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Title 40

PART 401 - GENERAL PROVISIONS

Authority: 33 U.S.C. 1251 *et seq.*

Source: 39 FR 4532, Feb. 1, 1974, unless otherwise noted.

§ 401.10 Scope and purpose.

Regulations promulgated or proposed under parts 402 through 699 of this subchapter prescribe effluent limitations guidelines for existing sources, standards of performance for new sources and pretreatment standards for new and existing sources pursuant to sections 301, 304 (b) and (c), 306 (b) and (c), 307 (b) and (c) and 316(b) of the Federal Water Pollution Control Act, as amended (the "Act"), 33 U.S.C. 1251, 1311, 1314 (b) and (c), 1316 (b) and (c), 1317 (b) and (c) and 1326(b); 86 Stat. 816; Pub. L. 92-500. Point sources of discharges of pollutants are required to comply with these regulations, where applicable, and permits issued by States or the Environmental Protection Agency (EPA) under the National Pollutant Discharge Elimination System (NPDES) established pursuant to section 402 of the Act must be conditioned upon compliance with applicable requirements of sections 301 and 306 (as well as certain other requirements). This part 401 sets forth the legal authority and general definitions which will apply to all regulations issued concerning specific classes and categories of point sources under parts 402 through 699 of this subchapter which follow. In certain instances the regulations applicable to a particular point source category or subcategory will contain more specialized definitions. Except as provided in § 401.17, in the case of any conflict between regulations issued under this part 401 and regulations issued under parts 402 through 499 of this subchapter, the latter more specific regulations shall apply.

(Secs. 301, 304, 306 and 501 of the Clean Water Act (the Federal Water Pollution Control Act Amendments of 1972, 33 U.S.C. 1251 *et seq.*, as amended by the Clean Water Act of 1977, Pub. L. 95-217))

[39 FR 4532, Feb. 1, 1974, as amended at 47 FR 24537, June 4, 1982]

§ 401.11 General definitions.

For the purposes of parts 402 through 699 of this subchapter:

- (a) The term *Act* means the Federal Water Pollution Control Act, as amended, 33 U.S.C. 1251 *et seq.*, 86 Stat. 816, Pub. L. 92-500.
- (b) The term *Administrator* means the Administrator of the United States Environmental Protection Agency.
- (c) The term *Environmental Protection Agency* means the United States Environmental Protection Agency.

- (d) The term *point source* means any discernible, confined and discrete conveyance, including but not limited to any pipe, ditch, channel, tunnel, conduit, well, discrete fissure, container, rolling stock, concentrated animal feeding operation, or vessel or other floating craft, from which pollutants are or may be discharged.
- (e) The term *new source* means any building, structure, facility or installation from which there is or may be the discharge of pollutants, the construction of which is commenced after the publication of proposed regulations prescribing a standard of performance under section 306 of the Act which will be applicable to such source if such standard is thereafter promulgated in accordance with section 306 of the Act.
- (f) The term *pollutant* means dredged spoil, solid waste, incinerator residue, sewage, garbage, sewage sludge, munitions, chemical wastes, biological materials, radioactive materials, heat, wrecked or discarded equipment, rock, sand, cellar dirt and industrial, municipal and agricultural waste discharged into water. It does not mean
 - (1) sewage from vessels or
 - (2) water, gas or other material which is injected into a well to facilitate production of oil or gas, or water derived in association with oil or gas production and disposed of in a well, if the well, used either to facilitate production or for disposal purposes, is approved by authority of the State in which the well is located, and if such State determines that such injection or disposal will not result in degradation of ground or surface water resources.
- (g) The term *pollution* means the man-made or man induced alteration of the chemical, physical, biological and radiological integrity of water.
- (h) The term *discharge of pollutant(s)* means:
 - (1) The addition of any pollutant to navigable waters from any point source and
 - (2) any addition of any pollutant to the waters of the contiguous zone or the ocean from any point source, other than from a vessel or other floating craft. The term "discharge" includes either the discharge of a single pollutant or the discharge of multiple pollutants.
- (i) The term *effluent limitation* means any restriction established by the Administrator on quantities, rates, and concentrations of chemical, physical, biological and other constituents which are discharged from point sources, other than new sources, into navigable waters, the waters of the contiguous zone or the ocean.
- (j) The term *effluent limitations guidelines* means any effluent limitations guidelines issued by the Administrator pursuant to section 304(b) of the Act.
- (k) The term *standard of performance* means any restriction established by the Administrator pursuant to section 306 of the Act on quantities, rates, and concentrations of chemical, physical, biological, and other constituents which are or may be discharged from new sources into navigable waters, the waters of the contiguous zone or the ocean.
- (l) **Navigable waters** means "waters of the United States, including the territorial seas," as defined in § 120.2 of this chapter.
- (m) The terms *state water pollution control agency, interstate agency, State, municipality, person, territorial seas, contiguous zone, biological monitoring, schedule of compliance, and industrial user* shall be defined in accordance with section 502 of the Act unless the context otherwise requires.
- (n) The term *noncontract cooling water* means water used for cooling which does not come into direct contact with any raw material, intermediate product, waste product or finished product.
- (o) The term *noncontact cooling water pollutants* means pollutants present in noncontact cooling waters.
- (p) The term *blowdown* means the minimum discharge of recirculating water for the purpose of discharging materials contained in the water, the further buildup of which would cause concentration in amounts exceeding limits established by best engineering practice.
- (q) The term *process waste water* means any water which, during manufacturing or processing, comes into direct contact with or results from the production or use of any raw material, intermediate product, finished product, by-product, or waste product.
- (r) The term *process waste water pollutants* means pollutants present in process waste water.
- (s) The following abbreviations shall have the following meanings:
 - (1) **BOD5** means five-day biochemical oxygen demand;
 - (2) **COD** means chemical oxygen demand;
 - (3) **TOC** means total organic carbon;

- (4) **TDS** means total dissolved solids;
- (5) **TSS** means total suspended non-filterable solids;
- (6) **kw** means kilowatt(s);
- (7) **kwh** means kilowatt hour(s);
- (8) **Mw** means megawatt(s);
- (9) **Mwh** means megawatt hour(s);
- (10) **hp** means horsepower;
- (11) **mm** means millimeter(s);
- (12) **cm** means centimeter;
- (13) **m** means meter(s);
- (14) **in.** means inch;
- (15) **ft** means foot (feet);
- (16) **l** means liter(s);
- (17) **cu m** means cubic meter(s);
- (18) **k cu m** means 1000 cubic meter(s);
- (19) **gal** means gallon(s);
- (20) **cu ft** means cubic foot (feet);
- (21) **mg** means milligram(s);
- (22) **g** means gram(s);
- (23) **kg** means kilogram(s);
- (24) **kkg** means 1000 kilogram(s);
- (25) **lb** means pound(s);
- (26) **sq m** means square meter(s);
- (27) **ha** means hectare(s);
- (28) **sq ft** means square foot (feet); and
- (29) **ac** means acre(s).

[39 FR 4532, Feb. 1, 1974, as amended at 58 FR 45038, Aug. 25, 1994; 80 FR 37125, June 29, 2015; 83 FR 5209, Feb. 6, 2018; 84 FR 56671, Oct. 22, 2019; 85 FR 22342, Apr. 21, 2020]

§ 401.12 Law authorizing establishment of effluent limitations guidelines for existing sources, standards of performance for new sources and pretreatment standards of new and existing sources.

- (a) Section 301(a) of the Act provides that “except as in compliance with this section and sections 302, 306, 307, 318, 402 and 404 of this Act, the discharge of any pollutant by any person shall be unlawful.”
- (b) Section 301(b) of the Act requires the achievement by not later than July 1, 1977, of effluent limitations for point sources, other than publicly owned treatment works, which require the application of the best practicable control technology currently available as determined by the Administrator pursuant to section 304(b)(1) of the Act. Section 301(b) also requires the achievement by not later than July 1, 1983, of effluent limitations for point sources, other than publicly owned treatment works, which require the application of the best available technology economically achievable which will result in reasonable further progress toward the national goal of eliminating the discharge of all pollutants, as determined in accordance with regulations issued by the Administrator pursuant to section 304(b)(2) of the Act.
- (c) Section 304(b) of the Act requires the Administrator to publish regulations providing guidelines for effluent limitations setting forth the degree of effluent reduction attainable through the application of the best practicable control technology currently available and the degree of effluent reduction attainable through the application of the best control measures

and practices achievable including treatment techniques, process and procedure innovations, operating methods and other alternatives.

- (d) Section 304(c) of the Act requires the Administrator, after consultation with appropriate Federal and State agencies and other interested persons to issue information on the process, procedures, or operating methods which result in the elimination or reduction of the discharge of pollutants to implement standards of performance under section 306 of the Act.
- (e) Section 306(b)(1)(B) of the Act requires the Administrator, after a category of sources is included in a list published pursuant to section 306(b)(1)(A) of the Act, to propose regulations establishing Federal standards of performances for new sources within such category. Standards of performance are to provide for the control of the discharge of pollutants which reflect the greatest degree of effluent reduction which the Administrator determines to be achievable through application of the best available demonstrated control technology, processes, operating methods, or other alternatives, including, where practicable, a standard permitting no discharge of pollutants.
- (f) Section 307(b) provides that the Administrator shall establish pretreatment standards which shall prevent the discharge of any pollutant into publicly owned treatment works which pollutant interferes with, passes through untreated, or otherwise is incompatible with such works.
- (g) Section 307(c) of the Act provides that the Administrator shall promulgate pretreatment standards for sources which would be "new sources" under section 306 (if they were to discharge pollutants directly to navigable waters) at the same time standards of performance for the equivalent category of new sources are promulgated.
- (h) Section 316(b) of the Act provides that any standard established pursuant to section 301 or section 306 of the Act and applicable to a point source shall require that the location, design, construction, and capacity of cooling water intake structures reflect the best technology available for minimizing adverse environmental impact.
- (i) Section 402(a)(1) of the Act provides that the Administrator may issue permits for the discharge of any pollutant upon condition that such discharge will meet all applicable requirements under sections 301, 302, 306, 307, 308 and 403 of this Act. In addition, section 402(b)(1)(A) of the Act requires that permits issued by States under the National Pollutant Discharge Elimination System (NPDES) established by the Act must apply, and insure compliance with any applicable requirements of sections 301, 302, 306, 307 and 403 of the Act.

§ 401.13 Test procedures for measurement.

The test procedures for measurement which are prescribed at part 136 of this chapter shall apply to expressions of pollutant amounts, characteristics or properties in effluent limitations guidelines and standards of performance and pretreatment standards as set forth at parts 402 through 699 of this subchapter, unless otherwise specifically noted or defined in said parts.

§ 401.14 Cooling water intake structures.

The location, design, construction and capacity of cooling water intake structures of any point source for which a standard is established pursuant to section 301 or 306 of the Act shall reflect the best technology available for minimizing adverse environmental impact, in accordance with the provisions of part 402 of this chapter.

(Sec. 501(a) of the Federal Water Pollution Control Act, as amended; 33 U.S.C. 1326(b) and 1261(a))

[41 FR 17389, Apr. 26, 1976]

§ 401.15 Toxic pollutants.

The following comprise the list of toxic pollutants designated pursuant to section 307(a)(1) of the Act:

1. Acenaphthene
2. Acrolein
3. Acrylonitrile
4. Aldrin/Dieldrin^[1]
5. Antimony and compounds^[2]

6. Arsenic and compounds
7. Asbestos
8. Benzene
9. Benzidine¹
10. Beryllium and compounds
11. Cadmium and compounds
12. Carbon tetrachloride
13. Chlordane (technical mixture and metabolites)
14. Chlorinated benzenes (other than di-chlorobenzenes)
15. Chlorinated ethanes (including 1,2-di-chloroethane, 1,1,1-trichloroethane, and hexachloroethane)
16. Chloroalkyl ethers (chloroethyl and mixed ethers)
17. Chlorinated naphthalene
18. Chlorinated phenols (other than those listed elsewhere; includes trichlorophenols and chlorinated cresols)
19. Chloroform
20. 2-chlorophenol
21. Chromium and compounds
22. Copper and compounds
23. Cyanides
24. DDT and metabolites¹
25. Dichlorobenzenes (1,2-, 1,3-, and 1,4-di-chlorobenzenes)
26. Dichlorobenzidine
27. Dichloroethylenes (1,1-, and 1,2-dichloroethylene)
28. 2,4-dichlorophenol
29. Dichloropropane and dichloropropene
30. 2,4-dimethylphenol
31. Dinitrotoluene
32. Diphenylhydrazine
33. Endosulfan and metabolites
34. Endrin and metabolites¹
35. Ethylbenzene

36. Fluoranthene
37. Haloethers (other than those listed elsewhere; includes chlorophenylphenyl ethers, bromophenylphenyl ether, bis(dichloroisopropyl) ether, bis-(chloroethoxy) methane and polychlorinated diphenyl ethers)
38. Halomethanes (other than those listed elsewhere; includes methylene chloride, methylchloride, methylbromide, bromoform, dichlorobromomethane)
39. Heptachlor and metabolites
40. Hexachlorobutadiene
41. Hexachlorocyclohexane
42. Hexachlorocyclopentadiene
43. Isophorone
44. Lead and compounds
45. Mercury and compounds
46. Naphthalene
47. Nickel and compounds
48. Nitrobenzene
49. Nitrophenols (including 2,4-dinitrophenol, dinitrocresol)
50. Nitrosamines
51. Pentachlorophenol
52. Phenol
53. Phthalate esters
54. Polychlorinated biphenyls (PCBs)¹
55. Polynuclear aromatic hydrocarbons (including benzantracenes, benzopyrenes, benzofluoranthene, chrysenes, dibenz-anthracenes, and indenopyrenes)
56. Selenium and compounds
57. Silver and compounds
58. 2,3,7,8-tetrachlorodibenzo-p-dioxin (TCDD)
59. Tetrachloroethylene
60. Thallium and compounds
61. Toluene
62. Toxaphene¹
63. Trichloroethylene

64. Vinyl chloride

65. Zinc and compounds

^[1] Effluent standard promulgated (40 CFR part 129).

^[2] The term *compounds* shall include organic and inorganic compounds.

[44 FR 44502, July 30, 1979, as amended at 46 FR 2266, Jan. 8, 1981; 46 FR 10724, Feb. 4, 1981]

§ 401.16 Conventional pollutants.

The following comprise the list of conventional pollutants designated pursuant to section 304(a)(4) of the Act:

1. Biochemical oxygen demand (BOD)
2. Total suspended solids (nonfilterable) (TSS)
3. pH
4. Fecal coliform
5. Oil and grease

[44 FR 44503, July 30, 1979; 44 FR 52685, Sept. 10, 1979]

§ 401.17 pH Effluent limitations under continuous monitoring.

- (a) Where a permittee continuously measures the pH of wastewater pursuant to a requirement or option in a National Pollutant Discharge Elimination System (NPDES) permit issued pursuant to section 402 of the Act, the permittee shall maintain the pH of such wastewater within the range set forth in the applicable effluent limitations guidelines, except excursions from the range are permitted subject to the following limitations:
 - (1) The total time during which the pH values are outside the required range of pH values shall not exceed 7 hours and 26 minutes in any calendar month; and
 - (2) No individual excursion from the range of pH values shall exceed 60 minutes.
- (b) The Director, as defined in § 122.3 of this chapter, may adjust the requirements set forth in paragraph (a) of this section with respect to the length of individual excursions from the range of pH values, if a different period of time is appropriate based upon the treatment system, plant configuration or other technical factors.
- (c) For purposes of this section, an *excursion* is an unintentional and temporary incident in which the pH value of discharge wastewater exceeds the range set forth in the applicable effluent limitations guidelines.

(Secs. 301, 304, 306 and 501 of the Clean Water Act (the Federal Water Pollution Control Act Amendments of 1972, 33 U.S.C. 1251 et. seq., as amended by the Clean Water Act of 1977, Pub. L. 95-217))

[47 FR 24537, June 4, 1982]