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SIXTH AMENDED
SITE CERTIFICATE
FOR THE
PORT WESTWARD GENERATING PROJECT

Issued By
OREGON ENERGY FACILITY SITING COUNCIL
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March 27, 2009

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**SIXTH AMENDED
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A. INTRODUCTION

This site certificate for the Port Westward Generating Project (“PWGP or Project”) is issued and executed in the manner provided by ORS Chapter 469, by and between the State of Oregon (“State”), acting by and through its Energy Facility Siting Council (“Council”), and the Portland General Electric Company (“PGE” or “Certificate Holder”).

The findings of fact, reasoning and conclusions of law underlying the terms and conditions of this site certificate are set forth in the following documents, which by this reference are incorporated herein: (a) the Council’s Final Order in the Matter of the Application for a Site Certificate for the Port Westward Generating Project, which the Council granted on November 8, 2002; (b) the Council’s Final Order in the Matter of the Site Certificate for the Port Westward Generating Project Request for Amendment No. One, which the Council granted on December 5, 2003; (c) the Council’s Final Order in the Matter of the Site Certificate for the Port Westward Generating Project Request for Amendment No. Two, which the Council granted on September 24, 2004; (d) the Council’s Final Order in the Matter of the Site Certificate for the Port Westward Generating Project Request for Amendment No. Three, which the Council granted on January 28, 2005; and (e) the Council’s Final Order in the Matter of the Fourth Request to Amend the Site Certificate for the Port Westward Generating Project, which the Council granted on May 19, 2006; (f) the Council’s Final Order in the Matter of the Fifth Request to Amend the Site Certificate for the Port Westward Generating Project, which the Council granted on September 29, 2006, and (g) the Council’s Final Order in the Matter of the Sixth Request to Amend the Site Certificate for the Port Westward Generating Project, which the Council granted on March 27, 2009. [Amendments No. 1, 2, 3, 4, 5 & 6]. Collectively, we refer to the Final Orders listed in (a) through (e) as “the Orders”.

In interpreting this site certificate, any ambiguity shall be clarified by reference to, and in the following priority: this Site Certificate, the record of the proceedings which led to the Orders, and the Application for a Site Certificate for the Port Westward Generating Project. As used in this Site Certificate, the “application for site certificate” or the “ASC” includes: (a) the Application for a Site Certificate for the Port Westward Generating Project, which the Department of Energy (“Department”) filed on April 11, 2002; (b) the Certificate Holder’s Request for First Amendment to the Site Certificate for the Port Westward Generating Project, which the Council received on October 25, 2003; (c) the Certificate Holder’s Request for Second Amendment to the Site Certificate for the Port Westward Generating Project, which the Council received on May 7, 2004; (d) the Certificate Holder’s Request for Third Amendment to the Site Certificate for the Port Westward Generating Project, which the Council received on November 3, 2004, (e) the Certificate Holder’s Request for Fourth Amendment to the Site Certificate for the Port

1 Westward Generating Project, which the Council received on January 18, 2006, (f) the
2 Certificate Holder's Request for Fifth Amendment to the Site Certificate for the Port
3 Westward Generating Project, which the Council received on July 18, 2006, and (g) the
4 Certificate Holder's Request for Sixth Amendment to the Site Certificate for the Port
5 Westward Generating Project, which the Council received on November 7, 2008.
6 [Amendments No. 1, 2, 3, 4, 5 & 6].
7

8 The terms used in this Site Certificate shall have the same meaning set forth in ORS
9 69.300 and Oregon Administrative Rules (OAR) 345-001-0010, except where otherwise
10 stated or where the context clearly indicates otherwise.
11

12 **B. SITE CERTIFICATION**

- 13 1. To the extent authorized by State law and subject to the conditions set forth
14 herein, the State approves and authorizes the Certificate Holder to construct,
15 operate and retire a natural gas-fired, combined cycle combustion turbine energy
16 facility, together with certain related or supporting facilities, at the site as
17 described in Section C of this Site Certificate, near Clatskanie, Oregon. ORS
18 469.401(1).
19
- 20 2. This site certificate shall be effective (1) until it is terminated pursuant to OAR
21 345-027-0110 or the rules in effect on the date that termination is sought, or (2)
22 until the Site Certificate is revoked pursuant to ORS 469.440 and OAR 345-029-
23 0100 or the statutes and rules in effect on the date that revocation is ordered. ORS
24 469.401(1).
25
- 26 3. This Site Certificate does not address, and is not binding with respect to, matters
27 that were not addressed in the Council's Final Order. These matters include, but
28 are not limited to: building code compliance, wage, hour and other labor
29 regulations, local government fees and charges, and other design or operational
30 issues that do not relate to siting the Project; and permits issued under statutes and
31 rules for which the decision on compliance has been delegated by the Federal
32 government to a state agency other than the Council. ORS 469.401(4) and
33 469.503(3).
34
- 35 4. Both the State and the Certificate Holder shall abide by local ordinances and state
36 law and the rules of the Council in effect on the date this Site Certificate is
37 executed. In addition, upon a clear showing of a significant threat to the public
38 health, safety or the environment that requires application of later-adopted laws or
39 rules, the Council may require compliance with such later-adopted laws or rules.
40 ORS 469.401(2).
41
- 42 5. For a permit, license or other approval addressed in and governed by this Site
43 Certificate, the Certificate Holder shall comply with applicable state and federal
44 laws adopted in the future to the extent that such compliance is required under the
45 respective state agency statutes and rules. ORS 469.401(2).
46

- 1 6. Subject to the conditions herein, this Site Certificate binds the State and all
2 counties, cities and political subdivisions in this state as to the approval of the site
3 and the construction, operation and retirement of the Project as to matters that are
4 addressed in and governed by this Site Certificate. ORS 469.401(3).
5
- 6 7. Each affected state agency, county, city and political subdivision in Oregon with
7 authority to issue a permit, license or other approval addressed in or governed by
8 this Site Certificate shall, upon submission of the proper application and payment
9 of the proper fees, but without hearings or other proceedings, issue such permit,
10 license or other approval subject only to conditions set forth in this Site
11 Certificate. ORS 469.401(3).
12
- 13 8. After issuance of this Site Certificate, each state agency or local government
14 agency that issues a permit, license or other approval for the Project shall continue
15 to exercise enforcement authority over such permit, license or other approval.
16 ORS 469.401(3).
17
- 18 9. After issuance of this Site Certificate, the Council shall have continuing authority
19 over the site and may inspect, or direct the Department to inspect, or request
20 another state agency or local government to inspect, the site at any time in order
21 to assure that the Project is being operated consistently with the terms and
22 conditions of this Site Certificate. ORS 469.430.
23
- 24 10. The Certificate Holder may develop the energy facility in two phases. Phase 1
25 would consist of the southernmost generating unit (“Unit 1”), including one
26 combustion turbine generator, heat recovery steam generator, steam generator,
27 one step-up transformer bank, auxiliary transformer, and cooling tower. Phase 1
28 would also include all of the energy facility components common to the two units
29 and the related or supporting facilities. Phase 2 would consist of the northernmost
30 generating unit (“Unit 2”) and its associated facilities. All conditions of this Site
31 Certificate apply equally to Phase 1 and Phase 2, unless a condition specifies
32 different obligations for Phase 1 or Phase 2. [Amendments No. 1 & 3]
33

34 C. SITE DESCRIPTIONS

35

36 C.1. FACILITY

37

38 C.1.a. Major Structures and Equipment

39

40 **Major Structures and Equipment.** The net electric power output of the energy facility
41 will be about 560 MW. It will use power augmentation, i.e., duct burning, that will allow
42 it to achieve a net electric power output of about 650 MW for a limited number of hours
43 annually on average.
44

45 The energy facility will consist of two combustion turbine generators (General Electric
46 Frame 7FB’s or comparable combustion turbines), two heat recovery steam generators

1 (“HRSG”), and two steam generators. It will burn natural gas in the combustion turbines
2 and duct burners. Expanding gases from combustion will turn rotors within the turbines
3 that are connected to electric generators. The hot gases exhausted from the combustion
4 turbines and duct burners will be used to raise steam in the HRSGs. Steam from the
5 HRSGs will be expanded through the steam turbines. Each steam turbine will drive its
6 own electric generator. [Amendment No. 1]

7
8 The combustion turbines will be housed in a turbine building that provides thermal
9 insulation, acoustical attenuation and fire extinguishing media containment. The turbine
10 building, occupying a footprint measuring about 230 feet by 560 feet and standing about
11 90 feet high, will also house the steam turbine generators, condensers, balance of plant
12 equipment, control room, and administrative offices. The enclosure will allow access for
13 routine inspection and maintenance.

14
15 Each of the two HRSGs will occupy a footprint measuring about 50 feet by 150 feet and
16 will stand about 110 feet high. A stack will be provided for each combustion turbine’s
17 HRSG. The two stacks will be about 15 to 25 feet in diameter and 200 feet high

18 .
19 Six transformers will step-up the combustion turbine and steam turbine generator
20 voltages to the substation voltage of 230 kilovolts (“kV”). Two auxiliary transformers
21 will supply power for plant auxiliary loads. [Amendment No. 1]

22
23 Most of the structures comprising the energy facility, including the combustion and steam
24 turbines and generators, the main step-up transformers, the HRSG, and the control rooms,
25 will be contained within an area measuring about 400 feet by 560 feet.

26
27 Two mechanical-draft cooling towers will be used to remove the waste heat from each
28 main condenser and the plant auxiliary heat exchangers. The cooling towers and
29 circulating water pumps will cover an area of about 75 feet by 650 feet and will stand
30 about 50 feet high.

31
32 A switchyard or dead-end transmission structure will interconnect the plant’s output to
33 the 230-kV transmission network. The switchyard footprint will measure about 300 feet
34 by 500 feet. [Amendment No. 1]

35
36 An auxiliary boiler will supply steam for plant start-ups and short duration shut-downs.
37 The auxiliary boiler will be fueled with natural gas. [Amendment No. 3]

38
39 Additional facilities will include: a plant services/warehouse building; two boiler feed
40 pump buildings; a fire water pump building; a water treatment building; a clarifier; a
41 settling basin; a condensate tank, a fire water/service water storage tank and a
42 demineralized water storage tank (each with 440,000-gallon capacity); a natural gas
43 metering station; a natural gas compressor station with electric compressors of 1,000 to
44 7,000 horsepower total, enclosed in a building with acoustical insulation; and, an aqueous
45 ammonia storage tank (with 100,000-gallon capacity and equipped with containment).
46 [Amendment No. 1]

1
2 Natural gas will not be stored at the energy facility site. Diesel fuel for the fire pumps
3 will be stored in an aboveground tank. Water treatment chemicals will be stored in
4 permanent aboveground storage tanks or portable plastic tanks (totes). To prevent storm
5 water runoff from chemical storage, all fuel and chemical storage will be inside buildings
6 or under cover in paved areas with a curb. All individual spill containment areas will be
7 designed to hold at least 110 percent of the volume of liquids stored within them.
8

9 A complete fire protection system will be installed within the buildings and yard areas at
10 the energy facility site. The system will be designed to meet the requirements of the
11 Uniform Fire Code, as amended by Oregon and the National Fire Protection Association,
12 and all other applicable fire protection standards. The fire protection system will include
13 a fire water system, a dry chemical extinguishing system, a carbon dioxide (“CO2”)
14 extinguishing system, and portable fire extinguishers. The road system within the energy
15 facility site will be designed for access by large trucks needed for equipment and material
16 deliveries. The minimum turning inside radius for roads will be 40 feet.
17

18 The fire water system will include a fire water supply loop, fire hydrants, sprinkler
19 systems, and hoses placed at appropriate locations. Reserved capacity in the 180,000-
20 gallon fire water/service water storage tank will serve as the firewater source.
21

22 The combustion turbine enclosures will be protected by foam or CO2 systems. If the
23 systems were to activate, an alarm will sound and/or a visual indicator will light up on the
24 gas turbine control panel.
25

26 Portable fire extinguishers will be placed at key locations within the energy facility site.
27 The type and number of portable fire extinguishers will conform to applicable code
28 requirements.
29

30 The Certificate Holder may develop the whole facility at the same time or it may develop
31 only one of the generating units and the related or supporting facilities (“Phase 1”) or the
32 two units of the energy facility in two distinct phases (“Phase 1” and “Phase 2”). As
33 referred to in this Site Certificate, the Certificate Holder would develop Phase 1 first if it
34 develops the energy facility in phases. Phase 1 would consist of the southernmost
35 generating unit (“Unit 1”), including a combustion turbine generator, heat recovery steam
36 generator, steam generator, one step-up transformer bank, auxiliary transformer, and
37 cooling tower. Phase 1 would also include all of the energy facility components common
38 to the two units and the related or supporting facilities. [Amendments No. 1 & 3]
39

40 **Output.** The energy facility will have a net electric power output of about 560 MW at an
41 average annual site condition of 51 degrees Fahrenheit, 14.691 pounds per square inch
42 barometric pressure, and 78 percent relative humidity. The new and clean heat rate will
43 be about 6,790 Btu (higher heating value). [Amendments No. 1 & 3]
44

45 With power augmentation technologies (duct burning), the energy facility will have a net
46 electric power output of about 650 MW and a new and clean heat rate of about 7,100 Btu

1 (higher heating value). The Certificate Holder proposes to operate the energy facility with
2 power augmentation technologies for 3,000 hours annually on average. [Amendments
3 No. 1 & 3]
4

5 **Fuel Use.** The energy facility will use natural gas as the only fuel to power the turbines
6 and the power augmentation technologies. It will use 4,600 MM Btu per hour of natural
7 gas at full load with the duct burners in operation at the average annual site condition.
8 [Amendments No. 1 & 3]
9

10 **Water Use.** The energy facility will obtain water to generate steam and to cool the steam
11 process from an existing PGE intake structure on the Bradbury Slough of the Columbia
12 River. The Certificate Holder will use water from PGE's existing industrial water right,
13 from partial transfer of a water right associated with PGE's Trojan Nuclear Plant (subject
14 to approval of a transfer by the Oregon Water Resources Department) and, if necessary,
15 will enter into a contract with the Port of St. Helens, which has an existing water permit,
16 to obtain water sufficient for operation of the energy facility. [Amendments No. 1 & 3]
17

18 Average water demand at the energy facility will be about 2,800 gallons per minute
19 ("gpm"), or 4.0 million gallons per day ("gpd"). Peak water demand will be about 3,700
20 gpm, 5.4 million gpd, or 8.3 cubic feet per second ("cfs"). [Amendments No. 1 & 3]
21

22 The energy facility will require no new state-administered water right, water rights
23 transfer, or surface water right permit for water supply. The Port of St. Helens has an
24 existing municipal water use permit for 30 cfs and PGE has an existing industrial water
25 right for 11.3 cfs. PGE expects to apply for a partial transfer of a water right associated
26 with PGE's Trojan Nuclear Plant, Certificate No. 73396, but an adequate water supply is
27 available for operation of the energy facility without that such a transfer. [Amendments
28 No. 1 & 3]
29

30 The water rights have a permitted point of diversion, where existing withdrawals occur
31 and the energy facility withdrawals will occur. PGE owns and operates the existing point
32 of diversion. To serve the energy facility, PGE will place additional pumps within the
33 existing intake facility. PGE will employ fish screens compliant with National Marine
34 Fisheries Service ("NMFS") screening criteria and Oregon Department of Fish and
35 Wildlife ("ODFW") criteria. [Amendment No. 1]
36

37 **Wastewater.** Process blowdown is washdown water, filter backwash or other non-
38 sanitary liquid waste produced within the energy facility. The average volume of process
39 blowdown for both units combined will be about 190 gpm. Cooling system blowdown is
40 water withdrawn from the cooling system to control the buildup of dissolved salts. The
41 average volume of cooling system blowdown for both units combined will be about 460
42 gpm, but it could vary depending on the quality of the river water supply. The energy
43 facility will discharge its process and cooling system blowdown to the Columbia River
44 under a National Pollution Discharge Elimination System ("NPDES") permit that the
45 Port of St. Helens has requested from DEQ. [Amendment No. 1]
46

1 The Certificate Holder will discharge sanitary sewage to an engineered septic tank and
2 drain field at a rate of about 500 gallons per day, as permitted by a Water Pollution
3 Control Facilities permit. The Certificate Holder will route storm water from roofs and
4 paved areas to pervious areas to percolate into the shallow groundwater.
5

6 **C.1.b. Related or Supporting Facilities**

7 The energy facility will include the following related or supporting facilities:
8

9 **Natural Gas Pipelines.** Natural gas will fuel the combustion turbine generators and duct
10 burners. The energy facility will be served by the Kelso-Beaver Pipeline, an existing
11 FERC-regulated interstate pipeline with a current capacity of 193,000 decatherms per
12 day. PGE owns the pipeline jointly with two other parties. To create the additional
13 capacity that will be required to serve the energy facility, PGE will add 1,000 to 7,000
14 compressor horsepower to the Port Westward site and/or up to 8,000 compressor
15 horsepower to the Kelso-Beaver Pipeline. All work on the existing pipeline will be
16 subject to FERC approval. The addition of compressor horsepower is intended to ensure
17 300 to 520 psig gas pressure at the Port Westward Industrial Area with total capacity of
18 310 million standard cubic feet/day. [Amendment No. 1]
19

20 The interconnecting pipeline, about 18 inches in diameter, between the existing Kelso-
21 Beaver Pipeline and the energy facility will be about 1,000 feet long and will be installed
22 below grade with appropriate cathodic protection.
23

24 In addition, the facility will include as a related or supporting facility a secondary natural
25 gas pipeline that will connect the energy facility to an extension of the existing 20-inch
26 NW Natural Beaver Lateral. The connecting pipeline will be approximately 2000 feet
27 long and about 12 inches in diameter. The new pipeline will be installed below grade
28 with appropriate cathodic protection. The new pipeline will be owned and operated by
29 NW Natural. [Amendment No. 5]
30

31 **Water Supply Pipeline.** Water supply for the energy facility will be drawn from
32 Bradbury Slough at about River Mile 53.8 of the Columbia River from an existing PGE
33 intake facility for the PGE Beaver Generating Plant. The pump capacity of the existing
34 intake facility will be expanded. No major structural improvements or modifications to
35 the intake facility will be required. However, PGE will upgrade the fish screens to
36 comply with NMFS and ODFW criteria regardless of whether it builds the Port
37 Westward Generating Project. The Certificate Holder will install a water supply pipeline
38 about 20 inches in diameter and 6,000 feet long to convey water from the intake facility
39 to the energy facility. The water supply pipeline will traverse upland areas and will avoid
40 wetlands. [Amendment No. 1]
41

42 **Chlorination and Electrical Control Buildings.** Two small structures will be
43 constructed on upland south of the intake facility. One structure, with a footprint of about
44 600 square feet, will be for chlorination. The other structure, with a footprint of about 150
45 feet, will be for electrical control. Underground lines in a 25-foot wide corridor will
46 connect these structures to the intake structure. [Amendment No. 3]

1
2 **Wastewater Pipeline.** Process and cooling wastewater discharged from the energy
3 facility will be collected in a settling basin and returned to the Columbia River about one-
4 half mile northwest of the energy facility, pursuant to the Port of St. Helens' NPDES
5 permit. [Amendment No. 1]
6

7 **Utility Lines Between the Energy Facility Site and the PGE Beaver Generating**
8 **Plant.** The Certificate Holder will construct water, backup electricity and
9 communications lines between the existing PGE Beaver Generating Plant and the energy
10 facility. The Certificate Holder will install the lines below ground within existing
11 roadways. Potable water may be conveyed to the energy facility in a pipeline from the
12 potable water storage tank located in the vicinity of the PGE water intake facility that
13 currently serves the PGE Beaver Generating Plant. The potable water pipeline will be
14 about two inches in diameter. The Certificate Holder will install the potable water line
15 underground. The potable water line will join the energy facility's water supply pipeline
16 corridor at their intersection as shown on revised Figure B-2. [Amendment No. 1]
17

18 The Certificate Holder may also construct a demineralized water pipeline about six
19 inches in diameter from the PGE Beaver Generating Plant to the energy facility. If the
20 Certificate Holder constructs the demineralized water pipeline, it will not construct a
21 water treatment building as part of the energy facility. The Certificate Holder will install
22 a backup 13.8 kV electrical distribution line and a communications line in a conduit from
23 the PGE Beaver Generating Plant to the energy facility. The demineralized water line,
24 communications line, and backup electricity lines will be about 1, 200 feet long, and the
25 portion of the potable water line between the potable water storage tank and the water
26 supply pipeline corridor will be about 1,700 feet long [Amendments No. 1 & 3]
27

28 **Temporary Construction Staging and Laydown Areas.** Temporary construction
29 staging and laydown areas totaling approximately 12.4 acres will be located around the
30 energy facility site. Another laydown area of about 6 acres will be located on upland
31 south of the existing PGE water intake structure. The areas will be used for storing
32 equipment and materials and as staging areas for constructing the power plant.
33 Construction laydown and staging areas are as depicted on Figure B-2 rev.1, submitted
34 with the Fourth Request for Amendment on January 18, 2006. [Amendment No. 4]
35

36 **Spoils Disposal Area.** Excess soils from construction at the energy facility site will be
37 spread across the spoils disposal site of about 11.6 acres, which will be located southeast
38 of the PGE Beaver Generating Plant. [Amendment No. 3].
39

40 **Electric Transmission Line.** The energy facility will deliver electric power to the
41 regional grid by means of a new transmission line consisting of one 230 kV circuit on
42 monopole towers (up to 120 feet high) routed along existing power line easements. There
43 are two transmission line alternatives routes under consideration, with two other short
44 alternative segments in the vicinity of the BPA Allston Substation:
45

1 Alternative One. The first alternative will entail routing the transmission line from
2 the energy facility to the Bonneville Power Administration (“BPA”) Allston
3 Substation near Alston, Oregon (a distance of about 10 miles).
4

5 Alternative Two. The second alternative will entail routing the transmission line
6 from the energy facility to the PGE Trojan Substation near Goble, Oregon (a
7 distance of about 20 miles).
8

9 PWGP and the Summit Project present a unique situation regarding the transmission lines
10 for their facilities. The two proposed energy projects will be located close to each other
11 and will use the same existing transmission corridor and the same towers from Port
12 Westward to the vicinity of the BPA Allston Substation, Alternative One. The towers will
13 be double-circuited, with PWGP on one side and the Summit Project on the other.
14

15 The Portland General Electric Transmission Group will build the transmission lines for
16 either or both projects, depending on which energy facilities are eventually constructed.
17 The transmission line for each project is a related or supporting facility for that project,
18 and therefore, must be built to Council standards. However, because the Council is
19 reviewing the applications for both projects simultaneously, because they will use the
20 same towers, and because the same company will build and operate the transmission
21 lines, the Council has consolidated the reviews within the PWGP proceeding and is
22 placing conditions for the transmission lines in the site certificate for the Port Westward
23 Generating Project.
24

25 Some conditions account for the possibility that the Certificate Holder may construct the
26 Port Westward to BPA Allston Substation Transmission Line separately from
27 constructing the energy facility. Additionally, if the Certificate Holder for PWGP does
28 not construct the energy facility within the time specified in its Site Certificate or if it
29 terminates its Site Certificate, the Council intends that the Certificate Holder of the
30 Summit Project must amend its Site Certificate to include the 230 kV transmission line
31 from the Summit Project to the BPA Allston Substation.
32

33 **C.2. LOCATION OF THE FACILITY**

34

35 **C.2.a. The Energy Facility Site**

36 The energy facility will be located about seven miles by road northeast of the city of
37 Clatskanie in Columbia County, Oregon. The energy facility site will be located on an
38 approximately 852-acre parcel leased to PGE by the Port of St. Helens in Section 15,
39 Township 8 North, Range 4 West, Willamette Meridian. The energy facility site will be
40 fenced and will comprise about 17.5 acres of the larger parcel. An alternative
41 configuration of the energy facility site excludes a strip 180 feet wide (50 feet south and
42 130 feet north of an existing road across the site). Under this alternative, the Certificate
43 Holder could choose to exclude this strip from the energy facility site for Phase 1. If the
44 strip is excluded during Phase 1, the Certificate Holder shall declare in writing to the
45 Department before beginning construction of Phase 2 whether the energy facility site for
46 Phase 2 includes the 180-foot wide strip. [Amendments No. 1 & 2]

1
2 Bradbury Slough of the Columbia River lies to the northeast of the energy facility site.
3 Access to the energy facility site will be by traveling about 1.5 miles north on Kallunki
4 Road from its intersection with Alston-Mayger Road. The existing PGE Beaver
5 Generating Plant is located about one-half mile southwest of the energy facility site.
6

7 **C.2.b. Related or Supporting Facility Sites**

8 **Natural Gas Pipeline Corridors.** The primary natural gas pipeline will be about 18
9 inches in diameter and will interconnect with the existing Kelso-Beaver Pipeline about
10 1,000 feet west of the energy facility site. The natural gas pipeline corridor will lie within
11 the 852-acre parcel leased to PGE by the Port of St. Helens and situated within Section
12 15, Township 8 North, Range 4 West, Willamette Meridian.
13

14 The secondary natural gas pipeline will be about 12 inches in diameter, extending from
15 the energy facility to an extension of the existing NW Natural Beaver Lateral, near the
16 northeast corner of the Beaver Generating Plant. The related or supporting portion of the
17 new natural gas pipeline corridor will be approximately 2000 feet long and will lie within
18 the 852-acre parcel leased to PGE by the Port of St. Helens and situated within Sections
19 15 and 16, Township 8 North, Range 4 West, Willamette Meridian. [Amendment No. 5]
20

21 **Water Supply Pipeline Corridor.** The proposed water supply pipeline will supply raw
22 water to the energy facility from the existing PGE Beaver Generating Plant water intake
23 structure in Bradbury Slough of the Columbia River. The pipeline right-of-way will be
24 about 50 feet wide and 6,000 feet long, will cover an area of about 7 acres, and will lie
25 within the 852-acre parcel leased to PGE by the Port of St. Helens and situated within
26 Section 15, Township 8 North, Range 4 West, Willamette Meridian.
27

28 **Chlorination and Electrical Control Buildings.** Two small structures will be
29 constructed on upland south of the existing PGE Beaver Generating Plant water intake
30 structure in Bradbury Slough. The two structures, with a combined footprint of about 750
31 square feet, will lie within the 852-acre parcel leased to PGE by the Port of St. Helens
32 and situated within Section 15, Township 8 North, Range 4 West, Willamette Meridian.
33 [Amendment No. 3].
34

35 **Wastewater Pipeline Corridor.** Water discharged from the energy facility will be
36 returned to the Columbia River about one-half mile northwest of the energy facility. The
37 wastewater pipeline corridor will be about 100 feet wide and 2,400 feet long, will cover
38 an area of about 6 acres, and will lie primarily within the 852-acre parcel leased to PGE
39 by the Port of St. Helens and situated within Section 15 and 16, Township 8 North,
40 Range 4 West, Willamette Meridian. [Amendment No. 1]
41

42 **Utility Line Corridor Between the Energy Facility Site and the PGE Beaver**
43 **Generating Plant.** The Certificate Holder will construct a potable water pipeline, backup
44 electricity line, communications line and possibly a demineralized water pipeline from
45 the PGE Beaver Generating Plant or the potable water tank to the energy facility site. It
46 would install the lines a minimum depth of three feet below grade in existing roadways

1 entirely with the 825-acre parcel that the Port of St. Helens has leased to PGE. The parcel
2 is located within Section 15 and 22, Township 8 North, Range 4 West, Willamette
3 Meridian. [Amendment No. 1]
4

5 **Temporary Construction Staging and Laydown Areas.** Temporary construction
6 staging and laydown areas totaling approximately 12.4 acres will be located around the
7 energy facility site, within the 852-acre parcel leased to PGE by the Port of St. Helens
8 and situated within Sections 15 and 16, Township 8 North, Range 4 West, Willamette
9 Meridian. Another laydown area of about 6 acres will be located on upland south of the
10 existing PGE water intake structure within Section 15, Township 8 North, Range 4 West,
11 Willamette Meridian. The areas will be used for storing equipment and materials and as
12 staging areas for constructing the power plant. Construction laydown and staging areas
13 are as depicted on Figure B-2 rev.1 as submitted with the Request for Fourth Amendment
14 on January 18, 2006 [Amendment No. 4]
15

16 **Spoils Disposal Area.** Excess soils from construction at the energy facility site will be
17 spread across the spoils disposal site of about 11.6 acres, which will be located southeast
18 of the PGE Beaver Generating Plant, within the 852-acre parcel leased to PGE by the
19 Port of St. Helens and situated within Sections 15 and 22, Township 8 North, Range 4
20 West, Willamette Meridian. [Amendment No. 3]
21

22 **Transmission Line Corridor.** The transmission line will follow one of two alternative
23 routes:
24

25 Alternative One. Under this alternative, the energy facility will deliver electric
26 power to the BPA Allston Substation near Alston, Oregon, by means of a new
27 230-kV circuit on monopole steel structures, except where it will have to cross the
28 existing BPA lines. A separate 230 kV circuit will carry the output of the Summit
29 Project on the same structures, as noted above. The new transmission line will be
30 routed on an existing PGE right-of-way that is 250 feet wide, except at the BPA
31 Allston Substation where a new right-of-way may be required. The structures will
32 be placed on or near the centerline of the unused north half of the right-of-way.
33 The transmission line corridor will be about 125 feet wide and 10 miles long, will
34 occupy an area of about 300 acres, and will pass through Sections 15, 22, 23, 26,
35 35 and 36, Township 8 North, Range 4 West, and Sections 31, 5, 6, 4, 3 and 10,
36 Township 7 North, Range 3 West, Willamette Meridian.
37

38 Alternative Two. Under this alternative, the energy facility will deliver electric
39 power to Trojan near Goble, Oregon, by means of a new 230-kV circuit on
40 monopole steel structures. Between PWGP and the BPA Allston Substation, the
41 new transmission line will be routed on an existing PGE right-of-way 250 feet
42 wide as described in Alternative One. The structures will be placed on or near the
43 centerline of the unused north half of the right-of-way. Between the BPA Allston
44 Substation and Trojan, the new transmission line will run parallel to an existing
45 BPA transmission line. This section of the transmission line corridor will be about
46 125 feet wide and ten miles long, will occupy an area of about 300 acres, and will

1 pass through Sections 10, 11, 15, 14, 23 and 24, Township 7 North, Range 3
2 West, and Sections 19, 30, 29, 28, 33 and 34, Township 7 North, Range 2 West,
3 and Sections 3 and 2, Township 6 North, Range 2 West, Willamette Meridian.
4

5 Alternates 3 and 4. These short alternate segments are in the vicinity of the BPA
6 Allston Substation. They provide flexibility for interconnecting with the
7 substation.
8

9 Unanalyzed Options. As shown on Figure C-2 of the ASC, and in particular the
10 enlarged detail of the BPA Allston Substation, there is a segment of Alignment 1
11 identified as “2nd (future) circuit.” This Site Certificate does not address that
12 proposed segment of Alignment 1.
13

14 **D. COUNCIL SITING STANDARDS**

15 **D.1. [PLACEHOLDER]**

16 [No Conditions]
17

18 **D.2. ORGANIZATIONAL EXPERTISE**

- 19
- 20 (1) The Certificate Holder shall report to the Department of Energy (“Department”)
21 in a timely manner any change in the ownership of Portland General Electric
22 Company (“PGE”).
23
 - 24 (2) Before beginning construction of the energy facility, the Port Westward to
25 Bonneville Power Administration (“BPA”) Allston Substation Transmission Line,
26 or other related or supporting facilities, the Certificate Holder shall identify to the
27 Energy Facility Siting Council (“Council”) whom it has chosen to act in the role
28 of the engineering, procurement and construction (“EPC”) contractor(s) for
29 specific portions of the work.
30
 - 31 (3) If the Certificate Holder chooses a third-party contractor to operate the facility,
32 the Certificate Holder shall submit to the Council the identity of the contractor so
33 the Council may review the qualifications and capability of the contractor to meet
34 the standards of OAR 345-0022-0010. If the Council finds that a new contractor
35 meets these standards, the Council shall not require an amendment to the Site
36 Certificate for the Certificate Holder to hire the contractor.
37
 - 38 (4) Any matter of non-compliance under this Site Certificate shall be the
39 responsibility of the Certificate Holder. Any notice of violation issued under the
40 Site Certificate will be issued to the Certificate Holder. Any civil penalties levied
41 shall be levied on the Certificate Holder.
42
 - 43 (5) The Certificate Holder shall contractually require the EPC contractor(s) and all
44 independent contractors and subcontractors involved in the construction and
45 operation of the facility to comply with all applicable laws and regulations and
46

1 with the terms and conditions of the Site Certificate. Such contractual provision
2 shall not operate to relieve the Certificate Holder of responsibility under the Site
3 Certificate.
4

5 (6) The Certificate Holder shall obtain necessary state and local permits or approvals
6 required for the construction, operation and retirement of the facility or ensure
7 that its contractors obtain the necessary state and local permits or approvals.
8

9 (7) Before beginning construction of the energy facility, the Certificate Holder shall
10 deliver to the Department a copy of the agreement between the Certificate Holder
11 and the Port of St. Helens that provides that the Certificate Holder may use up to
12 8.3 cubic feet per second of the water right held by the Port of St. Helens under
13 Permit to Appropriate the Public Waters, issued by the State of Oregon, Water
14 Resources Department, Permit No. 53677. [Amendment No. 1]
15

16 (8) Before beginning construction of the energy facility, the Certificate Holder shall
17 deliver to the Department evidence that the Oregon Department of Environmental
18 Quality has issued to the Port of St. Helens a National Pollutant Discharge
19 Elimination System (“NPDES”) permit that provides for the discharge of non-
20 sanitary wastewater from the Port Westward Industrial Site, including all non-
21 sanitary wastewater produced by the energy facility.
22

23 (9) Before beginning construction of the energy facility, the Certificate Holder shall
24 deliver to the Department a copy of the agreement between the Certificate Holder
25 and the Port of St. Helens that provides for discharge of non-sanitary wastewater
26 from the energy facility by means of the NPDES permit issued to the Port of St.
27 Helens.
28

29 **D.3. RETIREMENT AND FINANCIAL ASSURANCE**

30
31 (1) The Certificate Holder shall retire the facility if the Certificate Holder
32 permanently ceases construction or operation of the facility. The Certificate
33 Holder shall retire the facility according to a final retirement plan approved by the
34 Council, as described in OAR 345-027-0110, and prepared pursuant to Condition
35 D.3(2).
36

37 (2) Two years before closure of the energy facility, the Certificate Holder shall
38 submit to the Department a proposed final retirement plan for the facility and site,
39 pursuant to OAR 345-027-0110, including:
40

41 (a) A plan for retirement that provides for completion of retirement within
42 two years of permanent cessation of operation of the energy facility and
43 that protects the public health and safety and the environment;
44

45 (b) A description of actions the Certificate Holder proposes to take to restore
46 the site to a useful, non-hazardous condition; and,

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(c) A detailed cost estimate, a comparison of that estimate with the dollar amount secured by a bond or letter of credit and any amount contained in a retirement fund, and a plan for assuring the availability of adequate funds for completion of retirement.

(3) The Certificate Holder shall prevent the development of any conditions on the site that would preclude restoration of the site to a useful, non-hazardous condition to the extent that prevention of such site conditions is within the control of the Certificate Holder.

(4) A retirement plan that the Certificate Holder submits may provide transmission lines constructed and operated under this Site Certificate remain in operation to serve other energy facilities. [Amendment No. 3]

(5) Before beginning construction of the energy facility, the Certificate Holder shall submit to the State of Oregon, through the Council, a bond or letter of credit in the amount of \$4,938,800 (in 2004 dollars as of the fourth quarter) naming the State of Oregon, acting by and through the Council, as beneficiary or payee. [Amendment No. 3]

(a) If the Certificate Holder develops the energy facility in phases, then before beginning construction of Phase 1, the Certificate Holder shall submit a bond or letter of credit in the amount of \$3,698,000 (in 2004 dollars as of the fourth quarter). Before beginning construction of Phase 2, the Certificate Holder shall increase the amount of such bond or letter of credit to \$4,938,800 (in 2004 dollars as of the fourth quarter). [Amendments No. 1 & 3]

(b) [Deleted]. [Amendment No. 3]

(c) [Deleted]. [Amendments No. 1 & 3]

(d) The form of the bond or letter of credit and identity of the issuer shall be subject to approval by the Council.

(e) The Certificate Holder shall maintain a bond or letter of credit in effect at all times until the energy facility or the Port Westward to BPA Allston Substation Transmission Line has been retired, as appropriate.

(f) The calculation of 2004 dollars (or 2002 dollars or 2009 dollars in the case of the rate applicable to carbon dioxide emissions monetary path payment requirements) shall be made using the U.S. Gross Domestic Product Implicit Price Deflator, Chain-Weight, as published in the Oregon Department of Administrative Services' "Oregon Economic and Revenue Forecast," or by any successor agency (the "Index"). If at any time the

1 Index is no longer published, the Council shall select a comparable
2 calculation of 2002, 2004 and 2009 dollars. [Amendments No. 3 & 6]
3

4 (g) The amount of the bond or letter of credit account shall increase annually
5 by the percentage increase in the Index.
6

7 (h) The Certificate Holder shall not revoke or reduce the bond or letter of
8 credit before retirement of the facility without approval by the Council.
9

10 (6) The Certificate Holder shall describe in the annual report submitted to the
11 Council, pursuant to OAR 345-026-0080, the status of the retirement fund
12 or other instrument to ensure it has adequate funds to restore the site.
13

14 (7) Before beginning construction of the energy facility, the Certificate Holder shall
15 prepare and submit to the Department a materials management and monitoring
16 plan that addresses the handling of hazardous substances, the measures it will
17 implement to prevent site contamination, and how it will document
18 implementation of the plan during construction. The materials management and
19 monitoring plan shall be subject to approval by the Department. For the purpose
20 of this condition and Conditions D.3(8), D.3(10), D.3(11), and D.3(12) below, the
21 terms “release” and “hazardous substances” shall have the meanings set forth at
22 ORS 465.200.
23

24 (8) Before beginning operation of the energy facility, the Certificate Holder shall
25 prepare and submit to the Department a materials management and monitoring
26 plan that addresses the handling of hazardous substances, the measures it will
27 implement to prevent site contamination, and how it will document
28 implementation of the plan during operation. The materials management and
29 monitoring plan shall be subject to approval by the Department.
30

31 (9) Not later than 10 years after the date of commercial operation of Phase 1 of the
32 energy facility, and each 10 years thereafter during the life of the energy facility,
33 the Certificate Holder shall complete an independent Phase I Environmental Site
34 Assessment of the energy facility site. Within 30 days after its completion, the
35 Certificate Holder shall deliver the Phase I Environmental Site Assessment report
36 to the Department. [Amendment No. 1]
37

38 (10) In the event that any Phase I Environmental Site Assessment identifies improper
39 handling or storage of hazardous substances or improper record keeping
40 procedures, the Certificate Holder shall correct such deficiencies within six
41 months after completion of the corresponding Phase I Environmental Site
42 Assessment. It shall promptly report its corrective actions to the Department. The
43 Council shall determine whether the corrective actions are sufficient.
44

45 (11) The Certificate Holder shall report any release of hazardous substances, pursuant
46 to DEQ regulations, to the Department within one working day after the discovery

1 of such release. This obligation shall be in addition to any other reporting
2 requirements applicable to such a release.
3

4 (12) If the Certificate Holder has not remedied a release consistent with applicable
5 Oregon Department of Environmental Quality standards or if the Certificate
6 Holder fails to correct deficiencies identified in the course of a Phase I
7 Environmental Site Assessment within six months after the date of the release or
8 the date of completion of the Phase I Environmental Site Assessment, the
9 Certificate Holder shall submit within such six-month period to the Council for its
10 approval an independently prepared estimate of the additional cost of remediation
11 or correction.
12

13 (a) Upon approval of an estimate by the Council, the Certificate Holder shall
14 increase the amount of its bond or letter of credit by the amount of the
15 estimate.
16

17 (b) In no event, however, shall the Certificate Holder be relieved of its
18 obligation to exercise all due diligence in remedying a release of
19 hazardous substances or correcting deficiencies identified in the course of
20 a Phase I Environmental Site Assessment.
21

22 (13) All funds received by the Certificate Holder from the salvage of equipment and
23 buildings shall be committed to the restoration of the energy facility site to the
24 extent necessary to fund the approved site restoration and remediation.
25

26 (14) The Certificate Holder shall pay the actual cost to restore the site to a useful, non-
27 hazardous condition at the time of retirement, notwithstanding the Council's
28 approval in the Site Certificate of an estimated amount required to restore the site.
29

30 (15) If the Council finds that the Certificate Holder has permanently ceased
31 construction or operation of the facility without retiring the facility according to a
32 final retirement plan approved by the Council, as described in OAR 345-027-0110
33 and prepared pursuant to Condition D.3(2), the Council shall notify the Certificate
34 Holder and request that the Certificate Holder submit a proposed final retirement
35 plan to the Department within a reasonable time not to exceed 90 days.
36

37 (a) If the Certificate Holder does not submit a proposed final retirement plan
38 by the specified date or if the Council rejects the retirement plan that the
39 Certificate Holder submits, the Council may direct the Department to
40 prepare a proposed a final retirement plan for the Council's approval.
41

42 (b) Upon the Council's approval of the final retirement plan prepared pursuant
43 to subsection (a), the Council may draw on the bond or letter of credit
44 described in Condition D.3(5) and shall use the funds to restore the site to
45 a useful, non-hazardous condition according to the final retirement plan, in

1 addition to any penalties the Council may impose under OAR Chapter
2 345, Division 29.

3
4 (c) If the amount of the bond or letter of credit is insufficient to pay the actual
5 cost of retirement, the Certificate Holder shall pay any additional cost
6 necessary to restore the site to a useful, non-hazardous condition.

7
8 (d) After completion of site restoration, the Council shall issue an order to
9 terminate the Site Certificate if the Council finds that the facility has been
10 retired according to the approved final retirement plan.

11
12 **D.4. LAND USE**

13
14 (1) Before beginning construction of the energy facility, the Certificate Holder shall
15 submit a landscaping plan for the energy facility to Columbia County as part of its
16 building permit application for the energy facility. The landscaping plan shall be
17 subject to County approval, provided that the plan is consistent with this Site
18 Certificate and the Final Order. The Certificate Holder shall implement the
19 landscaping plan.

20
21 (2) Before beginning construction of the energy facility, the Certificate Holder shall
22 submit a site plan to Columbia County as part of its building permit application.

23
24 (3) Before beginning construction of the energy facility, the Certificate Holder shall
25 submit to Columbia County as part of its building permit application for the
26 energy facility a final parking lot plan that complies with Section 1400 of the
27 Columbia County Zoning Ordinance. The parking plan shall be consistent with
28 this Site Certificate and Attachment D of the Final Order. The Certificate Holder
29 shall implement the parking lot plan.

30
31 (4) Before beginning construction of the energy facility or the Port Westward to BPA
32 Allston Substation Transmission Line, as appropriate, the Certificate Holder shall
33 apply for and obtain all appropriate land use permits from Columbia County and
34 the City of Rainier.

35
36 (5) Before beginning construction of the energy facility, the Certificate Holder shall
37 enter into a written contract with Columbia County that recognizes the rights of
38 land owners who are adjacent to and nearby the corridor for the transmission line
39 from the BPA Allston Substation to the Trojan Nuclear Plant where it crosses PF-
40 76 and FA-19 zones to conduct forest operations consistent with the Forest
41 Practices Act and Rules for uses authorized in OAR 660-006-0025, subsections
42 (4)(e), (m), (s), (t), and (w).

43
44 **D.5. STRUCTURAL STANDARD**

- 1 (1) The Certificate Holder shall design, engineer and construct the facility to avoid
2 dangers to human safety presented by seismic hazards affecting the site that are
3 expected to result from all maximum probable seismic events. In no event shall
4 the recommended seismic design parameters be any less than those prescribed by
5 the Oregon Uniform Building Code. As used in this condition, "seismic hazard"
6 includes ground shaking, landslide, liquefaction, lateral spreading, tsunami
7 inundation, fault displacement, and subsidence.
8
- 9 (2) If the Certificate Holder does not have subsurface information for design of the
10 transmission lines that is acceptable to the Department and the Oregon
11 Department of Geology and Mineral Industries ("DOGAMI"), then the Certificate
12 Holder shall drill exploratory borings at critical locations during final design of
13 the proposed transmission lines.
14
- 15 (3) Before beginning construction of the facility, the Certificate Holder shall provide
16 the Department and DOGAMI with a report containing results of geotechnical
17 investigations and recommendations for the design of the energy facility,
18 transmission lines and other related or supporting facilities.
19
- 20 (a) The Certificate Holder shall prepare the report consistent with the study
21 designs detailed in the Section D.5 of the Final Order and Section H.3 the
22 Application for a Site Certificate ("ASC").
23
- 24 (b) If DOGAMI is not able to review the reports, the Department shall
25 arrange, in consultation with DOGAMI, for an independent review of the
26 report by a qualified registered geologist.
27
- 28 (c) If the Certificate Holder begins construction of the Port Westward to BPA
29 Allston Substation Transmission Line before beginning construction of
30 other parts of the facility, Condition D.5(3) shall apply only to the Port
31 Westward to BPA Allston Substation Transmission Line as long as it is
32 the only part of the facility under construction.
33
- 34 (4) In addition to, or concurrent with Condition D.5(3), before beginning construction
35 within the City of Rainier's Watershed zone, the Certificate Holder shall submit to
36 the City of Rainier, the Department and DOGAMI a geotechnical report prepared
37 by a registered engineer establishing that it can safely accomplish any
38 construction in a known slide hazard area, flood hazard area, or drainage way, or
39 on slopes exceeding 20 percent in that zone.
40
- 41 (5) If the geotechnical investigation reveals evidence that is not described in the ASC,
42 the Certificate Holder shall revise the facility design parameters to comply with
43 appropriate Uniform Building Code requirements.
44
- 45 (6) The Certificate Holder shall notify the Department, the State Building Codes
46 Division and DOGAMI promptly if site investigations or trenching reveals that

1 subsurface conditions differ significantly from those described in the ASC. After
2 the Department receives the notice, the Council may require the Certificate
3 Holder to consult with DOGAMI and the Building Codes Division and to propose
4 mitigation actions.

5
6 (7) The Certificate Holder shall notify the Department, the Building Codes Division
7 and DOGAMI promptly if shear zones, artesian aquifers, deformations, or clastic
8 dikes are found at or in the vicinity of the facility site.

9
10 (8) The Certificate Holder shall design, engineer and construct the facility to avoid
11 dangers to human safety presented by non-seismic or aseismic hazards affecting
12 the site. As used in this condition, “non-seismic or aseismic hazards” includes
13 settlement, landslides, groundwater, flooding, and erosion.

14
15 (9) The secondary gas supply pipeline constructed and operated by NWN shall be
16 designed to accommodate the potential for different settlement and seismic
17 induced differential deformation, particularly where the pipeline connects to the
18 existing supply line

19
20 **D.6. SOIL PROTECTION**

21
22 (1) Upon completion of construction in an area, the Certificate Holder shall use
23 native seed mixes to restore vegetation to the extent practicable and shall
24 landscape portions of the site disturbed by construction in a manner compatible
25 with the surroundings and proposed use. Conditions D.6(1) through D.6(6) shall
26 apply to all soil disturbing activities, including maintenance, repair,
27 reconstruction, and retirement of facilities. [Amendment No. 1]

28
29 (2) The Certificate Holder shall employ the following measures to control soil
30 erosion and sediment runoff by water and wind erosion:

31
32 (a) Avoid excavation and other soil disturbances beyond that necessary for
33 construction of the facility or confine equipment use to specific areas.

34
35 (b) Remove vegetation only as necessary.

36
37 (c) Apply water or mulch, as necessary, for wind erosion control during
38 construction.

39
40 (d) Revegetate those construction areas that will no longer be used.

41
42 (e) Use temporary erosion and sediment control measures, such as sediment
43 fences, straw wattles, bio-filter bags, mulch, permanent and temporary
44 seeding, sediment traps and/or basins, rock check dams or gravel filter
45 berms, and gravel construction entrances, and maintain these features

1 throughout construction and restoration to reduce the potential for soil
2 erosion and sediment runoff.

3
4 (f) Protect soil stockpiles with mulch and plastic sheeting.

5
6 (3) If excessively wet conditions occur during construction, the Certificate Holder
7 shall limit construction activities during such periods to the degree practicable in
8 areas susceptible to soil compaction.

9
10 (4) After completing construction in an area, the Certificate Holder shall monitor the
11 construction area for a period of 12 months to evaluate whether construction-
12 related impacts to soils are being adequately addressed by the mitigation
13 procedures described in the Sediment Erosion and Control Plan. It shall submit its
14 quality assurance measures to the Department for approval before beginning
15 monitoring.

16
17 (5) After completing construction in an area, the Certificate Holder shall use the
18 results of the monitoring program in Condition D.6(4) to identify remaining soil
19 impacts associated with construction that require mitigation. As necessary, the
20 Certificate Holder shall implement follow-up restoration measures to address
21 those remaining impacts and shall report in a timely manner to the Department
22 what measures it has taken.

23
24 (6) The Certificate Holder shall remove trapped sediment when the capacity of the
25 sediment trap has been reduced by 50 percent and shall place such sediment in an
26 upland area certified by a qualified wetland specialist.

27
28 (7) The Certificate Holder shall contain all fuel and chemical storage in paved spill
29 containment areas with a curb.

30
31 (8) The Certificate Holder shall design all inside spill containment areas to hold at
32 least 110 percent of the volume of liquids stored within them.

33
34 (9) The Certificate Holder shall design all spill containment areas located outdoors to
35 hold at least 110 percent of the volume of liquids stored within them, together
36 with the volume of precipitation that might accumulate during the 100-year return
37 frequency storm.

38
39 (10) During operation, the Certificate Holder shall minimize drift from the cooling
40 towers through the use of high efficiency drift eliminators that allow no more than
41 0.002 percent drift.

42
43 **D.7. PROTECTED AREAS**

44 [No Conditions]

1 **D.8. FISH AND WILDLIFE HABITAT**

2
3 (1) The Certificate Holder shall, to the extent practicable, avoid and, where avoidance
4 is not possible, minimize construction and operation disturbance to areas of native
5 vegetation and areas that provide important wildlife habitat. With respect to
6 construction of the facility, the Certificate Holder shall mitigate possible impacts
7 to wildlife by measures including, but not limited to, the following:

8
9 (a) Posting speed limit signs throughout the energy facility construction zone.

10
11 (b) Instructing construction personnel, including construction contractors and
12 their personnel, on sensitive wildlife of the area and on required
13 precautions to avoid injuring or destroying wildlife.

14
15 (c) Instructing construction personnel, including construction contractors and
16 their personnel, to watch out for wildlife while driving through the facility
17 site, to maintain reasonable driving speeds so as not to harass or strike
18 wildlife accidentally, and to be cautious and drive at slower speeds in a
19 period from one hour before sunset to one hour after sunrise when some
20 wildlife species are the most active.

21
22 (d) Requiring construction personnel, including construction contractors and
23 their personnel, to report any injured or dead wildlife detected at the
24 facility site.

25
26 (2) The Certificate Holder shall construct, operate and retire the facility to minimize
27 impacts to vegetation and habitat.

28
29 (a) The energy facility shall be located within previously disturbed Habitat
30 Category 6, non-native grassland Habitat Category 4, and palustrine
31 emergent and forested/scrub-shrub wetlands Habitat Category 3.

32
33 (b) The Certificate Holder shall limit Habitat Category 3 impacts to 0.43 acres
34 of permanent impact within palustrine emergent and forested/scrub-shrub
35 wetlands.

36
37 (3) The Certificate Holder shall site transmission towers outside wetlands and
38 waterways to the greatest extent practicable. If the Certificate Holder must site
39 transmission towers in riparian zones or wetlands, the Certificate Holder shall use
40 a monopole design for the transmission towers to minimize ground impacts and
41 vegetation control, except where it would have to cross the existing BPA lines.

42
43 (4) The Certificate Holder shall prohibit construction and maintenance equipment
44 from entering perennial and intermittent streams, except as follows:

45
46 (a) Construction equipment may cross a stream if it is dry;

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(b) Construction equipment may cross streams that are not dry by using temporary structures to bridge the stream in a manner that minimizes disturbance to the bed, banks and water of the stream;

(c) Construction equipment may cross a wet stream if the Certificate Holder notifies the Division of State Lands, the Oregon Department of Fish and Wildlife (“ODFW”) and the Department of its intent to cross the stream prior to the crossing and these agencies concur that the crossing is acceptable.

(A) The Certificate Holder shall return any stream bed or bank that it disturbs during construction or maintenance to conditions that are comparable to pre-disturbed conditions, including stabilizing the bed and banks and revegetating the riparian area with appropriate plant species.

(B) The Certificate Holder shall construct wet stream crossings within the ODFW-designated in-water work period.

(C) The Certificate Holder shall keep the wet stream crossing width to the minimum needed.

(5) The Certificate Holder shall take advantage of existing roads to the extent practicable.

(6) Before beginning construction of the energy facility or beginning construction of the transmission lines, and in the appropriate season, the Certificate Holder shall conduct wildlife surveys within 0.25 miles of the site to locate great blue heron rookeries. Should it locate rookeries, the Certificate Holder shall consult with ODFW and the Department to determine the action necessary to avoid adverse impacts. If it cannot avoid impacts, the Certificate Holder shall suspend construction in the affected areas during the critical nesting period of the species, as determined by the Department in consultation with ODFW.

(7) Should operation of the energy facility diminish the quality of nesting habitat for bald eagles on Crims Island, the Certificate Holder shall mitigate that impact in order to provide no net loss of habitat, plus a net benefit of habitat quality.

(a) The Certificate Holder shall mitigate to compensate for any loss in habitat quality if, within three complete bald eagle breeding seasons after beginning commercial operation of the energy facility, studies indicate that there has been a negative impact to habitat quality at the bald eagle nest site.

- 1 (b) The Certificate Holder shall collect and provide accurate and timely
2 information to the Department and ODFW on the status (e.g., active or
3 inactive; successful or unsuccessful) of the bald eagle nest site throughout
4 three complete bald eagle breeding seasons after beginning commercial
5 operation of the energy facility.
6
- 7 (c) The Certificate Holder shall consult with the Department and ODFW to
8 develop a standardized set of procedures for 1) monitoring the nest site, 2)
9 ensuring that the data collected are sufficient for assessing any impact to
10 habitat quality, and 3) ensuring that the data are reported in a timely
11 manner.
12
- 13 (d) The Certificate Holder, in consultation with the Department and ODFW,
14 shall use the monitoring data to assess whether an impact to habitat quality
15 has occurred.
16
- 17 (e) If the Department, in consultation with ODFW, determines that a negative
18 impact to habitat quality has occurred as a result of operating the energy
19 facility during the monitoring period, the Certificate Holder shall consult
20 with the Department and ODFW to develop an appropriate mitigation
21 strategy to meet the mitigation goal for Habitat Category 2.
22
- 23 (f) The Certificate Holder shall fund and implement the mitigation strategy
24 within two years of the Department's determination that a negative impact
25 to the habitat quality for the nesting bald eagles has occurred from
26 operation of the energy facility. [Amendments No. 1 & 3]
27
- 28 (8) Before beginning construction of the facility, the Certificate Holder shall conduct
29 pre-construction surveys within the analysis area and establish construction
30 buffers around raptor nests during the nesting season, as approved by ODFW. If it
31 is not practical for the Certificate Holder to avoid the nests of non-listed,
32 threatened or endangered raptor species, the Certificate Holder shall implement in
33 a timely manner a mitigation project approved by ODFW that meets the
34 requirements of the Habitat Mitigation policy for "no net loss" appropriate to the
35 Habitat Category. An exception to this is the artificial nesting platform located
36 adjacent to the energy facility site that was installed by Clatskanie PUD to deter
37 ospreys from nesting on a nearby PUD power pole. Protection buffers or other
38 restrictions and mitigation do not apply to this artificial nesting site and are not
39 required by ODFW. [Amendment No. 3]
40
- 41 (9) The Certificate Holder shall schedule construction at the existing raw water intake
42 pump station to avoid the purple martin nesting season (April 1 through June 30).
43 Before beginning construction at the existing raw water intake pump station, the
44 Certificate Holder shall conduct a survey to determine the exact location of any
45 purple martin nests. Should the Certificate Holder cause unavoidable impacts to
46 occur to any purple martin nest, it shall construct, install and maintain an artificial

- 1 nest site at a nearby location. It shall pick an appropriate location in consultation
2 with ODFW and the Department.
3
- 4 (10) When working around riparian areas or waterways, the Certificate Holder shall
5 use only herbicide labeled for use in those areas. The Certificate Holder shall
6 abide by all labeling instructions when using herbicides for vegetation
7 maintenance associated with the energy facility and transmission lines rights-of-
8 way.
9
- 10 (11) The Certificate Holder shall locate chemical storage, servicing of construction and
11 maintenance equipment and vehicles, and overnight storage of wheeled vehicles
12 at least 330 feet from any wetland or waterway.
13
- 14 (12) The Certificate Holder shall not construct any structure other than fences, signs
15 and the water supply pipeline within 50 feet of any Class I river, stream or the
16 emergent vegetation adjacent to such a river or stream or within 25 feet of any
17 other rivers, streams, and sloughs or the emergent vegetation adjacent to such a
18 river, stream, or slough or within the riparian corridors established under
19 Columbia County Zoning Ordinance Section 1172, as appropriate for the local
20 jurisdiction. [Amendment No. 2]
21
- 22 (13) To mitigate for impacts to 19 acres of non-native grassland, the Certificate Holder
23 shall protect 19 acres of on-site emergent wetland habitat identified in the ASC by
24 execution of a conservation easement for the life of the energy facility. Before
25 beginning construction of Phase 1 of the energy facility, the Certificate Holder
26 shall provide a copy of the conservation easement or similar conveyance to the
27 Department. [Amendment No. 1]
28
- 29 (14) The Certificate Holder shall restore temporary upland and wetland disturbance
30 areas by returning the areas to their original grade and seeding, with appropriate
31 seed mixes as recommended by ODFW and as shown in Table P-7 (ASC, Exhibit
32 P, page P-34), and by mulching the areas with straw. The Certificate Holder shall
33 obtain ODFW and Department concurrence before changing the proposed seed
34 mix.
35
- 36 (15) The Certificate Holder shall not clear any more riparian vegetation than is
37 necessary for the permitted land use, including clearing required for safety
38 purposes, during construction or operation of the facility.
39
- 40 (16) During construction of the transmission line(s) and maintenance of the rights-of-
41 way, the Certificate Holder shall limit clearing of vegetation in riparian areas and
42 wetlands to that needed to prevent contact with the transmission line and to meet
43 clearance standards for safety and transmission line reliability, as provided in the
44 appropriate sections of the National Electrical Code. [Amendment No. 2]
45

- 1 (17) The Certificate Holder shall mitigate for impacts to riparian shrub and forest
2 habitat that result in canopy cover of less than 25 percent by revegetating these
3 areas with appropriate native woody species according to the Typical
4 Revegetation Plan (ASC, Exhibit Q, page Q-6.1).
5
- 6 (18) The Certificate Holder shall, as soon as practicable and appropriate after
7 completing construction in an area, implement the mitigation measures specified
8 in Conditions D.8(13), D.8(14) and D.8(17).
9
- 10 (19) The Certificate Holder shall monitor revegetated areas for a period of five years
11 and shall ensure that new vegetation has an 80 percent survival rate.
12
- 13 (20) The Certificate Holder shall monitor and control nuisance and invasive plant
14 species annually for a period of five years in areas where vegetation removal
15 and/or revegetation has occurred in (1) riparian areas and wetlands along the
16 transmission line rights-of-way, and (2) in areas temporarily disturbed by
17 construction of the raw water, gas, and process water discharge lines, in the
18 temporary construction staging and laydown area northwest of the energy facility
19 site, and in the spoils disposal site. [Amendment No. 3]
20
- 21 (21) The Certificate Holder shall submit an annual monitoring report to ODFW and the
22 Department during the five-year monitoring period specified in Condition
23 D.8(20).
24
- 25 (22) Within one year after completion of construction of the facility or the Port
26 Westward to BPA Allston Substation Transmission Line, if constructed
27 separately, the Certificate Holder shall provide a summary report to ODFW and
28 the Department that identifies the revegetation actions it took and the results of
29 revegetation monitoring conducted to that time. If the Certificate Holder
30 constructs the energy facility in phases, the Certificate Holder shall provide the
31 summary report to ODFW and the Department within one year after completion
32 of each phase. [Amendment No. 1]
33
- 34 (23) Within three months after completion of the final annual monitoring survey, the
35 Certificate Holder shall provide a report to ODFW and the Department that
36 presents the results of its revegetation monitoring.
37
- 38 (24) If revegetation is not successful at establishing appropriate plant cover and
39 controlling erosion, the Certificate Holder shall take remedial actions as the
40 Department directs.
41

42 **D.9. THREATENED AND ENDANGERED SPECIES**

43

- 44 (1) Before beginning construction of the transmission line between the BPA Allston
45 Substation and the Trojan Nuclear Plant, the Certificate Holder shall direct
46 qualified personnel to conduct species ground surveys along the transmission line

1 corridor and within 150 feet on either side of the transmission line corridor at the
2 appropriate time of year to determine the presence of listed plant species. If listed
3 plant species are identified in the course of the species ground surveys, their
4 presence shall be noted on maps, and PGE shall provide copies of the maps to the
5 Department and the Department of Agriculture.
6

- 7 (2) During construction of the transmission lines, the Certificate Holder shall
8 manipulate construction equipment and site poles, towers and access roads to
9 avoid impacts, except as provided in Condition D.9(4), to known populations of
10 state- or federally-listed plant species.
11
- 12 (3) The Certificate Holder shall ensure that all maintenance practices along the
13 transmission line corridor minimize impacts to known populations of listed plant
14 species.
15
- 16 (4) In the event the Certificate Holder determines that it cannot avoid known
17 populations of listed plant species, the Certificate Holder shall engage qualified
18 personnel to determine whether the proposed action has the potential to reduce
19 appreciably the likelihood of the survival or recovery of the listed species, notify
20 the Department of its findings, and obtain approval from the Oregon Department
21 of Agriculture before proceeding with construction activities that affect the listed
22 plant species. (OAR 603-073-0090).
23
- 24 (5) Before beginning construction of the transmission line, the Certificate Holder
25 shall employ measures to protect raptors in the design and construction of
26 transmission lines. It shall design all energized transmission conductors with
27 either a minimum separation of nine feet or other measures to reduce the potential
28 for electrocution of raptors or other birds.
29
- 30 (6) The Certificate Holder shall not conduct construction activities at the transmission
31 line terminus at the Trojan Nuclear Plant that generate extreme noise or high
32 levels of visual disturbance during the peregrine falcon critical nesting period
33 from January 1 to June 30. Such activities include pile driving, excavation, and
34 grading for ground stabilization purposes and site preparation. Construction
35 activities involving lower levels of visible activity and less noise are allowed
36 throughout the year. These include such activities as excavating and setting forms,
37 pouring footings, erecting power line towers and bus duct, hanging conductor
38 wires, installing control wires, and testing.
39
- 40 (a) Prior to beginning construction at the terminus site, the Certificate Holder
41 shall provide the Department and ODFW with a final construction
42 schedule that lists various construction activities, and time periods when
43 specific work will be conducted. The schedule shall include information
44 on the types of heavy construction equipment that will be used and the
45 approximate number of workers and shall demonstrate that the
46 construction activities are consistent with the limitations of this condition.

1 The Certificate Holder shall provide scheduling updates as necessary to
2 alert the Department and ODFW ahead of time of any proposed changes in
3 the work schedule should the changes occur during the critical nesting
4 period.
5

6 (b) The Certificate Holder shall monitor peregrine falcon activity at the
7 transmission line terminus at the Trojan Nuclear Plant between January 1
8 to June 30 of construction years. Before beginning construction at the
9 transmission line terminus at the Trojan Nuclear Plant, the Certificate
10 Holder shall coordinate with ODFW and the Department and shall
11 consequently prepare a peregrine falcon contingency plan. This
12 contingency plan shall address actions that the Certificate Holder would
13 undertake in the event that the Department and ODFW determine that
14 monitoring shows the peregrine falcon pair's nesting activities are
15 negatively affected by the transmission line construction activities.
16

17 (c) The Certificate Holder shall not proceed with construction activity at the
18 transmission line terminus at the Trojan Nuclear Plant during the peregrine
19 falcon critical nesting period from January 1 to June 30 to the extent that
20 ODFW or the Department determines that the activity is not consistent
21 with the limitations of this condition. [Amendment No. 3]
22

23 (7) The Certificate Holder shall plant suitable vegetative species for deer forage and
24 cover within the wetland mitigation/enhancement area.
25

26 (8) The Certificate Holder shall coordinate with ODFW about whether to conduct
27 site-specific fish sampling at waterways that do not have confirmation of species
28 presence or absence along the transmission line corridor. If ODFW recommends
29 that the Certificate Holder conduct site-specific sampling, the Certificate Holder
30 shall do so and report the results to ODFW and the Department.
31

32 (9) The Certificate Holder shall not undertake construction at the energy facility site
33 during the bald eagle nesting season unless it obtains a final Biological Opinion
34 and Incidental Take Statement issued by the U.S. Fish and Wildlife Service that
35 addresses potential impacts to the bald eagle nest site on the northwest tip
36 (downstream end) of Crims Island.
37

38 (a) The Certificate Holder shall construct and operate the energy facility
39 consistent with the final Biological Opinion and Incidental Take Statement
40 issued by the U.S. Fish and Wildlife Service.
41

42 (b) If the requirements of the Biological Opinion and Incidental Take
43 Statement conflict with any conditions imposed in this Site Certificate, the
44 Certificate Holder shall consult with the Department and ODFW to
45 resolve the conflicts prior to taking any action in reliance on the Biological
46 Opinion and Incidental Take Statement. [Amendment No. 3]

1
2 **D.10. SCENIC AND AESTHETIC VALUES**
3

- 4 (1) During construction of the facility, the Certificate Holder shall ensure that
5 contractors move equipment out of the construction area when it is no longer
6 expected to be used. To the extent practical, contractors shall lower equipment
7 with long arms, such as cranes, bucket trucks, backhoes, when not in use in order
8 to minimize visibility.
9
- 10 (2) During construction of the facility, the Certificate Holder shall control dust
11 through the application of water.
12
- 13 (3) During construction of the energy facility, the Certificate Holder shall use
14 directing and shielding devices on lights to minimize off-site glare. When there is
15 no nighttime construction activity, the Certificate Holder shall minimize night
16 lighting consistent with safety and security requirements.
17
- 18 (4) During operation of the energy facility, the Certificate Holder shall use directing
19 and shielding devices on lights to minimize off-site glare, consistent with safety
20 and security requirements.
21
- 22 (5) Before beginning construction of the energy facility, the Certificate Holder shall
23 submit to Columbia County and the Department an outdoor lighting plan that
24 shows how it will minimize glare from the energy facility site, consistent with
25 Conditions D.10(3) and D.10(4).
26
- 27 (6) The Certificate Holder shall paint structures with low-glare paint in colors
28 selected to complement the surrounding foreground and background colors.
29
- 30 (7) After completion of construction of related and supporting pipelines in an area,
31 the Certificate Holder shall re-vegetate any undeveloped areas disturbed by
32 construction activities using native species, including grasses, shrubs, and trees. If
33 necessary, the Certificate Holder shall water re-vegetated areas on a regular basis
34 until the plant species have been successfully established.
35

36 **D.11. HISTORIC, CULTURAL AND ARCHAEOLOGICAL RESOURCES**
37

- 38 (1) Before beginning construction of the Port Westward to BPA Allston Substation
39 Transmission Line or the BPA Allston Substation to Trojan Transmission Line,
40 the Certificate Holder shall complete an archaeological survey of the approved
41 transmission line corridors in consultation with the Oregon Historic Preservation
42 Office (“SHPO”), the Confederated Tribes of the Warm Springs Indian
43 Reservation of Oregon, the Confederated Tribes of the Grand Ronde Community
44 of Oregon, the Confederated Tribes of the Siletz Indian Reservation of Oregon,
45 the Chinook Tribe in Washington, and appropriate federal agencies. The
46 Certificate Holder shall ensure that a qualified archaeologist evaluates all cultural

1 resources identified during the cultural resources survey. The Certificate Holder
2 shall report to SHPO and the Department about whether its archaeologist
3 recommends that a discovery is significant or not significant. If SHPO determines
4 that a discovery is significant, the Certificate Holder shall make recommendations
5 to the Council for mitigation in consultation with SHPO, the Department, the
6 tribes, and other appropriate parties. Mitigation measures shall include avoidance
7 or data recovery. [Amendment No. 1]
8

9 (2) During construction of the facility, the Certificate Holder shall ensure that a
10 qualified person instructs construction personnel in the identification of cultural
11 materials.
12

13 (3) During construction of the facility, in the event any artifacts or other cultural
14 materials are identified, the Certificate Holder shall cease all ground-disturbing
15 activities until a qualified archaeologist can evaluate the significance of the find.
16 The Certificate Holder shall report to SHPO and the Department about whether its
17 archaeologist recommends the artifacts or cultural materials are significant or not
18 significant. If SHPO determines that the materials are significant, the Certificate
19 Holder shall make recommendations to the Council for mitigation in consultation
20 with SHPO, the Department, the tribes, and other appropriate parties. Mitigation
21 measures shall include avoidance or data recovery. The Certificate Holder shall
22 not restart work in the affected area until it has demonstrated to the Department
23 that it has complied with the archaeological permit requirements administered by
24 SHPO. [Amendment No. 1]
25

26 (4) The Certificate Holder shall allow monitoring by the Confederated Tribes of the
27 Warm Springs Indian Reservation of Oregon, the Confederated Tribes of the
28 Grand Ronde Community of Oregon, the Confederated Tribes of the Siletz Indian
29 Reservation of Oregon, and the Chinook Tribe in Washington of earth-moving
30 activities within any areas with a potential for containing archaeological remains.
31

32 (5) Before beginning construction of the facility or of the Port Westward to BPA
33 Allston Substation Transmission Line separately, the Certificate Holder shall
34 notify the Confederated Tribes of the Warm Springs Indian Reservation of
35 Oregon, the Confederated Tribes of the Grand Ronde Community of Oregon, the
36 Confederated Tribes of the Siletz Indian Reservation of Oregon, and the Chinook
37 Tribe in Washington and provide their representatives the opportunity to be
38 available for periodic on-site monitoring during construction activities. If the
39 Certificate Holder constructs the energy facility in phases, the Certificate Holder
40 shall notify the Tribes prior to construction of each phase. [Amendment No. 1]
41

42 (6) If construction activities for the secondary gas pipeline occur at a level below the
43 sandy dredge fill (a depth of 10 feet), then the Site Certificate holder or NW
44 Natural shall immediately contact the State Historic Preservation Officer.
45 [Amendment 5]
46

1 **D.12. RECREATION**

2 [No Conditions]

3
4 **D.13. PUBLIC SERVICES**

- 5
- 6 (1) During construction, the Certificate Holder shall hire a contractor to provide
7 chemical toilet services or other appropriate facilities for construction personnel.
8
- 9 (2) The Certificate Holder shall pay to Columbia County or its designee the
10 appropriate Transportation Improvement Contribution (“TIC”) set forth in Section
11 2.1 of the Agreement between Columbia County and Portland General Electric
12 Company dated June 5, 2002 (“Agreement”).
13
- 14 (3) The Certificate Holder shall not agree to amend the Agreement with Columbia
15 County to reduce, revoke or waive the requirement for payment of the appropriate
16 TIC without prior approval of the Council; however, such approval by the
17 Council shall not require an amendment to the Site Certificate.
18
- 19 (4) Before beginning construction of the energy facility, the Certificate Holder shall
20 coordinate with Columbia County the improvement and maintenance of signage
21 and striping at the mainline rail crossing on Kallunki Road, including the
22 installation of “DO NOT STOP ON TRACKS” signs.
23
- 24 (5) If construction of the energy facility occurs concurrently with construction of
25 other projects in the Port Westward Industrial Area, the Certificate Holder shall
26 coordinate with other users of the Port Westward Industrial Area to provide a
27 carpooling program that identifies and/or creates park-and-ride locations to
28 facilitate carpooling.
29
- 30 (6) If construction of the energy facility occurs concurrently with construction of
31 other projects in the Port Westward Industrial Area, the Certificate Holder shall
32 coordinate with Columbia County and other users of the Port Westward Industrial
33 Area on the implementation of a staggered shift schedule if Columbia County
34 determines that traffic conditions warrant it.
35
- 36 (7) During construction of the energy facility, the Certificate Holder shall use barge
37 and railroad deliveries of bulk materials to the extent practicable to minimize the
38 number of freight truck deliveries on local roads.
39
- 40 (8) The Certificate Holder shall construct a fire protection system within the
41 buildings and yard areas of the energy facility site that meets the requirements of
42 the Uniform Fire Code, as amended by Oregon and the National Fire Protection
43 Association standards, and all other applicable fire protection standards in effect
44 at the time of construction.
45

1 (9) The Certificate Holder shall provide a dedicated reserve capacity of 180,000
2 gallons in the raw water storage tank to serve as the fire suppression water source.

3
4 (10) For fire truck access, the minimum inside turning radius of curves in the road
5 system on the energy facility site shall be 40 feet.

6
7 **D.14. WASTE MINIMIZATION, OAR 345-022-0120**

8
9 (1) During construction, operation and retirement of the energy facility, the
10 Certificate Holder shall separate recyclable materials from the solid waste stream
11 to the extent practicable, store those materials on site until sufficient quantities
12 exist to make recycling economic, and periodically deliver or sell those materials
13 to a recycling facility.

14
15 (2) During construction, operation and retirement of the energy facility, the
16 Certificate Holder shall segregate all used oil, mercury-containing lights, and
17 lead-acid and nickel-cadmium batteries, store such materials on site, and deliver
18 such materials to a recycling firm specializing in the proper disposal of such
19 materials.

20
21 (3) Upon completion of construction, the Certificate Holder shall dispose of all
22 temporary structures not required for facility operation and all timber, brush,
23 refuse, and flammable or combustible material resulting from clearing of land and
24 construction of the facility.

25
26 (4) During operation of the energy facility, the Certificate Holder shall convey all
27 storm water and water discharges other than sanitary sewage to pervious areas to
28 allow for percolation into the shallow groundwater.

29
30 (5) During operation of the energy facility, the Certificate Holder shall use internal
31 recycling of aqueous streams whereby water shall be recycled several times in the
32 cooling system before being discharged.

33
34 **D.15. CARBON DIOXIDE STANDARD**

35
36 (1) Before beginning construction of Phase 1 and Phase 2 of the energy facility,
37 respectively, the Certificate Holder shall submit to The Climate Trust a bond or
38 letter of credit in the amount of the monetary path payment requirement (in 2002
39 dollars for Phase 1 and in 2009 dollars for Phase 2) as determined by the
40 calculations set forth in Condition D.15(3) and based on the estimated heat rates
41 and capacities certified pursuant to Condition D.15(4) and as adjusted in
42 accordance with the terms of this Site Certificate pursuant to Condition
43 D.15(3)(c). For the purposes of this Site Certificate, the "monetary path payment
44 requirement" means the offset funds determined pursuant to OAR 345-024-0550
45 and -0560 and the selection and contracting funds that the Certificate Holder must
46 disburse to The Climate Trust, as the qualified organization, pursuant to OAR

1 345-024-0710 and this Site Certificate. The offset fund rate for the monetary path
2 payment requirement shall be \$0.85 per ton of carbon dioxide (in 2002 dollars)
3 for Phase 1 and \$1.27 per ton of carbon dioxide (in 2009 dollars) for Phase 2. The
4 calculation of 2002 and 2009 dollars shall be made using the Index set forth in
5 Condition D.3(5) and as required below in subsection (g). [Amendments No. 1 &
6 6]

- 7
- 8 (a) The form of the bond or letter of credit and identity of the issuer shall be
9 subject to approval by the Council.
- 10
- 11 (b) The form of the Memorandum of Understanding “MOU”) between the
12 Certificate Holder and the Climate Trust establishing the disbursement
13 mechanism to transfer selection and contracting funds and offset funds to
14 The Climate Trust shall be substantially in the form of Attachment A to
15 this Site Certificate.
- 16
- 17 (c) Either the Certificate Holder or The Climate Trust may submit to the
18 Council for the Council’s resolution any dispute between the Certificate
19 Holder and The Climate Trust that concerns the terms of the bond, letter of
20 credit, or MOU concerning the disbursement mechanism for the monetary
21 path payments, or any other issues related to the monetary path payment
22 requirement. The Council’s decision shall be binding on all parties.
- 23
- 24 (d) The bond or letter of credit shall remain in effect until such time as the
25 Certificate Holder has disbursed the full amount of the monetary path
26 payment requirement to The Climate Trust. The Certificate Holder may
27 reduce the amount of the bond or letter of credit commensurate with
28 payments it makes to The Climate Trust. The bond or letter of credit shall
29 not be subject to revocation before disbursement of the full monetary path
30 payment requirement.
- 31
- 32 (e) In the event that the Council approves a new Certificate Holder for the
33 energy facility:
- 34
- 35 (A) The new Certificate Holder shall submit to the Council for the
36 Council’s approval the form of a bond or letter of credit that
37 provides comparable security to the bond or letter of credit of the
38 current Certificate Holder. The Council’s approval of a new bond
39 or letter of credit shall not require a site certificate amendment.
- 40
- 41 (B) The new Certificate Holder shall submit to the Council for the
42 Council’s approval the form of an MOU between the new
43 Certificate Holder and The Climate Trust that is substantially in the
44 form of Attachment A to this Site Certificate. In the case of a
45 dispute between the new Certificate Holder and The Climate Trust
46 concerning the disbursement mechanism for monetary path

1 payments or any other issues related to the monetary path payment
2 requirement, either party may submit the dispute to the Council for
3 the Council's resolution as provided in Condition D.15(1)(c).
4 Council approval of a new MOU shall not require a site certificate
5 amendment.
6

7 (f) If calculations pursuant to Condition D.15(5) demonstrate that the
8 Certificate Holder must increase its monetary path payments, the
9 Certificate Holder shall increase the bond or letter of credit sufficiently to
10 meet the adjusted monetary path payment requirement within the time
11 required by Condition D.15(3)(c). Alternately, the Certificate Holder may
12 disburse any additional required funds directly to The Climate Trust
13 within the time required by Condition D.15(3)(c).
14

15 (g) The amount of the bond or letter of credit shall increase annually by the
16 percentage increase in the Index, and the disbursement of funds shall be
17 pro-rated within the year to the date of disbursement to The Climate Trust
18 from the calendar quarter of Council approval of the Site Certificate.
19

20 (2) The Certificate Holder shall disburse to The Climate Trust offset funds and
21 selection and contracting funds as requested by The Climate Trust. The Certificate
22 Holder shall make disbursements in response to requests from The Climate Trust
23 in accordance with subsections (a), (b), and (c).
24

25 (a) The Certificate Holder shall disburse all selection and contracting funds to
26 The Climate Trust before beginning construction.
27

28 (b) Upon notice pursuant to subsection (c), The Climate Trust may request
29 from the issuer of the bond or letter of credit the full amount of all offset
30 funds available or it may request partial payment of offset funds at its sole
31 discretion. Notwithstanding the specific amount of any contract to
32 implement an offset project, The Climate Trust may request up to the full
33 amount of offset funds the Certificate Holder is required to provide to
34 meet the monetary path payment requirement.
35

36 (c) The Climate Trust may request disbursement of offset funds by providing
37 notice to the issuer of the bond or letter of credit that The Climate Trust
38 has executed a letter of intent to acquire an offset project. The Certificate
39 Holder shall provide that the issuer of the bond or letter of credit disburse
40 offset funds to The Climate Trust within three business days of a request
41 by The Climate Trust for the offset funds in accordance with the terms of
42 the bond or letter of credit.
43

44 (3) The Certificate Holder shall submit all monetary path payment requirement
45 calculations to the Department for verification in a timely manner before
46 submitting a bond or letter of credit for Council approval and before entering into

1 an MOU with The Climate Trust. The Certificate Holder shall use the contracted
2 design parameters for capacities and heat rates that it reports pursuant to
3 Condition D.15(4) to calculate the estimated monetary path payment requirement,
4 along with the estimated annual hours of operation of power augmentation
5 technologies. The Certificate Holder shall use the Year One Capacities and Year
6 One Heat Rates that it reports for the facility pursuant to Condition D.15(5) to
7 calculate whether it owes additional monetary path payments.
8

9 (a) The net carbon dioxide emissions rate for the base load gas plant shall not
10 exceed 0.675 pounds of carbon dioxide per kilowatt-hour of net electric
11 power output, with carbon dioxide emissions and net electric power output
12 measured on a new and clean basis, as defined in OAR 345-001-0010.
13

14 (b) The net carbon dioxide emissions rate for incremental emissions for the
15 facility operating with power augmentation technologies that increase the
16 capacity and heat rate of the facility above the capacity and heat rate that it
17 can achieve as a base load gas plant on a new and clean basis (“power
18 augmentation technologies”) shall not exceed 0.675 pounds of carbon
19 dioxide per kilowatt-hour of net electric power output, with carbon
20 dioxide emissions and net electric power output measured on a new and
21 clean basis, as the Department may modify such basis pursuant to
22 Condition D.15(4)(d).
23

24 (c) When the Certificate Holder submits the Year One Test reports required in
25 Condition D.15(5), it shall increase its monetary path payments if the
26 calculation using reported data shows that the adjusted monetary path
27 payment requirement exceeds the monetary path payment requirement for
28 which the Certificate Holder had provided a bond or letter of credit before
29 beginning construction, pursuant to Condition D.15(1). The Certificate
30 Holder shall submit its calculations to the Department for verification.
31

32 (A) The Certificate Holder shall make the appropriate calculations and
33 fully disburse any increased funds directly to The Climate Trust
34 within 30 days of filing the Year One Test reports.
35

36 (B) In no case shall the Certificate Holder diminish the bond or letter
37 of credit it provided before beginning construction or receive a
38 refund from The Climate Trust based on the calculations made
39 using the Year One Capacities and the Year One Heat Rates.
40

41 (4) The Certificate Holder shall include an affidavit certifying the heat rates and
42 capacities reported in subsections (a) and (b).
43

44 (a) Before beginning construction of the energy facility, the Certificate Holder
45 shall notify the Council in writing of its final selection of a gas turbine
46 vendor and heat recovery steam generator vendor and shall submit written

1 design information to the Council sufficient to verify the base-load gas
2 plant's designed new and clean heat rate (higher heating value) and its net
3 power output at the average annual site condition.
4

5 (b) Before beginning construction of the energy facility, the Certificate Holder
6 shall submit written design information to the Council sufficient to verify
7 the facility's designed new and clean heat rate and its net power output at
8 the average annual site condition when operating with power
9 augmentation technologies.

10
11 (c) Before beginning construction of the energy facility, the Certificate Holder
12 shall specify the estimated annual average hours that it expects to operate
13 the power augmentation technologies.
14

15 (d) Upon a timely request by the Certificate Holder, the Department may
16 approve modified parameters for testing the power augmentation
17 technologies on a new and clean basis, pursuant to OAR 345-024-0590(1).
18 The Department's approval of modified testing parameters for power
19 augmentation technologies shall not require a site certificate amendment.
20

21 (5) Within the first 12 months of commercial operation of each phase of the energy
22 facility, the Certificate Holder shall conduct a 100-hour test at full power without
23 power augmentation technologies ("Year One Test-1") and a test at full power
24 with power augmentation technologies ("Year One Test-2"). A 100-hour test
25 performed for purposes of the Certificate Holder's commercial acceptance of the
26 facility shall suffice to satisfy this condition in lieu of testing after beginning
27 commercial operation. [Amendment No. 6]
28

29 (a) Year One Test-1 shall determine the actual heat rate ("Year One Heat
30 Rate-1") and the net electric power output ("Year One Capacity-1") on a
31 new and clean basis, without degradation, with the results adjusted for the
32 average annual site condition for temperature, barometric pressure, and
33 relative humidity, and using a rate of 117 pounds of carbon dioxide per
34 million Btu of natural gas fuel pursuant to OAR 345-001-0010(35).
35

36 (b) Year One Test-2 shall determine the actual heat rate ("Year One Heat
37 Rate-2") and net electric power output ("Year One Capacity-2") for the
38 facility operating with power augmentation technologies, without
39 degradation, with the results adjusted for the average annual site condition
40 for temperature, barometric pressure and relative humidity, and using a
41 rate of 117 pounds of carbon dioxide per million Btu of natural gas fuel
42 pursuant to OAR 345-001-0010(35). The full power test shall be 100
43 hours duration unless the Department has approved a different duration
44 pursuant to Condition (4)(d).
45

- 1 (c) The Certificate Holder shall notify the Department at least 60 days before
2 conducting the tests required in subsections (a) and (b) unless a shorter
3 time is mutually agreed upon.
4
- 5 (d) Before conducting the tests required in subsections (a) and (b), the
6 Certificate Holder shall, in a timely manner, provide to the Department a
7 copy of the protocol for conducting the tests.
8
- 9 (e) Within two months after completing the Year One Tests, the Certificate
10 Holder shall provide to the Council a report of the results of the Year One
11 Tests.
12
- 13 (6) If calculations pursuant to Condition D.15(7) demonstrate that the Certificate
14 Holder must supplement its monetary path payments (“supplemental monetary
15 path payment requirement”), the Certificate Holder shall provide a bond or letter
16 of credit sufficient to meet the supplemental monetary path payment requirement
17 within the time required by Condition D.15(7)(b). The bond or letter of credit
18 shall not be subject to revocation before disbursement of the supplemental
19 monetary path payment requirement. Alternately, the Certificate Holder may
20 disburse in cash any such supplemental monetary path payments directly to The
21 Climate Trust within the time required by Condition D.15(7).
22
- 23 (7) The Certificate Holder shall submit all supplemental monetary path payment
24 requirement calculations to the Department for verification. The Certificate
25 Holder shall use the Year One Capacity-2 and Year One Heat Rate-2 that it
26 reports for the facility pursuant to Condition D.15(5)(b) to calculate whether it
27 owes supplemental monetary path payments, pursuant to subsections (a) and (b).
28
- 29 (a) Each five years after beginning commercial operation of the energy
30 facility (“five-year reporting period”), the Certificate Holder shall report to
31 the Department the annual average hours the facility operated with power
32 augmentation technologies during that five-year reporting period, pursuant
33 to OAR 345-024-0590(6). The Certificate Holder shall submit five-year
34 reports to the Department within 30 days of the anniversary date of
35 beginning commercial operation of the energy facility.
36
- 37 (b) If the Department determines that the energy facility exceeds the projected
38 net total carbon dioxide emissions calculated pursuant to Conditions
39 D.15(4) and D.15(5), prorated for five years, during any five-year
40 reporting period described in subsection (a), the Certificate Holder shall
41 offset excess emissions for the specific reporting period according to
42 subsection (A) and shall offset the estimated future excess emissions
43 according to subsection (B), pursuant to OAR 345-024-0600(4). The
44 Certificate Holder shall offset excess emissions using the monetary path as
45 described in OAR 345-024-0710, except that contracting and selecting
46 funds shall equal twenty (20) percent of the value of any offset funds up to

1 the first \$250,000 (in 2002 dollars) and 4.286 percent of the value of any
2 offset funds in excess of \$250,000 (in 2002 dollars). The Certificate
3 Holder shall disburse the funds to The Climate Trust within 30 days after
4 notification by the Department of the amount that the Certificate Holder
5 owes.

6
7 (A) In determining the excess carbon dioxide emissions that the
8 Certificate Holder must offset for a five-year period, the
9 Department shall apply OAR 345-024-0600(4)(a). The Certificate
10 Holder shall pay for the excess emissions at \$0.85 per ton of
11 carbon dioxide emissions (in 2002 dollars) for Phase 1 and \$1.27
12 per ton of carbon dioxide emissions (in 2009 dollars) for Phase 2.
13 The Department shall notify the Certificate Holder and The
14 Climate Trust of the amount of payment required, using the
15 monetary path, to offset excess emissions. [Amendment No. 6]

16
17 (B) The Department shall calculate estimated future excess emissions
18 and notify the Certificate Holder of the amount of payment
19 required, using the monetary path, to offset them. To estimate
20 excess emissions for the remaining period of the deemed 30-year
21 life of the facility, the Department shall use the parameters
22 specified in OAR 345-024-0600(4)(b). The Certificate Holder shall
23 pay for the estimated excess emissions at \$ 0.85 per ton of carbon
24 dioxide (in 2002 dollars) for Phase 1 and \$1.27 per ton of carbon
25 dioxide (in 2009 dollars) for Phase 2. The Department shall notify
26 the Certificate Holder of the amount of payment required, using
27 the monetary path, to offset future excess emissions. [Amendment
28 No. 6]

29
30 (8) The combustion turbine for the base-load gas plant and power augmentation
31 technologies shall be fueled solely with pipeline quality natural gas or with
32 synthetic gas with a carbon content per million Btu no greater than pipeline-
33 quality natural gas.

34
35 (9) With respect to incremental capacity and fuel consumption increases for which
36 the Certificate Holder has not previously complied with the carbon dioxide
37 standard, the Certificate Holder shall comply substantially with Conditions
38 D.15(1) through D.15(8) in lieu of the Council's requiring an amendment,
39 provided that:

40
41 (a) The Council determines, pursuant OAR 345-027-0050, that the Certificate
42 Holder does not otherwise require an amendment, and further provided
43 that:
44

1 (b) The Certificate Holder shall meet the appropriate carbon dioxide
2 emissions standard and monetary offset rate in effect at the time the
3 Council makes its determination pursuant to OAR 345-027-0050.
4

5 (10) Notwithstanding Conditions D.15(1) through d.15(9), if the Certificate Holder
6 begins construction of the Port Westward to BPA Allston Substation
7 Transmission Line, but no other part of the energy facility or other related or
8 supporting facilities, the Certificate Holder shall not be required to comply with
9 Conditions D.15(1) through D.15(9). The Certificate Holder shall comply with
10 Conditions D.15(1) through D.15(9) in connection with construction of any part
11 of the energy facility or related or supporting facilities other than the Port
12 Westward to BPA Allston Substation Transmission Line.
13

14 (11) If the Certificate Holder begins construction of Phase 1, but not Phase 2, the
15 Certificate Holder shall comply with Conditions D.15(1) through D.15(9) for
16 Phase 1. If the Certificate Holder later begins construction of Phase 2, the
17 Certificate Holder shall comply with Conditions D.15(1) through D.15(9) for
18 Phase 2. [Amendment No. 1]
19

20 **E. OTHER APPLICABLE REGULATORY REQUIREMENTS**

21
22 **E.1. REQUIREMENTS UNDER COUNCIL JURISDICTION**

23
24 **E.1.a. Noise**

- 25
26 (1) During construction of the facility, the Certificate Holder shall schedule most
27 heavy construction to occur during daylight hours. Construction work at night
28 shall be limited to work inside buildings and other structures when possible.
29
30 (2) During construction of the facility, the Certificate Holder shall require contractors
31 to equip all combustion engine-powered equipment with exhaust mufflers.
32
33 (3) During construction of the energy facility, transmission lines or other related or
34 supporting facilities, the Certificate Holder shall establish a complaint response
35 system at the construction manager's office to address noise complaints.
36
37 (4) Within six months after the start of commercial operation of the energy facility,
38 the Certificate Holder shall retain a qualified noise specialist to measure noise
39 levels associated with the energy facility operation when environmental
40 conditions are expected to result in maximum sound propagation between the
41 source and the receivers and when the energy facility is operating in a typical
42 operations mode that produces maximum noise levels.
43
44 (a) The specialist shall measure noise levels at sites (1), (2), (5), and (6), as
45 described in Exhibit X of the ASC, to determine if actual noise levels are

1 within the levels specified in the applicable noise regulations in OAR 345-
2 035-0035(1)(b)(B)(i).

3
4 (b) The Certificate Holder shall report the results of the noise evaluation to the
5 Department.

6
7 (c) If actual noise levels do not comply with applicable DEQ regulations, the
8 Certificate Holder shall take those actions necessary to comply with the
9 regulations as soon as practicable.

10
11 (d) If initial measurements show that actual noise levels increase at site (5) by
12 7 dBA or more, the Certificate Holder shall measure the noise levels as
13 specified in this condition and shall repeat the process outlined in
14 subsections (a), (b), and (c) for site (5) within six months after completion
15 of the initial measurements.

16
17 (5) The Certificate Holder shall install silencers on short duration noise sources (e.g.
18 steam vents) from the heat recovery steam generator.

19
20 **E.1.b. Wetlands and Removal/Fill Permit**

21
22 (1) Before beginning construction of Phase 1 of the energy facility or the Port
23 Westward to BPA Allston Substation Transmission Line, as appropriate, the
24 Certificate Holder shall obtain a U.S. Army Corps of Engineers and Oregon
25 Division of State Lands Joint Removal/Fill Permit substantially in the form of the
26 Removal/Fill Permit in Attachment C; provided, that mitigation required under
27 the Removal/Fill Permit shall allow for accommodation of Corps of Engineers
28 mitigation requirements, subject to the concurrence of the Department, in
29 consultation with the Division of State Lands and affected federal agencies.
30 [Amendment No. 1]

31
32 (2) The Certificate Holder shall comply with state laws and rules applicable to the
33 Removal/Fill Permit that are adopted in the future to the extent that such
34 compliance is required under the respective statutes and rules.

35
36 (3) The Certificate Holder shall clearly stake the wetland boundary adjacent to the
37 spoils disposal area and the wetland number 4 boundary adjacent to the
38 construction laydown/staging areas in the vicinity of the energy facility prior to
39 any ground disturbing activity in the spoils disposal area or in the construction
40 laydown/staging areas in the vicinity of the energy facility, and shall maintain the
41 staking until all ground-disturbing activities in the spoils disposal area and in the
42 construction laydown/staging areas in the vicinity of the energy facility have been
43 completed. The Certificate Holder shall instruct all contractors disposing of soil in
44 the spoils disposal area and using the construction laydown/staging areas in the
45 vicinity of the energy facility about the purpose of the staking and shall require
46 them to avoid any impact to the wetlands. [Amendment No. 3]

1
2 **E.1.c. Public Health and Safety**
3

- 4 (1) If local public safety authorities notify the Certificate Holder and the Department
5 that the operation of the energy facility is contributing significantly to ground
6 level fogging or icing along public roads and is likely to pose a significant threat
7 to public safety, the Certificate Holder shall cooperate with local public safety
8 authorities regarding the posting of warning signs on affected roads and the
9 implementation of other reasonable safety measures.
10
- 11 (2) The Certificate Holder shall design the transmission lines and backup electricity
12 lines so that alternating current electric fields shall not exceed 9 kV per meter at
13 one meter above the ground surface in areas accessible to the public. [Amendment
14 No. 1]
15
- 16 (3) The Certificate Holder shall design the transmission lines and backup electricity
17 lines so that induced currents and voltage resulting from the transmission lines are
18 as low as reasonably achievable. [Amendment No. 1]
19
- 20 (4) The Certificate Holder shall develop and implement a program that provides
21 reasonable assurance that all fences, gates, cattle guards, trailers, or other objects
22 or structures of a permanent nature that could become inadvertently charged with
23 electricity are grounded or bonded throughout the life of the transmission line.
24
- 25 (5) The Certificate Holder shall restore or mitigate the reception of radio and
26 television at residences and commercial establishments in the primary reception
27 area to the level present before operation of the transmission line at no cost to
28 residents or businesses experiencing interference resulting from the transmission
29 line.
30
- 31 (6) The Certificate Holder shall design, construct and operate the transmission lines
32 and backup electricity lines in accordance with the requirements of the National
33 Electrical Safety Code. [Amendment No. 1]
34
- 35 (7) The Certificate Holder shall take reasonable steps to reduce or manage exposure
36 to electromagnetic fields (EMF), consistent with Council findings presented in the
37 "Report of EMF Committee to the Energy Facility Siting Council," March 30,
38 1993, and subsequent findings. Effective on the date of this Site Certificate, the
39 Certificate Holder shall provide information to the public, upon request, about
40 EMF levels associated with the energy facility and related transmission lines and
41 backup electricity lines. [Amendment No. 1]
42
- 43 (8) At least 30 days before beginning preparation of detailed design and
44 specifications for the electrical transmission line(s) and backup electricity line(s)
45 or the natural gas pipelines, the Certificate Holder shall consult with the Oregon

1 Public Utility Commission staff to ensure that its designs and specifications are
2 consistent with applicable codes and standards. [Amendments No. 1 & 5]

- 3
4 (9) With respect to the related or supporting natural gas pipelines, the Certificate
5 Holder shall design, construct and operate the pipeline in accordance with the
6 requirements of the U.S. Department of Transportation as set forth in Title 49,
7 Code of Federal Regulations, Part 192. [Amendment No.5]

8
9 **E.1.d. Water Pollution Control Facilities Permit**

- 10
11 (1) Before beginning commercial operation of Phase 1 of the energy facility, the
12 Certificate Holder shall demonstrate that the DEQ has issued to the Certificate
13 Holder a Water Pollution Control Facilities Permit, substantially in the form of
14 Attachment B.1, allowing for on-site sanitary waste disposal. [Amendment No. 1]
15
16 (2) The Certificate Holder shall comply with state laws and rules applicable to Water
17 Pollution Control Facilities Permits that are adopted in the future to the extent that
18 such compliance is required under the respective statutes and rules.

19
20 **F. CONDITIONS REQUIRED OR RECOMMENDED BY COUNCIL RULES**

21
22 **F.1. MANDATORY CONDITIONS IN SITE CERTIFICATES**

23
24 **Amendment of Site Certificate**

- 25 (1) The Council shall not change the conditions of the Site Certificate except in
26 accordance with the applicable provisions of OAR 345, Division 27, in effect on
27 the date of the Council action.

28
29 **Legal Description**

- 30 (2) Before beginning construction of Phase 1 of the energy facility, the Certificate
31 Holder shall submit to the Department a legal description of the site, except as
32 provided in OAR 345-027-0023(6). [Amendment No. 1]
33
34 (a) The legal description of the site for purposes of beginning construction of
35 Phase 1 may exclude the 180-foot wide strip (50 feet south and 130 feet
36 north of an existing road) immediately north of Phase 1.
37
38 (b) The Certificate Holder shall notify the Department in writing if it is
39 exercising the option to exclude the 180-foot wide strip from Phase 1.
40
41 (c) If the Certificate Holder excludes the strip from the legal description
42 during Phase 1, the Certificate Holder shall submit to the Office, before
43 beginning construction of Phase 2 of the energy facility, a legal
44 description indicating whether the energy facility site for Phase 2 includes
45 the 180-foot wide strip. [Amendment No. 2]
46

1 **General Requirements**

2 (3) The Certificate Holder shall design, construct, operate, and retire the facility:

- 3
- 4 (a) Substantially as described in the Site Certificate;
- 5
- 6 (b) In compliance with the requirements of ORS Chapter 469, applicable
- 7 Council rules, and applicable state and local laws, rules and ordinances in
- 8 effect at the time the Council issues the Site Certificate; and,
- 9
- 10 (c) In compliance with all applicable permit requirements of other state
- 11 agencies.
- 12

13 **Construction Rights on Site**

14 (4) Except as necessary for the initial survey or as otherwise allowed for transmission

15 lines or pipelines in this condition, the Certificate Holder shall not begin

16 construction, as defined in OAR 345-001-0010, or create a clearing on any part of

17 the site until the Certificate Holder has construction rights on all parts of the site.

18 For the purpose of this condition, “construction rights” means the legal right to

19 engage in construction activities. For transmission lines or pipelines, if the

20 Certificate Holder does not have construction rights on all parts of the site, the

21 Certificate Holder may nevertheless begin construction or create a clearing on a

22 part of the site if:

23

- 24 (a) The Certificate Holder has construction rights on that part of the site; and,
- 25
- 26 (b) The Certificate Holder would construct and operate part of the facility on
- 27 that part of the site even if a change in the planned route of the
- 28 transmission line or pipeline occurs during the Certificate Holder's
- 29 negotiations to acquire construction rights on another part of the site.
- 30

31 For purposes of this condition, the “site” for purposes of beginning construction

32 of Phase 1 may exclude the 180-foot wide strip (50feet south and 130 feet north

33 of an existing road) immediately north of Phase 1. [Amendment No. 2]

34

35 **Beginning and Completing Construction**

36 (5) The Certificate Holder shall begin construction of the energy facility by

37 November 8, 2006. Beginning construction of the Port Westward to BPA Allston

38 Substation Transmission Line shall not satisfy this requirement. [Amendment No.

39 2]

40

- 41 (a) The Certificate Holder shall report promptly to the Department the date
- 42 that it began construction of the facility, as defined in OAR 345-001-0010.
- 43 In reporting the beginning of construction, the Certificate Holder shall
- 44 briefly describe all work on the site performed before beginning
- 45 construction, including work performed before the Council issued the Site
- 46 Certificate and work performed to construct the Port Westward to BPA

1 Allston Substation Transmission Line, and shall state the cost of that
2 work, pursuant to OAR 345-026-0048. If the Certificate Holder constructs
3 the energy facility in phases, the Certificate Holder shall report the
4 beginning of construction of each phase. [Amendment No. 1]
5

6 (b) If the Certificate Holder begins construction of the Port Westward to BPA
7 Allston Substation Transmission Line, as defined in OAR 345-001-0010,
8 prior to beginning construction of the energy facility, it shall promptly
9 report to the Department the date it began construction of the transmission
10 line.
11

12 (6) The Certificate Holder shall complete construction of the facility by May 8, 2011.
13 The completion of construction date is the day by which (1) the facility is
14 substantially complete as defined by the Certificate Holder's construction contract
15 documents; (2) acceptance testing is satisfactorily completed; and, (3) the energy
16 facility is ready to commence continuous operation consistent with the Site
17 Certificate. Completion of construction of the Port Westward to BPA Allston
18 Substation Transmission Line separately shall not satisfy this requirement.
19 [Amendments No. 2 & 6]
20

21 (a) The Certificate Holder shall report promptly to the Department the date it
22 completed construction of the facility. If the Certificate Holder constructs
23 the energy facility in phases, the Certificate Holder shall report the date of
24 completion of each phase. [Amendment No. 1]
25

26 (b) If the Certificate Holder completes construction of the Port Westward to
27 BPA Allston Substation Transmission Line separately before completing
28 construction of the facility, it shall promptly report that date to the
29 Department.
30

31 (c) Separate completion of construction of Port Westward to BPA Allston
32 Substation Transmission Line shall be the date that PGE makes it
33 available to the Summit/Westward Project to transmit energy.
34

35 **F.2 OTHER CONDITIONS BY RULE**
36

37 **Incident Reports**

38 (1) With respect to the related or supporting natural gas pipelines, the Certificate
39 Holder shall submit to the Department copies of all incident reports required
40 under 49 CFR §192.709 that involve the pipeline.
41

42 **Rights-of-Way**

43 (2) Before beginning operation of the energy facility, the Certificate Holder shall
44 submit to the Department a legal description of the permanent right-of-way where
45 the Certificate Holder has built a pipeline or transmission line within an approved
46 corridor. The site of the pipeline or transmission line subject to the Site Certificate

1 is the area within the permanent right-of-way. However, if the Certificate Holder
2 completes construction of the Port Westward to BPA Allston Substation
3 Transmission Line before beginning construction of the energy facility, the
4 Certificate Holder shall submit to the Department a legal description of the
5 permanent right-of-way for that segment of that transmission line,
6 notwithstanding OAR 345-027-0023(6).
7

8 **Monitoring Programs**

9 (3) If the Certificate Holder becomes aware of a significant environmental change or
10 impact attributable to the facility, the Certificate Holder shall, as soon as possible,
11 submit a written report to the Department describing the impact on the facility and
12 its ability to comply with any affected Site Certificate conditions.
13

14 **Compliance Plans**

15 (4) Before beginning construction of the facility, the Certificate Holder shall
16 implement a plan that verifies compliance with all Site Certificate terms and
17 conditions and applicable statutes and rules. The Certificate Holder shall submit a
18 copy of the plan to the Department. The Certificate Holder shall document the
19 compliance plan and maintain it for inspection by the Department or the Council.
20 However, if the Certificate Holder begins construction of the Port Westward to
21 BPA Allston Substation Transmission Line before beginning construction of the
22 energy facility, the applicable compliance plan shall relate to that phase of
23 construction.
24

25 **Reporting**

26 (5) Within six months after beginning any construction, and every six months
27 thereafter during construction of the energy facility and related or supporting
28 facilities, the Certificate Holder shall submit a semi-annual construction progress
29 report to the Council. In each construction progress report, the Certificate Holder
30 shall describe any significant changes to major milestones for construction. When
31 the reporting date coincides, the Certificate Holder may include the construction
32 progress report within the annual report described in Condition F.2(6).
33

34 (6) The Certificate Holder shall, within 120 days after the end of each calendar year
35 after beginning construction, submit an annual report to the Council that addresses
36 the subjects listed in OAR 345-026-0080(2). The Council secretary and the
37 Certificate Holder may, by mutual agreement, change the reporting date.
38

39 (7) To the extent that information required by OAR 345-026-0080(2) is contained in
40 reports the Certificate Holder submits to other state, federal or local agencies, the
41 Certificate Holder may submit excerpts from such other reports. The Council
42 reserves the right to request full copies of such excerpted reports.
43

44 **Schedule Modification**

45 (8) The Certificate Holder shall promptly notify the Department of any changes in
46 major milestones for construction, decommissioning, operation, or retirement

1 schedules. Major milestones are those identified by the Certificate Holder in its
2 construction, retirement or decommissioning plans.

3
4 **Correspondence with Other State or Federal Agencies**

- 5 (9) The Certificate Holder and the Department shall exchange copies of all
6 correspondence or summaries of correspondence related to compliance with
7 statutes, rules and local ordinances on which the Council determined compliance,
8 except for material withheld from public disclosure under state or federal law or
9 under Council rules. The Certificate Holder may submit abstracts of reports in
10 place of full reports; however, the Certificate Holder shall provide full copies of
11 abstracted reports and any summarized correspondence at the request of the
12 Department.

13
14 **Notification of Incidents**

- 15 (10) The Certificate Holder shall notify the Department within 72 hours of any
16 occurrence involving the facility if:
17
18 (a) There is an attempt by anyone to interfere with its safe operation;
19
20 (b) A natural event such as an earthquake, flood, tsunami or tornado, or a
21 human-caused event such as a fire or explosion affects or threatens to
22 affect the public health and safety or the environment; or,
23
24 (c) There is any fatal injury at the facility.

25
26 **G. GENERAL CONDITIONS**

- 27
28 (1) The general arrangement of the Port Westward Generating Project shall be
29 substantially as shown in the ASC.
30
31 (2) The Certificate Holder shall ensure that related or supporting facilities are
32 constructed in the corridors described in this Order and as shown in ASC and in
33 the manner described in this Order and the ASC.
34
35 (3) During construction and operation of the energy facility, the Certificate Holder
36 shall house the combustion turbine in an enclosure that provides thermal
37 insulation, acoustical attenuation, and fire extinguishing media containment and
38 that would allow access for routine inspection and maintenance.

39
40 **Successors and Assigns**

- 41 (4) Before any transfer of ownership of the facility or ownership of the Certificate
42 Holder, the Certificate Holder shall inform the Department of the proposed new
43 owners. The requirements OAR 345-027-0100 shall apply to any transfer of
44 ownership that requires a transfer of the Site Certificate.

45
46 **Severability and Construction**

1 (5) If any provision of this Site Certificate is declared by a court to be illegal or in
2 conflict with any law, the validity of the remaining terms and conditions shall not
3 be affected, and the rights and obligations of the parties shall be construed and
4 enforced as if the Site Certificate did not contain the particular provision held to
5 be invalid. In the event of a conflict between the conditions contained in the Site
6 Certificate and the Council's Order, the conditions contained in this Site
7 Certificate shall control.
8

9 **Governing Law and Forum**

10 (6) This Site Certificate shall be governed by the laws of the State of Oregon.

11
12 (7) Any litigation or arbitration arising out of this agreement shall be conducted in an
13 appropriate forum in Oregon.
14

15 IN WITNESS WHEREOF, this Site Certificate has been executed by the State of
16 Oregon, acting by and through its Energy Facility Siting Council, and Portland General
17 Electric Company.
18

19 ENERGY FACILITY SITING COUNCIL
20
21
22

23 By: _____
24 Robert Shiprack, Chair Date

25
26
27 PORTLAND GENERAL ELECTRIC COMPANY
28
29
30

31 By: _____
32 Date
33

- 34 ATTACHMENT A MEMORANDUM OF UNDERSTANDING: MONETARY PATH
35 PAYMENT REQUIREMENT
36 ATTACHMENT B WATER POLLUTION CONTROL FACILITIES PERMIT (B.1)
37 AND ANALYSIS (B.2)
38 ATTACHMENT C REMOVAL/FILL PERMIT
39