Subpart H—Standards of Performance for Sulfuric Acid Plants

§ 60.80 Applicability and designation of affected facility.

(a) The provisions of this subpart are applicable to each sulfuric acid production unit, which is the affected facility. Any facility under paragraph (a) of this section that commences construction or modification after August 17, 1971, is subject to the requirements of this subpart.

[42 FR 37936, July 25, 1977]

§ 60.81 Definitions.

As used in this subpart, all terms not defined herein shall have the meaning given them in the Act and in subpart A of this part.

(a) Sulfuric acid production unit means any facility producing sulfuric acid by the contact process by burning elemental sulfur, alkylation acid, hydrogen sulfide, organic sulfides and mercaptans, or acid sludge, but does not include facilities where conversion to sulfuric acid is utilized primarily as a means of preventing emissions to the atmosphere of sulfur dioxide or other sulfur compounds.

(b) Acid mist means sulfuric acid mist, as measured by Method 8 of appendix A to this part or an equivalent or alternate method.


§ 60.82 Standard for sulfur dioxide.

(a) On and after the date on which the performance test required to be conducted by §60.8 is completed, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any affected facility any gases which:

(1) Contain acid mist, expressed as \( \text{H}_2\text{SO}_4 \), in excess of 0.075 kg per metric ton of acid produced (0.15 lb per ton), the production being expressed as 100 percent \( \text{H}_2\text{SO}_4 \).

(2) Exhibit 10 percent opacity, or greater.

[39 FR 20794, June 14, 1974, as amended at 40 FR 46258, Oct. 6, 1975]

§ 60.83 Standard for acid mist.

(a) On and after the date on which the performance test required to be conducted by §60.8 is completed, no owner or operator subject to the provisions of this subpart shall cause to be discharged into the atmosphere from any affected facility any gases which:

\[
\begin{align*}
\text{CF} &= k \left( 1.000 - 0.015 r \right) / \left( r - s \right) \\
\text{CF} &= \text{conversion factor (kg/metric ton per ppm, lb/ton per ppm)} \\
k &= \text{constant derived from material balance.} \\
&= 0.0653 \quad \text{for determining CF in metric units,} \\
&= 0.1306 \quad \text{for determining CF in English units,} \\
r &= \text{percentage of sulfur dioxide by volume entering the gas converter.} \\
s &= \text{percentage of acid mist} \\
\end{align*}
\]

The conversion factor shall be determined, as a minimum, three times daily by measuring the concentration of sulfur dioxide entering the gas converter using suitable methods (e.g., the Reich test, National Air Pollution Control Administration Publication No. 999–AP–13) and calculating the appropriate conversion factor for each eight-hour period as follows:

\[
\text{CF} = k \left( 1.000 - 0.015 r \right) / \left( r - s \right)
\]

where:

\[
\begin{align*}
\text{CF} &= \text{conversion factor (kg/metric ton per ppm, lb/ton per ppm).} \\
k &= \text{constant derived from material balance.} \\
&= 0.0653 \quad \text{for determining CF in metric units,} \\
&= 0.1306 \quad \text{for determining CF in English units,} \\
r &= \text{percentage of sulfur dioxide by volume entering the gas converter.} \\
s &= \text{percentage of acid mist} \\
\end{align*}
\]

appropriate corrections must be made for air injection plants subject to the Administrator’s approval.