



Circular Economy Webinar

Session 6 Summary: Measuring and Mitigating Methane Emissions from Agriculture, Municipal Solid Waste, and Wastewater

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[Global Methane Initiative \(GMI\)](#) is an international public-private partnership that focuses on reducing methane emissions through collaboration and projects. They have 46 member countries and over 700 project network members, which include private industry companies, non-governmental organizations, universities, and other partners.

Key Takeaways

1. **The Global Methane Initiative (GMI), supported by the U.S. EPA, focuses on three major sectors: biogas (agriculture, municipal solid waste, and wastewater), oil and gas, and coal mine methane.** The biogas sector is a significant source of methane emissions globally, accounting for over 20% of manufactured methane emissions.
2. **The two main technologies for biogas projects are Anaerobic Digesters and Landfill Gas Capture Systems.** These systems capture methane that would otherwise be released into the atmosphere from sources such as manure management, waste, and wastewater. Other practices, like organic diversion and best practices for reducing methane from organic waste, are also important.
3. **Anaerobic Digestion is a technology used in biogas projects to convert organic feedstocks or waste, such as livestock manure, wastewater, and food waste, into biogas and digestate.** Biogas can be used for energy production or turned into other products, while digestate, which is a nutrient-rich product, can be used as organic fertilizer.
4. **The U.S. EPA and GMI have developed a [EPA Biogas Toolkit](#) for their 38 tools and resources of information and guidance on planning and implementing methane mitigation projects.**
5. **Two of their financial readiness resources for biogas projects are the Municipal Solid Waste Financial Readiness Questionnaire** which helps cities assess their readiness for financing methane mitigation projects by exploring the political environment, legal frameworks, and revenue streams associated with such projects.



6. **The second is the Risk Analysis and Technical Review Checklist** which provides guidance on assessing the technical and financial viability of a biogas project. This includes over 37 best practices used in the U.S. when reviewing projects seeking federal financing.
7. **GMI and EPA also provide resources and guidelines to support the measurement, reporting, and verification (MRV)** of biogas projects in quantifying emissions, enhancing targets, and reporting progress. These include:
 - a. **MRV Handbook for Biogas provides guiding principles for conducting MRV in the biogas sector.** It assists decision-makers at both project and national levels in quantifying emissions and incorporating biogas projects into national inventories. The handbook's best practices focus on agriculture, municipal solid waste, and wastewater sectors.
 - b. **MRV Resources Center goes deeper into the benefits of MRV, enhancing NDC targets, and best practices for using MRV systems.**
8. **GMI and EPA share these types of resources and how to use them through workshops, trainings, and outreach.** They work with countries to analyze and provide support on policies and identify improvements and with stakeholders to identify their priorities and help them develop work plans.

[Watch the Recording here.](#)