

Briefing note
Large Combustion Plant Best Available Techniques
Reference Document Revision
RMC Brandwood – E.ON Technologies

Background

The Industrial Emissions Directive (IED¹) was adopted in 2010 and merges a number of former directives into one, including the Large Combustion Plant Directive (LCPD²). The LCPD was the instrument which currently governs the permitting and required Emission Limit Values (ELV) for a number of recent GT fired plant³, with the very newest being permitted under IED.

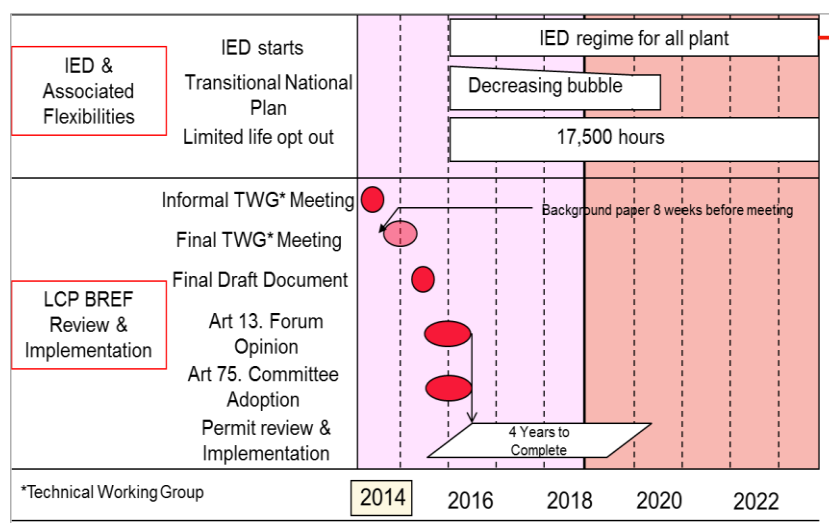
The IED applies to installations of 50MWth or above, and can incorporate units of 15MWth where they are aggregated to a total of 50MWth or more. This aggregation would be the case where units have a common flue within the plant, or the Competent Authority setting permits deems they could be considered as aggregated. The IED sets NO_x and CO ELVs for GT plant, though installations operated off-shore are excluded from these. Different ELVs apply according to fuel type (gaseous or liquid), and flexibilities are in place for certain criteria, such as load factor. The IED does also contain other requirements around the setting of permits based on the contents of BAT Conclusions. These conclusions are derived from the so called Best Available Techniques Reference Documents, colloquially known as “BREFs”.

The appropriate reference document for Large Combustion Plant, the LCP BREF, is currently under review, this is known as the “Sevilla Process”.

All operational plant must adhere to the revised opinion on BAT. While off-shore assets are exempt from the IED ELVs, they are not exempt from this requirement for the application of BAT in permit setting. There remains legal uncertainty as to whether plant in the IED flexibilities must apply BAT as stated in the BAT Conclusions.

Timeline

The timeline for the application of the IED, its flexibilities and the application of revised BAT standards is best shown graphically. The revision of the LCP BREF, from which the critically important BAT Conclusions are drawn, is ongoing. The process should have been completed by now, but delays have been apparent.



¹ DIRECTIVE 2010/75/EU OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 24 November 2010 on industrial emissions (integrated pollution prevention and control)

² DIRECTIVE 2001/80/EC OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL of 23 October 2001 on the limitation of emissions of certain pollutants into the air from large combustion plants

³ Note, the LCPD did not actually set ELVs for most existing GT plant.

The current expectation is that the final LCP BREF will be completed in Q1/2 of 2015. Once completed the conclusions must be formally adopted via a recommendation from the Article 13 Forum and a vote by the European Article 75 Committee on BAT-Conclusions. Once that vote has been past a four year window opens for permit reviews and implementation. Therefore, it is likely that the full impact of the new LCP BREF will have impacted our business by 2019.

Potential Implications

The potential impact on the fleet of gas turbine plant in Europe, and ultimately any accession countries, might be significant. In the most extreme case the document will require plant to improve efficiency, as well as reduce emissions to air of NOx, CO, and ammonia, the latter of these where catalytic DeNOx is required.

There is much disquiet in the Technical Working Group of the Seville Process as it is far from clear what processes have been used to derive the performance levels quoted in the draft document. In particular submitted reference plant data has been screened out, leaving a remaining dataset of plant considered as BAT which do not represent the full range of operating conditions and situations apparent in the Fleet. The manner in which averaging is to be undertaken is also inconsistent with the IED – increasing the burden on Operators.

In short there is a significant risk that increased capital spend to already financially stressed CCGT or GT plant will be required, and that there will also be an increased ongoing operational expense and burden.

It is also interesting to note that Russia is adopting a catalogue based approach to BAT, and there is a significant possibility that the outcome of the LCP BREF revision may be used to govern environmental permitting expectations for plant there.

Request for Data

In a first of its kind, Greenpeace have made a formal request in accordance with Regulation (EC) No 1049/2001 regarding public access to documents and Regulation (EC) No 1367/2006 regarding access to environmental information, to obtain any letters, documentation of meetings and email correspondence in relation to the revision. This request specifically names any communications between the European Commission and CEZ, EdF, Enel, E.ON, GDF Suez, Gas Natural Fenosa, Iberdrola, PGE, RWE, Vattenfall, and Public Power Corporation of Greece (DEI). This request is being opposed by those involved, one reason being that it could impact negatively the willingness of those involved to submit the information required.

ETN Next Steps

The following next steps are recommended:

- ETN maintains an active engagement with the revision process via its IED Working Group.
- Dialogue to be maintained with other sectorial organisations on the topic (i.e. EUTurbines, Eurelectric, International Association of Oil and Gas Producers (OGP), etc.).
- ETN continues to make its membership aware of developments in this area and potential impact on their plant's operation.