



# GRAPHITE INDIA LIMITED

DURGAPUR-713211, DIST. - BURDWAN  
E-MAIL : general\_dgp@graphiteindia.com

To  
The Member Secretary  
State Level Environment Impact Assessment Authority (SEIAA)  
Prani Sampad Bhavan, 5<sup>th</sup> Floor, LB-2  
Sector-III, Salt Lake, Kolkata-700106  
Email ID: - msseiaa.wb@gmail.com

Dt: 02.06.2023

Sub.: Submission of Six Monthly Compliance Report for the period of October 2022  
to March 2023  
EC Ref.No. : EN/T-II-1/128/2021, Date 10/03/2023

Sir,

We are pleased to submit the six monthly compliance reports along with necessary enclosures regarding "Proposed Expansion of Capacity from 52 KTPA to 67 KTPA" by Graphite India Limited, JL No. – 85 & 92, Vill – Sararbhang, Durgapur, Dist. – Paschim Bardhaman, West Bengal.

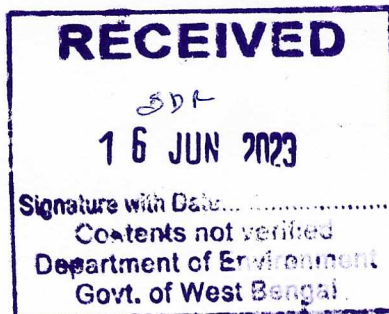
The Compliance Report has been prepared against the conditions mentioned in the Environmental Clearance vide Ref. no. EN/T-II-1/128/2021, Date 10/03/2023

We hope that you will do the needful in this regard.

Thanking you

Yours Faithfully,  
For Graphite India Limited.

  
Ranadeep Chakraborty  
(Vice President Works)



Registered Office : 31, Chowringhee Road, Kolkata - 700016  
CIN - L10101WB1974PLC094602  
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# GRAPHITE INDIA LIMITED

DURGAPUR-713211, DIST. - BURDWAN  
E-MAIL : general\_dgp@graphiteindia.com

To  
The Member Secretary  
West Bengal Pollution Control Board  
Paribesh Bhawan, 10A, Block - LA,  
Sector- III, Bidhannagar,  
Kolkata - 700 098

Date: 02.06.2023



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# SIX MONTHLY COMPLIANCE REPORT

OCTOBER 2022 TO MARCH 2023



## Graphite India Limited

**Village – Sagarbhangra, Taluk – Durgapur,  
District – Paschim Bardhaman, West Bengal –  
713211**

## COMPLIANCE STATUS REPORT ON ENVIRONMENTAL CLEARANCE

### GRAPHITE INDIA LIMITED

Village – Sagarbhangha, Taluk – Durgapur, District – Paschim  
Bardhaman, West Bengal – 713211

F. No. : EN/T-II-1/128/2021 date : 10/03/2023

#### I. Statutory compliance

| Sl.  | Compliance conditions   | : | Compliance status   |
|------|---|---|---|
| i.   | The project proponent shall obtain forest clearance under the provisions for Forest (Conservation) Act, 1986, in case of the diversion of forest land for non-forest purpose in the project.  | : | The project proponent does not required forest clearance as the expansion project is in the existing industrial land.   |
| ii.  | The project proponent shall obtain clearance from the National Board for Wildlife, if applicable.   | : | It is not applicable as the expansion project is in the existing industrial land.   |
| iii. | The project proponent shall prepare a Site-Specific Conservation Plan & Wildlife Management Plan and approved by the Chief Wildlife Warden. The recommendations of the approved Site-Specific Conservation Plan/Wildlife Management Plan shall be implemented in consultation with the State Forest Department. The implementation report shall be furnished along with the six-monthly compliance report. (in case of the presence of schedule-I species in the study area). | : | Site-Specific Conservation Plan & Wildlife Management Plan does not required for this project as there is no Schedule I species present in the 10 km radius of the project. |

| Sl.  | Compliance conditions   | : | Compliance status  |
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| iv.  | The project proponent shall obtain Consent to Establish/Operate under the provisions of Air (Prevention & Control of Pollution) Act, 1981 and the Water (Prevention & Control of Pollution) Act, 1974 from the concerned State Pollution Control Board Committee.       | : | The project proponent will obtain Consent to Operate for expansion project. Consent to Establish has been obtained. Consent to operate for existing project are attached as <b>Annexure – 1</b> .  |
| v.   | The project proponent shall obtain the necessary permission from the Central Ground Water Authority, in case of drawl of ground water/ from the competent authority concerned in case of drawl of surface water required for the project.                               | : | There is no drawl of ground water.   |
| vi.  | The project proponent shall obtain authorization under the Hazardous and the other Waste Management Rules, 2016 as amended from the time to time.   | : | For existing Authorization under the Hazardous and the other Waste Management Rules, 2016 has been obtained. See <b>Annexure – 2</b> . For expansion part HW authorization will be applied after getting CTO.  |
| vii. | The company shall strictly comply with the rules and guidelines under Manufactures, Storage and Import of Hazardous Chemicals (MSHIC) Rules, 1989 as amended time to time. All transportation of Hazardous Chemicals shall be as per the Motor Vehicle Act (MVA), 1989. | : | The company will applicable rules and guidelines. comply with the rules and guidelines under Manufactures, Storage and Import of Hazardous Chemicals (MSHIC) Rules, 1989 as amended time to time. All transportation of Hazardous Chemicals shall be as per the Motor Vehicle Act (MVA), 1989. |
| ii.  | <b>Air quality monitoring and preservation</b>  |   |  |
| i.   | The project proponent shall install 24x7 continuous emission system at process stacks to monitor stack emission with respect to standards prescribed in Environment (Protection) Rules, 1986 and connected to SPCB and CPCB online serves and calibrate                 | : | 24x7 continuous emission system at 15 KTPA expansion project process stack to monitor stack emission with respect to standards prescribed in Environment (Protection) Rules, 1986 will be installed.   |



| Sl.  | Compliance conditions   | : | Compliance status  |
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|      | these systems from time to time according to equipment supplier specification through labs recognized under Environment (Protection) Act, 1986 or NABL accredited laboratories.   |   |  |
| ii.  | The project proponent shall monitor fugitive emissions in the plant premises at least once in every quarter through labs recognized under Environment (Protection) Act, 1986.   | : | Fugitive emissions in the plant premises has been monitored. Reports are attached as <b>Annexure – 3</b> .   |
| iii. | The project proponent shall install system to carryout continuous Ambient Air Quality Monitoring for common/criterion parameters relevant to the main pollutants released (e.g. PM <sub>10</sub> and PM <sub>2.5</sub> in reference to PM emission, and SO <sub>2</sub> , and NO <sub>x</sub> in reference to SO <sub>2</sub> and NO <sub>x</sub> emission) within and outside the plant area at least at four locations (one within and three outside the plant area at an angel of 102° each), covering upwind and downwind directions. (case to case basis small plants: Manual; Large plants: Continous). | : | Continuous Ambient Air Quality Monitoring will be installed. The project proponent has monitored Ambient Air Quality from NABL accredited lab. Reports are attached as <b>Annexure – 3</b> .   |
| iv.  | The project proponent shall submit monthly summary report of continuous stack emission and air quality monitoring and results of manual monitoring of air quality/fugitive emissions to Regional Office of Ministry of Environment, Forest & Climate Change / State Environment Impact Assessment Authority /State Pollution Control Board / Zonal office of CPCB along with six-monthly monitoring report.   | : | The project proponent will submit monthly summary continuous report emission of 15 KTPA expansion processes stack and air quality monitoring and results of manual monitoring of air quality/fugitive emissions after installation to Regional Office of Ministry of Environment, Forest & Climate Change / State Environment Impact Assessment Authority /State Pollution Control Board / Zonal office of CPCB along with six-monthly |

| Sl.   | Compliance conditions   | : | Compliance status  |
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|       |   |   | monitoring report. Stack monitoring has been carried out. Reports are attached as <b>Annexure – 3</b> .  |
| v.    | Appropriate Air Pollution Control (APC) system shall be provided for all the dust generating points including fugitive dust from all vulnerable sources, so as to comply prescribed stack emission and fugitive emission standards.                   | : | Appropriate Air Pollution Control (APC) system will be provided for 15 KTPA expansion project and also APC has been provided at all dust generating points for existing units. Photograph has been attached as <b>Annexure – 4</b> . |
| vi.   | Sulphur content should not exceed 0.5% in the coal for use fired boilers to control particulate emission within permissible limits (as applicable). The gaseous emissions shall be dispersed through stack of adequate height as per CPCB guidelines. | : | This condition is not in project configuration.  |
| vii.  | The DG sets shall be equipped with suitable pollution control devices and the adequate stack height so that the emissions are in conformity with the extant regulations and the guidelines in this regard.  |   | The DG sets has been equipped with suitable pollution control devices and with the adequate stack height.  |
| viii. | The National Emission Standards for Petroleum Oil Refinery issued by the Ministry vide G.S.R. 186(E) dated 18th March, 2008 and G.S.R. 595(E) dated 21st August, 2009 as amended from time to time shall be followed.                                 |   | This condition is not in project configuration.  |
| ix.   | The National Emission Standards for Petrochemical (Basic & Intermediates) issued by the Ministry vide G.S.R. 820 (E) dated 9th November, 2012 as amended time to time shall be followed.  |   | This condition is not in project configuration.  |

| Sl.  | Compliance conditions  | : | Compliance status   |
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| x.   | Storage of raw materials, coal etc. shall be either stored in silos or in covered areas to prevent dust pollution and other fugitive emissions.  |   | Storage of raw materials, coal, etc. is stored in covered areas to prevent dust pollution and other fugitive emissions.   |
| iii. | <b>Water quality monitoring and preservation</b>   |   |   |
| i.   | The project proponent shall provide online continuous monitoring of effluent, the unit shall install web camera with night vision capability and flow meters in the channel/ drain carrying effluent within the premises (applicable in case of the projects achieving ZLD).   |   | Presently there is no discharge of effluent of outside the plant. The unit will install web camera with night vision capability and flow meters in the channel/ drain carrying effluent within the premises.  |
| ii.  | The project proponent shall monitor regularly ground water quality at least twice a year (pre and post monsoon) at sufficient numbers of piezometers/ sampling wells in the plant and adjacent areas through labs recognized under Environment (Protection) Act, 1986 and NABL accredited laboratories.  |   | The condition is not in project configuration.  |
| iii. | The project proponent shall submit monthly summary report of continuous effluent monitoring and results of manual effluent testing and manual monitoring of ground water quality to Regional Office of Ministry of Environment, Forests & Climate Change / State Environment Impact Assessment Authority/Zonal office of CPCB/ State Pollution Control Board along with six-monthly monitoring report. |   | Presently there is no discharge outside the plant. Manual monitoring of water quality has been attached as <b>Annexure – 3</b> and same will be submitted to Regional Office of Ministry of Environment, Forests & Climate Change / State Environment Impact Assessment Authority/Zonal office of CPCB/ State Pollution Control Board along with six-monthly monitoring report. |
| iv.  | The effluent discharge shall conform to the standards prescribed under the Environment (Protection) Rules, 1986, or as specified by the State Pollution Control Board while granting   |   | The effluent discharge conforms to the standards prescribed under the Environment (Protection) Rules, 1986, or as specified by the State  |



| Sl.   | Compliance conditions   | : | Compliance status  |
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|       | Consent under the Air / Water Act, whichever is more stringent.   |   | Pollution Control Board while granting Consent under the Air / Water Act, whichever is more stringent.   |
| v.    | As already committed by the project proponent, Zero Liquid Discharge shall be ensured and no waste / treated water shall be discharged outside the premises (applicable in case of the projects achieving the ZLD). |   | Zero Liquid Discharge is ensured and no waste / treated water is discharged outside the premises.  |
| vi.   | Total fresh water requirement shall not exceed the proposed quantity or as specified by the Committee. Prior permission shall be obtained from the concerned regulatory authority / SWID in this regard.            |   | Total fresh water requirement will not exceed the proposed quantity or as specified by the Committee. If required prior permission will be obtained from the concerned regulatory authority / SWID in this regard. |
| vii.  | Process effluent / any wastewater shall not be allowed to mix with storm water. The storm water from the premises shall be collected and discharged through a separate conveyance system.                           |   | Process effluent / any wastewater is not allowed to mix with storm water. The storm water from the premises is collected and discharged through a separate conveyance system.                                      |
| viii. | The project proponent shall practice rainwater harvesting to maximum possible extent.   |   | The project proponent will practice rainwater harvesting as proposed in EIA.   |
| ix.   | The project proponent shall make efforts to minimise water consumption in the complex by segregation of used water, practicing cascade use and by recycling treated water.  |   | The project proponent has made efforts to minimize water consumption in the complex by segregation of used water and by recycling treated/filtered water.  |
| iv.   | <b>Noise monitoring and prevention</b>  |   |  |
| i.    | Acoustic enclosure shall be provided to DG set for controlling the noise pollution.   |   | Acoustic enclosure is provided to DG set for controlling the noise pollution.  |
| ii.   | The overall noise levels in and around the plant area shall be kept well within the   |   | The overall noise levels in and around the plant area is kept well   |

| Sl.  | Compliance conditions   | : | Compliance status   |
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|      | standards by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation.  |   | within the standards by providing noise control measures including acoustic hoods, silencers, enclosures etc. on all sources of noise generation.   |
| iii. | The ambient noise levels should conform to the standards prescribed under E(P)A Rules, 1986 viz. 75 dB(A) during day time and 70 dB(A) during night time.   |   | The ambient noise levels conforms to the standards prescribed under E(P)A Rules, 1986 viz. 75 dB(A) during day time and 70 dB(A) during night time. Reports of existing plant are attached as <b>Annexure – 3</b> .   |
| v.   | <b>Energy Conservation measures</b>   |   |   |
| i.   | The energy sources for lighting purposes shall preferably be LED based.   |   | The energy sources for lighting purposes is LED based.  |
| vi.  | <b>Waste management</b>   |   |   |
| i.   | Hazardous chemicals shall be stored in tanks, tank farms, drums, carboys etc. Flame arresters shall be provided on tank farm and the solvent transfer through pumps.  |   | Hazardous chemicals is stored in as per statutory norms and precaution taken as regulatory requirement.   |
| ii.  | Process organic residue and spent carbon, if any, shall be sent to cement industries. ETP sludge, process inorganic & evaporation salt shall be disposed off to the TSDF.   |   | Process organic residue is not generated. ETP sludge generated and is disposed off to the TSDF.   |
| iii. | The company shall undertake waste minimization measures as below:-<br>a. Metering and control of quantities of active ingredients to minimize waste.<br>b. Reuse of by-products from the process as raw materials or as raw material substitutes in other processes.<br>c. Use of automated filling to minimize spillage.<br>d. Use of Close Feed system into batch reactors. |   | The company has undertaken the waste minimization measures as mentioned in the condition –<br>a. Project proponent has metering and control of quantities of active ingredients to minimize waste.<br>b. By-products are reused or sold.<br>c. Automated filling is used to minimized spillage. |

| Sl.          | Compliance conditions  | : | Compliance status   |
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|              | <p>e. Venting equipment through vapour recovery system.</p> <p>f. Use of high pressure hoses for equipment clearing to reduce wastewater generation.</p>   |   | <p>d. The condition is not in project configuration.</p> <p>e. The condition is not in project configuration.</p> <p>f. The condition is not in project configuration.</p>  |
| <b>vii.</b>  | <b>Green Belt</b>  |   |   |
| <b>i.</b>    | <p>The green belt of 5-10 m width shall be developed in the total project area and also in the compensatory plantation area as proposed by the project proponent. In this regard, O.M. issued by MoEF&amp;CC vide F No 22-2312018.IA.III(Pt.) dated 31.10.2019 should be strictly complied with, as the project is located within the municipal boundaries of Durgapur Municipal Corporation which is declared as Severely Polluted Area. The plantation should be done mainly along the plant periphery, in downward wind direction, and along road sides etc. and also in the colony areas. Selection of plant species shall be as per the CPCB guidelines in consultation with the State Forest Department. The project proponent should follow the plantation plan submitted and uploaded in the PARIVESH portal by them. In addition to greenbelt area within project site, 13,018 sq.m. of greenbelt area to be developed in the colony area, as proposed.</p> |   | <p>A good greenbelt existing plant area. Along the project area 4332 sq.m. plantation area as proposed by project proponent will be developed. The plantation is available along the plant periphery and within the plant area and also in the colony areas to meet the requirement. The project proponent has followed the plantation plan submitted and uploaded in the PARIVESH portal. Photographs are attached as <b>Annexure – 5.</b></p> |
| <b>viii.</b> | <b>Public hearing and Human health issues</b>  |   |   |
| <b>i.</b>    | <p>Emergency preparedness plan based on the Hazard identification and Risk Assessment (HIRA) and Disaster Management Plan shall be implemented.</p>  |   | <p>Emergency preparedness plan based on the Hazard identification and Risk Assessment (HIRA) and</p>  |



| Sl.  | Compliance conditions   | : | Compliance status  |
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|      |   |   | Disaster Management Plan is implemented.   |
| ii.  | The unit shall make the arrangement for protection of possible fire hazards during manufacturing process in material handling. Fire fighting system shall be as per the norms.  |   | The unit has made the arrangement for protection of fire hazards during manufacturing process in material handling. Fire fighting system is as per the norms.  |
| iii. | Training shall be imparted to all employees on safety and health aspects of chemicals handling. Pre- employment and routine periodical medical examinations: for all employees shall be undertaken on regular basis. Training to all employees on handling of chemicals shall be imparted.  |   | Training is imparted to all employees on safety and health aspects to product handling. Routine periodical medical examinations: for all employees is done on regular basis. Health register is maintained. Health register and training photographs have been attached as <b>Annexure – 6</b> . |
| iv.  | The project proponent shall carry out heat stress analysis for the workmen who work in high temperature work zone and provide Personal Protection Equipment (PPE) as per the norms of Factory Act.  |   | This condition is not in project configuration.  |
| v.   | Provision shall be made for the housing of construction labour within the site with all necessary infrastructure and facilities such as fuel for cooking, mobile toilets, mobile STP, safe drinking water, medical health care, creche etc. The housing may be in the form of temporary structures to be removed after the completion of the project. |   | Provision was made for the housing of construction labour within the site with all necessary infrastructure and facilities. The housing were be in the form of temporary structures removed after the completion of the project.   |
| vi.  | There shall be adequate space inside the plant premises earmarked for parking of vehicles for   |   | There is adequate space inside the plant premises earmarked for parking of vehicles for raw materials  |

| Sl.  | Compliance conditions  | : | Compliance status  |
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|      | raw materials and finished products, and no parking to be allowed outside on public places.  |   | and finished products, and no parking is allowed outside on public places. Parking photographs are attached as <b>Annexure – 7</b> .   |
| vii. | Occupational health surveillance of the workers shall be done on a regular basis and records maintained as per the Factories Act.  |   | Occupational health surveillance of the workers will submit on a regular basis and records maintained as per the Factories Act. ESI challan has been attached as <b>Annexure – 8</b> .   |
| ix.  | <b>Environment Management Plan (EMP)</b>   |   |  |
| i.   | The project proponent should submit the proposed EMP on a six monthly basis. The Office Memorandum issued by the MoEF & CC vide F. No. 22-6512017-IA.III dated 30.09.2020 read with O.M. issued by MoEF&CC vide F No. 22-2312018.IA.III(Pt.) dated 31.10.2019 should be strictly complied with, as the project is located within the municipal boundaries of Durgapur Municipal Corporation which is declared as Severely Polluted Area. |   | The project proponent will submit the proposed EMP on a six monthly basis. The Office Memorandum issued by the MoEF & CC vide F. No. 22-6512017-IA.III dated 30.09.2020 read with O.M. issued by MoEF&CC vide F No. 22-2312018.IA.III(Pt.) dated 31.10.2019 is strictly complied with, as the project is located within the municipal boundaries of Durgapur Municipal Corporation which is declared as Severely Polluted Area. Photographs of STP used to recycle 20 KLD kitchen waste water has been attached as <b>Annexure - 9</b> |
| ii.  | Need based activities for local people is part of the EMP. Details of such activities are submitted by the project proponent is given in Annexure – 3.   |   | Need based activities for local people is part of the EMP will be complied with and addressed in six monthly compliance report.  |
| iii. | The company shall have a well laid down environmental policy duly approve by the Board of Directors. The environmental policy should prescribe for standard operating  |   | The company has prepared environment policy. The policy has been attached as <b>Annexure – 10</b> .  |

| Sl. | Compliance conditions   | : | Compliance status   |
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|     | procedures to have proper checks and balances and to bring into focus any infringements/ deviation / violation of the environmental/forest /wildlife norms / conditions. The company shall have defined system of reporting infringements / deviation / violation of the environmental /forest/ wildlife norms / conditions and /or shareholders/stake holders. The copy of the board resolution in this regard shall be submitted to the Ministry of Environment, Forests & Climate Change /State Environment Impact Assessment Authority / State Pollution Control Board as a part of six-monthly report. |   |   |
| iv. | A separate Environmental Cell both at the project and company head quarter level, with qualified personnel shall be set up under the control of Senior Executive, who will directly to the head of the organization.  |   | Project proponent already have environment management system organizational structure which is given in EIA.  |
| v.  | Action plan for implementing EMP and environmental conditions along with responsibility matrix of the company shall be prepared and shall be duly approved by competent authority. The year wise funds earmarked for environmental protection measures shall be kept in separate account and not to be diverted for any other purpose. Year wise progress of implementation of action plan shall be reported to the Ministry of Environment, Forests & Climate Change / State Environment Impact Assessment   |   | Action taken for the EMP which is need based activity for local people will be complied with and details with the same will be shared in six monthly compliance report. |



| Sl. | Compliance conditions   | : | Compliance status   |
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|     | Authority/ State Pollution Control Board along with the Six Monthly Compliance Report.  |   |   |
| vi. | Self environmental audit shall be conducted annually. Every three years third party environmental audit shall be carried out.   |   | Self environmental monitoring is done on quality basis and reports of the same is submitted to WBPCB. a Every year third party environmental management system audit carried out.   |
| x.  | <b>Additional conditions</b>  |   |   |
| a.  | The project proponent should comply with the conditions mentioned in O.M. issued by MoEF&CC vide F No. 22-2312018.IA.III(Pt.) dated 31.10.2019 as the project is located within the municipal boundaries of Durgapur Municipal Corporation which is declared as Severely Polluted Area.   |   | The project proponent complies with the conditions mentioned in O.M. issued by MoEF&CC vide F No. 22-2312018.IA.III(Pt.)dated 31.10.2019 as the project is located within the municipal boundaries of Durgapur Municipal Corporation which is declared as Severely Polluted Area. |
| b.  | The project proponent shall install display board for display of all the environmental parameters including sensor-based air, water and noise quality monitoring stations as proposed within their premises.  |   | The project proponent is in process of installation of display board for display of relevant environmental parameters.  |
| xi. | <b>Miscellaneous</b>  |   |   |
| i.  | The environmental clearance accorded shall be valid for a period of 10 years for the proposed project.  |   | The given condition is noted.   |
| ii. | The project proponent shall make public the environmental clearance granted for-their project along with the environmental conditions and safeguards at their cost by prominently advertising it at least in two local newspapers of the District or State, of which one shall be in the vernacular language within seven days and in addition this shall also be |   | The project proponent has made public the environmental clearance granted for-their project along with the environmental conditions and safeguards at their cost by prominently advertising in two local newspapers of the District or State, of which one shall be in the        |

| Sl.  | Compliance conditions  | : | Compliance status  |
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|      | displayed in the project proponent's website permanently.  |   | vernacular language and is also displayed in the project proponent's website permanently. Advertisement and screenshot of the website copy of local newspaper has been attached as <b>Annexure – 11</b> .  |
| iii. | The copies of the environmental clearance shall be submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government who in turn has to display the same for 30 days from the date of receipt.   |   | The copies of the environmental clearance is submitted by the project proponents to the Heads of local bodies, Panchayats and Municipal Bodies in addition to the relevant offices of the Government. The intimation copy has been attached as <b>Annexure – 12</b> .  |
| iv.  | The project proponent shall upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.   |   | The project proponent will upload the status of compliance of the stipulated environment clearance conditions, including results of monitored data on their website and update the same on half-yearly basis.  |
| v.   | The project proponent shall monitor the criteria pollutants level namely; PM <sub>10</sub> , SO <sub>2</sub> , NO <sub>x</sub> (ambient levels as well as stack emissions) or critical sectoral parameters, indicated for the projects and display the same at a convenient location for disclosure to the public and put on the website of the company. |   | The project proponent has monitored the criteria pollutants level namely; PM <sub>10</sub> , SO <sub>2</sub> , NO <sub>x</sub> (ambient levels as well as stack emissions) or critical sectoral parameters, indicated for the projects and display the same at a convenient location for disclosure to the public and put on the website of the company. |
| vi.  | The project proponent shall submit six-monthly reports on the status of the compliance of the stipulated environmental conditions on the website of the Ministry of  |   | The project proponent will submit six-monthly reports on the status of the compliance of the stipulated environmental conditions.  |

| Sl.   | Compliance conditions  | : | Compliance status  |
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|       | Environment, Forest and Climate Change at environment clearance portal with a copy to SEIAA/WBPCB.   |   |  |
| vii.  | The project proponent shall submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board as prescribed under; the Environment (Protection) Rules, 1986, as amended subsequently and put on the website of the company.          |   | The project proponent has submit the environmental statement for each financial year in Form-V to the concerned State Pollution Control Board. Submission letter has been attached as <b>Annexure – 13</b> .                             |
| viii. | The project proponent shall inform the Regional Office of the MoEF&CC along with SEIAA and WBPCB, the date of financial closure and final approval of the project by the concerned authorities, commencing the land development work and start of production operation by the project. |   | The project proponent has obtain the CTE where in the details of the project were being already disclosed.   |
| ix.   | The project authorities must strictly adhere to the stipulations made by the State Pollution Control Board and the State Government.   |   | The condition will be followed.  |
| x.    | The project proponent shall abide by all the commitments and recommendations made in the EIA / EMP report, commitment made during Public Hearing and also that during their presentation to the State Expert Appraisal Committee (SEAC).   |   | The project proponent will follow by all the commitments and recommendations made in the EIA / EMP report, commitment made during Public Hearing and also that during their presentation to the State Expert Appraisal Committee (SEAC). |
| xi.   | No further expansion or modifications in the plant shall be carried out without prior approval of the SEIAA/ MoEF&CC.  |   | No further expansion or modifications in the plant will be carried out without prior approval of the SEIAA/ MoEF&CC.   |

| Sl.   | Compliance conditions  | : | Compliance status               |
|-------|--|---|---------------------------------|
| xii.  | Concealing factual data or submission of false / fabricated data may result in revocation of this environmental clearance and attract action under the provisions of Environment (Protection) Act, 1986.   |   | The condition will be followed. |
| xiii. | The SEIAA may revoke or suspend the clearance, if implementation of any of the above conditions is not satisfactory.   |   | The condition will be followed. |
| xiv.  | The SEIAA reserves the right to stipulate additional conditions if found necessary. The Company in a time bound manner shall implement these conditions.   |   | The condition will be followed. |
| xv.   | The Regional Office of MoEF&CC/SEIAA/WBPCB shall monitor compliance of the stipulated conditions.<br>The project authorities should extend full cooperation to the officer (s) of the Regional Office of MoEF&CC/SEIAA/WBPCB by furnishing the requisite data / information / monitoring reports,  |   | The condition will be followed. |
| xvi.  | The above conditions shall be enforced, inter-alia under the provisions of the Water (Prevention & Control of Pollution) Act, 1974, the Air (Prevention & Control of Pollution) Act, 1981, the Environment (Protection) Act, 1986, Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016 and the Public Liability Insurance Act, 1991 along with their amendments and Rules and any other orders passed by the Hon'ble Supreme Court of India / High Courts/NGT and |   | The condition will be followed. |



| Sl.   | Compliance conditions  | : | Compliance status               |
|-------|--|---|---------------------------------|
|       | any other Court of Law relating to the subject matter.   |   |                                 |
| xvii. | Any appeal against this EC shall lie with the National Green Tribunal, if preferred, within a period of 30 days as prescribed under Section 16 of the National Green Tribunal Act, 2010. |   | The condition will be followed. |

# **Annexure – 1**

NOC NO172047

**SPEED POST**



# WEST BENGAL POLLUTION CONTROL BOARD

Paribesh Bhawan  
10A, Block-LA, Sector-III  
Bidhannagar, Kolkata-700 098

Memo No: 151-2N-08/2020(E)-Pt.-I

Dated 31.03.2023

From :  
Member Secretary,  
West Bengal Pollution Control Board

To: M/s. Graphite India Limited,  
Sagarbhangha, Durgapur-713211, Dist.- Paschim Bardhaman, West Bengal.

Sub: Consent to Establish (NOC) from Environmental Point of View

Ref: i) Your letter No. Nil Dated 24.03.2023  
ii) Environmental Clearance issued by SEIAA, WB, vide EC Identification No. EC23B020WB141674, File No. EN/T-II-i/128/2021 dated 10.03.2023

Dear Sirs,

In response to the application for Consent to Establish (NOC) for proposed Unit of M/s Graphite India limited, Sagarbhangha, Durgapur-713211, Paschim Bardhaman, W.B. for manufacturing/storage/installation of one Baking Furnace (Riedhammer Baking Furnace, RH 24 Section Unit-III) & released accessories replacing one old Recirculating Baking Furnace) for increase in finished product capacity at existing Unit at Sagarbhangha, Durgapur, Paschim Bardhaman, West Bengal. this is to inform you that this Board hereby grants the Consent to Establish (NOC) from the environmental point of the above subject to the following conditions and special conditions annexed.

1. The quality of sewage and trade effluent to be discharged from your factory shall satisfy the permissible limits as prescribed in IS : 2490 (Pt. I) of 1974, and/or its subsequent amendment and Environment (Protection) Rules 1986.
2. Suitable measures to treat your effluent shall be adopted by you in order to reduce the pollutional load so that the quality of the effluent satisfies the standards mentioned above.
3. You shall have to apply to this Board for its consent to operate and discharge of sewage and trade effluent according to the provisions of the water (Prevention & Control of Pollution) Act, 1974. No sewage or trade effluent shall be discharged by you without prior consent of this Board.
4. All emission from your factory shall conform to the standards as laid down by this Board.
5. No. emission shall be permitted without prior approval of this Board and you shall apply to this Board for its consent to operate and atmospheric emission as per provision of the Air (Prevention & Control Pollution) act, 1981.
6. No industrial plant, furnace, flues, chimneys, control equipment, etc. shall be constructed/reconstructed/erected/re-erected without prior approval of this Board.

*Mukherjee*  
31.03.2023  
Chief Engineer  
W. B. Pollution Control Board  
Dept. of Environment, Govt. of W.B.



7. You shall comply with
- Water (Prevention and Control of Pollution) Cess Act, 1977, if applicable.
  - Water (Prevention and Control of Pollution) Cess Act, 1978, if applicable.
  - Environment (Protection) Act, 1986
  - Environment (Protection) Rules, 1986
  - Hazardous Wastes (Management and Handling) Rules, 1989 and Amended Rules, 2000
  - Manufacture, Storage and Import of Hazardous Chemicals Rules, 1989 and Amended Rules, 2000
  - Manufacture, Use, Import and Storage and Hazardous Micro-Organisms, Genetically Engineered Organisms or Cell Rules, 1989
  - The Public Liability Insurance Act, 1991 and Amended Act, 1992
  - The Public Liability Insurance Rules, 1991 and Amended Rules 1993
  - Biomedical Wastes (Management & Handling) Rules, 1998 and Amended Rules 2000 if applicable.
  - Recycled Plastics Manufacture and Usage Rules 1999, if applicable and
  - Ozone Depleting Substances (Regulation & Control) Rules, 2000, if applicable
8. You will have to abide by any other stipulations as may be prescribed by any authority/local bodies/Government Departments etc.

**SPECIAL CONDITION :**

See Annexures.

Gross capital investment - Rs.136.89 Crores.

Any violation of the aforesaid conditions shall entail cancellation of this Consent to Establish (NOC)

Yours faithfully,

*[Signature]* 31/03/2023  
Member Secretary/Chief Engineer,  
West Bengal Pollution Control Board  
(EIM CELL)

Memo No. **151** - 2N-08/2020(E)-Pt.-I *dd. 31.03.2023* Dated.....  
Copy forwarded for information to : W. B. Pollution Control Board  
Government, Govt. of W.B.

- Chief Inspector of Factories, Government of West Bengal, N. S. Building, Kolkata-700 001
- Director of Industries/Director of Cottage & Small Scale Industries, Government of West Bengal, N. S. Building, Kolkata-700 001
- Guard file, West Bengal Pollution Control Board.
- Environmental Engineer, I/II/Alipur R.O./Howrah R.O./Hooghly R.O./B.R.O./D.R.O./Haldia R.O./S.R.O./Asansol/ Sub-R.O./WBPC Board

|   |  |  |  |
|---|--|--|--|
| Himalaya Bhawan<br>Delhi Road, Dankuni<br>Dist. Hooghly | Vill, Panpur<br>Kalyani Expressway<br>P.O. Narayanpur<br>Dist. 24 Pgs. (N) | Sahid Khudiram Sarani<br>City Centre, Durgapur-16<br>Dist. Burdwan | 10, Camac Street<br>2nd Floor<br>Kolkata-700 017 |
|---|--|--|--|

|  |  |   |
|--|--|---|
| Paribesh Bhawan<br>10A, LA-Block, Sector-III<br>Salt Lake City,<br>Kolkata - 700 098 | Block-05 at 40<br>Flats Complex<br>Adjacent to Priyambada<br>Housing Estate<br>P.O. : Khanjanchak,<br>P.S. Durgachak<br>Haldia-721602<br>Dist. : Purba Medinipur | Paribahan Nagar<br>Matigara, Siliguri<br>Dist.-Darjeeling |
|--|--|---|

Satya Chowdhury  
Indoor Stadium  
Balurchar Bandh Road  
Malda-732101

Asansol Sub-Regional Office  
ADDA Commercial Market (2nd Floor)  
Opposite Asansol Fire Station  
G.T. Road, Asansol-713 301

*[Signature]* 31/03/2023  
Member Secretary/Chief Engineer,  
West Bengal Pollution Control Board  
(EIM CELL)  
W. B. Pollution Control Board  
Dept. of Environment, Govt. of W.B.



Special Conditions issued to - M/s. Graphite India Limited (Expansion Project) at JL no. 85 & 92, Vill – Sagarbhangra, Durgapur, Dist – Paschim Brdhaman, West Bengal (Application no. 3484968)

**Emission :-**

| Sl. No. | Equipment  | APC device  | Stack Height (m) |
|---------|--|---|------------------|
| 1       | Proposed Finishing unit Electrode dust collector | Bag Filter  | 15               |
| 2       | Proposed Finishing unit nipple dust collector    | Bag Filter  | 15               |
| 3       | Riedhammer Baking Furnace                        | ESP   | 45               |
| 4       | Stock cleaning machine dust collector            | Bag Filter  | 24               |
| 5       | Jaw Crusher machine dust collector               | Bag filter  | 22               |
| 6       | 3X500 KVA DG Sets                                | Individual acoustic enclosures with stacks of height 9m above DG room |                  |

- 1) Stacks should have sampling port, platform and ladder as per the Emission Regulation Part-III of CPCB. Particulate emission from all stacks shall be less than  $30\text{mg/Nm}^3$ .
- 2) The National Ambient Air Quality Emission Standards issued by MoEF vide G.S.R 826(E) dated 16<sup>th</sup> November, 2009 should be complied with.
- 3) Dry fog system and water sprinklers to be installed to arrest fugitive emission.
- 4) 24X7 continuous emission monitoring system at process stacks to be installed and as well as Continuous Ambient Air Quality Station for monitoring AAQ parameters to be installed.

**Effluent :-**

- 1) Process – All scrubber effluent to be treated in ETP. Treated effluent to be recycled.
- 2) 24X7 continuous effluent monitoring system to be installed.
- 3) Cooling water to be recycled after settling.
- 4) Domestic – to be treated in STP.
- 5) ZLD system to be strictly followed.

**Solid Waste :-**

- 1) Bag Filter dust – to be reused in different processes.
- 2) The proponent should abide by the Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016

**General :-**

- 1) Noise Control – Ambient noise level not to exceed the permissible limit.
- 2) No additional machineries / equipment can be installed without prior permission from the State Board.
- 3) No change in raw materials, products and production capacity should be made without prior permission from the State Board.
- 4) Plant layout should be as per EIA Report/DPR submitted during EC process.
- 5) Proper lighting and proper pathway inside the factory premises should be constructed.
- 6) Adequate measures to be adopted for control of fugitive emission.
- 7) The unit should not start operation without obtaining 'Consent to Operate' from the State Board after complete installation of pollution control devices.
- 8) The unit should obtain permission from the District level authority for ground water abstraction, if any, as per The West Bengal Ground Water Resources (Management, Control and Regulation) Act, 2005; before applying for 'Consent to Operate' to this Board.
- 9) The unit should obtain Land Conversion Certificate from the competent authority, if applicable, before starting construction activities.
- 10) No construction is permitted on the land parcels, not under the possession of the industry.
- 11) At least 33% of the project area should be under green belt.

*W.B. 31/03/2023*  
Chief Engineer  
W. B. Pollution Control Board  
Dept. of Environment, Govt. of W.B.

**Annexure I to NOC Sl. No. – NO172047**

**Special Conditions issued to - M/s. Graphite India Limited (Expansion Project) at JL no. 85 & 92, Vill – Sagarbhanga, Durgapur, Dist – Paschim Brdhaman, West Bengal (Application no. 3484968)**

- 12) Rain water harvesting must be done however recharging of harvested rain water is not allowed under any circumstances.
- 13) All conditions as imposed by SEIAA, West Bengal through their Environmental Clearance issued vide EC Identification No. - EC23B020WB141674, File No. - EN/T-II-1/128/2021, Dated 10.03.2023 shall be strictly complied with.
- 14) Good house-keeping to be maintained.
- 15) This NOC is valid up to **31.03.2030** for setting up the unit.

*Mukherjee*  
*31/03/2023.*

**Chief Engineer (EIM Cell)  
West Bengal Pollution Control Board**

*Chief Engineer*  
W. B. Pollution Control Board  
Dept. of Environment, Govt. of W.B.



# WEST BENGAL POLLUTION CONTROL BOARD

'Paribesh Bhawan'  
Bldg. No. - 10A, Block - LA, Sector-III  
Salt Lake City, Kolkata-700 098



Consent Letter Number : C0110270

Memo Number : 25-Dr-CO.P/12/0341-

Date : 04.01.19.

## Consent to Operate

under

Section 25 & 26 of the **Water (Prevention and Control of Pollution) Act, 1974** and  
Section 21 of the **Air (Prevention and Control of Pollution) Act, 1981**

The West Bengal Pollution Control Board (hereinafter referred to as State Board) under the provisions of Section 25 & 26 of the Water (Prevention and Control of Pollution) Act, 1974, as amended and Section 21 of the Air (Prevention and Control of Pollution) Act, 1981, as amended and Rules and Orders made thereunder, hereby grants its consent to :

Graphite India Limited

(Address of Regd. office/Head/Office/City Office)

(hereinafter referred to as Applicant) for its unit located at Sagarbanga, Durgapur,

P.S - Coke Oven, Paschim Bardhaman -  
713211

(Detailed address of the manufacturing unit)

for a period from date of issue to 30/11/2023

to operate the industrial unit and to discharge liquid effluent and to emit gaseous effluent from the premises/land of the industrial unit, in accordance with the conditions as mentioned in the Annexure to this consent letter provided on any day at any instance the quantity and quality of liquid discharge and gaseous emission shall not exceed the permissible limit as specified in the Table I & II of this consent letter and in the Environmental (Protection) Act, 1986.

Breach of the conditions and / or failure to comply with the directions as set out in the Annexure shall render the applicant liable for prosecution under the provisions of the Water (Prevention and Control of Pollution) Act, 1974 and Air (Prevention and Control of Pollution) Act, 1981.

The State Board reserve the right to revoke, withdraw or make any reasonable variation / change / alter the conditions of this consent letter giving one month's notice to the applicant.

\* The unit should comply with all the directions of the Board issued time to time and all the terms and conditions stipulated in the previous 'Consent to Operate' vide no. C0092315 dated 09/11/2015.

For and on behalf of the State Board

Renuka

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Assistant Engineer)  
Durgapur Regional Office  
West Bengal Pollution Control Board



## ANNEXURE

Consent to Graphite India Limited  
 for its unit at Sagarbanga, Durgapur, P.S - Coke Oven,  
Paschim Bardhaman - 713211

**Conditions :**

01. This Consent is valid for the manufacture of :-

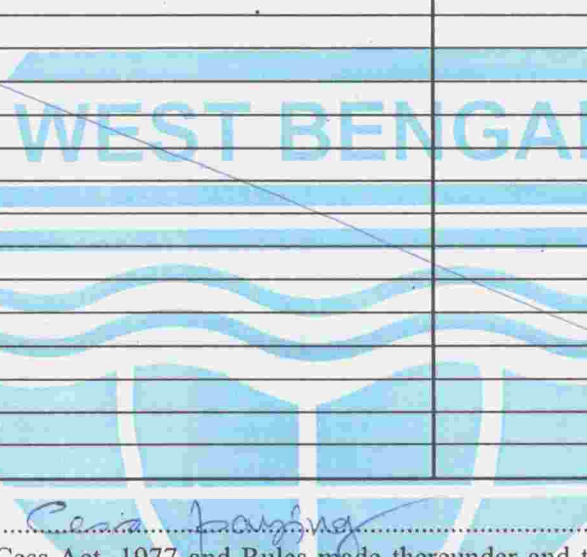
| Sl. No. | Name of major products and by-products | Quantity manufactured per month |
|---------|--|---------------------------------|
| 01      | Electrode                              | 4333.33 MT                      |
| 02      | Pitch Coke                             | 102.97 MT                       |
| 03      | Met Coke fines (By-products)           | 919.68 MT                       |
| 04      | Graphite fines (By-products)           | 633.50 MT                       |
| 05      | Coal Tar Pitch from ESP (By-products)  | 28.52 MT                        |
| 06      |  |                                 |
| 07      |  |                                 |
| 08      |  |                                 |
| 09      |  |                                 |
| 10      |  |                                 |
| 11      |  |                                 |
| 12      |  |                                 |

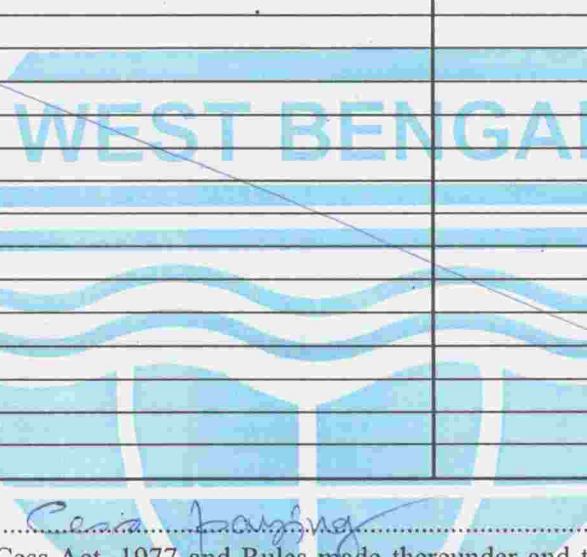
02. The Applicant shall remain responsible for quantity and quality of liquid effluent and air emissions.
03. **Daily** discharge of industrial liquid effluent shall not exceed ..... KL.
04. **Daily** discharge of domestic liquid effluent shall not exceed ..... KL.
05. **Daily** discharge of mixed (industrial & domestic) liquid effluent shall not exceed 453 ..... KL.
06. The Applicant shall discharge liquid effluent to Outside after treatment (place of discharge) through Three ..... nos. outlets / outfalls.
07. To bring into any altered or new outlet/outfall or to change the place of discharge, the Applicant shall have to inform the Board and obtain prior permission of the Board in this effect.
08. The Applicant shall provide comprehensive facility for treatment of industrial liquid waste and domestic liquid waste (sewage, sullage and liquid effluent generated from canteen), and operate and maintain the same continuously so that the quality of final effluent conforms to the Standard as given in Table-I in page 03.

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

Assistant Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board

(3)

|   |                 |
|---|-----------------|
| Oil & Grease  | Not to exceed : |
|    |                 |
| in the ..... <u>Calcutta Municipality</u> ..... Category<br>(Section) Cess Act, 1977 and Rules made thereunder and the Ap<br>Act and Rules made thereunder. |                 |

|  |                 |
|--|-----------------|
| Oil & Grease   | Not to exceed : |
|   |                 |
| in the ..... <u>Calcutta Municipality</u> ..... Category<br>(tion) Cess Act, 1977 and Rules made thereunder and the Ap<br>Act and Rules made thereunder. |                 |

- Cash paying

- and Rules made thereunder.

- 1588.00

*Ramona*

Assistant Environmental Engineer  
Durgapur Regional Office  
West Bengal Pollution Control Board



Consent to Graphite India Limited  
 for its unit at Sagarbanga, Durgapur, P.S - Coke Oven,  
Poachim Bardhaman - 713211

11. The *Applicant* shall install suitable device for measuring the volume of water consumed for different purposes as mentioned above giving correct result to the satisfaction of the *State Board*.
12. All the stacks connected to various sources of emissions must be designated by numbers such as S-1, S-2, S-3, etc., and this must be painted/displayed to facilitate identification.
13. The *Applicant* shall install comprehensive control system consisting of pollution control equipment as is warranted with reference to generation of air emissions and operate and maintain the same continuously so as to achieve the level of pollutants of the *Standard* as given in Table-II below :

Table-II

| Stack No. | Stack height from G.L., (in mts.) | Stack attached to (sources and control system, if any): | Volume Nm <sup>3</sup> /hr. | Velocity of gas emission m/sec | Concentrations of parameters not to exceed |           |  |  |  | Frequency of emission sampling |
|-----------|-----------------------------------|---|-----------------------------|--------------------------------|--|-----------|--|--|--|--------------------------------|
|           |                                   |   |                             |                                | SPM (mg/Nm <sup>3</sup> )                  | CO (%v/v) |  |  |  |                                |
| S-1       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-2       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-3       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-4       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-5       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-6       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-7       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-8       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-9       |                                   |   |                             |                                |  |           |  |  |  |                                |
| S-10      |                                   |   |                             |                                |  |           |  |  |  |                                |

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

Assistant Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board

Consent to

Graphite India Limited

for its unit at

Sagarbanga, Durgapur, P.S.-Coke Oven,  
Paschim Bardhaman-713211

14. The *Applicant* shall provide ports in the stack(s) and other necessary permanent facilities such as ladder, platform, etc. for monitoring/sampling the air emissions and the same shall be made available for inspection and use by the *State Board's* staff as well as *State Board's* authorised agencies.
15. The *Applicant* shall observe the following fuel consumption pattern :-

| Sl. No | Type of fuel | Quantity consumed per day        | Fuel burning operation where the fuel is used |
|--------|--------------|----------------------------------|---|
| 01     | CBM Gas      | 6225.76-75 m <sup>3</sup> /month | Boilers & different furnaces                  |
| 02     | Furnace Oil  | 422.66 KL/month                  | Baking furnace                                |
| 03     | HSD          | -                                | Different D.O. sets                           |
| 04     |              |                                  |   |
| 05     |              |                                  |   |

16. The *Applicant* shall maintain the generation and treatment/disposal of non-hazardous solid waste as specified below :-

| Type of waste | Quantity | Treatment | Disposal |
|---------------|----------|-----------|----------|
|               |          |           |          |
|               |          |           |          |

17. The *Applicant* shall take adequate measures for control of noise levels from its own sources within the premises within the limit given below :-

| Time                            | Limit in dB(A) $L_{eq}$ |
|---------------------------------|-------------------------|
| Day Time (06 a.m. to 09 p.m.)   | 75                      |
| Night Time (09 p.m. to 06 a.m.) | 70                      |

18. The *Applicant* shall at all times maintain good house-keeping, proper working order, and operate efficiently for control of pollution from all sources so as not to cause nuisance to surrounding areas/inhabitants and to achieve compliance with the terms and conditions of the consent.
19. The *Applicant* shall bring about at least 33% of the available open land under the green coverage / plantation.
20. The *Applicant* shall provide for an alternate electric power source sufficient to operate all pollution control facilities installed by the *Applicant* to maintain compliance with the terms and conditions of the consent. In absence of such an alternate electric power source, the *Applicant* shall stop, reduce or otherwise control production to abide by the terms and conditions of the Consent regarding pollution level.
21. The *Applicant* shall install a separate energy meter showing the consumption of energy for operation of pollution control devices.
22. The *Applicant* shall ensure that fugitive emissions from the activity are controlled so as to maintain clean and safe environment in and around the factory premises.
23. The *Applicant* shall provide drainage system for conveying industrial and domestic liquid waste. Storm-water drain shall be kept separate from the drainage system meant for industrial and domestic liquid waste

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

 Assistant Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board



Consent to ..... Graphite India Limited .....  
 for its unit at ..... Sagarbhanga, Durgapur, P. S - Coke Oven, .....  
 ..... Poachin Bardhaman - 713211 .....

24. The *Applicant* shall maintain a separate register showing consumption of chemicals used in pollution control systems.
25. The *Applicant* shall get the samples of hazardous wastes/leachates analysed at least once in ..... from the laboratory recognised of the West Bengal Pollution Control Board and ensure that they conform to the limits stipulated. Test reports shall be sent to the Board.
26. The *Applicant* shall provide adequate and safe facility for collection of air, waste water and solid waste samples by the *State Board's* staff as well as *State Board's* authorised agencies.
27. The *Applicant* shall submit to the *State Board* by the 30th September of every year the Environmental Statement Report for the financial year ending 31st March of the current year in the prescribed form (Form -V) as required under the provisions of rule 14 of the Environment (Protection) [Second Amendment] rules, 1992.
28. The *Applicant* shall allow the Officers of the *State Board* to enter into the applicant's premises at any reasonable time to inspect the pollution control systems as well as monitoring and measuring devices in connection with prevention & control of pollution.
29. The *Applicant* shall maintain an Inspection Book in the factory premises which shall be made available to Officers & employees of the *State Board* for inspection, review and to write down any direction or observation as is deemed necessary during the inspection from time to time.
30. The *Application* shall furnish to the *State Board* all information in respect of quality, quantity, rate of discharge, place of discharge of liquid effluent and air emissions.
31. The *Applicant* shall maintain adequate number of qualified and trained personnel among his staff for proper maintenance and operation of the effluent treatment and / or emission control devices and for overall environment management of the industry.
32. The *Applicant* shall have to make registration for the use of groundwater if any, with Central Ground Water Authority.
33. The *Applicant* shall intimate to the *State Board* immediately of any occurrence or apprehension of occurrence of discharge of any poisonous, noxious or pollutants in excess of quality as well as quality as mentioned earlier to any receiving water body/receiving system or to atmosphere owing to accident or other unforeseen incident/event including natural disaster. The *Applicant* Shall (i) take all steps adequate to prevent such accident discharge/release of poisonous, noxious or pollutants and to limit their consequences to persons and the environment, (ii) provide to the persons working on the site with the information, training and equipment including antidotes necessary to ensure their safety and mitigate the accidental release of poisonous noxious or pollutants to the environment.
34. The *Applicant* shall make an application to the *State Board* in the prescribed form for renewal of the consent at least 60 (sixty) days before the date of expiry of this Consent.
35. The *Applicant* shall not make any alternation/modification/expansion in the existing manufacturing process and equipment as well as the pollution control system without prior approval of the Board.
36. The *Applicant* shall comply with the conditions as laid down in the Manufacture, Storage and Import of hazardous Chemicals Rules, 1989 and Hazardous Wastes (Management & Handling) Rules, 1989.

*This Consent may be revoked subject to any valid public complaint for violation of environmental norms.*  
**Additional Conditions** of environmental norms.

(Member Secretary/Chief Engr./ Sr. Env. Engr./ Env. Engr./ Asst. Env. Engr.)  
 Assistant Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board



Consent to Graphite India Limited  
 for its unit at Sagarbanga, Durgapur P.S - Coke Oven,  
Parachim Bardhaman - 713211

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| Sl. No | Type of fuel | Quantity consumed per day        | Fuel burning operation where the fuel is used |
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| 02     | Furnace Oil  | 422.66 KL/month                  | Baking furnace                                |
| 03     | HSD          | -                                | Different D.O. etc.                           |
| 04     |              |                                  |   |
| 05     |              |                                  |   |

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|---------------|----------|-----------|----------|
|               |          |           |          |
|               |          |           |          |

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|---------------------------------|--------------------------------|
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| Night Time (09 p.m. to 06 a.m.) | 70                             |

18. The *Applicant* shall at all times maintain good house-keeping, proper working order, and operate efficiently for control of pollution from all sources so as not to cause nuisance to surrounding areas/inhabitants and to achieve compliance with the terms and conditions of the consent.
19. The *Applicant* shall bring about at least 33% of the available open land under the green coverage / plantation.
20. The *Applicant* shall provide for an alternate electric power source sufficient to operate all pollution control facilities installed by the *Applicant* to maintain compliance with the terms and conditions of the consent. In absence of such an alternate electric power source, the *Applicant* shall stop, reduce or otherwise control production to abide by the terms and conditions of the Consent regarding pollution level.
21. The *Applicant* shall install a separate energy meter showing the consumption of energy for operation of pollution control devices.
22. The *Applicant* shall ensure that fugitive emissions from the activity are controlled so as to maintain clean and safe environment in and around the factory premises.
23. The *Applicant* shall provide drainage system for conveying industrial and domestic liquid waste. Storm-water drain shall be kept separate from the drainage system meant for industrial and domestic liquid waste

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

Assistant Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board

Annexure I of Consent to Operate Sl. No. **CO110270** of **M/s. Graphite India Limited**,  
located at Sagarbhanga, Durgapur, P. S- Coke Oven, Paschim Bardhaman-713211

| Stack No. | Stack ht. from G. L in mts. | Stack attached to (sources and control system, if any):  | Volume Nm <sup>3</sup> /hr. | Velocity of gas emission m/sec | Concentrations of parameters not to exceed |            | Frequency of sampling |
|-----------|-----------------------------|--|-----------------------------|--------------------------------|--|------------|-----------------------|
|           |                             |  |                             |                                | SPM (mg/Nm <sup>3</sup> )                  | CO (% v/v) |                       |
| 1         | 30                          | Mixture Fume Extractor (North) (Extrusion Dept.)         |                             |                                | 150  | 1          | Half yearly           |
| 2         | 30                          | Mixture Fume Extractor (South) (Extrusion Dept.)         |                             |                                | 150  | 1          | Half yearly           |
| 3         | 30                          | Cooler North (Extrusion Dept.)                           |                             |                                | 150  | 1          | Half yearly           |
| 4         | 30                          | Cooler South (Extrusion Dept.)                           |                             |                                | 150  | 1          | Half yearly           |
| 5         | 30                          | Fume Extractor (West side) weigh floor (Extrusion Dept.) |                             |                                | 150  | 1          | Half yearly           |
| 6         | 7                           | Raymond Mill Dust Collector ( Extrusion Dept.)           |                             |                                | 150  |            | Half yearly           |
| 7         | 7.1                         | Scrap System Dust Collector (Extrusion Dept.)            |                             |                                | 150  |            | Half yearly           |
| 8         | 12                          | Main Dust Collector (Extrusion Dept.)                    |                             |                                | 150  |            | Half yearly           |
| 9         | 10                          | Baking Milling Dust Collector                            |                             |                                | 150  |            | Half yearly           |
| 10        | 30                          | Baking Furnace (Fce. 1 to 5 side)                        |                             |                                | 150  | 1          | Half yearly           |
| 11        | 30                          | Baking Furnace (Fce. 6 to 10 side)                       |                             |                                | 150  | 1          | Half yearly           |
| 12        | 30                          | Ried Hammer Furnace (Baking Dept.) (14 SECTION)          |                             |                                | 150  | 1          | Half yearly           |
| 13        | 45                          | Ried Hammer Furnace (Baking Dept.)(16 & 24 SECTION)      |                             |                                | 150  | 1          | Half yearly           |
| 14        | 30.48                       | P.I. UNIT 1 (THERMOPACK STACK)                           |                             |                                | 150  |            | Half yearly           |
| 15        | 30                          | P.I. UNIT 1 (HGG STACK)                                  |                             |                                | 150  |            | Half yearly           |

|    |       |   |  |  |                              |   |             |
|----|-------|---|--|--|------------------------------|---|-------------|
| 16 | 30    | P.I. UNIT 2<br>(THERMOPACK<br>STACK)                        |  |  | 150                          |   | Half yearly |
| 17 | 30    | P.I. UNIT 2 (HGG<br>STACK)                                  |  |  | 150                          |   | Half yearly |
| 18 | 10.67 | LWG # 3(MILLING)  |  |  | 150                          |   | Half yearly |
| 19 | 13    | Finishing Dust<br>Collector (North)<br>(Unit 1)             |  |  | 150                          |   | Half yearly |
| 20 | 15    | Finishing Dust<br>Collector (Unit 2)                        |  |  | 150                          |   | Half yearly |
| 21 | 9.75  | FINE SCREENING<br>DUST COLLECTOR                            |  |  | 150                          |   | Half yearly |
| 22 | 29.29 | Boiler (1.5 Ton &<br>2Ton) 2.0 Ton<br>Running               |  |  | 800 at 12 %<br>Co correction | 1 | Half yearly |
| 23 | 30    | Tunnel Kiln – 1 (Re-<br>baking Furnace)                     |  |  | 150                          | 1 | Half yearly |
| 24 | 13    | Finishing Unit – 3<br>(Dust Collector)                      |  |  | 150                          |   | Half yearly |
| 25 | 30    | P.I. Unit – 3 (HGG<br>Stack)                                |  |  | 150                          |   | Half yearly |
| 26 | 30    | Tunnel Kiln – 2 (Re-<br>baking Furnace)                     |  |  | 150                          |   | Half yearly |
| 27 | 30    | P.I. Unit – 3 (Thermo<br>pack Stack)                        |  |  | 150                          |   | Half yearly |
| 28 | 30    | New Extrusion<br>Department Thermic<br>Fluid Heater         |  |  | 150                          | 1 | Half yearly |
| 29 | 34    | New Extrusion IRICH<br>Dust Collector                       |  |  | 150                          |   | Half yearly |
| 30 | 34    | New Extrusion Main<br>Dust Collector                        |  |  | 150                          |   | Half yearly |
| 31 | 12.5  | New Extrusion<br>Raymond Mill Dust<br>Collector             |  |  | 150                          |   | Half yearly |
| 32 | 15    | New Extrusion Silo<br>Dust Collector                        |  |  | 150                          |   | Half yearly |
| 33 | 8     | New Extrusion IRICH<br>(Trema) Scrubber<br>System           |  |  | 150                          | 1 | Half yearly |
| 34 | 18    | Acheson Dust<br>Collector                                   |  |  | 150                          |   | Half yearly |
| 35 | 17    | New Extrusion Scrap<br>system Dust collector                |  |  | 150                          |   | Half yearly |
| 36 | 15    | Finishing Unit – 3<br>(South Side) Nipple<br>Dust Collector |  |  | 150                          |   | Half yearly |

|    |       |   |  |  |     |  |             |
|----|-------|---|--|--|-----|--|-------------|
| 37 | 11.58 | Finishing Unit – 2<br>Nipple line Dust<br>Collector |  |  | 150 |  | Half yearly |
| 38 | 10    | R.H.-16 Stock<br>Cleaning Machine<br>Dust Collector |  |  | 150 |  | Half yearly |
| 39 | 15    | P.I.-2 Turning<br>Machine Dust<br>Collector         |  |  | 150 |  | Half yearly |
| 40 | 15    | P.I.-3 Turning<br>Machine Dust<br>Collector         |  |  | 150 |  | Half yearly |



AEE & I/C

Durgapur R. O, WBPCB

Assistant Environmental Engineer  
Durgapur Regional Office  
West Bengal Pollution Control Board



Mr. Dhanuka

# WEST BENGAL POLLUTION CONTROL BOARD

'Paribesh Bhawan'

Bldg. No. - 10A, Block - LA, Sector-III  
Salt Lake City, Kolkata-700 098



Consent Letter Number : C013/904

Memo Number : 348-7/WPBD-Cont(408)/98(Pt-VII)

Date : 14/12/2020

## Consent to Operate

under

Section 25 & 26 of the Water (Prevention and Control of Pollution) Act, 1974 and  
Section 21 of the Air (Prevention and Control of Pollution) Act, 1981

The West Bengal Pollution Control Board (hereinafter referred to as State Board) under the provisions of Section 25 & 26 of the Water (Prevention and Control of Pollution) Act, 1974, as amended and Section 21 of the Air (Prevention and Control of Pollution) Act, 1981, as amended and Rules and Orders made thereunder, hereby grants its consent to :

M/s. Graphite India Limited

(Address of Regd. office/Head/Office/City Office)

(hereinafter referred to as Applicant) for its unit located at existing factory premises

Sagarbhangra, Dwargapur, P.S.-Coke Oven, Dist-Paschim

Burdwan, Pin-713211.

(Detailed address of the manufacturing unit)

for a period from date of issue to 30/11/2023.

to operate the industrial unit and to discharge liquid effluent and to emit gaseous effluent from the premises/land of the industrial unit, in accordance with the conditions as mentioned in the Annexure to this consent letter provided on any day at any instance the quantity and quality of liquid discharge and gaseous emission shall not exceed the permissible limit as specified in the Table I & II of this consent letter and in the Environmental (Protection) Act, 1986.

Breach of the conditions and / or failure to comply with the directions as set out in the Annexure shall render the applicant liable for prosecution under the provisions of the Water (Prevention and Control of Pollution) Act, 1974 and Air (Prevention and Control of Pollution) Act, 1981.

The State Board reserve the right to revoke, withdraw or make any reasonable variation / change / alter the conditions of this consent letter giving one month's notice to the applicant.



For and on behalf of the State Board

(Member Secretary/Chief Engr./Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

Environmental Engineer  
W. B. Pollution Control Board  
Operation & Execution Cell

## ANNEXURE

Consent to M/s. Graphite India Limited  
 for its unit at existing factory premises Sagarbanga, Durgapur,  
P.S. - Coke Oven, Dist- Paschim Burdwan, Pin-713211.

Conditions :

01. This Consent is valid for the manufacture of :-

| Sl. No. | Name of major products and by-products | Quantity manufactured per month |
|---------|--|---------------------------------|
| 01      | CFO for it's new Pitch                 | Production of electrode         |
| 02      | Impregnation Unit (PI Unit #4)         | will remain same as             |
| 03      | Pitch Impregnated, electrode           | accorded in last CFO            |
| 04      | is intermediate process of             | (Sl. no. CO/10270) dt.          |
| 05      | total finished product                 | 04/06/2019.                     |
| 06      | 52000 MTPA)                            |                                 |
| 07      |  |                                 |
| 08      |  |                                 |
| 09      |  |                                 |
| 10      |  |                                 |
| 11      |  |                                 |
| 12      |  |                                 |

02. The Applicant shall remain responsible for quantity and quality of liquid effluent and air emissions.
03. **Daily** discharge of industrial liquid effluent shall not exceed ..... KL.
04. **Daily** discharge of domestic liquid effluent shall not exceed ..... KL.
05. **Daily** discharge of mixed (industrial & domestic) liquid effluent shall not exceed ..... KL. *as per existing facility*
06. The Applicant shall discharge liquid effluent to existing facility ..... (place of discharge)  
 through ..... nos. outlets / outfalls.
07. To bring into any altered or new outlet/outfall or to change the place of discharge, the Applicant shall have to inform the Board and obtain prior permission of the Board in this effect.
08. The Applicant shall provide comprehensive facility for treatment of industrial liquid waste and domestic liquid waste (sewage, sullage and liquid effluent generated from canteen), and operate and maintain the same continuously so that the quality of final effluent conforms to the Standard as given in Table-I in page 03.

(Member Secretary/Chief Engr./Sr. Env. Engr./Env. Engr./Asst. Env. Engr.)

*Handwritten signature*  
 14/12/20  
**Environmental Engineer**  
**W. B. Pollution Control Board**  
**Operation & Execution Cell**



(3)  
Consent to M/s. Graphite India Limited  
for its unit at Sagarbhangra, Durgapur, P.S. - Coke Oven, Dist- Paschim  
Burdwan, Pin- 713211

[illegible]

- The *Applicant* shall regularly submit to the Board the Returns of Water Consumption in the prescribed form and pay the Cess as specified under Section 3 of the said Act.

**Environmental Engineer**  
**W. B. Pollution Control Board**  
**Operation & Execution Cell**

Continued.....

(4)

Consent to M/s. Graphite India Limited.  
 for its unit at existing factory premises, Garghanga, Durgapur,  
P.S.- Coke Oven, Dist- Paschim Bardwan, Pin-713211

11. The *Applicant* shall install suitable device for measuring the volume of water consumed for different purposes as mentioned above giving correct result to the satisfaction of the *State Board*.
12. All the stacks connected to various sources of emissions must be designated by numbers such as S-1, S-2, S-3, etc., and this must be painted/displayed to facilitate identification.
13. The *Applicant* shall install comprehensive control system consisting of pollution control equipment as is warranted with reference to generation of air emissions and operate and maintain the same continuously so as to achieve the level of pollutants of the *Standard* as given in Table-II below :

Table-II

| Stack No. | Stack height from G.L., (in mts.) | Stack attached to (sources and control system, if any):  | Volume Nm <sup>3</sup> /hr. | Velocity of gas emission m/sec | Concentrations of parameters not to exceed |           |  |  | Frequency of emission sampling |
|-----------|-----------------------------------|--|-----------------------------|--------------------------------|--|-----------|--|--|--------------------------------|
|           |                                   |  |                             |                                | SPM (mg/Nm <sup>3</sup> )                  | CO (%v/v) |  |  |                                |
| S-I       | 30.5                              | P.T. Unit-4 (Thermopack Stack) with wet Scrubber.        |                             |                                | 150  | -         |  |  | Half Yearly                    |
| S-2       | 35.8                              | P.T. Unit-4 (Preheater System).                          |                             |                                | 150  | -         |  |  | -do-                           |
| S-3       | 8.5                               | D.G. Set (2x500 KVA) with acoustic enclosure & silencer. |                             |                                | 150  | 1         |  |  | -do-                           |
| S-4       |                                   |  |                             |                                |  |           |  |  |                                |
| S-5       |                                   |  |                             |                                |  |           |  |  |                                |
| S-6       |                                   |  |                             |                                |  |           |  |  |                                |
| S-7       |                                   |  |                             |                                |  |           |  |  |                                |
| S-8       |                                   |  |                             |                                |  |           |  |  |                                |
| S-9       |                                   |  |                             |                                |  |           |  |  |                                |
| S-10      |                                   |  |                             |                                |  |           |  |  |                                |

(Member Secretary/Chief Engr./ Sr. Env. Engr./ Env. Engr./ Asst. Env. Engr.)

*Hausdi*  
 14/12/20  
**Environmental Engineer**  
**W. B. Pollution Control Board**  
**Operation & Execution Cell**

Continued.....



C0131904

(5)

Consent to M/s. Graphite India Limited.for its unit at Sagarbhangra, Durgapur, P.S. - Coke Oven, Dist - Paschim  
Burdwan, Pin-713211

14. The Applicant shall provide ports in the stack(s) and other necessary permanent facilities such as ladder, platform, etc. for monitoring/sampling the air emissions and the same shall be made available for inspection and use by the State Board's staff as well as State Board's authorised agencies.
15. The Applicant shall observe the following fuel consumption pattern :-

| Sl. No | Type of fuel | Quantity consumed per day     | Fuel burning operation where the fuel is used |
|--------|--------------|-------------------------------|---|
| 01     | CBM Gas      | 15,5000 m <sup>3</sup> /month | P. I Unit #4                                  |
| 02     |              |                               |   |
| 03     |              |                               |   |
| 04     |              |                               |   |
| 05     |              |                               |   |

16. The Applicant shall maintain the generation and treatment/disposal of non-hazardous solid waste as specified below :-

| Type of waste    | Quantity  | Treatment | Disposal                                   |
|------------------|-----------|-----------|--|
| Pitch Condensate | 6 MT/Year | —         | to be disposed off through<br>WBWML/Haldia |
|                  |           |           |  |

17. The Applicant shall take adequate measures for control of noise levels from its own sources within the premises within the limit given below :-

| Time                            | Limit in dB(A) L <sub>eq</sub> |
|---------------------------------|--------------------------------|
| Day Time (06 a.m. to 09 p.m.)   | 75                             |
| Night Time (09 p.m. to 06 a.m.) | 70                             |

18. The Applicant shall at all times maintain good house-keeping, proper working order, and operate efficiently for control of pollution from all sources so as not to cause nuisance to surrounding areas/inhabitants and to achieve compliance with the terms and conditions of the consent.
19. The Applicant shall bring about at least 33% of the available open land under the green coverage / plantation.
20. The Applicant shall provide for an alternate electric power source sufficient to operate all pollution control facilities installed by the Applicant to maintain compliance with the terms and conditions of the consent. In absence of such an alternate electric power source, the Applicant shall stop, reduce or otherwise control production to abide by the terms and conditions of the Consent regarding pollution level.
21. The Applicant shall install a separate energy meter showing the consumption of energy for operation of pollution control devices.
22. The Applicant shall ensure that fugitive emissions from the activity are controlled so as to maintain clean and safe environment in and around the factory premises.
23. The Applicant shall provide drainage system for conveying industrial and domestic liquid waste. Storm-water drain shall be kept separate from the drainage system meant for industrial and domestic liquid waste

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

Environmental Engineer  
W. B. Pollution Control Board  
Operation & Execution Cell

Continued.....



Consent to Ms. Graphite India Limited.  
 for its unit at Sagarbhang, Durgapur, P.S. - Coke Oven, Dist - Paschim  
Burdwan, Pin - 713211

24. The *Applicant* shall maintain a separate register showing consumption of chemicals used in pollution control systems.
25. The *Applicant* shall get the samples of hazardous wastes/leachates analysed at least once in ..... from the laboratory recognised of the West Bengal Pollution Control Board and ensure that they conform to the limits stipulated. Test reports shall be sent to the Board.
26. The *Applicant* shall provide adequate and safe facility for collection of air, waste water and solid waste samples by the *State Board's* staff as well as *State Board's* authorised agencies.
27. The *Applicant* shall submit to the *State Board* by the 30th September of every year the Environmental Statement Report for the financial year ending 31st March of the current year in the prescribed form (Form -V) as required under the provisions of rule 14 of the Environment (Protection) [Second Amendment] rules, 1992.
28. The *Applicant* shall allow the Officers of the *State Board* to enter into the applicant's premises at any reasonable time to inspect the pollution control systems as well as monitoring and measuring devices in connection with prevention & control of pollution.
29. The *Applicant* shall maintain an Inspection Book in the factory premises which shall be made available to Officers & employees of the *State Board* for inspection, review and to write down any direction or observation as is deemed necessary during the inspection from time to time.
30. The *Application* shall furnish to the *State Board* all information in respect of quality, quantity, rate of discharge, place of discharge of liquid effluent and air emissions.
31. The *Applicant* shall maintain adequate number of qualified and trained personnel among his staff for proper maintenance and operation of the effluent treatment and / or emission control devices and for overall environment management of the industry.
32. The *Applicant* shall have to make registration for the use of groundwater if any, with Central Ground Water Authority.
33. The *Applicant* shall intimate to the *State Board* immediately of any occurrence or apprehension of occurrence of discharge of any poisonous, noxious or pollutants in excess of quality as well as quality as mentioned earlier to any receiving water body/receiving system or to atmosphere owing to accident or other unforeseen incident/event including natural disaster. The *Applicant* Shall (i) take all steps adequate to prevent such accident discharge/release of poisonous, noxious or pollutants and to limit their consequences to persons and the environment, (ii) provide to the persons working on the site with the information, training and equipment including antidotes necessary to ensure their safety and mitigate the accidental release of poisonous noxious or pollutants to the environment.
34. The *Applicant* shall make an application to the *State Board* in the prescribed form for renewal of the consent at least 60 (sixty) days before the date of expiry of this Consent.
35. The *Applicant* shall not make any alternation/modification/expansion in the existing manufacturing process and equipment as well as the pollution control system without prior approval of the Board.
36. The *Applicant* shall comply with the conditions as laid down in the Manufacture, Storage and Import of hazardous Chemicals Rules, 1989 and Hazardous Wastes (Management & Handling) Rules, 1989.

Additional Conditions See Annexure.

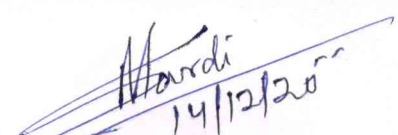
(Member Secretary/Chief Engr./Sr. Env. Engr. /  Environmental Engineer.)

W. B. Pollution Control Board  
 Operation & Execution Cell

Annexure to Consent Letter Number – CO131904

Additional Conditions issued **M/s. Graphite India Limited** at existing factory premises  
Sagarbhangaa India Limited , Durgapur, P.S-Coke Oven, Dist- Paschim Bardhaman, PIN-713211

1. The unit should comply all the conditions mentioned in Consent to Establish (NOC) issued vide meo no.285-7/WPBD-Cont(408)/98 dated 27.10.2016 in favour of the industry for new Pitch Impregnation Unit(PI Unit#4) at existing factory premises by replacing of existing Pitch Impregnation Unit(PI #1).
2. The unit should obtain all the statutory licenses as applicable from other concerned Govt. Department.
3. This consent may be revoked at any time on violation of environmental norms.
4. The unit shall comply the State Board direction issued vide memo no.1406-7/WPBD-Cont(408)/98(Part-VII) dated 02.12.2020 .
5. **The unit shall demolish the existing Pitch Impregnation Unit(PI#1) immediately and submit the report of same before the State Board.**
6. This consent to Operate is valid for operation of new Pitch Impregnation Unit(PI Unit#4) Pitch Impregnated electrode is intermediate process of total finished product – Electrode-52000 MTPA will remain as existing production capacity at existing plant premises.

  
**Environmental Engineer**  
**West Bengal Pollution Control Board**

**Environmental Engineer**  
**W. B. Pollution Control Board**  
**Operation & Execution Cell**



WEST BENGAL POLLUTION CONTROL BOARD

'Paribesh Bhawan'  
Bldg. No. - 10A, Block - LA, Sector-III  
Salt Lake City, Kolkata-700 098

[Renewal]



Consent Letter Number : C.O.12.3373

Memo Number : 1302-E/WPBD-cont(408)/98 (Pt.-VII).

Date : 29/12/2021

Consent to Operate

under

Section 25 & 26 of the Water (Prevention and Control of Pollution) Act, 1974 and  
Section 21 of the Air (Prevention and Control of Pollution) Act, 1981

The West Bengal Pollution Control Board (hereinafter referred to as State Board) under the provisions of Section 25 & 26 of the Water (Prevention and Control of Pollution) Act, 1974, as amended and Section 21 of the Air (Prevention and Control of Pollution) Act, 1981, as amended and Rules and Orders made thereunder, hereby grants its consent to :

Graphite India Limited

(Address of Regd. office/Head/Office/City Office)

(hereinafter referred to as Applicant) for its unit located at P.O. - Sagarebanga, Durgapur,  
P.S. - Coke Oven, Paschim Bardhaman - 713211

(Detailed address of the manufacturing unit)

for a period from 01/01/2022 to 30/11/2023

to operate the industrial unit and to discharge liquid effluent and to emit gaseous effluent from the premises/land of the industrial unit, in accordance with the conditions as mentioned in the Annexure to this consent letter provided on any day at any instance the quantity and quality of liquid discharge and gaseous emission shall not exceed the permissible limit as specified in the Table I & II of this consent letter and in the Environmental (Protection) Act, 1986.

Breach of the conditions and / or failure to comply with the directions as set out in the Annexure shall render the applicant liable for prosecution under the provisions of the Water (Prevention and Control of Pollution) Act, 1974 and Air (Prevention and Control of Pollution) Act, 1981.

The State Board reserve the right to revoke, withdraw or make any reasonable variation / change / alter the conditions of this consent letter giving one month's notice to the applicant.

For and on behalf of the State Board

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Engr.)



29/12/2021  
Environmental Engineer  
Durgapur Regional Office  
West Bengal Pollution Control Board

## ANNEXURE

Consent to ..... Graphite India Limited .....  
 for its unit at ..... P.O- Sagarbhangra, Durgapur, P.S- Coke Oven, .....  
 ..... Paschim Bardhaman- 713211 .....

Conditions :

01. This Consent is valid for the ~~manufacture of~~ operation of new RH 24 section Baking Furnace (# II)

| Sl. No. | Name of major products and by-products | Quantity manufactured per month |
|---------|--|---------------------------------|
| 01      |  |                                 |
| 02      |  |                                 |
| 03      |  |                                 |
| 04      |  |                                 |
| 05      |  |                                 |
| 06      |  |                                 |
| 07      |  |                                 |
| 08      |  |                                 |
| 09      |  |                                 |
| 10      |  |                                 |
| 11      |  |                                 |
| 12      |  |                                 |

02. The *Applicant* shall remain responsible for quantity and quality of liquid effluent and air emissions.

03. **Daily** discharge of industrial liquid effluent shall not exceed ..... — ..... KL.

04. **Daily** discharge of domestic liquid effluent shall not exceed ..... — ..... KL.

05. **Daily** discharge of mixed (industrial & domestic) liquid effluent shall not exceed ..... 9.0 ..... KL.

06. The *Applicant* shall discharge liquid effluent to ..... DMC Nullah ..... (place of discharge)  
 through ..... 01 (One) ..... nos. outlets / outfalls.

07. To bring into any altered or new outlet/outfall or to change the place of discharge, the Applicant shall have to inform the Board and obtain prior permission of the Board in this effect.

08. The *Applicant* shall provide comprehensive facility for treatment of industrial liquid waste and domestic liquid waste (sewage, sullage and liquid effluent generated from canteen), and operate and maintain the same continuously so that the quality of final effluent conforms to the *Standard* as given in Table-I in page 03.

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

*Key*  
 29/12/2021  
 Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board  
 Continued.....



Consent to Graphite India Limited  
for its unit at P.O. - Sagarbanga, Durgapur, P.S. - Coke Oven,  
Paschim Bardhaman - 713211

[illegible]

09. The Applicant falls in the ..... Cess paying ..... Category of the Water (Prevention and Control of Pollution) Cess Act, 1977 and Rules made thereunder and the Applicant shall comply with the provisions of the said Act and Rules made thereunder.

|  |   |       |    |
|--|---|-------|----|
| ● Industrial cooling, spraying in mine pits and boiler feed water<br>(Water used for gardening should be included in this category of use) | → | 50.00 | KL |
| ● Domestic purpose   | → | 10.00 | KL |
| ● Processing whereby water gets polluted and the pollutants<br>are easily biodegradable  | → | —     | KL |
| ● Processing whereby water gets polluted and the pollutants<br>are not easily biodegradable  | → | —     | KL |

The *Applicant* shall regularly submit to the Board the Returns of Water Consumption in the prescribed form and pay the Cess as specified under Section 3 of the said Act.

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Engr. / Assistant Engr.)

29/11/2024  
Environmental Engineer  
Durgapur Regional Office  
West Bengal Pollution Control Board  
Continued.....

Continued.....

Consent to ..... Graphite India Limited .....  
 for its unit at P.O - Sagarbanga, Durgapur, P.S - Coke Oven,  
Purchim Bardhaman - 713211 .....

11. The *Applicant* shall install suitable device for measuring the volume of water consumed for different purposes as mentioned above giving correct result to the satisfaction of the *State Board*.
12. All the stacks connected to various sources of emissions must be designated by numbers such as S-1, S-2, S-3, etc., and this must be painted/displayed to facilitate identification.
13. The *Applicant* shall install comprehensive control system consisting of pollution control equipment as is warranted with reference to generation of air emissions and operate and maintain the same continuously so as to achieve the level of pollutants of the *Standard* as given in Table-II below :

Table-II

| Stack No. | Stack height from G.L., (in mts.) | Stack attached to (sources and control system, if any): | Volume Nm <sup>3</sup> /hr. | Velocity of gas emission m/sec | Concentrations of parameters not to exceed |           |   |   | Frequency of emission sampling |
|-----------|-----------------------------------|---|-----------------------------|--------------------------------|--|-----------|---|---|--------------------------------|
|           |                                   |   |                             |                                | SPM (mg/Nm <sup>3</sup> )                  | CO (%v/v) |   |   |                                |
| S-1       | 45m                               | 1x RH 21 Section Baking Furnace (#II)                   | —                           | —                              | 150  | 1         | — | — | yearly                         |
| S-2       | 30m                               | Stack cleaning machine                                  | —                           | —                              | 150  | —         | — | — | yearly                         |
| S-3       | * 11m                             | 1x 500KVA D.h ret                                       | —                           | —                              | 150  | 1         | — | — | yearly.                        |
| S-4       |                                   |   |                             |                                |  |           |   |   |                                |
| S-5       |                                   |   |                             |                                |  |           |   |   |                                |
| S-6       |                                   |   |                             |                                |  |           |   |   |                                |
| S-7       |                                   |   |                             |                                |  |           |   |   |                                |
| S-8       |                                   |   |                             |                                |  |           |   |   |                                |
| S-9       |                                   |   |                             |                                |  |           |   |   |                                |
| S-10      |                                   |   |                             |                                |  |           |   |   |                                |

\* Height of the stack above the roof of D.h ret room must be 5m.

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Engineer)

Key  
29/12/2024  
Environmental Engineer  
Durgapur Regional Office  
West Bengal Pollution Control Board  
Continued.....



Consent to ..... Graphite India Limited .....  
 for its unit at P.O- Sagarbhangra, Durgapur, P.S- Coke Oven,  
Paschim Bardhaman - 713211 .....

14. The *Applicant* shall provide ports in the stack(s) and other necessary permanent facilities such as ladder, platform, etc. for monitoring/sampling the air emissions and the same shall be made available for inspection and use by the *State Board's* staff as well as *State Board's* authorised agencies.

15. The *Applicant* shall observe the following fuel consumption pattern :-

| Sl. No | Type of fuel | Quantity consumed per day   | Fuel burning operation where the fuel is used |
|--------|--------------|-----------------------------|---|
| 01     | CBM          | 87000 m <sup>3</sup> /month | 1X RH 24 section Baking Furnace (#II)         |
| 02     | HSD          | -                           | 1X 500 KVA D.G set                            |
| 03     |              |                             |   |
| 04     |              |                             |   |
| 05     |              |                             |   |

16. The *Applicant* shall maintain the generation and treatment/disposal of non-hazardous solid waste as specified below :-

| Type of waste | Quantity | Treatment | Disposal |
|---------------|----------|-----------|----------|
|               |          |           |          |
|               |          |           |          |

17. The *Applicant* shall take adequate measures for control of noise levels from its own sources within the premises within the limit given below :-

| Time                            | Limit in dB(A) L <sub>eq</sub> |
|---------------------------------|--------------------------------|
| Day Time (06 a.m. to 10 p.m.)   | 75                             |
| Night Time (10 p.m. to 06 a.m.) | 70                             |

18. The *Applicant* shall at all times maintain good house-keeping, proper working order, and operate efficiently for control of pollution from all sources so as not to cause nuisance to surrounding areas/inhabitants and to achieve compliance with the terms and conditions of the consent.

19. The *Applicant* shall bring about at least 33% of the available open land under the green coverage / plantation.

20. The *Applicant* shall provide for an alternate electric power source sufficient to operate all pollution control facilities installed by the *Applicant* to maintain compliance with the terms and conditions of the consent. In absence of such an alternate electric power source, the *Applicant* shall stop, reduce or otherwise control production to abide by the terms and conditions of the Consent regarding pollution level.

21. The *Applicant* shall install a separate energy meter showing the consumption of energy for operation of pollution control devices.

22. The *Applicant* shall ensure that fugitive emissions from the activity are controlled so as to maintain clean and safe environment in and around the factory premises.

23. The *Applicant* shall provide drainage system for conveying industrial and domestic liquid waste. Storm-water drain shall be kept separate from the drainage system meant for industrial and domestic liquid waste

(Member Secretary/Chief Engr./ Sr. Env. Engr. / Env. Engr. / Asst. Env. Engr.)

*Key*  
 29/11/2021  
 Environmental Engineer  
 Durgapur Regional Office  
 West Bengal Pollution Control Board



Consent to ..... Graphite India Limited .....  
 for its unit at P.O- Sagarbhangra, Durgapur, P.S- Coke Over, .....  
Paschim Bardhaman - 713211 .....

24. The *Applicant* shall maintain a separate register showing consumption of chemicals used in pollution control systems.
25. The *Applicant* shall get the samples of hazardous wastes/leachates analysed at least once in ..... from the laboratory recognised of the West Bengal Pollution Control Board and ensure that they conform to the limits stipulated. Test reports shall be sent to the Board.
26. The *Applicant* shall provide adequate and safe facility for collection of air, waste water and solid waste samples by the *State Board's* staff as well as *State Board's* authorised agencies.
27. The *Applicant* shall submit to the *State Board* by the 30th September of every year the Environmental Statement Report for the financial year ending 31st March of the current year in the prescribed form (Form -V) as required under the provisions of rule 14 of the Environment (Protection) [Second Amendment] rules, 1992.
28. The *Applicant* shall allow the Officers of the *State Board* to enter into the applicant's premises at any reasonable time to inspect the pollution control systems as well as monitoring and measuring devices in connection with prevention & control of pollution.
29. The *Applicant* shall maintain an Inspection Book in the factory premises which shall be made available to Officers & employees of the *State Board* for inspection, review and to write down any direction or observation as is deemed necessary during the inspection from time to time.
30. The *Application* shall furnish to the *State Board* all information in respect of quality, quantity, rate of discharge, place of discharge of liquid effluent and air emissions.
31. The *Applicant* shall maintain adequate number of qualified and trained personnel among his staff for proper maintenance and operation of the effluent treatment and / or emission control devices and for overall environment management of the industry.
32. The *Applicant* shall have to make registration for the use of groundwater if any, with Central Ground Water Authority.
33. The *Applicant* shall intimate to the *State Board* immediately of any occurrence or apprehension of occurrence of discharge of any poisonous, noxious or pollutants in excess of quality as well as quality as mentioned earlier to any receiving water body/receiving system or to atmosphere owing to accident or other unforeseen incident/event including natural disaster. The *Applicant* Shall (i) take all steps adequate to prevent such accident discharge/release of poisonous, noxious or pollutants and to limit their consequences to persons and the environment, (ii) provide to the persons working on the site with the information, training and equipment including antidotes necessary to ensure their safety and mitigate the accidental release of poisonous noxious or pollutants to the environment.
34. The *Applicant* shall make an application to the *State Board* in the prescribed form for renewal of the consent at least 60 (sixty) days before the date of expiry of this Consent.
35. The *Applicant* shall not make any alternation/modification/expansion in the existing manufacturing process and equipment as well as the pollution control system without prior approval of the Board.
36. The *Applicant* shall comply with the conditions as laid down in the Manufacture, Storage and Import of hazardous Chemicals Rules, 1989 and Hazardous Wastes (Management & Handling) Rules, 1989.

**Additional Conditions** Annexure to Consent Letter no. CO/104534 vide memo no. 415-Dr-Co-5/12/0344 dated 22/11/2017.



# **Annexure – 2**



## WEST BENGAL POLLUTION CONTROL BOARD

(Department of Environment, Govt. of West Bengal)

Paribesh Bhawan

Bldg. No. 10 A, Block-LA, Sector-III, Bidhan Nagar,

Kolkata – 700 098

Tel : 0091 (033) 2335-9088 / 8861 / 8211 / 8073 / 6731

2335-0261 / 8212 / 8213 / 7428 / 5975

Fax : 0091 (033) 2335 6730 / 2813

Website : [www.wbpcb.gov.in](http://www.wbpcb.gov.in), e-mail : [wbpcbnet@wbpcb.gov.in](mailto:wbpcbnet@wbpcb.gov.in)

Memo No. 114 /2S (HW) –598/99-2000 (Pt-I)

Date: 16.06.2022

### FORM 2

**Grant of Authorization under the provisions of the Hazardous and Other Wastes (Management and Transboundary Movement) Rules, 2016.**

**Ref.:** Application authorization dated 30.07.2021 for management & handling of Hazardous & Other Waste (Management & Transboundary) Rules, 2016 and its amendment thereafter.

**M/s. Graphite India Limited**

**Sagarbhanga, Durgapur, P.S.: Coke Oven, Paschim Bardhaman-713211** is hereby granted an authorisation for generation, collection, reception, storage, transport, reuse, recycling, recovery, pre-processing, co-processing, utilisation, treatment, disposal, or any other use of hazardous or other wastes or both on the **Sagarbhanga, Durgapur, P.S.: Coke Oven, Paschim Bardhaman-713211**.

#### Details of Authorisation:

| Sl. no. | Category of Hazardous Waste as per the Schedule I, II and III of these rules | Authorised mode of disposal or recycling or utilization or co-processing etc. | Quantity ( MT/ per year) |
|---------|--|---|--------------------------|
| 1.      | 5.1  | Recycling through authorized recyclers.*                                      | 13.97 KL                 |
| 2.      | 5.2  | Disposal to CHWTSDF. *  | 16.17                    |
| 3.      | 3.3  | Recycling through authorized recyclers.*                                      | 14.39 KL                 |
| 4.      | B1   | Disposal to CHWTSDF. *  | 5.34                     |
| 5.      | 33.1   | Recycling through authorized recyclers.*                                      | 1.55                     |
| 6.      | 35.1   | Recycling through authorized recyclers / Disposal to CHWTSDF. *               | 214.90                   |
| 7.      | 35.3   | Disposal to CHWTSDF. *  | 3.88                     |

\* For detail refer to Specific Conditions.

(1) Authorization shall be valid for a period upto **30.04.2026** with effect from the date of issue

(2) The authorization is subject to the following general and specific conditions:

[Chief Engineer]

West Bengal Pollution Control Board

Chief Engineer  
W. B. Pollution Control Board  
Dept. of Environment, Govt. of W.B.

**A. General conditions of authorization:**

1. The authorised person shall comply with the provisions of the Environment (Protection) Act, 1986, and the rules made there under.
2. The authorisation or its renewal shall be produced for inspection at the request of an officer authorised by the State Pollution Control Board.
3. The person authorised shall not rent, lend, sell, transfer or otherwise transport the hazardous and other wastes except what is permitted through this authorisation.
4. Any unauthorised change in personnel, equipment or working conditions as mentioned in the application by the person authorised shall constitute a breach of his authorisation.
5. The person authorised shall implement Emergency Response Procedure (ERP) for which this authorisation is being granted considering all site specific possible scenarios such as spillages, leakages, fire etc. and their possible impacts and also carry out mock drill in this regard at regular interval of time;
6. The person authorised shall comply with the provisions outlined in the Central Pollution Control Board guidelines on "Implementing Liabilities for Environmental Damages due to Handling and Disposal of Hazardous Waste and Penalty"
7. It is the duty of the authorised person to take prior permission of the State Pollution Control Board to close down the facility.
8. The imported hazardous and other wastes shall be fully insured for transit as well as for any accidental occurrence and its clean-up operation.
9. The record of consumption and fate of the imported hazardous and other wastes shall be maintained.
10. The hazardous and other waste which gets generated during recycling or reuse or recovery or pre-processing or utilisation of imported hazardous or other wastes shall be treated and disposed of as per specific conditions of authorisation.
11. The importer or exporter shall bear the cost of import or export and mitigation of damages if any.
12. An application for the renewal of an authorisation shall be three months before the expiry of such authorisation.
13. Any other conditions for compliance as per the Guidelines issued by the Ministry of Environment, Forest and Climate Change or Central Pollution Control Board from time to time.
14. Annual return shall be filed by June 30<sup>th</sup> every year for the period ending 31st March of that year.

**B. Specific conditions:**


1. The unit shall store the hazardous wastes (category wise separately) under shade in an environment friendly safe manner within the premises at designated places and the unit shall not store hazardous waste on site for more than 90 days.
2. Waste containing oil (5.2), ETP sludge (35.3) and discarded asbestos (B1) shall be disposed to the CHWTSDf through Manifest system (Form-10).
3. Used oil (5.1), oily sludge (3.3), ESP tarry residue (35.1) and contaminated drums shall be sold through manifest system (Form 10) to the authorized recyclers having valid authorization of the State Pollution Control Board. During each sale, original Pass-book issued by SPCB to the authorized recyclers shall be endorsed mentioning



the quantity and copy of the same shall be kept as record. If not fit for recycling shall be sent to CHWTSDf facility with manifest system.

4. The unit shall submit copies of Form 10 to the State Board on a regular basis.
5. Transport of hazardous and other waste shall be in accordance with the Hazardous & Other Wastes (Management & Transboundary Movement) Rules, 2016, guidelines issued by the Central Pollution Control Board (CPCB) and rules made under the Motor Vehicle's Act, 1988. The responsibility of safe transport shall be either of the sender or the receiver whosoever arranges the transport and this responsibility shall be clearly indicated in the Manifest.
6. Records of hazardous waste generation, storage and disposal shall be maintained properly as form 3 of Hazardous & Other Wastes (Management & Transboundary Movement) Rules, 2016, and shall be available to the inspecting officials of the State Board during inspection.
7. The unit shall update regularly the environmental information in Display Boards as per the order of the Hon'ble Supreme Court dated. 14.10.2003 in W.P.(C) NO.657 of 1995.
8. Authorisation will be revoked in case of non-compliances with any of the above conditions.

**M/s. Graphite India Limited**  
**Sagarbhanga, Durgapur, P.S.: Coke Oven,**  
**Paschim Bardhaman-713211**

  
[Chief Engineer]  
West Bengal Pollution Control Board  
Chief Engineer  
W. B. Pollution Control Board  
Dept. of Environment, Govt. of W.B.



# **Annexure – 3**

**STACK AIR, AMBIENT AIR, NOISE LEVEL & EFFLUENT**

**SAMPLING**

**&**

**ANALYSIS REPORT**

**OF**

**M/s. Graphite India Limited**

**Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,**

**FEBRUARY - 2023**

**PREPARED BY :**

**INDICATIVE CONSULTANT INDIA**

HPL Link Road, Basudevpur

P.O.-Khanjanchak, Haldia

Dist. - Purba Medinipur ,

Pin Code - 721 602

Perbati Goluj  
Manager  
INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-133/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | MIXTURE FUME EXTRACTOR (NORTH) (EXTRUSION # 1 DEPT)        |                        |
| #Stack No.                                     | 01   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| Particulars of the Plant                                   | MIXTURE FUME EXTRACTOR (NORTH) (EXTRUSION # 1 DEPT) | Shape of Stack                           | Circular |
| Stack attached to  |   | Material of Construction                 | M.S      |
| Emission due to  | Due to Mixing                                       | Stack ID at sampling point (M)           | 0.72     |
| Fuel Used  | Electricity   | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -   | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -   | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -   | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -   | c) Ht. of sampling port from GL(M)       | 26.0     |
| Pollution Control Device                                   | Nil   | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes   |  |          |

### B. # PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 30       | Steam Generation Capacity : |   |
| Barometric Pressure.(mm Hg)                | 755      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 13.23    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 18970.49 | Load :                      |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C. # RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01      | Particulate Matter (mg/Nm <sup>3</sup> )   | 24.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02      | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03      | Carbon mono oxide (as CO) - % (V/V)  | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golder  
(Quality Manager)  
Signatory Authority  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-135/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | MIXTURE FUME EXTRACTOR (SOUTH) (EXTRUSION # 1 DEPT)        |                        |
| #Stack No.                                     | 02   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |                 |
|--|---|--|-----------------|
| <b>Particulars of the Plant</b>                            |   |  |                 |
| Stack attached to  | MIXTURE FUME EXTRACTOR (SOUTH) (EXTRUSION # 1 DEPT) | Shape of Stack                           | Square          |
| Emission due to  | Due to Mixing                                       | Material of Construction                 | M.S             |
| Fuel Used  | Electricity   | Stack ID at sampling point (M)           | 0.406m x 0.406m |
| Rated Fuel Consumption                                     | -   | At Bottom (M)                            | -               |
| Working Fuel Consumption                                   | -   | At Top (M)                               | -               |
| Calorific Value (Kcal/kg)                                  | -   | <b>Height Details :</b>                  |                 |
| Sulphur Content (% by Wt)                                  | -   | a) Total Ht. Of stack from GL(M)         | 30.0            |
| Ash Content (% by Wt.)                                     | -   | b) Total Ht. Of stack from RL(M)         | -               |
| Pollution Control Device                                   | Nil   | c) Ht. of sampling port from GL(M)       | 16.0            |
| Whether Stack is provided with permanent Platform / Ladder | Yes   | d) Ht. of port from disturbance zone (M) | -               |

### B.] PHYSICAL DATA:

|  |         |                                    |   |
|--|---------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 27      | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure (mm Hg)                | 755     | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 15.61   | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 9153.30 | <b>Load :</b>                      |   |
| Pressure                                   | -       | a) Rated                           | - |
|  |         | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 23.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Ghosh  
(Quality Manager)  
Signatory Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



9001:2015



45001:2018

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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-134/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P Dhanuka<br>Mob. No. 9332039296                    | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | COOLER NORTH (EXTRUSION # 1 DEPT)                          |                        |
| #Stack No.                                     | 03   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part-III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                 |  |          |
|--|---------------------------------|--|----------|
| Particulars of the Plant                                   |                                 | Shape of Stack                           | Circular |
| Stack attached to  | COOLER NORTH (EXTRUSION#1 DEPT) | Material of Construction                 | M.S      |
| Emission due to  | Cooling Operation               | Stack ID at sampling point (M)           | 0.55     |
| Fuel Used  | Electricity                     | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                               | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                               | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                               | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -                               | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                               | c) Ht. of sampling port from GL(M)       | 15.0     |
| Pollution Control Device                                   | Nil                             | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                             |  |          |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 29       | Steam Generation Capacity : |   |
| Barometric Pressure(mm Hg)                 | 755      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 19.08    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 16019.13 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                       |
|---------|--|-----------------|-----------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 20.0            | IS 11255 (Part-1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               | IS 13270:1992 (RA 2019)           |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            |                                   |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Goud  
(Quality Manager)  
Signatory Authority

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



9001:2015



45001:2018

EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |   |                        |
|--|---|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-136/2023                             | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                    | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.  | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                    | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                              | Analysis Start Date    |
| #Sample Description                            | STACK AIR   | Analysis complete Date |
| #Location                                      | FUME EXTRACTOR (WEST SIDE) WEIGH FLOOR (EXTRUSION # 1 DEPT) |                        |
| #Stack No.                                     | 05  |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                 |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                        |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                            |  |          |
|--|----------------------------|--|----------|
| Particulars of the Plant                                   | FUME EXTRACTOR (WEST SIDE) | Shape of Stack                           | Circular |
| Stack attached to  | WEIGH FLOOR                | Material of Construction                 | M.S      |
|  | (EXTRUSION # 1 DEPT)       |  |          |
| Emission due to  | Mixing Operation           | Stack ID at sampling point (M)           | 0.78     |
| Fuel Used  | Electricity                | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                          | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                          | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                          | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -                          | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                          | c) Ht. of sampling port from GL(M)       | 26.0     |
|  |                            | d) Ht. of port from disturbance zone (M) | -        |
| Pollution Control Device                                   | Nil                        |  |          |
| Whether Stack is provided with permanent Platform / Ladder | Yes                        |  |          |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 27       | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 755      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 15.72    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 26719.85 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 27.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: *Anondal*

Checked By: *A. Patra*

*Parbati Gohar*  
(Quality Manager)  
Signatory Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: **Haldia Laboratory**

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-099/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | RAYMOND MILL DUST COLLECTOR (EXTRUSION # 1 DEPT)           |                        |
| #Stack No.                                     | 06   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |  |             |
|--|--|--|-------------|
| Particulars of the Plant                                   | RAYMOND MILL DUST COLLECTOR (EXTRUSION # 1 DEPT) | Shape of Stack                           | Square      |
| Stack attached to  | Grinding of CPC Fines Electricity                | Material of Construction                 | M.S         |
| Emission due to  |  | Stack ID at sampling point (M)           | 0.3m x 0.3m |
| Fuel Used  |  | At Bottom (M)                            | -           |
| Rated Fuel Consumption                                     |  | At Top (M)                               | -           |
| Working Fuel Consumption                                   |  | Height Details :                         |             |
| Calorific Value(Kcal/kg)                                   |  | a) Total Ht. Of stack from GL(M)         | 7.0         |
| Sulphur Content (% by Wt)                                  |  | b) Total Ht. Of stack from RL(M)         | -           |
| Ash Content (% by Wt.)                                     |  | c) Ht. of sampling port from GL(M)       | 1.6         |
| Pollution Control Device                                   | Bag Filter                                       | d) Ht. of port from disturbance zone (M) | -           |
| Whether Stack is provided with permanent Platform / Ladder | Yes  |  |             |

### B.] PHYSICAL DATA:

|                               |         |                             |   |
|-------------------------------|---------|-----------------------------|---|
| Flue Gas Temperature (°C)     | 29      | Steam Generation Capacity : |   |
| Barometric Pressure(mm Hg)    | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)    | 13.08   | b) Running                  | - |
| Quantity of Gas flow (Nm³/hr) | 4157.08 | Load                        |   |
| Pressure                      |         | a) Rated                    | - |
|                               |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters  | Result Obtained | Test Method                       |
|---------|---|-----------------|-----------------------------------|
| 01.     | Particulate Matter (mg/Nm³)                               | 35.0            | IS 11255 (Part-1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO₂ (V/V) - (mg/Nm³) | -               |                                   |
| 03.     | Carbon mono oxide (as CO)- % (V/V)                        | <0.2            | IS 13270:1992 (RA 2019)           |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Golu  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
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  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-096/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-096           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 02:30 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 07.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 08.02.2023 |
| #Location                                      | SCRAP SYSTEM DUST COLLECTOR (EXTRUSION # 1 DEPT)           |                                     |
| #Stack No.                                     | 07   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |          |
|--|--|----------|
| Particulars of the Plant   | Shape of Stack                           | Circular |
| Stack attached to  | Material of Construction                 | M.S      |
| Emission due to  | Stack ID at sampling point (M)           | 0.6      |
| Fuel Used  | At Bottom (M)                            | -        |
| Rated Fuel Consumption   | At Top (M)                               | -        |
| Working Fuel Consumption   | Height Details :                         |          |
| Calorific Value(Kcal/kg)   | a) Total Ht. Of stack from GL(M)         | 7.1      |
| Sulphur Content (% by Wt)  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)   | c) Ht. of sampling port from GL(M)       | 5.6      |
| Pollution Control Device   | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder : Yes |  |          |

### B.] PHYSICAL DATA:

|  |          |                             |
|--|----------|-----------------------------|
| Flue Gas Temperature (°C)                  | 30       | Steam Generation Capacity : |
| Barometric Pressure,(mm Hg)                | 754      | a) Rated                    |
| Velocity of Gas flow (m/s)                 | 10.32    | b) Running                  |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 10270.29 | a) Rated                    |
| Pressure                                   | -        | b) Running                  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 43.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: A. Mondal

Checked By: A. Patra

Parbati Ghosh  
(Quality Manager)  
Signature Authority

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-132/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-132           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date : 03.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 03:55 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 08.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 09.02.2023 |
| #Location                                      | MAIN DUST COLLECTOR (EXTRUSION # 1 DEPT)                   |                                     |
| #Stack No.                                     | 08   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |  |          |
|--|--|--|----------|
| <b>Particulars of the Plant</b>                            |  | Shape of Stack                           | Circular |
| Stack attached to  | MAIN DUST COLLECTOR (EXTRUSION # 1 DEPT) | Material of Construction                 | M.S      |
| Emission due to  | Process Activity                         | Stack ID at sampling point (M)           | 0.7      |
| Fuel Used  | Electricity                              | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -  | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -  | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)                                   | -  | a) Total Ht. Of stack from GL(M)         | 22.0     |
| Sulphur Content (% by Wt)                                  | -  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -  | c) Ht. of sampling port from GL(M)       | 15.0     |
| Pollution Control Device                                   | Bag Filter                               | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                      |  |          |

### B.] PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 29       | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure(mm Hg)                 | 755      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 7.68     | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 10437.43 | <b>Load :</b>                      |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 61.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: *[Signature]*

Checked By: *[Signature]*

*[Signature]*  
Parbat Golm  
(Quality Manager)  
Signatory Authority

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: **Haldia Laboratory**

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-130/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-130           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 03.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 03:00 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 08.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 09.02.2023 |
| #Location                                      | BAKING MILLING DUST COLLECTOR                              |                                     |
| #Stack No.                                     | 09   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |                               |  |          |
|--|-------------------------------|--|----------|
| Particulars of the Plant                                     | BAKING MILLING DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  | Milling Operation             | Material of Construction                 | M.S      |
| Emission due to  | Electricity                   | Stack ID at sampling point (M)           | 0.76     |
| Fuel Used  | -                             | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                       | -                             | At Top (M)                               | -        |
| Working Fuel Consumption                                     | -                             | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                     | -                             | a) Total Ht. Of stack from GL(M)         | 10.0     |
| Sulphur Content (% by Wt)                                    | -                             | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                       | -                             | c) Ht. of sampling port from GL(M)       | 4.66     |
| Pollution Control Device                                     | Bag Filter                    | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder : | Yes                           |  |          |

### B. PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 31       | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 12.19    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 19381.17 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C. RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 55.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Gola  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-124/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-124           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 09.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 02:25 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 15.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 16.02.2023 |
| #Location                                      | BAKING FURNACE (FEE. 1 TO 5 SIDE)                          |                                     |
| #Stack No.                                     | 10   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |  |  |          |
|--|--|--|----------|
| <b>Particulars of the Plant</b>                            | <b>BAKING FURNACE (FEE. 1 TO 5 SIDE)</b> | Shape of Stack                           | Circular |
| Stack attached to  | Baking of Green Electrode                | Material of Construction                 | M.S      |
| Emission due to  | CBM                                      | Stack ID at sampling point (M)           | 1.56     |
| Fuel Used  | -  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -  | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -  | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)                                   | -  | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -  | c) Ht. of sampling port from GL(M)       | 9.65     |
| Pollution Control Device                                   | Incinerator                              | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                      |  |          |

### B. # PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 174      | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure.(mm Hg)                | 751      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 14.27    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 63853.08 | <b>Load</b>                        |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C. # RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 63.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 70.63           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NO <sub>x</sub> ) -(mg/m <sup>3</sup> )                     | 70.15           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.2             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gouri  
(Quality Manager)

Signatory Authority:

Parbati Gouri  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

End of Report

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-123/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-123           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date : 09.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 04:00 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 15.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 16.02.2023 |
| #Location                                      | BAKING FURNACE (FEE. 6 TO 10 SIDE)                         |                                     |
| #Stack No.                                     | 11   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                    |  |          |
|--|------------------------------------|--|----------|
| <b>Particulars of the Plant</b>                            |                                    |  |          |
| Stack attached to  | BAKING FURNACE (FEE. 6 TO 10 SIDE) | Shape of Stack                           | Circular |
| Emission due to  | Baking of Green Electrode          | Material of Construction                 | M.S.     |
| Fuel Used  | CBM                                | Stack ID at sampling point (M)           | 1.56     |
| Rated Fuel Consumption                                     | -                                  | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -                                  | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   | -                                  | <b>Height Details :</b>                  |          |
| Sulphur Content (% by Wt)                                  | -                                  | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Ash Content (% by Wt.)                                     | -                                  | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Incinerator                        | c) Ht. of sampling port from GL(M)       | 9.65     |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 162      | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure (mm Hg)                | 751      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 12.80    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 58839.71 | <b>Load</b>                        |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 66.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 50.44           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) - (mg/m <sup>3</sup> )                                 | 77.80           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.6             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)

Signatory Authority  
Parbati Golui  
Quality Manager

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

INDICATIVE CONSULTANT INDIA

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-110/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-110           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date : 13.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 11:10 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 20.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 21.02.2023 |
| #Location                                      | RIED HAMMER FURNACE (BAKING FURNACE) (14 SECTION)          |                                     |
| #Stack No.                                     | 12   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                      |   |  |          |
|--|----------------------|---|--|----------|
| Particulars of the Plant                                   | Stack attached to    | RIED HAMMER FURNACE (BAKING FURNACE) (14 SECTION) | Shape of Stack                           | Circular |
| Emission due to  | Combustion of C.B.M. |   | Material of Construction                 | M.S      |
| Fuel Used  | C.B.M.               |   | Stack ID at sampling point (M)           | 0.8      |
| Rated Fuel Consumption                                     | -                    |   | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -                    |   | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   | -                    |   | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  | -                    |   | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Ash Content (% by Wt.)                                     | -                    |   | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | E.S.P                |   | c) Ht. of sampling port from GL(M)       | 10.5     |
| Whether Stack is provided with permanent Platform / Ladder | Yes                  |   | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |          |                             |
|--|----------|-----------------------------|
| Flue Gas Temperature (°C)                  | 84       | Steam Generation Capacity : |
| Barometric Pressure(mm Hg)                 | 752      | a) Rated                    |
| Velocity of Gas flow (m/s)                 | 8.28     | b) Running                  |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 12255.64 | Load                        |
| Pressure                                   | -        | a) Rated                    |
|  |          | b) Running                  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 59.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 60.54           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NO <sub>x</sub> ) -(mg/m <sup>3</sup> )                     | 63.27           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.2             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Goliui  
(Quality Manager)  
Signatory Authority  
Parbati Goliui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                        |
|--|---|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-111/2023                               | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                      | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.    | 2023/A-111             |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                      | Sampling Date          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                                | 13.02.2023             |
| #Sample Description                            | STACK AIR   | Sampling Time          |
| #Location                                      | RIED HAMMER FURNACE (BAKING FURNACE) (RH16 & RH 24-I SECTION) | 09:35 AM               |
| #Stack No.                                     | 13  | Analysis Start Date    |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle                  | 20.02.2023             |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                          | Analysis complete Date |
|  |   | 21.02.2023             |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                   |  |  |          |
|--|-------------------|--|--|----------|
| Particulars of the Plant                                   | Stack attached to | RIED HAMMER FURNACE (BAKING FURNACE) (RH 16 & RH 24-I SECTION) | Shape of Stack                           | Circular |
| Emission due to  | Combustion of CBM |  | Material of Construction                 | M.S      |
| Fuel Used  | C.B.M             |  | Stack ID at sampling point (M)           | 1.8      |
| Rated Fuel Consumption                                     | -                 |  | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -                 |  | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   | -                 |  | Height Details :                         |          |
| Sulphur Content (% by Wt.)                                 | -                 |  | a) Total Ht. Of stack from GL(M)         | 45.0     |
| Ash Content (% by Wt.)                                     | -                 |  | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | E.S.P             |  | c) Ht. of sampling port from GL(M)       | 33.0     |
| Whether Stack is provided with permanent Platform / Ladder | Yes               |  | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |           |                             |   |
|--|-----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 76        | Steam Generation Capacity : |   |
| Barometric Pressure(mm Hg)                 | 752       | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 14.27     | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 109442.01 | Load                        |   |
| Pressure                                   | -         | a) Rated                    | - |
|  |           | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01      | Particulate Matter (mg/Nm <sup>3</sup> )   | 61.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02      | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03      | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 70.63           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04      | Oxides of Nitrogen (as NO <sub>x</sub> ) -(mg/m <sup>3</sup> )                     | 59.80           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05      | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06      | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.4             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-120/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | P.I. UNIT - 2 (THERMO PACK STACK)                          |                        |
| #Stack No.                                     | 16   |                        |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                      |  |          |
|--|--------------------------------------|--|----------|
| Particulars of the Plant                                   | P.I. UNIT - 2<br>(THERMO PACK STACK) | Shape of Stack                           | Circular |
| Stack attached to  | Combustion of CBM                    | Material of Construction                 | M.S      |
| Emission due to  | C.B.M                                | Stack ID at sampling point (M)           | 0.4      |
| Fuel Used  | -                                    | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                                    | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                                    | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                                    | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -                                    | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                                    | c) Ht. of sampling port from GL(M)       | 28.0     |
| Pollution Control Device                                   | Nil                                  | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                  |  |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 99      | Steam Generation Capacity : | - |
| Barometric Pressure.(mm Hg)                | 751     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 8.12    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 2868.84 | Load                        |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 61.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 60.54           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) -(mg/m <sup>3</sup> )                                  | 68.31           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.2             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: *Amal*

Checked By: *A. Patra*

*Parbati Golu*  
Parbati Golu  
(Quality Manager)  
Signatory Authority  
Parbati Golu  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-121/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-121           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 09.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 11:10 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 15.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 16.02.2023 |
| #Location                                      | P.I. UNIT - 2 (H.G.G STACK)                                |                                     |
| #Stack No.                                     | 17   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                             |  |          |
|--|-----------------------------|--|----------|
| <b>Particulars of the Plant</b>                                  |                             | Shape of Stack                           | Circular |
| Stack attached to  | P.I. UNIT - 2 (H.G.G STACK) | Material of Construction                 | M.S      |
| Emission due to  | Combustion of CBM           | Stack ID at sampling point (M)           | 0.4      |
| Fuel Used  | C.B.M                       | At Bottom (M)                            | -        |
| Rated Fuel Consumption   | -                           | At Top (M)                               | -        |
| Working Fuel Consumption   | -                           | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)   | -                           | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)  | -                           | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt)  | -                           | c) Ht. of sampling port from GL(M)       | 28.0     |
| Pollution Control Device   | Water Spray Cooling Chamber | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder - Yes |                             |  |          |

### B.] PHYSICAL DATA:

|  |        |                                    |   |
|--|--------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 65     | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure, (mm Hg)               | 751    | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 11.29  | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 439047 | <b>Load</b>                        |   |
| Pressure                                   | -      | a) Rated                           | - |
|  |        | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 52.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 50.45           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) -(mg/m <sup>3</sup> )                                  | 73.11           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.4             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
  - 5 The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - 6 The reproduction of the report except in full is invalid without written approval of the laboratory.
  - 7 Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - 8 Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevpur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

Plot 1/2/3/4/5/6/7/8/9/10/11/12/13/14/15/16/17/18/19/20/21/22/23/24/25/26/27/28/29/30/31/32/33/34/35/36/37/38/39/40/41/42/43/44/45/46/47/48/49/50/51/52/53/54/55/56/57/58/59/60/61/62/63/64/65/66/67/68/69/70/71/72/73/74/75/76/77/78/79/80/81/82/83/84/85/86/87/88/89/90/91/92/93/94/95/96/97/98/99/100/101/102/103/104/105/106/107/108/109/110/111/112/113/114/115/116/117/118/119/120/121/122/123/124/125/126/127/128/129/130/131/132/133/134/135/136/137/138/139/140/141/142/143/144/145/146/147/148/149/150/151/152/153/154/155/156/157/158/159/160/161/162/163/164/165/166/167/168/169/170/171/172/173/174/175/176/177/178/179/180/181/182/183/184/185/186/187/188/189/190/191/192/193/194/195/196/197/198/199/200/201/202/203/204/205/206/207/208/209/210/211/212/213/214/215/216/217/218/219/220/221/222/223/224/225/226/227/228/229/230/231/232/233/234/235/236/237/238/239/240/241/242/243/244/245/246/247/248/249/250/251/252/253/254/255/256/257/258/259/260/261/262/263/264/265/266/267/268/269/270/271/272/273/274/275/276/277/278/279/280/281/282/283/284/285/286/287/288/289/290/291/292/293/294/295/296/297/298/299/300/301/302/303/304/305/306/307/308/309/310/311/312/313/314/315/316/317/318/319/320/321/322/323/324/325/326/327/328/329/330/331/332/333/334/335/336/337/338/339/340/341/342/343/344/345/346/347/348/349/350/351/352/353/354/355/356/357/358/359/360/361/362/363/364/365/366/367/368/369/370/371/372/373/374/375/376/377/378/379/380/381/382/383/384/385/386/387/388/389/390/391/392/393/394/395/396/397/398/399/400/401/402/403/404/405/406/407/408/409/410/411/412/413/414/415/416/417/418/419/420/421/422/423/424/425/426/427/428/429/430/431/432/433/434/435/436/437/438/439/440/441/442/443/444/445/446/447/448/449/450/451/452/453/454/455/456/457/458/459/460/461/462/463/464/465/466/467/468/469/470/471/472/473/474/475/476/477/478/479/480/481/482/483/484/485/486/487/488/489/490/491/492/493/494/495/496/497/498/499/500/501/502/503/504/505/506/507/508/509/510/511/512/513/514/515/516/517/518/519/520/521/522/523/524/525/526/527/528/529/530/531/532/533/534/535/536/537/538/539/540/541/542/543/544/545/546/547/548/549/550/551/552/553/554/555/556/557/558/559/560/561/562/563/564/565/566/567/568/569/570/571/572/573/574/575/576/577/578/579/580/581/582/583/584/585/586/587/588/589/590/591/592/593/594/595/596/597/598/599/600/601/602/603/604/605/606/607/608/609/610/611/612/613/614/615/616/617/618/619/620/621/622/623/624/625/626/627/628/629/630/631/632/633/634/635/636/637/638/639/640/641/642/643/644/645/646/647/648/649/650/651/652/653/654/655/656/657/658/659/660/661/662/663/664/665/666/667/668/669/670/671/672/673/674/675/676/677/678/679/680/681/682/683/684/685/686/687/688/689/690/691/692/693/694/695/696/697/698/699/700/701/702/703/704/705/706/707/708/709/710/711/712/713/714/715/716/717/718/719/720/721/722/723/724/725/726/727/728/729/730/731/732/733/734/735/736/737/738/739/740/741/742/743/744/745/746/747/748/749/750/751/752/753/754/755/756/757/758/759/760/761/762/763/764/765/766/767/768/769/770/771/772/773/774/775/776/777/778/779/780/781/782/783/784/785/786/787/788/789/790/791/792/793/794/795/796/797/798/799/800/801/802/803/804/805/806/807/808/809/810/811/812/813/814/815/816/817/818/819/820/821/822/823/824/825/826/827/828/829/830/831/832/833/834/835/836/837/838/839/840/841/842/843/844/845/846/847/848/849/850/851/852/853/854/855/856/857/858/859/860/861/862/863/864/865/866/867/868/869/870/871/872/873/874/875/876/877/878/879/880/881/882/883/884/885/886/887/888/889/890/891/892/893/894/895/896/897/898/899/900/901/902/903/904/905/906/907/908/909/910/911/912/913/914/915/916/917/918/919/920/921/922/923/924/925/926/927/928/929/930/931/932/933/934/935/936/937/938/939/940/941/942/943/944/945/946/947/948/949/950/951/952/953/954/955/956/957/958/959/960/961/962/963/964/965/966/967/968/969/970/971/972/973/974/975/976/977/978/979/980/981/982/983/984/985/986/987/988/989/990/991/992/993/994/995/996/997/998/999/1000/1001/1002/1003/1004/1005/1006/1007/1008/1009/1010/1011/1012/1013/1014/1015/1016/1017/1018/1019/1020/1021/1022/1023/1024/1025/1026/1027/1028/1029/1030/1031/1032/1033/1034/1035/1036/1037/1038/1039/1040/1041/1042/1043/1044/1045/1046/1047/1048/1049/1050/1051/1052/1053/1054/1055/1056/1057/1058/1059/1060/1061/1062/1063/1064/1065/1066/1067/1068/1069/1070/1071/1072/1073/1074/1075/1076/1077/1078/1079/1080/1081/1082/1083/1084/1085/1086/1087/1088/1089/1090/1091/1092/1093/1094/1095/1096/1097/1098/1099/1100/1101/1102/1103/1104/1105/1106/1107/1108/1109/1110/1111/1112/1113/1114/1115/1116/1117/1118/1119/1120/1121/1122/1123/1124/1125/1126/1127/1128/1129/1130/1131/1132/1133/1134/1135/1136/1137/1138/1139/1140/1141/1142/1143/1144/1145/1146/1147/1148/1149/1150/1151/1152/1153/1154/1155/1156/1157/1158/1159/1160/1161/1162/1163/1164/1165/1166/1167/1168/1169/1170/1171/1172/1173/1174/1175/1176/1177/1178/1179/1180/1181/1182/1183/1184/1185/1186/1187/1188/1189/1190/1191/1192/1193/1194/1195/1196/1197/1198/1199/1200/1201/1202/1203/1204/1205/1206/1207/1208/1209/1210/1211/1212/1213/1214/1215/1216/1217/1218/1219/1220/1221/12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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-125/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | 2023/A-125             |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Date          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | 06.02.2023             |
| #Sample Description                            | STACK AIR  | Sampling Time          |
| #Location                                      | FINISHING DUST COLLECTOR NORTH (UNIT - 1)                  | 04:15 PM               |
| #Stack No.                                     | 19   | Analysis Start Date    |
| Sample Condition                               | In Glass Microfiber Thimble                                | 14.02.2023             |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       | Analysis complete Date |
|  |  | 15.02.2023             |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| Particulars of the Plant                                   | FINISHING DUST COLLECTOR NORTH (UNIT - 1) | Shape of Stack                           | Circular |
| Stack attached to  | Process Activity                          | Material of Construction                 | M.S.     |
| Emission due to Fuel Used                                  | Electricity                               | Stack ID at sampling point (M)           | 0.7      |
| Rated Fuel Consumption                                     | -   | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -   | At Top (M)                               | -        |
| Calorific Value (Kcal/kg)                                  | -   | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  | -   | a) Total Ht. Of stack from GL(M)         | 13.0     |
| Ash Content (% by Wt.)                                     | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter                                | c) Ht. of sampling port from GL(M)       | 4.2      |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                       | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 30       | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 9.06     | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 12256.02 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 52.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
  - 5 The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - 6 The reproduction of the report except in full is invalid without written approval of the laboratory.
  - 7 Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - 8 Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-126/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | FINISHING DUST COLLECTOR (UNIT - 2)                        |                        |
| #Stack No.                                     | 20   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                     |  |          |
|--|-------------------------------------|--|----------|
| Particulars of the Plant   | FINISHING DUST COLLECTOR (UNIT - 2) | Shape of Stack                           | Circular |
| Stack attached to  | Process Activity                    | Material of Construction                 | M.S      |
| Emission due to Fuel Used  | Electricity                         | Stack ID at sampling point (M)           | 0.9      |
| Rated Fuel Consumption   |                                     | At Bottom (M)                            | -        |
| Working Fuel Consumption   |                                     | At Top (M)                               | -        |
| Calorific Value (Kcal/kg)  |                                     | Height Details :                         |          |
| Sulphur Content (% by Wt)  |                                     | a) Total Ht. Of stack from GL(M)         | 15.0     |
| Ash Content (% by Wt.)   |                                     | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device   | Bag Filter                          | c) Ht. of sampling port from GL(M)       | 11.0     |
| Whether Stack is provided with permanent Platform / Ladder : Yes |                                     | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 31       | Steam Generation Capacity : |   |
| Barometric Pressure (mm Hg)                | 754      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 17.43    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 38852.32 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 64.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO) - % (V/V)  | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui

(Quality Manager)

Signatory Authority

Parbati Golui

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-127/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-127           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 06.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 02:00 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | FINE SCREENING DUST COLLECTOR                              |                                     |
| #Stack No.                                     | 21   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |                               |  |          |
|--|-------------------------------|--|----------|
| Particulars of the Plant                                   | FINE SCREENING DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  | Screening of Operation        | Material of Construction                 | M.S      |
| Emission due to  | Electricity                   | Stack ID at sampling point (M)           | 0.56     |
| Fuel Used  | -                             | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                             | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                             | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                             | a) Total Ht. Of stack from GL(M)         | 9.75     |
| Sulphur Content (% by Wt)                                  | -                             | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                             | c) Ht. of sampling port from GL(M)       | 6.70     |
|  |                               | d) Ht. of port from disturbance zone (M) | -        |
| Pollution Control Device                                   | Bag Filter                    |  |          |
| Whether Stack is provided with permanent Platform / Ladder | Yes                           |  |          |

### B. # PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 29      | Steam Generation Capacity : |   |
| Barometric Pressure (mm Hg)                | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 7.33    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 6361.52 | Load                        |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C. # RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 41.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For: INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Goudi  
(Quality Manager)

Signatory Authority:  
Parbati Goudi

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-119/2023  | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.   | Sample ID No : 2023/A-119           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal.  | Sampling Date : 10.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296   | Sampling Time : 09:40 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023   | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | BOILER (1.5 TON/2.0 TON/HR.) ATTACHED WITH COMMON STACK AT THE TIME OF SAMPLING 2.0 TON/HR. RUNNING. |                                     |
| #Stack No.                                     | 22   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle   |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)   |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|   |  |          |
|---|--|----------|
| Particulars of the Plant  | Shape of Stack                           | Circular |
| Stack attached to   | Material of Construction                 | M.S      |
| BOILER (1.5 TON/2.0 TON/HR.) ATTACHED WITH COMMON STACK AT THE TIME OF SAMPLING 2.0 TON/HR. RUNNING |  |          |
| Emission due to   | Stack ID at sampling point (M)           | 0.28     |
| Fuel Used   | At Bottom (M)                            | -        |
| Rated Fuel Consumption  | At Top (M)                               | -        |
| Working Fuel Consumption  | Height Details :                         |          |
| Calorific Value(Kcal/kg)  | a) Total Ht. Of stack from GL(M)         | 29.29    |
| Sulphur Content (% by Wt)   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt)   | c) Ht. of sampling port from GL(M)       | 13.50    |
| Pollution Control Device  | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder : Yes                                    | Nil                                      |          |

### B.] PHYSICAL DATA:

|  |         |                             |
|--|---------|-----------------------------|
| Flue Gas Temperature (°C)                  | 116     | Steam Generation Capacity : |
| Barometric Pressure, (mm Hg)               | 751     | a) Rated                    |
| Velocity of Gas flow (m/s)                 | 10.25   | b) Running                  |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 1702.41 | Load                        |
| Pressure                                   | -       | a) Rated                    |
|  |         | b) Running                  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained                | Test Method             |
|---------|--|--------------------------------|-------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 20.0 at 3.2% CO <sub>2</sub>   | IS 11255 (Part-1): 1985 |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | 75.0                           | (RA 2019).              |
| 03.     | Sulphur di-oxide (mg/Nm <sup>3</sup> )   | 121.07 at 16.2% O <sub>2</sub> | IS:11255 (Part-2) 1985  |
| 04.     | Sulphur di-oxide Normalized to 3% O <sub>2</sub> - (mg/Nm <sup>3</sup> )           | 461.10                         | (RA 2019)               |
| 05.     | Oxides of Nitrogen (as NOx) -(mg/m <sup>3</sup> )                                  | 90.79 at 16.2% O <sub>2</sub>  | IS: 11255 (Part-7) 2005 |
| 06.     | NO <sub>x</sub> Normalized to 3% O <sub>2</sub> -(mg/m <sup>3</sup> )              | 345.77                         |                         |
| 07.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2                           | IS 13270:1992 (RA 2019) |
| 08.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.2                            | IS 13270:1992 (RA 2019) |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

End of Report

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CENTRAL LABORATORY : HPL Link Road, Basudevpur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

B1 1/20/10, Santoshpur(M), Block D, Mahabubnagar, Kolkata - 700146, M. 9830122222, 9830122222





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-120/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-120           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 06.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 09:40 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | TUNNEL KILN - I (RE-BAKING FURNACE)                        |                                     |
| #Stack No.                                     | 23   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                     |  |          |
|--|-------------------------------------|--|----------|
| Particulars of the Plant                                   |                                     | Shape of Stack                           | Circular |
| Stack attached to  | TUNNEL KILN - I (RE-BAKING FURNACE) | Material of Construction                 | M.S      |
| Emission due to  | Re-Baking of Electrode              | Stack ID at sampling point (M)           | 0.73     |
| Fuel Used  | C.B.M                               | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                                   | At Top (M)                               | -        |
| Working Fuel Consumption                                   | 140 Kg/Hr.                          | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                                   | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -                                   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                                   | c) Ht. of sampling port from GL(M)       | 18.0     |
| Pollution Control Device                                   | Incinerator                         | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                 |  |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 111     | Steam Generation Capacity : |   |
| Barometric Pressure (mm Hg)                | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 6.78    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 7754.00 | Load :                      |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 29.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 80.72           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NO <sub>x</sub> ) - (mg/m <sup>3</sup> )                    | 63.35           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO) - % (V/V)  | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> ) - % (V/V)                                    | 3.2             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: *Amrinda*

Checked By: *A. Patra*

Parbati Gohui  
(Quality Manager)  
Signatory Authority  
Parbati Gohui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only
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  - 8 Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing: **Haldia Laboratory**

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-109/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | FINISHING DUST COLLECTOR (UNIT - 3)                        |                        |
| #Stack No.                                     | 24   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] GENERAL INFORMATION ABOUT STACK:

|  |                                     |  |          |
|--|-------------------------------------|--|----------|
| <b>Particulars of the Plant</b>                            |                                     |  |          |
| Stack attached to  | FINISHING DUST COLLECTOR (UNIT - 3) | Shape of Stack                           | Circular |
| Emission due to  | Process Activity                    | Material of Construction                 | M.S      |
| Fuel Used  | Electricity                         | Stack ID at sampling point (M)           | 0.78     |
| Rated Fuel Consumption                                     | -                                   | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -                                   | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   | -                                   | <b>Height Details :</b>                  |          |
| Sulphur Content (% by Wt)                                  | -                                   | a) Total Ht. Of stack from GL(M)         | 13.0     |
| Ash Content (% by Wt.)                                     | -                                   | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter                          | c) Ht. of sampling port from GL(M)       | 9.0      |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                 | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 30       | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure,(mm Hg)                | 752      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 10.63    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 17797.69 | <b>Load</b>                        |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 67.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Ghosh  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-118/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-118           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 10.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 11:05 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 15.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 16.02.2023 |
| #Location                                      | P.I. UNIT - 3 (H.G.G STACK)                                |                                     |
| #Stack No.                                     | 25   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                             |  |          |
|--|-----------------------------|--|----------|
| <b>Particulars of the Plant</b>                                  |                             | Shape of Stack                           | Circular |
| Stack attached to  | P.I. UNIT - 3 (H.G.G STACK) | Material of Construction                 | M.S      |
| Emission due to  | Combustion of CBM           | Stack ID at sampling point (M)           | 0.4      |
| Fuel Used  | C.B.M                       | At Bottom (M)                            | -        |
| Rated Fuel Consumption   | -                           | At Top (M)                               | -        |
| Working Fuel Consumption   | -                           | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)   | -                           | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)  | -                           | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)   | -                           | c) Ht. of sampling port from GL(M)       | 28.0     |
| Pollution Control Device   | Water Spray Cooling Chamber | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder - Yes |                             |  |          |

### B.] PHYSICAL DATA:

|  |         |                                    |   |
|--|---------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 65      | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure, (mm Hg)               | 751     | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 9.75    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 3791.74 | <b>Load</b>                        |   |
| Pressure                                   | -       | a) Rated                           | - |
|  |         | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 68.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 70.63           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NO <sub>x</sub> ) - (mg/m <sup>3</sup> )                    | 68.43           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.4             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
  - 5 The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - 6 The reproduction of the report except in full is invalid without written approval of the laboratory.
  - 7 Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - 8 Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                        |
|--|---|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-128/2023                           | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                  | Sample ID No           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                            | Analysis Start Date    |
| #Sample Description                            | STACK AIR   | Analysis complete Date |
| #Location                                      | TUNNEL KILN - 2 (RE-BAKING FURNACE)                       |                        |
| #Stack No.                                     | 26  |                        |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle              |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                      |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                     |  |          |
|--|-------------------------------------|--|----------|
| Particulars of the Plant   | TUNNEL KILN - 2 (RE-BAKING FURNACE) | Shape of Stack                           | Circular |
| Stack attached to  | Re-Baking of Electrode              | Material of Construction                 | M.S      |
| Emission due to  | C.B.M                               | Stack ID at sampling point (M)           | 0.73     |
| Fuel Used  | 140 Kg/Hr.                          | At Bottom (M)                            | -        |
| Rated Fuel Consumption   |                                     | At Top (M)                               | -        |
| Working Fuel Consumption   |                                     | Height Details :                         |          |
| Calorific Value(Kcal/kg)   |                                     | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)  |                                     | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)   |                                     | c) Ht. of sampling port from GL(M)       | 18.0     |
| Pollution Control Device   | Incinerator                         | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder : Yes |                                     |  |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 116     | Steam Generation Capacity : |   |
| Barometric Pressure.(mm Hg)                | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 8.52    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 9616.68 | Load                        |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 25.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 50.45           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) -(mg/m <sup>3</sup> )                                  | 59.80           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.6             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: [Signature]

Checked By: A. Patra

Parbati Gouti

(Quality Manager)

Signature: [Signature]

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-117/2023                           | Format No: ICI/EM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                  | Sample ID No : 2023/A-117           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal. | Sampling Date : 10.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  | Sampling Time : 12:25 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                            | Analysis Start Date : 15.02.2023    |
| #Sample Description                            | STACK AIR   | Analysis complete Date : 16.02.2023 |
| #Location                                      | P.I. UNIT - 3 (THERMO PACK STACK)                         |                                     |
| #Stack No.                                     | 27  |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle              |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                      |                                     |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |                                      |  |          |
|--|--------------------------------------|--|----------|
| Particulars of the Plant                                   | P.I. UNIT - 3<br>(THERMO PACK STACK) | Shape of Stack                           | Circular |
| Stack attached to  | Combustion of CBM                    | Material of Construction                 | M.S      |
| Emission due to  | C.B.M                                | Stack ID at sampling point (M)           | 0.40     |
| Fuel Used  | -                                    | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                                    | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                                    | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                                    | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -                                    | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt)                                      | -                                    | c) Ht. of sampling port from GL(M)       | 28.0     |
| Pollution Control Device                                   | Nil                                  | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                  |  |          |

### B. PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 84      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 751     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 7.41    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 2766.73 | Load                        |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C. RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 70.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/Nm <sup>3</sup> )   | 70.63           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) - (mg/m <sup>3</sup> )                                 | 50.15           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.8             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Ghosh  
(Quality Manager)  
Signatory Authority

Parbati Ghosh  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-098/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | EXTRUSION -2 DEPARTMENT THERMIC FLUEID HEATER              |                        |
| #Stack No.                                     | 28   |                        |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| <b>Particulars of the Plant</b>                            |   | Shape of Stack                           | Circular |
| Stack attached to  | EXTRUSION -2 DEPARTMENT THERMIC FLUEID HEATER | Material of Construction                 | M.S      |
| Emission due to  | Combustion of CBM                             | Stack ID at sampling point (M)           | 0.58     |
| Fuel Used  | C.B.M   | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -   | At Top (M)                               | -        |
| Working Fuel Consumption                                   | 138.4 Nm <sup>3</sup> /Hr.                    | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)                                   | -   | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -   | c) Ht. of sampling port from GL(M)       | 20.0     |
| Pollution Control Device                                   | Nil   | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes   |  |          |

### B.] PHYSICAL DATA:

|  |         |                                    |   |
|--|---------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 60      | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure (mm Hg)                | 754     | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 7.68    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 6391.36 | <b>Load</b>                        |   |
| Pressure                                   | -       | a) Rated                           | - |
|  |         | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 31.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 70.63           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) - (mg/m <sup>3</sup> )                                 | 75.20           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.2             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gola  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
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  - 8 Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                        |
|--|---|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-091/2023                           | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                  | Sample ID No           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal. | 2023/A-091             |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  | Sampling Date          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                            | 01.02.2023             |
| #Sample Description                            | STACK AIR   | Sampling Time          |
| #Location                                      | EXTRUSION # 2 IRICH DUST COLLECTOR                        | 11:50 AM               |
| #Stack No.                                     | 29  | Analysis Start Date    |
| Sample Condition                               | In Glass Microfiber Thimble                               | 07.02.2023             |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                      | Analysis complete Date |
|  |   | 08.02.2023             |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                   |                                    |  |          |
|--|-------------------|------------------------------------|--|----------|
| Particulars of the Plant                                   | Stack attached to | EXTRUSION # 2 IRICH DUST COLLECTOR | Shape of Stack                           | Circular |
| Emission due to  | Process Operation | Electricity                        | Material of Construction                 | M.S      |
| Fuel Used  |                   |                                    | Stack ID at sampling point (M)           | 0.3      |
| Rated Fuel Consumption                                     |                   |                                    | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   |                   |                                    | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   |                   |                                    | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  |                   |                                    | a) Total Ht. Of stack from GL(M)         | 34.0     |
| Ash Content (% by Wt.)                                     |                   |                                    | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter        |                                    | c) Ht. of sampling port from GL(M)       | 28.0     |
| Whether Stack is provided with permanent Platform / Ladder | Yes               |                                    | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 28      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 16.53   | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 4137.67 | Load :                      |   |
| Pressure                                   |         | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 50.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO) - % (V/V)  | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: A. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
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  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-092/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-091           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 01.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 10:50 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 07.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 08.02.2023 |
| #Location                                      | EXTRUSION # 2 MAIN DUST COLLECTOR                          |                                     |
| #Stack No.                                     | 30   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part II)                        |                                     |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |                                   |  |          |
|--|-----------------------------------|--|----------|
| Particulars of the Plant   | EXTRUSION # 2 MAIN DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  | Process Operation                 | Material of Construction                 | M.S      |
| Emission due to  | Electricity                       | Stack ID at sampling point (M)           | 1.0      |
| Fuel Used  | -                                 | At Bottom (M)                            | -        |
| Rated Fuel Consumption   | -                                 | At Top (M)                               | -        |
| Working Fuel Consumption   | -                                 | Height Details :                         |          |
| Calorific Value(Kcal/kg)   | -                                 | a) Total Ht. Of stack from GL(M)         | 34.0     |
| Sulphur Content (% by Wt)  | -                                 | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)   | -                                 | c) Ht. of sampling port from GL(M)       | 33.0     |
|  |                                   | d) Ht. of port from disturbance zone (M) | -        |
| Pollution Control Device   | Bag Filter                        |  |          |
| Whether Stack is provided with permanent Platform / Ladder : Yes |                                   |  |          |

### B. PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 27       | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 15.66    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 43665.49 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C. RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 71.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO) - % (V/V)  | <0.2            |                                    |

For INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Ghosh  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-097/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-097           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 01.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 03:20 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 07.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 08.02.2023 |
| #Location                                      | EXTRUSION # 2 RAYMOND MILL DUST COLLECTOR                  |                                     |
| #Stack No.                                     | 31   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| Particulars of the Plant                                   | EXTRUSION # 2 RAYMOND MILL DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  | Due to CPC Fines Grinding Electricity     | Material of Construction                 | M.S      |
| Emission due to Fuel Used                                  | -   | Stack ID at sampling point (M)           | 0.23     |
| Rated Fuel Consumption                                     | -   | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -   | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   | -   | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  | -   | a) Total Ht. Of stack from GL(M)         | 12.50    |
| Ash Content (% by Wt.)                                     | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter                                | c) Ht. of sampling port from GL(M)       | 10.50    |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                       | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 31      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 15.56   | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 2261.65 | Load                        |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 76.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Ghosh  
(Quality Manager)  
Signature Authority

Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1

**CENTRAL LABORATORY :** HPL Link Road, Basudevpur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

**KOLKATA LABORATORY :**

B1 1/22/1/2, Santoshpur(M), Block D, Mahasabla, Kolkata-700140, Mob : 7797506973, 7797506973





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-094/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | EXTRUSION # 2 SILO DUST COLLECTOR                          |                        |
| #Stack No.                                     | 32   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part.III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |  |          |
|--|--|--|----------|
| <b>Particulars of the Plant</b>                            | <b>EXTRUSION # 2 SILO DUST COLLECTOR</b> | Shape of Stack                           | Circular |
| Stack attached to  | Process Operation                        | Material of Construction                 | M.S      |
| Emission due to  | Electricity                              | Stack ID at sampling point (M)           | 0.6      |
| Fuel Used  | -  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -  | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -  | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)                                   | -  | a) Total Ht. Of stack from GL(M)         | 15.0     |
| Sulphur Content (% by Wt)                                  | -  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -  | c) Ht. of sampling port from GL(M)       | 7.0      |
|  |  | d) Ht. of port from disturbance zone (M) | -        |
| Pollution Control Device                                   | Bag Filter                               |  |          |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                      |  |          |

### B.] PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 29       | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure.(mm Hg)                | 754      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 14.34    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 14301.50 | <b>Load</b>                        |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 61.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For: INDICATIVE CONSULTANT INDIA

Prepared By: *[Signature]*

Checked By: *[Signature]*

*[Signature]*  
(Quality Manager)

Signature Authority

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: **Haldia Laboratory**

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-093/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-093           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 12-15 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 07.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 08.02.2023 |
| #Location                                      | EXTRUSION # 2 IRICH (TREMA) SCRUBBER SYSTEM                |                                     |
| #Stack No.                                     | 33   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| Particulars of the Plant                                   |   | Shape of Stack                           | Circular |
| Stack attached to  | EXTRUSION # 2 IRICH (TREMA) SCRUBBER SYSTEM | Material of Construction                 | M.S      |
| Emission due to  | Mixing Operation                            | Stack ID at sampling point (M)           | 0.28     |
| Fuel Used  | Electricity                                 | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -   | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -   | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -   | a) Total Ht. Of stack from GL(M)         | 8.0      |
| Sulphur Content (% by Wt)                                  | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt)                                      | -   | c) Ht. of sampling port from GL(M)       | 7.0      |
| Pollution Control Device                                   | Scrubber System                             | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes   |  |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 30      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 45.20   | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 9311.08 | Load :                      |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 41.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

B1/1/00/1/2, Santoshpur(M), Block D, Mahabhatla, Kolkata-700146, M.F. 7797506973, 7797506973





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-131/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | ACHESON DUST COLLECTOR                                     |                        |
| #Stack No.                                     | 34   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                   |                        |  |             |
|--|-------------------|------------------------|--|-------------|
| Particulars of the Plant                                   | Stack attached to | ACHESON DUST COLLECTOR | Shape of Stack                           | Rectangular |
| Emission due to  | Process Activity  |                        | Material of Construction                 | M.S         |
| Fuel Used  | Electricity       |                        | Stack ID at sampling point (M)           | 0.8mx 0.32m |
| Rated Fuel Consumption                                     | -                 |                        | At Bottom (M)                            | -           |
| Working Fuel Consumption                                   | -                 |                        | At Top (M)                               | -           |
| Calorific Value(Kcal/kg)                                   | -                 |                        | Height Details :                         |             |
| Sulphur Content (% by Wt)                                  | -                 |                        | a) Total Ht. Of stack from GL(M)         | 18.0        |
| Ash Content (% by Wt.)                                     | -                 |                        | b) Total Ht. Of stack from RL(M)         | -           |
|  |                   |                        | c) Ht. of sampling port from GL(M)       | 10.5        |
|  |                   |                        | d) Ht. of port from disturbance zone (M) | -           |
| Pollution Control Device                                   | Bag Filter        |                        |  |             |
| Whether Stack is provided with permanent Platform / Ladder | Yes               |                        |  |             |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 30       | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 754      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 13.11    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 11814.32 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 65.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Choudhary  
(Quality Manager)  
Signatory Authority  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
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  - 8 Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing: Haldia Laboratory

End of Report

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

B1/1/22/1/2, Santoshpur(M), Block B, Maheshtala, Kolkata 700140, Mob. : 7707045010, 7707506973

Towards Sustainable Growth





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-095/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-095           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 10:00 AM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 07.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 08.02.2023 |
| #Location                                      | EXTRUSION # 2 SCRAP SYSTEM DUST COLLECTOR                  |                                     |
| #Stack No.                                     | 35   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| <b>Particulars of the Plant</b>                            |   | Shape of Stack                           | Circular |
| Stack attached to  | EXTRUSION # 2 SCRAP SYSTEM DUST COLLECTOR | Material of Construction                 | M.S      |
| Emission due to  | Process Activity                          | Stack ID at sampling point (M)           | 0.65     |
| Fuel Used  | Electricity                               | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -   | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -   | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)                                   | -   | a) Total Ht. Of stack from GL(M)         | 17.0     |
| Sulphur Content (% by Wt)                                  | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -   | c) Ht. of sampling port from GL(M)       | 8.9      |
|  |   | d) Ht. of port from disturbance zone (M) | -        |
| <b>Pollution Control Device</b>                            | Bag Filter                                |  |          |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                       |  |          |

### B.] PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 26       | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure(mm Hg)                 | 754      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 12.63    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 14938.76 | <b>Load :</b>                      |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 62.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gohar  
(Quality Manager)  
Signature Authority

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

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**CENTRAL LABORATORY :** HPL Link Road, Basudevpur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

**KOLKATA LABORATORY :**

B1 1/22/11, Santoshpur(M), Block D, Mahasabala, Kolkata-700140, Mob : 7323845010, 7323500070





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-105/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | R. H. - 24 (II) FURNACE                                    |                        |
| #Stack No.                                     | 36   |                        |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                         |  |          |
|--|-------------------------|--|----------|
| Particulars of the Plant                                   | R. H. - 24 (II) FURNACE | Shape of Stack                           | Circular |
| Stack attached to  | Combustion of CBM       | Material of Construction                 | M.S      |
| Emission due to  | C.B.M                   | Stack ID at sampling point (M)           | 1.6      |
| Fuel Used  | 70 m <sup>3</sup> /Hr.  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                       | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                       | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                       | a) Total Ht. Of stack from GL(M)         | 45.0     |
| Sulphur Content (% by Wt.)                                 | -                       | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                       | c) Ht. of sampling port from GL(M)       | 33.0     |
| Pollution Control Device                                   | ESP                     | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                     |  |          |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 79       | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 753      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 7.26     | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 43457.24 | Load                        |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 36.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/Nm <sup>3</sup> )   | 60.54           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) - (mg/m <sup>3</sup> )                                 | 53.65           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO) - % (V/V)  | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> ) - % (V/V)                                    | 3.6             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Choudhury  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL: indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-108/2023                           | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                  | Sample ID No : 2023/A-108           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal. | Sampling Date : 13.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  | Sampling Time : 02:00 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                            | Analysis Start Date : 20.02.2023    |
| #Sample Description                            | STACK AIR   | Analysis complete Date : 21.02.2023 |
| #Location                                      | FINISHING UNIT - 3 SOUTH SIDE NIPPLE DUST COLLECTOR       |                                     |
| #Stack No.                                     | 37  |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                      |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                   |   |  |          |
|--|-------------------|---|--|----------|
| Particulars of the Plant                                   | Stack attached to | FINISHING UNIT - 3 SOUTH SIDE NIPPLE DUST COLLECTOR | Shape of Stack                           | Circular |
| Emission due to  | Process Activity  | Electricity   | Material of Construction                 | M.S      |
| Fuel Used  |                   |   | Stack ID at sampling point (M)           | 0.7      |
| Rated Fuel Consumption                                     |                   |   | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   |                   |   | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   |                   |   | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  |                   |   | a) Total Ht. Of stack from GL(M)         | 15.0     |
| Ash Content (% by Wt.)                                     |                   |   | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter        |   | c) Ht. of sampling port from GL(M)       | 8.0      |
| Whether Stack is provided with permanent Platform / Ladder | Yes               |   | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|                               |          |                             |  |
|-------------------------------|----------|-----------------------------|--|
| Flue Gas Temperature (°C)     | 30       | Steam Generation Capacity : |  |
| Barometric Pressure.(mm Hg)   | 752      | a) Rated                    |  |
| Velocity of Gas flow (m/s)    | 13.85    | b) Running                  |  |
| Quantity of Gas flow (Nm³/hr) | 18687.81 | Load                        |  |
| Pressure                      |          | a) Rated                    |  |
|                               |          | b) Running                  |  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters  | Result Obtained | Test Method                        |
|---------|---|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm³)                               | 33.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO₂ (V/V) - (mg/Nm³) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)                        | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: *[Signature]*

Checked By: *[Signature]*

*[Signature]*  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-107/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-107           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 13.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 03:10 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 20.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 21.02.2023 |
| #Location                                      | FINISHING UNIT - 2 NIPPLE LINE DUST COLLECTOR              |                                     |
| #Stack No.                                     | 38   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |  |          |
|--|--|--|----------|
| Particulars of the Plant                                   | FINISHING UNIT - 2<br>NIPPLE LINE DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  | Process Activity                                 | Material of Construction                 | M.S      |
| Emission due to  | Electricity                                      | Stack ID at sampling point (M)           | 0.61     |
| Fuel Used  | -  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -  | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -  | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -  | a) Total Ht. Of stack from GL(M)         | 11.58    |
| Sulphur Content (% by Wt)                                  | -  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -  | c) Ht. of sampling port from GL(M)       | 9.14     |
| Pollution Control Device                                   | Bag Filter                                       | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes  |  |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 31      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 752     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 7.66    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 7822.21 | Load :                      |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 46.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: V. Mondal

Checked By: A. Patra

Parbati Ghosh  
(Quality Manager)  
Signature Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
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  - Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

R11/22/1/2, Santoshpur(M), Block B, Maheshtala, Kolkata-700140, Mob. : 7707015010, 7707015011





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-115/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | R.H.-16 STOCK CLEANING MACHINE DUST COLLECTOR              |                        |
| #Stack No.                                     | 39   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |             |
|--|---|--|-------------|
| Particulars of the Plant                                   | R.H.-16 STOCK CLEANING MACHINE DUST COLLECTOR | Shape of Stack                           | Rectangular |
| Stack attached to  | Process Activity                              | Material of Construction                 | M.S         |
| Emission due to  | Electricity                                   | Stack ID at sampling point (M)           | 0.4m X 0.6m |
| Fuel Used  | -   | At Bottom (M)                            | -           |
| Rated Fuel Consumption                                     | -   | At Top (M)                               | -           |
| Working Fuel Consumption                                   | -   | Height Details :                         |             |
| Calorific Value(Kcal/kg)                                   | -   | a) Total Ht. Of stack from GL(M)         | 10.0        |
| Sulphur Content (% by Wt)                                  | -   | b) Total Ht. Of stack from RL(M)         | -           |
| Ash Content (% by Wt)                                      | -   | c) Ht. of sampling port from GL(M)       | 7.0         |
|  |   | d) Ht. of port from disturbance zone (M) | -           |
| Pollution Control Device                                   | Bag Filter                                    |  |             |
| Whether Stack is provided with permanent Platform / Ladder | Yes   |  |             |

### B.] PHYSICAL DATA:

|  |         |                             |
|--|---------|-----------------------------|
| Flue Gas Temperature (°C)                  | 33      | Steam Generation Capacity : |
| Barometric Pressure (mm Hg)                | 751     | a) Rated                    |
| Velocity of Gas flow (m/s)                 | 7.71    | b) Running                  |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 6411.74 | Load :                      |
| Pressure                                   | -       | a) Rated                    |
|  |         | b) Running                  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 44.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
  - 4 Test results shown in this test report relate only to the sample (s) only.
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  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-102/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | RH-24 (II), STOCK CLEANING MACHINE DUST COLLECTOR          |                        |
| #Stack No.                                     | 40   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| Particulars of the Plant                                   | RH-24 (II), STOCK CLEANING MACHINE DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  |   | Material of Construction                 | M.S      |
| Emission due to  | Process Activity                                  | Stack ID at sampling point (M)           | 0.65     |
| Fuel Used  | Electricity                                       | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -   | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -   | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -   | a) Total Ht. Of stack from GL(M)         | 30.0     |
| Sulphur Content (% by Wt)                                  | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -   | c) Ht. of sampling port from GL(M)       | 15.0     |
| Pollution Control Device                                   | Bag Filter  | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes   |  |          |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 32       | Steam Generation Capacity : |   |
| Barometric Pressure.(mm Hg)                | 753      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 8.96     | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 10367.79 | Load                        |   |
| Pressure                                   |          | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 37.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gouri  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
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  - 9 Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-114/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | TURNING - 1 DUST COLLECTOR                                 |                        |
| #Stack No.                                     | 41   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                   |                          |  |          |
|--|-------------------|--------------------------|--|----------|
| Particulars of the Plant                                   | Stack attached to | TURNING-1 DUST COLLECTOR | Shape of Stack                           | Circular |
| Emission due to  | Process Activity  |                          | Material of Construction                 | M.S      |
| Fuel Used  | Electricity       |                          | Stack ID at sampling point (M)           | 0.25     |
| Rated Fuel Consumption                                     |                   |                          | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   |                   |                          | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   |                   |                          | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  |                   |                          | a) Total Ht. Of stack from GL(M)         | 15.0     |
| Ash Content (% by Wt.)                                     |                   |                          | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter        |                          | c) Ht. of sampling port from GL(M)       | 3.0      |
| Whether Stack is provided with permanent Platform / Ladder | Yes               |                          | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |         |                             |  |
|--|---------|-----------------------------|--|
| Flue Gas Temperature (°C)                  | 31      | Steam Generation Capacity : |  |
| Barometric Pressure.(mm Hg)                | 751     | a) Rated                    |  |
| Velocity of Gas flow (m/s)                 | 7.68    | b) Running                  |  |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 1315.66 | Load :                      |  |
| Pressure                                   | -       | a) Rated                    |  |
|  |         | b) Running                  |  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 51.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)

Signatory Authority:  
Parbati Golui

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
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  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

End of Report

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-113/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-113           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date : 11.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 03:00 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | PI- 2, TURNING MACHINE DUST COLLECTOR                      |                                     |
| #Stack No.                                     | 42   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                   |                                       |  |          |
|--|-------------------|---------------------------------------|--|----------|
| Particulars of the Plant                                   | Stack attached to | PI- 2, TURNING MACHINE DUST COLLECTOR | Shape of Stack                           | Circular |
| Emission due to  | Process Activity  | Electricity                           | Material of Construction                 | M.S      |
| Fuel Used  |                   |                                       | Stack ID at sampling point (M)           | 0.25     |
| Rated Fuel Consumption                                     |                   |                                       | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   |                   |                                       | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   |                   |                                       | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  |                   |                                       | a) Total Ht. Of stack from GL(M)         | 15.0     |
| Ash Content (% by Wt)                                      |                   |                                       | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter        |                                       | c) Ht. of sampling port from GL(M)       | 3.0      |
| Whether Stack is provided with permanent Platform / Ladder | Yes               |                                       | d) Ht. of port from disturbance zone (M) | -        |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 31      | Steam Generation Capacity : |   |
| Barometric Pressure (mm Hg)                | 751     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 24.77   | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 4244.60 | Load                        |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 64.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Ghosh  
(Quality Manager)

Signature Authority

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer.
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-112/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-112           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 11.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 04:00 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | PI- 3, TURNING MACHINE DUST COLLECTOR                      |                                     |
| #Stack No.                                     | 43   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                       |  |          |
|--|---------------------------------------|--|----------|
| Particulars of the Plant                                   |                                       | Shape of Stack                           | Circular |
| Stack attached to  | PI- 3, TURNING MACHINE DUST COLLECTOR | Material of Construction                 | M.S      |
| Emission due to  | Process Activity                      | Stack ID at sampling point (M)           | 0.25     |
| Fuel Used  | Electricity                           | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                                     | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                                     | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                                     | a) Total Ht. Of stack from GL(M)         | 15.0     |
| Sulphur Content (% by Wt)                                  | -                                     | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt)                                      | -                                     | c) Ht. of sampling port from GL(M)       | 3.0      |
| Pollution Control Device                                   | Bag Filter                            | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                   |  |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 33      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 751     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 9.12    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 1552.31 | Load :                      |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 41.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO) - % (V/V)  | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Goli  
(Quality Manager)  
Signatory Authority  
Parbati Goli  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

KOLKATA LABORATORY : Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                        |
|--|---|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-104/2023                           | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                  | Sample ID No           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal, | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                            | Analysis Start Date    |
| #Sample Description                            | STACK AIR   | Analysis complete Date |
| #Location                                      | P.I. UNIT - 4 (THERMO PACK STACK)                         |                        |
| #Stack No.                                     | 44  |                        |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle              |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                      |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                      |  |          |
|--|--------------------------------------|--|----------|
| Particulars of the Plant                                   | P.I. UNIT - 4<br>(THERMO PACK STACK) | Shape of Stack                           | Circular |
| Stack attached to  | Combustion of CBM                    | Material of Construction                 | M.S      |
| Emission due to  | C.B.M                                | Stack ID at sampling point (M)           | 0.95     |
| Fuel Used  | 100 m <sup>3</sup> /Hr.              | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                                    | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                                    | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                                    | a) Total Ht. Of stack from GL(M)         | 30.5     |
| Sulphur Content (% by Wt)                                  | -                                    | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                                    | c) Ht. of sampling port from GL(M)       | 18.8     |
| Pollution Control Device                                   | Nil                                  | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                  |  |          |

### B.] PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 189      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 753      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 7.30     | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 11773.44 | Load :                      |   |
| Pressure                                   | -        | a) Rated                    | - |
|  |          | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 62.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 80.72           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) - (mg/m <sup>3</sup> )                                 | 52.61           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.0             | IS 13270:1992 (RA 2019)            |

For: INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gohar  
(Quality Manager)

Signature Authority

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: N.A.
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  - 9 Location of Testing: Haldia Laboratory

End of Report

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-103/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-104           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date : 14.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 12:30 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 20.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 21.02.2023 |
| #Location                                      | P.I-4 PRE-HEATER   |                                     |
| #Stack No.                                     | 45   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                         |  |                 |
|--|-------------------------|--|-----------------|
| <b>Particulars of the Plant</b>                                  | <b>P.I-4 PRE-HEATER</b> | <b>Shape of Stack</b>                    | <b>Circular</b> |
| Stack attached to  | Combustion of CBM       | Material of Construction                 | M.S             |
| Emission due to  | C.B.M                   | Stack ID at sampling point (M)           | 1.15            |
| Fuel Used  | 60 m <sup>3</sup> /Hr.  | At Bottom (M)                            | -               |
| Rated Fuel Consumption   | -                       | At Top (M)                               | -               |
| Working Fuel Consumption   | -                       | <b>Height Details :</b>                  |                 |
| Calorific Value(Kcal/kg)   | -                       | a) Total Ht. Of stack from GL(M)         | 35.80           |
| Sulphur Content (% by Wt)  | -                       | b) Total Ht. Of stack from RL(M)         | -               |
| Ash Content (% by Wt)  | -                       | c) Ht. of sampling port from GL(M)       | 21.20           |
|  |                         | d) Ht. of port from disturbance zone (M) | -               |
| <b>Pollution Control Device</b>                                  | <b>Nil</b>              |  |                 |
| Whether Stack is provided with permanent Platform / Ladder : Yes |                         |  |                 |

### B.] PHYSICAL DATA:

|  |          |                                    |   |
|--|----------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 52       | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure.(mm Hg)                | 753      | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 5.91     | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 19827.84 | <b>Load :</b>                      |   |
| Pressure                                   | -        | a) Rated                           | - |
|  |          | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 48.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Sulphur di-oxide (mg/ Nm <sup>3</sup> )  | 60.54           | IS 11255 (Part -2): 1985 (RA 2019) |
| 04.     | Oxides of Nitrogen (as NOx) -(mg/m <sup>3</sup> )                                  | 48.54           | IS 11255 (Part -7): 2005 (RA 2017) |
| 05.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |
| 06.     | Carbon di oxide (as CO <sub>2</sub> )-% (V/V)                                      | 3.4             | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gola  
(Quality Manager)  
Signatory Authority

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
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  - Location of Testing: Haldia Laboratory

End of Report

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-101/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | RH-24 (II) JAW CRUSHER MACHINE DUST COLLECTOR              |                        |
| #Stack No.                                     | 46   |                        |
| Sample Condition                               | In Glass Microfiber Thimble                                |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |          |
|--|--|----------|
| Particulars of the Plant                                   | Shape of Stack                           | Circular |
| Stack attached to  | Material of Construction                 | M.S      |
| RH-24 (II) JAW CRUSHER MACHINE DUST COLLECTOR              | Stack ID at sampling point (M)           | 0.48     |
| Emission due to Fuel Used                                  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | At Top (M)                               | -        |
| Working Fuel Consumption                                   | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | a) Total Ht. Of stack from GL(M)         | 22.0     |
| Sulphur Content (% by Wt)                                  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | c) Ht. of sampling port from GL(M)       | 10.0     |
| Pollution Control Device                                   | d) Ht. of port from disturbance zone (M) | -        |
| Bag Filter   |  |          |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                      |          |

### B.] PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 31      | Steam Generation Capacity : |   |
| Barometric Pressure,(mm Hg)                | 753     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 7.67    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 4851.49 | Load                        |   |
| Pressure                                   |         | a) Rated                    | - |
|  |         | b) Running                  | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 30.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevpur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

Plot No. 1, Sector 1, Block D, Mid. H.A. K. 700116, H.A. K.





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-116/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-116           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date : 10.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 02:35 PM            |
| #Work Order No.-                               | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | RIED HAMMER-16 JAW CRUSHER DUST COLLECTOR                  |                                     |
| #Stack No.                                     | 47   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |  |          |
|--|--|----------|
| Particulars of the Plant                                   | Shape of Stack                           | Circular |
| Stack attached to  | Material of Construction                 | M.S      |
| Emission due to  | Stack ID at sampling point (M)           | 0.8      |
| Fuel Used  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | At Top (M)                               | -        |
| Working Fuel Consumption                                   | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | a) Total Ht. Of stack from GL(M)         | 12.0     |
| Sulphur Content (% by Wt)                                  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | c) Ht. of sampling port from GL(M)       | 6.4      |
| Pollution Control Device                                   | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                      |          |

### B.] PHYSICAL DATA:

|                               |          |                             |
|-------------------------------|----------|-----------------------------|
| Flue Gas Temperature (°C)     | 32       | Steam Generation Capacity : |
| Barometric Pressure.(mm Hg)   | 751      | a) Rated                    |
| Velocity of Gas flow (m/s)    | 7.53     | b) Running                  |
| Quantity of Gas flow (Nm³/hr) | 13164.56 | Load                        |
| Pressure                      | -        | a) Rated                    |
|                               |          | b) Running                  |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters  | Result Obtained | Test Method                        |
|---------|---|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm³)                               | 26.0            | IS 11255 (Part -1); 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO₂ (V/V) - (mg/Nm³) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)                        | <0.2            | IS 13270:1992 (RA 2019)            |

For: INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Goliui  
(Quality Manager)

Signatory Authority  
Parbati Goliui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
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  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                                     |
|--|--|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-122/2023                            | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No : 2023/A-122           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal, | Sampling Date : 09.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time : 12:30 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date : 14.02.2023    |
| #Sample Description                            | STACK AIR  | Analysis complete Date : 15.02.2023 |
| #Location                                      | R.H.-24 (I) STOCK CLEANING DUST COLLECTOR                  |                                     |
| #Stack No.                                     | 48   |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                                |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                                     |

### A. # GENERAL INFORMATION ABOUT STACK:

|  |   |  |          |
|--|---|--|----------|
| Particulars of the Plant                                   |   |  |          |
| Stack attached to  | R.H.-24 (I) STOCK CLEANING DUST COLLECTOR | Shape of Stack                           | Circular |
| Emission due to  | Process Activity                          | Material of Construction                 | M.S      |
| Fuel Used  | Electricity                               | Stack ID at sampling point (M)           | 0.30     |
| Rated Fuel Consumption                                     | -   | At Bottom (M)                            | -        |
| Working Fuel Consumption                                   | -   | At Top (M)                               | -        |
| Calorific Value(Kcal/kg)                                   | -   | Height Details :                         |          |
| Sulphur Content (% by Wt)                                  | -   | a) Total Ht. Of stack from GL(M)         | 10.67    |
| Ash Content (% by Wt.)                                     | -   | b) Total Ht. Of stack from RL(M)         | -        |
| Pollution Control Device                                   | Bag Filter With Cyclone Separator         | c) Ht. of sampling port from GL(M)       | 4.57     |
| Whether Stack is provided with permanent Platform / Ladder | Yes                                       | d) Ht. of port from disturbance zone (M) | -        |

### B. # PHYSICAL DATA:

|  |         |                             |   |
|--|---------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 32      | Steam Generation Capacity : |   |
| Barometric Pressure, (mm Hg)               | 751     | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 10.74   | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 2652.33 | Load :                      |   |
| Pressure                                   | -       | a) Rated                    | - |
|  |         | b) Running                  | - |

### C. # RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 38.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Ghosh  
(Quality Manager)  
Signatory Authority

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

Quality Manager  
INDICATIVE CONSULTANT INDIA

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Thimble) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-100/2023                           | Format No: ICI/FM/H/58              |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                  | Sample ID No : 2023/A-100           |
| Address  | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal. | Sampling Date : 14.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  | Sampling Time : 04:40 PM            |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                            | Analysis Start Date : 20.02.2023    |
| #Sample Description                            | STACK AIR   | Analysis complete Date : 21.02.2023 |
| #Location                                      | CORE SAMPLING DUST COLLECTOR                              |                                     |
| #Stack No.                                     | 49  |                                     |
| Sample Condition                               | In Glass Microfiber Thimble                               |                                     |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                      |                                     |

### A.] # GENERAL INFORMATION ABOUT STACK:

|  |                                   |  |          |
|--|-----------------------------------|--|----------|
| <b>Particulars of the Plant</b>                            |                                   | Shape of Stack                           | Circular |
| Stack attached to  | CORE SAMPLING DUST COLLECTOR      | Material of Construction                 | M.S      |
| Emission due to  | Process Activity                  | Stack ID at sampling point (M)           | 0.25     |
| Fuel Used  | Electricity                       | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                                 | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                                 | <b>Height Details :</b>                  |          |
| Calorific Value(Kcal/kg)                                   | -                                 | a) Total Ht. Of stack from GL(M)         | 6.0      |
| Sulphur Content (% by Wt)                                  | -                                 | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                                 | c) Ht. of sampling port from GL(M)       | 4.5      |
| Pollution Control Device                                   | Bag Filter with Cyclone Separator | d) Ht. of port from disturbance zone (M) | -        |
| Whether Stack is provided with permanent Platform / Ladder | Yes                               |  |          |

### B.] PHYSICAL DATA:

|  |         |                                    |   |
|--|---------|------------------------------------|---|
| Flue Gas Temperature (°C)                  | 30      | <b>Steam Generation Capacity :</b> |   |
| Barometric Pressure.(mm Hg)                | 753     | a) Rated                           | - |
| Velocity of Gas flow (m/s)                 | 7.66    | b) Running                         | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 1319.95 | <b>Load</b>                        |   |
| Pressure                                   | -       | a) Rated                           | - |
|  |         | b) Running                         | - |

### C.] RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 34.0            | IS 11255 (Part -I): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gola  
(Quality Manager)  
Signatory Authority  
Parbati Gola  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
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  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1

**CENTRAL LABORATORY :** HPL Link Road, Basudevpur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

**KOLKATA LABORATORY :**

B-1/100/1/2, Santoshpur(M), Block-B, Mahasabha, Kolkata-700040, Mob : 7707045010, 7707045011





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |  |                        |
|--|--|------------------------|
| Date: 22.02.2023                               | Report No: ICI/HL/A/TC-106/2023                            | Format No: ICI/FM/H/58 |
| Customer Name                                  | M/s. GRAPHITE INDIA LTD.                                   | Sample ID No           |
| Address  | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal. | Sampling Date          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                   | Sampling Time          |
| #Work Order No.                                | DOM/4500287592 Dtd. 05.01.2023                             | Analysis Start Date    |
| #Sample Description                            | STACK AIR  | Analysis complete Date |
| #Location                                      | CBS DUST COLLECTOR   |                        |
| #Stack No.                                     | 50   |                        |
| Sample Condition                               | In Glass Microfiber Thimble & Plastic Bottle               |                        |
| Sampling Method                                | CPCB, Emission Regulation (Part III)                       |                        |

### A.) # GENERAL INFORMATION ABOUT STACK:

|  |                    |  |          |
|--|--------------------|--|----------|
| Particulars of the Plant                                   | CBS DUST COLLECTOR | Shape of Stack                           | Circular |
| Stack attached to  | Process Activity   | Material of Construction                 | M.S      |
| Emission due to  | Electricity        | Stack ID at sampling point (M)           | 0.6      |
| Fuel Used  | -                  | At Bottom (M)                            | -        |
| Rated Fuel Consumption                                     | -                  | At Top (M)                               | -        |
| Working Fuel Consumption                                   | -                  | Height Details :                         |          |
| Calorific Value(Kcal/kg)                                   | -                  | a) Total Ht. Of stack from GL(M)         | 12.0     |
| Sulphur Content (% by Wt)                                  | -                  | b) Total Ht. Of stack from RL(M)         | -        |
| Ash Content (% by Wt.)                                     | -                  | c) Ht. of sampling port from GL(M)       | 5.0      |
|  |                    | d) Ht. of port from disturbance zone (M) | -        |
| Pollution Control Device                                   | Bag Filter         |  |          |
| Whether Stack is provided with permanent Platform / Ladder | Yes                |  |          |

### B.) PHYSICAL DATA:

|  |          |                             |   |
|--|----------|-----------------------------|---|
| Flue Gas Temperature (°C)                  | 30       | Steam Generation Capacity : |   |
| Barometric Pressure.(mm Hg)                | 753      | a) Rated                    | - |
| Velocity of Gas flow (m/s)                 | 15.53    | b) Running                  | - |
| Quantity of Gas flow (Nm <sup>3</sup> /hr) | 15405.88 | a) Rated                    | - |
| Pressure                                   | -        | b) Running                  | - |

### C.) RESULT OF SAMPLING:

| Sl. No. | Parameters   | Result Obtained | Test Method                        |
|---------|--|-----------------|------------------------------------|
| 01.     | Particulate Matter (mg/Nm <sup>3</sup> )   | 51.0            | IS 11255 (Part -1): 1985 (RA 2019) |
| 02.     | Particulate Matter Normalised to 12% CO <sub>2</sub> (V/V) - (mg/Nm <sup>3</sup> ) | -               |                                    |
| 03.     | Carbon mono oxide (as CO)- % (V/V)   | <0.2            | IS 13270:1992 (RA 2019)            |

For, INDICATIVE CONSULTANT INDIA

Prepared By: W. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)

Signatory Authority

Parbati Golui  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: N.A.
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  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# STATEMENT OF STACK EMISSION DETAILS FOR THE YEAR FEBRUARY-2023

M/s. Graphite India Ltd.

Date of Sampling : 01.02.2023 to 04.02.23, 06.02.23, 09.02.23 to 11.02.23 & 13.02.23 to 14.02.23.

| Sl. No. | Stack Attached to  | Stack No. | Fuel (Type & Quantity) | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C                     | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> mg/NM <sup>3</sup> | Nox mg/NM <sup>3</sup> | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|---------|--|-----------|------------------------|----------------|-------------------------|--------------------------------------|----------------------------------|-------------------------|-----------------------|------------------------------------|------------------------|---------------------|----------------|-------------------------|---|
| 1       | Mixture Fume Extractor (North) (Extrusion #1 Dept)           | 1         | Electricity            | 720            | 30000                   | 26000                                | 30                               | 18970.49                | 24.0                  | -                                  | -                      | -                   | 13.23          | N.A.                    | Nil   |
| 2       | Mixture Fume Extractor (South) (Extrusion #1 Dept)           | 2         | Electricity            | 406x406        | 30000                   | 16000                                | 27                               | 9153.30                 | 23.0                  | -                                  | -                      | -                   | 15.61          | N.A.                    | Nil   |
| 3       | Cooler North (Extrusion #1 Dept)                             | 3         | Electricity            | 550            | 30000                   | 15000                                | 29                               | 16019.13                | 20.00                 | -                                  | -                      | -                   | 19.08          | N.A.                    | Nil   |
| 4       | Cooler South (Extrusion #1 Dept)                             | 4         | Electricity            |                |                         |                                      | Production Unit Not In Operation |                         |                       |                                    |                        |                     |                | N.A.                    | Nil   |
| 5       | Fume Extractor (West side) weigh floor (Extrusion #1 Dept)   | 5         | Electricity            | 780            | 30000                   | 26000                                | 27                               | 26719.85                | 27.0                  | -                                  | -                      | -                   | 15.72          | N.A.                    | Nil   |
| 6       | Raymond Mill Dust Collector (Extrusion #1 Dept)              | 6         | Electricity            | 300x300        | 7000                    | 1600                                 | 29                               | 4157.08                 | 35.0                  | -                                  | -                      | -                   | 13.08          | N.A.                    | Bag Filter  |
| 7       | Scrap System Dust Collector (Extrusion #1 Dept)              | 7         | Electricity            | 600            | 7100                    | 5600                                 | 30                               | 10270.29                | 43.0                  | -                                  | -                      | -                   | 10.32          | N.A.                    | Bag Filter  |
| 8       | Main Dust Collector (Extrusion #1 Dept)                      | 8         | Electricity            | 700            | 22000                   | 15000                                | 29                               | 10437.43                | 61.0                  | -                                  | -                      | -                   | 7.68           | N.A.                    | Bag Filter  |
| 9       | Baking Milling Dust Collector                                | 9         | Electricity            | 760            | 10000                   | 4660                                 | 31                               | 19381.17                | 55.0                  | -                                  | -                      | -                   | 12.19          | N.A.                    | Bag Filter  |
| 10      | Baking Furnace (Fee. 1 to 5 side)                            | 10        | CBM                    | 1560           | 30000                   | 9650                                 | 174                              | 63853.08                | 63.0                  | 70.63                              | 70.15                  | 3.2                 | 14.27          | N.A.                    | Incinerator   |
| 11      | Baking Furnace (Fee. 6 to 10 side)                           | 11        | CBM                    | 1560           | 30000                   | 9650                                 | 162                              | 58839.71                | 66.0                  | 50.44                              | 77.8                   | 3.6                 | 12.80          | N.A.                    | Incinerator   |
| 12      | Ried Hammer Furnace (Baking Furnace) (14 SECTION)            | 12        | CBM                    | 800            | 30000                   | 10500                                | 84                               | 12255.64                | 59.0                  | 60.54                              | 63.27                  | 3.2                 | 8.28           | N.A.                    | E.S.P   |
| 13      | Ried Hammer Furnace (Baking Furnace) (RH16 & RH24-I SECTION) | 13        | CBM                    | 1800           | 45000                   | 33000                                | 76                               | 109442.01               | 61.0                  | 70.63                              | 59.80                  | 3.4                 | 14.27          | N.A.                    | E.S.P   |
| 14      | P.I. UNIT- 2 (THERMOPACK STACK)                              | 16        | CBM                    | 400            | 30000                   | 28000                                | 99                               | 2868.84                 | 61.0                  | 60.54                              | 68.31                  | 3.2                 | 8.12           | N.A.                    | Nil   |
| 15      | P.I. UNIT- 2 (HGG STACK)                                     | 17        | CBM                    | 400            | 30000                   | 28000                                | 65                               | 4390.47                 | 52.0                  | 50.45                              | 73.11                  | 3.4                 | 11.29          | N.A.                    | Water spray Cooling Chamber                         |
| 16      | LWG # 3 (MILLING)  | 18        | Electricity            | 650            | 10670                   | 6700                                 | Production Unit Not In Operation |                         |                       |                                    |                        |                     |                | N.A.                    | Bag Filter  |
| 17      | Finishing Dust Collector (North) (Unit 1)                    | 19        | Electricity            | 700            | 13000                   | 4200                                 | 30                               | 12256.02                | 52.0                  | -                                  | -                      | -                   | 9.06           | N.A.                    | Bag Filter  |

  
**Parbati Golui**  
 Quality Manager  
 INDICATIVE CONSULTANT INDIA

| Sl. No. | Stack Attached to                                     | Stack No. | Fuel (Type & Quantity)           | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> | NO <sub>x</sub> mg/NM <sup>3</sup> | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|---------|---|-----------|----------------------------------|----------------|-------------------------|--------------------------------------|--------------|-------------------------|-----------------------|-----------------|------------------------------------|---------------------|----------------|-------------------------|---|
| 18      | Finishing Dust Collector (Unit 2)                     | 20        | Electricity                      | 900            | 15000                   | 11000                                | 31           | 38852.32                | 64.0                  | -               | -                                  | -                   | 17.43          | N.A.                    | Bag Filter  |
| 19      | FINE SCREENING DUST COLLECTOR                         | 21        | Electricity                      | 560            | 9750                    | 6700                                 | 29           | 6361.52                 | 41.0                  | -               | -                                  | -                   | 7.33           | N.A.                    | Bag Filter  |
| 20      | Boiler (1.5 Ton/ 2Ton) 2 Ton Running                  | 22        | CBM (86 m <sup>3</sup> /Hr.)     | 280            | 29290                   | 13500                                | 116          | 1702.41                 | 75.0                  | 121.07          | 90.79                              | 3.2                 | 10.25          | N.A.                    | Nil   |
| 21      | Tunnel Kiln – 1 (Re-baking Furnace)                   | 23        | CBM (140 Kg./Hr.)                | 730            | 30000                   | 18000                                | 111          | 7754.00                 | 29.0                  | 80.72           | 63.35                              | 3.2                 | 6.78           | N.A.                    | Incinerator   |
| 22      | Finishing Dust Collector (Unit 3)                     | 24        | Electricity                      | 780            | 13000                   | 9000                                 | 30           | 17797.69                | 67.0                  | -               | -                                  | -                   | 10.63          | N.A.                    | Bag Filter  |
| 23      | P.I. Unit – 3 (HGG STACK)                             | 25        | CBM                              | 400            | 30000                   | 28000                                | 65           | 3791.74                 | 68.0                  | 70.63           | 68.43                              | 3.4                 | 9.75           | N.A.                    | Water Spray Cooling Chamber                         |
| 24      | Tunnel Kiln – 2 (Re-baking Furnace)                   | 26        | CBM (140 Kg./Hr.)                | 730            | 30000                   | 18000                                | 116          | 9616.68                 | 25.0                  | 50.45           | 59.80                              | 3.6                 | 8.52           | N.A.                    | Incinerator   |
| 25      | P.I. Unit – 3 (THERMOPACK STACK)                      | 27        | CBM                              | 400            | 30000                   | 28000                                | 84           | 2766.73                 | 70.0                  | 70.63           | 50.15                              | 3.8                 | 7.41           | N.A.                    | Nil   |
| 26      | Extrusion -2 Department Thermic Flueid Heater         | 28        | CBM (138.4 Nm <sup>3</sup> /Hr.) | 580            | 30000                   | 20000                                | 60           | 6391.36                 | 31.0                  | 70.63           | 75.20                              | 3.2                 | 7.68           | N.A.                    | Nil   |
| 27      | Extrusion #2 IRICH Dust Collector                     | 29        | Electricity                      | 300            | 34000                   | 28000                                | 28           | 4137.67                 | 50.0                  | -               | -                                  | -                   | 16.53          | N.A.                    | Bag Filter  |
| 28      | Extrusion #2 Main Dust Collector                      | 30        | Electricity                      | 1000           | 34000                   | 33000                                | 27           | 43665.49                | 71.0                  | -               | -                                  | -                   | 15.66          | N.A.                    | Bag Filter  |
| 29      | Extrusion #2 Raymond Mill Dust Collector              | 31        | Electricity                      | 230            | 12500                   | 10500                                | 31           | 2261.65                 | 76.0                  | -               | -                                  | -                   | 15.56          | N.A.                    | Bag Filter  |
| 30      | Extrusion #2 Silo Dust Collector                      | 32        | Electricity                      | 600            | 15000                   | 7000                                 | 29           | 14301.50                | 61.0                  | -               | -                                  | -                   | 14.34          | N.A.                    | Bag Filter  |
| 31      | Extrusion #2 IRICH (Trema) Scrubber System            | 33        | Electricity                      | 280            | 8000                    | 7000                                 | 30           | 9311.08                 | 41.0                  | -               | -                                  | -                   | 45.20          | N.A.                    | Scrubber System                                     |
| 32      | Acheson Dust Collector                                | 34        | Electricity                      | 800x320        | 18000                   | 10500                                | 30           | 11814.32                | 65.0                  | -               | -                                  | -                   | 13.11          | N.A.                    | Bag Filter  |
| 33      | Extrusion #2 Scrap system Dust collector              | 35        | Electricity                      | 650            | 17000                   | 8900                                 | 26           | 14938.76                | 62.0                  | -               | -                                  | -                   | 12.63          | N.A.                    | Bag Filter  |
| 34      | R.H.-24 (II) Furnace                                  | 36        | CBM (70 m <sup>3</sup> /Hr.)     | 1600           | 45000                   | 33000                                | 79           | 43457.24                | 36.0                  | 60.54           | 53.65                              | 3.6                 | 7.26           | N.A.                    | E.S.P   |
| 35      | Finishing Unit – 3 (South Side) Nipple Dust Collector | 37        | Electricity                      | 700            | 15000                   | 8000                                 | 30           | 18687.81                | 33.0                  | -               | -                                  | -                   | 13.85          | N.A.                    | Bag Filter  |



|    | Stack Attached to                                  | Stack No. | Fuel (Type & Quantity)        | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C | Flow Rate of gas NM <sup>3</sup> /hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> mg/NM <sup>3</sup> | Nox mg/NM <sup>3</sup> | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|----|--|-----------|-------------------------------|----------------|-------------------------|--------------------------------------|--------------|--------------------------------------|-----------------------|------------------------------------|------------------------|---------------------|----------------|-------------------------|---|
| 36 | Finishing Unit – 2 Nipple line Dust Collector      | 38        | Electricity                   | 610            | 11580                   | 9140                                 | 31           | 7822.21                              | 46.00                 | -                                  | -                      | -                   | 7.66           | N.A.                    | Bag Filter  |
| 37 | R.H.-16 Stock Cleaning Machine Dust Collector      | 39        | Electricity                   | 400 × 600      | 10000                   | 7000                                 | 33           | 6411.74                              | 44.00                 | -                                  | -                      | -                   | 7.71           | N.A.                    | Bag Filter  |
| 38 | R.H.-24 (II) Stock Cleaning Machine Dust Collector | 40        | Electricity                   | 650            | 30000                   | 15000                                | 32           | 10367.79                             | 37.0                  | -                                  | -                      | -                   | 8.96           | N.A.                    | Bag Filter  |
| 39 | Turning-I Dust Collector                           | 41        | Electricity                   | 250            | 15000                   | 3000                                 | 31           | 1315.66                              | 51.0                  | -                                  | -                      | -                   | 7.68           | N.A.                    | Bag Filter  |
| 40 | P.L.-2 Turning Machine Dust Collector              | 42        | Electricity                   | 250            | 15000                   | 3000                                 | 31           | 4244.6                               | 64.0                  | -                                  | -                      | -                   | 24.77          | N.A.                    | Bag Filter  |
| 41 | P.L.-3 Turning Machine Dust Collector              | 43        | Electricity                   | 250            | 15000                   | 3000                                 | 33           | 1552.31                              | 41.0                  | -                                  | -                      | -                   | 9.12           | N.A.                    | Bag Filter  |
| 42 | P.L Unit- 4 (THERMOPACK STACK)                     | 44        | CBM (100 m <sup>3</sup> /Hr.) | 950            | 30500                   | 18800                                | 189          | 11773.44                             | 62.0                  | 80.72                              | 52.61                  | 3.0                 | 7.3            | N.A.                    | Nil   |
| 43 | P.L.-4 Pre-Heater                                  | 45        | CBM (60 m <sup>3</sup> /Hr.)  | 1150           | 35800                   | 21200                                | 52           | 19827.84                             | 48.0                  | 60.54                              | 48.54                  | 3.4                 | 5.9            | N.A.                    | Nil   |
| 44 | RH-24 (II) Jaw Crusher Machine Dust Collector      | 46        | Electricity                   | 480            | 22000                   | 10000                                | 31           | 4851.49                              | 30.0                  | -                                  | -                      | -                   | 7.67           | N.A.                    | Bag Filter  |
| 45 | Ried Hammer-16 Jaw Crusher Dust Collector          | 47        | Electricity                   | 800            | 12000                   | 6400                                 | 32           | 13164.56                             | 26.0                  | -                                  | -                      | -                   | 7.53           | N.A.                    | Bag Filter  |
| 46 | R.H.-24 (I) Stock Cleaning Dust Collector          | 48        | Electricity                   | 300            | 10670                   | 4570                                 | 32           | 2652.33                              | 38.0                  | -                                  | -                      | -                   | 10.74          | N.A.                    | Bag Filter With Cyclone Separator                   |
| 47 | Core Sampling Dust Collector                       | 49        | Electricity                   | 250            | 6000                    | 4500                                 | 30           | 1319.95                              | 34.0                  | -                                  | -                      | -                   | 7.66           | N.A.                    | Bag Filter With Cyclone Separator                   |
| 48 | CBS Dust Collector                                 | 50        | Electricity                   | 600            | 12000                   | 5000                                 | 30           | 15405.88                             | 51.0                  | -                                  | -                      | -                   | 15.53          | N.A.                    | Bag Filter  |

  
Checked By: A. Patra

For, Indicative Consultant India

  
Parbati Golui  
(Quality Manager)  
Signatory Authority

INDICATIVE CONSULTANT INDIA

Limit : SPM = 150 mg/Nm<sup>3</sup>, Ref. : Consent of operate under section 25 & 26 of the Water (Prevention and Control of Pollution) Act, 1974 & Sec. 21 of the Air (Prevention and Control of Pollution) Act, 1981, Consent letter No.



# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |   |  |
|--|---|---|--|
| Date: 17.02.2023                               | : | Report No: ICI/HL/A/RN-117/2023   | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-117               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 01.02.2023 to 02.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 08.02.2023         |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  | Analysis complete Date : 11.02.2023      |
| #Sample Description                            | : | AMBIENT AIR   |  |
| #Location                                      | : | EXTRUSION # 2 CAMPUS EAST SIDE BOUNDARY WALL  |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle   |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)  |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 10:00 AM to 06:00 PM | 06:30 PM to 02:30 AM | 03:00 AM to 11:00 AM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 87.09                | 80.45                | 74.93                | 80.82            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 40.10                | 36.07                | 32.58                | 36.25            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 20.69                | 23.80                | 17.59                | 20.69            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 39.26                | 46.56                | 41.08                | 42.30            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2716               | 0.3088               | 0.3407               | 0.3070           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 22.0                 | 17.0                 | 18.0                 | 19.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbati Datta  
(Quality Manager)

Signature of Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing : Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |   |  |
|--|---|---|--|
| Date: 17.02.2023                               | : | Report No: ICI/HL/ARN-118/2023  | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-118               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 01.02.2023 to 02.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 08.02.2023         |
|  |   |   | Analysis complete Date : 11.02.2023      |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |  |
| #Sample Description                            | : | AMBIENT AIR   |  |
| #Location                                      | : | EXTRUSION # 2 CAMPUS NORTH SIDE BOUNDARY WALL   |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle   |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)  |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 10:30 AM to 06:30 PM | 07:00 PM to 03:00 AM | 03:30 AM to 11:30 AM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 91.30                | 82.41                | 75.15                | 82.95            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 38.85                | 33.58                | 30.08                | 34.17            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 18.62                | 21.73                | 15.52                | 18.62            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 41.99                | 44.73                | 37.43                | 41.38            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2779               | 0.2933               | 0.3401               | 0.3038           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 24.0                 | 17.0                 | 18.0                 | 20.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

For, INDICATIVE CONSULTANT INDIA

Prepared By: 

Checked By: A. Patra

Parbati Choudhary  
(Quality Manager)

Signature of Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: NA
  - Test results shown in this test report relate only to the sample (s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  - Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing : Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |  |   |
|--|---|--|---|
| Date: 17.02.2023                               | : | Report No: ICI/HL/A/RN-119/2023  | Format No: ICI/FM/H/61  |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.   | Sample ID No : 2023/AC-119  |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,   | Sampling Date : 02.02.2023 to 03.02.2023                                |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296   | Analysis Start Date : 08.02.2023<br>Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023   |   |
| #Sample Description                            | : | AMBIENT AIR  |   |
| #Location                                      | : | EXTRUSION # 2 CAMPUS SOUTH SIDE BOUNDARY WALL  |   |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle  |   |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)   |   |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November 2009 |   |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 11:30 AM to 07:30 PM | 08:00 PM to 04:00 AM | 04:30 AM to 12:30 PM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 90.46                | 85.17                | 94.66                | 90.10            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 46.37                | 34.83                | 42.71                | 41.30            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 20.69                | 16.55                | 17.59                | 18.28            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 41.08                | 37.43                | 42.91                | 40.47            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.3141               | 0.3469               | 0.3628               | 0.3413           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 24.0                 | 17.0                 | 19.0                 | 20.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November 2009

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)

Signatory Authority  
Parbati Golui

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing : Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |   |  |
|--|---|---|--|
| Date: 17.02.2023                               | : | Report No: ICI/HL/ARN-120/2023  | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-120               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 02.02.2023 to 03.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 08.02.2023         |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  | Analysis complete Date : 11.02.2023      |
| #Sample Description                            | : | AMBIENT AIR   |  |
| #Location                                      | : | EXTRUSION # 2 CAMPUS WEST SIDE BOUNDARY WALL  |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle   |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)  |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME          |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|------------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 12:00 Noon to 08:00 PM | 08:30 PM to 04:30 AM | 05:00 AM to 01:00 PM |                  |   |
|         |  |                     | RESULT                 |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 78.48                  | 75.54                | 86.21                | 80.08            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 32.58                  | 29.85                | 36.34                | 32.92            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 21.73                  | 16.55                | 23.80                | 20.69            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 41.08                  | 37.43                | 43.82                | 40.78            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2652                 | 0.2966               | 0.3471               | 0.3030           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 23.0                   | 16.0                 | 21.0                 | 20.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

For: INDICATIVE CONSULTANT INDIA

Prepared By: K. Mondal

Checked By: A. Patra

Parbati Choudhary  
(Quality Manager)

Parbati Choudhary  
Signatory Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
- Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India.
  - Sample submitted and identified by customer as: NA
  - Test results shown in this test report relate only to the sample(s) only.
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory.
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |  |
|--|---|--|
| Date: 17.02.2023                               | : Report No: ICI/HL/A/RN-121/2023   | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-121               |
| Address  | : Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal,   | Sampling Date : 03.02.2023 to 04.02.2023 |
| #Customer Representative Name & Contact Number | : Mr C. P. Dhanuka<br>Mob. No. 9332039296   | Analysis Start Date : 08.02.2023         |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  | Analysis complete Date : 11.02.2023      |
| #Sample Description                            | : AMBIENT AIR   |  |
| #Location                                      | : EXTRUSION # 2 CAMPUS CENTER LOCATION (NEAR NEW ROAD WEIGH BRIDGE)   |  |
| Sample Condition                               | : In Glass Microfibre Filter Paper & Plastic Bottle, Suction of ambient air direct into analyser through Teflon tube and in Plastic Bottle  |  |
| Sampling Method                                | : CPCB, Emission Regulation (Part III) / Air Sampling & Analysis 3 <sup>rd</sup> Edition, CPCB Guideline (Vol. - 1)                         |  |
| Test Specification                             | : National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method   |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 09:00 AM to 05:00 PM | 05:30 PM to 01:30 AM | 02:00 AM to 10:00 AM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 92.17                | 82.79                | 76.18                | 83.71            | IS 5182 (Part – 23):2006 (RA 2017)  |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 39.80                | 33.83                | 30.08                | 34.57            | IS 5182 (Part – 24):2019  |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 22.76                | 15.52                | 18.62                | 18.97            | IS 5182 (Part – 2):2001 (RA 2017)   |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 44.73                | 41.99                | 37.43                | 41.38            | IS 5182 (Part – 6):2006 (RA 2017)   |
| 5.      | Lead (Pb)  | µg / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Guidelines for Measurement of ambient air pollutant (Vol.1) NAAQMS/36/2012-13 Atomic AAS Method |
| 6.      | Benzene (C <sub>6</sub> H <sub>6</sub> )           | µg / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | IS 5182 (Part – 11):2006 (RA 2017)  |
| 7.      | Ammonia (NH <sub>3</sub> )                         | µg / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Method of Air Sampling & Analysis 3 <sup>rd</sup> Edition, 1988 Method No. 408                  |
| 8.      | Ozone (O <sub>3</sub> )                            | µg / m <sup>3</sup> | 38.1                 | -                    | -                    | 38.1             | Guidelines for Measurement of ambient air pollutant (Vol.1) NAAQMS/36/2012-13 (Chemical Method) |
| 9.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2791               | 0.3228               | 0.3605               | 0.3208           | Non-Dispersive Infrared Spectrometry Method   |
| 10.     | Benzo(a)Pyrene (BaP)                               | ng / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | IS 5182 (Part – 12):2004 (RA 2019)  |
| 11.     | Arsenic (As)                                       | ng / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Atomic Absorption Spectrophotometric Method   |
| 12.     | Nickel (Ni)  | ng / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Atomic Absorption Spectrophotometric Method   |
| 13.     | Ambient Temperature (Average)                      | °C                  | 26.0                 | 20.0                 | 18.0                 | 21.0             | Hygrometer  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub>= 100 µg/m<sup>3</sup>, PM<sub>2.5</sub>=60 µg/m<sup>3</sup>, SO<sub>2</sub>=80 µg/m<sup>3</sup>, NO<sub>2</sub>=80 µg/m<sup>3</sup>, Lead=1.0 µg/m<sup>3</sup>, Ammonia=400 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide=2 mg/m<sup>3</sup>, O<sub>3</sub>=100µg/m<sup>3</sup>, 8hours basis, Benzene=5 µg/m<sup>3</sup>, Benzopyrene=1 ng/m<sup>3</sup>, Arsenic =6 ng/m<sup>3</sup>, Nickel=20ng/m<sup>3</sup>, Annual basis. For, Industrial, Residential, Rural & Other Area and Ecologically Sensitive Area

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Partha Ghosh  
(Quality Manager)  
Signature Authority

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing : Haldia Laboratory

End of Report

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

R1-1/22/1-2, Santoshpur(M), Block B, Maheshtala, Kolkata-700140, Mob. : 7707015010, 7707015011





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |  |  |
|--|---|--|--|
| Date: 17.02.2023                               | : | Report No: ICI/HL/A/RN-122/2023  | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.   | Sample ID No : 2023/AC-122               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,   | Sampling Date : 03.02.2023 to 04.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296   | Analysis Start Date : 08.02.2023         |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023   | Analysis complete Date : 11.02.2023      |
| #Sample Description                            | : | AMBIENT AIR  |  |
| #Location                                      | : | GRAPHITE OLD PLANT WEST SIDE BOUNDARY WALL (NEAR PERSONNEL OFFICE)   |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle  |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)   |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November'2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME       |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|---------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 09:30AM to 05:30 PM | 06:00 PM to 02:00 AM | 02:30 AM to 10:30 AM |                  |   |
|         |  |                     | RESULT              |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 85.15               | 77.69                | 73.46                | 78.77            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 37.59               | 33.58                | 31.41                | 34.19            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 20.69               | 22.76                | 18.62                | 20.69            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 41.99               | 46.56                | 39.26                | 42.60            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2766              | 0.3148               | 0.3691               | 0.3202           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 25.0                | 17.0                 | 17.0                 | 20.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November'2009

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Ghai  
(Quality Manager)  
Signatory Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing : Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |   |   |
|--|---|---|---|
| Date: 17.02.2023                               | : | Report No: ICI/HL/A/RN-123/2023   | Format No: ICI/FM/H/61  |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-123  |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 06.02.2023 to 07.02.2023                                |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 13.02.2023<br>Analysis complete Date : 16.02.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |   |
| #Sample Description                            | : | AMBIENT AIR   |   |
| #Location                                      | : | GRAPHITE OLD PLANT NORTH SIDE BOUNDARY WALL (NEAR SECURITY BARRACK)   |   |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle   |   |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)  |   |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |   |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 09:00 AM to 05:00 PM | 05:30 PM to 01:30 AM | 02:00 AM to 10:00 AM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
|         |  |                     |                      |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 89.18                | 81.50                | 76.05                | 82.24            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 48.51                | 38.85                | 32.58                | 39.98            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 21.73                | 18.62                | 15.52                | 18.62            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 45.65                | 41.99                | 35.60                | 41.08            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monooxide (CO)                              | mg / m <sup>3</sup> | 0.2658               | 0.3012               | 0.3514               | 0.3061           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 25.0                 | 19.0                 | 17.0                 | 20.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |  |  |
|--|---|--|--|
| Date: 17.02.2023                               | : | Report No: ICI/HL/AR-N-124/2023  | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.   | Sample ID No : 2023/AC-124               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.   | Sampling Date : 06.02.2023 to 07.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296   | Analysis Start Date : 13.02.2023         |
|  |   |  | Analysis complete Date : 16.02.2023      |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023   |  |
| #Sample Description                            | : | AMBIENT AIR  |  |
| #Location                                      | : | GRAPHITE OLD PLANT EAST SIDE BOUNDARY WALL (AT THE EAST SIDE OF LWG 4&5)   |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle  |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)   |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November 2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 09:30 AM to 05:30 PM | 06:00 PM to 02:00 AM | 02:30 AM to 10:30 AM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
|         |  |                     |                      |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 90.55                | 83.33                | 78.30                | 84.06            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 41.20                | 36.11                | 32.66                | 36.66            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 21.73                | 23.80                | 18.62                | 21.38            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 48.38                | 43.82                | 40.17                | 44.12            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2769               | 0.3248               | 0.3671               | 0.3229           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 26.0                 | 21.0                 | 18.0                 | 22.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>x</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November 2009

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbati Golui

(Quality Manager)

Signatory Authority

Parbati Golui

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: NA
  - 4 Test results shown in this test report relate only to the sample(s) only.
  - 5 The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - 6 The reproduction of the report except in full is invalid without written approval of the laboratory.
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  - 8 Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing : Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |   |  |
|--|---|---|--|
| Date: 17.02.2023                               | : | Report No: ICI/HIL/ARN-125/2023   | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-125               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.  | Sampling Date : 07.02.2023 to 08.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 13.02.2023         |
|  |   |   | Analysis complete Date : 16.02.2023      |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |  |
| #Sample Description                            | : | AMBIENT AIR   |  |
| #Location                                      | : | GRAPHITE OLD PLANT SOUTH SIDE BOUNDARY WALL (NEAR SOUTH SIDE OF TUNNEL KILN)  |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle   |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)  |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 10:30 AM to 06:30 PM | 07:00 PM to 03:00 AM | 03:30 AM to 11:30 AM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 86.40                | 91.67                | 82.07                | 86.71            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 38.56                | 42.61                | 33.83                | 38.33            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 17.59                | 22.76                | 18.62                | 19.66            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 41.99                | 45.65                | 35.60                | 41.08            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.2878               | 0.3306               | 0.3751               | 0.3312           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 26.0                 | 18.0                 | 19.0                 | 21.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbati Golui  
(Quality Manager)

Signatory Authority

Parbati Golui

Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
- 1 # Information provided by customer
  - 2 Sample is drawn by M/s. Indicative Consultant India.
  - 3 Sample submitted and identified by customer as: NA
  - 4 Test results shown in this test report relate only to the sample (s) only.
  - 5 The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - 6 The reproduction of the report except in full is invalid without written approval of the laboratory.
  - 7 Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - 8 Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  - 9 Location of Testing : Haldia Laboratory

-----End of Report-----

Page 1 of 1





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |  |  |
|--|--|--|
| Date: 17.02.2023                               | : Report No: ICI/HL/A/RN-126/2023  | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.   | Sample ID No : 2023/AC-126               |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.   | Sampling Date : 07.02.2023 to 08.02.2023 |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No. 9332039296   | Analysis Start Date : 13.02.2023         |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023   | Analysis complete Date : 16.02.2023      |
| #Sample Description                            | : AMBIENT AIR  |  |
| #Location                                      | : GRAPHITE OLD PLANT, CENTER LOCATION (WEST SIDE OF SHIPPING UNIT# 2)  |  |
| Sample Condition                               | : In Glass Microfibre Filter Paper & Plastic Bottle, Suction of ambient air direct into analyser through Teflon tube and in Plastic Bottle |  |
| Sampling Method                                | : CPCB, Emission Regulation (Part III) / Air Sampling & Analysis 3 <sup>rd</sup> Edition, CPCB Guideline (Vol. - 1)                        |  |
| Test Specification                             | : National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November'2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method   |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 02:00 PM to 10:00 PM | 10:30 PM to 06:30 AM | 07:00 AM to 03:00 PM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 94.20                | 98.47                | 83.15                | 91.94            | IS 5182 (Part – 23):2006 (RA 2017)  |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 44.78                | 48.87                | 35.09                | 42.91            | IS 5182 (Part – 24):2019  |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 18.62                | 22.76                | 15.52                | 18.97            | IS 5182 (Part – 2):2001 (RA 2017)   |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 41.99                | 46.56                | 37.43                | 41.99            | IS 5182 (Part – 6):2006 (RA 2017)   |
| 5.      | Lead (Pb)  | µg / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Guidelines for Measurement of ambient air pollutant (Vol.1) NAAQMS/36/2012-13 Atomic AAS Method |
| 6.      | Benzene (C <sub>6</sub> H <sub>6</sub> )           | µg / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | IS 5182 (Part – 11):2006 (RA 2017)  |
| 7.      | Ammonia (NH <sub>3</sub> )                         | µg / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Method of Air Sampling & Analysis 3 <sup>rd</sup> Edition, 1988 Method No. 408                  |
| 8.      | Ozone (O <sub>3</sub> )                            | µg / m <sup>3</sup> | 40.1                 | -                    | -                    | 40.1             | Guidelines for Measurement of ambient air pollutant (Vol.1) NAAQMS/36/2012-13 (Chemical Method) |
| 9.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.3017               | 0.3409               | 0.3972               | 0.3466           | Non-Dispersive Infrared Spectrometry Method   |
| 10.     | Benzo(a)Pyrene (BaP)                               | ng / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | IS 5182 (Part – 12):2004 (RA 2019)  |
| 11.     | Arsenic (As)                                       | ng / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Atomic Absorption Spectrophotometric Method   |
| 12.     | Nickel (Ni)  | ng / m <sup>3</sup> | BDL                  | BDL                  | BDL                  | BDL              | Atomic Absorption Spectrophotometric Method   |
| 13.     | Ambient Temperature (Average)                      | °C                  | 26.0                 | 16.0                 | 20.0                 | 21.0             | Hygrometer  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub>= 100 µg/m<sup>3</sup>, PM<sub>2.5</sub>=60 µg/m<sup>3</sup>, SO<sub>2</sub>=80 µg/m<sup>3</sup>, NO<sub>x</sub>=80 µg/m<sup>3</sup>, Lead=1.0 µg/m<sup>3</sup>, Ammonia=400 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide=2 mg/m<sup>3</sup>, O<sub>3</sub>=100µg/m<sup>3</sup>, 8hours basis, Benzene=5 µg/m<sup>3</sup>, Benzopyrene=1 ng/m<sup>3</sup>, Arsenic =6 ng/m<sup>3</sup>, Nickel=20ng/m<sup>3</sup>, Annual basis. For, Industrial, Residential, Rural & Other Area and Ecologically Sensitive Area

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November'2009

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbat Choudhary  
(Quality Manager)

Signature Authority

Parbat Choudhary  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

End of Report

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

B1-1/22/1-2, Santoshpur(M), Block B, Mahabhatla, Kolkata-700148, W.B.





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |   |   |  |
|--|---|---|--|
| Date: 17.02.2023                               | : | Report No: ICI/HL/A/RN-127/2023   | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-127               |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 08.02.2023 to 09.02.2023 |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 13.02.2023         |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  | Analysis complete Date : 16.02.2023      |
| #Sample Description                            | : | AMBIENT AIR   |  |
| #Location                                      | : | NEAR BAKING FURNACE RH 16 SECTION (NORTH SIDE OF BOUNDARY WALL)   |  |
| Sample Condition                               | : | In Glass Microfibre Filter Paper & Plastic Bottle   |  |
| Sampling Method                                | : | CPCB, Emission Regulation (Part III)  |  |
| Test Specification                             | : | National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 12:00 PM to 08:00 PM | 08:30 PM to 04:30 AM | 05:00 AM to 01:00 PM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 89.36                | 75.25                | 82.43                | 82.35            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 47.26                | 35.09                | 42.61                | 41.65            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 23.80                | 17.59                | 19.66                | 20.35            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 44.73                | 36.52                | 41.08                | 40.78            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.3355               | 0.3721               | 0.2892               | 0.3323           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 25.0                 | 17.0                 | 22.0                 | 21.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

For, INDICATIVE CONSULTANT INDIA

Prepared By:

Checked By:

(Quality Manager)  
Signatory Authority  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
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  8. Retention period of tested samples (Filter Paper) is 180 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing : Haldia Laboratory

-----End of Report-----

Page 1 of 1

CENTRAL LABORATORY : HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973

KOLKATA LABORATORY :

B11/22/1/2, Santoshpur(MB), Block-B, Midnapore, Koll. - 722142, M. - 9830211111

Towards Sustainable Growth





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |  |
|--|---|--|
| Date: 17.02.2023                               | : Report No: ICI/HL/A/RN-128/2023   | Format No: ICI/FM/H/61                   |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/AC-128               |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 08.02.2023 to 09.02.2023 |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No. 9332039296  | Analysis Start Date : 13.02.2023         |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  | Analysis complete Date : 16.02.2023      |
| #Sample Description                            | : AMBIENT AIR   |  |
| #Location                                      | : NEAR RH- 24 (II) (SOUTH SIDE OF BOUNDARY WALL)  |  |
| Sample Condition                               | : In Glass Microfibre Filter Paper & Plastic Bottle   |  |
| Sampling Method                                | : CPCB, Emission Regulation (Part III)  |  |
| Test Specification                             | : National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18 <sup>th</sup> November '2009 |  |

| Sl. No. | Parameters   | Unit                | SAMPLING TIME        |                      |                      | 24 Hours Average | Test Method                                 |
|---------|--|---------------------|----------------------|----------------------|----------------------|------------------|---|
|         |  |                     | 12:30 PM to 08:30 PM | 09:00 PM to 05:00 AM | 05:30 AM to 01:30 PM |                  |   |
|         |  |                     | RESULT               |                      |                      |                  |   |
| 1.      | Respirable Particulate Matter (PM <sub>10</sub> )  | µg / m <sup>3</sup> | 81.20                | 72.56                | 79.35                | 77.70            | IS 5182 (Part – 23):2006 (RA 2017)          |
| 2.      | Respirable Particulate Matter (PM <sub>2.5</sub> ) | µg / m <sup>3</sup> | 39.80                | 33.83                | 36.34                | 36.66            | IS 5182 (Part – 24):2019                    |
| 3.      | Sulphur Dioxide (SO <sub>2</sub> )                 | µg / m <sup>3</sup> | 21.73                | 16.55                | 19.66                | 19.31            | IS 5182 (Part – 2):2001 (RA 2017)           |
| 4.      | Oxides of Nitrogen (NO <sub>2</sub> )              | µg / m <sup>3</sup> | 44.73                | 35.60                | 40.17                | 40.17            | IS 5182 (Part – 6):2006 (RA 2017)           |
| 5.      | Carbon Monoxide (CO)                               | mg / m <sup>3</sup> | 0.3078               | 0.3591               | 0.2844               | 0.3171           | Non-Dispersive Infrared Spectrometry Method |
| 6.      | Ambient Temperature (Average)                      | °C                  | 25.0                 | 16.0                 | 22.0                 | 21.0             | Hygrometer                                  |

Limit: (µg / m<sup>3</sup>) Ambient Air Quality standard (National)

PM<sub>10</sub> = 100 µg/m<sup>3</sup>, PM<sub>2.5</sub> = 60 µg/m<sup>3</sup>, SO<sub>2</sub> = 80 µg/m<sup>3</sup>, NO<sub>2</sub> = 80 µg/m<sup>3</sup>, 24 hours basis, Carbon mono oxide = 2 mg/m<sup>3</sup> 8 hours basis. (Industrial, Residential, Rural, Ecologically Sensitive Area & Other Area)

Ref: National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18<sup>th</sup> November '2009

Prepared By: A. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India.
  3. Sample submitted and identified by customer as: NA
  4. Test results shown in this test report relate only to the sample (s) only.
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  9. Location of Testing - Haldia Laboratory

-----End of Report-----

Page 1 of 1

## Pollution Ambient Air Average concentration for Quarter 1 YEAR 2023 around the plant surroundings

Ref : National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18th November'2009

Sampling Period: 01.02.2023 to 09.02.2023

All figures are in micro gms / N cub. Mt

|                      |                          |                        | Parameters in $\mu\text{g} / \text{m}^3$ |       |                 |                 | Parameters in $\text{mg} / \text{m}^3$ | Parameters in $\mu\text{g} / \text{m}^3$ |         |                 |       | Parameters in $\text{ng} / \text{m}^3$ |    |    | Location            | Direction wrt Plant Land | Close to      |
|----------------------|--------------------------|------------------------|--|-------|-----------------|-----------------|--|--|---------|-----------------|-------|--|----|----|---------------------|--------------------------|---------------|
| Max limit            |                          |                        | 60                                       | 100   | 80              | 80              | 2                                      | 1  | 5       | 400             | 100   | 1                                      | 6  | 20 |                     |                          |               |
| LOCATION             | Sampling Date            | Sampling Time          | PM2.5                                    | PM10  | SO <sub>2</sub> | NO <sub>2</sub> | CO                                     | Pb                                       | Benzene | NH <sub>3</sub> | Ozone | Benzo(a) Pyrene                        | As | Ni |                     |                          |               |
| New Extrusion Campus |                          |                        |  |       |                 |                 |  |  |         |                 |       |  |    |    |                     |                          |               |
| A                    | 01.02.2023               | 10:00 AM to 06:00 PM   | 40.10                                    | 87.09 | 20.69           | 39.26           | 0.2716                                 | -  | -       | -               | -     | -                                      | -  | -  | Extrusion #2 Campus | East Side                | Boundary wall |
|                      | 01.02.2023 to 02.02.2023 | 06:30 PM to 02:30 AM   | 36.07                                    | 80.45 | 23.80           | 46.56           | 0.3088                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | 02.02.2023               | 03:00 AM to 11:00 AM   | 32.58                                    | 74.93 | 17.59           | 41.08           | 0.3407                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | Average                  |                        | 36.25                                    | 80.82 | 20.69           | 42.30           | 0.3070                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
| B                    | 01.02.2023               | 10:30 AM to 06:30 PM   | 38.85                                    | 91.30 | 18.62           | 41.99           | 0.2779                                 | -  | -       | -               | -     | -                                      | -  | -  | Extrusion #2 Campus | North Side               | Boundary wall |
|                      | 01.02.2023 to 02.02.2023 | 07:00 PM to 03:00 AM   | 33.58                                    | 82.41 | 21.73           | 44.73           | 0.2933                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | 02.02.2023               | 03:30 AM to 11:30 AM   | 30.08                                    | 75.15 | 15.52           | 37.43           | 0.3401                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | Average                  |                        | 34.17                                    | 82.95 | 18.62           | 41.38           | 0.3038                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
| C                    | 02.02.2023               | 11:30 AM to 07:30 PM   | 46.37                                    | 90.46 | 20.69           | 41.08           | 0.3141                                 | -  | -       | -               | -     | -                                      | -  | -  | Extrusion #2 Campus | South Side               | Boundary wall |
|                      | 02.02.2023 to 03.02.2023 | 08:00 PM to 04:00 AM   | 34.83                                    | 85.17 | 16.55           | 37.43           | 0.3469                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | 03.02.2023               | 04:30 AM to 12:30 PM   | 42.71                                    | 94.66 | 17.59           | 42.91           | 0.3628                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | Average                  |                        | 41.30                                    | 90.10 | 18.28           | 40.47           | 0.3413                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
| D                    | 02.02.2023               | 12:00 Noon to 08:00 PM | 32.58                                    | 78.48 | 21.73           | 41.08           | 0.2652                                 | -  | -       | -               | -     | -                                      | -  | -  | Extrusion #2 Campus | West Side                | Boundary wall |
|                      | 02.02.2023 to 03.02.2023 | 08:30 PM to 04:30 AM   | 29.85                                    | 75.54 | 16.55           | 37.43           | 0.2966                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | 03.02.2023               | 05:00 AM to 01:00 PM   | 36.34                                    | 86.21 | 23.80           | 43.82           | 0.3471                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |
|                      | Average                  |                        | 32.92                                    | 80.08 | 20.69           | 40.78           | 0.3030                                 | -  | -       | -               | -     | -                                      | -  | -  |                     |                          |               |

**Parbati Golui**  
 Quality Manager  
 INDICATIVE CONSULTANT INDIA  
*Page 1 of 3*



|                           |                                |                            |       |       |       |       |        |     |     |     |       |     |     |     |   |                    |                               |
|---------------------------|--------------------------------|----------------------------|-------|-------|-------|-------|--------|-----|-----|-----|-------|-----|-----|-----|---|--------------------|-------------------------------|
| E                         | 03.02.2023                     | 09:00 AM<br>to<br>05:00 PM | 39.80 | 92.17 | 22.76 | 44.73 | 0.2791 | BDL | BDL | BDL | 38.10 | BDL | BDL | BDL | Extrusion#2<br>Campus   | Center<br>Location | Near New Road<br>Weigh Bridge |
|                           | 03.02.2023<br>to<br>04.02.2023 | 05:30 PM<br>to<br>01:30 AM | 33.83 | 82.79 | 15.52 | 41.99 | 0.3228 | BDL | BDL | BDL | -     | BDL | BDL | BDL |   |                    |                               |
|                           | 04.02.2023                     | 02:00 AM<br>to<br>10:00 AM | 30.08 | 76.18 | 18.62 | 37.43 | 0.3605 | BDL | BDL | BDL | -     | BDL | BDL | BDL |   |                    |                               |
|                           | Average                        |                            | 34.57 | 83.71 | 18.97 | 41.38 | 0.3208 | BDL | BDL | BDL | 38.10 | BDL | BDL | BDL |   |                    |                               |
| Graphite Old Plant Campus |                                |                            |       |       |       |       |        |     |     |     |       |     |     |     |   |                    |                               |
| F                         | 03.02.2023                     | 09:30 AM<br>to<br>05:30 PM | 37.59 | 85.15 | 20.69 | 41.99 | 0.2766 | -   | -   | -   | -     | -   | -   | -   | Near<br>Personnel<br>Office<br>(Graphite<br>Old Plant)          | West Side          | Boundary wall                 |
|                           | 03.02.2023<br>to<br>04.02.2023 | 06:00 PM<br>to<br>02:00 AM | 33.58 | 77.69 | 22.76 | 46.56 | 0.3148 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | 04.02.2023                     | 02:30 AM<br>to<br>10:30 AM | 31.41 | 73.46 | 18.62 | 39.26 | 0.3691 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | Average                        |                            | 34.19 | 78.77 | 20.69 | 42.60 | 0.3202 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
| G                         | 06.02.2023                     | 09:00 AM<br>to<br>05:00 PM | 48.51 | 89.18 | 21.73 | 45.65 | 0.2658 | -   | -   | -   | -     | -   | -   | -   | Near<br>Security<br>Barrack<br>(Graphite<br>Old Plant)          | North Side         | Boundary wall                 |
|                           | 06.02.2023<br>to<br>07.02.2023 | 05:30 PM<br>to<br>01:30 AM | 38.85 | 81.50 | 18.62 | 41.99 | 0.3012 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | 07.02.2023                     | 02:00 AM<br>to<br>10:00 AM | 32.58 | 76.05 | 15.52 | 35.60 | 0.3514 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | Average                        |                            | 39.98 | 82.24 | 18.62 | 41.08 | 0.3061 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
| H                         | 06.02.2023                     | 09:30 AM<br>to<br>05:30 PM | 41.20 | 90.55 | 21.73 | 48.38 | 0.2769 | -   | -   | -   | -     | -   | -   | -   | At the east of<br>LWG 4<br>& 5<br>(Graphite<br>Old Plant)       | East Side          | Boundary wall                 |
|                           | 06.02.2023<br>to<br>07.02.2023 | 06:00 PM<br>to<br>02:00 AM | 36.11 | 83.33 | 23.80 | 43.82 | 0.3248 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | 07.02.2023                     | 02:30 AM<br>to<br>10:30 AM | 32.66 | 78.30 | 18.62 | 40.17 | 0.3671 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | Average                        |                            | 36.66 | 84.06 | 21.38 | 44.12 | 0.3229 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
| I                         | 07.02.2023                     | 10:30 AM<br>to<br>06:30 PM | 38.56 | 86.40 | 17.59 | 41.99 | 0.2878 | -   | -   | -   | -     | -   | -   | -   | Near South<br>side of<br>Tunnel Kiln<br>(Graphite<br>Old Plant) | South Side         | Boundary wall                 |
|                           | 07.02.2023<br>to<br>08.02.2023 | 07:00 PM<br>to<br>03:00 AM | 42.61 | 91.67 | 22.76 | 45.65 | 0.3306 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | 08.02.2023                     | 03:30 AM<br>to<br>11:30 AM | 33.83 | 82.07 | 18.62 | 35.60 | 0.3751 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |
|                           | Average                        |                            | 38.33 | 86.71 | 19.66 | 41.08 | 0.3312 | -   | -   | -   | -     | -   | -   | -   |   |                    |                               |


Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT

*[Signature]*

|   |                          |                        |       |       |       |       |        |     |     |     |       |     |     |     |                                   |                 |                                |
|---|--------------------------|------------------------|-------|-------|-------|-------|--------|-----|-----|-----|-------|-----|-----|-----|-----------------------------------|-----------------|--------------------------------|
| J | 07.02.2023               | 11:00 AM to 07:00 PM   | 44.78 | 94.20 | 18.62 | 41.99 | 0.3017 | BDL | BDL | BDL | 40.1  | BDL | BDL | BDL | Graphite Old Plant                | Center Location | West side of Shipping Unit # 2 |
|   | 07.02.2023 to 08.02.2023 | 07:30 PM to 03:30 AM   | 48.87 | 98.47 | 22.76 | 46.56 | 0.3409 | BDL | BDL | BDL | -     | BDL | BDL | BDL |                                   |                 |                                |
|   | 08.02.2023               | 04:00 AM to 12:00 Noon | 35.09 | 83.15 | 15.52 | 37.43 | 0.3972 | BDL | BDL | BDL | -     | BDL | BDL | BDL |                                   |                 |                                |
|   | Average                  |                        | 42.91 | 91.94 | 18.97 | 41.99 | 0.3466 | BDL | BDL | BDL | 40.10 | BDL | BDL | BDL |                                   |                 |                                |
| K | 08.02.2023               | 12:00 Noon to 08:00 PM | 47.26 | 89.36 | 23.80 | 44.73 | 0.3355 | -   | -   | -   | -     | -   | -   | -   | Near Baking Furnace RH 16 Section | North Side      | Boundary wall                  |
|   | 08.02.2023 to 09.02.2023 | 08:30 PM to 04:30 AM   | 35.09 | 75.25 | 17.59 | 36.52 | 0.3721 | -   | -   | -   | -     | -   | -   | -   |                                   |                 |                                |
|   | 09.02.2023               | 05:00 AM to 01:00 PM   | 42.61 | 82.43 | 19.66 | 41.08 | 0.2892 | -   | -   | -   | -     | -   | -   | -   |                                   |                 |                                |
|   | Average                  |                        | 41.65 | 82.35 | 20.35 | 40.78 | 0.3323 | -   | -   | -   | -     | -   | -   | -   |                                   |                 |                                |
| L | 08.02.2023               | 12:30 PM to 08:30 PM   | 39.80 | 81.20 | 21.73 | 44.73 | 0.3078 | -   | -   | -   | -     | -   | -   | -   | Near RH- 24 (II)                  | South Side      | Boundary wall                  |
|   | 08.02.2023 to 09.02.2023 | 09:00 PM to 05:00 AM   | 33.83 | 72.56 | 16.55 | 35.60 | 0.3591 | -   | -   | -   | -     | -   | -   | -   |                                   |                 |                                |
|   | 09.02.2023               | 05:30 AM to 01:30 PM   | 36.34 | 79.35 | 19.66 | 40.17 | 0.2844 | -   | -   | -   | -     | -   | -   | -   |                                   |                 |                                |
|   | Average                  |                        | 36.66 | 77.70 | 19.31 | 40.17 | 0.3171 | -   | -   | -   | -     | -   | -   | -   |                                   |                 |                                |

For, Indicative Consultant India

  
 Parbat Golui  
 (Quality Manager)  
 Quality Manager  
 Signatory Authority  
 INDICATIVE CONSULTANT INDIA

  
 Checked By: A. Patra





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 14.01.2023                               | : Report No: ICI/HL/W/RN-023/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-023           |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.  | Sampling Date : 03.01.2023          |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No. +91-9332039296  | Sampling Time : 03:15 PM            |
|  |   | Analysis Start Date : 05.01.2023    |
|  |   | Analysis complete Date : 13.01.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : EFFLUENT  |                                     |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : IS:3025 (Part 1): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : EXTRUSION # 2 ETP OUTLET  |                                     |
| Material/ Test Specification                   | : Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed  |
|---------|---|------|--------|--|----------------|--|
|         |   |      |        | Inland Surface Water   | Public Sewers  |  |
| 1.      | pH (at 20°C)                                    | ---  | 6.96   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11): 1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H* B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 38.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D    |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 161.9  | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B                                      |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 28.0   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,  |
| 5.      | Oil and Grease                                  | mg/L | 4.9    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,   |

\*\*The Environment (Protection) Rules, 1986

Prepared By: *Ananda*

Checked By: A. Patra

For: INDICATIVE CONSULTANT INDIA

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |   |
|--|---|---|
| Date: 14.01.2023                               | : Report No: ICI/HL/W/RN-024/2023   | Format No: ICI/FM/H/67  |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-024   |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 03.01.2023  |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 03:50 PM<br>Analysis Start Date : 05.01.2023<br>Analysis complete Date : 13.01.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  |   |
| #Sample Description                            | : EFFLUENT  |   |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |   |
| Sampling Method                                | : IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |   |
| #Location                                      | : NEAR OLD WEIGH BRIDGE OUTLET  |   |
| Material/ Test Specification                   | : Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |   |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C)                                    | ---  | 7.51   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11): 1983 RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 21.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984 RA 2017, APHA 23 <sup>rd</sup> Edition 2540D                |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 28.8   | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 5.61   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993 RA 2019,  |
| 5.      | Oil and Grease                                  | mg/L | 2.1    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991 RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,               |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: A. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)

Estimated Uncertainty: Not Required

- Note :
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory
  - Once issued, the test report certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

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-----End of Report-----





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 14.01.2023                               | : Report No: ICI/HL/W/RN-025/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-025           |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.  | Sampling Date : 03.01.2023          |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No. - +91-9332039296  | Sampling Time : 04:10 PM            |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  | Analysis Start Date : 05.01.2023    |
| #Sample Description                            | : EFFLUENT  | Analysis complete Date : 13.01.2023 |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : IS:3025 (Part I), 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : NEAR LWG - 4 OUTLET   |                                     |
| Material/ Test Specification                   | : Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C)                                    | ---  | 7.63   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 25.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D               |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 38.5   | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 7.12   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019.   |
| 5.      | Oil and Grease                                  | mg/L | 2.2    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B.              |

\*\*The Environment (Protection) Rules, 1986

For. INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
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  7. Once issued, the test report certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



EMAIL :indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |   |                                     |
|--|---|---|-------------------------------------|
| Date: 13.02.2023                               | : | Report No: ICI/HL/W/RN-211/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-211           |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 12:05 PM            |
|  |   |   | Analysis Start Date : 04.02.2023    |
|  |   |   | Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : | EFFLUENT  |                                     |
| Sample Condition                               | : | In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : | IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : | EXTRUSION # 2 ETP OUTLET  |                                     |
| Material/ Test Specification                   | : | Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C )                                   | ---  | 6.93   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 49.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D               |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 102.8  | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 19.0   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019.   |
| 5.      | Oil and Grease                                  | mg/L | 4.3    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,              |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: V. Mondal

Checked By: A. Patra

Parbati Gofui  
(Quality Manager)

Signature Authority  
Parbati Gofui  
Quality Manager

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

INDICATIVE CONSULTANT INDIA

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
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  9. Location of Testing: Haldia Laboratory

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-----End of Report-----





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 13.02.2023                               | : Report No: ICI/HL/W/RN-212/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-212           |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.  | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No. - +91-9332039296  | Sampling Time : 11:00 AM            |
|  |   | Analysis Start Date : 04.02.2023    |
|  |   | Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : EFFLUENT  |                                     |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : COLLECTED TREATED WATER FROM COMMON WASTE WATER RECYCLING UNIT OF OUTFALL LWG # 4 & OLD WEIGH BRIDGE                                    |                                     |
| Material/ Test Specification                   | : Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C)                                    | ---  | 7.35   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 29.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D               |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 46.7   | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 8.17   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,   |
| 5.      | Oil and Grease                                  | mg/L | 2.7    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,              |

\*\*The Environment (Protection) Rules, 1986

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only.
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 13.02.2023                               | : Report No: ICI/HL/W/RN-213/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-213           |
| Address  | : Durgapur - 713211, Dist. – PaschimBardhaman, West Bengal,   | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 11:15 AM            |
|  |   | Analysis Start Date : 04.02.2023    |
|  |   | Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : EFFLUENT  |                                     |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : COLLECTED UNTREATED WATER FROM COMMON WASTE WATER RECYCLING UNIT OF OUTFALL LWG # 4 & OLD WEIGH BRIDGE                                  |                                     |
| Material/ Test Specification                   | : Schedule – VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule – VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed  |
|---------|---|------|--------|--|----------------|--|
|         |   |      |        | Inland Surface Water   | Public Sewers  |  |
| 1.      | pH (at 20°C )                                   | ---  | 6.86   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11): 1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 51.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D                |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 112.1  | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B  |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 20.0   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,  |
| 5.      | Oil and Grease                                  | mg/L | 4.2    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,               |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

Page 1 of 1

-----End of Report-----





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |   |                                     |
|--|---|---|-------------------------------------|
| Date: 14.03.2023                               | : | Report No: ICI/HL/W/RN-415/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-415           |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 04.03.2023          |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 09:30 AM            |
|  |   |   | Analysis Start Date : 06.03.2023    |
|  |   |   | Analysis complete Date : 13.03.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : | EFFLUENT  |                                     |
| Sample Condition                               | : | In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : | IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : | EXTRUSION # 2 ETP OUTLET  |                                     |
| Material/ Test Specification                   | : | Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 22°C)                                    | ---  | 6.89   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H* B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 51.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D   |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 121.2  | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B                                     |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 24.0   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,                                       |
| 5.      | Oil and Grease                                  | mg/L | 4.1    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,  |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note:
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
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  9. Location of Testing: Haldia Laboratory

-----End of Report-----

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# INDICATIVE CONSULTANT INDIA

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## TEST REPORT

|  |   |   |
|--|---|---|
| Date: 14.03.2023                               | : Report No: ICI/HL/W/RN-416/2023   | Format No: ICI/FM/H/67  |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-416   |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 04.03.2023  |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 10:10 AM<br>Analysis Start Date : 06.03.2023<br>Analysis complete Date : 13.03.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  |   |
| #Sample Description                            | : EFFLUENT  |   |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |   |
| Sampling Method                                | : IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |   |
| #Location                                      | : COLLECTED TREATED WATER FROM COMMON WASTE WATER RECYCLING UNIT OF OUTFALL LWG # 4 & OLD WEIGH BRIDGE                                    |   |
| Material/ Test Specification                   | : Schedule – VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents: The Environment (Protection) Rules, 1986 |   |

| Sl. No. | Parameters                                      | Unit | Result | Schedule – VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 22°C )                                   | ---  | 7.18   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H* B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 33.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D   |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 40.4   | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B                                     |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 8.44   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,                                       |
| 5.      | Oil and Grease                                  | mg/L | 2.8    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,  |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only
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  - Location of Testing: Haldia Laboratory

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-----End of Report-----





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|  |   |   |
|--|---|---|
| Date: 14.03.2023                               | : Report No: ICI/HL/W/RN-417/2023   | Format No: ICI/FM/H/67  |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-417   |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 04.03.2023  |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No. - +91-9332039296  | Sampling Time : 10:20 AM<br>Analysis Start Date : 06.03.2023<br>Analysis complete Date : 13.03.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023  |   |
| #Sample Description                            | : EFFLUENT  |   |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle  |   |
| Sampling Method                                | : IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |   |
| #Location                                      | : COLLECTED UNTREATED WATER FROM COMMON WASTE WATER RECYCLING UNIT OF OUTFALL LWG # 4 & OLD WEIGH BRIDGE                                  |   |
| Material/ Test Specification                   | : Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |   |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 22°C )                                   | ---  | 6.97   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983; RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H* B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 48.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984; RA 2017, APHA 23 <sup>rd</sup> Edition 2540D   |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 90.9   | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B                                     |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 21.0   | 30 mg/L (max)  | 350 mg/L (max) | IS: 3025 (Part-44): 1993; RA 2019,                                      |
| 5.      | Oil and Grease                                  | mg/L | 4.5    | 10 mg/L (max)  | 20 mg/L (max)  | IS: 3025 (Part-39): 1991; RA 2019, APHA 23 <sup>rd</sup> Edition 5520B, |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
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  9. Location of Testing: Haldia Laboratory

Page 1 of 1

-----End of Report-----





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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## TEST REPORT

|   |   |   |                         |
|---|---|---|-------------------------|
| Date: 22.02.2023                            | : | Report No: ICI/HL/N/TC-030/2023                           | Format No: ICI/FM/H/68  |
| Customer Name                               | : | M/s. GRAPHITE INDIA LTD.                                  |                         |
| Address                                     | : | Durgapur - 713211, Dist - Paschim Bardhaman, West Bengal, |                         |
| #Customer Representative Name & Contact No. | : | Mr. C. P. Dhanuka<br>Mob. No. 9332039296                  |                         |
| #Work Order No.                             | : | DOM/4500287592 Dtd. 05.01.2023                            |                         |
| #Sample Description                         | : | AMBIENT NOISE   |                         |
| Sampling Method                             | : | By Digital Noise Meter                                    |                         |
| Test Method                                 | : | IS 9989:1981 (RA 2020)                                    |                         |
| Monitoring Details:                         |   |   |                         |
| Height from the floor                       | : | 1.5 M   | Total Time (T) : 18 Min |
| Distance of Source                          | : | 3.0 M   | Difference (dt) : 2 Min |

| #Noise Source/ Location: NORTH BOUNDARY WALL -NEAR MANDIR |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-120  | 13.02.2023    | 09:35 AM      | 60.36                                     | 62.0                                    | 58.1                                    | As per note  |

| #Noise Source/ Location: NORTH BOUNDARY WALL -NEAR SECURITY BARRACK |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-121  | 13.02.2023    | 10:10 AM      | 67.02                                     | 68.4                                    | 65.9                                    | As per note  |

| #Noise Source/ Location: NORTH BOUNDARY WALL -BACK OF LWG # 3 |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-122  | 13.02.2023    | 10:45 AM      | 66.37                                     | 68.0                                    | 64.8                                    | As per note  |

| #Noise Source/ Location: CENTRE OF THE PLANT (NEAR PI UNIT # 1) |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-123  | 13.02.2023    | 11:20 AM      | 66.01                                     | 67.2                                    | 64.7                                    | As per note  |

| #Noise Source/ Location: EAST BOUNDARY WALL - NEAR LWG # 4 |               |               |   |   |   | DAY TIME     |
|--|---------------|---------------|---|---|---|--------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-124   | 13.02.2023    | 11:55 AM      | 66.74                                     | 68.3                                    | 65.3                                    | As per note  |

| #Noise Source/ Location: WEST BOUNDARY WALL - NEAR PERSONAL OFFICE |               |               |   |   |   | DAY TIME     |
|--|---------------|---------------|---|---|---|--------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-125   | 13.02.2023    | 12:30 PM      | 64.58                                     | 66.2                                    | 62.7                                    | As per note  |

| #Noise Source/ Location: SOUTH BOUNDARY WALL -NEAR FINISHIG UNIT # 3 |               |               |   |   |   | DAY TIME     |
|--|---------------|---------------|---|---|---|--------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) | Limit* dB(A) |
| 2023/N-126   | 13.02.2023    | 01:20 PM      | 64.79                                     | 66.8                                    | 63.6                                    | As per note  |

Page 1 of 4

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Report No: ICI/HL/N/TC-030/2023

| #Noise Source/ Location: SOUTH BOUNDARY WALL –BACK OF OLD STORE |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-127  | 13.02.2023    | 02:20 PM      | 64.49                                     | 66.1                                    | 62.9                                    | As per note  |

| #Noise Source/ Location: SOUTH BOUNDARY WALL –BACK OF CANTEEN BUILDING |               |               |   |   |   | DAY TIME     |
|--|---------------|---------------|---|---|---|--------------|
| Sample ID  | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|  |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-128   | 13.02.2023    | 02:55 PM      | 65.15                                     | 66.4                                    | 63.8                                    | As per note  |

| #Noise Source/ Location: EXTRUSION # 2 AREA (NORTH BOUNDARY WALL) |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-129  | 13.02.2023    | 03:40 PM      | 67.63                                     | 69.4                                    | 65.8                                    | As per note  |

| #Noise Source/ Location: EXTRUSION # 2 AREA ( EAST BOUNDARY WALL) |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-130  | 13.02.2023    | 04:10 PM      | 66.67                                     | 68.2                                    | 64.6                                    | As per note  |

| #Noise Source/ Location: EXTRUSION # 2 AREA ( SOUTH BOUNDARY WALL) |               |               |   |   |   | DAY TIME     |
|--|---------------|---------------|---|---|---|--------------|
| Sample ID  | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|  |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-131   | 13.02.2023    | 04:40 PM      | 66.65                                     | 68.2                                    | 65.8                                    | As per note  |

| #Noise Source/ Location: EXTRUSION # 2 AREA (WEST BOUNDARY WALL ) |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-132  | 13.02.2023    | 05:10 PM      | 66.06                                     | 67.2                                    | 64.4                                    | As per note  |

| #Noise Source/ Location: EXTRUSION # 2 CENTRE OF THE PLANT –NEAR NEW WEIGH BRIDGE |               |               |   |   |   | DAY TIME     |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-133  | 13.02.2023    | 05:40 PM      | 65.79                                     | 67.4                                    | 64.1                                    | As per note  |

| #Noise Source/ Location: NORTH BOUNDARY WALL –NEAR MANDIR |               |               |   |   |   | NIGHT TIME   |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-134  | 13.02.2023    | 10:05 PM      | 60.32                                     | 62.0                                    | 57.4                                    | As per note  |

| #Noise Source/ Location: NORTH BOUNDARY WALL –NEAR SECURITY BARRACK |               |               |   |   |   | NIGHT TIME   |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-135  | 13.02.2023    | 10:35 PM      | 60.71                                     | 62.6                                    | 58.6                                    | As per note  |

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Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

(GOVT. REGISTERED TEST HOUSE)



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Report No: ICI/HL/N/TC-030/2023

| #Noise Source/ Location: NORTH BOUNDARY WALL -BACK OF LWG # 3 |               |               |  |                                      |                                      | NIGHT TIME      |
|---|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-136  | 13.02.2023    | 11:05 PM      | 59.54                                  | 61.1                                 | 57.4                                 | As per note     |

| #Noise Source/ Location: CENTRE OF THE PLANT (NEAR PI UNIT # 1) |               |               |  |                                      |                                      | NIGHT TIME      |
|---|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-137  | 13.02.2023    | 11:40 PM      | 60.74                                  | 62.2                                 | 58.8                                 | As per note     |

| #Noise Source/ Location: EAST BOUNDARY WALL - NEAR LWG # 4 |               |               |  |                                      |                                      | NIGHT TIME      |
|--|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-138   | 14.02.2023    | 12:15 AM      | 60.71                                  | 62.2                                 | 58.8                                 | As per note     |

| #Noise Source/ Location: WEST BOUNDARY WALL - NEAR PERSONAL OFFICE |               |               |  |                                      |                                      | NIGHT TIME      |
|--|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-139   | 14.02.2023    | 12:50 AM      | 60.19                                  | 61.2                                 | 58.9                                 | As per note     |

| #Noise Source/ Location: SOUTH BOUNDARY WALL -NEAR FINISHIG UNIT # 3 |               |               |  |                                      |                                      | NIGHT TIME      |
|--|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-140   | 14.02.2023    | 01:20 AM      | 60.17                                  | 62.6                                 | 58.8                                 | As per note     |

| #Noise Source/ Location: SOUTH BOUNDARY WALL -BACK OF OLD STORE |               |               |  |                                      |                                      | NIGHT TIME      |
|---|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-141  | 14.02.2023    | 01:50 AM      | 60.76                                  | 62.4                                 | 58.9                                 | As per note     |

| #Noise Source/ Location: SOUTH BOUNDARY WALL -BACK OF CANTEEN BUILDING |               |               |  |                                      |                                      | NIGHT TIME      |
|--|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-142   | 14.02.2023    | 02:30 AM      | 60.00                                  | 61.2                                 | 58.7                                 | As per note     |

| #Noise Source/ Location: EXTRUSION # 2 AREA (NORTH BOUNDARY WALL) |               |               |  |                                      |                                      | NIGHT TIME      |
|---|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-143  | 14.02.2023    | 03:15 AM      | 60.02                                  | 62.4                                 | 57.6                                 | As per note     |

| #Noise Source/ Location: EXTRUSION # 2 AREA ( EAST BOUNDARY WALL) |               |               |  |                                      |                                      | NIGHT TIME      |
|---|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID   | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-144  | 14.02.2023    | 03:45 AM      | 59.59                                  | 61.4                                 | 57.9                                 | As per note     |

| #Noise Source/ Location: EXTRUSION # 2 AREA ( SOUTH BOUNDARY WALL) |               |               |  |                                      |                                      | NIGHT TIME      |
|--|---------------|---------------|--|--------------------------------------|--------------------------------------|-----------------|
| Sample ID  | Sampling Date | Sampling Time | Equivalent Noise<br>( $L_{eq}$ ) dB(A) | Maximum Noise<br>( $L_{max}$ ) dB(A) | Minimum Noise<br>( $L_{min}$ ) dB(A) | Limit*<br>dB(A) |
| 2023/N-145   | 14.02.2023    | 04:15 AM      | 60.13                                  | 62.0                                 | 58.7                                 | As per note     |

Parbati Choudhary  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Page 3 of 4

**CENTRAL LABORATORY :** HPL Link Road, Basudevapur, Khanjanchak, Haldia, Purba Medinipur, Pin- 721602

Phone No. : 03224-275765, 9434017584, 9232395890, 7797506973





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Report No: ICI/HL/N/TC-030/2023

| #Noise Source/ Location: EXTRUSION # 2 AREA (WEST BOUNDARY WALL ) |               |               |   |   |   | NIGHT TIME   |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-146  | 14.02.2023    | 04:50 AM      | 59.86                                     | 61.2                                    | 57.6                                    | As per note  |

| #Noise Source/ Location: EXTRUSION # 2 CENTRE OF THE PLANT -NEAR NEW WEIGH BRIDGE |               |               |   |   |   | NIGHT TIME   |
|---|---------------|---------------|---|---|---|--------------|
| Sample ID   | Sampling Date | Sampling Time | Results dB(A)                             |   |   | Limit* dB(A) |
|   |               |               | Equivalent Noise (L <sub>eq</sub> ) dB(A) | Maximum Noise (L <sub>max</sub> ) dB(A) | Minimum Noise (L <sub>min</sub> ) dB(A) |              |
| 2023/N-147  | 14.02.2023    | 05:20 AM      | 59.26                                     | 60.2                                    | 57.6                                    | As per note  |

\*Note:

## NOISE STANDARD

| Area Code | Category of Area/ Zone | Limits dB (A) Leq               |                                   |
|-----------|------------------------|---------------------------------|-----------------------------------|
|           |                        | Day Time (06:00 AM to 10:00 PM) | Night Time (10:00 PM to 06:00 AM) |
| A         | Industrial Area        | 75                              | 70                                |
| B         | Commercial Area        | 65                              | 55                                |
| C         | Residential Area       | 55                              | 45                                |
| D         | Silence Zone           | 50                              | 40                                |

Source: The Noise Pollution (Regulation & Control) Rules, 2000

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Gola  
(Quality Manager)  
Signatory Authority

Parbati Gola  
Quality Manager

INDICATIVE CONSULTANT INDIA

Test Witnessed By: Sampling was done in front of customer's representative

Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. Noise data was recorded at the customer site in presence of customer's representative.
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report.
  8. The reproduction of the report except in full is invalid without written approval of the laboratory
  9. Location of Testing: Plant Site & Report was generated from Haldia Laboratory

-----End of Report-----

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# WORK ZONE AIR, NOISE LEVEL, ILLUMINATION & VENTILATION MONITORING REPORT OF

**M/s. GRAPHITE INDIA LTD.**

**Durgapur - 713 211, Dist. - Paschim Bardhaman, West Bengal**

**FEBRUARY-2023**

**PREPARED BY:**

**INDICATIVE CONSULTANT INDIA**

**H.P.L Link Road, Basudevpur, P.O.-Khanjanchak, Haldia,  
Dist. - Purba Medinipur, PIN - 721 602**

**☎ (03224) 275765**

**Website: [www.indicativeconsultantindia.com](http://www.indicativeconsultantindia.com)**





## INDICATIVE CONSULTANT INDIA

|                          |   |   |
|--------------------------|---|---|
| Name of the Factory      | : | M/S. GRAPHITE INDIA LTD.<br>Durgapur -713211, Dist - Paschim Bardhaman, West Bengal |
| Date of Execution of Job | : | 06.02.2023 to 11.02.2023 & 13.02.2023 to 14.02.2023                                 |

1.0 Environment pollution is mostly the result of various human activities like industrial operation. Identification and quantification of air contaminants in the work zone area in accordance with the requirements of Factory Rules of the State under existing Factory Act is the first step towards control of the Work Zone Environment Pollution.

M/S. INDICATIVE CONSULTANT INDIA have been asked to carry out the survey of the WORK ZONE ENVIRONMENT for assessment of air borne Pollution in the form of inorganic dust and gases as well as NOISE, VENTILATION AND ILLUMINATION as per the provision of Sections 36, 7A, 13 & 17 of the Factories Act, 1948 Accordingly, the work zone monitoring, Noise, Ventilation and Illumination have been conducted with the use of Static and Portable monitoring instruments.

The general illumination over those interior parts where persons are regularly employed, shall be provide and maintained sufficient and suitable lighting natural and artificial both.

The entire field work was completed within the period of 06.02.2023 to 11.02.2023 & 13.02.2023 to 14.02.2023. Result of Work Zone air monitoring have been reported in Form No.30 as per 13B(2) of the Factories Rules of the State, in Table No. 1 to 27 & Table No. 1 to 6 Noise Level Monitoring in Table No. 1 to 25, Ventilation Condition Testing in Table No. - 1 to 8 and of Illumination Level Testing in Table No. - 1.



## INDICATIVE CONSULTANT INDIA

2

### 2.0 DISCUSSION:

Result as indicated in Form No.30, which is annexed herewith, reveals the following facts.

#### **WORKZONE AIR RESULT**

- i) *Results of inorganic dust and gases are based on the exposure of 8 hrs. and have been reported in terms of TWA (Time Weighted Average) and Air borne contaminants like inorganic dust and gases, organic fumes in the manufacturing area have been found to be within the Permissible Exposure Limit (PEL) (TABLE 1 to 27 & TABLE 1 to 6)*

#### **NOISE LEVEL RESULT**

- ii) *Sound levels are well within limit at all measured locations. (TABLE 1 to 25)*

#### **ILLUMINATION LEVEL MEASUREMENT RESULT**

- iii) *100 % of the Illumination levels are within the norms. (TABLE 1)*

#### **VENTILATION CONDITION MEASUREMENT RESULT**

- a) *Volume of air change is ADEQUATE at all measured locations. (TABLE 1 to 8)*
- b) *Velocities of air inside the work places are ADEQUATE at all measured locations. (TABLE 1 to 8)*
- c) *Wet Bulb temperatures inside the work place are within limit at all measured locations. (TABLE 1 to 8)*





### 3.0 ACKNOWLEDGEMENT:

- i) Mr. Ranadeep Chakraborty – Vice President (Works)
- ii) Mr. Sugata Bhowmick – VP (HR & IR)
- iii) Mr. C. P. Dhanuka – (Sr. Manager Technical)
- iv) Mr. Sadananda Mukherjee – Asst. Manager (P&A)
- v) Mr. Sudev Mohanta- Safety Officer
- vi) Security Officer & Staff
- vii) All Officers & Staff of M/s. Graphite India Ltd., Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

We acknowledge our sincere thanks and gratitude to the above persons for their co-operation and help to our sampling team during the survey work.

For, INDICATIVE CONSULTANT INDIA

  
Parbat Ghosh  
Competent Person under Factories Act\*1948: Section 36

Parbat Ghosh  
Competent Person under Factories  
Act\*1948: Section 36  
INDICATIVE CONSULTANT INDIA

**INDICATIVE CONSULTANT INDIA**

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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 1

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**


**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **EXTRUSION #1 PRESS FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | EXTRUSION #1 PRESS FLOOR        | Suspended Particulate Matter  | 06.02.2023<br>08:00 AM to 04:00 PM | See Annexure-I           | 3                      | 1.074<br>1.112<br>1.067 | 1.084                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |  | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 0.425<br>0.467<br>0.444 | 0.445                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.019<br>0.022<br>0.018 | 0.020                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.044<br>0.046<br>0.042 | 0.044                  | 6.0   |                  | 3   | -                   | Below PEL |   | S. CHATTARAJ            |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA







**INDICATIVE CONSULTANT INDIA**

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**Form No. - 30****Table No. - 2****Result of Analysis of: M/s. GRAPHITE INDIA LTD.,****Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal****Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(c) of the Act.****1. Name of the Department/Plant : EXTRUSION #1 WEIGH FLOOR****2. Raw materials, by-products and finished products : See Annexure-I****3. Particular of Sampling :**

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination  |                         |                         | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|-------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup>  |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | EXTRUSI ON #1 WEIGH FLOOR       | Suspended Particulate Matter | 06.02.2023<br><br>08:30 AM to 04:30 PM | See Annexure-1           | 3                       | 1.066<br>1.087<br>1.043 | 1.065                   | 10.0  | See Annexure-1   | 3   | -                   | Below PEL |    | T. SUTRADHAR            |
|        |                                 | 3                            |  |                          | 0.321<br>0.314<br>0.309 | 0.315                   | 5.0                     | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.020<br>0.022<br>0.019 | 0.020                   | 5.0                     | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.042<br>0.043<br>0.040 | 0.042                   | 6.0                     | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | Nitrogen Dioxide             |  |                          |                         |                         | 0.042<br>0.043<br>0.040 | 0.042   |                  |   |                     |           |  | S. CHATTARAJ            |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 2/27

# INDICATIVE CONSULTANT INDIA

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Form No. - 30 Table No. - 3

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**



Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **EXTRUSION #1 MIXER FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | EXTRUSION #1 MIXER FLOOR        | Suspended Particulate Matter | 06.02.2023<br><br>09:00 AM to 05:00 PM | See Annexure-I           | 3                       | 1.114<br>1.125<br>1.097 | 1.112                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |    | T. SUTRADHAR            |
|        |                                 | 3                            |  |                          | 0.287<br>0.274<br>0.261 | 0.274                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.018<br>0.021<br>0.019 | 0.019                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.038<br>0.040<br>0.037 | 0.038                   | 6.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 |                              |  |                          |                         |                         |                        |   |                  |   |                     |           |  | S. CHATTERJEE           |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
Haldia, Purba Medinipur-721602  
Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228

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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 4

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **EXTRUSION #1 COOLER FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method      | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|-----------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                       | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | EXTRUSION #1 COOLER FLOOR       | Suspended Particulate Matter  | 06.02.2023<br>09:25 AM to 05:25 PM | <i>See Annexure-I</i>    | 3                      | 1.025<br>1.039<br>1.011 | 1.025                  | 10.0  | <i>See Annexure-I</i> | 3   | -                   | Below PEL | <i>Signature</i>                   | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 0.471<br>0.462<br>0.339 | 0.424                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.021<br>0.025<br>0.023 | 0.023                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.042<br>0.043<br>0.040 | 0.042                  | 6.0   |                       | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
Haldia, Purba Medinipur-721602  
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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 5

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**



Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **Extrusion #2 Press FLOOR**

2. Raw materials, by-products and finished products : See Annexure-I

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring    | Identified Contaminant       | Date & Time of Monitoring                    | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|------------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                    |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | EXTRUSI<br>ON #2<br>PRESS<br>FLOOR | Suspended Particulate Matter | 07.02.2023<br><br>08:15 AM<br>to<br>04:15 PM | See Annexure-I           | 3                       | 0.899<br>0.914<br>0.905 | 0.906                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |    | T.<br>SUTRADH<br>AR     |
|        |                                    | 3                            |  |                          | 0.324<br>0.341<br>0.331 | 0.332                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                    | 3                            |  |                          | 0.020<br>0.022<br>0.019 | 0.020                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                    | 3                            |  |                          | 0.040<br>0.042<br>0.039 | 0.040                   | 6.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                    | Nitrogen Dioxide             |  |                          |                         |                         |                        |   |                  |   |                     |           |  | S.<br>CHATTAR<br>AJ     |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevapur, Khanjanchak  
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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 6

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**



**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

## 1. Name of the Department/Plant : EXTRUSION #2 14MT. FLOOR

2. Raw materials, by-products and finished products : See Annexure-I

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring    | Identified Contaminant        | Date & Time of Monitoring                    | Sampling Instrument Used | Airborne Contamination |                         |                        |                     | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |              | Remark  | Signature of person taking Samples  | Name (in block letters) |
|--------|------------------------------------|-------------------------------|--|--------------------------|------------------------|-------------------------|------------------------|---------------------|---|------------------|---|--------------|---|---|-------------------------|
|        |                                    |                               |  |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> | Continuous Exposure |   |                  | Short term Exposure                                       |              |   |   |                         |
| 1.     | EXTRUSIO<br>N #2<br>14MT.<br>FLOOR | Suspended, Particulate Matter | 07.02.2023<br><br>08:40 AM<br>to<br>04:40 PM | See<br>Annexure-1        | 3                      | 1.432<br>1.454<br>1.424 | 1.437                  | 10.0                | See<br>Annexure-1   | 3                | -   | Below<br>PEL |  | T.<br>SUTRADH<br>AR   |                         |
|        |                                    | Respirable Particulate Matter |  |                          | 3                      | 0.677<br>0.692<br>0.685 | 0.685                  | 5.0                 |   | 3                | -   | Below<br>PEL |   |   |                         |
|        |                                    | Sulphur Dioxide               |  |                          | 3                      | 0.020<br>0.023<br>0.021 | 0.021                  | 5.0                 |   | 3                | -   | Below<br>PEL |   |   |                         |
|        |                                    | Nitrogen Dioxide              |  |                          | 3                      | 0.042<br>0.044<br>0.041 | 0.042                  | 6.0                 |   | 3                | -   | Below<br>PEL |   |   |                         |
|        |                                    |                               |  |                          |                        |                         |                        |                     |   |                  |   |              |   |  | S.<br>CHATTAR<br>AJ     |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



**INDICATIVE CONSULTANT INDIA**

HPL Link Road, Basudevapur, Khanjanchak  
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indicativeconsultantindia@gmail.com

**Form No. - 30****Table No. - 7**

Result of Analysis of: **M/s. GRAPHITE INDIA LTD.,**

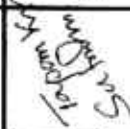

**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **BAKING R-C SHOP**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring                    | Sampling Instrument Used | Airborne Contamination  |                         |                         | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|-------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup>  |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | BAKING R-C SHOP                 | Suspended Particulate Matter | 07.02.2023<br><br>09:10 AM<br>to<br>05:10 PM | See Annexure-1           | 3                       | 1.487<br>1.466<br>1.456 | 1.470                   | 10.0  | See Annexure-1   | 3   | -                   | Below PEL |    | T. SUTRADHAR            |
|        |                                 | 3                            |  |                          | 0.587<br>0.568<br>0.552 | 0.569                   | 5.0                     | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.020<br>0.021<br>0.018 | 0.020                   | 5.0                     | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.039<br>0.040<br>0.037 | 0.039                   | 6.0                     | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | Nitrogen Dioxide             |  |                          |                         |                         | 0.039<br>0.040<br>0.037 |   |                  |   |                     | Below PEL |  | S. CHATTERJEE           |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA

  
Parbat Ghosh  
Authorized Signatory

P 7/27



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevapur, Khanjanchak  
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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 8

Result of Analysis of: **M/s. GRAPHITE INDIA LTD.,**

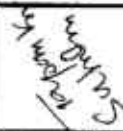
Dist - Paschim Bardhaman Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **BAKING RH 16 SHOP FLOOR**

2. Raw materials, by-products and finished products : See *Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring            | Identified Contaminant        | Date & Time of Monitoring                    | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|--|-------------------------------|--|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |  |                               |  |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | BAKING<br>BAKING<br>RH 16<br>SHOP<br>FLOOR | Suspended Particulate Matter  | 07.02.2023<br><br>09:35 AM<br>to<br>05:35 PM | See Annexure-1           | 3                      | 2.375<br>2.397<br>2.366 | 2.379                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL |  | T.<br>SUTRADHAR         |
|        |  | Respirable Particulate Matter |  |                          | 3                      | 0.877<br>0.869<br>0.858 | 0.868                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |  | Sulphur Dioxide               |  |                          | 3                      | 0.018<br>0.020<br>0.017 | 0.018                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |  | Nitrogen Dioxide              |  |                          | 3                      | 0.038<br>0.040<br>0.037 | 0.038                  | 6.0   |                  | 3   | -                   | Below PEL |   |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 8/27

# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
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indicativeconsultantindia@gmail.com

Form No. - 30

Table No. - 9

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**


Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **BAKING RH 24 (I) SHOP FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination  |                         |                        |                     | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |           | Remark  | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|---------------------|---|------------------|---|-----------|---|------------------------------------|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> | Continuous Exposure |   |                  | Short term Exposure                                       |           |   |                                    |                         |
| 1.     | BAKING RH 24 (I) SHOP FLOOR     | Suspended Particulate Matter | 08.02.2023<br><br>08:40 AM to 04:40 PM | See Annexure-I           | 3                       | 1.988<br>1.995<br>1.971 | 1.985                  | 10.0                | See Annexure-I  | 3                | -   | Below PEL |  | T. SUTRADHAR                       |                         |
|        |                                 | 3                            |  |                          | 1.125<br>1.112<br>1.136 | 1.124                   | 5.0                    | 3                   |   | -                | Below PEL   |           |   |                                    |                         |
|        |                                 | 3                            |  |                          | 0.018<br>0.021<br>0.017 | 0.019                   | 5.0                    | 3                   |   | -                | Below PEL   |           |   |                                    |                         |
|        |                                 | 3                            |  |                          | 0.040<br>0.041<br>0.039 | 0.040                   | 6.0                    | 3                   |   | -                | Below PEL   |           |   |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



Particulars of  
Authorized Signatory

P 9/27



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
Haldia, Purba Medinipur-721602  
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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 10

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**



Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **BAKING TUNNEL KILN SHOP**

2. Raw materials, by-products and finished products : See Annexure-I

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring                | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | BAKING TUNNEL KILN SHOP         | Suspended Particulate Matter | 08.02.2023<br>08:55 AM<br>to<br>04:55 PM | See Annexure-I           | 3                       | 2.566<br>2.554<br>2.541 | 2.554                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |    | T. SUTRADHAR            |
|        |                                 | 3                            |  |                          | 1.524<br>1.517<br>1.511 | 1.517                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.020<br>0.022<br>0.019 | 0.020                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | 3                            |  |                          | 0.044<br>0.045<br>0.041 | 0.043                   | 6.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|        |                                 | Nitrogen Dioxide             |  |                          |                         |                         |                        |   |                  |   |                     |           |  | S. CHATTARAJ            |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
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Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228

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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 11

Result of Analysis of: **M/s. GRAPHITE INDIA LTD.,**


Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **PITCH IMPREGNATION UNIT # 2 SHOP**

2. Raw materials, by-products and finished products : *See Annexure-1*

3. Particular of Sampling :

| SL No | Location / Operation Monitoring  | Identified Contaminant        | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|-------|----------------------------------|-------------------------------|--|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|       |                                  |                               |  |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.    | PITCH IMPREGNATION UNIT # 2 SHOP | Suspended Particulate Matter  | 08.02.2023<br><br>09:15 AM to 05:15 PM | See Annexure-1           | 3                      | 2.555<br>2.574<br>2.562 | 2.564                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL |  | T. SUTRADH AR           |
|       |                                  | Respirable Particulate Matter |  |                          | 3                      | 1.221<br>1.215<br>1.197 | 1.211                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|       |                                  | Sulphur Dioxide               |  |                          | 3                      | 0.018<br>0.019<br>0.017 | 0.018                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|       |                                  | Nitrogen Dioxide              |  |                          | 3                      | 0.040<br>0.043<br>0.042 | 0.042                  | 6.0   |                  | 3   | -                   | Below PEL |   |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 11/27



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevapur, Khanjanchak  
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Mob. - 94340 17584  
e-mail : jayantaskar67@gmail.com/  
indicativeconsultantindia@gmail.com

Form No. - 30


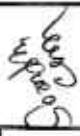
Table No. - 12

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **PITCH IMPREGNATION UNIT # 3 SHOP**
2. Raw materials, by-products and finished products : *See Annexure-I*
3. Particular of Sampling :

| SL No | Location / Operation Monitoring  | Identified Contaminant        | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination |                         |                        |                     | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |           | Remark  | Signature of person taking Samples   | Name (in block letters) |
|-------|----------------------------------|-------------------------------|--|--------------------------|------------------------|-------------------------|------------------------|---------------------|---|------------------|---|-----------|---|--|-------------------------|
|       |                                  |                               |  |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> | Continuous Exposure |   |                  | Short term Exposure                                       |           |   |  |                         |
| 1.    | PITCH IMPREGNATION UNIT # 3 SHOP | Suspended Particulate Matter  | 08.02.2023<br><br>09:40 AM to 05:40 PM | See Annexure-1           | 3                      | 1.947<br>1.932<br>1.925 | 1.935                  | 10.0                | See Annexure -1   | 3                | -   | Below PEL |  | T. SUTRA DHAR  |                         |
|       |                                  | Respirable Particulate Matter |  |                          | 3                      | 0.925<br>0.918<br>0.912 | 0.918                  | 5.0                 |   | 3                | -   | Below PEL |   |  |                         |
|       |                                  | Sulphur Dioxide               |  |                          | 3                      | 0.018<br>0.021<br>0.019 | 0.019                  | 5.0                 |   | 3                | -   | Below PEL |   |  |                         |
|       |                                  | Nitrogen Dioxide              |  |                          | 3                      | 0.039<br>0.041<br>0.040 | 0.040                  | 6.0                 |   | 3                | -   | Below PEL |   |  |                         |
|       |                                  |                               |  |                          |                        |                         |                        |                     |   |                  |   |           |   |  | S. CHATTARAJ            |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 12/27

# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
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Form No. - 30

Table No. - 13

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

Dist - **Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **GRAPHITE ACHESON SHOP**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|---------------------------|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                           |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | GRAPHITE ACHESON SHOP           | Suspended Particulate Matter  | 09.02.2023                | See Annexure-I           | 3                       | 2.741<br>2.733<br>2.720 | 2.731                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL | [Signature]                        | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                           |                          | 3                       | 1.241<br>1.232<br>1.218 | 1.230                  | 5.0   |                  | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               | 3                         |                          | 0.020<br>0.021<br>0.019 | 0.020                   | 5.0                    | 3   |                  | -   | Below PEL           |           |                                    |                         |
|        |                                 | Nitrogen Dioxide              | 3                         |                          | 0.042<br>0.043<br>0.041 | 0.042                   | 6.0                    | 3   |                  | -   | Below PEL           |           |                                    |                         |
|        |                                 |                               |                           |                          |                         |                         |                        |   |                  |   |                     |           | [Signature]                        | S. CHATTA RAJ           |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 13/27



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Kharjanachak  
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Form No. - 30 Table No. - 14

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **LWG # 3 SHOP**
2. Raw materials, by-products and finished products : *See Annexure-1*
3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | LWG # 3 SHOP                    | Suspended Particulate Matter  | 09.02.2023<br>08:40 AM to 04:40 PM | See Annexure-1           | 3                      | 2.399<br>2.412<br>2.405 | 2.405                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL | <i>[Signature]</i>                 | T. SUTRA DHAR           |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 1.165<br>1.177<br>1.158 | 1.167                  | 5.0   |                  | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.020<br>0.022<br>0.019 | 0.020                  | 5.0   |                  | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.038<br>0.039<br>0.038 | 0.038                  | 6.0   |                  | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



Authorized Signatory

P 14/27

**INDICATIVE CONSULTANT INDIA**

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Form No. - 30 Table No. - 15

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

**Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(c) of the Act.

1. Name of the Department/Plant : **LWG # 4 SHOP**
2. Raw materials, by-products and finished products : *See Annexure-I*
3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | LWG # 4 SHOP                    | Suspended Particulate Matter  | 09.02.2023<br>09:00 AM to 05:00 PM | See Annexure-I           | 3                      | 1.897<br>1.855<br>1.869 | 1.874                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |  | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 0.741<br>0.769<br>0.733 | 0.748                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.018<br>0.019<br>0.018 | 0.018                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.040<br>0.042<br>0.039 | 0.040                  | 6.0   |                  | 3   | -                   | Below PEL |   |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 15/27



**INDICATIVE CONSULTANT INDIA**

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Form No. - 30

Table No. - 16

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **LWG # 5 SHOP**
2. Raw materials, by-products and finished products : See Annexure-1
3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | LWG # 5 SHOP                    | Suspended Particulate Matter  | 09.02.2023<br>09:30 AM to 05:30 PM | See Annexure-1           | 3                      | 1.488<br>1.431<br>1.467 | 1.462                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL | Tapan Ghosh<br>Sutradhar           | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 0.587<br>0.596<br>0.574 | 0.586                  | 5.0   |                  | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.020<br>0.022<br>0.019 | 0.020                  | 5.0   |                  | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.045<br>0.046<br>0.042 | 0.044                  | 6.0   |                  | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 16/27

# INDICATIVE CONSULTANT INDIA

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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 17

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**



Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **FINISHING # 1 SHOP FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring    | Identified Contaminant        | Date & Time of Monitoring                    | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples   | Name (in block letters) |
|--------|------------------------------------|-------------------------------|--|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|--|-------------------------|
|        |                                    |                               |  |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |  |                         |
| 1.     | FINISHIN<br>G<br># 1 SHOP<br>FLOOR | Suspended Particulate Matter  | 10.02.2023<br><br>08:30 AM<br>to<br>04:30 PM | See Annexure-1           | 3                      | 2.214<br>2.187<br>2.168 | 2.190                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL |   | T.<br>SUTRADH<br>AR     |
|        |                                    | Respirable Particulate Matter |  |                          | 3                      | 1.141<br>1.169<br>1.125 | 1.145                  | 5.0   |                  | 3   | -                   | Below PEL |  |                         |
|        |                                    | Sulphur Dioxide               |  |                          | 3                      | 0.018<br>0.019<br>0.017 | 0.018                  | 5.0   |                  | 3   | -                   | Below PEL |  |                         |
|        |                                    | Nitrogen Dioxide              |  |                          | 3                      | 0.039<br>0.041<br>0.038 | 0.039                  | 6.0   |                  | 3   | -                   | Below PEL |  |                         |
|        |                                    |                               |  |                          |                        |                         |                        |   |                  |   |                     |           |  | S.<br>CHATTAR<br>AJ     |

\* PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 17/27



# INDICATIVE CONSULTANT INDIA

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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 18

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**



Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **FINISHING # 2 SHOP FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark   | Signature of person taking Samples  | Name (in block letters) |               |
|--------|---------------------------------|-------------------------------|---------------------------|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|--|---|-------------------------|---------------|
|        |                                 |                               |                           |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |  |   |                         |               |
| 1.     | FINISHING # 2 SHOP FLOOR        | Suspended Particulate Matter  | 10.02.2023                | See Annexure-1           | 3                       | 2.274<br>2.285<br>2.269 | 2.276                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL  |  | T. SUTRADHAR            |               |
|        |                                 | Respirable Particulate Matter |                           |                          | 3                       | 1.461<br>1.454          | 1.461                  | 5.0   |                  | 3   | -                   | Below PEL  |   |                         |               |
|        |                                 | Sulphur Dioxide               | 3                         |                          | 0.021<br>0.024<br>0.023 | 0.023                   | 5.0                    | 3   |                  | -   | Below PEL           |  |   |                         | S. CHATTERJEE |
|        |                                 | Nitrogen Dioxide              | 3                         |                          | 0.040<br>0.042<br>0.039 | 0.040                   | 6.0                    | 3   |                  | -   | Below PEL           |  |   |                         |               |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 18/27

# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevapur, Khanjanchak  
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Form No. - 30 Table No. - 19

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **FINISHING # 3 SHOP FLOOR**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method      | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|-----------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                       | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | FINISHING # 3 SHOP FLOOR        | Suspended Particulate Matter  | 10.02.2023<br>09:25 AM to 05:25 PM | <i>See Annexure-I</i>    | 3                      | 2.585<br>2.611<br>2.602 | 2.599                  | 10.0  | <i>See Annexure-I</i> | 3   | -                   | Below PEL | <i>Parbati Ghosal</i>              | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 1.247<br>1.232<br>1.242 | 1.240                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.019<br>0.021<br>0.018 | 0.019                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.037<br>0.039<br>0.036 | 0.037                  | 6.0   |                       | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 19/27



# INDICATIVE CONSULTANT INDIA

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Form No. - 30

Table No. - 20

Result of Analysis of : M/s. GRAPHITE INDIA LTD.,



Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **GRAPHITE FINES SCREENING SHOP**

2. Raw materials, by-products and finished products : See Annexure-1

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/Nt <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples   | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|--|------------------|---|---------------------|-----------|--|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |  |                  | Continuous Exposure                                       | Short term Exposure |           |  |                         |
| 1.     | GRAPHITE FINES SCREENING SHOP   | Suspended Particulate Matter | 10.02.2023<br><br>09:45 AM to 05:45 PM | See Annexure-I           | 3                       | 2.925<br>3.025<br>2.852 | 2.934                  | 10.0   | See Annexure-I   | 3   | -                   | Below PEL |   | T. SUTRADHAR            |
|        |                                 | 3                            |  |                          | 1.625<br>1.597<br>1.611 | 1.611                   | 5.0                    | 3  |                  | -   | Below PEL           |           |  |                         |
|        |                                 | 3                            |  |                          | 0.020<br>0.022<br>0.019 | 0.020                   | 5.0                    | 3  |                  | -   | Below PEL           |           |  |                         |
|        |                                 | 3                            |  |                          | 0.040<br>0.042<br>0.039 | 0.040                   | 6.0                    | 3  |                  | -   | Below PEL           |           |  |                         |
|        |                                 | Nitrogen Dioxide             |  |                          |                         |                         |                        |  |                  |   |                     |           |  | S. CHATTA               |
|        |                                 |                              |  |                          |                         |                         |                        |  |                  |   |                     |           |  | RAJ                     |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 20/27

# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
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Form No. - 30 Table No. - 21

Result of Analysis of: **M/s. GRAPHITE INDIA LTD.,**



**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant: **CANTEEN (KITCHEN AREA)**

2. Raw materials, by-products and finished products: *See Annexure-I*

3. Particular of Sampling:

| Sl. No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring              | Sampling Instrument Used | Airborne Contamination  |                         |                        |                     | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |           |   | Remark       | Signature of person taking Samples   | Name (in block letters) |
|--------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|---------------------|---|------------------|---|-----------|---|--------------|--|-------------------------|
|        |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> | Continuous Exposure |   |                  | Short term Exposure                                       |           |   |              |  |                         |
| 1.     | CANTEEN (KITCHEN AREA)          | Suspended Particulate Matter | 11.02.2023<br><br>08:10 AM to 04:10 PM | See Annexure-1           | 3                       | 1.145<br>1.169<br>1.174 | 1.163                  | 10.0                | See Annexure-1  | 3                | -   | Below PEL |  | T. SUTRADHAR |  |                         |
|        |                                 | 3                            |  |                          | 0.647<br>0.698<br>0.636 | 0.660                   | 5.0                    | 3                   |   | -                | Below PEL   |           |   |              |  |                         |
|        |                                 | 3                            |  |                          | 0.018<br>0.020<br>0.017 | 0.018                   | 5.0                    | 3                   |   | -                | Below PEL   |           |   |              |  |                         |
|        |                                 | 3                            |  |                          | 0.041<br>0.042<br>0.040 | 0.041                   | 6.0                    | 3                   |   | -                | Below PEL   |           |   |              |  |                         |
|        |                                 | Nitrogen Dioxide             |  |                          |                         |                         |                        |                     |   |                  |   |           |   |              |  | S. CHATTARAJ            |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 21/27



**INDICATIVE CONSULTANT INDIA**

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Form No. - 30 Table No. - 22

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **RH - 24 (II)**

2. Raw materials, by-products and finished products : *See Annexure-I*

3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method      | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|-----------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                       | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | RH - 24 (II)                    | Suspended Particulate Matter  | 11.02.2023<br>08:30 AM to 04:30 PM | <i>See Annexure-I</i>    | 3                      | 1.285<br>1.311<br>1.297 | 1.298                  | 10.0  | <i>See Annexure-I</i> | 3   | -                   | Below PEL | <i>Signature</i>                   | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 0.777<br>0.758<br>0.745 | 0.760                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.020<br>0.023<br>0.019 | 0.021                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.040<br>0.042<br>0.039 | 0.040                  | 6.0   |                       | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA





P 22/27

**INDICATIVE CONSULTANT INDIA**

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**Form No. - 30****Table No. - 23****Result of Analysis of: M/s. GRAPHITE INDIA LTD.,****Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal****Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.****1. Name of the Department/Plant : PITCH IMPREGNATION UNIT # 4****2. Raw materials, by-products and finished products : See Annexure-I****3. Particular of Sampling :**

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples   | Name (in block letters) |
|--------|---------------------------------|-------------------------------|---------------------------|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|--|-------------------------|
|        |                                 |                               |                           |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |  |                         |
| 1.     | PITCH IMPREGNATION UNIT # 4     | Suspended Particulate Matter  | 11.02.2023                | See Annexure-I           | 3                       | 2.551<br>2.504<br>2.487 | 2.514                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |   | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                           |                          | 3                       | 1.312<br>1.287<br>1.341 | 1.313                  | 5.0   |                  | 3   | -                   | Below PEL |  |                         |
|        |                                 | Sulphur Dioxide               | 3                         |                          | 0.018<br>0.020<br>0.018 | 0.019                   | 5.0                    | 3   |                  | -   | Below PEL           |           |  |                         |
|        |                                 | Nitrogen Dioxide              | 3                         |                          | 0.039<br>0.041<br>0.040 | 0.040                   | 6.0                    | 3   |                  | -   | Below PEL           |           |  |                         |
|        |                                 |                               |                           |                          |                         |                         |                        |   |                  |   |                     |           |  | S. CHATTARAJ            |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 23/27



# INDICATIVE CONSULTANT INDIA

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Form No. - 30 Table No. - 24

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

Dist - **Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **LWG UNIT # 4 AUTO DUST BAGGING AREA (DURING BAGGING)**
2. Raw materials, by-products and finished products : *See Annexure-I*
3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring                      | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method      | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|--|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|-----------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |  |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                       | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | LWG UNIT # 4 AUTO DUST BAGGING AREA (DURING BAGGING) | Suspended Particulate Matter  | 11.02.2023<br>09:20 AM to 05:20 PM | <i>See Annexure-I</i>    | 3                      | 3.811<br>3.925<br>3.788 | 3.841                  | 10.0  | <i>See Annexure-I</i> | 3   | -                   | Below PEL | <i>[Signature]</i>                 | T. SUTRADHAR            |
|        |  | Respirable Particulate Matter |                                    |                          | 3                      | 1.874<br>1.922<br>1.905 | 1.900                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |  | Sulphur Dioxide               |                                    |                          | 3                      | 0.019<br>0.022<br>0.019 | 0.020                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |  | Nitrogen Dioxide              |                                    |                          | 3                      | 0.044<br>0.046<br>0.044 | 0.045                  | 6.0   |                       | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA

*[Signature]*  
Parbati Golui  
Authorized Signatory

P 24/27

# INDICATIVE CONSULTANT INDIA

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Form No. - 30

Table No. - 25

Result of Analysis of : **M/s. GRAPHITE INDIA LTD.,**

**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant : **STORE SHOP FLOOR**
2. Raw materials, by-products and finished products : *See Annexure-I*
3. Particular of Sampling :

| Sl. No | Location / Operation Monitoring | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method      | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples | Name (in block letters) |
|--------|---------------------------------|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|-----------------------|---|---------------------|-----------|------------------------------------|-------------------------|
|        |                                 |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                       | Continuous Exposure                                       | Short term Exposure |           |                                    |                         |
| 1.     | STORE SHOP FLOOR                | Suspended Particulate Matter  | 13.02.2023<br>09:05 AM to 05:05 PM | <i>See Annexure-I</i>    | 3                      | 3.225<br>3.387<br>3.206 | 3.273                  | 10.0  | <i>See Annexure-I</i> | 3   | -                   | Below PEL | <i>Signature</i>                   | T. SUTRADHAR            |
|        |                                 | Respirable Particulate Matter |                                    |                          | 3                      | 2.125<br>2.192<br>2.226 | 2.181                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Sulphur Dioxide               |                                    |                          | 3                      | 0.019<br>0.022<br>0.018 | 0.020                  | 5.0   |                       | 3   | -                   | Below PEL |                                    |                         |
|        |                                 | Nitrogen Dioxide              |                                    |                          | 3                      | 0.039<br>0.042<br>0.039 | 0.040                  | 6.0   |                       | 3   | -                   | Below PEL |                                    |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 25/27



# INDICATIVE CONSULTANT INDIA

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Form No. - 30 Table No. - 26

Result of Analysis of: **M/s. GRAPHITE INDIA LTD.,**

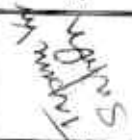
**Dist - Paschim Bardhaman, Durgapur, PIN-713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(c) of the Act.

## 1. Name of the Department/Plant : MAINTANANCE SHOP FLOOR

2. Raw materials, by-products and finished products : See Annexure-I

3. Particular of Sampling :

| SL No | Location / Operation Monitoring | Identified Contaminant       | Date & Time of Monitoring                    | Sampling Instrument Used | Airborne Contamination  |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|-------|---------------------------------|------------------------------|--|--------------------------|-------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|       |                                 |                              |  |                          | No. of sample           | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.    | MAINTANAN<br>CE SHOP<br>FLOOR   | Suspended Particulate Matter | 13.02.2023<br><br>09:30 AM<br>to<br>05:30 PM | See Annexure-I           | 3                       | 3.225<br>3.314<br>3.198 | 3.246                  | 10.0  | See Annexure-I   | 3   | -                   | Below PEL |  | T. SUTRADHAR            |
|       |                                 | 3                            |  |                          | 1.925<br>1.997<br>1.841 | 1.921                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|       |                                 | 3                            |  |                          | 0.019<br>0.022<br>0.020 | 0.020                   | 5.0                    | 3   |                  | -   | Below PEL           |           |   |                         |
|       |                                 | 3                            |  |                          | 0.040<br>0.042<br>0.039 | 0.040                   | 6.0                    | 3   |                  | -   | Below PEL           |           |   |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



**INDICATIVE CONSULTANT INDIA**

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Form No. - 30 Table No. - 27

Result of Analysis of: **M/s. GRAPHITE INDIA LTD.,**

**Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Register Containing Particulars of monitoring of Work Environment required Under Section 7-A(2)(e) of the Act.

1. Name of the Department/Plant: **LWG #5 AUTO DUST BAGGING AREA (DURING BAGGING)**
2. Raw materials, by-products and finished products: *See Annexure-1*
3. Particular of Sampling:

| Sl. No | Location / Operation Monitoring                | Identified Contaminant        | Date & Time of Monitoring          | Sampling Instrument Used | Airborne Contamination |                         |                        | TWA Concentration as given in 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Reference Method | Number of workers exposed at the location being monitored |                     | Remark    | Signature of person taking Samples  | Name (in block letters) |
|--------|--|-------------------------------|------------------------------------|--------------------------|------------------------|-------------------------|------------------------|---|------------------|---|---------------------|-----------|---|-------------------------|
|        |  |                               |                                    |                          | No. of sample          | Range mg/M <sup>3</sup> | Avg. mg/M <sup>3</sup> |   |                  | Continuous Exposure                                       | Short term Exposure |           |   |                         |
| 1.     | LWG #5 AUTO DUST BAGGING AREA (DURING BAGGING) | Suspended Particulate Matter  | 13.02.2023<br>09:50 AM to 05:50 PM | See Annexure-1           | 3                      | 3.841<br>3.925<br>3.774 | 3.847                  | 10.0  | See Annexure-1   | 3   | -                   | Below PEL |  | T. SUTRADHAR            |
|        |  | Respirable Particulate Matter |                                    |                          | 3                      | 2.325<br>2.477<br>2.411 | 2.404                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |  | Sulphur Dioxide               |                                    |                          | 3                      | 0.019<br>0.021<br>0.018 | 0.019                  | 5.0   |                  | 3   | -                   | Below PEL |   |                         |
|        |  | Nitrogen Dioxide              |                                    |                          | 3                      | 0.039<br>0.041<br>0.038 | 0.039                  | 6.0   |                  | 3   | -                   | Below PEL |   |                         |

• PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



P 27/27



**INDICATIVE CONSULTANT INDIA**

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**Form No. - 30****Table No. - 1**


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**M/s. GRAPHITE INDIA LTD.**

Address: Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

**RESULT OF WORK ZONE MONITORING:-**

1. Name of the Department/Plant: **R.C. – 1 BAKING FURNACE SHOP**
2. Raw materials, by-products and finished products: -
3. Particular of Sampling: - Respirable dust sampler

| Location / Operation monitoring       | Identified contaminants  | Date & Time of Monitoring                    | Air Contaminants | TWA Concentration as given in Factory's Act : 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Sampling Instrument used and Reference method | Remark       | Signature   | Name (in block letters) |
|---------------------------------------|--|--|------------------|---|---|--------------|---|-------------------------|
| R.C. - 1<br>BAKING<br>FURNACE<br>SHOP | Methyl Alcohol<br>(as CH <sub>3</sub> OH)                      | 07.02.2023<br><br>09:10 AM<br>to<br>05:10 PM | 32.5             | 260   | See<br>Annexure-I                             | Below<br>PEL |  | A.<br>BHATTACHARYA      |
|                                       | Ethyl Alcohol<br>(as C <sub>2</sub> H <sub>5</sub> OH)         |  | <0.1             | 1900  |   | Below<br>PEL |   |                         |
|                                       | Formic Acid<br>(as HCOOH)                                      |  | <0.05            | 9   |   | Below<br>PEL |   |                         |
|                                       | Benzene<br>(as C <sub>6</sub> H <sub>6</sub> )                 |  | Nil              | 20  |   | Below<br>PEL |   |                         |
|                                       | Toluene<br>(as C <sub>6</sub> H <sub>5</sub> CH <sub>3</sub> ) |  | 50.0             | 375   |   | Below<br>PEL |   |                         |

PEL – Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



**INDICATIVE CONSULTANT INDIA**

H.P.L Link Road, Basudevpur, Khanjanchak  
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Form No. - 30

Table No. - 2


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**M/s. GRAPHITE INDIA LTD.**

Address: Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

**RESULT OF WORK ZONE MONITORING:-**

1. Name of the Department/Plant: **RIED HAMMER 24 (I) SECTION SHOP**
2. Raw materials, by-products and finished products: -
3. Particular of Sampling: - Respirable dust sampler

| Location /<br>Operation<br>monitoring       | Identified<br>contaminants                                     | Date & Time<br>of<br>Monitoring              | Air Contaminants | TWA<br>Concentration as given<br>in Factory's Act :<br>2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Sampling<br>Instrument<br>used and Reference<br>method | Remark       | Signature   | Name<br>(in block<br>letters) |
|---|--|--|------------------|--|--|--------------|---|-------------------------------|
| RIED<br>HAMMER<br>24 (I)<br>SECTION<br>SHOP | Methyl Alcohol<br>(as CH <sub>3</sub> OH)                      | 11.02.2023<br><br>08:30 AM<br>to<br>04:30 PM | <0.1             | 260  | See<br>Annexure-1                                      | Below<br>PEL |  | A.<br>BHATTACHAR<br>YA        |
|   | Ethyl Alcohol<br>(as C <sub>2</sub> H <sub>5</sub> OH)         |  | <0.1             | 1900   |  | Below<br>PEL |   |                               |
|   | Formic Acid<br>(as HCOOH)                                      |  | <0.05            | 9  |  | Below<br>PEL |   |                               |
|   | Benzene<br>(as C <sub>6</sub> H <sub>6</sub> )                 |  | <0.05            | 20   |  | Below<br>PEL |   |                               |
|   | Toluene<br>(as C <sub>6</sub> H <sub>5</sub> CH <sub>3</sub> ) |  | <0.05            | 375  |  | Below<br>PEL |   |                               |

PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA





**INDICATIVE CONSULTANT INDIA**

H.P.L Link Road, Basudevpur, Khanjanchak  
Haldia, Purba Medinipur-721602

Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228

Form No. - 30

Table No. - 3


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**M/s. GRAPHITE INDIA LTD.**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

**RESULT OF WORK ZONE MONITORING:-**

1. Name of the Department/Plant: **BAKING TUNNEL KILN SHOP**
2. Raw materials, by-products and finished products: -
3. Particular of Sampling: - Respirable dust sampler

| Location /<br>Operation<br>monitoring | Identified<br>contaminants                                     | Date & Time<br>of<br>Monitoring | Air Contaminants | TWA<br>Concentration as given<br>in Factory's Act :<br>2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Sampling Instrument<br>used and Reference<br>method | Remark       | Signature  | Name<br>(in block<br>letters) |
|---------------------------------------|--|---------------------------------|------------------|--|---|--------------|--|-------------------------------|
| BAKING<br>TUNNEL<br>KILN<br>SHOP      | Methyl Alcohol<br>(as CH <sub>3</sub> OH)                      | 08.02.2023                      | <0.1             | 260  | See<br>Annexure-I                                   | Below<br>PEL |   | A.<br>BHATTACHA<br>RYA        |
|                                       | Ethyl Alcohol<br>(as C <sub>2</sub> H <sub>5</sub> OH)         |                                 | <0.1             | 1900   |   | Below<br>PEL |  |                               |
|                                       | Formic Acid<br>(as HCOOH)                                      | 08:55 AM<br>to<br>04:55 PM      | <0.05            | 9  |   | Below<br>PEL |  | S.<br>CHATTARAJ               |
|                                       | Benzene<br>(as C <sub>6</sub> H <sub>6</sub> )                 |                                 | <0.05            | 20   |   | Below<br>PEL |  |                               |
|                                       | Toluene<br>(as C <sub>6</sub> H <sub>5</sub> CH <sub>3</sub> ) |                                 | <0.05            | 375  |   | Below<br>PEL |  |                               |

PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



**INDICATIVE CONSULTANT INDIA**

H.P.L Link Road, Basudevpur, Khanjanchak  
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Form No. - 30

Table No. - 4



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**M/s. GRAPHITE INDIA LTD.**

Address: Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

**RESULT OF WORK ZONE MONITORING:-**

1. Name of the Department/Plant: **P.I. UNIT – 2 SHOP**
2. Raw materials, by-products and finished products: -
3. Particular of Sampling: - Respirable dust sampler

| Location / Operation monitoring | Identified contaminants                                     | Date & Time of Monitoring | Air Contaminants | TWA Concentration as given in Factory's Act : 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Sampling Instrument used and Reference method | Remark    | Signature  | Name (in block letters) |
|---------------------------------|---|---------------------------|------------------|---|---|-----------|--|-------------------------|
| P.I. UNIT – 2 SHOP              | Methyl Alcohol (as CH <sub>3</sub> OH)                      | 08.02.2023                | <0.1             | 260   | See Annexure-I                                | Below PEL |   | A. BHATTACHARYA         |
|                                 | Ethyl Alcohol (as C <sub>2</sub> H <sub>5</sub> OH)         |                           | <0.1             | 1900  |   | Below PEL |  |                         |
|                                 | Formic Acid (as HCOOH)                                      | 09:15 AM to 05:15 PM      | <0.05            | 9   |   | Below PEL |  | S. CHATTARAJ            |
|                                 | Benzene (as C <sub>6</sub> H <sub>6</sub> )                 |                           | <0.05            | 20  |   | Below PEL |  |                         |
|                                 | Toluene (as C <sub>6</sub> H <sub>5</sub> CH <sub>3</sub> ) |                           | <0.05            | 375   |   | Below PEL |  |                         |

PEL – Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA





**INDICATIVE CONSULTANT INDIA**

H.P.L Link Road, Basudevpur, Khanjanchak

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Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228

**Form No. - 30****Table No. - 5**

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**M/s. GRAPHITE INDIA LTD.****Address: Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal****RESULT OF WORK ZONE MONITORING:-**

1. Name of the Department/Plant: **ACHESON FURNACE SHOP**
2. Raw materials, by-products and finished products: -
3. Particular of Sampling: - Respirable dust sampler

| Location / Operation monitoring | Identified contaminants                                     | Date & Time of Monitoring | Air Contaminants | TWA Concentration as given in Factory's Act : 2 <sup>nd</sup> Schedule (mg/M <sup>3</sup> ) | Sampling Instrument used and Reference method | Remark    | Signature  | Name (in block letters) |
|---------------------------------|---|---------------------------|------------------|---|---|-----------|--|-------------------------|
| ACHESON FURNACE SHOP            | Methyl Alcohol (as CH <sub>3</sub> OH)                      | 09.02.2023                | <0.1             | 260   | See Annexure-1                                | Below PEL |   | A BHATTACHARYA          |
|                                 | Ethyl Alcohol (as C <sub>2</sub> H <sub>5</sub> OH)         |                           | <0.1             | 1900  |   | Below PEL |  |                         |
|                                 | Formic Acid (as HCOOH)                                      | 08:20 AM to 04:20 PM      | <0.05            | 9   |   | Below PEL |  | S. CHATTARAJ            |
|                                 | Benzene (as C <sub>6</sub> H <sub>6</sub> )                 |                           | <0.05            | 20  |   | Below PEL |  |                         |
|                                 | Toluene (as C <sub>6</sub> H <sub>5</sub> CH <sub>3</sub> ) |                           | <0.05            | 375   |   | Below PEL |  |                         |

PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA



**INDICATIVE CONSULTANT INDIA**

H.P.L Link Road, Basudevpur, Khanjanchak  
Haldia, Purba Medinipur-721602

Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228

**Form No. - 30**

**Table No. - 6**



Ph.: 03224- 273765  
Mob. - 94340 17584  
e-mail : jayantaskar67@gmail.com/  
indicativeconsultantindia@gmail.com

**M/s. GRAPHITE INDIA LTD.**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

**RESULT OF WORK ZONE MONITORING:-**

1. Name of the Department/Plant: **LWG - 4 SHOP**
2. Raw materials, by-products and finished products: -
3. Particular of Sampling: - Respirable dust sampler

| Location /<br>Operation<br>monitoring | Identified<br>contaminants                                     | Date & Time<br>of<br>Monitoring | Air Contaminants | TWA<br>Concentration as given<br>in Factory's Act : 2 <sup>nd</sup><br>Schedule (mg/M <sup>3</sup> ) | Sampling<br>Instrument<br>used and Reference<br>method | Remark       | Signature  | Name<br>(in block<br>letters) |
|---------------------------------------|--|---------------------------------|------------------|--|--|--------------|--|-------------------------------|
| <b>LWG - 4<br/>SHOP</b>               | Methyl Alcohol<br>(as CH <sub>3</sub> OH)                      | 09.02.2023                      | <0.1             | 260  | See<br>Annexure-I                                      | Below<br>PEL |   | A.<br>BHATTACHA<br>RYA        |
|                                       | Ethyl Alcohol<br>(as C <sub>2</sub> H <sub>5</sub> OH)         |                                 | <0.1             | 1900   |  | Below<br>PEL |  |                               |
|                                       | Formic Acid<br>(as HCOOH)                                      | 09:00 AM<br>to<br>05:00 PM      | <0.05            | 9  |  | Below<br>PEL |  | S.<br>CHATTARAJ               |
|                                       | Benzene<br>(as C <sub>6</sub> H <sub>6</sub> )                 |                                 | <0.05            | 20   |  | Below<br>PEL |  |                               |
|                                       | Toluene<br>(as C <sub>6</sub> H <sub>5</sub> CH <sub>3</sub> ) |                                 | <0.05            | 375  |  | Below<br>PEL |  |                               |

PEL - Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khurjanchak  
Haldia, Purba Medinipur - 721 602

Govt.Regd.No.-1-64871; MSME Reg. No.: WB-12-0000228

M/s. GRAPHITE INDIA LTD., Dist - Paschim Bardhaman, Durgapur, PIN - 713 211, (West Bengal)

Result of Analysis :-

Register Containing Particulars of *Testing of Illumination Level.*

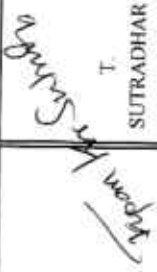

Form No. - 30

Table No. - 1

Ph. - 03224, 275765

Mob. - 94340 17584

e-mail : jayantaskar67@gmail.com/  
indicativeconsultantindia@gmail.com

| Sl. No. | Name of Locations                        | Parameter    | Date & Time of Monitoring | Sampling Instrument Used | Reference Method     | Illumination Level in Lux | Limit Lux | Remarks  | Signature  | Name         |
|---------|--|--------------|---------------------------|--------------------------|----------------------|---------------------------|-----------|----------|--|--------------|
| 1       | EXTRUSION #1 MIXER WORKING AREA          | Illumination | 13.02.2023                | Digital Lux Meter        | By Digital Lux Meter | 217                       | 65        | Adequate |   | T. SUTRADHAR |
| 2       | EXTRUSION #1 WEIGH WORKING AREA          |              |                           |                          |                      | 123                       | 65        | Adequate |  |              |
| 3       | EXTRUSION #2 PRESS WORKING AREA          |              |                           |                          |                      | 172                       | 65        | Adequate |  |              |
| 4       | EXTRUSION #2 14 MTR. WORKING FLOOR       |              |                           |                          |                      | 124                       | 65        | Adequate |  |              |
| 5       | RC BAKING WORKING AREA                   |              |                           |                          |                      | 128                       | 65        | Adequate |  |              |
| 6       | REID HAMMER BAKING-14 WORKING AREA       |              |                           |                          |                      | 232                       | 65        | Adequate |  |              |
| 7       | REID HAMMER BAKING-16 WORKING AREA       |              |                           |                          |                      | 173                       | 65        | Adequate |  |              |
| 8       | REID HAMMER BAKING-24 (I) WORKING AREA   |              |                           |                          |                      | 149                       | 65        | Adequate |  |              |
| 9       | REID HAMMER BAKING-24 (II) WORKING AREA  |              |                           |                          |                      | 192                       | 65        | Adequate |  |              |
| 10      | BAKING TUNNEL KILN WORKING AREA          |              |                           |                          |                      | 384                       | 65        | Adequate |  |              |
| 11      | PITCH IMPREGNATION UNIT # 2 WORKING AREA |              |                           |                          |                      | 303                       | 65        | Adequate |  |              |
| 12      | PITCH IMPREGNATION UNIT # 3 WORKING AREA |              | 6:00 PM to 7:50 PM        |                          |                      | 482                       | 65        | Adequate |  |              |
| 13      | LWG # 3 WORKING AREA                     |              |                           |                          |                      | 254                       | 65        | Adequate |  |              |
| 14      | LWG # 4 WORKING AREA                     |              |                           |                          |                      | 163                       | 65        | Adequate |  |              |
| 15      | GRAPHITE ACHESON WORKING AREA            |              |                           |                          |                      | 142                       | 65        | Adequate |  |              |
| 16      | FINISHING # 1 WORKING AREA               |              |                           |                          |                      | 206                       | 65        | Adequate |  |              |
| 17      | FINISHING # 2 WORKING AREA               |              |                           |                          |                      | 312                       | 65        | Adequate |  |              |
| 18      | FINISHING # 3 WORKING AREA               |              |                           |                          |                      | 419                       | 65        | Adequate |  |              |
| 19      | LWG # 5 WORKING AREA                     |              |                           |                          |                      | 165                       | 65        | Adequate |  |              |
| 20      | PITCH IMPREGNATION UNIT # 4 WORKING AREA |              |                           |                          |                      | 118                       | 65        | Adequate |  |              |
| 21      | MAINTENANCE DEPARTMENT                   |              |                           |                          |                      | 530                       | 65        | Adequate |  |              |
| 22      | MAIN STORE AREA                          |              |                           |                          |                      | 166                       | 65        | Adequate |  |              |
| 23      | CANTEEN                                  |              |                           |                          |                      | 169                       | 65        | Adequate |  |              |
| 24      | NEAR MAIN GATE (OLD PLANT)               |              |                           |                          |                      | 130                       | 65        | Adequate |  |              |
| 25      | LABORATORY                               |              |                           |                          |                      | 258                       | 65        | Adequate |  |              |
|         |  |              |                           |                          |                      |                           |           |          |  | S. CHATTARAJ |

Note: As per Factories Rules, 1958: Rule No R 31 (prescribed under sub section (4) of section 17

For, INDICATIVE CONSULTANT INDIA



Authorized Signatory

# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
Haldia; Purba Medinipur-721602  
Govt.Regd.No.-L-64871; MSME Reg. No.; WB-12-0000228

Ph - 03224-273765  
Mob. - 94340 17584  
e-mail : jayantasarkar67@gmail.com/  
indicativeconsultantindia@gmail.com



Form No. - 30

Table No. - 1

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Sl. No | Location                 | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|--------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| 1.     | EXTRUSION #1 MIXER FLOOR | Noise level Monitoring | 09.02.2023         | 09:40 AM      | Annexure-1              | 82.6<br>81.4<br>83.2<br>82.4<br>81.6<br>82.9<br>83.0<br>81.4<br>82.2<br>83.5 | 82.4            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure-1       | 3                         |  | T. SUTRADHAR          |
|        |                          |                        |                    |               |                         |  |                 |            |   |                  |                           |  | S. CHATTERJEE         |

Distance from the Machine : 3.0 M

For, INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak  
Haldia; Purba Medinipur-721602

Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228


Ph.- 03224-275765  
Mob. - 94340 17584  
e-mail : jayantaskar67@gmail.com/  
indicativeconsultantindia@gmail.com

Form No. - 30

Table No. - 2

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**  
Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Distance from the Machine : 3.0 M |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|-----------------------------------|-----------------------------|------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|---|------------------|---------------------------|--|-----------------------|
| Sl. No                            | Location                    | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample  | Name in block letters |
| 1.                                | EXTRUSION #1<br>WEIGH FLOOR | Noise level Monitoring | 09.02.2023         | 10:20 AM      | Annexure- I             | 80.4              | 82.0            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADH AR         |
|                                   |                             |                        |                    |               |                         | 82.4              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 81.6              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 82.0              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 82.9              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 83.2              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 81.4              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 82.2              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 81.5              |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         | 82.8              |                 |            |   |                  |                           |  |                       |
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|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
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|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
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|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
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|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
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|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |
|                                   |                             |                        |                    |               |                         |                   |                 |            |   |                  |                           |  |                       |

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indicativeconsultantindia@gmail.com

Form No. - 30



Table No. - 3

Result of Analysis: M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location                  | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|---------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| 1.     | EXTRUSION #1 COOLER FLOOR | Noise level Monitoring | 09.02.2023         | 11:55 AM      | Annexure- I             | 80.6<br>82.4<br>81.6<br>82.0<br>81.2<br>82.4<br>81.8<br>82.9<br>83.2<br>81.8 | 82.0            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADHAR          |
|        |                           |                        |                    |               |                         |  |                 |            |   |                  |                           |  | S. CHATTARAJ          |

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indicativeconsultantindia@gmail.com

Form No. - 30

Table No. - 4

Result of Analysis: M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location                 | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|--------|--------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
| 1.     | EXTRUSION #1 PRESS FLOOR | Noise level Monitoring | 09.02.2023         | 12:30 PM      | Annexure-1              | 80.2<br>79.4<br>81.4<br>82.1<br>79.9<br>81.0<br>82.0<br>81.6<br>82.1<br>79.4 | 80.9            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure-1       | 3                         | T. SUTRADHAR                      | T. SUTRADHAR          |
|        |                          |                        |                    |               |                         |  |                 |            |   |                  |                           | S. CHATTARAJ                      | S. CHATTARAJ          |

For, INDICATIVE CONSULTANT INDIA



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Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228


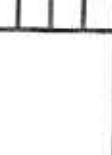
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indicativeconsultantindia@gmail.com

Form No. - 30

Table No. - 5

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**  
**Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Height from the floor : 1.5 M

| Distance from the Machine : 3.0 M |                                    |                           |                    |               |                         |                   |                 |            |  |                  |                           |   |                       |
|-----------------------------------|------------------------------------|---------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|--|------------------|---------------------------|---|-----------------------|
| Sl. No                            | Location                           | Parameter                 | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit  | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
| 1.                                | EXTRUSI<br>ON #2<br>PRESS<br>FLOOR | Noise level<br>Monitoring | 10.02.2023         | 04:15 PM      | Annexure-I              | 82.0              | 81.9            | 8 hrs.     | Exposure<br>Limit for<br>Industrial<br>workers<br>(8 hrs.) =<br>90 dB(A) | Annexure-I       | 3                         |   | T.<br>SUTRADH<br>AR   |
|                                   |                                    |                           |                    |               |                         | 82.2              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.9              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.9              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.0              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.8              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.4              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.1              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.5              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.0              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         |                   |                 |            |  |                  |                           |  | S.<br>CHATTAR<br>AJ   |

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indicativeconsultantindia@gmail.com

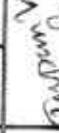

Form No. - 30

Table No. - 6

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Distance from the Machine : 3.0 M |                                       |                           |                    |               |                         |                   |                 |            |  |                  |                           |   |                       |
|-----------------------------------|---------------------------------------|---------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|--|------------------|---------------------------|---|-----------------------|
| SL No                             | Location                              | Parameter                 | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit  | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
| 1.                                | EXTRUSIO<br>N #2 14<br>METER<br>FLOOR | Noise level<br>Monitoring | 10.02.2023         | 04:50 PM      | Annexure- I             | 81.4              | 82.0            | 8 hrs.     | Exposure<br>Limit for<br>Industrial<br>workers<br>(8 hrs.) =<br>90 dB(A) | Annexure-<br>I   | 3                         |  | T.<br>SUTRADH<br>AR   |
|                                   |                                       |                           |                    |               |                         | 82.6              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 81.8              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 82.4              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 82.9              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 81.5              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 80.9              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 81.4              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 82.6              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         | 82.0              |                 |            |  |                  |                           |   |                       |
|                                   |                                       |                           |                    |               |                         |                   |                 |            |  |                  |                           |  | S.<br>CHATTAR<br>AJ   |

For, INDICATIVE CONSULTANT INDIA



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Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228


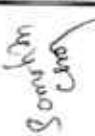
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e-mail : jayantaskar67@gmail.com/  
indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 7

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Sl. No | Location             | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) |      | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|----------------------|------------------------|--------------------|---------------|-------------------------|-------------------|------|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
|        |                      |                        |                    |               |                         | 83.1              | 81.2 |                 |            |   |                  |                           |   |                       |
| 1.     | BAKING RC SHOP FLOOR | Noise level Monitoring | 09.02.2023         | 02:00 PM      | Annexure-I              | 82.4              | 83.1 | 82.1            | 8 hrs.     | Exposure Limit for Industries (8 hrs.) = 90 dB(A) | Annexure-I       | 3                         |  | T. SUTRADHAR          |
|        |                      |                        |                    |               |                         | 82.2              | 81.6 |                 |            |   |                  |                           |  | S. CHATTARAJ          |

Distance from the Machine : 3.0 M

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Form No. - 30



Table No. - 8

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location                        | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|---------------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| 1.     | BAKING RH-14 SECTION SHOP FLOOR | Noise level Monitoring | 09.02.2023         | 01:00 PM      | Annexure- I             | 82.4<br>81.6<br>82.2<br>81.8<br>82.0<br>81.6<br>82.2<br>82.7<br>81.7<br>80.8 | 81.9            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADH AR         |
|        |                                 |                        |                    |               |                         |  |                 |            |   |                  |                           |  | S. CHATTAR AJ         |

For, INDICATIVE CONSULTANT INDIA



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indicativeconsultantindia@gmail.com

Form No. - 30



Table No. - 9

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location                | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|-------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| 1.     | BAKING RH-16 SHOP FLOOR | Noise level Monitoring | 09.02.2023         | 02:35 PM      | Annexure- I             | 82.4<br>81.6<br>82.3<br>82.0<br>81.9<br>82.4<br>83.0<br>81.8<br>82.4<br>82.6 | 82.2            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         | <br>T. SUTRADHAR | T. SUTRADHAR CHARYA   |
|        |                         |                        |                    |               |                         |  |                 |            |   |                  |                           | <br>S. CHATTARAJ | S. CHATTARAJ          |

For, INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 10

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**  
Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location                           | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit  | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|------------------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|--|------------------|---------------------------|---|-----------------------|
| 1.     | BAKING RH-24(0) SECTION SHOP FLOOR | Noise level Monitoring | 09.02.2023         | 03:05 PM      | Annexure- I             | 82.4<br>81.6<br>81.8<br>80.8<br>82.0<br>81.1<br>82.0<br>81.8<br>82.1<br>80.9 | 81.7            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs) = 90 dB(A) | Annexure- I      | 3                         | <br>T. SUTRADHAR | T. SUTRADHAR          |
|        |                                    |                        |                    |               |                         |  |                 |            |  |                  |                           | <br>S. CHATTARAJ | S. CHATTARAJ          |

For, INDICATIVE CONSULTANT INDIA



# INDICATIVE CONSULTANT INDIA

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e-mail : jayantaskar67@gmail.com/  
indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 11

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**  
Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Distance from the Machine : 3.0 M |                     |                        |                    |               |                         |                   |                 |            |   |                  |                           |   |                       |
|-----------------------------------|---------------------|------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| Sl. No                            | Location            | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
| 1.                                | BAKING RH - 24 (II) | Noise level Monitoring | 09.02.2023         | 04:10 PM      | Annexure- I             | 82.0              | 81.6            | 8 hrs.     | Exposure Limit for Industries workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADHA R         |
|                                   |                     |                        |                    |               |                         | 81.6              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 82.5              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 81.6              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 80.9              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 80.8              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 81.3              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 82.2              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 81.0              |                 |            |   |                  |                           |   |                       |
|                                   |                     |                        |                    |               |                         | 81.9              |                 |            |   |                  |                           |   |                       |

Distance from the Machine : 3.0 M

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indicativeconsultantindia@gmail.com

Form No. - 30

Table No. - 12

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location           | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|--------|--------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
| 1.     | BAKING TUNNEL KILN | Noise level Monitoring | 09.02.2023         | 03:40 PM      | Annexure- I             | 82.3<br>82.4<br>81.5<br>82.8<br>81.9<br>81.4<br>82.3<br>82.0<br>82.6<br>82.5 | 82.2            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         | T. SUTRADHAR                      | T. SUTRADHAR          |
|        |                    |                        |                    |               |                         |  |                 |            |   |                  |                           | S. CHATTARAJ                      | S. CHATTARAJ          |

For, INDICATIVE CONSULTANT INDIA



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indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 13

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| SL No | Location                          | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|-------|-----------------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
| 1.    | PITCH IMPREG NATION UNIT # 2 SHOP | Noise level Monitoring | 09.02.2023         | 04:40 PM      | Annexure- I             | 83.5<br>81.8<br>82.4<br>82.9<br>82.3<br>83.4<br>82.5<br>83.0<br>82.8<br>81.9 | 82.7            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         | Tapan Kumar SUTRADHAR             | T. SUTRADHAR          |
|       |                                   |                        |                    |               |                         |  |                 |            |   |                  |                           | Santanu CHATTA                    | S. CHATTA             |

Distance from the Machine : 3.0 M

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indicativeconsultantindia@gmail.com



Form No. - 30 Table No. - 14

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location                         | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|----------------------------------|------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| 1.     | PITCH IMPREGNATION UNIT # 3 SHOP | Noise level Monitoring | 09.02.2023         | 05:10 PM      | Annexure- I             | 82.4              | 82.2            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADHAR          |
|        |                                  |                        |                    |               |                         | 83.0              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 82.2              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 81.9              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 82.2              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 81.6              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 82.1              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 82.4              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 81.8              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         | 82.0              |                 |            |   |                  |                           |   |                       |
|        |                                  |                        |                    |               |                         |                   |                 |            |   |                  |                           |  | S. CHAITTA RAJ        |

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Form No. - 30



Table No. - 15

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

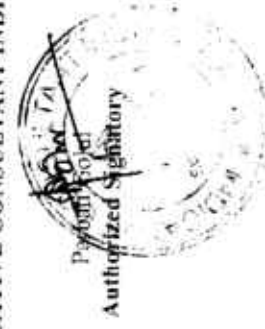
Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl No | Location                         | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|-------|----------------------------------|------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| 1.    | PITCH IMPREG NATION UNIT #4 SHOP | Noise level Monitoring | 10.02.2023         | 09:35 AM      | Annexure- I             | 81.1              | 81.7            | 8 hrs.     | Exposure Limit for Industries / workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADHAR          |
|       |                                  |                        |                    |               |                         | 83.0              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 80.6              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 81.4              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 81.6              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 82.4              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 81.9              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 82.0              |                 |            |   |                  |                           |   |                       |
|       |                                  |                        |                    |               |                         | 81.6              |                 |            |   |                  |                           |  | S. CHATTARAJ          |
|       |                                  |                        |                    |               |                         | 81.8              |                 |            |   |                  |                           |   |                       |

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Form No. - 30

Table No. - 16

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: **Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal**

Height from the floor : 1.5 M

| Sl. No | Location     | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) |      | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|--------|--------------|------------------------|--------------------|---------------|-------------------------|-------------------|------|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
|        |              |                        |                    |               |                         | 81.9              | 82.4 |                 |            |   |                  |                           |                                   |                       |
| 1.     | LWG # 3 SHOP | Noise level Monitoring | 10.02.2023         | 10:10 AM      | Annexure- I             | 82.6              | 82.9 | 82.0            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         | Tapan Kumar<br>G. Bhowmik         | T. SUTRADHAR          |
|        |              |                        |                    |               |                         | 81.6              | 82.0 |                 |            |   |                  |                           | Sourav Chatterjee                 | S. CHATTARAJ          |
|        |              |                        |                    |               |                         | 82.6              | 81.1 |                 |            |   |                  |                           |                                   |                       |
|        |              |                        |                    |               |                         | 82.3              |      |                 |            |   |                  |                           |                                   |                       |

Distance from the Machine : 3.0 M

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indicativeconsultantindia@gmail.com

Form No. - 30

Table No. - 17

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Sl. No | Location    | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) |      | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|--------|-------------|------------------------|--------------------|---------------|-------------------------|-------------------|------|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
|        |             |                        |                    |               |                         | 83.6              | 82.6 |                 |            |   |                  |                           |                                   |                       |
| 1.     | LWG #4 SHOP | Noise level Monitoring | 10.02.2023         | 10:40 AM      | Annexure-I              | 82.0              | 81.9 | 82.6            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure-I       | 3                         | Tapan Kumar SUTRADHAR             | T. SUTRADHAR          |
|        |             |                        |                    |               |                         | 81.7              | 82.9 |                 |            |   |                  |                           | Santhi Chatterjee                 | S. CHATTERJEE         |

Distance from the Machine : 3.0 M

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P 17/25



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Form No. - 30

Table No. - 18

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Sl. No | Location                             | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample          | Name in block letters        |
|--------|--------------------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|--|------------------------------|
| 1.     | LWG UNIT #4 (AUTO DUST BAGGING AREA) | Noise level Monitoring | 10.02.2023         | 11:10 AM      | Annexure- I             | 79.4<br>81.2<br>78.8<br>80.7<br>77.8<br>79.0<br>81.9<br>82.0<br>79.4<br>78.1 | 79.8            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         | <i>Tapan Kumar</i><br><i>S. Chatterjee</i> | T. SUTRADHAR<br>S. CHATTARAJ |

Distance from the Machine : 3.0 M

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Form No. - 30

Table No. - 19

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Distance from the Machine : 3.0 M |              |                        |                    |               |                         |                   |                 |            |   |                  |                           |   |                       |
|-----------------------------------|--------------|------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|---|------------------|---------------------------|---|-----------------------|
| Sl. No                            | Location     | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
| 1.                                | LWG # 5 SHOP | Noise level Monitoring | 10.02.2023         | 11:50 AM      | Annexure- I             | 81.6              | 81.6            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |  | T. SUTRADH AR         |
|                                   |              |                        |                    |               |                         | 82.4              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 82.9              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 82.0              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 81.1              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 80.9              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 80.6              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 80.9              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 81.9              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         | 82.0              |                 |            |   |                  |                           |   |                       |
|                                   |              |                        |                    |               |                         |                   |                 |            |   |                  |                           |  | S. CHATTAR AJ         |

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Form No. - 30 Table No. - 20

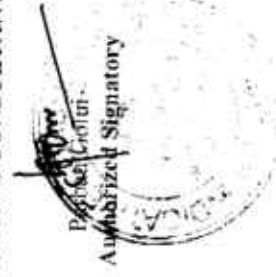
Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Distance from the Machine : 3.0 M |                                    |                           |                    |               |                         |                   |                 |            |  |                  |                           |   |                       |
|-----------------------------------|------------------------------------|---------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|--|------------------|---------------------------|---|-----------------------|
| SL No                             | Location                           | Parameter                 | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit  | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
| 1.                                | FINISHIN<br>G<br># 1 SHOP<br>FLOOR | Noise level<br>Monitoring | 10.02.2023         | 12:25 PM      | Annexure- I             | 82.0              | 82.0            | 8 hrs.     | Exposure<br>Limit for<br>Industrial<br>workers<br>(8 hrs ) =<br>90 dB(A) | Annexure-<br>I   | 3                         |  | T.<br>SUTRADH<br>AR   |
|                                   |                                    |                           |                    |               |                         | 81.4              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.9              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.1              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 83.0              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.4              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.6              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.0              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 81.9              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         | 82.0              |                 |            |  |                  |                           |   |                       |
|                                   |                                    |                           |                    |               |                         |                   |                 |            |  |                  |                           |  | S.<br>CHATTAR<br>AJ   |

For, INDICATIVE CONSULTANT INDIA

  
Authorized Signatory





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Form No. - 30

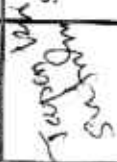

Table No. - 21

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| SL No | Location                             | Parameter                 | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit  | Reference Method | Number of Persons exposed   | Signature of person taking sample   | Name in block letters |
|-------|--------------------------------------|---------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|--|------------------|---|---|-----------------------|
| 1.    | FINISHIN<br>G<br>#2<br>SHOP<br>FLOOR | Noise level<br>Monitoring | 10.02.2023         | 01:05 PM      | Annexure-I              | 81.6              | 81.9            | 8 hrs.     | Exposure<br>Limit for<br>Industrial<br>workers<br>(8 hrs.) =<br>90 dB(A) | Annexure-I       | 3   |  | T.<br>SUTRADH<br>AR   |
|       |                                      |                           |                    |               |                         | 82.4              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 81.9              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 82.0              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 81.4              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 82.6              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 82.4              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 81.6              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 82.0              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         | 80.9              |                 |            |  |                  |   |   |                       |
|       |                                      |                           |                    |               |                         |                   |                 |            |  |                  |  | S.<br>CHATTAR<br>AJ   |                       |

Height from the floor : 1.5 M

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Form No. - 30 Table No. - 22

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl. No | Location  | Parameter                 | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A) | Average Reading | Total Time | Limit  | Reference Method | Number of Persons exposed | Signature of person taking sample   | Name in block letters |
|--------|---|---------------------------|--------------------|---------------|-------------------------|-------------------|-----------------|------------|--|------------------|---------------------------|---|-----------------------|
| 1.     | FINISHIN<br>G<br># 3 SHOP<br>FLOOR  | Noise level<br>Monitoring | 10.02.2023         | 01:50 PM      | Annexure- I             | 81.4              | 81.0            | 8 hrs.     | Exposure<br>Limit for<br>Industrial<br>workers<br>(8 hrs.) =<br>90 dB(A) | Annexure-<br>I   | 3                         |  | T.<br>SUTRADH<br>AR   |
|        |   |                           |                    |               |                         | 79.9              |                 |            |  |                  |                           |   |                       |
|        |   |                           |                    |               |                         | 80.8              |                 |            |  |                  |                           |   |                       |
|        |   |                           |                    |               |                         | 81.0              |                 |            |  |                  |                           |   |                       |
|        |   |                           |                    |               |                         | 79.9              |                 |            |  |                  |                           |   |                       |
|        |   |                           |                    |               |                         | 80.2              |                 |            |  |                  |                           |   |                       |
|        |   |                           |                    |               |                         | 81.1              |                 |            |  |                  |                           |   |                       |
|        |   |                           |                    |               |                         | 81.6              |                 |            |  |                  |                           |   |                       |
| 82.3   |  | S.<br>CHATTAR<br>AJ       |                    |               |                         |                   |                 |            |  |                  |                           |   |                       |
| 81.4   |   |                           |                    |               |                         |                   |                 |            |  |                  |                           |   |                       |

Distance from the Machine : 1.5 M

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Form No. - 30

Table No. - 23

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

| Sl. No | Location              | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters         |
|--------|-----------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-------------------------------|
| 1.     | GRAPHITE ACHESON SHOP | Noise level Monitoring | 10.02.2023         | 02:20 PM      | Annexure-I              | 79.6<br>80.1<br>82.1<br>79.9<br>78.8<br>79.1<br>78.4<br>79.9<br>80.0<br>82.2 | 80.0            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure-I       | 3                         | T. SUTRADHAR<br>S. CHATTERJEE     | T. SUTRADHAR<br>S. CHATTERJEE |

Distance from the Machine : 3.0 M

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HPL Link Road, Basudevpur, Khanjanchak  
Haldia; Purba Medinipur-721602  
Govt.Regd.No.-L-64871; MSME Reg. No.: WB-12-0000228

Ph- 03224-275765  
Mob. - 94340 17584  
e-mail : jayantiasarkar67@gmail.com/  
indicativeconsultantindia@gmail.com

Form No. - 30 Table No. - 24

Result of Analysis: **M/s. GRAPHITE INDIA LTD.,**

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Height from the floor : 1.5 M

Distance from the Machine : 3.0 M

| Sl No | Location                      | Parameter              | Date of Monitoring | Starting Time | Sampling Instrument Use | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters        |
|-------|-------------------------------|------------------------|--------------------|---------------|-------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|------------------------------|
| 1.    | GRAPHITE FINES SCREENING SHOP | Noise level Monitoring | 10.02.2023         | 02:55 PM      | Annexure-1              | 80.6<br>81.9<br>82.0<br>81.8<br>83.1<br>82.9<br>82.2<br>80.6<br>81.5<br>82.2 | 81.9            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure-1       | 3                         | Tarun Verma<br>Santosh Chatteraj  | T. SUTRADHAR<br>S. CHATTARAJ |

For, INDICATIVE CONSULTANT INDIA





# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak; Haldia, PurbaMedinipur-721 602


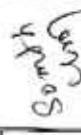
Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Table No. - 1

| Ambient Temperature                 | Dry Bulb | Wet Bulb |
|-------------------------------------|----------|----------|
| On 13.02.2023                       | 28.0°C   | 24.0°C   |
| Ambient Air flow - 108 m/min N to S |          |          |

Name of Department/Plant: EXTRUSION #1 MIXER FLOOR

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring          | Sampling Instrument Used | Volume of Work Place X 6                               | Volume of Air change/Hr | Velocity of Air                   | Dry/Wet bulb Temperature at work place | Limit  | Reference Method | Remarks  | Signature   | Name            |
|--------|--|-------------------------------|------------------------------------|--------------------------|--|-------------------------|-----------------------------------|--|--|------------------|----------|---|-----------------|
| 1.     | Inside Work Place                        | Volume of Air change          | 13.02.2023<br>02:05 PM to 04:00 PM | Annexure- I              | 1712.9 m <sup>3</sup> x 6<br>= 10,277.4 m <sup>3</sup> | 21870.22 m <sup>3</sup> | -                                 | -                                      | Vol. of Air change/hr > 6 x Vol. Of work place | Annexure- I      | Adequate |  | A. BHATTACHARYA |
| 2.     | Inside Work Place                        | Velocity of Air at work place |                                    |                          | -  | -                       | 30 m/min - at the entrance gate   | -                                      | 30 m/min at work place at 1.5 M height         |                  | Adequate |   |                 |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |                                    |                          | -  | -                       | 36 m/min - at middle of the plant | Dry Bulb 32.0°C<br>Wet Bulb 28.0°C     | Wet Bulb less than 30° C                       |                  | Adequate |  | S. CHATTAJI     |

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HPL Link Road, Basudevpur, Khanjanchak, Haldia, PurbaMedinipur-721 602


Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.

Address: Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Table No. - 2

| Ambient Temperature                 | Dry Bulb | Wet Bulb |
|-------------------------------------|----------|----------|
| On 13.02.2023                       | 27.0°C   | 24.0°C   |
| Ambient Air flow – 114 m/min N to S |          |          |

Name of Department/Plant: EXTRUSION #2 PRESS FLOOR

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring | Sampling Instrument Used | Volume of Work Place X 6  | Volume of Air change/Hr | Velocity of Air                   | Dry/Wet bulb Temperature at work place |                                    | Limit  | Reference Method | Remarks  | Signature   | Name             |
|--------|--|-------------------------------|---------------------------|--------------------------|---|-------------------------|-----------------------------------|--|------------------------------------|--|------------------|----------|---|------------------|
| 1.     | Inside Work Place                        | Volume of Air change          | 13.02.2023                | Annexure- 1              | $18048.6 \text{ m}^3 \times \frac{6}{6} = 1,08,291.6 \text{ m}^3$ | 825147.77 $\text{m}^3$  | -                                 | -                                      | -                                  | Vol. of Air change/hr > 6 x Vol. Of work place | Annexure- 1      | Adequate |  | A. BHATTA CHARYA |
| 2.     | Inside Work Place                        | Velocity of Air at work place | 10:15 AM to 12:15 PM      |                          | -   | -                       | 42 m/min – at middle of the plant | -                                      | -                                  | 30 m/min at work place at 1.5 M height         |                  | Adequate |   |                  |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |                           |                          | -   | -                       | -                                 | -                                      | Dry Bulb 26.0°C<br>Wet Bulb 23.0°C | Wet Bulb less than 30° C                       |                  | Adequate |   |                  |

For, INDICATIVE CONSULTANT INDIA





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HPL Link Road, Basudevpur, Khanjanchak; Haldia, PurbaMedinipur-721 602



Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Name of Department/Plant: BAKING RH - 16 SHOP FLOOR

Table No. - 3

| Ambient Temperature                  | Dry Bulb | Wet Bulb |
|--------------------------------------|----------|----------|
| On 09.02.2023                        | 31.0°C   | 27.0°C   |
| Ambient Air flow - 90 m/min NE to SW |          |          |

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring              | Sampling Instrument Used | Volume of Work Place X 6                                       | Volume of Air change/Hr  | Velocity of Air   | Dry/Wet bulb Temperature at work place | Limit  | Reference Method | Remarks                  | Signature   | Name             |          |  |               |
|--------|--|-------------------------------|--|--------------------------|--|--------------------------|---|--|--|------------------|--------------------------|---|------------------|----------|--|---------------|
| 1.     | Inside Work Place                        | Volume of Air change          | 09.02.2023<br><br>02:00 PM to 04:00 PM | Annexure- I              | 46832.32 m <sup>3</sup><br>X 6 =<br>2,80,993.92 m <sup>3</sup> | 353710.05 m <sup>3</sup> | -   | -                                      | Vol. of Air change/hr > 6 x Vol. Of work place | Annexure- I      | Adequate                 |  | A. BIATTA CHARYA |          |  |               |
| 2.     | Inside Work Place                        | Velocity of Air at work place |  |                          | -  | -                        | 48 m/min – at LHS of furnace<br>36 m/min – at RHS of furnace<br>42 m/min- at the middle | -                                      | 30 m/min at work place at 1.5 M height         |                  | Adequate                 |   | Adequate         | Adequate |  | S. CHATTA RAJ |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |  |                          | -  | -                        | -   | -                                      | Dry Bulb 34.0°C<br>Wet Bulb 29.0°C             |                  | Wet Bulb less than 30° C |   | Adequate         |          |  |               |

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HPL Link Road, Basudevpur, Khanjanchak; Haldia, PurbaMedinipur-721 602


Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Table No. - 4

| Ambient Temp.                      | Dry Bulb | Wet Bulb |
|------------------------------------|----------|----------|
| On 11.02.2023                      | 30.0°C   | 26.0°C   |
| Ambient Air flow - 84 m/min N to S |          |          |

Name of Department/Plant: PITCH IMPREGNATION UNIT # 3

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring              | Sampling Instrument Used | Volume of Work Place X 6                                     | Volume of Air change/Hr | Velocity of Air   | Dry/Wet bulb Temperature at work place | Limit  | Reference Method | Remarks                  | Signature   | Name            |          |          |
|--------|--|-------------------------------|--|--------------------------|--|-------------------------|---|--|--|------------------|--------------------------|---|-----------------|----------|----------|
| 1.     | Inside Work Place                        | Volume of Air change          | 11.02.2023<br><br>11:00 AM to 12:50 PM | Annexure- I              | 9,853.56 m <sup>3</sup><br>X 6 =<br>59,121.36 m <sup>3</sup> | 90425.17 m <sup>3</sup> | -   | -                                      | Vol. of Air change/hr > 6 x Vol. Of work place | Annexure- I      | Adequate                 |  | A. BHATTACHARYA |          |          |
| 2.     | Inside Work Place                        | Velocity of Air at work place |  |                          | -  | -                       | 48 m/min – at Entrance Gate<br>36 m/min – at Middle<br>42 m/min – at Back side Gate | -                                      | 30 m/min at work place at 1.5 M height         |                  | Adequate                 |   |                 | Adequate |          |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |  |                          | -  | -                       | -   | -                                      | Dry Bulb 32.0°C<br>Wet Bulb 28.0°C             |                  | Wet Bulb less than 30° C |   |                 | Adequate | Adequate |

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Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist – Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Name of Department/Plant: LWG # 3

Table No. - 5

| Ambient Temperature                | Dry Bulb | Wet Bulb |
|------------------------------------|----------|----------|
| On 10.02.2023                      | 28.0°C   | 24.0°C   |
| Ambient Air flow – 84 m/min N to S |          |          |

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring              | Sampling Instrument Used | Volume of Work Place X 6                              | Volume of Air change/Hr   | Velocity of Air  | Dry/Wet bulb Temperature at work place |  | Limit   | Reference Method | Remarks                  | Signature   | Name             |
|--------|--|-------------------------------|--|--------------------------|---|---------------------------|--|--|--|---|------------------|--------------------------|---|------------------|
| 1.     | Inside Work Place                        | Volume of Air change          | 10.02.2023<br><br>10:05 AM to 12:05 PM | Annexure- I              | 58176 m <sup>3</sup> x 6<br>= 3,49,056 m <sup>3</sup> | 1622025.14 m <sup>3</sup> | -  | -                                      | -                                      | Vol. of Air change/hr >6 x Vol. Of work place | Annexure- I      | Adequate                 |  | A. BIATTA CHARYA |
| 2.     | Inside Work Place                        | Velocity of Air at work place |  |                          | -   | -                         | 42 m/min – at entrance of 1 <sup>st</sup> Gate<br>42 m/min – at entrance of 2 <sup>nd</sup> Gate<br>36 m/min - at middle | -                                      | 30 m/min at work place at 1.5 M height | Adequate                                      |                  | Adequate                 |   |                  |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |  |                          | -   | -                         | -  | -                                      | -                                      | Dry Bulb 33.0°C<br>Wet Bulb 29.0°C            |                  | Wet Bulb less than 30° C |   |                  |

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Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Name of Department/Plant: FINISHING # 1

Table No. - 6

| Ambient Temperature                  | Dry Bulb | Wet Bulb |
|--------------------------------------|----------|----------|
| On 09.02.2023                        | 29.0°C   | 26.0°C   |
| Ambient Air flow - 84 m/min NE to SW |          |          |

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring | Sampling Instrument Used | Volume of Work Place X 6                                   | Volume of Air change/Hr  | Velocity of Air   | Dry/Wet bulb Temp. at work place   | Limit  | Reference Method | Remarks  | Signature   | Name             |
|--------|--|-------------------------------|---------------------------|--------------------------|--|--------------------------|---|------------------------------------|--|------------------|----------|---|------------------|
| 1.     | Inside Work Place                        | Volume of Air change          | 09.02.2023                | Annexure-1               | 12522.4 m <sup>3</sup><br>x 6 =<br>75,134.4 m <sup>3</sup> | 162045.11 m <sup>3</sup> | -   | -                                  | Vol. of Air change/hr > 6 x Vol. Of work place | Annexure-1       | Adequate |  | A. BIATTA CHARYA |
| 2.     | Inside Work Place                        | Velocity of Air at work place | 10:20 AM to 12:20 PM      |                          | -  | -                        | 30 m/min - at Gate<br>36 m/min - at Middle of the Plant | -                                  | 30 m/min at work place at 1.5 M height         |                  | Adequate |  | S. CHATTA RAJ    |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |                           |                          | -  | -                        | -   | Dry Bulb 27.0°C<br>Wet Bulb 24.0°C | Wet Bulb less than 30° C                       |                  | Adequate |   |                  |

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# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak; Haldia, PurbaMedinipur-721 602



Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Table No. - 7

|                                      |                    |                    |
|--------------------------------------|--------------------|--------------------|
| Ambient Temperature<br>On 10.02.2023 | Dry Bulb<br>30.0°C | Wet Bulb<br>27.0°C |
| Ambient Air flow - 72 m/min N to S   |                    |                    |

Name of Department/Plant: FINISHING # 2

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring | Sampling Instrument Used | Volume of Work Place X 6                                       | Volume of Air change/Hr  | Velocity of Air  | Dry/Wet bulb Temp. at work place   | Limit  | Reference Method | Remarks  | Signature  | Name            |
|--------|--|-------------------------------|---------------------------|--------------------------|--|--------------------------|--|------------------------------------|--|------------------|----------|--|-----------------|
| 1.     | Inside Work Place                        | Volume of Air change          | 10.02.2023                |                          | 24597.54 m <sup>3</sup><br>X 6 =<br>1,47,585.24 m <sup>3</sup> | 172145.11 m <sup>3</sup> | -  | -                                  | Vol. of Air change/hr > 6 x Vol. Of work place |                  | Adequate |   | A. BHATTACHARYA |
| 2.     | Inside Work Place                        | Velocity of Air at work place | 02:05 PM to 04:05 PM      | Annexure-I               | -  | -                        | 30 m/min - at entrance of 1 <sup>st</sup> Gate<br>42 m/min - at entrance of 2 <sup>nd</sup> Gate<br>48 m/min - at the middle | -                                  | 30 m/min at work place at 1.5 M height         | Annexure-I       | Adequate |  | S. CHATTAJ      |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |                           |                          | -  | -                        | -  | Dry Bulb 29.0°C<br>Wet Bulb 26.0°C | Wet Bulb less than 30° C                       |                  | Adequate |  |                 |

For, INDICATIVE CONSULTANT INDIA



# INDICATIVE CONSULTANT INDIA

HPL Link Road, Basudevpur, Khanjanchak, Haldia, PurbaMedinipur-721 602



Register Containing Particulars of Testing of Ventilation Condition of M/s. GRAPHITE INDIA LTD.,

Address: Dist - Paschim Bardhaman, Durgapur, PIN -713211, West Bengal

Name of Department/Plant: R.H. # 24 (II)

Table No. - 8

| Ambient Temperature                 | Dry Bulb | Wet Bulb |
|-------------------------------------|----------|----------|
| On 14.02.2023                       | 27.0°C   | 23.0°C   |
| Ambient Air flow - 108 m/min N to S |          |          |

| Sl. No | Location                                 | Parameter                     | Date & Time of Monitoring          | Sampling Instrument Used | Volume of Work Place X 6  | Volume of Air change/Hr  | Velocity of Air   | Dry/Wet bulb Temperature at work place | Limit  | Reference Method | Remarks  | Signature   | Name            |
|--------|--|-------------------------------|------------------------------------|--------------------------|---|--------------------------|---|--|--|------------------|--|---|-----------------|
| 1.     | Inside Work Place                        | Volume of Air change          |                                    |                          | 98.344.81 m <sup>3</sup><br>X 6 =<br>5,90,068.86 m <sup>3</sup> | 756625.11 m <sup>3</sup> | -   | -                                      | Vol. of Air change/hr > 6 x Vol. Of work place |                  | Adequate   |    | A. BHATTACHARYA |
| 2.     | Inside Work Place                        | Velocity of Air at work place | 14.02.2023<br>10:00 AM to 11:50 AM | Annexure- I              | -   | -                        | 36 m/min - East Side of the Furnace<br>42 m/min - West Side of the Furnace<br>42 m/min - East Side of the Shed<br>36 m/min - West Side of the Shed<br>30 m/min - Middle of the Shed | -                                      | 30 m/min at work place at 1.5 M height         | Annexure- I      | Adequate<br>Adequate<br>Adequate<br>Adequate<br>Adequate<br>Adequate |  | S. CHATTERJEE   |
| 3.     | Inside Work Place At middle of the plant | Temperature at work place     |                                    |                          | -   | -                        | -   | Dry Bulb 33.0°C<br>Wet Bulb 29.0°C     | Wet Bulb less than 30° C                       |                  | Adequate   |   |                 |

For. INDICATIVE CONSULTANT INDIA



Authorized Signatory



## ANNEXURE - 1

1. **RAW MATERIAL** - *Calcined Petroleum Coke (CPC), Binder Pitch, Extrusion Oil*

2. **PRODUCT** - *Graphite Electrode & Nipple*

3. **BY PRODUCT** - *Graphite Fines*

### **4. METHOD OF ANALYSIS:**

- i) *Respirable Particulate Matter (RPM) :  
Method of air sampling and analysis as per IS:5182(Part - IV) 1999.( RA 2019)*
- ii) *Suspended Particulate Matter (SPM)  
Method of air sampling and analysis as per IS:5182(Part - IV) 1999.(RA 2019)*
- iii) *Sulphur Dioxide (SO<sub>2</sub>) : As per IS:5182 (Part - II): 2001 (RA 2017)*
- iv) *Oxides of Nitrogen (NO<sub>2</sub>) : As per IS:5182 (Part - VI): 2006 (RA 2017)*
- v) *By Digital Lux Meter measurement was done as per IS :3646(Part - 1): 1992 (RA 2018)*
- vi) *Code of practice for industrial ventilation as per IS 3103: 1975 (RA 2018)*
- vii) *Code of practice for natural ventilation of residential buildings as per IS 3362: 1977 (RA 2018)*
- viii) *Noise level measurement was done as per IS 4758:1968 (RA 2017)*
- ix) *Factories Act, 1948*

### **5. INSTRUMENTS USED:**

The following standard instruments utilized during the entire survey period and all the instruments are calibrated.

- i) *Respirable Dust Sampler with Gaseous Attachment*
- ii) *UV-Vis Double Beam Spectrophotometer.*
- iii) *Electronic Digital Balance*
- iv) *Hot Air Oven*
- v) *Desiccator*
- vi) *Digital Lux Meter*
- vii) *Digital Noise Level Meter*
- viii) *Hygrometer / Dry Bulb- Wet Bulb Temperature Indicator Meter*
- ix) *Digital Anemometer*
- x) *Measuring Tape*





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |   |                                     |
|--|---|---|-------------------------------------|
| Date: 13.02.2023                               | : | Report No: ICI/HL/W/RN-212/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-212           |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 11:00 AM            |
|  |   |   | Analysis Start Date : 04.02.2023    |
|  |   |   | Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : | EFFLUENT  |                                     |
| Sample Condition                               | : | In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : | IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : | COLLECTED TREATED WATER FROM COMMON WASTE WATER RECYCLING UNIT OF OUTFALL LWG # 4 & OLD WEIGH BRIDGE                                    |                                     |
| Material/ Test Specification                   | : | Schedule – VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters                                      | Unit | Result | Schedule – VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C )                                   | ---  | 7.35   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 29.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D               |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 46.7   | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 8.17   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,   |
| 5.      | Oil and Grease                                  | mg/L | 2.7    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,              |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
  5. The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  6. The reproduction of the report except in full is invalid without written approval of the laboratory
  7. Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  8. Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

Page 1 of 1

-----End of Report-----





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : [indicativeconsultantindia@gmail.com](mailto:indicativeconsultantindia@gmail.com) / [indicativeconsultantindia.kol@gmail.com](mailto:indicativeconsultantindia.kol@gmail.com)

## TEST REPORT

|  |   |   |   |
|--|---|---|---|
| Date: 13.02.2023                               | : | Report No: ICI/HL/W/RN-213/2023   | Format No: ICI/FM/H/67  |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-213   |
| Address  | : | Durgapur - 713211, Dist. - PaschimBardhaman, West Bengal,   | Sampling Date : 02.02.2023  |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No. - +91-9332039296  | Sampling Time : 11:15 AM<br>Analysis Start Date : 04.02.2023<br>Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |   |
| #Sample Description                            | : | EFFLUENT  |   |
| Sample Condition                               | : | In Plastic Bottle & Glass Bottle  |   |
| Sampling Method                                | : | IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |   |
| #Location                                      | : | COLLECTED UNTREATED WATER FROM COMMON WASTE WATER RECYCLING UNIT OF OUTFALL LWG # 4 & OLD WEIGH BRIDGE                                  |   |
| Material/ Test Specification                   | : | Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |   |

| Sl. No. | Parameters                                      | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|---|------|--------|--|----------------|---|
|         |   |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C)                                    | ---  | 6.86   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>7</sup> B |
| 2.      | Total Suspended Solid (TSS)                     | mg/L | 51.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D               |
| 3.      | Chemical Oxygen Demand (COD)                    | mg/L | 112.1  | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C) | mg/L | 20.0   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,   |
| 5.      | Oil and Grease                                  | mg/L | 4.2    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,              |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbati Golui  
(Quality Manager)  
Signatory Authority  
Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India
  - Sample submitted and identified by customer as: N.A.
  - Test results shown in this test report relate only to the sample (s) only
  - The test results referred in test report are based on observations & measurements under the stated environmental conditions.
  - The reproduction of the report except in full is invalid without written approval of the laboratory
  - Once issued, the test report/certificate is in public domain and laboratory is not responsible for the authenticity of photocopied test report
  - Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  - Location of Testing: Haldia Laboratory

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-----End of Report-----





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL :indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |                                     |
|--|---|-------------------------------------|
| Date: 13.02.2023                               | : Report No: ICI/HL/W/RN-210/2023                                 | Format No: ICI/FM/H/67              |
| Customer Name                                  | : M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-210           |
| Address  | : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,      | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | : Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296                   | Sampling Time : 11:45 AM            |
|  |   | Analysis Start Date : 04.02.2023    |
|  |   | Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : DOM/4500287592 Dtd. 05.01.2023                                  |                                     |
| #Sample Description                            | : EFFLUENT  |                                     |
| Sample Condition                               | : In Plastic Bottle & Glass Bottle                                |                                     |
| Sampling Method                                | : IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017 |                                     |
| #Location                                      | : EXTRUSION # 2 ETP INLET   |                                     |

| Sl. No. | Parameters   | Unit | Result | Method Followed   |
|---------|--|------|--------|---|
| 1.      | pH (at 20°C )  | ---  | 6.63   | IS:3025(Part-11):1983 : RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>+</sup> B              |
| 2.      | Total Suspended Solid (TSS)                              | mg/L | 144.0  | IS:3025 (Part-17): 1984 : RA 2017, APHA 23 <sup>rd</sup> Edition 2540D                            |
| 3.      | Chemical Oxygen Demand (COD)                             | mg/L | 934.4  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C)          | mg/L | 505.0  | IS:3025 (Part-44): 1993 : RA 2019,  |
| 5.      | Oil and Grease   | mg/L | 8.1    | IS:3025 (Part-39): 1991 : RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,                           |
| 6.      | Phenolic Compounds (as C <sub>6</sub> H <sub>5</sub> OH) | mg/L | 1.31   | APHA 23 <sup>rd</sup> Edition 5530 C  |
| 7.      | Sulfate (as SO <sub>4</sub> )                            | mg/L | 42.5   | IS:3025(Part-24):1986: RA 2019 APHA 23 <sup>rd</sup> Edition 4500 SO <sub>4</sub> <sup>2-</sup> E |

Prepared By: N. Mondal

Checked By: A. Patra

For, INDICATIVE CONSULTANT INDIA

Parbati Golui  
(Quality Manager)  
Signatory Authority

Parbati Golui  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
- # Information provided by customer
  - Sample is drawn by M/s. Indicative Consultant India
  - Sample submitted and identified by customer as: N.A.
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  - Location of Testing: Haldia Laboratory

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# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



EMAIL : indicativeconsultantindia@gmail.com / indicativeconsultantindia.kol@gmail.com

## TEST REPORT

|  |   |   |                                     |
|--|---|---|-------------------------------------|
| Date: 13.02.2023                               | : | Report No: ICI/HL/W/RN-211/2023   | Format No: ICI/FM/H/67              |
| Customer Name                                  | : | M/s. GRAPHITE INDIA LTD.  | Sample ID No : 2023/W-211           |
| Address  | : | Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal,  | Sampling Date : 02.02.2023          |
| #Customer Representative Name & Contact Number | : | Mr. C. P. Dhanuka<br>Mob. No.- +91-9332039296   | Sampling Time : 12:05 PM            |
|  |   |   | Analysis Start Date : 04.02.2023    |
|  |   |   | Analysis complete Date : 11.02.2023 |
| #Work Order No.                                | : | DOM/4500287592 Dtd. 05.01.2023  |                                     |
| #Sample Description                            | : | EFFLUENT  |                                     |
| Sample Condition                               | : | In Plastic Bottle & Glass Bottle  |                                     |
| Sampling Method                                | : | IS:3025 (Part I): 1987 (RA 2019), APHA 23 <sup>rd</sup> ed 2017   |                                     |
| #Location                                      | : | EXTRUSION # 2 ETP OUTLET  |                                     |
| Material/ Test Specification                   | : | Schedule - VI: General Standards for Discharge of Environmental Pollutants: Part A: Effluents; The Environment (Protection) Rules, 1986 |                                     |

| Sl. No. | Parameters   | Unit | Result | Schedule - VI: General Standards for Discharge of Environmental Pollutants Part A: Effluents** |                | Method Followed   |
|---------|--|------|--------|--|----------------|---|
|         |  |      |        | Inland Surface Water   | Public Sewers  |   |
| 1.      | pH (at 20°C)   | ---  | 6.93   | 5.5-9.0  | 5.5-9.0        | IS:3025(Part-11):1983: RA 2017, APHA 23 <sup>rd</sup> Edition 4500-H <sup>1</sup> B               |
| 2.      | Total Suspended Solid (TSS)                              | mg/L | 49.0   | 100 mg/L (max)   | 600 mg/L (max) | IS:3025 (Part-17): 1984: RA 2017, APHA 23 <sup>rd</sup> Edition 2540D                             |
| 3.      | Chemical Oxygen Demand (COD)                             | mg/L | 102.8  | 250 mg/L (max)   | Not Specified  | APHA 23 <sup>rd</sup> Edition 5220B   |
| 4.      | Bio-Chemical Oxygen Demand (for 3 days at 27°C)          | mg/L | 19.0   | 30 mg/L (max)  | 350 mg/L (max) | IS:3025 (Part-44): 1993: RA 2019,   |
| 5.      | Oil and Grease   | mg/L | 4.3    | 10 mg/L (max)  | 20 mg/L (max)  | IS:3025 (Part-39): 1991: RA 2019, APHA 23 <sup>rd</sup> Edition 5520B,                            |
| 6.      | Phenolic Compounds (as C <sub>6</sub> H <sub>5</sub> OH) | mg/L | 44.0   | 1 mg/L (max)   | 5 mg/L (max)   | APHA 23 <sup>rd</sup> Edition 5530 C  |
| 7.      | Sulfate (as SO <sub>4</sub> )                            | mg/L | 0.21   | Not Specified  | Not Specified  | IS 3025(Part-24):1986: RA 2019 APHA 23 <sup>rd</sup> Edition 4500 SO <sub>4</sub> <sup>2-</sup> E |

\*\*The Environment (Protection) Rules, 1986

For, INDICATIVE CONSULTANT INDIA

Prepared By: N. Mondal

Checked By: A. Patra

Parbat Gohil  
(Quality Manager)

Signatory Authority  
Parbat Gohil  
Quality Manager  
INDICATIVE CONSULTANT INDIA

Test Witnessed By: Nil (Sampling was done in front of customer representatives)  
Estimated Uncertainty: Not Required

- Note :
1. # Information provided by customer
  2. Sample is drawn by M/s. Indicative Consultant India
  3. Sample submitted and identified by customer as: N.A.
  4. Test results shown in this test report relate only to the sample (s) only
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  8. Retention period of tested samples (Water) is 10 days from the date of issue of test report unless otherwise specified.
  9. Location of Testing: Haldia Laboratory

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-----End of Report-----





## TAR SAMPLE ANALYSIS REPORT

- Customer Name : M/s. GRAPHITE INDIA LTD.
- Address : Durgapur - 713211, Dist. - Paschim Bardhaman, West Bengal.
- Date of Sampling : In between 01.02.2023 to 06.02.2023, 09.02.2023, 10.02.2023, 13.02.2023 & 14.02.2023
- Report No. : -
- Analysis Completed on : 21.02.2023
- Reporting Date : 22.02.2023
- Sampling & Test Method : CPCB, Emission Regulation (Part III), Gas Chromatographic method.

### A. RESULT OF SAMPLING

| Sl. No. | Stack attached to   | Date of Sampling | Parameter                    | Unit                  | Result |
|---------|---|------------------|------------------------------|-----------------------|--------|
| 1.      | Mixture Fume Extractor (North) (Extrusion # 1 Dept)           | 03.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 2.      | Mixture Fume Extractor (South) (Extrusion # 1 Dept)           | 03.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 3.      | Cooler North (Extrusion # 1 Dept)                             | 03.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 4.      | Fume Extractor (West side) weigh floor (Extrusion # 1 Dept)   | 03.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 5.      | Baking Furnace (Fee. 1 to 5 side)                             | 09.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 6.      | Baking Furnace (Fee. 6 to 10 Side)                            | 09.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 7.      | Ried Hammer Furnace (Baking Furnace)(14 SECTION)              | 13.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 8.      | Ried Hammer Furnace (Baking Furnace)(RH 16 & RH 24-1 SECTION) | 13.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 9.      | P.I. UNIT 2 (THERMOPACK STACK)                                | 09.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 10.     | P.I. UNIT 2 (HGG STACK)                                       | 09.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 11.     | Boiler 2.0 Ton/Hr. Running                                    | 10.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 12.     | Tunnel Kiln - 1 (Re-baking Furnace)                           | 06.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |





# INDICATIVE CONSULTANT INDIA



(GOVT. REGISTERED TEST HOUSE)



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| Sl. No. | Stack attached to                             | Date of Sampling | Parameter                    | Unit                  | Result |
|---------|---|------------------|------------------------------|-----------------------|--------|
| 13.     | P.I. Unit – 3 (HGG Stack)                     | 10.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 14.     | P.I. Unit – 3 (Thermo pack Stack)             | 10.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 15.     | Extrusion – 2 Department Thermic Fluid Heater | 01.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 16.     | Extrusion - 2 IRIH (Trema) Scrubber System    | 02.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 17.     | RH – 24 (II) Furnace                          | 04.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 18.     | P.I. Unit - 4 Thermo pack Stack               | 14.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |
| 19.     | P.I. Unit - 4 Pre Heater                      | 14.02.2023       | Benzene Extractable Coal Tar | (mg/Nm <sup>3</sup> ) | N.D.   |

...End of Report...

For, INDICATIVE CONSULTANT INDIA  
**Parbati Goli**  
Quality Manager  
INDICATIVE CONSULTANT INDIA  
(Quality Manager)  
Signatory Authority

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# STATEMENT OF STACK EMISSION DETAILS FOR THE YEAR FEBRUARY-2023

M/s. Graphite India Ltd.

Date of Sampling : 02.11.2022 to 14.11.2022

| Sl. No. | Stack Attached to   | Stack No. | Fuel (Type & Quantity) | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C                     | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> mg/NM <sup>3</sup> | Nox mg/NM <sup>3</sup> | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|---------|---|-----------|------------------------|----------------|-------------------------|--------------------------------------|----------------------------------|-------------------------|-----------------------|------------------------------------|------------------------|---------------------|----------------|-------------------------|---|
| 1       | Mixture Fume Extractor (North) (Extrusion #1 Dept)          | 1         | Electricity            | 720            | 30000                   | 26000                                | 30                               | 18970.49                | 24.0                  | -                                  | -                      | -                   | 13.23          | N.A.                    | Nil   |
| 2       | Mixture Fume Extractor (South) (Extrusion#1 Dept)           | 2         | Electricity            | 406x406        | 30000                   | 16000                                | 27                               | 9153.30                 | 23.0                  | -                                  | -                      | -                   | 15.61          | N.A.                    | Nil   |
| 3       | Cooler North (Extrusion#1 Dept)                             | 3         | Electricity            | 550            | 30000                   | 15000                                | 29                               | 16019.13                | 20.00                 | -                                  | -                      | -                   | 19.08          | N.A.                    | Nil   |
| 4       | Cooler South (Extrusion#1 Dept)                             | 4         | Electricity            |                |                         |                                      | Production Unit Not In Operation |                         |                       |                                    |                        |                     |                | N.A.                    | Nil   |
| 5       | Fume Extractor (West side) weigh floor (Extrusion#1 Dept)   | 5         | Electricity            | 780            | 30000                   | 26000                                | 27                               | 26719.85                | 27.0                  | -                                  | -                      | -                   | 15.72          | N.A.                    | Nil   |
| 6       | Raymond Mill Dust Collector (Extrusion#1 Dept)              | 6         | Electricity            | 300x300        | 7000                    | 1600                                 | 29                               | 4157.08                 | 35.0                  | -                                  | -                      | -                   | 13.08          | N.A.                    | Bag Filter  |
| 7       | Scrap System Dust Collector (Extrusion#1 Dept)              | 7         | Electricity            | 600            | 7100                    | 5600                                 | 30                               | 10270.29                | 43.0                  | -                                  | -                      | -                   | 10.32          | N.A.                    | Bag Filter  |
| 8       | Main Dust Collector (Extrusion#1 Dept)                      | 8         | Electricity            | 700            | 22000                   | 15000                                | 29                               | 10437.43                | 61.0                  | -                                  | -                      | -                   | 7.68           | N.A.                    | Bag Filter  |
| 9       | Baking Milling Dust Collector                               | 9         | Electricity            | 760            | 10000                   | 4660                                 | 31                               | 19381.17                | 55.0                  | -                                  | -                      | -                   | 12.19          | N.A.                    | Bag Filter  |
| 10      | Baking Furnace (Fee. 1 to 5 side)                           | 10        | CBM                    | 1560           | 30000                   | 9650                                 | 174                              | 63853.08                | 63.0                  | 70.63                              | 70.15                  | 3.2                 | 14.27          | N.A.                    | Incinerator   |
| 11      | Baking Furnace (Fee. 6 to 10 side)                          | 11        | CBM                    | 1560           | 30000                   | 9650                                 | 162                              | 58839.71                | 66.0                  | 50.44                              | 77.8                   | 3.6                 | 12.80          | N.A.                    | Incinerator   |
| 12      | Ried Hammer Furnace (Baking Furnace) (14 SECTION)           | 12        | CBM                    | 800            | 30000                   | 10500                                | 84                               | 12255.64                | 59.0                  | 60.54                              | 63.27                  | 3.2                 | 8.28           | N.A.                    | E.S.P   |
| 13      | Ried Hammer Furnace (Baking Furnace)(RH16 & RH24-I SECTION) | 13        | CBM                    | 1800           | 45000                   | 33000                                | 76                               | 109442.01               | 61.0                  | 70.63                              | 59.80                  | 3.4                 | 14.27          | N.A.                    | E.S.P   |
| 14      | P.I. UNIT- 2 (THERMOPACK STACK)                             | 16        | CBM                    | 400            | 30000                   | 28000                                | 99                               | 2868.84                 | 61.0                  | 60.54                              | 68.31                  | 3.2                 | 8.12           | N.A.                    | Nil   |
| 15      | P.I. UNIT- 2 (HGG STACK)                                    | 17        | CBM                    | 400            | 30000                   | 28000                                | 65                               | 4390.47                 | 52.0                  | 50.45                              | 73.11                  | 3.4                 | 11.29          | N.A.                    | Water spray Cooling Chamber                         |
| 16      | LWG # 3(MILLING)  | 18        | Electricity            | 650            | 10670                   | 6700                                 | Production Unit Not In Operation |                         |                       |                                    |                        |                     |                | N.A.                    | Bag Filter  |
| 17      | Finishing Dust Collector (North) (Unit 1)                   | 19        | Electricity            | 700            | 13000                   | 4200                                 | 30                               | 12256.02                | 52.0                  | -                                  | -                      | -                   | 9.06           | N.A.                    | Bag Filter  |



| Sl. No. | Stack Attached to                                     | Stack No. | Fuel (Type & Quantity)           | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO2    | Nox mg/NM3 | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|---------|---|-----------|----------------------------------|----------------|-------------------------|--------------------------------------|--------------|-------------------------|-----------------------|--------|------------|---------------------|----------------|-------------------------|---|
| 18      | Finishing Dust Collector (Unit 2)                     | 20        | Electricity                      | 900            | 15000                   | 11000                                | 31           | 38852.32                | 64.0                  | -      | -          | -                   | 17.43          | N.A.                    | Bag Filter  |
| 19      | FINE SCREENING DUST COLLECTOR                         | 21        | Electricity                      | 560            | 9750                    | 6700                                 | 29           | 6361.52                 | 41.0                  | -      | -          | -                   | 7.33           | N.A.                    | Bag Filter  |
| 20      | Boiler (1.5 Ton/ 2Ton) 2 Ton Running                  | 22        | CBM (86 m <sup>3</sup> /Hr.)     | 280            | 29290                   | 13500                                | 116          | 1702.41                 | 75.0                  | 121.07 | 90.79      | 3.2                 | 10.25          | N.A.                    | Nil   |
| 21      | Tunnel Kiln – 1 (Re-baking Furnace)                   | 23        | CBM (140 Kg./Hr.)                | 730            | 30000                   | 18000                                | 111          | 7754.00                 | 29.0                  | 80.72  | 63.35      | 3.2                 | 6.78           | N.A.                    | Incinerator   |
| 22      | Finishing Dust Collector (Unit 3)                     | 24        | Electricity                      | 780            | 13000                   | 9000                                 | 30           | 17797.69                | 67.0                  | -      | -          | -                   | 10.63          | N.A.                    | Bag Filter  |
| 23      | P.I. Unit – 3 (HGG STACK)                             | 25        | CBM                              | 400            | 30000                   | 28000                                | 65           | 3791.74                 | 68.0                  | 70.63  | 68.43      | 3.4                 | 9.75           | N.A.                    | Water Spray Cooling Chamber                         |
| 24      | Tunnel Kiln – 2 (Re-baking Furnace)                   | 26        | CBM (140 Kg./Hr.)                | 730            | 30000                   | 18000                                | 116          | 9616.68                 | 25.0                  | 50.45  | 59.80      | 3.6                 | 8.52           | N.A.                    | Incinerator   |
| 25      | P.I. Unit – 3 (THERMOPACK STACK)                      | 27        | CBM                              | 400            | 30000                   | 28000                                | 84           | 2766.73                 | 70.0                  | 70.63  | 50.15      | 3.8                 | 7.41           | N.A.                    | Nil   |
| 26      | Extrusion -2 Department Thermic Flueid Heater         | 28        | CBM (138.4 Nm <sup>3</sup> /Hr.) | 580            | 30000                   | 20000                                | 60           | 6391.36                 | 31.0                  | 70.63  | 75.20      | 3.2                 | 7.68           | N.A.                    | Nil   |
| 27      | Extrusion #2 IRICH Dust Collector                     | 29        | Electricity                      | 300            | 34000                   | 28000                                | 28           | 4137.67                 | 50.0                  | -      | -          | -                   | 16.53          | N.A.                    | Bag Filter  |
| 28      | Extrusion #2 Main Dust Collector                      | 30        | Electricity                      | 1000           | 34000                   | 33000                                | 27           | 43665.49                | 71.0                  | -      | -          | -                   | 15.66          | N.A.                    | Bag Filter  |
| 29      | Extrusion #2 Raymond Mill Dust Collector              | 31        | Electricity                      | 230            | 12500                   | 10500                                | 31           | 2261.65                 | 76.0                  | -      | -          | -                   | 15.56          | N.A.                    | Bag Filter  |
| 30      | Extrusion #2 Silo Dust Collector                      | 32        | Electricity                      | 600            | 15000                   | 7000                                 | 29           | 14301.50                | 61.0                  | -      | -          | -                   | 14.34          | N.A.                    | Bag Filter  |
| 31      | Extrusion #2 IRICH (Trema) Scrubber System            | 33        | Electricity                      | 280            | 8000                    | 7000                                 | 30           | 9311.08                 | 41.0                  | -      | -          | -                   | 45.20          | N.A.                    | Scrubber System                                     |
| 32      | Acheson Dust Collector                                | 34        | Electricity                      | 800x320        | 18000                   | 10500                                | 30           | 11814.32                | 65.0                  | -      | -          | -                   | 13.11          | N.A.                    | Bag Filter  |
| 33      | Extrusion #2 Scrap system Dust collector              | 35        | Electricity                      | 650            | 17000                   | 8900                                 | 26           | 14938.76                | 62.0                  | -      | -          | -                   | 12.63          | N.A.                    | Bag Filter  |
| 34      | R.H.-24 (II) Furnace                                  | 36        | CBM (70 m <sup>3</sup> /Hr.)     | 1600           | 45000                   | 33000                                | 79           | 43457.24                | 36.0                  | 60.54  | 53.65      | 3.6                 | 7.26           | N.A.                    | E.S.P   |
| 35      | Finishing Unit – 3 (South Side) Nipple Dust Collector | 37        | Electricity                      | 700            | 15000                   | 8000                                 | 30           | 18687.81                | 33.0                  | -      | -          | -                   | 13.85          | N.A.                    | Bag Filter  |

|    | Stack Attached to                                  | Stack No. | Fuel (Type & Quantity)        | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> mg/NM <sup>3</sup> | Nox mg/NM3 | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|----|--|-----------|-------------------------------|----------------|-------------------------|--------------------------------------|--------------|-------------------------|-----------------------|------------------------------------|------------|---------------------|----------------|-------------------------|---|
| 36 | Finishing Unit – 2 Nipple line Dust Collector      | 38        | Electricity                   | 610            | 11580                   | 9140                                 | 31           | 7822.21                 | 46.00                 | -                                  | -          | -                   | 7.66           | N.A.                    | Bag Filter  |
| 37 | R.H.-16 Stock Cleaning Machine Dust Collector      | 39        | Electricity                   | 400 × 600      | 10000                   | 7000                                 | 33           | 6411.74                 | 44.00                 | -                                  | -          | -                   | 7.71           | N.A.                    | Bag Filter  |
| 38 | R.H.-24 (II) Stock Cleaning Machine Dust Collector | 40        | Electricity                   | 650            | 30000                   | 15000                                | 32           | 10367.79                | 37.0                  | -                                  | -          | -                   | 8.96           | N.A.                    | Bag Filter  |
| 39 | Turning-1 Dust Collector                           | 41        | Electricity                   | 250            | 15000                   | 3000                                 | 31           | 1315.66                 | 51.0                  | -                                  | -          | -                   | 7.68           | N.A.                    | Bag Filter  |
| 40 | P.I.-2 Turning Machine Dust Collector              | 42        | Electricity                   | 250            | 15000                   | 3000                                 | 31           | 4244.6                  | 64.0                  | -                                  | -          | -                   | 24.77          | N.A.                    | Bag Filter  |
| 41 | P.I-3 Turning Machine Dust Collector               | 43        | Electricity                   | 250            | 15000                   | 3000                                 | 33           | 1552.31                 | 41.0                  | -                                  | -          | -                   | 9.12           | N.A.                    | Bag Filter  |
| 42 | P.I Unit- 4 (THERMOPACK STACK)                     | 44        | CBM (100 m <sup>3</sup> /Hr.) | 950            | 30500                   | 18800                                | 189          | 11773.44                | 62.0                  | 80.72                              | 52.61      | 3.0                 | 7.3            | N.A.                    | Nil   |
| 43 | P.I.-4 Pre-Heater                                  | 45        | CBM (60 m <sup>3</sup> /Hr.)  | 1150           | 35800                   | 21200                                | 52           | 19827.84                | 48.0                  | 60.54                              | 48.54      | 3.4                 | 5.9            | N.A.                    | Nil   |
| 44 | RH-24 (II) Jaw Crusher Machine Dust Collector      | 46        | Electricity                   | 480            | 22000                   | 10000                                | 31           | 4851.49                 | 30.0                  | -                                  | -          | -                   | 7.67           | N.A.                    | Bag Filter  |
| 45 | Ried Hammer-16 Jaw Crusher Dust Collector          | 47        | Electricity                   | 800            | 12000                   | 6400                                 | 32           | 13164.56                | 26.0                  | -                                  | -          | -                   | 7.53           | N.A.                    | Bag Filter  |
| 46 | R.H.-24 (I) Stock Cleaning Dust Collector          | 48        | Electricity                   | 300            | 10670                   | 4570                                 | 32           | 2652.33                 | 38.0                  | -                                  | -          | -                   | 10.74          | N.A.                    | Bag Filter With Cyclone Separator                   |
| 47 | Core Sampling Dust Collector                       | 49        | Electricity                   | 250            | 6000                    | 4500                                 | 30           | 1319.95                 | 34.0                  | -                                  | -          | -                   | 7.66           | N.A.                    | Bag Filter With Cyclone Separator                   |
| 48 | CBS Dust Collector                                 | 50        | Electricity                   | 600            | 12000                   | 5000                                 | 30           | 15405.88                | 51.0                  | -                                  | -          | -                   | 15.53          | N.A.                    | Bag Filter  |

**For, Indicative Consultant India**

*Checked By: A. Patra*

Parbati Golui  
(Quality Manager)  
Signatory Authority

*Limit : SPM = 150 mg/Nm<sup>3</sup> , Ref. : Consent of operate under section 25 & 26 of the Water (Prevention and Control of Pollution) Act.1974 & Sec.21 of the Air (Prevention and Control of Pollution) Act.1981, Consent letter No.*



### Pollution Ambient Air Average concentration for Quarter 1 YEAR 2023 around the plant surroundings

*Ref : National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18th November '2009*

Sampling Period: 01.02.2023 to 09.02.2023

*All figures are in micro gms / N cub. Mt*

|                      |                          |                        | Parameters in µg / m <sup>3</sup> |       |                 |                 | Parameters in mg / m <sup>3</sup> | Parameters in µg / m <sup>3</sup> |         |                 |       | Parameters in ng / m <sup>3</sup> |    |    | Location            | Direction wrt Plant Land | Close to      |
|----------------------|--------------------------|------------------------|-----------------------------------|-------|-----------------|-----------------|-----------------------------------|-----------------------------------|---------|-----------------|-------|-----------------------------------|----|----|---------------------|--------------------------|---------------|
| Max limit            |                          |                        | 60                                | 100   | 80              | 80              | 2                                 | 1                                 | 5       | 400             | 100   | 1                                 | 6  | 20 |                     |                          |               |
| LOCATION             | Sampling Date            | Sampling Time          | PM2.5                             | PM10  | SO <sub>2</sub> | NO <sub>2</sub> | CO                                | Pb                                | Benzene | NH <sub>3</sub> | Ozone | Benzo(a) Pyrene                   | As | Ni |                     |                          |               |
| New Extrusion Campus |                          |                        |                                   |       |                 |                 |                                   |                                   |         |                 |       |                                   |    |    |                     |                          |               |
| A                    | 01.02.2023               | 10:00 AM to 06:00 PM   | 40.10                             | 87.09 | 20.69           | 39.26           | 0.2716                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion #2 Campus | East Side                | Boundary wall |
|                      | 01.02.2023 to 02.02.2023 | 06:30 PM to 02:30 AM   | 36.07                             | 80.45 | 23.80           | 46.56           | 0.3088                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
|                      | 02.02.2023               | 03:00 AM to 11:00 AM   | 32.58                             | 74.93 | 17.59           | 41.08           | 0.3407                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| Average              |                          |                        | 36.25                             | 80.82 | 20.69           | 42.30           | 0.3070                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| B                    | 01.02.2023               | 10:30 AM to 06:30 PM   | 38.85                             | 91.30 | 18.62           | 41.99           | 0.2779                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion #2 Campus | North Side               | Boundary wall |
|                      | 01.02.2023 to 02.02.2023 | 07:00 PM to 03:00 AM   | 33.58                             | 82.41 | 21.73           | 44.73           | 0.2933                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
|                      | 02.02.2023               | 03:30 AM to 11:30 AM   | 30.08                             | 75.15 | 15.52           | 37.43           | 0.3401                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| Average              |                          |                        | 34.17                             | 82.95 | 18.62           | 41.38           | 0.3038                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| C                    | 02.02.2023               | 11:30 AM to 07:30 PM   | 46.37                             | 90.46 | 20.69           | 41.08           | 0.3141                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion#2 Campus  | South Side               | Boundary wall |
|                      | 02.02.2023 to 03.02.2023 | 08:00 PM to 04:00 AM   | 34.83                             | 85.17 | 16.55           | 37.43           | 0.3469                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
|                      | 03.02.2023               | 04:30 AM to 12:30 PM   | 42.71                             | 94.66 | 17.59           | 42.91           | 0.3628                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| Average              |                          |                        | 41.30                             | 90.10 | 18.28           | 40.47           | 0.3413                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| D                    | 02.02.2023               | 12:00 Noon to 08:00 PM | 32.58                             | 78.48 | 21.73           | 41.08           | 0.2652                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion #2 Campus | West Side                | Boundary wall |
|                      | 02.02.2023 to 03.02.2023 | 08:30 PM to 04:30 AM   | 29.85                             | 75.54 | 16.55           | 37.43           | 0.2966                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |

|                                  |                                |                            |              |              |              |              |               |            |            |            |              |            |            |            |  |                    |                               |
|----------------------------------|--------------------------------|----------------------------|--------------|--------------|--------------|--------------|---------------|------------|------------|------------|--------------|------------|------------|------------|--|--------------------|-------------------------------|
|                                  | 03.02.2023                     | 05:00 AM<br>to<br>01:00 PM | 36.34        | 86.21        | 23.80        | 43.82        | 0.3471        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>32.92</b> | <b>80.08</b> | <b>20.69</b> | <b>40.78</b> | <b>0.3030</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| E                                | 03.02.2023                     | 09:00 AM<br>to<br>05:00 PM | 39.80        | 92.17        | 22.76        | 44.73        | 0.2791        | BDL        | BDL        | BDL        | 38.10        | BDL        | BDL        | BDL        | <b>Extrusion#2<br/>Campus</b>  | Center<br>Location | Near New Road<br>Weigh Bridge |
|                                  | 03.02.2023<br>to<br>04.02.2023 | 05:30 PM<br>to<br>01:30 AM | 33.83        | 82.79        | 15.52        | 41.99        | 0.3228        | BDL        | BDL        | BDL        | -            | BDL        | BDL        | BDL        |  |                    |                               |
|                                  | 04.02.2023                     | 02:00 AM<br>to<br>10:00 AM | 30.08        | 76.18        | 18.62        | 37.43        | 0.3605        | BDL        | BDL        | BDL        | -            | BDL        | BDL        | BDL        |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>34.57</b> | <b>83.71</b> | <b>18.97</b> | <b>41.38</b> | <b>0.3208</b> | <b>BDL</b> | <b>BDL</b> | <b>BDL</b> | <b>38.10</b> | <b>BDL</b> | <b>BDL</b> | <b>BDL</b> |  |                    |                               |
| <b>Graphite Old Plant Campus</b> |                                |                            |              |              |              |              |               |            |            |            |              |            |            |            |  |                    |                               |
| F                                | 03.02.2023                     | 09:30 AM<br>to<br>05:30 PM | 37.59        | 85.15        | 20.69        | 41.99        | 0.2766        | -          | -          | -          | -            | -          | -          | -          | <b>Near<br/>Personnel<br/>Office<br/>(Graphite<br/>Old Plant)</b>        | West Side          | Boundary wall                 |
|                                  | 03.02.2023<br>to<br>04.02.2023 | 06:00 PM<br>to<br>02:00 AM | 33.58        | 77.69        | 22.76        | 46.56        | 0.3148        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 04.02.2023                     | 02:30 AM<br>to<br>10:30 AM | 31.41        | 73.46        | 18.62        | 39.26        | 0.3691        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>34.19</b> | <b>78.77</b> | <b>20.69</b> | <b>42.60</b> | <b>0.3202</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| G                                | 06.02.2023                     | 09:00 AM<br>to<br>05:00 PM | 48.51        | 89.18        | 21.73        | 45.65        | 0.2658        | -          | -          | -          | -            | -          | -          | -          | <b>Near<br/>Security<br/>Barrack<br/>(Graphite<br/>Old Plant)</b>        | North Side         | Boundary wall                 |
|                                  | 06.02.2023<br>to<br>07.02.2023 | 05:30 PM<br>to<br>01:30 AM | 38.85        | 81.50        | 18.62        | 41.99        | 0.3012        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 07.02.2023                     | 02:00 AM<br>to<br>10:00 AM | 32.58        | 76.05        | 15.52        | 35.60        | 0.3514        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>39.98</b> | <b>82.24</b> | <b>18.62</b> | <b>41.08</b> | <b>0.3061</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| H                                | 06.02.2023                     | 09:30 AM<br>to<br>05:30 PM | 41.20        | 90.55        | 21.73        | 48.38        | 0.2769        | -          | -          | -          | -            | -          | -          | -          | <b>At the east of<br/>LWG 4<br/>&amp; 5<br/>(Graphite<br/>Old Plant)</b> | East Side          | Boundary wall                 |
|                                  | 06.02.2023<br>to<br>07.02.2023 | 06:00 PM<br>to<br>02:00 AM | 36.11        | 83.33        | 23.80        | 43.82        | 0.3248        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 07.02.2023                     | 02:30 AM<br>to<br>10:30 AM | 32.66        | 78.30        | 18.62        | 40.17        | 0.3671        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>36.66</b> | <b>84.06</b> | <b>21.38</b> | <b>44.12</b> | <b>0.3229</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 07.02.2023                     | 10:30 AM<br>to<br>06:30 PM | 38.56        | 86.40        | 17.59        | 41.99        | 0.2878        | -          | -          | -          | -            | -          | -          | -          | <b>Near South</b>  |                    |                               |



|         |                                |                              |       |       |       |       |        |     |     |     |       |     |     |     |   |                    |                                   |
|---------|--------------------------------|------------------------------|-------|-------|-------|-------|--------|-----|-----|-----|-------|-----|-----|-----|---|--------------------|-----------------------------------|
| I       | 07.02.2023<br>to<br>08.02.2023 | 07:00 PM<br>to<br>03:00 AM   | 42.61 | 91.67 | 22.76 | 45.65 | 0.3306 | -   | -   | -   | -     | -   | -   | -   | side of<br>Tunnel Kiln<br>(Graphite<br>Old Plant) | South Side         | Boundary wall                     |
|         | 08.02.2023                     | 03:30 AM<br>to<br>11:30 AM   | 33.83 | 82.07 | 18.62 | 35.60 | 0.3751 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| Average |                                |                              | 38.33 | 86.71 | 19.66 | 41.08 | 0.3312 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| J       | 07.02.2023                     | 11:00 AM<br>to<br>07:00 PM   | 44.78 | 94.20 | 18.62 | 41.99 | 0.3017 | BDL | BDL | BDL | 40.1  | BDL | BDL | BDL | Graphite Old<br>Plant                             | Center<br>Location | West side of<br>Shipping Unit # 2 |
|         | 07.02.2023<br>to<br>08.02.2023 | 07:30 PM<br>to<br>03:30 AM   | 48.87 | 98.47 | 22.76 | 46.56 | 0.3409 | BDL | BDL | BDL | -     | BDL | BDL | BDL |   |                    |                                   |
|         | 08.02.2023                     | 04:00 AM<br>to<br>12:00 Noon | 35.09 | 83.15 | 15.52 | 37.43 | 0.3972 | BDL | BDL | BDL | -     | BDL | BDL | BDL |   |                    |                                   |
| Average |                                |                              | 42.91 | 91.94 | 18.97 | 41.99 | 0.3466 | BDL | BDL | BDL | 40.10 | BDL | BDL | BDL |   |                    |                                   |
| K       | 08.02.2023                     | 12:00 Noon<br>to<br>08:00 PM | 47.26 | 89.36 | 23.80 | 44.73 | 0.3355 | -   | -   | -   | -     | -   | -   | -   | Near Baking<br>Furnace RH<br>16 Section           | North Side         | Boundary wall                     |
|         | 08.02.2023<br>to<br>09.02.2023 | 08:30 PM<br>to<br>04:30 AM   | 35.09 | 75.25 | 17.59 | 36.52 | 0.3721 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
|         | 09.02.2023                     | 05:00 AM<br>to<br>01:00 PM   | 42.61 | 82.43 | 19.66 | 41.08 | 0.2892 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| Average |                                |                              | 41.65 | 82.35 | 20.35 | 40.78 | 0.3323 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| L       | 08.02.2023                     | 12:30 PM<br>to<br>08:30 PM   | 39.80 | 81.20 | 21.73 | 44.73 | 0.3078 | -   | -   | -   | -     | -   | -   | -   | Near RH- 24<br>(II)                               | South Side         | Boundary wall                     |
|         | 08.02.2023<br>to<br>09.02.2023 | 09:00 PM<br>to<br>05:00 AM   | 33.83 | 72.56 | 16.55 | 35.60 | 0.3591 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
|         | 09.02.2023                     | 05:30 AM<br>to<br>01:30 PM   | 36.34 | 79.35 | 19.66 | 40.17 | 0.2844 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| Average |                                |                              | 36.66 | 77.70 | 19.31 | 40.17 | 0.3171 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |

For, Indicative Consultant India

Parbati Golui  
(Quality Manager)  
Signatory Authority

Checked By: A. Patra

**INDICATIVE CONSULTANT INDIA**

HPL Link Road, Basudevpur, Khanjanchak

Haldia, Purba Medinipur – 721 602

Govt.Regn.No.-L-64871; MSME Reg. No.: WB-12-0000228

**M/s. GRAPHITE INDIA LTD., Dist – Paschim Bardhaman, Durgapur, PIN - 713 211, (West Bengal)**

Result of Analysis :-

Register Containing Particulars of *Testing of Illumination Level*.**Form No. - 30****Table No. - 1**

Ph. – 03224, 275765

Mob. – 94340 17584

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| Sl. No. | Name of Locations                        | Parameter    | Date & Time of Monitoring | Sampling Instrument Used | Reference Method     | Illumination Level in Lux | Limit Lux | Remarks      | Signature | Name         |
|---------|--|--------------|---------------------------|--------------------------|----------------------|---------------------------|-----------|--------------|-----------|--------------|
| 1       | EXTRUSION #1 MIXER WORKING AREA          | Illumination | 13.02.2023                | Digital Lux Meter        | By Digital Lux Meter | 217                       | 65        | Adequate     |           | T. SUTRADHAR |
| 2       | EXTRUSION #1 WEIGH WORKING AREA          |              |                           |                          |                      | 123                       | 65        | Adequate     |           |              |
| 3       | EXTRUSION #2 PRESS WORKING AREA          |              |                           |                          |                      | 172                       | 65        | Adequate     |           |              |
| 4       | EXTRUSION #2 14 MTR. WORKING FLOOR       |              |                           |                          |                      | 124                       | 65        | Adequate     |           |              |
| 5       | RC BAKING WORKING AREA                   |              |                           |                          |                      | 128                       | 65        | Adequate     |           |              |
| 6       | REID HAMMER BAKING-14 WORKING AREA       |              |                           |                          |                      | 232                       | 65        | Adequate     |           |              |
| 7       | REID HAMMER BAKING-16 WORKING AREA       |              |                           |                          |                      | 173                       | 65        | Adequate     |           |              |
| 8       | REID HAMMER BAKING-24 (I) WORKING AREA   |              |                           |                          |                      | 149                       | 65        | Adequate     |           |              |
| 9       | REID HAMMER BAKING-24 (II) WORKING AREA  |              |                           |                          |                      | 192                       | 65        | Adequate     |           |              |
| 10      | BAKING TUNNEL KILN WORKING AREA          |              |                           |                          |                      | 384                       | 65        | Adequate     |           |              |
| 11      | PITCH IMPREGNATION UNIT # 2 WORKING AREA |              | 303                       |                          |                      | 65                        | Adequate  | S. CHATTARAJ |           |              |
| 12      | PITCH IMPREGNATION UNIT # 3 WORKING AREA |              | 482                       |                          |                      | 65                        | Adequate  |              |           |              |
| 13      | LWG # 3 WORKING AREA                     |              | 254                       |                          |                      | 65                        | Adequate  |              |           |              |
| 14      | LWG # 4 WORKING AREA                     |              | 163                       |                          |                      | 65                        | Adequate  |              |           |              |
| 15      | GRAPHITE ACHESON WORKING AREA            |              | 142                       |                          |                      | 65                        | Adequate  |              |           |              |
| 16      | FINISHING # 1 WORKING AREA               |              | 206                       |                          |                      | 65                        | Adequate  |              |           |              |
| 17      | FINISHING # 2 WORKING AREA               |              | 312                       |                          |                      | 65                        | Adequate  |              |           |              |
| 18      | FINISHING # 3 WORKING AREA               |              | 419                       |                          |                      | 65                        | Adequate  |              |           |              |
| 19      | LWG # 5 WORKING AREA                     |              | 165                       |                          |                      | 65                        | Adequate  |              |           |              |
| 20      | PITCH IMPREGNATION UNIT # 4 WORKING AREA |              | 118                       |                          |                      | 65                        | Adequate  |              |           |              |
| 21      | MAINTENANCE DEPARTMENT                   |              | 530                       |                          |                      | 65                        | Adequate  |              |           |              |
| 22      | MAIN STORE AREA                          |              | 166                       |                          |                      | 65                        | Adequate  |              |           |              |
| 23      | CANTEEN                                  |              | 169                       |                          |                      | 65                        | Adequate  |              |           |              |
| 24      | NEAR MAIN GATE (OLD PLANT)               |              | 130                       |                          |                      | 65                        | Adequate  |              |           |              |
| 25      | LABORATORY                               |              | 258                       |                          |                      | 65                        | Adequate  |              |           |              |

Note: As per Factories Rules, 1958: Rule No R 31 (prescribed under sub section (4) of section 17

For, INDICATIVE CONSULTANT INDIA



**Parbati Golui**  
Authorized Signatory

P 1/1

# NOISE LEVEL MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Paschim Burdwan, Durgapur, PIN - 713 211, (West Bengal)

Register Containing Particulars for Noise Level Monitoring.

For the month FEBRUARY - 2023

| Sl. No. | Name of Locations                    | Parameter              |                        | Sampling Instrument Used | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|---------|--------------------------------------|------------------------|------------------------|--------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
| 1       | EXTRUSION #1 Mixer Floor             | Noise Level Monitoring | 09.02.2023<br>09:40 AM | Annexure- I              | 82.6, 81.4, 83.2, 82.4, 81.6, 82.9, 83.0, 81.4, 82.2, 83.5 | 82.4            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |                                   |                       |
| 2       | EXTRUSION #1 Weigh Floor             |                        | 09.02.2023<br>10:20 AM |                          | 80.4, 82.4, 81.6, 82.0, 82.9, 83.2, 81.4, 82.2, 81.5, 82.8 | 82.0            |            |   |                  |                           |                                   |                       |
| 3       | EXTRUSION #1 Cooler Floor            |                        | 09.02.2023<br>11:55 AM |                          | 80.6, 82.4, 81.6, 82.0, 81.2, 82.9, 81.8, 82.9, 83.2, 81.8 | 82.0            |            |   |                  |                           |                                   |                       |
| 4       | EXTRUSION #1 Press Floor             |                        | 09.02.2023<br>12:30 PM |                          | 80.2, 79.4, 81.4, 82.1, 79.9, 81.0, 82.0, 81.6, 82.1, 79.4 | 80.9            |            |   |                  |                           |                                   |                       |
| 5       | EXTRUSION #2 Press Floor             |                        | 10.02.2023<br>04:15 PM |                          | 82.0, 82.2, 81.9, 82.5, 81.0, 81.8, 82.4, 81.1, 81.5, 82.0 | 81.9            |            |   |                  |                           |                                   |                       |
| 6       | EXTRUSION #2 14 Meter Floor          |                        | 10.02.2023<br>04:50 PM |                          | 81.4, 82.6, 81.8, 82.4, 82.9, 81.5, 80.9, 81.4, 82.6, 82.0 | 82.0            |            |   |                  |                           |                                   |                       |
| 7       | Baking RC Shop Floor                 |                        | 09.02.2023<br>02:00 PM |                          | 83.1, 81.2, 82.4, 83.1, 82.2, 81.6, 82.2, 82.9, 81.8, 80.8 | 82.1            |            |   |                  |                           |                                   |                       |
| 8       | Baking RH- 14 Section Shop Floor     |                        | 09.02.2023<br>01:00 PM |                          | 82.4, 81.6, 82.2, 81.8, 82.0, 81.6, 82.2, 82.7, 81.7, 80.8 | 81.9            |            |   |                  |                           |                                   |                       |
| 9       | Baking RH- 16 Shop Floor             |                        | 09.02.2023<br>02:35 PM |                          | 82.4, 81.6, 82.3, 82.0, 81.9, 82.4, 83.0, 81.8, 82.4, 82.6 | 82.2            |            |   |                  |                           |                                   |                       |
| 10      | Baking RH- 24 (I) Section Shop Floor |                        | 09.02.2023<br>03:05 PM |                          | 82.4, 81.6, 81.8, 80.8, 82.0, 81.1, 82.0, 81.8, 82.1, 80.9 | 81.7            |            |   |                  |                           |                                   |                       |
| 11      | Baking RH – 24 (II)                  |                        | 09.02.2023<br>04:10 PM |                          | 82.0, 81.6, 82.5, 81.6, 80.9, 80.8, 81.3, 82.2, 81.0, 81.9 | 81.6            |            |   |                  |                           |                                   |                       |
| 12      | Baking Tunnel Kiln                   |                        | 09.02.2023<br>03:40 PM |                          | 82.3, 82.4, 81.5, 82.8, 81.9, 81.4, 82.3, 82.0, 82.6, 82.5 | 82.2            |            |   |                  |                           |                                   |                       |
| 13      | Pitch Impregnation Unit # 2 Shop     |                        | 09.02.2023<br>04:40 PM |                          | 83.5, 81.8, 82.4, 82.9, 82.3, 83.4, 82.5, 83.0, 82.8, 81.9 | 82.7            |            |   |                  |                           |                                   |                       |
| 14      | Pitch Impregnation Unit # 3 Shop     |                        | 09.02.2023<br>05:10 PM |                          | 82.4, 83.0, 82.2, 81.9, 82.2, 81.6, 82.1, 82.4, 81.8, 82.0 | 82.2            |            |   |                  |                           |                                   |                       |
| 15      | Pitch Impregnation Unit # 4 Shop     |                        | 10.02.2023<br>09:35 AM |                          | 81.1, 83.0, 80.6, 81.4, 81.6, 82.4, 81.9, 82.0, 81.6, 81.8 | 81.7            |            |   |                  |                           |                                   |                       |
| 16      | LWG # 3 Shop                         |                        | 10.02.2023<br>10:10 AM |                          | 81.9, 82.4, 82.6, 82.9, 80.9, 81.6, 82.0, 82.6, 81.1, 82.3 | 82.0            |            |   |                  |                           |                                   |                       |

T.  
SUTRADHAR

S.  
CHATTARAJ



|    |  |                        |   |             |  |  |  |  |  |  |
|----|--|------------------------|---|-------------|--|--|--|--|--|--|
| 17 | LWG # 4 Shop                             | 10.02.2023<br>10:40 AM | 83.6, 82.6, 82.0, 81.9, 82.0,<br>81.7, 82.9, 83.0, 82.4, 83.8 | <b>82.6</b> |  |  |  |  |  |  |
| 18 | LWG Unit # 4 (Auto Dust<br>Bagging Area) | 10.02.2023<br>11:10 AM | 79.4, 81.2, 78.8, 80.4, 77.8,<br>79.0, 81.9, 82.0, 79.4, 78.1 | <b>79.8</b> |  |  |  |  |  |  |
| 19 | LWG # 5 Shop                             | 10.02.2023<br>11:50 AM | 81.6, 82.4, 82.9, 82.0, 81.1,<br>80.9, 80.6, 80.9, 81.9, 82.0 | <b>81.6</b> |  |  |  |  |  |  |
| 20 | Finishing # 1 Shop Floor                 | 10.02.2023<br>12:25 PM | 82.0, 81.4, 81.9, 82.1, 83.0,<br>82.4, 81.6, 82.0, 81.9, 82.0 | <b>82.0</b> |  |  |  |  |  |  |
| 21 | Finishing #2 Shop Floor                  | 10.02.2023<br>01:05 PM | 81.6, 82.4, 81.9, 82.0, 81.4,<br>82.6, 82.4, 81.6, 82.0, 80.9 | <b>81.9</b> |  |  |  |  |  |  |
| 22 | Finishing # 3 Shop Floor                 | 10.02.2023<br>01:50 PM | 81.4, 79.9, 80.8, 81.0, 79.9,<br>80.2, 81.1, 81.6, 82.3, 81.4 | <b>81.0</b> |  |  |  |  |  |  |
| 23 | Graphite Acheson Shop                    | 10.02.2023<br>02:20 PM | 79.6, 80.1, 82.1, 79.4, 78.8,<br>79.1, 78.4, 79.9, 80.0, 82.2 | <b>80.0</b> |  |  |  |  |  |  |
| 24 | Graphite Fines Screening<br>Shop         | 10.02.2023<br>02:55 PM | 80.6, 81.9, 82.0, 81.8, 83.1,<br>82.9, 82.2, 80.6, 81.5, 82.2 | <b>81.9</b> |  |  |  |  |  |  |
| 25 | Core Sample Shed                         | 10.02.2023<br>03:30 PM | 81.2, 80.6, 81.1, 81.7, 81.5,<br>82.4, 80.2, 79.8, 81.1, 80.8 | <b>81.0</b> |  |  |  |  |  |  |

For, INDICATIVE CONSULTANT INDIA

**Parbati Golui**  
Authorized Signatory

# WORKZONE AIR MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Paschim Burdwan, Durgapur, PIN - 713 211, (West Bengal)

Register Containing Particulars for Workzone Air Monitoring.

For the month of FEBRUARY-2023

| Sl. No. | Location / Operation Monitoring | Identified Contaminant | Date of Monitoring | Sampling Instrument Used | Airborne Contamination |            | TWA Concentration as given in 2nd Schedule (mg/M3) | Reference Method | Number of workers exposed at the location being monitored |                     | Remarks   | Signature of person taking Samples | Name in block letters |
|---------|---------------------------------|------------------------|--------------------|--------------------------|------------------------|------------|--|------------------|---|---------------------|-----------|------------------------------------|-----------------------|
|         |                                 |                        |                    |                          | No. of sample          | Avg. mg/M3 |  |                  | Continuous Exposure                                       | Short term Exposure |           |                                    |                       |
| 1       | Extrusion #1 Press Floor        | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.084      | 10.0   | Annexure- I      | 3   | -                   | Below PEL |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.445      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.020      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.044      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 2       | Extrusion #1 Weigh Floor        | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.065      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.315      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.020      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.042      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 3       | Extrusion #1 Mixer Floor        | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.112      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.274      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.019      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.038      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 4       | Extrusion #1 Cooler Floor       | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.025      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.424      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.023      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.042      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 5       | Extrusion #2 Press Floor        | SPM                    | 07.02.2023         | Annexure- I              | 3                      | 0.906      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.332      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.020      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.040      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 6       | Extrusion #2 14mt. Floor        | SPM                    | 07.02.2023         | Annexure- I              | 3                      | 1.437      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.685      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.021      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.042      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |



|    |                                  |     |            |             |   |       |      |             |   |   |      |  |              |
|----|----------------------------------|-----|------------|-------------|---|-------|------|-------------|---|---|------|--|--------------|
| 7  | Baking R-C Shop                  | SPM | 07.02.2023 | Annexure- I | 3 | 1.470 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.569 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.039 | 6.0  |             |   | - | -Do- |  |              |
| 8  | Baking RH 16 Shop Floor          | SPM | 07.02.2023 | Annexure- I | 3 | 2.379 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.868 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.038 | 6.0  |             |   | - | -Do- |  |              |
| 9  | Baking RH 24 (I) Shop Floor      | SPM | 08.02.2023 | Annexure- I | 3 | 1.985 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.124 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 10 | Baking Tunnel Kiln Shop          | SPM | 08.02.2023 | Annexure- I | 3 | 2.554 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.517 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.043 | 6.0  |             |   | - | -Do- |  |              |
| 11 | Pitch Impregnation Unit # 2 Shop | SPM | 08.02.2023 | Annexure- I | 3 | 2.564 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.211 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.042 | 6.0  |             |   | - | -Do- |  |              |
| 12 | Pitch Impregnation Unit # 3 Shop | SPM | 08.02.2023 | Annexure- I | 3 | 1.935 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.918 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 13 | Graphite Acheson Shop            | SPM | 09.02.2023 | Annexure- I | 3 | 2.731 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.230 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.042 | 6.0  |             |   | - | -Do- |  |              |
| 14 | LWG # 3 Shop                     | SPM | 09.02.2023 | Annexure- I | 3 | 2.405 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.167 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.038 | 6.0  |             |   | - | -Do- |  |              |
| 15 | LWG # 4 Shop                     | SPM | 09.02.2023 | Annexure- I | 3 | 1.874 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.748 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |

|    |  |     |            |             |   |       |      |             |   |   |      |  |              |
|----|--|-----|------------|-------------|---|-------|------|-------------|---|---|------|--|--------------|
| 16 | LWG # 5 Shop                                       | SPM | 09.02.2023 | Annexure- I | 3 | 1.462 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 0.586 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.044 | 6.0  |             |   | - | -Do- |  |              |
| 17 | Finishing # 1 Shop Floor                           | SPM | 10.02.2023 | Annexure- I | 3 | 2.190 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.145 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.039 | 6.0  |             |   | - | -Do- |  |              |
| 18 | Finishing # 2 Shop Floor                           | SPM | 10.02.2023 | Annexure- I | 3 | 2.276 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.461 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.023 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 19 | Finishing # 3 Shop Floor                           | SPM | 10.02.2023 | Annexure- I | 3 | 2.599 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.240 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.037 | 6.0  |             |   | - | -Do- |  |              |
| 20 | Graphite Fines Screening Shop                      | SPM | 10.02.2023 | Annexure- I | 3 | 2.934 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.611 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 21 | Canteen (Kitchen Area)                             | SPM | 11.02.2023 | Annexure- I | 3 | 1.163 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 0.660 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.041 | 6.0  |             |   | - | -Do- |  |              |
| 22 | RH-24 (II)   | SPM | 11.02.2023 | Annexure- I | 3 | 1.298 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 0.760 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.021 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 23 | P1 Unit # 4  | SPM | 11.02.2023 | Annexure- I | 3 | 2.514 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.313 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 24 | LWG Unit-4 Auto Dust Bagging Area (During Bagging) | SPM | 11.02.2023 | Annexure- I | 3 | 3.841 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.900 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.045 | 6.0  |             |   | - | -Do- |  |              |

|    |   |     |            |             |   |       |      |             |   |   |      |  |              |
|----|---|-----|------------|-------------|---|-------|------|-------------|---|---|------|--|--------------|
| 25 | Store Shop Floor                                | SPM | 13.02.2023 | Annexure- I | 3 | 3.273 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |   | RPM |            |             |   | 2.181 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |   | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |   | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 26 | Maintanance Shop Floor                          | SPM | 13.02.2023 | Annexure- I | 3 | 3.246 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |   | RPM |            |             |   | 1.921 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |   | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |   | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 27 | LWG # 5 Auto Dust Bagging Area (During Bagging) | SPM | 13.02.2023 | Annexure- I | 3 | 3.847 | 1.0  | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |   | RPM |            |             |   | 2.404 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |   | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |   | NOx |            |             |   | 0.039 | 6.0  |             |   | - | -Do- |  |              |

# PEL – Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA

Parbati Golui  
Authorized Signatory



# WORKZONE AIR MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Burdwan, Durgapur, PIN - 713 211, (West Bengal)

Register Containing Particulars for **Workzone Air Monitoring.**

For the month of FEBRUARY'2023

| Sl. No. | Location / Operation Monitoring | Identified Contaminant | Date & Time of Monitoring | Air Contaminants | TWA Concentration as given in Factory's Act :2nd Schedule (mg/m <sup>3</sup> ) | Sampling Instrument used and Reference method | Remarks   | Signature | Name in block letters |
|---------|---------------------------------|------------------------|---------------------------|------------------|--|---|-----------|-----------|-----------------------|
| 1       | RC – 1 Baking Furnace Shop      | Methyl Alcohol         | 07.02.2023                | 32.5             | 260  | Annexure- I                                   | Below PEL |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | Nil              | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | 50               | 375  |   | -Do-      |           |                       |
| 2       | Reid Hammer 24 (I) Section Shop | Methyl Alcohol         | 11.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 3       | Baking Tunnel Kiln Shop         | Methyl Alcohol         | 08.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 4       | P.I. Unit – 2 Shop              | Methyl Alcohol         | 08.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 5       | Acheson Furnace Shop            | Methyl Alcohol         | 09.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 6       | LWG – 4 Shop                    | Methyl Alcohol         | 09.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |

**For, INDICATIVE CONSULTANT INDIA**

**Parbati Golui**  
**Authorized Signatory**

# STATEMENT OF EFFLUENT DETAILS FOR THE YEAR - JAN, FEB. & MAR.' 2023

M/s. Graphite India Ltd., Dist – Burdwan, Durgapur, PIN - 713 211, (West Bengal)

| SL. NO. | Location   | Sampling Date | Sampling Time | Parameters   | Result |
|---------|--|---------------|---------------|--------------|--------|
| 1       | Near LWG # 4 Outlet  | 03.01.2023    | 3:15 PM       | pH (at 20°C) | 6.96   |
|         |  |               |               | TSS          | 38.0   |
|         |  |               |               | COD          | 161.9  |
|         |  |               |               | BOD          | 28.0   |
|         |  |               |               | Oil & Grease | 4.9    |
|         | Collected Treated Water from Common Waste Water Recycling Unit of Outfall LWG # 4 & Old Weigh Bridge | 02.02.2023    | 11:00 AM      | pH (at 20°C) | 7.35   |
|         |  |               |               | TSS          | 29.0   |
|         |  |               |               | COD          | 46.7   |
|         |  |               |               | BOD          | 8.17   |
|         |  |               |               | Oil & Grease | 2.7    |
|         | Collected Treated Water from Common Waste Water Recycling Unit of Outfall LWG # 4 & Old Weigh Bridge | 04.03.2023    | 10:10 AM      | pH (at 22°C) | 7.18   |
|         |  |               |               | TSS          | 33.0   |
|         |  |               |               | COD          | 40.4   |
|         |  |               |               | BOD          | 8.44   |
|         |  |               |               | Oil & Grease | 2.8    |
| 2       | Near Old Weigh Bridge Outlet   | 03.01.2023    | 3:50 PM       | pH (at 20°C) | 7.51   |
|         |  |               |               | TSS          | 21.0   |
|         |  |               |               | COD          | 28.8   |
|         |  |               |               | BOD          | 5.61   |
|         |  |               |               | Oil & Grease | 2.1    |
|         | Collected Untreated Water from Common Waste Water Recycling Unit of Outfall LWG # & Old Weigh Bridge | 02.02.2023    | 11:15 AM      | pH (at 20°C) | 6.86   |
|         |  |               |               | TSS          | 51.0   |
|         |  |               |               | COD          | 112.1  |
|         |  |               |               | BOD          | 20.0   |
|         |  |               |               | Oil & Grease | 4.2    |
|         | Collected Untreated Water from Common Waste Water Recycling Unit of Outfall LWG # & Old Weigh Bridge | 04.03.2023    | 10:20 AM      | pH (at 22°C) | 6.97   |
|         |  |               |               | TSS          | 48.0   |
|         |  |               |               | COD          | 90.9   |
|         |  |               |               | BOD          | 21.0   |
|         |  |               |               | Oil & Grease | 4.5    |
| 3       | Extrusion #2 ETP Outlet  | 03.01.2023    | 4:10 PM       | pH (at 20°C) | 7.63   |
|         |  |               |               | TSS          | 25.0   |
|         |  |               |               | COD          | 38.5   |
|         |  |               |               | BOD          | 7.12   |
|         |  |               |               | Oil & Grease | 2.2    |
|         |  | 02.02.2023    | 12:05 PM      | pH (at 20°C) | 6.93   |
|         |  |               |               | TSS          | 49.0   |
|         |  |               |               | COD          | 102.8  |



|  |  |            |         |              |       |
|--|--|------------|---------|--------------|-------|
|  |  | 04.03.2023 | 9:30 AM | BOD          | 19.0  |
|  |  |            |         | Oil & Grease | 4.3   |
|  |  |            |         | pH (at 22°C) | 6.89  |
|  |  |            |         | TSS          | 51.0  |
|  |  |            |         | COD          | 121.2 |
|  |  |            |         | BOD          | 24.0  |
|  |  |            |         | Oil & Grease | 4.1   |
|  |  |            |         |              |       |

*Checked By: A. Patra*

**For, Indicative Consultant India**

Parbati Golui  
(Quality Manager)  
Signatory Authority

## AMBIENT NOISE LEVEL MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Burdwan, Durgapur, PIN - 713 211, (West Bengal)

For the Month of FEB.'2023

Sampling Date : 13.02.2023 to 14.02.2023

Noise Level Leq. dB(A)

| LOCATIONS : |  | DAY TIME dB(A) |       |       | NIG   |
|-------------|--|----------------|-------|-------|-------|
|             |  | Leq            | Lmax. | Lmin. | Leq   |
| 1           | NORTH BOUNDARY WALL –NEAR MANDIR                         | 60.36          | 62.00 | 58.10 | 60.32 |
| 2           | NORTH BOUNDARY WALL –NEAR SECURITY BARRACK               | 67.02          | 68.40 | 65.90 | 60.71 |
| 3           | NORTH BOUNDARY WALL –BACK OF LWG # 3                     | 66.37          | 68.00 | 64.80 | 59.54 |
| 4           | CENTRE OF THE PLANT (NEAR PI UNIT # 1)                   | 66.01          | 67.20 | 64.70 | 60.74 |
| 5           | EAST BOUNDARY WALL - NEAR LWG # 4                        | 66.74          | 68.30 | 65.30 | 60.71 |
| 6           | WEST BOUNDARY WALL - NEAR PERSONAL OFFICE                | 64.58          | 66.20 | 62.70 | 60.19 |
| 7           | SOUTH BOUNDARY WALL –NEAR FINISHIG UNIT # 3              | 64.79          | 66.80 | 63.60 | 60.17 |
| 8           | SOUTH BOUNDARY WALL –BACK OF OLD STORE                   | 64.49          | 66.10 | 62.90 | 60.76 |
| 9           | SOUTH BOUNDARY WALL –BACK OF CANTEEN BUILDING            | 65.15          | 66.40 | 63.80 | 60.00 |
| 10          | EXTRUSION # 2 AREA (NORTH BOUNDARY WALL)                 | 67.63          | 69.40 | 65.80 | 60.02 |
| 11          | EXTRUSION # 2 AREA ( EAST BOUNDARY WALL)                 | 66.67          | 68.20 | 64.60 | 59.59 |
| 12          | EXTRUSION # 2 AREA ( SOUTH BOUNDARY WALL)                | 66.65          | 68.20 | 65.80 | 60.13 |
| 13          | EXTRUSION # 2 AREA (WEST BOUNDARY WALL )                 | 66.06          | 67.20 | 64.40 | 59.86 |
| 14          | EXTRUSION # 2 CENTRE OF THE PLANT –NEAR NEW WEIGH BRIDGE | 65.79          | 67.40 | 64.10 | 59.26 |

Checked By: A. Patra

For, Indicative Consultant Ir

Parbati Golui  
(Quality Manager)  
Signatory Authority



| HT TIME dB(A) |       |
|---------------|-------|
| Lmax.         | Lmin. |
| 62.00         | 57.40 |
| 62.60         | 58.60 |
| 61.10         | 57.40 |
| 62.20         | 58.80 |
| 62.20         | 58.80 |
| 61.20         | 58.90 |
| 62.60         | 58.80 |
| 62.40         | 58.90 |
| 61.20         | 58.70 |
| 62.40         | 57.60 |
| 61.40         | 57.90 |
| 62.00         | 58.70 |
| 61.20         | 57.60 |
| 60.20         | 57.60 |

ndia



# VENTILATION SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Paschim Burdwan, Durgapur, PIN - 713 211, (West Bengal)

For the month FEBRUARY' 2023

| SL. No. | Location                          | Sampling Date | Limit   | Parameter                   | Result                   |
|---------|-----------------------------------|---------------|---|-----------------------------|--------------------------|
| 1       | Extrusion #1<br>Mixer Floor       | 13.02.2023    | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 10277.40 m <sup>3</sup>  |
|         |                                   |               |   | Volume of air<br>Change/Hr  | 21870.22                 |
| 2       |                                   |               | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 33.0                     |
| 3       |                                   |               | Wet bulb less than 30°C                           | Temperature                 | 28.0                     |
| 1       | Extrusion #2<br>Press Floor       | 13.02.2023    | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 108291.60 m <sup>3</sup> |
|         |                                   |               |   | Volume of air<br>Change/Hr  | 825147.77                |
| 2       |                                   |               | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 42                       |
| 3       |                                   |               | Wet bulb less than 30°C                           | Temperature                 | 23                       |
| 1       | Baking RH-16<br>Shop Floor        | 09.02.2023    | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 280993.92 m <sup>3</sup> |
|         |                                   |               |   | Volume of air<br>Change/Hr  | 353710.05                |
| 2       |                                   |               | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 42.0                     |
| 3       |                                   |               | Wet bulb less than 30°C                           | Temperature                 | 29.0                     |
| 1       | Pitch<br>Impregnation<br>Unit # 3 | 11.02.2023    | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 59121.36 m <sup>3</sup>  |
|         |                                   |               |   | Volume of air<br>Change/Hr  | 90425.17                 |
| 2       |                                   |               | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 42.0                     |
| 3       |                                   |               | Wet bulb less than 30°C                           | Temperature                 | 28.0                     |
| 1       | LWG # 3                           | 10.02.2023    | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 349056.00 m <sup>3</sup> |
|         |                                   |               |   | Volume of air<br>Change/Hr  | 1622025.14               |
| 2       |                                   |               | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 40.0                     |
| 3       |                                   |               | Wet bulb less than 30°C                           | Temperature                 | 29.0                     |

|   |                      |            |   |                             |                          |
|---|----------------------|------------|---|-----------------------------|--------------------------|
| 1 | <b>Finishing # 1</b> | 09.02.2023 | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 75134.40 m <sup>3</sup>  |
|   |                      |            |   | Volume of air<br>Change/Hr  | 162045.11                |
| 2 |                      |            | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 33.0                     |
| 3 |                      |            | Wet bulb less than 30°C                           | Temperature                 | 24.0                     |
| 1 | <b>Finishing # 2</b> | 10.02.2023 | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 147585.24 m <sup>3</sup> |
|   |                      |            |   | Volume of air<br>Change/Hr  | 172145.11                |
| 2 |                      |            | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 40.0                     |
| 3 |                      |            | Wet bulb less than 30°C                           | Temperature                 | 26.0                     |
| 1 | <b>RH # 24 (II)</b>  | 14.02.2023 | Vol. of air Change/hr ><br>6 x Vol. of work place | Volume of work<br>Place x 6 | 590068.86 m <sup>3</sup> |
|   |                      |            |   | Volume of air<br>Change/Hr  | 756625.11                |
| 2 |                      |            | 30 m/min at work<br>Place at 1.5 m ht             | Velocity (avg)              | 37.2                     |
| 3 |                      |            | Wet bulb less than 30°C                           | Temperature                 | 29.0                     |

**For, INDICATIVE CONSULTANT INDIA**

**Parbati Golui**  
**Authorized Signatory**

# STATEMENT OF STACK EMISSION DETAILS FOR THE YEAR FEBRUARY-2023

M/s. Graphite India Ltd.

Date of Sampling : 02.11.2022 to 14.11.2022

| Sl. No. | Stack Attached to   | Stack No. | Fuel (Type & Quantity) | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C                     | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> mg/NM <sup>3</sup> | Nox mg/NM <sup>3</sup> | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|---------|---|-----------|------------------------|----------------|-------------------------|--------------------------------------|----------------------------------|-------------------------|-----------------------|------------------------------------|------------------------|---------------------|----------------|-------------------------|---|
| 1       | Mixture Fume Extractor (North) (Extrusion #1 Dept)          | 1         | Electricity            | 720            | 30000                   | 26000                                | 30                               | 18970.49                | 24.0                  | -                                  | -                      | -                   | 13.23          | N.A.                    | Nil   |
| 2       | Mixture Fume Extractor (South) (Extrusion#1 Dept)           | 2         | Electricity            | 406x406        | 30000                   | 16000                                | 27                               | 9153.30                 | 23.0                  | -                                  | -                      | -                   | 15.61          | N.A.                    | Nil   |
| 3       | Cooler North (Extrusion#1 Dept)                             | 3         | Electricity            | 550            | 30000                   | 15000                                | 29                               | 16019.13                | 20.00                 | -                                  | -                      | -                   | 19.08          | N.A.                    | Nil   |
| 4       | Cooler South (Extrusion#1 Dept)                             | 4         | Electricity            |                |                         |                                      | Production Unit Not In Operation |                         |                       |                                    |                        |                     |                | N.A.                    | Nil   |
| 5       | Fume Extractor (West side) weigh floor (Extrusion#1 Dept)   | 5         | Electricity            | 780            | 30000                   | 26000                                | 27                               | 26719.85                | 27.0                  | -                                  | -                      | -                   | 15.72          | N.A.                    | Nil   |
| 6       | Raymond Mill Dust Collector (Extrusion#1 Dept)              | 6         | Electricity            | 300x300        | 7000                    | 1600                                 | 29                               | 4157.08                 | 35.0                  | -                                  | -                      | -                   | 13.08          | N.A.                    | Bag Filter  |
| 7       | Scrap System Dust Collector (Extrusion#1 Dept)              | 7         | Electricity            | 600            | 7100                    | 5600                                 | 30                               | 10270.29                | 43.0                  | -                                  | -                      | -                   | 10.32          | N.A.                    | Bag Filter  |
| 8       | Main Dust Collector (Extrusion#1 Dept)                      | 8         | Electricity            | 700            | 22000                   | 15000                                | 29                               | 10437.43                | 61.0                  | -                                  | -                      | -                   | 7.68           | N.A.                    | Bag Filter  |
| 9       | Baking Milling Dust Collector                               | 9         | Electricity            | 760            | 10000                   | 4660                                 | 31                               | 19381.17                | 55.0                  | -                                  | -                      | -                   | 12.19          | N.A.                    | Bag Filter  |
| 10      | Baking Furnace (Fee. 1 to 5 side)                           | 10        | CBM                    | 1560           | 30000                   | 9650                                 | 174                              | 63853.08                | 63.0                  | 70.63                              | 70.15                  | 3.2                 | 14.27          | N.A.                    | Incinerator   |
| 11      | Baking Furnace (Fee. 6 to 10 side)                          | 11        | CBM                    | 1560           | 30000                   | 9650                                 | 162                              | 58839.71                | 66.0                  | 50.44                              | 77.8                   | 3.6                 | 12.80          | N.A.                    | Incinerator   |
| 12      | Ried Hammer Furnace (Baking Furnace) (14 SECTION)           | 12        | CBM                    | 800            | 30000                   | 10500                                | 84                               | 12255.64                | 59.0                  | 60.54                              | 63.27                  | 3.2                 | 8.28           | N.A.                    | E.S.P   |
| 13      | Ried Hammer Furnace (Baking Furnace)(RH16 & RH24-I SECTION) | 13        | CBM                    | 1800           | 45000                   | 33000                                | 76                               | 109442.01               | 61.0                  | 70.63                              | 59.80                  | 3.4                 | 14.27          | N.A.                    | E.S.P   |
| 14      | P.I. UNIT- 2 (THERMOPACK STACK)                             | 16        | CBM                    | 400            | 30000                   | 28000                                | 99                               | 2868.84                 | 61.0                  | 60.54                              | 68.31                  | 3.2                 | 8.12           | N.A.                    | Nil   |
| 15      | P.I. UNIT- 2 (HGG STACK)                                    | 17        | CBM                    | 400            | 30000                   | 28000                                | 65                               | 4390.47                 | 52.0                  | 50.45                              | 73.11                  | 3.4                 | 11.29          | N.A.                    | Water spray Cooling Chamber                         |
| 16      | LWG # 3(MILLING)  | 18        | Electricity            | 650            | 10670                   | 6700                                 | Production Unit Not In Operation |                         |                       |                                    |                        |                     |                | N.A.                    | Bag Filter  |
| 17      | Finishing Dust Collector (North) (Unit 1)                   | 19        | Electricity            | 700            | 13000                   | 4200                                 | 30                               | 12256.02                | 52.0                  | -                                  | -                      | -                   | 9.06           | N.A.                    | Bag Filter  |



| Sl. No. | Stack Attached to                                     | Stack No. | Fuel (Type & Quantity)           | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO2    | Nox mg/NM3 | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|---------|---|-----------|----------------------------------|----------------|-------------------------|--------------------------------------|--------------|-------------------------|-----------------------|--------|------------|---------------------|----------------|-------------------------|---|
| 18      | Finishing Dust Collector (Unit 2)                     | 20        | Electricity                      | 900            | 15000                   | 11000                                | 31           | 38852.32                | 64.0                  | -      | -          | -                   | 17.43          | N.A.                    | Bag Filter  |
| 19      | FINE SCREENING DUST COLLECTOR                         | 21        | Electricity                      | 560            | 9750                    | 6700                                 | 29           | 6361.52                 | 41.0                  | -      | -          | -                   | 7.33           | N.A.                    | Bag Filter  |
| 20      | Boiler (1.5 Ton/ 2Ton) 2 Ton Running                  | 22        | CBM (86 m <sup>3</sup> /Hr.)     | 280            | 29290                   | 13500                                | 116          | 1702.41                 | 75.0                  | 121.07 | 90.79      | 3.2                 | 10.25          | N.A.                    | Nil   |
| 21      | Tunnel Kiln – 1 (Re-baking Furnace)                   | 23        | CBM (140 Kg./Hr.)                | 730            | 30000                   | 18000                                | 111          | 7754.00                 | 29.0                  | 80.72  | 63.35      | 3.2                 | 6.78           | N.A.                    | Incinerator   |
| 22      | Finishing Dust Collector (Unit 3)                     | 24        | Electricity                      | 780            | 13000                   | 9000                                 | 30           | 17797.69                | 67.0                  | -      | -          | -                   | 10.63          | N.A.                    | Bag Filter  |
| 23      | P.I. Unit – 3 (HGG STACK)                             | 25        | CBM                              | 400            | 30000                   | 28000                                | 65           | 3791.74                 | 68.0                  | 70.63  | 68.43      | 3.4                 | 9.75           | N.A.                    | Water Spray Cooling Chamber                         |
| 24      | Tunnel Kiln – 2 (Re-baking Furnace)                   | 26        | CBM (140 Kg./Hr.)                | 730            | 30000                   | 18000                                | 116          | 9616.68                 | 25.0                  | 50.45  | 59.80      | 3.6                 | 8.52           | N.A.                    | Incinerator   |
| 25      | P.I. Unit – 3 (THERMOPACK STACK)                      | 27        | CBM                              | 400            | 30000                   | 28000                                | 84           | 2766.73                 | 70.0                  | 70.63  | 50.15      | 3.8                 | 7.41           | N.A.                    | Nil   |
| 26      | Extrusion -2 Department Thermic Flueid Heater         | 28        | CBM (138.4 Nm <sup>3</sup> /Hr.) | 580            | 30000                   | 20000                                | 60           | 6391.36                 | 31.0                  | 70.63  | 75.20      | 3.2                 | 7.68           | N.A.                    | Nil   |
| 27      | Extrusion #2 IRICH Dust Collector                     | 29        | Electricity                      | 300            | 34000                   | 28000                                | 28           | 4137.67                 | 50.0                  | -      | -          | -                   | 16.53          | N.A.                    | Bag Filter  |
| 28      | Extrusion #2 Main Dust Collector                      | 30        | Electricity                      | 1000           | 34000                   | 33000                                | 27           | 43665.49                | 71.0                  | -      | -          | -                   | 15.66          | N.A.                    | Bag Filter  |
| 29      | Extrusion #2 Raymond Mill Dust Collector              | 31        | Electricity                      | 230            | 12500                   | 10500                                | 31           | 2261.65                 | 76.0                  | -      | -          | -                   | 15.56          | N.A.                    | Bag Filter  |
| 30      | Extrusion #2 Silo Dust Collector                      | 32        | Electricity                      | 600            | 15000                   | 7000                                 | 29           | 14301.50                | 61.0                  | -      | -          | -                   | 14.34          | N.A.                    | Bag Filter  |
| 31      | Extrusion #2 IRICH (Trema) Scrubber System            | 33        | Electricity                      | 280            | 8000                    | 7000                                 | 30           | 9311.08                 | 41.0                  | -      | -          | -                   | 45.20          | N.A.                    | Scrubber System                                     |
| 32      | Acheson Dust Collector                                | 34        | Electricity                      | 800x320        | 18000                   | 10500                                | 30           | 11814.32                | 65.0                  | -      | -          | -                   | 13.11          | N.A.                    | Bag Filter  |
| 33      | Extrusion #2 Scrap system Dust collector              | 35        | Electricity                      | 650            | 17000                   | 8900                                 | 26           | 14938.76                | 62.0                  | -      | -          | -                   | 12.63          | N.A.                    | Bag Filter  |
| 34      | R.H.-24 (II) Furnace                                  | 36        | CBM (70 m <sup>3</sup> /Hr.)     | 1600           | 45000                   | 33000                                | 79           | 43457.24                | 36.0                  | 60.54  | 53.65      | 3.6                 | 7.26           | N.A.                    | E.S.P   |
| 35      | Finishing Unit – 3 (South Side) Nipple Dust Collector | 37        | Electricity                      | 700            | 15000                   | 8000                                 | 30           | 18687.81                | 33.0                  | -      | -          | -                   | 13.85          | N.A.                    | Bag Filter  |

|    | Stack Attached to                                  | Stack No. | Fuel (Type & Quantity)           | Inner dia (mm) | Height from ground (mm) | Height of sampling port from GL (mm) | Gas Temp. 0C | Flow Rate of gas NM3/hr | PM mg/NM <sup>3</sup> | SO <sub>2</sub> mg/NM <sup>3</sup> | Nox mg/NM3 | CO <sub>2</sub> (%) | Velocity (m/s) | Other Pollutants if any | Description of Air Pollution control devices if any |
|----|--|-----------|----------------------------------|----------------|-------------------------|--------------------------------------|--------------|-------------------------|-----------------------|------------------------------------|------------|---------------------|----------------|-------------------------|---|
| 36 | Finishing Unit – 2 Nipple line Dust Collector      | 38        | Electricity                      | 610            | 11580                   | 9140                                 | 31           | 7822.21                 | 46.00                 | -                                  | -          | -                   | 7.66           | N.A.                    | Bag Filter  |
| 37 | R.H.-16 Stock Cleaning Machine Dust Collector      | 39        | Electricity                      | 400 × 600      | 10000                   | 7000                                 | 33           | 6411.74                 | 44.00                 | -                                  | -          | -                   | 7.71           | N.A.                    | Bag Filter  |
| 38 | R.H.-24 (II) Stock Cleaning Machine Dust Collector | 40        | Electricity                      | 650            | 30000                   | 15000                                | 32           | 10367.79                | 37.0                  | -                                  | -          | -                   | 8.96           | N.A.                    | Bag Filter  |
| 39 | Turning-1 Dust Collector                           | 41        | Electricity                      | 250            | 15000                   | 3000                                 | 31           | 1315.66                 | 51.0                  | -                                  | -          | -                   | 7.68           | N.A.                    | Bag Filter  |
| 40 | P.I.-2 Turning Machine Dust Collector              | 42        | Electricity                      | 250            | 15000                   | 3000                                 | 31           | 4244.6                  | 64.0                  | -                                  | -          | -                   | 24.77          | N.A.                    | Bag Filter  |
| 41 | P.I-3 Turning Machine Dust Collector               | 43        | Electricity                      | 250            | 15000                   | 3000                                 | 33           | 1552.31                 | 41.0                  | -                                  | -          | -                   | 9.12           | N.A.                    | Bag Filter  |
| 42 | P.I Unit- 4 (THERMOPACK STACK)                     | 44        | CBM<br>(100 m <sup>3</sup> /Hr.) | 950            | 30500                   | 18800                                | 189          | 11773.44                | 62.0                  | 80.72                              | 52.61      | 3.0                 | 7.3            | N.A.                    | Nil   |
| 43 | P.I.-4 Pre-Heater                                  | 45        | CBM<br>(60 m <sup>3</sup> /Hr.)  | 1150           | 35800                   | 21200                                | 52           | 19827.84                | 48.0                  | 60.54                              | 48.54      | 3.4                 | 5.9            | N.A.                    | Nil   |
| 44 | RH-24 (II) Jaw Crusher Machine Dust Collector      | 46        | Electricity                      | 480            | 22000                   | 10000                                | 31           | 4851.49                 | 30.0                  | -                                  | -          | -                   | 7.67           | N.A.                    | Bag Filter  |
| 45 | Ried Hammer-16 Jaw Crusher Dust Collector          | 47        | Electricity                      | 800            | 12000                   | 6400                                 | 32           | 13164.56                | 26.0                  | -                                  | -          | -                   | 7.53           | N.A.                    | Bag Filter  |
| 46 | R.H.-24 (I) Stock Cleaning Dust Collector          | 48        | Electricity                      | 300            | 10670                   | 4570                                 | 32           | 2652.33                 | 38.0                  | -                                  | -          | -                   | 10.74          | N.A.                    | Bag Filter With Cyclone Separator                   |
| 47 | Core Sampling Dust Collector                       | 49        | Electricity                      | 250            | 6000                    | 4500                                 | 30           | 1319.95                 | 34.0                  | -                                  | -          | -                   | 7.66           | N.A.                    | Bag Filter With Cyclone Separator                   |
| 48 | CBS Dust Collector                                 | 50        | Electricity                      | 600            | 12000                   | 5000                                 | 30           | 15405.88                | 51.0                  | -                                  | -          | -                   | 15.53          | N.A.                    | Bag Filter  |

**For, Indicative Consultant India**

*Checked By: A. Patra*

Parbati Golui  
(Quality Manager)  
Signatory Authority

*Limit : SPM = 150 mg/Nm<sup>3</sup> , Ref. : Consent of operate under section 25 & 26 of the Water (Prevention and Control of Pollution) Act.1974 & Sec.21 of the Air (Prevention and Control of Pollution) Act.1981, Consent letter No.*

**Pollution Ambient Air Average concentration for Quarter 1 YEAR 2023 around the plant surroundings**

*Ref : National Ambient Air Quality Standards vide Central Pollution Control Board, New Delhi Notification dated 18th November '2009*

Sampling Period: 01.02.2023 to 09.02.2023

*All figures are in micro gms / N cub. Mt*

|                      |                          |                        | Parameters in µg / m <sup>3</sup> |       |                 |                 | Parameters in mg / m <sup>3</sup> | Parameters in µg / m <sup>3</sup> |         |                 |       | Parameters in ng / m <sup>3</sup> |    |    | Location            | Direction wrt Plant Land | Close to      |
|----------------------|--------------------------|------------------------|-----------------------------------|-------|-----------------|-----------------|-----------------------------------|-----------------------------------|---------|-----------------|-------|-----------------------------------|----|----|---------------------|--------------------------|---------------|
| Max limit            |                          |                        | 60                                | 100   | 80              | 80              | 2                                 | 1                                 | 5       | 400             | 100   | 1                                 | 6  | 20 |                     |                          |               |
| LOCATION             | Sampling Date            | Sampling Time          | PM2.5                             | PM10  | SO <sub>2</sub> | NO <sub>2</sub> | CO                                | Pb                                | Benzene | NH <sub>3</sub> | Ozone | Benzo(a) Pyrene                   | As | Ni |                     |                          |               |
| New Extrusion Campus |                          |                        |                                   |       |                 |                 |                                   |                                   |         |                 |       |                                   |    |    |                     |                          |               |
| A                    | 01.02.2023               | 10:00 AM to 06:00 PM   | 40.10                             | 87.09 | 20.69           | 39.26           | 0.2716                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion #2 Campus | East Side                | Boundary wall |
|                      | 01.02.2023 to 02.02.2023 | 06:30 PM to 02:30 AM   | 36.07                             | 80.45 | 23.80           | 46.56           | 0.3088                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
|                      | 02.02.2023               | 03:00 AM to 11:00 AM   | 32.58                             | 74.93 | 17.59           | 41.08           | 0.3407                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| Average              |                          |                        | 36.25                             | 80.82 | 20.69           | 42.30           | 0.3070                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| B                    | 01.02.2023               | 10:30 AM to 06:30 PM   | 38.85                             | 91.30 | 18.62           | 41.99           | 0.2779                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion #2 Campus | North Side               | Boundary wall |
|                      | 01.02.2023 to 02.02.2023 | 07:00 PM to 03:00 AM   | 33.58                             | 82.41 | 21.73           | 44.73           | 0.2933                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
|                      | 02.02.2023               | 03:30 AM to 11:30 AM   | 30.08                             | 75.15 | 15.52           | 37.43           | 0.3401                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| Average              |                          |                        | 34.17                             | 82.95 | 18.62           | 41.38           | 0.3038                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| C                    | 02.02.2023               | 11:30 AM to 07:30 PM   | 46.37                             | 90.46 | 20.69           | 41.08           | 0.3141                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion#2 Campus  | South Side               | Boundary wall |
|                      | 02.02.2023 to 03.02.2023 | 08:00 PM to 04:00 AM   | 34.83                             | 85.17 | 16.55           | 37.43           | 0.3469                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
|                      | 03.02.2023               | 04:30 AM to 12:30 PM   | 42.71                             | 94.66 | 17.59           | 42.91           | 0.3628                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| Average              |                          |                        | 41.30                             | 90.10 | 18.28           | 40.47           | 0.3413                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |
| D                    | 02.02.2023               | 12:00 Noon to 08:00 PM | 32.58                             | 78.48 | 21.73           | 41.08           | 0.2652                            | -                                 | -       | -               | -     | -                                 | -  | -  | Extrusion #2 Campus | West Side                | Boundary wall |
|                      | 02.02.2023 to 03.02.2023 | 08:30 PM to 04:30 AM   | 29.85                             | 75.54 | 16.55           | 37.43           | 0.2966                            | -                                 | -       | -               | -     | -                                 | -  | -  |                     |                          |               |



|                                  |                                |                            |              |              |              |              |               |            |            |            |              |            |            |            |  |                    |                               |
|----------------------------------|--------------------------------|----------------------------|--------------|--------------|--------------|--------------|---------------|------------|------------|------------|--------------|------------|------------|------------|--|--------------------|-------------------------------|
|                                  | 03.02.2023                     | 05:00 AM<br>to<br>01:00 PM | 36.34        | 86.21        | 23.80        | 43.82        | 0.3471        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>32.92</b> | <b>80.08</b> | <b>20.69</b> | <b>40.78</b> | <b>0.3030</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| E                                | 03.02.2023                     | 09:00 AM<br>to<br>05:00 PM | 39.80        | 92.17        | 22.76        | 44.73        | 0.2791        | BDL        | BDL        | BDL        | 38.10        | BDL        | BDL        | BDL        | <b>Extrusion#2<br/>Campus</b>  | Center<br>Location | Near New Road<br>Weigh Bridge |
|                                  | 03.02.2023<br>to<br>04.02.2023 | 05:30 PM<br>to<br>01:30 AM | 33.83        | 82.79        | 15.52        | 41.99        | 0.3228        | BDL        | BDL        | BDL        | -            | BDL        | BDL        | BDL        |  |                    |                               |
|                                  | 04.02.2023                     | 02:00 AM<br>to<br>10:00 AM | 30.08        | 76.18        | 18.62        | 37.43        | 0.3605        | BDL        | BDL        | BDL        | -            | BDL        | BDL        | BDL        |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>34.57</b> | <b>83.71</b> | <b>18.97</b> | <b>41.38</b> | <b>0.3208</b> | <b>BDL</b> | <b>BDL</b> | <b>BDL</b> | <b>38.10</b> | <b>BDL</b> | <b>BDL</b> | <b>BDL</b> |  |                    |                               |
| <b>Graphite Old Plant Campus</b> |                                |                            |              |              |              |              |               |            |            |            |              |            |            |            |  |                    |                               |
| F                                | 03.02.2023                     | 09:30 AM<br>to<br>05:30 PM | 37.59        | 85.15        | 20.69        | 41.99        | 0.2766        | -          | -          | -          | -            | -          | -          | -          | <b>Near<br/>Personnel<br/>Office<br/>(Graphite<br/>Old Plant)</b>        | West Side          | Boundary wall                 |
|                                  | 03.02.2023<br>to<br>04.02.2023 | 06:00 PM<br>to<br>02:00 AM | 33.58        | 77.69        | 22.76        | 46.56        | 0.3148        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 04.02.2023                     | 02:30 AM<br>to<br>10:30 AM | 31.41        | 73.46        | 18.62        | 39.26        | 0.3691        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>34.19</b> | <b>78.77</b> | <b>20.69</b> | <b>42.60</b> | <b>0.3202</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| G                                | 06.02.2023                     | 09:00 AM<br>to<br>05:00 PM | 48.51        | 89.18        | 21.73        | 45.65        | 0.2658        | -          | -          | -          | -            | -          | -          | -          | <b>Near<br/>Security<br/>Barrack<br/>(Graphite<br/>Old Plant)</b>        | North Side         | Boundary wall                 |
|                                  | 06.02.2023<br>to<br>07.02.2023 | 05:30 PM<br>to<br>01:30 AM | 38.85        | 81.50        | 18.62        | 41.99        | 0.3012        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 07.02.2023                     | 02:00 AM<br>to<br>10:00 AM | 32.58        | 76.05        | 15.52        | 35.60        | 0.3514        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>39.98</b> | <b>82.24</b> | <b>18.62</b> | <b>41.08</b> | <b>0.3061</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| H                                | 06.02.2023                     | 09:30 AM<br>to<br>05:30 PM | 41.20        | 90.55        | 21.73        | 48.38        | 0.2769        | -          | -          | -          | -            | -          | -          | -          | <b>At the east<br/>of LWG<br/>4 &amp; 5<br/>(Graphite<br/>Old Plant)</b> | East Side          | Boundary wall                 |
|                                  | 06.02.2023<br>to<br>07.02.2023 | 06:00 PM<br>to<br>02:00 AM | 36.11        | 83.33        | 23.80        | 43.82        | 0.3248        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 07.02.2023                     | 02:30 AM<br>to<br>10:30 AM | 32.66        | 78.30        | 18.62        | 40.17        | 0.3671        | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
| <b>Average</b>                   |                                |                            | <b>36.66</b> | <b>84.06</b> | <b>21.38</b> | <b>44.12</b> | <b>0.3229</b> | -          | -          | -          | -            | -          | -          | -          |  |                    |                               |
|                                  | 07.02.2023                     | 10:30 AM<br>to<br>06:30 PM | 38.56        | 86.40        | 17.59        | 41.99        | 0.2878        | -          | -          | -          | -            | -          | -          | -          | <b>Near South</b>  |                    |                               |

|         |                                |                              |       |       |       |       |        |     |     |     |       |     |     |     |   |                    |                                   |
|---------|--------------------------------|------------------------------|-------|-------|-------|-------|--------|-----|-----|-----|-------|-----|-----|-----|---|--------------------|-----------------------------------|
| I       | 07.02.2023<br>to<br>08.02.2023 | 07:00 PM<br>to<br>03:00 AM   | 42.61 | 91.67 | 22.76 | 45.65 | 0.3306 | -   | -   | -   | -     | -   | -   | -   | side of<br>Tunnel Kiln<br>(Graphite<br>Old Plant) | South Side         | Boundary wall                     |
|         | 08.02.2023                     | 03:30 AM<br>to<br>11:30 AM   | 33.83 | 82.07 | 18.62 | 35.60 | 0.3751 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| Average |                                |                              | 38.33 | 86.71 | 19.66 | 41.08 | 0.3312 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| J       | 07.02.2023                     | 11:00 AM<br>to<br>07:00 PM   | 44.78 | 94.20 | 18.62 | 41.99 | 0.3017 | BDL | BDL | BDL | 40.1  | BDL | BDL | BDL | Graphite<br>Old Plant                             | Center<br>Location | West side of<br>Shipping Unit # 2 |
|         | 07.02.2023<br>to<br>08.02.2023 | 07:30 PM<br>to<br>03:30 AM   | 48.87 | 98.47 | 22.76 | 46.56 | 0.3409 | BDL | BDL | BDL | -     | BDL | BDL | BDL |   |                    |                                   |
|         | 08.02.2023                     | 04:00 AM<br>to<br>12:00 Noon | 35.09 | 83.15 | 15.52 | 37.43 | 0.3972 | BDL | BDL | BDL | -     | BDL | BDL | BDL |   |                    |                                   |
| Average |                                |                              | 42.91 | 91.94 | 18.97 | 41.99 | 0.3466 | BDL | BDL | BDL | 40.10 | BDL | BDL | BDL |   |                    |                                   |
| K       | 08.02.2023                     | 12:00 Noon<br>to<br>08:00 PM | 47.26 | 89.36 | 23.80 | 44.73 | 0.3355 | -   | -   | -   | -     | -   | -   | -   | Near Baking<br>Furnace RH<br>16 Section           | North Side         | Boundary wall                     |
|         | 08.02.2023<br>to<br>09.02.2023 | 08:30 PM<br>to<br>04:30 AM   | 35.09 | 75.25 | 17.59 | 36.52 | 0.3721 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
|         | 09.02.2023                     | 05:00 AM<br>to<br>01:00 PM   | 42.61 | 82.43 | 19.66 | 41.08 | 0.2892 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| Average |                                |                              | 41.65 | 82.35 | 20.35 | 40.78 | 0.3323 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| L       | 08.02.2023                     | 12:30 PM<br>to<br>08:30 PM   | 39.80 | 81.20 | 21.73 | 44.73 | 0.3078 | -   | -   | -   | -     | -   | -   | -   | Near RH-<br>24 (II)                               | South Side         | Boundary wall                     |
|         | 08.02.2023<br>to<br>09.02.2023 | 09:00 PM<br>to<br>05:00 AM   | 33.83 | 72.56 | 16.55 | 35.60 | 0.3591 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
|         | 09.02.2023                     | 05:30 AM<br>to<br>01:30 PM   | 36.34 | 79.35 | 19.66 | 40.17 | 0.2844 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |
| Average |                                |                              | 36.66 | 77.70 | 19.31 | 40.17 | 0.3171 | -   | -   | -   | -     | -   | -   | -   |   |                    |                                   |

For, Indicative Consultant India

Parbati Golui  
(Quality Manager)  
Signatory Authority

Checked By: A. Patra

# NOISE LEVEL MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Paschim Burdwan, Durgapur, PIN - 713 211, (West Bengal)

Register Containing Particulars for Noise Level Monitoring.

For the month FEBRUARY - 2023

| Sl. No. | Name of Locations                    | Parameter              |                        | Sampling Instrument Used | Sound Level dB(A)  | Average Reading | Total Time | Limit   | Reference Method | Number of Persons exposed | Signature of person taking sample | Name in block letters |
|---------|--------------------------------------|------------------------|------------------------|--------------------------|--|-----------------|------------|---|------------------|---------------------------|-----------------------------------|-----------------------|
| 1       | EXTRUSION #1 Mixer Floor             | Noise Level Monitoring | 09.02.2023<br>09:40 AM | Annexure- I              | 82.6, 81.4, 83.2, 82.4, 81.6, 82.9, 83.0, 81.4, 82.2, 83.5 | 82.4            | 8 hrs.     | Exposure Limit for Industrial workers (8 hrs.) = 90 dB(A) | Annexure- I      | 3                         |                                   |                       |
| 2       | EXTRUSION #1 Weigh Floor             |                        | 09.02.2023<br>10:20 AM |                          | 80.4, 82.4, 81.6, 82.0, 82.9, 83.2, 81.4, 82.2, 81.5, 82.8 | 82.0            |            |   |                  |                           |                                   |                       |
| 3       | EXTRUSION #1 Cooler Floor            |                        | 09.02.2023<br>11:55 AM |                          | 80.6, 82.4, 81.6, 82.0, 81.2, 82.9, 81.8, 82.9, 83.2, 81.8 | 82.0            |            |   |                  |                           |                                   |                       |
| 4       | EXTRUSION #1 Press Floor             |                        | 09.02.2023<br>12:30 PM |                          | 80.2, 79.4, 81.4, 82.1, 79.9, 81.0, 82.0, 81.6, 82.1, 79.4 | 80.9            |            |   |                  |                           |                                   |                       |
| 5       | EXTRUSION #2 Press Floor             |                        | 10.02.2023<br>04:15 PM |                          | 82.0, 82.2, 81.9, 82.5, 81.0, 81.8, 82.4, 81.1, 81.5, 82.0 | 81.9            |            |   |                  |                           |                                   |                       |
| 6       | EXTRUSION #2 14 Meter Floor          |                        | 10.02.2023<br>04:50 PM |                          | 81.4, 82.6, 81.8, 82.4, 82.9, 81.5, 80.9, 81.4, 82.6, 82.0 | 82.0            |            |   |                  |                           |                                   |                       |
| 7       | Baking RC Shop Floor                 |                        | 09.02.2023<br>02:00 PM |                          | 83.1, 81.2, 82.4, 83.1, 82.2, 81.6, 82.2, 82.9, 81.8, 80.8 | 82.1            |            |   |                  |                           |                                   |                       |
| 8       | Baking RH- 14 Section Shop Floor     |                        | 09.02.2023<br>01:00 PM |                          | 82.4, 81.6, 82.2, 81.8, 82.0, 81.6, 82.2, 82.7, 81.7, 80.8 | 81.9            |            |   |                  |                           |                                   |                       |
| 9       | Baking RH- 16 Shop Floor             |                        | 09.02.2023<br>02:35 PM |                          | 82.4, 81.6, 82.3, 82.0, 81.9, 82.4, 83.0, 81.8, 82.4, 82.6 | 82.2            |            |   |                  |                           |                                   |                       |
| 10      | Baking RH- 24 (I) Section Shop Floor |                        | 09.02.2023<br>03:05 PM |                          | 82.4, 81.6, 81.8, 80.8, 82.0, 81.1, 82.0, 81.8, 82.1, 80.9 | 81.7            |            |   |                  |                           |                                   |                       |
| 11      | Baking RH – 24 (II)                  |                        | 09.02.2023<br>04:10 PM |                          | 82.0, 81.6, 82.5, 81.6, 80.9, 80.8, 81.3, 82.2, 81.0, 81.9 | 81.6            |            |   |                  |                           |                                   |                       |
| 12      | Baking Tunnel Kiln                   |                        | 09.02.2023<br>03:40 PM |                          | 82.3, 82.4, 81.5, 82.8, 81.9, 81.4, 82.3, 82.0, 82.6, 82.5 | 82.2            |            |   |                  |                           |                                   |                       |
| 13      | Pitch Impregnation Unit # 2 Shop     |                        | 09.02.2023<br>04:40 PM |                          | 83.5, 81.8, 82.4, 82.9, 82.3, 83.4, 82.5, 83.0, 82.8, 81.9 | 82.7            |            |   |                  |                           |                                   |                       |
| 14      | Pitch Impregnation Unit # 3 Shop     |                        | 09.02.2023<br>05:10 PM |                          | 82.4, 83.0, 82.2, 81.9, 82.2, 81.6, 82.1, 82.4, 81.8, 82.0 | 82.2            |            |   |                  |                           |                                   |                       |
| 15      | Pitch Impregnation Unit # 4 Shop     |                        | 10.02.2023<br>09:35 AM |                          | 81.1, 83.0, 80.6, 81.4, 81.6, 82.4, 81.9, 82.0, 81.6, 81.8 | 81.7            |            |   |                  |                           |                                   |                       |
| 16      | LWG # 3 Shop                         |                        | 10.02.2023<br>10:10 AM |                          | 81.9, 82.4, 82.6, 82.9, 80.9, 81.6, 82.0, 82.6, 81.1, 82.3 | 82.0            |            |   |                  |                           |                                   |                       |

T.  
SUTRADHAR

S.  
CHATTARAJ



|    |  |                        |   |             |  |  |  |  |  |  |
|----|--|------------------------|---|-------------|--|--|--|--|--|--|
| 17 | LWG # 4 Shop                             | 10.02.2023<br>10:40 AM | 83.6, 82.6, 82.0, 81.9, 82.0,<br>81.7, 82.9, 83.0, 82.4, 83.8 | <b>82.6</b> |  |  |  |  |  |  |
| 18 | LWG Unit # 4 (Auto Dust<br>Bagging Area) | 10.02.2023<br>11:10 AM | 79.4, 81.2, 78.8, 80.4, 77.8,<br>79.0, 81.9, 82.0, 79.4, 78.1 | <b>79.8</b> |  |  |  |  |  |  |
| 19 | LWG # 5 Shop                             | 10.02.2023<br>11:50 AM | 81.6, 82.4, 82.9, 82.0, 81.1,<br>80.9, 80.6, 80.9, 81.9, 82.0 | <b>81.6</b> |  |  |  |  |  |  |
| 20 | Finishing # 1 Shop Floor                 | 10.02.2023<br>12:25 PM | 82.0, 81.4, 81.9, 82.1, 83.0,<br>82.4, 81.6, 82.0, 81.9, 82.0 | <b>82.0</b> |  |  |  |  |  |  |
| 21 | Finishing #2 Shop Floor                  | 10.02.2023<br>01:05 PM | 81.6, 82.4, 81.9, 82.0, 81.4,<br>82.6, 82.4, 81.6, 82.0, 80.9 | <b>81.9</b> |  |  |  |  |  |  |
| 22 | Finishing # 3 Shop Floor                 | 10.02.2023<br>01:50 PM | 81.4, 79.9, 80.8, 81.0, 79.9,<br>80.2, 81.1, 81.6, 82.3, 81.4 | <b>81.0</b> |  |  |  |  |  |  |
| 23 | Graphite Acheson Shop                    | 10.02.2023<br>02:20 PM | 79.6, 80.1, 82.1, 79.4, 78.8,<br>79.1, 78.4, 79.9, 80.0, 82.2 | <b>80.0</b> |  |  |  |  |  |  |
| 24 | Graphite Fines Screening<br>Shop         | 10.02.2023<br>02:55 PM | 80.6, 81.9, 82.0, 81.8, 83.1,<br>82.9, 82.2, 80.6, 81.5, 82.2 | <b>81.9</b> |  |  |  |  |  |  |
| 25 | Core Sample Shed                         | 10.02.2023<br>03:30 PM | 81.2, 80.6, 81.1, 81.7, 81.5,<br>82.4, 80.2, 79.8, 81.1, 80.8 | <b>81.0</b> |  |  |  |  |  |  |

For, INDICATIVE CONSULTANT INDIA

**Parbati Golui**  
Authorized Signatory

# WORKZONE AIR MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Paschim Burdwan, Durgapur, PIN - 713 211, (West Bengal)

Register Containing Particulars for Workzone Air Monitoring.

For the month of FEBRUARY-2023

| Sl. No. | Location / Operation Monitoring | Identified Contaminant | Date of Monitoring | Sampling Instrument Used | Airborne Contamination |            | TWA Concentration as given in 2nd Schedule (mg/M3) | Reference Method | Number of workers exposed at the location being monitored |                     | Remarks   | Signature of person taking Samples | Name in block letters |
|---------|---------------------------------|------------------------|--------------------|--------------------------|------------------------|------------|--|------------------|---|---------------------|-----------|------------------------------------|-----------------------|
|         |                                 |                        |                    |                          | No. of sample          | Avg. mg/M3 |  |                  | Continuous Exposure                                       | Short term Exposure |           |                                    |                       |
| 1       | Extrusion #1 Press Floor        | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.084      | 10.0   | Annexure- I      | 3   | -                   | Below PEL |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.445      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.020      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.044      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 2       | Extrusion #1 Weigh Floor        | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.065      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.315      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.020      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.042      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 3       | Extrusion #1 Mixer Floor        | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.112      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.274      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.019      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.038      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 4       | Extrusion #1 Cooler Floor       | SPM                    | 06.02.2023         | Annexure- I              | 3                      | 1.025      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.424      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.023      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.042      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 5       | Extrusion #2 Press Floor        | SPM                    | 07.02.2023         | Annexure- I              | 3                      | 0.906      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.332      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.020      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.040      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |
| 6       | Extrusion #2 14mt. Floor        | SPM                    | 07.02.2023         | Annexure- I              | 3                      | 1.437      | 10.0   | Annexure- I      | 3   | -                   | -Do-      |                                    | T. SUTRADHAR          |
|         |                                 | RPM                    |                    |                          |                        | 0.685      | 5.0  |                  |   | -                   | -Do-      |                                    | S. CHATTARAJ          |
|         |                                 | SO2                    |                    |                          |                        | 0.021      | 5.0  |                  |   | -                   | -Do-      |                                    |                       |
|         |                                 | NOx                    |                    |                          |                        | 0.042      | 6.0  |                  |   | -                   | -Do-      |                                    |                       |

|    |                                  |     |            |             |   |       |      |             |   |   |      |  |              |
|----|----------------------------------|-----|------------|-------------|---|-------|------|-------------|---|---|------|--|--------------|
| 7  | Baking R-C Shop                  | SPM | 07.02.2023 | Annexure- I | 3 | 1.470 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.569 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.039 | 6.0  |             |   | - | -Do- |  |              |
| 8  | Baking RH 16 Shop Floor          | SPM | 07.02.2023 | Annexure- I | 3 | 2.379 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.868 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.038 | 6.0  |             |   | - | -Do- |  |              |
| 9  | Baking RH 24 (I) Shop Floor      | SPM | 08.02.2023 | Annexure- I | 3 | 1.985 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.124 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 10 | Baking Tunnel Kiln Shop          | SPM | 08.02.2023 | Annexure- I | 3 | 2.554 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.517 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.043 | 6.0  |             |   | - | -Do- |  |              |
| 11 | Pitch Impregnation Unit # 2 Shop | SPM | 08.02.2023 | Annexure- I | 3 | 2.564 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.211 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.042 | 6.0  |             |   | - | -Do- |  |              |
| 12 | Pitch Impregnation Unit # 3 Shop | SPM | 08.02.2023 | Annexure- I | 3 | 1.935 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.918 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 13 | Graphite Acheson Shop            | SPM | 09.02.2023 | Annexure- I | 3 | 2.731 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.230 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.042 | 6.0  |             |   | - | -Do- |  |              |
| 14 | LWG # 3 Shop                     | SPM | 09.02.2023 | Annexure- I | 3 | 2.405 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 1.167 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.038 | 6.0  |             |   | - | -Do- |  |              |
| 15 | LWG # 4 Shop                     | SPM | 09.02.2023 | Annexure- I | 3 | 1.874 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |                                  | RPM |            |             |   | 0.748 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |                                  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |                                  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |



|    |  |     |            |             |   |       |      |             |   |   |      |  |              |
|----|--|-----|------------|-------------|---|-------|------|-------------|---|---|------|--|--------------|
| 16 | LWG # 5 Shop                                       | SPM | 09.02.2023 | Annexure- I | 3 | 1.462 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 0.586 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.044 | 6.0  |             |   | - | -Do- |  |              |
| 17 | Finishing # 1 Shop Floor                           | SPM | 10.02.2023 | Annexure- I | 3 | 2.190 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.145 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.039 | 6.0  |             |   | - | -Do- |  |              |
| 18 | Finishing # 2 Shop Floor                           | SPM | 10.02.2023 | Annexure- I | 3 | 2.276 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.461 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.023 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 19 | Finishing # 3 Shop Floor                           | SPM | 10.02.2023 | Annexure- I | 3 | 2.599 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.240 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.037 | 6.0  |             |   | - | -Do- |  |              |
| 20 | Graphite Fines Screening Shop                      | SPM | 10.02.2023 | Annexure- I | 3 | 2.934 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.611 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 21 | Canteen (Kitchen Area)                             | SPM | 11.02.2023 | Annexure- I | 3 | 1.163 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 0.660 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.018 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.041 | 6.0  |             |   | - | -Do- |  |              |
| 22 | RH-24 (II)   | SPM | 11.02.2023 | Annexure- I | 3 | 1.298 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 0.760 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.021 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 23 | P1 Unit # 4  | SPM | 11.02.2023 | Annexure- I | 3 | 2.514 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.313 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 24 | LWG Unit-4 Auto Dust Bagging Area (During Bagging) | SPM | 11.02.2023 | Annexure- I | 3 | 3.841 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |  | RPM |            |             |   | 1.900 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |  | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |  | NOx |            |             |   | 0.045 | 6.0  |             |   | - | -Do- |  |              |

|    |   |     |            |             |   |       |      |             |   |   |      |  |              |
|----|---|-----|------------|-------------|---|-------|------|-------------|---|---|------|--|--------------|
| 25 | Store Shop Floor                                | SPM | 13.02.2023 | Annexure- I | 3 | 3.273 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |   | RPM |            |             |   | 2.181 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |   | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |   | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 26 | Maintanance Shop Floor                          | SPM | 13.02.2023 | Annexure- I | 3 | 3.246 | 10.0 | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |   | RPM |            |             |   | 1.921 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |   | SO2 |            |             |   | 0.020 | 5.0  |             |   | - | -Do- |  |              |
|    |   | NOx |            |             |   | 0.040 | 6.0  |             |   | - | -Do- |  |              |
| 27 | LWG # 5 Auto Dust Bagging Area (During Bagging) | SPM | 13.02.2023 | Annexure- I | 3 | 3.847 | 1.0  | Annexure- I | 3 | - | -Do- |  | T. SUTRADHAR |
|    |   | RPM |            |             |   | 2.404 | 5.0  |             |   | - | -Do- |  | S. CHATTARAJ |
|    |   | SO2 |            |             |   | 0.019 | 5.0  |             |   | - | -Do- |  |              |
|    |   | NOx |            |             |   | 0.039 | 6.0  |             |   | - | -Do- |  |              |

# PEL – Permissible Exposure Limit.

For, INDICATIVE CONSULTANT INDIA

Parbati Golui  
Authorized Signatory

# WORKZONE AIR MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Burdwan, Durgapur, PIN - 713 211, (West Bengal)

Register Containing Particulars for **Workzone Air Monitoring.**

For the month of FEBRUARY'2023

| Sl. No. | Location / Operation Monitoring | Identified Contaminant | Date & Time of Monitoring | Air Contaminants | TWA Concentration as given in Factory's Act :2nd Schedule (mg/m <sup>3</sup> ) | Sampling Instrument used and Reference method | Remarks   | Signature | Name in block letters |
|---------|---------------------------------|------------------------|---------------------------|------------------|--|---|-----------|-----------|-----------------------|
| 1       | RC – 1 Baking Furnace Shop      | Methyl Alcohol         | 07.02.2023                | 32.5             | 260  | Annexure- I                                   | Below PEL |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | Nil              | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | 50               | 375  |   | -Do-      |           |                       |
| 2       | Reid Hammer 24 (I) Section Shop | Methyl Alcohol         | 11.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 3       | Baking Tunnel Kiln Shop         | Methyl Alcohol         | 08.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 4       | P.I. Unit – 2 Shop              | Methyl Alcohol         | 08.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 5       | Acheson Furnace Shop            | Methyl Alcohol         | 09.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |
| 6       | LWG – 4 Shop                    | Methyl Alcohol         | 09.02.2023                | <0.1             | 260  | Annexure- I                                   | -Do-      |           | A.                    |
|         |                                 | Ethyl Alcohol          |                           | <0.1             | 1900   |   | -Do-      |           | BHATTACHARYA          |
|         |                                 | Formic Acid            |                           | <0.05            | 9  |   | -Do-      |           |                       |
|         |                                 | Benzene                |                           | <0.05            | 20   |   | -Do-      |           | S. CHATTARAJ          |
|         |                                 | Toluene                |                           | <0.05            | 375  |   | -Do-      |           |                       |



**For, INDICATIVE CONSULTANT INDIA**

**Parbati Golui**  
**Authorized Signatory**

# STATEMENT OF EFFLUENT DETAILS FOR THE YEAR - JAN, FEB. & MAR.' 2023

M/s. Graphite India Ltd., Dist – Burdwan, Durgapur, PIN - 713 211, (West Bengal)

| SL. NO. | Location   | Sampling Date | Sampling Time | Parameters   | Result |
|---------|--|---------------|---------------|--------------|--------|
| 1       | Near LWG # 4 Outlet  | 03.01.2023    | 3:15 PM       | pH (at 20°C) | 6.96   |
|         |  |               |               | TSS          | 38.0   |
|         |  |               |               | COD          | 161.9  |
|         |  |               |               | BOD          | 28.0   |
|         |  |               |               | Oil & Grease | 4.9    |
|         | Collected Treated Water from Common Waste Water Recycling Unit of Outfall LWG # 4 & Old Weigh Bridge | 02.02.2023    | 11:00 AM      | pH (at 20°C) | 7.35   |
|         |  |               |               | TSS          | 29.0   |
|         |  |               |               | COD          | 46.7   |
|         |  |               |               | BOD          | 8.17   |
|         |  |               |               | Oil & Grease | 2.7    |
|         | Collected Treated Water from Common Waste Water Recycling Unit of Outfall LWG # 4 & Old Weigh Bridge | 04.03.2023    | 10:10 AM      | pH (at 22°C) | 7.18   |
|         |  |               |               | TSS          | 33.0   |
|         |  |               |               | COD          | 40.4   |
|         |  |               |               | BOD          | 8.44   |
|         |  |               |               | Oil & Grease | 2.8    |
| 2       | Near Old Weigh Bridge Outlet   | 03.01.2023    | 3:50 PM       | pH (at 20°C) | 7.51   |
|         |  |               |               | TSS          | 21.0   |
|         |  |               |               | COD          | 28.8   |
|         |  |               |               | BOD          | 5.61   |
|         |  |               |               | Oil & Grease | 2.1    |
|         | Collected Untreated Water from Common Waste Water Recycling Unit of Outfall LWG # & Old Weigh Bridge | 02.02.2023    | 11:15 AM      | pH (at 20°C) | 6.86   |
|         |  |               |               | TSS          | 51.0   |
|         |  |               |               | COD          | 112.1  |
|         |  |               |               | BOD          | 20.0   |
|         |  |               |               | Oil & Grease | 4.2    |
|         | Collected Untreated Water from Common Waste Water Recycling Unit of Outfall LWG # & Old Weigh Bridge | 04.03.2023    | 10:20 AM      | pH (at 22°C) | 6.97   |
|         |  |               |               | TSS          | 48.0   |
|         |  |               |               | COD          | 90.9   |
|         |  |               |               | BOD          | 21.0   |
|         |  |               |               | Oil & Grease | 4.5    |
| 3       | Extrusion #2 ETP Outlet  | 03.01.2023    | 4:10 PM       | pH (at 20°C) | 7.63   |
|         |  |               |               | TSS          | 25.0   |
|         |  |               |               | COD          | 38.5   |
|         |  |               |               | BOD          | 7.12   |
|         |  |               |               | Oil & Grease | 2.2    |
|         |  | 02.02.2023    | 12:05 PM      | pH (at 20°C) | 6.93   |
|         |  |               |               | TSS          | 49.0   |
|         |  |               |               | COD          | 102.8  |

|  |  |            |         |              |       |
|--|--|------------|---------|--------------|-------|
|  |  | 04.03.2023 | 9:30 AM | BOD          | 19.0  |
|  |  |            |         | Oil & Grease | 4.3   |
|  |  |            |         | pH (at 22°C) | 6.89  |
|  |  |            |         | TSS          | 51.0  |
|  |  |            |         | COD          | 121.2 |
|  |  |            |         | BOD          | 24.0  |
|  |  |            |         | Oil & Grease | 4.1   |
|  |  |            |         |              |       |

*Checked By: A. Patra*

**For, Indicative Consultant India**

Parbati Golui  
(Quality Manager)  
Signatory Authority



## AMBIENT NOISE LEVEL MONITORING SUMMARY SHEET FOR M/s. Graphite India Ltd.,

Dist – Burdwan, Durgapur, PIN - 713 211, (West Bengal)

For the Month of FEB.'2023

Sampling Date : 13.02.2023 to 14.02.2023

Noise Level Leq. dB(A)

| LOCATIONS : |  | DAY TIME dB(A) |       |       | NIG   |
|-------------|--|----------------|-------|-------|-------|
|             |  | Leq            | Lmax. | Lmin. | Leq   |
| 1           | NORTH BOUNDARY WALL –NEAR MANDIR                         | 60.36          | 62.00 | 58.10 | 60.32 |
| 2           | NORTH BOUNDARY WALL –NEAR SECURITY BARRACK               | 67.02          | 68.40 | 65.90 | 60.71 |
| 3           | NORTH BOUNDARY WALL –BACK OF LWG # 3                     | 66.37          | 68.00 | 64.80 | 59.54 |
| 4           | CENTRE OF THE PLANT (NEAR PI UNIT # 1)                   | 66.01          | 67.20 | 64.70 | 60.74 |
| 5           | EAST BOUNDARY WALL - NEAR LWG # 4                        | 66.74          | 68.30 | 65.30 | 60.71 |
| 6           | WEST BOUNDARY WALL - NEAR PERSONAL OFFICE                | 64.58          | 66.20 | 62.70 | 60.19 |
| 7           | SOUTH BOUNDARY WALL –NEAR FINISHIG UNIT # 3              | 64.79          | 66.80 | 63.60 | 60.17 |
| 8           | SOUTH BOUNDARY WALL –BACK OF OLD STORE                   | 64.49          | 66.10 | 62.90 | 60.76 |
| 9           | SOUTH BOUNDARY WALL –BACK OF CANTEEN BUILDING            | 65.15          | 66.40 | 63.80 | 60.00 |
| 10          | EXTRUSION # 2 AREA (NORTH BOUNDARY WALL)                 | 67.63          | 69.40 | 65.80 | 60.02 |
| 11          | EXTRUSION # 2 AREA ( EAST BOUNDARY WALL)                 | 66.67          | 68.20 | 64.60 | 59.59 |
| 12          | EXTRUSION # 2 AREA ( SOUTH BOUNDARY WALL)                | 66.65          | 68.20 | 65.80 | 60.13 |
| 13          | EXTRUSION # 2 AREA (WEST BOUNDARY WALL )                 | 66.06          | 67.20 | 64.40 | 59.86 |
| 14          | EXTRUSION # 2 CENTRE OF THE PLANT –NEAR NEW WEIGH BRIDGE | 65.79          | 67.40 | 64.10 | 59.26 |

Checked By: A. Patra

For, Indicative Consultant Ir

Parbati Golui  
(Quality Manager)  
Signatory Authority



| HT TIME dB(A) |       |
|---------------|-------|
| Lmax.         | Lmin. |
| 62.00         | 57.40 |
| 62.60         | 58.60 |
| 61.10         | 57.40 |
| 62.20         | 58.80 |
| 62.20         | 58.80 |
| 61.20         | 58.90 |
| 62.60         | 58.80 |
| 62.40         | 58.90 |
| 61.20         | 58.70 |
| 62.40         | 57.60 |
| 61.40         | 57.90 |
| 62.00         | 58.70 |
| 61.20         | 57.60 |
| 60.20         | 57.60 |

ndia



## GRAPHITE INDIA LIMITED

DURGAPUR-713211, DIST. - BURDWAN  
E-MAIL : general\_dgp@graphiteindia.com

April 13, 2023

To,  
The Office of Environmental Engineer,  
West Bengal Pollution Control Board,  
Durgapur Regional Office,  
Sahid Khudiram Sarani,  
City Center,  
Durgapur - 713216.



***Sub: Submission of Bi-Annual compliance report on Stack, Ambient Air Monitoring, noise & Effluent sampling of GI (works).***

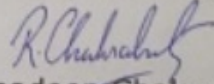
Dear Sir,

Please find enclosed herewith, one set of the Bi-Annual compliance reports (as per the requirement of the consent to Operate) of Stack, Ambient Air & Noise Monitoring in February 2023 & Effluent monitoring in Jan 2023. Since no waste water is discharged outside, Feb 2023 & March 2023 Effluent report is for the two combined outfall (i.e. LWG#4 & Old weigh Bridge) recycled untreated and treated water details and Extrusion#2 outfall treated details. Analysis is done by WBPCB Authorized agency M/s Indicative Consultant India, Kolkata. The summary statement of Stack & ambient emission also enclosed herewith.

Kindly acknowledge the same and oblige.

Thanking you,

Yours Faithfully,  
For Graphite India Limited.

  
Ranadeep Chakraborty  
Vice President (Works)



# Monitoring Photographs

## Noise Monitoring



# Stack Monitoring





# Work Zone Monitoring





# **Annexure – 4**

# Air Pollution Control System







# **Annexure – 5**

# Greenbelt



# **Annexure – 6**



# Health Checkup Photographs



# FORM No. 17

## GRAPHITE HEALTH REGISTER

1. Serial No. in the Register

of adult worker : 5298

2. Name of worker : HONISIT BARAN DAS

3. Sex : MALE

[Prescribed under Rules 63 & 94 of the West Bengal Factories Rules 1950]

| Department / works | Name of hazardous process | Dangerous process or operation | Nature of job or occupation | Raw material, products or by-products to which the worker is likely to be exposed to | Date of Exam | Date of leaving transfer to other work | Reason for discharge transfer to other work | Signs and symptoms observed during examination |
|--------------------|---------------------------|--------------------------------|-----------------------------|--|--------------|--|---|--|
|--------------------|---------------------------|--------------------------------|-----------------------------|--|--------------|--|---|--|

|           |   |   |               |   |          |   |   |   |
|-----------|---|---|---------------|---|----------|---|---|---|
| 1         | 2 | 3 | 4             | 5 | 6        | 7 | 8 | 9 |
| SUB-STAFF |   |   | OFFICE<br>BOY |   | 11/04/22 |   |   |   |

## INDIA LTD. Durgapur REGISTER

as amended vide Notification No. 1183-LW-IR-1/91 dated 27th Nov 1991

No.

95

4. Date of birth :

5. Medical examination and the results thereof

If declared unfit for work

| Nature of tests & results thereof | Result Fit / Unfit | Period of absence from work if declared unfit for work | Reason for such withdrawal | Date of return to work if declared fit | Date of expiry of Certificate | Signature with date / Factory Medical Officer the Certifying surgeon |
|-----------------------------------|--------------------|--|----------------------------|--|-------------------------------|--|
| 10                                | 11                 | 12   | 13                         | 14                                     | 15                            | 16   |

MB:- 14.1, TC-9200,

N-66, L-30, E-03, H-01,

B-00, ESR-06

Audiogram:-

R/Ear:- Hearing Sensitivity within normal limits.

L/Ear:- Moderate

degree of conductive hearing loss.

PFT:- NNL

Chest x ray (PFA)- NNL

ECG:- NNL

DR. PRASANTA GHOSH  
MBBS, DPM  
Factory Medical Officer  
Graphite India Ltd.  
Durgapur - 713211







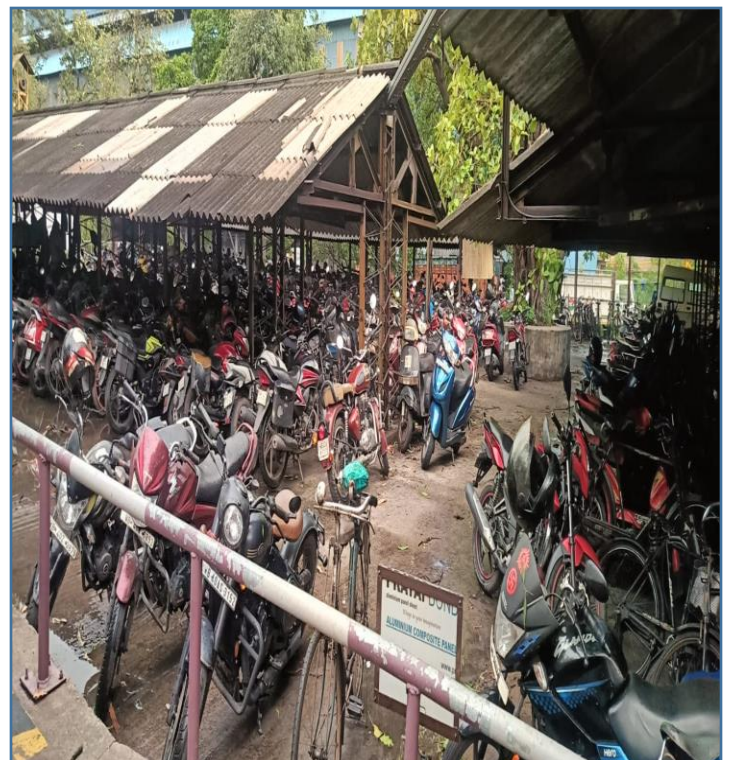
## Training photographs



# **Annexure – 7**



# Parking Photographs






# **Annexure – 8**

ChallanDoubleVerification - Profile 1 - Microsoft Edge

https://www.esic.in/ESICInsurance1/RevenueOne/Monthly%20Contribution/ChallanDoubleVerification.aspx?userPk=Kpy+rX%2f2PW5duh3eHQY9k77uVDgaYWEd&challanNo=JUGm1Rbj4gM%3d

 **ESIC**  
Employees' State Insurance Corporation

Insurance

User Login: 74000071990000910 Thursday, May 18, 2023 3:45:47 PM

Monthly Contribution > Online Challan Status


**Transaction Details** \* Required Fields

|                        |                                    |
|------------------------|------------------------------------|
| Transaction status:    | Transaction Completed Successfully |
| Employer's Code No:    | 74000071990000910                  |
| Employer's Name:       | GRAPHITE INDIA LTD                 |
| Challan Period:        | Nov-2022                           |
| Challan Number :       | 07422137095417                     |
| Challan Created Date   | 10-11-2022 13:03:18                |
| Challan Submitted Date | 10-11-2022 13:03:59                |
| Amount Paid:           | 12241.00                           |
| Transaction Number:    | 211102195621                       |

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ChallanDoubleVerification - Profile 1 - Microsoft Edge

https://www.esic.in/ESICInsurance1/RevenueOne/Monthly%20Contribution/ChallanDoubleVerification.aspx?userPk=Kpy+rX%2f2PW5duh3eHQY9k77uVDgaYWEd&challanNo=JUGm1Rbj4gM%3d

 **ESIC**  
Employees' State Insurance Corporation

Insurance

User Login: 74000071990000910 Thursday, May 18, 2023 3:47:24 PM

Monthly Contribution > Online Challan Status


**Transaction Details** \* Required Fields

|                        |                                    |
|------------------------|------------------------------------|
| Transaction status:    | Transaction Completed Successfully |
| Employer's Code No:    | 74000071990000910                  |
| Employer's Name:       | GRAPHITE INDIA LTD                 |
| Challan Period:        | Nov-2022                           |
| Challan Number :       | 07422141005939                     |
| Challan Created Date   | 10-12-2022 10:42:58                |
| Challan Submitted Date | 10-12-2022 10:50:37                |
| Amount Paid:           | 11032.00                           |
| Transaction Number:    | 212126076787                       |

[Print](#) [Close](#)

ChallanDoubleVerification - Profile 1 - Microsoft Edge

https://www.esic.in/ESICInsurance1/RevenueOne/Monthly%20Contribution/ChallanDoubleVerification.aspx?userPk=Kpy+rX%2f2PW5duh3eHQY9k77uVDgaYWEd&challanNo=JUGm1Rbj4gM%3d

 **ESIC**  
Employees' State Insurance Corporation

Insurance

User Login: 74000071990000910 Thursday, May 18, 2023 3:42:10 PM


Monthly Contribution > Online Challan Status

**Transaction Details** \* Required Fields

|                        |                                    |
|------------------------|------------------------------------|
| Transaction status:    | Transaction Completed Successfully |
| Employer's Code No:    | 74000071990000910                  |
| Employer's Name:       | GRAPHITE INDIA LTD                 |
| Challan Period:        | Jan-2023                           |
| Challan Number :       | 07423102354814                     |
| Challan Created Date   | 13-01-2023 12:28:59                |
| Challan Submitted Date | 13-01-2023 12:29:48                |
| Amount Paid:           | 13875.00                           |
| Transaction Number:    | FT301134287088                     |

ChallanDoubleVerification - Profile 1 - Microsoft Edge

https://www.esic.in/ESICInsurance1/RevenueOne/Monthly%20Contribution/ChallanDoubleVerification.aspx?userPk=Kpy+rX%2f2PW5duh3eHQY9k77uVDgaYWEd&challanNo=JUGm1Rbj4gM%3d

 **ESIC**  
Employees' State Insurance Corporation

Insurance

User Login: 74000071990000910 Thursday, May 18, 2023 3:50:38 PM

Monthly Contribution > Online Challan Status


**Transaction Details** \* Required Fields

|                        |                                    |
|------------------------|------------------------------------|
| Transaction status:    | Transaction Completed Successfully |
| Employer's Code No:    | 74000071990000910                  |
| Employer's Name:       | GRAPHITE INDIA LTD                 |
| Challan Period:        | Jan-2023                           |
| Challan Number :       | 07423105844255                     |
| Challan Created Date   | 13-02-2023 15:52:12                |
| Challan Submitted Date | 13-02-2023 15:52:33                |
| Amount Paid:           | 13404.00                           |
| Transaction Number:    | 302134847903                       |



ChallanDoubleVerification - Profile 1 - Microsoft Edge

https://www.esic.in/ESICInsurance1/RevenueOne/Monthly%20Contribution/ChallanDoubleVerification.aspx?userPk=Kpy+rX%2f2PW5duh3eHQY9k77uVDgaYWEd&challanNo=JUGm1Rbj4gM%3d

 **ESIC**  
Employees' State Insurance Corporation

Insurance

User Login: 74000071990000910 Thursday, May 18, 2023 3:57:00 PM

Monthly Contribution > Online Challan Status

**Transaction Details** \* Required Fields


|                        |                                    |
|------------------------|------------------------------------|
| Transaction status:    | Transaction Completed Successfully |
| Employer's Code No:    | 74000071990000910                  |
| Employer's Name:       | GRAPHITE INDIA LTD                 |
| Challan Period:        | Mar-2023                           |
| Challan Number :       | 0742310209003                      |
| Challan Created Date   | 13-05-2023 11:24:15                |
| Challan Submitted Date | 13-05-2023 11:24:53                |
| Amount Paid:           | 12854.00                           |
| Transaction Number:    | 303138885244                       |

[Submit Details](#)

[Print](#) [Close](#)

ChallanDoubleVerification - Profile 1 - Microsoft Edge

https://www.esic.in/ESICInsurance1/RevenueOne/Monthly%20Contribution/ChallanDoubleVerification.aspx?userPk=Kpy+rX%2f2PW5duh3eHQY9k77uVDgaYWEd&challanNo=JUGm1Rbj4gM%3d

 **ESIC**  
Employees' State Insurance Corporation

Insurance

User Login: 74000071990000910 Thursday, May 18, 2023 3:58:19 PM

Monthly Contribution > Online Challan Status

**Transaction Details** \* Required Fields

|                        |                                    |
|------------------------|------------------------------------|
| Transaction status:    | Transaction Completed Successfully |
| Employer's Code No:    | 74000071990000910                  |
| Employer's Name:       | GRAPHITE INDIA LTD                 |
| Challan Period:        | Mar-2023                           |
| Challan Number :       | 07423112752999                     |
| Challan Created Date   | 11-04-2023 15:53:36                |
| Challan Submitted Date | 11-04-2023 15:54:03                |
| Amount Paid:           | 11994.00                           |
| Transaction Number:    | FT304113243983                     |

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# **Annexure – 9**

## 20 KLD Kitchen Waste Water STP





# **Annexure – 10**



# GRAPHITE INDIA LIMITED

REGD. & H.O. : 31, CHOWRINGHEE ROAD, KOLKATA - 700 016, W.B., INDIA  
PHONE : 91 33 4002 9600, 2226 5755 / 4942 / 4943 / 5547 / 2334, 2217 1145 / 1146  
FAX : 91 33 2249 6420, E-mail : gilro@graphiteindia.com  
WEBSITE : www.graphiteindia.com, CIN : L10101WB1974PLC094602

## **ENVIRONMENTAL POLICY**

Graphite India Limited is engaged in the manufacturing of carbon, graphite and other products. We believe that protecting environment is also an essential element of our operations. To achieve this including compliance within norms, use of sustainable resources, climate change mitigation and adaption and protection of biodiversity and ecosystems, company is committed to

- a) Minimising pollutants in air emissions, effluents, solid wastes and noise
- b) Upgrading technology level through continual improvement for prevention and reduction of pollution.
- c) Operating and maintaining the facilities so as to ensure compliance with all applicable legal and other obligations
- d) Determining the risk and opportunities related to its environmental aspects and compliance obligations
- e) While investing in new plant and equipment or technology, its environmental impact will be reckoned and appropriate provisions will be made for Energy efficiency.
- f) Setting environmental objectives and targets along with an integral process of periodical review to target enhancement of environmental performance.
- g) Conserving raw materials, natural resources and energy by reducing consumption and wastes
- h) Maintaining the policy as a documented information and effectively communicating it to all persons working for or on behalf of company and making it available to all relevant interested parties on request.
- i) Responsibility in this regard lies with "Manager" in each of the locations.

**DATE : 01.04.2020**

  
**A. DIXIT**  
**EXECUTIVE DIRECTOR**

# **Annexure – 11**



## নোটিস

এতদ্বারা জনসাধারণকে জানানো যাইতেছে যে স্টেট এনভায়রনমেন্ট ইমপ্যাক্ট অ্যাসেসমেন্ট অথরিটি (SEIAA), পশ্চিমবঙ্গ, মৌজা গোপিনাথপুর জেলা পশ্চিম বর্ধমান, পশ্চিমবঙ্গ JL নং ৮৫ এবং মৌজা নড়িয়া JL নং ৯২ প্লটে অবস্থিত, মেসার্স গ্রাফাইট ইন্ডিয়া লিমিটেড, সাগরভাঙ্গা, দুর্গাপুর, EC আইডেন্টিফিকেশন নং ০১ ৩০২৪০৭৪০৪০৭ মোতাবেক KTPA-এর প্রস্তাবিত ৫২ KTPA থেকে ৬৭ KTPA ক্ষমতা সম্প্রসারণের জন্য পরিবেশগত ছাড়পত্র জারি করেছে ১০.৩.২০২৩ তারিখে। SEIAA দ্বারা জারি করা পরিবেশগত ছাড়পত্র SEIAA, পশ্চিমবঙ্গের অফিসিয়াল ওয়েবসাইটে এবং পশ্চিমবঙ্গ দূষণ নিয়ন্ত্রণ পার্সদ এর সাথে উপলব্ধ।

গ্রাফাইট ইন্ডিয়া লিমিটেড,  
সাগরভাঙ্গা,  
দুর্গাপুর-৭১৩২১১

## NOTICE

This is for the information to all General Public, Bank and Financial Institution that my clients Biswajit Mazumder, S/o Late Badal Chandra Mazumder, resident at, Alamganj, Mota Shiv Tala, P.O. Natunganj, within P.S. Burdwan, Dist- Purba Barddhaman & Asim Kumar Bardhan, S/o Late Anil Kumar Bardhan, resident at- Tejganj School Para, P.O.- Natunganj, within P.S.- Burdwan, Dist- Purba Barddhaman, do hereby declare that Original Chain Deed of Chain Deed (Sale) being No, 2651 dated 23.03.2006, registered A.D.S.R Burdwan in connection with the Schedule mentioned Property has been lost from my clients custody and one General Missing Diary have been lodged regarding loss of aforesaid Original Chain Deed of Chain Deed (Sale) before the I.C. Burdwan P.S., Purba Barddhaman, G.D. Entry No.: 1282 dated 13.03.2023. and as such If that the Original Chain Deed of Chain Deed (Sale) being No, 2651 dated 23.03.2006, registered A.D.S.R Burdwan is under Charge (Mortgage) of Bank or Financial

Burdwan Municipality, ward No. 22, Mouza: Alamganj, J.L. No. 31, L.R. Khatian No. 3880 & 3976, R.S. Plot No. 203 & L.R. Plot No. 630, Class: Chira Mill, Area: 2880 Sq. Ft.

Kripa Sankar Mondal  
Advocate

District Judges Court,  
Burdwan Bar Association  
Room No. 07, (Rashbihari Kashya)

Phone No.: 8348761945/  
9064544734

20655-3481254

This is to inform the public that State Environment Impact Assessment Authority (SEIAA), West Bengal has issued Environmental Clearance to M/s Graphite India Limited, Sagarbhangha, Durgapur for Proposed Expansion of Capacity from 52KTPA to 67KTPA, Vide EC Identification No EC23B020WB141674 Dt: 10.03.2023 located at plots of Mouza Gopinathpur JL no. 85 & at plots of Mouza Nadia JL no. 92, District Paschim Bardhaman, West Bengal. The Environmental clearance issued by SEIAA is available on the official website of SEIAA, WB and the same is available with WBPCB.

M/s Graphite India Limited, Sagarbhangha, Durgapur-713211

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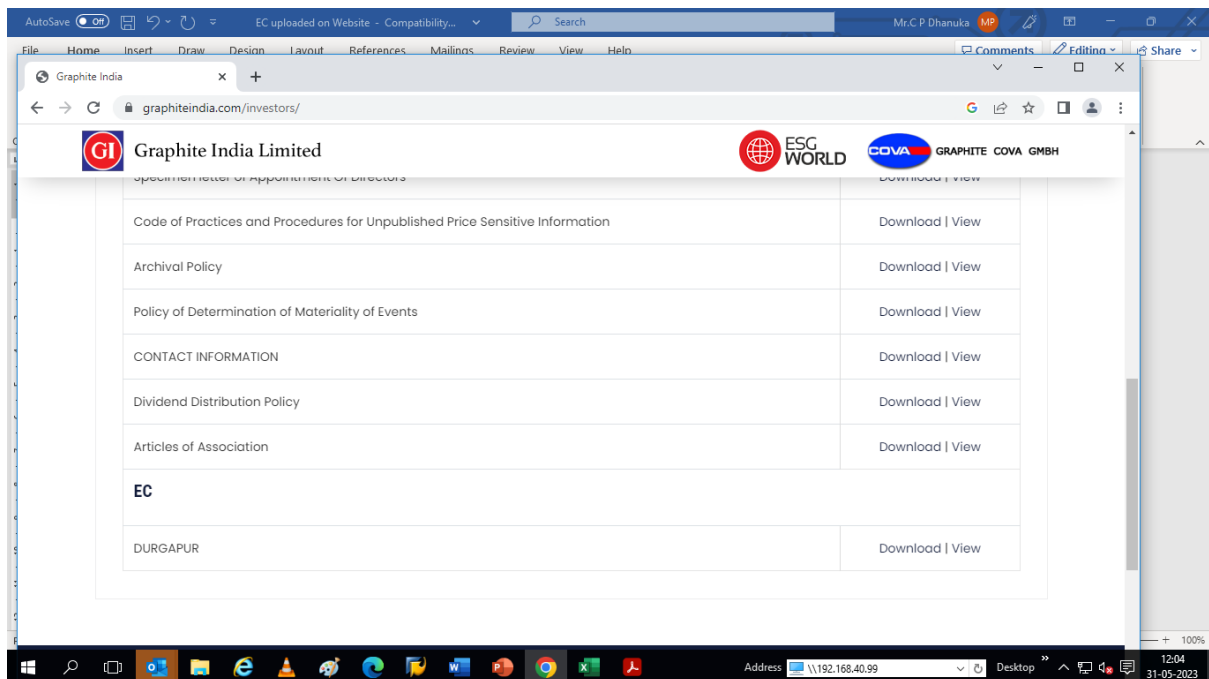
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Vivo V15Pro

AI Triple Camera



Link of EC uploaded on Website of [www.graphiteindia.com](http://www.graphiteindia.com) under Investor relation page below Corporate Governance





# **Annexure – 12**



## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST. BURDWAN  
E-Mail: general\_dgp@graphiteindia.com

Dt: 13.03.2023

To,  
The Office of the Sabhadhipati,  
Paschim Bardhaman Zilla Parishad,  
Govt. of West Bengal.

Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA

Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are summing the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

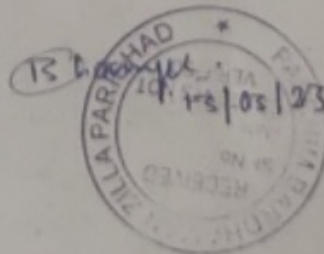
Thanking you,

Yours Faithfully,

**For Graphite India Limited.**

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above





## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com

Dt: 13.03.2023

To,  
The Office of Additional District Magistrate (LR),  
Paschim Bardhaman,  
Govt. of West Bengal.

**Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA**

**Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.**

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are summing the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

Thanking you,

Yours Faithfully,

**For Graphite India Limited.**

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above

Received  
but Contents are not verified  
B. Chakraborty  
13/03/23  
Receiving Clerk  
DL&LRO, Paschim Bardhaman





## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com

Dt: 13.03.2023

To,  
The Office of District Magistrate,  
Paschim Bardhaman,  
Govt. of West Bengal.

**Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA**

**Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.**

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are summing the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

Thanking you,

Yours Faithfully,

**For Graphite India Limited.**

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above





## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com

Dt: 13.03.2023

To,  
The Office of the Block Development Officer,  
Durgapur -Faridpur Development Block,  
Paschim Bardhaman,  
Govt. of West Bengal.

**Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA**

**Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.**

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are sumitting the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

Thanking you,

Yours Faithfully,

**For Graphite India Limited.**

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above

Received No. 327 dt 13/03/23  
**RECEIVED WITHOUT VERIFICATION**

**Receiving Staff  
Block Development Office  
Durgapur Faridpur**



## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com



Dt: 13.03.2023

To,  
The Office of Environmental Engineer,  
West Bengal Pollution Control Board,  
Durgapur Regional Office,  
Sahid Khudiram Sarani,  
City Center,  
Durgapur - 713216.

Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA

Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are sumitting the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

Thanking you,

Yours Faithfully,

**For Graphite India Limited.**

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above





## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com

Dt: 13.03.2023

To,  
The Office of the Sub-Divisional Officer,  
Durgapur Sub-Division,  
Paschim Bardhaman,  
Govt. of West Bengal.

Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of  
Capacity From 52KTPA to 67 KTPA

Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant  
Government offices.

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are summing the copy of EC as  
per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the  
date of receipt of this letter.

Kindly acknowledge and oblige.

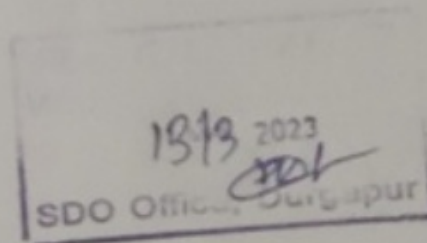
Thanking you,

Yours Faithfully,

For Graphite India Limited.

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above





## GRAPHITE INDIA LIMITED

DURGAPUR: 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com

Dt: 13.03.2023

To,  
The Office of the General Manager,  
District Industries Center,  
Paschim Bardhaman,  
Govt. of West Bengal.

Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA

**Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.**

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are summing the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

Thanking you,

Yours Faithfully,

**For Graphite India Limited.**

Ranadeep Chakraborty  
Vice President (Works)

GDOS  
13-3-2023  
Received (Contents not Verified)  
Anc. Ind. Dev. Cell & Sub-DIC., Durgapur  
Durgapur, Govt. of West Bengal

Enclosed - As above



## GRAPHITE INDIA LIMITED

DURGAPUR 713211, DIST- BURDWAN  
E-Mail : general\_dgp@graphiteindia.com

Dt: 13.03.2023

To, *Commissioner*  
The, Office of the Durgapur Municipal Corporation,  
Paschim Bardhaman,  
Govt. of West Bengal.

Ref: EC Identification no. EC23B020WB141674 Dt: 10.03.2023 for Proposed Expansion of Capacity From 52KTPA to 67 KTPA

Sub: Submission of Environmental Clearance (EC) copy to Head of local bodies / relevant Government offices.

Dear Sir,

This is in reference to above mentioned Environmental clearance, we are summing the copy of EC as per the attached EC condition in Point XI, iii of page 7 for your display of the same for 30 days from the date of receipt of this letter.

Kindly acknowledge and oblige.

Thanking you,

Yours Faithfully,

For Graphite India Limited.

Ranadeep Chakraborty  
Vice President (Works)

Enclosed - As above

*C-18*

*13/03/23*  
Received & Verified  
Durgapur Municipal Corporation



# **Annexure – 13**



# GRAPHITE INDIA LIMITED

DURGAPUR-713211, DIST. - BURDWAN  
E-MAIL : general\_dgp@graphiteindia.com



Dt: 27.09.2022

To,  
The Office of Environmental Engineer,  
West Bengal Pollution Control Board,  
Durgapur Regional Office,  
Sahid Khudiram Sarani,  
City Center,  
Durgapur - 713216.

**Sub: "Environmental Statement" of M/s. Graphite India Limited, Durgapur 713211, W.B., for the financial year, ending 31<sup>st</sup> March, 2022 in Form V, in compliance with the requirement of "Environment protection Amendment Rule(1993, Rule-2(b))" notified vide G.S.R 3'6(E) dated 22.04.1993**

Dear Sir,

On the above stated matter, enclosed please find herewith one set of "ENVIRONMENTAL STATEMENT", in Form - V prepared by our Sr. Manager (Technical ) for your kind perusal.

Hope, you will find everything in order.

Thanking you,

Yours Faithfully,  
**For Graphite India Limited.**

Ranadeep Chakraborty  
(Vice President Works)

End: Environmental Statement

Registered Office : 31, Chowringhee Road, Kolkata - 700016

CIN - L10101WB1974PLC094602

Ph. : +91-33-40029600 Fax : +91-33-40029676

E-mail Id : gllro@graphiteindia.com Website : www.graphiteindia.com