

Date: March 22, 2021

To: Environmental Quality Commission

From: Richard Whitman, Director

Subject: Item J: Director's Report (Informational)
March 25-26, 2021, EQC meeting

1. Federal actions

1.1. New EPA Administrator confirmed

On March 11, 2021, Michael S. Regan was sworn in as the 16th Administrator of the Environmental Protection Agency. Administrator Regan was the Secretary of the North Carolina Department of Environmental Quality. As the Secretary, Regan led that Department's efforts to establish a "net-neutral by 2050" goal for decarbonization for North Carolina; worked to address emerging contaminants, including per- and polyfluorinated alkyls (PFAS); and, in 2018, established an Environmental Justice and Equity Advisory Board. He previously worked at the Environmental Defense Fund, in EPA's Office of Air and Radiation and managed an environmental consultancy.

1.2. American Rescue Plan Act includes environmental and public health protection funding

Congress has passed the American Rescue Plan Act of 2021 (H.R. 1319) which was signed into law by President Biden. The \$1.9 trillion appropriates Fiscal Year 2021 funding to address both the pandemic and its economic ramifications. Section 6002 of the Act includes provisions that directly affect the funding of state and local clean air agencies in the current federal fiscal year, including appropriating \$100 million to EPA "to address health outcome disparities from pollution and the COVID-19 pandemic". This appropriation includes \$50 million to be used "for grants and activities authorized under subsections (a) through (c) of section 103 of the Clean Air Act... and grants and activities authorized under section 105 of such Act". No more than five percent of that funding can be used for administrative purposes by EPA. It also includes an additional \$50 million "that shall be for grants, contracts, and other agency activities that identify and address disproportionate environmental or public health harms and risks in minority

populations or low-income populations” under several authorities including CERCLA, the Safe Drinking Water Act, and “section 103(b) of the Clean Air Act”. No more than two percent of that funding can be used for administrative purposes.

2. Agency rulemaking updates

2.1 Air Quality: Landfill Gas Emissions Rulemaking

DEQ is conducting a Landfill Gas Emissions rulemaking that will consider regulations in effect in neighboring states and approaches in response to the Governor's Executive Order 20-04. DEQ convened a rules advisory committee that includes industry, non-profit and local government representatives. The RAC has met twice since January 2021 and has discussed landfill basics, existing landfill gas emission rules, and the draft rules prepared by DEQ. The draft rules increase: emission monitoring, emission reduction requirements, reporting requirements, and the number of landfills that would be permitted through DEQ's Air Quality Program. DEQ is currently reviewing comments from the RAC on the draft rules. DEQ is on track to present the rules for EQC consideration in late 2021. Draft rules and background materials regarding this rule making are available on the Landfill Gas Emissions 2021 rule making webpage:

<https://www.oregon.gov/deq/Regulations/rulemaking/Pages/lfg2021.aspx>

2.2. Air Quality: House Bill 2007 Diesel Registration and Retrofit Implementation Update

DEQ convened the Retrofit Compliance 2021 Rulemaking Advisory Committee in fall 2020. The committee included representatives from construction companies, small and large fleet associations, diesel retrofit installers and manufacturers, environmental organizations, as well as state and public agencies. The group met in September and November 2020, and January 2021 to consider the policy, fiscal and economic impacts of the draft proposed rules on the businesses and organizations they represent.

Next, DEQ is preparing for public engagement on the proposed rules and will file its notice late in March 2021. DEQ will hold a Public Hearing in late April and will present the proposed rules for EQC adoption in July of 2021. Pending commission approval, DEQ is planning for targeted outreach to affected parties, particularly those who own trucks subject to HB 2007 regulations, and highlighting options for compliance. DEQ will also work with ODOT to complete interagency agreements, following final rule approvals, related to title and registration requirements under the authority of that agency.

DEQ is pursuing a policy option package during the legislative session in order to fully implement the retrofit compliance program. The package authorizes one PSR4 staff position, and \$150,000 in one-time funds for IT work. Other DEQ work includes partnering with ODOT and

developing an IAA that addresses topics such as the transmission of certificates of compliance for the titling and registration renewal requirements ODOT intends to implement beginning January 1 of 2023.

2.3. Land Quality: Hazardous Waste Program's Rulemaking

The Hazardous Waste Program is ready to begin the public engagement process for the potential state adoption of 10 federal rules and related updates to Division 12 enforcement rules. Many of the federal rules must be adopted in full or in part to maintain EPA authorization for DEQ to run Oregon's Hazardous Waste Program. The program plans to bring proposed rules to the November 2021 EQC meeting for consideration.

The Hazardous Waste Rules Team, which includes staff from each region and headquarters, completed a pre-analysis of the impacts of the proposed rules and will solicit feedback from the Hazardous Waste Rules Advisory Committee this spring.

Federal rules in this Hazardous Waste Program rulemaking are (mandatory federal rules are indicated with an asterisk (*)):

- Hazardous Waste Generator Improvements Rule*
- Management Standards for Hazardous Waste Pharmaceuticals and Amendment to the P075 Listing for Nicotine*
- Definition of Solid Waste (2018)*
- Modernizing Ignitable Liquids Determinations
- Increasing Recycling: Adding Aerosol Cans to the Universal Waste Regulations
- Safe Management of Recalled Airbags
- Hazardous Waste Management System: User Fees for the Electronic Hazardous Waste Manifest System and Amendments to Manifest Regulations*
- Automated Export System: Hazardous Waste Export-Import Revision*
- Confidentiality Determinations for Hazardous Waste Export and Import Documents*
- Hazardous Waste Management System; Proposed Exclusion for Identifying and Listing Hazardous Waste

3. Laboratory

3.1. Laboratory renews its national accreditation

The DEQ laboratory received a renewal of its accreditation through The NELAC Institute and its National Environmental Laboratory Accreditation Program. The purpose of this program is to establish and implement a program for the accreditation of environmental laboratories.

The laboratory first achieved accreditation in 2018. Every two years, the laboratory is audited to ensure its practices, methods, record keeping and staff training maintain the high standards required to maintain accreditation. The process typically includes document submittal followed by an on-site, in-person audit. COVID-19 precautions meant that the auditor conducted everything virtually. Staff interacted with the auditor using laptops and webcams to highlight their work, answer questions and display their knowledge of their respective subject areas. This required scheduling efforts to ensure appropriate staff were onsite at the necessary time. In total, the audit lasted five days and resulted in only two findings.

The laboratory is now accredited for 765 analytes across several media including air, soils/sediment, water and tissue. The laboratory added several important methods to its accreditation this year including harmful algal toxins (drinking water and surface water) and hexavalent chromium (air and emissions). This accreditation demonstrates the laboratory's commitment to produce high quality, defensible data. All laboratory staff contribute to this effort every day in the work that they do.

3.2. Oregon Water Quality Index Report released

The laboratory released the most recent Oregon Water Quality Index report in March. This report tracks water quality conditions over time at 160 sites. Site scores are color-coded to indicate water quality status, and evaluated for improving or declining trends at each site. The status and trend analyses incorporate 10 years of water quality data. The data in this report are used to calculate and report on Key Performance Measures for the legislature each year.

The report and an interactive map displaying the stations and their status is on the website at <https://www.oregon.gov/deq/wq/Pages/WQI.aspx>.

4. Air Quality Division

4.1. School bus replacements

Oregon DEQ continues to reduce diesel emissions by replacing and retrofitting school buses with Volkswagen Settlement funds. To date, DEQ has obligated and spent \$13.2 million to address 259 buses, removing approximately 43.1 tons of harmful nitrogen oxides and 3.6 tons of carcinogenic particulate matter. Oregon must treat at least 450 school buses over the next two years and we are on track to meet that goal, with a current count of 374 buses at some stage of the program.

4.2. Oregon Clean Vehicle Rebate Program

As of Feb. 26, 2021 the OCVRP has awarded over 9,350 Standard rebates and over 1,280 Charge Ahead rebates for over \$25.5 million to people in Oregon. Of those awarded, 2,225 Standard rebates have been awarded to dealership-sponsored applicants who receive their rebate via “point of sale” through approved dealerships. To date, DEQ has agreements with over 70 dealerships across the state.

The Center for Sustainable Energy is under contract for implementation of the program. CSE is developing an online platform that will allow both dealers and participants to apply for the Standard rebate online and track their application. DEQ is currently conducting security testing and User Acceptance Testing on the platform. The system is expected to launch in April 2021.

4.3. Alternative Fuels Study

As part of the Statewide Transportation Strategy, DEQ is the lead agency for an [Alternative Fuels Study](#). The output of this study will be a profile of Oregon’s medium and heavy-duty fleet, barriers to alternative fuel adoption by sector and an informational report that includes gaps in policy, data, and incentive programs. The survey for fleet owners opened Feb. 8 and will close April 15, 2021. The needed fleet data from ODOT is expected by mid-March to complete the medium and heavy duty fleet profile for Oregon. The final report is expected to be completed in fall 2021.

4.4. Woodstove Change-out Grants

Woodstove smoke is one of the most significant sources of fine particulate matter and toxic air pollution in Oregon. Many of the woodstove-dependent areas are at risk of violating national health-based air quality standards. Funding from the 2019 Oregon Legislature allowed DEQ to fund seven community projects designed to reduce particulate matter emissions through woodstove change-outs, education and outreach, and woodstove curtailment. Recipients included: Klamath Falls, Lakeview, Pendleton, Multnomah County, Harney County, La Grande, and Prineville. All projects are to be completed by April 2021. DEQ will continue to monitor project progress and assist communities as needed

4.5. Permit backlog reduction

Starting Oct. 1, 2020, the federal fiscal year, the Air Quality Division implemented the statewide backlog reduction plan, with a goal to reduce the backlog to 10 percent by the end of the fiscal year 2025 (Sept. 30, 2025). Without corrective action, the backlog was projected to grow by 27 percent during that time. To date, DEQ has reduced the backlog from 21 to 18 percent for all individual Title V and ACDP permits. Due to the pause in most inspections for COVID-19 precautions, DEQ staff in Air Quality permitting programs have been able to focus more time on

permit review and issuance. This shift puts the program ahead of schedule, with 39 of 66 permits issued for the current annual period. While progress is expected to continue with the backlog reduction according to our plan, DEQ does not expect to see a backlog reduction of this magnitude on a continual basis, as the agency continues to work on ensuring inspection work is completed safely, effectively, and efficiently and staff work shifts back to a more typical pace of inspection work.

5. Land Quality Division

5.1. Pending Cleanup Site Closure, SWOSA-funded Kelso Street Waste Tire Dump Site

The Kelso Street Waste Tire Dump Site is a 1.5 acre former residence and auto salvage business in Lane County. During the course of the auto salvage and dismantling operations, significant quantities of auto parts, waste tires, and liquid storage drums were stored on site. Although the auto salvage operations reportedly ceased around 1998, these wastes have remained on the property and the owners continued receiving various solid wastes for nearly two decades. Since 2012, DEQ has engaged in numerous unsuccessful enforcement actions against the owners. Lane County eventually obtained the site through tax foreclosure in September 2018. DEQ declared the Site a Solid Waste Orphan in February 2019. This designation enables DEQ to use the Solid Waste Orphan Site Account, or SWOSA, to fund site investigation, stabilization, and cleanup activities on sites where the responsible party is unknown, unable, or unwilling to undertake cleanup activities.

DEQ's contractor completed a site investigation in January 2020, which included sampling soil, groundwater, and sediment for contamination. Based on the investigation results, the contractor began solid waste and soil removal in November 2020, and completed cleanup in February 2021. Prior to the cleanup, DEQ executed an Intergovernmental Agreement with Lane County in which Lane County waived landfill disposal costs associated with the removal action, saving DEQ an estimated \$200,000 in disposal costs. DEQ has reviewed the Removal Action Completion Report and final inspection results, and issued a No Further Action decision February 26, 2021. These actions mean the site can be considered cleaned and no longer an active environmental and public health threat.

5.2. Tanks Program staff develop new mapping capabilities, allowing better analysis of environmental justice concerns

Tanks staff have brought new mapping and data visualization capabilities into the program, resulting in improved wildfire response, and opening new opportunities for understanding environmental justice impacts in meeting the challenges of aging tanks. In mid-2020, program staff in headquarters developed a live map of active Underground Storage Tank facilities which

was linked to the program's database. Using this map when wildfires raged across the state over Labor Day weekend, responders could overlay a live map of fire perimeters with the tank locations. The Tanks team gained valuable response time in pinpointing facilities affected by fires, avoiding what would have been a laborious process of cross referencing addresses and spreadsheets. Underground Storage Tank inspectors then reached out immediately to facility owners and identified two gas stations, in Detroit and Blue River, which had been completely destroyed. Tanks staff worked with the Environmental Protection Agency to get the fuel pumped out of the ground before they could pose harm to human health and the environment, and the emptied tanks are now in temporary closure.

In January 2021, DEQ Tanks staff presented this experience as a case study during an EPA Regions 9 and 10 workshop on the recently-released [EPA UST Finder](#), an interactive map application showing tank facilities and leaks across the U.S. The DEQ Tanks team continues to strengthen the program with insights made possible by geographical information systems, looking at the distribution and possible adverse impacts of aging tanks installed before 1998 EPA requirements. In addition, demographic information available and applied as map layers is allowing the program to examine the disproportionate impact of leaking tanks on historically underrepresented communities, and the critical fuel infrastructure in rural areas of Oregon.

6. Water Quality Division

6.1. Water Quality Monitoring Strategy updated

The Water Quality program completed a five-year Water Quality Monitoring Strategy, online at <https://www.oregon.gov/deq/wq/Pages/WQ-Monitoring.aspx>.

DEQ is responsible for keeping Oregon's waters safe and healthy for many uses such as drinking, recreation, agriculture, and for ensuring fish populations are able to thrive. Importantly, Water Quality monitoring provides critical information for understanding how well these goals are being met and for identifying emerging water quality concerns, planning wastewater and industrial permit limits, assessing compliance with environmental regulations, developing effective watershed pollution reduction strategies and understanding trends in water quality statewide.

The Water Quality Monitoring Strategy is a high-level strategic document designed to steer the agency's water quality monitoring programs and monitoring data acquisition efforts over the next five years and beyond. The strategy identifies what information is needed, and how DEQ can make decisions about collecting and acquiring that information, recognizing information gaps, and identifying monitoring tools needed to fill those information gaps.

In the near and long-term timeframes, DEQ wants to address monitoring shortfalls in communities that have suffered a disproportionate burden of water pollution problems. Staff intend to strengthen this element of the program with analysis of monitoring designs and outreach and communication efforts to improve the protection of water for the health of all people in Oregon.

6.2. Annual Columbia River Spill Report from the U.S. Army Corps of Engineers

The commission requires an annual report from the U.S. Army Corps of Engineers to DEQ as part of the February 2020 Total Dissolved Gas water quality standard modification issued to the Corps. DEQ received the 2020 TDG report from the Corps on Jan. 28, 2021. The dams included in the modification and addressed as part of the report are Bonneville, The Dalles, John Day and McNary federal hydropower dams on the mainstem Columbia River.

Overall, the 2020 spill season had many fewer exceedances of the total dissolved gas standard at the dams subject to this reporting than the 2019 season, and a slightly higher incidence of gas bubble trauma found in out-migrating juvenile salmonids. A full report for the 2020 spill season is included as Attachment A to this report.

6.3. 2021 Water Quality Standards Triennial Review

The Water Quality Standards Program has begun a Triennial Review process to identify and prioritize water quality standards work needs. The work needs could include changes to water quality standards or developing procedures to apply standards, such as narrative criteria. The Triennial Review will result in a workplan of priority projects that the Water Quality Standards Program expects to complete or initiate in 2021 through 2023.

The federal Clean Water Act requires states to periodically review and update water quality standards and hold a public hearing. The Triennial Review process doesn't result in water quality standards revisions, but will prioritize the revisions to be made through later rulemaking processes. The purpose of revising the standards is to incorporate new scientific information, meet federal requirements, clarify standards, or improve the implementation of standards in water quality programs, such as NPDES permits, assessment and TMDLs.

DEQ will request public comment this spring and intends to present the results of the review to EQC in August 2021. Additional information may be found on the Water Quality Standards webpage: <https://www.oregon.gov/deq/wq/Pages/WQ-Standards.aspx>

7. Eastern Region

7.1. Proposed Grassy Mountain Gold Mine (Malheur County)

Calico Resources USA Corp. has indicated to DOGAMI that it intends to submit a revised application in July 2021. The company had previously completed portions of pre-application work for a proposed gold and silver mine near Vale, Oregon, but ceased work on the project in 2020.

Oregon's Chemical Mining Rules apply to this project because cyanide is proposed for processing the ore and separating gold and silver. By state statute, the Department of Geology and Mineral Industries, DOGAMI, manages the consolidated application process for chemical mining permits. DEQ would process air, water and solid waste permits as part of the consolidated process. If regulatory standards are met and all permits are issued, this would be the first chemical process mine permitted in Oregon.

Oregon permitting agencies include DOGAMI, DEQ, and Oregon Water Resources Department. Cooperating agencies with a review and consult role include the Oregon Department of Fish and Wildlife, State Historic Preservation Office, Oregon Department of Agriculture and Department of Land Conservation and Development.

If the state determines that the revised application is complete, Oregon permitting agencies would have 225 days by statute to develop draft permits for public comment. After a public hearing, Oregon agencies would have 120 days by statute to issue or deny final permits. DEQ will work closely with DOGAMI to support a collaborative interagency process and a public engagement plan that includes proactive outreach to tribal governments and environmental justice communities.

7.2. Easterday Farms Dairy proposed CAFO (Morrow County)

In 2019, Easterday Farms Dairy LLC submitted an application to the Oregon Department of Agriculture to permit a dairy that would house up to 28,300 cows, store manure and wastewater, and land apply wastewater for agricultural purposes.

This proposed dairy is on the site of the former Lost Valley Dairy CAFO. Repeated violations of Lost Valley Dairy's permit caused the agencies to modify the permit in 2019 to require removal of all animals from the facility. After Lost Valley Dairy's owner filed for bankruptcy, Easterday Farms purchased the property and cleaned up the site. This facility is located within the Lower Umatilla Basin Groundwater Management Area, which was established because of elevated nitrates in groundwater.

The CAFO permit program is administered jointly by ODA and DEQ pursuant to ORS 468B.217. Based on lessons learned from the Lost Valley Dairy experience, the agencies are now issuing CAFO permits for large facilities in two steps. The first step is review and approval of the plan for construction. The second step is inspection of construction completion and review and approval to populate and operate the facility. This two-step process allows the agencies to ensure that the facility functions as designed before it is allowed to begin operating and bring animals on-site.

ODA and DEQ, in consultation with Oregon Water Resources Department and the Oregon Health Authority, have been coordinating to review the proposed operation. In January, the agencies learned that Tyson Foods filed a lawsuit alleging Easterday Ranches defrauded Tyson out of an estimated 200,000 cattle. In February, two associated entities, Easterday Ranches and Easterday Farms, filed for bankruptcy. The agencies are investigating how these bankruptcies may affect the proposed operation and the ability of the applicant to comply with requirements for CAFO operations.

8. Northwest Region

8.1. Bradford Island (Multnomah County)

Bradford Island is a portion of the U.S. Army Corps Bonneville Dam facility, which was used historically as a dump site. Some materials were dumped into the Columbia River, including PCB-containing equipment, and PCB levels in resident fish in the Bonneville pool continue to be the highest in the Pacific Northwest by a substantial margin. At the same time, this area is heavily used by Native American tribal members fishing at U&A sites along the river.

In September 2019, DEQ learned the U.S. Army Corp of Engineers budget for FY 19-20 included no funding for ongoing work at this Columbia River site contaminated with PCBs. Subsequently, the Corps terminated the longstanding voluntary agreement with DEQ funding DEQ cleanup program participation. In October 2019, DEQ submitted a joint letter along with the Yakama Nation and Washington State Department of Ecology to the U.S. Environmental Protection Agency Region X, requesting rulemaking to list the site on the National Priorities List. In September 2020, EPA decided not to list Bradford Island.

On March 18, 2021, DEQ, along with the Yakama Nation and Ecology, met with EPA to discuss their joint petition to list this site under the Superfund program.

8.2. Columbia Pacific Bio Refinery (Clatskanie)

Transloading Permit

On Feb. 18, 2020, DEQ received an application from CPBR for a technical modification to its air quality permit to transload petroleum products. Following a public process, DEQ approved the renewal of this air quality permit in June 2020. The renewal also incorporated updates to Oregon air quality rules and requires performance testing of devices that control volatile organic compounds and hazardous air pollutants. CPBR's ethanol production operations are regulated under a separate air quality permit discussed below.

On Aug. 28, 2020, DEQ received a Request for Reconsideration of the transloading permit from Columbia Riverkeeper, NW Environmental Defense Center and Neighbors for Clean Air. The request asked DEQ to do the following:

1. Remove the tanks listed in the permit under Operating Scenario 2 as part of the source, because CPBR has no legal right to use the tanks identified in the application.
2. Remove crude oil from the permit.

On Sept. 16, 2020, DEQ granted the first request, removing the tanks listed under Operating Scenario 2 from being considered part of the source.

On Feb. 5, 2021, DEQ issued the permit with a modification to remove Operating Scenario 2. This permit supersedes and replaces the original air quality permit DEQ issued in June 2020.

Ethanol Production, Storage and Shipping Permit

On Feb. 17, 2021, CPBR submitted an air quality permit modification application for their ethanol production permit (a separate permit from their transloading permit described above) to include the production of renewable diesel. Currently, the permit allows for the production of ethanol. The proposed modification would add new equipment and repurpose other equipment. CPBR would be able to switch between ethanol and renewable diesel production. DEQ received the Land Use Compatibility Statement for the permit modification application on Feb. 26, 2021.

DEQ has determined that this type of modification qualifies as a Category 3 public notice, requiring a public hearing as part of DEQ's public process.

8.3. NW Metals' proposed new location (Portland)

DEQ continues follow-up work on the NW Metals facility in Northeast Portland. Multiple programs are involved. The court ordered NW Metals to cease operation of the shredder at the Killingsworth site on March 4, 2020 as part of a preliminary injunction DEQ pursued to bring the facility into compliance after exhausting our regulatory options through our civil enforcement

process. To date, NW Metals still has outstanding compliance issues associated with water quality, solid waste and environmental cleanup activities at the site. These requirements were also a part of the court order/preliminary injunction.

In the meantime, NW Metals has decided to move from the Killingsworth location in the Cully neighborhood to a site on Columbia Boulevard in the St. Johns neighborhood. NW Metals has submitted an air quality permit application for its new location on North Columbia Boulevard, along an industrial use corridor and near other similar metal salvage facilities. DEQ issued public notice for the application on Nov. 6, 2020, with an initial close of the public comment period set for Jan. 8, 2021. During that time, DEQ held two public hearings in December 2020, one on a Saturday afternoon and one on a weekday evening. Following the second public hearing, multiple people requested an extension of the public comment period. DEQ extended the public comment period by 30 days to Feb. 8, 2021. DEQ expects to make a decision on this application later this week.

8.4. Willamette Cove Upland Site (Portland)

DEQ has proposed a cleanup plan for the upland portion of the Willamette Cove property. The plan is designed to be protective of the anticipated future use of the property, which is planned as a nature park by Metro, the property owner. The riverfront property stretching 3,000 feet on the northeast bank of the Willamette River in the St. Johns neighborhood has a history of development and use spanning over 100 years. Soil contamination throughout the approximately 20-acre site exceeds acceptable levels for both human health and ecology, including elevated levels of contamination, called hot spots, for dioxins and furans, metals, PAHs and PCBs.

DEQ proposed a cleanup plan that includes removal of human and ecological hot spots, consolidation of remaining contamination, a site-wide cap of clean soil and long-term monitoring and maintenance of the remedy. A six-month public comment period on the proposed cleanup plan for the Willamette Cove Upland closed Aug. 31, 2020, and DEQ is currently in the process of reviewing and responding to comments. DEQ plans to select a final cleanup plan, officially called a Record of Decision, in March 2021.

On Dec. 10, 2020, Metro voted unanimously in support of a resolution to make Willamette Cove eligible for funding through the 2019 parks and natural areas bond measure. The resolution also includes an amendment requiring Metro to convene a work session within 30 days of issuance of the ROD. Based on the outcome of that workshop, DEQ will evaluate any changes in future use the Port and Metro propose to determine if a ROD amendment is necessary.

8.5. Zenith Energy (Portland)

Zenith Energy, an oil-shipping terminal in Northwest Portland, applied for 1200-C construction stormwater permit coverage in May 2020 for construction work planned at the facility. The permit application is not complete because the Land Use Compatibility Statement submitted to DEQ is not valid. On Jan. 11, 2021, DEQ sent Zenith a letter outlining the need for a valid LUCS for the Air Quality Title V permit application. On Friday, March 12, 2021, Zenith filed a petition for reconsideration with DEQ.

On March 1, 2021, after investigation of allegations by Willamette Riverkeeper and Columbia Riverkeeper that Zenith Energy conducted construction activities at the site without 1200-C permit coverage, DEQ issued a pre-enforcement notice for violations of operating without a permit and providing false information. DEQ water quality staff have referred the matter to DEQ's Office of Compliance and Enforcement.

9. Western Region

9.1. Mid-Willamette Valley Intermodal Facility (Linn County)

House Bill 2017 included two ODOT Connect Oregon dedicated projects for intermodal facilities. One is proposed in Treasure Valley in Malheur County and the other one is in the Mid-Willamette Valley in Linn County. The sites were each awarded about \$25 million for construction and environmental permitting. The Mid-Willamette Valley Intermodal Facility project plan was approved by the Oregon Transportation Commission at its [July 2019 meeting](#).

Linn Economic Development Group plans on constructing the Mid-Willamette Valley Intermodal Facility at the former International Paper Mill site located along Interstate-5 in Millersburg. The 65-acre site will consist of a refurbished office building, warehouse, truck queuing area, ticket entrance area, intermodal yard for domestic and international containers, container storage yard, maintenance yard, and rail tracks with connections to two class 1 railroads.

The Linn Economic Development Group will need two permits from DEQ: a 1200C construction permit and a 401 Water Quality Certification for impacts to wetlands and a post construction stormwater plan. They applied and received a 1200C stormwater construction permit on Dec. 8, 2020. DEQ denied the first 401 Water Quality permit application in September 2020 due to insufficient information about wetland mitigation and assessment of the former mill operations near the proposed stormwater facilities. The Group submitted a second 401 application in December 2020, which DEQ is reviewing.

DEQ recommended that the Linn Economic Development Group conduct a Phase 2 Environmental Assessment with sampling to determine if the soil and groundwater were impacted by 54 years of mill operations. DEQ's 401 Program has asked for confirmation that the location of the proposed stormwater facility is not impacted from past mill operations.

9.3. GP Toledo Landfill Proposed Expansion (Toledo)

Georgia-Pacific operates a containerboard mill in Toledo, Oregon, which is one of the west coast's biggest end markets for old corrugated cardboard and processes over 500,000 tons per year.

The mill is on the banks of the Yaquina River and established an industrial landfill in the mid-1970s. The landfill has a solid waste permit and is currently used for disposal of limited waste types. The mill also operates a wastewater treatment plant, with both a 15-acre and 30-acre wastewater treatment-settling ponds located adjacent to the landfill. The ponds are close to or have reached capacity due to a buildup of sludge. A berm separates the river from the ponds.

GP plans on applying for a landfill permit modification to build a new landfill cell over most of the existing 15-acre pond to dispose of approximately 700,000 cubic yards of dewatered sludge material from the ponds over a period of 50 years. Lincoln County approved a conditional land use permit authorizing the proposed new cell for only "sludge" on Feb. 16, 2021. The conditional use permit also requires the berm to be seismically mitigated and no have a no-rise certification, which means the berm and other activities will not increase potential flood heights.



Based on current information submitted to other agencies through the land use process, it appears that the proposed new cell may meet the location requirements for DEQ permitting. The Base Flood Elevation Study concluded that no rise in water surface elevation and no loss of effective floodplain storage would result in the Special Flood Hazard Area or 100-year floodplain from the proposed changes of grading materials stored behind the berms.

Industrial landfill rules are not as stringent as Subtitle D Municipal Solid Waste landfill requirements. As an example, there is no explicit liner nor a seismic analysis requirement of the waste placed in the cell. DEQ has required liners at other industrial landfills and will evaluate if the existing clay liner of the pond is protective. While there was limited public interest in the land use approval process, there may be more interest in the DEQ permitting process.

State of Oregon

Department of Environmental Quality

Memorandum

Date: March 19, 2021

To: Environmental Quality Commission

From: Richard Whitman, Director

Subject: Annual Report on 2020 Columbia River Total Dissolved Gas and Spill for Fish Passage

Annual report and update

This is an informational summary about the total dissolved gas levels during the 2020 fish passage spill season at the lower four Columbia River dams. The commission requires an annual report from the U.S. Army Corps of Engineers to DEQ as part of the February 2020 Total Dissolved Gas water quality standard modification issued to the Corps. DEQ received the 2020 TDG report from the Corps on Jan. 28, 2021. The dams included in the modification and addressed as part of the report are Bonneville, The Dalles, John Day and McNary federal hydropower dams on the mainstem Columbia River. This informational summary also includes comparative summary data for the 2015-2019 spill seasons and an update pertaining to the upcoming 2021 spill season.

Background

The TDG standard is 110 percent of barometric pressure. Fish exposed to high levels of TDG can suffer from gas bubble trauma (GBT), which increases susceptibility to predation and causes death in severe cases. Although spilling over dams increases TDG, spill improves overall survival of anadromous salmonids. The purpose of the 2020 standard modification is to overall survival of Endangered Species Act listed anadromous salmonids, while protecting beneficial uses of the Columbia River. The modification applies to the TDG levels in the dams' tail-water during voluntary spill and allows 125 percent of barometric pressure during spring spill, April 1 through June 15, and 120 percent of barometric pressure during summer spill, June 16 through August 31. The 2020 spring spill is the first occurrence of allowing greater than 120 percent TDG since the 1995 adoption of OAR 340-041-0104(3), which allows the commission to approve TDG standard modifications for the fish passage in the Columbia River. The standard modification is in effect for the 2020 through 2024 spill seasons.

The modification specifies using the average of the twelve highest hourly TDG measurements in a calendar day to determine exceedance of 125 percent TDG in the spring and 120 percent TDG in the summer. For an additional measure of safety, the average of the two highest hourly TDG measurements in a calendar day determines instantaneous exceedances of 127 percent TDG in the spring and 125 percent TDG in the summer.

The Corps conducted 2020 spill operations according to the National Oceanic and Atmospheric Administration's (NOAA's) 2019 Columbia River System Biological Opinion and the 2019-

2021 Spill Operation Agreement, an agreement balancing power generation and spill for juvenile salmonids, signed by the states of Oregon and Washington, the Nez Perce Tribe, Bonneville Power Administration, the Corps and US Bureau of Reclamation. For 2020 spring spill, the Corps targeted spill levels up to the 125 percent “gas cap,” which refers to Oregon and Washington modified TDG water quality standards. The Corps targeted spill levels according to these “flex spill” amounts for at least sixteen hours daily to increase juvenile salmonid passage via spill and reduce powerhouse passage. The remaining daily eight hours for the spring season and for the entirety of summer spill, the Corps targeted “performance standard spill,” which refers to lower spill levels intended to meet NOAA’s performance standard testing described in the 2008 Federal Columbia River Power System Biological Opinion. The division of daily spring spill is similar to the Corps’ 2019 spring spill operations with exception that flex spill targeted the 120 percent gas cap.

2020 results

In 2020, Columbia River flows were similar to the previous year with flows at 90 percent of average, compared to 89 percent of average flows in 2019. Between April and August 2020, there were no gauge days¹ of high flows above the 7Q10² when the TDG standard does not apply due to involuntary spill resulting from 7Q10 high flow conditions (Total Dissolved Gas TMDL 2002). Table 1 summarizes 2020 TDG exceedances and compares them with 2019 exceedances. Exceedance rates and the number of days affected by malfunctioning monitoring gauges decreased from 2019. Spring 2020 exceedances reported by the Corps were largely attributable to uncertainties associated with TDG modeling, such as weather forecasting. Summer 2020 exceedances were due to limited turbine capacity and variable hydropower demands.

Table 1. Summary of 2020 TDG exceedances in comparison with 2019 exceedances

Spill Season	Number of Gauge Days		
	Exceedances reported by the Corps (DEQ’s percent exceedances include monitoring gauge malfunctions)		Malfunctioning monitoring gauges resulting in missing or erroneous data
	12-hour limit	2-hour limit	
2020 Spring	10 (3.3%)	3 (< 0.1%)	0
2020 Summer	3 (2.6%)	0 (1.6%)	5
2019	59 (13%)	4 (3.8%)	19

Note: For spring 2020, 12-hour limit is 125 percent TDG and 2-hour limit is 127 percent TDG.
 For summer 2020 and 2019, 12-hour limit is 120 percent TDG and 2-hour limit is 125 percent TDG.

¹ A gauge day is a calendar day at a dam during the spring or summer spill period specified in the TDG water quality standard modification. The total gauge days are 612, or 153 days multiplied by 4, which is the number of days the modified standard is in effect multiplied by the number of compliance locations. There are 304 spring gauge days and 308 summer gauge days.

² The average peak annual flow for 7 consecutive days that has a recurrence interval of 10 years, or a 10% probability of being equaled or exceeded in any given year.

The Fish Passage Center (FPC) coordinated biological monitoring of juvenile salmon and trout for (GBT) at Bonneville and McNary dams during the fish passage spill period, conducted in accordance with Corps and FPC protocols. Sampling occurred twice a week at each dam under typical conditions during the first few months of the spill period. At McNary dam, FPC reduced sampling after July 28 and discontinued sampling after August 5. FPC reduced sampling because the GBT monitoring process increased stress experienced by sampled juveniles due to higher than normal stream temperatures. The combination of these conditions can result in a considerable increase in mortality for juveniles that are not able to recover from anesthetization required for GBT evaluation. Sampling cessation at McNary dam occurred due to low numbers of passing juveniles, which affected obtaining FPC's target sample size of 100. For the same reasons, FPC reduced sampling at Bonneville dam to once weekly after July 29 and discontinued sampling after August 5.

The 2020 commission-issued TDG standard modification states that the fish passage spill program must be halted if either more than 15 percent of the fish examined show signs of GBT in non-paired fins or if more than five percent of the fish examined have signs of GBT over more than 25 percent of their fin surface area. The FPC examined 6,395 juvenile salmonids and 28 individuals, or 0.4 percent, had signs of GBT. No juveniles examined had over 25 percent of their surface area affected. The seasonal split of GBT observance is 0.7 percent of examined individuals during spring spill and 0.1 percent during summer spill. Overall, the 2020 GBT monitoring shows a slight increase in observed GBT from 2019 when 0.3 percent, or 18 juveniles of 5,483 examined, exhibited GBT with no observations of greater than 25 percent affected surface area.

Although GBT monitoring halted before the spill season concluded, less invasive condition monitoring of juveniles occurred throughout the spill season at McNary, John Day and Bonneville dams. The 2008 Federal Columbia River Power System Biological Opinion requires the Corps to conduct condition monitoring, a type of biological monitoring, to identify injuries that may indicate dam passage issues.

Table 2 shows summary data for physical and biological metrics for the six-year period from 2015 through 2020. Much of the annual variability is related to streamflow.

Risks to fish

There was low level occurrence of GBT and no exceedances of the biological benchmarks. Biological monitoring results indicate a low GBT risk to out-migrating juvenile salmonids when the Corps conducts spill in accordance with the spring 125 and summer 120 percent standard modification. The Corps' goal is not to exceed the TDG modified limit when implementing the fish passage spill program. DEQ will continue to work with the Corps to assist with compliance with the TDG modified standard and improve monitoring data accuracy and completeness during the 2021 fish passage spill season.

Update

The FPC conducted a pilot GBT monitoring program for non-salmonids to determine if the existing juvenile salmonid monitoring infrastructure and methods can meet targets for non-salmonid GBT monitoring, which take effect in 2021 in accordance with Oregon's and Washington's 125 percent TDG standard modification. Monitoring personnel collected non-salmonids while collecting juvenile salmonids for GBT evaluation. For each sampling event, non-salmonid collection efforts stopped when FPC's sample size target of 100 juveniles were collected. Weekly sample sizes were well short of the 50 weekly target specified for Oregon's and Washington's 125 percent TDG standard modification. The largest weekly sample size was 9 total from McNary and Bonneville. In addition to the time limited monitoring events, efforts to reach larger sample sizes were also likely affected by using collection methods better suited for fish moving past the dams.

The anticipated start of spring spill at the four lower Columbia River dams is April 10. To conduct non-salmonid GBT monitoring, the Corps is working with the US Geological Survey (USGS) to develop a process using seining to meet minimum sample size targets. DEQ and Ecology reviewed a draft overview of the new sample collection method. The Corps and USGS are refining the method for inclusion in a biological monitoring plan that the Corps will submit to DEQ and Ecology for approval as required by respective TDG standard modifications.

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Table 2: Six-year summary of annual data

Year	Stream Flow		Total Dissolved Gas				Gas Bubble Trauma				
	Annual Stream Flow (percent of average)	Number of Gauge Days ¹ When Flows are Above 7Q10 ²	Exceedances of 12-Hour Limit ^{3,4}		Exceedances of 2-Hour Limit ^{3,5,6}		Number of Juvenile Salmonids Examined ⁷	Juvenile Salmonids Showing Signs of Gas Bubble Trauma ⁸		Juvenile Salmonids with Gas Bubbles Covering Over 25 Percent Surface Area ⁹	
			(number of gauge days)	(percent of total gauge days)	(number of gauge days)	(percent of total gauge days)		Number	Percent	Number	Percent
2015	86%	0	77	13%	--	--	4573	6	0.1%	0	0%
2016	95%	0	13	2.1%	--	--	5533	6	0.1%	0	0%
2017	128%	24	277	45%	--	--	6424	76	1.2%	2	< 0.1%
2018	104%	74	101	17%	55	9.0%	6074	61	1.0%	0	0%
2019	89%	0	78	13%	23	3.8%	5483	18	0.3%	0	0%
2020 Spring	90%	0	10	3.3%	3	< 0.1%	3662	25	0.7%	0	0%
2020 Summer			8	2.6%	5	1.6%	2733	3	0.1%	0	0%

- 1 - A gauge day is a calendar day at a dam during the spring or summer spill period specified in the TDG water quality standard modification. Total spring and summer gauge days are 612, or 153 days (days modified standard is in effect) multiplied by 4 (number of regulated locations). There are 304 spring season gauge days and 308 summer season gauge days.
- 2 - Average peak annual flow for 7 consecutive days that has a recurrence interval of 10 years, or a 10% probability of being equaled or exceeded in any given year.
- 3 - Exceedance occurrences include days affected by malfunctioning or damaged monitoring gauges for which the Corps did not report data.
- 4 - The 12-hour limit for 2020 spring is 125 percent TDG. For 2020 summer and the preceding years, the 12-hour limit is 120 percent TDG.
- 5 - The 2-hour limit for 2020 spring is 127 percent TDG. For 2020 summer and the preceding years, the 2-hour limit is 125 percent TDG.

- 6 - Annual total dissolved gas reports for 2015-2017 spill did not include information on exceedances of the 2-hour 125 percent total dissolved gas limit.
- 7 - Variability in annual number of examined juvenile salmonids is related to decreasing numbers of juveniles near the end of seasonal passage, which affects ability to obtain target sample sizes, and variable timing of monitoring cessation due to increasing stream temperatures affecting ability of examined salmonids to recover from anesthetization. Both causes of variable annual sampling are related to stream flow.
- 8 - The first of two biological monitoring thresholds is 15 percent or more of examined fish show signs of gas bubble trauma.
- 9 - The second of two biological monitoring thresholds is five percent or more of examined fish show signs of gas bubble trauma over 25 percent of their surface area.