Water & Marine



## Cape Disappointment Wave Barrier

llwaco, WA

Commercial and charter fishing boats leave the Port of Ilwaco, Wash. via the Columbia River to fish for steelhead, sturgeon, and salmon. The boats pass Cape Disappointment State Park's public boat landing, used by private fisherman. The waves created by the commercial and charter boats are so high and strong, the public boat landing requires a barrier protection system. In the past, there was a wooden system, which deteriorated over the years because of the exposure to coastal winds and saltwater.

The galvanized barrier system is located along the tidal area of the Columbia River and Pacific Ocean. where saltwater is rising up and down the barrier twice daily with the ebb and flow of the oceanic waters. The sheet piling of the barrier extends down about 30 feet, but does not extend to the river floor. The shorter piling allows the saltwater current to flow under the structure. Additionally, the barrier's top caps were designed with spikes to deter seagulls from landing on the system and tarnishing the appearance with droppings. The barrier system was hot-dip galvanized because the corrosion resistant coating was able to handle the constant exposure to saltwater and coastal winds without deterioration. The hot-dip galvanized coating will provide the private fisherman protection without succumbing to corrosion to ensure the Cape Disappointment is a safe and appealing park for many more years.



Specifier Washington State Parks & Recreation Commission

Engineer PND Consulting Engineers

## Additional National Pipe & Piling Inc. Village Iron Works

