

# Methane Guiding Principles Signatory Reporting

Eni S.p.A.

July 24th 2023





COMPANY: Eni S.p.A.

DATE: July 24th 2023

YEAR OF JOINING METHANE GUIDING PRINCIPLES: 2017

SENIOR REPRESENTATIVE: Rosanna Fusco, Head Climate Strategy and Positioning

WORKING LEVEL REPRESENTATIVE: Leonardo Gelpi, Climate Strategy and Positioning



## **Principle One:**

## Continually reduce methane emissions

- Please state what specific activities or projects your company has undertaken to reduce methane
  emissions. Please refer to the previous year's annual MGP reporting where applicable to refer to
  intended activity. Link to sustainability report where relevant to provide further detail.
- Describe how the reduction was achieved including description of the asset type, technology type, timeframe. What was the end result?
- Provide data to support your description e.g. the actual amount of emissions reduction achieved, or the reduction in methane intensity.



### 2022 completed activity

In 2022 the absolute Eni methane emissions decreased by 9% compared to 2021. The upstream methane emissions intensity, equal to 0.08% in 2022, decreased by 11% vs 2021, while upstream emissions from fugitives decreased by 21.7%.

Eni contributes to the OGCI collective target of reducing upstream methane intensity from 0.32% in 2017 to well below 0,20%.

Reduction have been achieved mainly through the implementation of LDAR campaigns, covering more than 95% of assets (on a production basis).

In 2022, the programme for the acquisition of thermal imaging cameras by the subsidiaries continued, and a training programme has begun for local teams for the appropriate use of these instruments and the monitoring methodology, in accordance with the best international standards such as OGMP-CCAC and EPA, which are incorporated into the company's operating instructions.

Our actions and commitment to achieve reductions in methane emissions, as well as performance achieved, are further described and reported in the following public documentation:

- Eni For 2022 A Just Transition
   Link:
   https://www.eni.com/assets/documents/eng/just
  - transition/2022/eni-for-2022-just-transitioneng.pdf
- Eni For 2022 Sustainability Performance
   Link:
   https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-eng.pdf
- CDP Climate Change Questionnaire Link:

https://www.eni.com/assets/documents/eng/just-transition/2022/cdp-climate-change-2022-submitted.pdf

#### 2023 intended activity

In 2023 we will continue to improve our field monitoring surveys using an Optical Gas Imaging (OGI) camera implementing the requirement of yearly DI&M campaign in all our sites worldwide. This will lead to a further reduction of fugitive emissions.

To further improve the accuracy and transparency of methane emissions reporting, with the support of a third party, Eni is proceeding with a measurement campaign on key-operated assets, which will be completed during 2023 and will allow a new reduction target to be set once completed

Methane emissions will be covered again by 3rd party reasonable assurance; we will continue the training program of local personnel for the Infrared Cameras in order to increase the frequency of Leak Detection And Repair (LDAR) campaigns.

We are planning to further reduce process venting from the existing assets focusing on the most emitters sources with an approach based on best practices and available technologies (e.g. compressors, tanks).

In addition to the reduction contribution from flaring down projects, Eni is analysing technologies for measuring and optimising the combustion efficiency of flares and conducting feasibility studies for the implementation of closed flares.

Moreovee, in 2023 Eni will continue testing new technologies for detecting and estimating emissions using satellites, aircrafts, drones and fixed monitoring locations.





## **Principle Two:**

## Advance strong performance across the gas supply chain

Please include answers to the following questions:

- 1. Did you participate in any methane research or plan to do so?
- 2. Did you conduct any outreach on methane management?
- Describe what action you have taken to engage industry players across the value chain to better
  understand how to achieve robust methane emissions management. Outreach activity could include
  training sessions, participation in webinars, influencing of NOJV partners, or publication of guidance.
  Activity could also include commercial incentives or engagement with investors to drive better
  performance by others.
- Provide details of any outcomes that resulted from your action.



### 2022 completed activity

In 2022 Eni confirmed its commitment to engage with industry players and stakeholders on methane emission management, mainly through active participation in several initiatives and organizations.

Within the Methane Guiding Principles (MGP), Eni joined several project regarding in particular the development of flaring web-toolkit for better managing methane emissions from flares. In addition, under MGP Non-Operated Joint Venture (NOJV) working Group, Eni continued the follow up on GHG clause guidance application, ensuring the proper data sharing and commitment on improving reduction performance from its Partner in NOJV.

Under the Oil & Gas Climate Initiative, in addition to participating to the collective upstream methane reduction target, Eni continued to support all methane initiatives, including UNEP-led initiatives like the Global Methane Alliance and the International Methane Studies.

Moreover, as part of **OGCI**, Eni is among the promoters of the **Aiming for Zero Methane Emissions Initiative**, and is engaged in supporting projects aimed at improving knowledge and technologies on methane detection and quantification, as well as methane reduction (e.g. collaboration with Payne Institute and GGFR to increase transparency on flaring and satellite data acquisition).

#### 2023 intended activity

In 2023 Eni will continue to collaborate with industry players, and stakeholders in order to enable the improvement of the methane performance across the full gas value chain.

The main vehicle will be the active participation within the international partnerships and associations.

Within **OGCI**, Eni will support projects aimed at improving knowledge and technologies on methane detection and quantification, as well as methane reduction (e.g. Satellite data acquisition, collaboration with Payne Institute and GGFR to increase transparency on flaring).

Under MGP, Eni will continue to support effort in particular under the NOJV Working Group and on specific planned projects aimed at embedding methane action across the O&G value chain and develop actions aimed at enabling at achieving the objectives of the Global Methane Pledge.

Under **OGMP 2.0**, Eni will participate in technical working groups in synergy with downstream operators.

## **Principle Three:**

## Improve accuracy of methane emissions data

- Describe action taken to improve methane emissions data collection methodologies. This could be
  application of new technology at an operated site(s), investment and participation in R&D initiatives,
  development of monitoring/modelling software, or support to research that improves the accuracy of
  the quantification of methane emissions.
- Where new technology /software has been piloted or adopted, it is helpful to describe how it works, the reasons it was selected, and how it was deployed. Any data that can be shared to demonstrate improvements is useful.



• How these new methods/technolgies has been adopted into your accounting process if at all.

2022 completed activity	2023 intended activity
Since 2019, Eni methane direct emissions are covered by 3rd party reasonable assurance within the overall GHG assurance review.	Methane emissions will be covered again by 3rd party reasonable assurance; we will continue the
During 2022, the acquisition of Infrared Cameras by subsidiaries has allowed to perform LDAR campaigns more frequently in their sites. The site personnel training for the LDAR campaign continued, to allow these teams to perform field surveys with the new OGI Cameras.	training program of local personnel for the Infrared Cameras in order to increase the frequency of LDAR campaigns.
During 2022 another tests were carried out with GHGSat to monitor with satellite the emissions from two subsidiaries, in order to assess the detection capacity of these technologies and improve the quality of monitored methane data.	We will strengthened the coverage of our monitoring activities in compliance with our commitment with OGMP.
In order to improve the accuracy of methane emissions reporting, in line with Eni's commitment to achieve the Gold Standard Status under the OGMP Initiative, during 2022 Eni worked, together with a a qualified technical provider, to develop a detailed implementation plan for methane monitoring, identifying the most appropriate technology and methodology to measure methane emissions in its operated assets.	Evaluation of modelling/simulations for flare combustion efficiency quantification are planned for 2023, in order to improve monitoring accuracy and reduce flaring emission.

## **Principle Four:**

Advocate sound policy and regulations on methane emissions



### 2022 completed activity

Eni is partner of several initiatives which envisage the implementation of voluntary actions for the reduction of methane emissions along the entire oil & gas production process and which promote the implementation of regulations and objectives on the reduction of methane emissions along the supply chain of the natural gas; for more information see section on Partnerships in *Eni For 2021 - Carbon Neutrality by 2050* (p. 35) and Eni For 2022 – A Just Transition (p. 41)

#### Link:

https://www.eni.com/assets/documents/eng/just-transition/2021/eni-for-2021-carbon-neutrality-2050-eng.pdf

https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-just-transition-eng.pdf

Within OGCI, Eni was also supportive of the Global Methane Pledge, launched at COP26, reaffirming its commitment to contribute to the reduction of methane emissions.

During 2022 Eni continued to support to OGCI and UNEP for governments engagement on methane in specific Countries.

Moreover, Eni participated to several consultation on the methane emissions regulation proposed by the European Commissions, confirming its supportive position regarding the adoption of sound policies that can help the O&G sector to mitigate methane emissions. Eni also supports actions for the introduction of mechanisms that favour the use of fuels with lower emission intensities and lower consumption of natural gas. The progressive mitigation of its carbon impact makes gas a fundamental energy source for accompanying the transition towards a low carbon content energy mix together with substitution of the more polluting fossil fuels in electricity generation and in energy-intensive industries.

#### 2023 intended activity

In 2023 we will continue to collaborate with our partners for the most appropriate and constructive engagement with governments to support the implementation of a methane regulation, both in the European context and in oil & gas producing countries. We will continue to leverage to the international partnership, as they are one of the strategic drivers to support the energy transition allowing to exploit and generate knowledge, share best practices and support initiatives that can simultaneously create value for the company and its stakeholders.



## **Principle Five:**

## Increase transparency

Please include answers to the following question:

- 1. Are you participating in OGMP 2.0 or do you intend to do so? If you are participating in OGMP 2.0 you may provide a link to the website.
- Describe what activity you have carried out e.g. providing information in relevant external reports on methane emissions data, methodologies, and progress and challenges in methane emissions management.
- If you have contributed towards the standardisation of comparable external methane reporting describe the activity you have taken.

### 2022 completed activity

Eni reports relevant information on methane emissions management through several frameworks. In particular, information on data and methodologies are available at the following links:

- Eni For 2022 A Just Transition Link:
  - https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-just-transition-eng.pdf
- Eni For 2022 Sustainability Performance
   Link:
   https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-eng.pdf
- CDP Climate Change Questionnaire

https://www.eni.com/assets/documents/eng/just-transition/2022/cdp-climate-change-2022-submitted.pdf

Through its participation to OGMP 2.0, Eni makes a relevant step forward in terms of commitment on methane reduction, improvement of quality of data reported and transparency on disclosure.

### 2023 intended activity

In 2023, Eni will continue to report information on methane management practices, methane data and other challenges across the public reports and through voluntary disclosure frameworks (e.g. CDP). In addition, Eni will continue to report within OGMP 2.0 framework, as well as continuing to collaborate with partners and other companies within the international partnerships to enable a better transparency and harmonization in oil and gas methane disclosure.



## **Methane Emissions**

Do you report absolute methane emissions within your sustainability report?  If so provide link.	Yes, Eni reports absolute methane emission  • Eni For 2022 – Sustainability Performance Link:  https://www.eni.com/assets/documents/eng/just- transition/2022/eni-for-2022-sustainability-performance- eng.pdf
Do you report a methane intensity within your sustainability report?  If so provide link.	<ul> <li>Eni reports Upstream methane emission intensity</li> <li>Eni For 2022 – Sustainability Performance         Link:         https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-eng.pdf     </li> </ul>
What are your organisation's total absolute methane emissions?  Provide a figure in tonnes.  Provide latest data publicly available.	Eni absolute methane emission was equal to 49,617 tCH <sub>4</sub> in 2022.  • Eni For 2022 – Sustainability Performance Link:  https://www.eni.com/assets/documents/eng/just- transition/2022/eni-for-2022-sustainability-performance- eng.pdf
State your methodology.	Methane emissions are estimated from measured Activity data, taken mostly from fuel gauge meters' records or direct measurement (e.g. LDAR). Emission Factors used are mostly calculated using fuel gas composition or taken by literature.  Methane emissions data are third party verified within the overall GHG assurance review. Eni conduct a dedicated assurance process for GHG figures, additional to the one related to Sustainability KPIs. Since 2019, GHG Scope 1 and Scope 2 emissions (including methane) are subjected to a reasonable assurance by an auditing firm (PWC).  More information on methologies applied and verification process are available in the following documentation:  • Eni For 2022 – Sustainability Performance Link:  https://www.eni.com/assets/documents/eng/just- transition/2022/eni-for-2022-sustainability-performance- eng.pdf



What are your organisation's methane intensity?  Provide latest data publicly available.  • Eni For 2022 – Sustainability Performance Link:  https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-eng.pdf  State your methodology.  Eni reports Methane Intensity according with methodology defined within the Oil & Gas Climate Initiative.  The numerator includes all operated methane emissions associated with upstream activities; denominator include the gas production sold (marketed gas).  More detail are available at the following links:  https://www.ogci.com/our-progress/performance-data  https://www.ogci.com/methane-emissions/methane- intensity-target  State your reporting boundary.  State your reporting boundary.  Oo you have a methane emission target?  If yes, please state what it is, including the boundaries and methodology.  If no, are you developing such a target? Please state your intended timeline.  Eni lass Climate Initiative (OGCI) collective methane intensity target of reducing the upstream methane intensity	State your reporting boundary.	<ul> <li>100% operated - according to this approach, Eni reports 100% of GHG emissions from assets over which it has operational control, even when it holds less than 100% of the value (for example in a joint venture).</li> <li>Eni For 2022 – Sustainability Performance Link:         <ul> <li>https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-eng.pdf</li> </ul> </li> </ul>
Link: https://www.eni.com/assets/documents/eng/just- transition/2022/eni-for-2022-sustainability-performance- eng.pdf  Eni reports Methane Intensity according with methodology defined within the Oil & Gas Climate Initiative. The numerator includes all operated methane emissions associated with upstream activities; denominator include the gas production sold (marketed gas). More detail are available at the following links: https://www.ogci.com/our-progress/performance-data https://www.ogci.com/methane-emissions/methane- intensity-target  State your reporting boundary.  100% operated - according to this approach, Eni reports 100% of GHG emissions from assets over which it has operational control, that is where Eni is able to enforce its own policies and procedures, even when it holds less than 100% of the value (for example in a joint venture).  Eni has in place two methane emissions of 80% by 2005 against 2014; due to Leak Detection and Repair (LDAR) campaigns and improved accounting approach the reduction achieved has made it possible to reach the 2025 target in 2019. Boundary: upstream 100% operated.  Oil and Gas Climate Initiative (OGCl) collective methane intensity target of reducing the upstream methane intensity		
defined within the Oil & Gas Climate Initiative.  The numerator includes all operated methane emissions associated with upstream activities; denominator include the gas production sold (marketed gas).  More detail are available at the following links: <a href="https://www.ogci.com/our-progress/performance-data">https://www.ogci.com/our-progress/performance-data</a> <a href="https://www.ogci.com/methane-emissions/methane-intensity-target">https://www.ogci.com/methane-emissions/methane-intensity-target</a> State your reporting boundary.  100% operated - according to this approach, Eni reports 100% of GHG emissions from assets over which it has operational control, that is where Eni is able to enforce its own policies and procedures, even when it holds less than 100% of the value (for example in a joint venture).  Do you have a methane emission target?  If yes, please state what it is, including the boundaries and methodology.  Eni has in place two methane specific targets:  Reduction of upstream fugitive methane emissions of 80% by 2025 against 2014: due to Leak Detection and Repair (LDAR) campaigns and improved accounting approach the reduction achieved has made it possible to reach the 2025 target in 2019. Boundary: upstream 100% operated.  Oil and Gas Climate Initiative (OGCI) collective methane intensity target of reducing the upstream methane intensity	Provide latest data publicly available.	Link: <a href="https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022/eni-for-2022-sustainability-performance-transition/2022-sustainability-performance-transition/2022-sustainability-performance-transition/2022-sustainability-perfor-2&lt;/th&gt;&lt;/tr&gt;&lt;tr&gt;&lt;th&gt;of GHG emissions from assets over which it has operational control, that is where Eni is able to enforce its own policies and procedures, even when it holds less than 100% of the value (for example in a joint venture).  Eni has in place two methane specific targets:  Reduction of upstream fugitive methane emissions of 80% by 2025 against 2014: due to Leak Detection and Repair (LDAR) campaigns and improved accounting approach the reduction achieved has made it possible to reach the 2025 target in 2019. Boundary: upstream 100% operated.  Oil and Gas Climate Initiative (OGCI) collective methane intensity target of reducing the upstream methane intensity&lt;/th&gt;&lt;th&gt;State your methodology.&lt;/th&gt;&lt;th&gt;defined within the Oil &amp; Gas Climate Initiative.  The numerator includes all operated methane emissions associated with upstream activities; denominator include the gas production sold (marketed gas).  More detail are available at the following links:  &lt;a href=" https:="" our-progress="" performance-data"="" www.ogci.com="">https://www.ogci.com/our-progress/performance-data</a> <a href="https://www.ogci.com/methane-emissions/methane-">https://www.ogci.com/methane-emissions/methane-</a>
If yes, please state what it is, including the boundaries and methodology.  If no, are you developing such a target? Please state your intended timeline.  Reduction of upstream fugitive methane emissions of 80% by 2025 against 2014: due to Leak Detection and Repair (LDAR) campaigns and improved accounting approach the reduction achieved has made it possible to reach the 2025 target in 2019. Boundary: upstream 100% operated.  Oil and Gas Climate Initiative (OGCI) collective methane intensity target of reducing the upstream methane intensity	State your reporting boundary.	of GHG emissions from assets over which it has operational control, that is where Eni is able to enforce its own policies and procedures, even when it holds less than 100% of the value
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More detailed information on Eni's target are available at the following links:

Eni For 2022 – A Just Transition
 Link:
 <a href="https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-just-transition-eng.pdf">https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-just-transition-eng.pdf</a>

• Eni For 2022 – Sustainability Performance Link:

https://www.eni.com/assets/documents/eng/just-transition/2022/eni-for-2022-sustainability-performance-eng.pdf

• CDP Climate Change Questionnaire Link:

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