Review of an Environmental Permit under the Environmental Permitting (England & Wales) Regulations 2016 ("EPR")

Decision document recording our decision-making process

We have decided to vary the Permit for Greystone Quarry Waste Facility operated by MDJ Light Brothers (Scrap Processing) Ltd, as a result of an application made by the Operator.

The Permit number is EPR/ KP3894HG (consolidation of EAWML 10122 / EPR/EP3895HL and EAWML 19635 / EPR/KP3894HG)

The Variation notice number is EPR/ KP3894HG /V002

What this document is about

This is a decision document, which accompanies a variation notice.

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.

Preliminary information and use of terms

We refer to the Permit (both existing and as varied) as "the **Permit**" in this document; and to the variation of the Permit as "the **Variation**".

The Operator of the Installation is MDJ Light Brothers (Scrap Processing) Ltd: we call MDJ Light Brothers (Scrap Processing) Ltd "the **Operator**" in this document. We refer to MDJ Light Brothers (Scrap Processing) Ltd's Greystone Quarry Waste Facility as "the **Installation**".

The Application was duly made on 04/09/14

How this document is structured

- Our decision
- The legal framework
- How we took our decision
- Key issues in the determination
- Annex 1 – the decision checklist

1 Our decision

We have issued a Variation, which will allow the Operator to operate their facility as an Installation, subject to the conditions in the varied Permit.

This Variation does several different things:

- **First**, it gives effect to our decisions following the identification of the Operator as undertaking a "newly prescribed activity" (NPA) under the Industrial Emissions Directive (IED);

- **Second**, it takes the opportunity to bring earlier variations into an up-to-date, consolidated Permit. The consolidated Permit should be easier to understand and use; and

- **Third**, it modernises the entire Permit to reflect our current template. The template reflects our modern regulatory permitting philosophy and was introduced because of a change in the governing legislation. This took place when the Pollution Prevention and Control (England and Wales) Regulations 2000 ("PPC") were replaced in 2008 by a new statutory regime under the Environmental Permitting Regulations 2007 (now the 2010 version).

- **Fourth**, it consolidates activities from two different permits into a single permit providing greater clarity for those involved in the regulatory process. Previously there were two separate waste activity permits for Greystone Quarry. The permit referenced as EAWML 10122 (or EPR/EP3895HL) is now part of EAWML 19635 (or EPR/KP3894HG). All the activities at the site will be regulated using EAWML 19635 (or EPR/KP3894HG).

The introduction of new template conditions makes the Permit consistent with our current general approach and philosophy. Although the wording of some conditions has changed, while others have disappeared because of the new regulatory approach, it does not affect the level of environmental protection achieved by the Permit in any way.

We consider that, in reaching our decision, we have taken into account all relevant considerations and legal requirements and that the Permit will continue to ensure that a high level of protection is provided for the environment and human health.

The original Permit EAWML 10122, issued on 20/09/02 and the original Permit EAWML 19635, issued on 18/05/79 ensured that the facility, would be operated in a manner which would ensure the protection of the environment specified in the existing Guidance at the time. To the extent that we have substantively altered the Permit as a result of this variation, the new requirements will deliver a higher level of protection to that which was previously achieved.

As we explained above, we do not address changes to the Permit in this document, to the extent that they give effect to either the consolidation of earlier variations, or introduce new template conditions.

2 The legal framework

The original Permit - EAWML 10122 was granted on 20/09/02 under the Environmental Protection Act 1990 and regulated under the Waste Management Licensing Regulations 1994.

The original Permit - EAWML 19635 was granted on 18/05/79 as a Waste Disposal License under the Control of Pollution Act 1974, which was superseded by the Environmental Protection Act 1990.

The Installation will be subject to the requirements of the Industrial Emissions Directive (IED) 2010/75/EU and regulated under the Environmental Permitting (England and Wales) Regulations 2010 (SI 2010 No 675). The IED was transposed in England and Wales by the Environmental Permitting (England and Wales)(Amendment) Regulations 2013 on 27 February 2013.

The IED seeks to achieve a high level of protection for the environment taken as a whole from harmful effects of industrial activities. It does so by requiring each of the industrial installations to have a permit from the competent authority (in England, the Environment Agency, or for smaller Installations, the relevant Local Authority). The IED has increased the number of activities that require an Installations permit. These are predominantly regulated as “waste operations” and include (when exceeding specific thresholds described in IED):

- hazardous waste treatment for recovery;
- hazardous waste storage;
- biowaste treatment – recovery and/or disposal;
- treatment of slags and ashes
- metals shredding;
- pre-treatment of waste for incineration/co-incineration;
- biological production of chemicals; and
- independently operated wastewater treatment works serving only industrial activities subject to the Directive

Article 11 of the IED requires the relevant authority (the Environment Agency in this case) to ensure that the Installation is operated in such a way that all the appropriate preventative measures are taken against pollution, in particular through the application of Best Available Techniques (BAT). Under Article 15(2), the Permit must contain emission limit values (ELVs) (or equivalent parameters or technical measures) for any pollutants likely to be emitted from the Installation in significant quantities. These ELVs are to be based on BAT, but also on local factors and EU Environmental Quality Standards. The overarching requirement is to ensure a high level of protection for the environment and human health.

We are required by Article 13 of the IED to keep abreast of developments in BAT. In addition, Article 13 requires us to carry out a periodic review of the permit’s conditions, and to update them if necessary.

The IED also requires the European Commission to organise an exchange of information between EU Member States so that what are known as BAT reference

documents (or BREF notes) can be published, creating a level playing field across the EU, providing a consistent set of standards for new plant, to which regulatory authorities in the Member States can then have reference. These BREF notes are the basis for our own national sector technical guidance. The Commission is also required to update BREF notes on a regular basis. The waste treatment BREF notes are currently being reviewed and a final issue date is anticipated in 2016. Under the IED, all permits will be subject to review within four years of the publication of revised BREF notes. This means that we will need to do a further review against any new standards in the BREF notes at sometime in the future.

The IED has been implemented over several years commencing from 7 January 2013. For existing installations operating “newly prescribed activities”, the relevant date for implementation was 7 July 2015.

3 How we reached our decision

It is the Operators responsibility to ensure they are correctly regulated for the activities they are carrying out. Following adoption of the IED, the Environment Agency engaged in a range of briefings and communications with the waste industry sector to raise awareness of the implications of the Directive and the need to ensure their facilities are correctly regulated (particularly after the implementation date of 7 July 2015 for newly prescribed activities).

Early in 2014, the Environment Agency provided further briefings to industry trade bodies and wrote to operators we believed may be implicated by these changes. We provided detailed information sheets that described the implications and the process operators should follow if they decided to have their activities permitted as Installations.

We confirmed that most facilities fell into one of two groups:

- Facilities permitted from April 2007
  When these facilities were permitted, a thorough assessment would have been carried out to confirm whether the proposed activities were using "appropriate measures" as a standard to protect the environment.

  This standard of protection is the same standards that would have been assessed against had the facilities applied as an Installation activity (i.e. BAT). The permit would have also been issued with modern conditions that ensured protection of the environment.

  We consider that these facilities are effectively 'IED-compliant' in terms of the technical standard of the facility with the exception of the "newly prescribed activity". For these facilities, we consider that, in general, no further technical assessment is required, so administrative variations are an appropriate mechanism to show the activities as Installation activities. The administrative variation is a necessary route for the Operator to formally ask for this activity to be included in their permit and for us to advertise that request on our Public Register.

  It is understood that the Environment Agency granted permits for new waste activities under the Waste Management Licensing Regulations 1994 beyond April 2007. Where a facility falls into this group, the Environment Agency shall determine whether or not the application was assessed using "appropriate measures". Where it is determined that the application was assessed using "appropriate measures", the application will be designated as an "administrative variation".

- Facilities permitted before April 2007
  For these facilities, a "normal" or "substantial" variation is appropriate because a detailed technical assessment is required on aspects of the Application [ecological impact assessment, waste types, secondary containment etc.] in addition to the administrative changes.
  Substantial variations will only be relevant where the newly prescribed activity is being added to an existing installation permit.

The original Permit EAWML 10122, was issued on 20/09/02 and the original Permit EAWML 19635, issued on 18/05/79 – both of which were subsequently varied. We have reviewed the documentation submitted in support of the original permit and subsequent variation application(s) in this determination. We are not satisfied that the standard of protection was assessed using appropriate measures. We have determined this Application as a normal variation, also due to the fact it is a consolidation of two permits. As the Variation will not have any negative effects on the environment, it is not a substantial variation and so does not require consulting on.

4 Key issues in the determination

Greystone quarry permits - EAWML 10122, and EAWML 19635 will be consolidated to form one permit. This will create a large site with several activities.

Within the application flow diagrams for the activities on site were included.

MDJ Light Greystone
Quarry process flow (

(This document is also saved as flow diagrams to our document repository

Operating techniques and Improvement conditions (IC)

The site have operating techniques however elements require updating to ensure they are in line with BAT.

The site has 9 ICs, shown below.

Table S1.7 Improvement programme requirements		
Reference	Requirement	Date
IC1	The operator shall submit a written procedure to the Environment Agency for approval for the use of Best Available Techniques to **trace and inspect baled wastes** delivered to the site. This shall include, but not be limited to, detailed monitoring and management of: (a) bale suppliers and processing; (b) flame events and audible events associated with processing of baled waste; and (c) concealed items, non-metallic materials, undepolluted End of Life Vehicles, cylinders / sealed containers or heavy non-shreddable items The procedure shall include risk-based inspection of individual bales which includes pre-shredding, opening or breaking of bales as appropriate. The operator shall implement the procedure in accordance with the Environment Agency's written approval.	3 months from permit issue date

Table S1.7 Improvement programme requirements		
Reference	Requirement	Date
IC2	The operator shall submit **a written management system** to the Environment Agency. The management system must ensure that all Installation activities referenced A1 – A12 in Table S1.1 are undertaken in accordance with Best Available Techniques The Management system shall include: (a) a clearly documented and auditable waste acceptance procedure which details: (i) assessment of potential in-feed including pre-acceptance checks to ensure that the wastes received are suitable for shredding, (ii) procedures for the identification, confiscation and repatriation of gas cylinders and other prohibited items, (iii) a dedicated waste reception area with suitably trained staff controlling inspection, reception and validation of wastes (iv) a dedicated quarantine area for wastes that are prohibited, awaiting full inspection, testing or removal (b) clearly documented and auditable material handling procedures that ensure emissions including dust and noise from material handling are prevented or where that is not practicable minimised, and (c) clearly documented and auditable procedures for the management of shredder residues which ensure that: (i) all residues are stored on impermeable surface with sealed drainage in a way that prevents or where that is not practicable, minimises emissions and prevents wind-blown dispersion (ii) all residues are characterised and assessed for appropriate further processing, recovery or disposal The operator shall implement the management system in accordance with the Environment Agency's written approval.	6 months from permit issue date
IC3	The operator shall submit proposals to the Agency that demonstrate they are preventing, or where that is not practicable, minimising **emissions of dust and particulates** by the movement and handling of materials by conveyor belt. This should include as appropriate: (a) covering of conveyors, transfer points and drop points downstream of the shredder; and (b) spraying and misting shall be used in dry or windy conditions (c) provision of containment for shredding operations of hazardous and non-hazardous WEEE and associated timescales to implement containment.	6 months from permit issue date
IC4	The operator shall submit an **updated drainage report** for Environment Agency's written approval, covering the improvements to the drainage system across the whole site, that includes but not limited to: (a) Demonstrating (using calculated volumes and rates) that all runoff water would be appropriately contained, taking into consideration worst case and incident scenarios; (b) Demonstrating no contaminated waters from site will be discharged to ground; (c) Demonstrating if the runoff water is reused, all contaminants identified during the sampling investigations will be taken into consideration (due to the potential for elevated concentrations) and a suitable treatment method identified, including the consideration of suspended solids removal; and (d) The proposal shall ensure that any potentially contaminated water on site will not pose a health risk. The drainage report must contain dates for implementation of individual measures.	3 months from permit issue date

Table S1.7 Improvement programme requirements		
Reference	Requirement	Date
IC5	The operator shall submit a written monitoring plan to the Environment Agency for approval that includes: • proposals to undertake representative **monitoring of the surface water** discharged from point(s) as agreed under IC4 including the parameters to be monitored, frequencies of monitoring and methods to be used; The operator shall carry out the monitoring in accordance with the Environment Agency's written approval The operator shall submit a written report to the Environment Agency for approval that includes: • the results of an assessment of the impact of the emissions of surface water from the site using the Environment Agency's 'H1 Environmental Risk Assessment' tool (or equivalent as agreed with the Environment Agency) based on the parameters monitored in part (a) above; and The operator shall implement the measures as approved, and from the dates stipulated by the Environment Agency.	3 months following completion of IC4
IC6	The Operator shall submit a written proposal to the Environment Agency to carry out tests to determine the **size distribution of the particulate matter** in the exhaust gas emissions to air from emission point A1 identifying the fractions within the PM_{10}, and $PM_{2.5}$ ranges. The proposal shall include a timetable for approval by the Environment Agency to carry out such tests and produce a report on the results. On receipt of written agreement by the Environment Agency to the proposal and the timetable, the Operator shall carry out the tests and submit to the Environment Agency a report on the results.	3 months from permit issue date
IC7	The operator shall submit a written plan to the Environment Agency for approval that includes: (a) proposals to undertake **representative monitoring of the air discharged from point A2** including the parameters to be monitored, frequencies of monitoring and methods to be used. ; (b) confirmation that a written report will be submitted to the Environment Agency for approval that includes: i) the results of an assessment of the impact of the emission to air from the site using the Environment Agency's 'H1 Environmental Risk Assessment' tool (or equivalent as agreed with the Environment Agency) based on the parameters monitored in (a) above; and ii) proposals for appropriate measures to mitigate the impact of the emissions where the assessment determines they are significant, including emissions limits and monitoring and dates for implementation of individual measures; and iii) details of appropriate measures for the operation and maintenance of the abatement system to ensure that where emission limits are proposed they are met or, where emission limits are not required, emissions remain insignificant. The operator shall carry out the monitoring in accordance with the Environment Agency's written approval.	3 months from permit issue date
IC8	The operator shall adopt best available techniques to ensure that emissions from the stage 2 refrigeration destruction plant are contained, channelled and abated such that TVOC emissions do not exceed 15 mg/m^3	30 July 2019

Table S1.7 Improvement programme requirements		
Reference	Requirement	Date
IC9	The operator shall submit a written monitoring plan to the Environment Agency for approval. The plan must contain proposals for a comprehensive monitoring exercise to demonstrate that the stage 1 and stage 2 processing of refrigeration units and insulation panels does not give rise to **fugitive** releases to air of refrigerant or blowing agent gases. The operator shall carry out the monitoring exercise and submit a report in accordance with the Environment Agency's written approval. The operator will give the Environment Agency at least fourteen days notice of the commencement of the monitoring exercise. The Environment Agency will be notified immediately if any fugitive releases are detected during the monitoring exercise.	2 months following the completion of IC8

In relation to Improvement Condition 4, the site has a long history of site drainage issues, all run off from site was collected in an unlined lagoon (including at times contaminated fire water). The lagoon sits on a principal aquifer. MDJ Light Bros, on the instruction of the EA have previously produced a cost benefit analysis and a strategy for the site drainage. We recognise the operator has invested in better controls since the application was submitted but we have added an IC to confirm to the EA the basis for the investment, the sizing of the system, the protection included, the management of the system.

IC 5 is connected to this to ensure a monitoring plan is also put in once the functioning of the drainage system is agreed with the EA due to previous findings of elevated levels of certain substances thought to be a result of normal site operations rather than the fire events. This is especially the case for substances such as Iron and Antimony which consistently exceed the EQS, and those that are shown to fluctuate (i.e. Titanium, Vanadium, Barium, Calcium, Magnesium, Manganese, Potassium and Strontium). Therefore necessary to continue monitoring these substances in the balancing pond to protect the underlying aquifer.

In relation to Improvement condition 7, the Operator are using a novel technology within the metal shredding industry and therefore MDJ Light Bros are requested to submit a written proposal to the Environment Agency for approval, proposals regarding the oxidiser unit to prevent the release of HCFCs to the atmosphere from the fridge plant.
The proposal must contain dates for implementation of individual measures.

<u>Waste types</u>
The original permits do not define the waste codes in detail, the Agency and Operator have agreed the waste codes that cover the current site operations and operating techniques and these are included in the permit.

Annex 1 – decision checklist

Aspect considered	Justification / Detail	Criteria met
Consultation		
Responses to web publicising	No responses were received in response to the web publicising.	✓
Operator		
Control of the facility	We are satisfied that the applicant (now the operator) is the person who will have control over the operation of the facility after the grant of the permit. The decision was taken in accordance with EPR RGN 1 Understanding the meaning of operator.	✓
The facility		
The regulated facility	The extent/nature of the facilities taking place at the site required clarification. The regulated facility is an installation with remaining waste activities which comprises the following activities listed in Part 2 of Schedule 1 to the Environmental Permitting Regulations and the following directly associated activities: <u>*Three hazardous waste treatment installation activities*</u> *S5.3 A(1) (a) (ii) Disposal or recovery of hazardous waste with a capacity exceeding 10 tonnes per day involving physico-chemical treatment* o *Pentane refrigeration units* o *Hazardous WEEE treatment facility* o *Oil Recovery Facility* DAAs - Storage of processed materials excluding temporary storage of hazardous waste under Section 5.6 A(1)(a) <u>*Hazardous waste storage pending treatment*</u> *Section 5.6 A(1)(a) Temporary storage of hazardous waste in a facility with a total capacity exceeding 50 tonnes (Aggregated) pending any of the activities listed in Section 5.1, 5.2 and 5.3* o *Refrigeration units* o *Oils* o *Hazardous Waste and* o *Hazardous WEEE* <u>*Processing IBA*</u> *S5.4 A(1) (b) (iii) Recovery or a mix of recovery and disposal of non hazardous waste with a capacity exceeding 75 tonnes per day involving treatment of slags and ashes.* DAAs - Storage of waste pending treatment; Storage of processed waste	✓

Aspect considered	Justification / Detail	Criteria met
	Non – hazardous Metal and WEEE Shredding *S5.4 A(1) (b) (iv) Recovery or a mix of recovery and disposal of non hazardous waste with a capacity exceeding 75 tonnes per day involving treatment in shredders of metal waste, including waste electrical and electronic equipment and end-of-life vehicles and their components.* DAAs: Storage of waste pending treatment; Post shredding treatment to aid separation of recyclables DAAs to all installations Raw materials storage; Storage of non-hazardous processed materials; Surface water management Remaining waste activities - Non- hazardous Waste transfer Station with treatment - Vehicle storage, depollution and dismantling (authorised treatment) - Shredding of wastes from mechanical biological treatment (MBT) facilities	
European Directives		
Applicable Directives	All applicable European Directives have been considered in the determination of the application.	✓
The site		
Extent of the site of the facility	The operator has provided a plan which we consider is satisfactory, showing the extent of the site of the facility. A plan is included in the permit and the operator is required to carry on the permitted activities within the site boundary.	✓
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.	✓
Operating techniques	We have reviewed the techniques used by the operator and compared these with the relevant guidance notes – • IPPC S5.06 – Guidance for the Treatment of Hazardous and Non-Hazardous Waste; • BRMA BAT recommendation document; We consider that the operating techniques require updating as per the IC above. Timeframes outlined within the IC table.	✓
The permit conditions		
Updating permit conditions during consolidation	We have updated previous permit conditions to those in the new generic permit template as part of permit consolidation. The new conditions have the same meaning as those in the previous permit(s).	✓

Aspect considered	Justification / Detail	Criteria met
Raw materials	We have specified limits and controls on the use of raw materials and fuels.	✓
Waste types	The original permits do not define the waste codes in detail, the Agency and Operator have agreed the waste codes that cover the current site operations and operating techniques and these are included in the permit.	✓
Improvement conditions	Based on the information on the application, we consider that we need to impose improvement conditions. We have imposed improvement conditions to ensure that: • the site's operating techniques/management system/plans are reviewed and updated against the standards specified in the technical guidance note • drainage is addressed • emissions to air addressed See IC table in Key issues above.	✓
Incorporating the application	We have specified that the operator 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.	✓
Emission limits	We have decided that emission limits should be set for the parameters listed in the permit.	✓
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.	✓
Reporting	We have specified reporting in the permit.	✓
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.	✓
Technical competence	Technical competency is required for activities permitted. The operator is a member of an agreed scheme.	✓
Financial provision	There is no known reason to consider that the operator will not be financially able to comply with the permit conditions. The decision was taken in accordance with RGN 5 on Operator Competence.	✓