

NRG Energy, Inc. (NRG)

	GHG EMISSIONS	WATER
ACKNOWLEDGE	● ● ● ●	● ● ● ●
PRIORITISE	● ● ● ●	● ● ● ●
SET STRATEGY & GOALS	● ● ● ●	● ● ● ●
TRACK	● ● ● ●	● ● ● ●

Background on NRG

NRG is an American-based energy company. It was founded in 1992 and is headquartered in West Windsor, New Jersey (Financial) and Houston, Texas (Operational). NRG owns and operates electricity generation facilities; trades energy, fuel, and transportation services; and serves 3 million retail customers across 11 states of the U.S. It employed 8,700 people and reported revenues of US\$ 12.3 billion in 2016. It is a publicly traded and is listed on the New York Stock Exchange.

How did NRG come to start thinking about context?

In early 2014, NRG began to review how to better align its existing sustainability strategy with its wider business strategy that aimed to achieve a transition towards a model of lower GHG emission power generation¹. The NRG executive sustainability steering committee believed that the company was at an inflexion point and wanted to ensure that any goals developed during this review process would be both ambitious and in-step with its growing investments in cleaner energy¹. NRG initially considered setting a GHG intensity driven goal but decided that what was really needed was less carbon in the atmosphere and this would not be achieved through a GHG intensity goal². In November 2014, NRG announced the outputs of this review, which included two long-term GHG emissions goals aimed at reducing absolute GHG emissions².

During 2015, NRG partnered with the [We Mean Business](#) coalition and signed on to the [Science-Based Targets](#) initiative ahead of [COP21](#) in Paris^{2,3}. Internally, NRG was already incorporating the evolving climate science data into its modelling of future climate scenarios;

¹ NRG (2016). Reporting for Results. Accessed at: <http://www.nrg.com/news/executive-blog/post/reporting-for-results>

² NRG (2015). Sustainability report 2015. Accessed at: <http://www.nrg.com/documents/sustainability/2015-nrg-sustainability-report.pdf>

³ Corporate Knights (2016). Corporate Strategies for a net-zero world. Accessed at: <http://www.corporateknights.com/magazines/2016-global-100-issue/corporate-strategies-for-a-net-zero-world-14516064/>

therefore, joining the Science-Based Targets initiative was a natural step for NRG⁴. Laurel Peacock, the Senior Sustainability Manager at NRG, commented that by setting an ambitious absolute GHG emissions reduction goal, NRG can continue to provide its customers with a reliable, sustainable, and safe supply of electricity in the future⁵.

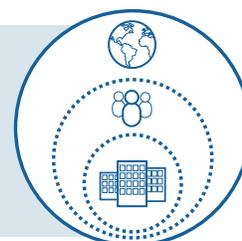
What does context look like at NRG?

1 ACKNOWLEDGE the need to operate within global, regional, and/or local socio-ecological thresholds.

GHG EMISSIONS



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GHG emissions: One of the challenges presented by the generation of power is the impact that the process has on climate change⁶. The impacts of climate change present NRG with operational risks. The company openly acknowledges this and its sustainability commitments are aimed at mitigating these risks^{3,7}. In its 2016 Sustainability Report, NRG acknowledges that it will only succeed in the future if it begins to consider and adapt to the socio-ecological challenges of a fast-changing world⁷. NRG also acknowledges that it intends to work with its value chain, commenting it developed a value chain sustainability action plan in 2015 that will serve as a platform to align with its sustainability strategy and reporting³. However, NRG has not yet provided details of the content of this value chain sustainability action plan. NRG's President and CEO, Mauricio Gutierrez, also commented that "beyond being mindful of our own operations, we help our customers achieve their own sustainability goals through clean energy and retail options"; however, NRG has yet to clearly outline how it will be supporting its customers outside of simply providing greater access to cleaner forms of energy³.

Water: NRG acknowledges the importance of water and articulates that it understands that water issues (usage, scarcity, quality, and biodiversity) generally originate at a local level⁷. This places unique pressures and risks on each of its operational units⁷. Despite this acknowledgment, NRG only discusses this ecological issue in a general way and has yet to commit to operating within the limits imposed by water resources.

Other thresholds: NRG acknowledges the importance of other socio-ecological issues including waste, biodiversity, wellness, and workforce diversity but does not yet discuss them with reference to thresholds.

⁴ Science-Based Targets (2016). Case Study: NRG Energy. Accessed at: <http://sciencebasedtargets.org/case-studies/case-study-nrg/>

⁵ World Resource Institute (2016). Setting Science-Based Targets: 5 Companies offer lessons for success. Accessed at: <http://www.wri.org/blog/2016/05/setting-science-based-emissions-targets-5-companies-offer-lessons-success>

⁶ NRG (2015). NRG CEO Letter. Accessed at: <http://www.nrg.com/sustainability/vision/chief-executive-officer-letter/>

⁷ NRG (2016). 2016 Sustainability Report. Accessed at: <http://www.nrg.com/documents/sustainability/2016-nrg-sustainability-report.pdf>

2 Transparently understand and **PRIORITISE** a set of focus areas in relation to key socio-ecological trends at the global, regional, and/or local level.

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As part of NRG's re-evaluation of its sustainability strategy in 2014, it used a third party to facilitate dialogues with its stakeholders aimed at understanding what socio-ecological issues they thought were relevant to NRG. NRG now undertakes an impact analysis for each of the socio-ecological issues it prioritises to help it better understand the magnitude of the impacts that its business activities are having on these issues. This helps NRG identify the socio-ecological issues that NRG has the greatest opportunity to influence³.

GHG emissions: As a power generation company that typically requires large long-term investments in capital assets, GHG emissions is a key ecological issue for NRG⁵. NRG outlines the types of emissions that arise from its power generation activities and the mitigating actions it will be taking for each source of emissions³. NRG has yet to outline its understanding of how the GHG emissions threshold is relevant to the business activities of its value chain, or how it aims to work with them to support them in adhering to the limits of this threshold.

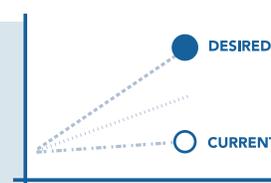
Water: NRG is developing its understanding of the impacts that it has on water resources and outlines how water is relevant to its operations. For NRG, water availability and quality is important because the generation of power relies on sufficient amounts of water⁷. It recognizes that its primary use of water is for cooling of condensers within the power generation process⁷.

3 SET STRATEGY AND GOALS by transparently articulating the current performance gap and what portion of this gap the business will address.

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GHG emissions: NRG has committed to reduce its absolute scope 1, 2, and 3 GHG emissions by 50% by 2030 from 2014 levels⁴. As a longer-term goal, NRG has committed to reduce its absolute scope 1, 2 and 3 GHG emissions by 90% by 2050 from 2014 levels⁴. Despite having a contextual GHG emissions goal, NRG has not transparently described the assumptions or rationale that it used to develop its goal. NRG has commented that it worked with the Science-Based Targets initiative to develop its goal and that the sector decarbonisation pathway for the power generation sector was used as the benchmark for the goal^{2, 8}.

⁸ NRG (2016). Sustainability: Making an Impact. Accessed at: <http://www.nrg.com/sustainability/campaigns/making-an-impact/>

Water: NRG has set a 2030 goal of withdrawing 7.8 million m³ and the company has not yet indicated if it intends to develop a contextual goal for water⁷. NRG has also yet to outline if it is working to better understand the gap between its current performance and the performance level needed to operate within the limits of this threshold.

Other thresholds: NRG has not yet set contextual goals in relation to any other thresholds.

4 Transparently TRACK performance against realistic trajectory targets.

GHG EMISSIONS ●●○○ WATER ●○○○



GHG emissions: NRG has a history of reporting its reductions in GHG emissions and presents this progress in a graphical format (Figure 1)⁷. It has set trajectory targets that could be used to monitor its progress towards achieving its goal but it has not yet outlined the rationale for how these trajectory targets were set. NRG has not outlined if it intends to develop metrics or targets to monitor the effectiveness of its support of its value chain's adherence to the limits of this threshold.

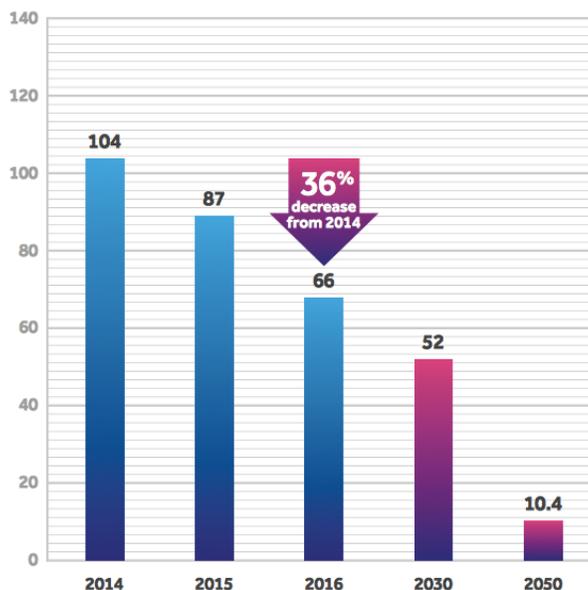


Figure 1: NRG's CO2 emissions performance heading towards its 2050 goal⁷.

Water: NRG has a history of reporting its performance against this threshold and presents the progress it is making in a graphical format⁷. However, it has yet to use this to develop a set of realistic trajectory targets that could be used to monitor its progress towards achieving its non-contextual goal.

Other thresholds: NRG reports its performance against other socio-ecological issues including waste, biodiversity, wellness, and workforce diversity but does not yet report its progress in relation to their associated thresholds.

What is the road ahead for context at NRG?

The internal communication of its contextual goal and the associated actions needed to achieve the goal have been challenging for NRG. The company understood that its high-emission plants would need to evolve, and it was important that this evolution be carefully communicated to employees in a way that reassured them that plants would not simply be closing overnight⁵. To achieve this, the executive sustainability steering committee toured the U.S. operations to answer the questions raised by employees and to explain what the goal means for the company and why it was developed⁵. This extra attention, placed on internal communication of NRG's contextual goal, was critical to the success of introducing the goals to the employees, and this ongoing internal dialogue will continue to help NRG foster the corporate cultural shift that will be needed to support it in achieving its goal.