CANNOCK CHASE DISTRICT COUNCIL

THE ENVIRONMENTAL PERMITTING (ENGLAND AND WALES) REGULATIONS 2010

Permit to operate an installation Prescribed by Section, 4.1 Part B, of Schedule 1 of the Environmental Permitting (England & Wales) Regulations 2010

PERMIT REFERENCE: 4.1B (a)/IED/ EPR 02/13

Chase Mouldings Limited
Units 1 and 2 Willow Park
Burdock Close, Hawks Green,
Cannock,
Staffordshire. WS11 7GB

Regulator Contact Details

Cannock Chase District Council
Environmental Health
Civic Centre
PO Box 28
Beecroft Road
Cannock
WS11 1BG

Tel: 01543 462621

Fax: 01543 462317

E-mail: environmentalhealth@cannockchasedc.gov.uk

This introductory note does not form a part of the Permit

The following Permit is granted under Regulation 13 of the Environmental Permitting (England and Wales) Regulations 2010 (S.I.2010/675) ("the EP Regulations") and the Industrial Emissions Directive (2010/75/EU) to operate an installation carrying out one or more of the activities listed in Part B to Schedule 1 of those Regulations, to the extent authorised by the Permit.

The Permit includes conditions that have to be complied with.

Techniques include both the technology used and the way in which the installation is designed, built, maintained, operated and decommissioned.

Brief description of the installation regulated by this permit

Chase Mouldings Limited, Units 1 & 2 Willow Park, Burdock Close, Hawks Green, Cannock, Staffordshire WS11 7GB is hereby permitted, in accordance with the requirements of the Environmental Permitting (England & Wales) Regulations 2010, to operate a di-isocyanate activity as prescribed by Section 4.1B(a) of Schedule 1 (as amended) to the above Regulations and a solvent emissions (SE) activity as prescribed by the Industrial Emissions Directive, subject to the conditions outlined in this document, at the site location given on the map as page 15 of this Permit and within the boundary of the installation as marked in red on the attached plan as page 16 of this Permit.

This Permit shall be subject to replacement, variation or amendment, as may be considered appropriate, by Cannock Chase District Council, at any time, according to the provisions of Regulation 17(1).

Contacting the Regulator

This Permit has been issued by Cannock Chase District Council as the Regulator for this installation and the address above (Page 1) is the Principle contact address for all matters relating to the Permit.

Confidentiality

The Permit requires the Operator to provide information to Cannock Chase District Council. The Council will place the information onto the public registers in accordance with the requirements of the EP Regulations. If the Operator considers that any information provided is commercially confidential, it may apply to Cannock Chase District Council to have such information withheld from the register as provided in the EP Regulations. To enable Cannock Chase District Council to determine whether the information is commercially confidential, the Operator should clearly identify the information in question and should specify clear and precise reasons.

Variations to the permit

Your attention is drawn to the Variation Notification Procedure condition in the permit. This Permit may be varied in the future. If at any time the activity or any aspect of the activity regulated by the following conditions changes such that the conditions no longer reflect the activity and require alteration, the Regulator should be contacted.

Revocation of the permit

Where an Operator intends to cease the operation of an installation (in whole or in part) the regulator should be informed in writing. The Regulator may revoke a permit in whole or in part, and may require the operator to take steps-

to avoid a pollution risk resulting from the operation of the regulated facility; or

to return the site to a satisfactory state, having regard to the state of the site before the facility was put into operation.

Transfer of the permit or part of the permit

Before the Permit can be wholly or partially transferred to another person, a joint application to transfer the Permit has to be made by both the existing and proposed holders, in accordance with Regulation 21 of the EP Regulations. A transfer will be allowed unless the Authority considers that the proposed holder will not be the person who will have control over the operation of the installation or will not ensure compliance with the conditions of the transferred Permit.

Responsibility under workplace health and safety legislation

This Permit is given in relation to the requirements of the EP Regulations. It must not be taken to replace any responsibilities you may have under Workplace Health and Safety legislation.

Appeal against permit conditions

Anyone who is aggrieved by the conditions attached to a Permit can appeal to the Appropriate Authority, (Secretary of State for the Environment, Food and Rural Affairs, in England). Appeals must be made in accordance with the requirements of Regulation 31 and Schedule 6 of the EP Regulations.

Appeals should be received by the Secretary of State for Environment, Food and Rural Affairs at the following addresses:

The Planning Inspectorate
Environment Team, Major and Specialist
Casework
Room 4/04 Kite Wing
Temple Quay House
2 The Square
Temple Quay
Bristol BS1 6PN

Please Note

An appeal bought under Regulation 31 (1) (b) and Schedule 6, in relation to the conditions in a permit will not suspend the effect of the conditions appealed against; the conditions must still be complied with.

In determining an appeal against one or more conditions, the Act allows the Secretary of State in addition to quash any of the other conditions not subject to the appeal and to direct the local authority either to vary any of these other conditions or to add new conditions.

End of Introductory Notes

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Permit Number: 4.1B (a)/IED/ EPR 02/13

Cannock Chase District Council (the Regulator) in exercise of its powers under Regulation 13 of the Environmental Permitting (England and Wales) Regulations 2010 (S.I.2010/675) hereby permits

Chase Mouldings Limited ("the operator"),

Whose registered offices are:

Chase Mouldings Limited,
Units 1 & 2 Willow Park,
Burdock Close,
Hawks Green,
Cannock,
Staffordshire. WS11 7GB

To operate an installation at:

Chase Mouldings Limited,
Units 1 & 2 Willow Park,
Burdock Close,
Hawks Green,
Cannock,
Staffordshire. WS11 7GB

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

Signed

Head of Environmental Health
The Proper Officer Designated to sign on behalf of the Council.
Cannock Chase District Council

Dated

Installation Description

Manufacture of polyurethane components in rigid, semi-rigid and integral skin foams for the automotive, leisure and medical industries.

The products are produced by the interaction of di-phenylmethane-di-isocyanate (MDI) and polyol.

The type of foam produced is dependant on the grade of MDI, the polyol blend, colour, and the ratio of MDI to polyol.

All products are produced in the same method. The MDI and polyol blends are fed to P.U. metering machines from a 200 litre drum via an air transfer pump. The drums and machines are sealed. The machines are set to a ratio dependant on the product. The material is then injected into heated moulding tools and then left to cure. The machine head is then flushed out automatically with methylene chloride. To aid de-moulding of the products the mould tools are sprayed with release agent.

After moulding the products are trimmed manually of any flash.

PERMIT CONDITIONS

Emission Limits, Monitoring and Other Provisions

Monitoring, investigations and recording

1.0 Monitoring of emissions from the stack, as identified on the layout plan (given as page 16), shall be carried out according to the method specified in Table 1 below or by an equivalent method agreed by the local authority. The reference conditions for limits in Table 1 are 273K, 101.3kPa without correction for water vapour content.

Table 1: Emission limits, monitoring and other provisions

Substance	Source Stack No.	Emission limits/ provisions	Type of Monitoring	Monitoring Frequency
Di-isocyanate as total NCO group	A and B	0.1 mg/Nm³ averaged over any 2 hour period whilst plant is in operation	Quantitative	Measured annually during normal production using for example MDHS 25/3
VOC (expressed as carbon excluding particulate matter)	A and B	75 mg Carbon/Nm³ as 30 minute mean	Quantitative	Measured annually during normal operation
Methylene chloride	A and B	20 mg/Nm^3 as total mass of methylene chloride	Quantitative	Measured annually during normal operation

1.1 The operator shall keep records of inspections, tests and monitoring, including all non-continuous monitoring, inspections and visual assessments. The records shall be:

- kept on site;
- kept by the operator for at least two years; and
- made available for the regulator to examine.

1.2 If any records are kept off-site, they shall be made available for inspection within one working week of any request by the regulator.

1.3 The operator shall identify and record substances used as blowing agents on site, including the ozone depleting potential (ODP), global warming potential (GWP) and photochemical ozone creation potential (POCP). Annual usage of individual

substances used as blowing agents shall be made available to the Regulator upon request.

Information required by the local authority

2.1 The local authority shall be informed of monitoring to be carried out and the results; the results shall include process conditions at the time of monitoring.

2.2 The operator shall notify the local authority at least 7 days before any periodic monitoring exercise to determine compliance with emission limit values. The operator shall state the provisional time and date of monitoring, pollutants to be tested and the methods to be used.

2.3 The results of non-continuous emission testing shall be forwarded to the local authority within 8 weeks of the completion of the sampling.

2.4 Adverse results from any monitoring activity shall be investigated by the operator as soon as the monitoring data has been obtained / received. The operator shall

- identify the cause and take corrective action;
- record as much detail as possible regarding the cause and extent of the problem and the action taken by the operator to rectify the situation;
- re-test to demonstrate compliance as soon as possible; and
- notify the local authority.

Visible and odorous emissions

3.0 All releases to air, other than condensed water vapour, shall be free from persistent visible emissions.

3.1 All emissions to air shall be free from droplets.

3.2 There shall be no offensive odour beyond the process boundary, as perceived by an authorised officer from the local authority.

3.3 Visual and olfactory assessments of emissions shall be made frequently and at least once each day whilst the process is in operation. The time, location, indicative wind direction and strength, and result of these assessments shall be recorded.

3.4 Where there are abnormal emissions that, in the opinion of the regulator, may be attributable to the installation, the operator shall inspect in order to find out which operation(s) is the cause.

If this inspection does not lead to correction of the problem then the operator shall inform the regulator in order to determine whether ambient air monitoring is necessary.

Ambient monitoring either may be by a British Standard method or by a method agreed with the regulator.

Whilst problems are ongoing, a visual / boundary odour check shall also be made once per day when an installation is being operated. The time, location and result of these checks, along with weather conditions such as indicative wind direction and strength, shall be recorded. Once the source of the emission or odour is known, corrective action shall be taken without delay.

3.5 There shall be no open burning of any materials in the open air in connection with the process.

Abnormal events

4.1 In the case of abnormal emissions, malfunction or breakdown leading to abnormal emissions the operator shall:

- investigate and undertake remedial action immediately;
- adjust the process or activity to minimise those emissions; and
- promptly record the events and actions taken.

4.2 The local authority shall be informed without delay if there is an emission that is likely to have an effect on the local community.

4.3 In case of non-compliance causing immediate danger to human health, operation of the activity must be suspended. All of the following criteria shall be taken into account:

- the toxicity of the substances being released;
- the amount released;
- the location of the installation; and
- the sensitivity of the receptors.

Calibration and compliance monitoring

- General

5.1 Di-isocyanate, VOC and methylene chloride monitoring shall be carried out by extractive testing annually.

5.2 Providing that emissions from stacks A and B remain of the same nature and volume, then annual extractive testing need only be carried out for one extraction point each year. Each extraction point shall be tested at least once every two years.

5.3 For extractive testing, no results of monitoring shall exceed the emission concentration limits specified.

5.4 For batch processes, where the production operation is complete within 2 hours, then the extractive sampling shall take place over a complete cycle of the activity.

5.5 The sampling period shall be sufficient such that at least three results are obtained.

5.6 Should the batch cycle not be compatible with the time available for sampling, then the data should be obtained over a minimum period of 2 hours in total.

5.7 The introduction of dilution air to achieve emission concentration limits shall not be permitted.

- VOC monitoring

5.8 VOC emission limit values shall be considered to be complied with if, in one monitoring exercise:

- The average of all the readings does not exceed the emission limit values, and
- None of the hourly averages exceeds the emission limit value by more than a factor of 1.5. An hourly average of 30-minute mean values may be used to demonstrate compliance.

- Sampling Provisions

5.9 Sampling points shall be designed to comply with the British or equivalent standards.

5.10 The operator shall ensure that relevant stacks or ducts are fitted with facilities for sampling which allow compliance with the sampling standards.

Control Techniques

Techniques to control emissions from contained sources

6.1 All spraying shall be carried out in a totally enclosed area and the spraying area should be under negative pressure throughout spraying and curing, in order to prevent fugitive emissions of odour and particulate matter. Emissions shall be extracted to suitable particulate arrestment equipment.

Techniques to control fugitive emissions

- Materials, handling and storage

7.1 Di-isocyanates, raw materials containing VOC and potentially odorous materials shall be stored in closed portable storage containers.

7.2 Storage and mixing containers shall be sited in locations to prevent offensive emissions off-site.

7.3 **Di-isocyanate** containers shall be stored in accordance with the manufacturer's recommended storage temperatures and allowed to acclimatise to working temperatures before use. These containers shall not be pressurised unless they are specifically designed for this. All such containers, whether full, partially empty, or empty, shall be kept securely lidded.

7.4 Any vents serving bulk storage tanks or mixing vessels containing **di-isocyanate** shall be fitted with a silica gel or other suitable air dryer to prevent ingress of water vapour. The air intake shall be separate to the exhaust vent to avoid di-isocyanate reacting with water on the silica gel to form insoluble polyureas.

7.5 **Foam blowing agents** shall be stored in portable non-pressurised containers.

7.6 Storage of **foam blowing agents** shall be at temperatures below the boiling point of the liquid in storage and shall be out of direct sunlight. Such containers shall not be pressurised, for example, to effect delivery of material from them, unless they are specifically designed for this. All such containers, whether full, partially empty, or empty, shall be kept securely lidded.

7.7 Covered or closed mixing vessels shall be used to minimise **VOC** emissions during mixing.

7.8 **VOC** emissions from the emptying of mixing vessels and transfer of materials shall be adequately contained by the use of closed mobile containers, containers with close fitting lids or containers with pipeline delivery.

7.9 Where practicable cleaning fluids which do not contain organic solvent or cleaning fluids with significantly less volatile organic solvents shall be used (with or without the addition of mechanical, chemical or thermal enhancements) (Note: HSE guidance should be sought prior to any substitution of any existing cleaning fluids).

Dust and spillage control

8.1 Where spillages of liquid occur, they shall be immediately cleaned up and contaminated material shall be held in a closed, labelled container. Sufficient supplies of decontaminant and a suitable absorbent material shall be kept at all times. A written procedure for dealing with spillages shall be agreed with the regulator.

8.2 Dusty wastes shall be stored in closed labelled containers and handled in a manner that avoids emissions.

8.3 All spillages shall be cleared as soon as possible; solids by vacuum cleaning, wet methods, or other appropriate techniques. Dry sweeping of dusty spillages shall not be permitted.

8.4 A high standard of housekeeping shall be maintained.

8.5 Where proprietary booths are provided, all spray-up operations shall be carried on in the booth so as to prevent fugitive emissions of odour and particulate matter. Booths shall be fitted with a means of preventing spraying operations from continuing in the event of positive pressure within the booth.

Cleaning techniques

9.1 Operators shall make arrangements for the despatch for recycling or reuse of all dirty solvents which have been used (for example, for equipment cleaning) and all other liquid wastes which contain volatile organic compounds.

9.2 Cleaning operations, cleaning techniques and cleaning substances shall be reviewed annually to identify:

- any cleaning steps which can be eliminated or automated;
- substances which can be substituted;
- the technical and economic feasibility of changing to different cleaning solutions.

A report shall be compiled which shall be made available to the regulator on request.

9.3 Alternative cleaning techniques shall be used where practicable. Examples include using water (with or without mechanical, chemical or thermal enhancements) or organic solvents which are significantly less volatile.

9.4 Where manual cleaning is unavoidable:

- cleaning solvents shall be kept in enclosed containers whilst not in active use;
- wiping cloths or brushes shall be impregnated with cleaning solvent in a controlled manner, using a dispenser or similar device;
- used wiping cloths or brushes shall be stored in enclosed containers pending recovery or disposal.

Stacks, vents and process exhausts

10.0 The two stacks serving the LEV system shall be 10 metres above ground level. This shall be achieved by no later than 31st December 2013.

10.1 Flues, stacks and ductwork shall be leak proof and shall be cleaned to prevent accumulation of materials, as part of the routine maintenance programme.

10.2 Exhaust gases discharged through a stack or vent shall achieve an exit velocity which is normally greater than 15 m/sec during normal operating conditions to achieve adequate dispersion.

10.3 Stacks or vents shall not be fitted with any restriction at the final opening such as a plate, cap or cowl, with the exception of a cone which may be necessary to increase the exit velocity of the emissions.

Management techniques

11.1 Spares and consumables – in particular, those subject to continual wear – shall be held on site, or should be available at short notice from guaranteed local suppliers, so that plant breakdowns can be rectified rapidly.

Training

12.0 Training of all staff with responsibility for operating the process shall include:

- awareness of their responsibilities under the permit;
- minimising emissions on start-up and shut-down;
- action to minimise emissions during abnormal conditions.

12.1 The operator shall maintain a statement of training requirements for each operational post and keep a record of the training received by each person whose actions may have an impact on the environment. These documents shall be made available to the local authority on request.

Maintenance

13.1 Effective preventative maintenance shall be employed on all aspects of the process including all plant, buildings and the equipment concerned with the control of emissions to air. In particular:

- A written maintenance programme shall be provided to the regulator with respect to pollution control equipment; and

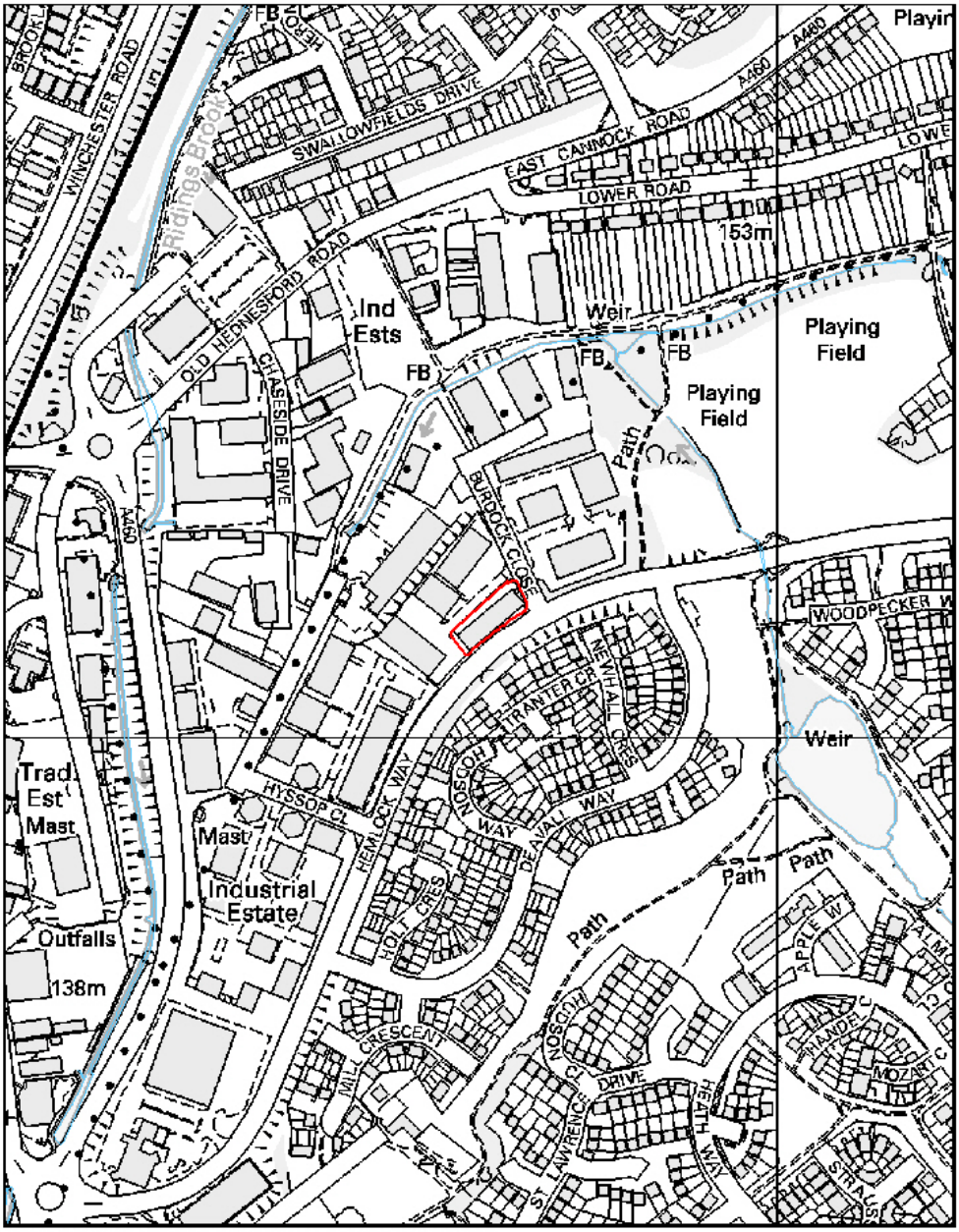
- A record of such maintenance shall be made available for inspection.

END OF CONDITIONS

Site Location

Chase Mouldings Limited
Permit Ref: 4.1B (a)/7(a) EPR 02/13

NOT TO SCALE | DATE



Cannock Chase Council

Site Plan

Chase Mouldings Limited
Permit Ref: 4.1B (a)7(a) EPR 02/13

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