



**Approved baseline and monitoring methodology/
methodological tool clarification response form
(Version 02.0)**

INFORMATION TO BE COMPLETED BY THE SECRETARIAT OR PANEL/ WG

Date and number of Panel/ WG meeting:	14–17 October 2013, SSC WG 42
Title/Subject of the request for clarification:	Clarification on the project emissions calculation applying AMS-III.H version 09
Reference number of the request for clarification:	SSC_693
Exact reference (number, title and version) of the methodology or methodological tool to which the request for clarification applies:	AMS-III.H Methane recovery in wastewater treatment --- Version 09.0
Fast track or Regular track:	<input type="checkbox"/> Fast track <input checked="" type="checkbox"/> Regular track

Summary of the request for clarification

Original text from Stakeholder:

Project reference number: 2672

Project Title: Kitroongruang Biogas Energy Project

Introduction:

In the registered PDD, page 32, the project emission from flare system is calculated based on the equation:

$$PE_{y,fugitive,ww,flare} = (1 - CFE_{ww,flare}) \times MEP_{y,ww,treatment,flared} \times GWP_{CH_4}; \text{ and}$$

$$MEP_{y,ww,treatment} = Q_{ww} \times B_{0,ww} \times \sum COD_{y,removed,CIGAR} \times MCF_{ww,j}$$

It is assumed that the project emission from inefficiencies in the capture and utilization / combustion / flare system applied the same equation to calculate which it does not represent the actual activity for project emission from flare system

According to the applied methodology, AMS.III-H (Version 09), the fugitive emission through capture and utilization / combustion / flare inefficiencies in the anaerobic wastewater treatment is calculated with the following equation:

$$PE_{y,fugitive,ww} = (1 - CFE_{ww}) \times MEP_{y,ww,treatment} \times GWP_{CH_4}$$

$$MEP_{y,ww,treatment} = Q_{ww} \times B_{0,ww} \times \sum COD_{y,removed,CIGAR} \times MCF_{ww,j}$$

During the preparing of the activity monitoring report, it was found that should the equation in the registered PDD be applied it will lead to double counting of project emissions when the equation from the methodology, is applied in the calculation. This means the same amount of captured biogas is combusted twice according to the parameter $MEP_{y,ww,treatment}$.

Clarification Request:

Clarification is requested whether in order to avoid double counting of PE, the below equation from the tool "Project emission from flaring" Version 02.0.0, EB68 Annex 15, can be applied to calculate the project emission from flaring for this PA since at the time of the project registration, the mention tool was not available.

$$PE_{flaring,y} = GWP_{CH_4} \times \sum_m^{525600} F_{CH_4, RG, m} \times (1 - \eta_{flaring, m}) \times 10^{-3}$$

Additional clarifications from Stakeholder submitted 12-Sep-13:

Refer the teleconversation, at the time of the project registration, the version of methodology AMS-III.H applied was 09 which states Project activity emissions from methane release in capture and utilization/combustion/flare systems. It is unclear on how to address capture, utilised or combust by boiler or gas engines and flaring for $PE_{y, fugitive}$. There is no clear representation, thus has caused unclear approach on the data to be applied to calculate the $PE_{y, fugitive}$ during monitoring. Therefore the PP seeks clarification.

When the biogas is utilised in a boiler or gas engine, it is considered as 100% combustion efficiency and no PE is considered. When combusted by the flare, the combustion efficiency depends on whether the flaring system is open or enclosed type. Whilst the capturing system has to account for the capture efficiency of 0.9 shall be applied.

In version 10, improvement has been made to have a clear representation for $PE_{fugitive, y}$ and $PE_{flaring, y}$ as individual parameters.

In version 16, an option as in para 30 (b) an optional default value of 0.05m³ biogas leaked / biogas produced maybe used to calculate $PE_{fugitive, ww, y}$ instead of applying the efficiency factor of 0.9. Whilst $PE_{flaring, y}$ remains a parameter by itself.

The SSC WG may consider above.

Clarification by the secretariat or Panel/ WG

The small-scale working group (SSC WG) of the CDM Executive Board would like to thank the author for the submission.

The SSC WG agreed to clarify that the project proponent of the underlying can use the relevant procedure in the latest version of AMS-III.H (ver.16) for fugitive emissions and flaring emissions, provided that the application of the latest version does not impact the conservativeness of the monitoring and verification process, including the related emission reduction calculations. The clarification by the SSC WG implies that in applying the relevant procedures in AMS-III.H (ver.16) for fugitive emissions and flaring emissions, the project proponent must ensure that they avoid cherry picking by ensuring that all relevant changes made to the latest version of the methodology that affect the entire emission reduction calculations shall be checked to ensure that application of the latest version will lead to more conservative emission reductions compared to the case when AMS-III.H (ver.09) was applied.

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Document information

Version	Date	Description
02.0	18 July 2013	Revised to remove the row "Date and signature of the chair and vice chair of Panel/WG (in case of clarification by Panel/WG)"
01.0	4 July 2013	Initial publication. This document supersedes and replaces the following documents: <ul style="list-style-type: none"> Recommendation Form for Small Scale Methodologies (F-CDM-SSCwg) (Version 01.1) Recommendation Form for Small Scale A/R Methodologies and Procedures (F-CDM-SSC-AR) (Version 01.1)

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