

E2SHB 1663 - S COMM AMD
By Committee on Ways & Means

ADOPTED AND ENGROSSED 3/4/2022

1 Strike everything after the enacting clause and insert the
2 following:

3 "NEW SECTION. **Sec. 1.** The definitions in this section apply
4 throughout this chapter unless the context clearly requires
5 otherwise.

6 (1) "Active municipal solid waste landfill" means a municipal
7 solid waste landfill that has accepted or is accepting solid waste
8 for disposal and has not been closed in accordance with the
9 requirements set forth in WAC 173-351-500 as it existed on January
10 10, 2022.

11 (2) "Air pollution" is presence in the outdoor atmosphere of one
12 or more air contaminants in sufficient quantities and of such
13 characteristics and duration as is, or is likely to be, injurious to
14 human health, plant or animal life, or property, or which
15 unreasonably interfere with enjoyment of life and property. For the
16 purpose of this chapter, air pollution does not include air
17 contaminants emitted in compliance with chapter 17.21 RCW.

18 (3) "Ambient air" means the surrounding outside air.

19 (4) "Authority" means any air pollution control agency whose
20 jurisdictional boundaries are coextensive with the boundaries of one
21 or more counties.

22 (5) "Closed municipal solid waste landfill" means a municipal
23 solid waste landfill that is no longer accepting solid waste for
24 disposal and has been closed in accordance with the requirements set
25 forth in WAC 173-351-500 as it existed on January 10, 2022.

26 (6) "Department" means the department of ecology.

27 (7) "Emission" means a release of air contaminants into the
28 ambient air.

29 (8) "Gas collection system" means any system that employs various
30 gas collection wells and connected piping, and mechanical blowers,
31 fans, pumps, or compressors to create a pressure gradient and
32 actively extract landfill gas.

1 (9) "Gas control device" means any device used to dispose of or
2 treat collected landfill gas including, but not limited to, enclosed
3 flares, internal combustion engines, boilers and boiler-to-steam
4 turbine systems, fuel cells, and gas turbines.

5 (10) "Gas control system" means any system that disposes of or
6 treats collected landfill gas by one or more of the following means:
7 Combustion; gas treatment for subsequent sale, or sale for processing
8 offsite, including for transportation fuel and injection into a
9 natural gas pipeline.

10 (11) "Municipal solid waste landfill" means a discrete area of
11 land or an excavation that receives household waste and that is not a
12 land application site, surface impoundment, injection well, or pile.

13 (12) "Person" means an individual, firm, public or private
14 corporation, association, partnership, political subdivision of the
15 state, municipality, or governmental agency.

16 NEW SECTION. **Sec. 2.** (1) This chapter applies to all municipal
17 solid waste landfills that received solid waste after January 1,
18 1992, except as provided in subsection (2) of this section.

19 (2) This chapter does not apply to the following landfills:

20 (a) Landfills that receive only hazardous waste, or are currently
21 regulated under the comprehensive environmental response,
22 compensation, and liability act, 42 U.S.C. chapter 103; and

23 (b) Landfills that receive only inert waste or nondecomposable
24 wastes.

25 (3) The department must adopt rules to implement this chapter.
26 The rules adopted by the department must be informed by landfill
27 methane regulations adopted by the California air resources board,
28 the Oregon environmental quality commission, and the United States
29 environmental protection agency.

30 NEW SECTION. **Sec. 3.** (1) Each owner or operator of an active
31 municipal solid waste landfill having fewer than 450,000 tons of
32 waste in place must submit an annual waste in place report to the
33 department or local authority pursuant to section 7 of this act.

34 (a) The waste in place report must be prepared for the period of
35 January 1st through December 31st of each year. The report must be
36 submitted to the department or local authority during the subsequent
37 calendar year, with the date of submission to be established by rule
38 as adopted by the department.

1 (b) The waste in place report must be submitted annually until
2 either:

3 (i) The active municipal solid waste landfill reaches a size
4 greater than or equal to 450,000 tons of waste in place; or

5 (ii) The owner or operator submits a closure notification
6 pursuant to section 7 of this act.

7 (2) Each owner or operator of either an active municipal solid
8 waste landfill having greater than or equal to 450,000 tons of waste
9 in place or a closed municipal solid waste landfill having greater
10 than or equal to 750,000 tons of waste in place must calculate the
11 landfill gas heat input capacity pursuant to section 8 of this act
12 and the department's implementing rules and must submit a landfill
13 gas heat input capacity report to the department or local authority.

14 (a) If the calculated landfill gas heat input capacity is less
15 than 3,000,000 British thermal units per hour recovered, the owner or
16 operator must:

17 (i) Recalculate the landfill gas heat input capacity annually
18 using the procedures specified in section 8 of this act and the
19 department's implementing rules; and

20 (ii) Submit an annual landfill gas heat input capacity report to
21 the department or local authority until either of the following
22 conditions are met:

23 (A) The calculated landfill gas heat input capacity is greater
24 than or equal to 3,000,000 British thermal units per hour recovered;
25 or

26 (B) If the municipal solid waste landfill is active, the owner or
27 operator submits a closure notification pursuant to section 7 of this
28 act.

29 (b) If the landfill gas heat input capacity is greater than or
30 equal to 3,000,000 British thermal units per hour recovered, the
31 owner or operator must either:

32 (i) Comply with the requirements of this chapter and the
33 department's implementing rules; or

34 (ii) Demonstrate to the satisfaction of the department or local
35 authority that after four consecutive quarterly monitoring periods
36 there is no measured concentration of methane of 200 parts per
37 million by volume or greater using the instantaneous surface
38 monitoring procedures specified in section 8 of this act and the
39 department's implementing rules. Based on the monitoring results, the
40 owner or operator must do one of the following:

1 (A) If there is any measured concentration of methane of 200
2 parts per million by volume or greater from the surface of an active,
3 inactive, or closed municipal solid waste landfill, comply with this
4 chapter and the department's implementing rules adopted pursuant to
5 section 2 of this act;

6 (B) If there is no measured concentration of methane of 200 parts
7 per million by volume or greater from the surface of an active
8 municipal solid waste landfill, recalculate the landfill gas heat
9 input capacity annually as required in (a) of this subsection until
10 such time that the owner or operator submits a closure notification
11 pursuant to section 7 of this act and the department's implementing
12 rules adopted pursuant to section 2 of this act; or

13 (C) If there is no measured concentration of methane of 200 parts
14 per million by volume or greater from the surface of a closed or
15 inactive municipal solid waste landfill, the requirements of this
16 chapter and the department's implementing rules adopted pursuant to
17 section 2 of this act no longer apply, provided that the following
18 information is submitted to and approved by the department or local
19 authority:

20 (I) A waste in place report pursuant to section 7 of this act and
21 the department's implementing rules adopted pursuant to section 2 of
22 this act; and

23 (II) All instantaneous surface monitoring records.

24 NEW SECTION. **Sec. 4.** (1) The owner or operator of any municipal
25 solid waste landfill that has a calculated landfill gas heat input
26 capacity greater than or equal to 3,000,000 British thermal units per
27 hour recovered must install a gas collection and control system that
28 meets the requirements of this section and the department's
29 implementing rules adopted pursuant to section 2 of this act, unless
30 the owner or operator demonstrates to the satisfaction of the
31 department or local authority that after four consecutive quarterly
32 monitoring periods there is no measured concentration of methane of
33 200 parts per million by volume or greater using the instantaneous
34 surface monitoring procedures specified in section 8 of this act and
35 the department's implementing rules adopted pursuant to section 2 of
36 this act. If a municipal solid waste landfill partners with a third
37 party to operate all or a portion of the gas collection and control
38 system or energy recovery device, the obligation to comply with the
39 requirements of this chapter are the responsibility of the owner or

1 operator of the relevant portion of the gas collection and control
2 system or energy recovery device.

3 (2) The gas collection and control system must handle the
4 expected gas generation flow rate from the entire area of the
5 municipal solid waste landfill and must collect gas at an extraction
6 rate to comply with the surface methane emission limits set forth in
7 section 5 of this act and the department's implementing rules.

8 (3) The gas collection and control system must be designed and
9 operated so that there is no landfill gas leak that exceeds 500 parts
10 per million by volume, measured as methane, at any component under
11 positive pressure.

12 (4) The gas collection and control system, if it uses a flare,
13 must achieve a methane destruction efficiency of at least 99 percent
14 by weight and must use either an enclosed flare or, if the system
15 uses an open flare, the open flare must comply with the following
16 requirements:

17 (a) The open flare must meet the requirements of 40 C.F.R. Sec.
18 60.18 (as last amended by 73 Fed. Reg. 78209, December 22, 2008);

19 (b) An open flare installed and operating prior to December 31,
20 2022, may operate until January 1, 2032, unless the owner or operator
21 demonstrates to the satisfaction of the department or local authority
22 that the landfill gas heat input capacity is less than 3,000,000
23 British thermal units per hour pursuant to section 8 of this act and
24 the department's implementing rules adopted pursuant to section 2 of
25 this act and is insufficient to support the continuous operation of
26 an enclosed flare or other gas control device; and

27 (c) The owner or operator may temporarily operate an open flare
28 during the repair or maintenance of the gas control system, or while
29 awaiting the installation of an enclosed flare, or to address offsite
30 gas migration issues. Any owner or operator seeking to temporarily
31 operate an open flare must submit a written request to the department
32 or local authority pursuant to section 10 of this act and the
33 department's implementing rules adopted pursuant to section 2 of this
34 act.

35 (5) If the gas collection and control system does not use a
36 flare, it must either route the collected gas to an energy recovery
37 device or devices, or must route the collected gas to a treatment
38 system that processes the collected gas for subsequent sale or use.

39 (6) If a gas collection and control system routes the collected
40 gas to an energy recovery device or devices, the owner or operator of

1 the energy recovery device or devices must comply with the following
2 requirements:

3 (a) The device or devices must achieve a methane destruction
4 efficiency of at least 97 percent by weight, except for lean-burn
5 internal combustion engines that were installed and operating prior
6 to January 1, 2022, which must reduce the outlet methane
7 concentration to less than 3,000 parts per million by volume, dry
8 basis corrected to 15 percent oxygen; and

9 (b) If a boiler or a process heater is used as the gas control
10 device, the landfill gas stream must be introduced into the flame
11 zone, except that where the landfill gas is not the primary fuel for
12 the boiler or process heater, introduction of the landfill gas stream
13 into the flame zone is not required.

14 (7) If a gas collection and control system routes the collected
15 gas to a treatment system that processes the collected gas for
16 subsequent sale or use, the owner or operator of the treatment system
17 must ensure the system achieves a methane leak rate of three percent
18 or less by weight. Venting of processed landfill gas to the ambient
19 air is not allowed. If the processed landfill gas cannot be routed
20 for subsequent sale or use, then the treated landfill gas must be
21 controlled according to subsection (4) of this section.

22 (8) The owner or operator of a municipal solid waste landfill
23 must conduct a source test for any gas control device or devices
24 subject to this section using the test methods identified in section
25 8 of this act and the department's implementing rules adopted
26 pursuant to section 2 of this act. If a gas control device is
27 currently in compliance with source testing requirements as of the
28 effective date of this section, the owner or operator must conduct
29 the source test no less frequently than once every five years. If a
30 gas control device is currently not in compliance with source testing
31 requirements as of the effective date of this section, or if a
32 subsequent source test shows the gas control device is out of
33 compliance, the owner or operator must conduct the source test no
34 less frequently than once per year until two subsequent consecutive
35 tests both show compliance. Upon two subsequent consecutive compliant
36 tests, the owner or operator may return to conducting the source test
37 no less frequently than once every five years.

38 NEW SECTION. **Sec. 5.** (1) Except as provided in section 4 of
39 this act, beginning January 1st of the year following the year in

1 which the department adopts rules to implement this chapter, or upon
2 commencing operation of a newly installed gas collection and control
3 system or modification of an existing gas collection and control
4 system pursuant to section 4 of this act, whichever is later, and
5 except as provided by the department to accommodate significant
6 technological improvements, which may include the installation of an
7 energy recovery device or devices, not to exceed 24 months after the
8 department adopts rules to implement this chapter, no location on a
9 municipal solid waste landfill surface may exceed the following
10 methane concentration limits, dependent upon whether the owner or
11 operator of the municipal solid waste landfills conducts, pursuant to
12 section 6 of this act, instantaneous surface emissions monitoring or
13 integrated surface emissions monitoring:

14 (a) Five hundred parts per million by volume, other than
15 nonrepeatable, momentary readings, as determined by instantaneous
16 surface emissions monitoring; or

17 (b) An average methane concentration limit of 25 parts per
18 million by volume as determined by integrated surface emissions
19 monitoring.

20 (2) Any reading exceeding the limits set forth in subsection (1)
21 of this section must be recorded as an exceedance and the following
22 actions must be taken:

23 (a) The owner or operator must record the date, location, and
24 value of each exceedance, along with retest dates and results. The
25 location of each exceedance must be clearly marked and identified on
26 a topographic map of the municipal solid waste landfill, drawn to
27 scale, with the location of both the monitoring grids and the gas
28 collection system clearly identified; and

29 (b) The owner or operator must take corrective action, which may
30 include, but not be limited to, maintenance or repair of the cover,
31 or well vacuum adjustments. The location or locations of any
32 exceedance must be remonitored within 10 calendar days of a measured
33 exceedance.

34 (3) The requirements of this section do not apply to:

35 (a) The working face of the landfill;

36 (b) Areas of the landfill surface where the landfill cover
37 material has been removed for the purpose of installing, expanding,
38 replacing, or repairing components of the landfill cover system, the
39 landfill gas collection and control system, the leachate collection

1 and removal system, or a landfill gas condensate collection and
2 removal system;

3 (c) Areas of the landfill surface where the landfill cover
4 material has been removed for law enforcement activities requiring
5 excavation; or

6 (d) Areas of the landfill in which the landfill owner or
7 operator, or a designee of the owner or operator, is engaged in
8 active mining for minerals or metals.

9 NEW SECTION. **Sec. 6.** (1) The owner or operator of a municipal
10 solid waste landfill with a gas collection and control system must
11 conduct instantaneous or integrated surface monitoring of the
12 landfill surface according to the requirements specified in
13 implementing rules adopted by the department pursuant to section 2 of
14 this act.

15 (2) The owner or operator of a municipal solid waste landfill
16 with a gas collection and control system must monitor the gas control
17 system according to the requirements specified in implementing rules
18 adopted by the department pursuant to section 2 of this act.

19 (3) The owner or operator of a municipal solid waste landfill
20 with a gas collection and control system must monitor each individual
21 wellhead to determine the gauge pressure according to the
22 requirements specified in implementing rules adopted by the
23 department pursuant to section 2 of this act.

24 NEW SECTION. **Sec. 7.** (1) The owner or operator of a municipal
25 solid waste landfill must maintain records and prepare reports as
26 prescribed in this section and in the department's implementing rules
27 adopted pursuant to section 2 of this act.

28 (2) The owner or operator of a municipal solid waste landfill
29 must maintain records related to monitoring, testing, landfill
30 operations, and the operation of the gas control device, gas
31 collection system, and gas control system. The records must be
32 provided by the owner or operator to the department or local
33 authority within five business days of a request from the department
34 or local authority.

35 (3) The owner or operator of a municipal solid waste landfill
36 that ceases to accept waste must submit a closure notification to the
37 department or local authority within 30 days of ceasing to accept
38 waste.

1 (4) The owner or operator of a municipal solid waste landfill
2 must submit a gas collection and control system equipment removal
3 report to the department or local authority within 30 days of well
4 capping or the removal or cessation of operation of the gas
5 collection, treatment, or control system equipment.

6 (5) The owner or operator of either an active municipal solid
7 waste landfill with 450,000 or more tons of waste in place or a
8 closed municipal solid waste landfill with 750,000 or more tons of
9 waste in place must prepare an annual report for the period of
10 January 1st through December 31st of each year. The annual report
11 must include a calculation of landfill gas heat input capacity. Each
12 annual report must be submitted to the department and local authority
13 during the subsequent calendar year, with the date of submission to
14 be established through rules adopted by the department.

15 (6) The owner or operator of an active municipal solid waste
16 landfill with fewer than 450,000 tons of waste in place must submit a
17 waste in place report to the department or local authority.

18 NEW SECTION. **Sec. 8.** (1) Any instrument used for the
19 measurement of methane must be a hydrocarbon detector or other
20 equivalent instrument approved by the department or local authority
21 based on standards adopted by the department that address
22 calibration, specifications, and performance criteria.

23 (2) The determination of landfill gas heat input capacity must be
24 calculated consistent with the department's implementing rules
25 adopted pursuant to section 2 of this act.

26 (3) The owner or operator of a municipal solid waste landfill
27 must measure the landfill surface concentration of methane using a
28 hydrocarbon detector meeting the requirements of this section and the
29 department's implementing rules adopted pursuant to section 2 of this
30 act.

31 (4) The owner or operator of a municipal solid waste landfill
32 must measure leaks using a hydrocarbon detector meeting the
33 requirements of this section and the department's implementing rules
34 adopted pursuant to section 2 of this act.

35 (5) The expected gas generation flow rate must be determined
36 according to the department's implementing rules adopted pursuant to
37 section 2 of this act.

1 (6) The control device destruction efficiency must be determined
2 according to the department's implementing rules adopted pursuant to
3 section 2 of this act.

4 (7) Gauge pressure must be determined using a hand-held
5 manometer, magnehelic gauge, or other pressure measuring device
6 approved by the department or local authority.

7 (8) Alternative test methods may be used if they are approved in
8 writing by the department or local authority.

9 NEW SECTION. **Sec. 9.** (1) The department or local authority must
10 allow the capping or removal of the gas collection and control system
11 at a closed municipal solid waste landfill, provided the following
12 three requirements are met:

13 (a) The gas collection and control system was in operation for at
14 least 15 years, unless the owner or operator demonstrates to the
15 satisfaction of the department or local authority that due to
16 declining methane rates, the municipal solid waste landfill will be
17 unable to operate the gas collection and control system for a 15 year
18 period;

19 (b) Surface methane concentration measurements do not exceed the
20 limits specified in section 5 of this act; and

21 (c) The owner or operator submits an equipment removal report to
22 the department or local authority pursuant to section 7 of this act
23 and the department's implementing rules adopted pursuant to section 2
24 of this act.

25 (2) Nothing in this section may be interpreted to modify or
26 supersede requirements related to the capping or removal of gas
27 collection and control systems that may exist under the state clean
28 air act, the federal clean air act, or rules adopted pursuant to
29 either the state clean air act or the federal clean air act.

30 NEW SECTION. **Sec. 10.** (1) The owner or operator of a municipal
31 solid waste landfill may request alternatives to the compliance
32 measures, monitoring requirements, and test methods and procedures
33 set forth in sections 4, 6, and 8 of this act, and the department's
34 implementing rules adopted pursuant to section 2 of this act. Any
35 alternatives requested by the owner or operator must be submitted in
36 writing to the department.

37 (2) The criteria that the department may use to evaluate
38 alternative compliance option requests include, but are not limited

1 to: Compliance history; documentation containing the landfill gas
2 flow rate and measured methane concentrations for individual gas
3 collection wells or components; permits; component testing and
4 surface monitoring results; gas collection and control system
5 operation, maintenance, and inspection records; and historical
6 meteorological data.

7 (3) The department must review the requested alternatives and
8 either approve or disapprove the alternatives within 120 days. The
9 department may request that additional information be submitted as
10 part of the review of the requested alternatives.

11 (4) If a request for an alternative compliance option is denied,
12 the department must provide written reasons for the denial.

13 (5) The department must deny a request for alternative compliance
14 measures if the request does not provide levels of enforceability or
15 methane emissions control that are equivalent to those set forth in
16 this chapter or in the department's implementing rules adopted
17 pursuant to section 2 of this act.

18 NEW SECTION. **Sec. 11.** The department or local authority may
19 request that any owner or operator of a municipal solid waste
20 landfill demonstrate that a landfill does not meet the applicability
21 criteria specified in section 2 of this act. Such a demonstration
22 must be submitted to the department or local authority within 90 days
23 of a written request received from the department or local authority.

24 NEW SECTION. **Sec. 12.** Any person who violates this chapter or
25 any rules that implement this chapter may incur a civil penalty
26 pursuant to RCW 70A.15.3160. The department shall waive penalties in
27 the event the owner or operator of the landfill is actively taking
28 corrective actions to control any methane exceedances. Penalties
29 collected under this section must be deposited into the air pollution
30 control account created in RCW 70A.15.1010 and may only be used to
31 implement chapter 70A.--- RCW (the new chapter created in section 18
32 of this act).

33 NEW SECTION. **Sec. 13.** The department and local authorities may
34 assess and collect such fees as may be necessary to recover the
35 direct and indirect costs associated with the implementation of this
36 chapter.

1 **Sec. 14.** RCW 70A.65.080 and 2021 c 316 s 10 are each amended to
2 read as follows:

3 (1) A person is a covered entity as of the beginning of the first
4 compliance period and all subsequent compliance periods if the person
5 reported emissions under RCW 70A.15.2200 for any calendar year from
6 2015 through 2019, or if additional data provided as required by this
7 chapter indicates that emissions for any calendar year from 2015
8 through 2019 equaled or exceeded any of the following thresholds, or
9 if the person is a first jurisdictional deliverer and imports
10 electricity into the state during the compliance period:

11 (a) Where the person owns or operates a facility and the
12 facility's emissions equal or exceed 25,000 metric tons of carbon
13 dioxide equivalent;

14 (b) Where the person is a first jurisdictional deliverer and
15 generates electricity in the state and emissions associated with this
16 generation equals or exceeds 25,000 metric tons of carbon dioxide
17 equivalent;

18 (c) Where the person is a first jurisdictional deliverer
19 importing electricity into the state and the cumulative annual total
20 of emissions associated with the imported electricity, whether from
21 specified or unspecified sources, exceeds 25,000 metric tons of
22 carbon dioxide equivalent. In consultation with any linked
23 jurisdiction to the program created by this chapter, by October 1,
24 2026, the department, in consultation with the department of commerce
25 and the utilities and transportation commission, shall adopt by rule
26 a methodology for addressing imported electricity associated with a
27 centralized electricity market;

28 (d) Where the person is a supplier of fossil fuel other than
29 natural gas and from that fuel 25,000 metric tons or more of carbon
30 dioxide equivalent emissions would result from the full combustion or
31 oxidation, excluding the amounts for fuel products that are produced
32 or imported with a documented final point of delivery outside of
33 Washington and combusted outside of Washington; and

34 (e)(i) Where the person supplies natural gas in amounts that
35 would result in exceeding 25,000 metric tons of carbon dioxide
36 equivalent emissions if fully combusted or oxidized, excluding the
37 amounts for fuel products that are produced or imported with a
38 documented final point of delivery outside of Washington and
39 combusted outside of Washington, and excluding the amounts: (A)

1 Supplied to covered entities under (a) through (d) of this
2 subsection; and (B) delivered to opt-in entities;

3 (ii) Where the person who is not a natural gas company and has a
4 tariff with a natural gas company to deliver to an end-use customer
5 in the state in amounts that would result in exceeding 25,000 metric
6 tons of carbon dioxide equivalent emissions if fully combusted or
7 oxidized, excluding the amounts: (A) Supplied to covered entities
8 under (a) through (d) of this subsection; and (B) the amounts
9 delivered to opt-in entities;

10 (iii) Where the person is an end-use customer in the state who
11 directly purchases natural gas from a person that is not a natural
12 gas company and has the natural gas delivered through an interstate
13 pipeline to a distribution system owned by the purchaser in amounts
14 that would result in exceeding 25,000 metric tons of carbon dioxide
15 equivalent emissions if fully combusted or oxidized, excluding the
16 amounts: (A) Supplied to covered entities under (a) through (d) of
17 this subsection; and (B) delivered to opt-in entities.

18 (2) A person is a covered entity as of the beginning of the
19 second compliance period and all subsequent compliance periods if the
20 person reported emissions under RCW 70A.15.2200 or provided emissions
21 data as required by this chapter for any calendar year from 2023
22 through 2025, where the person owns or operates a waste to energy
23 facility utilized by a county and city solid waste management program
24 and the facility's emissions equal or exceed 25,000 metric tons of
25 carbon dioxide equivalent.

26 (3) ~~((a))~~ A person is a covered entity beginning January 1,
27 2031, and all subsequent compliance periods if the person reported
28 emissions under RCW 70A.15.2200 or provided emissions data as
29 required by this chapter for any calendar year from 2027 through
30 2029, where the person owns or operates a ~~((~~

31 ~~(i) Landfill utilized by a county and city solid waste management
32 program and the facility's emissions equal or exceed 25,000 metric
33 tons of carbon dioxide equivalent; or~~

34 ~~(ii) Railroad)~~ railroad company, as that term is defined in RCW
35 81.04.010, and the railroad company's emissions equal or exceed
36 25,000 metric tons of carbon dioxide equivalent.

37 ~~((b) Subsection (a) of this subsection does not apply to owners
38 or operators of landfills that:~~

39 ~~(i) Capture at least 75 percent of the landfill gas generated by
40 the decomposition of waste using methods under 40 C.F.R. Part 98,~~

1 ~~Subpart HH - Municipal Solid Waste landfills, and subsequent updates,~~
2 ~~and~~

3 ~~(ii) Operate a program, individually or through partnership with~~
4 ~~another entity, that results in the production of renewable natural~~
5 ~~gas or electricity from landfill gas generated by the facility.~~

6 ~~(c) It is the intent of the legislature to adopt a greenhouse gas~~
7 ~~reduction policy specific to landfills. If such a policy is not~~
8 ~~enacted by January 1, 2030, the requirements of this subsection (3)~~
9 ~~take full effect.)~~

10 (4) When a covered entity reports, during a compliance period,
11 emissions from a facility under RCW 70A.15.2200 that are below the
12 thresholds specified in subsection (1) or (2) of this section, the
13 covered entity continues to have a compliance obligation through the
14 current compliance period. When a covered entity reports emissions
15 below the threshold for each year during an entire compliance period,
16 or has ceased all processes at the facility requiring reporting under
17 RCW 70A.15.2200, the entity is no longer a covered entity as of the
18 beginning of the subsequent compliance period unless the department
19 provides notice at least 12 months before the end of the compliance
20 period that the facility's emissions were within 10 percent of the
21 threshold and that the person will continue to be designated as a
22 covered entity in order to ensure equity among all covered entities.
23 Whenever a covered entity ceases to be a covered entity, the
24 department shall notify the appropriate policy and fiscal committees
25 of the legislature of the name of the entity and the reason the
26 entity is no longer a covered entity.

27 (5) For types of emission sources described in subsection (1) of
28 this section that begin or modify operation after January 1, 2023,
29 and types of emission sources described in subsection (2) of this
30 section that begin or modify operation after 2027, coverage under the
31 program starts in the calendar year in which emissions from the
32 source exceed the applicable thresholds in subsection (1) or (2) of
33 this section, or upon formal notice from the department that the
34 source is expected to exceed the applicable emissions threshold,
35 whichever happens first. Sources meeting these conditions are
36 required to transfer their first allowances on the first transfer
37 deadline of the year following the year in which their emissions were
38 equal to or exceeded the emissions threshold.

39 (6) For emission sources described in subsection (1) of this
40 section that are in operation or otherwise active between 2015 and

1 2019 but were not required to report emissions for those years under
2 RCW 70A.15.2200 for the reporting periods between 2015 and 2019,
3 coverage under the program starts in the calendar year following the
4 year in which emissions from the source exceed the applicable
5 thresholds in subsection (1) of this section as reported pursuant to
6 RCW 70A.15.2200 or provided as required by this chapter, or upon
7 formal notice from the department that the source is expected to
8 exceed the applicable emissions threshold for the first year that
9 source is required to report emissions, whichever happens first.
10 Sources meeting these criteria are required to transfer their first
11 allowances on the first transfer deadline of the year following the
12 year in which their emissions, as reported under RCW 70A.15.2200 or
13 provided as required by this chapter, were equal to or exceeded the
14 emissions threshold.

15 (7) The following emissions are exempt from coverage in the
16 program, regardless of the emissions reported under RCW 70A.15.2200
17 or provided as required by this chapter:

18 (a) Emissions from the combustion of aviation fuels;

19 (b) Emissions from watercraft fuels supplied in Washington that
20 are combusted outside of Washington;

21 (c) Emissions from a coal-fired electric generation facility
22 exempted from additional greenhouse gas limitations, requirements, or
23 performance standards under RCW 80.80.110;

24 (d) Carbon dioxide emissions from the combustion of biomass or
25 biofuels;

26 (e)(i) Motor vehicle fuel or special fuel that is used
27 exclusively for agricultural purposes by a farm fuel user. This
28 exemption is available only if a buyer of motor vehicle fuel or
29 special fuel provides the seller with an exemption certificate in a
30 form and manner prescribed by the department. For the purposes of
31 this subsection, "agricultural purposes" and "farm fuel user" have
32 the same meanings as provided in RCW 82.08.865.

33 (ii) The department must determine a method for expanding the
34 exemption provided under (e)(i) of this subsection to include fuels
35 used for the purpose of transporting agricultural products on public
36 highways. The department must maintain this expanded exemption for a
37 period of five years, in order to provide the agricultural sector
38 with a feasible transition period; ~~((and))~~

39 (f) Emissions from facilities with North American industry
40 classification system code 92811 (national security); and

1 (g) Emissions from municipal solid waste landfills that are
2 subject to, and in compliance with, chapter 70A.--- RCW (the new
3 chapter created in section 18 of this act).

4 (8) The department shall not require multiple covered entities to
5 have a compliance obligation for the same emissions. The department
6 may by rule authorize refineries, fuel suppliers, facilities using
7 natural gas, and natural gas utilities to provide by agreement for
8 the assumption of the compliance obligation for fuel or natural gas
9 supplied and combusted in the state. The department must be notified
10 of such an agreement at least 12 months prior to the compliance
11 obligation period for which the agreement is applicable.

12 (9) (a) The legislature intends to promote a growing and
13 sustainable economy and to avoid leakage of emissions from
14 manufacturing to other locations. The legislature further intends to
15 see innovative new businesses locate and grow in Washington that
16 contribute to Washington's prosperity and environmental objectives.

17 (b) Consistent with the intent of the legislature to avoid the
18 leakage of emissions to other jurisdictions, in achieving the state's
19 greenhouse gas limits in RCW 70A.45.020, the state, including lead
20 agencies under chapter 43.21C RCW, shall pursue the limits in a
21 manner that recognizes that the siting and placement of new or
22 expanded best-in-class facilities with lower carbon emitting
23 processes is in the economic and environmental interests of the state
24 of Washington.

25 (c) In conducting a life-cycle analysis, if required, for new or
26 expanded facilities that require review under chapter 43.21C RCW, a
27 lead agency must evaluate and attribute any potential net cumulative
28 greenhouse gas emissions resulting from the project as compared to
29 other existing facilities or best available technology including
30 best-in-class facilities and emerging lower carbon processes that
31 supply the same product or end use. The department may adopt rules to
32 determine the appropriate threshold for applying this analysis.

33 (d) Covered emissions from an entity that is or will be a covered
34 entity under this chapter may not be the basis for denial of a permit
35 for a new or expanded facility. Covered emissions must be included in
36 the analysis undertaken pursuant to (c) of this subsection. Nothing
37 in this subsection requires a lead agency or a permitting agency to
38 approve or issue a permit to a permit applicant, including to a new
39 or expanded fossil fuel project.

1 (e) A lead agency under chapter 43.21C RCW or a permitting agency
2 shall allow a new or expanded facility that is a covered entity or
3 opt-in entity to satisfy a mitigation requirement for its covered
4 emissions under chapter 316, Laws of 2021 and under any greenhouse
5 gas emission mitigation requirements for covered emissions under
6 chapter 43.21C RCW by submitting to the department the number of
7 compliance instruments equivalent to its covered emissions during a
8 compliance period.

9 **Sec. 15.** RCW 70A.15.3160 and 2021 c 317 s 25, 2021 c 315 s 16,
10 and 2021 c 132 s 1 are each reenacted and amended to read as follows:

11 (1)(a) Except as provided in RCW 43.05.060 through 43.05.080 and
12 43.05.150, and in addition to or as an alternate to any other penalty
13 provided by law, any person who violates any of the provisions of
14 this chapter, chapter 70A.25, 70A.60, 70A.450, (~~or 70A.60~~) 70A.535
15 ((RCW)), or 70A.--- RCW (the new chapter created in section 18 of
16 this act), RCW 76.04.205, or any of the rules in force under such
17 chapters or section may incur a civil penalty in an amount not to
18 exceed ten thousand dollars per day for each violation. Each such
19 violation shall be a separate and distinct offense, and in case of a
20 continuing violation, each day's continuance shall be a separate and
21 distinct violation. Enforcement actions related to violations of RCW
22 76.04.205 must be consistent with the provisions of RCW 76.04.205.

23 (b) Any person who fails to take action as specified by an order
24 issued pursuant to this chapter shall be liable for a civil penalty
25 of not more than ten thousand dollars for each day of continued
26 noncompliance.

27 (2)(a) Penalties incurred but not paid shall accrue interest,
28 beginning on the ninety-first day following the date that the penalty
29 becomes due and payable, at the highest rate allowed by RCW 19.52.020
30 on the date that the penalty becomes due and payable. If violations
31 or penalties are appealed, interest shall not begin to accrue until
32 the thirty-first day following final resolution of the appeal.

33 (b) The maximum penalty amounts established in this section may
34 be increased annually to account for inflation as determined by the
35 state office of the economic and revenue forecast council.

36 (3) Each act of commission or omission which procures, aids or
37 abets in the violation shall be considered a violation under the
38 provisions of this section and subject to the same penalty. The

1 penalties provided in this section shall be imposed pursuant to RCW
2 43.21B.300.

3 (4) (a) Except as provided in (b) of this subsection, all
4 penalties recovered under this section by the department or the
5 department of natural resources shall be paid into the state treasury
6 and credited to the air pollution control account established in RCW
7 70A.15.1010 or, if recovered by the authority, shall be paid into the
8 treasury of the authority and credited to its funds. If a prior
9 penalty for the same violation has been paid to a local authority,
10 the penalty imposed by the department under subsection (1) of this
11 section shall be reduced by the amount of the payment.

12 (b) All penalties recovered for violations of chapter 70A.60 RCW
13 must be paid into the state treasury and credited to the refrigerant
14 emission management account created in RCW 70A.60.050.

15 (5) To secure the penalty incurred under this section, the state
16 or the authority shall have a lien on any vessel used or operated in
17 violation of this chapter which shall be enforced as provided in RCW
18 60.36.050.

19 (6) Public or private entities that are recipients or potential
20 recipients of department grants, whether for air quality related
21 activities or not, may have such grants rescinded or withheld by the
22 department for failure to comply with provisions of this chapter.

23 (7) In addition to other penalties provided by this chapter,
24 persons knowingly underreporting emissions or other information used
25 to set fees, or persons required to pay emission or permit fees who
26 are more than ninety days late with such payments may be subject to a
27 penalty equal to three times the amount of the original fee owed.

28 (8) The department shall develop rules for excusing excess
29 emissions from enforcement action if such excess emissions are
30 unavoidable. The rules shall specify the criteria and procedures for
31 the department and local air authorities to determine whether a
32 period of excess emissions is excusable in accordance with the state
33 implementation plan.

34 **Sec. 16.** RCW 70A.15.1010 and 2021 c 315 s 13 are each amended to
35 read as follows:

36 (1) The air pollution control account is established in the state
37 treasury. All receipts collected by or on behalf of the department
38 from RCW 70A.15.2200(2), and receipts from nonpermit program sources
39 under RCW 70A.15.2210(1) and 70A.15.2230(7), and all receipts from

1 RCW 70A.15.5090 (~~and~~), 70A.15.5120, and section 12 of this act
2 shall be deposited into the account. Moneys in the account may be
3 spent only after appropriation. Expenditures from the account may be
4 used only to develop and implement the provisions of this chapter,
5 chapters 70A.25 and 70A.--- (the new chapter created in section 18 of
6 this act) RCW, and RCW 70A.60.060. Moneys collected under section 12
7 of this act may only be used to implement chapter 70A.--- RCW (the
8 new chapter created in section 18 of this act).

9 (2) The amounts collected and allocated in accordance with this
10 section shall be expended upon appropriation except as otherwise
11 provided in this section and in accordance with the following
12 limitations:

13 Portions of moneys received by the department of ecology from the
14 air pollution control account shall be distributed by the department
15 to local authorities based on:

16 (a) The level and extent of air quality problems within such
17 authority's jurisdiction;

18 (b) The costs associated with implementing air pollution
19 regulatory programs by such authority; and

20 (c) The amount of funding available to such authority from other
21 sources, whether state, federal, or local, that could be used to
22 implement such programs.

23 (3) The air operating permit account is created in the custody of
24 the state treasurer. All receipts collected by or on behalf of the
25 department from permit program sources under RCW 70A.15.2210(1),
26 70A.15.2260, 70A.15.2270, and 70A.15.2230(7) shall be deposited into
27 the account. Expenditures from the account may be used only for the
28 activities described in RCW 70A.15.2210(1), 70A.15.2260, 70A.15.2270,
29 and 70A.15.2230(7). Moneys in the account may be spent only after
30 appropriation.

31 **Sec. 17.** RCW 70A.65.260 and 2021 c 316 s 29 are each amended to
32 read as follows:

33 (1) The climate commitment account is created in the state
34 treasury. The account must receive moneys distributed to the account
35 from the climate investment account created in RCW 70A.65.250. Moneys
36 in the account may be spent only after appropriation. Projects,
37 activities, and programs eligible for funding from the account must
38 be physically located in Washington state and include, but are not
39 limited to, the following:

- 1 (a) Implementing the working families tax rebate in RCW
2 82.08.0206;
- 3 (b) Supplementing the growth management planning and
4 environmental review fund established in RCW 36.70A.490 for the
5 purpose of making grants or loans to local governments for the
6 purposes set forth in RCW 43.21C.240, 43.21C.031, 36.70A.500, and
7 36.70A.600, for costs associated with RCW 36.70A.610, and to cover
8 costs associated with the adoption of optional elements of
9 comprehensive plans consistent with RCW 43.21C.420;
- 10 (c) Programs, activities, or projects that reduce and mitigate
11 impacts from greenhouse gases and copollutants in overburdened
12 communities, including strengthening the air quality monitoring
13 network to measure, track, and better understand air pollution levels
14 and trends and to inform the analysis, monitoring, and pollution
15 reduction measures required in RCW 70A.65.020;
- 16 (d) Programs, activities, or projects that deploy renewable
17 energy resources, such as solar and wind power, and projects to
18 deploy distributed generation, energy storage, demand-side
19 technologies and strategies, and other grid modernization projects;
- 20 (e) Programs, activities, or projects that increase the energy
21 efficiency or reduce greenhouse gas emissions of industrial
22 facilities including, but not limited to, proposals to implement
23 combined heat and power, district energy, or on-site renewables, such
24 as solar and wind power, to upgrade the energy efficiency of existing
25 equipment, to reduce process emissions, and to switch to less
26 emissions intensive fuel sources;
- 27 (f) Programs, activities, or projects that achieve energy
28 efficiency or emissions reductions in the agricultural sector
29 including:
- 30 (i) Fertilizer management;
- 31 (ii) Soil management;
- 32 (iii) Bioenergy;
- 33 (iv) Biofuels;
- 34 (v) Grants, rebates, and other financial incentives for
35 agricultural harvesting equipment, heavy-duty trucks, agricultural
36 pump engines, tractors, and other equipment used in agricultural
37 operations;
- 38 (vi) Grants, loans, or any financial incentives to food
39 processors to implement projects that reduce greenhouse gas
40 emissions;

- 1 (vii) Renewable energy projects;
- 2 (viii) Farmworker housing weatherization programs;
- 3 (ix) Dairy digester research and development;
- 4 (x) Alternative manure management; and
- 5 (xi) Eligible fund uses under RCW 89.08.615;
- 6 (g) Programs, activities, or projects that increase energy
- 7 efficiency in new and existing buildings, or that promote low carbon
- 8 architecture, including use of newly emerging alternative building
- 9 materials that result in a lower carbon footprint in the built
- 10 environment over the life cycle of the building and component
- 11 building materials;
- 12 (h) Programs, activities, or projects that promote the
- 13 electrification and decarbonization of new and existing buildings,
- 14 including residential, commercial, and industrial buildings;
- 15 (i) Programs, activities, or projects that improve energy
- 16 efficiency, including district energy, and investments in market
- 17 transformation of high efficiency electric appliances and equipment
- 18 for space and water heating;
- 19 (j) Clean energy transition and assistance programs, activities,
- 20 or projects that assist affected workers or people with lower incomes
- 21 during the transition to a clean energy economy, or grow and expand
- 22 clean manufacturing capacity in communities across Washington state
- 23 including, but not limited to:
- 24 (i) Programs, activities, or projects that directly improve
- 25 energy affordability and reduce the energy burden of people with
- 26 lower incomes, as well as the higher transportation fuel burden of
- 27 rural residents, such as bill assistance, energy efficiency, and
- 28 weatherization programs;
- 29 (ii) Community renewable energy projects that allow qualifying
- 30 participants to own or receive the benefits of those projects at
- 31 reduced or no cost;
- 32 (iii) Programs, activities, or other worker-support projects for
- 33 bargaining unit and nonsupervisory fossil fuel workers who are
- 34 affected by the transition away from fossil fuels to a clean energy
- 35 economy. Worker support may include, but is not limited to: (A) Full
- 36 wage replacement, health benefits, and pension contributions for
- 37 every worker within five years of retirement; (B) full wage
- 38 replacement, health benefits, and pension contributions for every
- 39 worker with at least one year of service for each year of service up
- 40 to five years of service; (C) wage insurance for up to five years for

1 workers reemployed who have more than five years of service; (D) up
2 to two years of retraining costs, including tuition and related
3 costs, based on in-state community and technical college costs; (E)
4 peer counseling services during transition; (F) employment placement
5 services, prioritizing employment in the clean energy sector; and (G)
6 relocation expenses;

7 (iv) Direct investment in workforce development, via technical
8 education, community college, institutions of higher education,
9 apprenticeships, and other programs including, but not limited to:

10 (A) Initiatives to develop a forest health workforce established
11 under RCW 76.04.521; and

12 (B) Initiatives to develop new education programs, emerging
13 fields, or jobs pertaining to the clean energy economy;

14 (v) Transportation, municipal service delivery, and technology
15 investments that increase a community's capacity for clean
16 manufacturing, with an emphasis on communities in greatest need of
17 job creation and economic development and potential for commute
18 reduction;

19 (k) Programs, activities, or projects that reduce emissions from
20 landfills and waste-to-energy facilities through diversion of organic
21 materials, methane capture or conversion strategies, ~~((or other~~
22 ~~means))~~ installation of gas collection devices and gas control
23 systems, monitoring and reporting of methane emissions, or other
24 means, prioritizing funding needed for any activities by local
25 governments to comply with chapter 70A.--- RCW (the new chapter
26 created in section 18 of this act);

27 (l) Carbon dioxide removal projects, programs, and activities;
28 and

29 (m) Activities to support efforts to mitigate and adapt to the
30 effects of climate change affecting Indian tribes, including capital
31 investments in support of the relocation of Indian tribes located in
32 areas at heightened risk due to anticipated sea level rise, flooding,
33 or other disturbances caused by climate change. The legislature
34 intends to dedicate at least \$50,000,000 per biennium from the
35 account for purposes of this subsection.

36 (2) Moneys in the account may not be used for projects or
37 activities that would violate tribal treaty rights or result in
38 significant long-term damage to critical habitat or ecological
39 functions. Investments from this account must result in long-term

1 environmental benefits and increased resilience to the impacts of
2 climate change.

3 NEW SECTION. **Sec. 18.** Sections 1 through 13 of this act
4 constitute a new chapter in Title 70A RCW.

5 NEW SECTION. **Sec. 19.** If any provision of this act or its
6 application to any person or circumstance is held invalid, the
7 remainder of the act or the application of the provision to other
8 persons or circumstances is not affected."

E2SHB 1663 - S COMM AMD
By Committee on Ways & Means

ADOPTED AND ENGROSSED 3/4/2022

9 On page 1, line 1 of the title, after "landfills;" strike the
10 remainder of the title and insert "amending RCW 70A.65.080,
11 70A.15.1010, and 70A.65.260; reenacting and amending RCW 70A.15.3160;
12 adding a new chapter to Title 70A RCW; and prescribing penalties."

--- END ---