Introduction

This document is submitted to meet the requirement of section 4.2.2 (a) of the EPR Permit that is for an annual '*review of the results of the monitoring and assessment carried out in accordance with the Permit including an interpretive review of that data*'.

Extractive Monitoring

Bi-annual monitoring was undertaken, by the prescribed methods, and reported as per the Permit requirements for Emission Points A0, A1, A3 and A4. Zero emission breaches were reported during the year 2020.

Triplicate extractive monitoring was undertaken for Emission Point A0 White Wool forming stack, for the parameter of Particulate Matter. Both sets of results recorded for these parameters, undertaken in May and November, were consistently below their emission limit values.

For Emission Point A1 Furnace stack, there is a monitoring requirement to determine Particulate Matter, Oxides of Nitrogen (NO and NO_2 expressed as NO_2), Carbon Monoxide, Oxides of Sulphur (as SO_2), Gaseous Fluorides (as HF), Gaseous Chlorides (as HCl), Group 1 Metals and Group 2 Metals. The emission samples were all undertaken in triplicate. Both sets of results recorded for these parameters, undertaken in May and November, are consistently below their emission limit values.

For Emission Point A3 Forming stack, there is a monitoring requirement to determine Particulate Matter, Phenol, Formaldehyde, Ammonia, Volatile Organic Compounds (VOCs) and Amines. All samples were undertaken in triplicate. Both sets of results recorded for these parameters, undertaken in May and November, are consistently below their emission limit values.

Finally triplicate monitoring for Emission Point A4 Batch Plant, for the parameter of Particulate Matter was not undertaken as the emission point is no longer used following the installation of a new filter system on each of the raw materials silos.

Continuous Emissions Monitoring (CEMs)

A continuous emissions monitoring system is used on the furnace stack as a direct measurement of Particulate Matter and Oxides of Nitrogen (NO and NO_2 expressed as NO_2). The equipment is serviced and calibrated, by technicians from the equipment suppliers, quarterly using certified gases for the gas calibrations. The CEMs equipment is generally reliable, giving relatively little down time with low data loss, however, if this occurs, every effort is made to restore normal operation as quickly as is practical.

The CEMs data for Emission Point A1 Furnace stack were reported twice during the year with the unit being operational for 98% of the year. The daily average is reported as per the permit requirement.

Storm Water

For storm water, the concentrations of Total Suspended Solids, pH, Total Hydrocarbon Oil and Chemical Oxygen Demand (COD) are measured on a six monthly basis as required by the Permit from emission point W1.

During 2020, the W1 sampling was undertaken during the months of June and December and samples were analysed by an independent, UKAS accredited laboratory. The analytical results for both monitoring periods are within the expected ranges normally seen for storm water discharges from the site.

Conclusion

Process emissions are monitored in accordance with the Permit requirements and show that the controls and abatement normally result in the emissions being maintained within permitted limits. Where there are problems with un-authorised emissions, equipment breakdown and/or other unforeseen situations, every effort is made to ensure the plant regains compliance as soon as is possible within practical timescales.

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