

THE GENERAL ASSEMBLY OF PENNSYLVANIA

SENATE BILL

No. 762 Session of
2007

INTRODUCED BY M. WHITE, MUSTO, D. WHITE, LAVALLE, STOUT, PUNT,
ROBBINS, MADIGAN, KASUNIC, BROWNE, FOLMER, EARLL, SCARNATI,
PIPPY, PICCOLA, ARMSTRONG, REGOLA AND WASHINGTON,
APRIL 12, 2007

REFERRED TO ENVIRONMENTAL RESOURCES AND ENERGY, APRIL 12, 2007

AN ACT

1 Coordinating plans to reduce mercury emissions from new and
2 existing stationary sources in this Commonwealth; imposing
3 duties on and limiting certain powers of the Department of
4 Environmental Protection; and imposing duties on and limiting
5 certain powers of the Environmental Quality Board.

6 The General Assembly of the Commonwealth of Pennsylvania
7 hereby enacts as follows:

8 Section 1. Short title.

9 This act shall be known and may be cited as the Clean Air
10 Mercury Compliance Act.

11 Section 2. Legislative findings.

12 The General Assembly finds as follows:

13 (1) The United States of America is the only nation that
14 has a comprehensive regulatory scheme for controlling mercury
15 emissions from industrial facilities.

16 (2) Emissions from foreign countries such as China and
17 other industrial nations continue to have an adverse impact
18 upon aquatic ecosystems in the United States.

1 (3) Reducing domestic emissions of mercury is in the
2 public interest inasmuch as it will have a beneficial effect
3 on aquatic systems and associated fish and wildlife.

4 (4) The Clean Air Act (69 Stat. 322, 42 U.S.C. § 7401 et
5 seq.) contains a comprehensive regulatory scheme for the
6 control of mercury emissions and other harmful air
7 pollutants.

8 (5) The Clean Air Mercury Rule of the Environmental
9 Protection Agency will achieve by 2018 a reduction in mercury
10 emissions from 1999 emission levels of 70% at electric
11 generating facilities through a two-phase program commencing
12 in 2010 and ultimately reduce the emissions to an annual
13 nationwide level of 15 tons.

14 (6) It is the intent of the General Assembly to ensure
15 that mercury reductions are made in Pennsylvania without
16 substantially impairing competitiveness of businesses and
17 industries in this Commonwealth, producing an adverse impact
18 on employment, coal production, economic development and
19 family income.

20 Section 3. Purposes.

21 The purposes of this act are as follows:

22 (1) To achieve by 2010 and 2015 an 80% and 90%
23 reduction, respectively, in mercury emissions at Pennsylvania
24 electric generating facilities measured from the coal feed or
25 an emission rate of 0.024 lb/GWhr and 0.012 lb/GWhr,
26 respectively, if greater.

27 (2) To provide this Commonwealth with the opportunity to
28 participate in a national emissions trading program for
29 mercury which is similar to the cost-effective national acid
30 rain control program enacted in the Clean Air Act Amendments

1 of 1990 (Public Law 101-549, 42 U.S.C. § 7401 et seq.).

2 Section 4. Definitions.

3 The following words and phrases when used in this act shall
4 have the meanings given to them in this section unless the
5 context clearly indicates otherwise:

6 "Board." The Environmental Quality Board.

7 "Circulating fluidized bed unit." Combustion of fuel in a
8 bed or series of beds, including bubbling bed units and
9 circulating bed units, of limestone aggregate or other sorbent
10 materials in which these materials are forced upward by the flow
11 of combustion air and the gaseous products of combustion.

12 "Clean Air Mercury Rule." The regulations adopted by the
13 United States Environmental Protection Agency known as the Clean
14 Air Mercury Rule codified at 40 CFR Pts. 60 (relating to
15 standards of performance for new stationary sources), 72
16 (relating to permits regulation) and 75 (relating to continuous
17 emission monitoring).

18 "Cobenefit mercury emission control technology." The process
19 whereby mercury is removed from an exhaust gas stream, through
20 implementation of measures to control other pollutants, such as
21 sulfur dioxide, nitrogen oxides or particulate matter.

22 "Cold side electrostatic precipitator." An air pollution
23 control device for particulate matter installed downstream of a
24 boiler air preheater that does all of the following:

25 (1) Charges particles with an electric field and causes
26 them to migrate from the gas to a collection surface.

27 (2) Treats the flue gas after heat extraction from the
28 gas has been completed.

29 (3) Operates with a temperature range of no greater than
30 400 degrees Fahrenheit.

1 "Covered major mercury source." A stationary coal-fired
2 boiler or a stationary coal-fired combustion turbine that is an
3 "Hg Budget unit" as defined in 40 CFR 60.4104 (relating to
4 applicability). For purposes of this definition, "coal-fired"
5 has the same definition as 40 CFR 60.4102 (relating to
6 definitions).

7 "Department." The Department of Environmental Protection of
8 the Commonwealth.

9 "Fabric filtration." An air pollution control device that
10 removes particulate matter and emissions of nonvaporous metals
11 by passing flue gas through filter bags.

12 "Selective catalytic reduction." A process where a gaseous
13 or liquid reductant, most commonly ammonia or urea, is added to
14 the flue gas stream in the presence of a catalyst.

15 "Wet flue gas desulfurization unit." An air pollution
16 control device located downstream of a steam generating unit
17 that removes sulfur oxides from the combustion gases of the
18 steam generating unit by contacting the combustion gases of the
19 steam generating unit with combustion gases with an alkaline
20 slurry or solution, such as solutions of lime, limestone or
21 sodium, and forming a liquid material, which liquid material may
22 subsequently be converted to other forms.

23 Section 5. Implementation.

24 (a) Clean Air Mercury Rule.--The provisions of 40 CFR Pt.
25 60, Subpt. HHHH (relating to emission guidelines and compliance
26 times for coal-fired electric steam generating units) as
27 published in the May 18, 2005, Federal Register are hereby
28 incorporated by reference into the permitting program referred
29 to in the act of January 8, 1960 (1959 P.L.2119, No.787), known
30 as the Air Pollution Control Act, and into other appropriate

1 programs as the Commonwealth's mercury control program required
2 by the Clean Air Mercury Rule and the department shall, by
3 January 1, 2008, issue emission allowances to affected sources
4 consistent with the EPA's model allocation method.

5 (b) Limitation on regulations and programs.--The board shall
6 adopt by regulation the Clean Air Mercury Rule to be the sole
7 method of regulating mercury emissions from covered major
8 mercury sources, and notwithstanding any other provision of law
9 to the contrary, the board shall not have the power to
10 promulgate regulations and the department may not implement or
11 enforce programs relating to the control of mercury emissions
12 from covered major sources that are more stringent than the
13 Clean Air Mercury Rule, except as specifically provided in
14 subsection (c).

15 (c) Implementation of controls.--

16 (1) By November 1, 2007, the board shall adopt
17 regulations providing for the installation and operation by
18 January 1, 2010, and January 1, 2015, of mercury emission
19 control technologies at all facilities having one or more
20 covered major mercury sources that, except as provided in
21 paragraph (2), will achieve an 80% and 90% reduction,
22 respectively, in mercury emissions measured from the coal
23 feed or 0.024 lb/GWhr and 0.012 lb/GWhr, respectively, if
24 greater.

25 (2) The regulations shall provide alternative standards
26 and limits for facilities where meeting the standards in
27 paragraph (1) are not technologically or economically
28 feasible.

29 (3) The regulations shall provide that the department
30 shall make a determination of technologies for specified coal

1 and boiler types that can be presumed to result in the
2 emission reductions stated herein. Such technologies include,
3 but are not limited to, the following for certain coals:

4 (i) Fabric filtration technology.

5 (ii) Selective catalytic reduction in conjunction
6 with fabric filtration technology.

7 (iii) Wet flue gas desulfurization unit in
8 conjunction with either cold side electrostatic
9 precipitator unit or fabric filtration.

10 (iv) Selective catalytic reduction in conjunction
11 with cold side electrostatic precipitator unit.

12 (v) Fabric filtration in conjunction with wet flue
13 gas desulfurization unit.

14 (vi) Mercury sorbent injection in conjunction with
15 either cold side electrostatic precipitator unit or
16 fabric filtration.

17 (vii) Circulating fluidized bed unit.

18 (d) Interim review.--In 2012, the department shall review
19 the state of mercury reduction technologies and shall adjust the
20 2015 requirements stated in subsection (c)(1) or extend the date
21 of compliance to 2018 if those requirements are found to exceed
22 the capability of the technology.

23 Section 6. Coordination with Clean Air Mercury Rule.

24 In the event that the Clean Air Mercury Rule is remanded by
25 the D.C. Circuit Court to the Environmental Protection Agency
26 for development of standards under section 112 of the Clean Air
27 Act (69 Stat. 322, 42 U.S.C. § 7401 et seq.), then all of the
28 following shall apply:

29 (1) The board shall not have the power to promulgate
30 regulations, and the department shall not have the power to

1 implement or enforce programs relating to the control of
2 mercury emissions from covered major mercury sources unless
3 and until the Environmental Protection Agency has adopted
4 final regulations addressing the court's final decree that do
5 either of the following:

6 (i) Establish standards or other requirements
7 governing the control of mercury emissions from major
8 covered mercury sources.

9 (ii) Establish requirements for State implementation
10 plans to contain controls on mercury emissions from major
11 covered mercury sources.

12 (2) Following adoption by the Environmental Protection
13 Agency of final regulations addressing the court's final
14 decree, the board shall promptly promulgate regulations and
15 the department shall implement or enforce programs relating
16 to the control of mercury emissions from covered major
17 mercury sources that are consistent with the final
18 Environmental Protection Agency regulations and section 6.6
19 of the act of January 8, 1960 (1959 P.L.2119, No.787), known
20 as the Air Pollution Control Act. The regulations and
21 programs shall not be more stringent than the final
22 Environmental Protection Agency regulations unless the
23 General Assembly subsequently authorizes otherwise.

24 Section 7. Abrogation.

25 All rules and regulations and parts thereof are abrogated to
26 the extent that they are inconsistent with this act.

27 Section 8. Repeal.

28 All acts and parts of acts are repealed insofar as they are
29 inconsistent with this act.

30 Section 9. Effective date.

1 This act shall take effect immediately.