



5.0 MW SMALL SCALE WIND BASED POWER GENERATION FOR CAPTIVE USE BY BALKRISHNA INDUSTRIES LIMITED (BIL) IN RAJASTHAN, INDIA

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¹ Worked till 24th May 2025

Summary:

A description of the verification of the project:

TÜV SÜD South Asia Private Limited has been contracted by Balkrishna Industries Limited. the project proponent, to carry out the verification of the project “5.0 MW Small Scale Wind Based Power Generation for Captive Use by Balkrishna Industries Limited (BIL) in Rajasthan, India”. The verification is based on the desk review of the VCS PD, the corresponding validation report /B04/and first verification report/B05/, Monitoring report /01/, supporting emission reduction calculation spread sheets /02/ and other relevant supporting documents made available to the verification team by the project proponent during the onsite audit. This verification involves the period of 01-August-2009 to 27-March-2016 (including both the days). The project “5.0 MW Small Scale Wind Based Power Generation for Captive Use by Balkrishna Industries Limited (BIL) in Rajasthan, India” is a project which employs small scale methodology; AMS-I.D. i.e. Grid connected renewable electricity generation, version 13 /B03/. The project involves utilization of wind power for electricity generation for captive consumption. The wind farm consists of four Suzlon make Wind Turbine Generators (WTGs) of 1250 kW rated capacity each, for a total capacity of 5.0 MW.

The purpose and scope of verification:

The purpose of the verification is to review the monitoring results and verify that monitoring methodology was implemented according to monitoring plan and monitoring data, used to confirm the reductions in anthropogenic emissions by sources is sufficient, definitive and presented in a concise and transparent manner. Monitoring plan, monitoring report and the project’s compliance with relevant VCS, program criteria are verified in order to confirm that the project has been implemented in accordance with previously registered design and conservative assumptions, as documented.

The monitoring period: This verification covers the period of 01-August-2009 to 27-March-2016 (including both the days).

The method and criteria used for verification:

(a) Desk review, involving:

- Review of the data and information presented to verify their completeness
- Review of the monitoring plan and monitoring methodology, paying particular attention to the frequency of measurements, the quality of metering equipment including calibration requirements, and the quality assurance and quality control procedures
- Evaluation of data management and the quality assurance and quality control system in the context of their influence on the generation and reporting of emission reductions

(b) onsite assessment involving:

- Assessment of the implementation and operation of the VCS project activity as per the registered VCS PD
- Review of information flows for generating, aggregating and reporting the monitoring parameters

- Interview with relevant personnel to confirm that the operational and data collection procedures are implemented in accordance with the monitoring plan in the VCS PD
- A cross-check between information provided in the monitoring report and data from other sources such as inventories, purchase records, or similar data sources
- A check of the monitoring equipment including calibration performance and observations of monitoring practices against the requirements of the VCS PD and the applied methodology.
- Review of calculations and assumptions made in determining the GHG data and emission reductions.
- Identification of quality control and quality assurance procedures in place to prevent or identify and correct any errors or omissions in the reported monitoring parameters.

The number of findings raised during verification

A risk-based approach has been followed to perform this verification. During verification, a total of 08 findings were raised, which includes: 02 Corrective Action Request (CAR); 06 Clarification Requests (CLs); and 0 FAR were raised.

All the raised findings were successfully resolved by the PP.

Any uncertainties associated with the verification

The VCS MR /01/, emissions reduction calculations /02/ along with the supporting documents provided are considered to be in line with all the VCS standard requirements. The verification team has detected no further uncertainties or quality restriction.

Summary of the verification conclusion

In TUV SUD opinion, the emission reduction reported for the 5.0 MW Small Scale Wind Based Power Generation for Captive Use by Balkrishna Industries Limited (BIL) in Rajasthan, India in the monitoring report is fairly and correctly stated. TUV SUD therefore, is able to certify that the emission reduction from the “5.0 MW Small Scale Wind Based Power Generation for Captive Use by Balkrishna Industries Limited (BIL) in Rajasthan, India” in India during the period from of 01-August-2009 to 27-March-2016 (including both the days), is amount 37,319 tCO₂e.

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1 INTRODUCTION

1.1 Objective

TÜV SÜD South Asia Private Limited (TUV SUD) has been contracted by Balkrishna Industries Limited (PP), to undertake the verification of the project titled “5.0 MW Small Scale Wind Based Power Generation for Captive Use by Balkrishna Industries Limited (BIL) in Rajasthan, India” in India for the monitoring period 01-August-2009 to 27-March-2016 (including both days).

Through the verification activities, it is to be confirmed that:

The project is implemented as described in the VCS Project Description document /B04/ and monitoring report/01/.

The monitoring system is implemented and fully functional to generate emission reductions without any double counting, and

The data reported are accurate, complete, consistent, transparent and free of material error or omission by checking the monitoring records and the emissions reductions calculation.

The verification followed the requirements of the current version of the VCS Standard Version 4.7 /B01/ and VCS program guide (version 4.4)/B02/ to ensure the quality and consistency of the verification work and the report.

1.2 Scope and Criteria

The verification of this project is based on the registered VCS PD /B04/, the Monitoring Report of this monitoring period /01/, Emission reduction calculation spreadsheets /02/, supporting documents made available to the audit team and information collected through performing onsite audit. Furthermore, publicly available information was considered as far as available and required.

TUV SUD has employed a risk-based approach in the verification, focusing on the identification of significant risks and reliability of project monitoring and generation of emission reductions.

The verification was carried out on basis of the following requirements, applicable for this project activity:

- ✓ VCS Standard (v4.7) /B01/
- ✓ VCS Program Guide (v4.4) /B02/
- ✓ CDM Methodology: AMS-I.D. Grid connected renewable electricity generation, version 13 /B03/

The scope of this verification, by independent checking of objective evidence, is as follows:

- ✓ To verify that the project is implemented as described in the registered VCS PD.
- ✓ To assess the project's compliance with other relevant rules including the host country legislation.
- ✓ To confirm that the monitoring system is implemented and fully functional to generate voluntary emission reductions without any double counting.
- ✓ To establish that the data reported are accurate, complete, consistent, transparent and free of material error or omission by checking the monitoring records and the emissions reduction calculation.
- ✓ To evaluate the GHG emission reduction data and express a conclusion with a reasonable level of assurance about whether the reported GHG emission reduction data is free from material misstatement.
- ✓ To verify that reported GHG emission data is sufficiently supported by evidence.

The verification ensured that the reported emission reductions are complete and accurate to be certified.

The method and criteria used for verification consisted of the following phases:

1. Completeness check and desk review
2. Physical interviews with stakeholders
3. Resolution of outstanding issues and issuance of final verification report and applicable Verification Deeds of Representation.

TUV SUD has conducted all its work under strict rules to safeguard impartiality and ensured the independence of the verification team. The verification team did not provide any consulting or recommendations for the client. However, stated requests for clarifications and/or corrective actions may provide input for improvement of the monitoring activities

1.3 Level of Assurance

The verification report is based on registered VCS PD /B04/, Monitoring report /01/, supporting documents were made available to the verifier and information collected through performing interviews.

The verification has been planned and organized to achieve a:

- ☒ Reasonable level of assurance as per VCS Standard (v4.7) /B01/

☐ Limited level of assurance

The threshold for quantitative materiality with respect to the aggregate of errors, omissions and misrepresentations, relative to the total reported GHG emission reductions and/or removals was limited to five percent, as required by section 4.1.10 of the VCS Standard version 4.7 /B01/.

1.4 Summary Description of the Project

The project employed the CDM small scale methodology “AMS-I.D. Grid connected renewable electricity generation, version 13”/B03/. The project is involved in electricity generation by wind turbines of Suzlon make with rated capacity of 1250 kW each, for total capacity of 5.0 MW. The Project start date was 29 December-2004 (The earliest commissioning of first wind turbine by Suzlon)/04/.

During the monitoring period from 01-August-2009 to 27-March-2016 the project activity achieved a reduction of 37,319 tCO₂e emissions by displacing 41,126 MWh of electricity that would have otherwise been generated from fossil fuel-based sources on the NEWNE grid (now part of the Indian Grid).

The project was commissioned on 29-December-2004 and the start date of the crediting period was 28- March 2006.

The project activity has been implemented as described in the registered VCS PD and the emission reductions are calculated conservatively as per the applied methodology /B03/.

2 VERIFICATION PROCESS

2.1 Method and Criteria

The method and criteria used for verification:

The verification consists of the following three phases:

1. Completeness check and desk review of the validation report, monitoring plan, monitoring report, monitoring methodology, VCS PD and supporting documents (as a part of evidence gathering) and applicable tools in particular attention to the frequency of measurements, quality of metering equipment including calibration requirements, QA/QC procedures and other relevant documents.

2. Onsite interviews (including follow-up interviews with project stakeholders, when deemed necessary). This includes the following:

- ✓ An assignment of implementation and operation of project activity with respect to validated VCS PD.
- ✓ Review of the supporting documents provide by the PP.
- ✓ Review of information flows for generating, aggregating and reporting the monitoring parameters.
- ✓ Interview with relevant personals to determine whether the operational and data collection procedures are implemented and in accordance with the monitoring plan of the validated VCS PD.
- ✓ Cross check of information and data provided in the monitoring report with purchase records or similar data sources.
- ✓ Review of assumptions made in calculating the emission reductions (if any).
- ✓ Implementation of QA/QC procedure in-line with the VCS PD and methodology requirements.

3. Resolution of outstanding issues and the issuance of the final Verification report and as applicable the VCS Verification Deed of Representation.

Milestone description	Time
Sharing of Audit Plan to client	24/09/2024
Date of onsite audit	03/10/2024 to 04/10/2024
Issuance of Draft Verification Report along with List of Findings	15/10/2024
Issue of final report	13/05/2025

2.2 Document Review

During the document review, TUV SUD has applied standard auditing techniques to assess the quality of information provided. The verification was performed primarily based on the review of the monitoring report and the supporting documentation.

This process included:

- ✓ A review of data and information presented by the PP to verify their completeness

- ✓ A review of the MP and monitoring methodology, paying particular attention to the frequency of measurements, the quality of metering equipment including calibration requirements, and the QA/QC procedures, and
- ✓ An evaluation of data management and the QA/QC system in the context of their influence on the generation and reporting of ERs.

The monitoring report (version 1.0 dated 04-June-2024) was initially reviewed, and verification team requested the PP to present the supporting information and documents. The documents were reviewed by verification team.

During the verification process, the revised monitoring report and supporting documents were evaluated to confirm the actions taken by the project participant (PP) in response to the Corrective Action Requests (CARs) and Clarification Requests (CLs) issued by the verification team.

The list of documents referred during the course of this verification has been provided in Appendix-02.

2.3 Interviews

The table below describes the onsite audit process and further identifies personnel, including their roles, who were interviewed and/or provided information additional to that provided in the project description, Monitoring report /01/ and any supporting documents.

S/no.	Date	Name of the person	Organization	Topic discussed and onsite
1.	03-October-2024- 04-October-2024	Dheeraj Soni, Senior Manager	Eco capita	-Brief project description by the PP.
2.		Vinay Kumar Patel, Senior Manager	Suzlon	-Discussion on project Implementation status and Legal requirements.
3.		Imran Zubair, HSE Manager	Suzlon	-Any deviation in the project activity
4.		Pawan Kumar Shekhawat, Dp. manager	Suzlon	-Role and responsibility of the Balkrishna Industries Limited, Suzlon and Eco Capita Consulting Private
5.		Dhannaram Daiya, Manager	Suzlon	

6.		Rahul Parohut, Sr.Manager	BCT	Limited in the project activity.
7.		Surendra P Sing, HT Incharge	SS MADA	-Carbon credit ownership.
8.		Himanshu Solanki, Site Engineer	Balkrishna Industries Limited	-Onsite assessment of wind turbine.
9.		Rajendra Singh Rathore, Driver	Stakeholder	-Substation Visit.
10.		Veer Singh, Vehicle vendor	Stakeholder	-Discussion on Monitoring plan, monitoring process, operational and management structure for monitoring, and responsibility.
11.		Rohit Purohit. Sr. Manager	Eco capita	-Institutional arrangement for data collection and archiving.
12.		Narayan Singh, Admin Staff	Suzlon, Stakeholder	-Implementation of monitoring plan as per the registered PD and MR.
13.		Leelu Singh, Driver	Suzlon, Stakeholder	
14.		Sushil Mishra	Balkrishna Industries Limited	-Testing / Calibration of metering equipment & measurement, monitoring, recording & storage of data and observations of monitoring practices against the requirements of the PD and the methodology AMS ID Version 13 and "Tool to calculate the emission factor for an electricity system".
15.		Sakshi Nehra, Sr. Program Officer	Verra	
16.		Deepshikha Singh, Lead Program Officer	Verra	-Cross check the emission reductions calculation in line with the monitoring procedure mentioned in the MR and registered PD.

				-Crosschecking of generation data for the monitoring period with the SCADA system and Joint Meter Reading (JMR) or Logbook. -Review of data/information flows for generating, aggregating and reporting. -Discussion on QA/QC procedure. -Interview with the stakeholders -Grievance management record -Discussion on United Nations Sustainable Development Goals.
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2.4 Site Visits

An on site assessment visit was conducted during 03-October 2024 to 04-October-2024 for the project activity. The assessment was carried out for the implementation and operation of the project activity as per the registered VCS PD.

- ✓ A review of information aggregating and reporting of the monitoring parameters
- ✓ Interviews with relevant personnel to confirm that the operational and data collection procedures are implemented in accordance with the MP
- ✓ Onsite assessment of wind turbine and cross checking of generation from sub-station.
- ✓ A cross-check between product sales information provided in the MR and data from other sources.
- ✓ A check of the monitoring equipment including calibration performance, and observations of monitoring practices against the requirements of the VCS PD and the applied monitoring methodologies

- ✓ A review of calculations and assumptions made in determining the GHG data and ERs, and
- ✓ An identification of QA/QC procedures in place to prevent, or identify and correct, any errors or omissions in the reported monitoring parameters.

In addition, during the onsite audit the verification team interviewed the PP including other relevant stakeholders and it was confirmed that before the project activity, grid connected power was used which was predominantly fossil fuel based. Thus, the baseline scenario was found in compliance with the requirements of the applied methodology AMS. I. D., Version 13.

2.5 Resolution of Findings

During this verification, TUV SUD has identified issues related to the monitoring, implementation or operation of the VCS project that could impair the capacity of the proposed VCS project to achieve project emission reductions or influence the reporting of emission reductions. Verification team has identified these issues. Refer Appendix 03 of this Verification report.

- ✓ Clarification requests (CLs): Project reporting lacks transparency and further information is needed to determine if a material discrepancy is present.
- ✓ Corrective action requests (CARs): The VVB has identified a material discrepancy or non-conformance that the project proponent must address.

The verification team identified 02 CAR and 06 CLs. All CAR and CLs raised by verification team during this verification have been resolved. There is no outstanding FAR from the validation and 0 FAR is raised in this verification.

2.5.1 Forward Action Requests

Forward Action Request (FAR) is to be raised when the monitoring and reporting require attention and/or adjustment for the next verification period. FARs does not relate to VCS requirements for issuance of ERs achieved during subject monitoring.

The verification team has raised 0 FAR during this verification.

2.6 Eligibility for Validation Activities

The project activity falls under sectoral scope 1 and the TUV SUD is accredited for validation / verification of project activities under this scope.

3 VALIDATION FINDINGS

3.1 Methodology Deviations

There is no methodology deviation identified during the current monitoring period.

3.2 Project Description Deviations

There is no project description deviations deviation identified during the current monitoring period.

3.3 New Project Activity Instances in Grouped Projects

Not applicable as the implemented project activity is not part of the grouped projects.

3.4 Baseline Reassessment

Did the project undergo baseline reassessment during the monitoring period?

☐ Yes ☒ No

4 VERIFICATION FINDINGS

4.1 Project Details

Item	Evidence gathering activities, evidence checked, and assessment conclusion:				
Audit history	Audit type	Period	Program	Validation/verification body name	Number of years
	Validation/verification	18-November 2009	VCS	Perry Johnson Registrars Carbon Emissions Services	1 year
	Monitoring report 1	28-March-2006 to 31-July-2009	VCS	Perry Johnson Registrars Carbon Emissions Services	3 Years and 4 months
	Monitoring report 2	1-August-2009 to 27-	VCS	TUV SUD South Asia Pvt. Ltd.	6 Years and 7 months

		March-2016 ²			
Double counting and participation under other GHG programs	The monitoring system is implemented and fully functional to generate emission reduction without any double counting. A project is not receiving or seeking credit for reductions and removals from a project activity under another GHG program. Through interviews with PP during onsite assessment, the verification team has confirmed that all the project activity has not participated or been rejected under any other GHG Programs and emission allowance trading program including renewable energy certificates (RECs) since validation. The project activity has applied only under VCS for registration and the same has been cross verified by the verification team by exploring /checking/visiting other GHG programs like, GS, CDM, GCC etc. or non-GHG program like REC, iRECs, etc. Furthermore, the PP has provided the declaration on the double counting, which has been checked by the verification team/05/.				
No double claiming with emissions trading programs or binding emission limits	The project activity has applied only under VCS for registration. It has been cross verified by the verification team by exploring / checking/ visiting other GHG programs like, GS, CDM, GCC etc. or non-GHG program like REC, iRECs, etc. So, there would be no double claiming with other emissions trading programs. The Project proponent has also submitted declaration /05/ to confirm that all the project instances have not or shall not claim carbon credits on any other scheme after Registration of the project under VCS. In addition, the verification team also reviewed the local regulation and confirmed that there is no system that creates binding limits on the total GHG emissions or emissions per unit of output or activity from a site, company, sector, or region of this project activity but does not include emissions trading.				
No double claiming with other forms of environmental credit	The project activity has applied only under VCS for registration. It has been cross verified by the verification team by exploring / checking/visiting other GHG programs like, GS, CDM, GCC etc. or non-GHG program like REC, iRECs, etc. So, there would be no double claiming with other forms of environmental credit. The Project proponent has also submitted declaration /05/ to confirm that the				

² Verra Exemption is provided to verify the remaining period under one verification.

	project activity has not or shall not double claiming with any other form of environmental credit under any specific program.
Supply chain (scope 3) emissions double claiming	The project activity does not affect the emission footprint of any product (good or services) that are part of a supply chain.
Sustainable development contributions	The project has implemented the activities that result in the SD contribution describe in the section 1.12 of the monitoring report. PP has targeted the SDG indicator 7.2.1 Renewable energy share in the total final energy consumption as the project activity utilize renewable energy to generate electricity. 8.5 Productive employment and decent work, PP has employed the Manpower for the project activity. The verification team has checked the employment record of the employees and salary slip/06/. 13.0 Tons of greenhouse gas emission avoided or removed. The project activity in the current reporting period has resulted in emission reduction of 37,319 tCO₂e. This has been checked and confirmed by the ER sheet/02/, monitoring report /01/, and supporting documents like monthly electricity generation invoice and Scada reading.
Additional information relevant to the project	After reviewing registered VCS PD & validation report, and MR /01/, the verification team confirms that no commercially sensitive information has been excluded from the public versions of project documents.

4.2 Safeguards and Stakeholder Engagement

4.2.1 Stakeholder Identification

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Stakeholder identification	The stakeholder makeup has not been changed since validation hence, not applicable

Legal or customary tenure/access rights	The stakeholder makeup has not been changed since validation hence, not applicable
Stakeholder diversity and changes over time	The stakeholder makeup has not been changed since validation hence, not applicable
Expected changes in well-being	There is no change in wellbeing and stakeholders' characteristics under the baseline scenario.
Location of stakeholders	The stakeholder makeup has not been changed since validation hence, not applicable. Moreover, verification team has interviewed the stakeholder related operation and grievance.
Location of resources	This project is not resource-based so the stakeholders are not receiving any customary access from the project checked and confirmed by the verification team.

4.2.2 Stakeholder Consultation and Ongoing Communication

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Ongoing consultation	On the basis of reviewing the registered VCD PD & validation report, MR /01/, and interviews with the PP and stakeholders during the audit, it confirms that the project has a stepwise mechanism for the ongoing communication/07/. The operation and management team regularly organized the CSR program for the engage with stakeholders, gather feedback, and addressing grievances (if any). The details of ongoing communication activity are mentioned in the MR /01/ section 2.1.2. The verification team reviewed and verified those during on site and cross-checked with registered VCS PD & MR /01/ and confirms the procedure and method for engagement.
Date(s) of stakeholder consultation	21-August-2009

Communication of monitored results	The PP has established a grievance mechanism and ongoing communication for the stakeholder to raises any concern about potential negative impact of the project during project implementation. PP has kept the feedback register at the project site of the Balkrishna Industries Limited, and also available at the Suzlon site office, a complaint and feedback register are kept for comments of stakeholders and to inform them back for action taken on the comments. Verification team has checked the feedback registered, there is no comments received from the stakeholder/07/.
Consultation records	The verification team confirmed the method for documenting the outcomes of local stakeholders' ongoing consultation and account of all inputs received through reviewing of feedback registered during onsite audit.
Stakeholder input	No negative inputs are received during this and previous monitoring period confirmed by the verification team.

4.2.3 Free, Prior, and Informed Consent

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Consent	As per the monitoring report, there is no consent present in the project activity from IPs, LCs and customary rights holders which has been confirmed by the PP.
Outcome of FPIC discussion	. Based on the interviews with the local stakeholders, it is confirmed that the project activity does not involve any IPs, LCs and Customary Right Holders. Moreover, during the document review of validation and prior verification it was established that the land was leased from RRVNPL (a government body). Therefore, the project activity does not involve any land acquisition or government-imposed relocation, this confirms that the project does not possess any risk of ongoing or unresolved conflicts over property rights, land encroachment or involuntary physical or economic displacement.

4.2.4 Grievance Redress Procedure

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Grievance received and steps taken to resolve the grievance including the outcomes of the resolution	There is no grievance received during this monitoring period which has been checked and confirmed at onsite visit.
Grievance redress procedure	On the basis of site assessment, reviewing of registered VCS PD, MR /01/ the verification team confirms on the grievance redressal procedure and method for documenting, acknowledge, investigate and address the grievance and account of all grievance received reported in the MR /01/. During onsite audit, the verification team confirms that no grievances were made during this monitoring period. Hence the verification team deemed the grievance redressal procedure including the grievance record to be appropriate.

4.2.5 Public Comments

Comments received	Actions taken by the project proponent	Evidence gathering activities, evidence checked, and assessment conclusion
NA	NA	No public comments were received for this project activity during this monitoring period.

4.2.6 Risks to Local Stakeholders and the Environment

4.2.6.1 Management Experience

In the section 2.2.1 of the monitoring report PP shows that Balakrishna Industries Limited (BIL) leads the project with operational management is provided by Suzlon, ensuring effective execution and strong community engagement. At the time of onsite visit, the verification team interviewed and checked documents of the Suzlon entities to confirm the operational management. This can be concluded that Balakrishna Industries Limited (BIL), in collaboration with Suzlon as O&M agency are managing the project very well. Suzlon's experience in renewable energy, with over 20.9 GW of wind energy installations across 17 countries, enhances the project's value. The leadership team, with many years of experience, provides strong guidance. Both companies are dedicated to environmental protection and community development through their CSR activities. Given these factors, both the entities. demonstrated the capacity to meet the project's goals efficiently,

4.2.6.2 Risk Assessment

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Natural and human induced risks to stakeholders' wellbeing	No natural or human-induced risks identified to stakeholders' well-being, as the project experienced no harm from floods, earthquakes, storms, or other harmful activities.
Risks to stakeholder participation	No risk was identified to stakeholder participation as verified during onsite audit & interviewed with PP and stakeholder, review of the registered VCS PD /B04/ and MR /01/. There is no trade-off or any negative impact to their livelihood, land, food, etc.
Working conditions	No risk was identified to stakeholder participation as verified during onsite audit & interviewed with PP and stakeholder, review of the registered VCS PD /B04/ and MR /01/. The PP has employed all their staff in compliance with per national Labor Law and company policy /08/.
Safety of women and girls	No risk was identified to stakeholder participation as verified during onsite audit & interviewed with PP and stakeholder, review of the registered VCS PD /B04/ and MR /01/. The PP has employed all their staff in compliance with per national Labor Law and company policy /08/.

Safety of minority and marginalized groups, including children	No risk was identified to stakeholder participation as verified during onsite audit & interviewed with PP and stakeholder, review of the registered VCS PD /B04/ and MR /01/. The PP has employed all their staff in compliance with per national Labor Law and company policy /08/.
Pollutants (air, noise, discharges to water, generation and release of hazardous materials and chemical pesticides and fertilizers	No risk was identified to stakeholder participation as verified during onsite audit & interviewed with PP and stakeholder, review of the registered VCS PD /B04/ and MR /01/. As this to renewable energy which does not cause any air, noise, discharge of water, generation of waste, release of hazardous materials/09/.

4.2.7 Respect for Human Rights and Equity

4.2.7.1 Labor and Work

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Discrimination	On the basis of review of the registered VCS PD /B04/ and MR /01/, onsite audit interview and observation, there is no discrimination in terms of gender and races.
Sexual harassment	On the basis of review of the registered VCS PD /B04/ and MR /01/, onsite audit interview and observation, the verification team found no discrimination and sexual harassment. The PP also have company policy /08/ which indicated clearly that they have no tolerance for any discrimination and sexual harassment.
Gender equity in labor and work	On the basis of review of the registered VCS PD and MR, onsite audit interview and observation, the verification team found the PP has providing an equal opportunity to both men and women in work which has been checked through the employment record /06/.
Forced labor	The project does not involve any forced labour, the exploitation of human trafficking or the utilization of forced and child labour. PP has

	company policies to make sure work in places. Verification team has confirmed with PP and company policy /08/.
Child labor	The project does not involve any child labour, the exploitation of human trafficking or the utilization of forced and child labour. PP has company policies to make sure work in places. Verification team has confirmed with PP and company policy /08/.
Human trafficking	The project does not involve any child labour, the exploitation of human trafficking or the utilization of forced and child labour. PP has company policies to make sure work in places. Verification team has confirmed with PP and company policy /08/.

4.2.7.2 Human Rights

Risks identified	Evidence gathering activities, evidence checked, and assessment conclusion
No risk Identified	PP and it's O&M partner has well established HR policy which includes Human Rights. During the document review the verification team cross checked the relevant documents and confirmed that there is no human right violation.

4.2.7.3 Indigenous Peoples and Cultural Heritage

Risks identified	Evidence gathering activities, evidence checked, and assessment conclusion
No risk Identified	PP has confirmed that project activity has no adverse impact on indigenous peoples or cultural heritage within the project area. All operations are conducted with respect for local traditions and cultural values. Same has been checked and confirmed during onsite visit and interview.

4.2.7.4 Property Rights

Risks identified	Evidence gathering activities, evidence checked, and assessment conclusion
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No risk Identified	PP has confirmed that the project remains steadfast in its commitment to protecting and preserving the property rights of stakeholders, IPs, LCs, and customary rights holders. Same has been checked and confirmed by the verification team during desk review and onsite visit.
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4.2.7.5 Benefit Sharing

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Summary of the benefit sharing plan	PP has confirmed that there is no benefit-sharing agreement in the project activity. Hence, this section is not applicable
Benefit sharing during the monitoring period	This section is not applicable

4.2.8 Ecosystem Health

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Impacts on biodiversity and ecosystems	No risk identified. verification team confirms that the project has effectively prioritized biodiversity protection, particularly in relation to its renewable energy operations. The implemented measures, including bird-detecting sensors on wind turbines, bird guards, diverters, and insulation on powerlines, significantly contribute to minimizing potential negative impacts on local wildlife. The project's commitment to sustainability is demonstrated through its proactive approach to mitigate risks such as bird collisions and electrocution, ensuring that environmental protection remains at the forefront of its operational strategy. Based on the monitoring data and the ongoing efforts outlined in this report, it is clear that the project is on track to meet its biodiversity conservation objectives while continuing to generate renewable energy benefits.

Soil degradation and soil erosion	No risk identified The project activity is renewable energy project so there is no harm or degradation of soil. Same has been checked and confirmed by the verification team.
Water consumption and stress	Verification team confirms that the project has been developed with careful planning and consideration, ensuring minimal environmental impact. Specifically, there is no indication of significant water consumption or stress, as the project has been designed to avoid such concerns.

4.2.8.1 Rare, Threatened, and Endangered species

Item	Evidence gathering activities, evidence checked, and assessment conclusion
Species or habitat	The project activity has not adversely impacted habitats for rare, threatened, or endangered species during the monitoring period.
Areas needed for habitat connectivity	The Project activity has not adversely impacted areas needed for habitat connectivity during the monitoring period.

	Evidence gathering activities, evidence checked, and assessment conclusion
Habitats for rare, threatened, and endangered species	Not Applicable
Areas for habitat connectivity	Not Applicable

4.2.8.2 Introduction of Species

Species introduced	Evidence gathering activities, evidence checked, and assessment conclusion
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Not applicable	Not applicable as this is a renewable energy project.
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Existing invasive species	Evidence gathering activities, evidence checked, and assessment conclusion
Not applicable	Not applicable as this is a renewable energy project.

Evidence gathering activities, evidence checked, and assessment conclusion	
Invasive species	Not applicable as this is a renewable energy project.

4.2.8.3 Ecosystem conversion

Item	Evidence gathering activities and evidence checked
Ecosystem conversion	This section is not applicable because this project is related to renewable energy.

4.3 Accuracy of Reduction and Removal Calculations

The equations and choices provided in the applied methodology AMS ID version 13 and all other methodological tools are correctly quoted in the MR /01/. The emission reductions of the project activity are calculated using the formulae mentioned in the applied methodology; AMS-I.D. Grid connected renewable electricity generation (version 13)/B03/. The verification team has reviewed the emission reduction spread sheets (ER sheets) and checked all the formulae and found they are correct and are in accordance with the monitoring plan of the PD and the applied monitoring methodology. According to applied methodology AMS-I.D. Grid connected renewable electricity generation (version 13) /B03/ the baseline, project and leakage emissions are calculated as below:

The baseline emissions are calculated as follows:

$$BE_y = EG_y * EF_{Grid, CM, y}$$

Where:

$$EF_{Grid, CM, y} = (EF_{Grid, OM, y} * WOM) + (EF_{Grid, BM, y} * WBM),$$

Where,

$EF_{Grid,CM,y}$ = Combined Margin emission factor of NEWNE Grid, 0.9075 tCO₂/MWh

$EF_{Grid,OM,y}$ = Simple Operating Margin emission factor of NEWNE Grid, 1.01 tCO₂/MWh

$EF_{Grid,BM,y}$ = Build Margin emission factor of NEWNE Grid, 0.60 tCO₂/MWh

w_{OM} = Operating Margin weighting factor for wind power projects, 0.75

w_{BM} = Build Margin weighting factor for wind power projects, 0.25

The GHG emissions in the baseline scenario is given below:

Year	Baseline emissions (tCO ₂ e)
01-Aug-2009 to 31-Dec-2009	2,774
01-Jan-2010 to 31-Dec-2010	5,539
01-Jan-2011 to 31-Dec-2011	6,194
01-Jan-2012 to 31-Dec-2012	6,165
01-Jan-2013 to 31-Dec-2013	5,997
01-Jan-2014 to 31-Dec-2014	5,982
01-Jan-2015 to 31-Dec-2015	3,969
01-Jan-2016 to 27-Mar-2016	699
Total	37,319

Project emissions:

The project activity uses wind power to generate electricity and hence the emissions from the project activity are taken as zero.

$$PE_y = 0 \text{ tCO}_2\text{e}$$

Leakage:

Leakage emissions on account of the project activity is considered as zero as neither the wind energy generators are transferred from another activity, nor any existing equipment of the project site would be transferred from the project site in accordance with the applied methodology.

$$LE_y = 0 \text{ tCO}_2\text{e}$$

Emission reduction:

$$ER_y = BE_y - PE_y - LE_y$$

Where:

ER_y = Emission reductions in year y (t CO₂e)

BE_y = Baseline emissions in year y (t CO₂e)

PE_y = Project emissions in year y (t CO₂e)

LE_y = Leakage emissions in year y (t CO₂e)

The verification team has checked and confirmed the calculations in the spreadsheet and found to be correct. The monitoring report is supported by Microsoft excel based spreadsheet for the calculation of emission reductions/02/ The consistency and formula were verified and found to be accurate. After the closure of all the CARs and CLs raised, the verification team confirms that the GHG emission reductions for the project activity have been quantified correctly in accordance with the project description and the applied methodology AMS-I.D. Grid connected renewable electricity generation - Version 13.0.

The verification team has checked and confirmed the calculation in the spreadsheet and found to be accurate. The monitoring report is supported by emission reduction spreadsheet. The consistency and formula were verified and found to be accurate.

The total emission reductions calculated for this monitoring period (01-August-2009 to 27-March-2016) are 37,319 tCO₂e.

Table1: Parameter Determined and fixed during validation for ex-ante:

Parameter	Unit	Value	Assessment
$EF_{Grid,BM,y}$ Build Margin Emission Factor of NEWNE Grid	tCO ₂ e/MWh	0.60	Verification team has checked the registered PDD, found to be complied with the registered PDD.
$EF_{Grid,OMy}$ Operating Margin Emission Factor of NEWNE Grid	tCO ₂ e/MWh	1.01	Verification team has checked the registered PDD, found to be complied with the registered PDD.
$EF_{Grid,CM,y}$ Combined Margin emission factor of NEWNE Grid	tCO ₂ e/MWh	0.9075	Verification team has checked the registered PDD, found to be complied with the registered PDD.
W_{BM} Weighting of Build Margin emission factor for wind power generation project activities	%	25	Verification team has checked the registered PDD, found to be complied with the registered PDD.

W_{OM} Weighting of Operating Margin emission factor for wind power generation project activities	%	75	Verification team has checked the registered PDD, found to be complied with the registered PDD.
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The spread sheet submitted by the PP clearly and transparently mentioned the value of data parameters used for calculation of emission reductions, the input values been verified from the reliable and authentic source including monitoring record and applied methodology.

The details of monitoring parameters used for calculation of emission reduction are provided below:

Monitoring parameter requirement	Assessment/observation by the VVB		
Data / Parameter	Net annual electricity supplied to the grid by the project. EG _y Unit- MWh		
Measuring frequency / time interval	The meter readings at the Metering Point are conducted monthly by representatives from the State Grid/RVNL, along with representatives from M/s Suzlon Energy Limited and/or the designated contractor responsible for the Operation & Maintenance of the WTGs. Verification team has checked the registered PD, found to be complied with the registered PD.		
Reporting frequency	Verification of the power export and import quantities is included in the Monthly Report submitted by M/s Suzlon Energy Limited (SEL), based on the Joint Meter Reading conducted with RVNL. Verification team has checked the registered PD, found to be complied with the registered PD.		
Reported value	Year	Net annual electricity supplied to the grid by the project EG _y (MWh)	
	01-Aug-2009 to 31-Dec-2009	3056.80	

	01-Jan-2010 to 31-Dec-2010	6104.23
	01-Jan-2011 to 31-Dec-2011	6825.68
	01-Jan-2012 to 31-Dec-2012	6793.67
	01-Jan-2013 to 31-Dec-2013	6609.03
	01-Jan-2014 to 31-Dec-2014	6591.80
	01-Jan-2015 to 31-Dec-2015	4374.05
	01-Jan-2016 to 27-Mar-2016	770.98
Verification team has checked the monitoring report, ER sheet with monthly invoice found to be correct. During the monitoring period from 01 August 2009 to 27 March 2016, the project activity reduced 37,319 tCO₂e by displacing 41,140 MWh of electricity that would have otherwise been generated from fossil fuel-based power plants in the NEWNE grid (now referred to as the Indian Grid).		
Is measuring and reporting frequency in accordance with the monitoring plan and monitoring methodology? (Yes/No)	Yes.	
Details of monitoring equipment	Net electricity supplied to the grid was calculated and cross checked by invoice raised on JVVNL by the project proponent and the readings available from the check meter available at the site. This based on the difference between measured values of “export” and “import” on the RVPNL meter. The procedure for the metering and meter reading will be as per the provisions followed by the RVPNL. The joint reading is taken by representative of the project proponent, or the operation & maintenance contractor employed by the project proponent on one hand and RVPNL officials on the other. On the basis of these readings, the annual electricity supplied to the grid will be calculated. Verification team has checked with registered PD, found to be complied.	

	The detail of the meter is provided in the appendix 04. There is delay in the meter calibration which is found by the verification team. The results of delayed calibration reveals that the delayed calibration does not show any errors in the measuring equipment and is within the maximum permissible error limit (accuracy class) of 0.2%. Hence, in accordance with guidelines under Appendix-Calibration” of VVS for CDM PoA (version 03.0) /B06/, the electricity export and import data have been adjusted by applying maximum permissible error of 0.2% (as provided by the equipment supplier) to calculate the net exported electricity and the emission reductions accrued by the project activity. The maximum permissible error of 0.2% as provided by the equipment supplier was applied as the error identified in the delayed calibration is smaller than the maximum permissible error. The same is in accordance with the guideline provided under Appendix-Calibration” of VVS for CDM PoA (version 03.0) /B06/. The delay error factor of 0.2% has been applied from periods 01-August-09 to 31-December-09 and 01-January-10 to 30-April-10 due to unavailability of calibration report. Additionally, delays in calibration led to the application of the emission factor for the periods 01-March-12 to 31-March-12, 01-December-13 to 31-December-13, 01-January-14 to 31-January-14, and 01-January-16 to 27-March-16. as being a conservative approach, Verification team deems this approach adopted by PP to address the issue of delayed calibration acceptable. The same has been checked in ER sheet/02/ found to be correct.
How were the value in the monitoring report verified?	The values in the monitoring report were verified through joint meter readings by RVPNL and the O&M contractor, cross-referenced with SCADA data and logbooks. RVPNL's monthly reports and the apportionment method outlined in the VCS PDD were used to confirm power generation. Verification team has checked the registered PDD, found to be complied with the registered PDD.

Does the data management (from data generation to emission reduction calculation) ensure correct transfer of data and reporting of data and reporting of emission reduction and are necessary QA/QC processes in place?	The quantity of net electricity supplied can be cross- verified from the invoice raised on RVPNL by the project proponent and the readings available from the check meter available at site. The meters will be calibrated once a year. Verification team has checked the registered PDD, found to be complied with the registered PDD. Verification team has also verified the quantity of net electricity through the supplied JMR and invoice and found it accurate. The calibration certificate has also been checked during the site visit. Moreover, Project proponent adopted the robust approach to operations and maintenance (O&M), underscoring its commitment to ensuring the optimal performance of the Wind Turbine Generator (WTG) systems. The comprehensive O&M contract with the service provider sets clear expectations for maintaining a 95% annual uptime, which is supported by advanced diagnostic methods such as optic fiber technology and physical on-site inspections. The proactive and thorough diagnostic and repair process ensures that any failures are promptly addressed, with rigorous testing and verification of repairs before returning the WTG to operational status. These practices not only enhance system reliability and minimize downtime but also reflect the project's dedication to maintaining high operational standards. Through these measures, the project continues to support the efficient generation of renewable energy while ensuring the long-term sustainability of the wind farm.
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4.4 Quality of Evidence to Determine Reductions and Removals

When verifying the report emission reduction, verification team ensured that there was a clear audit trail that contained the evidence and records that validate the stated figures. All source documents that form the basis for assumptions and other information underlying the GHG data are shown above. When assessing the audit trails, verification team also examined:

- Whether sufficient evidence was available, both in terms of frequency and in covering the full monitoring period
- The source and nature of the evidence

- If comparable information was available from sources other than that used in the monitoring report

Verification team cross-checked the monitoring report against the other sources to confirm that the stated figures were correct. Verification team also assessed that the data collection system met the requirements of the monitoring plan as per the applied methodology. Proper data management inclusive of data acquisition and aggregation, data management system is being followed for the project activity. The monitoring personnel at site are well trained and follow reproducible routines. Thus, they are competent to carry out the relevant tasks with sufficient accuracy.

4.5 Non-Permanence Risk Analysis

The project activity was operational during the complete monitoring period. Hence there is no further requirement for the non-performance analysis rating during the monitoring period of the project activity.

5 VERIFICATION OPINION

5.1 Verification Summary

TÜV SÜD South Asia Pvt. Ltd. performed the 2nd emission reduction verification of the registered VCS project activity “5.0 MW Small Scale Wind Based Power Generation for Captive Use by Balkrishna Industries Limited (BIL) in Rajasthan, India” having VCS ID; 267. The scope of the activities covers the verification and certification of GHG emissions reductions reported in latest monitoring report /01/. This report summarizes the findings of the verification of the project, performed on the basis of VCS criteria, as well as criteria given to provide for consistent project operations, monitoring and reporting.

The project activity falls under the project activity which involves the generation of electricity from wind farm consisting of four Suzlon make Wind Turbine Generators (WTGs) of 1250 kW rated capacity each, for a total capacity of 5.0 MW which would have otherwise been generated by fossil based thermal power plants. The verification process was performed on the basis of all guidance and criteria as provided in VCS Standard version 4.7 /B01/, VCS Program Guide version 4.4 /B02/, VCS Validation and Verification Manual version 3.2 /B07/ and Registration & Issuance Process version 4.4./B08/

The monitoring system was installed, maintained in a proper manner, while collected monitoring data allowed for the verification of the amount of achieved GHG emission reductions. Through the review and onsite audit, the verification team confirms that the project activity has resulted in emission reductions of 37,319 tCO₂e during this monitoring period.

Monitoring period 01-August-2009 to 27-March-2016 (both days included) as per MR /01/.

5.2 Verification Conclusion

TUV SUD as a VVB is able to issue a positive verification opinion expressed in the attached Certification statement. And as the result of verification of the project activity of this grouped project, the verifier confirms that the GHG emission reductions are calculated without material misstatements in a conservative and appropriate manner. TUV SUD herewith confirm that the project has achieved emissions reductions in the below mentioned reporting period as follows. The project complies with the verification criteria for projects and their GHG emissions reductions or removal set out in VCS criteria. Verified GHG emission reductions and removals in the verification period as follow:

Verification period: From 01-August-2009 to 27-March-2016

Verified GHG emission reductions and carbon dioxide removals in the above verification period:

Vintage period	Baseline emissions (tCO ₂ e)	Project emissions (tCO ₂ e)	Leakage emissions (tCO ₂ e)	Reduction VCUs (tCO ₂ e)	Removal VCUs (tCO ₂ e)	Total VCUs (tCO ₂ e)
01-Aug-2009 to 31-Dec-2009	2,774	0	0	2,774		2,774
01-Jan-2010 to 31-Dec-2010	5,539	0	0	5,539		5,539
01-Jan-2011 to 31-Dec-2011	6,194	0	0	6,194		6,194
01-Jan - 2012 to 31-Dec-2012	6,165	0	0	6,165		6,165
01-Jan - 2013 to 31-Dec-2013	5,997	0	0	5,997		5,997
01-Jan-2014 to 31-Dec-2014	5,982	0	0	5,982		5,982
01- Jan - 2015 to 31-Dec-2015	3,969	0	0	3,969		3,969
01-Jan - 2016 to 27-Mar-2016	699	0	0	699		699
Total	37,319			37,319		37,319

5.3 Ex-ante vs Ex-post ERR Comparison

Vintage period	Ex-ante estimated reductions/removals	Achieved reductions/removals	Percent difference	Explanation for the difference
01-Aug-2009 to 31-Dec-2009	3,378	2,774	-17.88	Due to the variability in the Plant Load Factor
01-Jan-2010 to 31-Dec-2010	8,059	5,539	-31.27	Due to the variability in the Plant Load Factor
01-Jan-2011 to 31-Dec-2011	8,059	6,194	-23.14	Due to the variability in the Plant Load Factor
01-Jan-2012 to 31-Dec-2012	8,059	6,165	-23.50	Due to the variability in the Plant Load Factor
01-Jan-2013 to 31-Dec-2013	8,059	5,997	-25.59	Due to the variability in the Plant Load Factor
01-Jan-2014 to 31-Dec-2014	8,059	5,982	-25.77	Due to the variability in the Plant Load Factor
01-Jan-2015 to 31-Dec-2015	8,059	3,969	-50.75	Due to the variability in the Plant Load Factor
01-Jan-2016 to 27-Mar-2016	1,920	699	-65.59	Due to the variability in the Plant Load Factor
Total	53,652	37,319		

APPENDIX 1: COMMERCIALLY SENSITIVE INFORMATION

Not Applicable.

APPENDIX 2: <DOCUMENTS REVIEWED FOR VERIFICATION>

S. No.	Reference Documents
/01/	Monitoring report dated 04-June-2024. Version 01
/02/	ER calculation sheet
/03/	Technical Specification of wind turbine
/04/	WTGs commissioning certificate
/05/	Declaration on no double counting
/06/	Employment record and salary slip
/07/	Grievance procedure and record
/08/	Organization policy document specific to safety procedure, gender equality, labour and work
/09/	Procedure and records related to hazardous waste management
/10/	QA/QC Procedure during WTG Breakdown
/11/	Monitoring procedure and roles and responsibilities of the Balkrishna, eco and Suzlon
/12/	Training manual, plan & records
/13/	Monthly report Break up sheets
/14/	Calibration Reports for energy meters

/15/	Invoices raised on JVVNL by the BKT
/16/	Wheel and banking agreement (W&BA)
/17/	Monthly generation record - JMR reports
/18/	Clarification received from Verra for monitoring period
/19/	Contract of Verification with TUV SUD South Asia
/20/	Carbon Ownership supportive
/21/	O&M Contracts
/22/	WTG Breakdown Details
/B01/	VCS Standard version 4.7
/B02/	VCS Program Guide 4.4
/B03/	AMS-I.D. Grid connected renewable electricity generation, version 13
/B04/	Registered PDD of Balkrishna Industries & Validation Report
/B05/	Monitoring Report of the first verification & Verification report of the first verification
/B06/	VVS for CDM Project activity (version 03.0)
/B07/	VCS Validation and Verification Manual version 3.2
/B08/	Registration & Issuance Process version 4.6.

APPENDIX 3: <FINDING LOG>

CL ID	01	Section no.	1.6 of MR	Date: 15/10/2024
Description of CL				
The start date of the project activity mentioned in the section 1.6 of the MR is not consistent with the commissioning certificate and defined in the registered VCS PD.				
Project proponent response				Date: 27/12/2024
Now the start date of the project activity is corrected. As per the VCS Standard 2007.1, referenced during the project's validation, it is stated that the earliest Project Crediting Period Start Date for non-AFOLU projects shall be 28 March 2006. Accordingly, this date was selected as the project's start date.				
Documentation provided by project proponent.				
1. Revised Monitoring Report Version 1.0 2. VCS standard 2007.1				
VVB assessment				Date: 09/01/2025
PP has corrected the start date of the project activity as per the registered project description. Hence this finding has been closed.				

CL ID	02	Section no.	3.1 of MR	Date: 15/10/2024
Description of CL				
The referred version of CEA's CO2 emissions data base is not traceable in the MR.				
Project proponent response				Date: 27/12/2024
Now the version number of CEA's CO2 emissions data is included throughout the MR.				
Documentation provided by Project proponent				
1. Revised Monitoring Report Version 1.0				
VVB assessment				Date: 09/01/2025

PP has updated the version number of CEA's CO2 emissions data in the monitoring report, hence this finding has been closed.

CL ID	03	Section no.	3.3 of MR	Date: 15/10/2024
Description of CL				
1. During on-site assessment audit, it is found that the turbine no J280 is non operative or under breakdown. PP is requested to provide the breakdown details of all 4 nos. of WTGs during the current MP. Moreover, PP is also requested to clarify what QA/QC procedure is followed to evade such situation including a brief description of necessary steps or procedure taken during breakdown to make the WTG available on time. 2. PP is requested to provide documentary evidence to support the claim of SDG 8. 3. In section 3.3 under paragraph Frequency of Monitoring of the MR, PP has mentioned the O&M contractor is appointed for 5 years. PP needs to provide O& M contract for the current monitoring period for the assessment. 4. Under 2nd paragraph in uncertainties and reliability of section 3.3 of the MR, PP has mentioned "O&M contractor will take all necessary steps to make the WTG available". PP is requested to provide details procedure or steps with credible evidence to support the statement. 5. Under the paragraph roles and responsibilities in section 3.3 of MR it is mentioned that annual internal audits are being conducted to verify the data for emission reduction. PP is requested to provide documentary evidence to support the statement. 6. During site visit it is observed that the energy meter numbers mentioned in the calibration report of FY 2012-13 is inconsistent with the JMR and subsequent calibration reports. PP is requested to clarify. 7. The energy meter calibration reports are not available for the year of 2008-09. PP is requested to provide necessary documents to assess and verify the calibration details of the energy meters for the said monitoring period. 8. During generation verification from JMR and Invoices following inconsistencies are observed: a. JMR for September 2011 is not available. b. Backup meter JMR for Dec 2012 and December 2013 are not available. c. JMR for both main and backup meter for January 2013 is not signed by the JVVNL representative. d. JMR for both main and backup meter are not available for June and November 2014. e. There is an inconsistency in the export data mentioned in Invoice raised by Balkrishna Industries to discom and the breakup sheet for the month of September 2013. 9. PP has applied an apportioning factor to calculate the generation from 01/03/2016 to 27/03/2016. During review of the formula, it is observed that the controller date i.e. generation data available at 690V is considered to calculate the factor. However, the monthly invoices are generated from the meter reading done at 33KV side. PP is requested to clarify how comparison between 690V data and 33KV data are comparable while calculating the apportion factor.				
Project proponent response				Date: 27/12/2024

1. Details of the breakdowns for all four WTGs, including Turbine No. J280, during the current monitoring period have been provided. Additionally, a description of the QA/QC procedures implemented to prevent such situations has been included.
2. Documentary evidence supporting the claim of SDG 8 has been provided to address the finding.
3. The O&M contract for the current monitoring period has been provided for assessment as requested.
4. The O&M team has provided the following procedure for addressing WTG failures:
In the event of a WTG failure, the O&M team diagnoses the issue to identify the root cause within the system. Necessary repairs, including component replacements or adjustments, are carried out. Post-repair, the WTG undergoes testing and functional checks to ensure proper operation before being restored to operational mode for optimal performance. This systematic approach ensures the reliability and availability of the WTGs.
5. The reference to "annual internal audits" in Section 3.3 of the Monitoring Report indicates that the internal team of Balkrishna reviews the Breakup of Net Export data provided in the sheet by Suzlon. This process is a data verification activity and does not imply a formal or regular audit.
6. The inconsistency in energy meter numbers is due to a typographical error in the calibration report. The calibration entity incorrectly recorded the serial numbers as RJU000327 and TJU000956, whereas the correct numbers, as per the JMR report, are RJU00327 and TJU00956. The additional "0" in the calibration report serial numbers is a clerical error and does not affect the validity of the data.
7. The calibration reports for the year 2008-09 are not available. However, the O&M team has confirmed that the calibration was conducted during this period, although the report is not currently accessible.
8. Following JMR sheets are now provided -
 - a) The JMR for September 2011..
 - b) Backup meter JMRs for December 2012 and December 2013.
 - c) JMRs for both the main and backup meters for June and November 2014

The JMR for January 2013 was not signed by the JVVNL representative but was signed by two other representatives. As per the procedure, the backup sheet and invoice were prepared based on the JMR, ensuring its authenticity and no impact on the project activity.

The inconsistency in export data between the invoice and the breakup sheet for September 2013 is a typographical error. The net export values in both documents are identical, demonstrating that the breakup sheet data for export and import is accurate. The discrepancy in the invoice is merely a typo and does not affect the overall data consistency.

9. Now calculation of the apportioning factor includes a line loss of 4.6%, applied to the generation data at 690V to account for transmission to 33KV. This ensures that the generation data at 690V aligns proportionally with the readings at 33KV

Documentation provided by Project proponent

Monitoring report

VVB assessment

Date: 09/01/2025

PP shall specify under which section of MR the QA/QC procedure is included. Moreover, reference PDF file provided for the O&M breakdown procedure is not the correct one. Hence this CL is open.

The line loss 4.6%-line loss is not traceable in the document. PP shall clarify the same. Hence this finding has open.

Project proponent response

Date: 10/01/2025

The QA/QC procedure has now been included in the Monitoring Plan section of the Monitoring Report. Additionally, the QA/QC procedure response provided by the O&M team has already been submitted for review.

The 4.6%-line loss has now been explicitly mentioned in the Monitoring Report for clarity.

Documentation provided by Project proponent

Monitoring report

VVB assessment

Date: 20/01/2025

1. PP has provided the breakdown details of all 4 WTG and also mentioned the QA/QC procedure in detail in the monitoring report. Hence this CL is closed.
2. PP has provided the supporting evidence for the SDG 8 as detail employment record. Hence this finding has closed.
3. PP has provided the O&M contract of the current monitoring period; hence this finding has been closed.
4. PP has provided the stepwise details for the procedure for addressing WTG failures in the monitoring report, hence this finding has been closed.
5. PP has mentioned the refence of the audit in the section 3.3 of the monitoring report. Which is checked and confirmed by the verification team. Hence this finding has been closed.
6. PP has provided the clarification that there was inconsistency a typographic error on the report, verification team has checked the provided report and now the report is correct. Hence this finding has been closed.
7. PP has not provided the calibration record; However, the error factor has been applied during that period in the ER sheet. Which has been checked and confirm by the verification team. Hence this finding has been closed.
8. PP has provided the JMR of September 2011, backup meter JMR of 2012 and 2013, JMR of both backup meter of June and November 2014. The justification provided by the PP is acceptable. Hence this finding has been closed.
9. PP has now added the line loss clearly in the monitoring report, hence this finding has been closed.

CL ID	04	Section no.	1.12 of MR	Date: 15/10/2024
Description of CAR				
Under section 1.12 of MR adequate information regarding SDG 8 has not been provided. PP shall provide the total amount of employment generated along with the supportive evidence to justify the same.				
Project proponent response				Date: 27/12/2024
The required information regarding SDG 8 has been added under Section 1.12 of the Monitoring Report.				
Documentation provided by Project proponent				
Monitoring report				
VVB assessment				Date: 09/01/2025
PP has provided the details of SDG 8 in monitoring report and evidence for the same. Hence this finding has been closed.				

CL ID	05	Section no.	1.3 of MR	Date: 15/10/2024
Description of CAR				
The project is under verification and in section 1.3.2 under “Respect of Human Rights and Equity” contains future tense. PP is requested to rectify the grammatical errors. .				
Project proponent response				Date: 27/12/2024
The grammatical errors in Section under “Respect of Human Rights and Equity” have been reviewed and corrected.				
Documentation provided by Project proponent				
Monitoring report				
VVB assessment				Date: 09/01/2025
The inconsistency has been corrected in the monitoring report; hence this finding has been closed.				

CL ID	06	Section no.	Supporting documents / Declaration on double counting	Date: 15/10/2024
Description of CAR				
it is observed that in the declaration provided for double counting of carbon credits, it is mentioned that “Non Annex”, which seems to be erroneous. PP is requested to rectify the same.				
Project proponent response				Date: 27/12/2024

The double counting declaration has been revised to correct the error, and the updated declaration has been provided.	
Documentation provided by Project proponent	
Declaration document	
VVB assessment	Date: 09/01/2025
PP has provided the double counting declaration, which has been checked and confirmed by the verification team. Hence, this finding has been closed.	

Corrective Action Request from verification

CAR ID	01	Section no.	MR	Date: 15/10/2024
Description of CAR				
It is observed that the MR does not include Appendix 1, as per MR template. PP shall include the appendix 1 in the MR.				
Project proponent response				Date: 27/12/2024
Appendix 1 has been included in the Monitoring Report as per the MR template.				
Documentation provided by Project proponent				
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VVB assessment				Date: 09/01/2025
PP has updated the monitoring report, hence this finding has been closed.				

CAR ID	02	Section no.	4.1 of MR	Date: 15/10/2024
Description of CAR				
The table mentioned in section 4.1 of the MR does not include the quantity of GHG emissions in the baseline scenario. PP is requested to rectify the same.				
Project proponent response				Date: 27/12/2024
The table in Section 5.1 of the Monitoring Report has been updated to include the quantity of GHG emissions in the baseline scenario.				
Documentation provided by Project proponent				
--				
VVB assessment				Date: 09/01/2025

PP has provided the quantity of GHG emissions of baseline scenario in the monitoring report, hence this finding has been closed.

APPENDIX 4: < ENERGY METERS AND THEIR CALIBRATION DATES>

T/F01				T/F02				T/F03				Delay	Delayed Period
Main		Backup		Main		Backup		Main		Backup			
RJB00316		RJB00317		TNU00956		RJU00327		TNU00957		RJB00318			
Accuracy Class – 0.2s		Accuracy Class – 0.2s		Accuracy Class – 0.2s		Accuracy Class – 0.2s		Accuracy Class – 0.2s		Accuracy Class – 0.2s			
Calibration Date	Due Date	Calibration Date	Due Date	Calibration Date	Due Date	Calibration Date	Due Date	Calibration Date	Due Date	Calibration Date	Due Date		
20-Apr-2010	19-Apr-2011	20-Apr-2010	19-Apr-2011	21-Apr-2010	20-Apr-2011	21-Apr-2010	20-Apr-2011	21-Apr-2010	20-Apr-2011	21-Apr-2010	20-Apr-2011		
11-Mar-2011	10-Mar-2012	11-Mar-2011	10-Mar-2012	11-Mar-2011	10-Mar-2012	11-Mar-2011	10-Mar-2012	11-Mar-2011	10-Mar-2012	11-Mar-2011	10-Mar-2012	NO	
14-Mar-2012	13-Mar-2013	14-Mar-2012	13-Mar-2013	14-Mar-2012	13-Mar-2013	14-Mar-2012	13-Mar-2013	14-Mar-2012	13-Mar-2013	14-Mar-2012	13-Mar-2013	Yes	Mar-12
14-Dec-2012	13-Dec-2013	14-Dec-2012	13-Dec-2013	14-Dec-2012	13-Dec-2013	14-Dec-2012	13-Dec-2013	14-Dec-2012	13-Dec-2013	14-Dec-2012	13-Dec-2013	NO	
20-Jan-2014	19-Jan-2015	20-Jan-2014	19-Jan-2015	19-Jan-2014	18-Jan-2015	19-Jan-2014	18-Jan-2015	19-Jan-2014	18-Jan-2015	20-Jan-2014	19-Jan-2015	Yes	Dec 13, Jan 14
16-Jan-2015	15-Jan-2016	16-Jan-2015	15-Jan-2016	16-Jan-2015	15-Jan-2016	16-Jan-2015	15-Jan-2016	15-Jan-2015	14-Jan-2016	15-Jan-2015	14-Jan-2016	No	
15-Apr-2016	14-Apr-2017	15-Apr-2016	14-Apr-2017	15-Apr-2016	14-Apr-2017	15-Apr-2016	14-Apr-2017	15-Apr-2016	14-Apr-2017	15-Apr-2016	14-Apr-2017	Yes	Jan 16, Feb 16, March 16, Apr 16

APPENDIX 5: <COMPETENCY CERTIFICATE>

CERTIFICATE

CERTIFICATO

証明書

CERTIFICADO

CERTIFICATE

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CERTIFICATE OF APPOINTMENT

Mr. Rishi Raychoudhury fulfills the requirements of the Environment and Energy Certification Body of TÜV SÜD South Asia Pvt Ltd to participate in audits.

Qualification Details

Standard	Sectoral Scope	Technical Area	Technical Area Description	Role
CDM/GCC/A6.4*	SS1, SS3	1.2, 3.1	1.2 Renewables 3.1 Energy Demand	VAL/VER/ATL/TR /TE / SDG_E
GS	GS4GG, Energy and Waste, Land use and Forest		1.2 Renewables 3.1 Energy Demand	VAL/VER/ATL/TR /TE
VCS		1, 3	1 Energy Industries (renewables), 3 Energy Demand	VAL/VER/ATL/TR /TE
ISO 14064-1		13	13 General	VAL/VER/ATL/TR /TE
ISO 14064-2		1, 3	1 Energy Industries (renewables), 3 Energy Demand	VAL/VER/ATL/TR /TE
PAS 2060			Carbon Neutrality	VAL/VER/ATL

*The appointment under A6.4 is on a provisional basis and will be continued based on successful performance during the monitoring of the first project.

Country Expertise: India

Certificate Number: CB-IND-CCP-0046/005

Issued on: 01-08-2025

Valid until: 17-07-2026

Version	Date	Reason for Revision
01	19-07-2024	Initial appointment
02	24-07-2024	Added GS scheme
03	04-10-2024	Added PAS 2060
04	10-06-2025	A6.4 scheme and SDG_E role have been added
04.1	18-07-2025	Renewal
05	01-08-2025	SDG_E role has been added

Legend:
VAL - Validator, VER - Verifier, ATL - Audit Team Leader, TR - Technical Reviewer, TE - Technical Expert, FE - Financial Expert, CE - Country Expert, EE - Environment Expert, SE - Social Expert
CDM - Clean Development Mechanism, VCS - Verified Carbon Standard, GS4GG / GS - Gold Standard for Global Goals, GCC - Global Carbon Council, PPRS - Plastic Pollution Reduction Standard, VP - VERRA Plastic, A6.4 - Article 6.4, SDG_E - SDG Expert

This appointment is bound by internal requirements of the Certification Body 'Environment and Energy' of TÜV SÜD South Asia Pvt Ltd. In case of loss of validity of this certificate as per result of an assessment according to internal procedures or due to any other reason, it will be properly communicated to you.

Pritya Suman

Issued By
Quality Manager

EnE-CB-CMS-POG-01/05, 08/20-02-2025

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CERTIFICATE OF APPOINTMENT

Ms. Sumbul Rizwan fulfills the requirements of the Environment and Energy Certification Body of TÜV SÜD South Asia Pvt Ltd to participate in audits.

Qualification Details

Standard	Sectoral Scope	Technical Area	Technical Area Description	Role
CDM/ GS4GG / GCC/A6.4*	SS1, SS3	1.2 3.1	1.2_Renewables 3.1_Energy Demand	VAL/VER/SDG_E
VCS	-	1, 3	1_Energy industries (renewable) 3_Energy Demand	VAL/VER
PPRS	-	-	Handling Plastic Waste	VAL/VER
VERRA Plastic	-	-	Handling Plastic Waste	VAL/VER

*The appointment under A6.4 is on a provisional basis and will be continued based on successful performance during the monitoring of the first project

Country Expertise: India

Certificate Number: CB-IND-CCP-0038/006

Issued on: 10-06-2025

Valid until: 11-05-2026

Version	Date	Reason for Revision
01	20-05-2024	Initial appointment
02	26-06-2024	Added T.A. 3.1 for CDM
03	17-10-2024	Added VCS scheme
04	26-11-2024	Added plastic schemes and formatting changes in the table above
05	12-05-2025	Added GCC Scheme and renewal
06	10-06-2025	A6.4 scheme has been added

Legend:

VAL - Validator, VER - Verifier, ATL - Audit Team Leader, TR - Technical Reviewer, TE - Technical Expert, FE - Financial Expert, CE - Country Expert, EE - Environment Expert, SE - Social Expert
CDM - Clean Development Mechanism, VCS - Verified Carbon Standard, GS4GG / GS - Gold Standard for Global Goals, GCC - Global Carbon Council, PPRS - Plastic Pollution Reduction Standard, VP - VERRA Plastic, A6.4 - Article 6.4, SDG_E - SDG Expert

This appointment is bound by internal requirements of the Certification Body 'Environment and Energy' of TÜV SÜD South Asia Pvt Ltd. In case of loss of validity of this certificate as per result of an assessment according to internal procedures or due to any other reason, it will be properly communicated to you.

Pritya Suman

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Quality Manager

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CERTIFICATE OF APPOINTMENT

Ms. Priyanka Mukherjee fulfills the requirements of the Certification Body 'Environment and Energy' of TUV SUD South Asia Pvt Ltd to participate in audits.

Qualification Details

Standard	Sectoral Scope	Technical Area	Technical Area Description	Role
CDM/GCC	SS1, SS3, SS13	1.2, 3.1, 13.1	1.2 Renewables 3.1 Energy Demand 13.1 Solid waste and wastewater	VAL/VER VAL/VER VAL/VER
GS	GS4GG Energy & Waste	1.2, 3.1, 13.1	1.2 Renewables 3.1 Energy Demand 13.1 Solid waste and wastewater	VAL/VER VAL/VER VAL/VER
VCS	-	1, 3, 13	1_Energy Industries (renewables) 3_Energy Demand 13_Waste Handling and Disposal	VAL/VER VAL/VER VAL/VER

Country Expertise: India

Certificate Number: CB-IND-CCP-0044/001

Issued on: 30/07/2024

Valid until: 29/07/2025

Version	Date	Reason for Revision
01	30/07/2024	Initial appointment

Legend:
VAL - Validator, VER - Verifier, ATL - Audit Team Leader, TR - Technical Reviewer, TE - Technical Expert, FE - Financial Expert, CE - Country Expert, EE - Environment Expert, SE - Social Expert
CDM - Clean Development Mechanism, VCS - Verified Carbon Standard, GS4GG - Gold Standard for Global Goals, GCC - Global Carbon Council, PPRPS - Plastic Pollution Reduction Standard

This appointment is bound by internal requirements of the Certification Body 'Environment and Energy' of TUV SUD South Asia Pvt Ltd. In case of loss of validity of this certificate as per result of an assessment according to internal procedures or due to any other reason, it will be properly communicated to you.

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CERTIFICATE OF APPOINTMENT

Mr. Vishwa Munjal fulfills the requirements of the Certification Body 'Environment and Energy' of TÜV SÜD South Asia Pvt Ltd to participate in audits.

Qualification Details

Standard	Sectoral Scope	Technical Area	Technical Area Description	Role
PPRS	Handling of Plastic Waste	-	-	VAL/VER
VP	Handling of Plastic Waste	-	-	VAL/VER/TE

Country Expertise: India

Certificate Number: CB-IND-CCP-0039/03

Issued on: 28/05/2025

Valid until: 27/05/2026

Version	Date	Reason for Revision
01	28/05/2024	Initial qualification
02	01/04/2025	VERRA Plastic was added
03	28/05/2025	Renewal of certificate

Legend:

VAL - Validator, VER - Verifier, ATL - Audit Team Leader, TR - Technical Reviewer, TE - Technical Expert, FE - Financial Expert, CE - Country Expert, EE - Environment Expert, SE - Social Expert, CDM - Clean Development Mechanism, VCS - Verified Carbon Standard, GS4GG / GS - Gold Standard for Global Goals, GCC - Global Carbon Council, PPR* - Plastic Pollution Reduction Standard, VP - VERRA Plastic, A6.4 - Article 6.4, SDG_E - SDG Expert

This appointment is bound by internal requirements of the Certification Body 'Environment and Energy' of TÜV SÜD South Asia Pvt Ltd. In case of loss of validity of this certificate as per result of an assessment according to internal procedures or due to any other reason, it will be properly communicated to you.

Pritya Suman

Issued By
Quality Manager

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CERTIFICATE OF APPOINTMENT

Mr. Sanjay Patankar fulfills the requirements of the Environment and Energy Certification Body of TÜV SÜD South Asia Pvt Ltd to participate in audits.

Qualification Details

Standard	Sectoral Scope	Technical Area	Technical Area Description	Role
CDM/GCC/A6.4*	SS1, SS3	1.1,1.2,3.1	1.1 _Thermal Energy Generation, 1.2 _Renewables, 3.1 _Energy Demand,	TR and TE
VCS	SS1, SS3	1, 3	1_Energy (renewable/non-renewable), 3_ Energy demand	TR and TE
ISO 14064-1	1, 2	-	1_Power Generation and Electric Power Transactions, 2_General Manufacturing (physical or chemical or transformation of materials or substance into new products	TR and TE
ISO 14064-2	1,3	-	1_Energy industries (renewable/non renewable sources), 3_Energy dem	TR and TE

**The appointment under A6.4 is on a provisional basis and will be continued based on successful performance during the monitoring of the first project.*

Country Expertise: India

Certificate Number: CB-IND-CCP-0025/005

Issued on: 01/08/2025

Valid until: 31/07/2026

Version	Date	Reason for Revision
01	02/08/2023	Initial appointment
02	20/05/2024	VCS scopes added explicitly
03	02/08/2024	Renewal
04	10/06/2025	A6.4 scheme has been added
05	01/08/2025	Renewal

Legend:

VAL - Validator, VER - Verifier, ATL - Audit Team Leader, TR - Technical Reviewer, TE - Technical Expert, FE - Financial Expert, CE - Country Expert, EE - Environment Expert, SE - Social Expert
CDM - Clean Development Mechanism, VCS - Verified Carbon Standard, GS4GG / GS - Gold Standard for Global Goals, GCC - Global Carbon Council, PPRS - Plastic Pollution Reduction Standard, VP - VERRA Plastic, A6.4 - Article 6.4, SDG_E - SDG Expert

This appointment is bound by internal requirements of the Certification Body 'Environment and Energy' of TÜV SÜD South Asia Pvt Ltd. In case of loss of validity of this certificate as per result of an assessment according to internal procedures or due to any other reason, it will be properly communicated to you.

Pritya Suman

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Quality Manager

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