





Validation opinion

Revision of the monitoring plan

Title of project activity:		
Catalytic N ₂ O Abatement Project in the Tail Gas of the Nitric Acid Plant of the Hanwha Corporation (HWC) in Ulsan, Republic of Korea		
CDM reference number:		DNV project No.:
0922		PRJC-230713-2010-CCS-CHN
Type of revision:	<input type="checkbox"/> Proposed revision only includes the request by the CDM EB <input type="checkbox"/> Proposed revision includes not only the request by the CDM EB but also additional revisions proposed by the PP/DOE <input checked="" type="checkbox"/> Proposed Revision includes revisions proposed by the PP/DOE	
Date	Work carried out by:	Work verified by:
28 May 2010	Akira Sekine 	Trine Kopperud 

1 Description of the changes to the monitoring plan

The Section B.7.1 and Annex 4 of the revised PDD were revised regarding the measurement range of N₂O gas analyzer as follows;

	Registered PDD	Proposed revision
Measurement range of the N ₂ O concentration at destruction facility outlet	0 – 300 ppm	0 – 500 ppm

The project participants had determined the measurement range according to the specification of the N₂O abatement system at the validation phase. However the actual N₂O decomposition efficiency could not reach the process design of 90% (i.e. the average value of approximately 85% was observed during the 3rd monitoring period).

The actual N₂O concentration at the destruction facility outlet has occasionally exceeded the upper limit of the measurement range which was originally set. The project participants excluded the CER obtained during the period when the N₂O concentration was beyond 300 ppm in the 1st, 2nd and 3rd monitoring periods. They intend to make the values valid under the similar situation and proposed the revision of the monitoring plan by expanding the upper limit of the measurement range of the N₂O outlet analyzer from 300 ppm to 500 ppm.

2 Assessment of the revision of the monitoring plan

The change was conducted on 19 January 2010 by I & A, an agent of ABB in Korea, and the validity of the calibration function was checked and the AST conducted by AIRTEC. It was confirmed through the AST report dated 31 March 2010 issued by AIRTEC Gesellschaft für Umweltmessungen mbH.

The proposed revision of the monitoring plan ensures that the level of accuracy or completeness in the monitoring and verification process is not reduced as a result of the revisions.

Also, the proposed revision of the monitoring plan is in accordance with the approved monitoring methodology, AM0028, version 3 and would not impact the conservativeness of the emission reductions calculation.

3 Validation opinion

As per the requirements of Annex 28 of EB49, DNV confirms that the proposed revisions of the monitoring plan ensure that the level of accuracy or completeness in the monitoring and verification process is not reduced as a result of the revisions. Thus it is DNV opinion that the proposed revision is acceptable. Further, the proposed revision of the monitoring plan is in accordance with the approved monitoring methodology AM0028, version 3.

DNV thus recommends the approval of the revised monitoring plan submitted by the project participants.

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