
A BILL FOR AN ACT

RELATING TO GREENHOUSE GAS EMISSIONS.

BE IT ENACTED BY THE LEGISLATURE OF THE STATE OF HAWAII:

1 SECTION 1. (a) The legislature finds that the earth's
2 atmosphere is now warming at the fastest rate in recorded
3 history, a trend that is projected to cause extensive damage to
4 forests, marine ecosystems, and agriculture. Human communities
5 are also threatened by climate change as seas rise, storms
6 become more intense, and episodes of drought and flooding
7 increase. The scientific evidence is now compelling that recent
8 climate change is caused at least in part by human activities,
9 especially the burning of fossil fuels, which has driven
10 atmospheric carbon dioxide concentrations to their highest
11 levels in four hundred twenty thousand years.

12 The legislature further finds that climate change poses a
13 serious threat to the economic well-being, public health,
14 natural resources, and the environment of Hawaii. The potential
15 adverse effects of global warming include a rise in sea levels
16 resulting in the displacement of businesses and residences and
17 the inundation of Hawaii's freshwater aquifers, damage to marine
18 ecosystems and the natural environment, extended drought and



1 loss of soil moisture, an increase in the spread of infectious
2 diseases, and an increase in the severity of storms and extreme
3 weather events.

4 On February 2, 2007, the Intergovernmental Panel on Climate
5 Change, a body established by the United Nations, released its
6 fourth assessment of the predicted impacts of global climate
7 change. The panel predicted temperature rises of up to eleven
8 and a half degrees fahrenheit by 2100 and a sea level rise of up
9 to twenty-three inches, with an additional 7.8 inches possible
10 if current melting of the ice sheets in Greenland and Antarctica
11 continues.

12 Climate change will have detrimental effects on some of
13 Hawaii's largest industries, including tourism, agriculture,
14 recreational, commercial fishing, and forestry. It will also
15 increase the strain on electricity supplies necessary to meet
16 the demand for air conditioning during the hottest times of the
17 year.

18 The State has long been a leader in environmental
19 stewardship and is endeavoring to lead the way in alternative
20 renewable energy development and use. It is the intent of the
21 legislature that an air pollution reduction program will
22 continue the State's tradition of environmental leadership by



1 placing Hawaii among the nation's leaders in efforts to effect a
2 climate change policy. By reducing emissions in Hawaii, this
3 framework of action will serve as an example to other states,
4 the federal government, and other countries to protect our
5 fragile global environment. By investigating and pioneering
6 technologies that would best meet the unique needs of our island
7 State in achieving a 2020 statewide framework of action, Hawaii
8 will also position its economy, technology centers, financial
9 institutions, and businesses to benefit from national and
10 international efforts to meet this important policy. Therefore,
11 the legislature has outlined a plan of action of first:

- 12 (1) Declaring a policy, updating an existing statewide
13 inventory of emission; and then
14 (2) Establishing a regulatory scenario based on an
15 analysis of approaches developed through the work plan
16 of a task force.
- 17 (b) Accordingly, the purpose of this Act is to:
- 18 (1) Reduce, by January 1, 2020, greenhouse gas emissions
19 in the State to levels at or below the best
20 estimations and updates of the inventory of greenhouse
21 gas emissions estimates for 1990; and



1 (2) Establish a greenhouse gas emissions reduction task
2 force to prepare a work plan and regulatory scheme for
3 implementing the maximum practically and technically
4 feasible and cost-effective reductions in greenhouse
5 gas emissions from sources or categories of sources of
6 greenhouse gases to achieve the statewide greenhouse
7 gas emissions limits by 2020.

8 SECTION 2. **Declaration of policy.** By January 1, 2020, the
9 State of Hawaii shall reduce statewide greenhouse gas emissions
10 to levels at or below the best estimations and updates of the
11 inventory of greenhouse gas emissions estimates for 1990.

12 SECTION 3. By December 31, 2008, the department of
13 business, economic development, and tourism and the department
14 of health shall complete an updated inventory of emission
15 sources or categories of sources from the past report prepared
16 by the department of business, economic development, and tourism
17 and the department of health, entitled "Inventory of Hawaii
18 Greenhouse Gas Emissions Estimates for 1990", dated July 1997;
19 provided that at least one public hearing shall be held prior to
20 the completion of the updated inventory.

21 SECTION 4. **Greenhouse gas emissions reduction task force.**
22 There is established the greenhouse gas emissions reduction task



1 force within the department of business, economic development,
2 and tourism for administrative purposes only. The task force
3 shall be comprised of the following:

- 4 (1) Two members appointed by the president of the senate
5 from affected business sectors;
- 6 (2) Two members appointed by the speaker of the house of
7 representatives from affected business sectors;
- 8 (3) The deputy director of the department of health's
9 environmental health administration or the deputy
10 director's designee, who shall co-chair the task
11 force;
- 12 (4) The director of business, economic development, and
13 tourism or the director's designee, who shall co-chair
14 the task force;
- 15 (5) Two members from the University of Hawaii at Manoa
16 climate change commission, selected by members of the
17 Commission;
- 18 (6) A member from an environmental organization appointed
19 by the speaker of the house of representatives; and
- 20 (7) A member from an environmental organization appointed
21 by the president of the senate.



1 For the purposes of this section "affected business sector"
2 refers to the following business sectors: electrical utilities,
3 refinery operations, ground transportation industry, or maritime
4 industry.

5 SECTION 5. Objective of the task force. (a) Before
6 December 1, 2009, the greenhouse gas emission reduction task
7 force shall prepare a work plan and regulatory scheme for
8 implementing the maximum practically and technically feasible
9 and cost-effective reductions in greenhouse gas emissions from
10 sources or categories of sources of greenhouse gases to achieve
11 the statewide greenhouse gas emissions limit as adopted in
12 section 2 of this Act. For the purposes of this Act, "cost-
13 effective" is defined as being the cost per unit of reduction.

14 (b) Each member of the task force is encouraged to commit
15 as much time, expertise, and information as is available to the
16 individual member.

17 (c) Confidential information provided to the task force
18 that is exempt from public disclosure under section 92F-13(4),
19 Hawaii Revised Statutes, shall be held in confidence by the task
20 force or aggregated to the extent necessary to ensure
21 confidentiality as required by chapter 92F, Hawaii Revised
22 Statutes.



1 SECTION 6. **Work plan.** The work plan shall include but is
2 not limited to the following objectives:

3 (1) Consultation with all state agencies having
4 jurisdiction over sources of greenhouse gases,
5 including the public utilities commission, on all
6 elements of its plan that pertain to energy-related
7 matters, including but not limited to:

8 (A) Electrical generation;

9 (B) The provision of reliable and affordable
10 electrical service;

11 (C) Petroleum refining; and

12 (D) Statewide fuel supplies,

13 to ensure the greenhouse gas emissions reduction
14 activities to be adopted and implemented are
15 complementary, minimize duplication, and can be
16 implemented in an efficient and cost-effective manner.

17 (2) Identification and recommendations on:

18 (A) Direct emission reduction measures;

19 (B) Alternative compliance mechanisms;

20 (C) Market-based compliance mechanisms; and

21 (D) Potential monetary and non-monetary incentives,



1 for sources and categories of sources that are
2 necessary or desirable to facilitate the achievement
3 of the maximum feasible and cost-effective reductions
4 of greenhouse gas emissions by 2020;

5 (3) Consideration of relevant information pertaining to
6 greenhouse gas emissions reduction programs to
7 ascertain progressive efforts from other locations to
8 postulate control mechanisms most applicable to
9 Hawaii. The task force may consult with other states,
10 the federal government, nongovernmental organizations,
11 and, if applicable, other nations to identify
12 effective strategies and methods to reduce greenhouse
13 gases, manage greenhouse gas control programs, and to
14 facilitate the development of integrated and cost-
15 effective regional, national, and international
16 greenhouse gas emission reduction programs;

17 (4) Investigation and development of analytical tools,
18 economic models, or other scientific methods to
19 evaluate the total potential costs and total potential
20 economic and non-economic benefits of the plan for
21 reducing greenhouse gases to the State's economy,
22 environment, and public health;



- 1 (5) Consideration of the relative contribution of each
2 source or source category to statewide greenhouse gas
3 emissions and the potential for adverse effects on
4 small businesses, and recommendation of a minimum
5 threshold of greenhouse gas emissions below which
6 emission reductions requirements shall not apply;
- 7 (6) Identification of opportunities for emission
8 reductions measures from all verifiable and
9 enforceable voluntary actions, including but not
10 limited to carbon sequestration projects and best
11 management practices;
- 12 (7) Examination and use of market-based compliance
13 mechanisms to achieve emission reductions and:
- 14 (A) Consideration of the potential for direct,
15 indirect, and cumulative emission impacts from
16 these mechanisms, including localized impacts in
17 communities that are already adversely impacted
18 by air pollution;
- 19 (B) Design of any market-based compliance mechanism
20 to prevent any increase in the emissions of toxic
21 air contaminants or criteria air pollutants



- 1 identified by the Environmental Protection
2 Agency; and
- 3 (C) Recommendations to maximize additional
4 environmental and economic benefits for Hawaii,
5 as appropriate;
- 6 (8) Suggested rules governing how market-based compliance
7 mechanisms may be used by regulated entities subject
8 to greenhouse gas emission limits and mandatory
9 emission reporting requirements to achieve compliance
10 with their greenhouse gas emissions limits;
- 11 (9) Suggested regulation to control mobile sources of
12 greenhouse gas emissions to achieve reductions in
13 statewide greenhouse gas emissions;
- 14 (10) Recommendations to minimize "leakage" or a reduction
15 in emissions of greenhouse gases within the State that
16 is offset by an increase in emissions of greenhouse
17 gases outside the State;
- 18 (11) Review and recommendations of a schedule of fees to be
19 paid by the sources of greenhouse gas emissions
20 regulated pursuant to this Act;
- 21 (12) Implementation of a series of public workshops to give
22 interested parties an opportunity to comment on the



1 work plan. The task force shall conduct at least one
2 of these workshops in each county; and

3 (13) Review and revision of the work plan to achieve the
4 maximum technologically feasible and cost-effective
5 reductions of greenhouse gas emissions at least once
6 every five years.

7 SECTION 7. Not less than twenty days prior to the
8 convening of the regular session of 2010 and every fifth regular
9 session following the regular session of 2010, the greenhouse
10 gas emission reduction task force shall submit to the
11 legislature a copy of its work plan and proposed regulatory
12 scheme, along with any proposed legislation, and any five year
13 update to the work plan and proposed regulatory scheme, for
14 achieving the maximum practically and technically feasible and
15 cost-effective reductions in greenhouse gas emissions from
16 sources or categories of sources of greenhouse gases.

17 SECTION 8. Chapter 342B, Hawaii Revised Statutes, is
18 amended by adding a new part to be appropriately designated and
19 to read as follows:

20 "PART . GREENHOUSE GAS EMISSIONS

21 §342B-A Statewide greenhouse gas emissions limit,

22 adoption. A statewide greenhouse gas emissions limit to be



1 achieved by 2020 is hereby established that is equal to or below
2 the level of the statewide greenhouse gas emissions in 1990, as
3 determined by section 3 of Act , Session Laws of Hawaii 2007;
4 provided that for the purposes of this Act greenhouse gas
5 emissions from airplanes shall not be included.

6 §342B-B Greenhouse gas emissions limits; rules. (a)

7 Before December 31, 2011, the director shall adopt rules
8 pursuant to chapter 91, Hawaii Revised Statutes:

9 (1) Establishing greenhouse gas emission limits applicable
10 to sources or categories of sources, to be achieved by
11 January 1, 2020, and establishing emission reduction
12 measures to achieve the maximum practically and
13 technically feasible and cost-effective reductions in
14 greenhouse gas emissions in furtherance of achieving
15 the statewide greenhouse gas emissions limit; and

16 (2) Requiring the reporting and verification of statewide
17 greenhouse gas emissions and to monitor and enforce
18 compliance with this part,

19 to become operative beginning on January 1, 2012.

20 (b) The director, to the extent feasible to achieve the
21 statewide greenhouse gas emissions limit, shall adopt rules
22 pursuant to chapter 91, Hawaii Revised Statutes, and this



1 section based upon the recommendations and findings of the work
2 plan created pursuant to section 6 of Act , Session Laws of
3 Hawaii 2007.

4 (c) Any rule adopted by the director pursuant to this
5 section shall ensure all of the following:

6 (1) The greenhouse gas emission reductions achieved are
7 real, permanent, quantifiable, verifiable, and
8 enforceable by the director; and

9 (2) If applicable, the greenhouse gas emission reduction
10 occurs over the same time period and is equivalent in
11 amount to any direct emission reduction required
12 pursuant to this part.

13 (d) The director shall periodically review and update
14 state emission reporting requirements and endeavor to make the
15 requirements consistent with the requirements of international,
16 federal, and other states' greenhouse gas emission reporting
17 programs, as necessary.

18 (e) After January 1, 2012, the director may revise rules
19 adopted pursuant to this section and adopt additional rules to
20 further this part.

21 **§342B-C Schedule of fees; establishment.** The director may
22 adopt rules pursuant to chapter 91, Hawaii Revised Statutes,



1 that specify a schedule of fees to be paid by the sources of
2 greenhouse gas emissions regulated pursuant to this part. The
3 revenues collected pursuant to this section shall be deposited
4 into the clean air special fund established under section 342B-
5 32, Hawaii Revised Statutes, to be used for the purposes
6 thereof."

7 SECTION 9. There is appropriated out of the general
8 revenues of the State of Hawaii the sum of \$500,000 or so much
9 thereof as may be necessary for fiscal year 2007-2008 and the
10 same sum or so much thereof as may be necessary for fiscal year
11 2008-2009 for carrying out the purposes of this Act, including
12 the hiring of necessary staff.

13 The sums appropriated shall be expended by the department
14 of business, economic development, and tourism for the purposes
15 of this Act.

16 SECTION 10. This Act does not affect rights and duties
17 that matured, penalties that were incurred, and proceedings that
18 were begun, before its effective date.

19 SECTION 11. If any provision of this Act, or the
20 application thereof to any person or circumstance is held
21 invalid, the invalidity does not affect other provisions or
22 applications of the Act, which can be given effect without the



1 invalid provision or application, and to this end the provisions
2 of this Act are severable.

3 SECTION 12. In codifying the new sections added by section
4 8 of this Act, the revisor of statutes shall substitute
5 appropriate section numbers for the letters used in designating
6 the new sections in this Act.

7 SECTION 13. In printing this Act, the revisor of statutes
8 shall substitute in sections 342B-A, 342B-B, and 342B-C, Hawaii
9 Revised Statutes, of section 8, the corresponding act number of
10 this Act.

11 SECTION 14. This Act shall take effect on July 1, 2007.



H.B. NO. 226
S.D. 2
H.D. 2
C.D. 1

Report Title:

Environmental Quality; Greenhouse Gas Emissions

Description:

Establishes as state policy statewide greenhouse gas emissions limits at or below the statewide greenhouse gas emissions levels in 1990 to be achieved by January 1, 2020. Establishes greenhouse gas emissions reduction task force to prepare a work plan and regulatory scheme to achieve the statewide greenhouse gas emissions limits. (HB226 CD1)

