## Permit with introductory note

The Environmental Permitting (England & Wales) Regulations 2010

Dairy Crest Limited

Kirkby Creamery Moorgate Road Kirkby Liverpool L33 7XW

Permit number EPR/VP3234NX

# Kirkby Creamery Permit number EPR/VP3234NX

### Introductory note

### This introductory note does not form a part of the permit

The main features of the permit are as follows.

Dairy Crest Limited operate an installation known as Kirkby Creamery in Kirkby, Liverpool and centred approximately on grid reference SJ 42176 96983.

The installation was built in 1957 and produces a variety of vegetable fat spreads and non dairy spreads. The installation has previously not required an environmental permit, however with the introduction of the Environmental Permitting (England and Wales) (Amendment) Regulations 2013 and the transposition of the Industrial Emissions Directive (IED) the existing site will require a permit before July 2015 under Schedule 1 6.8 Part A(1)(d)(iii). In addition the operator is installing a new process with an above 10% animal raw material content which requires a permit under the same activity, therefore it was decided to permit the whole site. The installation also includes an effluent treatment plant under Schedule 1 section 5.4 Part A(1)(a)(ii).

There are three different spread manufacturing processes that take place, which are hot blend process, cold blend process and butter reworking process, of which the latter two are new processes.

The existing site has almost 250,000 tonnes per annum finished goods production capacity based on a 7 day working pattern, although the actual output is currently almost 60,000 tonnes. Raw materials delivered to site include vegetable oils, cream and powdered ingredients. Vegetable oils are delivered in bulk tankers and stored in internal tanks. Cream and powdered ingredients are delivered to site in containers of up to 1 tonne and also stored internally. A vacuum system is used to transfer powdered ingredients from their areas of storage in hoppers into batch weigh vessels for production. Potable water used as an ingredient is supplied either by mains water or through the on site abstraction borehole and treatment plant.

In the hot blend process a waterphase solution is prepared to dissolve powdered ingredients and other minor ingredients, and this is then blended with vegetable oils and, depending on the recipe, cream and butter to form an emulsion. The emulsion is pasteurised before being chilled and packed. The finished product is stored within a cold store area before dispatch.

Associated activities include the receipt and storage of raw materials, waste storage and boiler operation to generate steam for the pasteurisation process and hot water for cleaning purposes. The installation has two boilers with a combined thermal input of 17.6MW. Two ammonia refrigeration plants provide chilling and cooling both as part of the production process and as refrigeration. All liquid waste is partially treated within the on site effluent treatment plant before discharge to sewer under a discharge consent agreed with United Utilities. Surface water runoff from the building roof and external yard areas is discharged to Knowsley Brook, which ultimately drains to the River Alt.

The new processes introduce higher butter content based spreads, requiring the installation of new processing plant which will utilise existing packing lines. Block butter will not undergo any processing on site, rather it will undergo a reworking of 25kg blocks into smaller finished goods sizes, which also requires new plant. The total site capacity will increase to a theoretical 300,000 tonnes per annum. The impacts to the site from the introduction of the new products include changes to site utility use, effluent loading and waste production. These changes are not considered significant and there are minimal changes necessary to site services.

The vast majority of the processing equipment is in closed units and cleaning in place (CIP) is used to clean most of this, with a small amount of manual cleaning in comparison.

The installation is within 2km of 16 Local Wildlife Sites (LWS) and 2 Local Nature Reserves (LNR). There are no Sites of Special Scientific Interest (SSSI) within 2km and no Special Areas of Conservation (SAC), Special Protection Areas (SPA) or Ramsars within 10km of the installation. Emissions from the installation are not likely to have an impact on these designated sites. The operator has an Environmental Management System accredited to ISO 140001 and a Climate Change Levy Agreement.

The status log of the permit sets out the permitting history, including any changes to the permit reference number.

| Status log of the permit   |                       |  |
|--|-----------------------|--|
| Description  | Date                  | Comments   |
| Application<br>EPR/VP3234NX/A001                                     | Duly made<br>04/03/14 | Application for food and drink facility producing a variety of vegetable fat spreads and non dairy spreads.  |
| Additional information received (Schedule 5 Notice)                  | 25/04/14              | Clarification of site drainage, boilers, cleaning in place (CIP) optimisation and pasteurisation process and optimisation and relevant guidance used.  |
| Additional information received                                      | 14/05/14              | Confirmation of interim measures in place for effluent treatment plant containmant, borehole containment and bulk chemical delivery procedure. In addition confirmation of installation name and completion of effluent treatment plant sump inspection. |
| Permit determined<br>EPR/VP3234NX<br>(Billing reference<br>VP3234NX) | 02/06/14              | Permit issued to Dairy Crest<br>Limited  |

End of introductory note

### **Permit**

The Environmental Permitting (England and Wales) Regulations 2010

## Permit number EPR/VP3234NX

The Environment Agency hereby authorises, under regulation 13 of the Environmental Permitting (England and Wales) Regulations 2010

Dairy Crest Limited ("the operator"),

whose registered office is

Claygate House Littleworth Road Esher Surrey KT10 9PN

company registration number **02085882** to operate an installation at

Moorgate Road Kirkby Liverpool L33 7XW

to the extent authorised by and subject to the conditions of this permit.

| Name             | Date       |
|------------------|------------|
| Anne Nightingale | 02/06/2014 |

Authorised on behalf of the Environment Agency

### **Conditions**

### 1 Management

### 1.1 General management

- 1.1.1 The operator shall manage and operate the activities:
  - (a) in accordance with a written management system that identifies and minimises risks of pollution, including those arising from operations, maintenance, accidents, incidents, non-conformances, closure and those drawn to the attention of the operator as a result of complaints; and
  - (b) using sufficient competent persons and resources.
- 1.1.2 Records demonstrating compliance with condition 1.1.1 shall be maintained.
- 1.1.3 Any person having duties that are or may be affected by the matters set out in this permit shall have convenient access to a copy of it kept at or near the place where those duties are carried out.

### 1.2 Energy efficiency

- 1.2.1 The operator shall:
  - (a) take appropriate measures to ensure that energy is used efficiently in the activities:
  - review and record at least every four years whether there are suitable opportunities to improve the energy efficiency of the activities; and
  - (c) take any further appropriate measures identified by a review.

#### 1.3 Efficient use of raw materials

- 1.3.1 The operator shall:
  - (a) take appropriate measures to ensure that raw materials and water are used efficiently in the activities;
  - (b) maintain records of raw materials and water used in the activities;
  - (c) review and record at least every four years whether there are suitable alternative materials that could reduce environmental impact or opportunities to improve the efficiency of raw material and water use; and
  - (d) take any further appropriate measures identified by a review.

## 1.4 Avoidance, recovery and disposal of wastes produced by the activities

- 1.4.1 The operator shall take appropriate measures to ensure that:
  - (a) the waste hierarchy referred to in Article 4 of the Waste Framework Directive is applied to the generation of waste by the activities; and

- (b) any waste generated by the activities is treated in accordance with the waste hierarchy referred to in Article 4 of the Waste Framework Directive; and
- (c) where disposal is necessary, this is undertaken in a manner which minimises its impact on the environment.
- 1.4.2 The operator shall review and record at least every four years whether changes to those measures should be made and take any further appropriate measures identified by a review.

### 2 Operations

#### 2.1 Permitted activities

2.1.1 The operator is only authorised to carry out the activities specified in schedule 1 table S1.1 (the "activities").

#### 2.2 The site

2.2.1 The activities shall not extend beyond the site, being the land shown edged in green on the site plan at schedule 7 to this permit.

### 2.3 Operating techniques

- 2.3.1 (a) The activities shall, subject to the conditions of this permit, be operated using the techniques and in the manner described in the documentation specified in schedule 1, table S1.2, unless otherwise agreed in writing by the Environment Agency.
  - (b) If notified by the Environment Agency that the activities are giving rise to pollution, the operator shall submit to the Environment Agency for approval within the period specified, a revision of any plan or other documentation ("plan") specified in schedule 1, table S1.2 or otherwise required under this permit which identifies and minimises the risks of pollution relevant to that plan, and shall implement the approved revised plan in place of the original from the date of approval, unless otherwise agreed in writing by the Environment Agency.
- 2.3.2 Any raw materials or fuels listed in schedule 2 table S2.1 shall conform to the specifications set out in that table.
- 2.3.3 The operator shall ensure that where waste produced by the activities is sent to a relevant waste operation, that operation is provided with the following information, prior to the receipt of the waste:
  - (a) the nature of the process producing the waste;
  - (b) the composition of the waste;
  - (c) the handling requirements of the waste;
  - (d) the hazardous property associated with the waste, if applicable; and
  - (e) the waste code of the waste.

2.3.4 The operator shall ensure that where waste produced by the activities is sent to a landfill site, it meets the waste acceptance criteria for that landfill.

### 2.4 Improvement programme

- 2.4.1 The operator shall complete the improvements specified in schedule 1 table S1.3 by the date specified in that table unless otherwise agreed in writing by the Environment Agency.
- 2.4.2 Except in the case of an improvement which consists only of a submission to the Environment Agency, the operator shall notify the Environment Agency within 14 days of completion of each improvement.

### 3 Emissions and monitoring

### 3.1 Emissions to water, air or land

- 3.1.1 There shall be no point source emissions to water, air or land except from the sources and emission points listed in schedule 3 tables S3.1, S3.2 and S3.3.
- 3.1.2 The limits given in schedule 3 shall not be exceeded.
- 3.1.3 Periodic monitoring shall be carried out at least once every 5 years for groundwater and 10 years for soil, unless such monitoring is based on a systematic appraisal of the risk of contamination.

## 3.2 Emissions of substances not controlled by emission limits

- 3.2.1 Emissions of substances not controlled by emission limits (excluding odour) shall not cause pollution. The operator shall not be taken to have breached this condition if appropriate measures, including, but not limited to, those specified in any approved emissions management plan, have been taken to prevent or where that is not practicable, to minimise, those emissions.
- 3.2.2 The operator shall:
  - (a) if notified by the Environment Agency that the activities are giving rise to pollution, submit to the Environment Agency for approval within the period specified, an emissions management plan which identifies and minimises the risks of pollution from emissions of substances not controlled by emission limits;
  - (b) implement the approved emissions management plan, from the date of approval, unless otherwise agreed in writing by the Environment Agency.
- 3.2.3 All liquids in containers, whose emission to water or land could cause pollution, shall be provided with secondary containment, unless the operator has used other appropriate measures to prevent or where that is not practicable, to minimise, leakage and spillage from the primary container.

#### 3.3 Odour

- 3.3.1 Emissions from the activities shall be free from odour at levels likely to cause pollution outside the site, as perceived by an authorised officer of the Environment Agency, unless the operator has used appropriate measures, including, but not limited to, those specified in any approved odour management plan, to prevent or where that is not practicable to minimise the odour.
- 3.3.2 The operator shall:
  - (a) if notified by the Environment Agency that the activities are giving rise to pollution outside the site due to odour, submit to the Environment Agency for approval within the period specified, an odour management plan which identifies and minimises the risks of pollution from odour;
  - (b) implement the approved odour management plan, from the date of approval, unless otherwise agreed in writing by the Environment Agency.

#### 3.4 Noise and vibration

- 3.4.1 Emissions from the activities shall be free from noise and vibration at levels likely to cause pollution outside the site, as perceived by an authorised officer of the Environment Agency, unless the operator has used appropriate measures, including, but not limited to, those specified in any approved noise and vibration management plan to prevent or where that is not practicable to minimise the noise and vibration.
- 3.4.2 The operator shall:
  - (a) if notified by the Environment Agency that the activities are giving rise to pollution outside the site due to noise and vibration, submit to the Environment Agency for approval within the period specified, a noise and vibration management plan which identifies and minimises the risks of pollution from noise and vibration;
  - (b) implement the approved noise and vibration management plan, from the date of approval, unless otherwise agreed in writing by the Environment Agency.

### 3.5 Monitoring

- 3.5.1 The operator shall, unless otherwise agreed in writing by the Environment Agency, undertake the monitoring specified in the following tables in schedule 3 to this permit:
  - (a) point source emissions specified in tables S3.1, S3.2 and S3.3;
  - (b) process monitoring specified in table S3.4.

### 4 Information

#### 4.1 Records

- 4.1.1 All records required to be made by this permit shall:
  - (a) be legible;
  - (b) be made as soon as reasonably practicable;
  - (c) if amended, be amended in such a way that the original and any subsequent amendments remain legible, or are capable of retrieval; and

- (d) be retained, unless otherwise agreed in writing by the Environment Agency, for at least 6 years from the date when the records were made, or in the case of the following records until permit surrender:
  - (i) off-site environmental effects; and
  - (ii) matters which affect the condition of the land and groundwater.
- 4.1.2 The operator shall keep on site all records, plans and the management system required to be maintained by this permit, unless otherwise agreed in writing by the Environment Agency.

### 4.2 Reporting

- 4.2.1 The operator shall send all reports and notifications required by the permit to the Environment Agency using the contact details supplied in writing by the Environment Agency.
- 4.2.2 A report or reports on the performance of the activities over the previous year shall be submitted to the Environment Agency by 31 January (or other date agreed in writing by the Environment Agency) each year. The report(s) shall include as a minimum:
  - (a) a review of the results of the monitoring and assessment carried out in accordance with the permit including an interpretive review of that data;
  - (b) the annual production /treatment data set out in schedule 4 table S4.2; and
  - (c) the performance parameters set out in schedule 4 table S4.3 using the forms specified in table S4.4 of that schedule.
- 4.2.3 Within 28 days of the end of the reporting period the operator shall, unless otherwise agreed in writing by the Environment Agency, submit reports of the monitoring and assessment carried out in accordance with the conditions of this permit, as follows:
  - (a) in respect of the parameters and emission points specified in schedule 4 table S4.1:
  - (b) for the reporting periods specified in schedule 4 table S4.1 and using the forms specified in schedule 4 table S4.4; and
  - (c) giving the information from such results and assessments as may be required by the forms specified in those tables.
- 4.2.4 The operator shall, unless notice under this condition has been served within the preceding four years, submit to the Environment Agency, within six months of receipt of a written notice, a report assessing whether there are other appropriate measures that could be taken to prevent, or where that is not practicable, to minimise pollution.

#### 4.3 Notifications

- 4.3.1 (a) In the event that the operation of the activities gives rise to an incident or accident which significantly affects or may significantly affect the environment, the operator must immediately—
  - (i) inform the Environment Agency,

- (ii) take the measures necessary to limit the environmental consequences of such an incident or accident, and
- (iii) take the measures necessary to prevent further possible incidents or accidents;
- (b) in the event of a breach of any permit condition the operator must immediately—
  - (i) inform the Environment Agency, and
  - take the measures necessary to ensure that compliance is restored within the shortest possible time;
- (c) in the event of a breach of permit condition which poses an immediate danger to human health or threatens to cause an immediate significant adverse effect on the environment, the operator must immediately suspend the operation of the activities or the relevant part of it until compliance with the permit conditions has been restored.
- 4.3.2 Any information provided under condition 4.3.1 shall be confirmed by sending the information listed in schedule 5 to this permit within the time period specified in that schedule.
- 4.3.3 Where the Environment Agency has requested in writing that it shall be notified when the operator is to undertake monitoring and/or spot sampling, the operator shall inform the Environment Agency when the relevant monitoring and/or spot sampling is to take place. The operator shall provide this information to the Environment Agency at least 14 days before the date the monitoring is to be undertaken.
- 4.3.4 The Environment Agency shall be notified within 14 days of the occurrence of the following matters, except where such disclosure is prohibited by Stock Exchange rules:

Where the operator is a registered company:

- (a) any change in the operator's trading name, registered name or registered office address; and
- (b) any steps taken with a view to the operator going into administration, entering into a company voluntary arrangement or being wound up.

Where the operator is a corporate body other than a registered company:

- (a) any change in the operator's name or address; and
- (b) any steps taken with a view to the dissolution of the operator.

In any other case:

- (a) the death of any of the named operators (where the operator consists of more than one named individual);
- (b) any change in the operator's name(s) or address(es); and
- (c) any steps taken with a view to the operator, or any one of them, going into bankruptcy, entering into a composition or arrangement with creditors, or, in the case of them being in a partnership, dissolving the partnership.
- 4.3.5 Where the operator proposes to make a change in the nature or functioning, or an extension of the activities, which may have consequences for the environment and the change is not otherwise the subject of an application for approval under the Regulations or this permit:

- (a) the Environment Agency shall be notified at least 14 days before making the change; and
- (b) the notification shall contain a description of the proposed change in operation.
- 4.3.6 The Environment Agency shall be given at least 14 days notice before implementation of any part of the site closure plan.
- 4.3.7 Where the operator has entered into a climate change agreement with the Government, the Environment Agency shall be notified within one month of:
  - (a) a decision by the Secretary of State not to re-certify the agreement;
  - (b) a decision by either the operator or the Secretary of State to terminate the agreement; and
  - (c) any subsequent decision by the Secretary of State to re-certify such an agreement.

### 4.4 Interpretation

- 4.4.1 In this permit the expressions listed in schedule 6 shall have the meaning given in that schedule.
- 4.4.2 In this permit references to reports and notifications mean written reports and notifications, except where reference is made to notification being made "without delay", in which case it may be provided by telephone.

## **Schedule 1 - Operations**

| Table S1.1 activities                               |  |  |
|---|--|--|
| Activity listed in Schedule 1 of the EP Regulations | Description of specified activity  | Limits of specified activity   |
| S6.8 A1 (d) (iii)                                   | Treatment of animal and vegetable matter in a plant with a capacity of 300,000 tonnes per annum      | From receipt of butter and other raw materials to despatch of products and wastes generated by the process |
| S5.4 A 1 (a) (ii)                                   | Physico-chemical treatment<br>of process effluent, with a<br>capacity exceeding 50<br>tonnes per day | From receipt of effluent to discharge to sewer   |
| Directly Associated Activity                        |  |  |
| Steam and hot water supply                          | Generation of steam and hot water in two boilers with total thermal input of <20 MW                  | From receipt of fuel to emissions of combustion products   |

| Table S1.2 Operating te                                    |   |                  |
|--|---|------------------|
| Description  | Parts   | Date<br>Received |
| Application<br>EPR/VP3234NX/A001                           | Responses to Parts B3 section 3 of the application form and referenced supporting documentation.  | 04/03/14         |
| Response to Schedule<br>5 Notice dated<br>02/04/14         | Response to Request for Information clarifying site drainage, boilers, cleaning in place (CIP) optimisation and pasteurisation process and optimisation.                      | 25/04/14         |
| Response to Request for Further Information dated 13/05/14 | Response to Request for Information confirming interim measures in place for effluent treatment plant containment, borehole containment and bulk chemical delivery procedure. | 14/05/14         |

| Table S1.3 In | nprovement programme requirements  |          |
|---------------|--|----------|
| Reference     | Requirement  | Date     |
| IC1           | The operator shall review the current and predicted future site steam demand and submit a proposal to the Environment Agency for approval for how current and future demand will be managed and delivered. The review shall take into account energy efficiency, emissions and costs and shall also consider potential options for the use of combined heat and power generation. The proposal shall include a timescale for implementing identified improvements. | 31/05/15 |
| IC2           | The Operator shall submit a report containing details of the latest inspection of the effluent collection sump. The report shall include an evaluation of the findings of the inspection and a risk assessment to quantify the risk of leaks from the sump. Based on the findings of this study, the operator shall propose improvements, with timescale for implementation, to manage the risks to ensure protection of groundwater.                              | 31/12/14 |

|           | mprovement programme requirements  |                                   |
|-----------|--|-----------------------------------|
| Reference | Requirement  | Date                              |
| IC3       | The Operator shall review containment and control measurements at the effluent treatment plant (ETP) to ensure the risks from overfill or failures of tanks and associated pipes and equipment is minimised. A report detailing the findings of the review, including proposals for improvement and proposed dates for implementation, shall be submitted to the Agency for approval.  | 30/09/14                          |
| IC4       | The operator shall implement any measure or measures as approved through IC3.  | As agreed through approval of IC3 |
| IC5       | The Operator shall evaluate / quantify the risk of potential pollution to surface water across the installation and control measures in place at each location, including but not necessarily limited to ETP containment, borehole protection, caustic tank containment and chemical delivery and storage areas, and submit a report to the Agency. The report shall include proposals to reduce the risk and any proposed containment measures, and include timescale for implementation. | 31/05/15                          |
| IC6       | The Operator shall identify all external bund valves with drain valve points and either remove the valve and restore bund, or where removal is deemed higher risk, implement a suitable physical control to prevent opening or leakage of valve, and confirm actions in writing to the Environment Agency.   | 31/12/14                          |
| IC7       | The Operator shall develop and implement a suitable method of assessing and recording fugitive emissions to air, land and water, to commence reporting in January 2015 covering the 2014 calendar year, and include this method in a revised Environment Management System, and submit to the Environment Agency for approval.   | 31/12/14                          |
| IC8       | The Operator shall develop and implement a suitable method for monitoring the disused internal drain shown in light blue/turquoise on site drainage plan (reference 'Int drains - 8576CCTVINT', received 04/03/14) marked as 'filled with expanding foam' to verify whether the encapsulation appears robust and intact, and include this method in a revised Environment Management System, and submit to the Environment Agency for approval.  | 31/12/14                          |

## Schedule 2 - Waste types, raw materials and fuels

| Table S2.1 Raw materials and fuels |               |
|------------------------------------|---------------|
| Raw materials and fuel description | Specification |
|                                    |               |

## Schedule 3 – Emissions and monitoring

| Table S3.1 Point sour  | ce emissions            | to air – emi   | ssion limits a               | and monitori        | ng requiremer        | nts                           |
|--|-------------------------|--|------------------------------|---------------------|----------------------|-------------------------------|
| Emission point ref.<br>& location  | Parameter               | Source   | Limit<br>(including<br>unit) | Reference<br>period | Monitoring frequency | Monitoring standard or method |
| A1 and A2, shown as point 1 on site plan (reference Appendix 11 'release points to sewer, water& air') in support of application EPR/VP3234NX/A001 | No<br>parameters<br>set | Boiler<br>Plant, 2<br>boilers,<br>each of<br>capacity<br>8.8MW<br>thermal<br>input |                              |                     |                      |                               |
| A4, shown as point 3 on site plan (reference Appendix 11 'release points to sewer, water& air') in support of application EPR/VP3234NX/A001        | No<br>parameters<br>set | 4 x<br>powder<br>vacuum<br>pumps   |                              |                     |                      |                               |

| Table S3.2 Point monitoring requi  |           | ons to wate                              | r (other than                                | sewer) and la       | nd – emission I      | imits and                     |
|--|-----------|--|--|---------------------|----------------------|-------------------------------|
| Emission point ref. & location   | Parameter | Source                                   | Limit<br>(incl.<br>unit)                     | Reference<br>Period | Monitoring frequency | Monitoring standard or method |
| SW1 shown as point 5 on site plan (reference Appendix 11 'release points to sewer, water& air') in support of application EPR/VP3234NX/A001, emission to Knowsley Brook which ultimately drains to River Alt |           | Surface<br>water<br>and<br>roof<br>water | Clean and<br>free from<br>contamin-<br>ation |                     |                      |                               |

| Table S3.3 Point emission limits a   |                         |  | eatment plant o          | or other transfers off-site- |                      |                                     |
|--|-------------------------|--|--------------------------|------------------------------|----------------------|-------------------------------------|
| Emission point ref. & location   | Parameter               | Source                                 | Limit<br>(incl.<br>Unit) | Reference<br>period          | Monitoring frequency | Monitoring<br>standard or<br>method |
| S1 shown as point 4 on site plan (reference Appendix 11 'release points to sewer, water& air') in support of application EPR/VP3234NX /A001, emission to United Utilities Fazakerley Waste Water Treatment Works | No<br>parameters<br>set | Site<br>effluent<br>treatment<br>plant |                          |                              |                      |                                     |

| Table S3.4 Process monitoring requirements  |           |                      |                                     |   |  |
|---|-----------|----------------------|-------------------------------------|---|--|
| Emission point reference<br>or source or description<br>of point of measurement   | Parameter | Monitoring frequency | Monitoring<br>standard or<br>method | Other specifications                                    |  |
| Treated effluent prior to discharge to S1( shown as point 4 on site plan (reference Appendix 11 'release points to sewer, water& air') in support of application EPR/VP3234NX/A001) | pH 6 - 11 | Continuous           | pH probe                            | Out of specification effluent diverted to balance tanks |  |

## **Schedule 4 - Reporting**

Parameters, for which reports shall be made, in accordance with conditions of this permit, are listed below.

| Parameter | Emission or monitoring point/reference | Reporting period | Period begins |
|-----------|--|------------------|---------------|

| Table S4.2: Annual production/treatment       |        |
|---|--------|
| Parameter                                     | Units  |
| Total products (excluding butter repackaging) | tonnes |

| Table S4.3 Performance parameters |                         |                 |  |
|-----------------------------------|-------------------------|-----------------|--|
| Parameter                         | Frequency of assessment | Units           |  |
| Water usage                       | Annually                | Tonnes/Tonne of |  |
|                                   |                         | Product         |  |
| Energy usage                      | Annually                | MWh/Tonne of    |  |
|                                   |                         | Product         |  |

| Table S4.4 Reporting forms |   |              |  |
|----------------------------|---|--------------|--|
| Media/parameter            | Reporting format  | Date of form |  |
| Water usage                | Form water usage 1 or other form as agreed in writing by the Environment Agency | 02/06/14     |  |
| Energy usage               | Form energy 1 or other form as agreed in writing by the Environment Agency      | 02/06/14     |  |

### **Schedule 5 - Notification**

These pages outline the information that the operator must provide.

Units of measurement used in information supplied under Part A and B requirements shall be appropriate to the circumstances of the emission. Where appropriate, a comparison should be made of actual emissions and authorised emission limits.

If any information is considered commercially confidential, it should be separated from non-confidential information, supplied on a separate sheet and accompanied by an application for commercial confidentiality under the provisions of the EP Regulations.

#### Part A

| Permit Number                  |  |
|--------------------------------|--|
| Name of operator               |  |
| Location of Facility           |  |
| Time and date of the detection |  |

| (a) Notification requirements for any activity that gives rise to an incident or accident which |                            |  |  |  |
|---|----------------------------|--|--|--|
| significantly affects or may significantly affect the environment                               |                            |  |  |  |
|   | To be notified Immediately |  |  |  |
| Date and time of the event  |                            |  |  |  |
| Reference or description of the   |                            |  |  |  |
| location of the event   |                            |  |  |  |
| Description of where any release  |                            |  |  |  |
| into the environment took place   |                            |  |  |  |
| Substances(s) potentially   |                            |  |  |  |
| released  |                            |  |  |  |
| Best estimate of the quantity or  |                            |  |  |  |
| rate of release of substances   |                            |  |  |  |
| Measures taken, or intended to  |                            |  |  |  |
| be taken, to stop any emission  |                            |  |  |  |
| Description of the failure or   |                            |  |  |  |
| accident.   |                            |  |  |  |

| (b) Notification requirements for the breach of a permit condition |  |  |  |
|--|--|--|--|
| To be notified immediately   |  |  |  |
| Emission point reference/ source                                   |  |  |  |
| Parameter(s)   |  |  |  |
| Limit  |  |  |  |
| Measured value and uncertainty                                     |  |  |  |
| Date and time of monitoring  |  |  |  |
| Measures taken, or intended to                                     |  |  |  |
| be taken, to stop the emission                                     |  |  |  |

| Time periods for notification following detection of a breach of a limit |                   |                            |                         |
|--|-------------------|----------------------------|-------------------------|
| Parameter  |                   |                            | Notification period     |
|  |                   |                            |                         |
|  |                   |                            |                         |
|  |                   |                            |                         |
| In the event of a breach of permi  | t condition which | ch poses an immediate d    | anger to human health o |
| threatens to cause an immediate  | significant adve  | rse effect on the environn | nent:                   |
| Description of where the effect on                                       |                   |                            |                         |
| the environment was detected   |                   |                            |                         |
| Substances(s) detected   |                   |                            |                         |
| Concentrations of substances   |                   |                            |                         |
| detected   |                   |                            |                         |
| Date of monitoring/sampling  |                   |                            |                         |
|  |                   |                            |                         |
|  |                   |                            |                         |
| Part B - to be submitted   | d as soon a       | as practicable             |                         |
| Any more accurate information on the                                     |                   | •                          |                         |
| notification under Part A.   |                   |                            |                         |
| Measures taken, or intended to be taken, to                              |                   |                            |                         |
| prevent a recurrence of the incident                                     |                   |                            |                         |
| Measures taken, or intended to be t                                      | aken, to rectify, |                            |                         |
| limit or prevent any pollution of the                                    | environment       |                            |                         |
| which has been or may be caused be                                       | y the emission    |                            |                         |
| The dates of any unauthorised emis                                       | sions from the    |                            |                         |
| facility in the preceding 24 months.                                     |                   |                            |                         |
|  |                   | ,                          |                         |
| Name*  |                   |                            |                         |
| Post   |                   |                            |                         |
| Signature  |                   |                            |                         |

Date

<sup>\*</sup> authorised to sign on behalf of the operator

### Schedule 6 - Interpretation

"accident" means an accident that may result in pollution.

"application" means the application for this permit, together with any additional information supplied by the operator as part of the application and any response to a notice served under Schedule 5 to the EP Regulations.

"authorised officer" means any person authorised by the Environment Agency under section 108(1) of The Environment Act 1995 to exercise, in accordance with the terms of any such authorisation, any power specified in section 108(4) of that Act

"emissions to land" includes emissions to groundwater.

"EP Regulations" means The Environmental Permitting (England and Wales) Regulations SI 2010 No.675 and words and expressions used in this permit which are also used in the Regulations have the same meanings as in those Regulations.

"emissions of substances not controlled by emission limits" means emissions of substances to air, water or land from the activities, either from the emission points specified in schedule 3 or from other localised or diffuse sources, which are not controlled by an emission limit.

"groundwater" means all water, which is below the surface of the ground in the saturation zone and in direct contact with the ground or subsoil.

"Industrial Emissions Directive" means DIRECTIVE 2010/75/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 24 November 2010 on industrial emissions

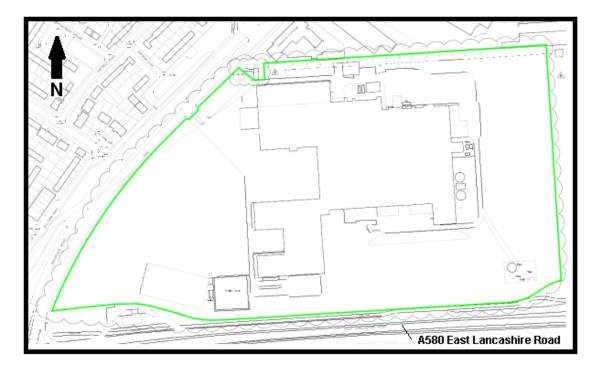
"year" means calendar year ending 31 December.

Where a minimum limit is set for any emission parameter, for example pH, reference to exceeding the limit shall mean that the parameter shall not be less than that limit.

Unless otherwise stated, any references in this permit to concentrations of substances in emissions into air means:

- (a) in relation to emissions from combustion processes, the concentration in dry air at a temperature of 273K, at a pressure of 101.3 kPa and with an oxygen content of 3% dry for liquid and gaseous fuels, 6% dry for solid fuels; and/or
- (b) in relation to emissions from non-combustion sources, the concentration at a temperature of 273K and at a pressure of 101.3 kPa, with no correction for water vapour content.

## Schedule 7 - Site plan



**END OF PERMIT** 

| Facility:             | Dairy Crest Kirkby      | Form Number:      | WaterUsage1 | / 02/06/14                         |
|-----------------------|-------------------------|-------------------|-------------|------------------------------------|
| Reporting of Wa       | ter Usage for the year: |                   |             |                                    |
| Water Source          |                         | Usage<br>(m³/year |             | Specific Usage<br>(m³/unit output) |
|                       |                         |                   |             |                                    |
|                       |                         |                   |             |                                    |
| TOTAL WATER U         | JSAGE                   |                   |             |                                    |
| Operator's comments : |                         |                   |             |                                    |
|                       |                         |                   |             |                                    |
| Signed                |                         |                   |             |                                    |

Operator:

Permit Number:

EPR/VP3234NX

Dairy Crest Limited

| Permit Number:               | EPR/VP3234NX                   | Operator:          | Dairy Crest Limite      | d                                   |
|------------------------------|--------------------------------|--------------------|-------------------------|-------------------------------------|
| Facility: Dairy Crest Kirkby |                                | Form Number:       | Energy1 / 02/06/14      |                                     |
| Reporting of Ener            | gy Usage for the year:         |                    |                         |                                     |
|                              | Energy Usa                     | ge                 |                         |                                     |
| Energy Source                | Quantity                       |                    | Primary Energy<br>(MWh) | Specific Usage<br>(MWh/unit output) |
| Electricity *                | MWh                            |                    |                         |                                     |
| Natural Gas                  | MWh                            |                    |                         |                                     |
|                              |                                |                    |                         |                                     |
|                              |                                |                    |                         |                                     |
| TOTAL                        |                                |                    |                         |                                     |
| TOTAL                        |                                |                    |                         |                                     |
| * Conversion facto           | r for delivered electricity to | primary energy = 2 | 2.4                     |                                     |
| Operator's comme             | ents :                         |                    |                         |                                     |
|                              |                                |                    |                         |                                     |
|                              |                                |                    |                         |                                     |
|                              |                                |                    |                         |                                     |
|                              |                                |                    |                         |                                     |
| Signed                       |                                |                    |                         |                                     |