

Open Report on behalf of Richard Wills, Executive Director of Environment and Economy

Report to:	Environmental Scrutiny Committee
Date:	4 December 2015
Subject:	Energy from Waste Plant Update

Summary

The Energy from Waste plant in Hykeham, which is operated by FCC Environment, was closed down during September 2015 for planned maintenance. The closure is referred to as an outage. This report advises the Committee on the on the maintenance activity and FCC Environment's plans for achieving 'R1 status', whereby the plant would be certified by the Environment Agency that it is a recovery as opposed to a disposal facility.

Actions Required:

The Committee is invited to consider and comment on the update report on the Energy from Waste plant in Hykeham

1. Background

Outage Report

FCC Environment has now submitted the final report detailing the findings and actions at the Energy from Waste (EfW) plant at Hykeham during the recent close down for planned maintenance.

The facility was closed down on 4 September and work began on the 5 September across the whole plant. The outage was planned to last fourteen days, but was actually completed in twelve due to the use of a night shift on the largest item of work - the overhaul of the fire grate. This reduced down period also reflected the high level of forward planning and preparation that had gone into this, starting almost immediately after the last planned outage.

This inspection and maintenance process was significantly more intensive than the first one in 2014 to ensure that any work or equipment replacements that might be required under warranty were completed before that expired in March 2016.

Substantive use was made of ultrasonic thickness testing (UT) to ascertain the wear on pipes that had been carrying water or steam at high pressure, and from these readings it is possible to predict the expected lifespan of these items. This allows future outages to be planned around what will need to be repaired or replaced and avoids time, money and effort being expended on areas where work is not required.

The grate was given a major inspection which included removing all the bars and replacing a small number of them, and undertaking a thorough clean of the grate structure itself. Minor repairs were also made as required. This was justified when a fault to the clinker weir was identified that will be repaired under warranty.

Both the steam turbine and the generator were also given thorough inspections and strip downs, as whilst neither of these were required by the timetables in the operational manuals it was considered worthwhile to ensure there were no defects requiring rectification under warranty.

The overall view was that the plant was in very good condition and wear and tear was either less than or in line with that to be expected.

Service Continuity

During the whole of the outage direct deliveries to the Energy from Waste bunker were maintained for the three waste collection authorities that applies to operationally, whilst all HGV deliveries were diverted to landfill.

R1 Status

FCC Environment has stated its intention of achieving R1 status for the EfW. R1 status is where the plant is acknowledged through certification issued by the Environment Agency that it is a recovery as opposed to a disposal facility. This relates to the energy output from the plant being at a high level in relation to the amount of waste being burnt.

There are very few EfWs with this accreditation in the UK, and it is only ever likely to be achieved by modern facilities where energy generation has been a part of the plant from design rather than as a retro-fit.

This move could have a much wider significance following an announcement by a speaker at the recent Local Authority Recycling Advisory Committee conference. The speaker is involved in EU policy development for waste, and stated that as part of the circular economy package under development in the EU, a ban on disposal of key recyclates such as paper, cardboard and plastic by any means other than recycling is under serious consideration.

If this ban were to be implemented the implication would be that waste collection authorities would need to keep all of those materials out of the residual waste bin.

The one exception currently considered appropriate to relax that requirement would be if those materials were going to an EfW plant with R1 status.

3. Consultation

This is not a consultation item.

4. Background Papers

The following background paper was used in the preparation of this report:

1. Agenda Item 3a to the Lincolnshire Waste Partnership – 19 November 2015.

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