ Bear ☒ Elk ☒ Beaver

☒ Other: California sea lion, river otter, muskrat, raccoon. Also, a variety of urban-adapted species such as possum and rat.

Fish: ☒ Bass ☒ Salmon ☒ Trout ☒ Herring
☒ Shellfish ☒ Other: numerous freshwater and marine species

Generally, the Puget Sound basin is home to an extremely wide diversity of animal species that depend upon marine, estuarine, freshwater, and terrestrial environments. This fauna includes species native to the region, as well as many non-native species. Seattle is an intensely developed urban area having few remaining areas of native vegetation and high-quality habitat. These remaining fragments of quality wildlife habitat are found in parklands and open spaces throughout the planning area. The wildlife found in most urban areas are those native and non-native species that tolerate or benefit from habitat degradation or close association with humans. More specific information on animals and their habitats would be determined during the design, environmental review, and permitting of individual projects.

b. List any threatened or endangered species known to be on or near the site:

In King County, five wildlife species are listed as endangered or threatened under the ESA but are not likely to be found in the planning area. These include Canada lynx (*Lynx Canadensis* Threatened), gray wolf (*Canis lupus*; Endangered), grizzly bear (*Ursus arctos*; Endangered), marbled murrelet (*Brachyramphus marmoratus*; Threatened), and northern spotted owl (*Strix occidentalis caurina;* Threatened). King County contains federally designated critical habitat for marbled murrelet and northern spotted owl; no designated critical habitat is located in Seattle. Bald eagle (*Haliaeetus leucocephalus*) was removed from the federal list under ESA on August 8, 2007, but is federally protected under the Bald and Golden Eagle Protection Act. Bald eagle is known to occur in Seattle.

Fish species listed as endangered or threatened under the ESA and found in freshwater tributaries of Puget Sound (PS) include Chinook salmon (*Oncorhynchus tshawytscha*, Threatened, PS), steelhead (*O. mykiss*, Threatened, PS), and bull trout (*Salvelinus confluentus*, Threatened, PS). Coho salmon (*O. kisutch*) is a Candidate species for listing as Threatened. All of these species reside in or near the planning area. Coastal cutthroat trout and coho salmon are State priority species.

Some actions contemplated in the *2022 Plan Update* could impact threatened or endangered animals or their habitats. Because potential project sites affected by the *2022 Plan Update* have been previously developed and the original habitats significantly altered or eliminated, the potential for threatened or endangered animal species to be present on or near these sites is low. More specific information on the presence of threatened or endangered species and their habitats would be determined during the design, environmental review, and permitting of individual projects.

c. Is the site part of a migration route? If so, explain.

The Puget Sound region is known to be an important migratory route for many animal species. Portions of the planning area provide migratory corridors for bald eagles traveling to and from foraging areas in Puget Sound or Lake Washington. Marbled murrelets travel through the planning area between marine waters and their nests in late successional/old growth forests in the Cascade Mountains. Bull trout, steelhead, and Chinook, chum, pink, and

coho salmon use the Puget Sound nearshore. Chinook, coho, and sockeye salmon use Lake Washington and Lake Union as migration corridors. Anadromous trout and salmon migrate through the area river and stream systems, including urban streams in Seattle. The Puget Sound region is also within the Pacific Flyway—a flight corridor for migrating waterfowl, migratory songbirds, and other birds. The Pacific Flyway extends from Alaska to Mexico and South America.

d. Proposed measures to preserve or enhance wildlife, if any:

Actions contemplated in the *2022 Plan Update* would be designed, constructed, and operated to minimize impacts to plants and meet applicable local, state, and federal regulatory and permit requirements to protect fish and wildlife species and their habitats, including threatened and endangered species and their habitats. Specific measures for reducing or controlling impacts to fish and wildlife would be identified during the design, environmental review, and permitting of individual projects, as applicable.

e. List any invasive animal species known to be on or near the site.

Per King County, potential invasive animal species that occur within Seattle's urban areas include European starling, house sparrow, Eastern gray squirrel, fox squirrel, and domestic cats.

6. Energy and Natural Resources

a. What kinds of energy (electric, natural gas, oil, wood stove, solar) will be used to meet the completed project's energy needs? Describe whether it will be used for heating, manufacturing, *etc.*

Some activities contemplated in the *2022 Plan Update* would require equipment and vehicles that would consume electricity and gasoline/diesel fuels. These impacts are expected to be related to construction and would be short-term and negligible relative to regional energy supplies and demands. Projects contemplated in the *2022 Plan Update* are not expected to require major energy usage or new sources of energy production. The *2022 Plan Update* would not construct new facilities that use substantial amounts of energy, but, rather, would predominantly replace existing infrastructure. The potential increase in energy use caused by the *2022 Plan Update* would be unavoidable and is also expected to be minor in the context of regional energy supplies and demands. Electrical power would be supplied mostly through existing power lines, grids, and associated infrastructure in the vicinity of existing system facilities.

b. Would your project affect the potential use of solar energy by adjacent properties? If so, generally describe.

The *2022 Plan Update* does not anticipate any projects that would affect the potential use of solar energy by adjacent properties. More specific information on the impacts of potential use of solar energy by adjacent properties would be determined during the design, environmental review, and permitting of individual projects.

c. What kinds of energy conservation features are included in the plans of this proposal? List other proposed measures to reduce or control energy impacts, if any:

The *2022 Plan Update* includes many recommendations that would continue and expand the City's recycling, reuse, and waste reduction efforts, most of which would ultimately conserve energy. Construction activities and operation of SPU's solid waste facilities would include measures to conserve energy, such as selection of energy-efficient equipment and implementation of energy-efficient operational practices, where applicable. Construction contractors could use energy-efficient equipment and methods. The City of Seattle has adopted a policy requiring all new construction and major renovations to be designed and built in a sustainable manner. Future SPU projects and facilities would be consistent with the City's sustainable building policies, as applicable.

7. Environmental Health

a. Are there any environmental health hazards, including exposure to toxic chemicals, risk of fire and explosion, spill, or hazardous waste, that could occur as a result of this proposal? If so, describe:

A major goal of the *2022 Plan Update* is to protect human and health and the environment by responsibly, efficiently, and safely managing solid waste. Collectively, all of the actions contemplated in the *2022 Plan Update* would improve and protect public health and the environment. Long-term benefits for public health and the environment would occur at a slower rate if the *2022 Plan Update* was not implemented.

Projects contemplated in the *2022 Plan Update* could potentially create environmental hazards due to leaks and spills from equipment and vehicles. Materials likely to be present would include gasoline/diesel fuels, hydraulic fluids, oils, lubricants, solvents, paints, and other chemical products. A spill of one of these chemicals could potentially occur as a result of either equipment failure or worker error. Operation of infrastructural solid waste projects anticipated under the *2022 Plan Update* generally would not increase environmental health hazards in the long term. In general, these infrastructure projects typically would not require large amounts of hazardous materials, and any potential releases of those materials would be minimal.

(1) Describe any known or possible contamination at the site from present or past uses.

Sites included in the *2022 Plan Update* are located throughout the planning area (see Response A.12.), and any historical contamination sites have been addressed in the SEPA Environmental Checklists prepared for those sites as part of their development.

(2) Describe existing hazardous chemicals/conditions that might affect project development and design. This includes underground hazardous liquid and gas transmission pipelines located within the project area and in the vicinity.

Projects in the *2022 Plan Update* that may have hazardous chemicals/conditions would be covered in the relevant SEPA Environmental Checklists prepared for those projects as part of their design and development.

(3) Describe any toxic or hazardous chemicals that might be stored, used, or produced during the project's development or construction, or at any time during the operating life of the project.

Anticipated toxic or hazardous chemicals to be stored and used at the sites included in the *2022 Plan Update* have been addressed in the SEPA Environmental Checklists prepared for those projects as part of their development or construction and operating life.

(4) Describe special emergency services that might be required.

Emergency services could be required to clean hazardous material spills or respond to worker injuries during project construction or maintenance of completed facilities. No other special emergency services would be required as part of this proposal, either during construction or once projects are completed. Typical emergency services required for medical emergencies during construction and operation of projects would be provided by the Seattle Fire Department. Typical security services during construction and operation of projects would be provided by the Seattle Police Department, Seattle Public Utilities, and project contractors.

(5) Proposed measures to reduce or control environmental health hazards, if any:

Actions contemplated in the *2022 Plan Update* would be designed, constructed, and operated to reduce or control environmental health hazards and meet applicable local, state, and federal regulatory and permit requirements for the protection of human health and the environment. Specific measures for reducing or controlling such hazards would be identified during the design, environmental review, and permitting of individual projects, as applicable.

b. Noise

(1) What types of noise exist in the area which may affect your project (for example: traffic, equipment, operation, other)?

Actions contemplated in the *2022 Plan Update* could occur at various locations throughout the planning area (see Response A.12.), where there is a wide range of existing noise sources associated with urban land uses, industrial production, and transportation. Urban and industrial areas often have high existing noise levels. Transportation facilities are major sources of noise, and background traffic noise levels are highest along arterials and freeways with higher traffic volumes and speeds. These existing noise sources would not affect future actions under the *2022 Plan Update*. More specific information on types of existing noise would be determined during the design, environmental review, and permitting of individual projects.

(2) What types and levels of noise would be created by or associated with the project on a short-term or a long-term basis (for example: traffic, construction, operation, other)? Indicate what hours noise would come from the site.

The *2022 Plan Update* includes actions that create noise on both short-term and long-term bases. Noise is generated by trucks as they pick up and transport residential, commercial, and industrial waste. Trains make noise as they transport solid waste to the Columbia Ridge Landfill. Also, the existing North and South Transfer Stations generate noise because of the vehicles transferring garbage or otherwise operating within those facilities. Noise associated with these stations is typically limited to daytime hours, except during emergency responses. Construction of some future projects could result in construction noise, which is expected to be short-term, temporary, and localized. Potential construction noise would be most noticeable at residences, institutions, and park/public open spaces near construction sites. Noise from construction equipment would be limited to allowable maximum noise levels of the City of Seattle's Noise Control Ordinance (SMC Chapter 25.08).

(3) Proposed measures to reduce or control noise impacts, if any:

Actions contemplated in the *2022 Plan Update* would be designed, constructed, and operated to reduce or control noises and to meet applicable local and state regulatory and permit requirements related to noise. Specific measures for reducing or controlling noise would be identified during the design, environmental review, and permitting of individual projects, as applicable.

8. Land and Shoreline Use

a. What is the current use of the site and adjacent properties? Will the proposal affect current land uses on nearby or adjacent properties? If so, describe.

The planning area is characterized by urban uses. Existing uses include single-family and multifamily residences, commercial, industrial, recreation, and open space. Most city properties have been developed at urban densities and existing uses are often mixed. Downtown areas often include many high-rise developments. SPU projects could be located in areas characterized by a variety of land uses. More specific information on land and shoreline use would be determined during the design, environmental review, and permitting of individual projects.

b. Has the project site been used as working farmlands or working forest lands? If so, describe. How much agricultural or forest land of long-term commercial significance will be converted to other uses as a result of the proposal, if any? If resource lands have not been designated, how many acres in farmland or forest land tax status will be converted to nonfarm or non-forest use?

The City of Seattle has not been used for large-scale agriculture in recent history. Because much of the planning area has been previously developed for urban and suburban uses, prime farmland is no longer present in Seattle.

(1) Will the proposal affect or be affected by surrounding working farm or forest land normal business operations, such as oversize equipment access, the application of pesticides, tilling, and harvesting? If so, how?

The *2022 Plan Update* does not anticipate projects that will affect or be affected by surrounding working farm or forest land. As noted above, the planning area has been previously developed for urban and suburban uses.

c. Describe any structures on the site.

The Seattle urban area is developed with a wide range of structures, ranging from single-family residences to high-rise office towers to large industrial structures.

d. Will any structures be demolished? If so, what?

Few actions contemplated in the *2022 Plan Update* would require demolition of existing structures. The old South Recycling and Disposal Station is under design to mitigate environmental concerns associated with the historic South Park Landfill. This action will require structural demolitions, which were evaluated and disclosed in the environmental review documents for that project (South Recycling and Disposal Station Redevelopment Project SEPA Environmental Checklist. SPU 2019.)

e. What is the current zoning classification of the site?

Existing zoning in the City of Seattle ranges from residential to commercial to industrial and includes mixed use zones. The City also has a number of special overlay districts with specific land use restrictions. More specific information on zoning classifications and overlay districts would be determined during the design, environmental review, and permitting of individual projects.

f. What is the current comprehensive plan designation of the site?

The City of Seattle's *Comprehensive Plan* designations are diverse within the planning area. More specific information on the *Comprehensive Plan* would be determined during the design, environmental review, and permitting of individual projects. See also the discussions for land use in Section B.8.a and for zoning in Section B.8.e.

g. If applicable, what is the current shoreline master program designation of the site?

N/A.

h. Has any part of the site been classified as an "environmentally critical" area? If so, specify.

Some future projects could affect environmentally sensitive areas and be subject to the City of Seattle's critical areas regulations. Critical areas include geologic and seismic hazards, flood prone areas, riparian corridors, wetlands, and fish and wildlife habitat conservation areas. More specific information on environmentally sensitive areas would be determined during design, environmental review, and permitting of individual projects.

i. Approximately how many people would reside or work in the completed project?

The *2022 Plan Update* does not include any residential development. People would not reside in the future projects.

j. Approximately how many people would the completed project displace?

Future infrastructural projects would occur at existing SPU facility locations and are not expected to displace people.

k. Proposed measures to avoid or reduce displacement impacts, if any:

Future projects would be designed to avoid or reduce potential displacements, where possible. If any displacements are necessary, SPU would comply with applicable local, state, and federal guidelines for relocation assistance. More specific information on the potential for displacement would be determined during the design, environmental review, and permitting of individual projects.

l. Proposed measures to ensure the proposal is compatible with existing and projected land uses and plans, if any:

Actions contemplated in the *2022 Plan Update* would be designed, constructed, implemented, operated, and maintained to meet applicable local, state, and federal planning, regulatory, and permit requirements related to land and shoreline use, structure demolition, and environmentally sensitive areas. Specific measures ensuring such compatibility with such requirements would be identified during the design, environmental review, and permitting of individual projects, as applicable.

m. Proposed measures to reduce or control impacts to agricultural and forest lands of long-term commercial significance, if any:

The *2022 Plan Update* does not anticipate projects that will impact agricultural or forest lands. The planning area has been previously developed for urban and suburban uses.

9. Housing

a. Approximately how many units would be provided, if any? Indicate whether high, middle, or low-income housing.

The *2022 Plan Update* would not provide any housing units.

b. Approximately how many units, if any, would be eliminated? Indicate whether high, middle, or low-income housing.

Implementation of the *2022 Plan Update* is not expected to result in any impacts to housing. More specific information on housing impacts would be determined during the design, environmental review, and permitting of individual projects.

c. Proposed measures to reduce or control housing impacts, if any:

Implementation of the *2022 Plan Update* is not expected to result in any impacts to housing. More specific information on housing impacts – and measures to reduce or

control housing impacts – would be determined during the design, environmental review, and permitting of individual projects.

10. Aesthetics

a. What is the tallest height of any proposed structure(s), not including antennas? What is the principal exterior building material(s) proposed?

The height, size, and building materials of existing solid waste facilities was evaluated and disclosed in the environmental review documents for these facilities. Future projects related to the recycling and disposal stations may require new, large, or tall structures. More specific information would be determined during the design, environmental review, and permitting of individual projects.

b. What views in the immediate vicinity would be altered or obstructed?

The *2022 Plan Update* does not anticipate the obstruction or alteration of any views. Anticipated projects would occur on sites already developed for existing SPU facilities, and minimal vegetation would be removed during construction. Construction impacts on aesthetics are expected to be short-term, temporary, and localized. More specific information would be determined during the design, environmental review, and permitting of individual projects.

c. Proposed measures to reduce or control aesthetic impacts, if any:

Specific measures for reducing or controlling impacts to aesthetic elements would be identified during the design, environmental review, and permitting of individual projects, as applicable. For example, the design, height, and size of new projects and modifications of individual facilities would meet the applicable development regulations of local jurisdictions. Exterior building materials could be selected to be compatible with each project site. Measures might also include landscaping that provides a visual buffer between a SPU facility and adjacent viewers.

11. Light and Glare

a. What type of light or glare will the proposal produce? What time of day would it mainly occur?

The *2022 Plan Update* would not introduce major new sources of light or glare. Minimal new lighting might be required on a project-specific basis, and its potential effects would be localized. Smaller O&M projects would not be long-term sources of light or glare. Construction activities could be short-term sources of light and glare. However, most construction would occur during daytime hours, in compliance with local noise ordinances to avoid nighttime hours. More specific information on light and glare would be determined during the design, environmental review, and permitting of individual projects.

b. Could light or glare from the finished project be a safety hazard or interfere with views?

Anticipated projects would not be major sources of long-term light or glare. Any new light or glare created under the *2022 Plan Update* would be minimal and would not increase safety hazards or interfere with views.

c. What existing off-site sources of light or glare may affect your proposal?

Future SPU projects under the *2022 Plan Update* would not be affected by existing off-site sources of light or glare.

d. Proposed measures to reduce or control light and glare impacts, if any:

Actions contemplated in the *2022 Plan Update* would be designed, constructed, and operated to meet applicable local, state, and federal code, regulatory, and permit requirements for lighting. Specific measures for reducing or controlling impacts related to light and glare would be identified during the design, environmental review, and permitting of individual projects, as applicable. Such provisions generally require that light fixtures be installed in such a way as to optimize on-site lighting and minimize off-site impacts.

12. Recreation

a. What designated and informal recreational opportunities are in the immediate vicinity?

In general, the planning area has a variety of recreational opportunities, including parks, trails, gardens, playfields, swimming pools, community centers, golf courses, school playgrounds, fishing piers, and private health clubs. Puget Sound, Lake Washington, Lake Union, and other water bodies offer water-related recreation such as swimming, boating, fishing, use of public beaches, and scuba diving. More specific information on recreational opportunities would be determined during the design, environmental review, and permitting of individual projects.

b. Would the proposed project displace any existing recreational uses? If so, describe.

Actions contemplated in the *2022 Plan Update* are not anticipated to permanently displace any existing recreational resources. During construction, localized recreational uses could be temporarily affected at project sites near recreational resources, as, for example, by temporary closures or detours. More specific information on potential impacts to recreational uses would be determined during the design, environmental review, and permitting of individual projects.

c. Proposed measures to reduce or control impacts on recreation, including recreation opportunities to be provided by the project or applicant, if any:

Specific measures for reducing or controlling impacts to recreation would be identified during the design, environmental review, and permitting of individual projects, as applicable. Impacts on active and passive recreational opportunities would be avoided wherever possible and would be addressed when individual projects are proposed. Short-term construction impacts would be minimized to the maximum extent possible. Additional landscaping could be provided, if warranted, to provide a visual buffer between projects and adjacent recreational users.

13. Historic and Cultural Preservation

a. Are there any buildings, structures, or sites, located on or near the site that are over 45 years old listed in or eligible for listing in national, state, or local preservation registers? If so, specifically describe.

The planning area includes many known landmarks, properties, districts, and objects that are listed on, proposed for, or potentially eligible for national, state, and local preservation registers. The *2022 Plan Update* does not anticipate disturbing any such site; however, more specific information on such resources would be determined during the design, environmental review, and permitting of individual projects.

b. Are there any landmarks, features, or other evidence of Indian or historic use or occupation? This may include human burials or old cemeteries. Are there any material evidence, artifacts, or areas of cultural importance on or near the site? Please list any professional studies conducted at the site to identify such resources.

The planning area has many known landmarks and evidence of historic, archaeological, scientific, or cultural importance, as well as significant potential for the discovery of additional such resources. The *2022 Plan Update* does not anticipate disturbing any such site; however, more specific information on the presence of these resources would be determined during the design, environmental review, and permitting of individual projects.

c. Describe the methods used to assess the potential impacts to cultural and historic resources on or near the project site. Examples include consultation with tribes and the Department of Archaeology and Historic Preservation, archaeological surveys, historic maps, GIS data, *etc.*

The *2022 Plan Update* does not anticipate disturbing cultural or historic resources. Methods used to assess the potential impacts of individual projects would be determined during the design, environmental review, and permitting of individual projects and would include checking sites against the following registers:

Washington Information System for Architectural & Archaeological Research Data (WISAARD), maintained by the Washington State Department of Archaeology & Historic Preservation (found at https://dahp.wa.gov/project-review/wisaard-system)

Landmark List, and Map of Designated Landmarks, maintained by the City of Seattle, Department of Neighborhoods (found at http://www.seattle.gov/neighborhoods/programs-and-services/historic-preservation/landmarks)

d. Proposed measures to avoid, minimize, or compensate for loss, changes to, and disturbance to resources. Please include plans for the above and any permits that may be required.

The *2022 Plan Update* does not anticipate disturbing cultural or historic resources. However, implementation of individual projects arising under the proposal could have the potential to encounter historic, archaeological, and other cultural resources. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated, and maintained to avoid and minimize impacts to historic, archaeological, and cultural resources and meet applicable local, state, and federal regulatory and permit

requirements protecting such resources. Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

14. Transportation

a. Identify public streets and highways serving the site or affected geographic area and describe proposed access to the existing street system. Show on site plans, if any.

In general, the planning area has a wide variety of transportation facilities, including roadways, bicycle paths, railroads, intermodal facilities, airports, ferries, and public transit. More specific information on transportation facilities would be determined during the design, environmental review, and permitting of individual projects.

b. Is the site or affected geographic area currently served by public transit? If so, generally describe. If not, what is the approximate distance to the nearest transit stop?

Transit stops generally would not be affected by implementation of solid waste management activities and projects contemplated by the *2022 Plan Update*. More specific information on transportation facilities would be determined during the design, environmental review, and permitting of individual projects.

c. How many additional parking spaces would the completed project or non-project proposal have? How many would the project or proposal eliminate?

Future solid waste activities contemplated in the *2022 Plan Update* could require parking spaces, and construction of future projects could temporarily displace on-street parking. More specific information on parking issues would be determined during the design, environmental review, and permitting of individual projects.

d. Will the proposal require any new or improvements to existing roads, streets, pedestrian, bicycle or state transportation facilities, not including driveways? If so, generally describe (indicate whether public or private).

Some activities contemplated in the *2022 Plan Update* would generate traffic during implementation, construction, operation, or maintenance. Most SPU solid waste management activities and facilities would continue to use the City's existing roadways, public street rights-of-way, and access points, but would not require construction of new roads or road improvements. Trucks routinely use public street rights-of-way to collect and transport solid waste and occasionally create very short-term disruptions to local traffic and access. Also, construction of individual infrastructure projects could occur near or within roadways and temporarily disrupt traffic and/or restrict access to adjacent residences and businesses. Construction-related road restrictions could temporarily interfere with transit, ferry, and emergency service vehicles. More specific information on the need to construct new roads or improve existing roads would be determined during the design, environmental review, and permitting of individual projects.

e. Will the project or proposal use (or occur in the immediate vicinity of) water, rail, or air transportation? If so, generally describe.

SPU's solid waste management activities currently require long-term use of rail transportation. Construction of individual projects could occur in the immediate vicinity of water, rail, and air transportation, which could result in temporary disruptions. More specific information on the use of or impacts to water, rail, or air transportation would be determined during the design, environmental review, and permitting of individual projects.

f. How many vehicular trips per day would be generated by the completed project or proposal? If known, indicate when peak volumes would occur and what percentage of the volume would be trucks (such as commercial and non-passenger vehicles). What data or transportation models were used to make these estimates?

The number of vehicle trips generated by SPU's current solid waste management activities is not known, but the number of long-term vehicular trips and peak volumes are not expected to increase substantially as a result of activities or operation of actions contemplated in the *2022 Plan Update*. Construction and maintenance activities would temporarily generate vehicle trips for workers and hauling materials. The number of these trips and the timing of peak volumes are not known. More specific information on vehicular trips and peak volumes would be determined during the design, environmental review, and permitting of individual projects and actions.

g. Will the proposal interfere with, affect or be affected by the movement of agricultural and forest products on roads or streets in the area? If so, generally describe.

It is not anticipated that activities contemplated by the *2022 Plan Update* would interfere with, affect, or be affected by the movement of agricultural and forest products on roads or streets in the area. The planning area has been previously developed for urban and suburban uses.

h. Proposed measures to reduce or control transportation impacts, if any:

Specific measures for reducing or controlling transportation impacts would be identified during the design, environmental review, and permitting of individual projects, as applicable. For example, SPU or its contractors would develop construction plans and obtain required street use permits. Construction activities would be coordinated with affected landowners, local businesses, emergency service providers, transit services, and the local jurisdictions.

When projects affect roads and vehicular access, SPU or its contractor prepare Traffic Control Plans to ensure vehicular and emergency response access to affected residences and businesses during construction. Traffic Control Plans commonly specify use of flaggers and traffic controls to maintain vehicle access when lanes are temporarily closed during construction. Plans might also include requirements that workers carpool to the job site or that the contractor provide worker shuttles from off-site parking locations.

15. Public Services

a. Would the project result in an increased need for public services (for example: fire protection, police protection, public transit, health care, schools, other)? If so, generally describe.

Implementation of the *2022 Plan Update* would not result in a long-term increase in the need for public services. Future solid waste projects are anticipated to have minimal impacts on public services. Occasional spills during construction and operation of some facilities could require responses from emergency service providers. Construction and operation activities could affect local traffic circulation and access on public streets, which could temporarily affect emergency service vehicles. More specific information on effects related to public services would be determined during the design, environmental review, and permitting of individual projects and actions.

b. Proposed measures to reduce or control direct impacts on public services, if any.

Because public services would not be directly affected, no such measures are proposed. Any potential spills during construction and operation of future SPU projects would be contained and cleaned under applicable state and local provisions. During construction, access and circulation would be maintained for emergency service vehicles.

16. Utilities

a. Check utilities available at the site, if any: *[check the applicable boxes]*

☐ None
☒ Electricity ☒ Natural gas ☒ Water ☒ Refuse service
☒ Telephone ☒ Sanitary sewer ☐ Septic system
☒ Other: cable, stormwater drainage

More specific information on utilities available at individual sites would be determined during project-level design, environmental review, and permitting. In general, the planning area has a variety of utilities, including those checked above.

b. Describe the utilities that are proposed for the project, the utility providing the service, and the general construction activities on the site or in the immediate vicinity which might be needed.

☐ **None**

Implementation of the *2022 Plan Update* could affect solid waste services provided by SPU. The other utility most likely to be affected by long-term operation of future projects is electricity. Solid waste facilities typically use electricity. Electrical power would be supplied though existing power lines, grids, and associated electrical infrastructure in the vicinity of any proposed projects. Long-term demands on water, telephone, and other utilities would be negligible. More specific information on potential impacts on utilities would be determined during the design, environmental review, and permitting of individual projects. Individual projects would include project-specific measures to minimize disruptions to utilities, where applicable.

C. SIGNATURE

The above answers are true and complete to the best of my knowledge. I understand that the lead agency is relying on them to make its decision.

Signature: Stephanie Schwenger Digitally signed by Stephanie Schwenger Date: 2022.03.31 15:41:13 -07'00'

Stephanie Schwenger
Project Manager

Attachment A: Planning Area Map

Note: Section *D. Supplemental Sheet for Non-Project Actions* is required if the proposal applies to a program, planning document, or code change.

D. SUPPLEMENTAL SHEET FOR NON-PROJECT ACTIONS

Note: Adoption and approval of the SPU *2022 Solid Waste Plan Update* ("*2022 Plan Update*") is a non-project action under SEPA. It is a long-range solid waste plan that includes studies, policies, programs, and projects designed to address SPU's solid waste management needs. No specific projects, however, would be implemented directly as a result of adoption or approval of the *2022 Plan Update*. The following sections of this SEPA Environmental Checklist address the non-project nature of the *2022 Plan Update*, and potential impacts are evaluated at the long-term, broader level. This Subpart D of the checklist does not discuss site-specific impacts and mitigation for future individual projects (e.g., construction activities) that may result subsequent to adoption of the *2022 Plan Update*. As described in Subpart B of the checklist, any projects to implement the *2022 Plan Update* would undergo future environmental review and permitting, where applicable, at the time the individual projects are proposed.

Because these questions are very general, it may be helpful to read them in conjunction with the list of the elements of the environment.

When answering these questions, be aware of the extent the proposal, or the types of activities likely to result from the proposal, would affect the item at a greater intensity or at a faster rate than if the proposal were not implemented. Respond briefly and in general terms.

1. How would the proposal be likely to increase discharge to water; emissions to air; production, storage, or release of toxic or hazardous substances; or production of noise?

As summarized in Response A.11., the *2022 Plan Update* is a long-range solid waste plan that would not result directly in the implementation of specific projects. Therefore, the *2022 Plan Update* itself would be unlikely to increase emissions to air (see B.2.); long-term discharges to water (see B.3.); production, storage, or release of toxic or hazardous substances (see B.7.a); or production of noise (see B.7.b.). Overall, the *2022 Plan Update* would not likely increase regional discharges of pollutants to the environment. Most of the *2022 Plan Update's* recommendations represent commitments and refinements to existing policies, programs, and projects that have goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities.

Proposed measures to avoid or reduce such increases are:

Plan adoption and approval would not result in increased discharges to water; emissions to air; production, storage, or release of toxic or hazardous substances; or production of noise. Therefore, no measures to avoid or reduce such increases are proposed. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated, and maintained to avoid and minimize such increases and to meet applicable local, state, and federal regulatory and permit requirements. Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

2. How would the proposal be likely to affect plants, animals, fish, or marine life?

Plan adoption and approval would be unlikely to adversely affect plants, animals, or fish, including threatened and endangered species (see B.4. and B.5.). As described in Response A.11., the *2022 Plan Update* includes goals for SPU's solid waste prevention program. Most of the *2022 Plan's* recommendations represent commitments and refinements to existing policies, programs, and projects that have goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities.

Proposed measures to protect or conserve plants, animals, fish, or marine life are:

Long-term adverse impacts on plants, animals, fish, and marine life are not expected under the *2022 Plan Update*. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated and maintained to avoid and minimize adverse impacts on plants, animals, fish and marine life and to meet applicable local, state, and federal regulatory and permit requirements. Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

3. How would the proposal be likely to deplete energy or natural resources?

Plan adoption and approval would be unlikely to directly deplete energy or natural resources (see B.6.). The *2022 Plan Update* itself would not require any additional long-term energy sources. Most of the *2022 Plan Update's* recommendations represent commitments and refinements to existing policies, programs, and projects that have goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities.

Proposed measures to protect or conserve energy and natural resources are:

The *2022 Plan Update* is not expected to cause long-term, adverse impacts on energy and natural resources. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated and maintained to protect or conserve energy and natural resources and to meet applicable local, state, and federal regulatory and permit requirements. Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

4. How would the proposal be likely to use or affect environmentally sensitive areas or areas designated (or eligible or under study) for governmental protection; such as parks, wilderness, wild and scenic rivers, threatened or endangered species habitat, historic or cultural sites, wetlands, floodplains, or prime farmlands?

Plan adoption and approval is not expected to adversely impact environmentally sensitive areas or areas designated for government protection (see B.8., B.12., and B.13.) or threatened or endangered species habitat (see B.4. and B.5.), historic or cultural sites (see B.13), wetlands or floodplains. Most of the *2022 Plan Update's* recommendations represent commitments and refinements to existing policies, programs, and projects that have goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities.

Proposed measures to protect such resources or to avoid or reduce impacts are:

The *2022 Plan Update* is not expected to result in adverse, long-term impacts on environmentally sensitive areas or areas designated for government protection, threatened or endangered species habitat, historic or cultural sites, wetlands or floodplains. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated and maintained to avoid and minimize adverse impacts on environmentally sensitive areas, areas designated for government protection, and threatened or endangered species habitat, historic and cultural sites, wetlands, and floodplains. (There are no prime farmlands in Seattle.) Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

5. How would the proposal be likely to affect land and shoreline use, including whether it would allow or encourage land or shoreline uses incompatible with existing plans?

The *2022 Plan Update* is a non-project plan of future actions that would not directly affect land and shoreline use in the planning area (see B.8.). Plan adoption and approval would not change land and shoreline uses or designations. Most of the *2022 Plan Update's* recommendations represent commitments and refinements to existing policies, programs, and projects that have goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities.

The *2022 Plan Update* is consistent with requirements of the Growth Management Act and local and regional land use plans. Any SPU actions themselves would not encourage land or shoreline uses that are incompatible with existing plans. Future land and shoreline uses would be determined by local land use plans, zoning codes, and development regulations, not by SPU activities.

Proposed measures to avoid or reduce shoreline and land use impacts are:

The *2022 Plan Update* is not expected to result in direct or indirect adverse impacts on shoreline and land uses. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated and maintained to avoid and minimize adverse impacts on shoreline and land use. Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

6. How would the proposal be likely to increase demands on transportation or public services and utilities?

Plan adoption and approval would be unlikely to directly increase demand on transportation (see B.14.), public services (see B.15.), or utilities (see B.16.). Most of the *2022 Plan Update's* recommendations represent commitments and refinements to existing policies, programs, and projects that have goals to decrease waste disposed (increase waste prevention, recycling, and composting) and reduce environmental impacts caused by solid waste management activities. The *2022 Plan Update's* programs and projects would address SPU's present and future needs for solid waste management, which would benefit utilities.

Proposed measures to reduce or respond to such demand(s) are:

The *2022 Plan Update* is not expected to result in long-term, adverse impacts on transportation, public services, and utilities. Actions contemplated in the *2022 Plan Update* would be designed, implemented, constructed, operated and maintained to avoid and minimize adverse impacts on

transportation, public services, and utilities. Specific measures for doing so would be identified during the design, environmental review, and permitting of individual projects, as applicable.

7. Identify, if possible, whether the proposal may conflict with local, state, or federal laws or requirements for the protection of the environment.

The *2022 Plan Update* would be consistent with, and support, all local, state, and federal laws or requirements for the protection of the environment. In implementing the *2022 Plan Update*, SPU would comply with all applicable local, state, and federal laws and regulations.

Attachment A: Planning Area Map

Seattle Solid Waste Facilities and Collection Contract Service Areas