

Appendix F. Planning and Permitting for Nature-Based Solutions

Nature-based solutions such as habitat restoration, tidal reconnection, and wetland enhancement can yield substantial resilience, ecological, and community benefits. Yet despite strong local interest and alignment with planning priorities, these projects often face challenges during early development, including fragmented planning processes, funding gaps, and the need for broad, sustained partnerships. This appendix provides a concise resource to help local interested parties better understand the overall project pathway, coordinate early with key partners, and identify relevant permits and processes. It includes a visual overview of typical **key project phases** and the iterative nature of planning, permitting, and funding, a table summarizing **common permits and approvals** needed for estuarine and riparian projects, a graphic illustrating the **regulatory cross section** of estuarine and shoreland jurisdiction, and a glossary of **relevant terms** used by agencies and practitioners.

While this appendix offers a generalized project roadmap, the specific sequence and complexity of steps will vary depending on site conditions, jurisdictional context, and project scope. Every project will look different but flexibility and early coordination remain key. Many state and federal agencies, watershed councils, and technical assistance providers can offer guidance during the early stages. Engaging these partners early can help align your project with funding priorities and permitting requirements. Involving community members and historically underrepresented groups in early scoping and decision-making stages can also help ensure inclusive project development.

Figure 1. illustrates the interconnected nature of this work with six project phases that nature-based projects typically move through. While the process may appear linear, in practice, many components, especially **funding and partnerships**, are ongoing and essential at multiple points. For example, relationship-building and early coordination with permitting agencies, landowners, and funding partners should begin as early as possible and continue throughout the project life cycle. If you're just getting started, begin with **Scoping and Relationship-Building** to identify aligned priorities, potential collaborators, and early feasibility questions.

The cross-sectional graphic illustrates the complex regulatory landscape of Oregon's estuarine and shoreland environments. It depicts the relationship between tidal datums, land classifications (Submerged Land, Tideland, Shoreland), and the jurisdictional boundaries that influence permitting decisions under Statewide Land Use Planning Goals 16 and 17. Key permitting triggers such as DSL and USACE authorities for in-water and fill activities are overlaid with relevant physical features like the mean high water line, wetland limits, and estuarine habitats. This visual provides a shared reference point for understanding how different zones

align with management responsibilities, ownership boundaries, and natural features across the estuarine gradient.

This appendix is intended to complement the Estuary Resilience Action Plans (ERAPs) by helping partners new to nature-based project planning move from planning to implementation with a clearer understanding of what to expect, who to engage, and where to begin.

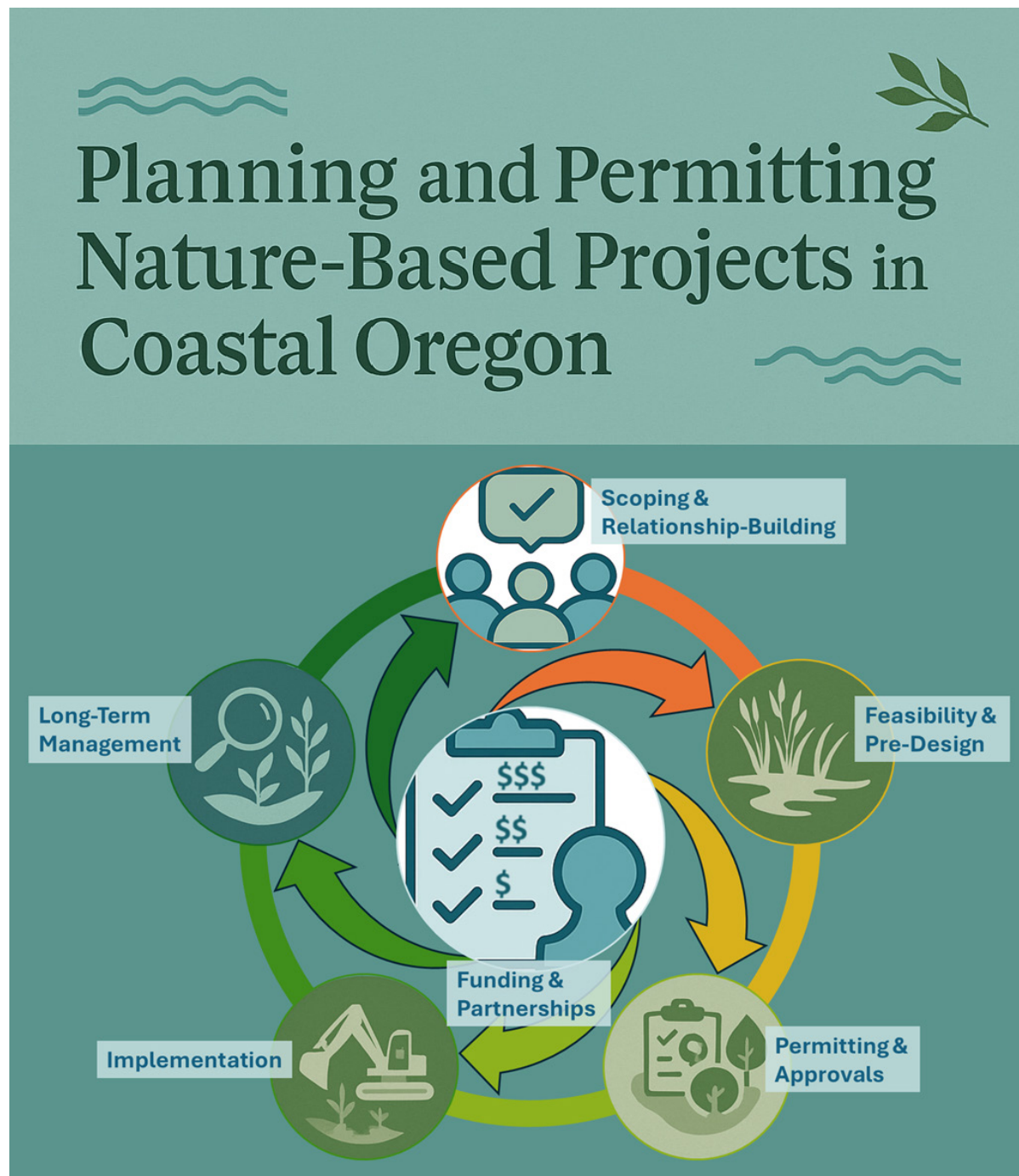


Figure 1. Six key phases of estuary project planning, permitting, and implementation.

Overview of Project Phases

1. Scoping & Relationship-Building

This early stage focuses on identifying opportunities and developing relationships that will carry the project forward. Key actions include identifying landowners and project champions, aligning with local priorities (e.g., estuary management plans, watershed plans), and engaging tribes, public and private entities, community groups, and other local partners.

Tip: Start by identifying local champions such as landowners, tribal representatives, conservation groups, or agency staff, who can help you align with community goals and navigate the permitting landscape.

2. Feasibility & Pre-Design

Technical partners and consultants assess site conditions, evaluate project options, and begin concept or preliminary design work. This phase often includes baseline data collection (e.g., elevation, hydrology, fish presence), access agreements, and early coordination with permitting agencies. Funding for this phase is often limited but crucial for project development.

3. Funding & Partnerships (ongoing throughout)

Securing funding is a major milestone, often requiring match funding and detailed technical designs. Partners may include state or federal grant programs, private foundations, tribes, and infrastructure programs. Coordination is critical: permitting and funding timelines may not align, and applications often require demonstration of stakeholder and landowner support.

4. Permitting & Approvals

Most nature-based projects will require some form of federal, state, or local authorization. Permitting complexity varies based on project type, location (e.g., estuarine vs. upland), and potential environmental impacts. Coordinating early with permitting agencies helps identify potential conflicts and ensures a smoother review process.

5. Implementation

With approvals and funding in place, final designs are completed and on-the-ground work begins. This may include construction, planting, acquisition, or infrastructure replacements. Site access, construction windows, procurement, and contractor management are important logistical factors.

6. Long-Term Management

Projects require long-term care. Monitoring evaluates success criteria such as vegetation establishment, fish passage, or salinity levels. Adaptive management may be necessary to respond to site conditions or performance results. Some funders require multi-year monitoring and reporting.

Table 1. Common Permits and Approvals

Agency	Permit/Approval	When Required	Common Triggers
Oregon DSL	Removal-Fill Permit (ORS 196)	Any fill/removal of 50+ cubic yards in jurisdictional waters/wetlands	Tidal marsh grading, tide gate removal, fill for crossings
USACE	Section 404 Clean Water Act Permit; Section 10	Discharge of dredged/fill material into waters of the U.S.; Impacts to navigable waters	Estuarine restoration, bank stabilization, culvert replacement
Oregon DEQ	Section 401 Water Quality Certification	Required for projects needing a 404 permit	Any activity affecting water quality in state waters
ODFW	Fish Passage Approval	Required when modifying or removing structures affecting fish movement	Tide gate replacement, culvert resizing, dam removal
NMFS / USFWS	Endangered Species Act (ESA) Section 7 or 10 Consultation	Federal funding, permits, or nexus involving listed species	Coho salmon habitat, eelgrass areas, estuarine marsh
City or County	Land Use Approval / Floodplain Development Permit	Most projects in estuaries or floodplains	Earthwork, changes in land use, vegetation clearing
SHPO / Tribes	Cultural Resources Review	When disturbing ground or using state/federal funding	Excavation, grading, work near known sites

Tip: Use the joint agency pre-application process (via DSL) when possible to coordinate feedback from multiple permitting authorities.

Oregon Estuarine and Shoreland Regulatory Cross Section

A cross-sectional diagram illustrating jurisdictional boundaries, tidal datums, ecological classifications, and requirements to support understanding of Statewide Land Use Planning Goals 16 (Estuaries) and 17 (Coastal Shorelands), and state/federal permitting.

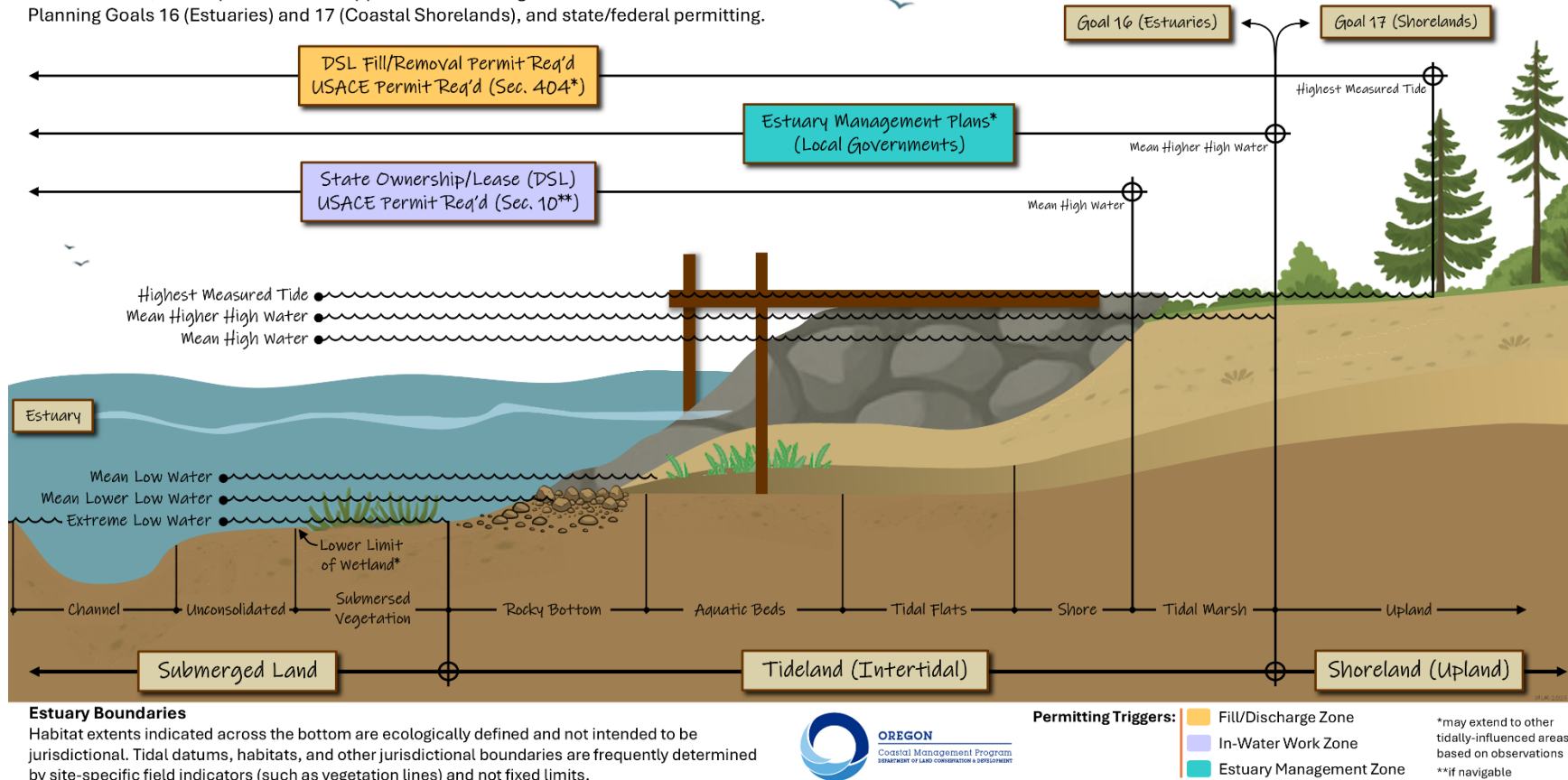


Figure 2. Oregon Estuarine and Shoreland Regulatory Cross Section

Glossary of Key Terms

- **Section 404 (Clean Water Act):** Federal permit administered by USACE for discharges of fill material into wetlands or waters of the U.S.
- **Section 401 (Clean Water Act):** State certification (via DEQ) that a project receiving a federal 404 permit will meet Oregon water quality standards.
- **DSL (Oregon Department of State Lands):** Oversees fill/removal permits and jurisdictional determinations for wetlands and waterways in Oregon.
- **ESA Consultation:** Required when a project may impact species or habitats listed under the Endangered Species Act. Handled through federal agencies.
- **Fish Passage Approval (ODFW):** State-level approval for projects that affect fish migration routes, particularly for native migratory species.
- **Floodplain Development Permit:** Local permit often required for work in FEMA-mapped floodplains, including grading or culvert installation.
- **Joint Permit Application (JPA):** A form used to apply simultaneously to DSL and USACE; simplifies initial permitting step for aquatic projects.
- **Goal 16 - Estuarine Resources:** One of Oregon's Statewide Land Use Planning Goals; guides protection and appropriate development of estuaries based on a classification system and allowable uses.
- **Goal 17 - Coastal Shorelands:** Statewide Land Use Planning Goal that protects the land bordering coastal waters and estuaries, requiring local governments to manage uses in these areas for habitat, hazard avoidance, and water-dependent needs.
- **Land Use Compatibility (LUC):** A requirement that projects must be consistent with local zoning and comprehensive plans; often demonstrated via a Land Use Compatibility Statement (LUCS) signed by the local planning authority.