



23 June 2022

Ms. Lindsay Scherr  
ESG Disclosure Manager  
ESG & Sustainability Impact  
Waste Management National Services, Inc.  
800 Capitol Street, Suite 300  
Houston, TX 77002

**RE: Waste Management – Independent Assurance Statement (Reporting Year 2021)**

**INTRODUCTION**

Aster Global Environmental Solutions, Inc. (Aster Global) was commissioned by the Sustainability Team of Waste Management National Services, Inc. (WM) to carry out an independent verification of its 2021 Greenhouse Gas (GHG) assertions relating to GHG Scope 1, 2 and 3 emissions. WM evaluated all Scope 3 categories and provided data for verification for categories relevant to WM.

WM has sole responsibility for preparation of the data and external report. Aster Global in performing our assurance work, is responsible to the management of WM. Our assurance statement; however, is an external audit and represents our independent opinion and is intended to inform all stakeholders including WM.

**SCOPE OF ASSURANCE**

The scope of work agreed with WM includes the following:

- Organizational boundaries for the GHG inventory are all North American sites functioning under WM's operational control. WM also maintains leased facilities in India, that are included in the Scope 3, category 8 data.
- All data was verified for the period between 01 January to 31 December 2021
- GHG data verified includes the following emission scopes:
  - Scope 1 - Direct emissions
  - Scope 2 - Indirect emissions
  - Scope 3 - Value chain emissions including 10 categories:
    - category 1 - Purchased Goods and Services
    - category 2 - Capital Goods
    - category 3 - Fuel and Energy- Related Activities
    - category 6 - Business Travel
    - category 7 - Employee Commuting
    - category 8 - Upstream Leased Assets – includes upstream leased assets in India
    - category 9 - Downstream Transport
    - category 11 - Use of Sold Products
    - category 12 - Downstream Leased Assets
    - category 15 - Investments

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- The assurance was carried out between April 2022 and June 2022
- Assurance was carried out to a limited level of assurance
- The verification for GHG emissions was conducted using the ISO-14064-3 Standard

## VERIFICATION METHODOLOGY

Aster Global is accredited by the ANSI National Accreditation Board (ANAB) under ISO 14065:2013 - *Requirements for greenhouse gas validation and verification bodies for use in accreditation or other forms of recognition*; and ISO 14064-3:2006 - *Specification with guidance for the validation and verification of greenhouse gas assertions* for verification of assertions related to GHG emissions and removals at the organizational level, and validation/verification of assertions related to GHG emissions reductions and removals at the project level.

The inventory was verified in accordance with the ISO 14064-3:2006 Specification with guidance for validation and verification of greenhouse gas assertions. The inventory was verified using the World Resources Institute (WRI)/World Business Council on Sustainable Development (WBCSD) Greenhouse Gas (GHG) Protocol, WRI/WBCSD Scope 2 Guidance: A Corporate Accounting and Reporting Standard and The GHG Protocol for Project Accounting, and the GHG Protocol Corporate Value Chain (Scope 3) Accounting and Reporting Standard and WM's GHG Inventory Management Plan.

The following methods were applied during the verification of WM's GHG inventory and management processes, the data that supports the company's GHG emissions inventory, and the GHG assertions presented by the company:

- Review of documentation, data records and sources relating to the corporate GHG data, GHG emissions and water consumption assertions.
- Review of the processes and tools used to collect, aggregate and report on GHG emissions.
- Interviews with executives and managers representing relevant functions for supporting the GHG inventory management process at both the corporate and site levels.
- Assessment of GHG information systems and controls, including:
  - Selection and management of all relevant GHG data and information;
  - Processes for collecting, processing, consolidating, and reporting GHG data and information;
  - Systems and processes that ensure the accuracy of the GHG data and information;
  - Design and maintenance of the GHG information system; and
  - Systems and processes that support the GHG information system.
- Performed sample-based audits of the processes for generating, gathering and managing the quantitative and qualitative data included in the WM data and GHG Inventory Management Plan
- Examination of the GHG data and information to develop evidence for the assessment of the GHG assertions.
- Confirmation of whether or not the organization conforms to verification criteria.
- Evaluation of whether the evidence and data are sufficient and support WM's GHG assertions.



## CONCLUSIONS

WM's GHG assertions are:

- Total emissions are 34,631,741 metric tonnes of CO<sub>2</sub>e including 20,515,951 metric tonnes of CO<sub>2</sub>e from anthropogenic sources and 14,115,791 metric tonnes of CO<sub>2</sub>e from biogenic sources;
- Scope 1 emissions include 16,975,323 metric tonnes of CO<sub>2</sub>e from anthropogenic sources and 12,969,522 metric tonnes CO<sub>2</sub>e from biogenic sources;
- Scope 2 market-based emissions are 182,885 metric tonnes of CO<sub>2</sub>e and Scope 2 location-market emissions are 257,188; and
- Scope 3 emissions include 3,357,743 metric tons of CO<sub>2</sub>e from anthropogenic sources and 1,146,269 metric tonnes CO<sub>2</sub>e from biogenic sources

Based on the processes and procedures conducted with a limited assurance, Aster Global concludes that the GHG assertions are materially correct and are a fair representation of GHG data and information and have been prepared in accordance with the calculation method referenced above.

## INDEPENDENCE

As an ISO accredited independent third-party verifier, Aster Global was not involved in the preparation of any part of WM's data or report. We followed the ISO requirements and processes for verifications and audits and adopt a balanced approach towards all stakeholders when performing our evaluation.

Sincerely yours,

ASTER GLOBAL ENVIRONMENTAL SOLUTIONS

A handwritten signature in black ink that reads "Janice McMahon".

Janice McMahon  
President

A handwritten signature in black ink that reads "Barbara Toole O'Neil".

Barbara Toole O'Neil, QEP  
Lead Verifier

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