

**NATIONAL ENVIRONMENTAL QUALITY STANDARDS FOR
INDUSTRIAL GASEOUS EMISSION (mg/Nm³,
UNLESS OTHERWISE DEFINED)**

S. No.	Parameter	Source of Emission	Existing Standards	Revised Standards
1	2	3	4	5
1	Smoke	Smoke opacity not to exceed	40% or 2 Ring-lemann Scale	40% or 2 Ring-lemann Scale or equivalent smoke number
2	Particulate matter ⁽¹⁾	(a) Boilers and furnaces:		
		(i) Oil fired	300	300
		(ii) Coal fired	500	500
		(iii) Cement Kilns	200	300
		(b) Grinding, crushing, clinker coolers and related processes, metallurgical processes, converters, blast furnaces and cupolas.	500	500
3	Hydrogen Chloride	Any	400	400
4	Chlorine	Any	150	150
5	Hydrogen Fluoride	Any	150	150
6	Hydrogen Sulphide	Any	10	10
7	Sulphur Oxidest ⁽²⁾ ⁽³⁾	Sulfuric acid / Sulphonic acid plants	400	5000
		Other plants except power plants operating on oil and coal	400	1700
8	Carbon Monoxide	Any	800	800
9	Lead	Any	50	50
10	Mercury	Any	10	10
11	Cadmium	Any	20	20
12	Arsenic	Any	20	20
13	Copper	Any	50	50

14	Antimony	Any	20	20
15	Zinc	Any	200	200
16	Oxides of Nitrogen (³)	Nitric acid manufacturing unit	400	3000
		Other plants except power plants operating on oil or coal:		
		Gas fired	400	400
		Oil fired	-----	600
		Coal fired	-----	1200

Explanations:

1. Based on the assumption that the size of the particulate is 10 micron or more.
2. Based on 1 percent sulphur content in fuel oil. Higher content of sulphur will cause standards to be pro-rated.
3. In respect of emissions of sulphur dioxide and nitrogen oxides, the power plants operating on oil and coal as fuel shall in addition to National Environmental Quality Standards (NEQS) specified above, comply with the following standards:-

A. Sulphur Dioxide

Sulphur Dioxide Background levels Micro-gram per cubic meter ug/m3 Standards				
Background Air Quality (SO ₂ Basis)	Annual Average	Max. 24 hours Interval	Criterion I Max. SO ₂ Emission (Tons per Day per plant)	Criterion II Max. Allowable ground level increment to ambient (ug/m3)
(One Year Average)				
Unpolluted	< 50	< 200	500	50
Moderately Polluted *				
Low	50	200	500	50
High	100	400	100	10
Very Polluted **	> 100	> 400	100	10

- * For intermediate values between 50 and 100 ug/m³ linear interpolations should be used.
- ** No projects with sulphur dioxide emissions will be recommended.

B. Nitrogen Oxide

Ambient air concentrations of nitrogen oxides, expressed as NO₂ should not be exceed the following:-

Annual Arithmetic Mean	100ug/m ³ (0.05 ppm)
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Emission levels for stationary source discharges, before mixing with the atmosphere, should be maintained as follows:-

For fuel fired steam generators, as Nanogram (10-gram) per joule of heat input:

Liquid fossil fuel	130
Solid fossil fuel	300
Lignite fossil fuel	260

Note:- Dilution of gaseous emissions to bring them to the NEQS limiting value is not permissible through excess air mixing blowing before emitting into the environment.

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Sd/-

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