

# 2018 Integrated Report



# About the Report



This Integrated Report provides a comprehensive global overview of the ENGIE Group, its ambitions, activities and creation of value.

## Methodology

Modelled on the reference framework published by the International Integrated Reporting Council (IIRC) of which ENGIE is a member, the Integrated Report is part of a proactive approach to the long-term progress of the Group and the development of integrated thinking. The Report also outlines ENGIE's sustainable contribution to the United Nations Sustainable Development Goals (SDG).

### SUSTAINABLE DEVELOPMENT GOALS



## Project organization

The reporting process was overseen by the Corporate Social Responsibility Department and carried out with the active involvement of several functional departments (General Secretariat, Finance, Human Resources and Global Care, Strategy, Brand and Communication, Risks, Innovation and Strategic Sourcing & Purchasing) and Métiers, which worked together throughout the process to select and structure the information. It was sponsored by ENGIE's governance bodies and was presented to the Executive Committee and to members of the Ethics, Environment and Sustainable Development Committee of the Board of Directors.

## Changes in the 2018 Report

This 5<sup>th</sup> edition of the Report, which is based on major trends in the energy sector, places a greater focus on the most material issues. It highlights the creation and sharing of value with stakeholders in the context of the fundamental transformation taking place within the Group.

### A few words from

Anne Chassagnette  
Director of Corporate Social Responsibility and Vice-Chair  
of the Rassembleurs d'Énergies social investment fund



ENGIE is revisiting the way it describes its business activities, presenting them in the light of major structural trends, and providing a new analysis of the challenges of social responsibility, conducted in conjunction with its stakeholders."

See also



[engie.com](http://engie.com)

Sustainable Development > IR > Interview






# Contents

Editorials – 2

Group profile – 4

Summary – 6

Business model – 8

-  **Trends – 10**
-  **Ambition – 16**
-  **Transformation – 20**
-  **Governance – 26**
-  **Value creation – 34**



## Editorials

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### Jean-Pierre Clamadieu

Chairman of the Board of Directors

Since its inception, ENGIE has demonstrated its capacity to innovate, which has enabled it to meet yesterday's challenges and stands as its best asset for meeting those of tomorrow.

As the new Chairman of the Board of Directors, I would first like to pay tribute to the remarkable career of Gérard Mestrallet, who worked successfully for 34 years to build a Group that is now the world leader in the energy transition. The strategic repositioning decided in 2016 with Isabelle Kocher was ambitious. It is already starting to pay off, with visible results.

This new Integrated Report demonstrates the Group's solidity and its ability to execute a strategy that meets its customers' expectations and contributes to the search for more sustainable and responsible development. It also highlights the quality of the Group's results and our ability to share the value created with all our stakeholders.

Together with my colleagues, members of the Board of Directors, our aim is to strengthen this strategic positioning and to set ENGIE firmly on a path of sustainable growth.

I will of course be very attentive to the Group's performance in terms of both financial performance and social and environmental responsibility.

I am convinced that the Group and all its teams have a major role to play in providing our customers and the planet with innovative solutions to the many challenges they face.



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**Isabelle Kocher**  
Chief Executive Officer

Over a two-year period, ENGIE has undergone far-reaching change and has returned to growth.

However, we have achieved far more than just creating value for the company. Behind our transformation lies a desire to shift to another type of development, guided by the pursuit of more harmonious progress.

Today, there are 7.5 billion of us on Earth, however, 1.2 billion of these individuals still do not have access to energy. In 30 years, the world's population is set to reach 9 billion.

According to WHO, 92% of the global population is exposed to air quality below the healthy limits. Greenhouse gases have skyrocketed and are threatening the Earth's equilibrium.

In response to a form of progress that was hitherto achieved at the expense of the planet and human development, there is a deep-rooted willingness to change the model, and I am convinced that a company such as ours can play its part.

This is the approach that ENGIE has chosen to adopt. We are now acutely aware of our specific responsibility in paving the way for more harmonious progress. We were part of the problem, today, however, we have chosen to be part of the solution to enable as many people as possible to have access to energy, under environmentally friendly conditions.

Harmonious progress is not a slogan: it must be the practical guiding principle for our strategic choices and the way we structure our offers and solutions for customers.

As a consequence, in two years, we have more than halved our coal capacity and commissioned, constructed or been awarded 6 GW of additional renewable capacity. At present, 91% of our activities are low carbon. We are investing in renewable biogas and hydrogen, with the aim of attaining a fully decarbonized world.

And we are not alone in this goal. Around the world, we are developing concrete projects with our partners that are turning this vision of progress into reality.

We will continue to create value in conjunction with them while providing greater access to sustainable energy. In doing so, we are meeting the UN's Sustainable Development Goals for 2030.

## Group profile

# A global energy and services Group

ENGIE is a global energy and services Group, founded on three key business areas: low-carbon electricity production, particularly from natural gas and renewable energy, energy infrastructure and customer solutions. Driven by the aim of contributing to harmonious progress, ENGIE is facing up to major global challenges such as combating global warming, access to energy for all, or mobility, and is offering its customers – companies, private individuals and professionals, cities and territories – energy-production solutions and services that bridge the gap between individual interests and collective challenges.

Low in carbon, its integrated, effective and sustainable offers rely on digital technology. Going beyond energy, they foster the development of new uses and ways of living and working.

Everyday, 155,000 employees in 70 countries are working towards ENGIE's ambition. Along with the Group's customers and partners, they form a community of imaginative builders who are devising and building solutions for the future, today.

**€65 bn**  
in revenues

Business activities  
in around  
**70 countries**

**155,000**  
employees worldwide

**24 million**  
customers worldwide

**102.7 GW**  
of installed electricity  
generation capacity

**350**  
district heating and cooling  
networks in 20 countries

**140 million**  
m<sup>2</sup> managed  
in the service sector

**12 billion**  
m<sup>3</sup> of storage capacity

**1,100**  
researchers and experts  
in 11 research  
and development centers

**€180 m**  
devoted to technological  
research and development

### North America <sup>(1)</sup>

**4,900**  
employees

**€3.9 bn**  
in revenues

**3.2 GW**  
installed and 7 MW  
under construction

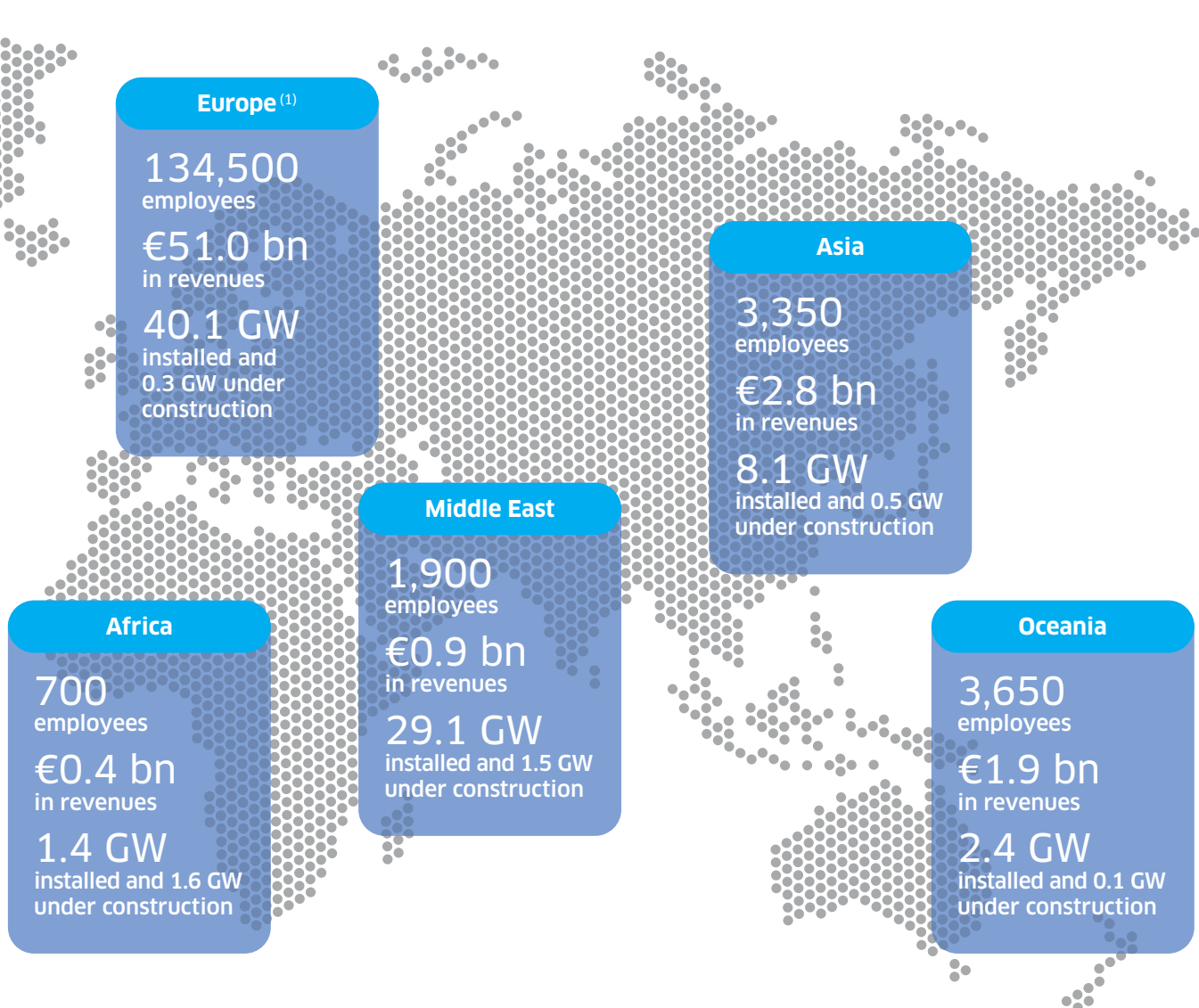
### Latin America

**6,100**  
employees

**€4.3 bn**  
in revenues

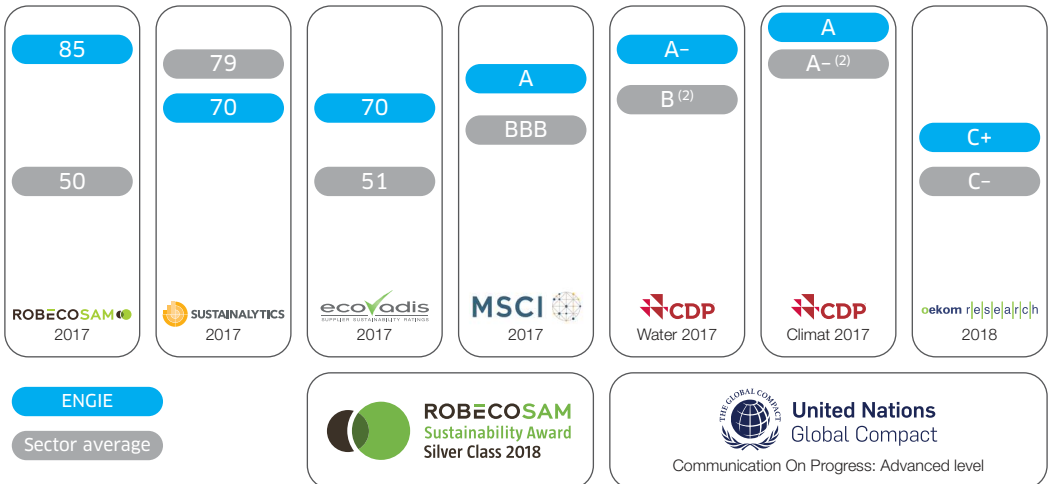
**18.2 GW**  
installed and 2 GW  
under construction

(1) Including Mexico.



### A positioning acknowledged by international rankings and indices

Listed in Paris and Brussels (ENGI), the Group is represented in the main financial (CAC 40, BEL 20, Euro STOXX 50, STOXX Europe 600, MSCI Europe, Euronext 100, FTSE Eurotop 100, Euro STOXX Utilities, STOXX Europe 600 Utilities) and non-financial indices (DJSI World, DJSI Europe and Euronext Vigeo Eiris – World 120, Eurozone 120, Europe 120, France 20, CAC 40 Governance).



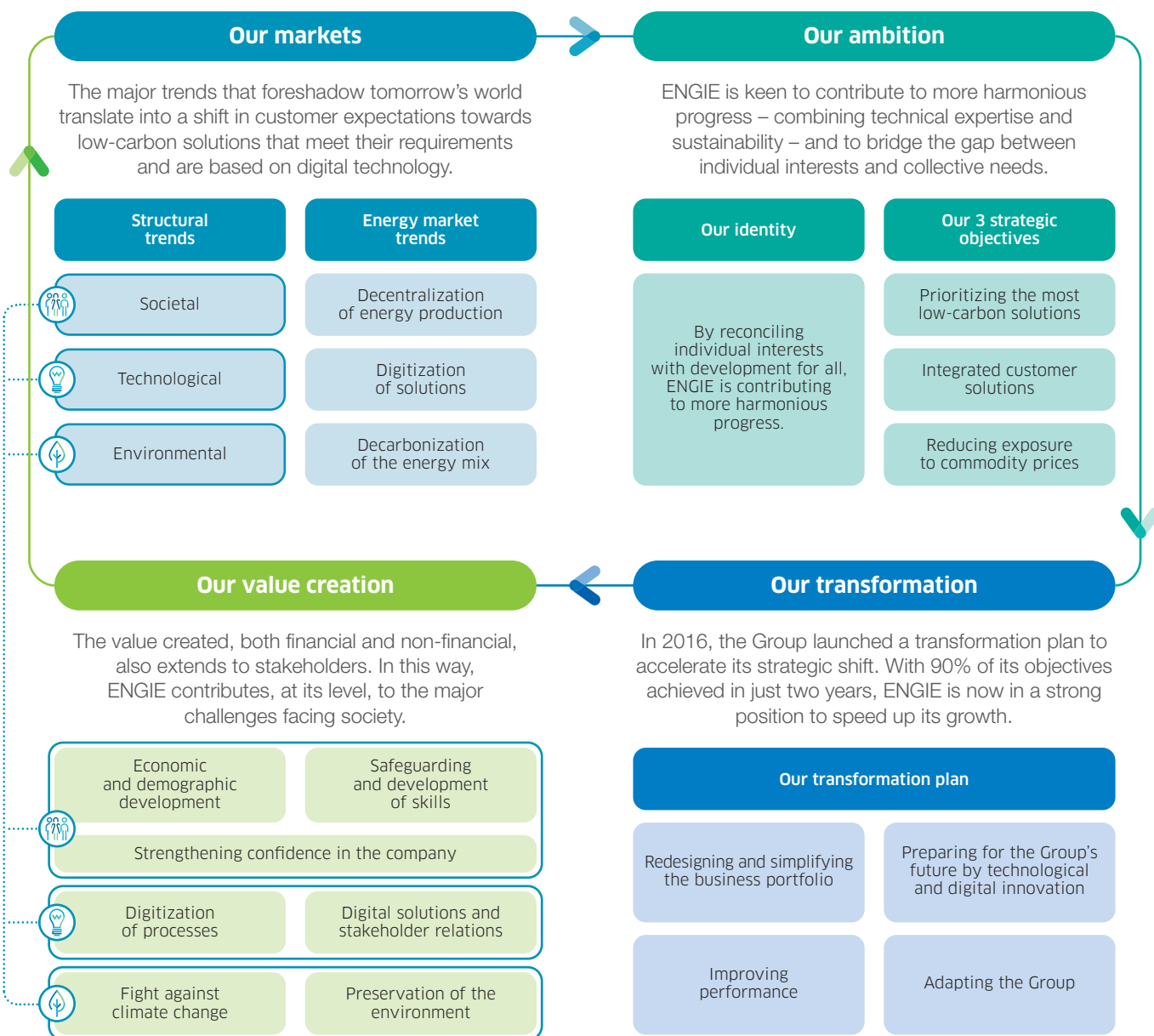
(1) Including Turkey. (2) Project Development Center sector (EDF, EON, RWE, ENEL, IBERDROLA, ENGIE).

# Summary



## ENGIE, a key player in the new energy world

In a sector undergoing fundamental change, ENGIE has repositioned its activities to capture new opportunities and become a key player in the new energy world. More competitive and debt-free, the Group is entering a new phase of dynamic growth, as confirmed by its good performance in 2017.





## Our performance

In line with objectives, the results for 2017 confirmed the relevance of ENGIE's strategy. With a return to organic growth now confirmed, thanks to the efforts and commitment of the teams, ENGIE can anticipate solid results and an increased dividend in 2018.

KPI		2017	Objectives
<b>Our 3 strategic objectives</b>			
Prioritizing the most low-carbon solutions	Share of low-carbon activities <sup>(1)</sup> in Group EBITDA	91%	In 2018 >90% ✓
Integrated solutions for customers	Increase in EBITDA from integrated customer solutions since the end of 2015 at constant exchange rates	+22%	+50%
Reducing exposure to commodity prices	Share of regulated or contracted activities <sup>(2)</sup> in Group EBITDA	89%	>85% ✓
<b>Our transformation plan</b>			
Redesigning and simplifying the business portfolio	Growth investment program	€13.9 bn	2016-18 €14.3 bn <sup>(3)</sup>
	Portfolio rotation program	€13.2 bn	€15 bn <sup>(3)</sup>
Preparing for the Group's future by technological and digital innovation	Expenditure in emerging and digital technologies	€1 bn	€1.5 bn
Improving performance	Efficiency program ("Lean 2018") aimed at making recurring savings on operating expenses	€0.9 bn	€1.3 bn
Adapting the Group	Share of women in the Group's workforce	22.2%	25%
	Internal occupational accident frequency rate	3.3	≤ 3 In 2020
<b>Our value creation</b>			
A strong financial structure	Revenues	€65 bn	
	EBITDA	€9.3 bn	
	Current operating income	€5.3 bn	
	Net income/(loss) Group share	€1.4 bn	In 2017
	Net recurring income, Group share	€2.4 bn	≥ €2.4 bn ✓ <sup>(5)</sup>
	Dividends (per share and per year, in cash)	€0.70	€0.70 ✓ <sup>(6)</sup>
	Net debt <sup>(4)</sup>	€20.9 bn	In 2018
	Net debt/EBITDA ratio <sup>(4)</sup>	2.25 x	≤ 2.5 x ✓
	Financial rating	A-/A2	A ✓
	A commitment to environmental and social responsibility	Satisfaction rate of B to C customers	83%
Share of industrial activities covered by an appropriate dialogue and consultation mechanism		48%	100%
Share of renewable energy in the electricity production capacity mix		23.1%	25%
CO <sub>2</sub> emission reduction rate for power generation compared to 2012		-18.1%	-20% <sup>(7)</sup> In 2020

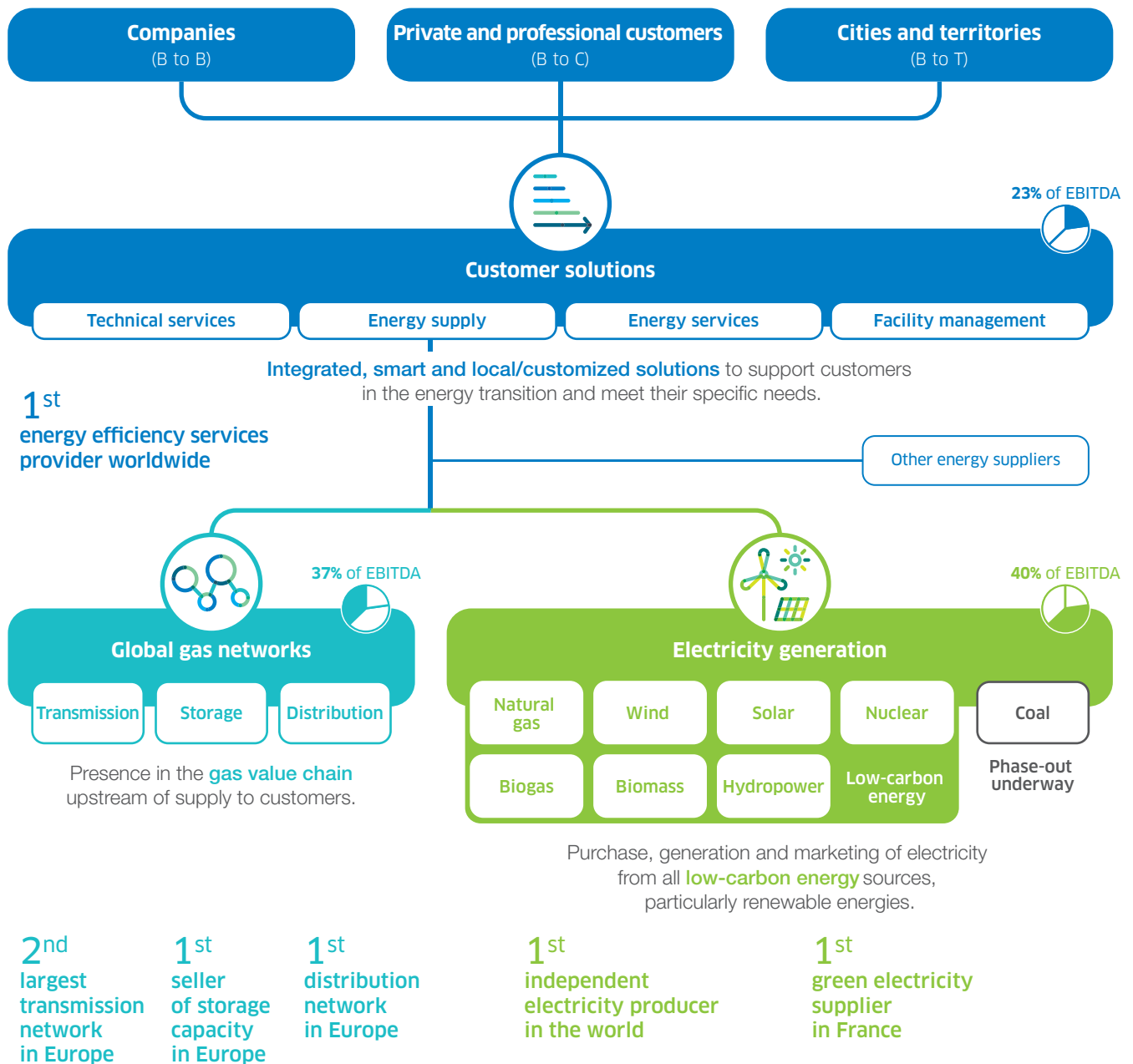
(1) Low-carbon electricity generation, gas and LNG infrastructure, downstream. (2) Activities other than merchant electricity generation, E&P and purchase/sale of LNG. (3) Net debt impact. (4) Excluding E&P and LNG activities sold. (5) This objective is based on the assumption of average weather conditions in France, full pass-through of supply costs in French regulated gas tariffs, no significant regulatory or macro-economic changes, commodity price assumptions based on market conditions at the end of December 2015 for the non-hedged part of the production, and average foreign exchange rates as follows for 2016: €/€: 1.10 €/BRL: 4.59. (6) €0.70 per share and per year in cash related to 2017 income and increased to €0.75 per share and per year in cash related to 2018 income. (7) Resulting in emissions of 354.4 kg of CO<sub>2</sub> equivalent per MWh of energy produced.

## Business model



# Going beyond energy supply to develop integrated solutions

With the 2016-2018 transformation plan, a new profile is emerging for the Group, firmly focused on low-carbon energy and the development of integrated services.



## Our customer solutions

### Companies

€27.9 bn  
in revenues

~100,000  
employees

80  
key accounts in more  
than 30 countries

#### Engineering

Energy infrastructure design,  
site engineering and consultancy

#### Installation

Installation and maintenance  
of technical equipment (electrical,  
mechanical, heating, ventilation  
and air conditioning)

#### Energy efficiency

Contractual commitment to reduce  
and optimize energy consumption  
through a range of digital solutions

#### Energy sales

Supply of gas, electricity  
and associated services

#### Integrated services

Integrated Facility Management  
(package of services performed on site)  
and Business Process Outsourcing  
(full outsourcing of business processes)

### Private and professional customers

€12.5 bn  
in revenues

~10,000  
employees

23.5 million  
contracts  
in 12 countries

#### Energy sales

Gas and electricity supply

#### Home services

Maintenance and installation  
of boilers, energy efficiency work,  
insurance and financing

#### Decentralized energy production

Solar panels, auto-consumption  
solutions, batteries, solar communities

#### “Connected home” services

Ranges of digital services in the areas  
of consumption monitoring, energy  
production, comfort and safety

#### E-commerce

Sale of connected objects linked  
to energy, safety, and home services

### Cities and territories

€2.6 bn  
in revenues

~2,000  
employees

350  
district heating networks  
in 20 countries

#### District heating and cooling networks

Effective heating and cooling  
solutions in cities

#### Decentralized energy production

Microgrids, integrated solutions  
for solar production, storage  
and management of demand

#### Green mobility

Alternative low-carbon fuel and  
development of transport infrastructure  
(information systems, electrification, etc.)

#### Digital platforms and systems

Town planning, urban dashboards,  
traffic management systems and  
e-healthcare tools

#### Solutions for towns and cities

Optimization of public lighting  
and security

## Highlights of our transformation

- Acceleration of the coal phase-out
- Sale of holdings in Exploration & Production
- Sign-off on the sale of upstream Liquid Natural Gas (LNG) activities
- Creation of a dedicated Business Unit for the development of renewable hydrogen

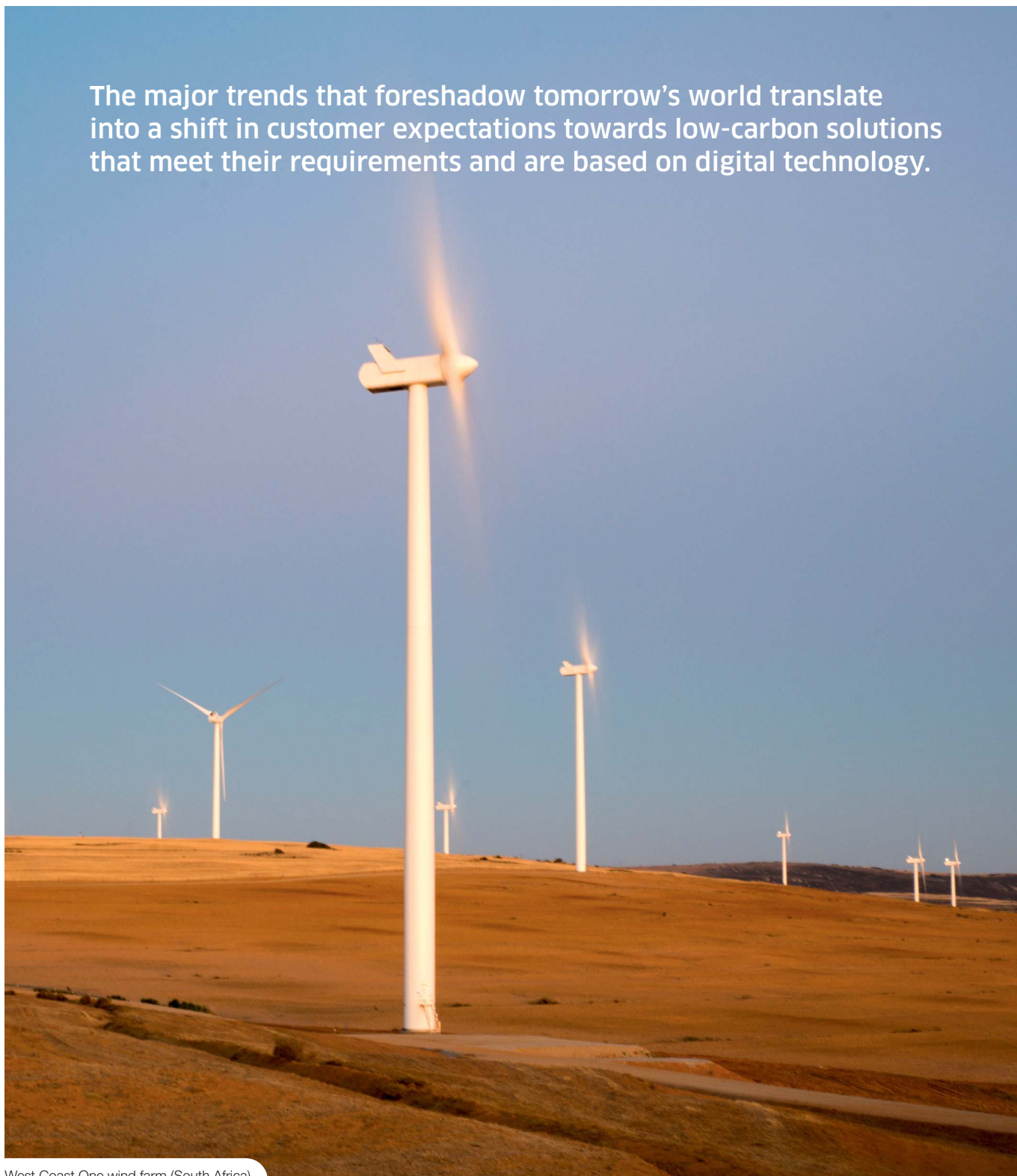
## Trends



# Staying abreast of energy market trends

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The major trends that foreshadow tomorrow's world translate into a shift in customer expectations towards low-carbon solutions that meet their requirements and are based on digital technology.



West Coast One wind farm (South Africa)

## Structural trends

Our ecosystem is currently undergoing a massive upheaval: we are seeing a fundamental change in the way that the company interacts with its stakeholders, and are facing issues such as climate change, demographic trends and an acceleration in technological advances. In view of these challenges, stakeholders have increasingly high expectations of the company, against a backdrop of regulatory changes.

### Societal

The **growth in world population** implies a raft of economic and societal changes. Although this growth is concentrated in the urban areas of developing countries, which are the main drivers of economic development, the gap between rural and urban areas is widening in terms of the quality of housing, access to services and infrastructures, pollution, public health, etc. This gap is increasing the inequalities between social groups. At the same time, economic growth and technological advances have resulted in an **increase in life expectancy**, involving changes to health and pension systems and the development of an offer to meet the particular needs of the elderly.

Simultaneously, younger generations now have **new aspirations**. They place a value on spontaneity and immediacy, and believe in the importance of accountability and the search for meaning. Under the influence of these new generations, the consumer society is thus moving towards a society based on goods and services, sharing and co-creation. **Community models** based on shared interests, fostered by new methods of communication and supported by growing global awareness amongst citizens – even a change in trust mechanisms – are profoundly altering the way that actors in society interact.

### Technological

The main sources of technological progress over the last few decades, the **New Information and Communications Technologies (NICT)**, have changed lifestyles and consumer habits considerably. They have resulted in a general improvement in housing conditions – in terms of construction, equipment, sustainability, etc. – and access to better quality medical services and care. People are now connected to each other as well as to their everyday objects, and these objects, in turn, are also interconnected. The **Internet of Things** provides an opportunity to continue improving our response to consumers' demands for customization in all areas of private life (food, information, health, etc.), resulting in the emergence of major issues linked to **cybersecurity**. In this **data society**, where all behaviors can be translated into statistics, new business models are emerging, particularly in terms of the circular economy and the sharing of products and services.

At the same time, there is increased pressure on the **labour market**, with demand focused on highly qualified profiles – particularly in the digital sector – to the detriment of positions considered as low added value. Companies are now required to adapt their business models to take advantage of the opportunities offered by new technologies, in order to invent the industry of the future, to continue improving relations with their stakeholders, and to meet their customers' expectations.

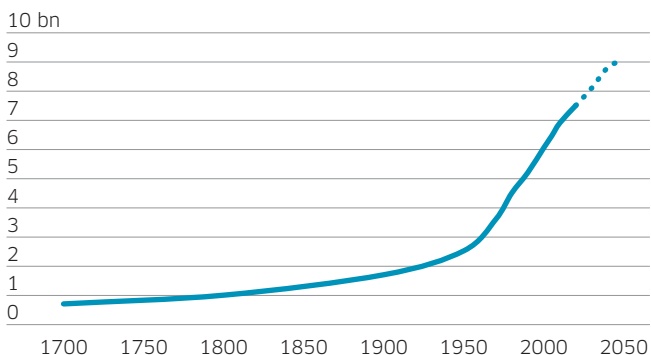
**5 billion**  
city-dweller in the  
world by 2030 <sup>(1)</sup>

Over  
**70%**  
of gross domestic  
product (GDP) is  
generated by cities <sup>(2)</sup>

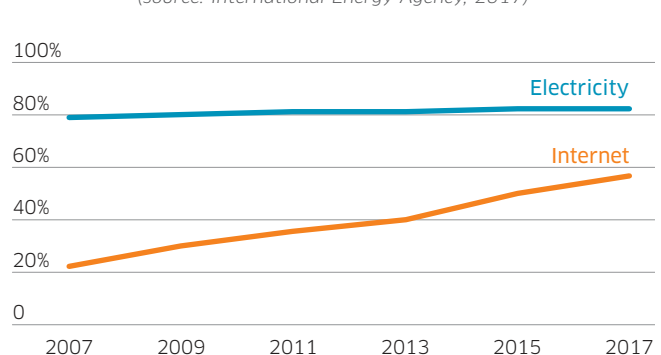
**53%**  
of the world's  
population connected  
to the Internet in  
January 2018 <sup>(3)</sup>

**\$2,200 bn**  
Global market share of  
smart systems between  
now and 2020 <sup>(4)</sup>

Changes in world population between 1700 and 2050  
(source: United Nations, 2015)



World population access to electricity networks and the Internet  
(source: International Energy Agency, 2017)



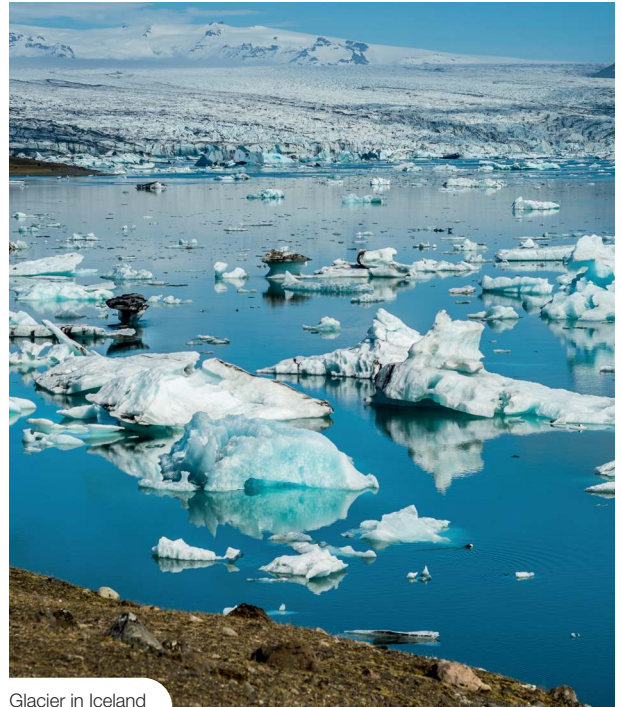
(1) United Nations, 2017. (2) UN-Habitat, 2018. (3) Hootsuite and We Are Social, 2018. (4) International Data Corporation (IDC), 2016.



## Environmental

Recognition of **climate change** is becoming increasingly important as our understanding of its impacts becomes clearer. The **concentration of CO<sub>2</sub> in the air** has reached an historic high, leading to fears of an increase in **extreme climate events**. In addition, **biodiversity** is decreasing sharply: around 17,000 animal and plant species are currently threatened with extinction.

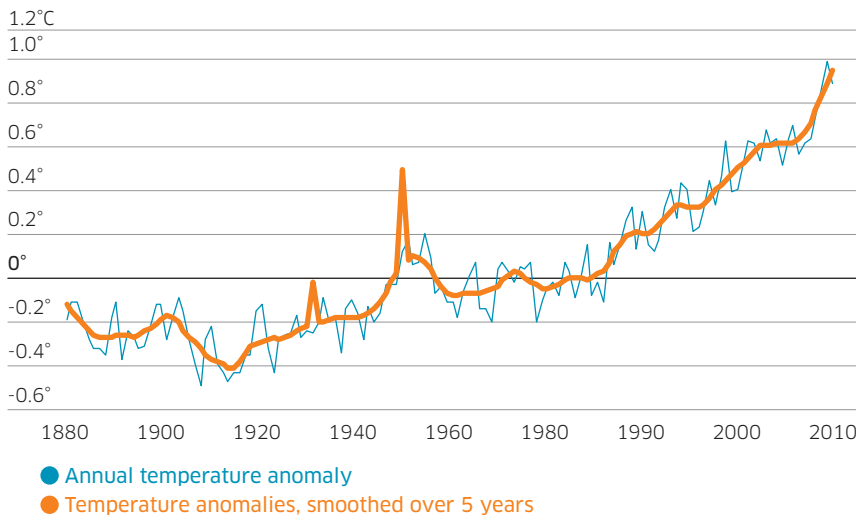
However, faced with these alarming findings, the society has demonstrated a **real awareness**. To reduce the impact of climate change across the planet, a **change in behavior** in terms of energy consumption and production is underway. This underlying trend has translated into **solid commitments from industrial and financial companies** to limit global warming to +2°C and to set a price on carbon in the wake of the 2015 Paris Agreement. With this same aim, many governments are imposing increasingly stringent **regulations**, as illustrated in France by the enactment of the 2015 law relating to the energy transition for green growth and the Duty of Vigilance law in 2017. Financial investors are pushing energy companies to be more transparent on the impacts of climate change.



Glacier in Iceland

### Change in mean annual global temperature since the industrial revolution

(source: NASA, 2017)



**+0.94°C**  
rise in mean annual global temperature since 1880 <sup>(1)</sup>

**65%**  
of biodiversity threatened

See also



**2018 Integrated Report**  
Governance – page 32



**2018 Integrated Report**  
Value creation – page 34

(1) National Oceanic and Atmospheric Administration (NOAA), 2017.

## Energy market trends

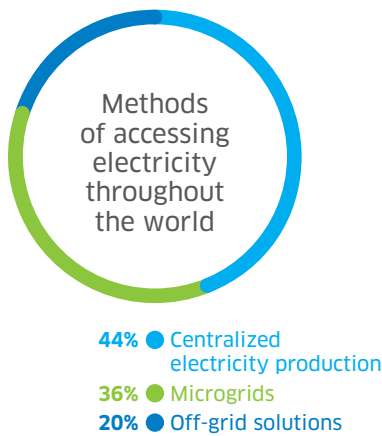
There are major structural trends impacting the energy sector, resulting in fundamental changes in terms of production and consumption. The energy world is now increasingly decentralized, digitized and decarbonized.

### A decentralized world

Historically, the operation of energy services was primarily based on **large electricity generation plants**, the operation of vast gas fields, and transmission and gas and electricity distribution networks. The development of new technologies and the increasing disintermediation of the actors are also now enabling the **decentralization of energy production**. Some energy needs are covered by **production at consumption sites** (individual and collective housing, businesses, industrial sites, and local authorities).

#### Breakdown between centralized and decentralized energy production in the “Providing energy access for all by 2030” scenario

(source: IEA-WEO, 2011)



### Consequences for customers

From private individuals to industrial operators, customers are now looking for **customized and comprehensive solutions**. “Prosumers” can themselves now become **producers – or even suppliers – of energy**, aided by the democratization of technology. Through the development of microgrids, local production and energy consumption networks, and the installation of new infrastructures in areas not yet equipped, populations are benefiting from **improved access to energy**.

#### Opportunities and challenges for ENGIE

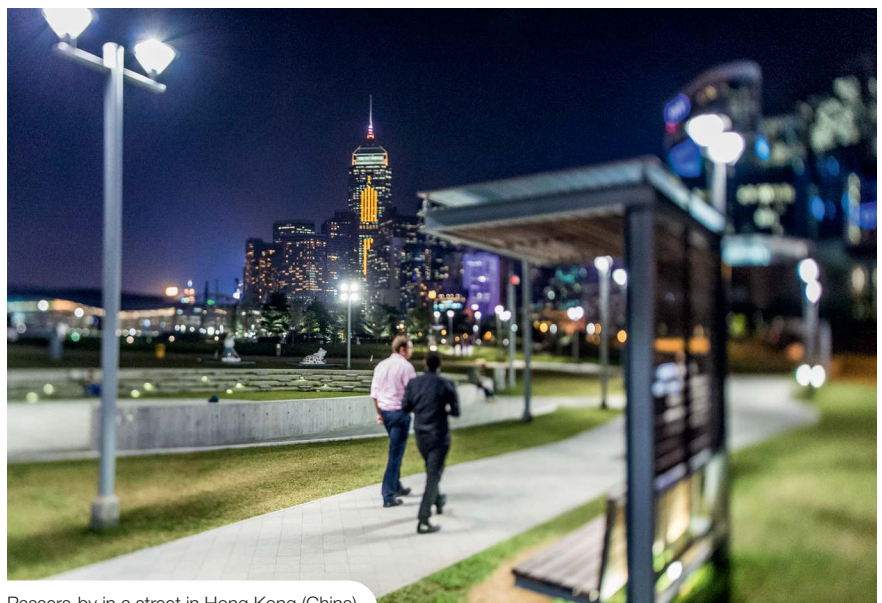
- **Diversification of activities and commercial offers**, to go beyond simply providing energy.
- Emergence of more collaborative **energy management platforms** and **new business models**: development of partnerships, co-construction of commercial offers, and support to customers for energy production, such as corporate power purchase agreements.
- **Development of energy storage solutions** to smooth out the intermittency of electricity produced from renewable energy, in compliance with the regulations and the roll-out of industrial safety best practices.
- **Development of equipment** in areas not connected to energy networks and the roll-out of **local solutions**.

€46 bn

Anticipated value of the microgrid market in 2020 <sup>(1)</sup>

Over 60%

of 114 experts in renewable energies interviewed by REN21 predict that decentralized energy will be predominant by 2050 <sup>(2)</sup>



Passers-by in a street in Hong Kong (China)

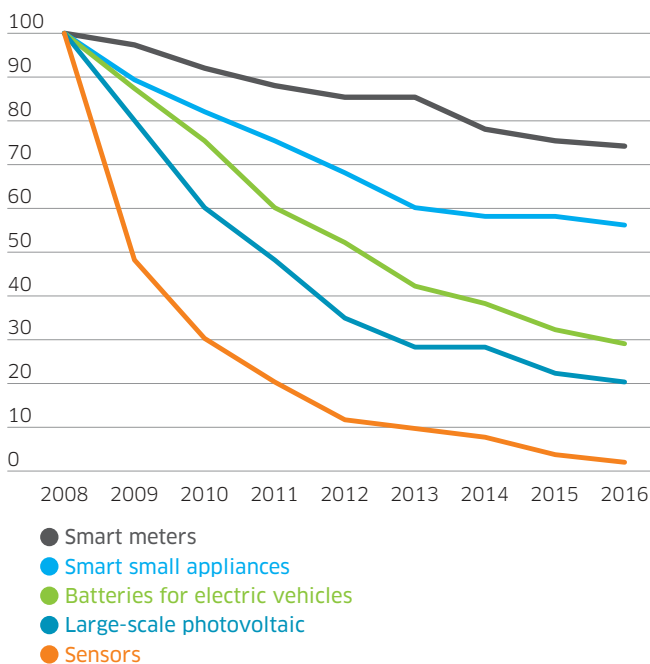
(1) SIEMENS, 2017. (2) REN21, 2017.

## A digitized world

With the widespread roll-out of digitization, **the energy sector is facing an unprecedented technological revolution**, resulting in the emergence of new energy services: diagnosis and installation of equipment, production and storage of renewable energy, monitoring and control of energy consumption, etc. The development of remote monitoring and optimization of equipment, along with predictive maintenance, demonstrate the potential of digital as a **driver of operational excellence**, in an increasingly competitive environment where customers are better informed. **Digital technologies are radically changing usages** and are modifying interactions between people and their **relationships with objects**.

### Changes in unit costs of emerging electricity technologies (base 100 in 2008)

(source: International Energy Agency, 2017)



**\$500 bn**  
estimated amount of digital  
investments in electrical  
networks over the next  
5 to 7 years <sup>(1)</sup>



**1 billion**  
homes may be part of  
interconnected electrical  
systems by 2040 <sup>(2)</sup>

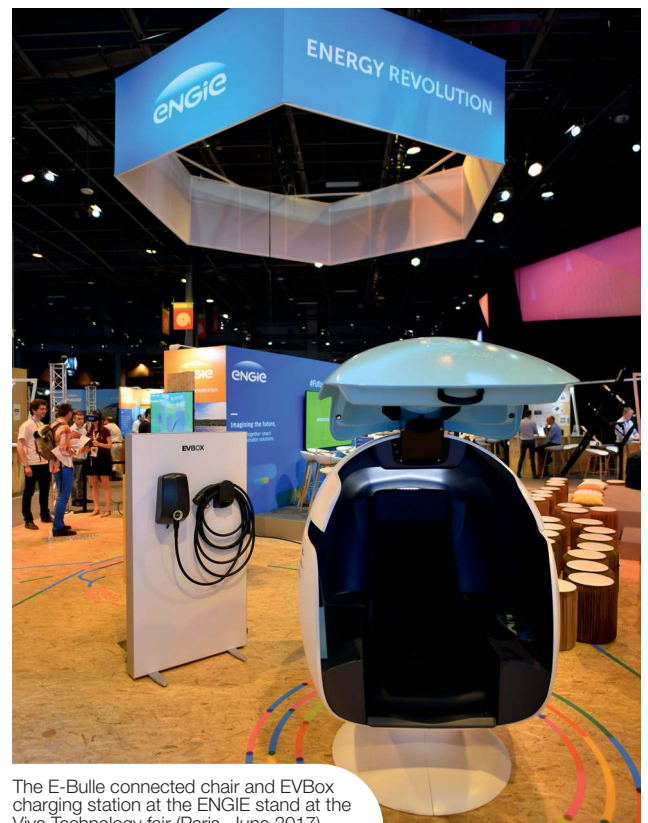
(1) EY, 2016. (2) International Energy Agency, 2017.

## Consequences for customers

Digital gives customers the ability to **express their expectations more fully** in terms of offers, which they want to be more integrated and customized. It fosters the diversification of solutions, including **control of their energy consumption**. This is now possible thanks to connected objects and customer areas allowing for detailed analysis of consumption, comparison with identical profiles and the provision of services to optimize energy consumption, etc. The development of new technologies, particularly artificial intelligence, implies **a change in customers' relationship with the company** via, for instance, the widespread use of chatbots.

### Opportunities and challenges for ENGIE

- Proposed **new service offers** and improved **operational efficiency**.
- Development of an increased **customer focus** with the customization of the product and service range and an improvement in customer satisfaction, in compliance with **confidentiality and the protection of personal data**.
- **Strengthening cybersecurity**, particularly in relation to the emergence of big data.
- **Increased transparency** in response to the heightened risk of reputational damage associated with the growing power of social networks.
- **Adaptation of the skills** of employees, suppliers and subcontractors to changes in the energy market.



The E-Bulle connected chair and EVBox charging station at the ENGIE stand at the Viva Technology fair (Paris, June 2017)

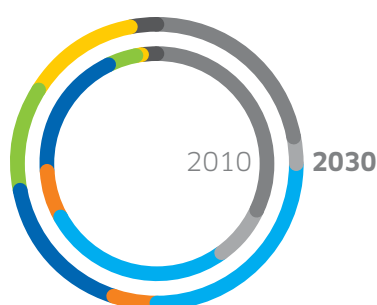


## A decarbonized world

After the interest in coal in recent decades, especially in developing countries, the momentum of investments has reversed in favor of **low-carbon assets**. In 2017, in Europe, more than 85% of new electrical capacity installed was renewable<sup>(1)</sup>. With advancements in technology and additional investments, **production costs have become increasingly competitive**. Consequently, solar and wind installation costs have fallen sharply: since 2010, they have decreased by 70% for new solar photovoltaic plants and by 25% for wind farms. **Gas also retains a key role** in this new energy world: it allows for effective management of the problem of intermittency associated with renewable production, while emitting significantly less CO<sub>2</sub> and fewer particles than all competing fossil fuels and paving the way for the green gas of tomorrow.

### Change in the global electricity mix between 2010 and 2030

(source: Enerdata, 2018)



32/22% ● Coal  
 8/3% ● Oil  
 27/25% ● Natural gas  
 5/7% ● Nuclear  
 19/17% ● Hydropower  
 4/12% ● Wind  
 1/13% ● Solar  
 2/3% ● Biomass

**+40%**  
 in atmospheric CO<sub>2</sub>  
 emissions since 1750<sup>(3)</sup>

**13%**  
 of global emissions were  
 covered by an explicit  
 carbon price mechanism  
 in 2016<sup>(4)</sup>

## Consequences for customers

Aware of **the urgency and importance of environmental challenges**, customers are adopting an increasingly responsible and proactive approach to their energy consumption, which, as proactive consumers, they wish to reduce and control. This fall in demand, especially in developed countries, comes on top of greater demands regarding the supply of energy: customer-citizens **attach great importance to corporate responsibility**, both in terms of a business' activities as well as its entire value chain.

### Opportunities and challenges for ENGIE

- Development of **environmentally friendly solutions**: sustainable mobility (tools and infrastructure), sustainable construction (energy-positive buildings), improved air quality, energy efficiency solutions.
- **Shift to low-carbon energy**, creating jobs and new sources of income to compensate for the **human and financial costs** stemming from changes to the energy mix and the sale of or move away from "carbon" assets.
- Anticipation of **risks related to climate change** (drought, floods, etc.), depending on the geographic areas where the Group has a presence, and the **increasing scarcity of certain natural resources**.
- Maintain **competitiveness** and **adapt** to changes in the **demand for natural gas**.
- Improvement in the **Group's reputation** and its **local integration**.
- Monitoring of **international standards** and the **legal and regulatory framework** in countries where the Group has a presence.

See also



**2018 Integrated Report**  
 Governance – page 32

(1) Wind Europe, 2017. (2) International Energy Agency, 2017. (3) *Commissariat général au développement durable* [French General Commission for Sustainable Development], 2017. (4) Institute for Climate Economics, 2017.

## Ambition



# To become one of the pioneers of the new energy world

ENGIE is keen to contribute to more harmonious progress – combining technical expertise and sustainability – and to bridge the gap between individual interests and collective needs.



ENGIE becomes the main partner of Energy Observer, the first drillship operating on renewable energies and hydrogen (Marseille, March 2018)

**170 years of industrial expertise and worldwide presence: shared energy**

With the experience gained through the huge challenges it has met over the past 170 years in the industrial sector and with a clear firm vision of the future of the energy and services sector, ENGIE is in a strong position to cope with the challenges ahead.

**1858**

**Creation of Compagnie Universelle du Canal Maritime de Suez**

- The golden age of transport
- Holdings and investments in the economy

**1946**

**Creation of Gaz de France**

- Industrial reconstruction
- Carrier, distributor and trader of natural gas

**2001**

**Suez Lyonnaise des Eaux becomes SUEZ**

- Essential needs and population growth
- Electricity, gas, energy, water and sanitation services

**2008**

**GDF SUEZ was created from the merger between SUEZ and Gaz de France**

- Strengthening competition in the energy market
- Creation of a global energy leader

**2015**

**GDF SUEZ becomes ENGIE**

- Decarbonization, decentralization and digitization of energy management
- A leader in the energy transition

**Today, ENGIE goes beyond energy**

**Energy is at the heart of human progress.** As the leader in energy and services, ENGIE has always been a pioneer, paving the way to new horizons. The Group sees the world around it as a vast source of opportunities, and is increasingly collaborative in the ways that it seizes the potential of these opportunities and, conversely, allows civil society to benefit from them.

Its 155,000 employees strive each day to pave the way for **more harmonious progress**, with every individual given the power to take action and to reconcile economic performance with social and environmental responsibility. ENGIE devises solutions for territories, companies, and individuals, providing individuals and communities with the power to act and choose.

**Four fundamentals**

There are **four fundamentals** that structure this commitment and, more broadly, the positioning of the Group's brand:

- **A legacy: being a pioneer**
- **A way of doing things: uniting**
- **A mission: going beyond energy**
- **A vocation: contributing to harmonious progress**

See also [engie.com](https://www.engie.com)  
Our commitments

## The Group's commitments

ENGIE takes into account the impact of its activities within its sphere of influence and, vice versa, the impact on business activities of changes in that sphere of influence.

### Our commitments

### Our priorities

### Our achievements in 2017



ENGIE is moving towards a **scenario compatible with the Paris Agreement (+2°C trajectory)** through its transformation and investments.

→ Changes in the **energy mix** (coal phase-out underway and development of renewable energy) and contribution to the decarbonization of **customers' value chains**



ENGIE is committed to **more comprehensive communication on the impact** that climate change may have on its activities and how it intends to take this into account to adapt its activities and strategy.

→ **Creation of an internal task force** to adapt the reporting to the recommendations set out in the TCFD, including an assessment within 5 years of regulatory, technological, market, reputation, and physical risks



ENGIE promotes the **development of sustainable finance**, especially the green bond market, which enables the convergence of the Group's long-term vision and the sustainable development goals of investors.

→ **1<sup>st</sup> issuer of green** corporate bonds with €6.25 billion issued since 2014  
→ Signing of the **Membership Charter at Finance for Tomorrow** at Paris EUROPLACE



ENGIE wants to find practical solutions that take a proactive approach to avoiding, reducing or offsetting its impacts. ENGIE is committed to developing a **biodiversity protection plan** for each of its priority sites, to address local issues identified in consultation with stakeholders.

→ **98% of European sites have been covered** by an action plan since the end of 2015



The Group adopts, supports and applies the **10 fundamental principles** in terms of human rights, labor rights, the environment and the fight against corruption. ENGIE undertakes to increase its management of water and sanitation.

→ **Progress report** on the 10 fundamental principles and water management



ENGIE promotes strong principles of **equal opportunities, the fight against discrimination and diversity**.

→ **Diversity Label** renewed in 2017 for all subsidiaries in France, for 4 years  
→ Signature of the Autre Cercle **LGBT** (Lesbian, Gay, Bisexual and Transgender) **Commitment Charter**



ENGIE and Solar Impulse, through the World Alliance for Efficient Solutions, have undertaken to promote **1,000 practical energy solutions** that are viable on both an ecological and economic level.

→ **Delivery** by ENGIE and its partners, at the forthcoming COP24, of **innovative solutions** to combat global warming

## Three strategic objectives

ENGIE has repositioned itself in order to lay solid foundations for new growth with a portfolio that is less exposed to market prices, lower in carbon and more profitable.

### A lower-carbon portfolio

As the Group's growth is based on **decarbonized energy sources**, ENGIE is gradually phasing out its activities with the highest levels of CO<sub>2</sub> emissions. Over a three-year period from 2016 to 2018, the objective was to **increase the share of low-carbon** activities to more than 90% of total EBITDA. This priority was achieved by means of a portfolio turnover program and a targeted investment strategy.

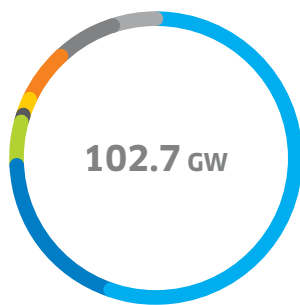
### More profitable long-term growth

With **customer solutions** representing strong potential for economic growth, ENGIE wants to be a key player in the decentralized and digital energy world. The Group has repositioned itself across **three main Métiers** that are strong drivers for growth – generation of low-carbon electricity, global networks and integrated customer solutions – and aims to increase EBITDA from **integrated customer solutions** by at least 50% by 2018 compared with the end of 2015.

### Improvement in the risk profile

To make its results more predictable, the Group reduced its commodity price exposure, and 89% of its EBITDA is currently contracted or regulated (vs. 70% in 2015). The **streamlining of its portfolio** and the **sale of activities** not compatible with the challenges of the energy transition have allowed ENGIE to **reduce its risk profile**.

#### Breakdown of fully installed electricity capacity at the end of 2017



- 56% ● Natural gas
- 19% ● Hydropower
- 5% ● Wind
- 1% ● Biomass and biogas
- 2% ● Solar
- 6% ● Nuclear
- 7% ● Coal
- 5% ● Other non-renewable



Natural gas-fired power plant in Cartagena (Spain)

### Our performance

	2016	2017	Objectives
Prioritizing the most low-carbon solutions	81%	91%	> 90% ✓
Integrated solutions for customers	+2%	+22%	+50% (c)
Reducing exposure to commodity prices	75%	89%	> 85% ✓
			2018

(c) At constant exchange rates

## Transformation



# Working towards the energy transition

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In 2016, the Group launched a transformation plan to accelerate its strategic shift. With 90% of its objectives achieved in just two years, ENGIE is now in a strong position to speed up its growth.



Solar panel park in Bollène (France)

## First pillar: redefine the portfolio of Group activities

ENGIE's repositioning of its business portfolio on drivers for growth is predicated on a secure asset turnover program and an ambitious investment program.

### Our priorities

The focus of ENGIE's business portfolio is on activities that will play a key role in the future energy world, and the portfolio is therefore moving towards being cleaner, less risky and more profitable.

To achieve this, ENGIE is running a **portfolio turnover program** worth €15 billion over the 3 years from 2016 to 2018. At the same time, the Group is overseeing a €14.3 billion **investment program** of this, €1 billion is being invested in digital and innovation, with €0.5 billion in charges, making a total expenditure of €1.5 billion in these areas. These investments will allow for the development of three businesses lines that are considered to be priorities: low-carbon energy production, particularly from gas and renewables; global networks, particularly gas; and integrated customer solutions.

**€15 bn**  
on the portfolio  
turnover program  
from 2016-2018

**€14.3 bn**  
on the investment program,  
including €1 billion of  
investment in innovation  
and digital

### Growth investments 2016-2018



**32%** (€4.6 bn) ● Customer solutions  
(€0.5 bn) ● B to B  
(€1.8 bn) ● B to T  
(€2.2 bn) ● B to C

**18%** (€2.6 bn) ● Global gas networks

**50%** (€7.1 bn) ● Energy production

### Our performance

Portfolio turnover program  
(including €1.6 billion in sales agreed at the beginning of March 2018)

Growth investment program  
(including €10.2 billion already spent at the beginning of March 2018)

### Our achievements in 2017

#### Develop low-carbon energy production .....

- 30-year concession contracts for two hydroelectric plants in Brazil
- 4 renewable energy projects in Mexico
- Contract to develop an offshore wind farm in the United Kingdom

#### Develop global networks, primarily gas .....

- Financing agreement for the Nord Stream 2 gas pipeline
- Concession to build power lines in Brazil
- Publication of three consultations by the *Commission de Régulation de l'Énergie* (Energy Regulation Commission, CRE) regulating underground gas storage in France

#### Develop integrated solutions for customers .....

- Acquisition of Keepmoat Regeneration, a leading provider of building renovation services for local authorities in the United Kingdom
- Acquisition of Sungevity International, a leading European company for the installation and management of photovoltaic solutions for residential and professional customers
- Acquisition of Mes Dépanneurs, a specialist company that puts individuals in touch with professionals for emergency callouts and home repair services in France
- 50-year energy management contract with Ohio State University in the United States, in partnership with Axium
- 40% stake taken in Tabreed, a leader in district cooling networks in the Middle East
- Acquisition of CNN MCO, a company specialized in the maintenance, management and servicing of all types of naval buildings, through the ENDEL ENGIE subsidiary
- Acquisition of SPIE Morocco, a key player in energy services in Morocco

2016

2017

Objectives

€8 bn

€13.2 bn

€15 bn<sup>(a)</sup>

€12 bn

€13.9 bn

€14.3 bn<sup>(a)</sup>

2016-2018

(a) Net debt impact

(1) Net income from sales of development and construction activities and from the partial sale of solar and wind farms (DBSO); excluding E&P capex and upstream LNG (including Touat and Cameron) amounting to €0.3 billion and corporate capex of €0.2 billion.

## Second pillar: prepare the Group's future by basing on innovation and digital transformation

ENGIE believes that innovation and digital are key to its growth and has therefore integrated them into all of its business activities – global gas infrastructure, energy production and customer solutions – as well as its organizational structure.

### Our priorities

ENGIE is investing in **innovation and digital** to prepare for the future, thus underlining its pathfinding position in the energy and digital revolutions. It is working simultaneously on innovative solutions with high growth potential over a 3-year horizon (green mobility, green gas, etc.) and on additional options for future growth to be rolled out over the next 5 to 10 years, based on emerging technologies and business models (clean hydrogen, etc.). To develop these activities, ENGIE has set up **new structures to support the BUs**, including ENGIE Fab and ENGIE Digital. The Group has also **strengthened its links with the innovation and technology ecosystem** through partnership arrangements. It has also made acquisitions and equity investments to expand its range of innovative solutions. Finally, convinced of the major role that green gas, biogas and renewable hydrogen will play in the energy transition, ENGIE is continuing to invest in their development.

### Our achievements in 2017

- Signature of a contract to acquire a majority stake in Electro Power System (EPS), a company specialized in industrial-scale energy storage solutions and microgrid solutions
- Acquisition of EVBox, the European leader in electric vehicle charging solutions
- Inauguration of the GAYA platform, near Lyon in France, for testing the production of biomethane from dry biomass
- Creation of a dedicated global entity for the development of renewable hydrogen throughout the world
- Continuation of the rollout of Darwin, a unique digital data management platform for renewable electricity production assets

### Our performance

Expenditure on emerging and digital technologies 2016-2018

2016

€0.5 bn

2017

€1 bn

Objective

€1.5 bn

Over  
**117**  
wind and solar  
farms connected  
as part of Darwin

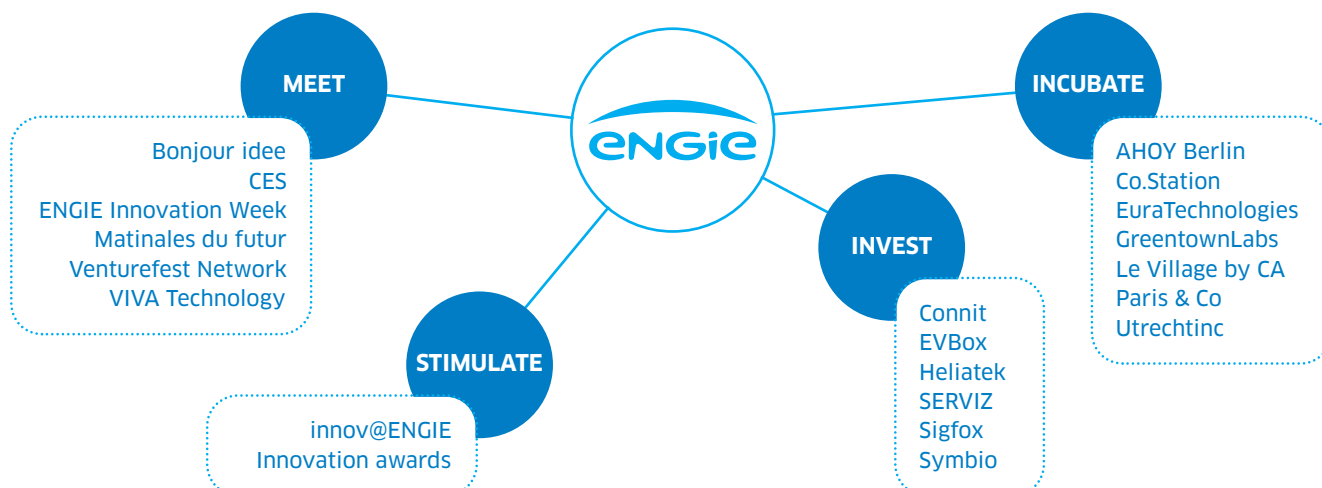
Around  
**1,100**  
employees  
are involved  
in R&D at ENGIE

**6**  
ENGIE Labs  
recently opened  
internationally

Around  
**16,000**  
employees who  
are members  
of innov@ENGIE

### At the heart of an innovative ecosystem

(entrepreneurs, start-ups and expert members of the Group's innovation ecosystem)





## Third pillar: improve operational performance

As part of a series of ongoing improvements, ENGIE is establishing optimized processes and operating methods to enhance its operational efficiency and competitiveness.

### Our priorities

ENGIE's **operational efficiency and competitiveness** are key to the third pillar of the transformation plan. The new efficiency program, "**Lean 2018**", was launched in January 2016 to provide long-term improvements to the Group's performance. It translates into the implementation of processes and operating methods designed to be simpler and more effective. The rollout of this **decentralized efficiency program** is carried out BU by BU. To achieve these objectives, adapted to their specific situations, BUs can make use of three main types of levers: operations, support functions and procurement.

Following the introduction of an organizational structure on January 1, 2016 that strengthened the operations of its geographic BUs, ENGIE has continued to decentralize its structure **to become more agile and get closer to its customers**. As a consequence, the Group has redefined the remit and size of NewCorp based on a voluntary departure plan implemented in 2017 and 2018.

### Our achievements in 2017

- €947 million in aggregate net gains in EBITDA recorded at the end of December 2017 (of which €417 million in 2017)
- Outperformance of the "Lean 2018" plan compared to the initial objective of €850 million in savings by the end of 2017
- Expansion of Shared Service Centers (pooling of support functions) and work focusing on the optimization and streamlining of working methods
- Implementation of procedures to build financial and CSR criteria into investment decisions
- Establishment of multi-disciplinary bodies such as the "Green Bond" Committee jointly chaired by the Finance Department and the CSR Department, and the "Duty of Vigilance" Committee jointly chaired by the Ethics, Compliance & Privacy Department and the CSR Department

### Our performance

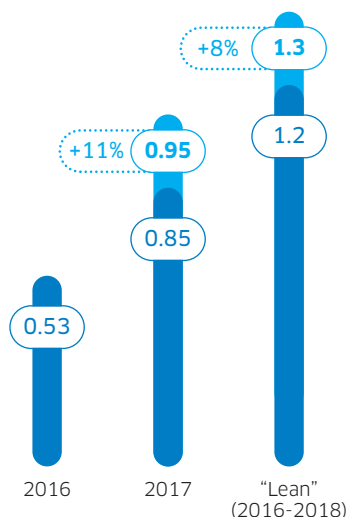
Efficiency program ("Lean 2018") aimed at making recurring savings on operating expenses between 2016 and 2018



The initial aim was to achieve recurring cost savings with a net aggregate impact on EBITDA of €1 billion by 2018. In view of the progress of the program, in March 2017, **the Group increased its objective for 2018 by 20%**, i.e. to €1.2 billion in net gains, moreover, in March 2018, it increased the objective by a further 8%, bringing the total amount to €1.3 billion.

### Ahead of plan for "Lean 2018"

Net aggregate impact on EBITDA (in € bn)



## Fourth pillar: adapt the Group to the new energy world

Reorganization, cross-functionality, sharing of skills: ENGIE is renewing itself and changing its organizational structure to become more agile and connected to its ecosystem.

### Our priorities

To be **closer to its stakeholders**, ENGIE is changing the way it operates and placing agility, proximity, cross-functionality and customer focus at the heart of its corporate culture.

The **personal development of employees** is a key performance and development lever for ENGIE. The Group encourages the **proactive management of jobs and skills**, appropriate to its transformation – which is intended to be collective – to create gateways to growing trades. Special focus is placed on training, via the internal training schools, the “e.campus” portal and ENGIE University. Furthermore, targeted talent development policies have been rolled out at all levels of the Group (executives, experts, managers, technicians, etc.).

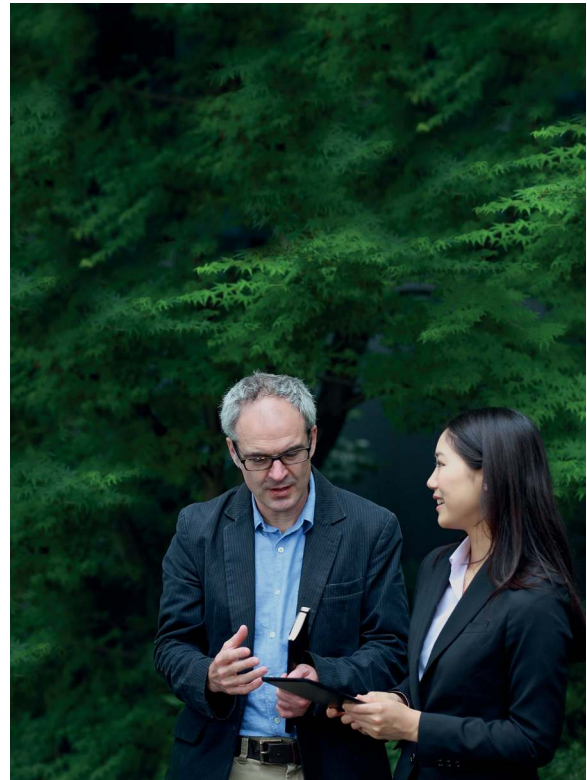
ENGIE has established a **streamlined organizational structure, based on a local, decentralized approach**. ENGIE is structured as 24 BUs, mostly covering a single country or a group of countries, according to the concentration of activities carried out in the geographical areas concerned. In addition to this geographical strategy, the BUs are supported by NewCorp, which comprises five cross-functional Métiers plus support and operational functions. Day-to-day support for the BUs and NewCorp is provided by **Global Business Support**, an entity that combines the Group’s Shared Service Centers in France and Belgium. It is currently being rolled out in Brazil and the United States, and its aim is to continue improving the internal services of the Group.

Over **900** members of the Young Professional Network, an international network to contribute to strategic discussions within the Group

**65,000** employees on “Yammer”, the corporate social network

### Our achievements in 2017

- Ramp up of ENGIE Mobility, which was launched in 2016 to encourage mobility between entities and support employees in their career plans
- Rollout of a new Leadership Model, a framework based on key skills essential for managerial responsibility
- 1<sup>st</sup> “U.Camp”, a temporary intensive training campus in Paris, bringing together 900 employees of 29 different nationalities, from 23 BUs
- Launch of the “Matching Energies by ENGIE” program, which aims to connect students with employees with similar educational backgrounds and personalities
- 2<sup>nd</sup> edition of the engagement measurement survey, ENGIE & Me



### Our performance

	2016	2017	Objectives
Share of women in the Group’s workforce	21.9%	22.2%	25%
Internal occupational accident frequency rate	3.6	3.3	≤ 3
Levels of management engagement	78%	78%	80% 2020

An organization working closely with customers and territories<sup>(1)</sup>

## 24 Business Units...

### 11 BUs in Europe and around the world

- Africa
- Asia Pacific
- Benelux
- Brazil
- China
- Generation Europe
- Latin America
- Middle East, South and Central Asia, and Turkey
- North America
- North South, Eastern Europe
- United Kingdom

### 8 BUs in France

- Elengy
- France B to B
- France B to C
- France Networks
- France Renewable Energy
- GRDF
- GRTgaz
- Storengy

### 5 global BUs

- Global Energy Management
- Global LNG<sup>(2)</sup>
- GTT
- Renewable hydrogen<sup>(3)</sup>
- Tractebel

... aided by NewCorp, composed of:

### 5 structural Métiers



### 11 Support Functions and 5 Operational Functions

and supported by Global Business Support

(1) Group position in May 2018. (2) In the process of being sold. (3) Currently being created.

## Governance



# Defining and implementing ENGIE's strategy

Renewed in 2018, ENGIE's governance structure continues to drive the transformation plan forward and define the strategic choices to ensure the future of the Group.



*From left to right:*  
Jean-Pierre Clamadieu,  
Isabelle Kocher,  
Ann-Kristin Achleitner,  
Christophe Agogue,  
Edmond Alphandéry,  
Christophe Aubert,  
Alain Beullier, Fabrice  
Bregier, Aldo Cardoso,  
Patrice Durand, Catherine  
Guillouard, Mari-Noëlle  
Jégo-Laveissière, Barbara  
Kux, Philippe Lepage,  
Françoise Malrieu, Ross  
McInnes, Lucie Muniesa,  
Marie-José Nadeau, Lord  
Ricketts of Shortlands



## Significant involvement of the Board and its Committees

The Board of Directors **sets the overall strategic direction** of ENGIE **and ensures that it is implemented**. In particular, it supervises the financial policy and commitments in terms of corporate, social and environmental responsibility and meets as often as the interests of the Group require. The rights and duties of Directors and the rules regarding the performance of such duties are set out in the **Code of Conduct** and in the **Directors' Charter**.

The Board of Directors is assisted in its discussions by **four Committees**. They are consulted on specific topics in preparation for certain matters to be discussed and give their recommendations on the decisions to be made. Each Committee is chaired by an Independent Director.

### Compliance with the Afep-Medef Code and with the "Comply or explain" principle

Independence of Directors	E
Total directorships	C
Distribution of Directors' fees	C
Employees within the Compensation Committee	C
Say on pay	C

C: Comply – E: Explain.

## The Board of Directors

sets the overall strategic direction and ensures that it is implemented

14 meetings

90% attendance

## Audit Committee

reviews the financial statements and financial position, monitors internal and external audits and risk mapping

10 meetings

94% attendance

## Strategy, Investment and Technology Committee

gives its opinion on general strategic directions, particularly in regard to technology, and internal and external growth projects, sales, strategic agreements, alliances and partnerships

15 meetings

89% attendance

## Appointments, Compensation and Governance Committee

reviews and drafts recommendations on any proposed changes to the Board, reviews the succession plan and the compensation policies for governance and evaluates the effective operation of the governance bodies

6 meetings

97% attendance

## Ethics, Environment and Sustainable Development Committee

ensures the Group has the right level of commitment with regard to ethics, non-financial compliance, and corporate, social and environmental responsibility

4 meetings

85% attendance

## A few words from

### Ann-Kristin Achleitner

Director and Chairman of the Ethics, Environment and Sustainable Development Committee



The Group works hard to maintain its leadership position in integrated thinking by taking a professional approach that pushes it to make continuous improvements

and further increase the transparency of its reporting to stakeholders."

### Philippe Lepage

Director elected to represent employees



The Director representing employees plays a vital role on the Board of Directors as the direct link between employees and Group governance."

## An Executive Board that embodies the Group's vision

Two executive bodies – the Executive Committee and the Operational Management Committee – are responsible for formulating ENGIE's strategy and monitoring its implementation in the territories where the Group has a presence.

### The Executive Committee, driving strategic decisions

The Executive Committee is responsible for steering the Group. Actively involved on the ground **to support the Group's 24 BUs**, the 12 members of the Executive Committee review ENGIE's long-term strategy and outlook while ensuring its short-term objectives are met. The Executive Committee generally meets weekly and makes the major decisions concerning investment in particular, reviews performance, and monitors the pace of the Group's transformation.

The composition of the Executive Committee is based on the principle of **bringing together the functional and operational responsibilities** shared between its various members, taking a cross-disciplinary approach that breaks down silos and establishes collective responsibility.

### The Operational Management Committee, responsible for strategy implementation

The "**ENGIE 50**" Operational Management Committee implements ENGIE's strategic decisions. It is also in charge of leading the Group's transformation closer to the territories. The Committee's monthly meetings are chaired by Isabelle Kocher and attended by Chief Operating Officers, Directors of the 24 BUs and 5 Métiers and the heads of the main functional departments.

25%  
women

5  
nationalities

1<sup>st</sup>  
company in its sector and  
5<sup>th</sup> overall in the ranking on  
"Increasing female  
representation on the  
governing bodies of SBF  
120 companies"

See also



**2017 Registration Document**  
Chapter 4 – section 4.3



**engie.com**  
Governance



Discussions during a Group Executive Committee meeting

## Compensation to encourage the creation of long-term overall value

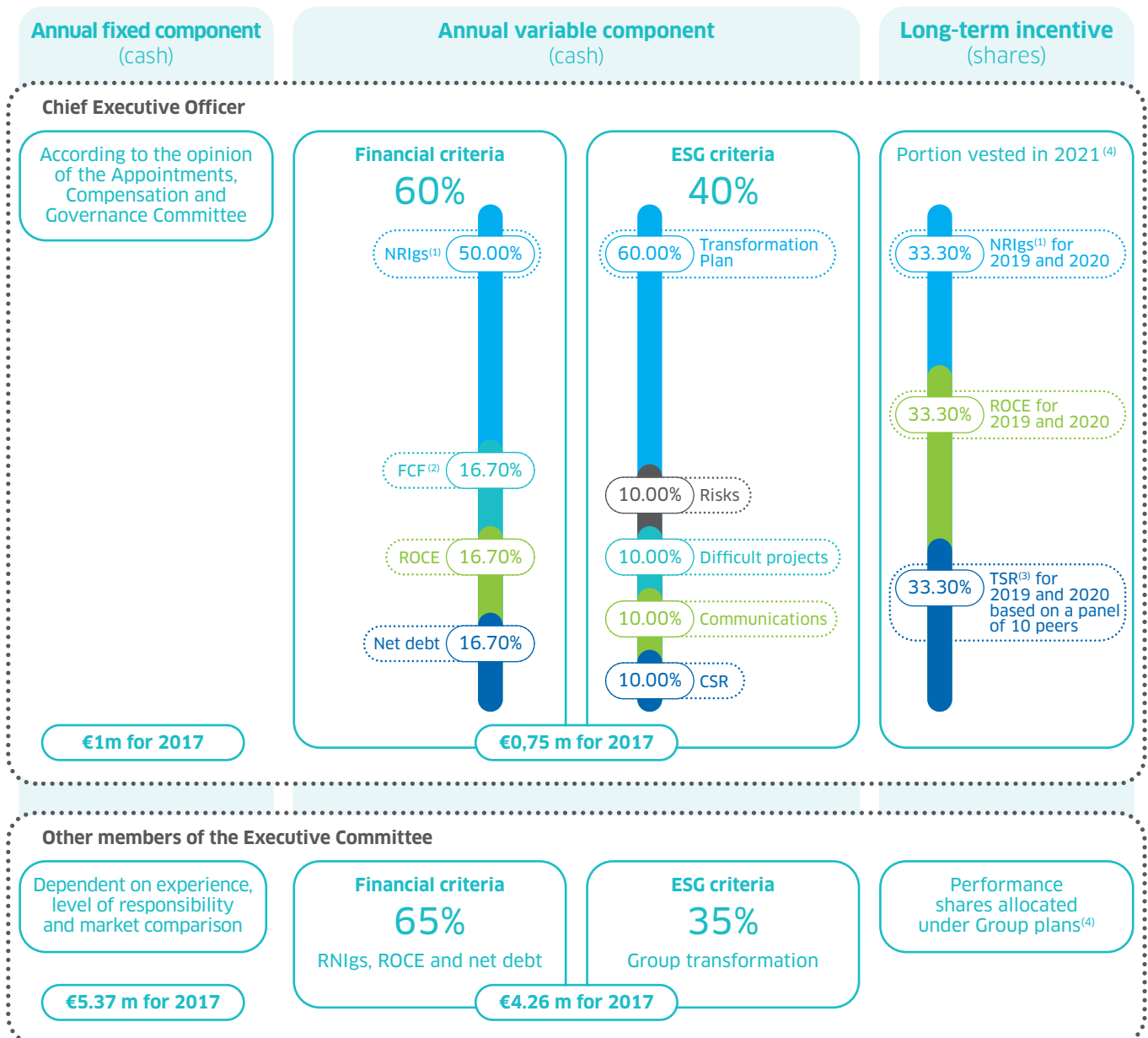
The compensation for ENGIE executives is designed to reflect short, medium and long-term value creation, in line with the Group's strategy, its performance, its CSR commitments and the interests of its shareholders and stakeholders.

### Compensation of executive management and corporate officers

The compensation of ENGIE's executive managers and corporate officers is reviewed annually by the Board of Directors, on the recommendation of the Appointments, Compensation and Governance Committee, and is subject to approval by the Annual Ordinary Shareholders' Meeting.

The Group builds CSR criteria into the appraisal of its 600 senior managers throughout the world. Additionally, in 2017, more than 7,300 employees were entitled to a **Performance Share plan** subject to performance conditions.

### Principles of compensation 2017



(1) Net Recurring Income, Group Share. (2) Free Cash Flow. (3) TSR: Total Shareholder Return; panel in 2018: EDF, E.ON, Innogy, RWE, ENEL, Iberdrola, Gas Natural, Uniper. (4) Long-term incentives comprise performance shares, 2/3 of which are restricted until a share portfolio has been established that is equivalent to 2 years' fixed compensation for the Chief Executive Officer and 1.5 years for the other members of the Executive Committee.

See also



**2017 Registration Document**  
Chapter 4 – section 4.6



**engie.com**  
Sustainable Development



## An ambitious commitment to ethics and compliance

ENGIE's commitment in terms of ethics and compliance is to act, everywhere and in all situations, in accordance with its fundamental ethical principles. This commitment is consistently communicated by the Group's Executive Board, as is the principle of zero tolerance of fraud and corruption.

### ENGIE's reference documents in the field of ethics

- The **Ethics Charter** sets out ENGIE's fundamental ethical principles.
- The **Practical Guide to Ethics** sets out and illustrates the procedures for practical application of the Group's ethical commitments.
- The **"Integrity" referential** defines how the Group is organized to guard against fraud, corruption and influence peddling.
- The **"Human Rights" referential** and policy document ENGIE's commitments in terms of internationally recognized human rights.
- The **"Ethics Compliance" referential** specifies how the Group is organized to support the implementation of its ethics and compliance systems and to measure the status of compliance; it also includes the Group's systems for compliance with the rules on embargo, the protection of personal data and competition.
- The **codes of conduct** govern professional practice in terms of ethics.

### The application and audit system for ENGIE's ethics and compliance framework

Steered by the Group Ethics, Compliance and Privacy department, and led by managers with the support of the Ethics and Compliance network, this system is based on:

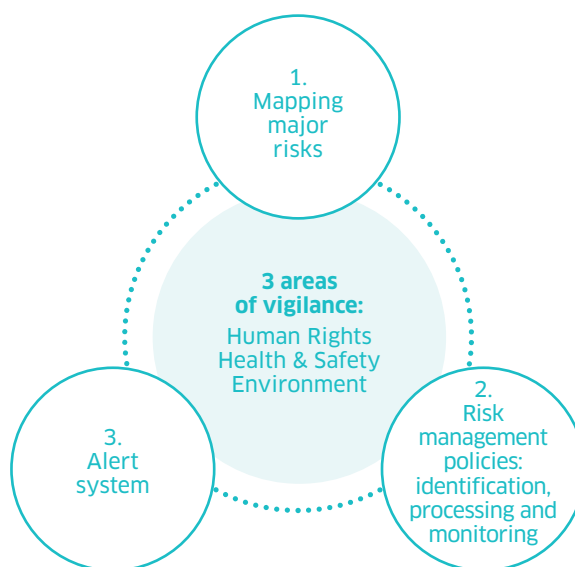
- an assessment of ethical risks
- notification and reporting of ethics incidents
- training and raising awareness
- a control system involving an annual compliance procedure
- an internal control program
- internal and external audits

### Our achievements in 2017

- Definition of a new Group whistle-blowing policy incorporating the legal requirements of the French Sapin 2 law, and those of the Duty of Vigilance law.
- Release of a new Group policy on the incorporation of ethics into HR processes, covering the ethical aspect in all HR processes.

### The vigilance plan

Led and monitored in coordination with the Executive Committee and the Ethics, Environment and Sustainable Development Committee, ENGIE's vigilance plan covers three areas: **Human rights, Health & Safety, and the Environment.**



### Controversy management

ENGIE carefully monitors controversies that may affect the Group's reputation, regardless of their nature. It relies on external monitoring and the **Reprisk™ reputation index** to measure the level and frequency of these controversies, which are the subject of regular reports to the Executive Board and the Ethics, Environment and Sustainable Development Committee, as well as dialogue with the BUs and the Group's functional departments.

See also



**2017 Registration Document**

Chapter 4 – section 4.4 and 4.5



**engie.com**

Sustainable Development

## Managing risks to increase performance and successfully achieve the Group's transformation

The energy revolution and ENGIE's diverse range of business activities and establishments expose the Group to a wide variety of risks that could have a significant impact on its results, its image and its share price. ENGIE has drawn up an overall risk management policy that will underpin the implementation of its strategy and, ultimately, its long-term performance.

### Risk management

Player	Role
Audit Committee	Risk review Opinion on the effectiveness of the risk management system
Executive Committee	Annual risk review Definition of risk management guidelines Coordination of each risk by a member of the Executive Committee
Entity Management Committee	Decisions on actions for managing risks
Group Chief Risk Officer	Oversees the overall process of risk management and supervision at every level of the Group (Corporate Services, BU)
Chief Risk Officer per BU	Defines the BU's overall risk exposure and manages changes in skills and the maturity of risk management within their entity

### Main risks



**In bold:** priority risks.

## Actions implemented by ENGIE

### Risks related to the external environment

#### 1. Country risks and regulatory risks resulting from the Group's international development

ENGIE represents its interests to legislators and regulators. It ensures the diversification of its establishments and manages its geographical exposure.

#### 2. Economic dynamics

ENGIE is diversifying its portfolio of projects, customers, activities and areas of development, to limit the impact of economic uncertainties on the demand for energy and services.

#### 3. Climate change

ENGIE is developing its portfolio of activities to take account of unpredictable weather conditions on energy demand and generation, as well as future physical or regulatory impacts relating to climate change. Increasing renewables and developing services are major areas of its strategy to support the energy transition.

#### 4. Financial risks

The Group's risk hedging policies specifically cover the commodity price, counterparty, credit and interest rate risks to which the Group is exposed through its operational and financial activities.

### Strategic risks linked to sectoral transformations

#### 1. Changes in the natural gas market

Against a backdrop of surplus gas production across the world and sluggish demand for gas in Europe, ENGIE benefits from diversified assets such as storage, LNG, and regasification and is gradually developing new uses in biogas and power-to-gas.

#### 2. Changes in the electricity market

Faced with changes in the electricity sector (technology, competition, customer expectations, etc.) and its regulation in a number of countries (nuclear power in Belgium), the Group is transforming its production facilities (with the disposal of coal-fired power stations and development of renewable energy) and is stepping up its expansion in energy services and new business lines.

### Operational risks linked to business activities

#### 1. Projects

The Group has become more proactive in the face of uncertainties affecting the profitability of its acquisition or construction projects for industrial assets, specifically through the development of its establishments with local partners, the inclusion of CSR criteria in responses to calls for tender and in the choice of its strategic suppliers.

#### 2. Industrial safety and nuclear security

The Group conducts its industrial activities in strict compliance with safety regulations and through integrated safety management based on prevention, continuous improvement and the ongoing implementation of the best international standards and practices. Particular attention is given to preventing the risk of a cyber-attack on the control systems of the Group's industrial assets through governance and a dedicated security plan.

#### 3. Human resources and transformation challenges

In view of the challenges faced in adapting human resources, ENGIE's transformation is being conducted with respect for the individual, in terms of social commitments, prevention of psychosocial risks, changes to business lines and skills, and so on. Particular attention is paid to local management, which is responsible for supporting change.

#### 4. Digitization & Cybersecurity

As part of the development of new business lines and digital offers (smart cities, etc.), the Group's security measures are regularly strengthened, and are continuously checked to counter its exposure to new risks (hacking attempts, information leaks, etc.).

#### 5. Reputational risk linked to ethics and environmental and social responsibility

Through its policies, organization, procedures and governance, the Group endeavors to prevent operational failures and smear attacks that could affect its reputation.

In bold: priority risks.

See also



**2018 Integrated Report**  
Trends – page 10



**2017 Registration Document**  
Chapter 2

## Value creation



# A global growth for ENGIE and its stakeholders



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ENGIE × QUEEN ELIZABETH OLYMPIC PARK

**What if the energy  
of sport could  
transform  
a neighbourhood?**

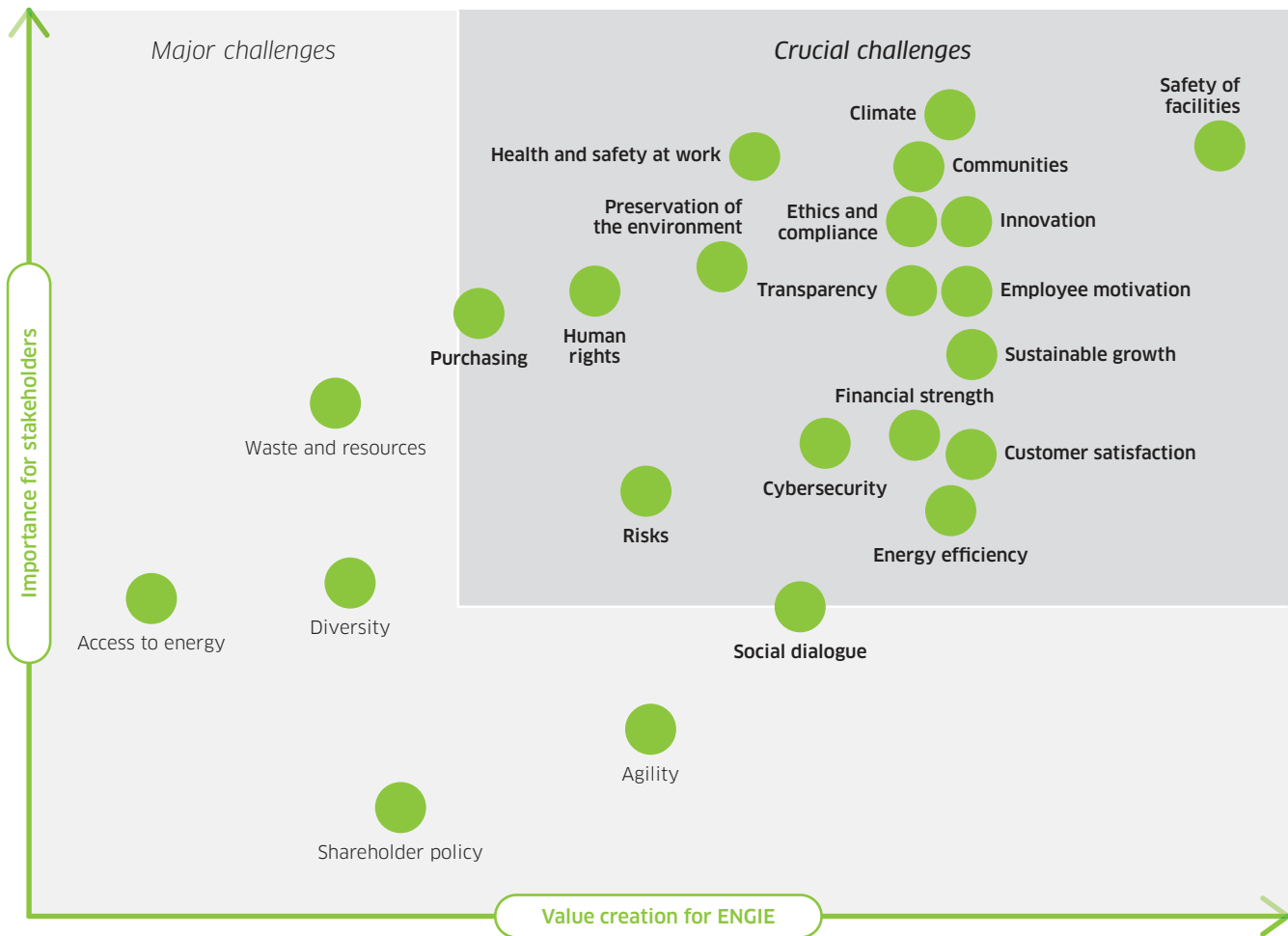
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**Project no.23.** In the UK, Queen Elizabeth Olympic Park and ENGIE, a key player in energy services, have integrated a biomass plant (heating, cooling and electricity) with facilities services to help transform the district. These actions contribute to reducing greenhouse gas emissions, improving social and economic well-being and creating more harmonious progress. Discover more of our collaborative projects at [harmonyproject.engie.com](https://harmonyproject.engie.com)

**#ENGIEHarmonyProject**

## Map of challenges 2017

ENGIE pays particular attention to dialogue with its stakeholders, since the company's ability to connect with its local ecosystem across all territories where it has a presence gives it a fundamental competitive advantage.



### Methodology

As part of a **drive for continuous improvement**, ENGIE updated its **map of challenges** (materiality matrix) in 2017 to supplement its discussions on the Group's main responsibility challenges. To this end, ENGIE conducted a study to gain insight into **its stakeholders' positions on these challenges**. The study was carried out in accordance with the AA 1000 guidelines, the G4 recommendations from the Global Reporting Initiative (GRI) and directions issued by the Task Force on Climate-related Financial Disclosures (TCFD) on organization's relations with their stakeholders.

This consultation, which involved **around one hundred people** inside and outside the Group, made it possible to rank **23 priority issues**, to understand the differing opinions of stakeholders and to analyze changes in their expectations between 2014 and 2017. The 2017 materiality matrix shows a high degree of convergence between the assessment of challenges by stakeholders and the Group in terms of value creation. This value creation is in keeping with societal, environmental and technological trends.

See also [engie.com](https://www.engie.com)  
Sustainable Development

### A few words from

**Stéphane Voisin**  
Financial Analyst, specialist in sustainable finance and responsible investment



The challenge for tomorrow will be to align disruptive technologies with expanded service to generate carbon-neutral energy at a lower price."

See also [engie.com](https://www.engie.com)  
Sustainable Development > IR > Interview



## Economic and demographic development

ENGIE is contributing to regional development through robust financial growth, as well as its offers for towns and cities, the economic and social impact of its activities and its commitment to providing access to energy.

### Our priorities

### Our achievements in 2017

## 6 challenges in our materiality matrix:

- Access to energy
- Agility
- Financial strength
- Purchasing
- Shareholder policy
- Sustainable growth

## 4 Sustainable Development Goals



Over **600** cities rely on ENGIE's safety solutions

Over **50,000** electrical recharge points installed in 26 countries and 980 cities

**€20 bn** in purchases excluding energy

**64%** of suppliers are SMEs

### Robust financial growth

Under its transformation plan, ENGIE is simultaneously targeting **three strategic value creation levers**:

- operational performance;
- organic growth;
- targeted acquisitions.

### Supporting urbanization

Designed with customers in order to cater to specific needs and situations, the solutions of the **Better Cities TODAY** and **Better Mobility TODAY** programs provide offers that combine energy, public lighting, safety, facility management and mobility. Sometimes bundled into integrated offers – forming part of an overall approach to a region – and based on digital technology, these solutions are ENGIE's fundamental propositions for immediate improvements in **the attractiveness, resilience and effectiveness of cities** to contribute to their inhabitants' quality of life.

### Territorial development

The Group contributes to **economic, social and urban** revitalization through shared investments to enhance quality of life, develop employment and boost the attractiveness of territories. This has included a study by the Group of the **social and economic footprint** of its activities in the Hauts-de-France region.

### Access to energy

ENGIE is committed to **removing disparities in terms of access to energy**, specifically by rolling out off-grid solutions or innovative microgrid solutions. With the **ENGIE Rassembleurs d'Énergies** fund, the Group aims to coordinate and consolidate its actions to promote access to energy and essential services. In France, ENGIE relies on a network of partners, contacts and advisers to combat **energy poverty**.

- 2017 results in line with the Group's objectives: recurring net income Group share €2.4 bn and significant reduction in net debt
- Outlook for 2018 shows strong organic growth compared to 2017 (+8%) and a dividend increase (+7.1%)

- Acquisitions in district cooling networks (Tabreed), electromobility (EVBox in the Netherlands) and connectivity for buses and trains (Icomera in Sweden)
- Significant contracts won in the rollout of natural gas refueling stations, and the electrification and management of new rail transport infrastructure
- Launch of new offers in electromobility: Elec'Car, Elec'Charge (France), Pack Drive (Belgium), sale and installation of recharging stations (Netherlands)

- Acquisition of Keepmoat and launch of ENGIE Avenue, a joint property development company (renovation and urban development)
- Contract with Northeast Lincolnshire (UK) where 30% of the total amount is conditional on the achievement of shared value-creation objectives (4,200 jobs, 3,500 houses, -20% in CO<sub>2</sub> emissions, -33% in road deaths)
- Signature or delivery of new Partnership Contracts with cities

- Power Corner project, which creates microgrids to speed up access to energy
- ENGIE *Rassembleurs d'Énergies*, recognized as one of the "Best for the World Funds" as evaluated by the Comprehensive GIIRS Impact Rating
- 658,000 customers on the Special Solidarity Rate for gas and 276,000 on the *Tarif de Première Nécessité* (basic needs rate) for electricity.

## Our performance

	2015	2016	2017	Objectives		
Robust financial growth	Share of regulated or contracted activities in Group EBITDA	-	75%	89%	> 85%	✓
	Efficiency program "Lean 2018" aimed at making recurring savings on operating expenses (net total impact on EBITDA)	-	€0.53 bn	€0.9 bn	€1.3 bn	2018
	Net recurring income, Group share	€2.6 bn	€2.5 bn	€2.4 bn	≥ €2.4 bn	✓
	Net debt/EBITDA ratio	2.5	2.3	2.25 <sup>(a)</sup>	≤ 2.5	✓
					2017	
(a) Excluding E&P and LNG activities sold						
Access to energy	Beneficiaries of access to sustainable energy programs at "the base of the pyramid"	0.7 m	1.2 m	2.4 m	20 m	2020

## Value creation for customers

- Strengthening the **effectiveness, sustainability and attractiveness of towns**
- **Support for customers** threatened by energy poverty
- Optimization of offers to **enhance customer comfort and well-being**, with increasing focus on end consumers (B to B to C, B to T to C)

## Value creation for the Group

- **Sustainability of value creation**, driven by the growing demand for energy
- **Stable, long-lasting relationships** in connection with public-private partnership contracts

## Value creation for Territories and Communities

- Development of territories in which the Group has a presence, with the **creation of direct and indirect jobs**
- **Development of public infrastructures** thanks to contractual models instituted with ENGIE

See also



[engie.com](http://engie.com)

Sustainable development > IR > Indicators Investors > Financial results 2017



Smart grid for an Economic Activity Area (France, 2013)

## A few words from

**Valérie Fayard**

Senior Executive Vice-President in charge of the Innovation and Development Division at Emmaüs France



Large companies must develop the financial and human resources to combat energy poverty and support customers who face such poverty ."

See also



[engie.com](http://engie.com)

Sustainable development > IR > Interview



## Safeguarding and development of skills

ENGIE is redrafting its Human Resources policies and practices to include all its employees in its transformation plans.

### Our priorities

### Our achievements in 2017

## 6 challenges in our materiality matrix:

- Diversity
- Employee motivation
- Health and safety at work
- Risks
- Safety of facilities
- Social dialogue

## 3 Sustainable Development Goals



Over  
**2,000**  
members of  
the Women  
In Networking  
(WIN) network

Over  
**600**  
participants in  
the “Women  
in Leadership”  
training program

### Training/motivation

To support its transformation and meet the expectations of new generations, ENGIE is reinventing its management methods by developing **flatter structures, accountability and autonomy** for teams at all hierarchical levels.

Particular attention is paid to **skills development** through targeted training programs according to employees' needs. The Group has also set up a skills anticipation and management system, ENGIE Skills, providing improved visibility of how the Group's businesses and needs are evolving.

- Experiments with new working methods: development of dynamic work spaces, introduction of teleworking with the signature of an agreement in a number of entities
- Training in digital business lines and continuous learning approach
- Development of the “Yammer” corporate social network
- Employee engagement in the “ENGIE Volunteers Program” (EVP) to take part in social responsibility initiatives in general and access to energy initiatives in particular

### Health/safety/security

ENGIE has a health and safety policy and a security policy. Based on a worldwide agreement with employee representative bodies, the health and safety policy aims to **safeguard people** (employees, service providers and third parties) **and assets**, as well as to promote quality of life at work. This is complemented by **Group Health and Safety Rules** that lay down the requirements applicable to all entities.

- Creation of an annual Group challenge, “Care Champions”, bringing together employees and subcontractors
- Development of an action program entitled “No Life at Risk”, which aims to strengthen ENGIE's culture of health, safety and security applicable to employees and subcontractors

### Diversity/gender equality

ENGIE has an **ambitious overall policy** on diversity and social development. This is now recognized as one of the Group's key performance drivers and a condition for its successful transformation. At the same time, the Group does its utmost to promote and make **equal opportunities and treatment** a reality, without discrimination of any kind.

ENGIE is committed to gender equality and supports women in their **career development**, particularly through the implementation of quantified objectives, an ambitious policy on parenthood and, beyond the boundaries of the Group, support for developing female talent in technical and scientific sectors.

- Raising awareness in terms of non-discrimination
- Renewal of the Diversity Label
- Renewal of the signature of the European Agreement on Professional Gender Equality
- Signature of the LGBT Commitment Charter
- Launch of Women In Networking (WIN) in China, Singapore and the Netherlands
- Grand Prix for Gender Equality and Prize for Gender Equality in the Energy and Utilities sector in 2017
- “Women in Leadership”, a mentoring and training program



## Our performance

	2015	2016	2017	Objectives
Training/motivation	66.0%	65.6%	67.7%	66% ✓
Health/safety/security	3.6	3.6	3.3	≤ 3
Diversity/gender equality	21.6%	21.9%	22.2%	25% 2020



Employee at the SPEM power plant, Montoir-de-Bretagne (France)

## Value creation for Employees

- Individual development and skills diversification
- Strengthening confidence and well-being at work
- Establishing a “culture of protection”

## Value creation for customers

- Compatibility of the Group profile with the society
- Increased relevance of product offerings
- Strengthening customer listening and quality of service

## Value creation for the Group

- Embracing a huge diversity of profiles, a wide range of talents and skills
- Possibility of developing internal innovative solutions to optimize the way the Group is organized and its product offerings
- Improvement in effectiveness and productivity through a reduction in absenteeism, social security contributions, replacement costs, insurance policies, etc.
- Attractiveness of the ENGIE employer brand to new generations

See also



**2018 Integrated Report**

Transformation – page 20



**engie.com**

Sustainable development > IR > Indicators



## Strengthening confidence in the company

ENGIE is committed to establishing stable, long-lasting relationships based on trust with all its stakeholders, to provide the best response to their needs and requirements.

### 14 challenges in our materiality matrix:

- Communities
- Customer satisfaction
- Cybersecurity
- Ethics and compliance
- Financial strength
- Health and safety at work
- Human rights
- Purchasing
- Risks
- Safety of facilities
- Shareholder policy
- Social dialogue
- Sustainable growth
- Transparency

### 5 Sustainable Development Goals



#### Our priorities

##### Stakeholder dialogue

Day in and day out, ENGIE strengthens its **local involvement** to provide solutions tailored to territorial needs. It builds employees' awareness of **the mechanisms for dialogue**, ranging from stakeholder mapping on the basis of challenges to the development of action plans, for offers and industrial projects.

#### Our achievements in 2017

- Gradual implementation of the Net Promoter Score with individual and corporate customers
- Together for the Future, an event in the Executive Sponsors program based on the theme of the energy revolution

##### Business ethics

ENGIE does business according to stringent principles in terms of **business ethics**, particularly with regard to its suppliers, with whom the Group aims to maintain a balanced and sustainable relationship (these commitments are set out in its Procurement Policy and Codes of Conduct).

- 49/100 in the RepRisk™ Reputation Index
- Enhanced and systematization of due diligence
- Ethics training courses for employees, including senior managers

##### Financial transparency

The Group undertakes to send its shareholders **clear, relevant information** to foster loyalty and encourage long-term buy-in to its strategy. It complies with the tax laws and regulations in the countries where it operates.

- Launch of LINK, a new employee shareholding plan
- Clear dividend policy to improve shareholder visibility

#### Our performance

	2015	2016	2017	Objectives	
Stakeholder dialogue	Satisfaction rate of B to C customers	-	81%	83%	85%
	Share of industrial activities covered by an appropriate dialogue and consultation mechanism	-	20%	48%	100%
Business ethics	Proportion of senior managers trained in combating corruption	77%	84%	94%	100%
	Proportion of Group entities with a "CSR" process for managing their supply chain	-	13%	37%	100%
Financial transparency	Financial rating	-	A-/A2	A-/A2	A ✓ 2016-2018
	Dividends (per share and per year, in cash)	€1	€1	€0.70	€0.70 <sup>(a)</sup> ✓

(a) For the 2017 results, increased to €0.75 for 2018

#### Value creation for the Group

- Improvement of **customer satisfaction**, new customer acquisition, fostering loyalty
- Increased **relevance of projects**
- **Anticipation of controversies** to limit reputational risk and the related management costs

#### Value creation for all stakeholders

- **Co-development** of offers and extension of the range of services offered
- Demonstration of **healthy, sustainable operating mechanisms**
- Quality of the **shareholder policy, transparency and regular supply** of information



## Use of new technologies in the Group's operations management

ENGIE takes every opportunity offered by new technologies, developing in-house new ways of working and production to achieve the 2020 ambition to transform the Group into a data-driven company.

### Our priorities

### Our achievements in 2017

## 5 challenges in our materiality matrix:

- Agility
- Cybersecurity
- Energy efficiency
- Innovation
- Safety of facilities

## 3 Sustainable Development Goals



### Research, development and technology

The Group, which aims to improve all its **in-house operating methods**, is intensifying its investment in Research & Technology, innovation and the digital domain. **ENGIE Digital** provides the BUs and Métiers with the best technology and related expertise. ENGIE also relies on its international network of research centers, **ENGIE Labs**, to develop technologies which will further enhance the performance of Group activities.

- Development of the corporate network of strategic and technological advisers
- Implementation of a network of external partners (academies and institutions, laboratories, industrial partners, start-ups, etc.)
- Digital Academy, e-learning platform for new technologies

### Operational excellence and industrial safety

ENGIE aims to **develop the operational excellence** and **reduce the operating costs** of its industrial assets. To this end, the Group pays particular attention to managing and sharing data and information, exemplified by the corporate digital platform, **ENGIE Business Solutions**. By developing new technologies, specifically **predictive maintenance systems**, ENGIE intends to enhance the **industrial safety** of its facilities and of its on-site operators.

- Development of the Darwin platform, a data management and analysis tool
- Development of simulators for continuous training of technicians
- KIZEO application for the analysis of Preventive Safety Visits
- Use of drones to inspect facilities

### Our performance

Research, development and technology

Growth investment programs  
Expenditure on emerging and digital technologies

2016

€12 bn

€0.5 bn

2017

€13.9 bn

€1 bn

Objectives

€14.3 bn

€1.5 bn

2016-2018

### Value creation for the Group

- Development of a "culture of innovation"
- Optimizing **maintenance systems** for a targeted, predictive view of needs (lifespan of facilities and their replacement, etc.) and thus of costs
- Improvement in the **energy and operational performance** of facilities
- Strengthening **industrial safety** (facilities and individuals)

### Value creation for Employees

- **Strengthening links between the BUs and with their stakeholders** regarding technology issues
- **Skills development** in new technologies and **continuous training**
- Strengthening **health and safety**

See also



**2018 Integrated Report**  
Transformation – page 20

**engie.com**

Sustainable development > IR > Indicators



## Use of new technologies in stakeholder relationships

ENGIE does its utmost to remain at the leading edge of technology and to build this into its business models or to develop tomorrow's business models and thus provide the best response to its customers' expectations.

### Our priorities

### Our achievements in 2017

## 8 challenges in our materiality matrix:

- Communities
- Customer satisfaction
- Cybersecurity
- Ethics and compliance
- Human rights
- Innovation
- Risks
- Transparency

## 6 Sustainable Development Goals



25 employee teams incubating their projects

60 calls for projects launched with start-ups, 2,000 responses received

### Culture of innovation

To help disseminate a **culture of innovation** within the Group, ENGIE relies on both external partnerships and the involvement of in-house teams. In line with the principles of **open innovation**, ENGIE encourages its employees to find out about their ecosystem: incubators, universities, start-ups, hubs, etc. Each year, the **Innovation Trophies** reward employee innovations. ENGIE also relies on several cross-functional in-house innovation systems, combining Group entities reporting to NewCorp and BUs.

- 3<sup>rd</sup> Innovation Week on the theme of "A world in full 3D: Decarbonized, Decentralized, Digital", celebrated in some twenty countries to highlight the Group's innovative projects: launch of calls for projects, creativity workshops, conferences, *Matinales du Futur* by ENGIE, etc.
- Rollout of an incubation system to develop new businesses, services or products

### Development of digitized offers

The Group is developing new sources of value on innovation and digital technology in **all its Customer Solutions**. ENGIE is shifting existing service activities for private customers (sale of energy, servicing of heating appliances) towards digitized offers related to comfort at home and decentralized electricity generation. The Group is developing **Blu.e**, a digital platform to improve the energy efficiency of industrial facilities. **Vertuoz** is a smart building operator which uses a digital multi-service platform to harness all building data to make buildings smarter, more efficient and therefore more comfortable for their tenants.

- Launch in several countries of a smart thermostat allowing customers to manage their heating
- Development of smart services using the analysis of data from connected objects (via a digital platform) to help customers optimize their energy consumption (heating management, solar energy generation, etc.)
- Solution Big Data Blu.e by ENGIE for the Groupe PSA, as part of its "plant of the future" project, and its overall approach to energy efficiency

### Customer experience

The development of these new offers is accompanied by a major wave of digitized tools and **the search for excellence in terms of customer relations**, in accordance with the European General Data Protection Regulation (GDPR).

- Digitizing of customer experience and development of digital channels (apps, e-commerce and e-service platform, etc.)
- Automation of administrative services and development of chatbots
- Satisfaction survey sent directly during customer experience

## Our performance

Development of digitized offers

Increase in EBITDA from integrated customer solutions since the end of 2015 at constant exchange rates

Customer experience

Satisfaction rate of B to C customers

2016

2017

Objectives

+2%

+22%

+50%

2016-2018

81%

83%

85%

2020

## Value creation for customers

- Improvement in **customer experience** and **satisfaction**
- Trust strengthened through appropriate **management of personal data**
- **Product offerings better targeted**, customized and providing a better response to customers' expectations in terms of controlling their energy consumption, mobility and digitization

See also



**2018 Integrated Report**

Transformation – page 20



**2018 Integrated Report**

Governance – page 26



**engie.com**

Sustainable development > IR > Indicators

## Value creation for the Group

- **Customization of product offerings** based on detailed analysis of customer consumption data
- **Reduction in operating expenses** thanks to new web services available to customers
- **Fostering customer loyalty and new customer acquisition**, increase in the **value of the customer portfolio** by adding services
- Improvement in the **operational performance of operators**

## A few words from

**Clément Jeannin**

Group Senior Vice-President of CSR,  
Unibail-Rodamco



Our partnership with ENGIE allows us to work on developing innovative solutions in key areas for the sustainable transformation of our assets."

See also



**engie.com**

Sustainable development > IR > Interview



**2018 Integrated Report**

Transformation – page 20



Presentation of the Darwin platform at the Municipalities and Local Councils fair (November 2017)



## Fight against climate change

ENGIE is a major player in the energy transition, actively combating climate change by adapting its own business model and by working closely with international organizations.

### Our priorities

### Our achievements in 2017

## 7 challenges in our materiality matrix:

- Climate
- Energy efficiency
- Innovation
- Preservation of the environment
- Sustainable growth
- Transparency
- Waste and resources

## 5 Sustainable Development Goals



€100 m invested by 2020 to promote natural gas as a fuel for trucks in Europe

1<sup>st</sup> worldwide corporate issuer of green bonds

### Commitments made to international organizations

ENGIE supports the **Paris Agreement** to limit global warming to 2°C. To this end, the Group is actively fighting for **the adoption of the carbon price mechanism** and has been part of the **Carbon Pricing Leadership Coalition** since 2016. An active supporter of **sustainable finance**, ENGIE is also integral to the international momentum for green bonds.

- Support by Isabelle Kocher for the commitment made to the TCFD by the WEF CEO Climate Leaders Group in October 2017
- Contribution to the launch of the Hydrogen Council with 12 other leaders in energy for transport and industry
- Signature of the “Green Bond” commitment during the Climate Finance Day 2017 in Paris

### Low-carbon energy mix and green solutions

ENGIE promotes **renewable energy** and thus invests in **research and development** to find the solutions of the future. The Group raises awareness among **its customers in terms of managing energy** and develops **energy efficiency solutions**. It works to achieve **green mobility** (fuel substitution, multimodal transport information systems) to reduce CO<sub>2</sub> emissions in urban areas.

ENGIE is working actively to develop a range of green electricity offers in several countries.

- Creation of a BU dedicated to renewable hydrogen in January 2018
- Commissioning of Santa Monica, ENGIE's second-largest terrestrial wind farm in Brazil (97 MW)
- Launch of an “Energy Community” platform in the Netherlands, putting individual customers in touch with local solar energy providers (6 energy communities online and 200 members)
- Partnership with SunRun to launch an offer in Texas (USA) allowing customers with solar panels to get credits for the surplus energy they generate
- Launch in Pau of France's first hydrogen bus route
- 4,000 energy performance contracts in France, including 100 incorporating building refurbishment from a total of 250 identified at national level

### Reduction in ENGIE's CO<sub>2</sub> emissions

ENGIE is also taking action **at its own facilities** (energy generation and transmission, etc.) to reduce its CO<sub>2</sub> emissions. In terms of its property assets, the Group is continuing with its **green property policy** in France and Belgium, which aims to reduce the energy consumption of its tertiary inventory by 40% by 2020.

- Use of an internal carbon price in the investment decision process
- Replacement of old turbines or boilers with recent models at the Group's generation facilities

## Our performance

	2015	2016	2017	Objectives	
Energy mix and green solutions	Share of low-carbon activities in Group EBITDA	-	81%	91%	>90% ✓
	Share of renewable energy in the electricity production capacity mix	18.3%	19.5%	23.1%	25%
Reduction in CO <sub>2</sub> emissions	CO <sub>2</sub> emission reduction rate for power generation compared to 2012	+0.6%	-11.3%	-18.1%	-20% 2020
Energy mix and green solutions	Portfolio turnover program in 2016-2018 <sup>(a)</sup> (a) Disposals agreed.	-	€8 bn	€13.2 bn	€15 bn

## Value creation for customers

- More **environmentally friendly** product offerings
- Reduction of the **carbon footprint**
- Optimizing **energy consumption** and creating **savings**

## Value creation for the Group

- Significant reduction in **greenhouse gas emissions** from Group activities
- Compatibility of **product offerings** with increasingly stringent criteria found in calls for tender
- Maintaining the Group's **asset financing methods**
- Safeguarding the Group's **reputation**

## Value creation for Territories and Communities

- Contributing **to the success of the 2°C trajectory**
- Reducing **the climate impacts** of the energy sector

See also



**2018 Integrated Report**

Ambition – page 16



**2018 Integrated Report**

Transformation – page 20



**engie.com**

Sustainable development > IR > Indicators

## A few words from

### Judith Hartmann

Senior Vice-President in charge of Finance and the United Kingdom and North America BUs



Bringing together the company's long-term vision and investor expectations, green bonds and sustainable finance in general are key drivers in transforming

the energy world."

See also

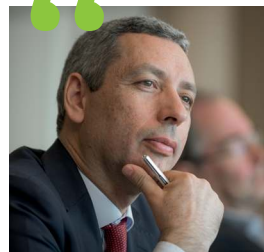


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Sustainable development > IR > Interview

### Paulo Almirante

Executive Vice-President in charge of the Generation Europe BU, Brazil BU, North South and Eastern Europe BU, the Middle East, South and Central Asia, and Turkey BU, as well as CSR



Since 2014, ENGIE has been seen as a leading player in the energy transition and is actively supporting the development of sustainable finance by becoming the leading worldwide

corporate issuer of green bonds."



**engie.com**

Sustainable development > IR > Interview



## Preservation of the environment

Though the Group's activities may have an impact on natural resources and environments, ENGIE is focused on measuring and reducing their negative effects by working on its activities and its facilities and by committing to developing the circular economy.

### Our priorities

### Our achievements in 2017

## 8 challenges in our materiality matrix:

- Climate
- Communities
- Energy efficiency
- Preservation of the environment
- Purchasing
- Risks
- Sustainable growth
- Waste and resources

## 6 Sustainable Development Goals



### Improving the environmental performance of activities and facilities

ENGIE operates **committed, integrated management** of its environmental performance, combining the issues of air, water and soil quality, biodiversity and adapting to climate change. The Group uses **innovative technologies**, such as biomonitoring with plants and fungi, to measure air quality around its sites. Internally, ENGIE supports its operational entities in their drive to comply with international environmental standards.

- Completion of impact studies and proposed support measures to help prevent, reduce or offset potential impacts for each project
- Monetizing of positive and negative external effects that allow a project's environmental impact to be measured

### Sustainable management of natural resources

To ensure the **sustainability of its activities**, ENGIE pays particular attention to managing its **water resources** and reducing the impacts of its activities on **biodiversity**. Those Group sites located in extreme water stress areas must define local action plans in consultation with stakeholders. An active player in the **National Biodiversity Strategy**, ENGIE is also committed to providing each of its priority sites with an action plan to meet the challenges posed by safeguarding biodiversity.

- Contribution of Glow Group, an ENGIE subsidiary, to forest restoration in Houay Mahad Hill, Thailand
- Reduction of wind turbine impacts on wildlife at the Cheppes-la-Prairie facility in France
- Construction of the Sauveterre fish pass in France, allowing them to pass safely through hydraulic structures
- Substitution of 80% of Kwinana's fresh water requirements, under a cogeneration arrangement run by ENGIE in Australia, thanks to an industrial water recycling process

### Commitment to develop the circular economy

ENGIE aims to **reduce its production of waste and increase its rate of recovery**. To achieve this, the Group is currently working towards the **circular economy** through the development of biomethane pathways, heat and energy recovery from industrial and tertiary processes, and decision support for industrial partners.

- Commitment alongside Afep to promote renewable gas, to develop energy recovery from industrial and tertiary processes, and to work in an innovative way to support decision-making on the circular economy in industrial areas
- Partnership with Carrefour to convert biowaste from stores into biogas to supply the Carrefour Group's delivery trucks
- Partnership with SUEZ to develop photovoltaic solar plants at all waste storage centers in France

**82%** of non-hazardous waste recovered

**A-** water rating assigned by CDP Water



## Our performance

Sustainable management of natural resources

Share of target sites with an integrated plan for environmental management developed in conjunction with their stakeholders

Reduction in fresh water abstraction/MWh electricity generation ratio compared to 2012

2015	2016	2017	Objectives
-	14%	61%	100%
-16%	-24%	-48%	-15% ✓
			2020

## Value creation for customers

- Option to bid for a **greater number of environmentally friendly tenders**
- Increase in the **trust** placed in the Group
- Reduction in the **environmental footprint**

## Value creation for the Group

- Increase in the **value of the customer portfolio** with the addition of environmental services
- Reduction in **negative external environmental effects**
- Improved **local integration**

## Value creation for Territories and Communities

- **Stakeholder involvement** in the preparation of ENGIE's environmental action plans
- Reduction in **pollution** and **preservation of biodiversity**

See also



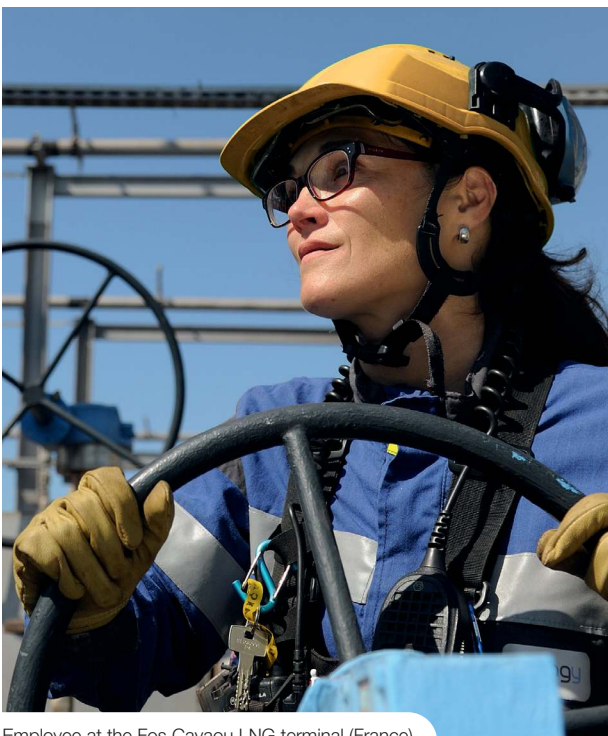
**2018 Integrated Report**

Ambition – page 16



**engie.com**

Sustainable development > IR > Indicators



Employee at the Fos Cavaou LNG terminal (France)

## A few words from

**Samantha Stephens**

SRI analyst at Mirova



“Though environmental concerns are common to all business sectors, the energy sector, which affects the economy in its entirety, plays a front-line role.”

See also



**engie.com**

Sustainable development > IR > Interview

## ENGIE's positive impact in 2017: shared value

### Employees

**A Group that is supporting its employees through the Group's transformation**

€10 bn in staff costs	3.3 internal frequency rate of occupational accident
155,000 employees, of whom 22.2% are women	78% of managers are satisfied
23,800 hires	20,000 employees saving into the ENGIE <i>Rassembleurs d'Énergies</i> fund
68% of employees trained	

### Customers and suppliers

**A Group providing an energy offer that is clean, customized and socially responsible**

89% of electrical capacity with low CO <sub>2</sub> emissions	24 million customers worldwide
	83% of B to C customers are satisfied

**A Group that is attentive to the entire value chain**

€20 bn in purchases excluding energy	116,000 active suppliers, including 250 key suppliers
€20.9 bn net debt (excluding EPI)	64% of suppliers are SMEs

### Shareholders

**A Group profiled for rapid, profitable growth**

ROCE 7.2%	2.7% of employees are shareholders
€2 bn in dividends paid	

### Territories and communities

**A Group connected to its ecosystem**

48% of industrial activities covered by an appropriate mechanism for dialogue and consultation with stakeholders	-48% in the consumption of drinking water for electricity generation compared to 2012
61% of target sites have an integrated, collaborative environmental management plan	-40% in scope 1 direct CO <sub>2</sub> emissions compared to 2012
	€1.1 bn of recurring taxes
	280 projects financed by the Fondation ENGIE

**A Group that invests in growth drivers**

€9 bn of investment, including €6.5 bn in growth and €2.5 bn in maintenance	€165 m in the ENGIE New Ventures fund
	€180 m in R&D expenditure

**€1.5 bn**  
of expenditure  
in emerging and  
digital technologies

**A Group committed to access to energy**

2.4 million beneficiaries of access to sustainable energy programs	658,000 customers benefiting from the Special Solidarity Rate for gas
€5 m invested by the ENGIE <i>Rassembleurs d'Énergie</i> social investment fund	276,000 customers benefiting from the <i>Tarif de Première Nécessité</i> (basic needs rate) for electricity

€65 bn in revenues in 2017

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