Conclusions on BAT

Reference Document on Best Available Techniques for Energy Efficiency - February 2009

BAT Reference No.	***BAT Statement***	***Applicable***	***Proposal***
4.2.1	**BAT is to implement and adhere to an energy efficiency management system (ENEMS)**	Yes	As energy is principally used to operate the, ventilation, feeding and water supply there are over riding issues with regard to animal welfare when it comes to energy efficiency. As a significant amount of energy is used in ventilation and climate control within the house, external climatic factors will have a significant effect on the energy usage on-site. However it should be noted that a number of specific issues have been addressed in the construction of these new houses so as to ensure the highest levels of energy efficiency. A system will be established to review annual energy usage and review results.
4.2.2.2	**BAT is to identify the aspects of an installation that influence energy efficiency by carrying out an audit. It is important that an audit is coherent with a systems approach.**	Yes	Energy Audit to be completed within 12 months of the date of grant of the licence/commencement of activities. Energy Audit to address any additional BAT recommendations that may be deemed appropriate.
4.2.3	**BAT is to optimise energy efficiency when planning a new installation, unit or system or a significant upgradeby considering all of the following:**	Yes	***Existing/Proposed*** Houses to be constructed with high insulation standards.

	a. the energy efficient design (EED) should be initiated at the early stages of the conceptual design/basic design phase, even though the planned investments may not be well-defined. b. the development and/or selection of energy efficient technologies c. additional data collection may need to be carried out as part of the design project or separately to supplement existing data or fill gaps in knowledge *d.* the EED work should be carried out by an energy expert e. the initial mapping of energy consumption should also address which parties in the project organisations influence the future energy consumption, and should optimise the energy efficiency design of the future plant with them. For example, the staff in the(existing) installation who may be responsible for specifying design parameters.		It should be noted that a number of specific issues have been addressed in the construction of these new houses so as to ensure the highest levels of energy efficiency, and LED lights are to be considered/recommended when considering any upgrade of the lighting system or investment in new structures.
4.2.8	**BAT is to carry out maintenance at installations to optimise energy efficiency ….**	Yes	***Existing*** Although the houses will be newly constructed a maintenance programme will be carried out on site to ensure that all systems are running efficiently.
4.3.10	**BAT is to optimise artificial lighting systems by using the techniques such as those in Table 4.9 according to applicability**	Yes	***Existing*** As per 4.2.3 above.
	Remaining BAT recommendations. ***Including but not limited to 4.3.1 – 4.3.4 inclusive, 4.3.7 and 4.3.8.***	No.	Remaining recommendations are not deemed applicable to the existing/proposed development, and/or are more appropriately covered by sector specific BAT recommendations. It must also be born in mind that sector specific BAT recommendations on energy efficiency are already contained within ***Integrated Pollution Prevention and Control (IPPC) Reference Document on Best Available Techniques for Intensive Rearing of Poultry and Pigs July 2003***