

I-1631 Reducing Pollution

FISCAL IMPACT SUMMARY

Initiative 1631 imposes a pollution fee on large emitters of greenhouse gases. The fee will raise \$2,295,785,000 during the first five fiscal years. The additional Utilities and Transportation Commission regulatory fee will raise \$9,685,072 during the first five fiscal years. A public oversight board is established to supervise revenue expenditures to reduce carbon pollution, promote clean energy and address climate impacts to the environment and communities. Twelve state agencies and two higher education institutions are estimated to expend \$27,178,592. The remaining expenditures cannot be estimated until the public board approves investment plans. Local government expenditures are estimated to be \$158,623,072.

GENERAL ASSUMPTIONS

- The effective date of the initiative is Dec. 6, 2018.
- The provisions of the initiative apply prospectively, not retroactively.
- Because the pollution fee will not be collected until Jan. 1, 2020, it is assumed that all costs for state agencies, except the Utilities and Transportation Commission (UTC), to implement the initiative before this date will be paid from the State General Fund. UTC costs are paid from the Public Service Revolving Account.
- Estimates use the state's fiscal year of July 1 through June 30. Fiscal year 2019 is July 1, 2018, to June 30, 2019.

REVENUE

Local Revenue

The initiative will not impact local revenue.

State Revenue

The initiative would generate an estimated \$2,305,470,073 over five fiscal years from the state pollution fee and UTC regulatory fees.

State Pollution Fee

The initiative would impose a pollution fee on large emitters of fossil fuels based upon the carbon content of fossil fuels sold or used within the state, electricity generated within the state (including out-of-state sales) and electricity imported for consumption in the state. Beginning Jan. 1, 2020, the pollution fee is set at \$15 per metric ton of carbon content. The fee would increase by \$2 per metric ton each year and is also adjusted for inflation each year. The \$2 annual increases would continue until the state's existing greenhouse gas reduction goal for 2035 is met and the state is on pace and likely to meet the 2050 greenhouse gas reduction goal. At that time, the pollution fee would be fixed,

except for annual inflation adjustments. The initiative would provide exemptions from the fee for certain fossil fuels and facilities.

The initiative would allow qualifying light and power businesses or gas distribution businesses to claim credits up to 100 percent of the pollution fee for investments made through clean energy investment plans that are approved by the UTC for investor-owned utilities and by the Department of Commerce for consumer-owned utilities.

All revenues from the pollution fee are deposited into the Clean Up Pollution Fund.

STATE REVENUE ASSUMPTIONS

Revenue estimates are based on: 1) the U.S. Energy Information Agency (EIA) 2018 Annual Energy Outlook; 2) the IHS Markit June 2018 forecast of the Consumer Price Index for All Urban Consumers (CPI-U); and 3) the Washington State Department of Commerce, State Energy Office, Carbon Tax Assessment Model (CTAM) – version 3.5. The Department of Commerce periodically updates data in the CTAM. Any data updates to the CTAM made between preparation and publication of this fiscal impact statement are not reflected in the estimates displayed here. Although the initiative specifies that the US Bureau of Labor Statistic price index for all urban wage earners and clerical workers (CPI-W) is used to calculate the inflationary increase in the carbon fee, the Department of Revenue does not have access to a forecast for CPI-W so the CPI-U is used instead.

The following assumptions are made in the CTAM for modeling purposes:

- Year one is set to calendar year 2020 to most closely correspond to the Jan. 1, 2020, effective date of the proposed pollution fee.
- The baseline reference energy forecast (option A) is specified, which corresponds to the EIA Annual Energy Outlook 2018 reference case.
- Marine fuels are exempted.
- Aircraft fuels are exempted.
- “Transition coal,” i.e., power generated from coal plants scheduled to close by 2025, is exempted.
- Power generated from Colstrip plants 1 and 2 are exempted since they are legally bound to cease operations by Dec. 31, 2025.

The following have been factored into the modeling to the extent possible:

- An exemption for aircraft fuels.
- An exemption for maritime fuels.
- An exemption for pollution emissions from coal closure facilities.
- An exemption for the fossil fuels and electricity sold to or used onsite by facilities with a primary activity that falls into an Energy Intensive Trade Exposed (EITE) sector. (Note that due to lack of available data, no attempt has been made to model the impact of this exemption for qualifying support facilities.)
- Facility-specific emissions data has been drawn from the Washington State Department of Ecology’s Greenhouse Gas Reporting Program, which requires facilities that emit at least 10,000 metric tons of CO₂ per year in Washington to report. Note that facilities that emit fewer than

10,000 metric tons of CO2 per year in Washington are not included in the data set used for estimating the EITE exemption.

- Emissions estimates have been adjusted to the extent possible to remove biogenic fuel emissions, non-CO2 emissions and industrial process emissions.
- Zero growth is assumed for EITE facility emissions into the future.
- The initiative defines “carbon content” to include both CO2 emissions and other CO2 equivalents (methane, nitrous oxide, hydrofluorocarbons, perfluorocarbons, sulfur hexafluoride, nitrogen trifluoride) released through the combustion or oxidation of fossil fuels. The revenue from this proposal could be approximately 1 percent higher than modeled because the CTAM does not apply a tax or fee to CO2 equivalents.
- Five months of cash collections are reflected in fiscal year 2020 due to the Jan. 1, 2020, effective date for the pollution fee.
- No credits are granted for payment of a similar fee in other jurisdictions.
- Qualifying light and power businesses or gas distribution businesses are assumed to claim credit for 100 percent of the pollution fees for which they are liable.

State Revenue Impacts

Table 1. Pollution fee revenues deposited into the Clean Up Pollution Fund

State Revenue Impact	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
Clean Up Pollution Fund	\$0	\$238,374,000	\$610,047,000	\$686,365,000	\$760,999,000

Pollution Fee Revenues Distribution Assumptions and Descriptions

Following deductions for administrative costs, 70 percent of the balance in the Clean Up Pollution Fund will be deposited into the Clean Air and Clean Energy Account, 25 percent will be deposited into the Clean Water and Healthy Forests Investments Account and 5 percent will be deposited into the Healthy Communities Account.

In addition, the initiative defines investor-owned utility-retained credits in the utilities’ Clean Energy Investment Account as gross operating revenue subject to UTC regulatory fees. This fee is equal to one-tenth of 1 percent of the first \$50,000 of gross operating revenue, plus two-tenths of 1 percent of any gross operating revenue in excess of \$50,000. In addition, each investor-owned utility must pay an annual fee of up to 1 percent of credited fees deposited into the Clean Energy Investment Account for UTC administrative costs to implement the initiative. It is assumed that the fee is set annually at 1 percent and excludes any amounts retained by consumer-owned utilities. These revenues would be deposited into the Public Service Revolving Account.

The initiative specifies that the Clean Up Pollution Fund may be used to pay for reasonable administrative costs. It is assumed that “administrative costs” include tax administration and other tasks necessary to implement the initiative unless a state agency has a usual fund source for the work required by the initiative.

Table 2. State revenues

State Revenue Impact by Fund	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
Clean Up Pollution Fund (Administration)	\$0	\$4,670,163	\$6,495,803	\$6,106,598	\$4,840,946
Clean Air and Clean Energy Account	\$0	\$163,592,686	\$422,485,838	\$476,180,881	\$529,310,638
Clean Water and Healthy Forest Account	\$0	\$58,425,959	\$150,887,799	\$170,064,601	\$189,039,514
Healthy Communities Account	\$0	\$11,685,192	\$30,177,560	\$34,012,920	\$37,807,903
Public Service Revolving Account	\$0	\$996,266	\$2,545,019	\$2,898,850	\$3,244,937
State Total	\$0	\$239,370,266	\$612,592,019	\$689,263,850	\$764,243,938

STATE GOVERNMENT EXPENDITURES

State Agency Implementation Cost Assumptions

Because the pollution fee will not be collected until Jan. 1, 2020, it is assumed that all costs for state agencies, except UTC, to implement the initiative before this date will be paid from the State General Fund. UTC costs are paid from the Public Service Revolving Account.

The initiative would establish a public oversight board (POB) to implement the new law. The POB adopts all programmatic policies, procedures and rules per the State Administrative Procedures Act for programs funded through the Clean Air and Clean Energy Account, the Clean Water and Healthy Forests Investments Account and the Healthy Communities Account. Utility investment plans are approved by the Department of Commerce and UTC by Dec. 31, 2020, to allow utilities to obtain pollution fee credits.

POB activity is phased as follows: 1) formation and organization; 2) programmatic rule makings and review and approval of investment plans; 3) project approvals and updates to rules, policies and procedures; 4) appropriation recommendations to the Legislature; and 5) tribal consultations throughout.

The POB would meet bimonthly in Olympia beginning March 1, 2019. From March 2019 through January 2020, the POB would hold one-day meetings; from February 2020 through January 2021, each meeting would last two days, with one-day meetings thereafter.

For each of the three Investment Advisory Panels, meeting length, location and frequency would mirror that of the POB, except that panel meetings would start in July 2019.

The Department of Health would begin work on Jan. 1, 2019, to designate pollution and health action areas and would complete this task by July 31, 2019.

To meet the requirement that state agencies submit all policies, procedures and rules related to expenditures from the Clean Air and Clean Energy Account, the Clean Water and Healthy Forests Investments Account and the Healthy Communities Account to the POB by Jan. 1, 2020, state agency work would begin on Jan. 1, 2019. State agencies would also begin work on Jan. 1, 2019, to develop the initial pollution reduction investment plans and rules that describe the processes and criteria to disburse funds from the Clean Air and Clean Energy Account, with review and approval by the POB by Jan. 1, 2020. A permanent pollution reduction investment plan and rule would be submitted to the POB by Jan. 1, 2022.

The Department of Ecology would begin work on Jan. 1, 2019, and would adopt emergency rules by Nov. 1, 2019, that specify the carbon content inherent in or associated with covered fossil fuels and electricity.

STATE AGENCY EXPENDITURES

State agency costs are estimated to be \$27,178,592 over five fiscal years to implement the initiative. Costs by agency are:

- The Department of Revenue would incur costs estimated at \$4,170,500 to administer pollution fee collection activities.
- The Office of the Governor would incur costs estimated at \$8,326,874 for the staffing, operation, per diem and compensation of the POB and three investment panels that would review and adopt through the rule-making process, as needed, plans, procedures, criteria and rules for the programs as well as conduct effectiveness reviews.
- The Department of Commerce would incur costs estimated at \$10,668,899 to draft the initial and final pollution reduction investment plans as well as the proposed rules for process and criteria to disburse funds from the Clean Air and Clean Energy Account. In consultation with the Environmental and Economic Justice Panel, the department would incur costs to develop a plan for investments that directly reduce the energy burden of people with lower incomes; design and implement comprehensive enrollment campaigns to inform and enroll people with lower incomes in energy assistance programs; create a program and provide assistance and support to workers in fossil fuel industries affected by the transition to a cleaner energy economy; and develop draft procedures and rules to

provide community capacity grants to participate in implementing the initiative. The agency would participate in development of carbon emission standards, validate a facility's EITE designation and review petitions by fee payers for credits for similar pollution fees imposed by other states. It would also conduct effectiveness reviews of programs in achieving carbon reduction goals and implementing pollution reduction plans.

- The Department of Health would incur estimated costs of \$631,000 to designate and update pollution and health action areas, participate on the POB and help support the Environmental and Economic Justice Panel and other investment panels.
- The Department of Ecology would incur both estimated costs and savings. Estimated costs of \$3,325,787 would be incurred to develop procedures, criteria and rules for grant programs for increasing the ability to remediate and adapt to the impacts of ocean acidification, reducing flood risk and restoring natural floodplain ecological function, increasing the sustainable supply of water and improving storm water infrastructure from previously developed areas within an urban growth boundary. These costs would also enable Ecology to contribute to development of procedures, criteria and rules on restoring and protecting estuaries, fisheries and marine shoreline habitats, and preparing for sea level rise. The agency would also adopt emergency rules specifying the basis for the carbon content of covered fossil fuels and electricity, work in consultation with the Department of Commerce to select a default emission factor for light and power businesses, and publish a default emissions factor for U.S. Bonneville Power Administration sales of electricity in Washington state. Ecology would also serve as a voting member of the POB, engage investment advisory panels and participate in conducting effectiveness reviews of programs in achieving carbon reduction goals and implementing pollution reduction plans. Ecology would incur estimated savings of \$10,436,000 in the State General Fund and the State Toxics Control Account from adopting rules to eliminate the program supporting the Clean Air Rule (Chapter 173-442 Washington Administrative Code) and associated greenhouse gas emissions reporting (Chapter 173-441 Washington Administrative Code), for a net estimated savings of \$7,110,213 over the five-year period.
- The Washington State Recreation and Conservation Office would incur estimated costs of \$534,272 to develop proposed procedures, criteria and rules for a grant program to prevent the conversion and fragmentation of working forests, farmland and natural habitat that sequester carbon and provide additional ecological benefits and to participate in the development of proposed procedures, criteria and rules for clean water investments that improve resilience from climate impacts. The agency would also participate as a voting member of the POB.
- The Department of Fish and Wildlife would incur estimated costs of \$423,600 to participate in development of proposed procedures, criteria and rules for clean water investments that improve resilience from climate impacts.
- The Puget Sound Partnership would incur estimated costs of \$272,772 to participate in the development of proposed procedures, criteria and rules for clean water investments that improve resilience from climate impacts, review programs and projects for consistency with the Puget Sound Action Agenda, and participate in conducting

effectiveness reviews of programs in achieving carbon reduction goals and implementing pollution reduction plans.

- The Department of Natural Resources would incur estimated costs of \$2,573,400 to develop proposed procedures, criteria and rules to sequester carbon through blue carbon projects, invest in healthy forests and enhance community preparedness and awareness of wildfires. Costs would also support tribal communities to suppress, prevent and recover from wildfires, and relocate tribal communities impacted by flooding and sea level rise. The agency would also participate in development of proposed procedures, criteria and rules for clean water investments that improve resilience from climate impacts.
- The Washington State Department of Agriculture would incur estimated costs of \$485,000 to develop proposed procedures, criteria and rules for a program to increase soil sequestration and reduce emissions from the loss and disturbance of soils.
- The UTC would incur estimated costs of \$4,800,418 to review and approve private utilities’ clean energy investment plans, review utilities’ annual reports on implementing their clean energy investment plans, conduct necessary rule making, support the POB and the investment panels, undertake tribal consultation on clean energy investments and participate in development of an effectiveness report.
- The University of Washington would incur estimated costs of \$797,070 for its Department of Environmental and Occupational Health Sciences to assist the Department of Health in designating and updating pollution and health action areas, and for the Climate Impacts Group to provide technical assistance to the Department of Natural Resources in developing programs and allocating funds for the clean water and healthy forest investments that increase resilience from climate impacts on wildlife and forest health and for investments to prepare communities for challenges caused by climate change.
- The Washington State University Energy Program would incur estimated costs of \$525,000 to participate in drafting the initial and final pollution reduction investment plans.
- The Office of Superintendent of Public Instruction would incur estimated costs of \$80,000 for developing and implementing education programs and teacher development programs to expand awareness of and increase preparedness for the environmental, social and economic impacts of climate change and strategies to reduce pollution.

Table 3. State Expenditures from the State General Fund, the Clean Up Pollution Fund, the Public Service Revolving Account and the State Toxics Control Account

Agency	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
Governor’s Office	\$174,180	\$2,109,440	\$2,031,220	\$1,930,146	\$2,081,888
Department of Revenue	\$0	\$1,764,400	\$819,700	\$810,700	\$775,700
Department of Commerce	\$2,452,979	\$2,542,708	\$1,657,286	\$2,649,444	\$1,366,482

Department of Health	\$315,000	\$46,000	\$162,000	\$62,000	\$ 46,000
Department of Ecology	\$ (467,705)	\$(701,365)	\$ (1,943,750)	\$ (1,905,164)	\$(2,092,229)
Recreation and Conservation Office	\$118,846	\$261,226	\$139,846	\$7,177	\$7,177
Department of Fish and Wildlife	\$62,800	\$191,000	\$169,800	\$0	\$0
Puget Sound Partnership	\$33,419	\$33,420	\$33,104	\$93,098	\$79,731
Department of Natural Resources	\$650,700	\$1,241,100	\$648,800	\$16,400	\$16,400
Department of Agriculture	\$118,000	\$224,000	\$143,000	\$0	\$0
Utilities and Transportation Commission	\$253,294	\$843,092	\$1,111,404	\$1,479,395	\$1,113,233
University of Washington	\$ 208,518	\$160,161	\$142,797	\$142,797	\$142,797
Washington State University	\$75,000	\$175,000	\$125,000	\$100,000	\$ 50,000
Office of Superintendent of Public Instruction	\$0	\$80,000	\$0	\$0	\$0
Total	\$3,995,031	\$8,970,182	\$5,240,207	\$5,385,993	\$3,587,179

LOCAL GOVERNMENT AND SCHOOL DISTRICT EXPENDITURES

Table 4. Total local government expenditure impact

	FY 2019	FY 2020	FY 2021	FY 2022	FY 2023
Publicly Owned Utilities	\$0	\$18,811,545	\$40,579,011	\$46,552,927	\$52,679,589
Local Government Total	\$0	\$18,811,545	\$40,579,011	\$46,552,927	\$52,679,589

Cities, public utility districts, port districts and other local governments that provide electricity and natural gas services would potentially be required to pay the pollution fee. It is estimated that 43 local governments would likely be impacted by the initiative. Publicly owned utilities could either pay the pollution fee or claim a credit for state-approved clean-energy investments. It is assumed that publicly owned utilities operated by local governments would incur costs of \$158,623,072 over four years, primarily for state-approved clean-energy investments made in lieu of pollution fees for which they would be liable.

Key assumptions used to generate these estimates are:

- Pollution fee estimates are based upon the Department of Commerce’s 2016 Washington State Electric Utility Fuel Mix Disclosure Report and the EIA 2016 data on natural gas utility deliveries.
- All consumer-owned utilities will withhold 100 percent of pollution-fee liability as pollution-fee credits equal to the value of clean-energy investments; however, the specific types of programmatic investments are unknown at this time. Jurisdictions choosing to participate in credit-eligible activities will incur indeterminate costs related to developing clean energy investment plans, applying for credits and reporting on funding usage.
- Neither the mix of fuels associated with electricity sources nor the demand for carbon-based fuels changes from 2016 reported levels. Local governments generally do not have the ability to modify their fuel mixes in the near term, and the impact of utility clean-energy investments on fuel mix and electricity demand are unknown at this time.

The Office of Superintendent of Public Instruction estimates that there are approximately 30 school districts that operate their own fueling distribution facilities that service their school bus fleets. To the extent these districts purchase fuel from out-of-state suppliers, they would be liable for the pollution fee. The source of fuel for these facilities is unknown, so no estimate is included of any potential costs to school districts. Similarly, the pollution fee liability incurred by local governments operating their own fuel-distribution facilities supplied with fuel imported directly from out of state is not known at this time.