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November 28, 2016

Millennium Bulk Terminals  
NEPA EIS c/o ICF International  
710 Second Ave Ste 550  
Seattle WA 98104

Besides, the current public comment that I have enclosed. I also attached the public testimonies that I gave verbally in the public hearings.

I have also enclosed two photographs of the Eastern Asia vessel that were taken in front of the Willow Grove Boat Launch, Longview during this summer.

Out of all of the major projects slated for the State of Washington including oil, methanol, and coal. COAL is the most destructive.

1. The most outdated source of energy.
2. Destruction of land at the mines.
3. Coal dust/sledge pollution to the Columbia River and the National Scenic Area.
4. Contamination at the Port of Longview and our aquifers beneath the project site.

Please, add the sections that I feel should be examined further and deny the 401 and 404 permits based on all of the concerns that have surfaced during these hearings and public comment periods.

Millennium Coal Terminal-Longview-Review of DEIS

Chris Turner

In 2012, Bnsf changed its train operations protocol to enhance use of existing capacity using Directional Running. This strategy routes all westbound loaded unit trains (including coal) from Pasco via the Columbia River Gorge to Vancouver, where it continues on the Bnsf north-south main line to its final destination. EMPTY unit bulk trains from north of Vancouver, including Cowlitz County, return to Pasco and to points east via Stampede Pass.

Scheduled to be completed by 2017, WSDOT is constructing 3.7 miles of a third main track on the Bnsf Seattle Subdivision main line between Longview Junction and Kelso. The purpose of the third main track is to enable 2 trains to pass while a train is simultaneously moving into or out of the Longview Junction yard. This would reduce the potential for delay to passenger and freight trains running through the area.

Capital investments by Bnsf or UP to increase capacity in Washington State would be made based on the general level of traffic and not specifically related to the projected volume. ...and would be implemented over time. This is typical process used by rail carriers to adjust network capacity to meet changing traffic volumes.

The projected 2028 capacity assumes No railroad investments would be made to increase capacity and no substantial change in existing operation would occur.

Without Improvements LVSU would not be able to accommodate the full growth of the Proposed Action.

Vancouver-Longview Junction and Longview Junction-Auburn (outside Cowlitz County) The projected volume on this segment with Proposed Action-related trains would exceed capacity.

The addition of 16 Proposed Action-related trains per day could result in rail traffic on some segments exceeding capacity if no capacity expansions were made. (Bnsf)

The Proposed Action-related trains could also result in rail traffic exceeding capacity on some parts of the Union Pacific route if no capacity expansions or operating changes were implemented.

Some Bnsf main line segments would exceed capacity in 2028 if Bnsf does not make capital investments or operating changes to Expand Capacity.

## Millennium Coal Terminal-Longview

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### Traffic Control Systems

Traffic Control Systems help maintain a safe distance between trains passing or meeting on the same track.

While future generations of PTC May Help railroads increase capacity on individual corridors, the PTC technology currently being installed on US railroads Is Not Expected To Have A Meaningful Impact on corridor capacity. (Association of American Railroads 2014).

LVSW has indicated that it would upgrade the Traffic Control Technology on both the Bnsf Spur and the Reynolds Lead from TWC to CTC. The upgrade in traffic control technology Would Increase Capacity on both segments from 16 trains per day to approximately 30 trains per day. This improvement would provide sufficient capacity to handle both the Proposed Action-related trains and the projected growth in baseline traffic.

While LVSW has planned for the capital investment, it has Not began work or applied for permits. LVSW would start the permit process and would make these investments once it was reasonably certain that the projected volume would materialize.

There are distinct differences of opinion between the Association of American Railroads and Bnsf on the issue of Traffic Control Systems being able to increase capacity.

For Bnsf projected 2028 capacity without improvements or operating changes, would about match the capacity. That's if Bnsf handles most of the volume and continues to use its directional running strategy.

If UP captures most of the volume, then all Proposed Action-related trains would use the segment from Vancouver, WA to Longview, WA, increasing volume beyond current capacity. Impacts of exceeding the capacity would include congestion and delays to both passenger and freight trains.

2.1.2 2.1.4.1 2.2.2 3.1.1.4 2.1.3.2

Millennium Coal Terminal-Longview

Chris Turner

The Sierra Club, Friends of the Gorge, and many other organizations have successfully sued Bnsf Railroad for violating the Clean Water Act due to the pollution from coal dust into the Washington waterways. (Primarily the Columbia River Gorge, National Scenic Area).

Wasco County, in November 2016 denied a permit application to allow Union Pacific Railroad to expand their rail system by double tracking 4.02 miles in the Columbia River Gorge, National Scenic Area. This expansion per Union Pacific would allow an increase in rail traffic capacity of 5-7 trains per day.

This Union Pacific expansion would have:

1. Allowed more than 50% variances to the buffer zones and setbacks.
2. Placed train tracks in the buffer zones right next to the Columbia River.
3. Would have allowed coal cars to expel coal dust/sledge directly into the Columbia River National Scenic Area.
4. Used the Gorge as a train yard, train parking lot.
5. Disconnected State Parks from recreation areas.
6. Filled in wetlands that couldn't be mitigated within the Gorge.
7. Compromised access to the Columbia River.
8. Blocked scenic views from view points and the roadway.
9. Increased rail traffic, number of trains and length of trains

We need to add the Columbia River Gorge, National Scenic Area as an area of extreme Indirect Impact from the proposed Millennium Coal project. The cumulative impacts have not been discussed in the DEIS.

We need to look at all of the proposed projects and rail traffic that will use the Columbia River Gorge on both sides of the river.

In every proposal, including Millennium's, for the southern region of Washington State, the one common denominator is that the trains will travel through the Columbia River Gorge, National Scenic Area. This proposed coal terminal, will by itself, exceed the 5-7 trains per day expansion of Union Pacific even if the expansion could ever be approved.

Together, these projects are huge, and will each require numerous trains per day to bring their products to their Ports.

Proposed Tesoro-Savage Oil Terminal (8-10 trains a day)  
Proposed Millennium Oil Terminal (8 trains a day)  
Proposed Westway Oil Terminal-Gray's Harbor

Millennium Coal Terminal-Longview

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All of these increases of rail traffic, will have to compete with the already existing overburdened rail system, and their future expansions.

Without relieving the bottleneck through the Columbia Gorge, including Mosier, the increased capacity in Longview will be useless. Also, significant capacity concerns, exceeding capacities and chokepoints mentioned throughout the EMPTY return routes for Bnsf should be more than a significant concern about the railroads ability to handle even this one project.

The Columbia River Gorge, National Scenic Area is undeniably the most direct route from the mines to Longview. Unfortunately, the Gorge is geologically unsuited because of the lack of buildable space to expand the tracks.

The Bnsf plan for transport of Millennium's coal is through the Columbia River Gorge. Returning EMPTIES through Stampede Pass. UP's transport plan is to transport Millennium's coal through the Columbia River Gorge. Returning the empties back through the Columbia River Gorge.

To add to the already lack of capacity, to the North, Seattle is having it's own capacity of oil trains with a derailment under one of it's downtown bridges.

Bnsf railway is already moving 8-16 oil trains per week through Seattle from Dakota to the refinery in Anacortes, WA.

The railway physically runs along the Puget Sound through residential neighborhoods underneath downtown in 100-year-old tunnel along the very popular professional sports venues.

The Spokane City Council recently considered a ballot initiative which would impose a \$261 fine for each rail car of crude oil and uncovered coal cars that passes through town. Citing potential safety risk to first responders dealing with a derailment downtown. ( As a reminder, Bnsf trains would run through Montana and Sandpoint, Idaho to Spokane and Pasco, WA)

Just because we want to double-track the rail system, doesn't mean that it's possible to double-track the Columbia River Gorge, National Scenic Area and various chokepoints effectively. There are numerous areas like the Columbia River Gorge that are geologically unable to expand to meet the increased demand of rail traffic. We are just providing areas to park trains along our waterways and in our towns. There is no way to force our geography to comply with our need to expand the rail system necessary to handle all of this increased volume.

Millennium Bulk Terminal-Longview-Review of DEIS  
November, 2016 Public Comment  
Chris Turner 8 Cedar Gates RD Longview WA 98632

## COAL DUST

### SOURCES OF COAL DUST:

1. Transfer and handling of coal from rail to storage piles.
2. Fugitive emissions from coal storage piles.
3. Transfer and handling of coal from storage piles to ship.
4. Fugitive coal dust/sledge during transport by rail car.

Bnsf's own statements, indicate that each rail car could lose up to 600lbs of coal dust between the mine and destinations like Longview, WA. Bnsf has done studies indicating that from 600lbs to a ton of coal can escape from a single loaded coal car. Other reports have indicated that as much as 3% of the coal loaded into a coal car can be lost in transit.

At 600lbs loss of coal per rail car, that's 75,000lbs per (125) train. At 8 trains per day (such as Millennium) that's 600,000lbs a day of fugitive coal/coal dust lost. During one year, 219,000,000lbs can be deposited along the tracks. That's an incredible amount that we would not have to dig out of the ground at the mine. I am always amazed how businessmen can lose such great quantities of product and just accept it as a cost of doing business.

Rail cars, even after traveling from the Powder River Basin to Longview are still expelling coal dust particles above the allowable trigger limits.

The fugitive coal dust from this project at the Port would extend 1,000ft into the Columbia River adjacent to the project site. The highest rate of coal dust pollution would be expected in the area adjacent to the coal terminal area, but smaller particles could also deposit in a zone extending around and downwind of the project area. Deposition rates gradually decline 2.98 miles from the coal terminal.

Coal dust particles would likely be transported downriver by river flow and either carried out to sea or distributed over a broad area of the Columbia River.

Coal and coal dust in marine and estuary environments have similar adverse effects as elevated levels of suspended sediments on water quality. During periods of lower flow, a smaller amount of coal dust could have a greater impact of water quality. Impacts include ICREASED TURBIDITY, which can interfere with Photosynthesis and increase WATER TEMPERATURES. Coal and coal dust in the water column, can also affect marine organisms through abrasions of tissue, and Smothering and Clogging of RESPIRATORY Feeding Organs.

Millennium Bulk Terminals-Longview-Review of DEIS  
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### COAL DUST (Cont)

Bnsf vs Sierra Club et al. Washington State Seattle Federal District Court November 2016.

A group of organizations from the Sierra Club, Friends of the Columbia River Gorge and others, sued Bnsf for violating Washington's Clean Water Act for polluting the waterways with fugitive coal dust. The decision was that Bnsf would:

1. Do a 2-year study funded by Bnsf into methods of covering coal trains.
2. One million dollars for conservation or restoration projects in Washington State.
3. Clean up and removal of coal and or petcoke at specific areas near water bodies most affected by Bnsf coal trains.

Bnsf vs Shippers-Surface Transportation Board 2011. Bnsf was allowed to require surfactants and specific loading profiles for coal trains. They stated that fugitive coal dust was causing derailments because of the build-up of coal dust on the tracks. Also, Bnsf was allowed to charge tariffs on shippers for transporting coal on their trains.

The Columbia River and Estuaries are already listed on the Clean Water Act (303d list) for water temperature and water quality violations.

### Mitigations

#### Coal Train Covers

1. Highly expensive \$13,000 to \$15,000 for each rail car. That's about 20% of the cost of the entire rail car.
2. Largely experimental-not used in the US.
3. Excessive weight of covered coal cars will degrade the tracks
4. Confined spaces creates potential for spontaneous combustion or explosions ignited by sparks, static electricity, or heat.
5. 7% of coal dust leaks out of the bottom of bottom-unloading cars in transit.
6. The weight of covered coal rail cars would require additional diesel engines.

#### Surfactants:

1. Adds additional chemicals to the coal.
2. Can boost the ability of coal pollutants to enter the environment.
3. Surface and groundwater quality deterioration
4. Soil Contamination
5. Toxicity to humans during and after application.
6. Surfactants are highly expensive, largely not biodegradable.

Millennium Coal Terminal-Longview

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Longview Train Congestion

Project-related trains would affect accessibility to community resources and public services during peak travel times because of increasing wait times at crossings along the Reynolds lead and Bnsf Spur if two project-related trains travel during the peak traffic hour, or rail infrastructure improvements are not made. Project-related trains would also increase rail traffic noise levels in Archie Anderson Park, along the Highlands Trail, and in Gerhart Gardens Park.

Project-related trains would adversely affect average vehicle delay at up to four public at-grade crossings if a project-related train traveled over the Reynolds Lead and Bnsf Spur during the peak vehicle traffic hour. Average delay for all vehicles would be more than 55 seconds at these four public at-grade crossings.

Increased vehicle delays would affect emergency services under certain conditions. Delays would primarily occur only if a dispatched emergency vehicle needed to pass through an at-grade crossing when a project-related train was already passing through that crossing and an alternate route was not available to the emergency vehicle.

Increasing the speed of trains through these intersections is not an appropriate mitigation measure. Increasing speeds from 10mph to 15mph or 20mph will only increase the risk of serious train-related vehicle accidents. These increased speeds will only increase the required stopping distance for the trains. Also, the additional speed will increase the coal dust volume expelled from the rail cars.

5.1.5.1 Table 5.1.4 DEIS

### Docks/Dredging

Fisheries generally consider the Columbia River Estuary to extend from the Bonneville Dam to the mouth of the Columbia River.

The Millennium DEIS should include not only the project site itself, but the accumulative indirect impacts from the proposed Tesoro-Savage Oil Terminal in Vancouver, proposed Kalama Methanol Refinery, proposed Port Westward Refinery, and other recent dock projects. Plus, add the failure of the Columbia River to currently meet the Clean Water Act Standards for water quality and water temperature.

The proposed Kalama Methanol Refinery, proposes to dredge a minimum of 16 acres to construct a new dock, or possible extend an existing dock. This project would install 320-640 pilings (temporary pilings are extra). Remove 160 creosote-treated pilings from the backwater near the proposed facility. Create an overwater docking structure of approximately 44,943 to 134,829 sq ft. At Port Westward, these figures for piling and dock structures could be similiar in scope.

The Proposed Tesoro-Savage Oil Terminal in Vancouver, would reinforce existing steel pipe piles supporting the Berth 13 dock. Two breasting dolphins and two mooring dolphins including removal and replacement of decking and pile caps. They will replace and upgrade existing steel trusses and walkways between 13 and two breasting dolphins. Plus, the addition of a new movable walkway between 2 mooring dolphins and the shoreline.

The Millennium facility will permanently alter 48-acres of deepwater habitat by removing approximately 50,000 cubic yards of benthic sediment. This approximately 68-acre dredging area (include docks 1, 2, 3) will have to be maintenance dredged somewhere between every 2 and 3 years.

"The proposal would result in the alteration or permanent loss of approximately 59 acres of aquatic habitat in the aquatic study area".

"Construction of docks 2 and 3 would create 4.62 acres of new overwater surface area".

"Existing creosote-treated piles associated with two-pile-dikes would be removed". Removing these pilings could cause:

1. Improved water quality over the long-term.
2. Could cause temporary, short-term increase in suspended sediments.
3. Short-term water contamination.
4. Long-term sediment contamination from creosote released during extraction or long-term exposure to the water column.

Millennium Bulk Terminal-Longview-Review of DEIS (Cont)  
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Docks/Dredging (Cont)

This accumulated dredging and large areas of overwater docking and trestles of all the projects slated for the Columbia River, especially in a very concentrated area of the river, will result in permanent, irreversible direct impacts to the aquatic life of the river estuaries.

There needs to be an additional protection to the Columbia River habitat from the disturbances caused by pile driving and construction etc. A little mitigation was mentioned, but not nearly sufficient. Air bubble curtains, and every other sound attenuation devices available should be required to protect the aquatic environment.

The 30-year aquatic land lease, which expires in 2038 between Washington State DNR and Northwest Alloys poses another hurdle for the Millennium Coal Terminal. Millennium is essentially only a contractor under this lease.

This project would need DNR's approval for pre-construction, dredging, and geotechnical studies and other activities. The lease only allows 3-220ft docks. DNR would evaluate the accumulative impact of river habitat, water quality, ocean acidification, and the affect of state-managed lands throughout the Lower Columbia Region and the State.

Dock 2 at the proposed site would be up to 1,400 feet long and would vary in width from approximately 100 to 130 feet. Dock 3 would be up to 900 feet long and approximately 100 feet wide. A single trestle approximately 800 feet long varying in width from approximately 35 feet up to 60 feet.

Obviously, the docks and trestle would be overwhelmingly beyond the scope of the DNR's lease.

3.3.1.6 4.1 4.4.8.5.1 SEPA Alternatives Technical Report  
April 2016

There are apparent deficiencies in our studying the Millennium Bulk Coal Project:

1. The Columbia River Gorge, National Scenic Area should be included in the Final EIS report. The Gorge area has some of the most direct and indirect impacts of this whole project. (Pollution from coal dust, overburdened rail traffic)
2. The direct and indirect impacts to the coal mines involved in this project need to be included in the Final EIS.
3. The transportation of the coal by vessel and the ultimate burning of the coal with its direct and indirect impacts need to be included in the Final EIS.
4. An Air Quality Monitoring Station needs to be built close to the Kalama Industrial Area. The monitoring station in Longview is just too far away to be useful.
5. There needs to be an increased number of water quality test locations in the Columbia River.

Please read the document "An Assessment of the Health and Safety Implications of Coal Transport through Oakland June 14, 2016". It documents the technical health hazards of coal dust and gives an accurate assessment of the dangers of living with a bulk coal terminal. Their summary notes: Increased hazardous air pollutants, increased mortality, an inability to meet air quality standards.

Millennium Coal Terminal-Longview

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EXECUTIVE SUMMARY ES 4.2.4

The potential impacts of the proposed export terminal in combination with the reasonably foreseeable future actions could result in CUMMULATIVE IMPACTS on the following environmental resource areas:

1. Land use
2. Social and community resources
3. Aesthetics
4. Cultural resources
5. Tribal treaty rights and trust responsibilities
6. Energy
7. Geology and soils
8. Surface water
9. Wetlands
10. Water Quality
11. Vegetation
12. Fish
13. Wildlife
14. Rail Transportation
15. Rail Safety
16. Vehicle Transportation
17. Vessel Transportation
18. Noise
19. Air Quality
20. Coal dust
21. Greenhouse gas emissions.

One cumulative effect that was left off in error, was the hazardous materials category. The direct and indirect impacts to humans, aquatic, and wildlife are unmistakable and long-lasting.

These cumulative Impacts encompass every category of Environmental Impacts: Built Environment, Natural Environment, and Operations.

Millennium Bulk Terminal-Longview-Review of DEIS  
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In order to approve the 401 and 404 permits, the Army Corps of Engineers would have to ignore the following cumulative, direct and indirect impacts:

1. The inability to sufficiently expand the rail systems by double-tracking the Columbia River Gorge, National Scenic Area, and other chokepoints.
2. Additional rail traffic required will promote double-tracking in the buffer zones in the Columbia River Gorge.
3. Trains blocking our scenic views in the Columbia River Gorge and other cities such as Kalama, WA.
4. A rail system in Washington and Oregon that is already at its maximum with current rail traffic.
5. Dragging coal long distances by rail, polluting with coal dust/sledge as the rail cars travel along the tracks near our waterways.
6. Mitigation methods currently available for uncovered coal cars, are not only limited but are virtually impossible due to the inability to confine the coal.
7. Coal dust pollution, recent liability placed on railroads for polluting the Washington waterways, primarily the Columbia River Gorge National Scenic Area
8. Increased frustration by cities and counties related to oil and coal rail cars. (Fires, explosions, coal dust)
9. Unmitigated loss of coal dust/sledge from rail cars during transit.
10. The mitigation of monitoring coal dust etc. when its already been proven to cause excessive pollution.
11. Studies are already available about the health concerns from a proposed coal terminal (Oakland Study)
12. Coal dust pollution adjacent to the project site interfering with photosynthesis in the Columbia River.
13. Confirmed health issues, related to coal dust, diesel emissions, and noise pollution.
14. Dredging 68-acres, damaging the Columbia River estuaries.
15. Excessive overwater coverage required for the docks and trestles.
16. Creosote-treated pilings which will be removed and can cause long-term damage to the estuaries.
17. Dredging in an area previously used for industrial purposes. Recommendations from the Reynolds cleanup indicated to not disturb large sections of the Columbia River due to possible toxic contamination.
18. Number of pilings required for two new docks and trestles.
19. New excessive, extremely large Panamax-class vessel traffic on the Columbia River.

Ignoring Direct and Indirect Impacts (Cont)

20. Limited width of the Columbia River Channel. Creating dangerous conditions for smaller boats and personal watercraft (Seadoos and kayaks).

21. Speed of the larger vessels during transit near the congested boat launches and Port areas.

22. Fishing, recreational activities being incompatible with the increased vessel traffic from multiple projects in the Columbia River.

23. The risk of contaminating the shallow and deep aquifers directly underneath the project site. (Longview's and surrounding areas Main Water Supply and direct connection to the Columbia River).

24. The Project's high liquefaction rating in an Earthquake.

25. Inability to properly deal with soil stability procedures because of the shallow aquifer.

26. Millennium's operational effects on aquatic life, fish migrations, and wildlife during a continuous 365 days-a-year schedule.

27. Effects on fisheries with the combined impacts from all the current and proposed projects on the Columbia River.

28. Environmental impacts of mining coal.

29. The environmental impacts of burning 44 million tons of coal a year.

30. Stockpiles of coal 85 feet tall, covering 75 acres.

31. Increased vessel accidents and groundings in the Columbia River not just for Millennium's vessels but for all others as well.

32. Coal dust/sledge from coal rail cars cause degradation of the tracks and increased risk of derailments.

33. Projected increase in the length of unit trains which are already 125 cars long.

34. Extended wait times for emergency and other vehicles on at-grade crossings in all the cities throughout Washington and Oregon.

35. Violation of tribal treaty rights on the Columbia River and the National Scenic Area.

COAL HEARING--MILLENNIUM LONGVIEW October 24, 2016  
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I had a great idea, modeled after AUSTRALIA'S GRIFFIN COAL COMPANY'S project which is now in the permitting process. The proposal would use cargo containers to transport coal from the Collie Mine to a ship's hold at the Port of Bunbury.

Coal is loaded into the cargo containers at the mine, lidded before they leave, stored at the harbor with the coal still inside. Then the containers are emptied directly into the hold of the ship.

No coal, coal dust, or sledge lost in transit. No soil or water contamination, or coal dust at the Port. No coal dust from the Port into the Columbia River.

BUT WAIT--we can't process coal the Aussie way because the proposed Millennium project site soil doesn't have the LOAD-BEARING CAPACITY to even handle the weight of the coal which will be dumped in the stockpile areas. Therefore, the additional weight of the cargo containers is out of the question. Weight is such a critical issue, that the Terminal Building has to be built with light weight materials. In addition, the ground is so corrosive to concrete as well as steel. The project area has a HIGH POTENTIAL of LIQUEFACTION.

An attempt will be made to stabilize the soil by preloading the soil in the area of the coal stockpiles, this will take 7 years. If it's successful, Millennium might be able to lay down the coal. All the issues with storing the coal on the ground will still remain. (Soil contamination, groundwater pollution, liquefaction after an earthquake, and the shallow aquifer located just 3 feet below the surface.)

WE ARE LEFT WITH:

1,600,000 metric tons of coal, stacked 85ft high at the Port

1. Union Pacific Railroad is proposing the double tracking for 4.02 miles in the buffer zone of the Columbia River, Wasco County. Coal dust, sledge will fall directly into the Columbia River.
2. Coal being dumped onto the ground at the project site. Coal dust from the stockpiles and ship loadings will end up in the Columbia River.
3. 48 Acres of dredging to build 2 docks, 630 steel piles.
4. 4.62 acres of new overwater surface area, alteration or permanent loss of approx 59 acres of aquatic habitat.
5. Removal of 202 acres of animal habitat.
6. 240 Unit Trains (125 cars each) arriving/departing monthly.
7. 70 ships loaded monthly (80% panamax)
8. Removing approx 225 linear feet of creosote-treated piles causing long-term sediment contamination from releasing creosote and long-term creosote exposure to the water column.

Handling coal in an open manner is disgraceful. The residents of Oregon, Washington, and all the states inbetween deserve more respect.

COAL HEARING-MILLENNIUM LONGVIEW October 25, 2016  
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I mentioned the load-bearing capacity of the project site at Millennium before. The coal stockpile area CANNOT SUPPORT the weight of the coal. I would like to address it further:

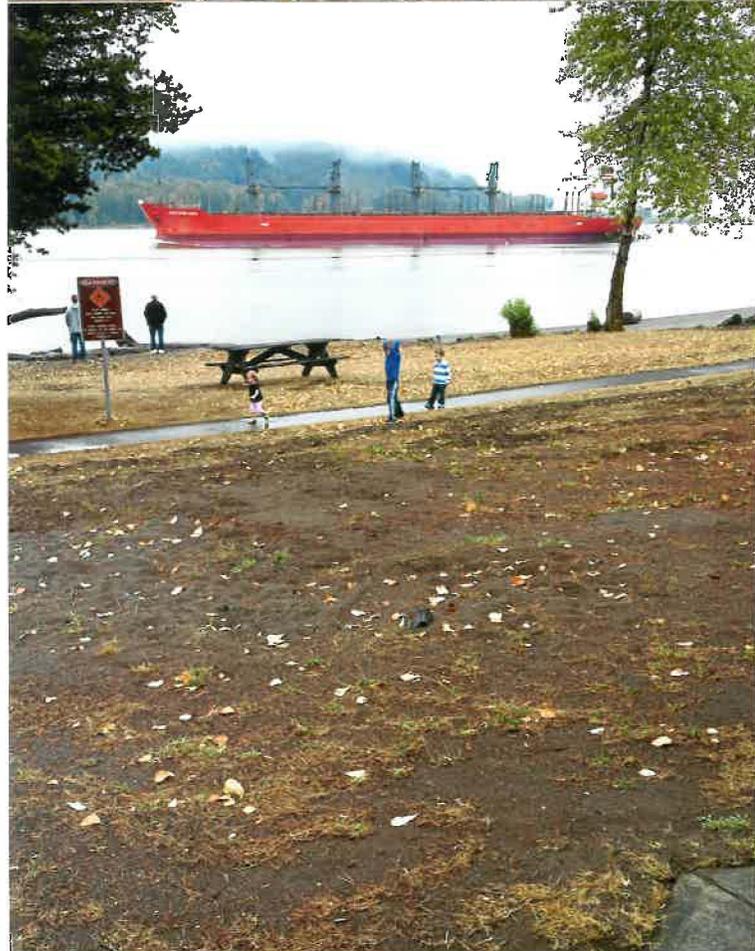
Specifically, a detailed "EARTHQUAKE GEOTECHNICAL ASSESSMENT" should be required before the issuance of the Final EIS.

1. HIGH POTENTIAL OF LIQUEFACTION
2. TWO AQUIFERS
3. PRELOADING OF STOCKPILE AREA

A professional earthquake engineer needs to determine the best method to address the soil stabilization considering the final extreme weight of the preloading and the coal. At the same time, considering the aquifers, and the liquefaction issues relating to lateral spread etc.

My main concern is the insufficiency of the soil stabilization mitigation proposal and lack of adequate professional oversight in the process. Particularly, the final stabilization effort and it's ability to protect the underlying aquifers from contamination, and possible damage or even collapse under the excessive weight of the coal etc.

This Earthquake Geotechnical Assessment should be done BEFORE the FINAL EIS because of it's profound effects on the entire project. Besides, it's possible that currently available soil stabilization mitigations will not overcome the project site's deficiencies or protect our aquifers.



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