Appendix M: Recreation Resources Technical Report

For Programmatic Environmental Impact Statement on Utility-Scale Onshore Wind Energy Facilities in Washington State

By

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Acronyms and Abbreviations List

BESS	battery energy storage system
BLM	Bureau of Land Management
BMP	best management practice
DNR	Washington Department of Natural Resources
PEIS	Programmatic Environmental Impact Statement
RCW	Revised Code of Washington
SMP	Shoreline Master Program
USFS	U.S. Forest Service
USFWS	U.S. Fish and Wildlife Service
WAC	Washington Administrative Code
WDFW	Washington Department of Fish and Wildlife

Summary

This technical resource report describes the conditions of recreation in the study area. It also describes the regulatory context, potential impacts, and measures to avoid or reduce impacts.

Recreational opportunities are vast throughout the onshore wind Programmatic Environmental Impact Statement (PEIS) study area. The study area encompasses lands that range from forested to desert, with various land uses, and have varying ownership. Several areas within the study area contain specifically designated recreational lands and activities. Recreational opportunities within the study area include, but are not limited to, the following:

- Hiking
- Biking (road and mountain biking)
- Backcountry driving
- Hunting
- Horseback riding/stock use
- Bird and wildlife watching
- Wildflower viewing
- Camping
- Paragliding
- Hang gliding
- Dispersed target shooting
- Skiing
- Snowboarding
- Snowshoeing
- Swimming
- Rafting
- Kayaking
- Other paddle sports
- Foraging
- Fishing

Findings for recreational impacts described in this technical resource report are summarized below.

Through compliance with laws and permits and with the implementation of measures to avoid, reduce, and mitigate impacts, most construction, operations, and decommissioning activities would likely result in **less than significant impacts** on recreation.

Potentially significant adverse impacts would occur if:

- The facility results in the loss of recreation resources or crowding of alternative recreational opportunities
- Increased use of neighboring recreational opportunities throughout the operations phase were to result in overcrowding and overuse of those resources
- The facility results in segmentation of recreational facilities, such as severing trail connections, and recreationists no longer have access to the full activity

No potentially significant and unavoidable adverse impacts related to recreation would occur.

Crosswalk with Recreation Resources Technical Report for Utility-Scale Solar Energy

Two PEISs are being released at the same time, one for utility-scale solar energy facilities and one for utility-scale onshore wind energy facilities. This crosswalk identifies the areas with substantial differences between the recreation resources technical reports for each PEIS.

Utility-Scale Solar Energy PEIS	Utility-Scale Onshore Wind Energy PEIS (this document)
• No substantial differences	• No substantial differences

1 Introduction

This report describes recreation in the study area and assesses probable impacts associated with types of facilities (alternatives) and a No Action Alternative. Chapter 2 of the State Environmental Policy Act Programmatic Environmental Impact Statement (PEIS) provides a description of the types of facilities evaluated (alternatives).

This section provides an overview of the aspects of recreation evaluated in this report and lists relevant regulations that contribute to the evaluation of potential impacts.

1.1 Resource description

Recreation provides people the opportunity to engage with and enjoy the natural environment. Washington has vast opportunities for recreation from mountains to deserts that vary by season. Recreational opportunities in Washington include both land- and water-based activities. These opportunities include hiking, biking, backcountry driving, hunting, birdwatching, camping, paragliding, hang gliding, dispersed target shooting, backcountry winter sports (such as skiing, snowboarding, and snowshoeing), swimming, rafting, kayaking, other paddle sports, and fishing. These activities occur in areas designated for recreation, privately owned lands, and lands open for public use.

The geographic scope of study for the onshore wind energy facilities overlaps with areas of the state that are valued for their recreational resources. If an onshore wind energy project is developed within areas used for recreation, it could displace or alter the quality of the recreation experience of these areas.

The following resources could have impacts that overlap with impacts to recreation. Impacts on these resources are reported in their respective technical resource reports:

- **Tribal rights, interest, and resources:** Tribal hunting, fishing, gathering, recreation, and other activities are provided in the *Tribal Rights, Interests, and Resources Technical Report* (Appendix B).
- **Biological resources:** For more information related to the impacts on habitats and wildlife distribution, see the *Biological Resources Technical Report* (Appendix G).
- **Noise:** For more discussion on the noise impacts of facilities, see the *Noise and Vibration Technical Resource Report* (Appendix J).
- **Aesthetics/visual quality:** For more discussion on the visual impacts of facilities, see the *Aesthetics/Visual Quality Technical Resource Report* (Appendix L).
- **Transportation:** For more discussion on potential impacts on traffic from construction, see the *Transportation Resources Technical Report* (Appendix O).

1.2 Regulatory context

Recreational resources within the onshore wind study area are protected by a variety of federal, state, and local plans, policies, and laws. Table 1 lists those that could apply depending on the jurisdictions in which a project is proposed.

Table 1. Applicable laws, plans, and policies

Regulation, statute, guideline	Description
Federal	
Wilderness Act, 1964	The Wilderness Act created the National Wilderness Preservation System and provides the highest level of conservation protection of federal lands. The purpose of the act is to manage wilderness areas to preserve and, where possible, to restore their wilderness character. Wilderness areas are defined as "outstanding opportunities for solitude or a primitive unconfined type of recreation."
National Wilderness Preservation System (43 *Code of Federal Regulations* 19)	Designates more than 111 million acres of protected wilderness areas in the United States for enjoyment of the public.
Wild and Scenic Rivers Act, 1968 (16 *United States Code* 1271-1287)	This act establishes a National Wild and Scenic Rivers System for the protection of rivers that have important scenic, recreational, fish and wildlife, and other resources. The system protects the designated river and an adjacent corridor of land. Wild and scenic river corridors contain both private and public lands. Restrictions associated with the Wild and Scenic River Act apply only to federal lands.
National Recreation Areas (Federal Executive Branch Policy March 26, 1963)	A Federal Executive Branch Policy that establishes National Recreation Areas with the purpose "to fulfill adequately the steeply mounting outdoor recreation demands of the American people." National Recreation Areas are established by acts of Congress. Private lands are not included in National Recreation Areas and are not bound by National Recreation Area rules.
National Forest Management Act, 1976	The National Forest Management Act requires every national forest or grassland managed by the U.S. Forest Service (USFS) to develop and maintain a Land Management Plan (also known as a Forest Plan).
Federal Land Policy and Management Act of 1976	Establishes management guidelines on public lands to protect, develop, and enhance public lands.
Forest and Range Renewable Resource Planning Act of 1974	A long-range planning policy to protect, enhance, and develop renewable resources on forest and rangelands managed by USFS. The Resource Planning Act requires a renewable resources assessment that reports on the status, trends, and projected future uses of the nation's renewable resources on forest and rangelands to occur every 10 years. This assessment looks at the condition of various resources including outdoor recreation.

Regulation, statute, guideline	Description
Executive Order 12962, Recreational Fisheries	Mandates federal agencies, to the extent permitted by law and where practical, to improve the "quantity, function, sustainable productivity, and distribution of U.S. aquatic resources for increased recreational fishing opportunities."
Reclamation Manual (Bureau of Reclamation 2024a)	Consists of policies, directives, and standards utilized by the Bureau of Reclamation. The policies, directives, and standards with the manual assign program responsibilities with the Bureau of Reclamation and serve to document how the bureau conducts business. The manual contains several directives and standards that relate to recreational activities on Reclamation Lands.
National Wildlife Refuge System Administration Act	Provides the U.S. Fish and Wildlife Service with guidelines, directives, and the authority to improve the National Wildlife Refuge System. The Act defines wildlife compatible recreational opportunities including hunting, fishing, wildlife observation, and photography.
State	
Washington State Recreation and Conservation Plan, 2023 (RCO 2023)	Provides a strategic direction for how local, regional, state, and federal agencies, Tribal governments, and private and non-profit partners can work together to make sure Washington residents' outdoor recreation and conservation needs are being met. This plan is updated with new data and findings every few years.
Washington State Shoreline Management Act (Chapter 90.58 Revised Code of Washington [RCW])	Establishes a state-local partnership for managing, accessing, and protecting Washington's shorelines. The law requires local governments to prepare locally tailored policies and regulations for managing shoreline use in their jurisdictions called Shoreline Master Programs (SMPs). Local governments review shoreline development proposals for compliance with SMP standards. Applies to shorelines of the state, including marine waters, streams and rivers with greater than 20-cubic-feet-per-second mean annual flow, lakes 20 acres or larger, upland areas extending 200 feet landward from the edge of these waters, biological wetlands and river deltas connected to these water bodies, and some or all of the 100-year floodplain, including all wetlands.
Washington Forest Practices Act (Chapter 76.09 RCW)	Forest practices in Washington are regulated by means of the Forest Practices Act. This includes all non-federal and non-Tribal lands within the state. The industry is governed by the Washington Forest Practices Board to protect the state's public resources, but also to maintain a viable timber industry. The Washington Department of Natural Resources enforces the rules that are adopted by the Board.
Forest Practices Habitat Conservation Plan (DNR 2024a)	Covers lands that are subject to the Forest Practices Act with goals to protect and provide long-term conservation for several salmonid species and other aquatic- and riparian-dependent species and keep the timber harvest industry economically viable.
Title 220 Washington Administrative Code (WAC), Washington Department of Fish and Wildlife (WDFW)	Identifies WDFW's responsibility to preserve, protect, perpetuate, and manage the state's fish and wildlife species.

Regulation, statute, guideline	Description
RCW 77.04.012, Mandate of Department and Commission	Identifies WDFW's responsibility to conserve the wildlife and food fish, game fish, and shellfish resources in a manner that does not impair the resource.
Local	
Shoreline codes	Local codes regulate development within shorelines of the state in accordance with SMPs and state Shoreline Management Act requirements.
Comprehensive plans	A local planning effort by cities and counties that provides a vision for the community and identifies steps needed to meet that vision. If funding is provided by the state, a required element of a comprehensive plan is a parks and recreation element, which evaluates park and recreational needs within the jurisdiction.
Local county codes	Local county codes may include standards that regulate public and private recreational activities as well as the development and construction of recreational land uses.

2 Methodology

2.1 Study area

The study area consists of areas that are used for recreation (parks, formal and informal recreational opportunities, public lands, and public amenities, such as trails) that could be impacted by the installation of future proposed onshore wind energy facilities. This includes areas within the PEIS geographic scope of study (Figure 1) and areas that are adjacent to it. Recreational resources within the study area could be directly impacted by the construction, operation, or decommissioning of onshore wind energy facilities.

The PEIS geographic scope of study includes various federal, state, and locally managed lands; however, Tribal reservation lands; national parks, wilderness areas, and wildlife refuges; state parks; and areas within cities and urban growth areas were excluded. Some of these areas adjacent to the PEIS geographic scope of study are considered in the study area if they contain recreational resources that may be impacted by facilities.

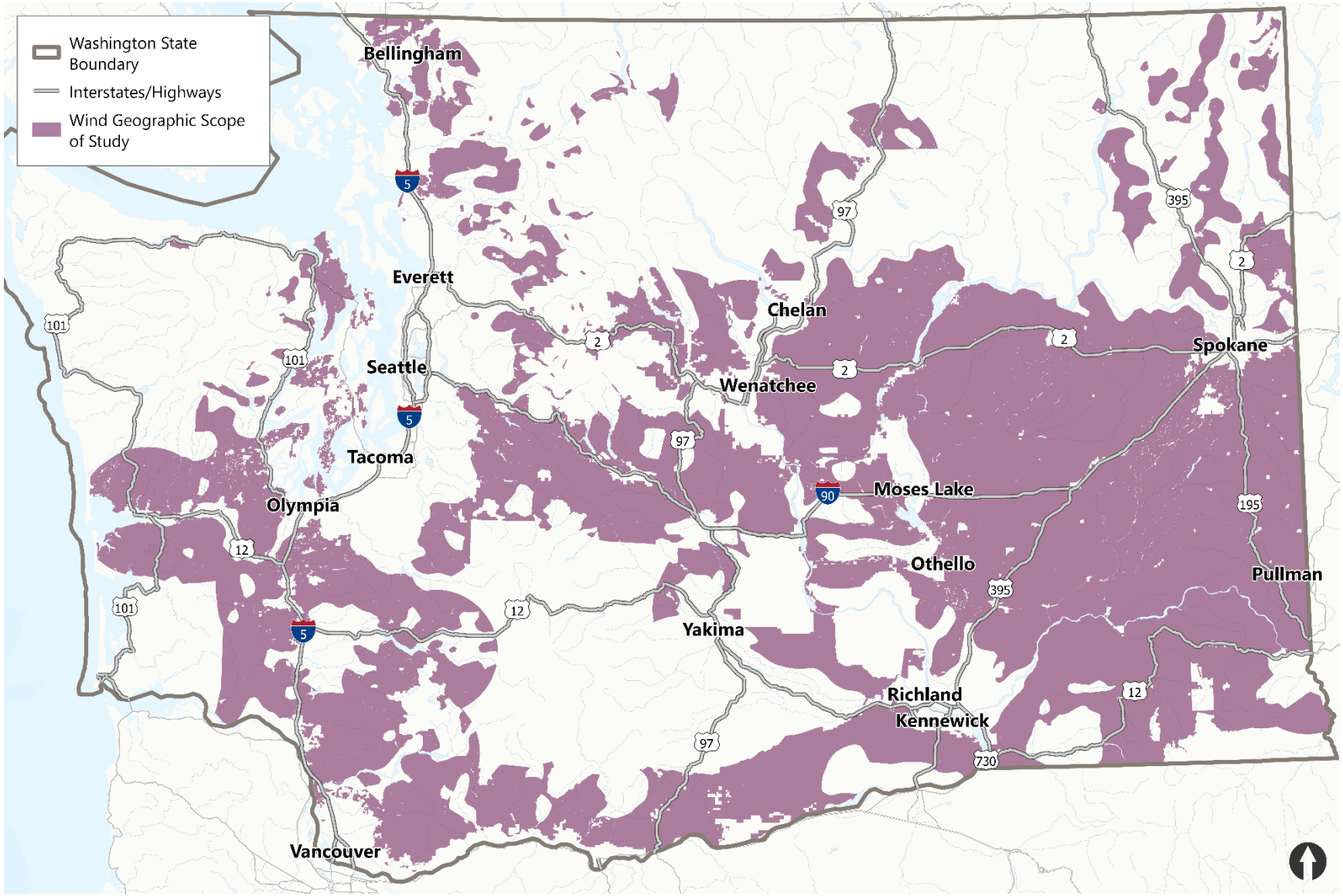

Figure 1. Onshore Wind Energy Facilities PEIS – geographic scope of study

2.2 Technical approach

Recreational opportunities within the study area were identified by reviewing agency websites, maps, and other information sources. Impacts on recreation were qualitatively assessed based on how construction, operation, and decommissioning of a proposed onshore wind energy facility could impact recreational resources. Recreational opportunities within the study area were reviewed to consider possible temporary impacts from construction and decommissioning, such as noise, visibility, and traffic or access changes. Construction, operation, and decommissioning of the onshore wind energy projects were also analyzed to determine whether projects would result in loss, reduced quality, segmentation, or overcrowding of any recreation opportunities.

2.3 Impact assessment approach

The PEIS analyzes a time frame of up to 20 years of potential facility construction and up to 30 years of potential facility operations (totaling up to 50 years into the future). The PEIS geographic scope of study overlaps and is adjacent to areas valued for their recreational opportunities. Impacts were identified by determining how the construction, operation, or decommissioning of onshore wind energy projects would influence recreational use of those opportunities. For the purposes of this assessment, a potentially significant impact would occur if a project resulted in the following:

- A total loss of recreational opportunities with no opportunity for relocation.
- Segmentation of an existing recreational resource. Segmentation would occur if an onshore wind energy facility were developed in the middle of a recreation facility or between previously connected recreation facilities.
- If loss of existing recreational opportunities or facilities could result in overuse and crowding of other recreational activities in the surrounding area.

3 Technical Analysis and Results

3.1 Overview

Recreation in the study area is vast, with various terrain and different opportunities based on season. Recreational activities within the study area range from trail activities to snow and water sports, as well as other unique activities, like target shooting or hang gliding. This section analyzes potential impacts on recreation that could occur with an onshore wind energy facility under the types of facilities (alternatives) analyzed in the PEIS. This section also evaluates measures to avoid, minimize, or reduce the identified impacts, and potential unavoidable significant adverse impacts.

3.2 Affected environment

The affected environment represents the existing conditions at the time this study was prepared. This section describes the variety of recreational opportunities available in the recreational technical resource report study area, which includes areas within and adjacent to the geographic scope of the PEIS. Recreational areas provide opportunities for people to enjoy and engage with the natural and built environment. The study area provides vast opportunities for recreation within various landscapes including mountains, deserts, lakes, and rivers. Designated recreation areas within the study area include local and national parks, national forests managed by the U.S. Forest Service (USFS), and other lands open to public use, including lands managed by Washington Department of Natural Resources (DNR), Washington Department of Fish and Wildlife (WDFW), National Park Service, Bureau of Land Management (BLM), Bureau of Reclamation, and U.S. Fish and Wildlife Service (USFWS). The above recreation areas are adjacent to the geographic scope of the PEIS and include wilderness areas, national monuments, and national wildlife refuges (Figures 2 through 5). Additional designated recreational areas and trails are likely present within the study area, including those on public and private lands, but may not be included in currently available recreational databases or shown on maps.

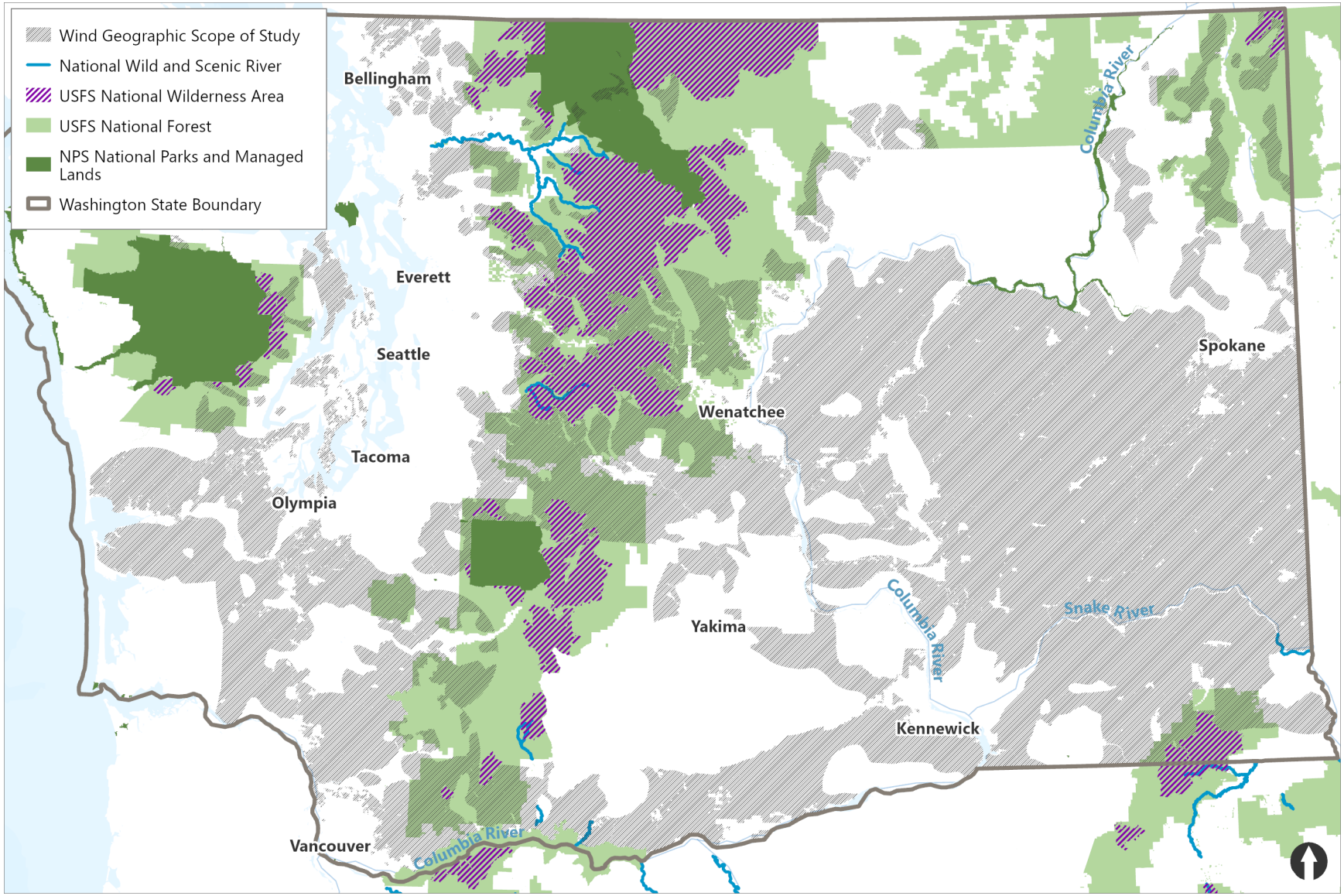

Figure 2. Recreational resources – national parks, forests, scenic rivers, and wilderness areas

Data sources: USFS 2024a, 2024b; NPS 2024; National Wild and Scenic Rivers System 2024

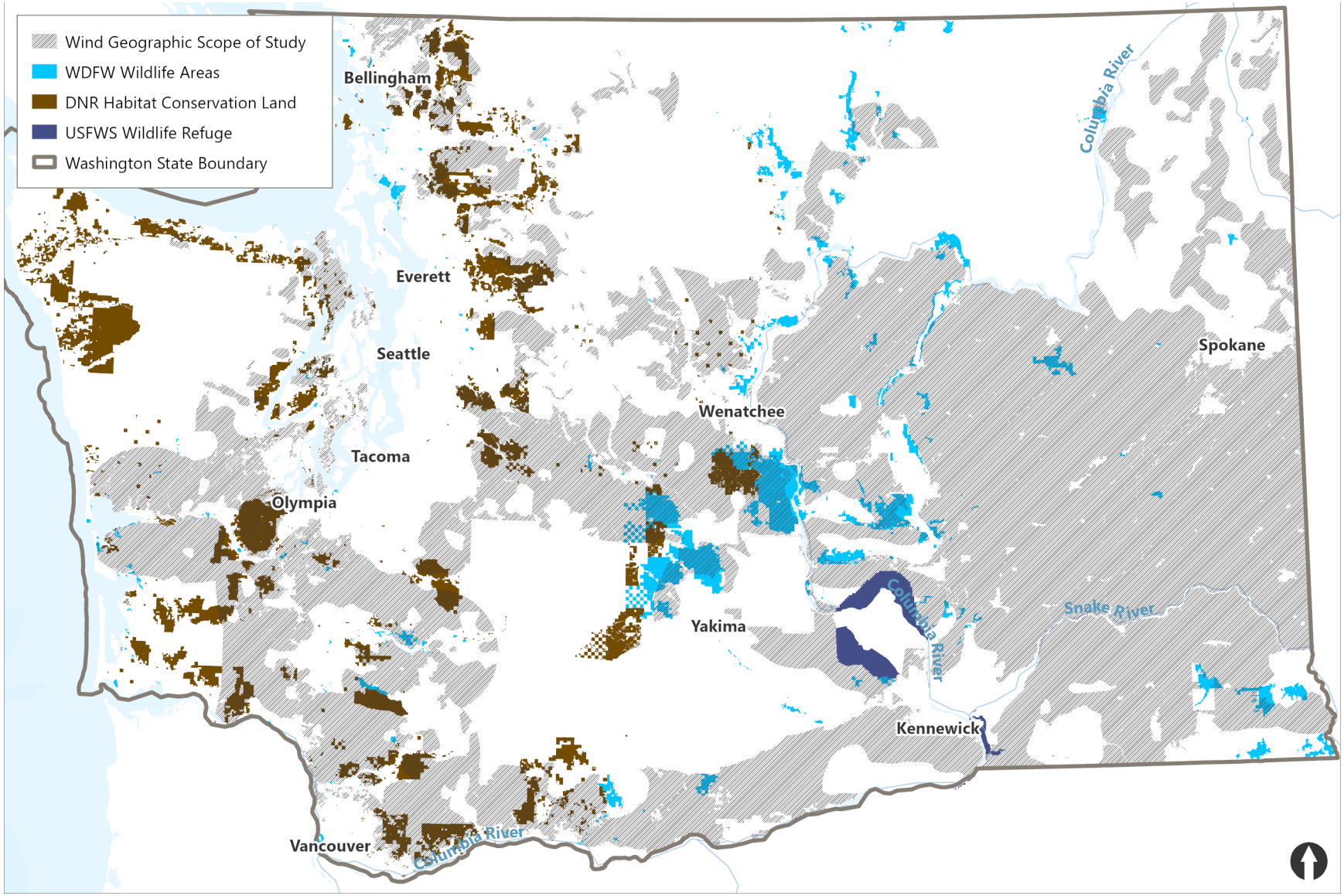

Figure 3. Recreational resources – conservation habitats and wildlife refuges

Data sources: DNR 2024b, 2024c; USFWS 2024

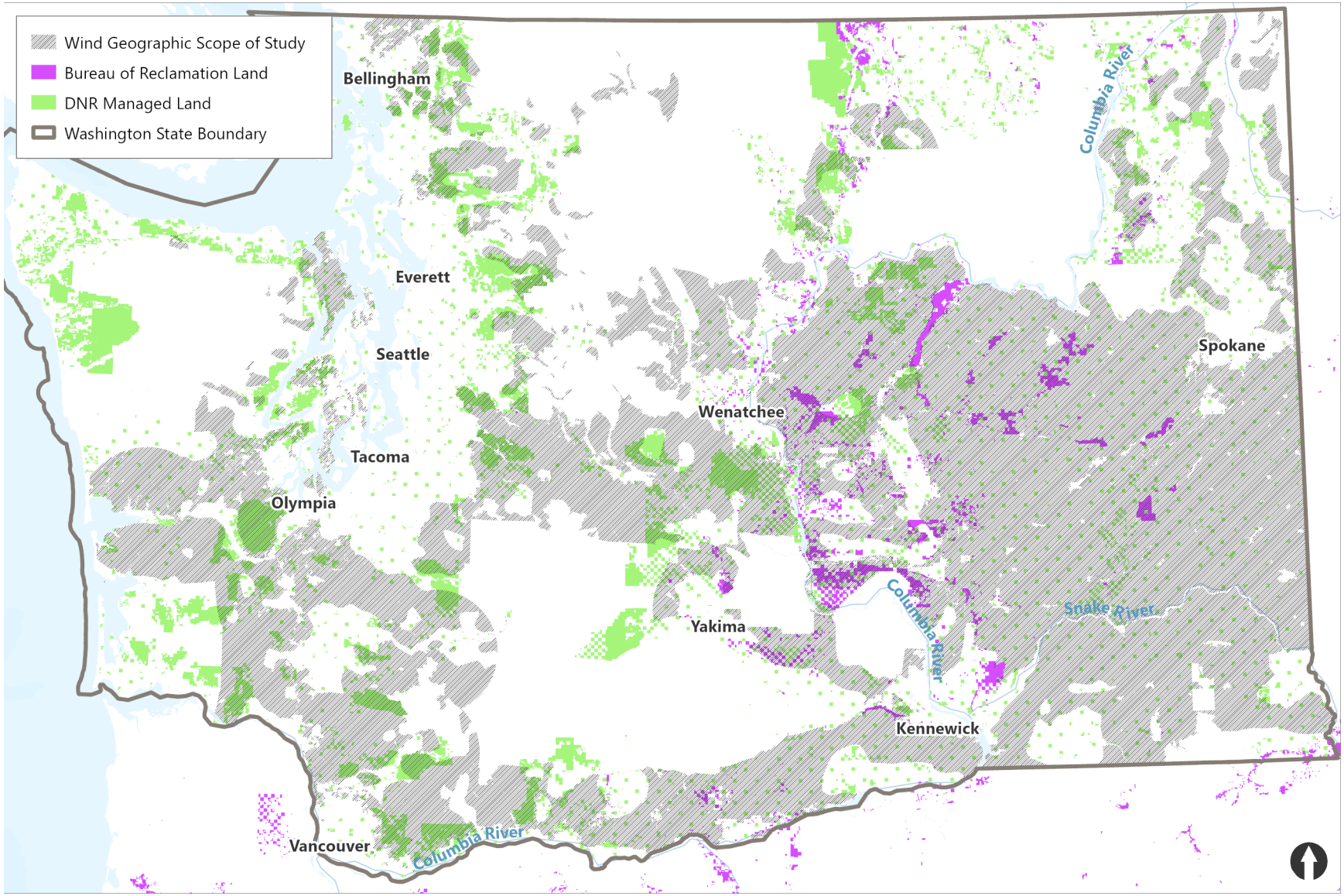

Figure 4. Recreational resources – Bureau of Reclamation and DNR lands

Data sources: DNR 2024b, 2024c; BLM 2024; Bureau of Reclamation 2024b

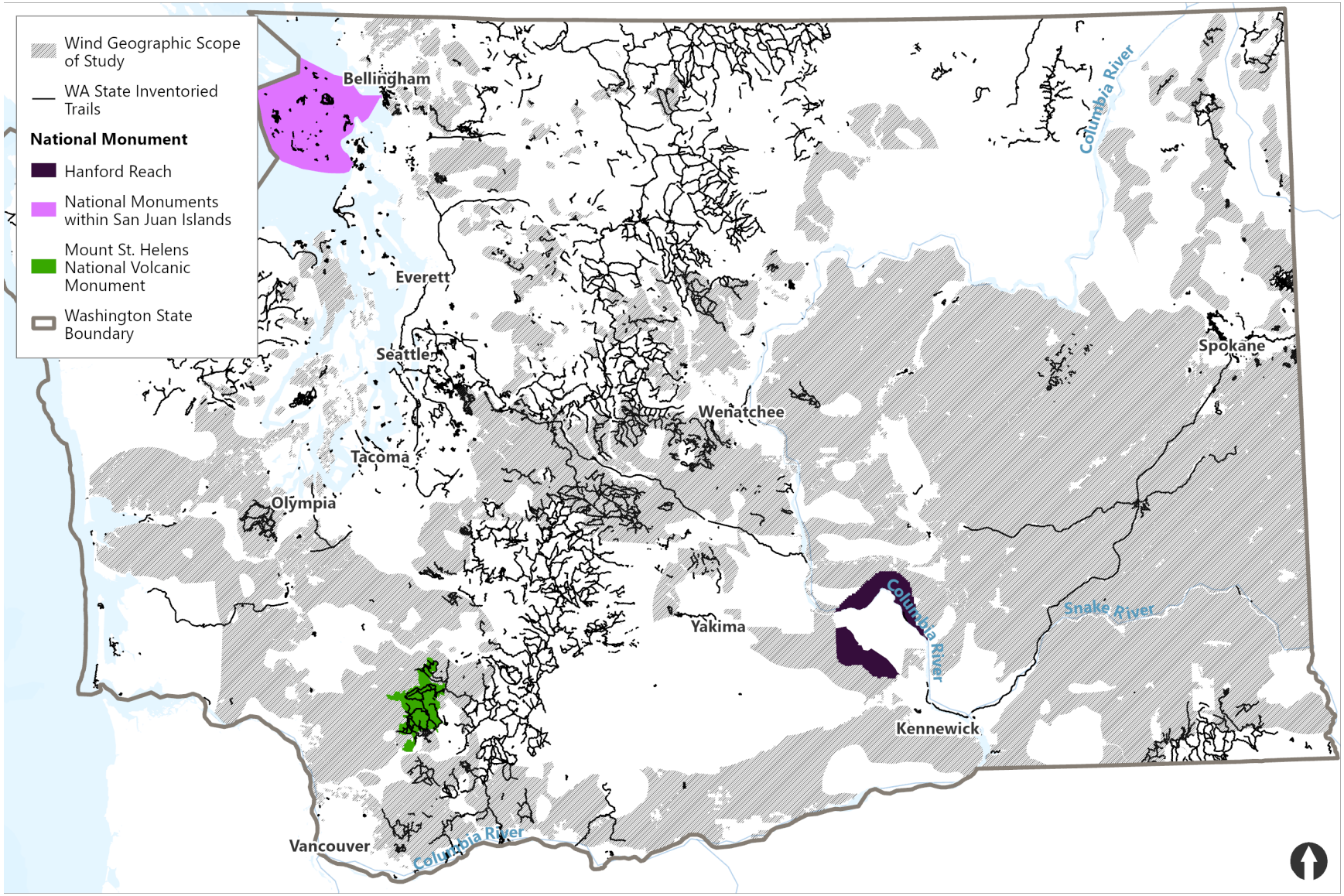

Figure 5. Recreational resources – RCO-inventoried trails and national monuments
Data sources: RCO 2024a; BLM 2024

Many of the recreational opportunities within the study area are used by both residents of the surrounding areas and visitors; these opportunities include, but are not limited to, the following:

- Hiking
- Biking (road and mountain biking)
- Backcountry driving
- Hunting
- Horseback riding/stock use
- Bird and wildlife watching
- Wildflower viewing
- Camping
- Paragliding
- Hang gliding
- Dispersed target shooting
- Skiing
- Snowboarding
- Snowshoeing
- Swimming
- Rafting
- Kayaking
- Other paddle sports
- Foraging
- Fishing

Recreational activities vary with terrain, season, and land use. Activities during the summer typically include more hiking, biking, camping, and water activities, while the winter typically includes more snow-based activities, such as skiing, snowboarding, and snowshoeing. Hunting and fishing seasons vary throughout the year by the species of animal (WDFW 2024a, 2024b). Tribal hunting, fishing, gathering, recreation, and other activities also occur throughout the state at various times during the year; see the *Tribal Rights, Interests, and Resources Technical Report*. To protect the natural environment and prevent overcrowding, some recreational activities require permits or licenses issued from the managing agency, such as USFS, WDFW, DNR, or a private landowner.

Although recreational trails are found throughout the state, most designated trails near the study area are located on federally managed land within the Cascade Mountain Range in the central portion of the state (RCO 2024b). This area contains multiple designated wilderness areas and national forests, as well as WDFW- and DNR-managed lands (Figure 5).

Recreational opportunities are also present on private lands. Landowners engage in recreational activities on their property and can provide access to the public at their discretion. WDFW works with private landowners in the state to provide hunting access and other recreational opportunities to the public through the Private Lands Program (WDFW 2024c).

Informal recreation on public lands also occurs throughout the study area. Informal recreation refers to activities that take place on public lands without a formal designation. Public lands are multi-use areas and can contain leases for other uses besides recreation, including grazing stock, mining energy development, and logging (RCO 2024b; DNR 2023). Informal recreational activities include, but are not limited to, dispersed camping at non-designated sites, wildlife and wildflower viewing, backcountry driving, off-trail hiking and biking, shooting, hunting, and fishing.

Agritourism is another form of recreation potentially offered within the study area. Agritourism includes recreational activities that take place on a farm or ranch and are offered to the general public. Activities associated with agritourism include, but are not limited to, farming and education programs, u-pick fruits and vegetables, farm tours, and petting zoos, as well as various seasonal events and festivals.

Water-based recreation is prevalent throughout the state in coastal areas like the Puget Sound and Pacific Coast, rivers, reservoirs, and lakes, all of which are located within the study area. Similar to the recreational activities described above, opportunities for water-based recreation are available in designated areas, on private property, and on public lands. Wild and scenic rivers are protected rivers valued for their unique characteristics, which often include their recreational opportunities. The onshore wind study area includes parts of multiple wild and scenic designated rivers including the following:

- Middle Fork Snoqualmie River
- Skagit River
- Suk River
- White Salmon River
- Klickitat River
- Snake River

Other major rivers used for recreation in portions of the study area include the Columbia River, the Chehalis River, the Wenatchee River, and non-designated wild and scenic portions of the Snake River.

Outdoor recreation has become increasingly popular in recent years. The Washington State Recreation Conservation Office reports that between 2017 and 2023, 20 different outdoor recreation activities in Washington have seen a double-digit increase in participation rates (RCO 2023). Interest and participation in recreation activities will likely continue to increase in the future with population growth. Based on counts for trail-based recreation at 519 trails, parks, and recreation facilities, ECONorthwest reports that day use is the highest on the western side of the state, with King and Pierce counties having the highest number of annual day use trips within the state. King County had an estimated 48.5 million annual day use visitors and Pierce County had an estimated count of 17 million annual day use visitors. Annual day trips were lowest in counties on the state's eastern side, with most counties in this area having fewer than 3.5 million annual day users reported. Spokane County had the highest annual day-use rate of the eastern Washington counties, with 11.6 million users. Because these data do not capture information for all trails in Washington it was supplemented with information from the 2017 Outdoor Recreation Survey (ECONorthwest 2019). Changes in land use could alter some recreational opportunities in the future; however, the study area is expected to continue to provide a diverse array of recreational opportunities.

3.3 Potentially required permits and approvals

There would be no specific permit requirements for utility-scale onshore wind facilities that pertain to recreation.

3.4 Utility-scale onshore wind facilities

3.4.1 Impacts from construction and decommissioning

Potential short-term construction, site characterization, and decommissioning impacts on areas on or adjacent to onshore wind project sites could include increased noise, dust (and reduced visibility), traffic, and temporary changes in access, as follows:

- **Noise, dust, and visibility:** Recreationists within sight and sound of the construction and decommissioning area for a facility could experience disruption or impairment of their recreational experience because of noise and dust. The magnitude of the impact would be related to the distance from the construction and decommissioning area and local conditions; however, these impacts would not result in a loss of recreation resource (i.e., a resource that is no longer able to be used for recreation). For more discussion on the visual and noise impacts of facility construction see the *Aesthetics/Visual Quality Technical Resource Report* and the *Noise and Vibration Technical Resource Report*.
- **Traffic:** Traffic delays could occur near areas under construction or during decommissioning and along routes used for transporting onshore wind facility components, such as turbine blades. Impacts to traffic could create longer travel times for recreationists to reach their activity. For more discussion on potential impacts on traffic from construction, see the *Transportation Resources Technical Report*.
- **Temporary changes in access:** Construction could limit access to any recreation sites that are in or near construction areas. Some site characterization activities, such as soil borings or installation of meteorological towers, could also lead to restricted access. Access to recreational sites adjacent to construction could be restricted or limited during the construction and decommissioning periods; however, it is not expected that access to adjacent recreation would be eliminated.

Through compliance with laws and permits and with the implementation of measures to avoid and reduce impacts, most construction and decommissioning activities would likely result in l**ess than significant impacts** on recreation.

If construction and decommissioning of a project results in the loss of recreation resources or crowding of alternative recreational opportunities, there would be **potentially significant adverse impacts**.

3.4.2 Impacts from operation

Some projects may allow continued or new recreation on some of their sites, whereas others may restrict recreational access for safety and security reasons. A project may be sited in an

area used and valued for its recreational opportunities and result in the loss of those recreational opportunities (for example, due to fencing that may exclude access or wind turbines or generation-tie transmission lines that may preclude activities like paragliding, hang gliding, mountain biking, hunting, or hiking).

Elimination of recreational opportunities may also result in higher uses of neighboring recreation opportunities or segmentation of existing recreational areas (such as trails).

Recreationists near a project during operations could experience changes that could degrade the recreational experience, including changes in the noise and visual environment. For more discussion of these impacts, refer to the *Aesthetics/Visual Quality Technical Resource Report* and the *Noise and Vibration Technical Resource Report*.

Operations could also result in impacts to vegetation and wildlife species (such as birds) and changes in wildlife habitat areas. These changes could impact hunting and wildlife viewing because they are dependent on where wildlife is located. However, these impacts would not result in the elimination of hunting and wildlife viewing, and these opportunities may still be available at other locations. For more information related to impacts on wildlife and habitats, see the *Biological Resources Technical Report*.

If operation results in the loss of recreation resources or crowding of alternative recreational opportunities, it would be a **potentially significant adverse impact**. If increased use of neighboring recreational opportunities throughout the operations phase were to result in overcrowding and overuse of those resources, such conditions would be **potentially significant adverse impacts**. Segmentation of recreational facilities, such as severing trail connections, could also result in **potentially significant adverse impacts** if recreationists no longer have access to the full activity.

3.4.3 Measures to avoid, reduce, and mitigate impacts

The PEIS identifies a variety of measures to avoid, reduce, and mitigate impacts. These measures are grouped into five categories:

- **General measures:** The general measures apply to all projects using the PEIS.
- **Recommended measures for siting and design:** These measures are recommended for siting and design in the pre-application phase of a project.
- **Required measures:** These measures must be implemented, as applicable, to use the PEIS. These include permits and approvals, plans, and other required measures.
- **Recommended measures for construction, operation, and decommissioning:** These measures are recommended for the construction, operation, and decommissioning phases of a project.
- **Mitigation measures for potential significant impacts:** These measures are provided only in sections for which potential significant impacts have been identified.

3.4.3.1 General measures

- **Laws, regulations, and permits:** Obtain required approvals and permits and ensure that a project adheres to relevant federal, state, and local laws and regulations.

  Rationale: Laws, regulations, and permits provide standards and requirements for the protection of resources. The PEIS impact analysis and significance findings assume that developers would comply with all relevant laws and regulations and obtain required approvals.

- **Coordination with agencies, Tribes, and communities:** Coordinate with agencies, Tribes, and communities prior to submitting an application and throughout the life of the project to discuss project siting and design, construction, operations, and decommissioning impacts, and measures to avoid, reduce, and mitigate impacts. Developers should also seek feedback from agencies, Tribes, and communities when developing and implementing the resource protection plans and mitigation plans identified in the PEIS.

  ***Rationale*:** Early coordination provides the opportunity to discuss potential project impacts and measures to avoid, reduce, and mitigate impacts. Continued coordination provides opportunities for adaptive management throughout the life of the project.

- **Land use:** Consider the following when siting and designing a project:
  - Existing land uses
  - Land ownership/land leases (e.g., grazing, farmland, forestry)
  - Local comprehensive plans and zoning
  - Designated flood zones, shorelines, natural resource lands, conservation lands, priority habitats, and other critical areas and lands prioritized for resource protection
  - Military testing, training, and operation areas

  ***Rationale*:** Considering these factors early in the siting and design process avoids and minimizes the potential for land use conflicts. Project-specific analysis is needed to determine land use consistency.

- **Choose a project site and a project layout to avoid and minimize disturbance:** Select the project location and design the facility to avoid potential impacts to resources. Examples include the following:
  - Minimizing the need for extensive grading and excavation and reducing soil disturbance, potential erosion, compaction, and waterlogging by considering soil characteristics
  - Minimizing facility footprint and land disturbances, including limiting clearing and alterations to natural topography and landforms and maintaining existing vegetation
  - Minimizing the number of structures required and co-locating structures to share pads, fences, access roads, lighting, etc.

***Rationale*:** Project sites and layouts may differ substantially in their potential for environmental impacts. Thoughtful selection of a project site and careful design of a facility layout can avoid and reduce environmental impacts.

- **Use existing infrastructure and disturbed lands, and co-locate facilities:** During siting and design, avoid and minimize impacts by:
  - Using existing infrastructure and disturbed lands, including roads, parking areas, staging areas, aggregate resources, and electrical and utility infrastructure
  - Co-locating facilities within existing rights-of-way or easements
  - Considering limitations of existing infrastructure, such as water and energy resources

  ***Rationale*:** Using existing infrastructure and disturbed lands and co-locating facilities reduces impacts to resources that would otherwise result from new ground disturbance and placement of facilities in previously undisturbed areas.

- **Conduct studies and surveys early:** Conduct studies and surveys early in the process and at the appropriate time of year to gather data to inform siting and design. Examples include the following:
  - Geotechnical study
  - Habitat and vegetation study
  - Cultural resource survey
  - Wetland delineation

  ***Rationale*:** Conducting studies and surveys early in the process and at the appropriate time of year provides data to inform siting and design choices that avoid and reduce impacts. This can reduce the overall timeline as well by providing information to agencies as part of a complete application for environmental reviews and permits.

- **Restoration and decommissioning:** Implement a Site Restoration Plan for interim reclamation following temporary construction and operations disturbance. Implement a Decommissioning Plan for site reclamation at the end of a project. Coordinate with state and local authorities, such as WDFW, county extension services, weed boards, or land management agencies on soil and revegetation measures, including approved seed mixes. Such plans address the following:
  - Documentation of pre-construction conditions and as-built construction drawings
  - Measures to salvage topsoil and revegetate disturbed areas with native and pollinator-supporting plants
  - Management of hazardous and solid wastes
  - Timelines for restoration and decommissioning actions
  - Monitoring of restoration actions
  - Adaptive management measures

  ***Rationale*:** Restoration and decommissioning actions return disturbed areas to pre-construction conditions, promote soil health and revegetation of native plants, remove

project infrastructure from the landscape, and ensure that project components are disposed of or recycled in compliance with all applicable laws and regulations.

- **Cumulative impact assessment:** Assess cumulative impacts on resources based on reasonably foreseeable past, present, and future projects. Identify measures to avoid, reduce, and mitigate cumulative impacts. Consider local studies and plans, such as comprehensive plans.

  ***Rationale*:** Cumulative impacts can result from incremental, but collectively significant, actions that occur over time. The purpose of the cumulative impacts analysis is to make sure that decision-makers consider the full range of consequences under anticipated future conditions.

3.4.3.2 Recommended measures for siting and design

- Consider recreation areas and uses when siting a facility. Contact recreational land managers as early as possible to discuss potential impacts and mitigation.
- Avoid siting facilities in areas valued for recreational opportunities, areas with unique recreation resources, areas that would divide existing recreation areas, or areas that would cause overuse of neighboring recreational activities. This includes both informal recreational areas and recreation in designated recreational areas.

3.4.3.3 Recommended measures for construction, operation, and decommissioning

- Notify recreationists of construction activities by means that would include posting signage, online postings, and press releases. Include a description of the project, expected hours of construction, and potential impacts on the recreational experience.

3.4.3.4 Mitigation measures for potential significant impacts

- Provide new opportunities for recreational activities. Facilities could be designed with biking or hiking trails, wildlife viewing areas, or be open to hunting during portions of the year.
  - Engage with land managers and statewide and local interest groups dedicated to conserving natural resources and recreation (for example, trail associations and environmental advocacy groups) regarding mitigation.

  Rationale: Providing new recreational opportunities can mitigate for loss of recreation resources or crowding of alternative recreational opportunities.

- If segmentation of existing recreational facilities (such as a severed trail connection) cannot be avoided, develop an alternate linkage to connect the remaining segments.

  Rationale: Providing an alternate linkage can mitigate the segmentation of recreational facilities by maintaining the overall connectivity of a recreational facility.

3.4.4 Unavoidable significant adverse impacts

Through compliance with laws and permits and with the implementation of measures to avoid, reduce, and mitigate significant impacts, construction, operation, or decommissioning would have **no potentially significant and unavoidable adverse impacts** on recreation resources from utility-scale onshore wind facilities.

3.5 Onshore wind facilities with battery energy storage systems

3.5.1 Impacts from construction, operation, and decommissioning

Impacts from construction, operation, and decommissioning of onshore wind energy facilities co-located with a battery energy storage system (BESS) would be the same as those discussed for projects without a BESS. For this analysis, it is assumed the BESS would be located within the onshore wind energy project site and would require a small additional area of development, but would not contribute other recreational impacts than described for facilities without a BESS.

Through compliance with laws and permits and with the implementation of measures to avoid and reduce impacts, most construction, operations, and decommissioning activities would likely result in **less than significant impacts** on recreation.

If construction, operations, or decommissioning results in the loss of recreation resources, segmentation without full access to an activity, or crowding of alternative recreational opportunities, there would be **potentially significant adverse impacts**.

3.5.2 Measures to avoid, reduce, and mitigate impacts

Available means of reducing recreational impacts of projects with co-located BESSs are the same as those identified in Section 3.4.3, with the addition of the following measure.

3.5.2.1 Recommended measures for siting and design

- Site the BESS away from any recreational uses to further avoid and minimize potential noise or visual impacts.

3.5.3 Unavoidable significant adverse impacts

Through compliance with laws and permits and with the implementation of measures to avoid, reduce, and mitigate impacts, construction, operation, or decommissioning of projects with a co-located BESS would have **no potentially significant and unavoidable adverse impacts** on recreation resources.

3.6 Onshore wind facilities that include agricultural uses

3.6.1 Impacts from construction, operation, and decommissioning

Recreational opportunities are generally less prevalent in agricultural landscapes because they often do not provide features like trails to support recreation, there are established land uses for livestock or crops, and many of these areas are located on private property. However, privately owned lands can still be used for recreation by the property owner, or the public may have opportunities to participate in recreation opportunities, like hunting, if a landowner participates in WDFW's Private Lands Program, as described in Section 3.2. Agricultural activities located on lands that are multi-use could also support recreational activities.

Impacts from construction, operation, and decommissioning of onshore wind energy projects co-located with agricultural land uses would largely be the same as those discussed in Section 3.4.

Through compliance with laws and permits and with the implementation of measures to avoid and reduce impacts, most construction, operations, and decommissioning would likely result in **less than significant impacts** on recreation.

If construction, operations, or decommissioning results in the loss of recreation resources, segmentation without full access to an activity, or crowding of alternative recreational opportunities, there would be **potentially significant adverse impacts**.

3.6.2 Measures to avoid, reduce, and mitigate impacts

Measures to avoid, reduce, and mitigate impacts would be the same as those identified in Section 3.4.3, including the following additional measure.

3.6.2.1 Recommended measures for construction, operation, and decommissioning

- Offer agritourism activities where agriculture use is co-located.

3.6.3 Unavoidable significant adverse impacts

Through compliance with laws and permits and with the implementation of measures to avoid, reduce, and mitigate impacts, construction, operation, or decommissioning of projects with agricultural use would have **no potentially significant and unavoidable adverse impacts** on recreation resources.

3.7 No Action Alternative

Under the No Action Alternative, agencies would continue to conduct environmental review and permitting for utility-scale onshore wind facilities under existing state and local laws on a project-by-project basis. The potential impacts would be similar to the impacts for the types of facilities described above for construction, operation, and decommissioning, depending on project size and design, and would likely result in **less than significant impacts** to **potentially significant adverse impacts**.

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