VERRA REVIEW FINDINGS REPORT

This report includes findings identified during Verra's post-registration review of the below-mentioned project. The review was conducted pursuant to Section 6 of the *VCS Registration and Issuance Process*.

The VVB must:

1. Address the findings and provide responses in this report for Verra's review.
2. Attach supporting documentation as needed.

Confidential information may be provided as separate attachments and should be clearly designated as such.

This report may be shared with the relevant accreditation body.

Project and Relevant Assessment(s)	2372, Installation of high efficiency wood burning cookstoves in Malawi - Project 2 VCS Verification Report Issued on 17/02/2022 for MP01: 05/07/2020 – 15/04/2021 VCS Verification Report Issued on 20/01/2023 for MP03: 16/10/2021 – 28/02/2022 VCS Verification Report Issued on 01/05/2023 for MP04: 01/03/2022 – 15/09/2022 VCS Verification Report Issued on 11/08/2023 for MP05: 16/09/2022 – 28/02/2023
Verra Program(s)	Verified Carbon Standard (VCS) Program
VVB	Carbon Check Pvt Ltd.
Lead Contact	Vikash Kumar Singh
Contact Information	info@carboncheck.co.in projects@carboncheck.co.in
References	*VCS Standard, v4.7; VCS Program Guide, v3.7;* ISO 14064

Date of First Issue	29 July 2024
Due Date for Responses	16th August 2024

Review Conclusion	Closed
Date of Final Issue	15 October 2024

FINDINGS

Finding 1 - Lack of clarity on the determination of $B_{y=1,new,i,j,survey}$, (Annual quantity of woody biomass used by improved cookstoves in tonnes per device of type i and batch j) and accuracy of the value applied.

Issues

1. The on-ground monitoring raw data has not been cross-checked to verify the value of $B_{y=1,new,i,j,survey}$ against on-ground monitoring raw data, which is necessary to confirm the absence of data inaccuracies and inconsistencies.
2. According to the registered project description (PD) and monitoring report (MR), the parameter '$B_{y=1,new,i,j,survey}$', is determined *ex-post* after one year of stove operation and fixed for the rest of the crediting period. However, the monitoring report(s) does not transparently outline the process and methods used to determine this value
3. The MR and verification report (VR) do not provide information about whether the survey conducted meets the statistical requirements of 90/10 or 95/10 confidence and precision, and whether it is representative of different types of cookstoves distributed/strata, as per the Standard for Sampling and surveys for CDM project activities and programmes of activities.
4. Section 4.2 & 4.3 of the MR states that this parameter was determined through sample survey based on questionnaires or interviews. However, the VVB has not assessed whether the monitoring procedures applied align with VMR006, v1.1 and how the conditions specified under '$B_{y=1,new,i,j,survey}$' parameter table (refer page 17-18 of VMR0006, v1.1) were satisfied.

Action Required

1. The VVB must cross-check the value used in emission reductions and removals (ERR) calculations with the on-ground monitoring raw data to confirm the accuracy of the value.
2. The VVB must assess how the $B_{y=1,new,i,j,survey}$ value applied for monitoring period(s) is accurate, consistent and credible for monitoring period(s) under review.
3. The VVB must assess whether the survey, process and methods to determine $B_{y=1,new,i,j,survey}$ for new instances added in the monitoring period are transparent and align with VMR0006, v1.1 and the latest version of the CDM Standard for sampling and surveys for CDM project activities and programme of activities.
4. The VVB must use objective evidence to independently assess information provided by the project proponent related to the value applied and ensure that the monitoring report and verification report are updated to include this evidence and assessment.

Program Rule(s)

VCS Standard v4.7, section 3.16.1 -3.16.5.

Background

Refer Annexure I

VVB Response

1. In response to the finding raised by VERRA, PP has shared a presentation (Confidential - VVB Technical Review Pre-Read (29 July 2024).pdf) /24-1 Appendix 1.1 of VR/ with the VVB which states that incorrect MRV data was shared with VVB and VEERA during the initial verification/issuance process. It also states that certain inputs from originally created data were found to be materially different from the MRV submitted data for issuance of VCUs.

   The presentation states that the original MRV survey data were collected correctly using a cloud-based SAS program called Open Data Kit ("ODK"). In the ODK platform, field data are uploaded and stored in the cloud, providing a clear audit trail of data.

   The authenticity of the new value (0.83147 tonnes/device/year) for parameter $B_{y=1,new,i,j,survey}$ as against the earlier value of 1.3359 tonnes/device/year has been affirmed by PP through a duly signed letter (dated 01/10/2024) /18/ from their attorney which states, "Based on our investigation and review of the analysis conducted by C-Quest for the purposes of the Section 6.1 process, we have conveyed to the Authorities that the by.new data reflected in the Spreadsheets represents accurate updated by.new data." Furthermore, the same letter has been accepted by VERRA (e-mail /19 Appendix 1.1 of VR / dated: 02/10/2024), affirming the authenticity of the new revised values for parameter $B_{y=1,new,i,j,survey}$.

   The VVB has reviewed all the above-mentioned documents and considers that the new and revised value of the parameter $B_{y=1,new,i,j,survey}$ is lower than the value reported in the earlier submitted MR and FVR. The lower value leads to a conservative calculation of emission reduction generated by the grouped project and is deemed acceptable to the VVB.

2. The monitoring report has been revised by the PP (refer section 4.2), and transparently outlines the process and methods used to determine this value the parameter '$B_{y=1,new,i,j,survey}$'.

3. The revised MR (refer section 4.3) and VR (in section 4.4) clearly describes the sampling approach and the confidence and precision level applied for determination of sample size. In the referred section of FVR, VVB has assessed that the survey conducted meets the statistical requirements of 90/10 confidence and also complied with the requirements of the applied methodology VMR0006 (V1.1).
4. Assessment of Monitoring parameters (namely By=1,new,i,j,survey) which was based on measurement campaign (and not solely based on questionnaires or interviews), was conducted based on following two methods:

- Confirmation with the household/end user whether or not the PP has performed monitoring/measurement campaign (or parameter By=1,new,i,j,survey)

- Assessment of Competence of personnel involved in conducting standardized tests viz., By=1,new,i,j,survey and surveys: Verification team has reviewed the abilities, qualifications and recognition of involved personnel and institutions of the measuring team involved in the By=1,new,i,j,survey. The verification team based on interviews confirms that the team was qualified to carry out the By=1,new,i,j,survey in line with the methodology.
  Hence monitoring procedures applied align with VMR0006, v1.1 and the registered PD. Refer section 4.4 of the updated VR.

Verra Response

The VVB has reviewed the documentation and submissions from the PP on the monitoring tests undertaken to determine the '$B_{y=1,new,i,j,survey}$' during the first monitoring period. The VVB acknowledges that at the time of the verification, there was material information, which was not made available to the VVB, that had an impact on the overall emission reductions by the project for the monitoring period for MP01: 05/07/2020 – 15/04/2021, MP03: 16/10/2021 – 28/02/2022, MP04: 01/03/2022 – 15/09/2022 and MP05: 16/09/2022 – 28/02/2023.

The VVB has reviewed the material information presented by the PP including a duly signed letter (dated 01/10/2024) from their attorneys who acted as counsel to the PP in an investigation of matters related to the misstatement of carbon credits in projects C-Quest submitted to Verra. The letter states that, *"Based on our investigation and review of the analysis conducted by C-Quest for the purposes of the Section 6.1 process, we have conveyed to the Authorities that the by.new data reflected in the Spreadsheets represents accurate updated by.new data."* Based on the new information, the $B_{y=1,new,i,j\ survey}$ value has been updated, and it is conservative as compared to the value applied in calculation of emission reductions claimed for the project. The verifying VVB for Monitoring Period 1 has also reviewed the revised data and confirmed that the updated value of 0.83147 tonnes/device/year xxx is conservative and appropriate as compared to the value ORIGINALLY applied to the project.

Since the value is determined during the first verification and fixed for the entire crediting period, the verifying VVB of MP1 has applied the updated value and fixed it for the entire crediting period i.e. 05/07/2020 to 04/07/2030 (10 years fixed).

The VVB for the current MP has also checked the same data and confirmed it to be correct. VVB has confirmed that the monitoring survey adheres to robust statistical analysis and is conservatively established.

Based on the VVB assessment, the monitoring report and verification report have been revised, and the ERR adjusted to reflect the correct amount due for the monitoring period(s) under review. The issue is closed.

Finding 2 – Determination of the proportion of installed cookstoves operating within the period not transparent

Issues

1. The proportion of operational cookstoves within the monitoring period(s) is reported to be 100% This is likely unrealistic, given the minimal probability of 100% stove operation without breakages and abandonment over their lifetime. The project documentation does not transparently provide the measures put in place for on-time stove maintenance support for repairs and replacement.
2. The verification report does not provide a sufficiently detailed assessment of how the proportion of operational cookstoves was verified with cross-checking of on-ground monitoring raw data.
3. The monitoring report(s) does not provide sufficient information on how the samples for determining stoves in operation were selected and the sampling process used.

Action Required

1. The VVB must assess and confirm the completeness, conservativeness and accuracy of the corrective MRV practices and sampling procedures related to determining the proportion of operational cookstoves within the monitoring period(s) under review.
2. The VVB must cross-check the value(s) used in ERR calculations with the on-ground monitoring raw data, project database, sales record and maintenance/repair logbook to confirm the accuracy and consistency of the value.
3. The VVB must use objective evidence to independently assess information provided by the project proponent related to the value applied, and ensure that the monitoring report and verification report are updated to include this corrective method, evidence and assessment.

Program Rule(s)

VCS Standard, v4.7, Sections 3.16.3 - 3.16.5

Background

Refer Annexure I

VVB Response

1. In response to the finding raised by VERRA, PP has shared a presentation (Confidential - VVB Technical Review Pre-Read (29 July 2024).pdf) /24-1 Appendix 1.1 of VR / with the VVB which states that an overestimated operational fraction data was shared with VVB and VERRA during the initial verification/issuance process. It also states the design of sampling (during the original sampling process) was done in way, to deliberately inflate operational fraction value.
   To address the issue of overestimated operational fraction data, PP has applied a value of 87.10% for the stove operating faction considering an annual compounding loss rate of 10%/Stoves in Operation of 87.10%. The revised value of stove operating faction is based on the independent review and analysis reports of the values provided stove operating faction used for ICS projects under different GHG program as detailed on page 13 of the presentation (Confidential - VVB Technical Review Pre-Read (29 July 2024).pdf) /24-1 Appendix 1.1 of VR /.

Furthermore, PP has submitted following documents to the VVB:

- File 1: 44.03.06 Privileged & Confidential - Stove champion data (26 August 2024) /20 Appendix 1.1 of VR /
- File 2: 44.03.05 Stoves in Operation - Verified Secondary Data (2024-08-05) /21 Appendix 1.1 of VR /

The analysis of the most recent data collection provides value of 96.06% for the parameter. Moreover, comparison with secondary data i.e., data from other similar regional projects show an average operational rate of 87.10%. However, PP has chosen to apply a revised value of 87.10% for stove operating faction for this monitoring period.

The VVB has reviewed all the above-mentioned documents along with revised MR /01-5 Appendix 1.1 of VR / and ER sheet/02 Appendix 1.1 of VR / and considers that the new and revised value (87.10%) of the stove operating fraction is lower than the value (100%) reported in the earlier submitted MR and FVR. The lower value leads to a conservative calculation of emission reduction generated by the grouped project and is deemed acceptable to the VVB.

2. Refer to the assessment for point 1.
3. Refer to the assessment of point 1.

Verra Response

The VVB has re-checked the documentation and submissions from the PP on the revised usage rates of project stoves. The VVB acknowledges that at the time of the verification, there was material information, which was not made available to the VVB, that had an impact on the overall emission reductions by the project for the monitoring period for MP01: 05/07/2020 – 15/04/2021, MP03: 16/10/2021 – 28/02/2022, MP04: 01/03/2022 – 15/09/2022 and MP05: 16/09/2022 – 28/02/2023.

The VVB has reviewed the material information presented by the PP and based on the new information, the usage rate determined is lower than the one which was verified initially. The VVB reviewed that the usage rate in the region was 96.06%, a value determined based on the usage rate of stove champion data. The revised value was determined by following sound statistical procedures, whereby sampling was robust and survey findings were also reviewed and found to be reliable.

In addition, the VVB also reviewed other similar cookstove projects within the region and established that they are using an average usage rate of 87.10%

Based on the two determined usage rates, the VVB has confirmed that the project opted to apply a usage rate of 87.10% during the monitoring period and revised the emission reductions for that period to maintain conservativeness. VVB assessed that the approach is considered conservative and does not lead to overestimating emission reductions, considering the similar project(s) implemented in the region and stove champion data. The issue is closed.

ANNEXURE I

Background

The VVB must assess the accuracy, conservativeness, relevance, completeness, consistency, and transparency of the information provided by the project proponent, determine whether information/data provided by the project proponent is reliable, credible and complete, and base their findings and conclusions on objective evidence.

To assess the claims and assumptions in the MR, the VVB must not be limited to evidence provided by the project proponent and must describe all steps taken and sources of information used to cross-check the information contained in the MR. In doing so, the VVB must apply the means of verification required by the relevant Verra Standard, CDM accreditation standards and normative ISO documents, and standard auditing techniques, including, but not limited to:

a. Document review involving cross-checks between the information provided in the MR, raw data and information from sources other than those used; if available, the VVB's sectoral or local expertise; and, if necessary, independent background investigations; and
b. Follow-up actions (e.g., on-site inspection and telephone or email interviews), including:
    i. Interviews with relevant stakeholders in the host country, such as personnel with knowledge of the project design and implementation.
    ii. Cross-checks between information provided by interviewed personnel (i.e., by checking sources or other interviews) to ensure that no relevant information has been omitted.