VALIDATION OPINION FOR REVISION OF REGISTERED MONITORING PLAN

Lafarge India Pvt. Ltd.

Substitution of clinker with fly ash in Portland Pozzolana Cement (Blended Cement) at Lafarge India Pvt. Ltd. – Arasmeta Cement Plant

UNFCCC Ref. No. 0746

SGS Climate Change Programme
SGS United Kingdom Ltd
SGS House
217-221 London Road
Camberley Surrey
GU15 3EY
United Kingdom

SGS United Kingdom Ltd | SGS House, 217-221 London Road, Camberley, Surrey GU15 3EY **Tel** +44 (0)1276 697810 **Fax** +44 (0)1276 697888
Registered in England No. 1193985 Rossmore Business Park, Ellesmere Port, Cheshire CH65 3EN www.sgs.com
Member of SGS Group (Société Générale de Surveillance)

Date of Issue:	**Project Number:**
12-06-2006	CDM.VER0200
Project Title:	
Substitution of clinker with fly ash in Portland Pozzolana Cement (Blended Cement) at Lafarge India Pvt. Ltd. – Arasmeta Cement Plant.	
Organisation:	**Client:**
SGS United Kingdom Limited	Lafarge India Pvt. Ltd.
Subject:	
Validation opinion for revision of Registered Monitoring Plan	
Validation Team:	
Ajoy Gupta – Lead Assessor Nikunj Agarwal – Assessor Kamesh Iyer – Local Assessor	☒ No Distribution (without permission from the Client or responsible organisational unit)
Technical Review: / **Trainee Technical Reviewer:**	
Date: 12-062008 Name: Sanjeev Kumar / Name: Vikrant Badve	☐ Limited Distribution
Authorised Signatory:	
Name: Siddharth Yadav Date: 16-06-2008	☐ Unrestricted Distribution

Revision Number:	**Date:**	**Number of Pages:**
0	12-06-2006	11
1	--	--
2	--	--

Reference to Part of this Report Which may Lead to Misinterpretation is not Permissible.

Table of Content

1. Validation Opinion 4
2. Introduction 5
2.1 Objective 5
2.2 Scope 5
2.3 GHG Project Description 5
2.4 The Names and Roles of the Validation Team Members 5
3. Methodology 6
3.1 Review of CDM-PDD and Additional Documentation 6
3.2 Use of the Validation Protocol 6
3.3 Findings 6
3.4 Internal Quality Control 7
4. Validation Findings 8
4.1 Participation Requirements 8
4.2 Project Design 8
4.3 Eligibility as a Small Scale Project 8
4.4 Baseline Selection and Additionality 8
4.5 Application of Baseline Methodology and Calculation of Emission Factors 8
4.6 Application of Monitoring Methodology and Monitoring Plan 8
4.7 Choice of the Crediting Period 9
4.8 Environmental Impacts 9
4.9 Local Stakeholder Comments 9
5. List of Persons Interviewed 10
6. Document References 11

Reference to Part of this Report Which may Lead to Misinterpretation is not Permissible.

1. Validation Opinion

Paragraph 57 of the modalities and procedures for the CDM allow project participants to revise monitoring plans in order to improve accuracy and/or completeness of information, subject to the revision being validated by a Designated Operational Entity.

SGS United Kingdom Ltd has been contracted by Lafarge India Pvt. Ltd. to perform such a validation of the revision of monitoring plan according to the procedure detailed in annex 34 to EB 26 meeting report, the original monitoring plan is part of the PDD of registered CDM project: Substitution of clinker with fly ash in Portland Pozzolana Cement (Blended Cement) at Lafarge India Pvt. Ltd. – Arasmeta Cement Plant; UNFCCC ref. no. 0746. The purpose of a validation is to have an independent third party assessment of the revision of monitoring plan. In particular, the level of accuracy or completeness in the proposed revision of the monitoring plan, and the conformity with approved monitoring methodology applicable to the project activity.

By applying the proposed revision of monitoring plan, the grid emission factor will not be monitored in annual frequency during the selected crediting period, since the grid emission factor for western regional grid has been determined ex-ante using combined margin approach, following approved consolidated methodology ACM0002 and this has been well documented in Validation Report. This revision improves the accuracy of information.

Furthermore, we confirm that:

(a) 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;

(b) the proposed revision of the monitoring plan is in accordance with the approved monitoring methodology applicable to the project activity.

Signed on Behalf of the Validation Body by Authorized Signatory

Signature: 

Name: Siddharth Yadav

Date: 16-06-2008

2. Introduction

2.1 Objective

Paragraph 57 of the modalities and procedures for the CDM allow project participants to revise monitoring plans in order to improve accuracy and/or completeness of information, subject to the revision being validated by a Designated Operational Entity.

SGS United Kingdom Ltd has been contracted by Lafarge India Private Limited to perform such a validation of the revision of monitoring plan according to the procedure detailed in annex 34 to EB 26 meeting report, the original monitoring plan is part of the PDD of registered CDM project: Substitution of clinker with fly ash in Portland Pozzolana Cement (Blended Cement) at Lafarge India Pvt. Ltd. – Arasmeta Cement Plant.; UNFCCC ref. no. 0746. The purpose of a validation is to have an independent third party assessment of the revision of monitoring plan. In particular, the level of accuracy or completeness in the proposed revision of the monitoring plan, and the conformity with the approved monitoring methodology applicable to the project activity.

The Validation was performed in accordance with the UNFCCC criteria for the Clean Development Mechanism (CDM) and host country criteria, as well as criteria given to provide for consistent project operations, monitoring and reporting.

SGS reviewed of the project design documentation, using a risk based approach and conducted follow-up interviews.

2.2 Scope

The scope of the validation is defined as an independent and objective review of the project design document, the project's baseline study and monitoring plan and other relevant documents. The information in these documents is reviewed against Kyoto Protocol requirements, UNFCCC rules and associated interpretations. SGS has employed a risk-based approach in the validation, focusing on the identification of significant risks for project implementation and the generation of CERs.

The validation is not meant to provide any consulting towards the Client. However, stated requests for clarifications and/or corrective actions may provide input for improvement of the project design.

2.3 GHG Project Description

As per http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view page validation report (no. 2006-9026-2, dated 2006-08-07). The project was registered on 11 Feb 07 with reference number 0746.

2.4 The Names and Roles of the Validation Team Members

Name	Role	Affiliate
Ajoy Gupta	Lead Assessor	SGS India
Nikunj Agarwal	Assessor	SGS India
Kamesh Iyer	Local Assessor	SGS India

3. Methodology

3.1 Review of CDM-PDD and Additional Documentation

The validation is performed primarily as a document review of the publicly available project documents. The assessment is performed by trained assessors using a validation protocol.

A site visit is usually required to verify assumptions in the baseline.

3.2 Use of the Validation Protocol

The validation protocol used for the assessment is partly based on the templates of the IETA / World Bank Validation and Verification Manual and partly on the experience of SGS with the validation of CDM projects. It serves the following purposes:

- it organises, details and clarifies the requirements the project is expected to meet; and
- it documents both how a particular requirement has been validated and the result of the validation.

The validation protocol consists of several tables. The different columns in these tables are described below.

Checklist Question	Ref ID	Means of verification (MoV)	Comment	Draft and/or Final Conclusion
The various requirements are linked to checklist questions the project should meet.	Lists any references and sources used in the validation process. Full details are provided in the table at the bottom of the checklist.	Explains how conformance with the checklist question is investigated. Examples of means of verification are document review (DR) or interview (I). N/A means not applicable.	The section is used to elaborate and discuss the checklist question and/or the conformance to the question. It is further used to explain the conclusions reached.	This is either acceptable based on evidence provided (Y), or a Corrective Action Request (CAR) due to non-compliance with the checklist question (See below). New Information Request (NIR) is used when the validation team has identified a need for further clarification.

The complete validation requirements are elaborated in section 4.1 to 4.9 of this report

3.3 Findings

As an outcome of the validation process, the team can raise different types of findings

In general, where insufficient or inaccurate information is available and clarification or new information is required the Assessor shall raise a **New Information Request (NIR)** specifying what additional information is required.

Where a non-conformance arises the Assessor shall raise a **Corrective Action Request (CAR).** A CAR

is issued, where:

I. mistakes have been made with a direct influence on project results;

II. validation protocol requirements have not been met; or

III. there is a risk that the project would not be accepted as a CDM project or that emission reductions will not be verified.

The validation process may be halted until this information has been made available to the assessors' satisfaction. Failure to address a NIR may result in a CAR. Information or clarifications provided as a result of an NIR may also lead to a CAR.

Observations may be raised which are for the benefit of future projects and future verification or validation actors. These have no impact upon the completion of the validation or verification activity.

Corrective Action Requests and New Information Requests are raised in the draft validation protocol and detailed in a separate form, the Project Developer is given the opportunity to "close" outstanding CARs and respond to NIRs and Observations.

3.4 Internal Quality Control

Following the completion of the assessment process and a recommendation by the Assessment team, all documentation will be forwarded to a Technical Reviewer. The task of the Technical Reviewer is to check that all procedures have been followed and all conclusions are justified. The Technical Reviewer will either accept or reject the recommendation made by the assessment team.

4. Validation Findings

4.1 Participation Requirements

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.2 Project Design

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.3 Eligibility as a Small Scale Project

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.4 Baseline Selection and Additionality

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.5 Application of Baseline Methodology and Calculation of Emission Factors

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.6 Application of Monitoring Methodology and Monitoring Plan

The project activity is using ACM0005, version 03 dated – 19th May 2006. The registered monitoring plan is required to be revised as the Project Proponent at site is not monitoring the grid emission factor in annual frequency at ex-post scenario; since the grid emission factor for western regional grid of India has been determined ex-ante as 0.984 $KgCO_2$ / KWh based on the approved methodology ACM0002 using a combined margin approach at the time of validation. During ex-ante grid emission factor estimation, the power data has been referred from power sector data published by Central Electricity Authority, Ministry of Power, Government of India. This fact has been well evidenced through Validation Report (report no. 2006-9026-2, dated 2006-08-07, page 8, available at http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. Ex-ante determination of grid emission factor is well consistent with the requirement of ACM0002, thus it has been accepted.

Rest of the monitoring plan remains the same as mentioned in the registered PDD available at UNFCCC website http://cdm.unfccc.int/UserManagement/FileStorage/I2JUM90GZLX2STCJKM8BFVDKHKZ61E and revised monitoring plan is attached with the revised validation opinion.

There is no other change in the validation report available on UNFCCC website http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view.

4.7 Choice of the Crediting Period

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.8 Environmental Impacts

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

4.9 Local Stakeholder Comments

As per http://cdm.unfccc.int/UserManagement/FileStorage/XV27S4GUT3TFHGIH0NUDYE2RZZOZCJ Validation Report (no. 2006-9026-2, dated 2006-08-07) available on UNFCCC website http://cdm.unfccc.int/Projects/DB/DNV-CUK1162198677.65/view. No Change.

5. List of Persons Interviewed

Date	Name	Position	Short Description of Subject Discussed
06/06/2008	Mr. S. Jajpuria	Sr. Manager Industrial Ecology	Monitoring practice adopted at plant site and requirement under registered PDD monitoring plan

Reference to Part of this Report Which may Lead to Misinterpretation is not Permissible.

6. Document References

Category 1 Documents (documents provided by the Client that relate directly to the GHG components of the project, (i.e. the CDM Project Design Document, confirmation by the host Party on contribution to sustainable development and written approval of voluntary participation from the designated national authority):

/1/ Revised Monitoring plan dated 10/06/2008
/2/ Registered PDD version 02 dated 19th September 2006
/3/ Validation Report (no. 2006-9026-2, dated 2006-08-07)
/4/ ACM0005 Version 03 dated – 19th May 2006

- o0o -