

PART F - AIR POLLUTION EPISODES

§2106.01 AIR POLLUTION EPISODE SYSTEM

- a. **General.** The purpose of this Part is to provide the Department with the authority to decrease the severity and duration of air pollution episodes by requiring staged reductions in the emission of air contaminants and general reductions in activities which place demands upon air pollution sources or which result in generation of air contaminants either directly or indirectly, in conjunction with air quality measurements and meteorological forecasts. The goal of these reductions is the avoidance of conditions which may result in significant harm to human health or welfare.
- b. **Other powers unaffected.** Nothing contained in this Part shall affect the power of the Department to issue an Emergency Order pursuant to §2109.05 of this Article, whether or not such emergency occurs during an air pollution episode, or any other order pursuant to Part I of this Article.

§2106.02 AIR POLLUTION SOURCE CURTAILMENT PLANS

- a. Any person responsible for a source of air contaminants of the type set forth below shall, upon written request of the Department, submit a source curtailment plan, consistent with good industrial practice and safe operating procedures, designed to reduce emissions of air contaminants during air pollution episodes. Such plans shall meet the requirements of Subsection c below, and shall be consistent with any further guidance developed by the Department in the administration of this Part.
 1. Coal or oil-fired electric power generating sources.
 2. Coal or oil-fired steam generating sources.
 3. Manufacturing industries in the following classifications:
 - A. primary metals
 - B. secondary metals
 - C. metal fabricating
 - D. coke making
 - E. paper and allied products
 - F. chemical and allied products
 - G. petroleum refining and related industry
 - H. stone, glass, clay, and concrete products.
 4. Asphalt plants.
 5. Incinerators.
 6. Slag handling operations.
 7. Other sources designated by Department.
- b. Source curtailment plans required by Subsection a above shall be in writing and shall show the source of emissions, the approximate emissions rate and percentage of reductions to be achieved upon implementation, the time necessary after notification to implement the plan, and a brief description of the manner in which reductions will be achieved at the respective Stages or Levels of an air pollution episode.

- c. Source curtailment plans shall specify three phases of curtailment actions. These phases shall correspond to the respective Alert Stages or Localized Incident Levels, unless otherwise provided for in an individual source curtailment plan upon the approval of the Department. The goal of the first phase of curtailment shall be to provide for the reduction of emissions to the level required by the applicable emission limitations of this Article. Subject to the approval of the Department, plans may specify that the first phase emission reductions required of a non-complying source may instead be brought about by the curtailment of another source (or sources) under common control at the same site. The goal of the second phase of curtailment shall be to provide substantial reduction of emissions of air contaminants by ceasing, curtailing, deferring or postponing production and allied operations. The goal of the third phase of curtailment shall be to eliminate emissions of air contaminants by ceasing curtailing, deferring, or postponing production and allied operations. Curtailment shall be obtained without causing injury to persons or substantial damage to equipment.
- d. Source curtailment plans for incinerators shall specify what preparations have been made to handle and store, or otherwise dispose of, refuse without incineration.
- e. Source curtailment plans required by this Section shall be kept on the premises of the source affected and made available to any person authorized to enforce the provisions of this Article.
- f. If a submitted plan, as required by Subsection a, is not acceptable to the Department, it shall issue an order directing the responsible person to modify and resubmit the plan within 30 days after receiving notice. The order shall specify the reason or reasons for disapproval and shall specify the changes or additions necessary to make the plan acceptable to the Department. In the event that the person responsible for a source fails to resubmit a plan or fails to resubmit a plan in accordance with the changes or additions recommended by the Department, the Department, in addition to any other remedies available to it under this Article, shall have the authority to issue an order to that person detailing the procedures for that person to following during the various stages of an air pollution episode and which shall be considered the source curtailment plan for that source.
- g. Any person responsible for operation of a source for which a source curtailment plan has been submitted shall advise the Department in writing of any changes affecting the technical content or the implementation of the plan within 30 days of their occurrence. Such submittals shall be processed according to the procedures described in Subsection f above.
- h. The Department may, upon its determination that particular sources are adversely contributing to an air pollution episode, order such sources to implement the procedures of their source curtailment plans. Upon notification by the Department of the existence of an episode and the need to implement the source curtailment plan, the person responsible for the source affected shall immediately implement such plan. If an Air Pollution Episode or Localized Incident occurs during the period when a source curtailment plan is under review by the Department, such plan shall be implemented, provided, however, that if such plan is not acceptable to the Department, other curtailment action shall be taken as specified by the Department.

§2106.03 EPISODE CRITERIA

a. County-wide Air Pollution Watch Declaration Criteria and Alert Declaration Criteria.

1. **County-wide Air Pollution Watch:** A County-wide Air Pollution Watch shall be declared by the Department when either of the following conditions has been met:
 - A. The Department has received a meteorological forecast that for the next 36-hour period or more a condition exists in which atmospheric dispersion parameters may lead to an air pollution episode throughout Allegheny County; or
 - B. The Department has received a meteorological forecast that for the past 12 hours a condition has existed in which atmospheric dispersion parameters may lead to an air pollution episode throughout Allegheny County, and that this condition will continue for at least the next 24 hours.

2. **First Stage Alert:** The Department may declare a First Stage Alert to exist if, during a County-wide Watch period, any of the following values have been equalled or exceeded at any official monitoring station judged by the Department to be in acceptable working condition, and the Department has obtained a forecast that for the next 24 hours or more atmospheric dispersion parameters conducive to the poor dispersion of air contaminants will exist.

The First Stage Alert values are:

Sulfur Dioxide (SO ₂)	0.30 ppm, 24-hour average
PM-10	350 ug/m ³ , 24-hour average
Carbon Monoxide (CO)	15 ppm, 8-hour average
Nitrogen Dioxide (NO ₂)	either 0.6 ppm, 1-hour average, or 0.15 ppm, 24-hour average
Ozone	0.2 ppm, 1-hour average

3. **Second Stage Alert:** The Department shall declare a Second Stage Alert to exist if, during a County-wide Watch period, any of the following values have been equalled or exceeded at any official monitoring station judged by the Department to be in acceptable working condition, and the Department has obtained a forecast that for the next 12-hour period or more atmospheric dispersion parameters conducive to the poor dispersion of air contaminants will exist.

The Second Stage Alert values are:

Sulfur Dioxide (SO ₂)	0.60 PPM, 24-hour average
PM-10	420 ug/m ³ , 24-hour average
Carbon Monoxide (CO)	30 ppm, 8-hour average
Nitrogen Dioxide (NO ₂)	either 1.2 ppm, 1-hour average or 0.30 ppm, 24-hour average
Ozone	0.40 ppm, 1-hour average

4. **Third Stage Alert:** The Department shall declare a Third Stage Alert to exist if, during a County-wide Watch period, any of the following values have been equalled or exceeded at any official monitoring station judged by the Department to be in acceptable working condition, and the Department has obtained a forecast that for the next 12-hour period or more atmospheric dispersion parameter conducive to the poor dispersion of air contaminants will exist.

The Third Stage Alert values are:

Sulfur Dioxide (SO ₂)	0.80 ppm, 24-hour average
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PM-10	500 ug/m ³ , 24-hour average
Carbon Monoxide (CO)	40 ppm, 8-hour average
Nitrogen Dioxide (NO ₂)	either 1.60 ppm, 1-hour average, or 0.40 ppm, 24-hour average
Ozone	0.60 ppm, 1-hour average

5. **Third Stage Alert (Ozone):** The Department may declare a Third Stage Alert to exist if, during a First or Second Stage ozone alert, the Department has obtained a forecast that within the next 36-hour period Third Stage ozone levels will be reached.

b. **Localized Air Pollution Watch Declaration Criteria and Localized Incident Declaration Criteria.**

1. **Localized Air Pollution Watch:** A Localized Air Pollution Watch shall be declared by the Department when either of the following conditions has been met:
 - A. The Department has received a meteorological forecast that for the next 24-hour period atmospheric dispersion parameters will exist which are conducive to an air pollution episode only in a limited portion of Allegheny County; or
 - B. The Department has received a meteorological forecast that atmospheric dispersion parameters which are conducive to an air pollution episode only in a limited portion of Allegheny County have existed for 12 hours and will continue for at least the next 12 hours.
2. **First Level Localized Incident:** The Department may declare a First Level Localized Incident to exist if any of the following values have been equalled or exceeded at an official monitoring station where a Localized Watch is in effect, if the station is judged by the Department to be in acceptable working condition and is located in a specific portion of Allegheny County for which the Department has obtained a forecast that for the next 12 hours or more atmospheric dispersion parameters conducive to the poor dispersion of air contaminants will exist.

The First Level Localized Incident values are:

Sulfur Dioxide (SO ₂)	0.45 ppm, 24-hour average
PM-10	385 ug/m ³ , 24-hour average

3. **Second Level Localized Incident:** The Department may declare a Second Level Localized Incident to exist if any of the following values have been equalled or exceeded at an official monitoring station where a Localized Watch is in effect, if the station is judged by the Department to be in acceptable working condition and is located in a specific portion of Allegheny County for which the Department has obtained a forecast that for at least the next six hours atmospheric dispersion parameters conducive to the poor dispersion of air contaminants will exist.

Second Level Localized Incident values are:

Sulfur Dioxide (SO ₂)	0.70 ppm, 24-hour average
PM-10	460 ug/m ³ , 24-hour average

4. **Third Level Localized Incident:** The Department may declare a Third Level Localized Incident to exist if any of the following values have been equalled or exceeded at an official monitoring station where a Localized Watch is in effect, if the station is judged by the Department to be in acceptable working condition and is located in a specific portion of Allegheny County for which the Department has obtained a forecast that for at least the next six hours atmospheric dispersion parameters conducive to the poor dispersion of air contaminants will exist.

Third Level Localized Incident values are:

Sulfur Dioxide (SO ₂)	0.8 ppm, 24-hour average
PM-10	500 ug/m ³ , 24-hour average

c. Termination Criteria

1. The Department shall terminate any Alert or Localized incident when the respective Declaration Criteria no longer are exceeded or when a meteorological forecast is received that for the next 24-hour period conditions conducive to the good dispersion of air contaminants will exist. The latter criterion only will be used to terminate a Watch.
 2. Upon the termination of any Alert or Localized Incident, the Department shall make a public announcement to that effect and shall also notify those persons who were required to implement source curtailment plans.
 3. Upon the termination of a Second or Third Stage Alert, or a Second or Third Level Localized Incident, the Department shall prepare and make available to the Board of Health, the Advisory Committee and to the public a report on the severity and duration of the preceding air pollution episode and the nature and effectiveness of measures taken to control the episode.
- d. With respect to the criteria for PM-10 in 2106.03.a.2, a.3, a.4, b.2, b.3, and B.4, the Department may substitute a value based upon the average of all of the quantitative site-specific COH-PM-10 relationships in the County that are deemed reliable by the Department where, in its judgment, a reliable site-specific value has not been determined pursuant to Section 2106.03.d above.
- e. The site-specific relationship established for each air quality monitoring station shall be re-evaluated on a periodic basis.
- f. The site-specific relationships and the verifying data used to determine the criteria for PM-10 under Section 2106.03.d above shall be kept on file at the Department and shall be available for public inspection as provided in §2101.07 of this Article.

§2106.04 EPISODE ACTIONS

- a. **Air Pollution Watch Actions.** Upon declaration of an air pollution Watch:
1. The Department shall review air quality information for the past 24-hour period, determine the current operational status of the air pollution monitoring network, and continue to compute all relevant air quality indices.
 2. The Department shall notify all sources of air pollution that require advance preparation time that a Watch has been declared and that within a short period of time air pollution emissions reductions may have to be effected.
 3. The Department shall notify all affected staff and affected Local, State, and Federal agencies that a Watch is in effect and that coordination of episode control actions may be required.
- b. **First Stage Alert Actions.** Upon declaration of a First Stage Alert:
1. The Department shall determine which source curtailment plans should be placed in effect and in which area and notify those sources to institute First Stage Alert curtailment actions.

2. The Department shall notify all affected Local, State, and Federal agencies that a First Stage Alert is in effect and that coordination of episode control actions may be required.
 3. The Department shall inform the public via the mass media that a First Stage Alert is in effect. The Public may be requested to curtail use of automobiles and electricity in the alert area and to otherwise take actions required by this Article. Individuals sensitive to high levels of air pollution shall be advised to take precautionary measures.
 4. All open burning of tree waste, vegetation, refuse, or debris of any form shall be prohibited in the alert area, notwithstanding any open burning permit which has been issued.
 5. Incinerators used for the disposal of solid or liquid waste in the alert area shall be permitted to operate only between the hours of 12:00 Noon and 4:00 P.M., unless otherwise provided for by individual source curtailment plans.
- c. **Second Stage Alert Actions.** Upon the declaration of a Second Stage Alert:
1. The Department shall determine which source curtailment plans should be placed in effect and in which areas and notify those sources to institute Second Stage Alert curtailment actions.
 2. The Department shall notify each Allegheny County Commissioner, each Board of Health Member, and all affected Local, State, and Federal agencies that a Second Stage Alert is in effect and that coordination of episode control actions may be required.
 3. The Department shall inform the public via the mass media that a Second Stage Alert is in effect. The public shall be requested to curtail use of automobiles and electricity in the alert area and to otherwise take actions required by these regulations. Commercial establishments involved in retail trade, amusement and recreation, office buildings, and all other businesses and institutions shall be requested by the Department to voluntarily reduce their consumption of electricity and to minimize heating, cooling and ventilating of their buildings and offices. The Department shall advise those individuals deemed to be particularly sensitive to high levels of air pollution to take precautionary measures.
 4. All open burning of tree waste, vegetation, refuse or debris, of any form shall be prohibited in the alert area, notwithstanding any open burning permit which has been issued.
 5. Incinerators used for the disposal of solid or liquid wastes in the alert area shall not be operated with the exception of those used for the incineration of pathogenic materials for which written permission to operate has been obtained from the Department, or unless otherwise provided for by individual source curtailment plans.
- d. **Third Stage Alert Actions.** Upon the declaration of a Third Stage Alert:
1. The Department shall notify each Allegheny County Commissioner, each Board of Health Member, and all affected Local, State, and Federal agencies that a Third Stage Alert is in effect and that coordination of episode control action is required.
 2. The Department shall inform the public via mass media that a Third Stage Alert is in effect and the extent of the area affected. Those individuals deemed to be particularly sensitive to high levels of air pollution shall be advised to take appropriate precautionary measures. Hospitals shall be informed that a Third Stage Alert has been declared and that increased demand upon their facilities may be imminent. Public buildings, apartment houses, commercial facilities, air pollution sources permitted to operate during a Third Stage Alert, office buildings, and other buildings, offices and

factories listed in the episode master plan shall be required to minimize heating, air conditioning, and ventilation.

3. Second Stage Alert prohibitions of open burning and incineration shall remain in effect during the Third Stage Alert.
 4. The Department shall determine which source curtailment plans should be placed in effect and in which areas and notify those sources to institute Third Stage Alert curtailment actions.
 5. The Department shall determine the likely extent of the area containing sources responsible for the exceedance of Third Stage levels. For that area, the Department shall determine which activities described hereafter, in addition to those with source curtailment plans, shall immediately be curtailed to the extent possible without causing injury to persons or substantial damage to equipment, and shall make appropriate public announcements to this effect.
 - A. Mining and quarrying.
 - B. Construction work.
 - C. Airplane flights into and out of the major airports within that area, with the exception of those required for public health or safety as approved by the Department.
 - D. Other activities and places of business announced by the Chairman of the Board of County Commissioners.
 - E. All places of employment described hereafter which are located in areas known to have significant concentrations of motor vehicle activity.
 - i. Manufacturing establishments.
 - ii. Places of business and public offices and institutions, with the exception of the following:
 - (a.) Retail food stores.
 - (b.) Health care facilities.
 - (c.) Pharmacies.
 - (d.) Government agencies, boards, authorities, courts, and other public or private offices whose services are needed to administer and enforce the Air Pollution Episode Program or have been determined by the Department to be vital to the public safety, health or welfare.
 - (e.) News media.
 - (f.) Others as approved by the Department.
- e. **Localized Incident Actions.** Upon the declaration of a Localized incident:
1. The Department shall review air quality information for the past 24-hour period, determine the current operational status of the air pollution monitoring network, and continue to compute all relevant air quality indices.

2. The Department shall notify all affected staff and affected Local, State, and Federal agencies that a Localized Incident is in effect and that coordination of episode control actions may be required. The Department shall notify each Allegheny County Commissioner and each Board of Health Member upon the declaration of a Second or Third Level Incident.
3. The Department shall determine which source curtailment plans should be placed in effect and in which area and notify those sources to institute curtailment actions for the appropriate declared Localized Incident Level.
4. The Department shall inform the public via the mass media that a Localized Incident is in effect. Individuals sensitive to high levels of air pollution shall be advised to take precautionary measures.