Cyfoeth Naturiol Cymru
Natural Resources Wales

Natural Resources Wales Permitting Decisions

Duynie Ingredients Limited (Duynie Ingredients Limited)

Decision Document

Application for a New Bespoke Permit

The application number is: PAN-025487

The permit number will be: EPR/DB3693FC

The applicant is: Duynie Ingredients Limited

The Installation is located at: Coed Aben Road, Wrexham Industrial Estate, Wrexham, Clwyd, LL13 9UH

Purpose of this document

This decision document:

- explains how the application has been determined
- provides a record of the decision-making process
- shows how all relevant factors have been taken into account
- justifies the specific conditions in the permit other than those in our generic permit template.

Unless the decision document specifies otherwise, we have accepted the applicant's proposals.

Contents

Glossary of acronyms and definitions used in this document

BAT - Best available techniques

ELV - Emission limit value

EMS - Environmental management system

EPR - Environmental permitting regulations (2016)

HRA - Habitats regulations assessment

IED - Industrial Emissions Directive (2010)

NOx - Oxides of nitrogen (NO plus NO_2, expressed as NO_2)

PC - Process contribution

PEC - Predicted environmental concentration

SAC - Special Area of Conservation

SCR - Site condition report

SSSI - Site of Special Scientific Interest

HD The Habitats Directive 1992

MCPD The Medium Combustion Plant Directive 2015

CRoW The Countryside and Rights of Way Act 2000

WCA The Wildlife and Countryside Act 1981

CHP - Combined heat and power

MCA - Monochloroacetic acid

SMCA - Sodium Monochloroacetate

PM10 - Particles with an aerodynamic diameter of 10 microns or less.

PM2.5 – Particles with an aerodynamic diameter of 2.5 microns or less

1. Executive summary

1.1. Application summary

The application is for a new bespoke permit. The installation is operated by Duynie Ingredients Limited which is located on Wrexham Industrial Estate. The installation modifies 15,000 tonnes of starches per annum and the manufacturing is a continuous process. The installation has been operating since 2007 and following a visit from officers from Natural Resources Wales in 2021, it was established that an environmental permit was required Two previous applications were made in 2022 which were incomplete, and both were returned due to a substantial amount of information missing.

The installation modifies starches to produce high quality wallpaper paste flake and drilling starches for the geological drilling industries. The modified starch products are manufactured using both imported unrefined starches and refined starches. All the manufacturing processes take place inside the building and not on the external yard area. Imported unrefined starches are purified on site in several stages. These stages include blending the unrefined starch with water, followed by sieving, shaking and drying the product. Imported refined starch is brought into the facility in 1 tonne sacks and is stored within the building prior to being used in the starch modification processes.

Refined starch is modified in several stages. The starch is reacted with sodium hydroxide and cross-linking agents in two large reaction vessels. This is followed by transfer of the admixture to three horizontal mixing tanks where sodium Monochloroacetate (SMCA) is added to produce a carboxylate derivative via carboxymethylisation.

The resultant product is then dropped out of the reaction vessels where it is transferred to dryers. There are five dryers on site for this purpose. Two gas fired boilers are used for the drying process, with the second one being a standby boiler only that is only used in the event of failure of the duty boiler. The applicant also proposes to install a combined heat and power (CHP) plant to generate electricity and heat for use at the site in the future – we have included this boiler in the permit. See Section 7.2 for more information on the manufacturing process.

1.2. Our decision

We are minded to grant the permit operated by Duynie Ingredients Limited.

We consider in reaching that decision we have taken into account all relevant considerations and legal requirements and that the permit will ensure that the appropriate level of environmental protection is provided.

2. Receipt of the application

The application was received on 18/04/2024**.** In order for us to be able to consider the application duly made, we needed more information. We requested the following:

- Further information on waste types, and amounts, generated at the site;
- Clarification of the Medium Combustion Plants on site;
- Clarification on aspects of the Air Quality Impact Assessment; and
- Submission of a completed OPRA spreadsheet.

A letter requesting this information was sent to the applicant on 21/01/2025. Upon receipt of this information, on 09/04/2025, we were able to consider the application duly made. This means we considered it was in the correct form and contained sufficient information for us to begin our determination, but not that it necessarily contained all the information we would need to complete that determination.

3. Confidential information

The applicant made no claim for commercial confidentiality, and we have not received information in relation to the application that appears to be confidential in relation to any party.

4. Legislation

The permit will be granted under Regulation 13 of the EPR. The Environmental Permitting regime is a legal vehicle which delivers most of the relevant legal requirements for activities falling within its scope. In particular, the regulated facility is:

- an *installation* as described by the IED;

- subject to aspects of the Well-Being of Future Generations (Wales) Act 2015 and the Environment (Wales) Act 2016 which also have to be addressed; and
- The Medium Combustion Plant Directive.

We address the legal requirements directly where relevant in the body of this document. NRW is satisfied that the decision on this application is consistent with its general purpose of pursuing the sustainable management of natural resources (SMNR) in relation to Wales and applying the principles of SMNR. In particular, NRW acknowledges that it is a principle of sustainable management to take action to prevent significant damage to ecosystems. We consider that, in granting the permit a high level of protection will be delivered for the environment and human health through the operation of the Installation in accordance with the permit conditions

As the EPR regulator in Wales, NRW are required to determine any duly made permit application. This means that we must decide either to grant, or to refuse the variation based upon an objective assessment of the proposals against the detailed legal requirements of EPR. Our public participation statement[1] gives more information on what can, and cannot, be taken into account when making our permitting decision.

The application, and this decision document, only considers the permitting of the facility under EPR as described throughout the document. We only assess the installation and its impacts and cannot take into consideration indirect impacts which are not as a direct result of activity within the installation boundary.

Any proposed development and wider associated activities will be required to be compliant with all relevant and applicable law, for example, environmental law, health and safety law, planning law. This other legislation acts largely independently of EPR (although they may be inter-related). Such other matters are beyond both the scope of this document, and of our regulatory remit and expertise and are not relevant to our EPR permitting decision. Ensuring compliance with all other regulation and obtaining any required consents (such as planning permission) is the responsibility of those

[1] Natural Resources Wales / Public participation: how you can take part in our permit and licence consultations

undertaking the development and is regulated by the relevant appropriate authority for each.

5. Consultation

5.1. Consultation on the Application

We have carried out consultation on the application in accordance with the Environment Permitting Regulations (EPR), our statutory Public Participation Statement (PPS) and our Regulatory Guidance.

A copy of the application is available on the public register for anyone to view. We advertised the application to the public by placing a notice on our website directing people to the public register, advising them of how they could arrange for copies to be made if required and how they can provide comments.

We also consulted with the following bodies, which includes those with whom we have "Working Together Agreements":

- Health and Safety Executive
- Public Health Wales
- Wrexham County Borough Council Planning Department
- Wrexham County Borough Council Environmental Health
- Welsh Water

These are bodies whose expertise, democratic accountability and/or local knowledge make it appropriate for us to seek their views directly.

The consultation started on 11/04/2025 and ended on 12/05/2025.

No consultation responses were received. Please note as per Section 6 below additional information was received on emission points following the issue of the Schedule 5 Notice and after the initial consultation had ended. In our opinion the additional information does not materially change the risk or impact or affect the environmental outcome or permit conditions. The factory has been manufacturing for nearly 20 years, with no known complaints, and no responses were received regarding the initial consultation.

5.2. Draft Permit Consultation

We are now carried out consultation on our draft decision. This consultation began on 26/02/2026 and ended on 26/03/2026

6. Requests for information

Further information was requested during determination by way of a Schedule 5 Notice requiring the applicant to provide further information relating to the:

- drainage system;
- the location and number of emission points;
- Best Available Techniques (BAT) assessment in accordance with Large Volume Organic Chemicals (LVOC) BRef; and
- the revised site plan.

The Schedule 5 Notice was sent on 12/05/2025 with a deadline for response of 26/05/2025.

A response was received on 23/06/2025 which indicated that the submitted risk assessments did not consider all of the emission points present on the site.

This meant that some aspects of the risk assessments were inaccurate. We decided to keep the Schedule 5 Notice open and ask the applicant to amend and resubmit all risk assessments that were affected. These included revision and resubmission of the:

- Air Quality Risk Assessment (AQRA), as the air dispersion modelled exercise needed to be repeated;
- The assessment of the suitability of the stack sample ports, to include the incorrectly omitted emission points; and
- Monitoring of previously omitted emission points.

Delays were incurred as the new sampling points needed to meet safety standards and also the monitoring of the emissions to air was required to meet standards of accuracy and reliability, known as MCERTS–Monitoring Certification Scheme.

The applicant provided the additional information on 01/12/2025 which we considered satisfied the request of the Schedule 5 Notice. See Section 10.1 below for more information on the emission points to air.

We also emailed the applicant on 15/12/2025 to ask:

- if the process was continuous;
- for the maximum finished product production capacity in tonnes per day; and
- information on the process monitoring checks for the scrubber and filter socks.

We received this information by email on 18/12/25. We requested an updated site plan on 15/01/26 confirming that the penstock valves and water emission points SW1,SW1 and FS1 were within the permit boundary. This was received on 18/02/2026 A copy of the information notice and e-mails requesting further information were placed on our public register as were the responses when received.

7.The Installation

7.1 The permitted activities

The regulated facility will be an installation which comprises the following activities listed in Part 2 of Schedule 1 to the Environmental Permitting Regulations:

- Chapter 4, Section 4.1, Part A (1)(a)(ii) organic compounds containing oxygen (e.g. alcohols, aldehydes, ketones, carboxylic acids, esters, ethers, peroxides, phenols, epoxy resins).
-

An installation may also comprise “directly associated activities”, which at this Installation will include:

- Receipt storage and dispatch of materials*;*
- Combustion of mains gas in two steam boilers;
- Abatement of emissions to foul sewer;
- Waste Storage and Handling; including waste water; and
- Discharge to surface water.

Together, these listed and directly associated activities comprise of the ‘Installation’.

The installation is also subject to Schedule 25A of EPR – Medium Combustion Plant (MCP) for the following:

- 1 x 1.6 MWth natural gas boiler installed in 2006; and
- 1 x 1.1 MWth natural gas boiler installed in 1971.

These are classed as existing medium combustion plant by way of the legislation as they were put into operation before the 20 December 2018. The compliance date for these existing MCPs is 1 January 2030 and they will therefore be added to Schedule 1 of the permit as directly associated activities. They have no associated emissions monitoring and reporting requirements.

A flash dryer unit utilises steam from site boilers to dry starch. The applicant has confirmed that this dryer should not be classed as a process furnace/heater as no combustion takes place within this unit and therefore is exempt from MCPD requirements.

The applicant also proposes to install a combined heat and power (CHP) plant to generate electricity and heat for use at the site in the future. As it will be put into operation after 20 December 2018, this will be classed as a new medium combustion plant. This CHP has a net rated thermal input of 1.4 MW and will be located within a dedicated enclosure within the building complex. The fuel will be natural gas. Although the plant will generate electricity, it will not be subject to the specified generator regulations as these do not apply to Chapter II Industrial Emissions Directive installation sites. Schedule 25A of EPR does, however apply here and the emission limit values (ELVs) set out in the Medium Combustion Plant Directive (MCPD) for this type of combustion appliance need to be met as a minimum standard. We have therefore included emissions monitoring and reporting requirements for this appliance.

7.2 What the installation will do

Imported unrefined Starch is purified on site in several stages. The impure starch is hoisted into a main mixing tank where it is blended with water to the required specific

gravity (measured in BaumÈ). The blend is then sieved using a shaker sieve followed by a rotary sieve. This is followed by a rotary tank and a cyclone to remove sand waste. The sand is bagged prior to removal and recycling off-site. The mixture is then transferred to another tank prior to the refining process. The blend is then transferred to the vacuum filters. The water from the filtration process is recovered for reuse.

Starch recovered from the filtration process is dried in a 'flash dryer' unit prior to being bagged as a precursor for the modified starch. The flash drier utilises steam from site boilers to dry the starch. Emissions from the drying process comprises of water vapour and these are vented to atmosphere via emission point A8. As confirmed above the flash dryer is exempt from MCPD requirements.

Imported refined starch is brought into the facility in 1 tonne sacks and stored on site within the building prior to being used in the starch modification process on site.
Modification of the starch occurs in several stages:

1. Reaction with sodium hydroxide and cross-linking agents in two large reaction vessels of 12m^3 each. These tanks are open and there are no emission points to air associated with these vessels.
2. Transfer of the admixture to three horizontal mixing tanks, horizontal reactor vessels, where sodium monochloroacetate (SMCA) is added to produce a carboxylate derivative via carboxymethylisation. SMCA is produced 'in-house' by the controlled reaction of sodium hydroxide solution (32% rayon grade) with 80% monochloroacetic acid, which is an esterification agent to modify the starch. This reaction is exothermic and is controlled by temperature sensors which are alarmed over 65^{o}C. At 78^{o}C the water deluge system retards the reaction. This reaction has to be carried out at above 30^{o}C and the reaction product is retained in the tanks and not released.
3. Addition of SMCA is a carboxmethylisation reaction and the resulting product is a carboxylated starch. There are emission points to air for the 3 reactor vessels, they are A9, A10 and A11 respectively.
4. The resultant product is then dropped out of the reaction vessels where it is transferred to 5 refined starch drying units. The moisture content prior to drying is 32%. The dryers remove moisture from the reaction product and the material

then goes to the rollers to produce a thin film of product at 8-10% moisture. Emissions from the dryers are via 5 stacks A1 to A5 respectively.

5. Two dust control equipment (DCE) units are utilised by the site, each with an individual air emission point A13 and A14. The units are used to abate dust emissions during product packaging.
6. This product then goes into the flakers to produce a fine flake which is then dosed with mergal (a biocide used to preserve product integrity prior to bagging and sale). The manufactured product is a high-quality wallpaper paste flake.
7. Any low grade or rejected flakes for wallpaper paste production are instead bagged for use as a drilling starch for supply to the geological drilling industry.

A scrubber unit is installed on site which is used to abate emissions from the monochloroacetic acid storage tank. The scrubber media is water, which runs in constant recirculation to capture any volatile SMCA vapor if present. A 6m pipe vents emissions from the top of the scrubber and exits horizontally through the side of the building wall. This is emission point A7. Spent scrubber water is discharged to foul sewer in accordance with the Trade Effluent Discharge consent from Welsh Water.

Surface water run-off from the external yard area falls to surface water drains which discharge to surface water sewer, which in turn falls to the Redwither Brook. The are 2 emission points to surface water, they are SW1 and SW2.

The Site collects effluent from the starch refining process in the Internal Drainage and Effluent storage tank. This acts as a holding tank for process water. The process water is dosed with a polymer and settled starch is returned to the process. The excess process water is discharged to sewer in accordance with the Trade Effluent Consent. See Section 10.3 for more information.

The two existing steam boilers on site use natural gas as fuel and generate steam to provide heat to the dryers and reactor vessels. These boilers emit from a common stack at emission point A6.

A new combined heat and power (CHP) engine is proposed for future years. This is 1.4MWth and will be regulated under the Schedule 25A of EPR. Its emission point will be A12.

A summary of the emission points to air for the installation are found below:

Emission Point	Process detail
A1 to A5	Starch dryers
A6	Boilers x 2 emit through common stack
A7	Scrubber for MCA
A8	Heat exchanger/flash dryer
A9 to A11	Horizontal reactors
A12	Proposed CHP
A13 to A14	Dust extractors

For more information on the air quality assessment for the 14 emission points to air see Section 10.1. For more information on the emission points to surface water and sewer see Sections 10.2 and 10.3 respectively.

In line with information received as part of this application, in Schedule 1 of the permit, we have set a limit of production to 60 tonnes/day of modified starch. The permit also sets a production limit of 15,000 tonnes per year

8. Operation of the installation

8.1. Operator competence

The applicant is the sole operator of the Installation. We are satisfied that the applicant is the person who will have control over the operation of the Installation after the permit is granted; and that they will be able to operate the Installation so as to comply with the conditions included in the permit. The decision was taken in accordance with EPR RGN 1 Understanding the meaning of operator[2].

[2] RGN 1 Understanding the meaning of 'operator' (naturalresources.wales)

Relevant Convictions

The applicant has declared they have no relevant convictions. NRW's COLINS Database has been checked to confirm there are no relevant convictions.

No relevant convictions were found.

Financial Provision

The applicant has declared they have no current or past bankruptcy or insolvency proceeding against them.

There is no known reason to consider that the operator will not be financially able to comply with the permit. The decision was taken in accordance with RGN 5 on Operator Competence.

8.2. Environmental Management System

The applicant has stated in the application that they will implement an Environmental Management System (EMS) that will meet the requirements for an EMS in our "How to comply with your environmental permit" guidance[3]. The applicant has confirmed that they will provide their own management system. The applicant has submitted a summary of the EMS with their application.

We have reviewed the application and are satisfied that appropriate management systems and management structures will be in place for this Installation, and that sufficient resources are available to the applicant to ensure compliance with all the permit conditions.

Accident management

The EMS includes an Accident Management Plan which the applicant has submitted as part of this application. We have reviewed this and are satisfied that appropriate controls are in place to help reduce the occurrence and impact of any accidence that occur.

[3] Natural Resources Wales / Guidance to help you comply with your environmental permit

In order to ensure that the management system proposed by the applicant sufficiently manages the residual risk of accidents, permit condition 1.1.1a requires the implementation of a written management system which addresses the pollution risks associated with, amongst other things, accidents.

Site security

Having considered the information submitted in the application, we are satisfied that appropriate infrastructure and procedures will be in place to ensure that the site remains secure.

8.3. Operating techniques

Installation activities and assessment of Best Available Techniques

The applicant has described the proposed equipment and operating techniques and compared these against the relevant guidance notes / Best Available Techniques conclusions (BATc) which for an installation of this type is BAT reference Document: Production of Large Volume Organic Chemicals (LVOC). However, whilst this is seen to represent good practice, as the annual throughput of modified starch and also SMCA is less than 20 kilotonnes/year, the LVOC is out of scope.

The applicant has also compared the proposed equipment and techniques and compared these against the horizontal guidance BAT Conclusions for Common Waste Gas Management and Treatment Systems in the Chemical Sector" (WGC).

Please refer to Annex 3 in this decision document where a table outlines the specific BATc that apply to this installation and the assessment made against them.

We have reviewed the techniques proposed and consider them in line with them to represent BAT at this installation.

We have specified in Schedule 1 Table S1.2 operating techniques outlined in key documents that are linked to the permit through permit condition 2.3.

We have specified that the applicant must operate the permit in accordance with descriptions in the application, including all additional information received as part of

the determination process. These descriptions are specified in the Operating Techniques (Table S1.2) table in the permit and will include the following reports:

- Environment Management System
- H1 Amenity Risk Assessment
- Non technical summary
- In-process control document
- BAT assessment document
- Containment assessment
- Energy report
- Raw materials document

The applicant has also compared the proposed equipment and techniques and compared these against the horizontal guidance BAT Conclusions for Common Waste Water and Waste Gas Treatment/Management Systems in the Chemical Sector
For emissions to water the applicant has confirmed that the wastewater is controlled as per the Consent to Discharge Trade Effluent (Consent No. 709008, 6 August 2018) held with Welsh Water and all monitoring occurs as set out in the consent document. See Section 10.3 below for emissions to sewer.

As the proposed CHP will be an MCP, the site must adhere to the following operating techniques specific for MCP:

- Each MCP must be operated in accordance with the manufacturer's instruction and records must be made and retained to demonstrate this.
- The operator must keep periods of start-up and shut down of each MCP as short as possible.
- There must be no persistent emission of 'dark smoke' as defined in Section 3(1) of the Clean Air Act 1993.

Monitoring of point source emissions to air will be carried out in line with the monitoring requirements outlined in Monitoring stack emissions: low risk MCPs and specified generators, formally known as TGN M5. No further additional controls for monitoring are required.

Efficient use of raw materials, water and energy

Having considered the information submitted in the application, we are satisfied that the applicant will ensure that raw materials, water and energy is used as efficiently as possible.

The operator will be required to report energy usage under condition 1.2.1 and Schedule 4 of the permit. The following parameters are required to be reported, water and energy usage. This will enable us to monitor energy recovery efficiency at the Installation.

Avoidance, recovery or disposal of wastes produced by the activities

The applicant has confirmed that it is adopting the fundamental of good environmental practice in that it aims to reduce waste production throughout its operation.

Having considered the information submitted in the application, we are satisfied that the waste hierarchy referred to in Article 4 of the WFD will be applied to the generation of waste and that any waste generated will be treated in accordance with this Article.

We are satisfied that waste from the Installation that cannot be recovered will be disposed of offsite using a method that minimises any impact on the environment. Permit condition 1.4.1 of the permit will ensure that this position is maintained.

9 The site

9.1.Site Plan

The installation is located on Wrexham Industrial Estate and is centred around National Grid Reference (NGR) SJ 32056 69754.

The applicant has provided a plan which we consider is satisfactory, showing the extent of the site of the facility and its emission points.

The plan will be included in the permit and the operator will be required to carry on the permitted activities within the site boundary.

9.2 Site Condition Report

The applicant has provided a description of the condition of the site in a Site Condition Report. We have reviewed this and consider this description is satisfactory. The decision was taken in accordance with our guidance on site condition reports – guidance and templates (H5)[4].

The baseline report is an important reference document in the assessment of contamination that might arise during the operational lifetime of the installation and at cessation of activities at the installation.

On permit surrender, the Operator will adhere to regulations and take full responsibility of cleaning up the site, including any pre-existing contamination.

9.3. Site protection: potentially polluting substances and prevention measures

The operator has a duty to ensure that soil and groundwater are protected in order to meet the requirements of Articles 14 (1)(b), 14(1)(e) and 16(2) of the IED. This is delivered through condition 3.1.3.

Based upon the information in the application we are satisfied appropriate measures will be in place to protect the site and its surroundings from polluting substances.

9.4. Site Containment and pollution prevention measures

An environmental risk assessment was provided by the applicant and has been reviewed by NRW in support of the application. The assessment identifies the potential hazards on site along with the pathways and receptors.

The applicant has outlined that containment measures will meet CIRIA guidance C736 'Containment Systems for the Prevention of Pollution'. Report Reference: CE-WH-1801-RP13-Containment - Final dated 06 January 2023 outlines the commitments made by the applicant through risk management and contains a full inventory of

[4] Environmental Permitting Regulations , Guidance for applicants H5, Site Condition Report, Guidance and Template (naturalresources.wales)

primary containment and secondary containment measures. This has been included in the operating techniques of the permit.

An example of this includes a dedicated enclosed building with a concrete floor on the site in addition to a concreted and tarmac external yard area. The internal floor is completely sealed with no inside drainage outlet to ensure that any leakages or inadvertent spillages are contained within the building. Both the internal concreted and external concreted and tarmac floors are in good condition, as is the integrity of the building. The tanks for Caustic Soda (32%) and Monochloroacetic acid (80%) are made from Polypropylene and are self-bunded and conform to CIRIA where the bund capacity is 110% of the capacity of the tanks.

The Site collects effluent from the starch refining process in the Internal Drainage and Effluent storage tank. The Internal Drainage and Effluent Storage Tank acts as a holding tank for process water. The excess process water is discharged to sewer in accordance with the Trade Effluent Consent. The Internal Drainage and Effluent storage tank is located on a bunded tray. The scrubber media is re-circulated to avoid unnecessary discharge to sewer.

Based upon the information in the application and the commitments made we are satisfied appropriate measures will be in place, to protect the site and its surroundings from polluting substances.

9.5. Closure and decommissioning

Permit condition 1.1.1 requires the Operator to have a written management system in place which identifies and minimises risks of pollution including those arising from closure.

At the definitive cessation of activities, the operator has to satisfy us that the necessary measures have been taken so that the site ceases to pose a risk to soil or groundwater, taking into account both the baseline conditions and the site's current or approved future use. To do this, the operator has to apply to us for surrender, which we will not grant unless and until we are satisfied that these requirements have been met.

10 Environmental Risk Assessment

Regulated activities can present different types of risk to the environment, these include odour, noise and vibration, accidents, fugitive emissions to air and water; as well as point source releases to air, water, sewer and discharges to ground or groundwater, global warming potential and generation of waste. All these factors have been considered during our determination and the relevant risks from this proposal are discussed in this and other sections of this document.

The next sections of this document explain how we have approached the critical issue of assessing the likely impact of emissions from the Installation on human health and the environment and what measures we are requiring ensuring a high level of protection.

In line with our guidance, the applicant has provided an environmental risk assessment with the application which identifies the sources of key risks from the installation, possible pathways and receptors. This risk assessment and further assessments provided by the applicant and/or completed by NRW will be discussed in further detail below.

10.1. Assessment of impact on air quality

This section of the decision document deals primarily with the dispersion modelling of emissions to air from the stacks and their impact on local air quality.

The applicant has assessed the Installation's potential emissions to air against the relevant air quality standards, and the potential impact upon human health in line with relevant guidance[5]. These assessments predict the potential effects on local air quality from the Installation's stack emission.

The air impact assessments, and the dispersion modelling has been based on the Installation operating continuously at the relevant long-term or short-term emission limit values, i.e., the maximum permitted emission rate.

[5] Air emissions risk assessment for your environmental permit - GOV.UK (www.gov.uk)

The applicant has calculated process contributions (PC) and predicted environmental concentrations (PEC) at locations within the immediate vicinity and all identified sensitive receptor locations. The PEC is calculated by adding the PC to the representative background concentration for the same pollutant. The modelling results for each pollutant will be discussed separately below.

Nitrogen dioxide (NO_X)

Emissions of NO_X were assessed against the long-term Air Quality Standard (AQS) of 40 µg/m^3 (annual) and short term AQS of 200 µg/m^3 (hourly), not to be exceeded on more than 18 occasions in a year.

At sensitive receptor locations the maximum predicted long-term PC was >1 % and the long-term PEC was <70 % of the long-term AQS. Therefore, in accordance with the relevant guidance and Air Quality Standards the long-term impacts from NO_X can be considered as insignificant. At sensitive receptor locations the maximum predicted short-term PC was <10 % of the short-term AQS. Therefore, in accordance with the relevant guidance and Air Quality Standards the short-term impacts from NO_X can be considered insignificant.

Sulphur Dioxide (SO_2)

Emissions of SO_2 were assessed against a long-term AQS of 125 µg/m^3 (24-hour mean) and short term AQS of 350 µg/m^3 (1-hour mean).

At sensitive receptor locations the maximum predicted long-term PC was <1 % and the long-term PEC was <70 % of the long-term AQS. Therefore, in accordance with the relevant guidance and Air Quality Objectives the long-term impacts from SO_2 can be considered as insignificant. At sensitive receptor locations the maximum predicted short-term PC was <10 % of the short-term AQS Therefore, in accordance with the relevant guidance the short-term impacts from SO_X can be considered insignificant.

Particulate Matter (PM_{10})

Emissions of PM_{10} were assessed against a long-term AQS of 40 µg/m^3 (annual) and short term AQS of 50 µg/m^3 (24-hourly), not to be exceeded more than 35 times per year.

At sensitive receptor locations the maximum predicted long-term PC was >1 % and the long-term PEC was <70 % of the long-term AQS. Therefore, in accordance with the relevant guidance and Air Quality Standards the long-term impacts from PM10 can be considered as insignificant.

At sensitive receptor locations the maximum predicted short-term PC was >10 % of the short-term AQS. The 90.41st percentile 24-hour mean PM_{10} PCs are below 10% of the limit value at seven of the ten modelled receptors. A maximum PC of 13.8 µg/m^3 is predicted at receptor R10 which corresponds to 28% of the AQS. The corresponding PM_{10} PECs are below the 50 µg/m^3 limit value at all modelled receptors. A maximum PEC of 37.2 µg/m^3 is predicted at receptor R10, which is below the limit value by 26%. As such, predicted effects of 24-hour mean PM_{10} concentrations on discrete sensitive human receptors is considered not significant.

Particulate Matter ($PM_{2.5}$)

Emissions of $PM_{2.5}$ were assessed against a long-term AQS of 20 µg/m^3 (annual). At sensitive receptor locations the maximum predicted long-term PC was >1 % and the long-term PEC was <70 % of the long-term AQS. Therefore, in accordance with the relevant guidance and Air Quality Standards the long-term impacts from $PM_{2.5}$ can be considered as insignificant.

Volatile Organic Carbons (Benzene C_6H_6)

The applicant confirmed that the installation emissions may contain a variety of volatile organic compounds (VOCs), the exact blend of which is unknown. As there is no specific standard for assessment of VOCs, the VOCs were assumed to consist entirely of benzene (C_6H_6) and assessed against the benzene standard. This is considered a highly conservative approach. We agree with this approach.

Emissions of benzene C_6H_6 were assessed against a long-term AQS of 5 µg/m^3 (annual). At sensitive receptor locations the maximum predicted long-term PC was <1 % and the long-term PEC was <70 % of the long-term AQS. Therefore, in accordance with the relevant guidance and Air Quality Standards the long-term impacts from benzene can be considered as insignificant.

With regards to emission points A13 and 14 for the dust control equipment mentioned in Section 7.2 above, each unit utilises fabric sock filters to abate dust. The filter socks are replaced every 12 months in line with a written schedule developed by the site.

Emission limits

We have decided that emission limits should be set for the parameters listed in the permit.

Emission limit values for the new natural gas-fired CHP are in line with those contained within the Medium Combustion Plant Directive (MCPD).

The following substances have been identified as being emitted in significant quantities and Emission Limit Values (ELVs) based on BAT have been set for those substances: Particulate matter for the dryers at emission points A1 to A5. See Section 12.3 below.

It is considered that the ELVs or technical measures described above will ensure that significant pollution of the environment is prevented and a high level of protection for the environment secured.

Article 14(3) of IED states that BAT conclusions shall be the reference for permit conditions. Article 15(3) further requires that under normal operating conditions; emissions do not exceed the emission levels associated with the best available techniques as laid down in the decisions on BAT conclusions.

Based upon the information in the application and the measures that will be imposed by the permit we are satisfied that the appropriate measures will be in place to protect air quality for the environment and human health.

10.2. Assessment of impact to surface and ground water

The proposal includes two discharges of clean uncontaminated surface water drainage to surface water. These will be listed in the permit as emission points SW1 and SW2. The majority of the Site consists of a concrete and tarmac yard area and car park, which drain to storm water sewer. The two discharge pipes to surface water sewer are fitted with penstock valves close to and upstream of the discharge points SW1 and SW2. As the penstock valves are kept closed as a matter of routine, in the event of an accidental spillage there would be no discharge to the surface water sewer. There are no discharges to groundwater.

Based upon the information in the application we are satisfied that the appropriate measures will be in place to prevent pollution of ground and surface water.

We have requested by way of an Improvement Condition that the applicant undertake a CCTV survey of the drainage system and update the site drainage plan, which should be drawn to scale. See Annex 1 below.

10.3. Emissions to sewer

The proposal includes a discharge to sewer. This foul sewer drainage system on site receives waste waters from the welfare facilities (e.g. toilets and wash basins) and surplus water from wash downs and scrubber liquors associated with the manufacturing process plus trade effluent generated from the operation of the starch refinery area of the site and the cleaning processes used. A Trade Effluent Discharge Consent, issued by Dwr Cymru Cyfyngedig (Welsh Water), (Consent no: 709008), is in force for the site.

The Site collects effluent from the starch refining process in the Internal Drainage and Effluent storage tank. The Internal Drainage and Effluent Storage Tank acts as a holding tank for process water. The process water is dosed with a polymer and settled starch is returned to the process. The excess process water is discharged to sewer in accordance with the Trade Effluent Consent. The Internal Drainage and Effluent storage tank is located on bunded tray. The scrubber media is re-circulated to avoid

unnecessary discharge to sewer. All effluent discharges from the manufacturing process are to foul sewer

The applicant has confirmed that effluent generated by the starch refinery is firstly sent to a holding pit where a portion of this effluent is pumped back into the refinery process where there is capacity to do so. There should be no discharge from the starch mixing tanks. Spillages from these tanks are collected in a separate drainage system with no discharge point. Where possible, spillages are pumped to a bag filter which separates any starch and water. The starch is then re-used in the process while the water is discharged to sewer. If the bag filter cannot be utilised for a spillage, the applicant employs a third-party contractor to collect spillages contained in the mixing tank drainage system and dispose of them effectively.

The majority of the site's trade effluent is generated from the operation of the starch refinery area of the site and the cleaning processes used in this area. Effluent typically contains solid starch, cleaning chemicals (usually sodium hypochlorite) and water. However, as the site occasionally breach the suspends solids limit seen in the trade effluent consent, an assessment of the site's trade effluent management and treatment techniques has been undertaken by a third party. The applicant utilise multiple treatment techniques to reduce the suspended solids load which is discharged to sewer. This includes in-line polymer dosing and decanting. The applicant has confirmed that it is looking to replace the use of the polymer with one that will more effectively reduce the suspended solids load

The applicant is proposing to install pH and flow meters within the trade effluent discharge line to allow for improved effluent management and are also looking to implement an automatic in-line pH control system which will measure the pH levels within the effluent and dose effectively using an acid or base.

Emission limits

We have decided that emission limits should not be set for the parameters listed in the permit. We made this decision as a Trade Effluent consent is already in place. The conditions set in the site's trade effluent discharge consent have been specified by

Welsh Water to ensure that the site's effluent will not have a negative impact on the final water body which it is discharged to the River Clywedog**,** following treatment in Welsh Water's Five Fords Wastewater Treatment Works.

The emission limits in the Discharge Consent are as follows:

- Total suspended solids of the trade effluent shall not exceed 800 milligrams per litre
- The chemical oxygen demand of the trade effluent after one-hour quiescent settlement shall not exceed 3000 milligrams per litre
- Fat, oils and greases shall not excess 100 milligrams per litre
- Phosphate shall not exceed 15 milligrams per litre
- Ammonia shall not exceed 25 milligrams per litre
- Sulphate shall not exceed 500 milligrams per litre
- Sulphide shall not exceed 2 milligrams per litre
- Temp less than of 43° Celsius
- pH 5 -10

In addition:

- The maximum quantity of trade effluent discharged on any day (being any continuous 24 hour period) shall not exceed 360 cubic metres.
- The highest rate at which trade effluent may be discharged shall not exceed 4.2 litres per second.

The effluent water is monitored weekly by Welsh Water for suspended solids and pH, in accordance with the Trade Effluent Consent. The emission point to sewer is FS1.

The Operator has confirmed that it records flow rate daily and monitors trade effluent quality on an annual basis, with the sample sent to an independent UKAS accredited laboratory for analysis. All effluent discharges from the manufacturing process are to foul sewer.

Based upon the information in the application we are satisfied that the appropriate measures will be in place to prevent pollution of surface waters as a result of the sewer discharge.

10.4. Fugitive emissions

The applicant has identified the following potential fugitive emissions in their environmental risk assessment:

- Dust from vehicle movement and processing; and
- Pests.

The application details measures which will be in place for preventing and minimising fugitive emissions. The applicant states that modified starch production is not inherently dusty and is carried out entirely within an enclosed building. The applicant has informed us that the site has not received complaints regarding fugitive emissions. No information regarding complaints was received from the local authority during the initial consultation.

In the event of any complaints of dust emissions from local businesses or residents an investigation will be made and logged in accordance with the EMS. The application confirms that mitigation measures will be implemented, as appropriate, to ensure a high level of control.

The applicant has informed us that the site has not received complaints regarding pests and vermin. No information regarding complaints was received from the local authority during the initial consultation In the event of any pest infestation or complaints from local businesses or residents about pests or vermin from the site, an investigation will be made and logged in accordance with the EMS.

Based upon the information in the application we are satisfied that the appropriate measures will be in place to prevent or where that is not practicable to minimise fugitive emissions and to prevent pollution from fugitive emissions.

Permit condition 3.2.1 requires that emissions of substances not controlled by emission limits (i.e., fugitive emissions) shall not cause pollution. Condition 3.2.2 requires that a management plan shall be developed if pollution is subsequently identified.

10.5. Assessment of odour impact

The applicant confirms that in terms of sensitive receptors, the closest residential receptor is Little Friars Farm 340m west of the site. Within a radius of 500m from the permit boundary, there are no further residential receptors. There is a residential property 560m west of the site on Redwither Lane and HMP Berwyn is 540m to the south-east.

The applicant has identified the following sources of odour in their environmental risk assessment: Odour from raw material delivery, offloading, storage and processing and odour from products, prior to off-site dispatch. The environmental risk assessment states that the probability of exposure is unlikely as modified starch production process is not inherently odorous/does not generate any significant odour. The site has been in operation since 2007 and the applicant has informed us that the site has not received complaints regarding odour emissions. No information regarding complaints was received from the local authority during the initial consultation. The applicant confirms that in the event that significant odour is detected or odour complaints are received these will be investigated and logged in accordance with the Environmental Management System (EMS). Mitigation measures will be implemented, as appropriate, to ensure a high level of control.

The application details measures which will be in place for preventing and minimising odour pollution.

Based upon the information in the application we are satisfied that the appropriate measures will be in place to prevent or where not practicable to minimise the effects of odour.

Condition 3.3.1 in the permit will also require that emissions from the activities are free from odour at levels likely to cause pollution outside the site. We are satisfied that this will be sufficiently protective in conjunction with the measures described by the applicant for minimising odour at the installation.

10.6. Noise and vibration assessment

The applicant confirms that in terms of sensitive receptors, the closest residential receptor is Little Friars Farm 340m west of the site. Within a radius of 500m from the permit boundary, there are no further residential receptors. There is a residential property 560m west of the site on Redwither Lane and HMP Berwyn is 540m to the south-east.

The applicant has identified the following sources of noise in their environmental risk assessment: Engine noise from vehicles entering and exiting the site, including reversing bleepers and noise from the manufacturing process. The environmental risk assessment confirms that to minimise noise emissions, all vehicles, plant and machinery operated at the site will be maintained in accordance with the manufacturer's specification. The manufacturing process is carried out within an enclosed building, which minimises the potential for noise breakout from the site. The applicant has confirmed that the production process is not inherently noisy, that the site has been in operation since 2007 and that the site has not received complaints regarding noise emissions. No information regarding complaints was received from the local authority during the initial consultation. The applicant confirms that in the event of any noise complaints from local businesses or residents, they will be investigated and logged in accordance with the EMS. Mitigation measures will be implemented, as appropriate, to ensure a high level of control.

The application details measures which will be in place for preventing and minimising noise and/or vibration.

We are satisfied that vibration is unlikely to be an issue at the installation. The nature of the activity means that there are no significant sources of vibration on site. Therefore, vibration does not need to be included in the management plan.

Based upon the information in the application we are satisfied that the appropriate measures will be in place to prevent or where not practicable to minimise the effects of noise and vibration.

Conditions 3.4.1 of the permit requires noise from the activities to be below that which could cause pollution outside the site. We are satisfied that this will be sufficiently protective in conjunction with the measures described by the applicant for minimising noise at the installation. We have added an improvement condition following the commissioning of the proposed CHP. See Annex 1 below.

10.7. Global warming potential

Emissions of carbon dioxide (CO_2) and other greenhouse gases differ from those of other pollutants in that, except at gross levels, they have no localised environmental impact. Their impact is at a global level and in terms of climate change.

Global Warming Potential (GWP100) emissions as carbon dioxide equivalents (CO2e) have estimated for the proposed facility by the applicant.

Carbon dioxide emissions arising from primary energy consumption at the site are detailed in the application. The initial estimate for annual Global Warming Potential / carbon dioxide emissions in the first year of operation and assuming circa 15,000 tonnes of modified starch manufacture is 5,131 tonnes of CO_2.

The applicant has confirmed that all plant and equipment will be operated by trained personnel, in accordance with the management procedures defined within the Environmental Management System (EMS). Where necessary, operational control procedures will be refined to ensure efficient operation of equipment particularly, including during start up and shut down when energy usage is at its optimum.

As part of management reviews, to be completed under the EMS, energy performance will be reviewed by site management. The review will include:

- Comparison of quantitative performance against targets;
- Comparison with benchmark data, where available;
- Review of the implementation of energy efficiency improvements; and
- Energy reporting, at a minimum frequency of annually.

We agree with the proposed mitigation and proposed reviews of energy efficiency improvements.

11 Impact on European Sites, SSSIs and non-statutory sites

The applicant has used the relevant screening distance criteria to identify relevant protected conservation sites which could be at risk from the proposal. The screening distances used 10km for Special Areas of Conservation (SAC), Special Protection Areas or Ramsar sites, and within 10km of the facility, and 2km for Sites of Special Scientific Interest, National Nature Reserves, Local Wildlife Sites (LWS) and Ancient Woodland (AW) We are in agreement with the screening distances used.

A full assessment of the variation application and its potential to affect the identified sites identified has been carried out as part of the permit determination process. National Site Network sites, Sites of Special Scientific Interest (SSSI) and non-statutory conservation sites will be discussed separately below.

11.1 The National Site Network

The following National Site Network sites are located within 10km of the installation:
Special Areas of Conservation (SAC):

- Johnstown Newt Sites UK0030173 (SAC) approximately 8km from the installation
- River Dee and Bala Lake / Afon Dyfrdwy a Llyn Tegid (Wales) UK0030252 10000 (SAC) Located approximately 3km from the installation
- River Dee and Bala Lake / Afon Dyfrdwy a Llyn Tegid (England) UK0030252 10000 (SAC) Located approximately 3km from the installation

Ramsar Sites:

- Midland Meres & Mosses Phase 2 (Wales) UK11080 Located approximately 5km from the regulated facility

A Habitats Regulations Assessment (HRA) is not required because there is no conceivable impact pathway to any of the European sites identified by virtue of the scale or location or nature of the project.

Although the proposed and existing boilers would result in emissions to air, they are not within screening distance of the European sites. The only impact pathway to the SACs and Ramsar from the proposal is emissions of NO_x and SO_2 to air from the

boilers. The two existing boilers are 1.634MWth and 1.1MWth and use natural gas as the fuel. The relevant screening distance for natural gas of combustion units of this size is 750 m. As such the SACs and Ramsar sites are outside of the screening distance for emissions from the boiler and therefore there is no impact pathway due to size and scale of the boiler. The proposed boiler will be 1.363MWth and will also use natural gas as the fuel. The relevant screening distance for natural gas of a combustion unit of this size is also 750 m. As such the SACs and Ramsar sites are also outside of the screening distance for emissions from the boiler. There is no impact pathway due to size and scale of the boiler.

With regards to dust emissions, as the nearest European site is approximately 3km from the installation there is no impact pathway. There is no possibility that dust from the facility could negatively affect any of the European sites within a 10km radius of the site.

11.2 Sites of Special Scientific Interest (SSSI)

No SSSIs are located within 2km of the installation. Therefore, no further assessment was required as there is no impact pathway to any SSSI due to the location of the installation.

11.3 Non-statutory conservation sites

The following relevant non-statutory sites are located within 2km of the installation:

- Peter's Dingle Local Wildlife Site (LWS)
- Wrexham Industrial Estate LWS
-
- Unnamed Ancient Woodland (AW) x 4
- Black Wood AW
- Rhododendron Spinney AW
- Cefn Park LWS
- Redwither Wood AW
- Clays Plantation AW

As per Section 11.1 above which confirms that a Habitats Regulations Assessment (HRA) is not required because there is no conceivable impact pathway to any of the

National Site Network sites identified by virtue of the scale or location or nature of the project, we can also confirm therefore that the project will not adversely affect the integrity of any non-statutory conservation sites. The local wildlife and ancient woodland sites are outside of the screening distance for emissions from the boiler and therefore there is no impact pathway due to size and scale of the boiler.

Based upon the information in the application we are satisfied that there will be no adverse impact to the non-statutory conservation sites identified.

12. The Permit Conditions

We have incorporated a number of new conditions specific to Medium Combustion Plants into the permit. These conditions have been taken from our MCP permit template.

12.1 Incorporating the application

We have specified that the applicant must operate the permit in accordance with descriptions in the application, including additional information received as part of the determination process.

These descriptions have been specified in the Operating Techniques table in the permit. As the new CHP is an MCP, the site must adhere to a number of additional operating techniques, these have also been specified in the Operating Techniques table in the permit. We have specified that the operator must operate the permit in accordance with descriptions in the application

12.2 Emission Limits

See Section 10.1 above with regards to emission limits to air. No emission limits have been set for emissions to surface water and sewer.

12.3 Monitoring

We have decided that monitoring should be carried out for the parameters listed in Schedule 3 of the permit using the methods and to the frequencies specified in those

tables. These monitoring requirements have been imposed in order to demonstrate compliance with the emissions limits in the permit.

For the new Medium Combustion Plant, that is an engine fuelled on natural gas, the monitoring requirements are as follows:

Pollutant	**Emission Limit Value (mg/Nm^3)**	**Monitoring Required**
Oxides of Nitrogen (NO and NO_2 expressed as NO_2)	95	Within 4 months of the start of operations and then every three years
Carbon monoxide	No limit set	Within 4 months of the start of operations and then every three years

Emission limit values are defined at a temperature of 273.15 Kelvin (K), a pressure of 101.3 kilo Pascals (kPa) and after correction for the water vapour content of the waste gases and at a standardised O_2 content of 15% for engines.

For emissions to air, the methods for periodic monitoring are in accordance with the Environment Agency's Monitoring stack emissions: low risk MCPs and specified generators. A condition has been added to the permit stating the first monitoring measurements will be carried out within four months of the issue date of the permit or the date when the MCP is first put into operation whichever is later.

For emissions to air of dust at emission points A1 to A5, the methods for periodic monitoring are in accordance with BAT Conclusions 8 and 14 of under Directive 2010/75/EU of the European Parliament and of the Council on industrial emissions, for common waste gas management and treatment systems in the chemical sector published in 2022. Note: While no longer bound by latest post 2021 EU regulations, the UK still considers and benchmarks European and international best practices when developing our own standards. Environmental permits in the UK still reference EU BREF documents and BATC which were published pre 2021 and Operators are expected to comply with these unless alternative UK BATC have been published.

Based on the information in the application and the requirements set in the conditions of the permit we are satisfied that the monitoring techniques, personnel and equipment employed by the Operator will have either MCERTS certification or MCERTS accreditation as appropriate.

We have also added process monitoring requirements in Table S3.4 for the filter socks at emission points A13 and A14 and also for the scrubber. These are as follows:

- Filter socks – pressure across the filter sock – continuous; and
- Scrubber – to monitor flow rate daily

12.4 Reporting

We have specified the reporting requirements in Schedule 4 of the Permit to ensure data is reported to enable timely review by Natural Resources Wales to ensure compliance with permit conditions and to monitor the efficiency of material use and waste recovery at the installation.

12.5 Raw Materials

We have not specified limits and controls on the use of raw materials and fuels.

12.6 Improvement Conditions

Based on the information on the application, we consider that we need to impose improvement conditions. Details of the improvement conditions used can be found at Annex 1. The inclusion of the improvement conditions has been discussed throughout the body of the text of this decision document. An improvement condition has also been set for the operator to submit to Natural Resources Wales a climate change risk assessment that includes current and future climate change projections.

13 OPRA

The agreed OPRA score at the installation is 108. This will form the basis for ongoing subsistence fees.

ANNEX 1: Improvement Conditions

Table S1.3 Improvement programme requirements		
Reference	**Requirement**	**Date**
IC1	Following successful commissioning and establishment of routine steady operation of the CHP, the Operator shall undertake noise monitoring at the nearest local receptors. This shall include: • A full noise monitoring survey and assessment meeting the BS4142:2014 standard • 1/3rd octave and narrow band (FFT) measurements to identify any tonal elements or low frequency noise • Reference to the Welsh Government Noise and soundscape action plan 2018-2023. Upon completion of the work, a written report shall be submitted to Natural Resources Wales for approval.	Within 9 months of commissioning of CHP
IC2	Undertake a CCTV survey of the drainage system and update the site drainage plan, which should be drawn to scale	Within 9 months of issuing permit
IC3	The operator shall submit to Natural Resources Wales a climate change risk assessment that includes current and future climate change projections. The assessment must be site specific and uses the most up to date climate projections to: ○ plan and manage the risks associated with a 2°C rise by 2050 ○ assess the risks associated with a 4°C rise by 2100 ○ avoid lock-in to future proof your site ○ consider internal, external and consequential climate change impacts ○ develop a plan to regularly update the assessment based on new data or emerging climate trends	Within 6 months of issuing permit

ANNEX 2 :Consultation Reponses

1. Advertising and consultation on the Application

The application has been advertised and consulted upon in accordance with Natural Resources Wales Public Participation Statement. Responses to this consultation and how we have taken consultation responses into account in reaching our draft decision is summarised in this Annex.

No comments were received

ANNEX 3: BAT Assessment

The applicant assessed the installation using the BAT Conclusions for Common Waste Gas Management and Treatment Systems in the Chemical Sector in the Official Journal of the EU on 6th December 2022. There are 36 BAT Conclusions. This checklist provides a record of decisions made in relation to each relevant BAT Conclusion applicable to the installation. This annex should be read in conjunction with the permit. For definitions and acronyms see the BAT Conclusions Document: [6]Common Waste Gas Management and Treatment Systems in the Chemical Sector | EU-BRITE

BATc number	Summary of BAT Conclusion requirement	**Status/comment** **One of the following:** Not Applicable, Currently Compliant, Compliant in the future, Not Compliant
8	BAT is to monitor channelled emissions to air with at least the frequency given below and in accordance with EN standards. If EN standards are not available, BAT is to use ISO, national or other international standards that ensure the provision of data of an equivalent scientific quality	For emission points A1-A5, Compliant in the future as monitoring to air is a requirement in the permit
14	BAT-associated emission levels (BAT-AELs) for channelled emissions to air of dust	For emission points A1-A5, compliant in the future as monitoring to air is a requirement in the permit

[6] Common Waste Gas Management and Treatment Systems in the Chemical Sector (COMMISSION IMPLEMENTING DECISION (EU) 2022/2427 of 6 December 2022)