

Natural Resources Wales permitting decisions

Variation of a Bespoke Permit

We have decided to issue the variation for Wrexham Convenience Foods operated by Oscar Mayer Limited (trading as Rowan Foods Limited).

The application number is PAN-000070.

The variation number is EPR/WP3534GX/V004.

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.

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.

Structure of this document

- Key issues
- Annex 1 the decision checklist

Key issues of the decision

This variation updates the permit to incorporate a new 4.5MWth gas fired steam raising boiler as a directly associated activity. There will be one additional emission to air as a result, through an existing stack. The operator is also installing new refrigeration systems to serve temperature controlled storage areas, an additional process refrigeration unit to serve production areas and a new air conditioning system. Several old refrigeration systems will be removed as a result.

Environmental Risk

Emissions to air

The applicant has completed a H1 risk assessment considering emissions to air, based on the installation and operation of the proposed new gas boiler. Emissions will be from the same stack as the current boilers.

The results of the H1 show high short and long term process contributions for nitrogen dioxide and nitrogen dioxide (ecological – daily mean). The short-term Process Contribution (PC) is more than 10% of the Air Quality Standard (AQS) and the long-term PC is more than 1% of the AQS. The PC for Carbon Monoxide is regarded as insignificant as the short term PC is less than 10% of the AQS. The Predicted Environmental Contribution is also high, at greater than 70% of the long term standard.

The results of the H1 indicate that further modelling is required however the applicant has not carried any out. The applicant has calculated the effective stack height from the boiler to be 0m. The calculation takes into account the height of the stack (17m) in relation to the height and close proximity of buildings on site. The applicant considers that the H1 assessment provides highly conservative estimates of impacts from small combustion plant having stacks with effective height 0. We agree in this instance that the stack height is likely to have contributed to the results shown by the H1 assessment, which would not typically be expected for the operation of a boiler of this size.

The combined capacity of the boilers on site falls under the threshold that would normally be regulated under EPR (2 x 3MWth existing and 1 x 4.5MWth new). The new boiler is to be the lead boiler, but will not replace the existing smaller boilers. Three boilers will provide sufficient capacity on site to allow for a boiler to be taken off line when required for maintenance. The new boiler is considered to represent BAT and has a rated efficiency of >94%. Taking these factors into consideration further modelling has not been requested from the applicant.

We are satisfied that the operation of the new boiler will not cause an exceedance of relevant air quality standards.

Emissions to water

No additional release points to surface water or sewer will be introduced as part of this variation.

Noise

It is not considered that the changes being made on site will have any significant effect on noise levels. The applicant has not carried out a noise monitoring assessment as part of their application.

Biodiversity, Heritage, Landscape and Nature Conservation

Screening carried out during the permitting process shows the following sites within the relevant distance of the emission point.

European Protected Sites (within 10km)

Ramsar - Midland Meres & Mosses Phase 2 (3.9km away)

SAC - Johnstown Newt Sites (7.3 km away)

SAC - River Dee and Bala Lake/Afon Dyfrdwy a Llyn Tegid (4km away)

National and Local sites (within 2km)

Cefn Park (wildlife site) 0.9km away

Wrexham Industrial Estate (wildlife site) 0.2km and 1km away

5 areas of semi natural woodland

3 areas of restored ancient woodland

An assessment has been carried out as part of the permitting process, on the potential effects of the new emission on the European sites listed above. We do not consider that there will be any significant effect caused by the operation of the new boiler. See supporting Appendix 11 document for detail. The document has been forwarded on to our conservation team for information but it was not considered that formal consultation was required.

Due to the sites location within an existing industrial estate, and taking into account the size of the new boiler we do not consider that there will be any significant impact on the national and local sites listed above, from its operation.

Monitoring

The operator is required to annually monitor emissions of Oxides of Nitrogen (NO and NO₂ expressed as NO₂) from the new boiler to demonstrate that it is functioning appropriately and that emissions remain insignificant. No emission limits have been set.

As the new boiler is to be the lead boiler we have changed the monitoring requirement for the existing boilers (boiler stack one and boiler stack two). Monitoring will only be required when these boilers are in operation for more than 500 hours per calendar year.

Annex 1: decision checklist

This document should be read in conjunction with the application and supporting information and the variation notice.

Aspect considered	Justification / Detail
The site	
Extent of the site of the facility	The operator has provided a plan which we consider is satisfactory, showing the location of the emission points at the facility. The permit boundary has not changed as a result of this variation.
Biodiversity, Heritage, Landscape and Nature Conservation	The application is within the relevant distance criteria of a site of heritage, landscape or nature conservation, and/or protected species or habitat. An assessment of the application and its potential to affect the sites has been carried out as part of the permitting process. We consider that the application will not affect the features of the site. See key issues section.
Environmental Risk Assessment and operating techniques	
Environmental risk	We have reviewed the operator's assessment of the environmental risk from the facility. The operator's risk assessment is satisfactory. See key issues section.
Operating techniques	We have reviewed the techniques used by the operator and compared these with the relevant guidance notes. The proposed techniques/emission levels for priorities for control are in line with the benchmark levels contained in the TGN and we consider them to represent appropriate techniques for the facility.
The permit conditions	
Incorporating the application	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 in the permit.

Aspect considered	Justification / Detail
Monitoring	We have decided that monitoring should be carried out for the parameters listed in the permit, using the methods detailed and to the frequencies specified. See key issues section.
Reporting	We have specified reporting in the permit. The operator is required to report on emissions monitoring of the new boiler every 12 months.
Operator Competence	
Environment management system	There is no known reason to consider that the operator will not have the management systems to enable it to comply with the permit conditions. The decision was taken in accordance with RGN 5 on Operator Competence.