

# **Northern Refine Ltd**

## **Non-Technical Summary**

Ref: NR.PT.NTS.2208

August 2022

Northern Refine Ltd is seeking to obtain a bespoke environmental permit to operate a Catalytic Converter (CAT) centre at Unit 11 Victoria Road, Adwick Le Street, Doncaster, DN6 7AZ. The permitted area will be a small-scale operation situated within an industrial unit that will store and treat CATs.

A maximum of 500 tonnes of CATs will be accepted per annum, and it is expected that 1-2 tonnes per day will be accepted on average. The site will handle both hazardous and non-hazardous waste. The non-hazardous waste consists of the steel matrix CATs, and de-canned and cleaned steel shells. The site will accept approximately 200 tonnes of non-hazardous waste per annum and 300 tonnes of hazardous waste per annum.

The permitted area comprises of a small unit building which will house all site operations. There is one roller shutter doors on the northern boundary which will remain closed at all times deemed appropriate. The unit consists of an office portacabin, quarantine area, mobile plant storage area, process plant area, a battery box for the secure storage of CAT shells, and storage for bagged CAT products on the northern boundary. The process plant area consists of a shear and hopper for the processing of ceramic CATs. The site has an existing concrete surface.

CATs will be brought on to site mainly by Northern Refine's own vehicles and occasionally through third party contractor vehicles, and will be delivered directly to the roller shutter door for immediate visual inspection and sortation. CATs will be sorted between those with a steel and those with a ceramic internal matrix.

Steel CATs will be bagged and stored pending dispatch to a suitable recycler. Ceramic CATs will be transferred to the process area where they will be 'de-canned' using a shear. The internal matrix will then be placed into a hopper and milled to produce powder which will be stored in sealed bags. The powder is then dispatched to a refinery where the precious metals in the CAT are recovered. These materials are defined as product and not waste once processed.

CAT shells will be stored within the Cemo 610L or similarly approved battery disposal box in the south eastern corner of the site.

There are 3 UKAS accredited CCTV cameras installed within the unit building. The unit will also be equipped with an automatic fire extinguisher system and AFFF fire extinguishers will be distributed throughout the building to work alongside the Fire and Rescue Service when extinguishing a fire.

The daily average anticipated throughputs are as follows:

Material Type	Form	Amount (Daily)
CATs	Loose	Average: 1 – 2 tonnes

The site consists of an industrial unit within a larger industrial estate which is surrounded by additional industrial and commercial properties with open fields to the east and north, and residential houses beyond to the west. The site's operating hours are as follows:

Monday – Friday: 07.00 – 18.00

Saturday: 07.00 – 14.00

Sundays and Bank Holidays: Closed

#### **Non-Hazardous Waste**

The non-hazardous waste consists of the steel matrix CATs, and de-canned and cleaned steel shells. The site will accept approximately 200 tonnes of non-hazardous waste per annum.

CATs will be brought on to site mainly by Northern Refine's own vehicles and occasionally through third party contractor vehicles and will be delivered directly to the roller shutter door for immediate visual inspection and sortation. CATs will be sorted between those with a steel matrix and those with a ceramic internal matrix. Steel CATs will be bagged immediately upon identification and stored pending dispatch to a suitable recycler.

#### **Hazardous Waste**

The site accepts hazardous in the form of ceramic matrix CATs. The site will accept approximately 300 tonnes of hazardous waste per annum.

CATs will be brought on to site mainly by Northern Refine's own vehicles and occasionally through third party contractor vehicles and will be delivered directly to the roller shutter door for immediate visual inspection and sortation. CATs will be sorted between those with a steel matrix and those with a ceramic internal matrix. Ceramic CATs will be transferred to the process area where they will be 'de-canned' using a shear. The internal matrix will then be placed into a hopper and milled to produce powder which will be stored in sealed bags. The powder is then dispatched to a refinery where the precious metals in the CAT are recovered. These materials are defined as product and not waste once processed.

On arrival, hazardous waste is inspected at the gate by the site operatives to ensure that the waste delivered to the site meets the following criteria:

- EWC Code on the waste transfer note conforms to the waste inside the container.
- Permit waste acceptance criteria – waste meets with the criteria of the environmental permit and the planning permissions for example, waste accepted would be within the permissible tonnage and waste type acceptance criteria.

If non-conforming hazardous waste is identified upon arrival, the load will be rejected immediately. In the event that non-conforming waste is identified, it will be segregated from the load immediately and transferred to the quarantine area. The non-conforming waste will be removed from site as soon as possible to a suitable permitted facility. If the non-conforming waste is from a customer, they are required to remove the waste from site.

<b>European Waste Code (EWC)</b>	<b>Product Description</b>	<b>Destination within Facility</b>	<b>Process</b>
		<b>Unit Building</b>	
16 01 17	Ferrous metals	Yes	Processed and bagged
16 01 18	Non-ferrous metals	Yes	Processed and bagged
16 01 21*	Hazardous components other than those mentioned in 16 01 07 and 16 01 13 and 16 01 14	Yes	Processed and bagged
16 01 22	Components not otherwise specified	Yes	Processed and bagged