

 Eskom	Monthly Report	Matla Power Station
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Title: **Matla Power Station Monthly Emissions Report**

Document Identifier: **06C-31482**

Alternative Reference **31482**  
Number:

Area of Applicability: **Matla Power Station**



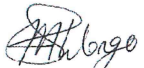
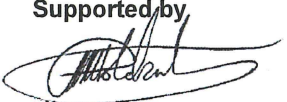
Functional Area: **Environmental Department**




Revision: **0**

Total Pages: **12**

Next Review Date: **July 2027**

Disclosure Classification: **Controlled Disclosure**

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## 1. Introduction

### MATLA POWER STATION MONTHLY EMISSIONS REPORT FOR THE MONTH OF AUGUST 2024

This document serves as the monthly emissions report required in terms of Section 7.6 of Matla Power Station Provisional Atmospheric Emission License (AEL), 17/4/AEL/MP312/11/14

This report reflects Unit 1 to Unit 6 gaseous and particulate emissions performance against the AEL limit for the month of August 2024 only.

## 2. Raw Materials and Products

Table 1- Quantity of Raw Materials and Products Consumption in 08/2024

Raw Materials and Products used	Raw Material Type	Unit	Maximum Permitted Consumption/ Rate (Quantity)	Consumption – 08/2024
	Coal	Tons/month	1 475 000	815178
	Fuel Oil	Tons/month	3 500	662.9
Production Rates	Product/ By-Product Name	Unit	Maximum Production Capacity Permitted (Quantity)	Production Rate in Month of 08/2024
	Energy	GWh	2 745	1505
	Ash Emitted	Tons/month	471 000	1118.3

## 3. Abatement Technology

Table 2-Abatement Equipment Control Technology Efficiency in 07/2024

Associated Unit/Stack	Technology Type	Efficiency	ESP Utilization
South Stack (Unit 1, 2 and 3)	Electrostatic Precipitators (ESP)	99.235%	100%
	Electrostatic Precipitators (ESP)		
	Electrostatic Precipitators (ESP)		
Unit 4	Electrostatic Precipitators (ESP)	99.474%	100%
Unit 5	Electrostatic Precipitators (ESP)	99.808%	100%
Unit 6	Electrostatic Precipitators (ESP)	99.708%	100%

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#### 4. Energy Source Characteristics

Table 3: Energy Source Material Characteristics for 08/2024

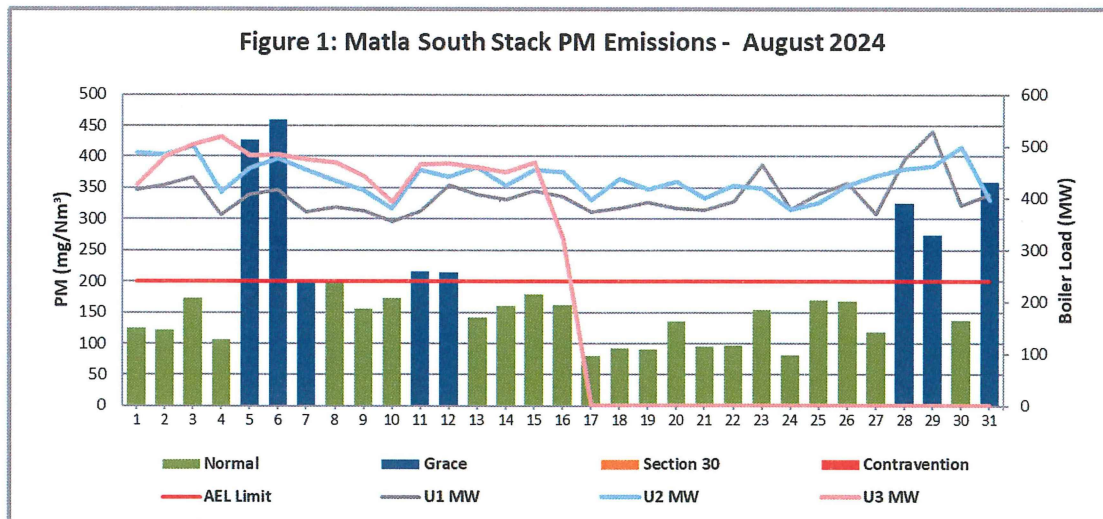
Characteristic	Stipulated Range (% by weight on a dry basis)	Monthly Average Content (% by weight on a dry basis)
	Coal	
Sulphur Content	0.8-1.1	1.00
Ash Content	21-40	28.31

#### 5. Emissions Reporting

Table 4- Emission Limits are as follows:

SO <sub>2</sub> Monthly = 3500 mg/Nm <sup>3</sup>	Dust Daily= 200 mg/Nm <sup>3</sup> (South Stack and Unit 4) Dust Daily= 100 mg/Nm <sup>3</sup> (Unit 5 and 6)	NO <sub>2</sub> Daily= 1200 mg/Nm <sup>3</sup>
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##### 5.1 PM Daily Averages



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Figure 2: Matla Unit 4 PM Emissions - August 2024

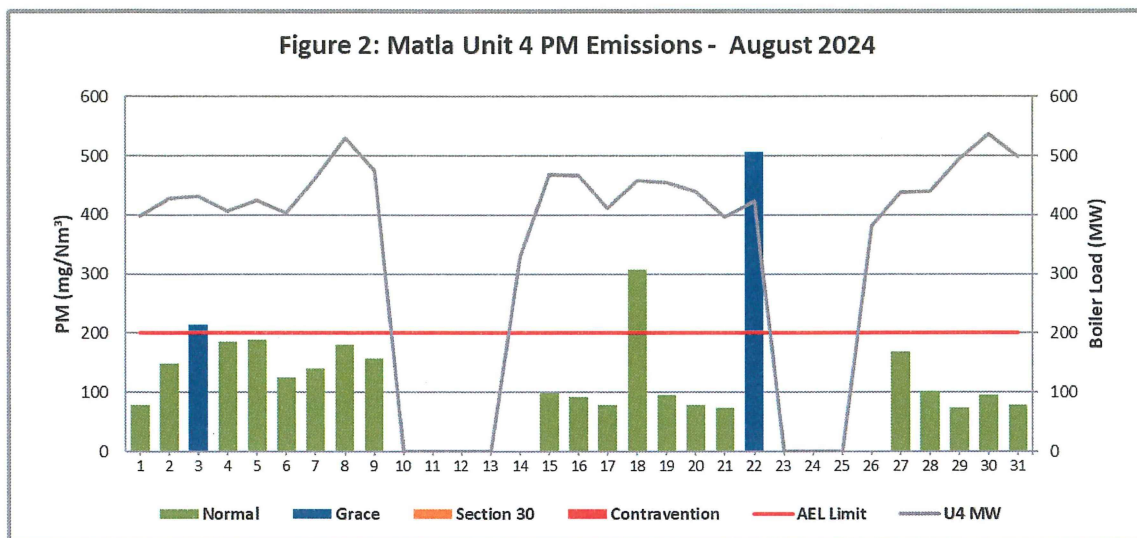
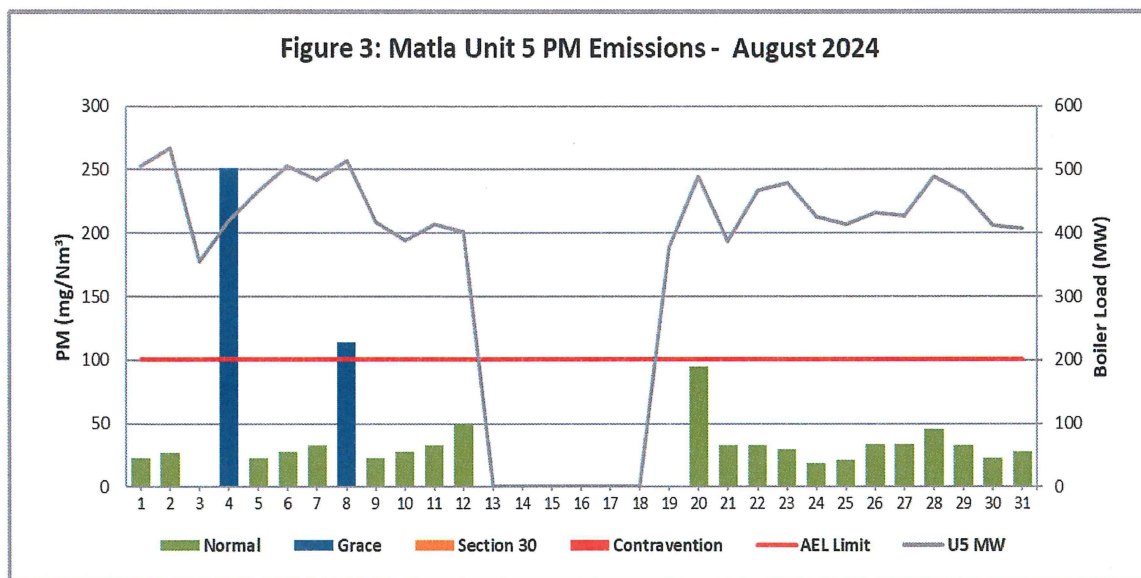
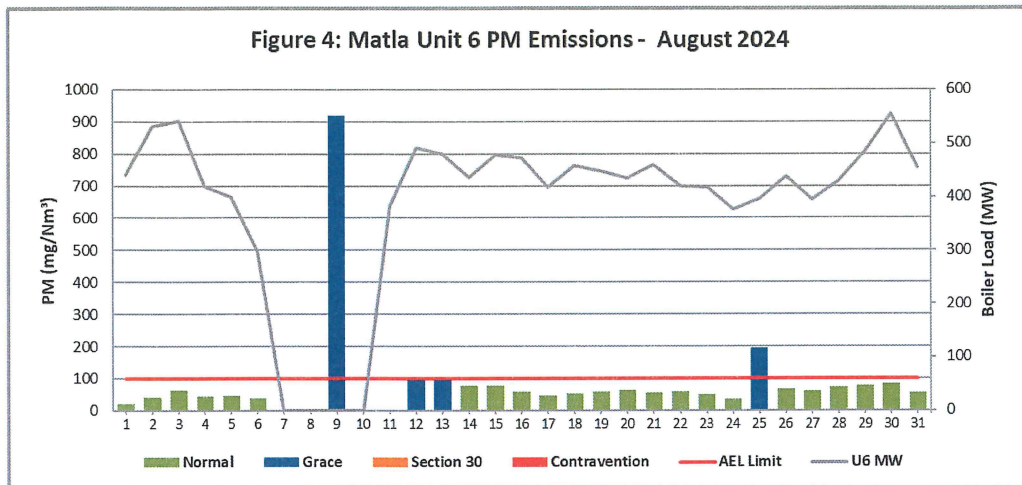


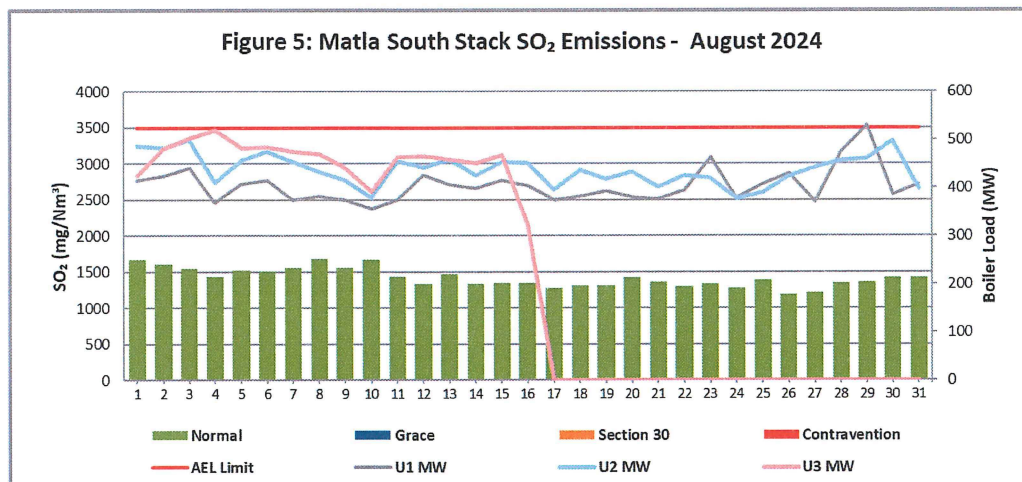
Figure 3: Matla Unit 5 PM Emissions - August 2024



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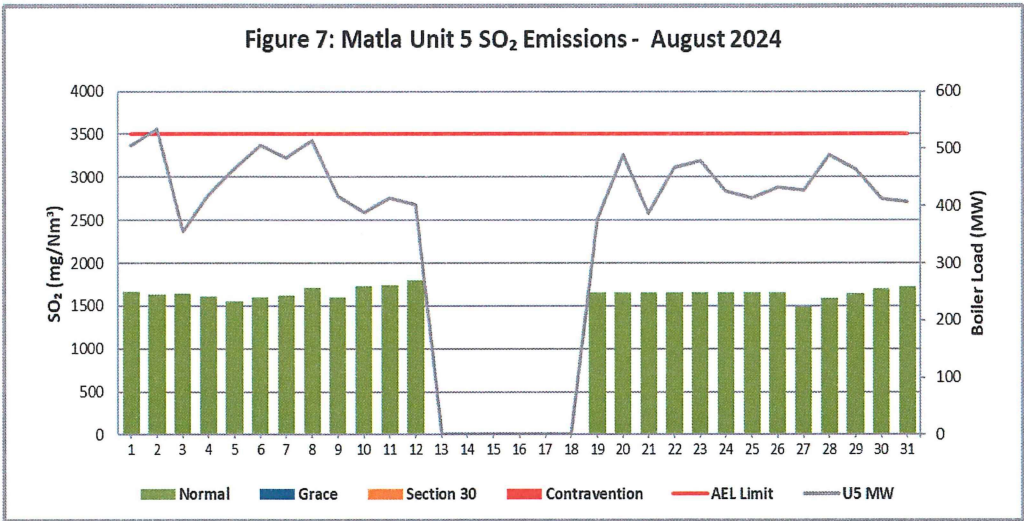
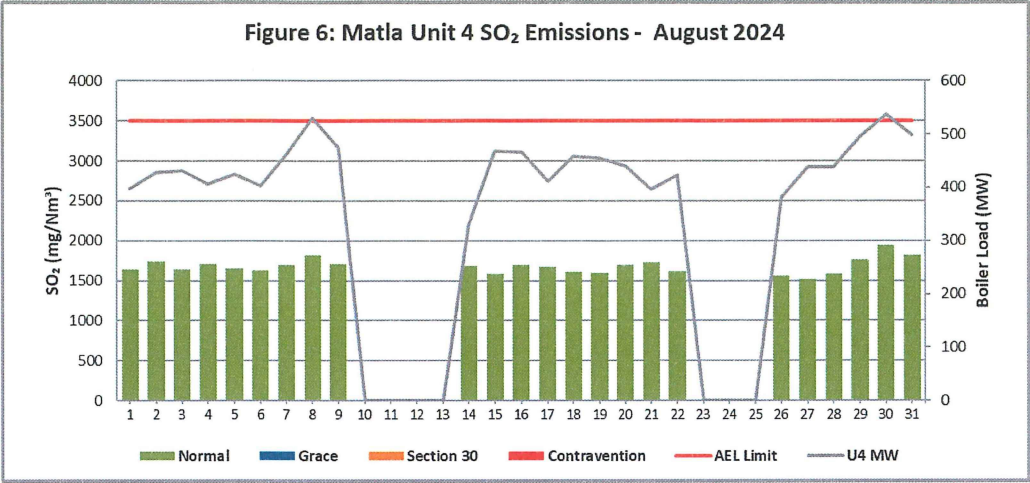


## 5.2 Sox Daily Averages



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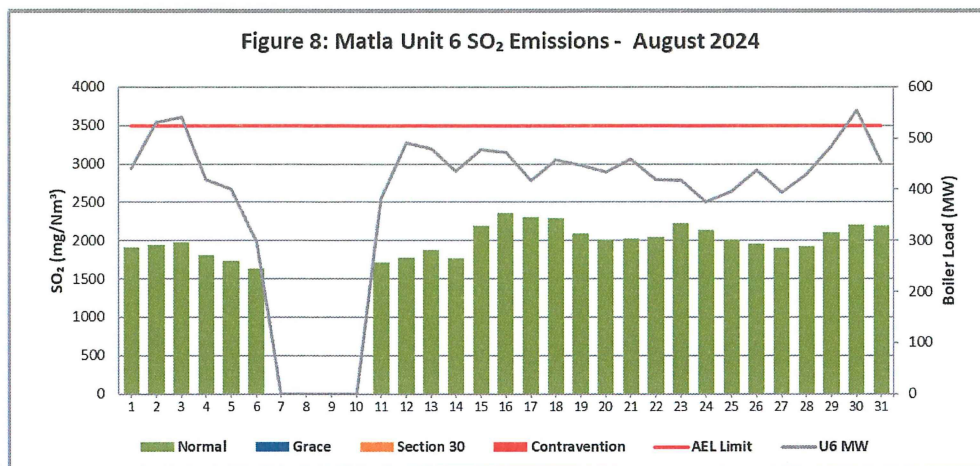
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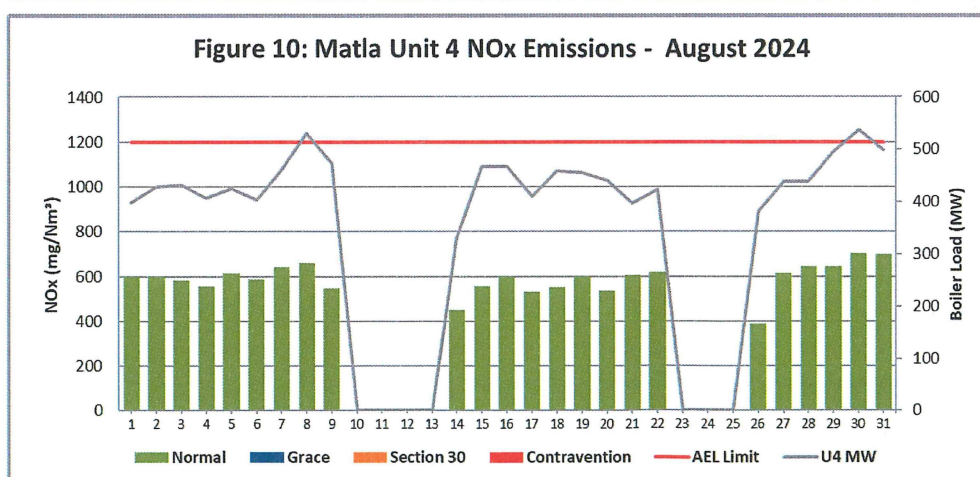
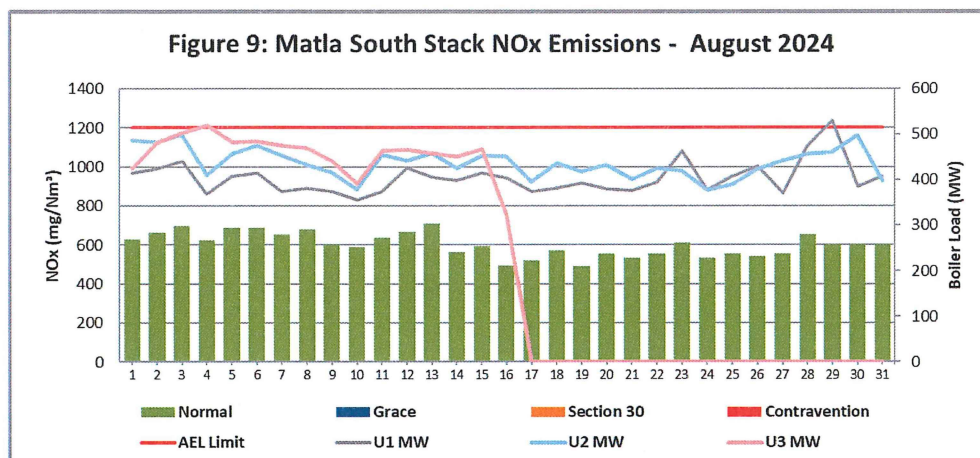
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### 5.3 NO<sub>x</sub> Daily Averages



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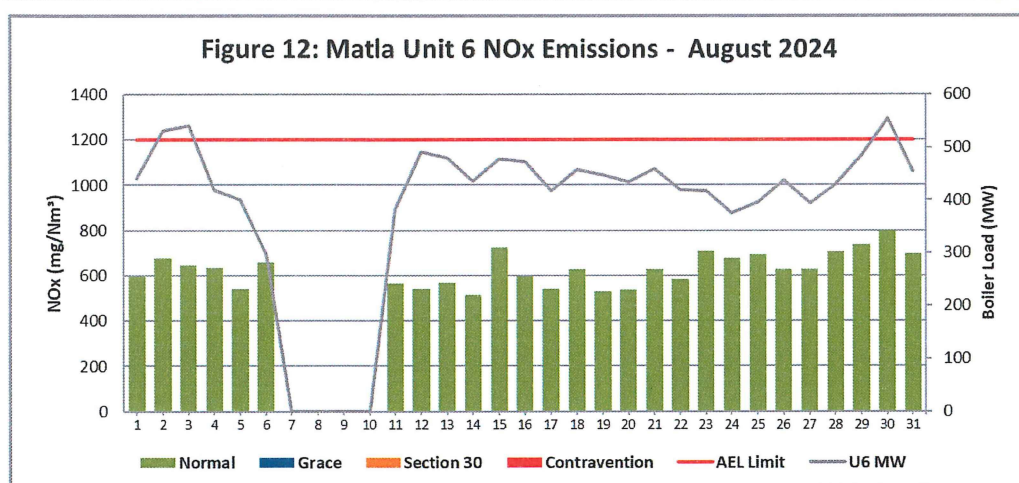
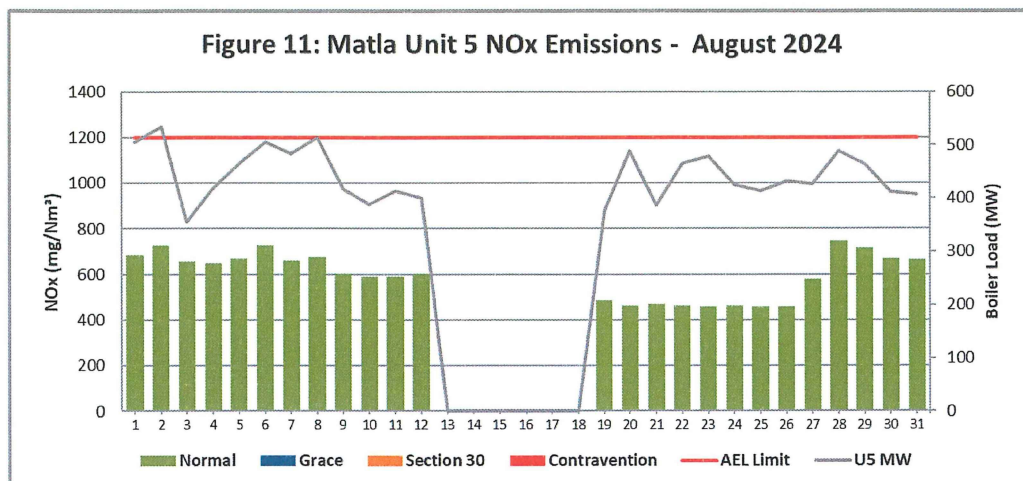


Table 5-Monthly Tonnages for 08/2024

Associated Unit/Stack	PM	SO <sub>2</sub>	NO <sub>2</sub>
Unit 1	206.2	1 621.0	686.8
Unit 2	446.1	3 504.8	1 486.1
Unit 3	155.1	1 150.0	490.0
Unit 4	166.9	1 932.6	695.3
Unit 5	44.0	1 797.4	657.5
Unit 6	100.0	3 082.2	967.2
SUM	1 118.3	13 088.0	4 983.0

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Table 6-Monthly Averages Concentration for 08/2024 in mg/Nm<sup>3</sup>

Associated Unit/Stack	PM	SO <sub>2</sub>	NO <sub>2</sub>
South Stack	180.4	1 420.4	601.6
Unit 4	148.7	1 679.8	588.6
Unit 5	46.0	1 649.6	597.4
Unit 6	65.6	2 004.8	629.2

## 6. Continuous Emissions Monitoring System (CEMS)

Table 7- Periods during which was inoperative/malfunctioning.

Date	CEMS status	Comments
16 July 2024 to 08 August 2024	Malfunctioning	<p>Matla Unit 5 Dust (PM) Monitor was malfunctioning from 16 July 2024 to 08 August 2024.</p> <p>The monitor was changed on the 25<sup>th</sup> of July 2024; however, the new installed monitor was still malfunctioning. Upon investigation it was found that that when monitor shutter failed, the shutter seal slightly peeled off (tear off). The seal slightly protruded into monitor measuring path and this seal was seen by the monitor as constant dust. This seal was removed to clear the measuring path and restarted the monitor.</p> <p>A Spot check Measurement was done on the 06 August 2024 and the curve was Implemented for August 2024, however average values of PM were used for 4 days after the 8th and backfitted to the 1st of August 2024 for Accurate reporting.</p>

Table 8-CEMS Monitor Reliability Percentage

Associated Unit/Stack	PM	SO <sub>2</sub>	NO <sub>2</sub>	O <sub>2</sub>
South Stack	98.4	98.8	98.9	92.5
Unit 4	99.0	96.9	97.2	99.3
Unit 5	82.6	65.7	99.8	100.0
Unit 6	99.7	97.4	97.5	99.2

## 7. CEMS Calibration and Equipment Used for Calibration

Calibration certificates to be made available upon request.

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## 8. Validity of Correlation and Parallel Test

Table 9-Validity of Correlation and Parallel Test.

Associated Unit/Stack	Correlation Test (PM)	Parallel Test (NO <sub>2</sub> , CO <sub>2</sub> , O <sub>2</sub> , SO <sub>2</sub> )
South Stack	Invalid Since 31 August 2024, test to please done after Unit 1 opportunity Outage to fix the damaged Precips – Target completion Date for the Test is 15 October 2024	Valid until 30 October 2025
Unit 4	Valid until 30 July 2025	Valid until 30 April 2025
Unit 5	Invalid – Spot measurement was done 06/08/2024 and Valid for 3 months	Valid until 30 April 2025
Unit 6	Valid until 02 August 2026	Valid until 30 June 2025

## 9. Complaint Register

Table 10-Complaints for the month of 08/2024

Source Code/ Name	Air pollution complaints received	Calculation of Impacts/ emissions associated with the incident	Date complaint and date of response by the license holder	Action taken to resolve the complaint	Date when the action was implemented.
N/A	N/A	N/A	N/A	N/A	N/A

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