



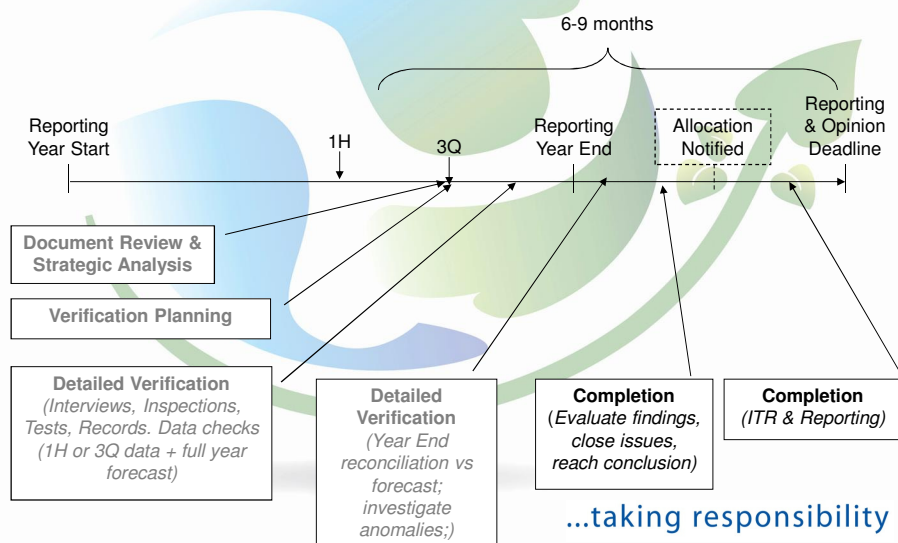
# EU ETS Verification

Completion

...taking responsibility



## Stages of verification work





## Verification Completion

- Detailed verification -
    - Inspections; Interviews; Tests; Record review; etc
  - Evaluation of findings –
    - Non-compliances with the MRR
    - Non-conformances with MP
    - Mis-statements
  - Evaluation of materiality
    - Quantitative materiality
    - Qualitative materiality
    - Can < % threshold be material?
  - Documentation –
    - Results of 'tests'
    - Issues log
    - Opinion Statement
- ...taking responsibility



## Evaluation & Materiality Analysis

Numerical Materiality Analysis				
Client	#####			
Contract No				
Lead Auditor				
Completed by				
Date last updated				
All data sampling and testing should be recorded in a clearly annotated spreadsheet to be presented for technical review.				
			Total Emissions	2,371,067
Materiality Analysis				
Item	Estimated emissions understatement (t CO2)	Estimated emissions overstatement (t CO2)	Under misstatement (%)	Over misstatement (%)
GCV vs NCV used for EF calculations in Sangea				0.186%
FCCU cannot meet permitted Tier	7,084	7,084	0.30%	0.30%
		Total % under/ over	0.30%	0.48%
		Overall misstatement %	-0.19%	

...taking responsibility



## Verification Completion

- Detailed verification -
    - Inspections; Interviews; Tests; Record review; etc
  - Evaluation of findings –
    - Non-compliances with the MRR
    - Non-conformances with MP
    - Mis-statements
  - Evaluation of materiality
    - Quantitative materiality
    - Qualitative materiality
    - Can < % threshold be material?
  - Documentation –
    - Results of 'tests'
    - Issues log
    - Opinion Statement
- ...taking responsibility



## Documentation – test results

**Notes to Verifiers:**

(1) **General Risk** refers to the implication that there might be a misstatement arising in the data resulting from the verifications as characteristics of the source of the data (or its manipulation) in the absence of any quality controls.

(2) **General Risk** refers to the implication that a quality control of its place might break down or be misapplied (or might be non-existent) therefore meaning that any inherent risk identified *would* have an impact upon the data.

(3) **Verification Risk** refers to the implication that an incorrect conclusion is arrived at as a result of failure to conduct sufficient breadth and depth of testing etc. Therefore the higher the verification risk (as a product of inherent and control risks) the more work is required to be done.

**Table No. 2**

Activity	Description	Type of Risk	Substantive Risk	Inherent Risk	Control Risk	Verification Risk	Verification Test Plan (if applicable)	Results of Testing & Observations	Evidence	Conclusion	Opinion Statement
Measurement of materiality	Measurement of materiality	Substantive Risk	Yes	High	Low	Low	Test: Confirm appropriate materiality level.	Materiality level is appropriate.	Yes	Yes	Yes
Measurement of compliance	Measurement of compliance	Substantive Risk	Yes	High	Low	Low	Test: Confirm compliance with MRR/MP.	Compliance is confirmed.	Yes	Yes	Yes
Measurement of materiality	Measurement of materiality	Substantive Risk	Yes	High	Low	Low	Test: Confirm appropriate materiality level.	Materiality level is appropriate.	Yes	Yes	Yes
Measurement of compliance	Measurement of compliance	Substantive Risk	Yes	High	Low	Low	Test: Confirm compliance with MRR/MP.	Compliance is confirmed.	Yes	Yes	Yes
Measurement of materiality	Measurement of materiality	Substantive Risk	Yes	High	Low	Low	Test: Confirm appropriate materiality level.	Materiality level is appropriate.	Yes	Yes	Yes
Measurement of compliance	Measurement of compliance	Substantive Risk	Yes	High	Low	Low	Test: Confirm compliance with MRR/MP.	Compliance is confirmed.	Yes	Yes	Yes
Measurement of materiality	Measurement of materiality	Substantive Risk	Yes	High	Low	Low	Test: Confirm appropriate materiality level.	Materiality level is appropriate.	Yes	Yes	Yes
Measurement of compliance	Measurement of compliance	Substantive Risk	Yes	High	Low	Low	Test: Confirm compliance with MRR/MP.	Compliance is confirmed.	Yes	Yes	Yes

...taking responsibility



## Documentation – Issues log

Date	Issue No.	Doc ref no.	Audit Stage	Type of issue (data compliance and Material non-material?)	Issue to be resolved (including document type & comments where relevant)	Material?	Who to resolve	Status for auditor	Status for SITE	Deadline	State how the issue has been proposed to be resolved, or why it will not be taken forwards.	Date accepted by auditor as resolved and so completely closed
####	1		####	Data Error - Misc calculation	<b>Carried forwards from 2013 Issue 39 &amp; updated</b> - Please recalculate the calculation of the process emissions; these still appear to be accounted for as CO2 in the new spreadsheet when in fact they are largely vented HC so should be accounted for as CH4/N2O/CO2 using PPC emissions factor. It appears that the spreadsheet is picking up raw data into the wrong column so the calculation carried forwards is wrong and understates emissions. (Ref - ADP page 43 which describes the emissions and the calculation). <b>Recall by auditor indicates an error of 0.01% 2014 emission See (Test Results 76-150/1). This has been discussed with Sander and Noura so required changes should be clear.</b>	No	####	Open	Open	Before stage 2 visit		
####	2		####	Improvement Opportunity	<b>Carried forwards from 2014 Issue 8 &amp; updated</b> - Unlike for safety critical instruments, there does not appear to be a formal process of review for measurement etc. of GHG critical instruments (meters & analysers) to ensure that trends, etc are monitored and issues notified to the GHG co-ordinator in a sufficiently timely manner to make notifications to OPA, get that approval for alternative methods to fill data gaps etc. Reliance is placed upon the Tech team to react to when they identify gross issues, but they may not note drifts etc and much later than the instrument team.	No	####	Open	Open	Before stage 2 visit	<b>07/9/15 auditor comment - see states that he is in discussion with the new instrument Engineering Manager in establishing a formal process. Follow up at Stage 2</b>	
####	3		####	Improvement Opportunity	<b>Carried forwards from 2014 Issue 9 for checking</b> - The integration of Corporate GHG reporting and assurance (the ISO14064-1/3 processes) should be reviewed to ensure alignment and efficiency of the two reporting/assurance processes. It seems that there are two separate accounting and reporting processes although the GHG Manager appears to be transferring data to the corporate database for use by the Environment Team, but this lacks clarity. If ISO14064-1 is being applied a matrix mapping which clauses of the Standard are met by which actions/persons/records etc would be useful & create efficiencies for the two sets of third party verifiers.	No	####	Open	Open	2016 data audit cycle		
####	4		####	Follow up request	<b>Carried forwards from 2014 Issue 12 for checking</b> - Please provide copies of evidence of formal approvals of quarterly data/reports by the Head of Tech.	No	####	Open	Open	Before stage 2 visit		
####	5		####	Follow up request	<b>Carried forwards from 2014 Issue 13 for checking</b> - Please provide a copy of the auditor's report opinion for the 2014 ghg data reported to Corporate in accordance with ISO14064-1. (To close out questions that arose in the 2013 report audit)	No	####	Open	Open	Before stage 2 visit	<b>05/9 verifier comment - received the upstart certificate but not the supporting auditor's report which ##### states is under the control of the GHG Manager who co-ordinated that audit.</b>	

...taking responsibility



## Documentation – VOS

Independent Reasonable Assurance Verification Report Opinion Statements - Emissions Trading System

EU ETS Annual Reporting

OPERATOR DETAILS	
Name of Operator:	
Address of Installation:	
Unique ID:	
EU ETS Permit Number:	
Period of relevant approved MR and period of validity for each plan:	
Approving Competent Authority:	
Category:	
Is the installation a 'low emitter'?	
Access 1 Activity:	
EMISSIONS DETAILS	
Reporting Year:	
Reference document:	
Date of Emissions Report:	
Process Emissions in tCO <sub>2</sub> e:	
Combustion Emissions in tCO <sub>2</sub> e:	
Total Emissions in tCO <sub>2</sub> e:	0.00
Combustion Source Streams:	
Process Source Streams:	
Methodology used:	
Emissions factors used:	
Changes to the Operator installation during the reporting year:	
SITE VERIFICATION DETAILS	
Operator installation visited during verification:	
Number of visits:	
Number of days on-site:	
Name of EU ETS lead auditor/technical experts undertaking site visit:	
Justification for not undertaking site visit:	
AVR ref. verification_report_en 130513.dvr	
Opinion Statement (final)	

1/5

Printed : 26/10/2015 12:17

ing responsibility



## Questions & Answers

- Other questions?

...taking responsibility



## Thank you...

Lucy Candlin. MSc. FIEMA. C.Env

Director. Planet & Prosperity Ltd

[lucy@pp-sustainability.eu](mailto:lucy@pp-sustainability.eu)

LinkedIn profile :

<http://www.linkedin.com/pub/lucy-candlin/0/497/37a>

...taking responsibility