

# Tractebel Energia SA

ISIN CODE: BRTBLEACNOR2

Overall score 49/100

Sector: Electric & Gas Utilities  
Emerging Market

Companies in sector panel: 46

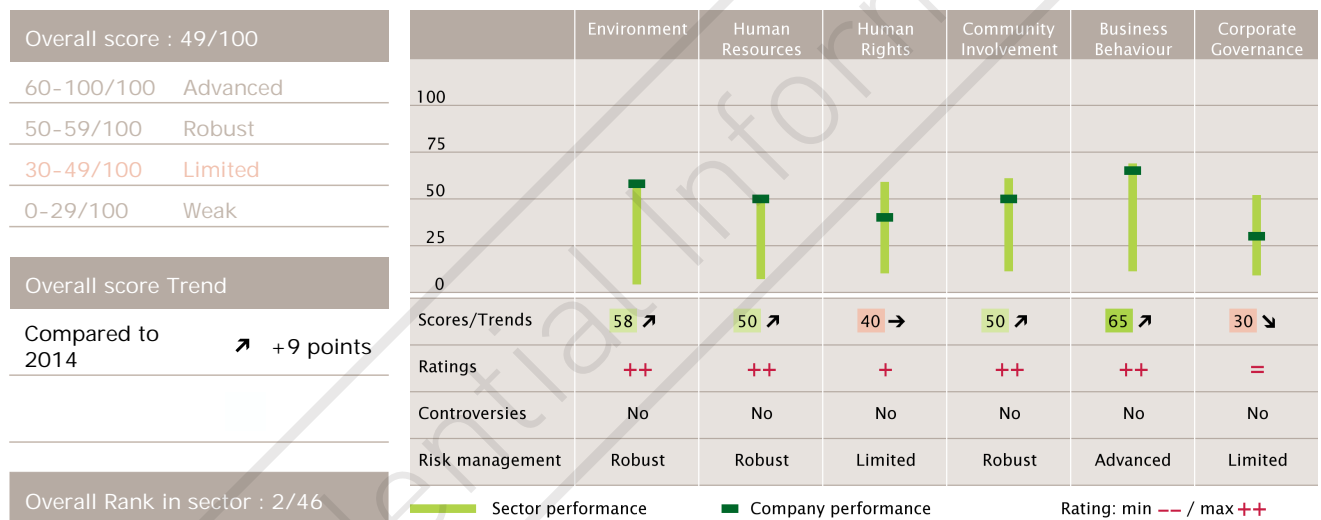
Information rate: 70% (Sector average: 50%)  
Company cooperation level: Partially responsive \*

## General information

Tractebel Energia SA operates as a power generation company. Its activities include generation and commercialization of electrical energy. The Company was founded on January 29, 1998 and is headquartered in Florianópolis, Brazil.

Main Economic Segment**	Turnover 2014
Generation and commercialization of electrical energy	100 %

## Overall CSR performance & trends



- Tractebel's overall approach to manage its CSR performance is considered to be limited (49/100) in absolute terms. This performance has improved compared to our previous review (40/100).
- The Company displays a heterogeneous approach to address its ESG impacts as it exhibits limited performances in the Governance and Social pillars while its Environmental performance is considered to be robust.
- Tractebel has not been involved in any controversy during the period under review according to stakeholders' sources.

### Company inclusion in Vigeo Indices\*\*\*

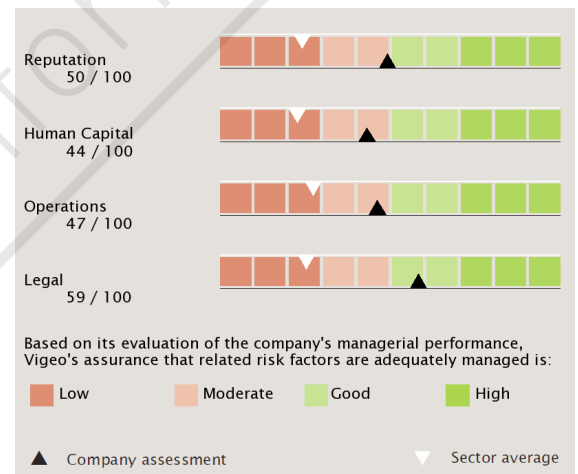


\* On a 4-level scale: proactive, responsive, partially responsive, not responsive  
 \*\* See detailed economic indicators in Selected financial data section  
 \*\*\* Based on the most recent Index at the date of publication

## Management of Risks and Opportunities

Weight of the Sustainability drivers	Weaknesses		Strengths	
	3	<ul style="list-style-type: none"> <li>Access to energy</li> <li>Board of Directors</li> </ul>	<ul style="list-style-type: none"> <li>Air emissions from combustion power plants</li> </ul>	<ul style="list-style-type: none"> <li>Career management</li> </ul>
2	<ul style="list-style-type: none"> <li>Reorganisation</li> <li>Audit &amp; Internal Controls</li> <li>Executive Remuneration</li> </ul>	<ul style="list-style-type: none"> <li>Industrial accidents and pollution</li> <li>Fundamental human rights</li> <li>Non-discrimination and diversity</li> </ul>	<ul style="list-style-type: none"> <li>Biodiversity</li> </ul>	<ul style="list-style-type: none"> <li>Environmental strategy</li> <li>Shareholders</li> </ul>
1		<ul style="list-style-type: none"> <li>Fundamental labour rights</li> </ul>	<ul style="list-style-type: none"> <li>Social standards in the supply chain</li> </ul>	<ul style="list-style-type: none"> <li>General interest causes</li> </ul>
	<b>Weak</b> 0 to 29 points	<b>Limited</b> 30 to 49 points	<b>Robust</b> 50 to 59 points	<b>Advanced</b> 60 to 100 points

- Considered as the main strength of Tractebel, the Company's approach towards **social and economic development** of its areas of operations demonstrates its ability to build on its good management of this area to create local and national opportunities for itself in its societal environment. Tractebel's formalised commitments to implement local capacity building programmes and support development of infrastructure are backed with partnerships to prioritize the contracting and development of suppliers and professionals locally, in addition to dedicated support to non-governmental initiatives aimed at vocational training. Besides, Tractebel appears to conduct public hearings and surveys for evaluation of the social, economic and environmental aspects related to the implementation and operation of projects, in addition to participation in regional development forums and joint social and cultural development and environmental improvement initiatives.



- Amid a national context negatively impacted by the "Lava Jato" high-level corruption scandal, involving big companies as well as many officials and state institutions, Tractebel appears to be in a good position for an adequate mitigation of the legal and operational risks associated with the economic environment in which it evolves. Risks of legal proceedings and judiciary campaigns related to business ethics appear to be sufficiently handled through a comprehensive commitment to address **corruption** issues including conflict of interest, bribery and illegal financing of political parties, in addition to formal training programmes for employees on ethical matters, approval procedures for gifts by an independent entity, and efficient whistleblowing systems. Besides, the Company's business model almost exclusively relying on **renewable sources**, thus isolating Tractebel from the fuel supply context and any reliance on Petrobras and its doubtful contracts, is to be considered as an additional strength enabling the Company to avoid operational constraints linked to any interruption of supplies due to ongoing legal proceedings against the country's main oil and gas supplier.

\* We consider legal security as an element of a company's tangible or intangible assets. We define legal risk as the potential impact - negative or positive - on these assets, considering the management of CSR issues possibly involving the company's legal responsibility. Under no circumstances should our opinion be construed as a due diligence or an assurance in the meaning of regulations such as, for instance, the Sarbanes-Oxley Act in the USA or the Loi de Sécurité Financière in France

## Company performance in all the Sustainability Drivers

Weight of the Sustainability driver		Overall score 49/100		Trend	Score
<b>Environment</b>					
ENV1.1	2	Environmental strategy	↗	↗	88
ENV1.2	2	Industrial accidents and pollution	↗	↗	43
ENV1.3	3	Renewable energy	↗	↗	77
ENV1.4	2	Biodiversity	↗	↗	54
ENV2.2	1	GHG emissions from T&D			N/R
ENV2.4	3	Air emissions from combustion power plants	→	→	30
ENV3.1	2	Energy demand-side management			N/R
<b>Human resources</b>					
HRS1.1	1	Social Dialogue			N/R
HRS2.3	2	Reorganisation	→	→	27
HRS2.4	3	Career management	↗	↗	51
HRS3.2	3	Health and safety	↗	↗	65
<b>Human rights</b>					
HRT1.1	2	Fundamental human rights	→	→	40
HRT2.1	1	Fundamental labour rights	→	→	43
HRT2.4	2	Non-discrimination and diversity	→	→	36
<b>Community involvement</b>					
CIN1.1	3	Social and Economic Development	↗	↗	50
CIN2.1	3	Access to energy	↗	↗	65
CIN2.2	1	General interest causes	↗	↗	29
			↗	↗	70
<b>Business behaviour (c&amp;s)</b>					
C&S1.3	2	Customer relations			65
C&S2.4	1	Social standards in the supply chain			N/R
C&S3.1	3	Corruption	↗	↗	56
C&S3.2	3	Anti-competitive practices	↗	↗	69
			↗	↗	64
<b>Corporate governance</b>					
CGV1.1	3	Board of Directors	↘	↘	30
CGV2.1	2	Audit & Internal Controls	↘	↘	27
CGV3.1	2	Shareholders	↗	↗	14
CGV4.1	2	Executive Remuneration	→	→	78
			→	→	4

**Weak** (0-29/100)
  **Limited** (30-49/100)
  **Robust** (50-59/100)
  **Advanced** (60-100/100)

⚡ **Involvement in allegations**
☔ **Involvement in allegations with evidence of corrective measures**

N/R means that this Sustainability Driver is not analysed for this Company

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

## Selected financial data

Key data	Net sales revenue	EBIT	Employees
2015	BRL 6,512m	BRL 2,503.8	1,135
2014	BRL 6.472m	BRL 2,303m	1,134
2013	BRL 5,569m	BRL 2,387m	1,125
2012	BRL 4,912m	BRL 2,547m	1,082
2011	BRL 4,327m	BRL 2,409m	1,084

Main shareholders	2015
ENGIE SA	68.7 %
Banco Clássico SA	10 %

Geographical breakdown	Net sales revenue 2014	Employees 2014
Brazil	100 %	100 %

All Economic Segments	Turnover 2014
Generation and commercialization of electrical energy	100 %

## Selected ESG Indicators

	2015
Non-executive Board member(s) responsible for CSR issues	No
Executive remuneration linked to CSR performance	No
Carbon factor (3-year trend)	î
Percentage of independent Board members	12.5
Percentage of women on Board	0
Percentage of women in Executive team	0
Percentage of women in workforce	N/A
3 year trend for safety at work	î
Involvement in armament	No
Management of social risks in supply chain	Robust

## Involvement in disputable activities: summary

This section is dedicated to disputable activities in which the company is involved. 9 disputable activities are analyzed (see list below) following 30 parameters. Additional analysis and full database access are available as an option.

For more information please contact us at [customer.service@vigeo.com](mailto:customer.service@vigeo.com)

	Level of involvement	% of revenues
<input type="checkbox"/>	Alcohol	%
<input type="checkbox"/>	Animal maltreatment	%
<input type="checkbox"/>	Armament	%
<input type="checkbox"/>	Hazardous chemicals	%
<input type="checkbox"/>	Gambling	%
<input type="checkbox"/>	GMOs in food & feed	%
<input type="checkbox"/>	Nuclear energy	%
<input type="checkbox"/>	Sex industry	%
<input type="checkbox"/>	Tobacco	%

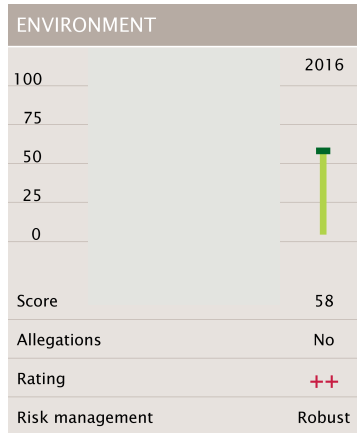
A company's level of involvement (Major, Minor, No) in a disputable activity is based on:

- An estimation of the revenues derived from disputable products or services
- The precise nature of the disputable products or services provided by the company

N/A means that the data is not available.

## CSR performance per domain

■ Sector performance  
■ Company performance  
Rating: min -- / max ++

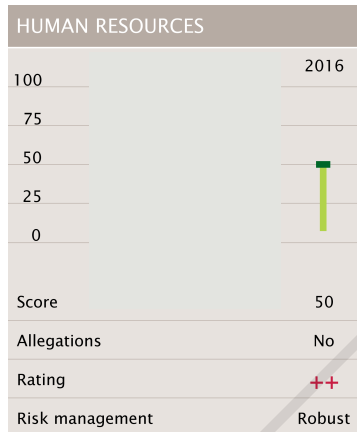


### Key issues

The Electric & Gas Utilities sector has a major role to play towards the achievement of demanding climate and energy targets (ENV 2.4), and the development of renewable energy is strongly required (ENV 1.3). To achieve such objectives, companies must set ambitious climate change strategies, backed by relevant targets and widespread environmental management systems (ENV 1.1).

### Company performance

- The Company's Environmental performance appears to be robust.
- This performance has improved compared to our previous review (19 points).
- The Company displays an advanced Environmental strategy that addresses all its responsibilities. Also, the low carbon factor that stood at 132 KgCO<sub>2</sub>/MWh in 2014 and the high percentage of ISO 14001 standing at 83.6% in the same year improved the Company's performance. The Company also reports on significant measures to protect biodiversity and develop renewable energy. Room for improvement remains regarding the Company's atmospheric emissions which have shown a negative trend over the past years.

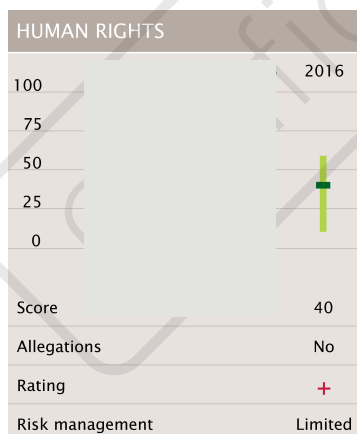


### Key issues

Safeguarding the safety and health of employees and contractors (HRS3.2) remains a key risk factor in the sector, and this includes the prevention of stress, which is an emerging issue in the sector. Similarly, anticipating the ageing workforce and subsequent leaving of highly skilled workers on retirement through the development of career management and promotion of employability represents a major sector challenge (HRS2.4). Companies are also expected to put in place corporate strategies to limit the impacts of reorganisations on employees (HRS2.3).

### Company performance

- In terms of Human Resources, the Company's absolute performance is robust.
- This performance has improved compared to our previous review of the Company.
- The Company's formalised commitment regarding safety and career management appear to be more comprehensive; in addition, an improvement has been noticed regarding measures to address these issues which positively impacted Tractebel's performance. However, even though the Company fails to report on how it manages reorganisation, its workforce has increased since 2012.

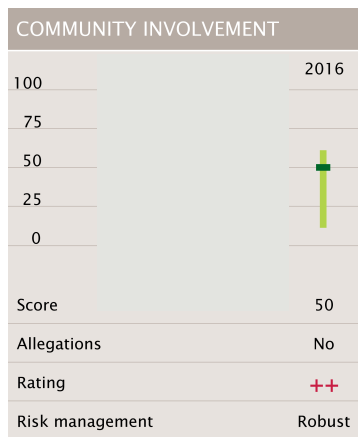


### Key issues

Companies with operations in weak governance zones and which are involved in large-hydro projects, mining activities, or gas exploration, tend to be more exposed than others to violations of stakeholders' human rights (HRT 1.1). Electric & Gas Utilities should also have policies and management systems in place, e.g. information, training, risk-mapping, to deal with labour rights issues in their countries of operation and guarantee freedom of association and the right to collective bargaining (HRT 2.1). Finally, the industry remaining largely male dominated, discrimination should be banned and diversity promoted if companies want to increase their competitiveness as well as attract and retain talents (HRT 2.4).

### Company performance

- Tractebel's performance in the Human Rights domain is considered to be limited in absolute terms.
- The Company's performance has remained stable compares to the previous review.
- The Company reports on a formalised commitments to prevent human rights violations, ensure the respect of freedom of association and prevent discrimination within its staff. However, the Company does not report on any measures aimed at putting these commitments in practice. Finally, during the past three years, the share of women in management positions has declined.

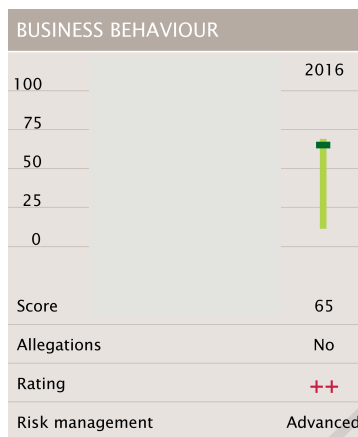


**Key issues**

Power generation companies have an important role to address issues related to fuel poverty and promote access to energy (CIN 2.1). On top of that, in their regions of operations, electric & gas utilities should deal with the disruptive impacts of their operations and promote the local social and economic development (CIN 1.1).

**Company performance**

- The Company's absolute performance in the Community Involvement domain appears to be robust.
- This performance has improved compared to our previous review of the Company (19 points).
- This increase is mainly explained by the improvement of measures to address both local social and economic development as well as the mitigation of impact of operations on surrounding communities. In fact the Company reports on significant efforts in this regard. Concerning contribution to general interest causes, in addition to significant measures in place, Tractebel reports on improving indicators. However, the Company does not appear to report comprehensively on its endeavours to promote access to energy as only references have been reported.

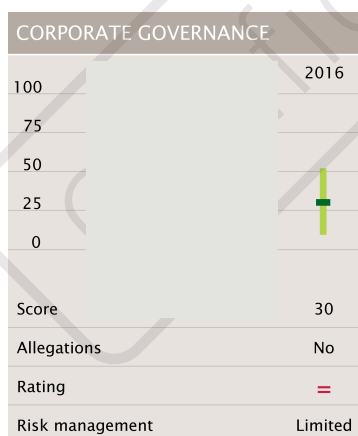


**Key issues**

Electric & Gas Utilities and Electric & Gas Transmission companies operate in highly regulated markets where risks and opportunities are often shaped by fiscal and regulatory frameworks and reforms. The prevention of corruption and of conflicts of interest (C&S 3.1) is the main sector challenge). In a context of increasing competition, old incumbent operators may be tempted to violate competition rules (C&S 3.2) to keep their dominant position.

**Company performance**

- Tractebel displays an advanced absolute performance in the Business Behaviour domain.
- This performance has improved compared to our previous review (14 points).
- The disclosure of a formalised commitment to integrate social factor in the supply chain and the reporting on corruption incident has positively impacted the Company's performance in this domain. In addition, the Company has an Ethics committee in charge of issues related to prevention of corruption and anti-competitive practices that can be contacted directly by employees and has implemented approval procedures for gifts. Besides, the Company reports to include social issues into contractual clauses with its suppliers and provides them with training on sustainable corporate management.



**Key issues**

Corporate governance is critical to ensuring that a well-functioning system of checks and balances protects the interests of all of the company's stakeholders. The effectiveness of the Board of Directors (CGV1.1) is a key issue to be addressed: this can be gleaned from information on Board composition (independence and competencies) and its way of functioning (regularity of Board meetings, evaluation of performance). Other important corporate governance factors include the effectiveness of the Audit and Internal control system (CGV2.1), the protection of Shareholders Rights (CGV3.1) and the establishment of Executive Remunerations (CGV4.1) which align executives' and company's interests.

**Company performance**

- On Corporate Governance, Tractebel displays a limited absolute performance.
- This performance has deteriorated compared to our last review.
- The Company displays a low level of independence at Board level. Besides, it appears no specific committee is in charge of nominating directors, remuneration or audit. The Company's low reporting on governance matters weakens its performance. On a positive note, the Company's management of relations with shareholders is advanced, with no restrictions voting rights or to convene an EGM. Besides, safeguards appear to be in place to monitor transactions with major shareholders.

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

## Detailed analysis

<b>Environment</b>	<b>9</b>
<b>ENV1.1</b> Environmental strategy	9
<b>ENV1.2</b> Pollution prevention and control (soil, accident, industrial safety, nuclear)	9
<b>ENV1.3</b> Development of renewable energy	10
<b>ENV1.4</b> Protection of biodiversity	11
<b>ENV2.2</b> Management of energy consumption and GHG from Transmission & Distribution activities	12
<b>ENV2.4</b> Management of energy consumption and air emissions from fossil-based Generation activities	12
<b>ENV3.1</b> Energy demand-side management	13
<b>Human Resources</b>	<b>14</b>
<b>HRS1.1</b> Promotion of labour relations	14
<b>HRS2.3</b> Responsible management of reorganisations	14
<b>HRS2.4</b> Career management and promotion of employability	15
<b>HRS3.2</b> Improvement of health and safety conditions	16
<b>Human Rights</b>	<b>18</b>
<b>HRT1.1</b> Respect for human rights standards and prevention of violations	18
<b>HRT2.1</b> Respect for freedom of association and the right to collective bargaining	19
<b>HRT2.4</b> Non-discrimination	20
<b>Community Involvement</b>	<b>21</b>
<b>CIN1.1</b> Promotion of the local social and economic development	21
<b>CIN2.1</b> Promotion of access to energy and prevention of fuel poverty	23
<b>CIN2.2</b> Contribution to general interest causes	24
<b>Business Behaviour (C&amp;S)</b>	<b>25</b>
<b>C&amp;S1.3</b> Responsible Customer Relations	25
<b>C&amp;S2.4</b> Integration of social factors in the supply chain	25
<b>C&amp;S3.1</b> Prevention of corruption	26
<b>C&amp;S3.2</b> Prevention of anti-competitive practices	27
<b>Corporate Governance</b>	<b>29</b>
<b>CGV1.1</b> Board of Directors	29

<b>CGV2.1</b>	<b>Audit &amp; Internal Controls</b>	<b>30</b>
<b>CGV3.1</b>	<b>Shareholders</b>	<b>31</b>
<b>CGV4.1</b>	<b>Executive Remuneration</b>	<b>31</b>

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

Confidential Information

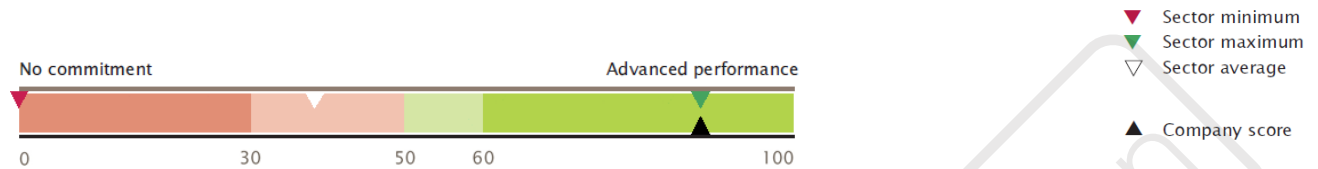


## Environment

Score : 58

### ENV1.1 Environmental strategy

(score: 88, weight: 2)



The company operates 28 power plants comprising: 9 large and medium-sized hydroelectric, 5 thermoelectric, 3 small hydroelectric power plants, 7 wind farms, 3 biomass and 1 solar photovoltaic with an installed capacity of 8,765 megawatts.

#### Visibility of commitment to environmental issues

*The company has issued a formalised commitment to environmental protection in its Code of Ethics and its Environmental Code.*

#### Relevance of environmental strategy

*The company commits to all its responsibilities in terms of environmental protection:*  
 - Protection of biodiversity  
 - Pollution prevention and control (soil, accident)

#### Relevance of climate change strategy

*The company commits to all its responsibilities in terms of climate change:*  
 - Development of renewable energy.  
 - Management of greenhouse gas emissions from Generation activities.

#### Ownership of commitment

The commitment applies throughout the company, supported by senior management. In addition, there is a dedicated structure responsible for this issue.  
*The Sustainability Committee Environment Management Department are in charge of environment issues within Tractebel.*

#### Means allocated to environmental management

*Following the ISO 14001 certification, we assume the company has allocated resources to environmental management, including training, communication and monitoring.*

#### Coverage of certified environmental management systems

*The company's installed capacity that has a certified environmental management system was at 83.6% in 2015.*

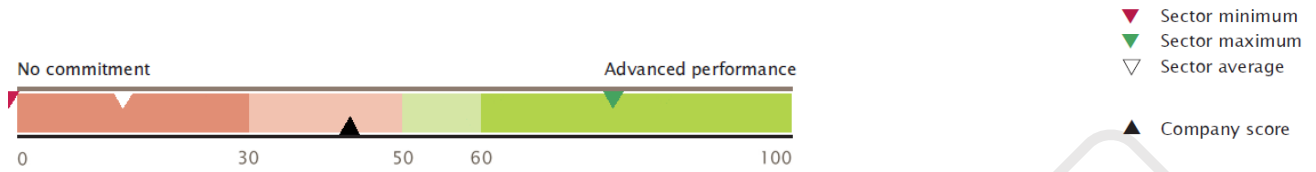
#### Carbon factor

The company's power and heat generation activities produce very low (direct) GHG emissions  
*The company's carbon factor stood at 132 Kg CO<sub>2</sub>/MWh in 2014.*

Leadership	86	Implementation	90	Results	N/A
Visibility	65	Means & resources	81	Performance	N/A
Relevance	100	Scope	N/A	Trends	N/A
Ownership	65	Coverage	100		

**ENV1.2 Pollution prevention and control (soil, accident, industrial safety, nuclear)**

(score: 43, weight: 2)



**Relevance of commitments on pollution prevention and control**

The company's commitments take into account accidental pollution prevention during its operations.

**Means allocated to pollution prevention and control**

Information obtained from the company and public sources regarding means allocated to pollution prevention and control is insufficient.

**Coverage**

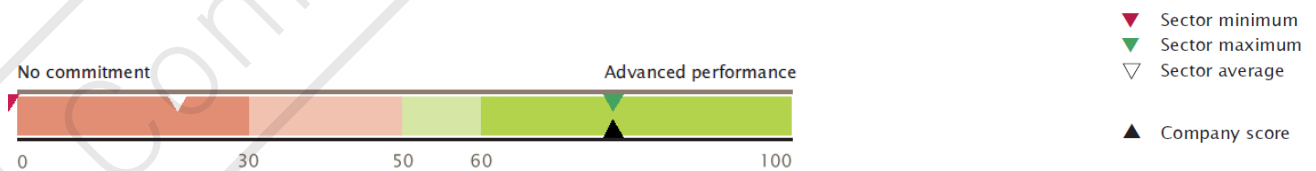
**Existence of accidental pollution**

The company's reporting indicates that there have been no environmental incidents in the last three years, and this has been confirmed by a review of relevant stakeholder sources.

<b>Leadership</b>	<b>30</b>	<b>Implementation</b>	<b>0</b>	<b>Results</b>	<b>100</b>
Visibility	N/A	Means & resources	0	Performance	N/R
Relevance	30	Scope	N/A	Trends	100
Ownership	N/A	Coverage	0		

**ENV1.3 Development of renewable energy**

(score: 77, weight: 3)



**Relevance of the company's commitment in terms of renewable energy.**

The company's commitment on developing renewable energy is general as no quantified targets have been disclosed.

**Installed capacity in renewable energy sources**

In 2015, the company had an installed capacity of renewable sources of 7,646 MW, representing thus 87.2% of its total installed capacity.

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

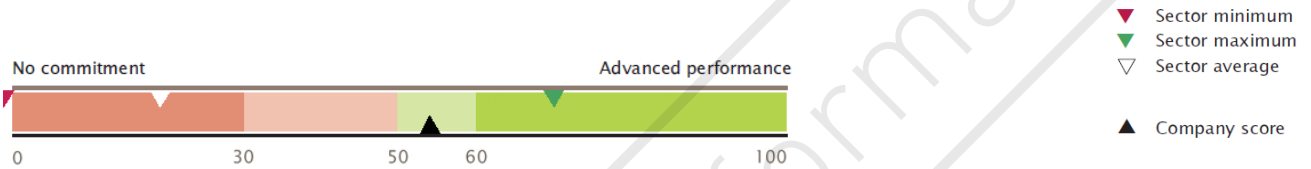
**Performance**

Energy generation from hydro plants was at 83.4% in 2015.  
Energy generation from thermal plants was at 13.5% in 2015.  
Energy generation from complementary sources was at 3.1% in 2015.

Leadership	30	Implementation	100	Results	100
Visibility	N/A	Means & resources	100	Performance	100
Relevance	30	Scope	N/A	Trends	N/A
Ownership	N/A	Coverage	N/A		

**ENV1.4 Protection of biodiversity**

(score: 54, weight: 2)



**Relevance of the commitment**

The company's commitment towards biodiversity protection covers the main impacts of its activities:

- Effects on aquatic's flora dynamic
- Effects on population's dynamic (breeding, feeding and reproduction behaviour), due to noise, habitats degradation or fragmentation
- Effects on sensitive or migratory species (due to noise, habitat degradation)
- Effect of habitat fragmentation and ecosystems

**Managerial tools allocated to integrate biodiversity in the management of operations**

The company has implemented relevant measures to identify the impacts of its operations on biodiversity, including:

- Environmental impact assessments and risk mapping: Tractebel has contracts with companies specialising in environmental and property monitoring. They identify aspects and environmental impacts from Tractebel activities classifying them by significance levels to protection of biodiversity. Reservoir areas are defined for all the production units of the company.
- Monitoring of biodiversity indicators: For each reservoir, the company monitors indicators on the surface of the reservoir, number of mammals species, number of bird species, number of fish species, number of amphibian species and number of reptile species.

**Local measures taken to protect biodiversity on operation sites**

The company has implemented some measures to limit the impacts of its operations on biodiversity such as:

- Biotope management plans: Before deforestation and reservoir formation, studies are carried out. During this process, animals are rescued and preservation strips are maintained around the reservoir, also helping maintain water quality. Species that are potentially dangerous to local populations, such as insects, snails that transmit diseases and venomous animals, are also monitored and controlled by studies and regular research. Furthermore, the company reports to work for ensuring the continuity of native species through reforestation and recovery of vegetation.
- Fish protection programmes: The company ensures the restocking of rivers by lab breeding the fry of native species.

**Coverage of local measures allocated to protect biodiversity on operation sites**

All the company's relevant sites or operations are covered by these measures. *The company's measures are applied in all production units reservoirs.*

**Results with regard to biodiversity protection**

Indicators on biodiversity are published but they are not representative enough *Tractebel monitors indicators specific to each plant and does not provide historic data to assess a trend.*

**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

Leadership	65	Implementation	63	Results	35
Visibility	N/A	Means & resources	48	Performance	65
Relevance	65	Scope	N/A	Trends	0
Ownership	N/A	Coverage	100		

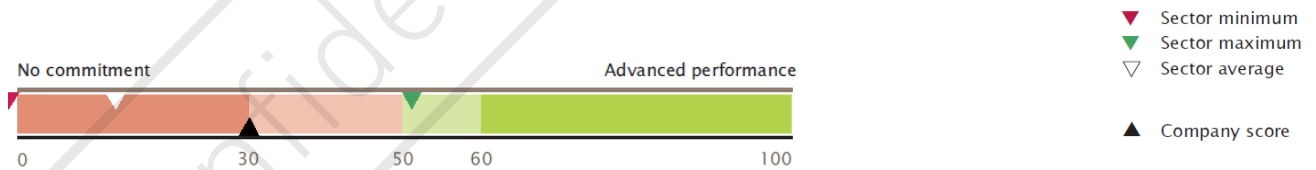
**ENV2.2 Management of energy consumption and GHG from Transmission & Distribution activities**

(deactivated)

Tractebel Energia SA is only active in the Generation segment and does not have any Transmission and Distribution activities. Thus this sustainability driver is deactivated for the company.

**ENV2.4 Management of energy consumption and air emissions from fossil-based Generation activities**

(score: 30, weight: 3)



**Relevance of the company's commitment on improving thermal power plants efficiency and reducing related air emissions**

*The company discloses a general commitment to improving thermal power plants' efficiency and reducing related air emissions as no quantified targets have been disclosed.*

**Means allocated to improve thermal power plants' efficiency (e.g. CCGT, CHP)**

*The installed capacity from CHP normalised to the total thermal installed capacity stood at 1.42% in 2012. However it has decreased by 43% over the past three years from 2.47% in 2010 to 1.42% in 2012. Data for 2013 and 2014 is not disclosed.*

**Means and technologies allocated to reduce SOx, NOx, PM and Mercury emissions**

The company has a major involvement in technologies developed to reduce air emissions (SOx, NOx, Particulates, Mercury):

- Particulate matter capture technologies: Tractebel has electrostatic precipitators which retain over 98.5% of particulate matter emissions.
- Flue gas cleaning systems (NOx and SO2): Tractebel has bag filters and a desulfurization system at the Charqueadas Thermoelectric Power Plant, which reduces the emissions of sulfur dioxide.
- Sourcing of low sulphur fuels: Reduction in the formation and emission of sulfur dioxide is done by controlling the sulfur content of coal and fuel oils.
- Other: the company allocated 100% of fly ash from burning coal to cement production, minimised the use of limestone in this process and in turn reducing emissions. Also, the company allocated 100% of ash produced in biomass plants to forestry and farming, replaced artificial fertilisers and thereby reduced related emissions.

**Share of the company's thermal plants covered by means and technologies to reduce SOx, NOx, PM and Mercury emissions**

The company has taken such measures in all its thermal power plants.

**Measures to develop innovative technologies such as carbon capture and storage and associated new combustion techniques**

The company has invested in R&D for the development of carbon capture and storage and associated new combustion techniques.

The company has 5 thermoelectric plants that do not require fossil fuels. One of them burns wood chips (Lages Cogeneration Unit) and two sugarcane bagasse (Ibiutiva Bioenergetica Thermoelectric Plant and Ferrari Thermoelectric, acquired in 2014) and uses rice-straw in the co-firing Process. with Pulverized Coal.

**Carbon Factor of thermal facilities (fossil-based power generation, excluding nuclear)**

The company does not disclose quantitative data on its thermal carbon factor.

**Emissions of substances responsible for acid rain (SO2, NOx)**

SO2 emissions normalised to production have increased but not continuously over the past five years from 2.7 gSO2/kWh in 2010 to 17.97 gSO2/kWh in 2014.

NOx emissions normalised to production have remained stable over the past five years at 2.6 gNOx/kWh in 2010 and 2014 (though it fluctuated).

**Other emissions: Particulates, Mercury emissions**

The company's Particulates emissions, normalised to production, have increased by 38% over the past five years from 0.045 (gP/kWh) in 2010 to 0.062 (gP/kWh) in 2014

**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

<b>Leadership</b>	<b>30</b>	<b>Implementation</b>	<b>43</b>	<b>Results</b>	<b>16</b>
Visibility	N/A	Means & resources	5	Performance	16
Relevance	30	Scope	100	Trends	N/A
Ownership	N/A	Coverage	100		

**ENV3.1 Energy demand-side management**

(deactivated)

Tractebel Energia SA does not have end-use customers. Thus this sustainability driver is deactivated for the company.

**Human Resources**

Score : 50

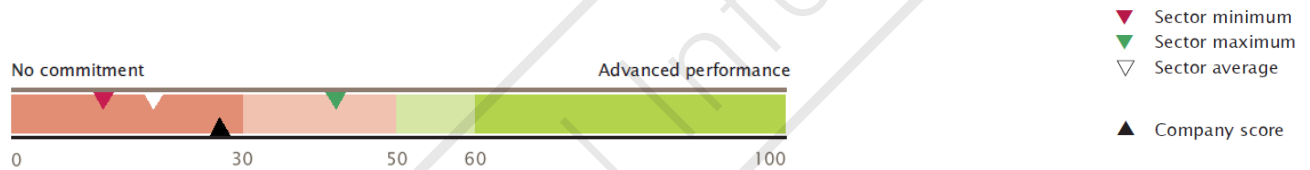
**HRS1.1 Promotion of labour relations**

(deactivated)

Preliminary note: This Sustainability Driver is only analysed for large companies in the Electric and Gas Utilities Emerging Market sector, it is therefore not analysed for this company.

**HRS2.3 Responsible management of reorganisations**

(score: 27, weight: 2)



In 2014, 20 employees opted for the Voluntary Dismissal Plan (PDV) and one employee transferred, to another company owned by the parent company, Engie. No restructuring is reported by the company, and nothing is found in stakeholders sources.

**Relevance of commitment to manage reorganisations responsibly**

The company does not disclose any commitment to manage reorganisations responsibly.

**Relevance of commitment to involve employee representatives in the process**

The company does not disclose any commitment to inform and consult employee representatives on reorganisations.

**Means allocated to prevent and manage reorganisations**

*Information obtained from the company and public sources regarding measures allocated to prevent and manage reorganisations is insufficient.*

**Coverage**

**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

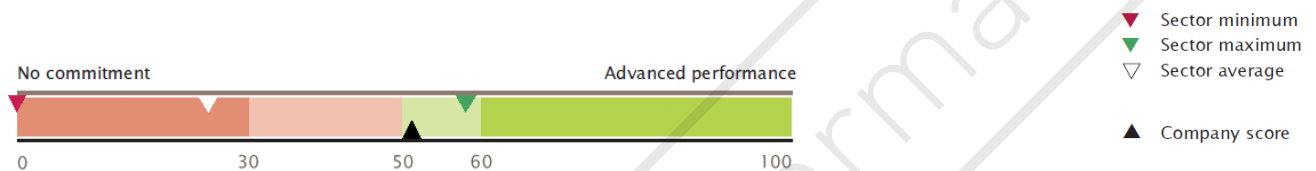
**Result of the company's commitment to manage reorganisations responsibly**

The company has been able to avoid redundancies or to maintain employment. Employees number has increased between 2012 and 2014.

<b>Leadership</b>	<b>0</b>	<b>Implementation</b>	<b>0</b>	<b>Results</b>	<b>81</b>
Visibility	N/A	Means & resources	0	Performance	81
Relevance	0	Scope	N/A	Trends	N/A
Ownership	0	Coverage	0		

**HRS2.4 Career management and promotion of employability**

(score: 51, weight: 3)



**Visibility of commitment**

The company has issued a largely publicised, formal commitment to promote career management and training which is publicly available in its Code of Ethics.

**Relevance of commitment**

The company's commitment to promoting career management and training addresses its main responsibilities:

- Anticipate short and long-term needs and skill requirements.
- Adapt employees' skill sets to their career paths.
- Enable the progressive improvement in employees' qualification levels.

**Ownership of commitment**

The Administrative Director is responsible for HR. However line managers do not appear to be evaluated on their performance in terms of HR management.

**Career management systems**

The company has set up an internal job opportunity marketplace. Moreover employees have regular performance assessment and career counselling interviews. The Company offers career self-management tools, like evaluations and feedback that give employees a good opportunity for reflection and improvement, in addition to highlighting each employee's strengths. Each year, employees are evaluated on their individual performance and every three years, according to 360° Skill Mapping that includes self-evaluation and the evaluation of colleagues, subordinates (as the case may be), supervisors, and internal clients. This process results in the Individual Development Plan (PDI).

**Coverage of career management systems**

These career management systems cover all of the company's employees. In 2014, the percentage of employees receiving regular performance and career development reviews was at 100%.

**Types of training provided to non-managers**

The training programmes are mostly aimed at adapting employees' skills to the requirements of their current position.

*The company reports to provide technical courses, occupational safety training, language courses and other types of training, such as behavior, leadership and communication. Ethical matters such as respect for diversity and human rights, as well as combating corruption, are part of the new employee Welcome Programme and are also addressed on occasions such as the release or disclosure of corporate policies and seminars on the Company's Code of Ethical Conduct.*

**Means allocated to training for all employees**

*The number of training hours per employee has increased continuously over the past five years by 73% from 40.4 Hours/Employee in 2011 to 70.04 Hours/Employee in 2015.*

**Mobility / turnover**

Information disclosed on indicators such as employee turnover or mobility rates is insufficient.

*The company discloses turnover for 2014 (3.8%), but does not disclose data for previous years.*

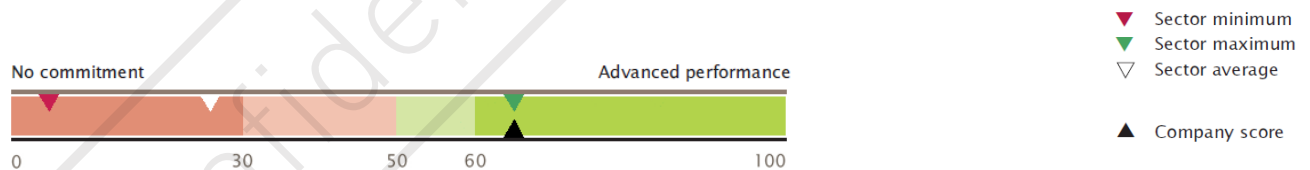
**Training delivered during the year under review**

*It is assumed that at least a minority of the company's employees received training during the year under review, 2015. The exact percentage is not disclosed.*

Leadership	62	Implementation	74	Results	18
Visibility	100	Means & resources	82	Performance	18
Relevance	65	Scope	30	Trends	N/A
Ownership	30	Coverage	100		

**HRS3.2 Improvement of health and safety conditions**

(score: 65, weight: 3)



**Visibility of health & safety commitments**

*The company has made a formalised commitment to health and safety issues, which covers both its own employees and sub-contracted workforce, in its Code of Ethics and Sustainable Management Policy.*

**Relevance of commitment on the improvement of health and safety conditions**

*The company's commitment addresses its main responsibilities:*

- Ensure awareness about health and safety issues.
- Reduce the number of work accidents and their severity.
- Reduce stress and promote well-being.
- Prevent occupational disease



<b>Ownership of commitment</b>	The commitment applies throughout the company, supported by senior management. In addition, employee representatives are involved at group level. <i>The Sustainability Committee is responsible for Occupational Health and Safety. Also, there are 10 In-company Accident Prevention Committee (CIPA) in the company's administrative headquarters and plants with more than 20 employees, formed by employee and company representatives.</i>
<b>Means allocated to health and safety</b>	<i>The company has allocated means to address these issues, including a certified health and safety system:</i> <ul style="list-style-type: none"> <li>- <i>Training: the Company's employees are trained on Occupational Health and Safety. Following the parent company, Engie, Tractebel launched an internal work accidents prevention campaign that emphasizes the incident identification and recording.</i></li> <li>- <i>Internal monitoring: the company monitors indicators on frequency and severity for both employees and sub-contracted workforce.</i></li> <li>- <i>Risk assessments: the company identifies and controls dangers and risks inherent to processes, equipment and workplaces. All groups are oriented regarding these dangers and risks, as well as respective measures for prevention and control.</i></li> <li>- <i>OHSAS 18001 certifications: All employees and outsourced employees receive training on health and safety and are covered with BS OHSAS 18001 certifications. The certification implies having internal H&amp;S audits; however, no further details are disclosed.</i></li> </ul>
<b>Coverage of health and safety system</b>	The health and safety measures cover the majority of the company's employees, as well as the company's contractors and sub-contractors. <i>In 2014, 100% of employees and outsourced workers received OHS training, and the OHSAS 18001 certifications covers 83.6% of the installed capacity as of 2015.</i>
<b>Means allocated to reduce stress at work</b>	<i>The company has allocated basic means to address stress at work, including:</i> <ul style="list-style-type: none"> <li>- <i>Monitoring of absenteeism: it is done for both employees and contractors.</i></li> <li>- <i>Stress support instruments: the company is involved in the promotion of sports and physical activity in general, on-the-job exercise, healthy eating, stress management, treatment and prevention of addictions and service to people with special needs.</i></li> <li>- <i>awareness raising for employees: the company organizes awareness campaigns on different topics related to wellness of employees.</i></li> </ul>
<b>Coverage of means allocated to reduce stress at work</b>	The measures allocated to address stress at work cover the majority of the company's employees. <i>All employees are covered by measures on promotion of well-being.</i>
<b>Accident frequency rate</b>	<i>Total recordable injury frequency rate (TRIFR) has decreased but not continuously over the past five years by 100% from 1.5 in 2011 to 0 in 2015.</i>
<b>Accident severity rate</b>	<i>Severity rate has decreased but not continuously over the past five years by 100% from 0.025 in 2011 to 0 in 2015.</i>
<b>Occupational diseases</b>	<i>Rate of absenteeism for employees has increased by 25% over the past three years from 2.15% in 2010 to 2.45% in 2012. Data for 2013 and 2014 is not disclosed. Rate of occupational illnesses has been stable at 0 between 2010 and 2014.</i>
<b>Accident frequency rate at contractors'</b>	<i>Total recordable injury frequency rate (TRIFR) for contractors has decreased but not continuously by 83% over the past five years from 3.13 in 2011 to 0.54 in 2015.</i>

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

**Accident severity rate at contractors'**

Severity rate for contractors has decreased but not continuously by 100% over the past five years from 0.082 in 2011 to 0 in 2015.

**Absenteeism and/or Occupational diseases at contractors'**

Rate of absenteeism for contractors has been stable at 0% over the past three years from 2010 to 2012. Data for 2013 and 2014 is not disclosed.

**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

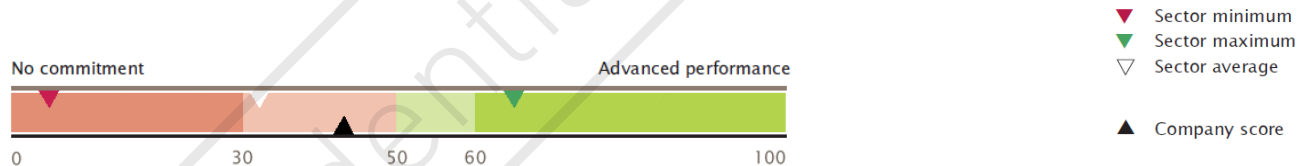
<b>Leadership</b>	<b>77</b>	<b>Implementation</b>	<b>69</b>	<b>Results</b>	<b>48</b>
Visibility	65	Means & resources	51	Performance	48
Relevance	65	Scope	N/A	Trends	N/A
Ownership	100	Coverage	86		

**Human Rights**

Score : 40

**HRT1.1 Respect for human rights standards and prevention of violations**

(score: 43, weight: 2)



The company has operations in Brazil, a country considered at risk by international organisations for human rights issues.

**Visibility of commitment on the respect for human rights standards and the prevention of violations**

The company has issued a formalised commitment to respect and promote human rights in society in its Code of Ethics.

Of note, the company launched the Human Rights Policy in 2015, which establishes the commitments and the guidelines involving respect for human rights in relation to company projects, operations and the value chain.

**Relevance of commitment on the respect for human rights standards and the prevention of violations**

The company's commitment to respect and promote human rights in society addresses its main responsibilities:

- respect the right to privacy
- respect the right to personal security
- respect freedom of expression
- prevent complicity in human rights violations

**Ownership of commitment**

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved. The Board of Directors, through the Ethics Committee is responsible for the commitment.

**Means allocated to the commitment on the respect for human rights standards and the prevention of violations**

Information obtained from the company and public sources regarding systems to ensure that basic human rights are respected is insufficient.

**Coverage**

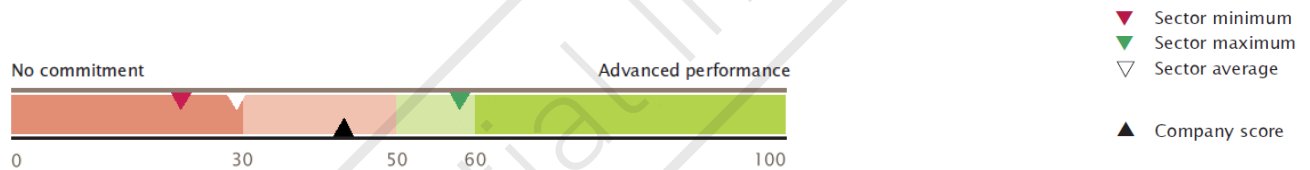
**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

<b>Leadership</b>	<b>65</b>	<b>Implementation</b>	<b>0</b>	<b>Results</b>	<b>65</b>
Visibility	<b>65</b>	Means & resources	<b>0</b>	Performance	<b>65</b>
Relevance	<b>65</b>	Scope	<b>N/A</b>	Trends	<b>N/A</b>
Ownership	<b>65</b>	Coverage	<b>0</b>		

**HRT2.1 Respect for freedom of association and the right to collective bargaining**

(score: 43, weight: 1)



The company has operations in Brazil, a country considered at risk by international organisations for labour rights issues.

**Visibility of commitment**

The company has issued a formalised commitment to freedom of association and the right to collective bargaining in its Code of Ethics.

**Relevance of commitment**

The company's commitment addresses its main responsibilities:  
 - Protection of freedom of association and the right to organise.  
 - Respect the right to collective bargaining.  
 - Explicit support for ILO Conventions C87, C98, C135, or similar international texts on union rights

**Ownership of commitment**

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved.  
 The Board of Executive Directors, through the Ethics Committee is responsible for the commitment.

**Monitoring**

It is not clear what steps the company takes to ensure that freedom of association is respected throughout the company's operations.

**Promotion of collective bargaining**

Information obtained from the company and public sources regarding measures in place to inform employees about their trade union rights is insufficient.

**Coverage**

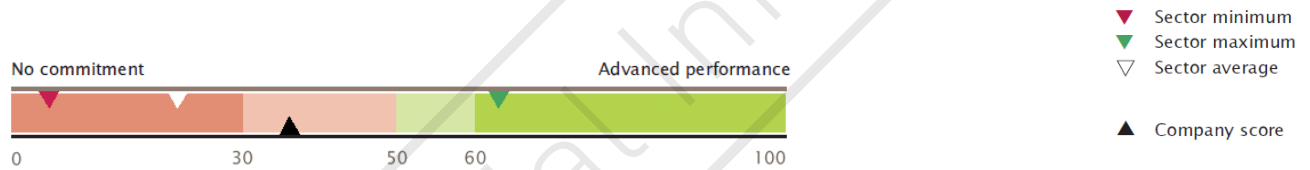
**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

<b>Leadership</b>	<b>65</b>	<b>Implementation</b>	<b>0</b>	<b>Results</b>	<b>65</b>
Visibility	<b>65</b>	Means & resources	<b>0</b>	Performance	<b>65</b>
Relevance	<b>65</b>	Scope	<b>N/A</b>	Trends	<b>N/A</b>
Ownership	<b>65</b>	Coverage	<b>0</b>		

**HRT2.4 Non-discrimination**

(score: 36, weight: 2)



**Visibility of commitment on non-discrimination**

The company has issued a formalised commitment to non-discrimination in its Code of Ethics.

**Relevance of commitment on non-discrimination**

The company's commitment to non-discrimination explicitly defines most of the categories covered:

- Gender.
- Ethnicity.
- Social background.
- Religion.
- Sexual orientation.
- Disabilities.
- Political opinion.
- Age.

**Ownership of commitment**

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved. The Board of Executive Directors, through the Ethics Committee is responsible for the commitment.

**Means allocated to non-discrimination**

The company has set up a few measures to prevent discrimination:

- Monitoring: the company monitors the share of women in its workforce and in management positions.

**Coverage**

Although the company has set up monitoring, the company has not gone beyond that to implement programmes to promote diversity in its operations.

**Results in terms of gender distribution**

The share of women in middle management positions has declined by 3.7 percentage points over the past five years from 12% in 2011 to 9.5% in 2015. Of note, the figure for 2013 is not disclosed.

**Results in terms of employment of disabled persons**

The share of disabled employees in the total workforce has increased but not continuously over the past three years by 0.28 percentage points from 2.8% in 2013 to 3.08% in 2015.

**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

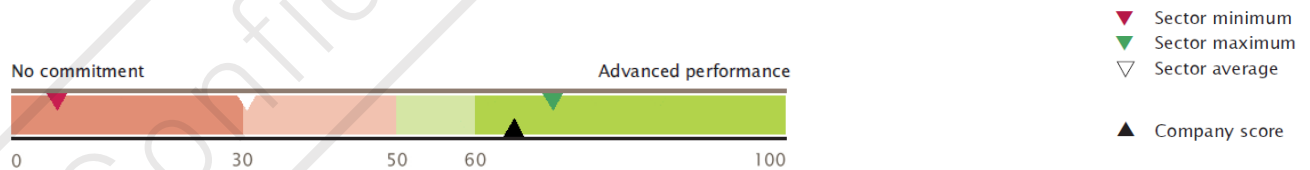
Leadership	65	Implementation	15	Results	28
Visibility	65	Means & resources	30	Performance	65
Relevance	65	Scope	N/A	Trends	15
Ownership	65	Coverage	0		

**Community Involvement**

Score : 50

**CIN1.1 Promotion of the local social and economic development**

(score: 65, weight: 3)



**Visibility of the commitment on the promotion of the social and economic development and mitigation of the impacts of operations**

The company has issued a formalised and accessible commitment to promote local social and economic development in its Sustainable Management Policy.

**Ownership of commitment on the promotion of the social and economic development and mitigation of the impacts of operations**

The commitment applies throughout the company, supported by senior management. In addition other employees are involved. The Sustainability Committee is in charge of any matters related to communities.

**Relevance of commitment to promote the social and economic development**

The company's commitment to promote local social and economic development addresses all of its responsibilities:

- Develop social programmes for local populations
- Implement local capacity building programmes
- Support development of infrastructure

**Relevance of commitment on the mitigation of the impacts of its operations on social and economic development**

*The company's commitment to mitigate the impacts of its operations on social and economic development addresses its main responsibilities:*

- *Community consultation*
- *Evaluate socio-economical impacts of projects*

**Means allocated to promote the social and economic development of countries of operation**

*The company has allocated extensive means to address social and economic development, including:*

- *Social development programmes: the company builds partnerships with local players, and prioritize the contracting and development of professionals and suppliers from the regions where it operates.*
- *Capacity building programmes: through its power generation projects, the company develops local economy, creates jobs, and generates income. Tractebel also supports non-governmental organizations by contributing to the training of artisans.*
- *Infrastructure development programmes: the company invested in the environmental recovery of public areas and in the improvement of local infrastructure.*

**Coverage of the means allocated to promotion of the local social and economic development**

These means are allocated throughout the company.

**Means allocated to the mitigation of impacts of operations**

*The company has allocated extensive means to mitigate the impacts of its operations:*

- *Social impact assessment of new projects: Company mapped the stakeholders in the communities where it operates. This mapping including analyses of positive and negative effects of the Company's activities on the communities and areas of influence of the projects and can be updated as needed. Some of these assessments are maintained during the entire plant operation life.*
- *Community consultation: Tratebel conducts public hearings and surveys for evaluation of the social, economic and environmental aspects related to the implementation and operation of a power plant, in addition to participation in regional development forums and joint social and cultural development and environmental improvement initiatives.*
- *Grievance mechanisms: the company has a dedicated page on its website to communicate with stakeholders including communities. Any complaints or concerns can be raised there, and the company reports having solved all complants raised so far.*

**Coverage of the means allocated to the mitigation of impacts of operations**

*There is no evidence that these means are allocated throughout the company.*

**Performance trend**

*The company does not report indicators on social and economic development.*

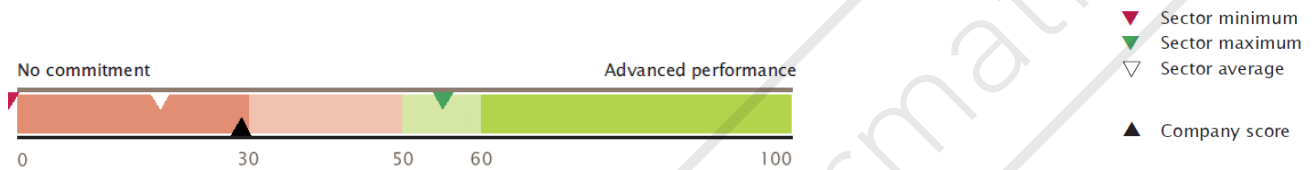
**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral

Leadership	72	Implementation	86	Results	37
Visibility	65	Means & resources	82	Performance	65
Relevance	81	Scope	N/A	Trends	0
Ownership	65	Coverage	100		

**CIN2.1 Promotion of access to energy and prevention of fuel poverty**

(score: 29, weight: 3)



**Visibility of the commitment on the promotion of access to energy**

*The company refers to addressing the access to energy in developing countries 2014 Sustainability Report.*

**Relevance of the company's commitment on the promotion of access to energy**

*The company's commitment to address the access to electricity in developing countries is general.*

**Ownership of commitment**

*The Sustainability Committee is responsible for ccess to electricity in developing countries.*

**Measures implemented to promote the access to energy**

*Information obtained from the company and public sources regarding measures allocated to the access to energy in developing countries is insufficient.*

**Coverage of the measures implemented to address access to energy**

**Performance trend - Access to energy**

The company does not disclose indicators on access to energy.

**Stakeholders' feedback**

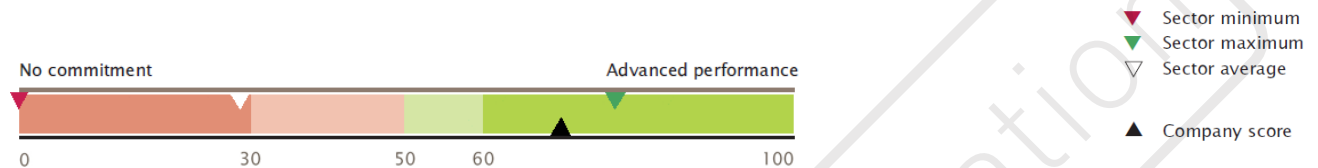
A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

<b>Leadership</b>	<b>42</b>	<b>Implementation</b>	<b>0</b>	<b>Results</b>	<b>46</b>
Visibility	<b>30</b>	Means & resources	<b>0</b>	Performance	<b>65</b>
Relevance	<b>30</b>	Scope	<b>N/A</b>	Trends	<b>0</b>
Ownership	<b>65</b>	Coverage	<b>0</b>		

## CIN2.2 Contribution to general interest causes

(score: 70, weight: 1)



### Relevance of commitment

The company's commitment to supporting general interest causes addresses some of the relevant issues for the sector:  
- Cultural development of the communities.

### Ownership of commitment

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved.  
The Sustainability Committee is responsible for the socio-cultural development in the regions where the company operates.

### Means allocated

The company has allocated significant means to general interest causes, including:  
- Financial support: The company funded the opening of several cultural centers in Entre Rios do Sul, Bela Vista High, Quedas do Iguaçu and Capivari de Baixo.  
- Allowing staff time: the company supports employees who participate in voluntary work.

### Geographical coverage

These means are allocated in the majority of company sites.  
The criteria for culture centers is to be in the neighborhood of power plants of the Company. New culture centers are to be launched in the next years. The ones that are in operation are: Entre Rios do Sul, Alto Bela Vista, Capivari de Baixo and Quedas do Iguaçu. New ones in construction: Concórdia, Minaçu and Trairi.

### Trend in contributions to general interest causes

The company monitors indicators on contributions to general interest causes, and these have been improving over time.  
The company's investments with tax incentives (Childhood and Adolescence Fund, Cultural Incentive Act, Incentive to Sports Act, etc.) normalised to EBIT has increased from 0.47% in 2012 0.59% 2014.

<b>Leadership</b>	<b>65</b>	<b>Implementation</b>	<b>44</b>	<b>Results</b>	<b>100</b>
Visibility	<b>N/A</b>	Means & resources	<b>30</b>	Performance	<b>N/A</b>
Relevance	<b>65</b>	Scope	<b>N/A</b>	Trends	<b>100</b>
Ownership	<b>65</b>	Coverage	<b>65</b>		



## Business Behaviour (C&S)

Score : 65

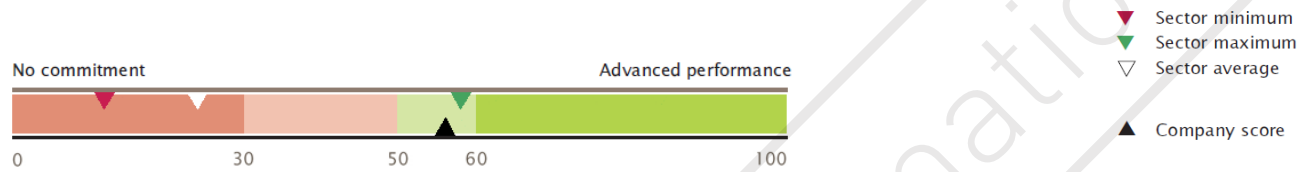
### C&S1.3 Responsible Customer Relations

(deactivated)

The company does not have end-use customers. Therefore, this sustainability driver is deactivated for the company.

### C&S2.4 Integration of social factors in the supply chain

(score: 56, weight: 1)



#### Visibility of commitment

The company has issued a formalised commitment to including social factors in supply chain management in its Code of Ethics.

#### Relevance of commitment

The company's social requirements for suppliers address the main relevant issues in the sector:

- Freedom of association and right to collective bargaining
- Health and Safety
- Other rights (e.g. prevention of cruel, degrading and inhuman behaviour, etc.)
- Abolition of child labour
- Abolition of forced labour

#### Ownership of commitment

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved.  
The Board of Executive Directors, through the Ethics Committee is responsible for the commitment.

#### Means allocated

The company has set up two measures to include social factors in supply chain management:

- Integration of social issues into contractual clauses: Prices, terms, quality and other technical and commercial aspects of contracts with suppliers are governed by administrative standards that establish procedures allowing the selection of those offers that best serve the company's interests in line with its policy of contributing to sustainable development in the regions where it operates.
- Supplier support: The company has put in place the Sustainable Partnerships Project, which trains suppliers in sustainable corporate management.

#### Audits of suppliers/subcontractors

The company includes social aspects in its standard quality audits of suppliers. The company reports to evaluate the performance of suppliers focusing on commitment and engagement with human rights, social responsibility and occupational Health and Safety.

#### Coverage of the means allocated

The measures implemented cover the main direct and indirect suppliers.

**Coverage of the social audits**

The percentage of suppliers covered by social audits is not disclosed.

**Transparency on social compliance in the supply chain**

The company monitors quantitative data on the compliance of its suppliers with social standards, and it reports that in 2014 it did not identify any non-compliance events regarding violations of freedom of association or collective bargaining rights.

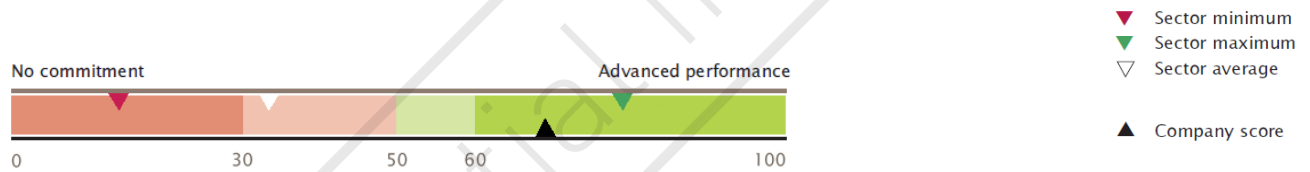
**Allegations against suppliers**

A review of stakeholder sources did not reveal any social allegations against the company's suppliers or contractors.

<b>Leadership</b>	<b>65</b>	<b>Implementation</b>	<b>55</b>	<b>Results</b>	<b>49</b>
Visibility	<b>65</b>	Means & resources	<b>50</b>	Performance	<b>49</b>
Relevance	<b>65</b>	Scope	<b>N/A</b>	Trends	<b>N/A</b>
Ownership	<b>65</b>	Coverage	<b>65</b>		

**C&S3.1 Prevention of corruption**

(score: 69, weight: 3)



**Visibility of commitment on the prevention of corruption**

The company has issued a formalised commitment to preventing corruption in its Code of Ethics.

**Relevance of commitment on the prevention of corruption**

The company's commitment to preventing corruption addresses its main responsibilities:

- Active and passive bribery.
- Gifts and invitations.
- Fraud.
- Conflicts of interest.
- Illegal financing of political parties.

**Ownership of commitment**

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved.  
The Board of Executive Directors, through the Ethics Committee is responsible for the commitment.

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

**Involvement of employees in the prevention of corruption**

The company has instituted formal training programmes for relevant employees on corruption prevention.

*The Ethics Committee, with help from the company managers, organises the implementation, training and awareness initiatives concerning ethical practices. Moreover, the Committee must help and advise employees with questions or concerns regarding ethical matters.*

*Training programmes cover topics such as: Ethical, operating and control aspects included in the Anti-Corruption Law, Small gifts and amenities, Anti-Corruption Law*

**Means allocated to the prevention of corruption**

The company has set up internal controls to prevent corruption, including a confidential reporting system:

- Approval procedures for gifts by an independent department: The Board of Administration must approve all the gifts made or received by Tractebel employees.

- The possibility to contact internal audit, legal or compliance departments directly & confidentially: The deontologist is the member of the Ethics Committee in charge of this duty within Tractebel.

- a dedicated confidential hotline or email address: the company has a communication channel so that anyone can contact it anonymously and confidentially related to any non-compliance with its code of ethics.

**Coverage of the means allocated to the prevention of corruption**

The measures implemented cover all significant parts of the company as well as sales agents.

*Tractebel Energia complies with its mother company's policy that established a mandatory internal procedure for commitments with commercial middlemen.*

**Transparency on corruption suspicions raised through the employee reporting system**

The company explicitly states that there were no corruption incidents reported internally during the period under review.

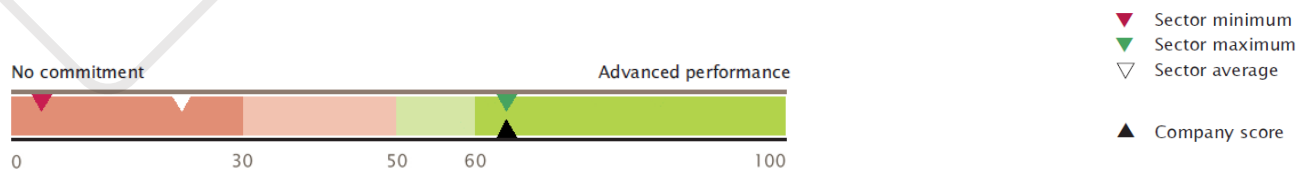
**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

Leadership	65	Implementation	65	Results	77
Visibility	65	Means & resources	65	Performance	77
Relevance	65	Scope	N/A	Trends	N/A
Ownership	65	Coverage	65		

**C&S3.2 Prevention of anti-competitive practices**

(score: 64, weight: 3)



**Visibility of commitment on the prevention of anti-competitive practices**

*The company has issued a formalised commitment to prevent anti-competitive practices in its Code of Ethics.*

**Relevance of commitment on the prevention of anti-competitive practices**

*The company's commitment to preventing anti-competitive practices addresses part of its responsibilities:*  
- *Transparency on the market.*

**Ownership of commitment**

The commitment applies throughout the company, supported by senior management. In addition, other employees are directly involved.  
*The Board of Executive Directors, through the Ethics Committee is responsible for the commitment.*

**Involvement of employees in the prevention of anti-competitive practices**

The company has instituted formal training programmes for relevant employees on the prevention of anti-competitive practices.  
*The Ethics Committee, with help from the company managers, organises the implementation, training and awareness initiatives concerning ethical practices. Moreover, the Committee must help and advise employees with questions or concerns regarding ethical matters.*

**Means allocated to the prevention of anti-competitive practices**

*The company has set up internal controls to prevent corruption, including a confidential reporting system:*  
- *Approval procedures for gifts by an independent department: The Board of Administration must approve prices made or received by Tractebel employees.*  
- *The possibility to contact internal audit, legal or compliance departments directly & confidentially: The deontologist is the member of the Ethics Committee in charge of this duty within Tractebel.*  
- *a dedicated confidential hotline or email address: the company has a communication channel so that anyone can contact it anonymously and confidentially related to any non-compliance with its code of ethics.*

**Coverage of the means allocated to the prevention of anti-competitive practices**

The measures implemented cover all significant parts of the company as well as sales agents.  
*Tractebel Energia complies with the mother company's policy that established a mandatory internal procedure for commitments with commercial middlemen.*

**Reporting**

*The company explicitly states that there were no antitrust incidents reported internally during the period under review.*

**Stakeholders' feedback**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

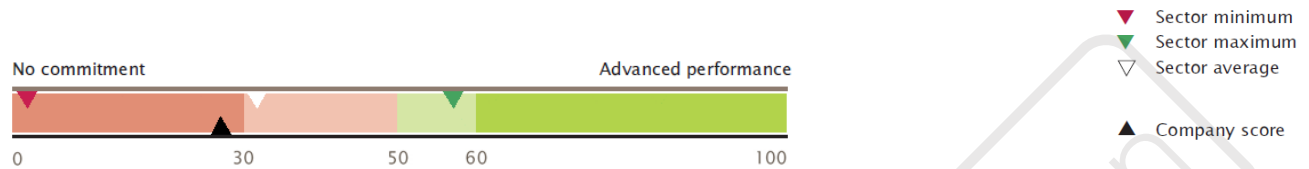
<b>Leadership</b>	<b>51</b>	<b>Implementation</b>	<b>65</b>	<b>Results</b>	<b>77</b>
Visibility	<b>65</b>	Means & resources	<b>65</b>	Performance	<b>77</b>
Relevance	<b>30</b>	Scope	<b>N/A</b>	Trends	<b>N/A</b>
Ownership	<b>65</b>	Coverage	<b>65</b>		

## Corporate Governance

Score : 30

### CGV1.1 Board of Directors

(score: 27, weight: 3)



#### Existence and independence of Nomination Committee

No specific committee is in charge of director nomination, which might raise concerns.

#### Independence of board Chairman

The roles of Chairman and CEO are separated, but the Chairman is not considered independent.

#### Total % of independent shareholder-elected board members

The board is between 0 and 20% independent, which might raise concerns. One member of the 8-member Board are considered independent.

Of note, employee representatives are excluded from the calculation of the % of independence of committee's members, thus Roberto Henrique Tejada Vencato is not included in these calculations.

#### Skills and backgrounds of non-executive board members

Non-executive board members have complementary and relevant skills and backgrounds.

#### Training and expertise provided to board members

Information obtained from the company and public sources regarding training provided to board members is insufficient.

#### Regularity of and attendance at board meetings

Information obtained from the company and public sources regarding the regularity of and attendance at board meetings is insufficient.

#### Regular election of board members

Board members are elected at least every 3 years. Board members are eligible for re-election following 1-year terms.

#### Evaluation of board functioning and performance

Information obtained from the company and public sources regarding the evaluation of board functioning and performance is insufficient.

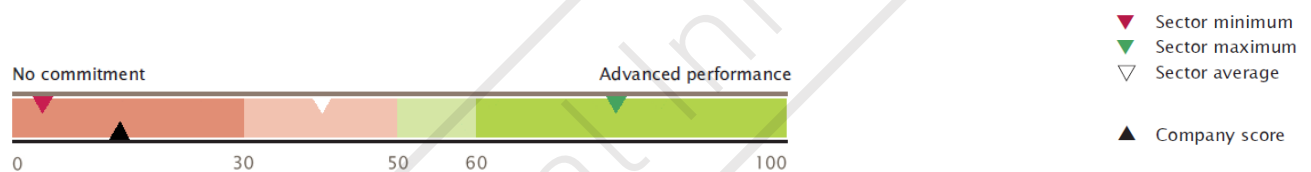
#### Review of CSR issues at board meetings

One or more non-executive directors is responsible for oversight of CSR issues within the board. Sustainability Committee is part of the Board of Directors and none of its members is executive.

Non-independent board members (excl. employee representatives)	Role	Current or Former Executive	More than 9 years on board	Stock options or warrants	Paid >1/2 executive salary	Owens or represents >3% company's shares	Other
Mauricio Stolle Bahr	Chairman					X	General representative of GDF SUEZ in Brazil
Manoel Arlindo Zaroni Torres	CEO	X	X				
Luiz Eduardo Simoes Viana						X	Responsible for the financial and administrative management of GDF SUEZ Group in Brazil
Philip Julien De Cnudde	Vice President						Not considered independent by the company
Antonio Alberto Gouvêa Vieira							Not considered independent by the company
Dirk Achiel Marc Beeuwsaert							Not considered independent by the company
Willem Frans Alfons Van Twembeke							Not considered independent by the company

## CGV2.1 Audit & Internal Controls

(score: 14, weight: 2)



### Existence and independence of Audit Committee

No specific committee is in charge of audit issues, which might raise concerns. *The company states that it is externally and internally audited in addition to a permanent Fiscal Board.*

### Skills and backgrounds of Audit Committee members

### Operational and CSR risks covered by the company's internal controls system

The system covers financial, operational, and legal risks, plus CSR risks. *The CSR risks cover mainly topics related to Ehtics, Sustainability and Energy.*

### Role of the Audit Committee in overseeing internal and external controls

### Independence of the firm's external auditors

*Information obtained from the company and public sources regarding the independence of the firm's external auditors is insufficient.*

**Inclusion of CSR issues in company reporting**

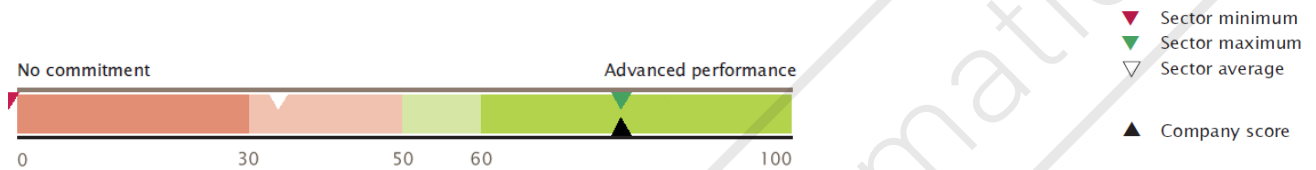
The company publishes significant social and environmental reporting, with quantitative indicators, that is audited by a 3rd party, PricewaterhouseCoopers.

**Reliability of the company's internal controls system**

A review of stakeholder sources did not reveal any allegations for internal control failures against the company during the period under review: stakeholders' feedback is neutral.

**CGV3.1 Shareholders**

(score: 78, weight: 2)



**Voting rights restrictions**

The company respects the "one share - one vote" principle.

**Safeguards on transactions with major shareholder(s)**

Less than half of the board is independent. However, there are other safeguards in place to monitor transactions between the company and its major shareholder(s).

*The company has the Special Independent Committee for Transactions with Related Parties that is composed of majority independent members from the board of directors.*

**Ability to add items to the agenda of the AGM and to convene an EGM.**

No major restrictions have been identified.

**Access to voting at General Meetings**

There are no major restrictions on shareholders' ability to vote, however there is no possibility of voting through online services.

**Governance and CSR items put to a vote at General Meetings**

Not all major items are put to a shareholder vote. In particular, shareholders are not given the opportunity to express an opinion on executive remuneration through a (non-binding) shareholder vote.

*The following items are not put to a vote at the AGM:*  
- Board fees  
- Executive remuneration

**Voting results of the latest AGM**

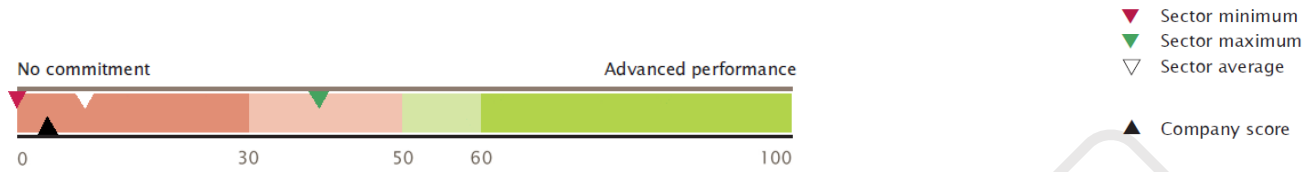
All resolutions were approved by more than 90% of shareholder votes.

**Feedback from shareholders and other stakeholders on the company's corporate governance performance**

A review of stakeholder sources did not reveal any allegations against the company during the period under review: stakeholders' feedback is neutral.

**CGV4.1 Executive Remuneration**

(score: 4, weight: 2)



**Existence and independence of Remuneration Committee**

No specific committee is in charge of executive remuneration, which might raise concerns.  
*The company states that it follows market rules.*

**Disclosure of senior executives' individual remuneration**

*Executive remuneration is disclosed, but on a collective rather than on an individual basis.*

**Link between Short Term Incentive Plans and the economic and CSR performance of the company**

*Bonuses are linked to predetermined and disclosed economic and operational indicators. However the actual quantified targets are not disclosed. Bonus amounts vary from 25% to 90% of the fixed annual compensation, in line with the executive's position, his or her challenges and established targets. This variable installment considers:*

- *Financial indicators, such as the company's EBITDA growth, free cash flow and net income, as well as consolidation within the Controller, among others, which represent, on average, 40% of the annual bonus.*
- *Individual and operating indicators, such as fulfillment of targets, operating and financial results, including matters relating to sustainability, which represent, on average, 40% of the bonus.*
- *Behavioral and managerial issues that represent, on average, 20% of the annual bonus.*

**Link between the main Long Term Incentive Plan and the economic performance of the company**

There is no disclosure on what rules guide the company in allocating stock options and other long-term incentives to senior executives, and what performance conditions are attached to the right to exercise these incentives.

**Severance pay for senior executives**

*Information obtained from the company and public sources regarding severance pay for senior executives is insufficient.*



**Allegations and controversies**

Domain Sustainability driver

Page

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

Confidential Information

## Detailed Scores And Ratings

### Current and previous ratings

Period	Environment	Human Resources	Human Rights	Community Involvement	Business Behaviour (C&S)	Corporate Governance
2016/03	++	++	+	++	++	=
2014/12	+	++	+	+	++	+
2014/03	+	++	+	+	++	+

### Scores per domain

Domain	Average score	Leadership	Implementation	Results
Environment	58	45	61	52
Human Resources	50	52	54	45
Human Rights	40	65	6	50
Community Involvement	50	58	43	50
Business Behaviour (C&S)	65	59	64	73
Corporate Governance	30	32	14	46

### Scores per criteria

Sub-domain	Criterion	Score
Environment 1	1	88
	2	43
	3	77
	4	54
Environment 2	2	D/A
	4	30
Environment 3	1	D/A
Sub-domain	Criterion	Score
Human Resources 1	1	D/A
Human Resources 2	3	27
	4	51
Human Resources 3	2	65
Sub-domain	Criterion	Score
Human Rights 1	1	43
Human Rights 2	1	43
	4	36

Sub-domain	Criterion	Score
Community Involvement 1	1	65
	2	70
Community Involvement 2	1	29
	2	70
Sub-domain	Criterion	Score
Business Behaviour (C&S) 1	3	D/A
Business Behaviour (C&S) 2	4	56
Business Behaviour (C&S) 3	1	69
	2	64
Sub-domain	Criterion	Score
Corporate Governance 1	1	27
Corporate Governance 2	1	14
Corporate Governance 3	1	78
Corporate Governance 4	1	4

## General Overview

Position versus sector peers Rest of the World	Environment	Human Resources	Human Rights	Community Involvement	Business Behaviour (C&S)	Corporate Governance	Overall score
PHY0005M1090 Aboitiz Power Corp (APC)	=	=	=	=	=	+	28
CL0001880955 AES Gener S.A.	+	+	=	=	+	=	31
BRTIETACNPR7 AES Tiete S/A	=	-	=	-	=	-	19
XS0989152573 Bulgarian Energy Holding	-	--	-	-	-	-	8
CNE100001T80 CGN POWER LTD	-	=	-	-	-	+	23
BMG2109G1033 CHINA GAS HOLDINGS	-	-	-	-	-	=	19
CNE100000HD4 China Longyuan Power Group Corp. Ltd.	=	=	-	=	-	+	26
HK2380027329 China Power International Development	-	=	-	-	=	++	25
BMG2113B1081 China Resources Gas GP	-	-	-	-	-	=	20
HK0836012952 China Resources Power Holdings Co. Ltd.	=	=	=	=	=	+	30
BRCMIGACNPR3 Cia Energetica de Minas Gerais	++	+	++	+	++	=	48
CLP3615W1037 Colbun S.A.	=	=	=	=	-	-	22
BRCPLEACNPB9 Companhia Paranaense de Energia-COPEL	-	=	-	-	-	-	20
BRCPFACNORO CPFL Energia S.A.	=	+	+	=	=	=	29
CNE1000002Z3 Datang International Power Generation Co. Ltd.	=	-	=	=	-	=	24
CL0001583070 E-CL S.A.	-	=	-	=	-	--	18
BRENBACNOR2 EDP-Energias do Brasil S.A.	++	++	++	++	++	+	57
CLP3710M1090 Empresa Nacional de Electricidad S.A.	+	+	+	+	+	=	35
PLENEA000013 Enea S.A.	=	-	-	-	-	-	18
PLENERG00022 Energia SA	+	+	=	+	+	+	37
PHY2292T1026 Energy Development Corp.	=	=	+	+	=	=	31
CLP371861061 Enersis S.A.	+	=	+	+	+	=	36
INE129A01019 GAIL (India) Ltd.	=	+	+	+	=	=	32
TH0834010009 Glow Energy PCL	=	-	=	=	=	=	24
CNE1000003D8 Huadian Power International	-	--	-	-	-	=	17
CNE1000006Z4 Huaneng Power International	-	-	-	-	-	-	15
CNE100000WS1 Huaneng Renewables	-	-	-	-	-	=	19
COE15PA00026 Interconexion Electrica SA ESP	+	++	+	-	+	+	39
COE16PA00016 ISAGEN S.A. E.S.P.	+	=	+	=	=	-	25

Position versus  
sector peers Rest of the World

	Environment	Human Resources	Human Rights	Community Involvement	Business Behaviour (C&S)	Corporate Governance	Overall score
KR7015760002 Korea Electric Power Corp.	=	-	=	=	-	=	22
KR7036460004 Korea Gas Corp.	+	=	+	+	=	--	28
MYL219400008 MMC Corp. Bhd	--	-	=	-	=	-	17
INE733E01010 NTPC Ltd.	=	=	-	+	=	-	26
ID1000111602 Perusahaan Gas Negara	=	=	=	=	=	-	24
PLPGER000010 PGE Polska Grupa Energetyczna S.A.	=	-	=	-	-	+	21
INE752E01010 Power Grid Corp. of India Ltd.	+	-	+	-	=	=	27
QA0006929812 QATAR ELECT & WATER CO	-	--	-	-	-	-	12
RU000A0JPKH7 RusHydro	+	=	=	=	=	+	35
XS0953958641 Slovensky Plynarensky Priemysel	-	=	-	=	=	--	17
INE245A01021 Tata Power Co. Ltd.	=	=	+	+	++	+	38
PLTAURN00011 Tauron Polska Energia S.A.	=	=	=	++	=	+	31
MYL534700009 Tenaga Nasional Bhd	+	=	--	-	=	+	29
<b>BRTBLEACNOR2 Tractebel Energia SA</b>	<b>++</b>	<b>++</b>	<b>+</b>	<b>++</b>	<b>++</b>	<b>=</b>	<b>49</b>
BRTAECDAM10 TRANSMISSORA ALIANCA DE-UNIT	-	-	-	-	-	--	11
MYL467700000 YTL Corp. Bhd	=	=	=	=	=	+	28
MYL674200000 YTL Power International Bhd	-	-	-	-	-	=	14

Copyright Vigeo 2016 - Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provisions of the French Intellectual Property Code.

Confidential Information

---

## Contacts

Analyst : Meryem Baskoun • meryem.baskoun@vigeo.com  
Sector Lead: Meryem Baskoun • meryem.baskoun@vigeo.com

---

## Disclaimer

### Copyright Vigeo 2016

Reproduction of this document in whole or in part is prohibited without the express written authorization of Vigeo and is protected by the provision of the French Intellectual Property Code.

The information in this document results from the application of Vigeo's Equities methodology and is based on sources which Vigeo believes to be reliable. However, the accuracy, completeness and up-to-dateness of this report are not guaranteed, and Vigeo shall under no circumstances be responsible for the strategy choices, management decisions and, more generally, decisions of any nature taken by the reader in reliance upon the information contained in this document.

Confidential Information