AFS Data Elements Included in the ECHO Data Download

The Enforcement and Compliance History Online (ECHO) system incorporates data from the Air Facility System (AFS). Note: the AFS Data Element Dictionary (http://www.epa.gov/compliance/resources/publications/data/systems/air/af1.pdf) includes more information about the data elements in AFS.

1.1 AFS Description

AFS contains emissions, compliance, and enforcement data on stationary sources of air pollution. Regulated sources cover a wide spectrum; from large industrial facilities to relatively small operations such as dry cleaners (automobiles and other mobile air pollution sources are tracked by a different EPA system). ECHO's AFS file currently does not contain any data on facilities that are solely asbestos demolition and/or renovation contractors, or landfills.

While AFS maintains data at several levels of detail on an air source, ECHO focuses on the data at the plant level. Plant-level data treats the entire facility as one unit rather than looking at individual emission points, processes, or stacks. Data reported at the plant level include:

- General source Information—identification number, name.
- High Priority Violator Information.
- Air Program Information—a repeating block of data addressing each regulatory area that a facility is subject to (e.g., SIP, NSPS, NESHAP, PSD).

AFS records included in the download files are those where the operating status is planned (has applied for a construction permit), under construction, operating, temporarily closed, seasonal, or permanently closed.

Each Air program offers data on the following:

- Historical Compliance Status (quarterly FY2007 to present)
- Action/Activity Data (inspections, enforcement actions, etc.—1978 to present)
- Operating Status

The action/activity data provided in the download has been "rolled up" to the plant level, to eliminate multi-counting actions which may have been entered at multiple air programs. For example, an inspection addressing SIP, NSPS, and NSR requirements, and entered into each of the three air program records, will only display once (the data element ALL_AIR_PROGRAM_CODES would indicate that three air programs were addressed by the action).

Only a subset of data elements from AFS is incorporated into ECHO. This document contains the AFS Data Element table as well as definitions those data elements in ECHO download query.

Air Program Code Definitions

State Implementation Plan (SIP) Section 110 of the Clean Air Act requires each state to adopt and submit to EPA for approval a SIP that provides for the maintenance, implementation and enforcement of the National Ambient Air Quality Standards (NAAQS). Each SIP must include a permit program to regulate the modification and construction of any stationary source of air pollution, including stationary sources in attainment and non-attainment areas of the state, as necessary to assure that NAAQS are achieved. SIP requirements are federally enforceable under Section 113 of the Act. Reference 40 CFR Part

52. The SIP air program is considered applicable to each Federally Reportable stationary source in AFS. Additional reporting requirements for SIP are promulgated as standards for various industrial categories. These standards are reported as subparts to the SIP, and are identified using the same subpart identification as the New Source Performance Standards (NSPS). Reporting of SIP subparts are optional.

SIP Source Under Federal Jurisdiction (FIP) Under current law, a federally implemented plan to achieve attainment of air quality standards is used when a state is unable to develop an adequate plan, or if jurisdiction does not exist. Sources located on Indian Land should reflect the Native American air program code.

Non-Federally Reportable Used to report State/Local/Tribal requirements not defined as federally reportable [reference Section 1, Minimum Data Requirements (MDRs)].

Chlorofluorocarbons (CFC) Tracking Under Title VI of the Clean Air Act, EPA is responsible for several programs that protect the stratospheric ozone layer. These programs include: Motor Vehicle Air Conditioning; Stationary Refrigeration and Air Conditioning, Halon Blends and Handling; Phase-out of Ozone Depleting Substances; Methyl Bromide; Nonessential Products Ban; Product Labeling, and Federal Procurement. Reference 40 CFR Part 82. This program is not delegated to State, Local, or Tribal agencies.

Prevention of Significant Deterioration (PSD) Part C of the Clean Air Act sets requirements for the prevention of significant deterioration (PSD) of air quality in those areas designated as either attainment or unclassifiable for purpose of meeting the National Ambient Air Quality (NAAQS) standards. These requirements are designed to protect public health and welfare, to assure that economic growth will occur in a manner consistent with the preservation of existing clean air resources and to assure that any decision to permit increased air pollution is made only after careful evaluation of all the consequences of such a decision and after public participation in the decision making process. PSD prohibits the construction and operation of a major emitting facility in an area designed as attainment or unclassifiable unless a permit has been issued that compiles with Section 165 of the Act, including the requirement that the facility install the best available control technology for each pollutant subject to regulation.

New Source Review (NSR) New Source Review is a preconstruction permitting program that serves two important purposes: (1.) it ensures the maintenance of air quality standards when factories, industrial boilers and power plants are modified or added. In areas with unhealthy air, NSR assures that new emissions do not slow progress toward cleaner air. In areas with clean air, especially pristine areas like national parks, NSR assures that new emissions fall within air quality standards. Emission calculations are completed using potential emissions. (2.) The NSR program assures that state of the art control technology is installed at new plants or at existing plants that are undergoing a major modification.

In August 2003, EPA issued a final rule that creates a category of activities that automatically will be considered routine maintenance, repair and replacement (RMRR) under the NSR permitting program. The rule defines a process unit, delineates the boundary of a process unit, defines a "functionally equivalent" component, and defines basic design parameters for electric utility steam generating units and other types of process units.

National Emission Standards For Hazardous Air Pollutants (NESHAP Part 61) Section 112 of the Clean Air Act identifies substances that have been designated as hazardous air pollutants (HAPs), known for serious health effects, including cancer, from ambient air exposure. HAPs include: Asbestos, benzene, beryllium, coke oven emissions, inorganic arsenic, mercury, radio nuclides and vinyl chloride. Reference 40 CFR Part 61. Additional reporting requirements for NESHAP are promulgated as standards for various

industrial categories. These standards are identified as subparts to the NESHAP, and can be reported to AFS in the 302/502 (Air Program) screen. Subpart reporting is not mandatory.

Acid Precipitation The Acid Rain Program requires major reductions of sulfur dioxide and nitrogen oxide emissions (key components of acid rain) from electric utilities, while establishing a new approach to environmental protection through the use of market incentives, a "cap and trade" process. Affected sources are required to install systems that continuously monitor emissions in order to track progress, ensure compliance, and provide credibility to the trading component of the program. Regulated sources must report all emissions as measured by continuous emissions monitors. EPA has established standard reporting procedures and has issued standard software for such reporting.

Federally Enforceable State Operating Permit Program (FESOP) This program (usually through SIP revision) provides a mechanism for states to establish federally enforceable State operating permits limiting the potential to emit for sources to remain below the applicability threshold for the operating permits program of Title V of the Clean Air Act (CAA). This program is available to allow States to issue FESOPs to small sources and exempt them from the Title V review, as the large number of small sources could be a resource burden on both the agency and the small sources. FESOP provides the mechanism to establish federally enforceable limits on sources' potential to emit below the Title V threshold. This air program is used for reporting sources classified as Synthetic Minor (SM).

Native American This program is used to identify sources located on Indian Lands. Sources do not have to be operated by tribal entities, but are subject to Tribal authority. In the absence of a Tribal Authorization Rule (TAR) or Implementation Plan (TIP), this air program will be used to identify any source subject to Tribal rule. All other applicable air programs need to be identified.

Maximum Achievable Control Technology (MACT) Part 63 The EPA is directed to use technology-based and performance-based standards to significantly reduce routine emissions of hazardous air pollutants of facilities within an industry group or source category. The NESHAP standards implemented in 1990 regulate specific categories of stationary sources. The standards of this part are independent of NESHAP. A MACT standard is based on emission levels that are already being achieved by the lower-emitting sources of an industrial sector. Eight years after a MACT standard is issued, EPA must assess the remaining health risks in the categories and may implement additional standards to care for any remaining risk. Reference 40CFR Part 63.

Title V Operating Permits Reference 40 CFR Part 70. The Final Rule (July 31, 1992) established an operating permit program for States to develop programs for issuing operating permits to all major stationary sources and to certain other sources. Title V does not impose new requirements, it does provide a permit to operate that assures compliance with all applicable requirements. It allows the delegated agency the authority to collect permitting fees. All permits are required to contain standard permit requirements that specify and reference the origin of authority for each applicable term or condition, the duration of the permit (not to exceed 5 years), the monitoring and related recordkeeping and reporting requirements, emissions trading allowed, Federally-enforceable and compliance requirements. Any operating source with Title V permit application pending should have the "V" air program code with the operating status of "P" for pending entered in AFS. Once the permit has been issued, the operating status should be upgraded to "O" for operating.

1.2 AFS Datasets

| Element Name | Data Type | Length |
|--|------------------------------------|---------------|
| | ntifying Data (AFS_FACILITIES.csv) | Ü |
| PLANT_ID | Num | 22 |
| AFS_ID | Char | 10 |
| PLANT_NAME | Char | 45 |
| EPA_REGION | Char | 2 |
| PLANT_STREET_ADDRESS | Char | 35 |
| PLANT_CITY | Char | 30 |
| PLANT_COUNTY | Char | 3 |
| STATE | Char | 2 |
| STATE NUMBER | Char | 2 |
| ZIP_CODE | Char | 9 |
| PRIMARY_SIC_CODE | Char | 4 |
| SECONDARY_SIC_CODE | Char | 4 |
| NAICS_CODE | Char | 6 |
| AFS_GOV_FACILITY_CODE | Char | 1 |
| FEDERALLY_REPORTABLE | Char | 1 |
| EPA CLASSIFICATION CODE | Char | 2 |
| OPERATING_STATUS | Char | <u>2</u> 1 |
| | Char | <u>1</u> |
| EPA_COMPLIANCE_STATUS CURRENT_HPV | Char | 1 1 |
| | | |
| LOCAL_CONTROL_REGION STATE_COMPLIANCE_STATUS | Char | <u>2</u> 1 |
| | Char | <u> </u> |
| 0 | (AIR_PROGRAM.csv) | 22 |
| PLANT_ID | Num | 22 |
| AFS_ID | Char | 10 |
| AIR_PROGRAM_CODE | Char | 1 |
| AIR_PROGRAM_STATUS | Char | 11 |
| EPA_CLASSIFICATION_CODE | Char | 2 |
| EPA_COMPLIANCE_STATUS | Char | 1 |
| AIR_PROGRAM_CODE_SUBPARTS | Char | 71 |
| POLLUTANT_CODE | Char | 5 |
| CHEMICAL_ABSTRACT_SERVICE_NMBR | Char | 9 |
| POLLUTANT_CLASSIFICATION | Char | 2 |
| POLLUTANT_COMPLIANCE_STATUS | Char | 1 |
| | AFS_ACTIONS.csv) | |
| PLANT_ID | Num | 22 |
| AFS_ID | Char | 10 |
| ANU1 | Num | 22 |
| NATIONAL_ACTION_TYPE | Char | 2 |
| NATIONAL_ACTION_DESC | Char | 50 |
| DATE_ACHIEVED | Char | 6 |
| ALL_AIR_PROGRAM_CODES | Char | 4000 |
| PENALTY_AMOUNT | Char | 9 |
| RESULT_CODE | Char | 2 |
| POLLUTANT_CODE | Char | 5 |
| ALL_VIOLATING_POLL_CODES | Char | 17 |
| ALL_VIOLATION_TYPE_CODES | Char | 27 |
| KEY_ACTION_NUMBERS | Char | 59 |
| REGIONAL_DATA_ELEMENT_8 | Char | 2 |
| DATE_RECORD_IS_UPDATED | Char | 6 |
| CREATION_DATE | Char | 8 |
| | evel (AFS_AIR_PRG_HIST_COMPLIANC | |
| AFS_ID | Char | 10 |
| AIR_PROGRAM_CODE | Char | 1 |
| HISTORICAL_COMPLIANCE_DATE | Char | 4 |
| HISTORICAL COMPLIANCE STATUS | Char | 1 |
| Historical High Priority Viola | | |
| AFS_ID | Char | 10 |
| HPV_DAYZERO_TYPE | Char | 2 |
| HPV_DAYZERO_DESC | Char | 50 |
| HPV_DAYZERO_DESC HPV_DAYZERO_DATE | Date | 50 |
| HPV_DAYZERO_DATE HPV_RESOLVED_TYPE | Char | 2 |
| | | |
| HPV_RESOLVED_DESC HPV_RESOLVED_DATE | Char | 50 |
| FEV KENULVED DATE | Date | |

1.3 AFS Data Element Definitions

The following is a list of AFS data elements and AFS-derived elements contained in the download. The data elements are listed alphabetically by data element name.

AFS_GOV_FACILITY_CODE - A one-character code indicating if plant is government facility.

| Code | Description |
|------|---------------------------|
| 0 | PRIVATELY OWNED/OPERATED |
| 1 | OWNED/OPERATED BY FED GOV |
| 2 | OWNED/OPERATED BY ST GOV |
| 3 | OWNED/OPERATED BY COUNTY |
| 4 | OWNED/OP BY MUNICIPALITY |
| 5 | OWNED/OP BY DISTRICT |
| 6 | OWNED/OPERATED BY TRIBE |

AFS_ID - A 10-character alphanumeric code which uniquely identifies each permitted plant. The AFSID is composed of the Census FIPS state code, the FIPS county code and the unique AFS plant ID. Also known as SCSC in AFS.

AIR_PROGRAM_CODE - A one-character code used to identify 1) the regulatory air program(s) that applies to a particular plant or point, and 2) the regulatory air program(s) authorizing and associated with an action taken by a local, state or federal regulatory agency. Code values include:

| Code | Description |
|------|---------------------------------------|
| A | Acid Precipitation |
| F | FESOP - (NON-TITLE V) |
| I | Native American |
| M | MACT (Section 63 NESHAPS) |
| Т | TIP (TRIBAL IMPLEMENTATION PLAN) |
| V | Title V Permits |
| 0 | SIP Source |
| 1 | SIP Source under federal jurisdiction |
| 3 | Non-Federally Reportable Source |
| 4 | CFC Tracking |
| 6 | PSD |
| 7 | NSR |
| 8 | NESHAP |
| 9 | NSPS |

AIR_PROGRAM_CODE - A one-character code representing the operational condition of the associated air program (AIR_PROGRAM_CODE). Air Program Status values include:

| Code | Description |
|------|--------------------|
| С | Under Construction |
| D | NESHAP Demolition |
| I | Seasonal |

| L | Landfill |
|---|---|
| О | Operating |
| P | Planned (Has Applied For A Construction Permit) |
| R | NESHAP Renovation |
| S | NESHAP Spraying |
| Т | Temporarily Closed |
| X | Permanently Closed |

AIR_PROGRAM_CODE_SUBPARTS - A field indicating applicable air program subparts. Multiple subpart codes are delimited by a single blank space within AIR_PROGRAM_CODE_SUBPARTS. Subpart code values are:

| Code | Description |
|------|--|
| AA | ELEC-ARC STEEL FURNACE 10/21/74-8/17/83 |
| AAA | EL-ARC FRN, ARGON-02 DECARB VESSL 8/7/83 |
| В | RADON FROM UNDERGROUND URANIUM MINES |
| BB | BENZENE EMISS FROM BENZENE TRANSFR OPER |
| BB | KRAFT PULP MILLS |
| BBB | RUBBER TIRE MANUFACTURE |
| С | BERYLLIUM |
| CC | GLASS MANUFACTURING PLANT |
| CCCC | COMMERCIAL & INDUSTRIAL SOLID WASTE INCINERATORS CONSTRUCTED |
| CE | EXISTING HOSPITAL/MEDICAL/INFECTIOUS WASTE INCINERATORS |
| D | BERYLLIUM ROCKET MOTOR FIRING |
| D | FOSSIL FUEL GENER BUILT AFTER 8/17/71 |
| DA | ELEC UTIL STEAM GENER AFTER 9/18/78 |
| DB | INDUS-COMMERC-INSTITUTL STEAM GENERATOR |
| DC | SMALL INDUS-COMMER-INSTITUTL STEAM GENER |
| DD | GRAIN ELEVATORS |
| DDD | VOC EMISS FROM POLYMER MANUFACTURING |
| Е | MERCURY |
| Е | INCINERATORS |
| EA | MUNICIPAL WASTE COMBUSTORS |
| EC | NEW HOSPITAL/MEDICAL/INFECTIOUS WASTE INCINERATORS |
| EE | SURFAC COATING OF METAL FURNITURE |
| F | VINYL CHLORIDE |
| F | PORTLAND CEMENT PLANTS |
| FF | BENZENE WASTE OPERATIONS |
| FFF | FLEXIBLE VINYL/URETHANE COATING/PRINTING |
| G | NITRIC ACID PLANTS |
| GG | STATIONARY GAS TURBINES |
| GGG | EQUIP VOC LEAKS PETROLEUM REFINERIES |
| Н | RADIONUCS OTR THN RADON FROM DPT OF ENGY |
| Н | SULFURIC ACID PLANTS |
| НН | LIME MANUFACTURING PLANTS |

| Code | Description |
|------|--|
| ННН | SYNTHETIC FIBER PRODUCTION FACILITIES |
| I | RADIONUCS NRC LICNSD OR FEDRL, NOT SUB-H |
| I | ASPHALT CONCRETE PLANTS |
| III | VOC EMISS OF SOCMI AIR-O2 UNIT PROCESS |
| J | EQUIP LEAK (FUGITIVE EMISS SRC) BENZENE |
| J | PETROLEUM REFINERIES |
| JJJ | PETROLEUM DRY CLEANERS |
| K | RADIONUCS FROM ELEMENTAL PHOSPHORUS PLNT |
| K | PETROLEUM STORAGE VESSEL 6/11/73 5/19/78 |
| KA | PETROLEUM STORAGE VESSEL 5/19/73 7/23/84 |
| KB | VOLATILE LIQ/PETRO STORAGE VESSEL 7/23/84 |
| KK | LEAD-ACID BATTERY MANUFACTURING PLANTS |
| KKK | VOC EMISS, ONSHORE NATURAL GAS PROC PLNT |
| L | BENZENE FROM COKE BY-PRODUCT RECOVERY |
| L | SECONDARY LEAD SMELTERS |
| LL | METALLIC MINERAL PROCESSING PLANTS |
| LLL | SO2 EMISS, ONSHORE NATURAL GAS PROC PLNT |
| M | ASBESTOS |
| M | SECONDARY BRASS & BRONZE PRODUCTN PLANTS |
| MM | AUTO/LT-DUTY TRK SURFACE COATING OPERATN |
| N | INORGANIC ARSENIC, FROM GLASS MANUFACT |
| N | PRIMARY EMISS BASIC O2 PROCESS FURNACES |
| NA | SECNDRY EMISS BASIC O2-PROC STEEL FACIL |
| NN | PHOSPHATE ROCK PLANTS |
| NNN | VOC EMISS OF SOCMI DISTILLATION OPERATN |
| О | INORG ARSENIC FROM PRIMARY COPPER SMLTR |
| О | SEWAGE TREATMENT PLANTS |
| 000 | NONMETALLIC MINERAL PROCESSING PLANTS |
| P | INORG ARSENIC, ARS TRIOXIDE, METAL ARS |
| P | PRIMARY COPPER SMELTERS |
| PP | AMMONIUM SULFATE MANUFAC |
| PPP | WOOL FIBERGLASS INSULATION PRODUCTION – NSPS |
| Q | RADON FROM DOE FACILITIES |
| Q | PRIMARY ZINC SMELTERS |
| QQ | GRAPH ART: PUBLICATION ROTOGRAVURE PRINT |
| QQQ | VOC EMISS PETRO REFINERY WATERWASTE SYS |
| R | RADON FROM PHOSPHOGYMSUM STACKS |
| R | PRIMARY LEAD SMELTERS |
| RR | PRESSR-SENST TAPE, LABEL SURFACE COATING |
| RRR | SOCMI REACTOR |
| S | PRIMARY ALUMINUM REDUCTION PLANTS |
| SS | LARGE APPLIANCES |
| SSS | MAGNETIC TAPE COATING |
| Т | RADON, DISPOSAL OF URANIUM MILL TAILINGS |

| Code | Description |
|------|---|
| Т | PHOSPHATE FRTLZR: WET-PROC PHOSPH ACID |
| TT | METAL COIL SURFACE COATING |
| ТТТ | IND-SURF-COAT: PLASTICS, BUSINESS MACHNS |
| U | PHOSPHATE FRTLZR: SUPERPHOSPHORIC ACID |
| UU | ASPHALT PROCESSING & ROOFING MANUFACTURE |
| UUU | CALCINERS/DRYERS IN MINERAL INDUSTRIES |
| V | EQUIPMENT LEAKS (FUGITIVE EMISSIONS SRC) |
| V | PHOSPHATE FRTLZR: DIAMMONIUM PHOS PLANT |
| VV | EQUIPT VOC LEAKS IN SYNTH-ORGAN-CHEM MFG |
| VVV | POLYMERIC COATING OF SUPPORTING SUBSTRATS FACILITIES – NSPS |
| W | RADON FROM OPERATING MILL TAILINGS |
| W | PHOSPHATE FRTLZR: TRIPLE SUPERPHOS PLNT |
| WW | BEVERAGE CAN SURFACE COATING |
| WWW | MUNICIPAL SOLID WASTE LANDFILLS |
| X | PHOSPHATE FRTLZR: GRANULAR 3-SUPER STOR |
| XX | BULK GASOLINE TERMINALS |
| Y | BENZENE EMISS FROM BNZN STORAGE VESSELS |
| Y | COAL PREPARATION PLANTS |
| Z | FERROALLOY PRODUCTION FACILITIES |

ALL_VIOLATING_POLL_CODES - One or more five character code values that identifies pollutant(s) in violation by the related national action. See Appendix 1 for values.

ALL_VIOLATION_TYPE_CODES - One or more three character codes that identify the types of violations cited for a violation or administrative penalty. Values are:

| Code | Description |
|------|---|
| GC1 | Fail to Obtain Psd or Nsr Permit and/or a Permit for Major Mods to Either |
| GC2 | Viol. of Air Toxics Req. Resulting in Either EE or Viol. Op Parm Restricts |
| GC3 | Viol. by SM of Emis Lim or Perm. Condition Effecting Srces PSD, NSR or T5 |
| GC4 | Viol. of any Substantive Term of any S/L or Fed Order, Consent Decree or AO |
| GC5 | Substantial Viol. of T5 Cert. Obligation, e.g., Failure to Submit a Cert |
| GC6 | Substantial Violation of Srcs Obligation to Submit T5 Permit Application |
| GC7 | Test/Monitor/Records/Reporting Viol. that Substan. Interfere w/Enf or Cmst |
| GC8 | Viol. of Allw Emis. Limit Detected during a Reference Method Stack Test |
| GC9 | Clean Air Act (CAA) Violations by Chronic or Recalcitrant Violators |
| G10 | Substantial Violation of Clean Air Act Section 112(R) Requirements |
| M1A | Any Violation of Emission Limit Detected via Stack Testing |
| M1B | Violation of Emission Limits > 15% via Sampling |
| M1C | Violation of Emission Limits > The SST (Supplemental Sig. Threshold) |
| M2A | Violation of Direct Surrogate For >5% of Limit For >3% of Operating Time |
| M2B | Violation of Direct Surrogate For >50% of Operating Time (OT) |
| M2C | Violation of Direct Surrogate of >25% For 2 Reporting Periods |
| M3A | Violation of Non-Opacity Standard via CEM of >15% For >5% of Operating Time |
| МЗВ | Violation of Non-Opacity Standard via CEM of the Supplement. Sig. Threshold |
| МЗС | Viol. of Non-Opacity Std via CEM of >15% for 2 Reporting Periods |
| M3D | Viol. of Non-Opacity Std via CEM of >50% of the Oper Time during Report Per |

| М3Е | Viol of Non-Opacity Std via CEM of >25% During 2 Consec. Reporting Periods |
|-----|--|
| M3F | Any Violation of Non-Opacity Standard via CEM |
| M4A | Violation of Opacity Standards (0-20%) via Continuous Opacity Monitoring |
| M4B | Viols. of Opacity Stds > 3% of Op Time via Com During 2 Consec. Rept Perds |
| M4C | Violation of Opacity Stds (>20%) via Com For >5% of Operating Time |
| M4D | Violation of Opacity Standards (>20%) via Com For 5% Operating Time |
| M4E | Violation of Opacity Standards (0-20%) via Method 9 VE Readings |
| M4F | Violation of Opacity Standards (>20%) via Method 9 VE Readings |

ANU1 – The action number is a numeric field used to uniquely identify an action record.

CURRENT_HPV - A one-character code indicating if plant is currently categorized as a High Priority Violator. Values include

| Code | Description |
|------|--|
| В | Violation Unaddressed; EPA And State Share Lead Enforcement |
| С | Violation Addressed; EPA And State Share Lead Enforcement |
| D | Src W/Svil=B W/Changed Comp. Status Code From 1 Or 6 To 2,3,4,8 Or 9(Obsolete) |
| Е | Violation Unaddressed; EPA Has Lead Enforcement |
| F | Violation Addressed; EPA Has Lead Enforcement |
| G | Src W/Svil=E W/Changed Comp. Stat. Code from 1 Or 6 To 2,3,4,8 Or 9(Obsolete) |
| Н | EPA (Lead) Resolved In A Prior Fiscal Year (Obsolete) |
| P | Both (Lead) Resolved In A Prior Fiscal Year (Obsolete) |
| S | Violation Unaddressed; State/Local Has Lead Enforcement |
| Т | Violation Addressed; State Has Lead Enforcement |
| U | Src W/Svil=S W/Changed Compliance Status from 1 Or 6 To 2,3,4,8, Or 9 (Obsolete) |
| V | State (Lead) Resolved in A Prior Year (Obsolete) |
| X | Violation Unaddressed; Enforcement Lead Unassigned |

CHEMICAL_ABSTRACT_SERVICE_NMBR (CAPP) -The chemical abstract number (CAS) for the pollutant if it exists.

CREATION_DATE (**DCRE**) - The date the action record was created in AFS. This date is automatically generated when a new plant action record is created in AFS.

DATE_ACHIEVED - Field that indicates the date (YYYYMMDD) of a completed compliance action (NATIONAL_ACTION_TYPE).

DATE_RECORD_IS_UPDATED (DU17) - The last date the action record was updated.

EPA_CLASSIFICATION_CODE - A two-character code that categorizes a source's emission status according to the Alabama Power Decision's definition of a Major Source, or the 1993 EPA Compliance Monitoring Branch Classification Guidance. If there is no EPA Classification Code present, this field displays the State Classification Code value. AFS generates a plant classification reflecting the highest emission level classification of criteria pollutants regulated by an Air program.

EPA_CLASSIFICATION_CODE reflects the EPA Classification Code at the general plant level. Valid codes for the plant/source level (EPA_CLASSIFICATION_CODE), the pollutant level

(POLLUTANT_CLASSIFICATION) and the air program level (EPA_STATE_CLASSIFICATION_CODE) include:

| Code | Description |
|------|--|
| A | Actual or potential emissions are above the applicable major source thresholds. |
| A1 | Actual or potential controlled emissions >100 tons/year as per Alabama Power Decision. |
| A2 | Actual emissions <100 tons/year, but potential uncontrolled emissions >100 tons/year. |
| В | Potential uncontrolled emissions <100 tons/year |
| С | Class is unknown. |
| E1 | Unregulated pollutant actual or potential controlled emissions >100 tons/year as per Alabama Power Decision. |
| E2 | Unregulated pollutant actual emission <100 tons/year. |
| ND | Major Source thresholds are not defined. |
| SM | Potential emissions are below all applicable Major Source enforceable regulations or limitations. |
| UK | Unknown Pollutant Classification. |

EPA_COMPLIANCE_STATUS - A one-character code reflecting EPA's determination of compliance for a facility (or point within a facility) with regard to pollutants regulated by an Air program or by the procedural requirements of a permit. (This corresponds to the AFS field DCS1 at the facility level, and DCA1 at the program level. That is, it is the worst case of the EPA and State fields.) Values include:

| Code | Description |
|------|---|
| A | Unknown With Regard To Procedural Compliance |
| В | In Violation With Regard To Both Emissions And Procedural Compliance |
| С | In Compliance With Procedural Requirements |
| D | HPV Violation (Auto-Generated) |
| Е | FRV Violation (Auto-Generated) |
| F | HPV On Schedule (Auto-Generated) |
| G | FRV On Schedule (Auto-Generated) |
| Н | In Compliance (Auto-Generated) |
| M | In Compliance – CEMs |
| P | Present, See Other Program(s) |
| U | Unknown By Evaluation Calculation (Generated Value-Not Available For Input) |
| W | In Violation With Regard To Procedural Compliance |
| Y | Unknown With Regard To Both Emissions And Procedural Compliance |
| 0 | Unknown Compliance Status |
| 1 | In Violation - No Schedule |
| 2 | In Compliance - Source Test |
| 3 | In Compliance – Inspection |
| 4 | In Compliance – Certification |
| 5 | Meeting Compliance Schedule |
| 6 | In Violation - Not Meeting Schedule |
| 7 | In Violation - Unknown With Regard To Schedule |
| 8 | No Applicable State Regulation |
| 9 | In Compliance - Shut Down |

EPA_REGION – A two-character code identifying the EPA Region in which the plant is located.

| Code | Description |
|------|---|
| 01 | EPA Region 1 – CT, ME, MA, NH, RI, VT |
| 02 | EPA Region 2 – NJ, NY, PR, VI |
| 03 | EPA Region 3 – DE, DC, MD, PA, VA, WV |
| 04 | EPA Region 4 – AL, FL, GA, KY, MS, NC, SC, TN |
| 05 | EPA Region 5 – IL, IN, MI, MN, OH, WI |
| 06 | EPA Region 6 – AR, LA, NM, OK, TX |
| 07 | EPA Region 7 – IA, KS, MO, NE |
| 08 | EPA Region 8 – CO, MT, ND, SD, UT, WY |
| 09 | EPA Region 9 – AZ, CA, HI, NV, AS, GU |
| 10 | EPA Region 10 – AK, ID, OR, WA |

EPA_STATE_CLASSIFICATION_CODE - A two-character code that categorizes an <u>air program's</u> emission status according to the Alabama Power Decision's definition of a Major Source, or the 1993 EPA Compliance Monitoring Branch Classification Guidance. See EPA_CLASSIFICATION_CODE for valid code values.

FEDERALLY_REPORTABLE - ECHO generates the Federally Reportable indicator. FEDERALLY_REPORTABLE displays a "Y" if the facility is federally reportable and a "N" if the facility is not federally reportable. A facility is federally reportable if it's emission classification is "major" or "synthetic minor", or it is subject to NSPS or NESHAP requirements and it's source-level compliance status is not equal to "no applicable state regulation" (AFS.EPA_CLASSIFICATION_CODE = A, A1, A2, SM OR (AFS.AIR_PROGRAM_CODE = 8, 9 and AFS.EPA_COMPLIANCE_STATUS is not equal to 8)).

HISTORICAL_COMPLIANCE_STATUS - A compliance status associated with a year and quarter time frame. See EPA_COMPLIANCE_CODE for valid code values.

HISTORICAL_COMPLIANCE_DATE - The date (in YYQQ format) associated with an historical air program level compliance status. Quarters are calendar year-quarters (not fiscal year), i.e., quarter one covers January 1 –March 31.

HPV_DAYZERO_TYPE - Code designating the lead agency for the high priority violator in AFS. These correspond to the AFS national action types for "day zeroes", indicating the start of high priority violation status.

| Code | National Description | |
|------|------------------------------------|--|
| 2B | DAY ZERO - SHARED ENFORCEMENT LEAD | |
| 2E | STATE DAY ZERO | |
| 2Z | FEDERAL DAY ZERO | |

HPV_RESOLVED_TYPE - These correspond to AFS national action types which resolved the HPV pathway in AFS, indicating the high priority violation was resolved. If the HPV pathway was unresolved as of the data extract, this will be blank.

| Code | National Description |
|------|---|
| C3 | 113D PEN COLLECTED |
| C7 | CLOSEOUT MEMO ISSUED |
| 2K | COMPL BY STATE, NO ACT REQ |
| WD | EPA 113D WITHDRAWN |
| 2L | PROPOSED SIP REVISION TO COMPLIANCE |
| 7G | SOURCE RET TO COMPL BY USEPA W/NO FURTHER ACT REQ |
| 2M | SOURCE SPECIFIC SIP REVISION |
| VR | VIOLATION RESOLVED |

KEY_ACTION_NUMBERS (KAN1) – A key action number is assigned to an action to indicate which violation pathway to full compliance evaluation (FCE) pathway the action is linked. An action can be linked to a maximum of ten pathways.

LOCAL_CONTROL_REGION (LCON) – A two character code identifying the Local Control Region Code with jurisdiction over a plant. Note: LCON codes have different meanings in each state.

NAICS_CODE - The Primary NAIC Code is the North American Industry Classification (NAIC) code for the plant. The North American Industry Classification System (NAICS) replaced the U.S. Standard Industrial Classification (SIC) system as the standard for industry classification in 1997.

NATIONAL_ACTION_TYPE - A two-character code identifying a compliance activity including inspections and enforcement actions. The National Action Type field translates region-specific action type codes to the corresponding EPA national activity code. This field represents unique actions which may be recorded multiple times at different air programs, *e.g.*, the same inspection addressing Title V, SIP and NSPS requirements is represented by a single NATIONAL_ACTION_TYPE value. The lead agency for a national action is indicated within its description. The most commonly used codes for inspections are: FF, FS, FE, FZ, 1A, & 5C for full inspections, and EM, EO, ES, EX,, PC, PO, PP, PR, PS & PX for partial inspections. The most commonly used codes for formal enforcement actions are: 1B, 2D, 6B, 7A, 7E, 7F, 8A, 8C, & 9A.

Valid values for NATIONAL_ACTION_TYPE include:

| Code | National Description |
|------|--|
| 1A | EPA INSPECTION - LEVEL 2 OR GREATER |
| 1B | 113(D)(4) INNOV. TECH. ORDER APPROVD/ISS |
| 1C | APPLICATION TO EPA COMPLETE |
| 2A | EPA CONDUCTED STACK TEST |
| 2C | EPA PSD PERMIT ISSUED |
| 2D | CONSENT AGREEMENT FILED |
| 2K | COMPL BY STATE, NO ACT REQ |
| 2L | PROPOSED SIP REVISION TO COMPLIANCE |
| 3A | OWNER/OPERATOR CONDUCTED SOURCE TEST |
| 3C | NEW SOURCE COMMENCE CONSTRUCTION |
| 3E | WARNING NOTIFICATION OF VIOLATION |
| 3F | WARNING SUBSTANTIVE VIOLATION |

| Code | National Description | | |
|------|---|--|--|
| 4A | NESHAP WAIVER OF COMPLIANCE ISSUED | | |
| 4C | NEW SOURCE START-UP | | |
| 4D | STATE NONCOMPLIANCE PENALTY ASSESSED | | |
| 5A | EPA PRE-NOV LETTER SENT | | |
| 5C | STATE INSPECTION - LEVEL 2 OR GREATER | | |
| 5D | STATE PSD APPLICABILITY DETERMINATION | | |
| 6A | EPA NOV ISSUED | | |
| 6B | EPA COURT CONSENT DECREE | | |
| 6C | STATE CONDUCTED STACK TEST | | |
| 6D | STATE PSD APPLICATION COMPLETE | | |
| 7A | NOTICE OF NONCOMPLIANCE (SECTION 120) | | |
| 7C | STATE NOV ISSUED | | |
| 7D | STATE PSD PERMIT ISSUED | | |
| 7E | EPA 167 ORDER | | |
| 7F | 113D APO COMPLAINT FILED. | | |
| 7G | COMPL BY EPA, NO ACT REQ | | |
| 8A | EPA 113(A) ORDER ISSUED | | |
| 8B | 113(D) PENALTY ORDER FILED | | |
| 8C | STATE ADMINISTRATIVE ORDER ISSUED | | |
| 8D | OFFSET APPLICABILITY DETERMINATION | | |
| 9A | 113(D) DELAYED COMPL. ORDER APPROVED/ISSUED BY EPA | | |
| 9B | EPA PSD APPLICABILITY DETERMINATION | | |
| 9D | OFFSET PERMIT ISSUED | | |
| C1 | 113 CONFERENCE | | |
| C4 | FINAL COMPLIANCE | | |
| C7 | CLOSEOUT MEMO ISSUED | | |
| C8 | DECREE LODGED | | |
| СВ | TITLE V ANNUAL COMPL CERT DUE/RECVD BY | | |
| CC | TITLE V COMPLIANCE CERT DUE/RECEIVED BY | | |
| EC | EPA INVESTIGATION CONDUCTED | | |
| ED | EPA/STATE DEMAND LETTER | | |
| EE | COMPLAINT ON-SITE PCE (EPA) | | |
| EI | EPA INVESTIGATION STARTED | | |
| EM | PROCESS OFF-SITE PCE (EPA) | | |
| ЕО | ON-SITE PCE OBSERVATION (EPA) | | |
| ER | TITLE V COMPLIANCE CERTIFICATION REVIEW BY EPA | | |
| ES | EPA PCE/ON-SITE (PCE = Partial Compliance Evaluation) | | |
| EX | EPA PCE/OFF-SITE | | |
| FE | EPA FCE/ON-SITE (FCE = Full Compliance Evaluation) | | |
| FF | STATE CONDUCTED FCE/OFF-SITE | | |
| FS | STATE CONDUCTED FCE/ON-SITE | | |
| FZ | EPA CONDUCTED FCE/OFF-SITE | | |
| HR | 113D HEARING | | |
| LL | EPA SECTION 114 LETTER | | |

| Code | National Description |
|------|---|
| OT | OTHER ADDRESSING ACTION |
| PC | COMPLAINT ON-SITE PCE (STATE) |
| PO | ON-SITE PCE OBSERVATION (STATE) |
| PP | PERMIT ON-SITE PCE (STATE) |
| PR | PROCESS OFF-SITE PCE (STATE) |
| PS | STATE PCE/ON-SITE |
| PX | STATE PCE/OFF-SITE |
| SC | STATE INVESTIGATION CONDUCTED |
| SD | STATE DEMAND LETTER |
| SE | 113(D) SETTLEMENT |
| SI | STATE INVESTIGATION STARTED |
| SR | TITLE V COMPLIANCE CERTIFICATION REVIEW BY STATE |
| ST | AGENCY NON-MDR STACK TEST |
| TE | EPA REQ (O/O COND) STACK TEST/NOT OBSVD |
| ТО | EPA REQ (O/O COND) STACK TEST OBSERVED & REVIEWED |
| TR | STATE REQ (O/O COND) STACK TEST/NOT |
| VR | VIOLATION RESOLVED |
| WD | EPA 113D WITHDRAWN |

Note: this is a subset of all possible NATIONAL_ACTION_TYPE values, limited to compliance monitoring and enforcement activities.

NATIONAL_ACTION_DESC – Text description for value NATIONAL_ACTION_TYPE. **ALL_AIR_PROGRAM_CODES** - A field which indicates all air programs associated with a given National Action Type (NATIONAL_ACTION_TYPE). Each associated AIR_PROGRAM_CODE is delimited by a single blank space between values.

OPERATING_STATUS - A one-character code representing the operational condition of the plant. The operating status for a plant is generated from the most significant operative value assigned to subordinate Air programs (AIR_PROGRAM_STATUS). See AIR_PROGRAM_STATUS for valid code values.

PENALTY_AMOUNT - Field that indicates the amount of the civil penalty associated with a national action type (NATIONAL_ACTION_TYPE) which was assessed, or agreed to by a facility in the final agreement between the enforcement authority and the plant.

PLANT_CITY - Field containing the name of the city or town where the plant is located.

PLANT_COUNTY - Field containing the code of the county where the plant is located.

PLANT_NAME - The name associated with a plant at a given location.

PLANT_STREET_ADDRESS - Field that indicates the street address for the physical location of the plant.

POLLUTANT_CLASSIFICATION (Air Program Pollutant Classification) A two-character code that categorizes a source air program's emission status. See EPA_CLASSIFICATION_CODE above for valid code values.

POLLUTANT_CODE - A five-character code that identifies a pollutant tracked at the air program level. See Appendix 1 for values.

POLLUTANT_COMPLIANCE_STATUS - A one-character code reflecting the compliance status for a specified air program pollutant. See EPA_COMPLIANCE_STATUS for valid code values.

PRIMARY_SIC_CODE - The *Primary SIC Code* is the four-character Standard Industrial Classification code that classifies the main product produced or service performed at the plant.

REGIONAL_DATA_ELEMENT_8 (RD81) - Compliance Codes of "In Compliance (MC), In Violation (MV), or Unknown (MU)" are entered for Title V Annual Compliance Certification reviews.

RESULT_CODE - Code indicating results of Stack Test and Title V review. Values include:

| Code | Description |
|------|-------------------|
| 01 | ACTION ACHIE VED |
| 02 | NOT ACHIEVED |
| 03 | ACTION RESCHED. |
| 97 | APPROVED |
| 98 | DISAPPROVED |
| 99 | PENDING |
| FF | STACK TEST FAILED |
| FR | FED REPT VIOL |
| MA | QEER ADEQUATE |
| MC | IN COMPLIANCE |
| MI | QEER INADEQUATE |
| MR | RETEST REQ |
| MU | UNKNOWN CMST |
| MV | IN VIOLATION |
| PP | STACK TEST PASSED |

SECONDARY_SIC_CODE - The Secondary SIC Code is the four-character Standard Industrial Classification code that classifies a product produced or service performed at the plant that is other than the one described by the Primary SIC Code (PRIMARY_SIC_CODE).

STATE - Two-character postal abbreviation code to identify the state where the plant is located.

STATE_COMPLIANCE_STATUS (SCS1) – A one-character code which reflects the state agency's determination of the compliance status of a facility with regards to pollutants regulated by an air program or by the procedural requirements of a permit. Compliance falls within four categories: in compliance, out of compliance, on schedule, or unknown. The most serious state compliance status across all air programs and pollutants is shown.

STATE_NUMBER (STTE) – A two-digit number corresponding to the state, using the federal information processing system (FIPS) standard.

ZIP_CODE - Field that contains the five or nine-digit zip code for the plant address.

Appendix 1. Pollutant Codes Used by Data Element POLLUTANT_CODE

| Code | Description |
|-------|---|
| AB | Asbestos |
| ACEHY | Acetaldehyde |
| ACEPH | Acetophenone |
| ACET | Acetone |
| ACETM | Acetamide |
| ACETR | Acetonitrile |
| ACETY | Acetylenes (Alkynes) |
| ACRAC | Acrylic Acid |
| ACRLA | Acrylamide |
| ACRLE | Acrolein |
| ACRNI | Acrylonitrile |
| ADMIN | Administration |
| AGC | Silver Compounds |
| AL-PT | Aluminum (Tsp) |
| ALC | Aluminum Compounds |
| ALDHY | Aldehydes |
| ANILI | Aniline |
| ANISO | Anisidine,O- |
| ANTCO | Antimonyu Compounds (E649921) |
| AROM | Aromatics |
| ARSCO | Arsenic Compounds (E649418) |
| AS | Arsenic |
| ASC | Arsenic Compounds |
| BA-PT | Barium |
| BAC | Barium Compounds |
| BAYGN | Baygon |
| BDCEE | Bis(2-Chloroethyl) Ether |
| BE | Beryllium |
| BEC | Beryllium Compounds |
| BENYC | Benzyl Chloride |
| BENZI | Benzidine |
| BERCO | Beryllium Compounds (E649947) |
| BETRC | Benzotrichloride |
| BIPHE | Biphenyl |
| BROMO | Bromoform |
| BTEX | Benzene, Toluene, Ethylbenzene, Xylenes |
| BUT13 | Butadiene,1,3- |
| BZ | Benzene |
| CAA | Chloroacetic Acid |
| CACHO | Catechol |
| CACNA | Calcium Cyanamide |
| CADCO | Cadmium Compounds (E649954) |
| CADIS | Carbon Disulfide |

| Code | Description |
|-------|---|
| CAPRO | Caprolactam |
| CAPTA | Captan |
| CARBA | Carbaryl |
| CATET | Carbon Tetrachloride |
| CD | Cadmium |
| CDC | Cadmium Compounds |
| CE | Coke Oven Emissions |
| CFC | Chlorofluorocarbons |
| CHACP | Chloroacetophenone |
| CHBET | Chlorobenzilate |
| CHBNZ | Chlorobenzene |
| CHBT2 | Chlorobutadiene,2-,1,3- |
| CHDIF | Chlorodifluoromethane |
| СНЕТВ | Chloromethylether,Bis |
| CHLBN | Chloramben |
| CHLFO | Chloroform |
| CHLRD | Chlordane |
| CHPR3 | Chloropropene,3- |
| CHRCO | Chromium Compounds (E649962) |
| CH4 | Methane |
| CL | Chlorine |
| CLD | Chlorinated Dioxin |
| CLD&F | Chlorinated Dioxin And Furans 2,3,7,8 Congeners Only (Teq) (E17000407) |
| CLETH | Chloroethane |
| CLPH | Chlorophenols |
| CNC | Cyanide Compounds |
| CO | Carbon Monoxide |
| COBCO | Cobalt Compounds (E649970) |
| COC | Cobalt Compounds |
| COE | Coke Oven Compounds (E649830) |
| CO2 | Carbon Dioxide |
| COS | Carbonyl Sulfide |
| CRC | Chromium Compounds |
| CRSL | Cresol (All Isomers) |
| CRSLM | Cresol,M- |
| CRSLO | Cresol,O- |
| CRSLP | Cresol,P- |
| CR6PT | Chromium Vi |
| CU-PT | Copper (Tsp) |
| CUC | Copper Compounds |
| CUREN | Curene |
| C3F6 | Perfluoroethane/Hexafluoroethane |

| Code | Description |
|-------|---|
| C4F10 | Perfluorobutane |
| C6F14 | Perfluorohexane |
| C9H12 | Ethylidene-2-Norbornene |
| DBCP1 | Dibromochloropropane,1,2,3- |
| DBNZF | Dibenzofuran |
| DCB14 | Dichlorobenzene,1,4- |
| DCB33 | Dichlorobenzidine,3,3'- |
| DCE11 | Dichloroethane,1,1- |
| DCP12 | Dichloropropane,1,2- |
| DCP13 | Dichloropropene,1,3- |
| DDE | Dde (Dichlorodiphenyldichloroethylene) |
| DDVP | Vapona |
| DEHP | Ethylhexylphthalate,Bis,2- |
| DES | Diethyl Sulfate |
| DIAZM | Diazomethane |
| DIETA | Diethanolamine |
| DMANN | Dimethylaniline,N,N- |
| DMAZ4 | Dimethylaminoazobenzene,4- |
| DMB33 | Dimethylbenzidine,3,3'- |
| DMD44 | Diphenylmethanediisocyanate,4,4'- |
| DMFNN | Dimethylformamide,N,N- |
| DMH11 | Dimethylhydrazine,1,1- |
| DMN | N-Nitrosodimethylamine |
| DMPHT | Dimethyl Phthalate |
| DMSAT | Dimethyl Sulfate |
| DMTCH | Dimethylcarbamyl Chloride |
| DMXBZ | Dimethoxybenzidine,3,3'- |
| DNBP | Di-N-Butyl Phthalate |
| DNP | Dinitrophenol,2,4- |
| DNT24 | Dinitrotoluene,2,4- |
| DOC+ | 4,6-Dinitro-O-Cresol Including Salts_(E650077) |
| DT24 | Diaminotoluene,2,4- |
| DXN14 | Dioxane,1,4- |
| EBENZ | Ethylbenzene Aka-Phenylethane |
| ECH | Epichlorohydrin |
| EDB | Ethylene Dibromide |
| EDC | Ethylene Dichloride |
| EO | Ethylene Oxide |
| EPB12 | Epoxybutane,1,2- |
| ETACR | Ethyl Acrylate (Inhibited) |
| ETGLY | Ethylene Glycol |
| ETHAN | Ethanol |
| ETHYL | Ethylene Aka-Ethene |
| ETLEN | Ethyleneimine |
| ETU | Ethylene Thiourea |

| Code | Description |
|-------|--|
| FACIL | Facility-Wide Permit Requirements |
| FD | Fugitive Dust |
| FE | Fugitive Emissions |
| FL | Fluorides |
| FMF | Fine Mineral Fibers_(E649533) |
| FORM | Formaldehyde |
| FURAN | Furan |
| GLYC | Glycerol |
| GLYET | Glycol Ethers (E651141) |
| НС | Total Hydrocarbons |
| НСВ | Hexachlorobenzene |
| НССН | 1,2,3,4,5,6-Hexachlorocyclohexane (Aka Lindane) |
| HCCPD | Hexachlorocyclopentadiene |
| HCE | Hexachloroethane |
| HCL | Hydrogen Chloride |
| HCY | Hydrogen Cyanide |
| HC13B | Hexachloro-1,3-Butadiene |
| HC36 | Methyl Ethyl Ketone |
| HC53 | Tetrachloroethylene (Perchloroethylene) |
| HC81 | Xylene(S) |
| HDRQ | Hydroquinone |
| HDRZB | Hydrazobenzene |
| HDRZN | Hydrazine |
| HF | Hydrofluoric Acid |
| HFC | Hafnium Carbide |
| HFCL2 | Hafnium Chloride Oxide Hfcl2o |
| HFCL4 | Hafnium Carbine Hfcl4,T-4 |
| HFCS | Hydrofluorocarbons |
| HFC1 | HFC -365mfc |
| HFC10 | HFC -236ea, Propane, Hexafluoro- |
| HFC11 | HFC -245eb, Propane, Pentafluoro |
| HFC12 | HFC-236fa, Propane, Hexafluoro |
| HFC13 | HFC -245fa, Propane, Pentafluoro |
| HFC14 | HFC -245ca, Propane, Pentafluoro |
| HFC15 | HFC -245ea, Propane, Pentafluoro |
| HFC2 | HFC -134a |
| HFC23 | Methane, Trifluoro |
| HFC3 | HFC -143a |
| HFC32 | Methane, Difluoro |
| HFC4 | HFC -134 |
| HFC41 | Methane, Fluoro |
| HFC5 | HFC -152a |
| HFC6 | HFC -161 |
| HFC7 | HFC -125 |
| HFC8 | HFC -4310mee, Pentane, Decafluoro |

| Code | Description |
|-------|----------------------------------|
| HFC9 | HFC -227ea, Propane, Decafluoro- |
| HFE | Hydrofluorinated Ethers |
| HGC | Mercury Compounds |
| HMPA | Hexamethylphosphoramide |
| HNO3 | Nitric Acid |
| HPTCR | Heptachlor |
| HSO4P | Sulfuric Acid |
| HXMDI | Hexamethylene Diisocyanate |
| HXNE | Hexane,N- |
| H2 | Hydrogen |
| H2S | Hydrogen Sulfide |
| ISBTA | Propane, 2-Methyl-, Isobutane |
| ISPBZ | Isopropylbenzene Aka-Cumene |
| ISPR | Isophorone |
| KETON | Ketones |
| LEACO | Lead Compounds (E650002) |
| MAGCO | Manganese Compounds (E650010) |
| MC | Methylene Chloride |
| MCANH | Maleic Anhydride |
| MEA44 | Methylenedianiline,4,4'- |
| MEBRO | Methyl Bromide |
| MECHE | Methyl Chloromethyl Ether |
| MECLD | Methyl Chloride |
| MEISC | Methyl Isocyanate |
| MERCO | Mercury Compounds (E650028) |
| MMA | Methyl Methacrylate |
| MMH | Methyl Hydrazine |
| MN-PT | Manganese |
| MNC | Manganese Compounds |
| MNU | N-Nitroso-N-Methylurea |
| MPN42 | Methylpentanone,4-,2- |
| MTBE | Ether, Tert-Butyl Methyl |
| MTNIO | Methane, Iodo- |
| MTNOL | Methanol |
| MTXLR | Methoxychlor |
| MXYL | M-Xylene Aka-1,3-Dimethylbenzene |
| NAPH | Naphthalene |
| NB | Nitrobenzene |
| NDP4 | Nitrodiphenyl,4- |
| NF3 | Nitrogen Trifluoride |
| NH3 | Ammonia |
| NI-PM | Nickel Powder |
| NI-PT | Nickel |
| NIC | Nickel Compounds |
| NIKCO | Nickel Compounds (E650036) |

| Code | Description |
|-------|--|
| NIPR2 | Nitropropane,2- |
| NMOL | N-Nitrosomorpholine |
| NO | Nitric Oxide |
| NO2 | Nitrogen Dioxide |
| NVOC | Non-Volatile Organic Compounds |
| N2O | Nitrous Oxide |
| OACID | Organic Acids |
| OD | Odors |
| OLEF | Olefins |
| OT | Other Emissions Other Than Road Based |
| OXYL | O-Xylene Aka-1,2-Dimethylbenzene |
| Р | Phosphorous (Yellow) |
| PAH6 | Anthracene |
| PARAF | Paraffins (Alkanes) |
| PATHI | Parathion |
| PB | Lead |
| PBB | Polybrom. Biphenyls |
| PBC | Lead Compounds |
| PCBS | Polychlorinated Biphenyls |
| PCNB | Pentachloronitrobenzene |
| PCP | Pentachlorophenol |
| PDAP | Phenylenediamine,P- |
| PGLY | Propanediol,1,2- |
| PHNOL | Phenol |
| PHPNE | Phosphine |
| PHSGN | Phosgene |
| PLB | Propiolactone,B- |
| PM10 | Particulate Matter < 10 Um |
| PM2.5 | Particulate Matter < 2.5 Um |
| PNP | Nitrophenol,P- |
| POM | Polycyclic Organic Matter |
| PQNON | P-Quinone |
| PRAL | Propionaldehyde |
| PRENM | Propyleneimine |
| PROSU | Propane Sultone |
| PROX | Propylene Oxide |
| PRPYL | Propylene |
| PT | Total Particulate Matter |
| PTCAN | Phthalic Anhydride |
| PX | Pollutant X |
| PXYL | P-Xylene Aka-1,4-Dimethylbenzene |
| P1 | Fine Particulates: High Probability Of Violation |
| P2 | Fine Particulates: Low Probability Of Violation |
| P224T | Pentane, 2,2,4-Trimethyl- |
| QNLNE | Quinoline |
| | ř. |

| Code | Description |
|--------------|---|
| RADNU | Radionuclides (Including Radon)5 (E649632) |
| RD | Radionucleides |
| ROC | Reactive Organic Compound |
| RSC | Reduced Silver Compounds |
| SB-PT | Antimony (Tsp) |
| SBC | Antimony Compounds |
| SEC | Selenium Compounds (E650044) |
| SF6 | Sulphur Hexafluoride |
| SO2 | Sulfur Dioxide |
| SO3 | Sulfur Trioxide |
| SO4 | Sulfates |
| STYOX | Styrene Oxide |
| STYR | Styrene Aka-Ethenylbenzene |
| SVOC | Semi-Volitale Organic Compounds |
| TB124 | Trichlorobenzene,1,2,4- |
| TCA | 1,1,1-Trichloroethane |
| TCDF | Tetrachlorodibenzofuran,2,3,7,8- |
| TCE12 | Tetrachloroethane,1,1,2,2- |
| TC245 | Trichlorophenol,2,4,5- |
| TC246 | Trichlorophenol,2,4,6- |
| TEA | Triethylamine |
| TE112 | Trichloroethane,1,1,2- |
| THAP | Total Hap Pollutant |
| TI | Thallium |
| TI-PT | Titanium (Tsp) |
| TIN | Tin, As Sn |
| TITE | Titanium Tetrachloride |
| TNMOC | Total Non-Methane Organic Compounds |
| TOLU | Toluene Aka-Methylbenzene |
| TOLUO | Toluidine,O- |
| TOX | Toxaphene |
| TRFLR | Trifluralin |
| TS | Total Reduced Sulphur-Sulfide |
| TSP | Total Suspended Particulate (Physical Property) |
| T24DI | Toluene,24,Diisocyanate |
| URTHN | Urethane |
| VC | Vinyl Chloride |
| VE | Visible Emissions |
| VHAP | Volatile Organic Hazardous Air Pollutant |
| VOC | Volatile Organic Compounds |
| | |
| VYAC VYBR | Vinyl Acetate Vinyl Bromide |
| | Vinyl Bromide |
| ZNC | Zinc |
| ZNC | Zinc Compounds |
| 11DCE | Dichloroethylene,1,1- |

| Code | Description |
|-------|------------------------------------|
| 124TB | 1,2,4-Trimethylbenzene Aka-Pseudoc |
| 2,4-D | 2,4-Dichlorophenoxyacetic Acid |
| 2ACFL | Fluorenylacetamide,N-,2- |
| 2P1DM | 2 Propanol, 1 (Dimethylamino) |
| 24XYL | Xylenol |
| 3CLET | Trichloroethylene |
| 43516 | Trans-Crotonaldehyde |
| 43520 | Cis-Crotonaldehyde |
| 95166 | Hydrazine Monohydrate |