

BUNDLED WIND POWER PROJECT IN TAMIL NADU MANAGED BY ENERCON INDIA LIMITED - II



SGS United Kingdom Limited

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Summary:

SGS United Kingdom Ltd has performed the verification of the project “Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II” and VCS Project ID: 404 against VCS Standard Version 3.3. The verification includes confirming the implementation of the monitoring plan of the VCS Project Description version 02 dated 08/09/2009 and the application of the monitoring methodology as per ACM0002 version 10 valid from 11/06/2009. A site visit was conducted to verify the data submitted in the monitoring report.

As per the registered PD the project activity is a bundled wind power project with 45 WTGs of capacity 800 kW each with an installed capacity of 36 MW. Out of this 14 WTGs (i.e. 11.2 MW) have been registered as a part of a CDM project (UN Ref. No. 4877). Hence, for the current monitoring period, this project activity becomes a bundled wind power generation project involving 31 WTGs of capacity 800 kW each with an installed capacity of 24.8 MW. The electricity generated from these wind mills is being supplied to the Southern Regional Grid; hence replacing fossil fuel dominated grid connected electricity generation.

The report describes a total of 02 findings which include:

- 01 Corrective Action Requests (CARs)
- 01 Clarification Requests (CLs)
- 00 Forward Action Requests (FARs)

All findings have been closed satisfactorily and same has been discussed in Annex 2 of this report.

SGS confirms that the project is implemented in accordance with the validated VCS Project Description. The monitoring system is in place and the emission reductions are calculated without material misstatements. Our opinion relates to the projects GHG emissions and the resulting GHG emission reductions reported and related to the valid and validated project baseline and monitoring and its associated documents. Based on the information seen and evaluated we confirm that the implementation of the project has resulted in 39,569 tCO₂e emission reductions during period 16/11/2011 to 15/09/2012.

Abbreviations

CAR	Corrective Action Request
CDM	Clean Development Mechanism
CEA	Central Electricity Authority
CL	Clarification Request
CO ₂	Carbon dioxide
EB	Executive Board
EIL	Enercon India Limited
FAR	Forward Action Request
GHG	Green House Gas
HTSC	High Tension Service Connection
ID	Identification
ISO	International Standards Organization
kW	Kilowatt
kWh	Kilowatt hour
MR	Monitoring Report
MW	Megawatt
MWh	Megawatt-hour
PLF	Plant Load Factor
PP	Project Participant
PPA	Power Purchase Agreement
QA/QC	Quality Assurance and Quality Control
SCADA	Supervisory Control And Data Acquisition
SGS	SGS United Kingdom Limited
TNEB	Tamil Nadu Electricity Board
UNFCCC	United Nations Framework Convention on Climate Change
VCS	Verified Carbon Standard
VCS PD	VCS Project Description
VCUs	Verified Carbon Units
VVS	Validation and Verification Standard
WTG/WEG	Wind Turbine Generator/Wind Energy Generator

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1 INTRODUCTION

1.1 Objective

SGS United Kingdom Ltd has been contracted by Enercon (India) Limited to perform an independent verification of its project “Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II” against VCS Standard Version 3.3. The verifiers have reviewed the GHG data collected to date for the period between 16/11/2011 to 15/09/2012.

The purposes of this verification exercise are, by review of objective evidence, to independently review:

- Whether the project has resulted in emission reductions as declared by the organisation or GHG project’s GHG assertion;
- The data reported are accurate, complete, consistent, transparent and free of material error or omission

1.2 Scope and Criteria

This engagement covers verification of emission reductions from anthropogenic sources of greenhouse gases included within the project boundary of “Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II”.

Our approach is risk-based, drawing on an understanding of the risks associated with reporting GHG emissions data and the controls in place to mitigate these. Our examination includes assessment, on a test basis, of evidence relevant to the amounts and disclosures in relation to the project’s GHG emission reductions for the defined reporting period.

The verification 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.

1.3 Level of assurance

The level of assurance of the verification report is reasonable assurance engagements as selected by the Client. Materiality for the project is 5%.

1.4 Summary Description of the Project

This engagement covers emissions and emission reductions from anthropogenic sources of greenhouse gases included within the project boundary of the following project and period.

Title of Project Activity:	Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II
Project ID	404
Monitoring Period Covered in this Report	16/11/2011 to 15/09/2012
Project Participant(s)	Enercon (India) Limited

Location of the Project Activity: Pushpathur site in Dindigul district and Chinnakkampalayam in Erode district of Tamil Nadu, India

The project activity involves electricity generation by WTGs and supplying the same to the southern regional grid. This is a renewable energy generation which replaces the fossil fuel dominated grid connected electricity generation.

As per the VCS PD, the project activity is a bundled wind power project with 45 WTGs of capacity 800 kW each with an installed capacity of 36 MW. Out of this, 14 WTGs (i.e. 11.2 MW) have been registered as a part of a CDM project (UN Ref. No. 4877). Hence, for the current monitoring period, this project activity becomes a bundled wind power generation project involving 31 WTGs of capacity 800 kW each with an installed capacity of 24.8 MW, at Dindigul and Erode districts of Tamil Nadu, India. The WTGs are of Enercon make E-48. The generated electricity is evacuated to Tamil Nadu state grid which is an integral part of the Southern Regional Grid. The project has already been commissioned as mentioned in the VCS PD and verified from the commissioning certificates^{/11/}.

All the 31 WTGs are fully functional and this was verified by the assessment team during the site visit. Technical details of WTGs with respect to installation place and capacity have been verified during the site visit and found to be consistent with the details provided in the VCS PD.

2 VALIDATION PROCESS, FINDINGS AND CONCLUSION

2.1 Validation Process

This project activity is registered under VCS standard 2007.1. A part of the project activity i.e. 14 WTGs owned by Bannari Amman Spinning Mills was registered with the UNFCCC as a CDM project (UN Ref. No. 4877) on 17/06/2011; hence these 14 WTGs will not be considered as a part of this project activity, in the current monitoring period. For other investors, the PP has not applied the project activity to any other GHG program; and hence not registered under any other GHG program. Thus it is concluded that all the rules and validation requirements set by VCS are already taken care at the time of VCS validation of the project activity under 2007.1. Thus no further validation is required for the project activity.

2.2 Validation Findings

2.2.1 Gap Validation

This project activity (31 WTGs with total capacity of 24.8 MW) is not registered under CDM. Hence, gap validation with reference to the cover page and sections 1.2, 1.3, 1.5, 1.6, 1.7, 1.9, 1.10, 1.12.1, 1.12.2, 1.12.3, 1.12.4 and 1.13 of the VCS Project Description template is not required as the project activity is registered under VCS 2007.1. Details of the WTGs that have been excluded from this project activity due to their CDM registration have been discussed in section 2.2.3 below.

2.2.2 Methodology Deviations

Not applicable as no methodological deviations are found. Monitoring plan implemented at project site is in line with registered VCS PD^{/1/} as well as applied methodology^{/2/} for the project activity.

2.2.3 Project Description Deviations

As per the registered VCS PD, the project activity has an installed capacity of 36 MW which involves 45 WTGs of capacity 0.8 MW each. The 14 WTGs owned by the investor Bannari Amman Spinning Mills were registered as CDM project (UN Ref. No. 4877) on 17/06/2011. Hence these WTGs will not be considered in calculating the emission reductions for the current monitoring period. Hence this VCS project activity now has 31 WTGs of capacity 0.8 MW each, with a total capacity of 24.8 MW.

2.2.4 New Project Activity Instances

Not applicable as no new project activity instances are included in the project activity.

2.3 Validation Conclusion

Based on the above discussion the verification team confirms that the project conforms to the validation criteria for projects, as set out in the VCS version 3.3.

3 VERIFICATION PROCESS

3.1 Method and Criteria

SGS' approach to the verification is a two-stage process.

In the first stage, SGS completed a strategic review and risk assessment of the projects activities and processes in order to gain a full understanding of:

- Activities associated with all the sources contributing to the project emissions and emission reductions, including leakage if relevant;
- Protocols used to estimate or measure GHG emissions from these sources;
- Collection and handling of data;
- Controls on the collection and handling of data;
- Means of verifying reported data; and
- Compilation of the monitoring report.

At the end of this stage, SGS produced a Verification Checklist which, based on the risk assessment of the parameters and data collection and handling processes for each of those parameters, describes the verification approach and the sampling plan.

Using the Verification checklist, SGS verified the implementation of the monitoring plan and the data presented in the Monitoring Report for the period in question. This involved a site visit and a desk review of the monitoring report. This verification report describes the findings of this assessment.

3.2 Document Review

The VCS PD, the monitoring report submitted by the client and additional background documents related to the project performance were reviewed. A complete list of all documents reviewed is attached in section Annex 1 of this report.

3.3 Interviews

The site visit to the project activity was conducted on 29th & 30th November 2012. During the site visit to the project activity, personnel responsible for monitoring of the project activity, data collection and management, QA/QC procedure to be followed for the project activity is interview. Summary of the same is discussed in table as below:

Date	Name & Designation	Short Description of Subject Discussed
29/11/2012 - 30/11/2012 onwards	Mr. Bhupendra Verma Assistant Manager – CDM, EIL	• Project Implementation • Project boundary • Monitoring & Measuring System • Data collection and recoding • Data archiving system • Calibration of measuring Equipments • VCS monitoring & Reporting documentation
29/11/2012 - 30/11/2012 onwards	Mr. R Ramesh Kumar Site in-charge, EIL Mr. Bhadresh Assistant Engineer, EIL	• Project implementation • Monitoring & Measuring System • Data collection and recoding • Data archiving system • Calibration of measuring Equipments • Operation and Maintenance procedures • QA/QC procedures • Training procedures

3.4 Site Inspections

As part of the verification, the following on-site inspections have been performed by the Lead Assessor/Local Assessor/ Sector Expert TA1.2.

Location: Pushpathur site in Dindigul district and Chinnakkampalayam in Erode district of Tamil Nadu, India, India	
Date: 29/11/2012 – 30/11/2012	
Coverage:	Source of Information / Persons Interviewed
Assessment of project boundary VCS monitoring and reporting documentation	Mr. Bhupendra Verma (Assistant Manager – CDM, EIL)
Site visit: Inspection of infrastructure and equipments, calibration, maintenance, personnel training. Monitoring and measuring system - Collection of measurements - Observations of established practices Data Verification of monitoring parameters Detailed review of project activity and verification of monitoring procedures implementation, Monitored data verification	Mr. Bhupendra Verma (Assistant Manager – CDM, EIL) Mr. R Ramesh Kumar (Site in-charge, EIL) Mr. Bhadresh (Assistant Engineer, EIL)
Project implementation Quality Assurance – Management and operating system	Mr. R Ramesh Kumar (Site in-charge, EIL) Mr. Bhadresh (Assistant Engineer, EIL)

3.5 Resolution of Any Material Discrepancy

As an outcome of the verification 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 team shall raise a Clarification Request (CL) specifying what additional information is required.

Where a non-conformance arises the team shall raise a Corrective Action Request (CAR). A CAR is issued, where:

- I. The verification is not able to obtain sufficient evidence for the reported emission reductions or part of the reported emission reductions. In this case these emission reductions shall not be verified and certified;
- II. The verification has identified misstatements in the reported emission reductions. Emission reductions with misstatements shall be discounted based on the verifiers ex-post determination of the achieved emission reductions

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

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

Corrective Action Requests and Clarification Requests are detailed in Verification Checklist. The Project Developer is given the opportunity to "close" outstanding CARs and respond to CLs and FARs

4 VERIFICATION FINDINGS

4.1 Project Implementation Status

4.1.1 Implementation status of the project activity

The project activity is implemented and equipments are installed^{/11/} as described in the registered VCS PD^{/1/}. This is the fourth verification for the project activity. The project activity has been commissioned^{/11/} and implemented satisfactorily. The same has been checked and verified during the site visit.

The 14 WTGs owned by Bannari Amman Spinning Mills are registered as CDM project (UN Ref. No. 4877) on 17/06/2011. Hence, this component of the project activity will not be considered a part of this VCS project activity. The WTG details of the project activity are as follows:

Sr. No.	Name of Customers	HTSC No.	Commissioning Date	No. of M/C	Capacity (MW)
1	Premier Spg & Wvg Mills Pvt Ltd	D47	21/03/2007	10	8
2	Premier Spg & Wvg Mills Pvt Ltd	D49	21/03/2007		
3	Premier Spg & Wvg Mills Pvt Ltd	D52	26/03/2007		

Sr. No.	Name of Customers	HTSC No.	Commissioning Date	No. of M/C	Capacity (MW)
4	Premier Spg & Wvg Mills Pvt Ltd	D54	26/03/2007		
5	Premier Spg & Wvg Mills Pvt Ltd	D79	25/04/2007		
6	Premier Spg & Wvg Mills Pvt Ltd	D80	25/04/2007		
7	Premier Spg & Wvg Mills Pvt Ltd	D81	25/04/2007		
8	Premier Spg & Wvg Mills Pvt Ltd	D82	09/05/2007		
9	Premier Spg & Wvg Mills Pvt Ltd	D83	09/05/2007		
10	Premier Spg & Wvg Mills Pvt Ltd	D84	11/05/2007		
11	Premier Fine Yarns Pvt Ltd	D26	26/02/2007	10	8
12	Premier Fine Yarns Pvt Ltd	D27	26/02/2007		
13	Premier Fine Yarns Pvt Ltd	D28	26/02/2007		
14	Premier Fine Yarns Pvt Ltd	D29	26/02/2007		
15	Premier Fine Yarns Pvt Ltd	D30	27/02/2007		
16	Premier Fine Yarns Pvt Ltd	D30	27/02/2007		
17	Premier Fine Yarns Pvt Ltd	D32	07/03/2007		
18	Premier Fine Yarns Pvt Ltd	D32	07/03/2007		
19	Premier Fine Yarns Pvt Ltd	D33	07/03/2007		
20	Premier Fine Yarns Pvt Ltd	D34	07/03/2007		
21	Coimbatore Twisted (Premier Mills)	D37	14/03/2007	1	0.8
22	Coimbatore Polytex (Premier Mills)	D38	14/03/2007	10	8
23	Coimbatore Polytex (Premier Mills)	D43	21/03/2007		
24	Coimbatore Polytex (Premier Mills)	D43	21/03/2007		
25	Coimbatore Polytex (Premier Mills)	D44	21/03/2007		
26	Coimbatore Polytex (Premier Mills)	D45	21/03/2007		
27	Coimbatore Polytex (Premier Mills)	D68	29/03/2007		
28	Coimbatore Polytex (Premier Mills)	D73	30/03/2007		
29	Coimbatore Polytex (Premier Mills)	D74	30/03/2007		
30	Coimbatore Polytex (Premier Mills)	D75	30/03/2007		
31	Coimbatore Polytex (Premier Mills)	D78	16/04/2007		
	Total			31	24.8

The WTGs referred in the above table have been commissioned during the period of 26/02/2007 to 11/05/2007 as mentioned in the monitoring report^{/3/} and this has been cross verified with the commissioning certificates^{/11/}. The monitoring report for the fourth monitoring period is in compliance with the monitoring plan of the registered VCS PD.

The start date of this monitoring period is 16/11/2011 which is found to be consistent with end date of second monitoring period i.e. 15/11/2011 as mentioned on VCS project webpage. This is checked and confirmed from the VCS website at:

<https://vcsprojectdatabase2.apx.com/myModule/Interactive.asp?Tab=Projects&a=2&i=404&lat=10%2E534736&lon=77%2E422475&bp=1>.

A verification site visit to the project activity has been carried out by members of the verification team during the period from 29/11/2012 to 30/11/2012. The Operation and implementation of the project activity have been checked and the same has been confirmed during the site visit to the project activity. It is also found to be consistent with the registered VCS PD^{/1/}.

The MR^{/3/} has been checked for consistency with the registered VCS PD^{/1/}; and it is found to be consistent. The PP has considered the monitoring parameters in the monitoring report as per the registered monitoring plan^{/1/} and the deviation considered from the previous monitoring period. The recording frequency and completeness of the data for the monitoring period have been checked and it is found to be appropriate as per the registered monitoring plan^{/1/}.

The locations of the monitoring instruments i.e. energy meters have been checked and confirmed during the site visit. The same is found to be appropriate and consistent with the registered VCS PD^{/1/}.

CAR #1 was raised to discuss the following issues:

1. The MR Version 1.0 dated 25-October-2012 submitted by the PP has been prepared using the VCS MR template version 3.0; while the latest version of the MR template on the VCS website is version 3.2. In response, the MR Version 2 dated 10-December-2012 submitted by the PP has been prepared using the VCS MR template version 3.2 available on the VCS website. This is the latest available version on the VCS website. Hence accepted and closed out.
2. In section 1.1 of the MR Version 1.0 dated 25-October-2012, the capacity of the project has been mentioned as 24.8 MW. The capacity of the project as per the VCS PD and the MR for the previous verification period is 36 MW. During the site visit, the verification team was informed by the PP that the WTGs belonging to the investor Bannari Amman Spinning Mills is no longer a part of the project activity. The PP was requested to clarify why this change is not discussed in section 2.2 of the MR. The PP has clarified in section 2.3 of the MR Version 2.0 dated 10-December-2012 that the WTGs (11.2 MW) belonging to the investor Bannari Amman Spinning Mills has been registered as a CDM project activity. This was confirmed from the [UNFCCC website](#). Hence the WTGs belonging to this investor have not been included in this VCS project activity. This approach by the PP is correct. This will ensure that there is no double counting of Emission Reductions. Hence the total capacity of this project activity is reduced to 24.8 MW. This is accepted and closed out.

3. The PP was requested to complete sections 1.4 and 4.4 of the MR Version 1.0 dated 25-October-2012 as per the guidelines mentioned in the VCS MR template version 3.2. The PP has revised sections 1.4 and 4.4 in the MR Version 2.0 dated 10-December-2012. In section 1.4 the PP has mentioned that Enercon India Limited ("EIL") is the project participant for this activity and has been duly authorized by the individual investors to take up the said project activity for VCS development, thus clarifying the roles EIL and the investors. In section 4.4 the PP as included the vintage wise VCUs for the project activity. Hence these sections have now been completed as per the guidelines mentioned in the VCS MR template version 3.2.
4. The project capacity was 36 MW as per registered PD, but due to registration of a subproject under CDM, the capacity was reduced to 24.8 MW. The same was not discussed in section 1.1 of the MR. In response the PP has included the following information in section 1.1 of the MR: "The bundled wind power project was of capacity 36 MW earlier as per the registered PD. The subproject of Bannari Amman Spinning Mills was registered as CDM project on 17-06-2011 (<http://cdm.unfccc.int/Projects/DB/SIRIM1306929016.84/view>). Hence, this subproject has not been monitored. Thus project capacity has been reduced from 36 MW to 24.8 MW after omission of Wind Turbine Generators (WTGs) belonging to the investor Bannari Amman Spinning Mills." This is correct. Hence accepted and closed out.
5. The net electricity supplied to the grid is calculated parameter as per section 3.2, but in section 3.3 it is described as measured parameter. The PP was requested to clarify the same. In response, the PP has revised the information in section 3.3 of the MR to make it consistent with the information in section 3.2, i.e. the net electricity supplied to the grid is a calculated parameter. This has been checked and is accepted. Hence closed out.
6. The submitted documents names (MR and ER sheet) mention the capacity of the project as 36MW. In response, the PP has changed the names of the revised documents and has removed the reference to 36 MW since the capacity of the project now is 24.8 MW. This is appropriate and hence accepted

Thus CAR #1 was **closed** out. For detailed discussions please refer CAR #1 in annex 2 of this report.

CL #2 was raised to discuss the following issues:

1. During the site visit it was observed that the HTSC no. and the corresponding UIN for the WTGs have not been correctly matched in the table in section 1.7 of the MR Version 1.0 dated 25-October-2012. The PP was requested to clarify the same. The PP has revised the table in section 1.7 of the MR Version 2.0 dated 10-December-2012. The HTSC nos. and the UIN for the WTGs have now been correctly matched. This mismatch error has no effect on the project implementation; monitoring or the ER calculations. The correct matching of the HTSC nos. and the UIN was checked through the document obtained at the site from the ENERCON personnel. This document is used by the O&M personnel for daily monitoring and hence is accurate. Hence accepted and closed out.
2. During the site visit it was observed that the meters nos. for HTSC nos. D32, D34, D37 and D44 on the site are inconsistent with the meter nos. mentioned in table in section 3.3 of the MR. The PP was requested to clarify the same. The PP has clarified that the meters associated with the HTSC nos. D32, D34, D37 and D44 have been changed. This meter change was also confirmed during the site visit by interviewing the O&M personnel. The PP has inserted the meter change details in a table in section 3.3 of the MR Version 2.0 dated 10-December-2012. The details have been checked against the meter change certificates reference above and are found to be correct. Hence accepted and closed out.

Thus CL #2 was **closed** out. For detailed discussions please refer CL #2 in annex 2 of this report.

Corresponding to paragraphs 229 to 232 of VVS 3.0^{/15/}, the verification team confirms that the monitoring has been carried out in accordance with the approved methodology ACM0002 version 10, which was applied to the project activity. This is found to be appropriate and it is accepted.

4.1.2 Remaining Issues from Previous Validation or Verification

This is the fourth verification for the project activity. During the current verification assessment of the project activity, project validation report and previous verification reports^{/9/} have been checked and reviewed by the verification team. There are no pending or open issues observed for the project. The monitoring methodology observed to be followed in the current monitoring period is in accordance with the registered monitoring plan^{/1/}.

4.1.3 Compliance of the monitoring plan with the monitoring methodology

The monitoring plan of the registered project is in accordance with the applied methodology ACM0002 version 10^{/2/}.

The project had been registered with the large scale approved baseline and monitoring methodology ACM0002, "Consolidated baseline methodology for grid-connected electricity generation from renewable sources," version 10 valid from 11/06/2009^{/2/}. The monitoring plan implemented for the current verification is in accordance with the registered monitoring plan^{/1/}. The registered monitoring plan has been checked and it is found to be consistent with the requirements of applied monitoring methodology ACM0002 version 10 valid from 11/06/2009^{/2/}. Also the project boundary was found to be consistent with the registered VCS PD^{/1/}. It was checked and confirmed during the site visit that there is no other additional source of GHG emissions which are attributable to the project activity.

This is in line with paragraphs 229 to 232 of VVS 3.0^{/15/}.

4.1.4 Implementation Status of the Monitoring Plan and Completeness of Monitoring

Monitoring of reductions in GHG emissions to result from the project have been implemented in accordance with the monitoring plan contained in the VCS PD. The monitoring mechanism is effective and reliable.

The project activity was registered under VCS 2007.1 with VCS project ID 404^{/9/}. The monitoring report version 01 as well as final monitoring report for the current verification mentions the monitoring period from 16/11/2011 up to 15/09/2012. During the site visit, personnel involved at various levels of operation of the project activity have been interviewed. It has been confirmed that the onsite personnel are conscious of the importance of monitoring related activities. The onsite verification of measurement records also substantiate consistency in recording and reporting of the monitored data.

The following parameters have been verified for current monitoring period:

(1) Net electricity supplied to the grid by the Project, EG_y, net

This parameter is being calculated based on the measured values of export and import at TNEB's meter at respective HTSC^{/6/}. The value of this parameter is being sourced from Statements of electricity generation^{/6/} and it is further crosschecked with invoices^{/5/} raised by individual investors involved in the project activity.

This parameter is being used for the calculation of the emission reductions for the project activity. This is found to be consistent with the monitoring methodology as per registered VCS PD^{/1/}; hence this is accepted. Since TNEB is the third party government agency; this parameter has been considered from the Statements of electricity generation^{/6/} for emission reductions calculations for the project activity. The value of this parameter for the current monitoring period is **42,690.232 MWh**.

(2) Electricity exported to the grid by the project activity in year y, EG_{Export}

This parameter is a measured parameter and the value of this parameter is being used for calculation net electricity supplied to grid by project activity. As per the registered VCS PD, this parameter is being monitored at energy meter located at TNEB's HTSC. Electricity is being measured hourly and same is being recorded monthly. The PP reported electricity exported to the grid by the project activity on monthly basis. This is in line with the applied methodology ACM0002 version 10. Joint Meter Reading is being taken on a monthly basis and it is signed by TNEB's and EIL's. The value of this parameters is directly sourced from Statements of electricity generation^{/6/} and this is further crosschecked with invoices^{/5/} raised by individual investors involved in the project activity. The value of this parameter for the current monitoring period is 42,800.338 MWh.

(3) Electricity imported from the grid, EG_{Import}

This parameter is a measured parameter and the value of this parameter is being used for calculation net electricity supplied to grid by project activity. As per the registered VCS PD, this parameter is being monitored at energy meter located at TNEB's HTSC. Electricity is being measured hourly and same is being recorded monthly. The PP reported electricity imported from the grid by the project activity on monthly basis. This is in line with the applied methodology ACM0002 version 10. Joint Meter Reading is being taken on a monthly basis and it is signed by TNEB's and EIL's. The value of this parameters is directly sourced from Statements of electricity generation^{/6/} and this is further crosschecked with invoices^{/5/} raised by individual investors involved in the project activity. The value of this parameter for the current monitoring period is 110.106 MWh.

4.1.5 Accuracy of Equipment

During the verification assessment of the project activity, accuracy and calibration^{/10/} of all the metering have been checked and found appropriate. The details of monitoring equipments involved in the project activity and their calibration details are mentioned in below table.

Sr. No.	Name of Investors	HTSC No.	Meter No.	Past Calibration	Recent Calibration	Accuracy Class
1	Premier Spg & Wvg Mills Pvt Ltd	D47	04863754	12/10/2010	28/01/2012	0.5s
2	Premier Spg & Wvg Mills Pvt Ltd	D49	04890022	12/10/2010	28/01/2012	0.5s
3	Premier Spg & Wvg Mills Pvt Ltd	D52	TN902732	12/10/2010	09/12/2011	0.2s
4	Premier Spg & Wvg Mills Pvt Ltd	D54	04865534	12/10/2010	28/01/2012	0.5s
5	Premier Spg & Wvg Mills Pvt Ltd	D79	04865507	12/10/2010	28/01/2012	0.5s
6	Premier Spg & Wvg Mills Pvt Ltd	D80	TNB02400	12/10/2010	28/01/2012	0.5s

7	Premier Spg & Wvg Mills Pvt Ltd	D81	04865535	12/10/2010	28/01/2012	0.5s
8	Premier Spg & Wvg Mills Pvt Ltd	D82	04865504	12/10/2010	27/01/2012	0.5s
9	Premier Spg & Wvg Mills Pvt Ltd	D83	04865503	12/10/2010	27/01/2012	0.5s
10	Premier Spg & Wvg Mills Pvt Ltd	D84	04865505	12/10/2010	27/01/2012	0.5s
11	Premier Fine Yarns Pvt Ltd	D26	TN902742	12/10/2010	22/11/2011	0.2s
12	Premier Fine Yarns Pvt Ltd	D27	04865401	12/10/2010	27/01/2012	0.5s
13	Premier Fine Yarns Pvt Ltd	D28	10287910	12/10/2010	27/01/2012	0.5s
14	Premier Fine Yarns Pvt Ltd	D29	HT5100083	12/10/2010	27/01/2012	0.5s
15	Premier Fine Yarns Pvt Ltd	D30	HT5110137	12/10/2010	27/01/2012	0.5s
16	Premier Fine Yarns Pvt Ltd	D30	HT5110137	12/10/2010	27/01/2012	0.5s
17	Premier Fine Yarns Pvt Ltd	D32	04863757	12/10/2010	27/01/2012	0.5s
18	Premier Fine Yarns Pvt Ltd	D32	04863757	12/10/2010	27/01/2012	0.5s
19	Premier Fine Yarns Pvt Ltd	D33	04863762	12/10/2010	27/01/2012	0.5s
20	Premier Fine Yarns Pvt Ltd	D34	04865400	12/10/2010	27/01/2012	0.5s
21	Coimbatore Twisted (Premier Mills)	D37	04863761	18/10/2010	27/01/2012	0.5s
22	Coimbatore Polytex (Premier Mills)	D38	04865383	18/10/2010	27/01/2012	0.5s
23	Coimbatore Polytex (Premier Mills)	D43	04865533	18/10/2010	27/01/2012	0.5s
24	Coimbatore Polytex (Premier Mills)	D43	04865533	18/10/2010	27/01/2012	0.5s
25	Coimbatore Polytex (Premier Mills)	D44	04865526	18/10/2010	27/01/2012	0.5s
26	Coimbatore Polytex (Premier Mills)	D45	04865528	18/10/2010	27/01/2012	0.5s
27	Coimbatore Polytex (Premier Mills)	D68	04865501	18/10/2010	28/01/2012	0.5s
28	Coimbatore Polytex (Premier Mills)	D73	04959599	18/10/2010	28/01/2012	0.5s
29	Coimbatore Polytex (Premier Mills)	D74	04865530	18/10/2010	27/01/2012	0.5s
30	Coimbatore Polytex (Premier Mills)	D75	TN901783	18/10/2010	18/10/2011	0.2s
31	Coimbatore Polytex (Premier Mills)	D78	208320441	18/10/2010	28/01/2012	0.5s

The installation and working condition of the meters were checked during the site visit for the project activity and it was found to be satisfactory. During site visit, it was observed that meters are found to be changed for HTSC Numbers D44; D34; D32 and D37. Meter change for D44 and D34 are outside the current monitoring period while the meter change for D32 and D37 are in the current monitoring period. Appropriateness of the same has been checked and confirmed from documents from TNEB^{/17/} mentioning about meter change details. This is found to be appropriate and it is accepted. It is also evident from the above table that calibrations^{/10/} for all monitoring equipment involved in the project activity are valid for current monitoring

period. A delay in calibration is observed for all customers. Hence for the period of December 2011 to February 2012 considering the annual calibration frequency and maximum permissible error of 0.5% is applied to both electricity exported and imported by the project activity in line with paragraph 4 (a) of EB 52 Annex 60 i.e. Guidelines for assessing compliance with the calibration frequency requirements. Since new meters installed are of better accuracy class 0.2s as compared to the same mentioned in registered VCS PD as 0.5s. During the site visit to the project activity, there are meters involved in the project activity with accuracy classes of 0.2s as well as 0.5s which is found to be consistent with the registered VCS PD^{/1/}. The Gazette of India (Registered NO. DL (N) – 04/0007/2003 – 15) dated 26/07/2010^{/13/} which is a gazette for metering regulations in India clearly mentions that for voltage of 650 V up to 33 kV, 0.5s and better is recommended. Hence, the accuracy classes of 0.5s of energy meters installed at sites are found to be appropriate and it is accepted.

CEA Notification^{/16/} No. 502/70/CEA/DP&D dated 17/03/2006 which is considered as national standard mentions that “All interface meters shall be tested at least once in five years.” Hence, the annual calibration frequency of the meter is appropriate.

As per Para 234 c), VVS, version 3.0^{/15/}, the verification team is able to confirm that the accuracy of equipment used for monitoring is in accordance with the relevant guidance provided by the CDM Executive Board and it is controlled and calibrated in accordance with the monitoring plan;

- (i) Monitoring results are consistently recorded as per approved frequency;
- (ii) Quality assurance and quality control procedures have been applied in accordance with the monitoring plan.

4.1.6 Data from External Sources

Since, the combined margin grid emission factor was calculated based on ex-ante approach indicated by Tool to calculate emission factor of an electricity system, the value of “Operating Margin Emission Factor of Southern Regional Electricity Grid, EFOM,y” will remain ex-ante as 0.998157 tCO₂e/MWh throughout the crediting period and same has been considered from the registered VCS PD^{/1/}. The basis for the same was “CO₂ Baseline Database for Indian Power Sector”, version 4.0 published by the Central Electricity Authority, Ministry of Power, Government of India.

The value of “Build Margin Emission Factor of Southern Regional Electricity Grid, EF_{BM,y}” is 0.7133 tCO₂e/MWh considered from the registered VCS PD^{/1/} and same will remain ex-ante throughout the crediting period. The basis for the same was “CO₂ Baseline Database for Indian Power Sector”, version 4.0^{/8/} published by the Central Electricity Authority, Ministry of Power, Government of India. The “CO₂ Baseline Database for Indian Power Sector” is available at www.cea.nic.in/ressports/planning/cdm_co2/cdm_co2.htm. This is found to be appropriate and it is accepted.

The “Combined Margin Emission Factor of Southern Grid, EFCM, y” has been fixed ex-ante during the validation stage^{/1/} as 0.92694 tCO₂e/MWh and it is applicable for the crediting period considered for the project activity

4.2 Accuracy of GHG Emission Reduction or Removal Calculations

4.2.1 Accuracy of GHG Emission Reductions

The calculation of the emission reductions is found to be correct. The details of the reported and the verified values for all parameters are listed in section 4.2.2 of this report, 'Calculation of Emission Reductions'.

The net electricity supplied to grid by the project activity is used for the emission reduction calculations. The project participant has provided a complete set of data for the specified monitoring period of 16/11/2011 up to 15/09/2012. The values of parameters reported in the ER spreadsheet^{/4/} by the PP and the same were checked and confirmed with the same mentioned in the Statement of Electricity Generation issued by TNEB^{/6/} and invoices raised by the project participant^{/5/}. The values are found to be consistent and accurate.

The formula and method used to calculate the baseline emissions are appropriate. Since the project is a wind power generation project, project emissions and leakage emissions are not involved in the project activity. This is found to be in line with the approved methodology ACM0002 version 10 and as defined in the registered VCS PD^{/1/}.

4.2.2 Calculations of Emission Reductions

Parameter	Reported Value	Verified Value
	MR Version 1	MR Version 2
Net electricity supplied to the grid by the Project, $EG_{y, \text{net}}$ (MWh)	42,690.232	42,690.232
Electricity exported to the grid by the project activity in year y, EG_{Export} (MWh)	42,800.338	42,800.338
Electricity imported from the grid, EG_{Import} (MWh)	110.106	110.106
Combined Margin Emission Factor of Southern Grid, $EF_{\text{CM}, y}$ (tCO ₂ e /MWh)	0.92694	0.92694

Grid emission factor is determined ex-ante and fixed throughout the crediting period.

The emission reduction is calculated as follows:

$$\begin{aligned}
 \text{Baseline emission} &= \text{EGy, net (MWh)} \times \text{EFCM, y (tCO}_2\text{e /MWh)} \\
 &= 42,690.232 \times 0.92694 \\
 &= 39,569 \text{ t CO}_2\text{e}
 \end{aligned}$$

As per methodology, leakage emissions and project emissions are zero.

Thus emission reductions are calculated as follow:

$$\begin{aligned}
 \text{Emission reductions} &= \text{Baseline emissions} - \text{Project emissions} - \text{Leakage emissions} \\
 &= 39,569 - 0 - 0 \\
 &= 39,569 \text{ tCO}_2\text{e}
 \end{aligned}$$

Vintage-wise VERS

Vintage	VERs (tCO ₂ e)
2011 (16/11/2011 to 31/12/2011)	421
2012 (01/01/2012 to 15/09/2012)	39,148
Total	39,569

Note: In the MR Section 5 paragraph (c) the PP has clarified that, the billing cycle is from 15th day of one month to 15th day of next month and title of billing month has been referred as the month where final meter reading have been taken. For example: for month of Dec-11, the billing cycle is from 15-11-2011 to 15-12-2011 and billing month has been mentioned as Dec-2011. The JMR have been checked during the site visit to confirm the same. Further, since the last date of the previous monitoring period is 15/11/2011, hence the start date of the current monitoring period has been mentioned as 16/11/2011.

4.3 Quality of Evidence to Determine GHG Emission Reductions or Removals

Critical parameters used for the determination of the Emission Reductions are discussed in section 4.1.4 above. All the data recorded is in compliance with the monitoring report.

The data pertaining to the parameters mentioned in section 4.2.2 of this report are maintained in the identified records^{/6/, /5/, /7/}. The external sources data have been discussed in section 4.1.6 of this report. All the data is in compliance with the figures stated in the updated monitoring report version 2 dated 10/12/2012^{/3/} and the ER calculation excel spreadsheet^{/4/}.

According to the registered VCS PD, the verification team has checked the Electricity Generation Statements^{/5/} signed by TNEB's and Enercon's officials. The same have being cross checked against the invoices raised to TNEB by individual investors.

The verification team reviewed the comparison of the actual VERs claimed in the monitoring period with the same estimated in the VCS PD; the same has been discussed in section 4.1.1 above.

Corresponding to the paragraph 235 and 236 of VVS version 3.0^{/15/}, it has been ensured that:

1. The data used for the determination of the emission reductions are available and monitored in accordance with the registered monitoring plan.
2. The appropriate methods and formulae for calculating baseline emissions, project emissions and leakage have been properly followed the applied methodology and registered VCS PD;

The emission factor of Southern Regional Grid has been determined ex-ante during validation of the project activity. The same is applied in the current monitoring report and the calculations have been justified.

4.4 Management and Operational System

The company involved in the project has quality assurance system ISO 9001:2008^{/14/} implemented; therefore the assessment team can confirm that the management system the VCS project is in place; with the responsibilities properly identified and in place.

The company involved has assigned personnel with proper roles and responsibilities in the project and the same is as per the registered VCS PD^{/1/}. During the site visit, the roles and responsibility for data monitoring and management have been checked. It was also found during the interview with plant personnel that project has a well defined responsibility matrix and execution system to ensure the quality of VCS monitoring system. The same was found acceptable; therefore the assessment team can affirm that the management system of the VCS project is in place; with the responsibilities properly identified and in place.

In order to verify data quality, the company involved in the project works in accordance with a quality assurance procedure of Standard Operating Procedure which establishes the operational and management structure implemented.

5 VERIFICATION CONCLUSION

The scope of the verification

We, SGS have been engaged by Enercon (India) Limited to certify that the greenhouse gas (GHG) emission reductions reported for the “Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II” for the period from 16/11/2011 up to 15/09/2012 in the monitoring report 03 dated 29/01/2013 are eligible for issuance as Verified Carbon Units.

This engagement covers the verification of emission reductions from anthropogenic sources of greenhouse gases included within the project boundary of the “Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II”, as well as an additional confirmation of the compliance of the VCS PD with the requirements of VCS Standard version 3.3.

Our approach is risk-based, drawing on an understanding of the risks associated with reporting GHG emissions data and the controls in place to mitigate these. Our examination includes assessment, on a test basis, of evidence relevant to the amounts and disclosures in relation to the project's GHG emission reductions for the defined reporting period.

The verification 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.

Conclusions of the verification

(a) SGS is an entity accredited by the United Nations Framework Convention on Climate Change (UNFCCC) to undertake certification and verification services in the sector in which the Project is undertaken. The accreditation is accepted by VCSA as indicated in Clause 5 of VCS Program Guide Version 3.4.

(b) The monitoring report, together with other information examined, was prepared as per the VCS Monitoring Report Template, Version 3.2.

(c) The information in the monitoring report together with other information examined by the assessment team, including all the information necessary to determine that the emission reductions achieved have been determined correctly.

(d) Based on the examination of the monitoring report and other relevant information, the project meets all the requirements of the VCS Standard Version 3.3.

(e) Based on our examination of the monitoring report and other relevant information, the claiming emission reductions during the monitoring period from 16/11/2011 up to 15/09/2012 are verified as 39,569 tonnes CO₂ equivalent.

Liability statement with regards to the accuracy of the verification statement

The management of Enercon (India) Limited is responsible for the preparation of the GHG emissions data and the reported GHG emissions reductions. SGS is responsible for verification and confirming emission estimates for the project, as described in the monitoring report.

Our certification approach draws on an understanding of the risks associated with reporting GHG emissions data and the controls in place to mitigate these. Our examination includes an assessment of evidence, through desk review, and where necessary, interviews, stakeholder discussions and site visits, relevant to certifying the rightfulness of the amounts and disclosures in relation to the Project's GHG emission reductions.

We planned and performed our work to obtain the information and explanations that we considered necessary to provide sufficient evidence for us to give reasonable assurance that the amount of GHG emission reductions for the given period, prepared on the basis of the monitoring report, are fairly stated.

This assessment included:

- Collection of evidence supporting the reported data;
- Checking whether the provisions of the Monitoring Plan in the registered VCS PD, were consistently and appropriately applied;
- Site visit and interview of relevant staff.

We have verified whether the information included in the monitoring report representing the emission reductions achieved has been determined correctly for the given period from the baseline figure.

Certification statements

Based on process and procedures conducted, in our opinion, the monitoring report version 03 dated 29/01/2013 on emission reductions for "Bundled Wind Power Project in Tamil Nadu managed by Enercon India Limited - II" during the reporting period from 16/11/2011 up to 15/09/2012 is materially correct and is a fair representation of the GHG data and information and the emission reductions are fairly stated. All relevant facts have been found correct by our examination. The GHG emission reductions calculation is correct.

Therefore, SGS is able to certify that the project is in full compliance with the VCS Standard Version 3.3, and the quantity of the reported emission reductions during below reporting period are completely, comparably, accurately and correctly reported.

(1) Reporting period: From 16/11/2011 up to 15/09/2012

Verified GHG emission reductions or removals in the above reporting period:

GHG Emission Reductions or Removals	tCO ₂ e
Baseline Emissions	39,569
Project Emissions	0
Leakage	0
Net GHG emission reductions or removals	39,569

Statement of Confidentiality

SGS will hold all information confidential until the client instructs otherwise or until it has been released in accordance with the VCS Standard Version 3.3 requirements.

Signed on behalf of the Verification Body by Authorized Signatory

SGS United Kingdom Limited

Dated: 07/02/2013

07/02/2013

Signature:

Signature:

Kodialbail SR

[Signature]

Lead Assessor

Sudeep Kodialbail

Technical Reviewer

Shivaji Chakraborty

ANNEX 1: DOCUMENT REFERENCES

/1/	Registered VCS PD version 02 dated 08/09/2009
/2/	ACM0002 version 10 valid from 11/06/2009
/3/	Monitoring report /3.1/ Version 1.0 dated 25/10/2012 /3.2/ Version 2.0 dated 10/12/2012 /3.2/ Version 3.0 dated 29/01/2013 (Final)
/4/	Emission Reductions calculation excel sheet
/5/	Invoices for project activity raised by project participant to TNEB for current monitoring period
/6/	Statement of Electricity Generation by TNEB for all WTGs involved in the project activity
/7/	SCADA system reading for project activity and total generation of all wind mills and log book records
/8/	CEA data for emission factor www.cea.nic.in/reports/planning/cdm_co2/cdm_co2.htm
/9/	VCS Project Site: https://vcsprojectdatabase2.apx.com/myModule/Interactive.asp?Tab=Projects&a=2&i=404&lat=10%2E534736&lon=77%2E422475&bp=1 Validation Report dated 10/11/2009 First Verification Report dated 11/01/2010 Second Verification Report dated 19/01/2011 Third Verification Report dated 11/05/2012
/10/	Calibration Certificates for the meters installed at each HTSC
/11/	Commissioning Certificates from Tamil Nadu Electricity Board
/12/	Power Purchase Agreement signed between Entities involved (other investors) and TNEB
/13/	The Gazette of India (Registered NO. DL (N) – 04/0007/2003 – 15) dated 26/07/2010
/14/	ISO 9001: 2008 Certificate (Ref. QS-898HH) dated 08/02/2010
/15/	Validation and Verification Standard, version 3.0
/16/	CEA Notification No. 502/70/CEA/DP&D dated 17/03/2006
/17/	Documents from TNEB mentioning about change in meter including details of old meter, new meter and meter replacement date; • D37 - Ref: EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 37/D.NO.:1776/12, dated 27-11-2012 • D44 - Ref: EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 44/D.NO.:1700/12, dated 31-10-2012 • D34 - Ref: EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 34/D.NO.:1642/12, dated 12-10-2012 • D32 - Ref: EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 32/D.NO.:1221/12, dated 09-07-2012

ANNEX 2: OVERVIEW OF FINDINGS

	CARs	CLs	FARs
Total Number raised	1	1	-

Date:	30/11/2012		Raised by:	Assessment Team	
Type:	CAR	Number:	#1	Reference:	MR
Lead Assessor Comment:				Date: 30/11/2012	
- The MR Version 1.0 dated 25-October-2012 submitted by the PP has been prepared using the VCS MR template version 3.0; while the latest version of the MR template on the VCS website is version 3.2. - In section 1.1 of the MR Version 1.0 dated 25-October-2012, the capacity of the project has been mentioned as 24.8 MW. The capacity of the project as per the VCS PD and the MR for the previous verification period is 36 MW. During the site visit, the verification team was informed by the PP that the WTGs belonging to the investor Bannari Amman Spinning Mills is no longer a part of the project activity. PP is requested to clarify why this change is not discussed in section 2.3 of the MR. - PP is requested to complete sections 1.4 and 4.4 of the MR Version 1.0 dated 25-October-2012 as per the guidelines mentioned in the VCS MR template version 3.2.					
Project Participant Response:				Date: 10/12/2012	
- MR has been revised as per version 3.2. - WTGs belonging to the investor Bannari Amman Spinning Mills is no longer a part of the project activity and the capacity of the project has been reduced to 24.8 MW from 36 MW. This change has been discussed in section 2.3 of the revised MR. - Revised MR has section 1.4 and 4.4 as per VCS MR template version 3.2					
Documentation Provided as Evidence by Project Participant:					
Revised MR (Version 2)					
Information Verified by Lead Assessor:					
The MR version 2 dated 10-December-2012 has been checked for the revisions made by the PP.					
Reasoning for not Acceptance or Acceptance and Close Out:					

1. The MR Version 2 dated 10-December-2012 submitted by the PP has been prepared using the VCS MR template version 3.2 available on the VCS website. This is the latest available version on the VCS website. Hence accepted and closed out. 2. The PP has clarified in section 2.3 of the MR Version 2.0 dated 10-December-2012 that the WTGs (11.2 MW) belonging to the investor Bannari Amman Spinning Mills has been registered as a CDM project activity. This was confirmed from the UNFCCC website. Hence the WTGs belonging to this investor have not been included in this VCS project activity. This approach by the PP is correct. This will ensure that there is no double counting of Emission Reductions. Hence the total capacity of this project activity is reduced to 24.8 MW. This is accepted and closed out. 3. The PP has revised sections 1.4 and 4.4 in the MR Version 2.0 dated 10-December-2012. In section 1.4 the PP has mentioned that Enercon India Limited ("EIL") is the project participant for this activity and has been duly authorized by the individual investors to take up the said project activity for VCS development, thus clarifying the roles EIL and the investors. In section 4.4 the PP has included the vintage wise VCUs for the project activity. Hence these sections have now been completed as per the guidelines mentioned in the VCS MR template version 3.2. Hence closed out. Hence CAR #1 is closed out on 13/12/2012. The following issues were raised as a part of the TR process on 28/01/2013. 1. Project capacity was 36 MW as per registered PDD, due to registration of subproject under CDM, the capacity is reduced (24.8 MW) but the same is not discussed in section 1.1 of the MR. Please clarify. 2. Net electricity supplied to the grid is calculated parameter as per section 3.2, but in section 3.3 it is described as measured parameter. Please clarify. 3. The submitted documents names (MR and ER sheet) mention the capacity of the project as 36MW. Please clarify. Hence CAR #1 open	
Acceptance and Close out by Lead Assessor: Open	Date: 28/01/2013
Project Participant Response:	Date: 29/01/2013
1. The bundled wind power project was of capacity 36 MW earlier as per the registered PD. The subproject of Bannari Amman Spinning Mills was registered as CDM project on 17-06-2011 (http://cdm.unfccc.int/Projects/DB/SIRIM1306929016.84/view). Hence, this subproject has not been monitored. Thus project capacity has been reduced from 36 MW to 24.8 MW after omission of Wind Turbine Generators (WTGs) belonging to the investor Bannari Amman Spinning Mills. This information has been incorporated in section 1.1 of the MR. 2. Net electricity supplied to grid is calculated based on measured values of electricity export and import. Electricity exported and imported by project are measured through meter readings of the two-way export meter installed by TNEB. This information has been rectified in section 3.3 of the MR. 3. Documents name has been changed appropriately.	
Documentation Provided as Evidence by Project Participant:	
Revised MR and excel spreadsheet	
Information Verified by Lead Assessor:	
The revised MR version 3 dated 29/01/2013 has been checked for the changes made by the PP.	
Reasoning for not Acceptance or Acceptance and Close Out:	

1. The PP has revised section 1.1 in the MR to include the information that the Project capacity was 36 MW as per registered PDD, but due to registration of a subproject under CDM, the capacity is reduced to 24.8 MW. This is correct. Hence accepted and closed out.
2. The PP has revised the information in section 3.3 of the MR to make it consistent with the information in section 3.2, i.e. the net electricity supplied to the grid is a calculated parameter. This has been checked and is accepted. Hence closed out.
3. The PP has changed the names of the revised documents and has removed the reference to 36 MW. This is appropriate and hence accepted.
CAR #1 closed out
Acceptance and Close out by Lead Assessor: Closed Date: 29/01/2013

Date:	30/11/2012	Raised by:	Assessment Team		
Type:	CL	Number:	#2	Reference:	MR
Lead Assessor Comment:				Date: 30/11/2012	
1. During the site visit it was observed that the HTSC no. and the corresponding UIN for the WTGs have not been correctly matched in the table in section 1.7 of the MR Version 1.0 dated 25-October-2012. PP is requested to clarify the same.					
2. During the site visit it was observed that the meters nos. for HTSC nos. D32, D34, D37 and D44 on the site are inconsistent with the meter nos. mentioned in table in section 3.3 of the MR. The PP is requested to clarify the same.					
Project Participant Response:				Date: 10/12/2012	
1. The table in section 1.7 of the MR Version 2.0 mentions corrected UIN with HTSC numbers of customers machines.					
2. Meter change reports for HTSC nos. D32, D34, D37 and D44 has been provided to DOE and necessary changes have been made in revised MR.					
Documentation Provided as Evidence by Project Participant:					
Revised MR (Version 2)					
Meter change reports for HTSC nos. D32, D34, D37 and D44					
Information Verified by Lead Assessor:					
The table in section 1.7 of the MR Version 2.0 dated 10-December-2012 was checked for the correct matching of the HTSC nos. and the UIN.					
The Meter change details mentioned in the table in section 3.3 of the MR Version 2.0 dated 10-December-2012 was checked against the following meter change certificates issued by the state utility (Tamil Nadu Generation and Distribution Corporation Ltd.). The details were found to be correct.					
1. HTSC D37 – Ref No. EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 37/D.NO.:1776/12, Dated:27-11-2012					
2. HTSC D44 – Ref No. EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 44/D.NO.:1700/12, Dated:31-10-2012					
3. HTSC D34 – Ref No. EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 34/D.NO.:1642/12, Dated:12-10-2012					
4. HTSC D32 – Ref No. EE/WFP/AEE/MRT/Udt/F.WFSC.NO D 32/D.NO.:1221/12, Dated:09-07-2012					
Reasoning for not Acceptance or Acceptance and Close Out:					

1. The PP has revised the table in section 1.7 of the MR Version 2.0 dated 10-December-2012. The HTSC nos. and the UIN for the WTGs have now been correctly matched. This mismatch error has no effect on the project implementation; monitoring or the ER calculations. The correct matching of the HTSC nos. and the UIN was checked through the document obtained at the site from the ENERCON personnel. This document is used by the O&M personnel for daily monitoring and hence is accurate. Hence accepted and closed out.
2. The PP has clarified that the meters associated with the HTSC nos. D32, D34, D37 and D44 have been changed. This meter change was also confirmed during the site visit by interviewing the O&M personnel. The PP has inserted the meter change details in a table in section 3.3 of the MR Version 2.0 dated 10-December-2012. The details have been checked against the meter change certificates reference above and are found to be correct. Hence accepted and closed out.

Hence CL #2 is closed out.

Acceptance and Close out by Lead Assessor:

Date: 13/12/2012

ANNEX 3: TEAM MEMBERS STATEMENTS OF COMPETENCY

Name: Sudeep
Kodialbail

Status

- Lead Assessor	x	- Expert	x
- Assessor	x	- Financial Expert	
- Local Assessor	India	- Technical Reviewer	

Scopes of Expertise

1. Energy Industries (renewable / non-renewable)

x

Technical Area(s): TA 1.2 Energy generation from renewable energy sources

2. Energy Distribution

Technical Area(s):

3. Energy Demand

Technical Area(s):

4. Manufacturing

Technical Area(s):

5. Chemical Industry

Technical Area(s):

6. Construction

Technical Area(s):

7. Transport

Technical Area(s):

8. Mining/Mineral Production

Technical Area(s):

9. Metal Production

Technical Area(s):

10. Fugitive Emissions from Fuels (solid, oil and gas)

Technical Area(s):

11. Fugitive Emissions from Production and

Consumption of Halocarbons and Sulphur Hexafluoride

Technical Area(s):

12. Solvent Use

Technical Area(s):

13. Waste Handling and Disposal

Technical Area(s):

14. Afforestation and Reforestation

Technical Area(s):

15. Agriculture

Technical Area(s):

Approved Member of Staff by: Siddharth Yadav Date: 06/02/2012

Name: Ravi Kant
Soni

Status

- Lead Assessor	x	- Expert	x
- Assessor	x	- Financial Expert	
- Local Assessor	India	- Technical Reviewer	x

Scopes of Expertise

1. Energy Industries (renewable / non-renewable)	x
Technical Area(s): TA 1.2 Energy generation from renewable energy sources	
2. Energy Distribution	
Technical Area(s):	
3. Energy Demand	
Technical Area(s):	
4. Manufacturing	
Technical Area(s):	
5. Chemical Industry	
Technical Area(s):	
6. Construction	
Technical Area(s):	
7. Transport	
Technical Area(s):	
8. Mining/Mineral Production	
Technical Area(s):	
9. Metal Production	
Technical Area(s):	
10. Fugitive Emissions from Fuels (solid, oil and gas)	
Technical Area(s):	
11. Fugitive Emissions from Production and Consumption of Halocarbons and Sulphur Hexafluoride	
Technical Area(s):	
12. Solvent Use	
Technical Area(s):	
13. Waste Handling and Disposal	
Technical Area(s):	
14. Afforestation and Reforestation	
Technical Area(s):	
15. Agriculture	
Technical Area(s):	

Approved Member of Staff by: Siddharth Yadav Date: 12/10/2012

Name: Shivaji Chakraborty

Status

- Lead Assessor	x	- Expert	x
- Assessor	x	- Financial Expert	
- Local Assessor	India	- Technical Reviewer	x

Scopes of Expertise

1. Energy Industries (renewable / non-renewable)

x

Technical Area(s):

TA 1.1 Thermal energy generation from fossil fuels and biomass including thermal electricity from solar

TA 1.2 Energy generation from renewable energy sources

2. Energy Distribution

x

Technical Area(s): TA 2.1 Electricity distribution

TA 2.2 Heat distribution

3. Energy Demand

x

Technical Area(s): TA 3.1 Energy Demand

4. Manufacturing

Technical Area(s):

5. Chemical Industry

Technical Area(s):

6. Construction

Technical Area(s):

7. Transport

Technical Area(s):

8. Mining/Mineral Production

Technical Area(s):

9. Metal Production

Technical Area(s):

10. Fugitive Emissions from Fuels (solid, oil and gas)

Technical Area(s):

11. Fugitive Emissions from Production and

Consumption of Halocarbons and Sulphur Hexafluoride

Technical Area(s):

12. Solvent Use

Technical Area(s):

13. Waste Handling and Disposal

Technical Area(s):

14. Afforestation and Reforestation

Technical Area(s):

15. Agriculture

Technical Area(s):

Approved Member of Staff by:

Siddharth Yadav

Date:

19/09/2012