

Description of proposed changes

Day Group Ltd are applying to vary permit DP3332JX for the Avonmouth IBA Recycling Facility, to increase the annual throughput of the site to 200,000 tonnes per year. The three EfW plants supplying IBA to the facility are increasing their operational efficiency and are forecasting an increase in their annual outputs, along with there being additional IBA supply opportunities in the local area that Day Group wish to pursue.

A summary of the proposed changes is provided in Table 1.

Table 1.

	Currently permitted	Proposed variation
Operational hours	07.00 – 18.00 Monday to Friday 07.00 – 13.00 Saturday	No change.
Plant running time	11 hours Monday – Friday 6 hours Saturday	No change.
Daily processing limit	700 tonnes per day based on an average of 10 hours at 70 tonnes per hour.	800 tonnes per day based on an average of 10 hours at 80 tonnes per hour.
Maximum IBA storage	10,000 tonnes inside the building.	14,000 tonnes inside the building.
Annual throughput	160,000 tonnes	200,000 tonnes.

Improvements in the quality and consistency of the incoming IBA, including a lower unburnt and oversize material content means the Avonmouth IBA Recycling facility is able to mature and process IBA at a faster rate than when the facility was originally permitted.

The maturation period for windrows of IBA has reduced from 4 weeks to circa 2.5 – 3 weeks, therefore the additional 4,000 tonnes of IBA is able to be stored within the IBA building (see AV001-173-Rev0 Windrow Capacities) and therefore brings no additional environmental risk. The Company recognises that should an IBA test result return as hazardous waste, a larger buffer zone of IBA will need to be removed to effectively quarantine the hazardous waste. This scenario has not occurred, with no IBA samples having been returned as hazardous in the history of this facility.

The reduced oversize content and unburnt material leads to fewer blockages in the treatment plant and the ability to treat 80 tonnes per hour comfortably as the standard processing rate. At 80 tonnes per hour for 10 hours per day Monday – Friday the plant can treat up to 800 tonnes per day, with one hour per day Monday – Friday and six hours on Saturdays reserved for maintenance, cleaning, or treatment after plant shutdowns. The facility operates a split shift working pattern, providing enough staff to operate the plant during staff breaks, and to carry out cleaning and maintenance alongside the plant being operational as far as possible.

The Company operates two other IBA recycling facilities with much of the plant being common, and a large supply of spare and replacement parts available at short notice should they be required. This greatly reduces the amount of time the plant is offline in the event of breakdowns.

The proposal does not include any increase in the maximum storage capacity for products. This is due to Day’s sales team, at times, outselling the plant’s current rate of production. At busy periods of production, such as the build up to Christmas, Day Group’s sales team liaise with the Operations team

to ensure that production feeds the sales pipeline and to minimise the length of time products must be stored prior to sale.

Over the Christmas period, the supplying EFWs continue to burn while the IBA facility operates reduced working hours, therefore there is an established process of increasing IBA deliveries in December to empty the EFW ash bays to provide some buffer storage space. The Avonmouth IBA facility also has use of a permitted storage facility at Roath Docks, where IBA can be temporarily stored prior to transfer to buffer the incoming IBA supply during this busy period.

Operating Techniques Changes

We have supplied a new Environmental Management Plan (Avonmouth) draft v3 to replace the previous operating system documents. Largely the updates to this document are to conform with our controlled documents procedures and to comply with our newly certified ISO14001 integrated management system.

Table 1.2 of Schedule 1 to the permit lists the following documents which are superseded by the updated Environmental Management Plan:

- Environmental Management System & Operating Techniques document dated November 2017
- Section 3.3 of the document titled 'Environmental Management System & Operating Techniques' dated 27 November 2017 (amended June 2019).

The Odour Management Plan, Dust Management Plan and Noise Management Plans remain in place.