

1226115

[0085322]

1

Appendix F

2

Identification of Potential Applicable or Relevant and Appropriate Requirements and To Be Considered Criteria for 200-WA-1 and 200-BC-1 Operable Units

3

4

CROSS REF- 0100644

Terms

ACM	asbestos containing materials
ALARA	as low as reasonably achievable
ARAR	applicable or relevant and appropriate requirement
BACT	best available control technology
BARCT	best available retrofit control technology
CERCLA	<i>Comprehensive Environmental Response, Compensation, and Liability Act of 1980</i>
DOE	U.S. Department of Energy
Eco-SSLs	ecological risk-based soil screening levels
EPA	U.S. Environmental Protection Agency
IDW	Investigation-derived waste
NSPS	New Source Performance Standards
OU	operable unit
PCB	polychlorinated biphenyls
RI	remedial investigation
RI/FS	remedial investigation/feasibility study
RTD	removal, treatment, and disposal
TBC	to be considered
TSD	treatment, storage, or disposal

- 1 Appendix F presents potential applicable or relevant and appropriate requirements (ARARs) that may
- 2 apply to 200-WA-1 and 200-BC-1 remediation activities. Table F-1 presents potential federal ARARs and
- 3 to-be-considered (TBC) criteria. Table F-2 presents potential State of Washington ARARs and
- 4 TBC criteria.

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
Chemical-Specific ARARs and TBCs—Vadose Zone Soil				
OSWER Directive 9285.7-55, <i>Guidance for Developing Ecological Soil Screening Levels (Eco-SSLs)</i>	Provides a set of ecological risk-based soil screening levels (Eco-SSLs) for several soil contaminants that are of ecological concern for terrestrial plants and animals at hazardous waste sites. Also describes the process used to derive these levels and provides guidance for their use.	Target analytes detected in soil and vadose zone soil includes constituents that could pose ecological risks.	To-be-considered (TBC)	Assistance in the identification of areas, contaminants, and conditions that may require further remedial investigation.
EPA, 2010, "Regional Screening Levels for Chemical Contaminants at Superfund Sites"	Provides a set of risk-based screening levels; the regional screening levels provide tables of human health risk-based screening levels calculated using the latest toxicity values, default exposure assumptions, and physical and chemical properties. Risk-based screening levels may help determine whether levels of contamination found at <i>Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA)</i> Hazardous Waste sites may warrant further investigation or site cleanup, or whether no further investigation or action may be required.	Target analytes detected in soil and vadose zone soil includes constituents that could pose risks to human health.	TBC	Assistance in the identification of areas, contaminants, and conditions that may require further remedial investigation.

F-2

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
<i>Toxic Substances Control Act of 1976 (TSCA) (15 USC 2601, et seq.); "Polychlorinated Biphenyls (PCBs) Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions" (40 CFR 761)</i>				
"National Emission Standards for Hazardous Air Pollutants," "Applicability" (40 CFR 61.140)	Establishes general PCB disposal requirements for the storage and disposal of PCB wastes including liquid PCB wastes, PCB items, PCB remedial waste, PCB bulk product wastes, and PCB/radioactive wastes at concentrations greater than 50 parts per million (ppm).	PCB wastes greater than 50 ppm may be encountered or generated during the remedial investigation (RI) and subsequent remediation.	ARAR	Soil and vadose zone soil excavation and remedial investigation; equipment and debris handling and disposal; investigation-derived waste (IDW) management and disposal of PCB wastes greater than 50 ppm.
"Polychlorinated Biphenyls (PCBs) Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions," "Disposal Requirements" (40 CFR 761.60 (a) (b) and (c))	Establishes requirements applicable to the handling and disposal of PCB liquids, PCB articles, and PCB containers.	PCB liquids, articles, or containers may be encountered or generated during the RI and subsequent remediation.	ARAR	Equipment and debris handling, storage, and disposal; IDW management and disposal.
"Polychlorinated Biphenyls (PCBs) Manufacturing, Processing, Distribution in Commerce, and Use Prohibitions," "PCB Remediation Waste" (40 CFR 761.61)	Provides cleanup and disposal options for PCB remediation waste based on the concentration at which the PCBs are found.	PCB remediation wastes may be encountered or generated during the remedial actions for 200-WA-1 or 200-BC-1.	ARAR	Soil remediation; removal, treatment, and disposal (RTD); and IDW management and disposal.

F-3

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
<i>Clean Air Act of 1977 (42 USC 7401, et seq.); "National Emission Standards for Hazardous Air Pollutants" (40 CFR 61)</i>				
<p>"National Emission Standards for Hazardous Air Pollutants," "Applicability" (40 CFR 61.140)</p> <p>"National Emission Standards for Hazardous Air Pollutants," "Standard for Demolition and Renovation" (40 CFR 61.145)</p>	<p>Defines regulated asbestos containing materials (ACM) and regulated removal and handling requirements.</p> <p>Specifies sampling, inspection, handling, and disposal requirements for regulated sources having the potential to emit asbestos. Specifically, no visible emissions are allowed during handling, packaging, and transport of ACM.</p>	<p>Encountering ACM (e.g., on pipelines or buried asbestos) is possible during the remedial investigation or during remedial activities.</p>	<p>ARAR</p>	<p>Site investigation and remedial activities that include demolition or renovation and associated handling, packaging, and transportation of ACM including IDW management and disposal.</p>
<p>"National Emission Standards for Hazardous Air Pollutants," "Standard for Waste Disposal for Manufacturing, Fabricating, Demolition, Renovation, and Spraying Operations" (40 CFR 61.150)</p>	<p>Identifies requirements for the removal and disposal of asbestos from demolition and renovation activities.</p>	<p>Encountering ACM on pipelines or buried asbestos is possible during the remedial investigation or during remedial activities.</p>	<p>ARAR</p>	<p>Site investigation and remedial activities that include demolition or renovation and associated handling, packaging, and transportation of ACM, including IDW management and disposal.</p>

F4

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
Radionuclide ARAR Dose Compliance Concentrations for Superfund				
<p>“Establishment of Cleanup Levels for CERCLA Sites with Radioactive Contamination” (Luftig and Weinstock, 1997) OSWER Directive 9200.4-31P, <i>Radiation Risk Assessment at CERCLA Sites: Q & A</i></p>	<p>This memorandum presents clarification for establishing protective cleanup levels in media for radioactive contamination at CERCLA sites. The U.S. Environmental Protection Agency (EPA) has determined that the dose limits established in the Nuclear Regulatory Commission 62 FR 39058, “Radiological Criteria for License Termination” (25 mrem/yr, which is equivalent to 5×10^{-4} increase lifetime risk), will not provide a protective basis for establishing preliminary remedial goals (PRGs) under CERCLA. Instead, EPA has identified a 15 mrem/yr effective dose (approximately equivalent to 3×10^{-4} increase lifetime risk), which is preferred as the maximum dose limit for humans. (However, depending upon the radionuclide involved, a 15 mrem/yr effective dose equivalent could represent a significantly higher or lower lifetime cancer risk than 3×10^{-4}.)</p> <p>In the Final Guidance, EPA further clarifies that 15 mrem/yr is not a presumptive cleanup level under CERCLA. Rather, site decision makers should continue to use the CERCLA risk range when ARARs are not used to set cleanup levels because using dose-based guidance would result in</p>	<p>Target analytes detected in soil and vadose zone soil include constituents that would constitute radionuclides regulated as NESHAP hazardous air pollutants.</p>	<p>TBC</p>	<p>Development of media cleanup levels for remediation and verification.</p>

F-5

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
	unnecessary inconsistency in how radiological and nonradiological (chemical) contaminants are addressed at CERCLA sites.			
Location-Specific ARARs and TBCs				
<i>Archeological and Historic Preservation Act of 1974 (16 USC 469a-1 – 469a-2(d))</i>				
<i>Archeological and Historic Preservation Act of 1974 (16 USC 469a-1 – 469a-2(d))</i>	Provides for the preservation of historical and archaeological data that might be otherwise irreparably lost or destroyed as a result of alterations of terrain caused by any federal construction project. This act mandates preservation of data; it does not require protection of the actual site or facility.	Archaeological and historic sites have been identified within 200-WA-1 and 200-BC-1.	ARAR	Investigation and remedial activities that occur in or near archaeological or historic sites.
<i>National Historic Preservation Act of 1966 (16 USC 470, et seq.)</i>				
“Protection of Historic Properties” (36 CFR 800) Executive Order 11593, <i>Protection and Enhancement of the Cultural Environment</i> “National Historic Landmarks Program” (36 CFR 65) “National Register of Historic Places” (36 CFR 60)	Requires federal agencies to consider the impacts of their undertaking on cultural properties through identification, evaluation, and mitigation processes, and consultation with interested parties.	Cultural and historic sites have been identified within 200-WA-1 and 200-BC-1.	ARAR	Investigation and remedial activities that affect cultural or historic sites.

F-6

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
<i>Native American Graves Protection and Repatriation Act of 1990 (25 USC 3001, et seq.); "Native American Graves Protection and Repatriation Regulations" (43 CFR 10)</i>				
"Native American Graves Protection and Repatriation Regulations" (43 CFR 10)	Establishes federal agency responsibility for discovery of human remains, associated and unassociated funerary objects, sacred objects and items of cultural patrimony. Requires Native American Tribal consultation in the event of discovery.	Native American archaeological, cultural, and historic sites have been identified within 200-WA-1 and 200-BC-1; Native American remains and associated objects may be present.	ARAR	Investigation and remedial activities that affect Native American archaeological and cultural areas, and historic sites that contain associated remains and objects.
<i>Endangered Species Act of 1973 (16 USC 1531, et seq., Subsection 16 USC 1536(c))</i>				
"Interagency Cooperation--Endangered Species Act of 1973, as Amended" (50 CFR 402)	Prohibits actions by federal agencies that are likely to jeopardize the continued existence of listed species or result in the destruction or adverse modification of habitat critical to them. Mitigation measures must be applied to actions that occur within critical habitats or surrounding buffer zones of listed species, in order to protect the resource.	Federal endangered and/or threatened species including plants and animals are found within 200-WA-1 and 200-BC-1.	ARAR	Remedial actions and investigation activities that occur within critical habitats or designated buffer zones of federally listed species.
<i>Migratory Bird Treaty Act of 1918 (16 USC 703-712)</i>				
<i>Migratory Bird Treaty Act of 1918 (16 USC 703-712)</i>	Implements various treaties and conventions for the protection of migratory birds. Under this act, taking, killing, or possessing migratory birds is unlawful.	Migratory birds occur within 200-WA-1 and 200-BC-1.	ARAR	Investigation and remediation activities that have the potential to kill migratory birds or destroy their eggs or nests.

F-7

Table F-1. Identification of Potential Federal Applicable or Relevant and Appropriate Requirements and To-Be-Considered Criteria for 200-WA-1 and 200-BC-1

Citation	Description of Requirement	Rationale for Use	Potential Relevancy	Possible Application
Land Use and Exposure Scenarios				
<i>Final Hanford Comprehensive Land-Use Plan Environmental Impact Statement</i> (DOE/EIS-0222-F) and <i>Analysis: Hanford Comprehensive Land-Use Plan Environmental Impact Statement</i> (DOE/EIS-0222-SA-01)	Establishes the future land use projections for the Inner Area.	Land use as stated in the Hanford Comprehensive Land Use Plan for the Inner Area of the Central Plateau is industrial exclusive.	TBC	

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
Chemical-Specific ARAR				
<p>“Model Toxics Control Act – Cleanup,” “Soil Cleanup Standards for Industrial Properties” (WAC 173-340-745)</p>	<p>Establishes soil chemical cleanup levels where industrial land use represents the reasonable maximum exposure under both current and future site use conditions. Cleanup standards require specification of the following: hazardous chemical substance concentrations that protect human health and the environment (cleanup levels), the location of the site where cleanup levels must be attained (points of compliance), and other regulatory requirements that apply to the cleanup action because of the type of action or location of the site. These requirements are specified in the applicable state and federal laws and are generally established in conjunction with the selection of a specific cleanup action.</p>	<p>Soil in 200-WA-1 and 200-BC-1 contains chemical contaminants that require remediation. The human health conceptual exposure model for these areas is considered industrial land use.</p>	<p>ARAR</p>	<p>Soil chemical cleanup actions where concentrations of hazardous substances in the soil exceed Method A cleanup levels.</p>
<p>“Model Toxics Control Act—Cleanup,” “Deriving Soil Concentrations for Groundwater Protection” (WAC 173-340-747(3) and (8))</p>	<p>Establishes soil chemical concentrations that will not cause contamination of groundwater at levels that exceed the groundwater cleanup levels established under “Groundwater Cleanup Standards” (WAC 173-340-720).</p>	<p>Soil in 200-WA-1 and 200-BC-1 contains chemical contaminants that require remediation to protect groundwater. The requirements corresponding to soil cleanup levels may be used to calculate cleanup levels to ensure protection of groundwater. Although groundwater is not currently used for drinking water, it is a potential drinking water source .</p>	<p>ARAR</p>	<p>Soil cleanup actions where concentrations of hazardous chemical substances in the soil exceed soil concentrations for protection of groundwater. As allowed, WAC 173-340-747(8), Alternative fate and transport models, one of the seven allowable methods under WAC 173-340-747, will be used to determine appropriate cleanup levels.</p>

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
<p>“Model Toxics Control Act—Cleanup,” “Terrestrial Ecological Evaluation Procedures” (WAC 173-340-7490(4)(b))</p> <p>“Site-Specific Terrestrial Ecological Evaluation Procedures” (WAC 173-340-7493)</p> <p>“Priority Contaminants of Ecological Concern” (WAC 173-340-7494)</p>	<p>Defines goals and procedures for determining whether a release of hazardous substances to soil and vadose zone soil may pose a threat to the terrestrial environment; characterizes existing or potential threats to terrestrial plants or animals exposed to hazardous substances in soil and vadose zone soil; and establishes site-specific cleanup standards for the protection of terrestrial plants and animals.</p> <p>Section 173-340-7494 provides for numeric concentrations of hazardous substances determined to persist, bioaccumulate, or be highly toxic to terrestrial ecological receptors.</p>	<p>Soil and vadose zone soil in 200-WA-1 and 200-BC-1 contain contaminants that require evaluation to determine whether ecological exposures have the potential to cause significant adverse effects.</p>	<p>ARAR</p>	<p>Soil and vadose zone soil remedial activities (e.g., containment or RTD) that may pose risks to terrestrial ecological plants and animals.</p>
Action-Specific ARAR				
“Hazardous Waste Management” (RCW 70.105); “Dangerous Waste Regulations” (WAC 173-303)				
<p>“Dangerous Waste Regulations,” “Identifying Solid Waste” (WAC 173-303-016)</p> <p>“Dangerous Waste Regulations,” “Recycling Processes Involving Solid Waste” (WAC 173-303-017)</p>	<p>Establishes criteria for solid and recycled solid wastes.</p>	<p>Solid wastes and/or recycled solid wastes may be generated during the RI/FS.</p>	<p>ARAR</p>	<p>Investigative and remedial activities that generate solid wastes, (e.g., drums, barrels, tanks, containers, bulk wastes, debris, contaminated soil and vadose zone soil).</p>
<p>“Dangerous Waste Regulations,” “Designation of Dangerous Waste” (WAC 173-303-070)</p>	<p>Establishes the method for determining whether a solid waste is a dangerous waste (or an extremely hazardous waste).</p>	<p>Dangerous/hazardous waste may be generated during the RI/FS.</p>	<p>ARAR</p>	<p>Investigative and remedial (including waste treatment) activities that generate solid wastes that may be dangerous waste.</p>

F-10

DOE/RL-2010-49, DRAFT A
DECEMBER 2011

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
<p>“Dangerous Waste Regulations,” “Excluded Categories of Waste” (WAC 173-303-071)</p>	<p>Lists waste categories that are excluded from management in accordance with the requirements of WAC 173-303.</p>	<p>Excluded wastes may be generated during the RI/FS.</p>	<p>ARAR</p>	<p>Potential for generating materials during the cleanup of waste sites and decommissioning of industrial buildings/structures that would qualify for management under the substantive provisions of these regulations.</p>
<p>“Dangerous Waste Regulations,” “Conditional Exclusion of Special Wastes” (WAC 173-303-073)</p>	<p>Establishes the conditional exclusion and the management requirements of special wastes, as defined in WAC 173-303-040, “Definitions.</p>	<p>Special wastes may be generated during the RI/FS.</p>	<p>ARAR</p>	<p>Investigative and remedial activities (disposal, storage, recycling, and onsite treatment) that manage special wastes consistent with the requirements of the <i>Washington Administrative Code</i>.</p>
<p>“Dangerous Waste Regulations,” “Requirements for Universal Waste” (WAC 173-303-077)</p>	<p>Identifies those wastes exempted from regulation under WAC 173-303-140, “Land Disposal Restrictions,” and WAC 173-303-170, “Requirements for Generators of Dangerous Waste” through 173-303-9907, “Reserved” (excluding WAC 173-303-960, “Special Powers and Authorities of the Department”). These wastes are subject to regulation under WAC 173-303-573, “Standards for Universal Waste Management.”</p>	<p>Universal wastes may be generated during the RI/FS.</p>	<p>ARAR</p>	<p>Investigative and remedial activities (disposal, storage, recycling, and onsite treatment) that manage universal wastes consistent with the requirements of the <i>Washington Administrative Code</i>.</p>

F-11

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
<p>“Dangerous Waste Regulations,” “Recycled, Reclaimed, and Recovered Wastes” (WAC 173-303-120; WAC 173-303-120(3); and WAC 173-303-120(5))</p>	<p>These regulations define the requirements for the recycling of materials that are solid and dangerous waste. Specifically, WAC 173-303-120(3) provides for the management of certain recyclable materials, including spent refrigerants, antifreeze, and lead acid batteries. WAC 173-303-120(5) provides for the recycling of used oil.</p>	<p>Recycled, reclaimed, and recovered wastes may be generated during the RI/FS.</p>	<p>ARAR</p>	<p>Remedial investigation/feasibility study (RI/FS) recycling activities consistent with the requirements of the <i>Washington Administrative Code</i> and are not otherwise subject to the <i>Comprehensive Environmental Response, Compensation, and Liability Act of 1980 (CERCLA)</i> as hazardous substances.</p>
<p>“Dangerous Waste Regulations,” “Land Disposal Restrictions” (WAC 173-303-140)</p>	<p>This regulation establishes treatment requirements and disposal prohibitions for land disposal of dangerous waste and incorporates, by reference, (in WAC 173-303-140(2)(a)) the federal land disposal restrictions of 40 CFR 268, “Land Disposal Restrictions,” that are applicable to solid waste that is designated as dangerous or mixed waste in accordance with WAC 173-303-070(3).</p>	<p>Onsite land disposal may be a selected remedy for dangerous waste and debris.</p>	<p>ARAR</p>	<p>Investigative and remedial wastes destined for onsite land disposal.</p>

F-12

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
<p>“Dangerous Waste Regulations,” “Requirements for Generators of Dangerous Waste” (WAC 173-303-170)</p>	<p>Establishes the requirements for dangerous waste generators. WAC 173-303-170(3) includes the substantive provisions of WAC 173-303-200, “Accumulating Dangerous Waste Onsite,” by reference. WAC 173-303-200 further includes certain substantive standards from WAC 173-303-630, “Use and Management of Containers,” and WAC 173-303-640, “Tank Systems,” by reference. Specifically, the substantive standards for management of dangerous or mixed waste are relevant and appropriate to the management of dangerous waste that will be generated during the remedial action.</p>	<p>Dangerous wastes may be generated from the RI/FS.</p>	<p>ARAR</p>	<p>IDW and remedial wastes (e.g., contaminated soil, vadose zone soil, groundwater, IDW, treatment chemicals, etc.).</p>
<p>“Dangerous Waste Regulations,” “Accumulating Dangerous Waste Onsite” (WAC 173-303-200)</p>	<p>Establishes the requirements for accumulating wastes onsite. WAC 173-303-200 further includes certain substantive standards from WAC 173-303-630 and WAC 173-303-640, by reference.</p>	<p>Dangerous waste may be generated from the RI/FS.</p>	<p>ARAR</p>	<p>Management of dangerous waste during remedial and investigative actions.</p>

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
<p>“Dangerous Waste Regulations,” “Purpose and Applicability” (WAC 173-303-64610)</p> <p>“Dangerous Waste Regulations,” “Requirements” (WAC 173-303-64620(4)(a) through (g))</p>	<p>Establishes closure requirements applicable to all treatment, storage, and disposal (TSD) units dangerous waste facilities and post-closure care requirements applicable to all regulated units (as defined in WAC 173-303-040) where dangerous wastes will remain after closure (including tank systems, landfills, surface impoundments, waste piles, and miscellaneous units). “Hazardous Waste Cleanup – Model Toxics Control Act,” (RCW 70.105D) as amended, and its implementing regulations may be used to fulfill corrective action responsibilities.</p>	<p>Dangerous wastes may remain at TSD units after closure.</p> <p>The RI/FS process will also meet the requirements of RCRA) corrective action to the extent practicable. The substantive requirements of the specified subsections are used to ensure the corrective action requirements are being considered during the remedial actions.</p>	<p>ARAR</p>	<p>These requirements are applicable to the closure of RCRA TSD units.</p> <p>The substantive requirements ensure corrective action requirements are considered where appropriate.</p>
<p>“Dangerous Waste Regulations,” “Closure and Post-Closure” (WAC 173-303-610(2)(b)(ii))</p>	<p>Establishes closure requirements applicable to all dangerous waste facilities and post-closure care requirements applicable to all regulated units (as defined in WAC 173-303-040) where dangerous wastes will remain after closure (including tank systems, landfills, surface impoundments, waste piles, and miscellaneous units).</p>	<p>Dangerous wastes may remain after closure.</p>	<p>ARAR</p>	<p>Remedial design and operation of regulated units that contain dangerous wastes and that will remain after closure.</p>
<p>“Dangerous Waste Regulations,” “Landfills” (WAC 173-303-665(6))</p>	<p>Specifies closure and post-closure requirements for landfills.</p>	<p>Land disposal may be proposed as a containment remedy.</p>	<p>ARAR</p>	<p>Design and operation of a engineered landfill cover.</p>

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
“Water Well Construction” (RCW 18.104); “Minimum Standards for Construction and Maintenance of Wells” (WAC 173-160)				
“Minimum Standards for Construction and Maintenance of Wells,” “What Is the Decommissioning Process for Resource Protection Wells?” (WAC 173-160-460)	Identifies the decommissioning process for resource protection wells.	Groundwater monitoring and treatment wells and borings may occur in 200-WA-1 or 200-BC-1.	ARAR	Investigative and remedial activities that require siting, installation, construction, operation, maintenance, and decommissioning of wells and borings.
“On-Site Sewage Systems,” “Abandonment” (WAC 246-272A-0300)				
“On-Site Sewage Systems,” “Abandonment” (WAC 246-272A-0300)	Identifies the abandonment requirements for onsite sewage systems.	Inactive septic systems need to be abandoned.	ARAR	Remedial actions that require the abandonment of septic systems.
“Solid Waste Management—Reduction and Recycling” (RCW 70.95); “Solid Waste Handling Standards” (WAC 173-350)				
“Solid Waste Handling Standards,” “Owner Responsibilities for Solid Waste” (WAC 173-350-025) “Solid Waste Handling Standards,” “Performance Standards” (WAC 173-350-040) “Solid Waste Handling Standards,” “On-Site Storage, Collection and Transportation Standards” (WAC 73-350-300) “Solid Waste Handling Standards,” “Remedial Action” (WAC 173-350-900)	Establishes minimum functional performance standards for the proper handling and disposal of solid waste materials originating from residences; commercial, agricultural, and industrial operations; and other sources, and identifies those functions necessary to assure effective solid waste handling programs at the state and local level.	Solid, non-dangerous waste will be generated during the implementation of the RI/FS.	ARAR	Investigative and remedial actions that generate solid, non-dangerous waste.

F-15

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
“Washington Clean Air Act” (RCW 70.94); “General Regulations for Air Pollution Sources” (WAC 173-400)				
“General Regulations for Air Pollution Sources” (WAC 173-400)	Defines methods of control to be employed to minimize the release of air pollutants associated with fugitive emissions resulting from materials handling, construction, demolition, or other operations. Emissions are to be minimized through application of best available control technology (BACT).	Soil and vadose zone soil remedial actions implemented in 200-WA-1 or 200-BC-1 have the potential to emit air pollutants because contaminants detected in 200-WA-1 or 200-BC-1 include regulated pollutants subject to these standards.	ARAR	Actions performed such as decontamination, demolition, and excavation activities that have the potential to emit visible, particulate, fugitive, or gaseous forms of hazardous criteria, and toxic or nuisance air pollutants.
“General Regulations for Air Pollution Sources,” “General Standards for Maximum Emissions” (WAC 173-400-040)	All sources and emissions units are required to meet the general emission standards unless a specific source standard is available. General standards apply to visible emissions, particulate fallout, fugitive emissions, odors, emissions detrimental to health and property, sulfur dioxide, and fugitive dust.	Soil and vadose zone soil remedial actions implemented have the potential to emit air pollutants because contaminants detected in 200-WA-1 or 200-BC-1 include regulated pollutants subject to these standards.	ARAR	Remedial actions that have the potential to release air pollutants subject to these regulations.
“General Regulations for Air Pollution Sources,” “Emission Standards for Sources Emitting Hazardous Air Pollutants” (WAC 173-400-075)	Establishes national emission standards for hazardous air pollutants. Adopts, by reference, 40 CFR 61 and appendices.	Soil and vadose zone soil remedial actions implemented have the potential to emit air pollutants because contaminants detected in 200-WA-1 or 200-BC-1 include regulated pollutants subject to these standards.	ARAR	Actions performed that could result in the emission of hazardous air pollutants, including decontamination, demolition, and excavation activities implemented during the RI/FS that have the potential to release air pollutants subject to these regulations.

F-16

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
“Washington Clean Air Act” (RCW 70.94); “Controls for New Sources of Toxic Air Pollutants” (WAC 173-460)				
<p>“Controls for New Sources of Toxic Air Pollutants,” “Purpose” (WAC 173-460-010)</p> <p>“Controls for New Sources of Toxic Air Pollutants,” “Applicability” (WAC 173-460-030)</p> <p>“Controls for New Sources of Toxic Air Pollutants,” “Control Technology Requirements” (WAC 173-460-060)</p> <p>“Controls for New Sources of Toxic Air Pollutants,” “Ambient Impact Requirement” (WAC 173-460-070)</p> <p>“Controls for New Sources of Toxic Air Pollutants,” “First Tier Review” (WAC 173-460-080)</p> <p>“Controls for New Sources of Toxic Air Pollutants,” “Table of ASIL, SQER and de Minimus Emission Values” (WAC 173-460-150)</p>	<p>Establishes control of new sources emitting toxic air pollutants to prevent air pollution, reduce emissions to the extent reasonably possible, and maintain such levels of air quality as will protect human health and safety. Toxic air pollutants include carcinogens and noncarcinogens listed in WAC 173-460-150, “Table of ASIL, SQER and de Minimis Emission Values.” Three major requirements of this regulation include implementation of BACT for toxics, quantification of toxic air pollutant emissions, and health and safety protection demonstration.</p>	<p>Hazardous contaminants detected in soil and groundwater in 200-WA-1 or 200-BC-1 include constituents that would constitute toxic air pollutants if released to the air.</p>	<p>ARAR</p>	<p>Groundwater and soil remediation activities such as treatment systems that have the potential to emit toxic air emissions and would be considered a new source.</p>

F-17

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
“Washington Clean Air Act” (RCW 70.94); “Ambient Air Quality Standards for Particulate Matter” (WAC 173-470)				
“Ambient Air Quality Standards for Particulate Matter,” “Ambient Air Quality Standards” (WAC 173-470-100)	Sets maximum acceptable levels for particulate matter in the ambient air at 150 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$) over a 24-hour period, or 60 $\mu\text{g}/\text{m}^3$ annual geometric mean. It also sets the 24-hour ambient air concentration standards for particles less than 10 μm in diameter (PM_{10}) at 105 $\mu\text{g}/\text{m}^3$ and 50 $\mu\text{g}/\text{m}^3$ geometric mean.	Particulates and dust can be generated during the remedial actions. Ambient air quality standards for particulate matter will be considered if the remedial actions raise emissions above the standard.	ARAR	Investigative and remediation activities (e.g., excavation, RTD, containment) that have the potential to emit particulate matter above maximum acceptable levels.
“Ambient Air Quality Standards for Particulate Matter,” “Particulate Matter Standards” (WAC 173-470-110)	Establishes the standard for particle fallout not to exceed 10 grams per square meter (g/m^2) per month in an industrial area or 5 g/m^2 per month in residential or commercial areas. Alternative levels for areas where natural dust levels exceed 3.5 g/m^2 per month are set at 6.5 g/m^2 per month, plus background levels for industrial areas and 1.5 g/m^2 per month, plus background in residential and commercial areas.	Particulates and dust can be generated during the remedial actions.	ARAR	Investigative and remediation activities (e.g., excavation, RTD, containment) that have the potential to emit particulate matter above maximum acceptable levels.
“Washington Clean Air Act” (RCW 70.94); “Ambient Air Quality Standards and Emission Limits for Radionuclides” (WAC 173-480)				
“Ambient Air Quality Standards and Emission Limits for Radionuclides,” “Ambient Standard” (WAC 173-480-040)	Requires that emissions of radionuclides in the air will not cause a maximum effective dose equivalent of more than 10 mrem/yr to the whole body to any member of the public.	Hazardous contaminants detected in soil and groundwater in 200-WA-1 or 200-BC-1 include radionuclides that could be emitted to ambient air during remedial actions.	ARAR	Investigative and remediation activities (e.g., excavation, RTD, demolition, ventilation, vacuuming/exhaust) that have the potential to emit radionuclides above maximum acceptable levels.

F-18

DOE/RL-2010-49, DRAFT A
DECEMBER 2011

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
<p>“Ambient Air Quality Standards for Particulate Matter,” “General Standards for Maximum Permissible Emissions” (WAC 173-480-050)</p>	<p>At a minimum, all emission units will make every reasonable effort to maintain radioactive materials in effluents to unrestricted areas, as low as is reasonably achievable (ALARA)* Control equipment of sites operating under ALARA will be defined as reasonably available control technology and ALARA control technology.</p>	<p>The potential for fugitive and diffuse emissions resulting from demolition, excavation, and related activities will require efforts to minimize those emissions. This requirement is action specific.</p>	<p>ARAR</p>	<p>Investigative and remediation activities (e.g., excavation, RTD, demolition, ventilation, vacuuming/exhaust) that have the potential to emit radionuclides above maximum acceptable levels.</p>
<p>“Ambient Air Quality Standards for Particulate Matter,” “Emission Monitoring and Compliance Procedures” (WAC 173-480-070)</p>	<p>Requires that procedures specified in WAC 246-247, “Radiation Protection—Air Emissions,” or approved specifically by the regulatory agency will be used to determine emissions compliance with the 10 mrem/yr standard for dose to any member of the public. Compliance is determined by calculating the dose to members of the public at the point of maximum annual air concentration in an unrestricted area where any member of the public may be.</p>	<p>Hazardous contaminants detected in soil and groundwater in 200-WA-1 or 200-BC-1 include radionuclides that could be emitted to unrestricted areas during remedial actions and, therefore, could require monitoring.</p>	<p>ARAR</p>	<p>Investigative and remediation activities (e.g., excavation, RTD, demolition, ventilation, and vacuuming/exhaust) that have the potential to emit radionuclides to the ambient air.</p>
<p>“Ambient Air Quality Standards for Particulate Matter,” “Emission Standards for New and Modified Emission Units” (WAC 173-480-060)</p>	<p>Requires that construction, installation, or establishment of a new air emission control units will utilize best available retrofit control technology (BARCT).</p>	<p>Hazardous contaminants detected in soil and groundwater in 200-WA-1 or 200-BC-1 include radionuclides that could be emitted to the ambient air during remedial actions.</p>	<p>ARAR</p>	<p>Investigative and remediation activities (e.g., excavation, RTD, demolition, ventilation, and vacuuming/exhaust) that require air pollution control equipment or other methods to best control emissions and have the potential to emit airborne radionuclides.</p>

F-19

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
“Nuclear Energy and Radiation” (RCW 70.98); “Radiation Protection—Air Emissions” (WAC 246-247)				
<p>“Radiation Protection—Air Emissions,” “National Standards Adopted by Reference for Sources of Radionuclide Emissions” (WAC 246-247-035 (1)(a)(ii))</p>	<p>Establishes emission standards for radionuclides equivalent to 40 CFR 61, Subpart H, “National Emission Standards for Emissions of Radionuclides Other Than Radon from Department of Energy Facilities,” by reference. Combined Hanford Site radionuclide airborne emissions will be controlled so as not to exceed amounts that would cause an exposure to any member of the public of greater than 10 mrem/yr effective dose equivalent.</p>	<p>Substantive requirements of this standard are applicable because the remedial action may include activities such as excavation, decontamination, and stabilization of contaminated areas that many provide airborne emissions of radioactive.</p>	<p>ARAR</p>	<p>Investigative and remedial activities.</p>
<p>“Radiation Protection—Air Emissions,” “General Standards” (WAC 246-247-040(3) and (4))</p>	<p>Requires that emissions be controlled to ensure ALARA-based and BACT standards are not exceeded.</p>	<p>Hazardous contaminants detected in soil and groundwater include radionuclides that could be emitted and require controls during remedial actions.</p>	<p>ARAR</p>	<p>Investigative and remediation activities (e.g., RTD, excavation, demolition, ventilation).</p>
<p>“Radiation Protection—Air Emissions,” “Monitoring, Testing and Quality Assurance” (WAC 246-247-075)</p>	<p>Establishes the monitoring, testing, and quality assurance requirements for radioactive air emissions. Emissions from non-point and fugitive sources of airborne radioactive material will be measured. Measurement techniques may include but are not limited to sampling, calculation, smears, or other reasonable methods for identifying emissions as determined by the lead agency.</p>	<p>Hazardous contaminants in 200-WA-1 or 200-BC-1 waste sites include radionuclides that could be emitted as airborne radioactive material during remedial actions.</p>	<p>ARAR</p>	<p>Investigative and remediation activities (e.g., RTD, excavation, demolition, ventilation) that could emit airborne radionuclides.</p>

**Table F-2. Identification of Potential State of Washington Applicable and Relevant or Appropriate Requirements to be Considered
Criteria for 200-WA-1 and 200-BC-1**

Citation	Description of Requirement	Rationale for Use	Relevancy	Possible Action(s)
----------	----------------------------	-------------------	-----------	--------------------

* ALARA means as low as reasonably achievable making every reasonable effort to maintain exposures to radiation as far below the 10 mrem/yr dose standard as practical, consistent with the purpose for which the activity is undertaken, taking into account the state of technology, the economics of improvements in relation to the state of technology, the economics of improvements in relation to benefits to the public health and safety, and other socioeconomic considerations, and in relation to the use of nuclear energy, ionizing radiation, and radioactive materials in the public interest.

References

1

- 2 36 CFR 60, "National Register of Historic Places," *Code of Federal Regulations*. Available at:
3 [http://www.gpo.gov/fdsys/pkg/CFR-2010-title36-vol1/xml/CFR-2010-title36-vol1-
part60.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title36-vol1/xml/CFR-2010-title36-vol1-
4 part60.xml).
- 5 36 CFR 65, "National Historic Landmarks Program," *Code of Federal Regulations*. Available at:
6 [http://www.gpo.gov/fdsys/pkg/CFR-2010-title36-vol1/xml/CFR-2010-title36-vol1-
part65.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title36-vol1/xml/CFR-2010-title36-vol1-
7 part65.xml).
- 8 36 CFR 800, "Protection of Historic Properties," *Code of Federal Regulations*. Available at:
9 [http://www.gpo.gov/fdsys/pkg/CFR-2010-title36-vol3/xml/CFR-2010-title36-vol3-
part800.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title36-vol3/xml/CFR-2010-title36-vol3-
10 part800.xml).
- 11 40 CFR 6, "Procedures for Implementing the National Environmental Policy Act and Assessing the
12 Environmental Effects Abroad of EPA Actions," *Code of Federal Regulations*. Available at:
13 <http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-vol1/xml/CFR-2010-title40-vol1-part6.xml>.
14 6.301, "Applicant Requirements."
15 6.302, "Responsible Official Requirements."
- 16 40 CFR 61, "National Emission Standards for Hazardous Air Pollutants," *Code of Federal
17 Regulations*. Available at: [http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-
vol8/xml/CFR-2010-title40-vol8-part61.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-
18 vol8/xml/CFR-2010-title40-vol8-part61.xml). 61.92, "Standard."
19 61.140, "Applicability."
20 61.145, "Standard for Demolition and Renovation."
21 61.150, "Standard for Waste Disposal for Manufacturing, Fabricating, Demolition,
22 Renovation, and Spraying Operations."
- 23 Subpart H, "National Emission Standards for Emissions of Radionuclides Other Than Radon
24 from Department of Energy Facilities."
- 25 40 CFR 268, "Land Disposal Restrictions," *Code of Federal Regulations*. Available at:
26 [http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-vol26/xml/CFR-2010-title40-vol26-
part268.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-vol26/xml/CFR-2010-title40-vol26-
27 part268.xml).
- 28 40 CFR 761, "Polychlorinated Biphenyls (PCBs) Manufacturing, Processing, Distribution in Commerce,
29 and Use Prohibitions," *Code of Federal Regulations*. Available at:
30 [http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-vol30/xml/CFR-2010-title40-vol30-
part761.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title40-vol30/xml/CFR-2010-title40-vol30-
31 part761.xml).
32 761.50, "Applicability."
33 761.60, "Disposal Requirements."
34 761.61, "PCB Remediation Waste."
- 35 43 CFR 10, "Native American Graves Protection and Repatriation Regulations," *Code of Federal
36 Regulations*. Available at: [http://www.gpo.gov/fdsys/pkg/CFR-2010-title43-vol1/xml/CFR-
2010-title43-vol1-part10.xml](http://www.gpo.gov/fdsys/pkg/CFR-2010-title43-vol1/xml/CFR-
37 2010-title43-vol1-part10.xml).

- 1 50 CFR 402, "Interagency Cooperation—Endangered Species Act of 1973, as Amended," *Code of*
2 *Federal Regulations*. Available at: <http://www.gpo.gov/fdsys/pkg/CFR-2009-title50->
3 [vol7/xml/CFR-2009-title50-vol7-part402.xml](http://www.gpo.gov/fdsys/pkg/CFR-2009-title50-vol7-part402.xml).
- 4 62 FR 39058, "Radiological Criteria for License Termination," *Federal Register*, Vol. 62, No. 139,
5 pp. 39058-39092, July 21, 1997. Available at: <http://www.gpo.gov/fdsys/pkg/FR-1997-07->
6 [21/pdf/97-17752.pdf](http://www.gpo.gov/fdsys/pkg/FR-1997-07-21/pdf/97-17752.pdf).
- 7 *Archeological and Historic Preservation Act of 1974*, Pub. L. 93-291, as amended, 16 USC 469a-1 –
8 469a-2(d). Available at: http://www.nps.gov/history/local-law/fhpl_archhistpres.pdf.
- 9 *Clean Air Act of 1977*, 42 USC 7401, et seq., as amended (1977 and 1990), Pub. L. 101-549. Available at:
10 <http://www.epa.gov/air/caa/>.
- 11 *Comprehensive Environmental Response, Compensation, and Liability Act of 1980*, 42 USC 9601, et seq.,
12 Pub. L. 107-377, December 31, 2002. Available at: <http://epw.senate.gov/cercla.pdf>.
- 13 DOE/EIS-0222-F, 1999, *Final Hanford Comprehensive Land-Use Plan Environmental Impact Statement*,
14 U.S. Department of Energy, Washington, D.C. Available at:
15 <http://www5.hanford.gov/arpir/?content=findpage&AKey=D199158842>.
16 <http://www5.hanford.gov/arpir/?content=findpage&AKey=D199158843>.
17 <http://www5.hanford.gov/arpir/?content=findpage&AKey=D199158844>.
18 <http://www5.hanford.gov/arpir/?content=findpage&AKey=D199158845>.
19 <http://www5.hanford.gov/arpir/?content=findpage&AKey=D199158846>.
20 <http://www5.hanford.gov/arpir/?content=findpage&AKey=D199158847>.
- 21 DOE/EIS-0222-SA-01, 2008, *Supplement Analysis: Hanford Comprehensive Land-Use Plan*
22 *Environmental Impact Statement*, U.S. Department of Energy, Richland Operations Office,
23 Richland, Washington. Available at: http://www.hanford.gov/files.cfm/SAwith_signed-
24 [R1.pdf](http://www.hanford.gov/files.cfm/SAwith_signed-R1.pdf).
- 25 *Endangered Species Act of 1973*, Pub. L. 93-205, as amended, 7 USC 136, 16 USC 1531, et seq.
26 Available at: <http://www.nmfs.noaa.gov/pr/pdfs/laws/esa.pdf>.
- 27 EPA, 2010, "Regional Screening Levels for Chemical Contaminants at Superfund Sites,"
28 U.S. Environmental Protection Agency, Region 3, Mid-Atlantic Risk Assessment. Available
29 at: <http://www.epa.gov/reg3hwmd/risk/human/rb->
30 [concentration_table/Generic_Tables/index.htm](http://www.epa.gov/reg3hwmd/risk/human/rb-concentration_table/Generic_Tables/index.htm).
- 31 Executive Order 11593, 1971, *Protection and Enhancement of the Cultural Environment*, Richard Nixon,
32 May 13. Available at: <http://www.gsa.gov/portal/content/101025>.
- 33 Luftig, Stephen D. and Larry Weinstock, 1997, "Establishment of Cleanup Levels for CERCLA Sites
34 with Radioactive Contamination" (memorandum to Addressees), OSWER No. 9200.4-18,
35 Office of Emergency and Remedial Response and Office of Radiation and Indoor Air,
36 U.S. Environmental Protection Agency, Washington, D.C., August 22. Available at:
37 <http://www.epa.gov/oerrpage/superfund/health/contaminants/radiation/pdfs/radguide.pdf>.
- 38 *Migratory Bird Treaty Act of 1918*, 16 USC 703-712, Ch. 128, July 13, 1918, 40 Stat. 755, as amended.
39 Available at: <http://www.animallaw.info/statutes/stusmba.htm>.
- 40 *National Historic Preservation Act of 1966*, 16 USC 470, et seq. Available at:
41 <http://www.achp.gov/docs/nhpa%202008-final.pdf>.

- 1 *Native American Graves Protection and Repatriation Act of 1990*, Pub. L. 101-601, as amended,
2 25 USC 3001, et seq. Available at: [http://www.nps.gov/history/local-](http://www.nps.gov/history/local-law/FHPL_NAGPRA.pdf)
3 [law/FHPL_NAGPRA.pdf](http://www.nps.gov/history/local-law/FHPL_NAGPRA.pdf).
- 4 OSWER Directive 9200.4-31P, 1999, *Radiation Risk Assessment At CERCLA Sites: Q & A*,
5 EPA/540/R/99/006, Office of Emergency and Remedial Response and Office of Radiation and
6 Indoor Air, U.S. Environmental Protection Agency, Washington, D.C. Available at:
7 <http://www.epa.gov/superfund/health/contaminants/radiation/pdfs/riskqa.pdf>.
- 8 OSWER Directive 9285.7-55, 2005, *Guidance for Developing Ecological Soil Screening Levels*, Office of
9 Solid Waste and Emergency Response, U.S. Environmental Protection Agency,
10 Washington, D.C. Available at:
11 http://www.epa.gov/ecotox/ecossl/pdf/ecossl_guidance_chapters.pdf.
- 12 RCW 18.104, "Water Well Construction," *Revised Code of Washington*, Olympia, Washington. Available
13 at: <http://apps.leg.wa.gov/RCW/default.aspx?cite=18.104&full=true>.
- 14 RCW 70.94, "Washington Clean Air Act," *Revised Code of Washington*, Olympia, Washington.
15 Available at: <http://apps.leg.wa.gov/RCW/default.aspx?cite=70.94>.
- 16 RCW 70.95, "Solid Waste Management—Reduction and Recycling," *Revised Code of Washington*,
17 Olympia, Washington. Available at: <http://apps.leg.wa.gov/RCW/default.aspx?cite=70.95>.
- 18 RCW 70.98, "Nuclear Energy and Radiation," *Revised Code of Washington*, Olympia, Washington.
19 Available at: <http://apps.leg.wa.gov/RCW/default.aspx?cite=70.98>.
- 20 RCW 70.105, "Hazardous Waste Management," *Revised Code of Washington*, Olympia, Washington.
21 Available at: <http://apps.leg.wa.gov/RCW/default.aspx?cite=70.105>.
- 22 RCW 70.105D, "Hazardous Waste Cleanup -- Model Toxics Control Act," *Revised Code of Washington*,
23 Olympia, Washington. Available at: <http://apps.leg.wa.gov/RCW/default.aspx?cite=70.105D>.
- 24 *Resource Conservation and Recovery Act of 1976*, 42 USC 6901, et seq. Available at:
25 <http://epw.senate.gov/rcra.pdf>.
- 26 *Toxic Substances Control Act of 1976*, Pub. L. 107-377, as amended, 15 USC 2601, et seq. Available at:
27 <http://frwebgate.access.gpo.gov/cgi-bin/usc.cgi?ACTION=BROWSE&TITLE=15USCC53>.
- 28 WAC 173-160, "Minimum Standards for Construction and Maintenance of Wells," *Washington*
29 *Administrative Code*, Olympia, Washington. Available at:
30 <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-160>.
- 31 160-460, "What Is the Decommissioning Process for Resource Protection Wells?"
- 32 WAC 173-303, "Dangerous Waste Regulations," *Washington Administrative Code*, Olympia,
33 Washington. Available at: <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-303>.
- 34 303-016, "Identifying Solid Waste."
- 35 303-017, "Recycling Processes Involving Solid Waste."
- 36 303-040, "Definitions."
- 37 303-070, "Designation of Dangerous Waste."

- 1 303-071, "Excluded Categories of Waste."
2 303-073, "Conditional Exclusion of Special Wastes."
3 303-077, "Requirements for Universal Waste."
4 303-120, "Recycled, Reclaimed, and Recovered Wastes."
5 303-140, "Land Disposal Restrictions."
6 303-170, "Requirements for Generators of Dangerous Waste" through 173-303-9907,
7 "Reserved."
8 303-170, "Requirements for Generators of Dangerous Waste."
9 303-200, "Accumulating Dangerous Waste On-Site."
10 303-573, "Standards for Universal Waste Management."
11 303-610, "Closure and Post-Closure."
12 303-630, "Use and Management of Containers."
13 303-640, "Tank Systems."
14 303-64610, "Purpose and Applicability."
15 303-64620, "Requirements." 303-665, "Landfills."
16 303-960, "Special Powers and Authorities of the Department."
17 303-9907, "Reserved."
18 WAC 173-340, "Model Toxics Control Act—Cleanup," *Washington Administrative Code*, Olympia,
19 Washington. Available at: <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-340>.
20 340-720, "Groundwater Cleanup Standards."
21 340-745, "Soil Cleanup Standards for Industrial Properties."
22 340-747, "Deriving Soil Concentrations for Groundwater Protection."
23 340-7490, "Terrestrial Ecological Evaluation Procedures."
24 WAC 173-350, "Solid Waste Handling Standards," *Washington Administrative Code*, Olympia,
25 Washington. Available at: <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-350>.
26 350-025, "Owner Responsibilities for Solid Waste."
27 350-040, "Performance Standards."
28 350-300, "On-Site Storage, Collection and Transportation Standards."
29 350-900, "Remedial Action."

- 1 WAC 173-400, "General Regulations for Air Pollution Sources," *Washington Administrative Code*,
2 Olympia, Washington. Available at: <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-400>.
- 3 400-040, "General Standards for Maximum Emissions."
4 400-075, "Emission Standards for Sources Emitting Hazardous Air Pollutants."
- 5 WAC 173-460, "Controls for New Sources of Toxic Air Pollutants," *Washington Administrative Code*,
6 Olympia, Washington. Available at: <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-460>.
- 7 460-010, "Purpose."
8 460-030, "Applicability."
9 460-060, "Control Technology Requirements."
10 460-070, "Ambient Impact Requirement."
11 460-080, "First Tier Review."
12 460-150, "Table of ASIL, SQER and de Minimis Emission Values."
- 13 WAC 173-470, "Ambient Air Quality Standards for Particulate Matter," *Washington*
14 *Administrative Code*, Olympia, Washington. Available at:
15 <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-470>.
- 16 470-100, "Ambient Air Quality Standards."
17 470-110, "Particle Fallout Standards."
- 18 WAC 173-480, "Ambient Air Quality Standards and Emission Limits for Radionuclides," *Washington*
19 *Administrative Code*, Olympia, Washington. Available at:
20 <http://apps.leg.wa.gov/WAC/default.aspx?cite=173-480>.
- 21 480-040, "Ambient Standard."
22 480-050, "General Standards for Maximum Permissible Emissions."
23 480-060, "Emission Standards for New and Modified Emission Units."
24 480-070, "Emission Monitoring and Compliance Procedures."
- 25 WAC 246-247, "Radiation Protection—Air Emissions," *Washington Administrative Code*, Olympia,
26 Washington. Available at: <http://apps.leg.wa.gov/WAC/default.aspx?cite=246-247>.
- 27 247-035, "National Standards Adopted by Reference for Sources of Radionuclide Emissions."
28 247-040, "General Standards."
29 247-075, "Monitoring, Testing and Quality Assurance."
- 30 WAC 246-272A, "On-Site Sewage Systems," *Washington Administrative Code*, Olympia, Washington.
31 Available at: <http://apps.leg.wa.gov/wac/default.aspx?cite=246-272A>.
32
33 272A-0300, "Abandonment."