



The Sustainability Accounting Standards Board's (SASB) mission is to develop sustainability metrics for public corporations to disclose material, decision-useful information to investors. We support work that contributes directly to generating comparable and consistent data. The nature of our business directs us to consult the Infrastructure Sector – Electric Utilities. Below is a table which contains those topics we have identified as

key issues and against which we are able to report on as a publically traded company. Activity metrics that may assist in the accurate evaluation and comparability of disclosure may be found in NRG's 2017 Form 10-K and in NRG's 2017 Sustainability Report. Quantitative data is followed by narrative information that contextualizes the data table and is also responsive to any qualitative metrics. For more details on our report process please visit Reporting in the 2017 Sustainability Report.

SASB code	Accounting metric	2017
<b>Greenhouse gas emissions and energy resource planning</b>		
IF0101-01	<b>(1) Gross global scope 1 emissions (million metric tons)</b>	51,000,000*  *Rounded to nearest million. Includes 37.5% ownership of 144MW capacity natural gas plant in Turkey and 80% of a 605MW capacity coal plant in Australia. Excludes GenOn assets.
	<b>(2) Percentage covered under emissions-limiting regulations, and</b>	8%
	<b>(3) Percentage covered under emissions-reporting regulations</b>	99.99%
	<b>Clarification of percentage covered under emissions-limiting and emissions-reporting regulations:</b>	A significant majority (>99%) of NRG's emission sources are subject to mandatory federal (USEPA) greenhouse gas reporting regulations. In addition, some of these emission sources (8% specified under IF0101-01(2) above) also report to regional and state CO <sub>2</sub> e reporting programs that are disclosed annually as part of NRG's financial reporting data (RGGI, AB32).
	<b>Discussion of accounting, estimations and uncertainty for scope 1 emissions:</b>	Scope 1 includes only direct GHG emissions associated with fuel combustion in boilers, turbines and engines used for the production of wholesale electric power. The Scope 1 GHG emissions were determined by using methods specified within Title 40, Chapter I, Subchapter C, Part 98, Subparts A, C and D of the Code of Federal Regulations. The determination of the equity share of GHG emissions is consistent with equity share methodologies for equity share accounting for greenhouse gas emissions as described in GHG Protocol: A Corporate Accounting and Reporting Standard, Revised Edition.  GHG emissions from combustion of fossil fuels used for other activities or equipment, such as auxiliary boilers, starter engines, mobile sources and offices is not included and was estimated to represent under 0.25% of the reported Scope 1 emissions. The Scope 1 emissions do not include emissions from fugitive sources such as hydro fluorocarbon releases from use of refrigeration and/or air conditioning equipment, sulfur hexafluoride (SF6) from electrical equipment and methane releases from natural gas transport.
IF0101-02	<b>Description of long-term and short-term strategy or plan to manage scope 1 emissions, emission-reduction targets, and an analysis of performance v. those targets</b>	NRG anticipates reductions in its future emissions profile as the company modernizes the fleet. From 2016 to 2017, the Company's U.S. CO <sub>2</sub> e emissions decreased from 49 million metric tons to approximately 48 million metric tons, representing a 2% reduction year over year. The primary factor leading to the decreased emissions include reductions in fleet wide annual net generation due to a continued market-driven shift towards increased generation from natural gas over coal. NRG's goal is to reduce its total U.S. Scope 1, 2 (purchased electricity) and 3 (business travel) CO <sub>2</sub> e emissions by 50% by 2030, and 90% by 2050, using 2014 as a baseline.

SASB code	Accounting metric	2017			
<b>Air quality</b>					
IF0101-04	<b>Air emissions source</b>	<b>Air emissions</b> (metric tons)	<b>Percentage from production facilities within urbanized areas</b>		
	NOx	22,510	28%		
	SOx	61,430	54%		
	PM10*	3,704	45%		
	Pb**	.31	18%		
	Hg***	.15	9%		
<p><b>Discussion of accounting, estimations and uncertainty for air emissions:</b></p> <p>*The requirement to report PM-10 emissions in annual emissions inventories or emissions statements varies between states. In addition, the earliest reporting deadline for a reporting year is April 1st of the following year. For sites in NRG's fleet that have not yet or are not required to report PM-10 emissions at the time of submittal to SASB, NRG has used USEPA's AP-42 emission factors to estimate emissions.</p> <p>** In the case of lead emissions, volumes are estimated for some facilities based on prior year due to incomplete data at time of publication.</p> <p>***In the case of mercury emissions, volumes are estimated for some facilities based on prior year due to incomplete data at time of publication.</p>					
<b>Water management</b>					
IF0101-05	<b>(1) Total water withdrawn (thousands of cubic meters)</b>	~3,866,135			
		<b>2017 NRG water withdraw by source</b>			
		<b>Water source</b>	<b>Total (thousands of cubic meters)</b>	<b>Percent</b>	
		Fresh water	~1,726,852	44%	
		Non-fresh water	1,033,280	27%	
		Ocean	1,106,003	29%	
		Total	3,866,135	100%	
	<b>(2) Total water consumed, (thousands of cubic meters)</b>	201,554			
	<b>Percentage of each in regions with high or extremely high baseline water stress</b>	<b>Baseline water stress high (40-80%) extremely high (&gt;80%)</b>	<b>Withdrawal from areas with high or extremely high baseline water stress</b>	<b>Consumption from areas with high or extremely high baseline water stress</b>	
		Percent of total water	27%	41%	
Percent that is non-fresh*		24%	61%		
<p>*Non-Fresh water has a total dissolved solids great than 1000 mg/l and is not used for agriculture or municipal water supply.</p> <p>NRG uses the World Resource Institute Aqueduct and the World Wildlife Federation Water Risk Tool to model and help assess water basin risks in combination with regional internal subject matter expertise. NRG models 123 generating locations, which are fossil fuel, renewable, nuclear and thermal facilities. The World Resource Institute Aqueduct tool identifies 55 facilities located in high (40-80%) or extremely high (&gt;80%) baseline water stress.</p>					
<b>Type of generating facility in baseline water stress area</b>			<b>Number</b>		
Fossil fuel (natural gas, coal, oil)			21		
Renewable (solar and wind)			26		
Nuclear			1		
Thermal (district heating and cooling)			7		
Total			55		

SASB code	Accounting metric	2017					
<b>Water management (continued)</b>							
IF0101-06	Number of incidents of non-compliance with water-quality and/or quantity permits, standards and regulations	21					
IF0101-07	<p><b>Discussion of water management risks:</b>  NRG's definition of substantive risk from water is the possibility that an event will occur and significantly affect the achievement of NRG's business goals. Risk identification and assessment process applies to both direct operations and supply chain. NRG uses the measures, metrics and indicators for water risk assessment leveraging the management and professional judgment from the following perspectives:</p> <ul style="list-style-type: none"> <li>• <b>Financial impact</b> <ul style="list-style-type: none"> <li>◦ Corporate earnings</li> <li>◦ Capital expenditure on technologies to reduce water consumption and withdrawal</li> </ul> </li> <li>• <b>Plant operation</b> <ul style="list-style-type: none"> <li>◦ Operation disruption due to water shortage</li> <li>◦ Increase in costs of water usage</li> <li>◦ Supply chain risk</li> </ul> </li> <li>• <b>Environmental impact</b> <ul style="list-style-type: none"> <li>◦ Water availability</li> <li>◦ Water quality of river basins</li> <li>◦ Regulations that impact supply and/or management of water</li> </ul> </li> </ul> <p><b>Discussion of strategies and practices to mitigate risks:</b>  Water risk is monitored by the risk owners (individual plant operators) and reported to management upon material changes with a threshold of 20% in water consumption and withdrawal levels. If it is determined that a water supply risk exists that could impact projected generation levels within any plant within the subsequent two year time frame, risk mitigation efforts are identified and economically evaluated for implementation. Water risk regarding the impact for barge delivery is evaluated on a daily basis, with contingency plans developed as needed. NRG has long-term water contracts and agreements which mitigates risk. NRG executive management reviews modeling scenarios generated for water risk determination. Plant level NRG water usage analysis is reviewed annually by the management of NRG Operations, Engineering and Commercial Operations.</p>						
<b>Coal ash management</b>							
IF0101-08	Amount of coal combustion residuals generated (metric tons)	1,348,612					
	Percentage recycled (metric tons)	68%					
IF0101-09	Total number of coal combustion residuals impoundments	18 surface impoundments as defined by 40 CFR 257.2.					
	Number by EPA hazard potential classification, broken down by EPA structural integrity assessment	NRG impoundment structural integrity rating and hazard potential classification					
			<b>Less than low</b>	<b>Low</b>	<b>Significant</b>	<b>High</b>	<b>Incised**</b>
		<b>Satisfactory</b>	0	8	3	0	0
		<b>Fair</b>	0	0	0	0	0
		<b>Poor</b>	0	0	0	0	0
		<b>Unsatisfactory</b>	0	0	0	0	0
		<b>Not applicable</b>	0	3	0	0	3
<p>*Powerton Former Ash Basin will be evaluated by April 17, 2018 as required by the CCR regulation which is not in scope of this report. Thus, it is not included in the table.</p> <p>**Incised is an impoundment, but not subject to assessment due to the fact they do not have a dam.</p> <p>To align with EPA reporting, we have added a column for 'Incised' and a row 'Not Applicable' to account for all impoundments as defined by the EPA.</p>							

SASB code	Accounting metric	2017		
<b>Workforce health and safety</b>				
IF0101-12	(1) Total recordable injury rate	0.57		
	(2) Fatality rate	0		
	(3) Near miss frequency rate	34.91 <b>Process for classifying, recording and reporting:</b> <i># of near misses reported / total hours worked X 1,000,000 = near miss frequency rate</i> The National Safety Agency defined near misses as "an unplanned event that did not result in injury, illness, or damage, but had the potential to do so." NRG utilizes an electronic Incident Management System (IMS) to document, communicate, track, and trend specific factors about each event including causal factors and corrective actions; this system provides automated fleet-wide notifications. The number of near misses was derived from a report pulled from the IMS. NRG's OHS management system applies to 100% of US operations. The system also includes notifications to executive management when significant safety events occur that meet the defined criteria for a Significant Event notification. The system also generates weekly reports to communicate previous weeks' event to NRG personnel.		
<b>Nuclear safety and emergency management</b>				
IF0101-15	Total number of nuclear power units, broken down by nuclear regulatory commission action matrix column	NRG South Texas LP is a 44% owner of a joint undivided interest in STP, the other owners of STP being the City of Austin, Texas (16%) and the City Public Service Board of San Antonio (40%).		
		Reactor unit	Action matrix column	Current regulatory oversight
		South Texas 1	Regulatory response	Baseline inspection
		South Texas 2	Regulatory response	Baseline inspection
		Table source: <a href="https://www.nrc.gov/reactors/operating/oversight/actionmatrix-summary.html#r_4">https://www.nrc.gov/reactors/operating/oversight/actionmatrix-summary.html#r_4</a> as of March 2018		
IF0101-16	Discussion of efforts to manage nuclear safety and emergency preparedness	As a holder of an ownership interest in STP, NRG South Texas LP is an NRC licensee and is subject to NRC regulation. The NRC license gives NRG the right only to possess an interest in STP but not to operate it. As a possession-only licensee, i.e., non-operating co-owner, the NRC's regulation of NRG South Texas LP is primarily focused on NRG's ability to meet its financial and decommissioning funding assurance obligations. In connection with the NRC license, NRG and its subsidiaries have a support agreement to provide up to \$120 million to support operations at STP.		
<b>Management of the Legal &amp; Regulatory Environment</b>				
IF101-21	Discussion of positions on the regulatory and political environment related to environmental and social factors and description of efforts to manage risks and opportunities presented	A discussion of risks can be found in the 2017 10-K SEC filing, Item 1-A, Risk Factors Related to NRG Energy, Inc., pages 35-52.  Regulatory filings, white papers, presentations, and other materials that NRG has prepared and submitted setting forth NRG's positions on a variety of critical subjects driving our business and the industry can found at <a href="http://www.nrg.com/company/energy-policy/">http://www.nrg.com/company/energy-policy/</a> .		