

Shoreline Compliance Narrative

Kalama Manufacturing and Marine Export Facility

Submitted to:

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SHORELINE COMPLIANCE NARRATIVE

Kalama Manufacturing and Marine Export Facility

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SHORELINE COMPLIANCE NARRATIVE KALAMA MANUFACTURING AND MARINE EXPORT FACILITY

1.0 PURPOSE

The purpose of this narrative is to demonstrate compliance with the Shoreline Master Program (SMP) of Cowlitz County (County) for the development of a methanol production, storage, and shipping facility at the Port of Kalama (Port).

2.0 PROJECT DESCRIPTION

2.1 Proposed Use

Northwest Innovation Works LLC (NWIW) and the Port propose to design and construct the Kalama Manufacturing and Marine Export Facility (the project) to manufacture and export methanol on approximately 100 acres on the Columbia River at the Port's North Port site. The proposed project would consist of a methanol production facility; accessory administrative, support, and infrastructure facilities located in upland areas; and a new marine terminal located on the Columbia River. The marine terminal would include the construction of a new dock that would require work (pile driving and dredging) below the ordinary high water mark (OHWM) of the Columbia River (defined by the U.S. Army Corps of Engineers (USACE) at 11.6 feet Columbia River Datum [CRD] at river mile [RM] 72). The proposed marine terminal would accommodate the oceangoing vessels that would transport methanol to destination ports. It would also be designed to accommodate other vessel types and, when not in use for loading methanol, would be made available for general use by the Port, for other cargo operations, as a lay berth where vessels could moor while waiting to use other Port berths, and for topside vessel maintenance.

The proposed project is designed to produce up to 10,000 tonnes per day of AA-grade methanol from natural gas. The proposed manufacturing facility will have two production lines, each with a production capacity of 5,000 tonnes per day. The project site and infrastructure will be developed to accommodate both production lines. The anticipated yearly production at full capacity is approximately 3.6 million tonnes of methanol. The methanol would be stored in non-pressurized aboveground storage tanks with a total capacity of approximately 200,000 tonnes surrounded by a containment area. Methanol would be transferred by pipeline from the storage area to a deep draft marine terminal to be constructed by the Port on the Columbia River.

The proposed project would receive natural gas from the Kalama Lateral Pipeline project to be constructed by Northwest Pipeline GP (Northwest Pipeline). The proposed pipeline is a separate related action, by Northwest Pipeline, and is under the jurisdiction of the Federal Energy Regulatory Commission (FERC) (FERC Docket # CP 15-8). The pipeline project proposes to permit, construct, and operate a 3.1-mile, 24-inch diameter

natural gas pipeline to provide natural gas transportation service to the proposed project. Information on the project is contained in NEPA resource reports prepared for the project in 2012, and the Environmental Assessment (EA) prepared for the project and available on the FERC docket online at <http://www.ferc.gov/docs-filing/elibrary.asp>.

In order to provide electric service to the proposed project, it is expected that Cowlitz PUD will upgrade an existing transmission line from its existing Kalama Industrial Substation to the project site by installing new lines on existing towers within the existing transmission line corridor. New equipment (e.g., 115 kV breakers and switches) would be installed at the Kalama Industrial Substation within the existing footprint of that facility. Cowlitz PUD also has indicated that it may construct a short transmission line (approximately 750 feet) between the Kalama Industrial Substation and an existing 115 kV transmission line on the east side of Interstate 5 (I-5) to provide redundant supply to the substation. This short line would cross I-5, Hendrickson Drive and the railroad and would require installation of new poles. The new lines and improvements to the Kalama Industrial Substation would constitute a related action on the part of the Cowlitz PUD. Cowlitz PUD would acquire any necessary environmental permits for this related action.

2.2 Construction and Permitting

During peak construction activities, there would be an average of approximately 1,032 workers per day. This schedule includes workers associated with the marine terminal construction activities. The peak construction period would last for approximately 2 to 3 months; on-site construction employment would be lower throughout the remainder of the construction period. The project would employ approximately 192 full time employees including administrative and management, production, maintenance, logistics and technical staff. Additional workers will be required to tie up and release vessels calling on the facility and to load the vessel.

It is expected that some components of the facility (e.g., boilers, air separation units, water treatment, substation, and motor control centers) will be assembled off-site and transported to the project site via barge. These modules may be offloaded from the existing Steelscape dock, may be offloaded directly from the barges using a temporary crane, or may be offloaded across temporary falsework for the new dock trestle. A temporary concrete crane pad will be constructed on an upland portion of the site for offloading materials/equipment from barges. Once offloaded, the equipment/modules will be moved into place and erected on the site. The temporary concrete pad will be demolished and the temporary crane removed prior to project completion.

Two dredge material stockpiles are currently located at the site. The first stockpile is located in the central and eastern part of the site and the second is located in the northwest portion of the site bordered by the Columbia River shoreline on the west and the back channel, wetland area to the east. The first stockpile is roughly rectangular shaped, with a generally level top, and elevations of approximately 40 feet CRD, which

is 10-15 feet higher than site elevations immediately adjacent to the stockpile. The second stockpile fills the northwestern “finger” of the site and reaches elevations of approximately 45 feet CRD (20 feet higher than site elevations immediately adjacent to the stockpile). The two stockpiles total approximately 650,000 cubic yards of material; each stockpile contains approximately 325,000 cubic yards of material.

The Port of Kalama intends to remove the first stockpile located in the central and eastern portion of the site and transport the material to one of the Port’s permitted upland dredge material disposal sites for reuse by the Port. The Port will remove this stockpile independent of the proposed development of the methanol manufacturing facility.

Material from the second stockpile located in the northwestern part of the site will be used to mass grade the site to an elevation of approximately 23 feet +/- CRD. The northwestern portion of the site may be elevated to as high as approximately 33 feet CRD to provide for additional stormwater infiltration capacity. All slopes on the site would be 2:1 or less and no retaining walls are anticipated. All buildings and structures on the site would be setback from the top or toe of slopes in accordance with applicable Cowlitz County setback criteria.

Following mass grading of the site to finished subgrade elevation, further grading would be conducted to accommodate the infiltration pond, building foundations, and utilities, and tank storage area containment berms. Pond slopes will be inclined at 2:1 or less. The total cubic yards of material excavated for the ponds, building foundations, and utilities is expected to be approximately 200,000 cubic yards. A portion of excavated materials from the ponds and building foundations would be used for backfill and fine grading for drainage. Excess materials, if any, will be placed at one of the Port’s permitted upland dredge material disposal sites for reuse by the Port.

The proposed project is subject to environmental review under the State Environmental Policy Act (SEPA). The Port and Cowlitz County are serving as co-lead agencies for the SEPA environmental review. A SEPA Draft Environmental Impact Statement (EIS) is being developed to meet the environmental review requirements of the Port, Cowlitz County, and other state and local agencies with jurisdiction over the proposed project. The SEPA EIS is also expected to be used to support NEPA review of applicable federal actions. The SEPA EIS and supporting studies will be submitted to the County under separate cover. The SEPA Final EIS must be completed prior to issuance of decisions for shoreline permits by Cowlitz County.

A detailed description of the project is provided in Attachment A. (Please see the table of contents and the following pages for a list of attachments.)

3.0 ZONING

The project site is located in an unincorporated portion of the County. The project site and the parcels immediately adjacent to the project site are unzoned and therefore are not subject to the County zoning regulations established in the Land Use and Development Code, Chapter 18.10 of the Cowlitz County Code (CCC). Dimensional standards and use restrictions are not established for unzoned property.

4.0 SHORELINE DESIGNATIONS, WATER-ORIENTATION, AND PROJECT ELEMENTS

The portions of the proposed project located within 200 feet landward of the OHWM or within the Columbia River are in the Urban and Conservancy shoreline districts designated by Cowlitz County’s SMP, as shown in Attachment E. The southern portion of the project site, beginning at the southern extent of backwater channel of Columbia River that extends into the site is located within the Urban District of the shoreline. The northern portion of the project site (north of the Urban District boundary) is located in the Conservancy District of the shoreline. Proposed uses in the Urban and Conservancy districts are shown in Table 1.

Water-dependent uses must locate on the water by their intrinsic nature. Water-related uses depend upon a shoreline location for their economic viability and support water-dependent uses. Water-enjoyment uses are recreational in nature and provide access to the shoreline. For the proposed project, water-dependent uses are the dock and export facilities, while the upland methanol production facility and accessory uses are water-related because they support the water-dependent use, which is the export of methanol from the proposed dock facility. Water-dependent, water-related, and water-enjoyment uses are further defined in WAC 173-26-020. Please see Table 1, which classifies proposed shoreline uses on the site into water-dependent, water-related, and water-enjoyment.

Table 1. Proposed Uses by District and Water-Oriented Classification

Proposed Use	Conservancy District (Permitted or Conditionally Permitted)	Urban District (Permitted or Conditionally Permitted)
Water-Dependent Uses/Activities		
Dredging	X(P)	X (C)
Ranney well and associated improvements		X (P)
Dock (for mooring and loading methanol onto ships cargo operations, loading and unloading, vessel supply operations, layberthing, for short- and long-term vessel moorage) <ul style="list-style-type: none"> • Dock structure (piles, caps, decking, etc.) • Stormwater pump station • Longshore break shelter 		X (P)

Proposed Use	Conservancy District (Permitted or Conditionally Permitted)	Urban District (Permitted or Conditionally Permitted)
<ul style="list-style-type: none"> • Security gate • Operation shack • Hydraulic and electrical utility box • Mechanical loading arms • Utilities 		
Temporary falsework		X(P)
Habitat Mitigation	X (P)	
Water-Related Uses		
Methanol pipelines		X (P)
Bulk product storage tanks	X (C)	
Fire suppression water storage	X (C)	
Pipe rack		X (P)
Methanol pump pad/ship scrubber		X (P)
Site process water pump station/collector well		X (P)
Utilities serving site uses		X (P)
Infiltration pond	X (C)	
First flush pond	X (C)	
Foam building	X (P)	
Security guard shack		X (P)
Security guard shack parking		X (P)
Air separation unit		X (P)
Stormwater weir and outfall removal		X (P)
Electrical Substation		X (P)
Security fencing	X (C)	X (P)
Loop Road	X (P)	
Site grading and excavation	X (C)	X (P)
Temporary construction structures (temporary crane pads, , and construction trailers)	X(P)	X (P)
Water-Enjoyment Uses		
Parking for recreation	X (P)	
Recreational access point	X (P)	
Tradewinds Road (private)	X (P)	X (P)

Note: P = permitted outright, C = conditional use permit required

Table 1 also shows proposed uses permitted outright versus those requiring a conditional use permit under the County’s SMP. All proposed uses within shoreline jurisdiction shown in Table 1 are permitted outright with the exception of: (1) proposed

dredging in the Urban District for the dock (2) all proposed water-related industrial uses in the Conservancy District (fire suppression water storage, infiltration pond, the security fencing, and the first flush pond) which require a shoreline conditional use permit. A first flush pond collects and treats potentially contaminated stormwater from the methanol facility prior to release to the infiltration pond. The first flush pond, infiltration ponds, fire suppression water storage, security fencing, and other proposed shoreline uses are integral to the operation and support of a methanol manufacturing facility, are therefore considered to be water-related industrial uses, and are further described in the expanded project description in Attachment A. Permanent uses permitted outright require a shoreline substantial development permit.

This narrative provides justification for both types of uses (permitted and conditional uses) in support of the issuance of shoreline permits under the County's SMP. The SMP gives preference to development and redevelopment of existing port areas in Economic Development policy 5g of the SMP. Although the project proposes conditional uses under the SMP, upland water-related port industrial uses will be located in impacted areas on the site previously used for the placement of dredge spoils meeting policy 5g. In addition, the applicant is proposing mitigations for impacts to aquatic and riparian areas. All other proposed uses are permitted in the shoreline districts in which they are proposed. Therefore, as demonstrated in this narrative, the project complies with the SMP.

5.0 REGULATORY COMPLIANCE

5.1 Washington Administrative Code (WAC 173-27)

5.1.1 Review Criteria for All Development (WAC 173-27-140)

(1) No authorization to undertake use or development on shorelines of the state shall be granted by the local government unless upon review the use or development is determined to be consistent with the policy and provisions of the Shoreline Management Act and the master program.

Response: The Washington Shoreline Management Act (SMA) promotes water-dependent and water-related uses in areas designated as shorelines of the state. The SMA specifically states that preferred uses of the shoreline include those which are "dependent upon use of the state's shoreline [and] alterations of the natural condition of the shorelines of the state, in those limited instances when authorized, shall be given priority for... ports, shoreline recreational uses including but not limited to parks, marinas, piers, and other improvements facilitating public access to shorelines of the state, [and] industrial and commercial developments which are particularly dependent on their location on or use of the shorelines of the state". Because the project is a manufacturing and marine export facility, is an industrial development located on Port property that requires a waterfront location, and includes public recreation access to appropriate areas of the site, the project is consistent with policies of the SMA.

Compliance with the County's SMP is addressed in section 5.3 of this narrative. As discussed in the JARPA (Attachment G), the entirety of the site, including the northwestern portion, is located in a highly degraded area where dredge material has been placed through previously permitted activities. Development of the project site generally avoids impacts to high quality terrestrial, aquatic, and riparian habitats because it is located on a previously impacted site. Mitigation measures for impacted aquatic and shoreline ecological resources (riparian and wetland buffers) will include pile removal, engineered log jams (ELJs), and riparian and wetland buffer plantings. These measures will ensure that the project does not result in significant adverse impacts to the shoreline environment in compliance with both the SMP and the SMA.

(2) No permit shall be issued for any new or expanded building or structure of more than thirty-five feet above average grade level on shorelines of the state that will obstruct the view of a substantial number of residences on areas adjoining such shorelines except where a master program does not prohibit the same and then only when overriding considerations of the public interest will be served.

Response: The project is located in a port-industrial area. No residential communities adjoin the shoreline; therefore, no adjoining residential views would be obstructed by site development. The nearest residences are located approximately one-half mile or more northeast of the site. These residences have views of segments of the Columbia River and adjacent heavy industrial facilities, however, these views are dependent on the vegetation present around the homes and their orientation to the site.

All project elements within shoreline jurisdiction, with the exception of the bulk product storage tanks, loading arms on the dock, dock lighting, and the air separation units would be 35 feet or less in height. The storage tanks would be approximately 105 feet in height. In the stowed positions, the methanol loading arms would be approximately 100 feet in height above the dock surface. Dock lighting would be mounted on 40-foot tall steel poles. The air separation units would be 60 feet high. The elements of the project taller than 35 feet would not "obstruct the view of a substantial number or residences on areas adjoining such shorelines because there are no residential areas adjoining the project site.

5.1.2 Review Criteria for Substantial Development Permits (WAC 173-27-150)

This narrative includes a completed SSDP application as Attachment C. Consistent with this permit request, the review criteria required by the SMA are discussed below; County regulations pertaining to this request are discussed in section 5.3.

(1) A substantial development permit shall be granted only when the development proposed is consistent with:

(a) The policies and procedures of the act;

Response: As a port-related development containing water-dependent, water-related, and water-enjoyment elements, the facility is consistent with the intent of the SMA. The SMA encourages water-oriented development (water-dependent, water-related, and water enjoyment) within shoreline areas and discourages non-water-dependent uses. Water-dependent uses are given the highest priority followed by water-related and water-enjoyment uses, as stated in RCW 90.58.020. The purpose of the facility is to produce methanol and export the finished product by ocean-going vessels. The proposed dock export facility is a water-dependent use. Methanol production is considered to be a water-related use since it needs to be located in immediate proximity to the dock export facility to support the water-dependent export of methanol. Therefore, the project meets the objectives of the act to encourage water-oriented uses in the State's shorelines. Consistency with these and other County policies is outlined further in section 5.3.

(b) The provisions of this regulation; and

Response: In compliance with this regulation, a completed SSDP application is attached to this narrative.

(c) The applicable master program adopted or approved for the area. Provided, that where no master program has been approved for an area, the development shall be reviewed for consistency with the provisions of chapter 173-26 WAC, and to the extent feasible, any draft or approved master program which can be reasonably ascertained as representing the policy of the local government.

Response: The project's compliance with the approved County SMP is discussed below in section 5.3.

5.1.3 Review Criteria for Conditional Use Permits (WAC 173-27-160)

In accordance with the SMP, the applicant is providing a response to the CUP criteria for water-related industrial uses located in the Conservancy District on the northwest portion of the project site and for dredging proposed in the Urban District of the shoreline. A completed CUP application is included in Attachment D.

(1) Uses which are classified or set forth in the applicable master program as conditional uses may be authorized provided that the applicant demonstrates all of the following:

(a) That the proposed use is consistent with the policies of RCW 90.58.020 and the master program;

Response: The project's compliance with RCW 90.58.020 is addressed in section 5.2.

(b) That the proposed use will not interfere with the normal public use of public shorelines;

Response: Consistent with policies regarding public use of the Urban and Conservancy districts, public access to the shoreline would be maintained on the northwest side of the project site adjacent to the shoreline. Public access would continue to be provided to the shoreline via a 2-lane road owned and maintained by the Port of Kalama for recreational access (Tradewinds Road) along the north side of the proposed facility. Tradewinds Road would not be publicly dedicated and would therefore qualify as a “private roadway” under Cowlitz County Code section 11.36.040. The road would end at a new 21-car parking area constructed adjacent to the methanol facility and the Columbia River shoreline in the northwest portion of the project site. The parking area would provide public access for low-intensity recreational uses such as scenic viewing and walking the unofficial trail systems of the area.

The security fence constructed around the facility would not interfere with public access to the shoreline on the northwest portion of the site. Public access to the shoreline would be maintained by Tradewinds Road and the roadway would not be restricted. Therefore, normal public uses of the shoreline in the location of the site would be maintained and enhanced with the project.

(c) That the proposed use of the site and design of the project is compatible with other authorized uses within the area and with uses planned for the area under the comprehensive plan and shoreline master program;

Response: As stated above in section 3.0, the site is unzoned and has a comprehensive plan designation of Heavy Industrial. The Heavy Industrial comprehensive plan designation is intended to accommodate heavy industrial uses, such as is proposed for the subject site. Existing industrial uses adjacent to the site include steel shipping and manufacturing (Steelscape, Inc.), the Port’s domestic wastewater treatment plant, and the Air Liquide industrial facility. Steelscape consists of multiple large buildings and a marine terminal.

In addition to consistency with local land use policy, shoreline districts (Urban and Conservancy) in the project area permit water-dependent port-related activities as outlined in the SMP. Water-related, port industrial uses, like those proposed for the northwest portion of the project site, while permitted uses in the Urban shoreline district, are conditional uses in the Conservancy District. Compliance with the conditional use permit criteria for these water-related industrial uses is demonstrated in this section and in section 5.3.2.

(d) That the proposed use will cause no significant adverse effects to the shoreline environment in which it is to be located; and

Response: Impacts associated with the in-water and riparian portions of the project are outlined in the Joint Aquatic Resources Permit Application (JARPA) that is included as Attachment G.

As earlier discussed, the northwest portion of the project site in the Conservancy District is proposed to be developed with water-related industrial uses supporting the water-dependent port facility proposed on the Columbia River. Proposed uses requiring a conditional use permit in the Conservancy District in the northwestern portion of the project site within shoreline jurisdiction consist of the infiltration pond; fire suppression water storage; first flush pond; and security fencing. The applicant is also proposing to dredge approximately 126,000 cubic yards in the Urban and Conservancy Districts to accommodate ocean going vessels at the proposed new dock which requires a conditional use permit. The following discussion summarizes the impacts and mitigations for the water-related industrial uses proposed on the northwest part of the site in the Conservancy District and dredging in the Urban District.

As discussed in the JARPA (Attachment G), the entirety of the site, including the northwestern portion, is located in a highly degraded area where dredge material has been placed through previously permitted activities. The project site design specifically avoids impacts to high quality terrestrial, aquatic, and riparian habitats by locating on a previously developed site.

The proposed infiltration pond, security fencing, and associated water related upland site improvements (including grading and excavation) in the Conservancy District would impact approximately 8,010 square feet (0.18 acre) of riparian buffer. The portion of the recreation access road in this district would impact approximately 3,446 square feet (0.08 acre), and the recreation parking area would impact approximately 8,707 square feet (approximately 0.20 acre) of riparian buffer. Additionally, the recreation parking area would impact approximately 3,904 square feet (0.09 acre) of wetland buffer.¹ Development in the wetlands has been specifically avoided through the layout of site features.

Mitigation for these impacts, as well as impacts to riparian and wetland buffers from the recreational access improvements, dock trestle, and associated upland site improvements would include pile removal, ELJ installation, riparian enhancement and invasive species management within an area 1.41 acres in size along the Columbia River, and enhancement of 0.58 acre of wetland buffer at the north end of the site.

Three acres of the project site that have been potentially suitable for streaked horned lark nesting are located on the northern peninsula of the site, on an area of dredge material that was placed as part of the USACE Columbia River navigation channel improvement project. The USACE recently conducted an ESA Section 7 consultation for dredging associated with the maintenance of the Columbia River navigation channel. The USACE used Normalized Difference Vegetation Index (NDVI) data in the biological assessment that was part of the Section 7 consultation to judge the extent of suitable

¹ Riparian and wetland buffer impact quantities may vary from the project JARPA in Attachment G. Impact areas cited in this narrative are current and should be used in place of areas listed in the JARPA.

nesting habitat throughout the lower Columbia River (USACE 2014). The USACE estimates that these 3 acres will be available as suitable streaked horned lark nesting habitat only through the 2015 summer nesting season, as ground cover increases to render the area non-habitat (USACE 2014, U.S. Fish and Wildlife Service [USFWS] 2014a).

The USACE and USFWS study also indicate that birds that might otherwise have attempted to nest at the site in previous years, are expected to disperse to favorable nesting conditions in the vicinity such as those on nearby Howard or Sandy Islands (USACE 2014, USFWS 2014a).

A conditional use permit is also requested for dredging for the marine terminal. Several best management practices (BMPs) and conservation measures will be implemented to minimize environmental impacts during dredging, and these are described in Section 8a of the JARPA. Dredging specific BMPs include the following:

- Conducting dredging during the work window approved for the project
- Dredging will be conducted to prevent impingement of juvenile salmonids by dredging equipment
- Construction activities will be conducted in compliance with Surface Water Quality Standards for Washington
- Appropriate BMPs will be employed to minimize sediment loss and turbidity generation during dredging
- Enhanced BMPs may also be implemented and may include slowing the velocity of the ascending clamshell bucket, pausing the dredge bucket at the bottom and top while ascending and descending and placing filter material over the barge scuppers
- If sediment is placed on a barge for delivery, no spill of sediment from the barge will be allowed.

(e) That the public interest suffers no substantial detrimental effect.

Response: The site is planned for industrial use consistent with port activities. As a water-dependent and water-related use defined by WAC 173-26-020, the site's Columbia River frontage in an industrial area make it appropriate for manufacturing and exporting. The project will be developed and operated with no significant adverse effects to the public or natural resources including enhancement of existing public access opportunities on the site and mitigations provided for terrestrial, riparian, and aquatic impacts as described in subsection (d) above.

(2) In the granting of all conditional use permits, consideration shall be given to the cumulative impact of additional requests for like actions in the area. For example, if conditional use permits were granted for other developments in the area where similar circumstances exist, the total of the

conditional uses shall also remain consistent with the policies of RCW 90.58.020 and shall not produce substantial adverse effects to the shoreline environment.

Response: As previously discussed, a conditional use permit is required for the water-related industrial uses in the Conservancy District and for dredging for the marine terminal in the Urban District. Therefore, this analysis is limited to the conditional uses proposed in the Conservancy and Urban Districts. Impacts from the water-related industrial uses in the Conservancy District are limited to 20,163 square feet (approximately 0.45 acres) of riparian area. These and other impacts on the site will be mitigated by riparian enhancement and invasive species management within an area 1.41 acres in size along the Columbia River, enhancement of 0.58 acres of wetland buffer, ELJ installation, and pile removal at the north end of the site. As previously mentioned, the applicant will avoid potential impacts to streaked horned lark by conducting site preparation activities (clearing and grading) outside of the nesting season.

For the proposed dredging, BMPs will be employed to reduce impacts as described in JARPA section 8a and summarized in response to 5.1.3(d) above. The riparian buffer enhancements and dredging BMPs will reduce impacts to result in no substantial adverse effects on the shoreline environment.

Vacant lands extending approximately three miles to the north of the project site are in the Conservancy District and appear to be constrained by critical areas (wetlands and habitat areas). Development potential and suitability of these sites to accommodate heavy industrial or manufacturing uses is likely limited in comparison with the project site due to the presence of critical areas.

To the applicant's knowledge, there are no industrial or manufacturing projects proposed in the Conservancy District. Even if development was proposed on sites to the north in the Conservancy District, it would be required to obtain a conditional use permit for port and water-related industries in this district and mitigate for impacts to the shoreline environment to result in no substantial adverse effects to the shoreline environment. The Cowlitz County critical areas code would require that wetland and habitat impacts be mitigated to a standard of "no net loss." Dredged or fill materials placed in jurisdictional wetlands likely present on these sites would also be regulated and required to obtain permits from the Corp of Engineers (section 404 permit), if proposed. A water quality certification (section 401) through the Washington Department of Ecology would be required to discharge to federal waters. All of these permit processes would help ensure that future development proposed in the adjacent Conservancy District would result in no substantial adverse effects to the shoreline environment.

Properties to the south of the project site are in the Urban District within the County's SMP. There is a vacant property south of the Kalama Export site located at 1296 3rd Street NW in Kalama (parcels 61335 and 62816002) as well as another vacant site located in the

Urban District south of the Cowlitz River and bordered by the Columbia River to the East. Additional Urban District vacant sites are located 3.75 miles northwest of the intersection of state routes 433 and 432 in Longview and are bordered by State Route 432 to the north and east and the Columbia River to the west; sites in this area are designated and zoned for heavy industrial uses. If new docks were proposed to serve upland industrial or manufacturing uses for the above listed sites, dredging would likely be required. As such, Section 401, Section 404, and Section 10 permits, as well as critical areas permits, and shoreline permits would likely be required through the Corps, Department of Ecology, and relevant local jurisdictions to establish docks at these locations. These permits would ensure that water quality and shoreline resources were protected.

Therefore, the cumulative impacts of similar heavy industrial or manufacturing projects, which also apply BMPs for dredging activities and mitigate for construction within riparian areas as does the subject proposal, would also result in no substantial adverse effects on the shoreline environment via shoreline regulations, federal and state permitting and other required environmental reviews. Considered together, these uses would not result in cumulative impacts that produce substantial adverse effects on the shoreline environment.

(3) Other uses which are not classified or set forth in the applicable master program may be authorized as conditional uses provided the applicant can demonstrate consistency with the requirements of this section and the requirements for conditional uses contained in the master program.

Response: This section is not applicable to the project. All aspects of the project located within the shoreline (please see Table 1) are classified as water-dependent or water-related port industrial uses considered within the SMP policies and regulatory framework; therefore, the proposed project is consistent with permitted and conditionally permitted uses classified under SSDP and CUP permits within the County's Urban and Conservancy districts of the shoreline environment.

(4) Uses which are specifically prohibited by the master program may not be authorized pursuant to either subsection (1) or (2) of this section.

Response: All development activities necessary to complete the project are permitted and/or conditionally permitted by the SMP. No prohibited uses are proposed.

5.2 Legislative Findings (RCW 90.58.020)

As required by the CUP regulations this section addresses consistency with SMA legislative findings.

1) Recognize and protect the statewide interest over local interest;

Response: Statewide and local interests are recognized and protected through compliance with the local SMP and the statewide SMA. Compliance with the SMP regulations, goals, and policies is addressed below in section 5.3.

(2) Preserve the natural character of the shoreline;

Response: The site's natural character is highly degraded as a result of previous development practices including vegetation clearing and the use of the site for dredge spoil disposal. Currently, the upland site area is used for dredge spoil disposal, sand material sales and reuse, as well as recreational access. The most undisturbed natural character occurs on the northwest portion of the project site where there are intact riparian buffers. As discussed in this narrative and in the JARPA (Attachment G), the project has the potential to affect the suitability of aquatic habitat and the applicant proposes to enhance the natural character of the shoreline through wetland and riparian buffer enhancements, ELJs, and pile removal. The applicant proposes minor impacts to riparian buffers on the northwestern portion of the site (20,163 square feet, approximately 0.45 acre) for construction of the infiltration pond, security fencing and upland site improvements, and recreational access and roadway within the Conservancy District. Additionally, proposed impacts in the Urban District would include 8,843 square feet (0.20 acre) for constructing security fencing and upland improvements and the dock trestle (a total of 29,006 square feet or 0.67 acres of riparian buffer impacts at the site). However, the project has been specifically designed to preserve the large wetland areas and buffers to the north of the project site on parcels 63305 and 63301. Thus the applicant proposes to not only preserve the site's natural shoreline character but to enhance it in appropriate areas.

(3) Result in long-term over short-term benefit;

Response: The project will establish a long-term industrial use without requiring significant modification of the shoreline. Consistent with RCW 90.58.020 of the SMA, "uses shall be preferred which are... unique to or dependent upon use of the state's shoreline" and "shall be given priority for... ports, shoreline recreational uses including but not limited to parks, marinas, piers, and other improvements facilitating public access to shorelines of the state, industrial and commercial developments which are particularly dependent on their location on or use of the shorelines of the state and other development that will provide an opportunity for substantial numbers of the people to enjoy the shorelines of the state".

The project has been designed to preserve the riparian areas and buffers at or adjacent to the project site by locating improvements on previously impacted areas. As a water-dependent and water-related industrial use, the project will provide long-term economic benefit by providing industrial jobs at the Port and within Cowlitz County. Although the project is proposing water-dependent industrial uses consistent with goals of the SMA, the Applicant is also proposing environmental enhancements (native riparian and

wetland buffer plantings, ELJs, and the removal of pilings) that will offset riparian and wetland buffer impacts and lead to no significant adverse effect on shoreline resources.

The project will facilitate public access to the shoreline and additional long-term public benefits including a 21-car parking area and improved public access from Tradewinds Road (a private road to be maintained by the Port of Kalama) at the northwestern corner of the project site.

(4) *Protect the resources and ecology of the shoreline;*

Response: As previously described, the project would be located on a site with a highly degraded natural character having been used for previous dredge disposal, sand material sales and reuse, as well as recreational access. Very little native habitat exists on the site. The project will be located in upland areas adjacent to the Columbia River and the proposed dock will be located in the River.

Federally-designated ESA-listed species are known to occur in the vicinity of the project and are listed in JARPA section 9. In addition, the Washington State Department of Fish and Wildlife (WDFW) recognizes priority habitat and species within the State. Federally-listed and WDFW-designated species in the project area include Chinook (*Oncorhynchus tshawytscha*), chum (*Oncorhynchus keta*), coho (*Oncorhynchus kisutch*), sockeye salmon (*Oncorhynchus nerka*), eulachon/smelt (*Thaleichthys pacificus*), bull trout (*Salvelinus confluentus*), steelhead trout (*Oncorhynchus mykiss*), resident/searun cutthroat trout (*O. clarki clarki*), white (*Acipenser transmontanus*) and green sturgeon, and Pacific (*Lampetra tridentata*) and river lamprey (*L. ayresi*). Priority mammals that occur in the river include Steller sea lions (*Eumatopius jubatus*), California sea lions (*Zalophus californianus*), and harbor seals (*Phoca vitulina*). Habitat for these species adjacent to or on the project site include the Columbia River and riparian habitats associated with the Columbia River and the associated backwater wetland (Wetland A). The extent to which functional riparian habitat extends onto the project site is limited.

Portions of the project site that have been potentially suitable for streaked horned lark nesting are located on the northern peninsula of the site, on an area of dredge material that was placed as part of the USACE Columbia River navigation channel project. Please see section 5.1.4 for further details on streaked horn lark habitat at the site.

Proposed Mitigation

Mitigation for the proposed project's impacts on aquatic and riparian areas as previously discussed, include the installation of eight ELJs along the project's Columbia River shoreline frontage, wetland and riparian buffer enhancements, and the removal of 157 piles in the adjacent Columbia River backwater area.

Minimization efforts and best management practices (BMPs)

In addition to mitigation, the following efforts and BMPs have been developed via project design to minimize shoreline impacts in the project area as described below.

Marine Terminal

The project has been designed to avoid and minimize impacts to aquatic resources to the greatest extent practicable. The size and configuration of the structures have been kept to the minimum necessary to support their needed functions. The terminal has been designed such that (with the exception of the access trestle) the platforms, dolphins, and structures associated with the terminal would be located in water deeper than 20 feet below OHWM (11.6 feet CRD). This would minimize the effects to aquatic habitats by minimizing structure in and over shallow water habitats and placing the vessels away from shallow water, thus reducing impacts from vessel operations such as scour from prop and thrusters. Dredging would occur only in deep water.

The Columbia River is a constitutionally designated area of commerce and the dock would be located in an existing harbor area and adjacent to the federal navigation channel. Ship traffic associated with the project would result in a minor increase in vessel traffic (an estimated 3 to 6 ships per month) and would be within historical levels. Walkways would be grated to minimize shading, and stormwater would be collected and infiltrated upland, reducing the potential for pollutants to reach surface waters. Furthermore, the access trestle abutments have been designed and configured to eliminate the need for shoreline armoring.

The dock design uses precast concrete piles, rather than steel pipe piles, as structural support piles, which minimizes the potential for acoustic effects associated with impact pile driving. The steel piles for walkway supports and fender systems would be installed with a vibratory hammer, and are not expected to require impact proofing. If impact proofing is required, a bubble curtain would be employed to attenuate underwater noise.

Stormwater from the dock would be collected and conveyed to an upland treatment and an infiltration swale. In addition to stormwater from the project, the stormwater system would accommodate stormwater from the existing North Port dock; this stormwater is currently infiltrated in an upland swale that would be removed with the development.

The proposed berth extension has been sited entirely in deep water habitat, adjacent to an existing deep water berth. Existing water depths in the proposed berth area vary from -50 feet CRD to -39 feet CRD. Locating the berth only in existing deep water, adjacent to an existing deep water berth minimizes the effects that could be associated with constructing a new berth at a different site. No shallow water habitat would be affected by the berth construction.

Upland Facility

The upland facility has been designed to avoid and minimize impacts to all aquatic resources to the greatest extent practicable. The upland portion of the facility has been designed to entirely avoid disturbing wetlands, and would be constructed on a site that

has little substantial vegetation, has been slated for industrial development for years, and has been used as a dredge material placement site.

The site is well suited for use as an export facility. The proposed project has been developed within the envelope of previously developed areas at the site and would not result in any impacts to the forested backwater wetland to the north. Several industrial projects were previously proposed for the site that would have resulted in greater habitat impacts than the current proposal, including construction of a rail loop track that would have required filling a portion of the high quality forested backwater wetland area to the north of the project site.

Upland construction activities will be conducted to avoid direct impacts to streaked horned larks that could be present at the site during site preparation and construction. Stormwater from impervious surfaces associated with the proposed project would be infiltrated through on-site stormwater pond(s).

The Applicant proposes to conduct initial site preparation activities (clearing and grading) within previously suitable streaked horned lark nesting habitat and outside of the nesting season, consistent with the site preparation impact minimization measures described in the USACE's "Biological Assessment for the Continued Operations and Maintenance Dredging Program for the Columbia River Federal Navigation Channel" (USACE 2014) and the associated USFWS biological opinion (USFWS 2014).

The project design includes pile installation, overwater concrete placement and minimization, dredging, and dredging material placement BMPs to minimize the extent of any effects to marine mammals or the aquatic environment (see the JARPA included as Attachment G for further details on BMPs).

(5) Increase public access to publicly owned areas of the shorelines;

Response: In order to provide improved public access to Cowlitz County shoreline areas, a 21-car parking area will be constructed at the terminus of Tradewinds Road. Public recreation in the project area consists of low-intensity uses of the unofficial trail system and the sandy beaches, fishing, and visual access, all of which will continue with the project.

(6) Increase recreational opportunities for the public in the shoreline;

Response: Recreational activities currently occur along the Columbia River shoreline and on unofficial trails located north of the project site. Currently, Tradewinds Road is an unpaved dirt roadway as it enters the project boundary. The roadway will be paved to improve public access to the shoreline. Redevelopment of the roadway will include asphalt construction consisting of 2 lanes (one for eastbound and one for westbound travel) and parking for approximately 21 vehicles for access to the shoreline and trails.

This will serve to increase recreational opportunities by providing additional accessibility.

(7) Provide for any other element as defined in RCW 90.58.100 deemed appropriate or necessary

Response: The goals and policies and use activity regulation sections of the SMP account for the elements defined in RCW 90.58.100. These goals and policies and use activity regulations are outlined in section 5.3.1.

5.3 Cowlitz County Shoreline Master Program

The project requires a Cowlitz County SSDP and CUP. The development is consistent with shoreline uses allowed in the Urban District and Conservancy District subject to these permits. The required application materials are provided with this narrative. The table that follows identifies the SMP policies and regulations that apply and explains (in *italics*) how the proposed project is consistent with each requirement.

5.3.1 Policies and Goals

Table 2 provides responses to the goals, objectives and policies of the Cowlitz County SMP.

Table 2. Goals, Objectives and Policies

Policy & Goal	Response
Goal: Circulation	
Policies:	
a) Whenever feasible, major highways, freeways, and railways should be located away from shorelines except in port and heavy industrial areas, so that shoreline roads may be reserved for slow-moving recreational traffic.	<i>There are no major highways, freeway or railways proposed with this project that this policy would apply to.</i> <i>Tradewinds Road, an existing access road, extends along the northern project boundary adjacent to shoreline and wetland buffer areas. The existing 2-lane dirt roadway will be paved for an additional 3,700 feet to provide improved recreational access to the Columbia River shoreline. The roadway will be constructed consistent with private roadway standards outlined in CCC Title 11.</i>
b) Roads located in wetland areas should be designed and maintained to prevent erosion and to permit a natural movement of ground water.	<i>No roads are planned in wetland areas.</i>
c) All debris, overburden, and other waste materials from construction should be disposed of in such a way as to prevent their entry by erosion from drainage, high water, or other means into any water body.	<i>During construction, debris, overburden, and other waste materials will be disposed of in a manner preventing their entry into waterbodies. These materials will be removed off site to an approved location. During construction, materials will be staged in areas away from waterbodies and critical areas.</i>

Policy & Goal	Response
d) Road locations should be planned to fit the topography so that minimum alterations of natural conditions of the shorelines will be necessary.	<i>Topography at the project site would be generally flat. The northwestern portion of the site may be set at a higher elevation than the eastern portion to provide additional infiltration capacity for the stormwater pond. The site grade changes within the project site will be designed to fit the topography within the site and minimize alterations to the shoreline. Roadways accessing the site will require minimal alterations or grading.</i>
e) Provision should be made for sufficient viewpoints, rest areas, and picnic areas in public shorelines.	<i>A parking lot for recreational access by the public to the shoreline will be located on the northwest corner of the project area at the terminus of Tradewinds Road.</i>
Goal: Conservation	
2. Wildlife – Hunting and fishing are major recreational activities for residents of Cowlitz County. Also, a large number of non-residents from other areas of the state and neighboring Oregonians visit the county hunt and fish. The wildlife resource of the county also provides a source of enjoyment for those who desire to observe and photograph wildlife. Since wildlife, which includes the fish in lakes and streams, constitutes a major use of the county's shorelines, consideration should be given to habitat requirements of wildlife in order to maintain and enhance this valuable natural resource.	
a) The impact of proposed development should be considered in areas identified as harboring rare or endangered species.	<p><i>In order to protect rare and/or endangered species, the applicant will obtain all necessary permits and authorizations required under local, state, and federal guidelines. Permits and authorizations to be obtained for the project include an Endangered Species Act (ESA) Section 7 consultation Magnusson Stevens Fisheries Protection Act essential fish habitat analysis issued by NOAA Fisheries (NOAA), the U.S. Fish and Wildlife Service (USFWS), an Incidental Harassment Authorization (IHA) for marine mammals during construction, and a local critical areas permit. See section 5.2 of this document which addresses threatened and endangered species. Please see the JARPA (Attachment G) for a comprehensive list of endangered species in the project area.</i></p> <p><i>Mitigation measures will consist of piling removal in the adjacent Columbia River backwater, the construction of ELJs, and native riparian and wetland buffer plantings. Details for these mitigation measures are outlined on figures 10-13 of the JARPA (Attachment G).</i></p>
b) Professional expertise should be solicited and seriously regarded in matters of the impact developments and uses might have on spawning beds, rearing areas of fish, and seasonal feed areas of wildlife.	<i>As noted above permits and authorizations will be obtained from multiple resource agencies and effects of the project on the noted elements will be considered. Input from natural resource scientists on the impact to aquatic and terrestrial species has been obtained and mitigations have been identified and incorporated in to the JARPA (Attachment G).</i>

Policy & Goal	Response
c) Seasonal constraints upon uses proposed may be considered as necessary to protect a variety of wildlife resources in the shoreline areas.	<i>In water construction will comply with work windows established by regulatory agencies. Initial site preparation activities (clearing and grading) within areas identified as potentially suitable streaked horned lark nesting habitat would be conducted outside of the nesting season.</i>
Policy & Goal	Response
Goal: Economic Development	
5. Ports and Water-Related Industry—Ports are centers for water-borne traffic and as such, have become gravitational points for industrial/manufacturing firms.	
a) Port facilities shall be designed to permit viewing of harbor areas from viewpoints, waterfront restaurants and similar public facilities which would not interfere with port operations or endanger public health and safety	<i>The proposed facility would permit continued low-intensity public recreation and provide associated roadways. The proposed recreation area, located on the northwest corner of the project site, would provide the public safe access to the shoreline.</i>
b) Sewage treatment, water reclamation, desalinization and power plants shall be located where they do not interfere with, and are compatible with recreational, residential, or other public uses of the water and shorelands. Waste treatment ponds for water-related industry shall occupy as little shoreline as possible.	<i>The fire suppression water storage facility will be located within the shoreline area. The storage facility has been designed specifically for the needs of the project and the majority of the facility (greater than 75 percent) is located outside shoreline jurisdiction.</i>
c) The cooperative use of dock parking, cargo handling, and storage facilities shall be strongly encouraged in waterfront industrial areas.	<i>The proposed dock would be located approximately 500 feet north of the Port's existing North Port dock (currently in use by Steelscape). The proposed marine terminal would accommodate the oceangoing vessels that would transport methanol to destination ports. It would also be designed to accommodate other vessel types and, when not in use for loading methanol, would be made available for general use by the Port, for other cargo operations, loading and unloading, for vessel supply operations, and/or as a lay berth, for short-term vessel moorage, where vessels could moor while waiting to use other Port berths, or for topside vessel maintenance.</i>
e) Prior to allocating shorelines for port uses, local government shall consider statewide needs and coordinate planning with other jurisdictions to avoid wasteful duplication of port services within port-service regions.	<i>The site is currently devoted to port uses and the proposal would benefit the local and state needs without allocating more shoreline area to port uses, thus potentially reducing the demand for new shoreline facilities of the same type within the region.</i>

Policy & Goal	Response
f) Since industrial docks and piers are often longer and greater in bulk than recreational or residential piers, careful planning must be undertaken to reduce the adverse impact of such facilities on other water-dependent uses, aesthetics, and shoreline resources. Because heavy industrial activities are associated with industrial piers and docks, the location of these facilities must be considered a major factor in determining the environmental and aesthetic compatibility of such facilities.	<p><i>The proposed dock facility is a water-dependent use and requires close proximity to the shoreline. Sites adjacent to the proposed facility consist of heavy manufacturing uses typical in port-operated areas.</i></p> <ul style="list-style-type: none"> • <i>Dock structures have been kept to the minimum necessary to support their needed functions.</i> • <i>The design of the terminal locates the platforms, dolphins, and structures associated with it (except for the access trestle) in water deeper than 20 feet below OHWM (11.6 feet CRD).</i> • <i>The design minimizes the effects to aquatic habitats by minimizing structure in and over shallow water habitats.</i> • <i>Walkways would be grated to further minimize shading.</i> • <i>The access trestle abutments were designed and configured to eliminate the need for shoreline armoring along the riverbank.</i> • <i>The project would not restrict access to adjacent industrial facilities.</i>
g) Because a large impact cannot be avoided due to ports and port-related uses, preference will be given to develop and redevelopment of existing port areas.	<i>The project would be located at an underutilized port site. The project will provide economic opportunity and habitat enhancements, through the redevelopment and improvement of an underutilized and shovel-ready industrial property.</i>
h) Ports and water-related industries are encouraged to locate in urban environments, but in exceptional cases may locate under natural, conservancy, and rural environments, subject to conditional use and specific performance standards. An exception is log storage and rafting which may be permitted in conservancy, rural, urban, and is considered as a conditional use on natural shorelines.	<i>The project would be located in two shoreline districts (Urban and Conservancy). A shoreline CUP application is included with this narrative for proposed water-related industry in the Conservancy District and dredging operations in the Urban District, See response to the conditional use permit criteria and the specific Economic Development performance standards in this section above.</i>
Policy & Goal	Response
Goal: Economic Development	
6. Utilities— Utilities are services which produce and carry electric power, gas, sewage, communication, and oil.	
a) Upon completion of installation/maintenance projects on shorelines, banks should be restored to pre-project configuration, replanted with native species, and provided maintenance care until the newly planted vegetation is established.	<i>Banks will not be modified with utility installations that would require restoration activities.</i>
b) Whenever these facilities must be placed in a shoreline area, the location should be chosen so as not to obstruct or destroy scenic views. Whenever feasible, these facilities should be placed underground, or designed to do minimal damage to the aesthetic qualities of the shoreline area.	<i>Utilities would be located below ground whenever feasible, except where attached to the dock.</i>

Policy & Goal	Response
d) Utilities should be located to meet the needs of future populations in areas planned to accommodate this growth.	<i>All site utilities have been designed specifically to meet the needs of the project site and will not be oversized to accommodate future growth. There is no additional suitable land for development within the immediate area and future growth of the facility is not anticipated.</i>
Policy & Goal	Response
Goal: Historical/Cultural	
Policies:	
1) Where possible, sites should be permanently preserved for scientific study and public observation. In areas known or suspected to contain archaeological data, local government should attach a special condition to a shoreline permit, providing for a site inspection and evaluation by an archaeologist to ensure that possible archaeological data are properly salvaged. Such a condition might also require approval by local government before work can commence or resume on the project following such an examination.	<i>A cultural resources survey prepared by Archaeological Investigations Northwest (AINW) for the project did not identify any resources on the project site that are eligible for listing under the National Register of Historic Places (NRHP). AINW conducted 11 Geoprobe excavations to sample the native soils beneath an average of 16 feet of dredge material in the project area and concluded that the site area has a low probability of retaining deeply buried archaeological sites. No additional archaeological work or monitoring was recommended by AINW.</i>
2) Shoreline permits, in general, should contain special provisions which require developers to notify local governments if any possible archaeological data are uncovered during excavations.	<i>Applicable inadvertent discovery regulations and BMPs will be followed.</i>
4) Development which might destroy an archaeological or historic site may be delayed for six months until the appropriate agency or organization can be given the opportunity to purchase the site or obtain the desired data. Such delays will not be prolonged if little or no interest is shown, or if a group wanting protection tends to cause delay.	<i>As noted above there are no known resources on the site.</i>
Policy & Goal	Response
Goal: Recreation	
1) General Recreational Uses	
a) Priority will be given to developments, other than single family residences which are exempt from the permit system of the act, which provide recreational uses and other improvements facilitating public access to shorelines.	<i>The project is designed to allow the continuation of existing recreational uses adjacent to the site and will establish a new parking area to facilitate low-intensity recreational uses of the shoreline such as the unofficial trail system and sandy beaches, and similar low-intensity activities.</i>
b) Access to recreational locations such as fishing streams and hunting areas should be a combination of areas and linear access (parking areas and easements, for example), to prevent concentrations of use pressure at a few points.	<i>Other than the new 21-space parking area described above the project does not propose any new recreational access that this policy would apply to. The parking area will provide access to an informal network of shoreline trails along the river.</i>

Policy & Goal	Response
c) This shoreline program should encourage the linkage of shoreline parks and public access points through the use of linear access. Many types of connections can be used such as hiking paths, bicycle trails, and/or scenic drives.	<i>The recreation areas (i.e., unofficial trail system) do not connect to other formal trails or paths. However, pedestrians currently use the site for informal access to north port beaches and trails. Because the recreation area is located on a peninsula, there is limited potential for formal connectivity to other trail systems.</i>
d) Attention should be directed toward the effect the developments of a recreational site will have on the environmental quality and natural resources of an area.	<i>Parking for public recreation would be located near the shoreline as part of the project. The parking area would have 21 parking spaces and be constructed with impervious asphalt. The improvements would be located approximately 53 feet from the biological OHWM, primarily in an area of prior disturbance and use. Per page 51 of the County SMP Conservancy District use activity regulations, parking is permitted greater than 20 feet from the OHWM. The impacts of the development of recreational amenities on shoreline resources would be minimal and would be mitigated through the provision of riparian and wetland buffer enhancements discussed in the JARPA (Attachment G).</i>
e) To avoid wasteful use of the limited supply of recreational shoreland, parking areas should be located inland away from the immediate edge of the water and recreational beaches. Access should be provided by walkways or other methods. Automobile traffic on beaches, dunes, and fragile shoreland resources should be discouraged.	<i>The site's recreational parking area would be located at the terminus of the proposed Tradewinds Road improvements, approximately 53 feet away from the OHWM. The parking area will contain curbing and wheel stops to discourage vehicular access to the shoreline.</i> <i>It will continue to be possible to access the physical shoreline of the river and the recreational trails along the river by foot after construction of the recreational parking facility.</i>
f) Recreational developments should be of such variety as to satisfy the diversity of demands from groups in nearby population centers.	<i>The site has been designed to accommodate existing shoreline recreational uses and activities. Existing low-intensity recreational uses consist of fishing, walking, trail exploration, and scenic viewing. Public access for these uses would be improved by improving the road and parking.</i>
g) The supply of recreation facilities should be directly proportional to the proximity of population and compatible with the environment designations.	<i>Proposed recreational areas have been designed to support existing local populations and recreation uses.</i> <i>Enhanced public access to existing uses such as fishing, waterfront walks, and scenic views of the Columbia River would be provided by improving Tradewinds Road and constructing the 21-car parking area.</i>
h) Facilities for intensive recreational activities should be provided where sewage disposal and insect control can be accomplished to meet public health standards without adversely altering the natural features attractive for recreational uses.	<i>Activities at the site will consist of low-intensity recreation not requiring sewage disposal or insect control. Therefore, no sewage facilities are proposed in recreation areas.</i>

Policy & Goal	Response
i) In locating proposed recreation facilities such as playing fields, and golf courses, and other areas which use large quantities of fertilizers and pesticides in their turf maintenance programs, provisions must be made to prevent these chemical from entering the water. If this type of facility is approved on a shoreline location, provision should be made for protection of water areas from drainage and surface runoff.	<i>The recreational area would not require facilities, fertilizers, pesticides, and/or turf maintenance programs.</i>
j) State and local health agencies have broad regulations which apply to recreation facilities, recreation watercraft, and ocean beaches, which should be consulted in preparing use regulations and issuing permits.	<i>The proposed recreation area will be structure-less and consist of opportunities for low-intensity recreation.</i>
k) Regional, as well as local, needs shall be considered where recreational development takes place.	<p><i>Regional and local recreational needs are considered by improving a recognized public recreation area and providing a new parking lot.</i></p> <p><i>Public access to the recreation area is provided by an unpaved segment of Tradewinds Road with no parking area. The project would pave the road for an additional 3,700 feet terminating at the new 21-car parking area.</i></p>
Policy & Goal	Response
Goal: Public Access	
Objectives	
1) To retain existing public access and develop additional access where such will not endanger life or property nor interfere with the rights inherent with private property.	<i>Upon completion of the project, public access to the shoreline would be continued and improved at the parking area at the terminus of Tradewinds Road. For safety reasons, access to the proposed dock and the immediately adjacent shoreline area will be prohibited in compliance with the Maritime Transportation Security Act (MTSA) through the construction of security fences.</i>
2) Such access should not have an adverse effect on unique or fragile natural features, nor alter ecological systems of the area.	<i>Improving public access to the shoreline would not result in adverse effects to ecological systems or natural features. For further details on natural features, please see Attachment G.</i>
Policy & Goal	Response
Other General Shoreline Uses	
Goal: Development within the shorelines of Cowlitz County must be for the betterment of the life style of the citizens of Cowlitz County, and so located as to prevent ecological debilitation from occurring.	
1. Dredging - Dredging is the removal of earth from the bottom of a stream, river, lake, bay, or other water body for the purposes of deepening a navigational channel or to obtain use of the bottom materials for landfill.	

Policy & Goal	Response
<p>a) Dredging operations shall be so controlled as to minimize damage to existing ecological values and natural resources of both the area to be dredged, and the area for deposit of dredged materials</p>	<p><i>Dredging will be controlled to minimize impacts. A Rivers and Harbors Act, Section 10, Section 404, and other applicable permits/ authorizations would be acquired before dredging operations begin. Dredging operations would require either mechanical (clamshell) and/or hydraulic dredging methods, depending on factors such as volume, distance to permitted placement sites, contractor preference, and/or the need for material for future upland projects at the Port. Dredging is not proposed in shallow water areas. For further details on mechanical and hydraulic dredging methods, please see the JARPA (Attachment G).</i></p>
<p>b) This program must include long-range plans for the deposit and use of spoils on land. Spoils deposit sites in water areas shall also be identified by local government in cooperation with the state departments of natural resources, game, and fisheries. Depositing of dredge material in water areas shall be allowed only for habitat improvement, to correct problems of material distribution adversely affecting fish and shellfish resources, or where the alternatives of depositing material on land is more detrimental to shoreline resources than depositing it in water areas.</p>	<p><i>Dredged material will be placed at existing authorized in-water and upland placement sites. The existing permits (NWP-1994-462-1) authorize both in-water and upland placement of dredged material as follows:</i></p> <ul style="list-style-type: none"> • <i>flow lane placement to restore sediment at a deep scour hole associated with pile dike 75.63 M located on the Washington side of the river</i> • <i>beach nourishment at the Port's shoreline park (Louis Rasmussen Park) at RM 76</i> • <i>the Ross Island Sand and Gravel disposal site in Portland, Oregon</i> • <i>Upland portions of the project site ("North Port" site) have been previously used to provide material for construction or for other uses. Until recently, the upland portions of the project site were part of the dredged material placement network for the USACE Columbia River Navigation Channel project. The site was withdrawn from the network of USACE dredge material placements sites in February 2015.</i> • <i>The South Port upland placement site located north of the CHS/TEMCO grain terminal at approximately RM 77</i> <p><i>Additional in-water and upland sites may be identified and permitted for dredge material placement in the future.</i></p>
<p>c) Dredging of bottom materials for the single purpose of extending one's property shall be discouraged.</p>	<p><i>Dredging is only planned for vessel access and will not be used to extend property area.</i></p>
<p>d) Navigation channels, turning and moorage basins shall be identified. Future channel and basin areas which would be used in conjunction with potential future ports and marinas should be identified as non-deposit areas for spoils from other dredging operations.</p>	<p><i>The proposed dredging area is identified in the attached JARPA and defines the navigation needs of the project. No disposal operations are currently occurring within the proposed dredge area.</i></p>
<p>4. Piers- A pier or dock is a structure built over or floating upon the water, used as a landing place for marine transportation or for recreation purposes</p>	

Policy & Goal	Response
a) The use of floating docks should be encouraged in those areas where scenic values are high and where conflicts with recreational boaters and fishermen will not be created.	<i>A floating dock is not feasible due to the scale of ships used in exporting methanol.</i>
b) Open-pile piers should be encouraged where shore trolling is important, where there is significant littoral drift, and where scenic values will not be impaired.	<i>The dock would be open pile construction and located in an area where similar docks are constructed. Although views will be modified by the project the existing scenic values will not be obstructed as existing shoreline residents are located upland and one-half mile away from the project site and are not located adjacent to the project site.</i>
c) Priority should be given to the use of community piers and docks in all new major waterfront developments. In general, encouragement should be given to the cooperative use of piers and docks.	<i>The proposed dock will be used cooperatively with the Port. The applicant anticipates three to six shipping trips per month, and when the dock is not in use by the applicant, it will be available for other Port or shipping uses.</i>
d) In providing for boat docking facilities in the master program, local governments should consider the capacity of the shoreline sites to absorb the impact of waste discharges from boats including gas and oil spillage.	<i>The surrounding property is Port-operated heavy industry. The County has determined this area best for supporting potential shipping-related impacts.</i> <i>BMPs intended to prevent gas and oil spillage that would be employed at the site include regular checks of fuel hoses, oil drums, oil or fuel transfer valves, fittings, etc., and a spill prevention, control, and countermeasures (SPCC) plan outlining prevention and process in the event of leaking or discharge.</i>
e) The risk and potential damage of contaminants must be determined for piers and the ability of the shoreline area to recover from such spills must be known. Where appropriate, contamination prevention and abatement measures will be required as part of any proposal to erect a pier.	<i>The dock would employ containment to collect methanol in case of a spill during the transfer and loading process. Any accidental spills from pipelines on the dock (for both alternatives) would be captured on the dock surface and collected by the stormwater system. Valving would be installed on the storm conveyance pipes so that the spill could be diverted to a separate pumping system that would convey the contaminated water back to the proposed methanol manufacturing facility for treatment and reuse.</i>

5.3.2 Use Activity Regulations

The following section addresses uses permitted, not permitted, and/or permitted conditionally in Cowlitz County shoreline areas. Based on the requirements outlined in this section and, as stated in section 5.1, the project will require an SSDP and a CUP. These permits will be required for development located within designated shoreline areas (SSDP) and for dredging proposed within the Urban District (CUP). Table 3 provides responses to the Use Activity Regulations contained in the Cowlitz County SMP.

Table 3. Use Activity Regulations

Use and Regulations:	Response
Substantial Development Permit	
<p>Applicants for substantial development permits shall be required to provide such documentation, illustrations, maps, and accurate engineering data as the administrator may deem necessary to adequately appraise the development proposed, the potential impact on the environment, and ensure compliance with the shorelines management act and substantial development permit.</p>	<p><i>The project requires an SSDP for development in the Urban District of the shoreline. The permit application is included with this narrative; supporting documentation includes a shoreline designation map, County zoning map, and completed JARPA.</i></p>
Conditional Uses	
<p>Conditional uses are those uses which either do not need a shoreline location or are considered unsuitable for siting within a particular shoreline environment. Uses classified as subject to the issuance of a conditional use permit can be permitted only by meeting such performance standards that make the use compatible with other permitted uses within that area. Conditional use permits shall be granted only after the applicant can demonstrate all of the following.</p>	
<p>1) The use will cause no unreasonable adverse effects on the environment or other uses within the area.</p>	<p><i>The JARPA (Attachment G) outlines the impacts of the proposed project and mitigation measures planned to minimize and compensate for the impacts. Impacts are largely avoided because the project will be developed on a previously impacted site. The mitigation measures include ELJs, riparian and wetland buffer enhancements, and pile removals and are designed to offset aquatic and riparian impacts. As outlined in this narrative the project will not affect existing uses in the area. Section 5.1.3 further demonstrates that there will be no unreasonable adverse effects on the environment from this project.</i></p>
<p>2) The use will not interfere with the public use of public shorelines.</p>	<p><i>As noted in section 5.1.3 of this narrative, upon completion of the project, public access to the shoreline would be continued and improved. A security fence will separate unauthorized individuals from entering the facility, however, these security measures will not interfere with public use of the shoreline.</i></p>
<p>3) The design of the proposed use will be compatible with the environment in which it will be located.</p>	<p><i>As noted in section 5.1.3 of this narrative the project is consistent with the two shoreline environments (Urban and Conservancy) in which it is located. Urban environments allow for water-dependent and water-related uses. Water-related industrial uses are conditional uses in the Conservancy environment; compliance with conditional use permit criteria are demonstrated in section 5.1.3 and in this section. Water-related industrial uses are allowed in the conservancy environment per SMP Economic Development policy 5h, subject to meeting the requirements of conditional use and specific performance standards. In addition, environmental impacts will largely be avoided due to the fact that the project will be constructed in previously impacted areas. For minor impacts to aquatic and riparian areas, mitigation measures are proposed including ELJs, riparian and wetland buffer enhancements and pile removal.</i></p>

Use and Regulations:	Response
<p>a) Specific performance standards shall be imposed and/or developed for any given use, to make that use compatible to the natural or conservancy environments, in which that use will locate.</p>	<p><i>The use is consistent with performance standards in the Urban and Conservancy districts and for port and water-related industries as demonstrated in response to policies a-h of the Economic Development section of the SMP. In addition, The development requires water access for shipping methanol. Due to the development's nature as a water-dependent and water-related port use, the project is consistent with the goals and policies and use activity regulations sections of the SMP. Ports and water-related industries are conditional uses in the Conservancy environment and compliance with conditional use permit criteria is demonstrated in this section and in section 5.1.3.</i></p> <p><i>As discussed throughout this narrative, the project will achieve no net loss of shoreline ecological functions by nearly total avoidance of impacts to the shoreline environment. Where impacts occur, mitigations such as ELJs, riparian and wetland buffer enhancements and pile removal are proposed to meet the no net loss performance standard.</i></p>
<p>4) The proposed use will not be contrary to the goals, policy statements or general intent of the shoreline environments of this master program.</p>	<p><i>As a water-dependent and water-related port use, the proposed project is allowed in the Urban environment and is, therefore not contrary to the goals, policies, or intent of this designation which promotes such uses. Water-related industrial uses, such as are proposed on the northwestern portion of the site are conditional uses in the Conservancy environment, which limits the placement of such uses to those which meet conditional use permit criteria and specific performance standards. As discussed above in this section, the water-related uses in the Conservancy designation are consistent with conditional use permit criteria and specific performance standards for ports and water-related uses contained in the Economic Development section of the SMP and are, therefore, consistent with the goals, policy statements, and general intent of the Conservancy District.</i></p>
<p>Construction and Operations Regulations</p>	
<p>1) No construction equipment shall enter any shoreline body of water, except as authorized under the terms of a substantial development permit.</p>	<p><i>The project proponent will utilize construction trailers, but these will be located in upland areas of the site. As noted in the JARPA (Attachment G) dredging for dock construction, barge unloading, and mitigation activities would require construction equipment to be in and over the water. Construction of the dock will require up to approximately four in-water barges to be operated waterward of the Columbia River's OHWM at any given time. A temporary crane pad and falsework would also be installed on the project site along the Columbia River shoreline with falsework temporarily placed waterward of the OHWM to facilitate unloading overwater barges anchored waterward of the</i></p>

Use and Regulations:	Response
	<i>Columbia River OHWM. The SSDP should specifically authorize these in-water and shoreline construction activities.</i>
2) Vegetation along the water shall be left in its natural condition unless the substantial development permit allows otherwise.	<i>Limited vegetation existing within the shoreline area would be impacted by project construction as shown on the site plan (Attachment B). Site preparation would consist of clearing and grubbing the site, grading, and setting up the temporary construction facilities. The SSDP should specifically authorize this activity.</i>
3) During construction, care will be taken to assure that waste material and foreign matter are not allowed to enter the water.	<i>Construction BMPs will be employed throughout all phases of project construction. These BMPs include working within approved in-water work windows, complying with state water quality standards (WAC 173-201A), discharge prevention measures for oil, fuels, or chemicals to surface waters, or onto land where there is a potential for re-entry into surface waters, and employing an SPCC plan during all demolition and construction operations.</i>
4) All fuel and chemicals shall be kept, stored, handled and used in a fashion which assures that there will be no opportunity for entry of such fuel and chemicals into the water.	<i>The storage of standard fuel and/or chemicals required to operate the facility will occur consistent with protective systems which prevent entry into the waterways. Construction equipment will be checked regularly for leaks and other problems that could result in the discharge of petroleum-based products or other material into the water, corrective actions will be taken in the event of any discharge of oil, fuel, or chemicals into the water, and oil-absorbent materials will be present on site for use in the event of a spill or if any oil product is observed in the water.</i>
5) Protection from siltation and erosion shall be provided for on all earthworks projects.	<i>An erosion and sediment control plan will be submitted to the County for review and approval prior to the start of construction.</i>
6) Land being prepared for development shall have an adequate drainage system to prevent runoff from entering water bodies.	<i>Due to the size of the development, an NPDES permit would be obtained from Ecology. As required by the permit, the project's preliminary stormwater design report includes BMPs outlined in the JARPA (Attachment G). As noted in Section 1, upon the completion of construction, stormwater runoff would be infiltrated through on-site features. Roads will drain to roadside swales.</i>
7) Side casting of excess road building material into streams will not be permitted.	<i>Road building materials would not be side-cast into streams.</i>
8) All construction debris such as fuel and oil containers and barrels and other miscellaneous litter shall be removed from the shoreline area. No equipment shall be abandoned within the shoreline area.	<i>Materials would be placed in designated construction staging areas. Unused equipment and materials would be removed from the project site once construction is completed.</i>

Use and Regulations:	Response
<p>9) State and federal water quality standards for both inter-state and intra-state waters already are established. These shorelines regulations need only allude to these and other regulations already in effect. Any activities within the shorelines must, as a minimum, meet all these other regulations.</p>	<p><i>The project would comply with all applicable water quality standards, including WAC 173-221, the Clean Water Act as well as County and state standards. The project has the potential to effect water quality during construction and operation through the addition of impervious surfaces and discharge of effluent from the methanol production process. The project will obtain an NPDES individual industrial permit for discharge of effluent, a 401 water quality certification from the Department of Ecology, and will undergo review by Cowlitz County for compliance with minimum stormwater requirements. Therefore, the project will meet all applicable water quality standards.</i></p>
Forest Practices and Shoreline Management	
Roads	
Conservancy and Urban Districts	
<p>1) Road Location: Road should be located on stable soils and constructed in such a manner as to minimize the risk of material entering waterways.</p>	
<p>a) Fit the road to the topography so that minimum alteration of natural features will be necessary.</p>	<p><i>The existing roadway is located on flat topography and existing topography will not be altered to accommodate the roadway.</i></p>
<p>b) Avoid steep, narrow canyons, slide areas, slumps, marshes, wet meadows or natural drainage channels. Also, utilize available topographic surveys, soils, and geologic data to assist in selecting locations which avoid steep and/or unstable areas.</p>	<p><i>Tradewinds Road is not located on these features, however the roadway is located south of and adjacent to wetlands and within riparian habitat buffers. The Applicant is seeking to preserve public access to the shoreline, and the existing roadway alignment will be maintained in order to meet this objective. The proposed road alignment and recreational access area will impact 12,153 square feet (0.28 acre) of riparian habitat buffer in the Conservancy district. The recreational access area will also impact approximately 0.09 acre of wetland buffer in the Conservancy District. However, roadway improvements will not result in wetland buffer impacts. Riparian and wetland buffer impacts will be mitigated onsite through the enhancement of approximately 1.41 acres of riparian buffer, 0.58 acre of wetland buffer, ELJ installation, and pile removal.</i></p>
<p>c) Where possible, locate roads far enough away from waterways to leave buffer zones.</p>	<p><i>The proposed roadway improvements would primarily avoid impacts to regulated buffer areas. However, 12,153 square feet (0.28acre) of riparian buffer would be impacted on the northwest part of the site, but these impacts would occur within the existing roadway limits. The recreational access area will also impact approximately 0.09 acre of wetland buffer.</i></p>
<p>d) Minimize the number of waterway crossings and avoid unnecessary duplication of road systems by making use of existing road where practical. Where roads traverse land in another ownership, but still adequately serve the</p>	<p><i>No waterway crossings are proposed and all lands where roadway improvements are proposed are owned by the Port.</i></p>

Use and Regulations:	Response
operation, attempt to negotiate with the owner for use before resorting to location of new roads.	
2) Road Specifications: Establish specification criteria for each road so that it is best adapted to the terrain and soil properties providing for a drainage system which will control the dispersal of surface runoff water from roads and exposed soils in order to minimize turbid waters from draining into waterways.	
a) Balance cuts and fills or provide waste and borrow areas which minimize damage to soil and water.	<i>Construction of the roadway will require cuts and fills, sub-excavation and surface compaction, base and top course, and asphalt surfacing both within and outside of the 100-year floodplain. However, stormwater will infiltrate through local sandy soils, drainage ditches, and/or sheet flow dispersion. The roadway would be constructed balancing cuts and fills at the site.</i>
c) Specify cut and fill and slopes at the normal angle of repose or less.	<i>Cut and fill and slopes would be consistent with County regulations (see section 5.3.1 for further details).</i>
f) Plan roads to drain by outsloping, crowning, waterbars and through grade changes wherever possible	<i>Roads would drain through sloping and standard roadway construction design.</i>
g) Design the road drainage (whether from culverts, cross-drainage, or ditches) onto the forest floor, preferably on benches so that sediment can settle out before drainage water reaches waterway.	<i>Sediment would filter from the roadway into the sandy soils, roadside ditches, and shallow containment by infiltration and/or sheet flow dispersion methods.</i>
3) Road Construction: Roads should be constructed in such a manner as to prevent the entry of construction or waste material into waterways while adhering to road design, specifications, and requirement of the hydraulic project approval	
a) Until such time as adequate identification can be made throughout the county of the 50- or 100-year flood level, deposit excess material in stable locations above the ordinary high water level.	<i>Roadway materials would be deposited in approved areas above the OHWM.</i>
b) Clear drainage ways of all debris generated during road construction and/or maintenance which potentially interferes with drainage or water quality	<i>No construction will occur in drainage ways.</i>
d) In the construction of road fills, properly compact the material to reduce the entry of water and to minimize the settling of fill material.	<i>There are no significant fills required for the construction of Tradewinds Road. Placement of needed fills and base course will comply with engineering standards for compaction. All excavated soil from roadway construction would remain on the site and would not be disposed offsite or into water systems. The Applicant intends to balance cut and fills to the extent practicable.</i>
g) Install drainage structures as soon as feasible during the pioneer stage of road construction. Uncompleted road grades subject to washing before grading should be adequately cross-drained	<i>Drainage would occur through sloped roadway design, roadside ditches, and shallow containment to infiltration and/or sheet flow dispersion.</i>

Use and Regulations:	Response
4) Road Maintenance: Adequately maintain all portions of the road system to prevent water quality degradation	
a) Clean culvert inlets, outlets, ditches and trash racks to diminish danger of clogging and the possibility of washouts and overflows.	<i>Tradewinds Road would be maintained to the standards of the SMP and County code by the Port.</i>
b) When it is the intention of the land owner to discontinue active use of the road, the road shall be left in such a state as to provide for adequate drainage and soil stability without continuous active maintenance	<i>The road will be maintained by the Port and therefore this regulation is not applicable to the project.</i>
c) Retain road drainage by performing proper maintenance grading	<i>The road will be constructed of asphalt and therefore this regulation is not applicable to the project.</i>
d) Use mechanical equipment in preference to herbicides for control of road side brush	<i>The applicant will use herbicides only when mechanical equipment is not appropriate for site-specific conditions.</i>
Landfill and Dredging	
Rural District	
2) All dredging or spoils disposal operations shall be subject to the following regulations:	
a) Dredging operations shall conform to the operating standards specified on any federal and state permits required for such operations. Operations not requiring federal or state permits shall have similar standards imposed as conditions of obtaining a permit.	<i>Dredging and in-water work permits would be obtained prior to the start of construction. Dredging-related permits to be obtained include the Rivers and Harbors Act Section 10, Section 404, Section 408 analysis, WDFW Hydraulic Project Approval, and County SSDP and CUP.</i>
b) Dredge spoils exceeding the department of ecology criteria for toxic sediments shall be disposed of on land. The results of chemical and physical analyses of the spoils material shall be forwarded to the administrator prior to the beginning of dredging operations.	<i>Sampling was conducted in February 2015 and dredged material characterization was reviewed by the Portland Sediment Evaluation Team. A Suitability Determination was issued that approves in-water placement. Please see the JARPA (Attachment G).</i>
c) Dredge spoils disposal sites shall be completely enclosed by dikes of sufficient capacity to allow for the settling of sediment before entrapped water leaves the diked area.	<i>Approved upland dredged material disposal sites would be enclosed by dikes with sufficient capacity to contain sediment prior to discharging water (see the JARPA in Attachment G for further details on dredging disposal).</i>
3) All landfills shall be subject to the following standards and regulations	<i>The SMP defines "filling" as "the process of depositing dirt and mud in marsh areas to create more land for real estate development." Filling can disturb natural ecological cycles. The applicant is not proposing to fill wetland areas, therefore these criteria do not apply.</i>
Urban District	
1) Dredging or landfill operations with Urban shorelines are to be considered as a conditional use.	<i>In order to provide a dock to accommodate ships arriving, loading and departing, dredging is necessary in the Urban district.</i>

Use and Regulations:	Response
	A CUP application is included with this narrative for the dredging proposed within Urban shoreline areas.
2) Regulations under <u>rural Nos. 2 and 3</u> shall apply.	Landfills are not proposed with the project. Compliance with urban shoreline dredging regulations (rural numbers 2 and 3) are addressed above.
Conservancy District	
1) Dredging operations or landfills shall be prohibited on conservancy shorelines, except where they do not substantially change the character of that district along navigable waterways deemed necessary for adequate navigation as determined by the U.S. Army Corps of Engineers, and where they are a necessary accessory to a project which is clearly dependent on a location near or adjacent to a body of water	In order to provide a dock to accommodate ships arriving, loading and departing, dredging is necessary in the Conservancy District and is clearly water dependent. The Columbia River is designated as a navigable waterway by the U.S. Army Corps of Engineers. The dredging will not change the character of the waterway as it is being conducted in deep water and will not impact shorelines or shoreline uses. The only visible element of dredging is during the actual activity.
Ports and Water-Related Industries	
Conservancy District	
1) Deep-draft ports or water-related industries other than those activities covered in other sections of this program shall be considered as conditional uses on conservancy shorelines.	As stated in section 4.0, the proposed dock facility is a water-dependent use located at the Port of Kalama shoreline; therefore, the project requires an SSDP. In addition, water-related industrial uses are proposed in the Conservancy District, therefore a conditional use permit is required and the conditional use permit criteria are addressed in this narrative.
Urban District	
1) Port facilities and water-related industries shall be permitted on urban shorelines.	As defined under WAC 173-26-20(43), a “water-related use “means a use or portion of a use which is not intrinsically dependent on a waterfront location but whose economic viability is dependent upon a waterfront location. Due to the facility’s water-based exporting of methanol, the project is a water-related and water-dependent use and is therefore permitted on urban shorelines.
2) Any person proposing a development, expansion or alteration, or any phase thereof which constitutes a complete project, of a port facility or water-related industry, shall apply for a permit.	SSDP and CUP applications are included with this narrative.
3) A permit for a port facility or water-related industry, or any expansion or alteration thereof which constitutes a complete project, may be granted a permit subject to compliance with local ordinances and the following regulations:	
a) Demonstration of compliance with the regulations specified on any federal and state permits required for such facilities and operations, by presentation of an application for each permit or other means satisfactory to the administrator.	The following permits for the development of the project will be obtained from County, state, and federal authorities. <i>Federal</i> <ul style="list-style-type: none"> • Rivers & Harbors Act Section 10 / Clean Water Act Section 404, Section 408 analysis.

Use and Regulations:	Response
	<ul style="list-style-type: none"> • <i>ESA Section 7 Consultation</i> • <i>Marine Mammal Protection Act (MMPA) Incidental Harassment Authorization</i> • <i>NEPA Review</i> • <i>Private Aids to Navigation Permit</i> • <i>National Historic Preservation Act Section 106 consultation</i> <p>State</p> <ul style="list-style-type: none"> • <i>Hydraulic Project Approval (HPA)</i> • <i>Shoreline CUP</i> • <i>401 Water Quality Certification</i> • <i>Air Containment Discharge Permit</i> • <i>NPDES Wastewater Discharge Permit</i> • <i>NPDES Construction Stormwater Permit</i> • <i>State Environmental Policy Act (SEPA) Review</i> <p>County</p> <ul style="list-style-type: none"> • <i>SSDP and CUP</i> • <i>Critical Areas Review (CCC 19.15)</i> • <i>Floodplain Permit</i> • <i>Engineering and Grading</i> • <i>Building, Mechanical, Fire, etc.</i>
b) Compliance with other applicable use regulations in this program is required.	<i>This narrative and the accompanying documents address all applicable shoreline use regulations.</i>
Recreation	
1) Low-intensity recreational uses shall be permitted on conservancy shorelines, subject to the following regulations:	
a) A recreational facility or structure which detracts from the character of the local environment shall be prohibited.	<i>No recreational structures are proposed with the project. In order to improve public access to recreational opportunities, improvements would be made to Tradewinds Road. These improvements would include paving approximately 3,700-feet of the existing unpaved roadway terminating at a new parking area approximately 53 feet from the OHWM of the Columbia River. The parking area and roadway improvements would improve public access to the waterfront, shoreline, and unofficial trail systems. The area is currently used for recreational purposes and the proposed improvement will not detract from the character of the area, but would enhance it.</i>
b) Access roads to recreational facilities shall comply with regulations under the use activity roads.	<i>Compliance with Forest Practices and Shoreline Management (Roads) is addressed above in this section (5.3.2.)</i>
c) Parking facilities shall be prohibited within twenty (20) feet of the shoreline as measured on a horizontal plane and surface runoff must	<i>Parking facilities are not proposed within 20 feet of the OHWM. The recreational parking area located at the terminus of Tradewinds Road would be located approximately 53 feet from the OHWM.</i>

Use and Regulations:	Response
meet all city, county, and state requirements in view of water quality.	<i>Runoff would be consistent with County standards by being directed to roadside ditches and shallow containment areas through infiltration and/or sheet flow dispersion.</i>
d) Little or no major change of environment by man-made structures, contrivances shall be permitted.	<p><i>Roadway improvements and a parking area are proposed for public access to existing recreational areas. Currently, members of the public access the site via an unpaved roadway and park in the sandy shoreline area. The roadway improvements and new parking area allow public access to the shoreline.</i></p> <p><i>Activities at the site would include low-intensity structure-less recreation such as sightseeing along the shoreline and walking the unofficial trail systems.</i></p> <p><i>A total of 12,153 square feet (0.28 acre) of riparian buffer and 0.09 acres of wetland buffer would be impacted by the proposed recreational facility and roadway, but would be mitigated by additional buffer enhancements.</i></p>
Roads and Railroads	
Conservancy District	
1) Non-motorized trails shall be permitted within conservancy shorelines.	<i>Non-motorized access to existing informal trails will continue. No new trails are proposed.</i>
3) All private roads must meet the road specifications as outlined in the Forest Practices and Shoreline Management Special Report, found under Forest Practices and Shoreline Management, pages 34 - 36.	<i>Tradewinds Road will be owned and operated by the Port of Kalama, but will not be a publicly dedicated road and is therefore a "private roadway" per Cowlitz County Code 11.36.040. Compliance with Forest Practices and Shoreline Management (Roads) is addressed above in section. 5.3.2.</i>
Sewage Collection and Treatment	
Natural, Conservancy, Rural, and Urban Districts	
1) Sewage disposal facilities for any proposed use shall meet all applicable state and local regulations, including those of the Department of Social and Health Services, Department of Ecology, Cowlitz County Health Department and those found in zoning subdivision ordinances.	<p><i>Sewage from the administrative and support areas and restrooms of the facility would be treated at the existing Port wastewater treatment plant.</i></p> <p><i>Process wastewater would be treated on site and would be subject to an NPDES permit issued specifically for the proposed wastewater treatment.</i></p>
Utilities	
Conservancy and Urban Districts	
1) Utility systems, such as permanent electric lines, pipelines, sewer trunk lines, water main lines, and similar facilities shall be permitted on conservancy shorelines.	<i>Standard utilities necessary to operate methanol facilities would be located at the project site and, as stated in this section, are permitted within the Conservancy District.</i>
2) Any person proposing to install or construct a utility system shall apply for a permit.	<p><i>Utilities are included in this application for the SSDP.</i></p> <p><i>Utilities located in the Urban District will include domestic water service provided to the proposed dock and to the new fire hydrants serving it. New</i></p>

Use and Regulations:	Response
	<p>hydrants fed by 6-inch diameter lines would be located at the dock and where the trestle connects to the land as required by the fire code. These hydrants would be fed using 6-inch-diameter fire main. A 1 1/2-inch water service for domestic water service would be provided on the dock. A 3-inch domestic water line would be constructed to the outside face of the dock. This water supply would serve two 2-inch-diameter provisioning connections, as well as approximately two washdown water spigots on the dock. All exposed water piping hung from the dock structure would be heat-traced to prevent freezing. Pipe supported on hangers would be equipped with flexible couplings at expansion joints</p> <p>A new 15kV electrical substation will be constructed near the dock to provide electrical service to the dock and will consist of transformers and switchgear sized to handle the dock equipment and shore power for berthed vessels. Electrical panels will be provided on the dock to serve lighting, freeze protection, and receptacles. The electrical substation will be an approximate 50' x 60' bollard-enclosed area. The switchgear house will be a stainless steel enclosure mounted on a concrete pad foundation.</p> <p>Dock lighting will be provided by fixtures mounted on 40 foot steel poles. Private aids to navigation lighting would also be installed on the dock.</p>
<p>3) A permit may be granted subject to the following regulations:</p>	
<p>a) All such utility systems shall be underground unless such undergrounding would not be feasible</p>	<p>Where feasible, utility systems would be located underground. A stormwater infiltration pond will be located on the northwestern part of the site. Overhead utility lines would be located in the Urban District and include an electrical substation, pipelines, as well as mechanical, electrical, and plumbing utilities elevated above the dock surface on a steel frame pipe rack. These utilities will be located above the Columbia River and OHWM (see JARPA Figure 5 for further details) and must be located above ground to serve the dock.</p>
<p>b) Where such utility systems occupy shoreline areas, clearing necessary for installation or maintenance shall be kept to the minimum width necessary to prevent interference by trees and other vegetation with the proposed transmission facilities.</p>	<p>Utilities located within the Conservancy District would be constructed within the project site, and no interference by trees or other vegetation is anticipated.</p> <p>Vegetation at the site consists of a mix of mosses, grasses, and forbs and scattered Scotch broom (<i>Cytisus scoparius</i>) on the east side of the project site, with dense mosses, grasses, and herbaceous vegetation to the southwest, and, in the northwest portion of the site, sparse vegetation consisting of</p>

Use and Regulations:	Response
	<i>low-growing herbaceous vegetation and a mix of perennial and annual grasses. Previously placed sandy dredge spoils occupy the remainder of the upland site. Given the sparsely vegetated condition of the project site, impacts to vegetation from utility systems will be minimal.</i>
c) Upon completion of installation of such utility systems or of any maintenance project which disrupts the environment, the disturbed area shall be regraded to compatibility with the natural terrain and replanted to prevent erosion and provide an attractive, harmonious vegetation cover.	<i>Utilities would be located within the project site and no restoration activities are anticipated.</i>
4) Utility hookup linkages to shoreline use facilities shall be underground where feasible.	<i>Utilities would be located underground where feasible.</i>

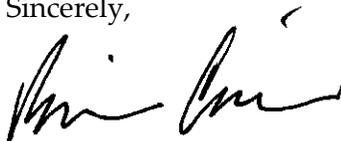
6.0 SUMMARY

As shown in the table above, the proposed use is consistent with permitted and/or conditionally permitted uses in the Urban and Conservancy shorelines. The SMP also requires that the activity comply with state and federal regulations. The local, state, and federal permits that are required will be obtained prior to undertaking any work.

Based on the information indicated above, we request that Cowlitz County grant an SSDP and CUP for the project and find that, as proposed, it is consistent with the policies and regulations of the Cowlitz County SMP.

Based on the information indicated above, we request that Cowlitz County grant an SSDP and CUP for the project and find that, as proposed, it is consistent with the policies and regulations of the Cowlitz County SMP. Thank you for your consideration of this request.

Sincerely,



Brian Carrico
Senior Project Manager