

1. INTRODUCTION

1.1 Non-Technical Summary

- 1.1.1 This document, comprising a Site Specific Environmental Management System (EMS) has been prepared by Earthcare Technical Ltd (ETL) on behalf of the Operator Neil Wainwright Farming Ltd (NWF), herein termed 'the Operator' in support of a bespoke waste operation environmental permit application to operate an on-farm digestate dryer on land at Two Hoots, Bromyard, Herefordshire, HR7 4FQ, herein termed 'the Site'.
- 1.1.2 The digestate dryer is located adjacent to an on-farm anaerobic digester (AD) operated under an environmental permit held and operated by Assured Energy LLP; permit reference number EPR/BB3201MD. A copy of this permit can be found in Appendix 1.
- 1.1.3 The Operator secured planning permission from Herefordshire District Council on 5th April 2013 to operate an on-farm AD and ancillary development at the site. The planning reference is Application No: 130161/N.
- 1.1.4 The adjacent AD plant is restricted through the site planning permission to processing only agricultural crops, poultry litter, animal manures and slurry. The resulting digestate is therefore classified by the Environment Agency (EA) as a non-waste provided it is used as an agricultural fertiliser in accordance with their Regulatory Position Statement on the Anaerobic Digestion of Manure and Slurry.¹ As the digestate dryer treats the digestate, this further processing is classified as a waste treatment process therefore it is required to be carried out at a regulated facility.
- 1.1.5 The digestate dryer falls outside the permitted area for the AD plant. Although the two regulated facilities are linked, the legal entities operating the AD plant and the dryer are different and as such it has been deemed that a separate permit is required for the digestate dryer.
- 1.1.6 Any environmental permit regularising the digestate dryer activity will contain permit Condition 1.1.1 requiring the Operator to manage and operate the activity 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 as a result of complaints; and using sufficient competent person and resources.
- 1.1.7 Additionally, the Environment Agency (EA) has published Environmental Permitting Guidance to help Operators understand the conditions of environmental permits.^{2,3} It describes the standards and measures that must be used to control the most common risks of pollution from the activity.

¹ Environment Agency Position Statement 029 on the Anaerobic digestion of agricultural manure and slurry, Version 1.0, October 2010

² <https://www.gov.uk/guidance/develop-a-management-system-environmental-permits> Accessed 3rd October 2018

³ <https://www.gov.uk/guidance/control-and-monitor-emissions-for-your-environmental-permit> Accessed 3rd October 2018

- 1.1.8 This EMS is written in accordance with the most relevant EA guidance referenced above.
- 1.1.9 The digestate dryer was manufactured and commissioned by Dorset Green Machines BV, a Dutch manufacturing company who design and manufacture manure and sludge drying technology.
- 1.1.10 The benefit to the Operator of producing dried digestate is that it is easier and cheaper to transport than whole digestate and is less of a pollution risk when spread to land as an agricultural fertiliser.
- 1.1.11 The maximum annual throughput of the digestate dryer is proposed to be 3,000 tonnes.
- 1.1.12 Whole, unseparated digestate is pumped via an underground pipe from the adjacent AD plant to the dryer. The whole digestate is stored within a tank in the dryer prior to processing.
- 1.1.13 The drying of the digestate uses waste heat from the adjacent AD plant which reduces the water content of the digestate for ease of storage, transport and use.
- 1.1.14 Dried digestate is stored undercover in a farm building on site prior to being removed for use on a seasonal basis as a fertiliser on nearby agricultural land in accordance with agronomic advice and in line with Codes of Good Agricultural Practice for the protection of water, soil, and air and Nitrate Vulnerable Zone rules where applicable. The storage and spreading of the dried digestate is outside the scope of this EMS.
- 1.1.15 Emissions to air in the form of dust are controlled via the dryer technology, namely a 'dust catcher' and the fact the dryer is containerised. The dust catcher will also act to reduce ammonia emissions as ammonia will dissolve in the water spray.
- 1.1.16 Emissions to land and water are controlled through the containment of the dryer and containment of the dirty water from the dust abatement system.