



The background of the cover is a photograph taken from inside an airplane. It shows the interior headrest of a seat in the foreground, the window frame, and the view outside which consists of a bright blue sky filled with wispy white clouds. Below the clouds, a city skyline is visible, suggesting the plane is flying over a large urban area. The overall atmosphere is one of travel and connectivity.

2018  
CORPORATE SOCIAL  
RESPONSIBILITY  
REPORT

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Exploring our  
sustainable  
development  
actions...

## Message of the Chairman of the Managing Board

(GRI.102-14)

2018 has been a year of constant change with extreme climatic events, social unrest and political uncertainty; all delivered to the world at large in real time.

The general public, businesses and corporations are witnessing the reconfiguration of great political, social, environmental and societal balances at an unprecedented rate, suggesting that this chaos will continue. This resulting climate of anxiety could lead to impulsive decisions and inhibit constructive initiatives.

We must avoid the temptation to launch ourselves over the edge, as we have to remain in control of our destiny.

We also need to avoid the temptation of sheltering from change, as we have to drive our future against status quo!

The opportunity in a crisis, if any, is to transition from an old world to a new world, full of opportunities.

As a vehicle manufacturer, Groupe PSA will make its contribution to build this hopefully desirable future. Our *raison d'être* is to ensure the freedom of movement by providing a safe, sustainable, affordable and enjoyable mobility.

Seven mega trends will shape the future of mobility: climate change, divergence of the markets, connectivity and the autonomy of products, digitalization, changes in customer behaviour and the economy of sharing.

Groupe PSA is in the right frame to meet these challenges with a Darwinian spirit to make the difference with our competitors in a sustainable way. Our company is paving its way every day to a strengthen efficiency, enhance performance, making no compromise on responsibility in a transparent dialogue with its stakeholders.



*Faced with the challenges of the automotive industry, we must be more Darwinian than ever, agile and strong of our 3 identity markers: performance, responsibility and transparency."*

## PERFORMANCE

Groupe PSA is one of the most efficient economic players in its sector, with a Group recurring operating margin of 7.7% in 2018. Groupe PSA is also a socially recognised company with the award of industry leader in the Dow Jones Sustainability Index for the second year in a row and being included in the world's leading SRI<sup>(1)</sup> indexes. Financial and extra-financial performances feed each other.

Our Core Model and Technology Strategy, our Core Mobility Services Strategy - mould of our brand Free2Move that revolutionises the access to mobility services for 500,000 private customers. Our equity investments in many startups, our developing locations including Africa and Asia, our partnerships including with NGO's on transparency concerning emissions are creating positive footprints towards our environment.

Groupe PSA strategic plan *Push to Pass* and the *PACE!* Plan implemented in the OPEL and VAUXHALL business have delivered the

<sup>(1)</sup> Socially Responsible Investment.

**“ Groupe PSA will make its contribution to build a hopefully desirable future, to defend strongly the freedom of movement for the citizen, this fundamental right for humanity.”**

results that will allow our company to identify and grasp opportunities. This double economic and societal performance is the best protection against the vagaries of the markets.

Our state of the art products and services offering is our way to defend strongly the freedom of movement for the citizen, this fundamental right for humanity. Designing a sustainable future of mobility is both a matter of economic performance and a requirement of responsibility.

## RESPONSIBILITY

A long-time supporter of the Global Compact and the ILO (International Labour Organization) Principles, Groupe PSA integrates social, environmental and societal impacts in all its decision-making processes in a 360-degree approach.

Scaled down to our position as a global automotive group, these principles drive our company on providing effective solutions to major CSR issues: fight against climate change, reduce the drain on natural resources, reduce inequalities in development between territories, respect and uphold human rights, enable the development of all talents promoting parity, support societal changes in mobility, meet security and cybersecurity needs.

Innovation is our DNA; it imposes the rigor of a scientific approach in the search for the most efficient solutions to serve the greatest number, against emotional decisions. This way of thinking and behaving in our decision making process is the best way to secure a significant societal and environmental impact with a long-term view.

## TRANSPARENCY

Our role as a company is to create sustainable value for our stakeholders. Our customers, our employees, our investors, our suppliers and the civil society challenge and expect our positive contribution to the economy, society and the environment.

To push forward environmental and societal innovation, we do not hesitate to shake usual methods by engaging partnerships and dialogues with demanding players such as NGOs, notably through our Corporate Foundation, federations of trade unions or independent experts.

The clarity and the quality of the information published transparently by Groupe PSA is a key factor of efficiency of these dialogues. It also feeds the public debate, for the benefit of the general interest.

In addition to our integrated report in video format, I invite you to read this annual CSR Report, which presents how our responsible business model creates shared and sustainable value.

The 23 CSR commitments supported by accountable members of Groupe PSA Executive Committee are part of a proactive trajectory that I am personally monitoring. All of the Group's employees are committed to implement our CSR roadmap, which reflects our ambitions for 2035 or even 2050.

Thank you for taking the time to read this and, most of all, I thank you for your support and engagement in our Company.

**Carlos Tavares**



**“ To push forward environmental and societal innovation, we do not hesitate to shake usual methods.”**

## GROUPE PSA CONTRIBUTION TO GLOBAL SUSTAINABLE DEVELOPMENT GOALS

Groupe PSA takes into account the impact of its activities on the 17 Sustainable Development Goals (SDGs) set by the United Nations for 2030. It makes a positive contribution at a global level to many of them and at a local level for others.



- |   |  |
|---|--|
| <p><b>1</b> End poverty in all its forms everywhere<br/>(see sections 4.1.2.2/4.2.1.1/7.2.2).</p> <p><b>2</b> End hunger, achieve food security and improved nutrition and promote sustainable agriculture (see section 7.2.2.1).</p> <p><b>3</b> Ensure healthy lives and promote well-being for people of all ages<br/>(see sections 3.4.1.4/3.4.2/5.3.1/5.3.2/7.2).</p> <p><b>4</b> Ensure inclusive and equitable quality education and promote lifelong learning opportunities for all<br/>(see sections 3.3/7.2/7.2.2.2).</p> <p><b>5</b> Achieve gender equality and empower all women and girls (see section 3.5.1).</p> <p><b>6</b> Ensure availability and sustainable management of water and sanitation for all (see section 5.5).</p> <p><b>7</b> Ensure access to affordable, reliable, sustainable and modern energy for all<br/>(see section 5.2).</p> <p><b>8</b> Promote sustained, inclusive and sustainable economic growth, full and productive employment and decent work for all<br/>(see sections 3.1.1/3.1.1.2/3.4.2/3.5.1/3.5.3/4.1.2.3/4.2.1/4.2.2.2).</p> <p><b>9</b> Build resilient infrastructure, promote inclusive and sustainable industrialisation and foster innovation<br/>(see sections 2.0/2.1/2.2.0/2.2.3/2.3.2/3.0/3.4.2.2/4.0/4.2.2.3/5.1.3.5/6.3.0/7.1.2/7.4.2.0).</p> | <p><b>10</b> Reduce income inequality within and among countries (see sections 3.5/7.2/7.3).</p> <p><b>11</b> Make cities and human settlements inclusive, safe, resilient and sustainable<br/>(see sections 2.1.1/2.4/2.5.1/7.2.2.2).</p> <p><b>12</b> Ensure sustainable consumption and production patterns<br/>(see sections 2.0/2.1/2.4/2.5/5.1.3.6/5.2.5/5.4.2/5.4.3/5.6/7.4.2).</p> <p><b>13</b> Take urgent action to combat climate change and its impact by regulating emissions and promoting developments in renewable energy<br/>(see sections 2.1.0/2.1.2/2.1.3/2.1.5/2.4/4.1.2.2/5.2/5.6/7.4.2.1).</p> <p><b>14</b> Conserve and sustainably make use of the oceans, seas and marine resources for sustainable development (see sections 2.1/5.2).</p> <p><b>15</b> Protect, restore and promote the sustainable use of terrestrial ecosystems, sustainably manage forests, combat desertification, and halt and reverse land degradation and halt biodiversity loss (see sections 2.4/5.6).</p> <p><b>16</b> Promote peaceful and inclusive societies for sustainable development, provide access to justice for all and build effective, accountable and inclusive institutions at all levels (see sections 3.1.1.1/6.1.3/6.3).</p> <p><b>17</b> Strengthen the means of implementation and revitalise the global partnership for sustainable development<br/>(see sections 2.0/2.4.1.2/2.4.3.2/3.1.1).</p> |
|---|--|





**RESPONSIBLE DECISIONS  
BASED ON 360° APPROACH**



**RESPECT TOWARDS  
STAKEHOLDERS  
BASED ON TRANSPARENCY**

Responsibility is to take each day engaging decisions which we will be accountable for in the future. Groupe PSA relies on continuous dialogue with its various stakeholders to build long-term responses to economic, environmental, social and societal issues.



1

■

# CREATING SHARED AND LASTING VALUE

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## 1.1. A CSR PROGRAM THAT IS FULLY INTEGRATED INTO THE GROUP STRATEGY

### 1.1.1. Groupe PSA: a global carmaker at the leading edge of efficiency and a benchmark supplier of mobility services

GRI.102-1

GRI.102-7

GRI.102-10

#### 1.1.1.1. The Automotive Division, central to the Group's results

##### CONSOLIDATED REVENUE BY BUSINESS

(in millions of euros)	Automotive Division (PCD + OV)	Automotive equipment	Other businesses and eliminations*	Total
<b>2018 NET REVENUE</b>	<b>61,333</b>	<b>17,525</b>	<b>(4,831)</b>	<b>74,027</b>
2017 net revenue	47,973	16,962	(2,679)	62,256

\* Including the activities of BANQUE PSA FINANCE not covered by the partnership signed with Santander Consumer Finance.

After Groupe PSA acquired OPEL and VAUXHALL on 1 August 2017, this CSR report includes CSR information specific to OV starting in the 2018 financial year. Reliable previous OV CSR data are not available.

Starting in 2018, Groupe PSA has standardised CSR data collection with OV, in order to publish consolidated information.

Most indicators are already consolidated and for few remaining topics, results are presented differently between PCD and OV.

This report reflects the Corporate Social Responsibility policies, commitments and results of the Automotive Division for 2018.

#### 1.1.1.2. Mobility: Groupe PSA identity and strategy

##### 1.1.1.2.1. An identity built on complementary brands

GRI.102-2

To support its *raison d'être* – “ensure the freedom of movement by providing a safe, sustainable, affordable and enjoyable mobility” –, the Group is structured around four main segments:

- the Automotive Division, covering:

- the design and engineering, manufacture and sale of passenger cars and light commercial vehicles under five brands:
  - > PEUGEOT: “Motion & Emotion”, whose ambition is to become the best high-end general brand,
  - > CITROËN: “Inspired by you”, inspired first and foremost by our customers and their lifestyles,
  - > DS AUTOMOBILES: “Spirit of Avant-Garde”, the ultimate in French luxury,
  - > OPEL: “The future is everyone’s”, whose ambition is to become the most desirable German mainstream brand,
  - > VAUXHALL: “British Brand since 1903”; to be the reference brand for mobility in Britain;
- mobility services under the umbrella of the Free2Move brand (leasing, car-sharing and more): “Unlimited mobility”;
- used vehicle sales:
  - > marketed as “PEUGEOT OCCASIONS”, “CITROËN SELECT” and “DS CERTIFIED”;
  - > via the “CARDAYZ BY PSA RETAIL” platform (a network owned by Groupe PSA), dedicated to used vehicle sales online or through dealerships,

- > through a strategic alliance with ARAMISAUTO.COM in 2016, the leading online used car sales website for all brands, and the first platform to offer used vehicles reconditioned by a specialised plant, with a “satisfied or your money back” guarantee;
- > via the CARVENTURA.COM platform, a startup formed by Groupe PSA, which provides easy and secure online peer-to-peer used vehicle sales;
- spare parts and other after-sales services offered by the Group:
  - > a complete parts offer, comprising original equipment from the Group's brands, as well as EUROREPAR, the multi-brand range for wear and maintenance, and supplier brands. This complete offer is provided to repairers through the DISTRIGO distribution label,
  - > EURO REPAR CAR SERVICE, the Group's multi-brand vehicle repair network,
  - > FORWELT, a consumables brand for bodywork professionals,
  - > AUTOBUTLER, a web platform for creating automotive maintenance and repair quotations online,
  - > MISTER AUTO, a website dedicated to online sales of automotive parts which has been part of Groupe PSA since 2015;
- the Automotive Equipment Division, corresponding to the FAURECIA Group comprising interior systems, automotive seating and emissions control technologies;

- the Finance Division, corresponding to the BANQUE PSA FINANCE Group, which provides retail financing to customers and wholesale financing to the brands' dealer networks. Since 2015, BPF has set up a business model of cooperation, including two major partnerships in Europe, one with the Santander Consumer Finance Group for the PEUGEOT, CITROËN and DS AUTOMOBILES brands, and the other with the BNP Paribas group for the OPEL and VAUXHALL brands. The governance implemented in these partnerships guarantees independent credit decisions while allowing the construction of adapted, innovative commercial offers, and which fully support the Push to Pass and PACE! growth plans;
- the Group's other businesses, which include the operations of Peugeot S.A., the Group's holding company.

#### **1.1.1.2.2. Push to Pass: the Group's roadmap**

Push to Pass is the first step towards achieving Groupe PSA vision: “**to become a global carmaker on the leading edge of efficiency and a benchmark supplier of mobility services**”.

Unveiled in 2016, it builds on the results of the previous plan “Back in the Race”, which enabled the Group to return to profit sooner than expected. This transformation plan is the Group's roadmap for 2016-2021. Driven by customers' shifting expectations, **this plan has unlocked the Company's potential** by capitalising on efficiency, operational excellence and agility.

**Groupe PSA is now sustainably competitive**, and is supported by the results of an efficiency drive that has aligned it with the best reference level in the global automotive industry. As a result, it now has the ability to seize opportunities such as the OPEL acquisition.

It is focused on meeting the expectations of its key stakeholders such as its customers, its employees, its investors, its suppliers and its host communities, and a life-friendly planet. Section 1.3.3 of this document presents the benefits shared with these stakeholders.

With carefully managed R&D investment and rigorous control of fixed and production costs, the strategic plan raises the bar for Groupe PSA structural performance by aiming to deliver an Automotive recurring operating margin\* of over 4.5% on average in 2019-2021.

#### **— AN AGILE BUSINESS MODEL**

To achieve this target, the Company is rethinking its business model. It will create more value by leveraging its existing customer base.

Brand development is based on:

- **a Core Model Strategy** to support the launch of 116 regional launches by 2021, including new concepts, with a resulting reduction in the average age of the range – a source of pricing power for the brands – to 3.5 years by 2021;
- **a Core Technology Strategy** driven by CO<sub>2</sub> as a key decision criterion, to accelerate the electrification of vehicle ranges, with 50% of the offering electrified by 2021 and a target of 100% by 2025, and to allow the use of the first hydrogen vehicles in real-life conditions in B2B customer fleets. Having been one of the first manufacturers to test autonomous vehicles out on the open road, Groupe PSA will continue to roll out advanced driver-assistance systems (ADAS), taking into account customers' cost-use value trade-offs;
- **a Core Mobility Strategy** to support the international launch of the Free2Move mobility brand with a x4 in targeted growth in the number of active customers by 2021, enhanced after-market offers driven by the IAM (Independent Automotive After-market) multi-brand business with a x2 in targeted growth in the IAM spare parts revenue by 2021, and a break into the circular economy field. The used vehicles business is expected to increase its sales and transactions outside Europe by a third. Financial services will become a decisive driver of sales performance as the market becomes increasingly electrified;
- **Continuous improvement in product and service quality**, which is fostering greater satisfaction among the Group's customers on a broader geographical scope and across a larger range of businesses.

**“**

*We will be continuing our Darwinian transformation and approaching each challenge as an opportunity to stand apart against our competitors. The commitment, professionalism and agility of our teams, combined with the pursuit of operational excellence, will sustainably drive our performance and increase the satisfaction of our customers.*

**”**

**Carlos Tavares**

*commenting on the Push to Pass plan*

\* Recurring operating income related to revenue for PCDOV Automotive Division.

### 1.1.1.3. A global industrial footprint managed as close to the automotive markets as possible

GRI.102-4 GRI.102-6 SASB-000.A

Due to the scope and breadth of their operations, automobile production plants have a considerable economic and social impact on their host communities. They create jobs and drive growth at the grass-roots level.

Groupe PSA has sales operations in 160 countries. It is often the largest employer in its host communities.

## AUTOMOTIVE MANUFACTURING, R&D AND SALES ESTABLISHMENTS

### MANUFACTURING LOCATIONS

- **Automotive production plant**
  - in partnership
  - in the planning stage
- **Components factory, casting**
  - in partnership
  - in the planning stage
- **Automotive assembly plant**
  - in partnership
  - in the planning stage

### OTHER LOCATIONS

- **R&D centre**

### SALES LOCATIONS

- Country where the Group Automotive Trade sites surfaces are significant enough to be included in the reporting scope (see 5.7 for details)
- Countries where only Group mobility services are offered



### Industrial partners (see 2.0.3.3.1)

Items included in or excluded from the CSR reporting scope are listed in Section 8.4.1.

- 1 STAFIM
- 2 Condor Electronics, Palpa Pro and l'Entreprise Nationale de Production de Machines-Outils
- 3 CK BIRLA
- 4 URYSLIA
- 5 THACO
- 6 SC Uzavtosanoat
- 7 Naza Automotive Manufacturing
- 8 PAN Nigeria Ltd
- 9 MIE (Mesfin Industrial Engineering's)
- 10 FIAT
- 11 Mitsubishi
- 12 Toyota
- 13 Dongfeng Motor Corp.
- 14 Changan PSA Automobiles
- 15 HMFCL (Hindustan Motor Finance Corporation Limited)
- 16 EASA Nordex



## Global organisation, local management

The Group is organised into six regions: Europe, China & South-east Asia, Latin America, Eurasia, India-Pacific and Middle East & Africa, each one run by an operating unit. Each locally-based Head of Department, is responsible for economic profit and

management of the Group's resources in that region, both for manufacturing and sales activities. This structure takes better account of the specific characteristics of each region, so as to identify the risks and capitalise on opportunities.

## MANUFACTURING PLANTS ARE LOCATED ACCORDING TO THEIR MARKET PENETRATION PLAN

Manufacturing region	2006	2016	2017	2018	% of total production 2018
Latin America	189,302	144,712	144,089	118,253	3%
China and Southeast Asia	201,862	606,157	382,150	256,349	7%
Eurasia		3,795	1,744	5,361	0%
Europe	2,993,844	2,130,716	2,600,698	3,243,904	83%
<i>including</i> France	1,900,759	1,008,351	1,138,048	1,210,434	31%
India-Pacific		16,789	55,160	120,378	3%
Middle East & Africa	3,123	250,618	464,445	156,024	4%
North America			1,456	2,109	0%
<b>TOTAL</b>	<b>3,388,131</b>	<b>3,152,787</b>	<b>3,649,742</b>	<b>3,902,378</b>	<b>100%</b>

These volumes cover the production:

- of Groupe PSA brand vehicles (including OPEL and VAUXHALL), manufactured in the Group's plants and those of its joint ventures;
- vehicles of other brands which are assembled in the Group's plants and in those of its joint ventures.

## A workforce distribution reflecting the commitment to the economic development of the host regions

### NUMBER OF EMPLOYEES ON PERMANENT OR FIXED-TERM CONTRACTS BY REGION (excluding FAURECIA, as at 31 December)

Permanent and temporary workforce	Group's direct workforce (controlled and consolidated companies)	Distribution of total workforce by region (%)
China and Southeast Asia	768	0.7%
Eurasia	2,309	2.0%
Europe	108,557	91.9%
India-Pacific	119	0.1%
Latin America	5,242	4.4%
Middle East & Africa	1,134	1.0%
<b>TOTAL</b>	<b>118,129</b>	<b>100.0%</b>

Workforce of joint ventures (JV) non-consolidated as at 31 December:

- TPCA = 2,148 in Kolín, in JV with Toyota;
- DPCA = 8,082 in Wuhan, Chengdu and Xiangyang in JV with DONGFENG MOTOR CORP.;
- CAPSA = 1,167 in Shenzhen, in JV with Changan Automobiles;
- SevelSud = 5,987 in Val Di Sangro, in JV with Fiat;
- UPCA = 41 in Jizzakh, in JV with SC Uzavtosanoat.

**1.1.1.4. Present in all the major mobility markets worldwide**

GRI.102-6

SASB-000.B

**VEHICLES SOLD IN 2018**



**1,740,214**



**1,046,229**



**53,265**



**1,038,057**

1

**Groupe PSA sold 3,878,000 vehicles worldwide in 2018,** compared with 3,632,300 in 2017, representing an increase of 6.8%. This is the fifth consecutive year of increased sales for the Group, in addition to improved pricing power, in a context of

economic and geopolitical headwinds. The Core Model strategy is fruitful: success of new launches and European leadership in Light Commercial Vehicles.

Region	Vehicles sold in 2017	% of total sales 2017	Vehicles sold in 2018	% of total sales 2018	Change from 2017
Europe	2,378,642	65.5%	3,106,160	80.1%	+30.59%
China and Southeast Asia	387,302	10.7%	262,583	6.8%	-32.20%
Middle East & Africa	618,827	17.0%	291,998	7.5%	-52.81%
Latin America	206,275	5.7%	175,257	4.5%	-15.04%
India-Pacific	26,053	0.7%	26,479	0.7%	+1.64%
Eurasia	15,215	0.4%	15,288	0.4%	+0.48%
<b>TOTAL</b>	<b>3,632,300</b>	<b>100%</b>	<b>3,877,765</b>	<b>100%</b>	<b>+6.76%</b>

Groupe PSA recorded revenue of €74 billion in 2018, versus €62.3 billion in 2017 (up 18.9%).

**CONSOLIDATED REVENUE BY REGION**

(in millions of euros)	Europe	Eurasia	Southeast Asia	India-Pacific	Latin America	Middle East & Africa	North America	Total
<b>2018 REVENUE</b>	58,007	557	3,147	1,478	3,842	2,802	4,194	74,027
2017 Revenue	46,269	477	2,920	1,226	4,490	2,975	3,899	62,256

Detailed information on the breakdown of Groupe PSA revenue by business and by region can be found in the Group's Registration Document.

As part of its strategic plan, the Group has committed to launch 116 new vehicles across its global sales regions by 2021. It has also unveiled a three-step plan to become established in the United States over the next 10 years, starting with the marketing of mobility services in 2017 (primarily in Los Angeles), followed by the development of new mobility solutions based on the Group's vehicles, and finally vehicle sales as soon as suitable supply sources become available.

## 1.1.1.5. Operational efficiency: Group DNA

### Operational efficiency: a prerequisite for financial security, investment capacity and implementation of the Group's strategy

Operational efficiency translates to all areas of the business:

- efficiency of R&D resulted in productivity improvement of 5% per year at the end of 2018;

- the target of PCD average cost of production per vehicle (reduction of €700/vehicle in 2018 vs 2015), taking into account compliance with Euro 6 standards, has almost been met (€632) and OV cost reduction is on track. The new target is to create an additional saving of €700/vehicle by 2021 vs 2018;
- fixed costs have also been streamlined to return to best practice levels. For example, in real estate, built square metres of PCD sites were reduced by 17% between 2015 and 2018. A new target of a 14% decrease of built square metres of all PSA sites is set for the period between 2018 and 2021. Targeting benchmark also includes modernising manufacturing, flexibility and synergies.

Operational efficiency is a way for the Group to demonstrate its responsibility through the way in which it runs its business activities. Its purpose is to provide financial security, which is essential for the Group to implement its global strategy.

### BREAKDOWN OF TANGIBLE ASSETS BY GEOGRAPHIC LOCATION OF THE CONSOLIDATED COMPANIES

(in millions of euros)	Europe	Eurasia	China and Southeast Asia	India-Pacific	Latin America	Middle East & Africa	North America	Total	
2018	PROPERTY, PLANT AND EQUIPMENT	12,151	122	541	141	651	166	364	14,136
2017	Property, plant and equipment restated <sup>(1)</sup>	11,511	143	453	123	578	73	337	13,218
	(1) Financial statements restated after the first application of IFRS 15.								

### FINANCIAL SECURITY

(in millions of euros)	31/12/2016	31/12/2017	31/12/2018
Cash and cash equivalents <sup>(1)</sup>	11,576	11,582	14,961
Financial investments	110	165	50
Current & non-current financial assets	1,088	1,575	1,410
<b>TOTAL</b>	<b>12,774</b>	<b>13,322</b>	<b>16,421</b>
Credit lines (undrawn) - excluding FAURECIA	3,000	3,000	3,000
Credit lines (undrawn) - FAURECIA	1,200	1,200	1,950
<b>TOTAL FINANCIAL SECURITY</b>	<b>16,974</b>	<b>17,522</b>	<b>21,371</b>
o/w FAURECIA <sup>(2)</sup>	2,840	2,849	4,211

(1) Including €42 million in Argentina (€43 million as at 31 December 2017).

(2) Including the bridge loan of €750 million established in 2018 by FAURECIA during the acquisition of Clarion Co. Ltd and undrawn as at 31 December 2018.

Financial security is made up of available cash, other readily available financial assets and undrawn credit lines.

## 1.1.1.6. Choosing a core technology strategy to tackle climate change and meet customers' expectations

The Group identifies and develops **the most cost-effective technical solutions** for its customers. It combines:

- a market approach segmented by region and by the type of usage, expectations and budget of its customers, to whom it offers the most carbon-neutral solutions;
- a cross-functional approach based on a portfolio of technologies that can be rolled out on a global scale so as to capitalise on R&D investments through high production volumes and offer a broader response to environmental and public health challenges.

### A two-part technology strategy...

#### — 1. CLEAN TECHNOLOGIES

- **best-in-class powertrains in terms of emissions** (PureTech petrol engine voted Engine of the Year in 2015, 2016, 2017 and 2018);
- **electrified technology programmes** with the launch of plug-in hybrid vehicles and electric vehicles to electrify up to 50% of the range by 2021 and 100% by 2025.

Climate change can only be tackled effectively and air quality can only be improved through mass-market adoption of the most efficient technology.

With CO<sub>2</sub> emissions of 114 g/km in 2018, Groupe PSA remains one of the market leaders, as the European market average is 119,5 g/km.

The Group will offer an electrified powertrain for each series, with a tailored marketing approach depending on the identified market needs and the local regulations.

Group vehicle sales by region and by fuel type are shown in 2.1.2.

## — 2. SMART CARS: CONNECTED AND AUTONOMOUS

- technology that allows users to **stay permanently connected** while on the move;
- the continued **deployment of driving assistance systems (ADAS) foreshadowing the autonomous vehicle.**

### ... to master CO<sub>2</sub> transition and technology stakes

2018 - Efficient R&D	2021 - Flexible answer to customer demand
<ul style="list-style-type: none"> <li>• WLTP mastered and impactful CO<sub>2</sub> Committee</li> <li>• Right timing on LEV: BEV on CMP and PHEV on EMP2</li> <li>• ADAS roll-out on track</li> </ul>	<ul style="list-style-type: none"> <li>• CO<sub>2</sub> compliant: 23 LEV launches in EU (PC+LCV) and 8 in China</li> <li>• Extension of BEV on EMP2 platform</li> <li>• Multi-energy platforms in flexible plants: LEV and ICE on the same line</li> <li>• Fuel cell fleet in operation with selected B2B customers</li> </ul>

## 1.2. CSR IN THE VALUE CREATION MODEL

### 1.2.1. Risks and opportunities in all areas of CSR as they relate to future financial performance and long-term prospects

GRI.102-11

DPEF.B

With a crucial role in developed economies, the automotive industry represents around 6.1% of GDP in Europe, a trade surplus of €90.3 billion and 13.3 million direct and indirect jobs. To meet the future challenges for mobility which will be cleaner, safer and more connected, the automotive industry is focusing on innovation, and each year it invests more than €53.8 billion on research and development. It is the leading R&D investor in Europe.

The automotive sector also has a significant impact on the environment throughout a vehicle's life cycle, from design and engineering to production, use and end-of-life.

#### 1.2.1.1. Risks in view of the key trends for the automotive industry over the next few years

GRI.102-15

GRI.102-46

GRI.102-47

GRI.102-49

GRI.201-2

**The Group has identified macro-risks which it must address in accordance with the UN Sustainable Development Goals.**

In light of the Group's activities, each macro-risk can be broken down into a number of CSR issues. In this report, the Group outlines its response to each of these issues and the strategies that it plans to apply.

#### 7 CSR macro-risks

7 CSR macro-risks		23 linked CSR issues
<b>Climate change</b> 	<i>Climate change requires a global response, which includes designing vehicles with lower CO<sub>2</sub> emissions, reducing the carbon impact of manufacturing facilities, logistics and purchasing, and putting in place measures to offset carbon.</i>	<ul style="list-style-type: none"> <li>• Vehicle CO<sub>2</sub> emissions (see 2.1.)</li> <li>• Energy/industrial carbon footprint (see 5.2.)</li> <li>• Environmental performance in the supply chain: purchasing and logistics (see 5.2.5. and 4.2.1.1.)</li> </ul>
<b>Natural resources scarcity</b> 	<i>In an era characterised by a shortage of natural resources, reducing the dependency on water and raw materials is both a question of responsibility towards the environment, as well as being crucial for the Company's sustainability.</i>	<ul style="list-style-type: none"> <li>• Wise use of material in the vehicle life cycle (including product recycling) (see 2.4.)</li> <li>• Sustainable water management (see 5.5.)</li> <li>• Optimisation of material cycles in industrial processes (including waste) (see 5.4.)</li> </ul>
<b>Health/safety: growing demand of civil society</b> 	<i>In response to increasing concern in society about the effects of products and industrial processes on our health, car manufacturers must demonstrate their ability to reduce the impact of their activities and make their products stand out from the crowd in terms of vehicle safety.</i>	<ul style="list-style-type: none"> <li>• Biodiversity (see 5.6.)</li> <li>• Vehicle safety (see 2.3.)</li> <li>• Vehicle impact on air quality (see 2.2.)</li> <li>• Control of industrial discharges and nuisances (see 5.3.)</li> </ul>
<b>Unbalanced economic development of regions</b> 	<i>Faced with growing inequality in the economic development of the regions, it is vital to focus on redistributing the value created by the companies in the local communities in which they operate.</i>	<ul style="list-style-type: none"> <li>• Local sourcing development in host territories (see 4 and 4.1.2.2)</li> <li>• Balanced governance and distribution of added value (see 6.2., 6.4. and 6.5.)</li> <li>• Philanthropy and socially responsible mobility (see 7.1., 7.2. and 7.3.)</li> </ul>
<b>Human rights and business ethics violation</b> 	<i>The automotive industry must anticipate national and international regulations being tightened, such as regulations related to conflict minerals, the balance and integrity of business relations, the due diligence of major companies as well as consumer protection.</i>	<ul style="list-style-type: none"> <li>• Responsible information and marketing (see 7.4.2.)</li> <li>• Ethics in business practices (see 6.1. and 6.3.)</li> <li>• Human rights in the supply chain (see 4.2.)</li> </ul>

## 7 CSR macro-risks

<b>Human capital</b> 	<i>In an evolving context for the automotive industry's working framework (automation, digital transformation etc.) the Company's competitiveness should be based on a wide pool of talent, social dialogue, the well-being of employees and occupational safety.</i>	<b>23 linked CSR issues</b> <ul style="list-style-type: none"> <li>• Attracting and developing all talent (see 3.3.)</li> <li>• Management of company transformations and social dialogue (see 3.1. and 3.2.)</li> <li>• Health, safety and well-being in the workplace (see 3.4.)</li> <li>• Diversity and equal opportunity (see 3.5.)</li> </ul>
<b>Customers' expectations and market risks</b> 	<i>In response to travel policies and urban constraints, car manufacturers must provide fresh ideas by developing new mobility solutions suited to every mobility need, based on high-quality products and services and flawless customer relationship management.</i>	<ul style="list-style-type: none"> <li>• Vehicle and service quality – customer satisfaction (see 2.3.)</li> <li>• Responsible management of customer data and the customer relationship (see 7.4.1.)</li> <li>• Development of new mobility solutions (see 2.5.)</li> </ul>

## Focus: potential threats to the business model

Car manufacturers are having to rethink their business model. They need to address the following questions:

- how can tier 1 suppliers, who have become huge global players, play a part in risk management in the areas of environmental issues and human rights and be vigilant within their own subcontracting chain?
- what strategic alliances can be formed between partners in different industries – such as geolocation – so that ecosystems can be developed that are conducive to the connected vehicle? How can the accident data transmitted by vehicles be used to improve road safety and be of benefit to the Company?
- who will our customers be, and how will they use vehicles in view of:
  - the major changes resulting from the transition from an ownership economy to a rental economy,
  - the autonomous car revolution (according to an international study by KPMG, fully autonomous cars could represent 10% of car sales by 2035, or 12 million vehicles a year, and a market of \$42 billion by 2025),
  - the major changes linked to the fall in average disposable income in a large number of developed countries: total cost of ownership (TCO) is now a key factor in the decision-making process for car buyers. Apart from the costs of financing the purchase, the TCO of a vehicle is closely correlated to its environmental performance and quality: energy consumption; taxes on vehicle CO<sub>2</sub> and pollutant emissions; estimated resale value, which depends on the brand image and reputation of the model in terms of quality; insurance costs, which are linked to safety performance and increasingly to environmental performance,
  - the major changes resulting from restrictions on vehicle access to city centres: for example, the initiative of the Cities Climate Leadership Group, formed in 2005 and covering 85 cities around the world – including Paris, Beijing, São Paulo and Moscow – to launch an appeal for innovative urban projects by encouraging investment in schemes to build sustainable and resilient cities.

## Focus: risks related to climate change and financial impacts

Climate change generates two types of risk, which can have an impact on the Company's financial results:

- physical risk: the consequences of more frequent extreme weather events or natural disasters which can damage production facilities owned by the Group and its supply chain, disrupt production and lead to costly delivery delays for the end customer, result in plant repair costs, etc. These risks have an impact on the cost of insurance;
- non-physical risk such as:
  - regulatory risks: standards and regulations are becoming more stringent and prolific in response to climate change issues. This entails both large-scale investment in R&D and active monitoring to ensure that products and services fully conform to regulations. Regulations are also deterring investors from investing in carbon-intensive activities, with the result that manufacturers must upgrade their production facilities to make them less energy-intensive. Failing this, their assets will be devalued and their borrowing costs will increase,
  - technological risks: changes in consumers' mobility expectations amid rapid technological upheaval and the emergence of new competitors and financial penalties for carbon-intensive products require manufacturers to keep pace with the market (as a minimum) and to invest heavily in new environmental technologies. If not, they will inevitably disappear from the market and the value of their assets will plummet,
  - market risks: towns and cities are reviewing their transport policies and increasingly discouraging the use of cars; the average disposable income of consumers is falling in developed countries; demand is increasing in emerging countries in different economic conditions. Car manufacturers must rethink their business model so that new offerings can replace traditional revenue streams. Otherwise, the loss of revenue could affect profitability, leading to asset impairment and a fall in their securities valuation,
  - reputation-related risks: these may be linked to the choice of partnerships and could undermine the image of the brands and their pricing power, thereby reducing the Company's direct revenue.

Groupe PSA is introducing a risk Management System (described in section 1.4.3.) to manage or mitigate the impacts and capitalise on the opportunities that each of these aspects creates. New “low-carbon” mobility solutions and urban mobility markets (especially with the new technology used to develop the autonomous vehicle) are all new sources of revenue, operational efficiency and technological innovation, therefore enhancing the image and value of the Group’s brands.

Section 1.2.2. explains how the CSR issues considered as material by the Group are evaluated, particularly in view of their long-term impact on the Group’s performance.

For confidentiality reasons, the estimated amount of these impacts (in euros) is replaced in the CSR report by a scale of 1 to 4. However, the “Impact Measurement and Economic Assessment” inserted into the various sections of this report provide examples of risks and opportunities linked to strategic CSR issues which are rated for their economic impact.

The mechanism set up by the Group to manage risks is described below. CSR risks are part of this mechanism. In general, all Group risks and associated control procedures are described in section 1.5. of the Group’s Registration Document.

### **CSR risk management approach**

**Given its determination to take corporate social responsibility into account in all its decisions and activities, the Group takes the same approach to managing CSR risks as it does for its other risks.**

The Group has therefore adopted a risk management approach focusing on “top risks”, which aims to identify, assess and address the most material risks that the Group is exposed to (for details of this approach, see Chapter 1 of the Registration Document). This approach fully covers the major CSR risks, such as emissions-related risks, supplier risks, industrial risks, environmental risks and workplace health and safety risks. To complement this approach, the identification, evaluation and handling of less material risks are assumed by the operating entities within the Group’s various divisions, both in France and abroad, either using the division’s own risk management procedures, the crisis management process, the internal control procedures or any other ad hoc operational process.

CSR risks are identified in the relevant sections of the CSR report. For example, ethical risks and the associated risk management procedures are described in section 6, purchasing risks in section 4, and so on. A risk overview can be found in Chapter 1 of the Registration Document.

Like other aspects, the CSR categories are subject to internal control and are specifically included in the Group’s Internal Audit plan.

### **1.2.1.2. Groupe PSA strategic decisions in response to risks**

All of the economic, sociological, regulatory, environmental and societal aspects described above pose a challenge for the automotive industry. To meet this challenge, each actor must rethink its value creation model. While this entails some risk, Groupe PSA views it as an opportunity. Its Push to Pass strategic plan effectively illustrates its decision to update:

- its innovation processes: the traditional co-design process with suppliers is supplemented by taking a stake in or forming agile alliances with startups, which can now afford to test disruptive solutions in their beta version and correct them as required. Groupe PSA has set up a €100 million investment fund for startups, and has already announced partnerships in fields such as mobility and data (see 2.0.);
- its design and engineering processes: environmental and social responsibility throughout the entire life cycle requires special vigilance with regard to hazardous materials, pollutant emissions and rare earths. Groupe PSA has long deployed an eco-design approach. It is actively involved in the circular economy through managing its products’ end-of-life cycles (see 2.4.);
- its production processes: the Group is increasing its use of standardised modules and platforms. Similarly, to reduce its carbon footprint, the Group is taking steps to reduce the energy intensity of its processes and increasingly switch to using renewable energy sources. It is also looking at production processes based on disruptive technology (e.g. 3D metal printing in partnership with Divergent). (see 5);
- its marketing processes: digital tools are radically altering the relationship between brands and customers, while new actors are emerging as key influencers and are shaping consumer opinion. The Group invests heavily in customer relationship management (CRM) and is present in the customer information market (investing in Autobutler in 2016, an online quotation site for vehicle repairs) (see 2.3. and 2.5.);
- its work arrangements and talent management: collaborative working methods, agile project teams, remote working, integration of digital technology in the business lines, etc. (see 3);
- its products: development of plug-in hybrid petrol-electric powertrains; the need to improve the performance of electric vehicle batteries; downsizing; active monitoring of the development of new energies (hydrogen, fuel cell, new biofuels, etc.); the need to protect vehicles, passengers and other stakeholders not only from road safety risks, but increasingly from cybercrime (see 2.1. and 2.3.);
- its locations in order to support its sales development in emerging markets such as Africa or Asia (Morocco, Algeria, Malaysia). At the same time, it is boosting the competitiveness of its production plant in countries where markets are stagnating or declining;

- its stakeholder communication: transparent, reliable information is key to the Group's stakeholder dialogue. Financial and non-financial reports are published in conformity with leading global standards after being audited by third parties. In November 2015, PCD took the initiative in publishing its real-world vehicle consumption, in association with the environmental NGO Transport & Environment (see 2.1. and 2.2.);
- its risk management: technological advances and international expansion mean that data protection systems must be constantly updated, in addition to reputational and legal monitoring to ensure an immediate response to threats. Investors increasingly measure the financial consequences of risk management. Groupe PSA has raised its game in internal control to provide an efficient and structured response to the risks it is exposed to, whether regulatory, consumer, financial, climate or cybercrime-related (see 1.4.3.).

### 1.2.1.3. Stakeholder dialogue to anticipate risks and create opportunities

DPEF.15

DPEF.32

GRI.102-29

GRI.102-40

GRI.102-42

#### Raising our levels of mutual understanding

The Group – a core player in the local economies where it operates – has maintained solid relations with all of its stakeholders for many years.

Effective dialogue means that it can gradually raise the mutual level of understanding and knowledge of Groupe PSA and its stakeholders in key areas. This paves the way for the **joint development of efficient solutions**.

The experience gained through these relations allows the Group to **better identify company, environmental or economic issues and risks**. Continuously monitoring the changing expectations, needs and limitations of society allows for better mutual understanding. The advantages of this system are that it makes it **easier to prevent risks** and conflicts and helps the Group adapt to sociological and technological changes taking place within society.

By maintaining open lines of communication with stakeholders, the Group ensures that its most material issues are well identified and that actions are effectively engaged both to reduce the negative effects of its operations and to develop opportunities for value creation around these areas.

The Group's financial performance is underpinned by decisions that are informed by the expectations and needs of stakeholders who, directly or indirectly, influence and sometimes shape its activities.

In 2018, the Group's CEO also started a series of one-to-one dialogues with high-level experts on the seven megatrends that will shape the future of mobility. This initiative was launched in September 2018 during the Paris Motorshow. The aim of these dialogues is to help to build the future strategic plan of the Company. All dialogues are filmed so that they can be shown to the public in a transparent way. The dialogue related to climate change was made public in December 2018, and it will be followed by videos on the six other megatrends that were identified: the divergence of markets, the sharing economy, the development of connected objects, autonomous vehicles, digitalisation and changes in customer behaviour.



7 megatrends that will shape our future:

<https://www.groupe-psa.com/en/story/7-grandes-tendances-vont-faconner-notre-avenir/>

## A policy for ongoing dialogue

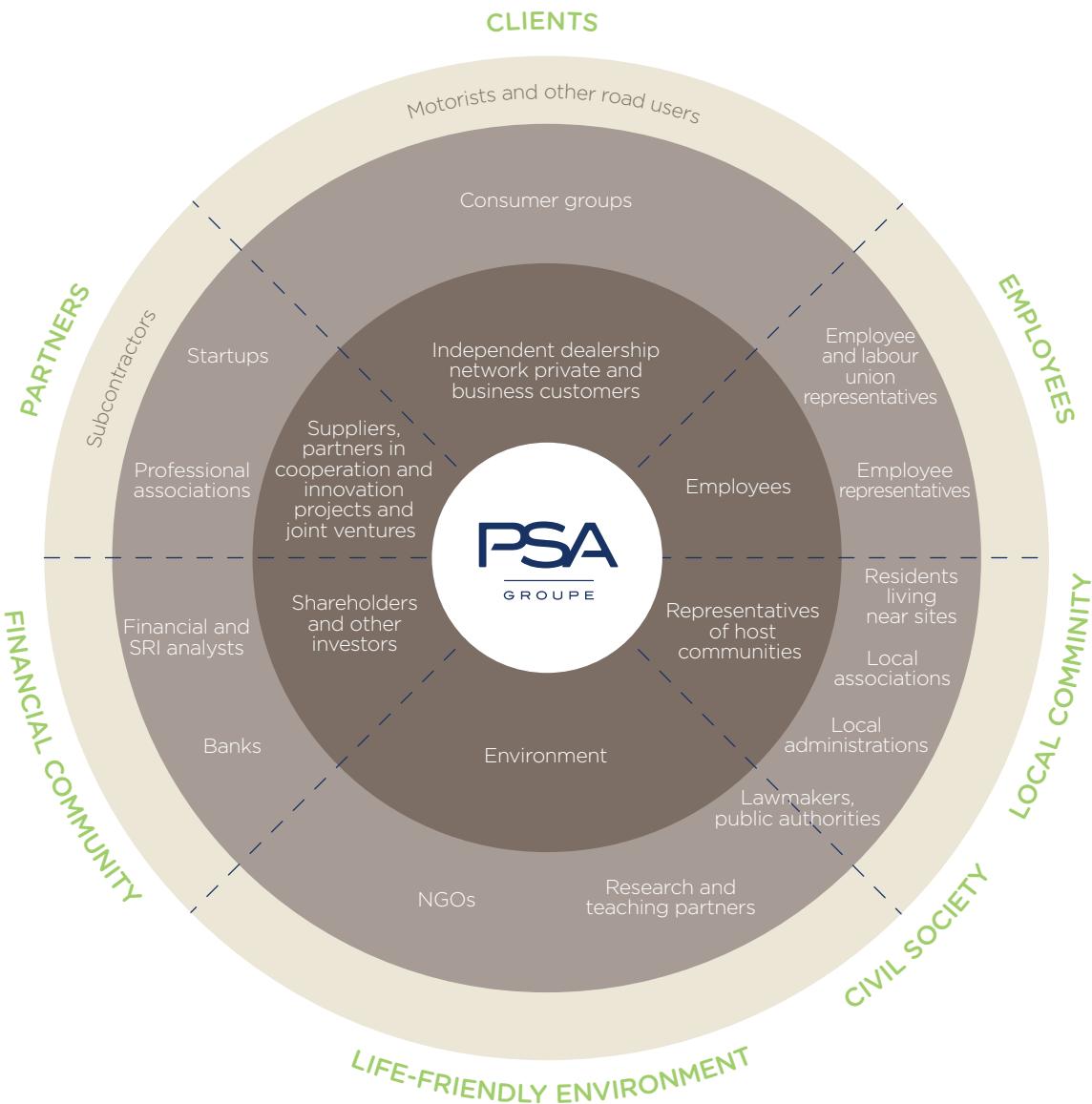
The Group's business activities have an impact on the decisions of a large number of stakeholders, both internal and external. **The Group has identified its main stakeholder categories. They are mapped below by type and by the importance of their interactions with the Group. The outermost circle includes the stakeholders with whom the Group is in contact for operational purposes on a day-to-day basis.**

The Group manages its relations with these different partners by maintaining continuous dialogue aimed at mutual understanding and the promotion of concrete actions.

It is by ensuring responsible dialogue with its stakeholders and engaging with them at the local and global levels that the Group is best able to identify its most material CSR issues, remain attentive to concerns and propose solutions.

The entire list of stakeholders was drawn up by staff in each of the Group's business lines on the basis of their day-to-day activities and the interactions involved.

## MAPPING OF GROUPE PSA STAKEHOLDERS



## Tools for dialogue set up by Groupe PSA

Groupe PSA has established opportunities for dialogue that is specific to each type of stakeholder, providing a forum for ongoing discussions about all of the issues raised by the parties concerned. The main types of dialogue are detailed in section 8.2 of this report, which specifies the type of discussion (information, debate, partnership) that takes place.

These regular discussions with stakeholders constitute a benchmark for the Group's CSR ambitions. They provide the content for the action plans launched by the Group. Examples of dialogue can be found throughout this report, and are located in the dedicated boxes.

### 1.2.2. Groupe PSA CSR issues mapping

GRI.102-15

GRI.102-29

GRI.102-32

GRI.102-49

GRI.203-2

**23 CSR issues covering seven macro-risks (see 1.2.1.1.) are considered to be material by Groupe PSA experts and stakeholders.** According to the Global Reporting Initiative (GRI), material issues “are those that reflect the organisation’s significant economic, environmental and social impacts or substantively influence the assessments and decisions of stakeholders”.

These issues are described in the relevant sections of this CSR report, with an indication for each one of whether its impacts are internal, external or both.

The CSR risk assessment was the first step in the process which led to CSR issues being assessed according to two main focus areas: the impact of the issue on the Company’s financial performance, and the level of stakeholder expectations. The materiality matrix

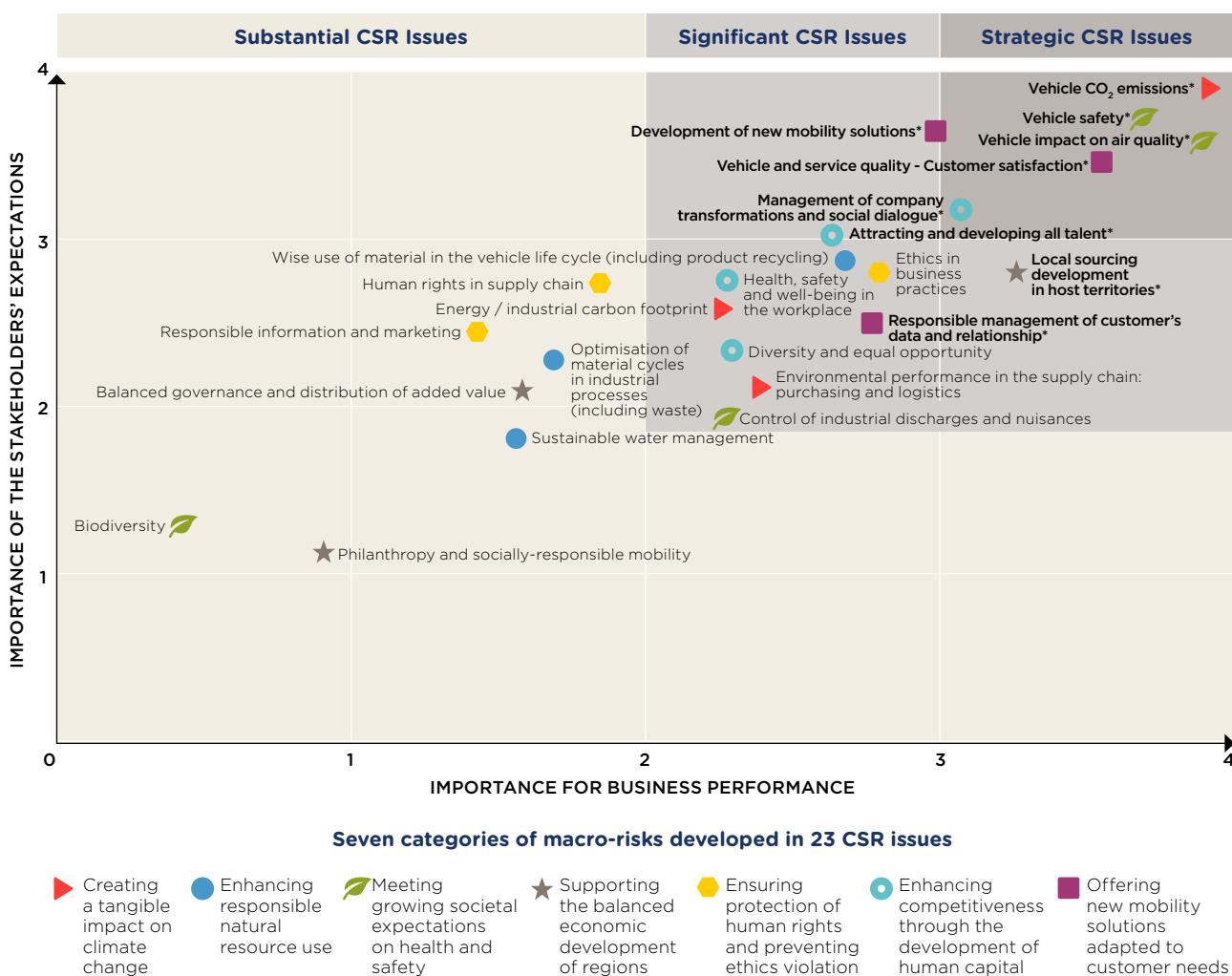
of the issues, presented below, puts the issues which are most strategic for the Group into perspective. For this mapping of its CSR issues, the Group followed the guidelines of the GRI.

The method used to prepare and update the materiality matrix is described in section 8.4.2 of this CSR report.

Once a year, as part of the process to update the CSR report and the CSR chapter of the Registration Document, the Group’s CSR issues are reviewed and validated by the Executive Committee, before being presented to the Supervisory Board.

**For each issue, the Group adopts measures proportionate to its position in the materiality matrix.** These measures are described in the various sections of this CSR report.

#### GROUPE PSA MATERIALITY MATRIX



\*Issue linked to the Push to Pass strategy.

## 1.2.3. Groupe PSA value creation model

DPEF.A

### 1.2.3.1. A Groupe PSA choice: responsible management of tangible and intangible capital for sustainable growth

Everyone in society needs to collaborate and take meaningful actions to address the complex challenges of lasting development effectively, and businesses cannot avoid these issues.

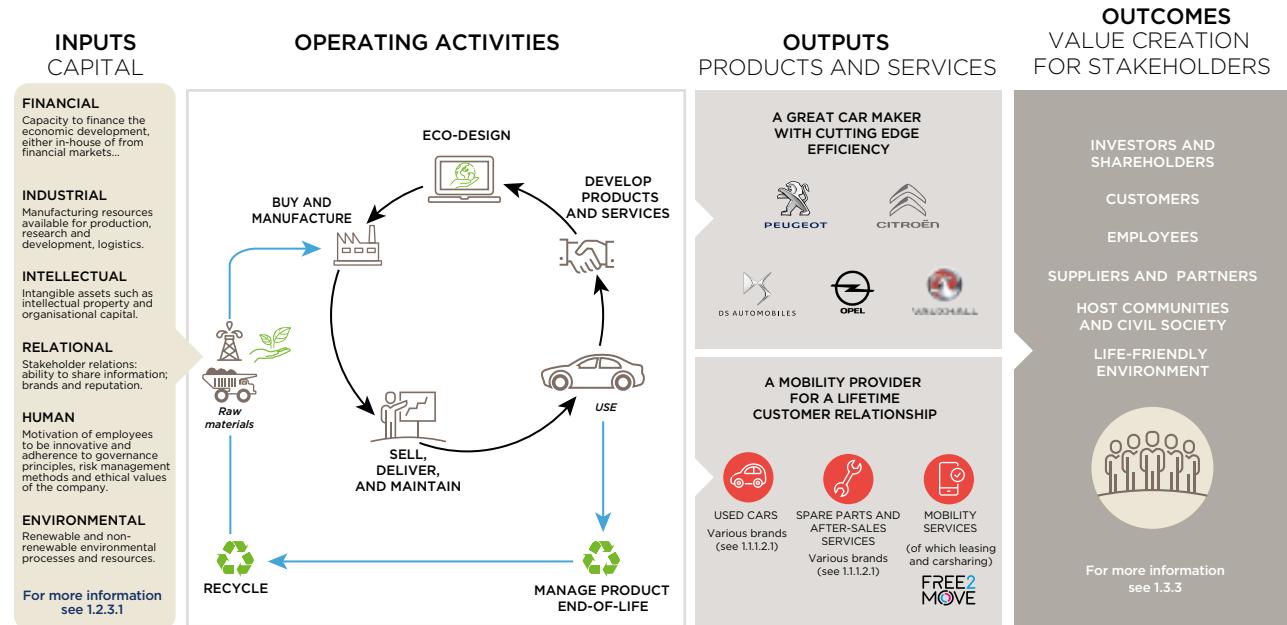
The Group relies on continuous dialogue with its various stakeholders (customers, suppliers, legislators, etc.) to build long-term responses to a number of economic, environmental, social and societal issues (see "Stakeholder Relations" boxes in the chapters on each topic).

The strategic choices emerge in the course of this dialogue.

**To increase the positive impacts and reduce the negative impacts of its activities throughout the value chain, the Group takes specific actions on each of the CSR issues that affect it.**

These actions are designed to maintain or develop the Group's environmental, relational, financial, human, industrial and intellectual capital. This is effectively a reservoir of value that, through its activities, the Group taps for the benefit of its stakeholders.

### GROUPE PSA VALUE CREATION MODEL



### 1.2.3.2. Responsibility in the value creation model

The Group's value chain, presented below, embraces a holistic, material and transparent approach to its growth model. Non-financial performance boosts financial performance and allows the Group to create value for stakeholders (see 1.3.3.).

→ "Integrated Thinking by Groupe PSA" video:  
<https://www.groupe-psa.com/en/automotive-group/groupe-psa-creator-shared-sustainable-value/>

The Group's growth model is illustrated by the "impact measurement and economic assessments" performed for each strategic CSR issue and published in sections 2-7 of this report.

### 1.2.3.3. An Open Innovation approach focused on creating value for our stakeholders

#### The Open innovation approach

Expanding the scope of Groupe PSA relies on an Open innovation approach, which brings together a broad range of partners including universities, laboratories, suppliers, institutions, major companies, SMEs, startups, employees, customers, etc.

The purpose of the Open innovation policy is to help the Group to:

- enhance its agility and market more innovative solutions;
- have access to the best knowledge that exists (scientific, technological, use, etc.);
- balancing the economic equation of R&D by sharing costs and risks with its partners or by enhancing the value of its expertise and technologies outside the Company.



#### *Impact measurement and economic assessment*

With the Open innovation policy, the Group can optimise its internal R&D expenditure, build expertise and gain access to patents and technology. For example, in developing autonomous vehicles, VEDECOM manufacturers and equipment suppliers have teamed up to reduce the duration of processes (authorisations to conduct road experiments were granted in five months instead of 12), their complexity and their cost (a single application was filed to register the patents rather than one application for each patent).

For Groupe PSA, Open innovation aims to build and manage relationships driven by shared value creation with stakeholders from four ecosystems: with people, companies, academia and institutions. Through this initiative of "openness", Groupe PSA aims to expand its ability to innovate. (see section 2.0.3.3.2.).

The "individuals" ecosystem incorporates Group employees, customers and users of mobility services in general. It aims to cement the place of individuals at the core of the innovation process.

The "academic" ecosystem focuses on scientific partnerships with the most advanced universities and laboratories in their respective fields. These partnerships are targeted so as to benefit from their expertise and explore ways to branch out into new research.

The "institutions and networks" ecosystem brings together incubators, accelerators, competitiveness clusters, networks dedicated to innovation which facilitate meetings with new potential partners and partnerships with SMEs and startups. With the creation of the Business Lab, Groupe PSA has been able to boost its partnerships with these players (Euratechnologies, Paris Région Entreprises, Le Village by CA, Paris & CO., BPI France, BFA, MOV'EO, CUBO, etc.).

The "businesses" ecosystem covers VSEs, SMEs and major groups, exploring new terrain and working with others to build the solutions of the future.



"Groupe PSA Business Lab and Latin America Division partner with Cubo Itaú in Brazil" 06/04/2018 press release: <https://media.groupe-psa.com/en/groupe-psa%20%99s-business-lab-and-latin-america-division-partner-cubo-ita%C3%BA-brazil>

#### The Business Lab

In order to take its Open innovation strategy even further, particularly the ecosystem for startups, and to address the rapid emergence of new car uses, Groupe PSA created the Business Lab at the end of 2016 to explore new terrain and transform it into opportunities for the Group. **The Business Lab is part of the deployment of the Push to Pass strategic plan, through which Groupe PSA aims to become a car manufacturer with cutting-edge efficiency, as well as become the preferred mobility provider worldwide.**

The Business Lab is based on three main activities:

- Business Innovation Hub: to detect business and technological innovations by promoting interactions with innovative ecosystems at a global level, and by being the preferred entry point for startups.
- Business Factory: to carry out full-scale experiments of new value proposals for its customers.
- Venture Development: to facilitate the creation of partnerships with innovative startups and take minority stakes both through capital risk funds and directly.

As part of its Venture Development endeavours, the Business Lab signed a partnership agreement in December 2016 with Idinvest Partners, a leader in growth funding for European companies that holds more than €9 billion in capital.



#### *Impact measurement and economic assessment*

In 2018, the Business Lab contributed to improving operating methods which generated more than €3 million in recurring savings. Of the 979 startups examined since the Business Lab creation, including 449 in 2018, 8% have been transformed. The startups come from 44 countries and involve 28 different entities.



"Anne Laliron presents the Business Lab" video: <https://www.youtube.com/watch?v=Adi6K9f6zfs>  
 "Business Lab - Let's accelerate together" 01/02/2018  
 Press kit: <https://media.groupe-psa.com/en/business-lab-lets-accelerate-together-en>

## 1.3. TRANSPARENCY AND CSR COMMITMENT: TANGIBLE RESULTS FOR THE GROUP AND ITS STAKEHOLDERS

### 1.3.1. The Group's CSR policy

For Groupe PSA, lasting development and financial performance depend on **responsible and transparent business conduct**. The Group has defined its Corporate Social Responsibility programme based on this principle, in line with the UN Global Compact which it joined in 2003. This CSR policy, which is the result of **ongoing dialogue with stakeholders** and is reflected in its **public commitments**, guides the Group's approach to its strategic challenges. It is based on three pillars: sustainable mobility; the economic development of host communities; and the implementation of innovative, thoughtful social practices focused on the individual.

#### Sustainable mobility

As a technological pioneer, Groupe PSA is demonstrating its social responsibility by developing a portfolio of mobility services in response to the changing expectations of its stakeholders, whether they are consumers or host communities. Its strategy is to have a presence in all mobility segments.

With this in mind, it applies its **innovation** resources to reducing the environmental impacts of transport. Its core strategy is to introduce the most **efficient technology on as many vehicles as possible**, spearheading the fight against pollution and climate change.

From the design and manufacturing stages, Groupe PSA is committed to **optimising the use of resources** by incorporating green or recycled materials into its vehicles to make them recyclable, and **reducing the environmental footprint of its production plants and dealership networks** in terms of energy, water and waste.

Vehicle use represents the bulk of emissions. Therefore, the Group:

- extensively equips its ranges with efficient, **low-carbon** clean tech to preserve **air quality**, and sells best-in-class combustion vehicles alongside its hybrid and electric cars;
- is developing a range of connected and mobility services in response to changes in **customer** behaviour and expectations.

Through dialogue with civil society, is inventing the transport of the future by incorporating digital into vehicle DNA and installing driver assistance systems to improve safety and traffic flow, foreshadowing the **autonomous vehicle**.

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#### Economic development of host regions

The Group's activities have a considerable economic and social impact on their host communities and Groupe PSA is mindful of the responsibility this entails. As such:

- it selects **suppliers** that are as close to its production plants as possible and that meet its **strict social and environmental standards**. By acting responsibly to increase the percentage of local purchases, the Group is demonstrating that its operations contribute towards the **sustainable economic development** of its host regions and countries;
- it supports the least privileged members of society through its Corporate Foundation, which funds mobility-based inclusion and access to education. It is a testament to the Group's **commitment to serving its host communities**.

#### Harnessing talent and paving the way for success

Groupe PSA economic and social performance is intrinsically linked. It is a question of channelling energy to succeed. The Group prioritises the relationship with its employee representatives to define innovative solutions and **foster trust and commitment**. Since 2010, to support the Group's internationalisation and effectively implement its social commitments, it has relied on a frame of reference: the Global Framework Agreement on Corporate Social Responsibility.

At each of its sites, Groupe PSA applies the principles of this agreement in response to employee-related issues. The Group:

- draws on its mature relationship with employee representatives and its philosophy of working together to share its strategy and provide secure career paths for its employees via negotiated provisions and close support;
- confirms the need to **ensure workplace health and safety** and to develop workplace well-being;
- sees **talent development** and expression as the cornerstone of its strategy;
- guarantees **equal opportunity** based on merit;
- extends its commitment to **uphold fundamental human rights to its suppliers and partners**;
- invites each employee to abide by its **Code of Ethics** and rules of professional conduct.

Groupe PSA regards its CSR policy as a collective and individual endeavour, which ensures that the principles of Corporate Social Responsibility are embedded into each business decision.

### 1.3.2. CSR commitments and roadmaps: Groupe PSA, an “impact player”

The CSR programme reflects the active commitment of Groupe PSA to understand and address each of the issues identified. This mission is fully in keeping with the Group's ambition to guarantee responsible development.

**For each issue, the Group undertakes a commitment and sets a target so as to lay out a specific path towards** its goal while monitoring its progress, and the level of achievement against each target is published in the Group's annual CSR report. The Group's commitments are defined jointly by the Sustainable Development Delegation and the departments concerned. The level of progress for each commitment in its roadmap is presented transparently in a scoreboard at the start of each section in this CSR report.

In 2018, based on its already-published medium-term 2025 CSR commitments, Groupe PSA has decided to publish its long-term CSR roadmap detailing ambitions for 2035 and beyond in order to give all stakeholders a clear vision of its strategy.

The 23 CSR commitments cover all aspects of the Group's social responsibility, including management of human resources, social dialogue, equal opportunities and diversity, ethics, manufacturing environment, environmental impact of products, procurement policy, sponsorship, etc.

These commitments are the concrete results of the Group's CSR approach and constitute its roadmap in these areas.

Actions to maintain or revise the CSR roadmap are initiated by members of the Executive Committee, depending on their area of responsibility.

**Commitments in respect of strategic CSR issues are shown in the table below. These commitments are monitored by the Group's Executive Committee and are presented to the Supervisory Board.**

THE GROUP'S AMBITIONS FOR STRATEGIC CSR ISSUES BY 2035

MACRO-RISKS	STRATEGIC CSR ISSUES	AMBITIONS 2035
<b>Climate change</b> 	<b>Vehicle CO<sub>2</sub> emissions</b> Organiser: Executive Vice-President, Programmes	Reduce average CO <sub>2</sub> emissions of vehicles sold worldwide by 55% compared with 2012 levels, to be achieved with: <ul style="list-style-type: none"> <li>• a plug-in hybrid petrol-electric powertrain;</li> <li>• a new range of electric vehicles;</li> <li>• a range of high-performance engines and lighter vehicle platforms.</li> </ul>
<b>Health and safety: growing demand of civil society</b> 	<b>Vehicle impact on air quality</b> Organiser: Head of Research and Development	Based on its technological offer and especially its line of vehicles to be 100% electrified by 2025: <ul style="list-style-type: none"> <li>• achieve more than 50% of Group sales with electric, fuel cells and hybrid vehicles with an emission-free mode;</li> <li>• deploy state-of-the-art after-treatment systems for internal combustion vehicles in all countries where the Group operates.</li> </ul>
	<b>Vehicle safety</b> Organiser: Head of Quality and Engineering	Offer vehicles fitted with state-of-the-art protection: <ul style="list-style-type: none"> <li>• to customers and all road users, especially in autonomous driving mode, with 80% of vehicles offering automatic driving features from 2030 (reduction in the number of reported physical injuries involving a Groupe PSA vehicle);</li> <li>• to customers' property by controlling the inviolability of the vehicles (90% of models with the highest Thatcham rating);</li> <li>• for vehicle/customer data and the vehicle itself against cyberattacks (all hardware protected against cyberattacks/all alerts processed).</li> </ul>
<b>Customers' expectations and market risks</b> 	<b>Vehicle/service quality - customer satisfaction</b> Organiser: Head of Quality and Engineering	To be customers' preferred car manufacturer and mobility provider: <ul style="list-style-type: none"> <li>• satisfy each and every customer by offering them the mobility solutions that meet their expectations, around the world and for all usages (product's global satisfaction rate in comparison with the TOP3);</li> <li>• contribute, with the best level of reliability of the mobility objects, to maximise vehicles' resale value and minimise repair costs (warranty claim rates at 0 at the three-month mark, and warranty costs cut by a quarter in relation to the Push to Pass benchmark);</li> <li>• provide the same level of excellent service to all customers anywhere, anytime (recommendation rate).</li> </ul>
	<b>Development of new mobility solutions</b> Organiser: Head of Mobility Services	Free2Move, the new mobility brand from Groupe PSA, will be customers' preferred mobility services provider with intermediate targets for 2021: <ul style="list-style-type: none"> <li>• continue profitable growth to achieve a turnover of €400 million.</li> <li>• reach 2,000,000 active B2C customers.</li> </ul>
<b>Human capital</b> 	<b>Management of company's transformations and social dialogue</b> Organiser: Head of Human Resources	Engage in agile co-construction for the Company's future with employee representatives and unions to: <ul style="list-style-type: none"> <li>• enable rapid technological and economic changes;</li> <li>• promote the professional development of employees and their employability;</li> <li>• allow all employees to be covered by a collective bargaining agreement or company agreement.</li> <li>• conduct this dialogue within the Global Framework Agreement, which notably ensures respect for human rights.</li> </ul>

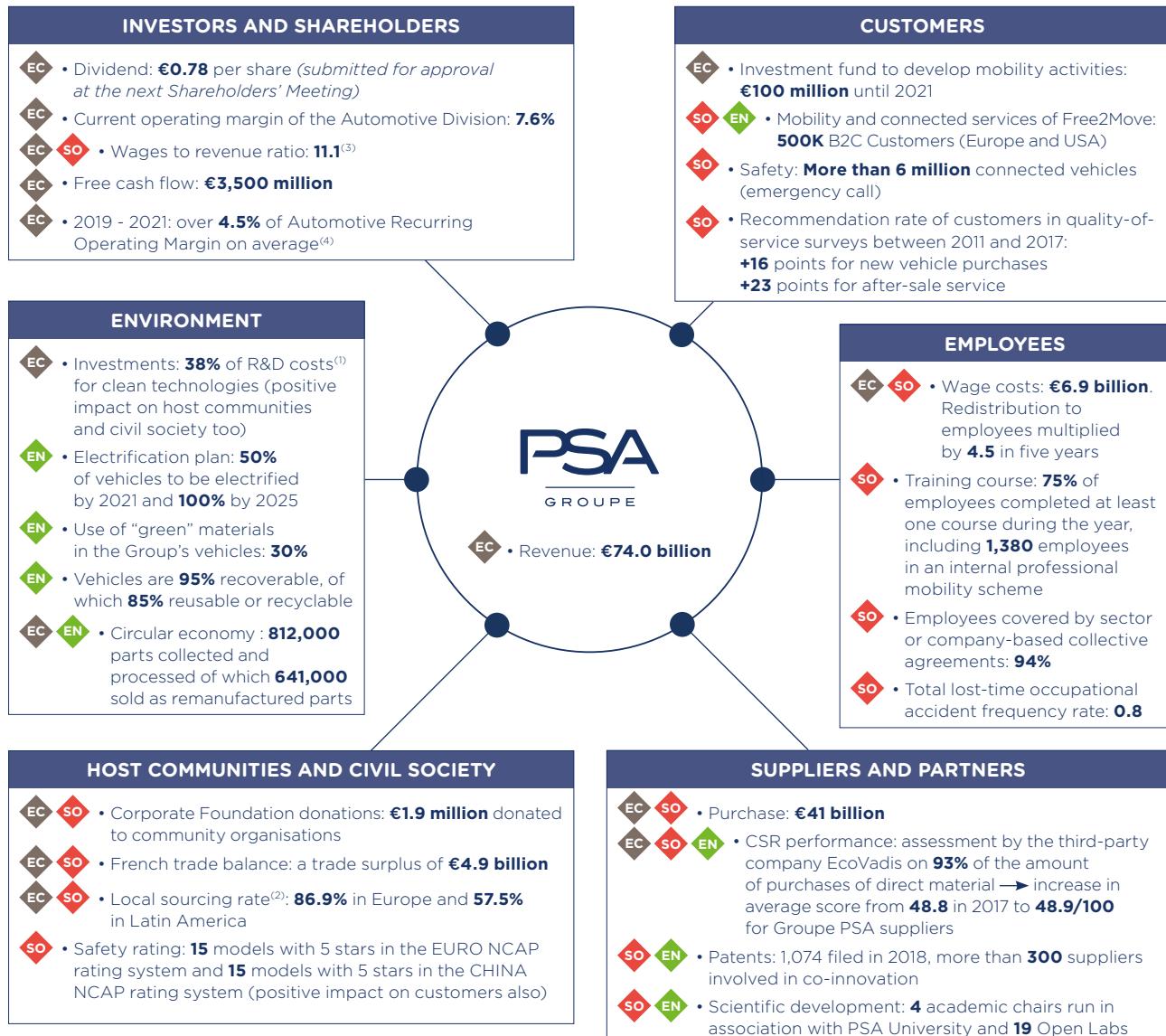
### 1.3.3. Tangible results for Groupe PSA stakeholders

GRI.201-1

GRI.203-2

Non-financial performance boosts financial performance and allows the Group to create value for the stakeholders who support it in the deployment of its strategy over the medium and long-term.

#### DISTRIBUTION OF VALUE CREATED IN 2018



Economic and financial value



Social value



Environmental value

(1) Total R&D costs: €3.9B (Automotive Division and Faurecia).

(2) Purchase of parts manufactured in the region for local production.

(3) Automotive Division excluding own dealer network.

(4) Automotive Division (PCDOV) recurring operating income related to revenue.

### 1.3.3.1. Value created for its long-term investors

Groupe PSA priority is to secure its long-term financial performance.

The Group's strategic plan Push to Pass, unveiled in 2016, sets targets for its profitable organic growth. The operating target for the period of 2019 – 2021 was updated when the 2018 annual results were announced: to deliver an Automotive Recurring Operating Margin\* of over 4.5% on average in 2019-2021.

The Group is pursuing its financial performance targets through sustainable business management. For its investors, it is intrinsically linked to:

- **long-term performance**, as recognised by credit rating agencies. In November 2018, the rating agency Fitch upgraded Groupe PSA to BBB-/outlook stable and in December 2018, Standard & Poor's (S&P) assigned Groupe PSA a rating of BBB-/outlook stable.

This performance is essentially based on:

- **a stable and balanced capital structure that supports the rollout of strategic projects**,
- **a robust strategic plan designed to meet the mobility needs of all of the Group's customers**. The Push to Pass plan has set clear targets for operational excellence and profitable organic growth. This plan is essentially based on,
  - > an unprecedented product offensive based on the deployment of the "core model" strategy and "core technologies" strategy,
  - > international expansion of the Group's activities,
  - > the development of offers and services in response to the new mobility needs of the Group's customers in areas such as used vehicles, leasing, after-sales service and shared mobility,
- **rigorous execution**: with its 2018 financial results, the Group once again confirmed its ability to sustain its performance for the fifth consecutive year. In 2018, the Group reported,
  - > a Group recurring operating margin which stood at 7.7%, up 1.3 points compared to 2017,
  - > a 6.8% growth in volumes to 3.88 million vehicles in 2018,
  - > a net financial position of manufacturing and sales companies of €9,089 million, compared to €6,194 million as at 31 December 2017,

- **a proven ability to form partnerships with responsible and innovative companies, including startups**: firms that are committed to tackling climate change are backed by investors who support initiatives for a low-carbon economy (e.g. the 2014 Global Investor Statement on Climate Change, or the TCFD guidelines on a three-year agenda starting in August 2018),
- **an Internal Audit and risk management framework** which includes ESG (environmental, social and governance) risks, so as to reduce uncertainty in the long-term and capitalise on opportunities. In February 2018, Institutional Shareholder Services Inc. (ISS) published Groupe PSA Environmental & Social QualityScore; Environment = 1, Social/Societal = 2 (scale: 1 = low risk, 10 = high risk),
- **a robust compliance and ethics system**, supported by an Ethics Committee and five Compliance Officers, ensures that compliance programmes are effective in the most vital areas (competition; anti-corruption; export control; data privacy; type approval). The system accompanied is in the day-to-day working environment by a network of trained officers responsible for implementing these programmes and monitoring their application. Under the aegis of the Group Code of Ethics, rolled out and signed globally, this system fosters a culture of integrity within Groupe PSA and prevents ethical abuses liable to damage the Group's financial position and reputation;

- **a performance shared equally among all stakeholders** through:

- **transparent and effective decision-making processes**: to deploy its strategic plans over the long-term, the Group long ago opted for a two-tier governance structure. This consists of an Executive Committee and a Supervisory Board whose members are chosen for their complementary experience and skills, particularly in risk assessment and CSR.



In October 2018, the 15<sup>th</sup> edition of the Grand Prix of Corporate Governance organised by AGEFI (*Agence économique et financière*) awarded Groupe PSA the "Governance Dynamics" award, as its governance model is recognised as a model of transparency and effective compliance.

\* Recurring operating income related to revenue for PCDOV Automotive Division.

- **taking into account the interests of stakeholders in strategic or operational decisions:** there is no special CSR body; instead, responsibility is exercised within all management or executive functions within the Company. Making CSR central to decisions and actions can significantly boost performance. It allows the Group to improve its economic and financial efficiency (reducing costs, driving innovation, creating new revenue streams, etc.), safeguard the value of its assets, manage risks more effectively – whether they are environmental, legal, financial, social or reputational – and protect its value and sustainability in the medium to long-term,
- **a compensation policy for corporate officers** and members of the Managing Board **based on performance and a long-term view of the Company**, subject to the approval of the Shareholders' Meeting,
- **the protection of shareholders' rights, including the views of minority shareholders.** Shareholders who meet the legal and regulatory requirements may apply to have specific items or draft resolutions added to the agenda by submitting them to the Company's registered office, as described in the Notice of Meeting. All draft resolutions are published on the Group's website. Electronic online voting has been in place since the 2016 Shareholders' General Meeting,

- **guaranteed fair access to information to allow informed decision-making:** for Groupe PSA, exercising its responsibility towards its investors and shareholders means guaranteeing them access to key information so they can make fully-informed decisions. Firstly, the fairness of the financial and non-financial data published is certified by third-party auditors. Secondly, the Group is fair and transparent in providing the strategic plan (presentation of the Push to Pass plan which has been published on the Group's website), financial data and CSR commitments and performance to all relevant parties, which show that the long-term risks have been properly considered.



In 2018, in order to present standardised CSR information for a better comparison between companies of the automotive sector, Groupe PSA has implemented SASB Transportation standard and is the first carmaker that has committed to implement the recommendations of the Task Force on Climate-related Financial Disclosures: <https://www.fsb-tcfd.org/tcfd-supporters>.

- **a sustainable dividend policy:** in February 2019, Groupe PSA announced a new dividend policy for 2019-2021 with a payout ratio increased to 28%, starting in 2020 with the dividends paid on 2019 net results. The dividend policy protects the Group's innovation potential and takes the expectations of customers for new products, new technologies and new services into account, while pursuing the Group's international expansion. In 2018, a dividend of €0.78 per share will be submitted for approval at the Shareholders' General Meeting.

## CREATING SHARED AND LASTING VALUE

Transparency and CSR commitment: tangible results for the Group and its stakeholders

The Group has demonstrated its sustainability by being included in various specialised socially responsible investment indices. The ESG Group's performance as scored by non-financial ratings agencies is presented in the table below.

Index	Rating agency	Latest evaluation of Groupe PSA
	<b>FTSE RUSSELL:</b> The FTSE4Good index is designed to measure the performance of companies with solid ESG practices.	Groupe PSA remains <b>listed in the FTSE4Good index</b> (in the "Automobiles & Parts" category).
	<b>VIGEO-EIRIS:</b> The Vigeo-Eiris indices group together companies with the best ESG ratings. It includes four indices: Vigeo World 120 (the 120 most advanced companies in the world); Vigeo Eurozone 120 (the 120 most advanced companies in the eurozone); Vigeo Europe 120 (the 120 most advanced companies in Europe); Vigeo France 20 (the 20 most advanced companies in France).	Groupe PSA remains <b>listed in the four indices World 120, Eurozone 120, Europe 120 and France 20</b> . Groupe PSA was the <b>only car manufacturer in the Vigeo World 120</b> in December 2018.
<u>Low Carbon Europe 100</u>	<b>CARBONE 4:</b> Carbone 4's unique methodology identifies the businesses that make a positive contribution to climate transition, not only through their operational performance but through the products sold to their customers as well. The selection of companies in the index also takes into account emissions avoided through their innovative products and services.	Groupe PSA remains <b>listed in the Low Carbon Europe 100 index</b> .
	<b>CARBON DISCLOSURE PROJECT:</b> The CDP assigns companies a rating for their action on climate change based on a publicly-disclosed methodology updated each year.	Groupe PSA was highlighted as a global leader on corporate climate action and awarded <b>member of the "CDP Climate Change A List"</b> . With its public answers to the CDP questionnaire, the Group also meets the criteria of the Task Force on Climate-related Financial Disclosures (TCFD).
	<b>FORUM ETHIBEL/VIGEO:</b> To compile the Ethibel Sustainability Index (ESI) Excellence Europe, Forum Ethibel uses analyses carried out by Vigeo to select companies from the Russell Global Index at the forefront of CSR in their industry.	Groupe PSA was confirmed as a <b>constituent of the Ethibel Sustainability Index (ESI) Excellence Europe</b> .
	<b>ROBECOSAM/STANDARD &amp; POOR'S:</b> RobecoSAM and S&P jointly compile the Dow Jones Sustainability Index (DJSI) for the New York Stock Exchange. This index selects the top 10% of the most successful companies in each sector on the basis of economic, environmental and social criteria.	Groupe PSA remains <b>listed in the DJSI World, keeping its leading position for the automotive industry</b> for the second year in a row.
	<b>SUSTAINALYTICS:</b> The STOXX Global ESG index includes a representative sample of leading global companies in terms of environmental, social and governance criteria. It is made up of the following sub-indices: STOXX Global ESG Environmental Leaders, STOXX Global ESG Social Leaders and STOXX Global ESG Governance Leaders.	Groupe PSA remains <b>listed in the STOXX Global ESG Leaders index</b> .
	<b>OEKOM RESEARCH:</b> This is a German sustainable development rating agency that awards Prime status to those companies that, according to the Oekom corporate rating, are among the leaders in their industry and that meet industry-specific minimum requirements.	Groupe PSA was awarded <b>Prime status</b> in the rating compiled by ISS Oekom, making it <b>co-leader of the automotive industry</b> .

Lastly, in accordance with its **United Nations Global Compact** commitments, the Group reports on improvements made during the year with respect to each of the Global Compact's ten principles. This year, the Group's 2018 CSR report was awarded **Advanced** level, which is the highest assessment for the Global Compact.

### 1.3.3.2. Value created for customers

Groupe PSA CSR policy makes customers central to the Company's processes. It offers them:

#### A RELATIONSHIP OF TRUST BUILT ON TRANSPARENCY

In order to provide its customers with the best information, Groupe PSA announced a **unique initiative in November 2015**: customers were granted access to an **independent and certified measurement of their real-world fuel consumption**.

It has **joined forces with two NGOs** – Transport & Environment (a European environmental association dedicated to the development of a sustainable transport policy) and France Nature Environnement (French federation of associations for the protection of nature and the environment). Together, they have developed a measurement protocol that has been certified by Bureau Veritas.

Groupe PSA is committed to **being transparent with its customers**, who can find these measurements on the PEUGEOT, CITROËN and DS AUTOMOBILES brand websites.

Following its commitment, Groupe PSA extended this initiative to measure NO<sub>x</sub> and particulate emissions. In early March 2018, Groupe PSA published the first results of these tests. This new step contributes to **increasing the reliability of automotive tests and measurements**.



#### A PERSONALISED CUSTOMER/BRAND RELATIONSHIP

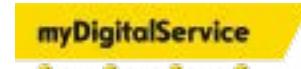
Each brand defines actions to provide a **unique experience** for its customers, based on:

- **connection**: the ambition of the PEUGEOT brand is to be ranked as the top mainstream brand, offering a best-in-class customer experience with 700,000 connected customers in 2021. PEUGEOT is recognised for its efforts in **digitalising the customer after-sales experience**, with specific reference to the online appointment facility through the MyPEUGEOT app;
- **transparency and sharing**: the CITROËN brand has set its sights on being one of the most recommended brands by customers. With **CITROËN ADVISOR**, it gives them the opportunity to share their customer experience. By striving for **complete transparency towards customers**, this system is certified by the French standards association AFNOR for its built-in guarantee of reliability and full disclosure of posted comments. Since the launch of CITROËN ADVISOR, the brand was rated 4.8 stars by more than 260,000 reviews from 38 countries;
- **simplicity**: the DS AUTOMOBILES brand is rolling out ONLY YOU, the DS customer experience programme which includes DS AT YOUR SERVICE, a customer contact platform and a unique phone number, allowing customers or prospects to **easily** find answers **for all types of DS queries**. Already available in 12 countries in Europe, South America and Asia, DS AT YOUR SERVICE will be rolled out in 2019 in the rest of the world;
- **approachability and excitement**: OPEL's mission is to be like a true German friend, and VAUXHALL's mission is to be confidently British, both in offering the best products and services to their customers in **an approachable way**. OPEL and VAUXHALL brands have launched the MYDIGITALSERVICE programme, which allows customers to receive live status updates from dealer workshops, including videos of any services due on their vehicles and approving these services via their smartphones.

### MYPEUGEOT



### ONLYYOU



#### EASY AND SHARED MOBILITY

With its Free2Move brand, the Group has pooled all of its mobility services to **facilitate customer mobility**.

For end customers:

- **simplicity**: transport solutions in the city available through **one single app**;
- **easy urban rides**: car-sharing services available in **5 major cities in Europe, China and the USA**;
- **practicality**: a growing trip partner for **consolidated payment** of parking, tolls and valet parking services.

For corporate customers:

- **efficiency and easy monitoring**: **optimisation solutions** for fleet managers and employees' mobility;
- **à la carte service**: long-term leasing solutions with **a complete range of services**.

### FREE2MOVE

Recommendation rate of customers in quality-of-service surveys between 2011 and 2018:

- **+16 points** for new vehicle purchases;
- **+23 points** for after-sales service (PCD scope);
- **15 five-star models** rated by EURO NCAP;
- **15 five-star models** rated by China NCAP.
- **E-call** (emergency call system): Groupe PSA has **4.8 million connected vehicles**, helping to improve road safety.



#### TRAVELLING IN VEHICLES IN LINE WITH THE HIGHEST QUALITY AND SAFETY STANDARDS IN ALL MARKETS

Groupe PSA products are designed to meet customers' requirements on quality and safety which cannot be addressed separately given the long lifespan of vehicles:

- **long-lasting quality**: reliability, durability, ability to repair (availability of spare parts), comfort and preserved aspect are major **criteria closely monitored** in the development process of any new vehicle;
- **safety for all**: safety of each individual road user has always been the top priority for Groupe PSA. The focus is on technologies with a proven ability to make cars safer (including intrusion prevention and cyber security threats) at an affordable cost for the largest number of users. Safety devices (i) prevent accidents, (ii) protect people in the event of an accident, (iii) alert the emergency services and provide assistance.

**The Group's vehicles are ranked among the best on the market.**

In September 2018, Groupe PSA won the 2019 **International Van of the Year** (IVOTY) Award for their PEUGEOT Partner, CITROËN Berlingo, OPEL Combo and VAUXHALL Combo vans based on their **technological advancements which help the driver**. The overload alert system is recognised as a great initiative to **enhance safety**.

# CREATING SHARED AND LASTING VALUE

Transparency and CSR commitment: tangible results for the Group and its stakeholders

## SPARE PARTS FOR ALL BUDGETS IN A CIRCULAR ECONOMY MINDSET

### Groupe PSA spare parts service is available for all market segments.

New vehicle owners tend to purchase brand-new parts produced by car manufacturers. For customers with older vehicles of all brands, the Group now offers a service which is unprecedented for a car manufacturer, which is based on the Eurorepar range and equipment manufacturer parts.

As part of its involvement in the circular economy, Groupe PSA offers re-used parts coming from dismantlers, a full range of remanufactured parts ("Echange Standard") and a "repair and return" service for automatic gearboxes and complex electronic components. This large range covers 55% of vehicle content and allows cost savings for customers up to 50% compared to equivalent original parts.

Customers can also buy low-cost basic parts from the Bölk range (Bottom of Pyramid offer) on the Mister Auto website.

**This range of offers allows the Group to meet the needs of all of its customers, regardless of budget.**

## SPARE PARTS VERIFIED TO BOOST SAFETY

Due to their strong visual resemblance to branded parts, customers might be misled by counterfeit parts. The poor quality of counterfeit parts can endanger consumer safety. In the automotive field in particular, counterfeit products do not offer guarantees in terms of safety, environmental protection or regulatory requirements. In order to allow customers, after-market and customs networks to **authenticate genuine parts**, the various brands of Groupe PSA (PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL, VAUXHALL and EUOREPAR) use a **secure label** placed on the spare parts packaging.

## ASSURANCE FOR BUSINESS CLIENTS EAGER TO HIGHLIGHT THEIR OWN COMMITMENT TO RESPONSIBLE PURCHASING

EcoVadis, an independent rating agency that specialises in responsible purchasing, has annually awarded Groupe PSA the **gold medal** as a **responsible supplier** since 2014. Score in 2018 was 77/100. Groupe PSA belongs to the select 2% of companies that are rated **CSR Advanced**. Groupe PSA business clients can therefore demonstrate their own commitment to responsible purchasing.

Type of client	CHANNELS	
	Authorised and independent repairers	e-commerce
Reinsurance	• Groupe PSA original parts	
Smart buy	• Eurorepar parts • Suppliers' parts • Remanufactured PSA original parts	• Suppliers' parts
Best cost	• Re-used parts	• BÖLK parts

As part of the World Anti-Counterfeiting Day on 7 June 2017, the Global Anti-Counterfeiting Network awarded Groupe PSA the **Best Technology Award**, in recognition of the Group's innovative customer protection technologies.



## ABILITY TO ENGAGE IN ENERGY TRANSITION WITH AFFORDABLE AND DESIRABLE MOBILITY DEVICES

**Electric vehicles**, such as the DS 3 Crossback e-tense that is produced on the Group's new multi-energy platform (eCMP), **have an overall cost (TCO) similar to an internal combustion engine and do not compromise on the ease of use**.

In addition, the Group wants to promote enjoyable mobility. In December 2018, **the PEUGEOT e-LEGEND Concept was recognised by the Auto-Moto Innovation jury** and was presented with:

- the "Concept car of the year" award as a connected, autonomous and electric coupé with an **attractive design**.
- the "Media Campaign" award for the advertising film #unboringthefuture, which conveys the brand's **optimistic vision of the future**.



## FAIR TOTAL COST OF OWNERSHIP (TCO)

Positive impact on insurance costs: in June 2018, the **PEUGEOT 3008** was elected the **"Best SUV"** at the **MAAF Auto environment awards** (most compliant with environmental standards) which allowed MAAF policyholders to receive a bonus of €100 on their first insurance premium.

**Best solution at the best price:** in December 2018, the Autobest panel of 31 specialist journalists recognised the new generation of Groupe PSA Leisure Activity Vehicles (CITROËN Berlingo, OPEL Combo Life and PEUGEOT Rifter) as the **"Best Buy Car of Europe"**. This award recognises the vehicle models with the **best price/performance/equipment ratio**, based on 13 criteria o/w value for money, design, comfort, technology, service quality, spare part availability through dealership networks, etc.

Cost monitoring of company's fleet:

- **Free2Move Connect Fleet** enables fleet managers to optimise their fleet maintenance and the use of the vehicles thanks to the monitoring of real-life consumption, hours of use, GPS tracking and mileage. An eco-driving module gives drivers personalised recommendations to reduce CO<sub>2</sub> emissions. Free2Move Connect Fleet **helps reduce the TCO of fleet vehicles by 5%**.
- **Free2Move Fleet Sharing** allows employees to reserve their vehicles from their company fleet online. This solution allows companies to **reduce mobility costs by up to 25%** through the optimised use of vehicles, lower taxi/public transport costs and additional revenue from the private use of the vehicles.



**FREE2MOVE**  
CONNECT FLEET FLEETSHARING



**Stable residual value:** in June 2018, the independent market observers Schwacke and car magazine Auto Bild commended the vehicles with the **most stable value** in Germany. The OPEL Zafira won the title in the compact van category for the second time in a row. With a **residual value of 53.61% after four years and 80,000 kilometres**, the OPEL Zafira again takes the top spot in the Schwacke forecast. The flexible OPEL van is a regular contender for the recognition of value stability: the model range has now won the coveted prize for the fifth time.

### 1.3.3.3. Value created for employees

Groupe PSA has adopted a business strategy based on an organic, profitable and sustainable growth plan, Push to Pass. In order to capitalise on all development opportunities, the Group's employees are major players in its strategic plan. Together with employee representatives and the unions, the Group is fostering a culture in which everyone works together to build the future, and where teams can compete to demonstrate and develop their talent.

The Group's Corporate Social Responsibility approach, as demonstrated by the Global Framework Agreement, allows the Group's employees to:

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#### DEVELOP IN A CULTURE WHERE SOLUTIONS ARE DESIGNED COLLABORATIVELY

In October 2018, the 15<sup>th</sup> edition of the Grand Prix of Corporate Governance organised by AGEFI rewarded Groupe PSA with the "Fonctionnement des organes sociaux" award, as its model of social dialogue allows the Group to implement **agile and responsible solutions to adapt the Company as needed and protect employees**.



**94%** of employees are covered by collective agreements.

#### TAKE OWNERSHIP OF THEIR CAREER BY DEVELOPING THEIR SKILLS

**Personal Development Plans** provide each staff member with the opportunity to boost and diversify their skills, including training with a wide range of teaching materials in addition to professional mobility, with priority given to internal mobility.

In 2018, **88%** of PCD employees had an **annual appraisal**.

75% of employees completed at least one training course during the year.

In 2018, **1,380** employees took part in the Group's "Top Compétences" **internal retraining programme**.

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#### WORK IN AN ENVIRONMENT THAT PROMOTES HEALTH AND WELL-BEING

- Groupe PSA is **one of the industry leaders in workplace health and safety**. The Workplace Health and Safety Management System (WHSMS), which is implemented worldwide, closely monitors risk prevention.
- Groupe PSA goes even further: it has committed to the "Healthy Workplaces" approach promoted by the European Union and the European Agency for Safety and Health at Work. <https://www.healthy-workplaces.eu/en/campaign-partners/psa-groupe>.
- For Groupe PSA, **developing and attracting talent** means rethinking the workplace relationship due to the possibilities created by new technology. **Remote working helps** to ensure a work/life balance and improves working conditions. A policy for **working from home** offers employees unprecedented flexibility.

In 2018, Groupe PSA maintained its leadership position regarding safety: for the first time, the Group achieved a worldwide lost-time **accident frequency rate of 0.8 points**.

Groupe PSA is also involved in the 2018-2019 "Healthy Workplaces Manage Dangerous Substances" campaign.

On 26 April 2017, Groupe PSA was awarded the **Healthy Workplaces Good Practices Award** for actions taken in the workplace that help promote individual and collective health. **4,768 employees** worldwide have already benefitted from **remote working**. In France, employees are allowed to work from home for 25 days a year.

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#### SHOWCASE THEIR TALENTS IN AN INCLUSIVE ENVIRONMENT

- The Group promotes diversity and actively combats discrimination in its recruitment, talent management and compensation policy. It enforces its gender equality policy worldwide. Groupe PSA adheres to the **Women's Empowerment Principles**, an initiative by the UN and UN Women which encourages companies to take action to promote diversity and gender equality. It was the first company to receive "**Professional equality**" certification in 2005, and this label was renewed in December 2017. Since 2009, the Group has been certified under France's **Diversity label**, which recognises good human resources practices to promote diversity and equal opportunity and to prevent discrimination. This label was renewed in February 2018.
- The "youth employment" policy seeks to integrate **apprentices and trainees on work-study placements**.
- Keeping **older employees in work and motivated** is one of the Corporate Social Responsibility commitments.
- The Group is also committed to **hiring and retaining employees with disabilities**.



**2,904 trainees** on work-study placements (including apprentices) in 2018.

**37.3%** of the Group's workforce are **older employees**.

The Group has **6,405 employees with disabilities** worldwide.

### 1.3.3.4. Value created for its suppliers and partners

Groupe PSA is implementing a responsible procurement policy which includes a third-party assessment (by Ecovadis) of its suppliers based on CSR criteria.

Although this policy allows the Group to secure its supply chains, it also boosts performance for suppliers, who are called on to introduce CSR policies within their own organisation as well as with their supply and subcontracting chains.

The responsible purchasing policy, which Groupe PSA requires its suppliers to sign, serves to:

#### BOOST INNOVATION

The Group involves its core and strategic suppliers in a **disruptive innovation process**, which is essential in order to meet commitments on reducing CO<sub>2</sub> emissions, air quality, the autonomous vehicle, etc. at a cost acceptable to customers.

**1,074 patents** filed by the Group in France in 2018 (Vs 1,021 in 2017 and 930 in 2016).

The Group works with **more than 300 suppliers** on **joint innovation** projects to develop future technologies.

#### BOOST EFFICIENCY

The CSR commitments that the Group asks its suppliers to take enables them to **reduce their own operational risks**. Suppliers are well-informed of best practices and regulatory changes, and can therefore benchmark themselves by comparing their CSR performance against the industry average, build on their strengths and implement action plans to work on any weaknesses. Groupe PSA monitors the progress of the action plans required from suppliers. If necessary, it can help them find **solutions to improve their product quality or optimise their processes using Monozukuri methodology**.

**64 Monozukuri coordinators** worldwide, with more than **350 suppliers** involved.

#### BOOST ECONOMIC PERFORMANCE

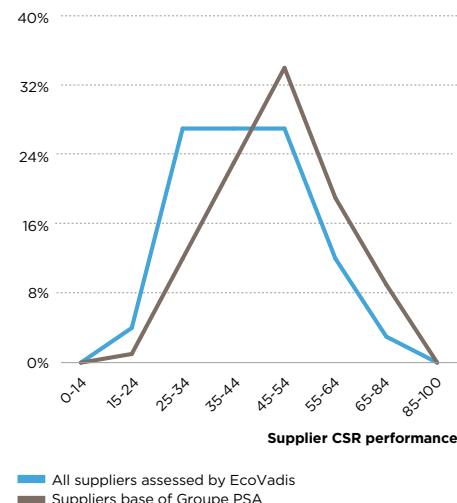
In view of the demanding supplier selection process, being a strategic or core supplier of Groupe PSA demonstrates a high-level of economic and CSR performance. Through innovation partnerships with Groupe PSA, suppliers are developing a **competitive edge** in state-of-the-art technical expertise. This distinguishes them from their competitors when bidding for contracts in other markets. They can create **commercial opportunities** with customers who, like Groupe PSA, regard CSR criteria as a key aspect of the supplier selection and listing process. The Group's suppliers can communicate their own CSR commitment and performance (Ecovadis score) to their customers and/or host regions. Similarly, in being chosen to support Groupe PSA on international projects, companies are boosting their prospects by increasing their **visibility in new markets**.

Morocco's 27 new plants are boosting its automotive industry's ecosystem. **13 of these projects form part of the Group's ecosystem**, which is driving development for the sector as a whole and is helping to create an Industrial Division known for its excellence in Kenitra.

The Group's **responsible purchasing approach** has proven useful in making its suppliers part of a **positive trend**: their CSR performance is above average compared with other companies assessed by Ecovadis (48.18 for Groupe PSA suppliers vs 42.2 for Ecovadis assessment average).

Breakdown of CSR assessments of Groupe PSA suppliers compared with all suppliers assessed by EcoVadis:

Supplier distribution



### 1.3.3.5. Value created for host communities and civil society

#### CONCRETE ACTIONS IN THE SOCIAL AND SOLIDARITY ECONOMY

The PSA Foundation supports community organisations that are active in rural communities or in outlying urban areas, working alongside social agencies and local authorities to put in place socially responsible mobility solutions, mainly in aid of people referred by social services. The goal is to remove mobility obstacles for unemployed people and help them to receive training or find a new job. For example, the Foundation supports social garages, which help welfare recipients to repair, rent or buy cars cheaply. The garages – most of which are social enterprises – can also help the long-term unemployed get back into work.

The Group is also the number-one buyer from companies that only employ people with disabilities in France, and has expanded its operations in Spain.

#### AN ACTIVE CONTRIBUTION TO ROAD SAFETY, BOTH NOW AND IN THE FUTURE

Groupe PSA has played a pioneering role and remains the European leader in post-accident or tertiary safety, attenuating the effects of an accident by facilitating emergency rescue. In anticipation of the new European regulation that came in force in March 2018, the Group has been the first mainstream car manufacturer to have deployed a wide-scale, location-aware emergency call system without a subscription or any cut-off date. The emergency call system is particularly useful when accidents occur in isolated areas with no eyewitnesses. Motorway control centres in France are now automatically warned of any accidents on their roads with the e-call service introduced on PEUGEOT, CITROËN, DS AUTOMOBILES and OPEL vehicles. Drivers can also use the e-call in their vehicles to alert the emergency services if they witness an accident. Messages can then be displayed on motorway signs to warn other drivers of the potential dangers they may encounter.

As a testament to its technological accomplishments, in July 2015 the Group became the first car manufacturer to receive the required authorisations to test its autonomous prototypes on the open road. The cars adjusted their speed and overtaking based on other vehicles, posted speed limits and infrastructure.

#### PUBLIC PLEDGES TO SUPPORT THE ECONOMIC AND SCIENTIFIC DEVELOPMENT OF HOST COMMUNITIES

##### Direct and indirect job creation

The Group's strategic plan Push to Pass reaffirmed the Group's ambitions to open manufacturing plants in its key markets. The Group has made a public pledge to achieve high local sourcing rates in the regions concerned, which involves suppliers setting up production facilities close to the Group's industrial sites. The Group's direct and indirect job creation brings value to the host communities.

A trendsetting partnership was created between Groupe PSA and a number of temporary employment agencies to increase the use of temporary permanent work contracts. Permanent employment contracts guarantee permanent employability within Groupe PSA as well as in the employment region through regional mobility platforms.

##### Consolidation of the automotive business in France

The Group is taking action in two key areas:

- strengthening the competitiveness of its own production plants to ensure their sustainability: removing sources of non-value inherited from previous configurations; more compact sites to reduce fixed costs; rethinking processes to save energy and water; implementing a make-or-buy decision-making process which takes all factors into account; including the impact on logistics;
- the Group is involved in revitalising the automotive industry in France, either through actions carried out on its own initiative (including an Open Innovation Plan for SMEs involved in the initial exploratory phases of specific programmes), or by participating in the work of the French government's automotive industry support platform (PFA).

##### Scientific development

The Group acts as a vehicle for scientific development through its Stellab network, which supports the creation of R&D centres, OpenLabs and academic chairs in the same areas. For example, an OpenLab called Sustainable Mobility for Africa has opened in Rabat, Morocco, while another – OpenLabs Human Machine Interface and Accidentology – is located in Shanghai.

Similarly, as part of its Push to Pass plan, the Group conducts joint research as part of a programme coordinated by VEDECOM (the French institute for low-carbon communicating vehicles and their mobility) of which it is one of the founding members. VEDECOM aims to become the leading French technology research institute where it can spearhead the development and use of autonomous connected cars.

##### Support for startups

Groupe PSA created the Business Lab as a response to fast-changing automotive uses. The purpose of this new entity is to identify, experiment with and transform opportunities into new businesses for the Group, particularly with regard to mobility and digital issues. As part of its Venture Development endeavours, the Business Lab, an excellent programme for identifying and transforming new businesses, is signing a partnership agreement with Idinvest Partners, a leader in funding the growth of European companies that holds more than €7 billion in capital, €2 billion of which is dedicated to funding startups.

**598 projects** previously sponsored by the Foundation

€14.5 million donated to community organisations, including €8.5 million for employment schemes and €4.5 million for educational or cultural initiatives. In 2018, the PSA Foundation provided financial support for 11 social garages in France (setting up new garages or developing existing ones). The services bought from companies that only employ people with disabilities have generated €49.8 million in added value for these companies.

E-call (emergency call system): Groupe PSA has 4.8 million connected vehicles, helping to improve road safety.

Groupe PSA autonomous vehicles had already driven 170,000 km on Europe's roads by the end of 2018.

- The Vigo plant in Spain created jobs in Galicia a number of years ago.

- The Kenitra plant in Morocco will help establish a cluster where approximately 20 new suppliers will be based. The aim is to achieve a local sourcing rate of 80%. Once it is fully operational, the future plant is set to provide 4,500 direct jobs and 20,000 indirect jobs, primarily for equipment manufacturers.

- Of the Group's temporary employees, 1000 have a temporary permanent work contract.

- Groupe PSA is France's leading car manufacturer with 1,210,434 vehicles produced in 2018, representing a 6.4% rise on 2017.

- 150 SMEs have already received individual support from the PFA.

- Thanks to its deep manufacturing roots in France, Groupe PSA makes positive contribution to France's trade balance: in 2018, the Company had an import/export surplus of 362,000 vehicles and a trade surplus of €4.9 billion.

- The Group's Stellab network includes 4 academic chairs run in association with PSA University and 19 OpenLabs.



### 1.3.3.6. Value created for the environment

Given the nature of its business and its international presence, Groupe PSA is an economic actor keen to fulfil its environmental responsibilities.

#### TECHNOLOGICAL CHOICES FOR A CONCRETE IMPACT ON CLIMATE CHANGE AND AIR QUALITY

A reduction in the use of fossil fuels: The Group spends **38% of its R&D budget on clean tech:**

- eight plug-in petrol hybrid vehicles will be launched on the market between 2019 and 2021. These will enable emission thresholds of under 50 g/km of CO<sub>2</sub>, i.e. 2 l/100 km in all areas, and will run 50 km in fully electric mode in city and suburban environments (WLTP procedure);
- seven electric vehicles will be launched on the market between 2019 and 2021;
- with average approved CO<sub>2</sub> emissions of 114.1 g/km in 2018, Groupe PSA is, however, still better placed than its competitors, as the market average is 119.5 g/km.

Air quality at the forefront of research and development programmes: As a participant in discussions about the public health and environmental issues that relate to mobility, Groupe PSA has long incorporated concerns about air quality into its R&D programmes. Thanks to this work, the Group has been able to integrate engines and technologies that drastically reduce its particulate and nitrogen oxide emissions into its ranges:

- Groupe PSA invented the diesel particulate filter (DPF) which it began selling in 2000, more than nine years before Euro 5 standards made it compulsory from September 2009;
- Groupe PSA was the first car manufacturer to introduce SCR (Selective Catalytic Reduction) technology in 2013, reducing nitrogen oxide emissions by up to 95%.

The results also reflect the Group's decision to focus on **affordable technological solutions** deployed in mass-produced cars, which is the only way to have a real impact on the environment.

#### COMMITTED TO FURTHERING PUBLIC DEBATE

The **measurement protocol for real-world consumption** developed with Transport & Environment, France Nature Environnement and Bureau Veritas is open source. The Group encourages all car manufacturers to use it so that customers can make informed vehicle purchase decisions.

At end 2013, the Group launched the EB Turbo PureTech Engine, a three-cylinder, 1.2-litre petrol engine that combines reduced dimensions and weight for benefits and performance unprecedented for this level of displacement. In June 2018, this engine won the **2018 Engine of the Year Award** in the 1.1 to 1.4 l category. This is the **4<sup>th</sup> consecutive time** the engine has won the award.

Launched in 2017 on the new PEUGEOT 308, the new generation is now being installed on Groupe PSA vehicles across 100 models in more than 70 countries.

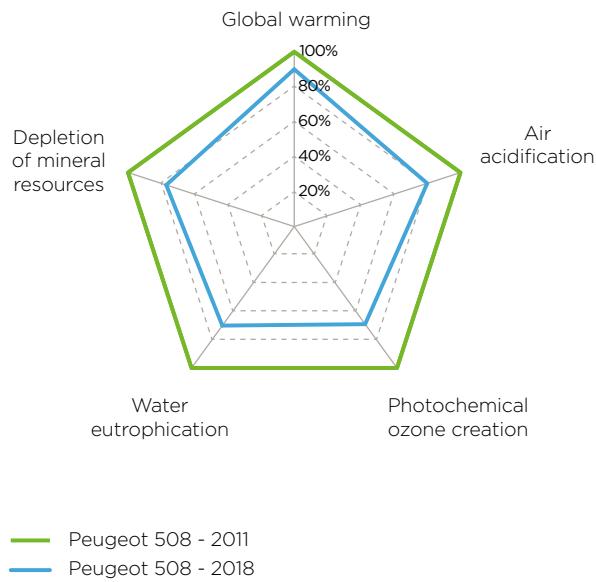
**Open-source** measurement protocol:

<https://media.groupe-psa.com/en/press-releases/group/realworld-fuel-consumption-protocol-publication>

#### TANGIBLE RESULTS FOR THE CIRCULAR ECONOMY AND SUSTAINABLE MANAGEMENT OF MATERIALS

From the vehicle design phase, the Group's teams work tirelessly to ensure that its circular economy commitments are met. Materials are selected for their end-of-life recyclability, and priority is given to green materials. This active policy of influencing the selection of materials also extends to suppliers. Groupe PSA design choices ensure a steady **reduction in the environmental footprint** of its vehicles.

- All Group **vehicles** are **95% recoverable**.
- **Green materials** make up **30%** of the Group's vehicles.
- **Reduction of the environmental footprint** of the new PEUGEOT 508 in 2018, compared with the old version in 2011.



In production, the Group is continually improving its processes to **reduce the amount of waste** and increase recycling.

Similarly, Groupe PSA has rolled out two spare parts offers and one service based on **the circular economy** throughout the life of each vehicle. (i) The "Remanufactured parts" offer launched more than 30 years ago. (ii) The reused parts (a portfolio of more than 380,000 parts coming from dismantlers of end-of-life vehicles). (iii) The "repair and return service" (for automatic gearboxes and complex electronic components).

The Group is also involved in collecting and **processing end-of-life vehicles** from its dealership networks through partnerships with specialist operators.

Groupe PSA has introduced a collection and **recycling** process for **traction batteries** that covers the whole European market.

**A PROACTIVE INITIATIVE FOR CARBON OFFSETTING AND BIODIVERSITY**  
The PEUGEOT brand, in partnership with the France National Forestry Office (ONF), has contributed to the **PEUGEOT-ONF carbon sink project it has sponsored in the Amazon** since 1998. The project involves reforesting vast areas of degraded land and restoring biodiversity, while studying the relationship between reforestation and the absorption of atmospheric carbon dioxide.

#### HIGH-PERFORMANCE PLANTS FOR REDUCED ENVIRONMENTAL IMPACT

The Group's industrial strategy integrates environmental protection with a commitment to **continued improvement** based on rigorous organisation, a methodology structured around the Environmental Management System (ISO 14001 standard), and the allocation of significant financial resources.

- In 20 years, **waste production** per manufactured vehicle has **halved**.
- **100% of metal waste is recycled**.
- **103,313 tonnes of casting sand was regenerated** in 2018.
- 812,000 parts were collected and processed in 2018, 80% of which **641,000 were sold as remanufactured parts**, covering 24 part families.
- Remanufacturing of parts creates a **saving of up to 80% raw material and 50% of energy** compared to a new product.
- More than **1 million end-of-life vehicles were processed** through the Group's dealer networks between 2009 and 2018 in France, equating to nearly 1,156 million tonnes.
- **Traction battery recycling** rate in 2017:
  - **77.4%** for electric vehicle Li-Ion batteries;
  - **84%** for hybrid vehicle Ni-MH batteries.
- An area of **1,800 hectares** of virgin forest with high biodiversity value has been devoted to scientific research since 2009.
- The carbon sink started 20 years ago. **About 700,000 tonnes of CO<sub>2</sub> eq have been sequestered** through biomass and soil
- **2 million trees** reintroduced.
- More than **50 local species planted**.
- **Two new species identified** in 2016, and another two in 2018.

100% of plants with ISO 14001 certification.

## 1.4. GOVERNANCE GEARED TOWARDS SUSTAINABLE GROWTH

[GRI.102-5](#) [GRI.102-10](#) [GRI.102-18](#) [GRI.102-22](#) [GRI.102-23](#) [GRI.102-24](#)

### Managing bodies

Since 1972, Peugeot S.A. has had a two-tier management structure comprising a Managing Board, responsible for strategic and operational management, and a Supervisory Board, responsible for oversight and control.

- The Peugeot S.A. Supervisory Board ensures that the strategy proposed and applied by the Managing Board fits with the Group's long-term vision. It reviews the medium-term strategic plan and the capital expenditure plan as well as the budget as presented by the Managing Board.
- The Supervisory Board, which currently has 14 members, oversees four smaller committees: the Finance and Audit Committee; the Strategic Committee; the Appointments, Compensation and Governance Committee; and the Asia Business Development Committee.

● The Managing Board is appointed by the Supervisory Board and is re-appointed every four years. Members may be removed from office by the Supervisory Board or by the Shareholders' General Meeting, in accordance with French company law.

In accordance with the rules on the separation of functions, the Chairman of the Supervisory Board cannot be a member of the Managing Board. Conversely, the Chairman of the Managing Board cannot be a member of the Supervisory Board.

Chapter 3.1 of the Group's Registration Document provides details of the membership, skills and work of these managing bodies and the committees, together with information on the skills of each of their members.

### PEUGEOT SA ownership structure

The Group's ownership structure as at 31 December 2018 is presented in Chapter 7 of the Registration Document.

#### 1.4.1. CSR in the Group's governance

[GRI.102-20](#) [GRI.102-21](#) [GRI.102-26](#) [GRI.102-27](#) [GRI.102-29](#)

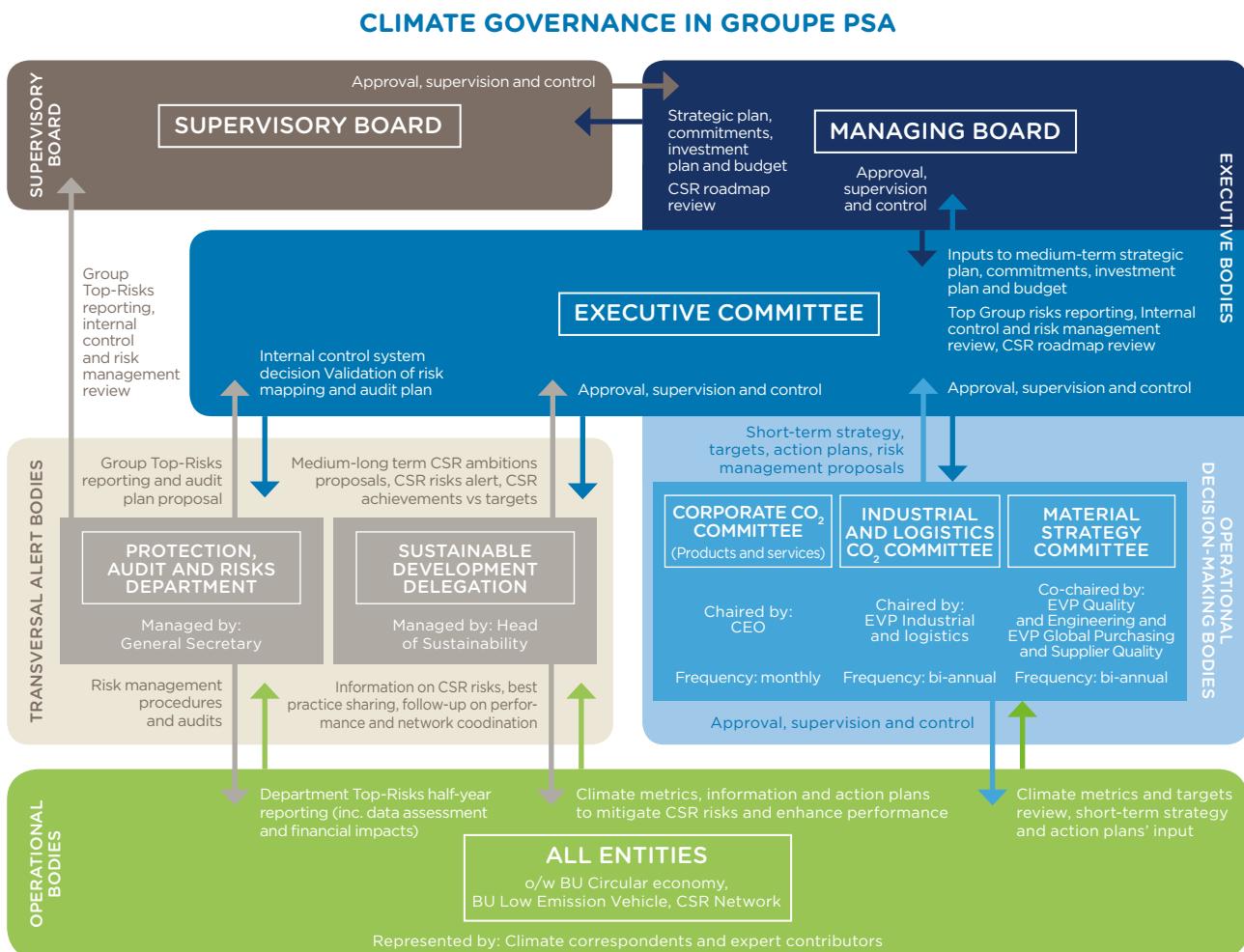
For a company like Groupe PSA, meeting corporate social responsibility commitments is seen as a means to guarantee its own economic sustainability and is achieved by addressing the concerns of its main stakeholders, who are affected by its decisions and actions.

The Group's CSR policy and Management System form an integral part of its strategy, and take into account all societal, social and

environmental issues. Furthermore, the robust CSR reporting processes used by the Group for more than ten years aptly illustrate its strong dedication to transparency in these areas. Over the years, Groupe PSA CSR commitment has become an integral part of its business strategy. Executive Committee members assume direct responsibility with respect to these issues and all operational action plans incorporate CSR criteria.

## Focus on CO<sub>2</sub> governance

Groupe PSA is highly driven by climate change risk. It is important to provide stakeholders with a clear vision of CO<sub>2</sub> governance in Groupe PSA



The monthly CO<sub>2</sub> Corporate Committee summons the Managing Board and Executive Committee to share the forecast of vehicles' CO<sub>2</sub> emission average from 2018 to 2025 in all countries/areas (especially where CAFE/CO<sub>2</sub> regulation exists) and decide action plans (technical enablers, product plan adaptation and strategy) to reach targets. At the operational level, the Strategy and Programmes Division keeps track of the solutions implemented and measures their efficiency based on the proportion of green materials used and CO<sub>2</sub> emissions.

The Industrial and Logistics CO<sub>2</sub> Committee is described in section 5.2.2.3. and the Materials Strategic Committee in section 2.4.1.4.

CO<sub>2</sub> emission levels are part of the variable compensation of the Group's employees and make up to 14% of the variable compensation of the Chairman of the Managing Board. Please refer to chapter 3.2 of the Registration Document.

### 1.4.1.1. CSR in supervisory bodies

GRI.102-25    GRI.102-30    GRI.102-31  
GRI.102-36

The Group's strategic CSR commitments, their implementation and their progress report are presented to the Supervisory Board. Given the importance and scope of CSR issues that, for a car manufacturer, come into play for many of its strategic decisions, there is no single dedicated committee established for the areas of social and environmental responsibility. Each Supervisory Board committee, and where applicable the Board itself depending on the issue involved, handles these issues within its area of expertise.

Some examples:

Governing body	Examples of CSR issues handled
• Supervisory Board	Any topics linked to the strategic Medium-Term Plan, including CSR issues (which comprises climate change risks).
• The Finance and Audit Committee	All high-level CSR issues and risks linked to business ethics and economic consequences.
• The Strategic Committee	Environmental issues, including those relating to climate change and air quality
• The Appointments, Compensation and Governance Committee	Company issues, including issues relating to diversity and corporate governance.

The Supervisory Board's Finance and Audit Committee monitors the efficiency of internal control and risk management systems, reviews risk mapping (including CSR risks), and ensures that these systems are properly developed and managed. The Committee also examines the means used to implement these procedures and the remedial actions applied to correct any material weaknesses or deficiencies identified.

### Skills relating to economic, environmental and social impacts

Members of the Supervisory Board are selected to ensure sufficiently diverse and complementary skills to enable these members to deliver the Company's strategy. Members of the Board and its committees are selected on the basis of a skills matrix (see section 3.1. of the 2018 Registration Document). This seeks to ensure that skills in "finance and risk management", "international experience", "industry", "new business models", "human resources", "social and environmental responsibility" and "governance" are represented on one or more committees.

In 2018, members of the Supervisory Board with specific CSR skills include:

- Louis Gallois, member and Chairman of the Peugeot S.A. Supervisory Board since 2014, is Chairman of the French Federation of Solidarity Actors. He is also a member of the Board of the French National Association of Research and Technology (ANRT), co-chair of the think-tank *La Fabrique de l'Industrie* and Chairman of *Fonds d'Expérimentation Territoires Zéro Chomeur Longue Durée*;
- Geoffroy Roux de Bézieux, a Supervisory Board member since 2007, Vice-Chairman of the Board, and Chairman of the Appointments, Compensation and Governance Committee, is the Delegated Vice-Chairman, Treasurer and Member of the Office of MEDEF Mr de Bezieux will leave the Supervisory Board in April 2019 to be replaced by Mr Gilles Schnepp, whose nomination will be submitted to the General Assembly in April 2019.
- Marie-Hélène PEUGEOT-Roncoroni, a Supervisory Board member, is Vice-Chair of Groupe PSA Foundation;
- Christian Lafaye, Member of the Supervisory Board representing employees, is an administrator of Groupe PSA Foundation;
- Bénédicte Juyaux, Member of the Supervisory Board representing employee shareholders, is a CSR correspondent in charge of vehicle quality and safety in the Company.

### Consultation of stakeholders

#### — EMPLOYEES ARE REPRESENTED ON THE SUPERVISORY BOARD

- A member representing employees sits on the Peugeot S.A. Supervisory Board in accordance with Article 10-1 B of the Company by-laws. This member is appointed by the Groupe PSA European Group Works Council. Please note that

the term of office of Mr Jean-François Kondratuk, the member representing employees since 2014, expired in June 2018. The European Group Works Council met to appoint a new member of the Board representing employees, Christian Lafaye.

- A member representing employee shareholders sits on the Peugeot S.A. Supervisory Board in accordance with Article 10-1 C of the Company by-laws. This member is voted in at the Shareholders' General Meeting from the candidates put forward by the Supervisory Boards of the corporate mutual funds (FCPEs) which hold shares in the Company. Based on the current shareholding status, although Peugeot S.A. is no longer required to have an employee shareholder representative, it wishes employee shareholders to be involved in the Company's governance and has therefore decided to retain this position.
- In many countries, Groupe PSA offers a variety of savings schemes. As at 31 December 2018, employee share ownership was 1.86%, or 50,985 of the Group's current or former employees.

#### — MINORITY SHAREHOLDERS ARE REPRESENTED ON THE SUPERVISORY BOARD

In April 2014, the Supervisory Board appointed a Senior Independent Member from the independent members of the Board, Geoffroy Roux de Bézieux. Since July 2017, Mr Roux de Bézieux has been Vice-Chairman of the Board, with his primary duties being to inform the Chairman of the Supervisory Board of any conflict of interest he has identified that might affect the deliberations of the Board, and to factor in any major governance concerns of shareholders that are not represented on the Supervisory Board and ensure that their concerns are addressed.

In accordance with the law, shareholders may ask the Supervisory Board to include points in the agenda for the Shareholders' General Meeting. All draft resolutions are published on the Group's website. Electronic online voting has been in place since the 2016 Shareholders' General Meeting.

#### — OPINIONS OF OTHER STAKEHOLDERS ARE SENT TO THE SUPERVISORY BOARD

Consultation with stakeholders is delegated to the operating units, which are in contact with them on a daily basis, and to the Sustainable Development Delegation. The strategic proposals submitted for approval to the Group's Executive Committee by these managing bodies, according to their area of responsibility, take into account the expectations and opinions of stakeholders collected through the various opportunities for dialogue described in section 8.2 of the CSR report. These are presented to the Supervisory Board.

### Membership of an under-represented social group

Membership of an under-represented social group is not among the assessment criteria authorised by French law.

#### 1.4.1.2. CSR at the executive body level

GRI.102-19

Progress made on meeting CSR commitments and objectives is reviewed periodically and is approved and monitored by the Group's Executive Committee, which includes the members of the Managing Board.

CSR criteria (o/w CO<sub>2</sub>) are included in the variable compensation of the Chairman of the Managing Board. Please refer to chapter 3.2 of the Group's Registration Document.

The Managing Board delegates a number of powers to carry out CSR-related legal formalities to specific executive managers. For example:

- the Group's Head of Human Resources, who is a member of the Executive Committee, in the context of their powers "ensures compliance with the rules applying to non-discrimination in the workplace", "ensures that the prevention policy and the various regulations relating to health, safety and working conditions are properly applied", "monitors all aspects of collective working relations", etc.;
- all Production centre Directors in France are fully authorised to "ensure compliance with applicable regulations, especially those relating to employment law and health and safety, and environmental law in the industrial domain".

#### 1.4.2. Operational management of CSR

##### Sustainable Development Delegation

The Group's Sustainable Development Delegation was formed in 2003 with a staff of four, and reports directly to the VP of Corporate Communications, who in turn reports to the Chairman of the Managing Board. The role of the Sustainable Development Delegation is:

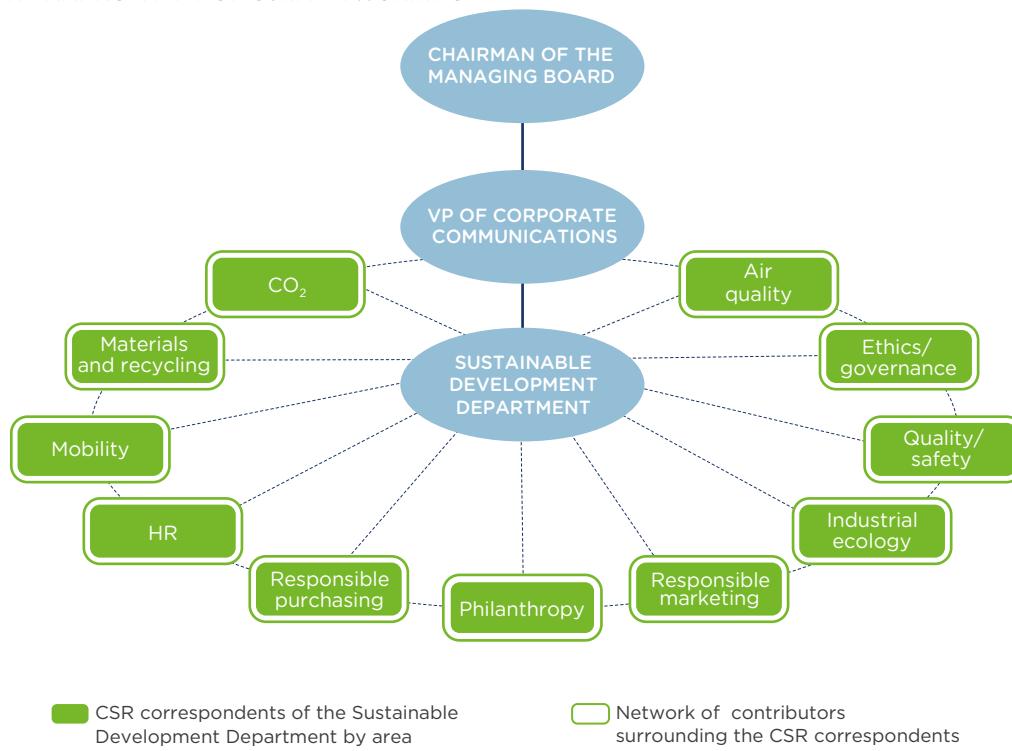
- to ensure that progress plans that aim to improve the integration of sustainable development responsibilities within the Group's strategy are implemented, by working with and coordinating a network of front-line correspondents present in all the Group's departments who are experts in the different areas of corporate social responsibility (human resources, environmental management, procurement, marketing, sponsorship, etc.);
- organise dialogue with stakeholders through this network by mobilising the Group's experts on the subjects at hand;
- to liaise on a daily basis with CSR rating agencies and SRI investors, in particular by making every effort to provide them with information in response to their requests;
- to coordinate thinking and proposals for actions enabling the Group to prepare for the regulatory developments related to CSR, to appropriate external best practice and share its own, identify scope for further progress and initiate the appropriate actions, etc.;
- to carry out each year's reporting on the Group's environmental, social and governance performance, coordinate its verification by an independent third party and oversee the preparation of the CSR report (where the Delegation acts as project manager), as well as the CSR chapter of the Group's Management Report;
- to submit the priority commitments, objectives and action plans for validation by the Executive Committee and take charge of all related follow-up actions as well as their communication both within and outside the Group; to keep the Supervisory Board informed of CSR issues;
- to represent the Group's interests before various external bodies specialising in CSR;
- to be a proponent of actions serving to underscore the Group's CSR commitments.

CSR criteria such as vehicle CO<sub>2</sub> emissions level or customer satisfaction are included in the variable compensation of employees. Please refer to chapter 3.2 of the Group's Registration Document.

##### A network of CSR correspondents and contributors embedded within the Company's business lines

The Sustainable Development Delegation oversees a network of CSR officers with specialist knowledge of the various business lines. They relay messages from the Sustainable Development Delegation to teams in their area of expertise and serve as proponents to encourage improvements in practices. To this end, the correspondents rely on their own networks of contributors within their respective departments. A CSR meeting is held each quarter, attended by the Sustainable Development Delegation and all CSR officers which provides an opportunity to share best practices, discuss progress made on action plans, and exchange information, in particular on upcoming changes in regulatory frameworks, so as to remain at the forefront of CSR knowledge and expertise. The CSR network involves the participation of nearly 600 contributors present in all of the Group's entities and subsidiaries and in all the countries where the Group has operations.

**The Executive Committee and the Heads of Department who serve amongst its members play a key role in the Group's CSR policy: the Executive Committee validates the medium- and long-term CSR directions and ambitions, while the Heads of Department are responsible for following the courses adopted and are the guarantors of the action plans necessary to attain the targets set.**

**OPERATIONAL MANAGEMENT OF CSR: NETWORKING****Focus on stakeholders' relations with the Sustainable Development Delegation in 2018**

- Contributions to proposals put forward by MEDEF upstream of working sessions on the CSR platform in addition to continuing efforts to identify best practices within the MEDEF working group on "Non-financial performance".
- Participation in ESG/SRI conferences hosted by investors and in meetings with investors/sustainable finance operators in collaboration with the Financial Division.

- Participation in workshops held by the *Union des Annonceurs* (French Union of Advertisers) on the topic of responsible communication.
- Participation in the Paris Europlace Working Group on integrated reporting, bringing together issuers, investors and the French Financial Markets Authority (AMF) and in the dialogue between investors, insurers and issuers on financial climate disclosure (TCFD).

**1.4.3. Internal control system** GRI.102-11**Internal control objectives**

As part of its commitment to prevent and limit the effect of internal and external risks, including CSR risks, the Group has put in place risk management and internal control systems to provide reasonable assurance concerning the achievement of the following objectives:

- compliance with laws and regulations;
- application of the Managing Board's instructions and guidelines;
- efficient internal processes, particularly those that help to safeguard the assets of Group companies;
- the reliability of financial and non-financial disclosures.

More generally, these procedures and processes also contribute to the proficient management of the Group's businesses, the effectiveness of its operations and the efficient use of its resources. However, internal control cannot provide an absolute guarantee that the Company's objectives will be achieved.

**Reference framework used by Groupe PSA**

The Group's risk management and internal control system complies with and functions according to the rules of the eighth directive on Statutory Audits, the French Financial Markets Authority (AMF)'s Reference Framework for Risk Management and Internal Control Systems issued in January 2007, and the report of the working group on audit committees published by the AMF on 22 July 2010.

**Principles of the risk Management System and actors in the process**

As described in section 3.2.2. of the Registration Document, the principal risks in each department, which are counted as those with the highest impact and the most highest likelihood (Impact x probability), are reported every six months in a "Top Management Risks" Report. This is sent to the General Counsel via its Protection Audit and Risk Department.

In addition, once a year this department identifies the Group's main crossover risks at interviews held with a representative range of the Group's senior executives and managers.

The mapping of major risks ("Top Group Risks", mainly derived from the "Top Management Risks" and the aforementioned interviews) is reviewed each year by the Executive Committee and presented to the Supervisory Board's Finance and Audit Committee. The Executive Committee validates the action plans for dealing with the "Top Group Risks".

Specific risk management and control procedures cover in particular:

- **risks associated with product quality**: these are managed using the specific procedures described in section 2 of this report. **The precautionary principle** is applied, in particular, during the design phase through life cycle assessments or compliance tests for vehicle projects (transitioning between project milestones), at the production phase through quality controls and, once the vehicles have been released onto the market, through preventive product recall campaigns;
- **ethics risks**: an international network of Chief Ethics Officers deploys the process in every host country and systematically reports any local ethical issues or breaches of compliance to the Ethics Committee, as described in section 6 of this report;
- **risks arising from malicious acts**: the Security Department, which reports to the General Counsel, is responsible for defining and coordinating, all actions intended to protect the Group's employees and tangible and intangible assets on a global basis;
- **legal risks**: the Legal Affairs Department, which reports to the General Secretary, produces or checks the Group's contractual commitments and ensures they comply with the relevant statutory and regulatory provisions. It is also in charge of organising the Group's defence in the event of disputes with third parties;
- **economic and financial risks**: the Management Control Department, which reports to the Chief Financial Officer, is responsible for overseeing the Group's business and financial performance and proposes annual and medium-term targets for growth, operating margin and return on capital employed to Executive Management. It manages the process of preparing the Medium-Term Plan and the budget framework. It controls the results of the operating departments and the Group's projects, and produces summary reports. It also carries out other finance-related tasks, that are specific to the automotive industry, such as product costings and price provision, selling price control, checking project profitability, financial monitoring of industrial cooperation with other car manufacturers, negotiations for mergers, acquisitions and disposals, etc., and drawing up formal management rules and standards;
- **risks related to climate changes**: under Article 173 of Law No. 2015-992 of 17 August 2015 relating to the Energy Transition for Green Growth, the financial risks associated with the effects of climate change and the measures that the Group is taking to reduce mitigate them are detailed in 1.2.1.1., as shown in sections 2, 4 and 5 of this document. They are also presented in Chapter 1 and Chapter 2 of the Registration Document.

## Principles of the internal control system and actors in the process

- The Protection Audit and Risk Department checks that the risk management procedures are correctly applied.

The Protection Audit and Risk Department checks compliance with internal applicable rules through audit assignments. The annual audit plan, which is defined independently, is based on the "Top Group Risks" and is subsequently submitted to Executive Management for approval and presented to the Supervisory Board's Finance and Audit Committee. The Audit and Risk Management Department is also responsible for assessing the maturity level of risk management procedures and making recommendations, if necessary, for improving their effectiveness.

- The Supervisory Board has a control and oversight role.

The Finance and Audit Committee of the Supervisory Board ensures that the risk management and internal control system operates effectively. It reports to the General Counsel on the procedures in place, their maturity level and the mapping of "Top Group Risks", with particular emphasis on risks which could have an impact on financial and accounting information.

The Supervisory Board also reviews the Internal Audit Department's organisational and operating principles, expresses an opinion on the Internal Audit plan and is informed about the findings of (i) the audits performed as part of the plan and (ii) the follow-up audits to check that teams have implemented the recommendations.

## Monitoring environment

To better meet the regulatory requirements and consumer expectations, the Group has appointed five Compliance Officers who oversee the areas of competition, anti-corruption, personal data and homologation and export control, so that it can examine and address these concerns internally.

Working closely with regulatory bodies, each Compliance Officer is responsible for converting the external obligations and constraints (such as laws, regulations, consumer commitments) applicable to their particular area into internal control rules that govern applicable rules.

They are supported by the network of Internal Control and Risk Coordinators (ICRC) set up in 2016. Internal Control and Risk Coordinators are responsible within their department for filtering the Group's rules and adapting them to their department's activities. Internal Control and Risk Managers identify risks specific to their department and ensure that they are under control. They oversee the drafting and updating of reference guides and key procedures for the business lines, and ensure that they conform to Group rules (including compliance). They conduct the self-assessment for their department.

## Monitoring

Monitoring is designed to ensure that standards, procedures and audit recommendations that implement Executive Management guidelines are applied. All departments reporting to the Chairman of the Managing Board undergo an annual self-assessment process.

- Departments can use the METRIC tool to perform a self-assessment of their processes. This also allows any necessary action plans to be monitored.
- Appropriate action plans are put in place by the entities in order to ensure continuous improvement. Internal Audits may be used to check that they have been properly implemented.

## Internal control management

The internal control system is decided by the Executive Committee. Its management is based on the following points:

- regular meetings with the ICRC network supplemented by ad hoc working groups when requested, and an annual presentation of self-assessment results at Director level during METRIC reviews.

The ICRC network is coordinated through regular meetings. Where required, these meetings are supplemented by the appointment of working groups and the implementation of awareness-raising and training initiatives.

## Continuous improvement process

Internal control oversight takes place to ensure continuous improvement. Its purpose is to strive for excellence in compiling a coherent set of methods and tools with which to provide the management teams with an overview of the findings and any corrective actions. It is based on the following principles:

- preparation and development of internal control reference guides, working closely with the operating units to reinforce the Group's policy;
- feedback from the different business lines, which is then used to streamline and enhance internal control procedures;
- adaptation of controls to keep pace with the changing risks.

## BANQUE PSA FINANCE

In line with the principles of the three lines of defence model, and in particular with the decree of 3 November 2014 which is applicable to French companies in relation to the internal control procedures of financial institutions, BANQUE PSA FINANCE has put in place an internal control system in its subsidiaries and JVs in partnership with SANTANDER CONSUMER FINANCE. This system is organised around two lines of defence for recurring and periodic controls, with the first-tier controls being performed by the operating units. The system is currently being rolled out to OPEL VAUXHALL FINANCE.

BANQUE PSA FINANCE (BPF) has established a charter that sets out the fundamental principles on which the organisation and operation of its internal control system is based. The Bank's Internal Control Charter defines the organisation, resources, scope and tasks. It also sets out the way in which the Bank's control system functions.





Solutions need to combine safe, enjoyable and environmentally friendly services and mobility devices. Customers, whose civic awareness is growing, will not compromise on this virtuous balance. The true value of mobility solutions will be measured against the life experience they offer.



2

# A TRENDSETTER IN SUSTAINABLE MOBILITY

GRI.102-15 GRI.103-1

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For Groupe PSA, mobility is a fundamental right that enables access to health care, education and work. The emergence of a more harmonious urban mobility will guarantee this right for everyone.

Groupe PSA operates in a mind-set of constructive dialogue with all stakeholders to define mobility in cities of the future — without neglecting rural environments — on the basis of strict but stable criteria, enabling the automotive industry to realise its full innovation potential. When it comes to environmental performance, it is crucial to have a comprehensive approach to mobility that takes into account the subtle balance between the energy consumption of mobility objects and the ecological performance of producing this energy, within the idea of “well-to-wheel” rather than “tank-to-wheel”. A “360 ° mobility” approach is necessary because isolating the two elements would give rise to unsustainable solutions. The solutions of the future will therefore need to combine safe, comfortable and environmentally friendly services and mobility objects. Customers — whose civic awareness of social and environmental issues is growing — will not compromise on this virtuous balance.

The shift from “ownership” to “experience” resonates more strongly on a daily basis with the emergence of new collaborative mobility uses, such as carpooling and car-sharing. The true value of mobility objects will be measured against the uses and experience that these objects can offer consumers.

Groupe PSA has identified six significant issues concerning sustainable mobility:

- **“Vehicle CO<sub>2</sub> emissions”**

According to a study by the IPCC published in 2014, transport accounted for 14.1% of global greenhouse gas emissions in 2010. While it is only the fourth largest contributor (energy sector: 25%; agriculture: 23%; industry: 21%), the automotive industry faces numerous regulatory pressures and consumer demands for lower CO<sub>2</sub> emissions and fuel consumption (EU target of 95 g/km of CO<sub>2</sub> by 2021, or 5 l/100 km by 2020 in China). The survival of automotive brands thus depends on their ability to comply with increasingly stringent regulations and to meet the expectations of consumers.

See 2.1. for more details.

- **“Vehicle impact on air quality”**

The harmful effects of atmospheric pollutants on climate, ecosystems, natural habitats and agriculture as well as human and animal health are a major public concern. Given the frequent media coverage, they represent an important reputational issue for companies. Deteriorating air quality and public health concerns have resulted in the introduction of local and international regulations to control atmospheric emissions, such as the Ambient Air Quality and Cleaner Air for Europe Directive (2008/50/EC) of 21 April 2008 and the European Emissions standards (Euro X) that limit vehicle emissions of regulated pollutants. The emissions permitted by successive Euro X regulations have been restricted considerably. For example, particle emissions have fallen by around 97% – from 140 to 4.5 mg/km – since the regulations first came into force in 1993. There are also a growing number of cities with restricted traffic areas which exclude vehicles with the highest emissions. Vehicles may only be marketed if compliance with regulations is ensured, thus necessitating substantial R&D investments by car manufacturers with a direct impact on their financial performance. Manufacturing facilities must also be adapted to meet customer expectations (in France, diesel's market share fell from 77% in 2008 to 47% in 2017).

See 2.2. for more details.

- **“Vehicle and service quality – customer satisfaction”**

Customer satisfaction hinges on two factors: product quality and service quality. The regulatory context defines obligations to provide information, a legal warranty, repair and replace services, and international quality standards (e.g. IATF 16949 specific to the automotive industry), while the socio-economic context includes increasingly complex value chains and constantly changing customer expectations in terms of mobility and vehicles. Good quality is the forerunner to economic efficiency and customer loyalty. Poor quality costs money and can lead to a fall in revenue and reputation damage.

See 2.3.1. for more details.

- **“Vehicle safety”**

Safety is governed by laws and regulations, but it is also addressed by the subject of voluntary codes of practice, such as the OECD Guidelines for Multinational Enterprises. Vehicle safety affects all road users (cyclists, pedestrians, other motorists, etc.). Government departments (NHTSA in the US, MLIT in Japan, KBA in Germany, DVSA in the UK, MOLIT in South Korea, etc.) are introducing increasingly stringent safety measures. Safety is one of the most important factors in customers' choices. Civil society has high expectations in terms of vehicle safety and car manufacturers' efforts right from the design stage, and there will be greater expectations with the arrival on the market of autonomous and connected cars. The challenge for car manufacturers is to continually improve vehicle safety without impacting sale prices.

See 2.3.2. for more details.

- **“Wise use of material in the vehicle life cycle (including product recycling)”**

By 2060, the Earth will have ten billion people whose average income will be equivalent to that of the richest countries today. The OECD estimates that the use of raw materials will double to meet this growth, exerting twice as much pressure on the environment.

The automobile also impacts the environment through the use of the natural resources of which it is composed, and the issue of its recycling at the end of its life, i.e., the recycling of scrapped vehicles. To exercise their social responsibility, to reduce their risk of dependency and to control production costs, car manufacturers must find solutions for:

- using fewer natural resources, which are growing more expensive as they become increasingly scarce;
- eliminating hazardous substances targeted by regulations (REACH, limitation of volatile organic compounds, elimination of some fluorinated compounds in air-conditioning systems, etc.);
- using materials that are compatible with the circular economy, focussing on two areas: the need to recover and recycle end-of-life vehicles and recycle materials that are becoming scarce;
- use of materials from a responsible supply chain (respecting human rights and the environment, ethics);
- processing end-of-life products (specifically the vehicles and batteries from electric vehicles) in a responsible manner to meet growing regulatory pressure worldwide.

This issue is now of crucial importance, with spectacular progress being made in this area, opening the way to greater use of renewable and recycled materials.

#### Focus on critical materials:

Demand for the materials needed for nano-technologies is greater than ever, which is indispensable for creating more networked objects, and the car is not immune to this trend. However, these materials depend on the availability of the metals that compose them. Some of these metals are becoming increasingly harder to mine: the metal content of the ore is decreasing, while mines that are in operation today are less concentrated than those that have shut down. The rising costs of these metals mean that they must be used in minute quantities, with implications for their subsequent recovery during the recycling phase.

See 2.4. for more details.

#### ● “Development of new mobility solutions”

Traditionally perceived as a tangible asset, the car is now more likely to be perceived as an object of mobility, especially by new generations. Social, environmental and technical changes impact customer behaviour and expectations in mobility matters. Analysts foresee a market of 300,000 vehicles for car-sharing fleets by 2018. The number of users of car-sharing services worldwide is set to increase from 8 to 36 million between 2015 and 2025. The Group's longevity is therefore dependent on mobility product and service developments.

Car manufacturers need to adapt their business models to these new mobility patterns. The emerging risk for car manufacturer in this new market is their customers' mobility data being collected by data hosting companies and service providers.

Free2Move, the Group's new mobility brand, aims to provide customers with the mobility solutions they need to make their lives easier. It has invested €100 million in developing an ecosystem with partners operating in different car-sharing niches, bringing them all together in one platform which offers customers a one-click transport solution to suit their situation.

See 2.5. for more details.

Taking these issues into account, solutions draw on the more widespread use of low-emission, communicating or smart cars, as well as on more effective policies for traffic management, land use planning and simplified multi-modal transport.

For the Group, these sustainable mobility solutions are central to its Push to Pass strategic plan, and the Group is developing a range of products and services that are discussed in detail in this section along with the results obtained.

From the vehicle design phases through each stage of its life cycle, Group teams are tasked with limiting the vehicle's environmental footprint as much as possible by controlling fuel consumption, CO<sub>2</sub> emissions and pollutants, and through using natural resources responsibly (e.g., by improving recyclability), etc. In addition to ensuring that its vehicles comply with the environmental legislation of the different markets, eco-design also guarantees that the Group will stay ahead of the competition in terms of sustainable mobility.



#### STAKEHOLDERS DIALOGUE

**Awareness raising on environmental issues:** during the annual plenary meeting of the Group's Works Council, the internal stakeholders (employee representatives) were given an update on the actions taken by the Group related to the commitment n°9 of the Global Framework Agreement (“Protection of the environment”).

#### COMMITMENTS SCOREBOARD

MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Climate change</b> 	<b>Vehicle CO<sub>2</sub> emissions*</b> Organiser: Executive Vice-President, Programmes	<b>By 2035</b> Reduce average CO <sub>2</sub> emissions of vehicles sold worldwide by 55% compared with 2012 levels, to be achieved with the support of: <ul style="list-style-type: none"><li>• a plug-in hybrid gasoline-electric powertrain;</li><li>• a new range of electric vehicles;</li><li>• a range of high-performance engines and lighter vehicle platforms.</li></ul>	<ul style="list-style-type: none"> <li>• Integration of OV with faster rollout of technologies in line with the PACE! plan: launch of joint projects stepped up on the Group's EMP2 and CMP platforms with earlier market launch of CO<sub>2</sub> efficient OV models and the electrified versions (electric or plug-in gasoline hybrid).</li> <li>• Continue launch of new EMP2 models (ranges of high-performance commercial vehicles and top-of-the range passenger vehicles) and 1<sup>st</sup> vehicle launch on the CMP platform (small, fuel-efficient lightweight vehicles).</li> </ul>	<b>Target met</b> <ul style="list-style-type: none"><li>• Three OV vehicles based on PSA platforms launched in 2018 (Grandland X, Crossland X, and new Combo). OV portfolio reviewed with only joint projects for the next launches. OV electrified versions (100% electric and plug-in hybrid), based on PSA technologies, planned for 2020;</li><li>• New models on EMP2: new CITROËN Berlingo and PEUGEOT Rifter, and 508 on the CMP platform: DS3 Crossback launched in October 2018.</li></ul>	<ul style="list-style-type: none"> <li>• Prepare to reduce CO<sub>2</sub> emissions average of sold vehicles in Europe in 2020 with a Q4-2019 CO<sub>2</sub> emission average lower than 2018 (114.1 g/km) for produced passenger cars.</li> <li>• Launch four plug-in hybrids (on EMP2 platform) and two BEVs (on e-CMP platform) before end of 2019.</li> </ul>

\* Strategic issue monitored by the Executive Committee and presented to the Supervisory Board.

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Health &amp; safety: growing demand of civil society</b>  	<b>Vehicle impact on air quality*</b>  Organiser: Quality & Engineering Department	<b>By 2035</b>  Based on its technological offer and especially its range of 100% electrified vehicles by 2025: <ul style="list-style-type: none"><li>achieve more than 50% of the Group's sales with electric, fuel cells and hybrid vehicles with an emission-free mode;</li><li>deploy state-of-the-art after-treatment systems for internal combustion vehicles in all countries where the Group operates.</li></ul>	<ul style="list-style-type: none"><li>For PCD, publish the results of the work carried out with T&amp;E, FNE and Bureau Veritas to measure NO<sub>x</sub> emissions and particles in real driving conditions;</li><li>By the end of 2018, all new direct-injection gasoline-powered vehicles sold by Groupe PSA in Europe will be fitted with particulate filters.</li></ul>	<b>Target met</b> <ul style="list-style-type: none"><li>On 6 March, Groupe PSA disclosed vehicle emissions (NO<sub>x</sub> and particulate emissions) in real driving conditions with T&amp;E, FNE and Bureau Veritas;</li><li>The Group's passenger cars were all certified under the WLTP new laboratory test (Euro 6d-TEMP) before the end of August 2018 thanks to sound technological choices made in anticipation of the regulations on the "Gasoline Particulate Filter" (GPF). Since 1 September 2018, all new direct-injection gasoline-powered vehicles sold by Groupe PSA in Europe have been fitted with particulate filters.</li></ul>	<ul style="list-style-type: none"><li>Launch four plug-in hybrids (on EMP2 platform) and two BEVs (on e-CMP platform) before end of 2019.</li><li>Launch 50 Euro 6d internal combustion engine models by anticipation of future regulations.</li></ul>
	<b>Vehicle safety*</b>  Organiser: Quality & Engineering Department	<b>By 2035</b>  Offer customers vehicles fitted with state-of-the-art protection: <ul style="list-style-type: none"><li>for customers and all road users, especially in autonomous driving mode, with 80% of vehicles offering automatic control functions from 2030 (reduction in number of reported physical injuries involving a Groupe PSA vehicle);</li><li>for customers' property by controlling the inviolability of the vehicles (90% of vehicles with the highest Thatcham rating);</li><li>for vehicle/customer data and the vehicle itself against cyberattacks (all hardware protected against cyberattacks/all alerts processed).</li></ul>	<ul style="list-style-type: none"><li>Create a single indicator to monitor changes in injury accidents involving a Groupe PSA vehicle.</li><li>Groupe PSA scope reference: vehicles in production since 2011 rated by Thatcham, 90% are rated "Exceed".</li><li>Implement a system to monitor alerts fed back by vehicles in the Cloud platform managed by PSA.</li></ul>	<b>Target met</b>  <b>Target met</b> The indicator created shows the improvement in safety between generations of car model with regard to the occupants (fatal and serious injuries).  <b>Target met</b> PCD + OV (cars + light commercial vehicles): <ul style="list-style-type: none"><li>since 2011: 90%;</li><li>2018: 94%.</li></ul> <b>Target met</b> <ul style="list-style-type: none"><li>Incident monitoring has been implemented for vehicles alerts;</li><li>100% of connected embedded devices are tested and developed extensively according to state-of-art cybersecurity standards.</li></ul>	<ul style="list-style-type: none"><li>Reduce lethal and serious injuries by 15% for occupants of the generation of cars launched since 2017 compared to the previous generation, which were launched between 2013 and 2017 (scope Group brands sold in France).</li><li>Maintain 90% of Groupe PSA vehicles rated "Exceed" by Thatcham as part of extended requirements for LCV (scope: reference vehicles in production since 2011).</li><li>Process 100% of alerts on all PSA produced vehicles.</li><li>Maintain secure development and full testing of connected embedded devices.</li></ul>

\* Strategic issue monitored by the Executive Committee and presented to the Supervisory Board.

MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Natural resource scarcity</b> 	<b>Wise use of material in the vehicle life cycle (including product recycling)</b> Organiser: Quality & Engineering Department	<b>By 2035</b> Demonstrate the Group's commitment to the circular economy: <ul style="list-style-type: none"><li>• by guaranteeing a minimum rate of 30% integrated recycled and natural materials for the Group's of 30% average vehicle worldwide;</li><li>• by ensuring that all electric vehicle batteries can be used as second-hand energy storage devices before being recycled;</li><li>• by eco-designing our vehicles to ensure all new materials can be recycled in the circular economy circuits (95% vehicle recovery rate by weight with a minimum recyclability rate of 85%).</li></ul>	Continue integrating recycled and natural materials into new vehicle projects that have begun.  <u>Europe</u> <ul style="list-style-type: none"><li>• PCD: publish a report on the 2018 average PCD vehicle;</li><li>• OV: introduce the process for calculating the average integration rate of green materials in vehicles sold.</li></ul> <u>Rest of the world</u> <ul style="list-style-type: none"><li>• Latin America: continue integrating green materials into polymers; consolidate the metals reference guide and evaluation on one vehicle;</li><li>• China: continue work to identify green materials, approved in technical and economic terms, according to the Group's materials policy.</li></ul> Continuation of R&D programme to develop a second life for electric vehicle batteries.	<b>Target met</b>  <u>Europe</u> <ul style="list-style-type: none"><li>• PCD: average vehicle contains 30% green materials;</li><li>• OV: one vehicle evaluated — Opel ADAM — contains 30% green materials.</li></ul> <u>Rest of the world</u> <ul style="list-style-type: none"><li>• Latin America: five new green materials validated for designed parts;</li><li>• China: green materials policy introduced the JV organisation.</li></ul> R&D programme on second life for batteries on going with new testing.	  <u>Europe</u> <ul style="list-style-type: none"><li>• Operational target: maintain 30% rate of green materials in average vehicles for PCD vehicles and new OV vehicles;</li><li>• Innovation target: use Coccycbio project to evaluate technical properties of new natural fibres stemming from byproducts of sawmill activities and flax processing and define new green material compounds with the selected fibres for interior parts requiring shock performance.</li></ul> <u>Rest of the world</u> <ul style="list-style-type: none"><li>• Latin America: continue integrating green materials and improve the portfolio;</li><li>• China: identify green materials approved in technical and economic terms, according to the Group's materials policy to initiate a portfolio of materials and parts.</li></ul> Pursue R&D programme on second life of electric vehicles batteries.

\* Strategic issue monitored by the Executive Committee and presented to the Supervisory Board.

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Customers' expectations and market risks</b>  	<b>Vehicle and service quality - customer satisfaction*</b> Organiser: Quality & Engineering Department	<p><b>By 2035</b> Be, and remain, customers' preferred car manufacturer and mobility supplier:</p> <ul style="list-style-type: none"> <li>satisfy each and every customer by offering mobility solutions that meet their expectations around the world and for all usage (overall product satisfaction rate, in comparison with the TOP3);</li> <li>contribute, with the best level of reliability of the mobility objects, to maximize their resale value, and minimize the repair costs in the long run (three-month warranty claim rates at 0 and warranty cost cut by 75% in comparison to the Push to Pass benchmark);</li> <li>provide the same level of excellent service to all customers anywhere, anytime (recommendation rate).</li> </ul>	<p><u>Satisfaction:</u> 30% of models in the Q1 of their competitive segment for satisfaction vs. 25% in 2017 (PSA satisfaction index all regions).</p> <p><u>Three-month warranty claim rates</u> • Target 61 vs. 76 in 2017 (scope World - base 100,2014).</p> <p><u>Change in the per-vehicle warranty expense</u> Target of -18% vs. 2015 (Scope PCD world).</p> <p><u>Recommendation rate</u> • sales target of 105 (vs. 103 in 2017), after-sales target of 109 (vs. 106 in 2017) (scope PCD world - base 100, 2014); • sales target of 101.4, after-sales target of 101.3 (scope OV - base 100, 2017).</p>	<p><b>Target partially met</b></p> <p><u>Satisfaction</u> <b>Target not met</b> Groupe PSA (PCD + OV) = 26% o/w PCD = 28% (&gt; 25% in 2017).</p> <p><u>Three-month warranty claim rates</u> <b>Target not met</b> Groupe PSA: 69* o/w PCD: 66*.</p> <p><u>Change in the per-vehicle warranty expense</u> <b>Target met</b> PCD: -18,5% (PSA: -6,6%).</p> <p><u>Recommendation rate</u> <b>Target met</b> • Scope PCD world (base 100, 2017): • sales: 107 (vs. 103 in 2017); • after-sales: 112 (vs. 106 in 2017). • Scope OV world, base 100, 2017: • sales: 102 (vs. 100 in 2017); • after-sales: 103 (vs. 100 in 2017).</p>	<p><u>Satisfaction</u> 25% of models in the Q1 of their competitive segment vs. 22% in 2018 (based on new unified item "overall satisfaction" for PSA vehicles).</p> <p><u>Three-month warranty claim rates</u> Groupe PSA: 57,2 (scope world - base 100,2014).</p> <p><u>Change in the per-vehicle warranty expense compared to 2015</u> -15% (scope Groupe PSA world) vs. -6,6% in 2018.</p> <p><u>Recommendation rate</u> Scope Groupe PSA world (base 100, 2017): • sales: 106 (vs. 103 in 2018); • after-sales: 110 (vs. 104 in 2018).</p>

\* Strategic issue monitored by the Executive Committee and presented to the Supervisory Board.

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Customers' expectations and market risks</b>  	<b>Development of new mobility solutions*</b> Organiser: Head of Mobility Services	<b>By 2035</b> Free2Move, the new mobility brand by Groupe PSA, will be customers' preferred mobility services provider with intermediate targets for 2021: <ul style="list-style-type: none"> <li>continue profitable growth to achieve a turnover of €400 million;</li> <li>reach 2,000,000 active B2C customers.</li> </ul>	<u>B2C services</u> <ul style="list-style-type: none"> <li>Rental through the network: seven operational countries in Europe for PEUGEOT, and six for CITROËN and DS AUTOMOBILES;</li> <li>Groupe PSA will offer car-sharing services, through a membership scheme in two, new continents: America and Asia;</li> <li>the Free2Move app will have over 1 million customers.</li> </ul>	<b>Target met:</b> <u>B2C services</u> <ul style="list-style-type: none"> <li>rental through the network: seven operational countries in Europe for PEUGEOT, CITROËN and DS AUTOMOBILES;</li> <li>Groupe PSA offers car-sharing services through a membership scheme in America and Asia;</li> <li>the Free2Move app has over 1 million customers.</li> </ul>	<u>B2C services</u> <ul style="list-style-type: none"> <li>improve geographical coverage of car rental offered in the four brands' dealerships by more than 35% (from 24 to 33 brands deployments in nine European countries);</li> <li>offer car-sharing services in two new European cities;</li> <li>increase the Free2Move app attractiveness both in US and Europe, building on the rollout of multi-provider registration and integrate more service providers within the app.</li> </ul>
			<u>B2B services</u> <ul style="list-style-type: none"> <li>180,000 PCD cars to be fitted with Connect Fleet Management and 1,000 with Connect Fleet Sharing by 2018 year end;</li> <li>create a B2B offering for OV.</li> <li>set out the strategy and schedule for the OV connected services offering in the Group's service plan.</li> <li>satisfaction with PCD rental, car sharing and B2B services will be 8.4 compared to 8 in 2017.</li> </ul>	<u>B2B services</u> <ul style="list-style-type: none"> <li>180,000 PCD cars were fitted with Connect Fleet and 700 with Fleet Sharing by 2018 year end.</li> <li>OV launched Connect Fleet in Netherlands and Belgium in 2018;</li> <li>the strategy and schedule for the OV connected services offering is set out in the Group's service plan;</li> <li>satisfaction with PCD rental, car-sharing and B2B services is 8.4.</li> </ul>	<u>Expand B2B services</u> <ul style="list-style-type: none"> <li>300,000 PCD cars fitted with Connect Fleet and with Fleet Sharing by 2019 year end.</li> <li>launch Connect Fleet and Fleet Sharing on OV in the European G10 countries</li> <li>launch the first OV connected service in October 2019 with a factory embedded technology;</li> <li>define new customer satisfaction indexes focused on each service: rental and car sharing, connected services and B2B services. These new values will be the starting points for the 2020/2025 customer satisfaction studies.</li> </ul>

\* Strategic issue monitored by the Executive Committee and presented to the Supervisory Board.

## 2.0. DESIGNING THE MOBILITY OF THE FUTURE: SUSTAINABLE, SMART, SAFE AND SHARED DPEF.15

Groupe PSA is evolving in an environment in which there are growing safety and regulatory issues (e.g. convergence of the CO<sub>2</sub> targets in all major markets, tightening up of anti-pollution standards, etc.), there is increased pressure from other market players (becoming more aware of environmental issues) and customer needs are changing with the advent of new technologies.

Innovation, research and development are therefore priorities for Groupe PSA. They are a powerful lever that can be used to tackle the crucial issues facing the automotive industry and develop the competitive advantages, which are vital for growth.

Through the Push to Pass plan, which was unveiled on 5 April 2016, **Groupe PSA has outlined its vision for 2030: to be the most efficient car manufacturer and the preferred global supplier of mobility services. To do this, the Group relies particularly on a core model and technology strategy, and it has articulated a performance plan.**



Push to Pass plan: <https://www.groupe-psa.com/en/publication/push-to-pass/>

PACE! <https://media.groupe-psa.com/en/opelvauxhall-go-profitable-electric-and-global-pace>

### 2.0.1. Innovation for differentiation on the automotive market

Innovation guarantees a genuine potential for differentiation on a market which is demanding and constantly changing. It enables the Group to set itself apart from the competition and to invent the vehicle of tomorrow. **Groupe PSA has consolidated a high-value portfolio, which is protected by industrial property rights, including a large number of patents.**

In 2018, Groupe PSA had 1,074 patents published in France. This high number of patents is a testament to the Group's unwavering commitment to protecting and enhancing its innovations. In fact, innovation is central to the Group's strategy.

**1,074**

patents published in France in 2018

The proactive policy on patent filing was initiated in the early 2000s, with various initiatives being set up, such as an incentive system, in which bonuses were paid to inventors upon filing requests for patents; awards for inventors; and the creation of a patent-organiser network.

This policy has been significantly modified to give greater protection to technological developments that the Group considers strategic; on-board innovations on vehicle projects; and improvements to processes implemented in the plants. These changes help to optimise the economic performance of the patent operations.

The bicentenary of the first Groupe PSA patent was celebrated in 2018 during the Inventors' Award Ceremony, which each year rewards the best inventions of the Group in the presence of the Executive Vice-President of Engineering and Quality. This anniversary was an opportunity to remember that **innovation and its protection have been in the Group's genes since its inception. This human and intellectual capital is the Group's wealth.**



#### *Impact measurement and economic assessment*

The active patent policy, which protects the Group's intellectual property, enables it to:

- generate revenue: €220 million in 2018 from patents from the Automotive Division;
- attract and retain talents: "inventors" and potential partners;
- consolidate its reputation for technology and raise the status of its inventions with customers and other stakeholders.

**€220 million**

**in revenue generated by the patents of the automotive branch published in France in 2018**

## 2.0.2. The R&D strategy supporting the Group's ambitions

### 2.0.2.1. The “core model strategy”

Through its Push to Pass strategic plan, the Group has decided to launch a product offensive that is focused on its customers and on the world's leading profit pools by releasing one new car per region, per brand and per year.

To roll out this ambitious product plan and ensure its efficiency, the Group's R&D Department develops its vehicles through multi-brand and multi-region programmes, based on multi-energy modular platforms that enable it to maximise the reuse of parts.

As a result, **all Groupe PSA passenger cars are designed on two multi-energy platforms** – the **Efficient Modular Platform 2 (EMP2)**, launched in 2013, and the **Common Modular Platform (CMP)**, revealed in 2018 with the new DS 3 Crossback.

The new models developed on these two platforms will be available in internal combustion (gasoline and diesel) and electrified (electric or plug-in hybrid) versions in accordance with the energy transition deployment.

- **Small city cars, sedans and compact SUVs** (B and C mainstream segments) **are made on the CMP**. Starting in 2019, the platform will also be available in a variant equipped with an electric powertrain (eCMP).
- **The mid- and high-end body styles** (upper C and D segments) **are made on the EMP2**. In addition to gasoline and diesel engines, the EMP2 will also accommodate the plug-in gasoline hybrid powertrain (PHEV) from 2019, starting with DS7 Crossback.

For both EMP2 and CMP, electrified and internal combustion versions are industrialised on the same production line. As a result, **Groupe PSA has the flexibility to adapt to changes in the energy mix in its various markets** and can offer all of its customers around the world a comprehensive range of technologies that meet their usage needs and contribute to increasingly responsible mobility.



#### *Impact measurement and economic assessment*

This modular approach, coupled with programme-based organisation, will enable basic parts, modules, and even body parts to be reused, generating a **20% saving on R&D costs and a 30% saving on capital expenditure (CAPEX)** compared with an entirely new model.

### 2.0.2.2. The “core technology strategy”

Groupe PSA offers a targeted range of technologies that aims to provide its customers with a **diverse selection of technological options to meet all of their sustainable mobility needs**, reflecting the social changes that directly impact the automotive industry: the energy transition; increased urbanisation; digital advances and hyper-connectivity; globalisation; mobility and changes in habits.

Groupe PSA has therefore identified **three R&D strategic axes** through which it will offer all of its customers new types of automotive experiences, tailored to the individual trends around the world:

1. **clean technologies**: marketing a car which addresses environmental and health issues (see 2.1.1.0.);
2. **the autonomous connected vehicle**: to assist drivers during the most monotonous moments of driving, offering ever increasing levels of safety and paving the way for the car of the future (see 2.3.2.0.);
3. **attractiveness**: to offer customers wellness functions and enhance the Group's brand DNA.

These technological innovations enable the Group to provide concrete responses to some of its CSR issues.

R&D strategic focus axes	Related strategic CSR issue
<b>Clean technologies</b>	<p><b>“Vehicle CO2 emissions” and “Vehicle impact on air quality”</b>            100% of Groupe PSA passenger cars were certified under the new WLTP standard upon its entry into force on 1 September 2018. (see 2.2.)            Groupe PSA is ready to launch its electrification offensive starting in 2019 and revealed its new multi-energy platform in September 2018. (see 2.0.2.1.)            The Group also continues to deploy efficient technologies that help to reduce emissions and to be transparent to its customers. (see 2.1, 2.2.)</p>
<b>The autonomous connected vehicle</b>	<p><b>“Vehicle safety”</b>            Groupe PSA is a pioneer in the development of V2X technology for intelligent connected vehicles and autonomous driving. Road tests and public demonstrations have been conducted since early 2018 - to assess the advanced performance of this technology to improve road safety and traffic management. Moreover, during the 2018 World IoT (Internet of Things) Expo in Wuxi (China), Groupe PSA presented its latest LTE-V2X achievement. (see 2.3.2.0.1.)            In 2018, Groupe PSA generalised the active safety features launched on DS7 Crossback. As a result, the new PEUGEOT 508 and 508 SW are equipped with a wide range of state-of-the-art driving aids such as Night Vision, Lane Keeping Assist and Lane Positioning Assist, the latest Active Safety Brake system, the Driver Attention alert, etc. (see 2.3.2.0.2.)</p>
<b>Attractiveness</b>	<p><b>“Vehicle safety”</b>            With the PEUGEOT Partner, CITROËN Berlingo, and OPEL and VAUXHALL Combo vans – which were awarded Van of the Year – Groupe PSA has proposed two technologies that are unique on the market: the overload indicator and surround rear vision. (see 2.3.2.0.)</p>

## 2.0.3. R&D effectiveness: optimised resources DPEF.16

Key figures	2016	2017	2018
R&D expenses* (total expenditure)	NA	€3.6 billion	€3.9 billion
Number of employees assigned to R&D	13,000	20,300**	18,700**
Number of R&D centres	7	9**	9**
Number of patents published	930	1,021	1,074
Number of academic chairs	6	6	4
Number of OpenLabs	18	18	19
Proportion of Group scientific research conducted in the OpenLabs (excluding China)	15%	between 15 and 20%	between 15 and 20%

\* Automotive Division (PCD + OV) and FAURECIA.

\*\* Including OPEL and VAUXHALL and JV CAPSA & DPCA.

Within the Automotive Division, the Quality and Engineering Division is responsible for research and development and is part of the Executive Committee. The QED manages and carries out eco-design in particular and life cycle analyses, as well as monitoring the use of green or recycled materials, collecting the required data from the engineering business lines and suppliers for each vehicle project. As these projects develop, the Programmes Department keeps track of the solutions implemented, measuring their efficiency based on the proportion of green materials used and CO<sub>2</sub> emissions, etc. A special unit is responsible for coordinating the Group's CO<sub>2</sub> programme. This monitors and reports on the emissions performance of vehicles developed by the Group. A special department monitors the Group's ELV (end-of-life vehicles) policy and its recycling and recovery performance.

Regarding the integration of engineering teams from OPEL and VAUXHALL, there has been major progress in 2018 to define the role of the Rüsselsheim R&D Center in the global R&D footprint of Groupe PSA (see 2.0.3.2.).

### 2.0.3.1. The R&D budget

**€3.9 billion**  
budgeted for R&D in 2018

As part of the Push to Pass plan that was introduced in 2016, the Group committed to keeping annual R&D and CAPEX budgets between 7 and 8% of the revenue of the Automotive Division to enable it to develop structuring projects.

This ratio increased in 2018 (between 8 and 9%) due to the OV integration but thanks to PACE! it should quickly return to the target fixed in Push to Pass.

Total R&D spending was up thanks to OV acquisition, reinforcing the Group's ability to innovate for the future (see the financial statements in the Registration Document).

To meet these strategic ambitions, R&D must become more efficient and expenditure must be thoroughly optimised throughout the R&D value chain, from the innovation phases right through to manufacturing and the throughout vehicle's lifetime. **Management of the DRIVE (Development Research Innovation and Value Enhancement) performance plan aims to deliver 5% of productivity per year.**

The key factors to achieve this objective were:

- Digital Validation Boost, a project that aims to strengthen digital validation, thereby reducing physical validation and leading to lower costs and quicker time to market. In 2018, the Digital Validation Boost project generated a saving of €16 million;
- complexity reduction, leading to a 40% reduction in the number of references on developing vehicles compared to the current situation;
- arranging R&D subcontracting around the core suppliers of engineering services and undertaking cost improvement measures with each of them (gains = €25 million in 2018);
- optimising campus-estate of R&D (-40% from 2013 to end 2018).



#### Impact measurement and economic assessment

The Group continues to roll out a plan to optimise its R&D by developing its processes using digital simulation and by enhancing its partnership policy (including strategic suppliers). In 2018, R&D achieved efficiency gains in line with its optimisation plan. This rationalisation has enabled the Group to develop new vehicles and new technologies in support of the Group's core model strategy.

### 2.0.3.2. Using skills to further R&D

**almost 18,700**  
employees devoted to R&D

**Groupe PSA R&D has a global reach and is built around five clusters that support the Group's international development:**

- an R&D cluster in France – its main base, in charge of the early phase, design and engineering of vehicles and subassemblies. It is divided into three R&D centres and their three validation and testing sites: Vélizy/La Ferté-Vidame, Sochaux/Belchamp and Poissy/Carrières-sous-Poissy. These handle three-quarters of the Group's R&D activity, with a staff of 9,630 (8,956 FTE) at the 2018 year end.

In July 2018, Groupe PSA set up its new multi-energy Powertrain Expertise Centre in France, to support the energy transition by improving powertrains efficiency in reducing CO<sub>2</sub> emissions. It was officially inaugurated in early 2019;

- an R&D center in Germany (Rüsselsheim), in charge of the development of all new OPEL and VAUXHALL cars, light commercial vehicles built on a dedicated LCV platform for all Groupe PSA brands, and the next generation of the EP engine family (four-cylinder). It leads 15 Centers of Competences (equivalent to Expertise fields) and is therefore a key contributor to the Global R&D footprint. The Rüsselsheim Technical Center had a workforce of 6358 at the 2018 year-end;
- an R&D center opened in Morocco in July 2017, which will support Groupe PSA expansion in the Middle East and Africa region, with a workforce of 329 at the 2018 year-end;
- an R&D cluster in Latin America (São Paulo), which is dedicated to local sourcing and manufacturing, and had a workforce of 450 at the 2018 year-end;
- an R&D cluster in China, with three R&D centres: two sites with our partner DONGFENG MOTORS in Shanghai (the Group's China Tech Centre) and Wuhan (in charge of developing new prototype vehicles, modifying engines and fostering local integration) and one site with our partner CHANGAN PSA AUTOMOBILES in Shenzhen (responsible for local sourcing and manufacturing), with a workforce of 1,950 (1,300 of which in joint ventures at the 2018 year-end).



“Groupe PSA inaugurates the multi-energy Powertrain Expertise Centre in Carrières-sous-Poissy (France), to support the energy transition” 18/01/2019 press release:  
<https://media.groupe-psa.com/en/groupe-psa-inaugurates-multi-energy-powertrain-expertise-centre-carri%C3%A8res-sous-poissy-france-support>

“Opel and IG Metall/Works Council Agree on Measures for Improved Competitiveness and Investments”  
 29/05/2018 press release: <https://media.groupe-psa.com/en/opel-and-ig-metallworks-council-agree-measures-improved-competitiveness-and-investments>

“Rüsselsheim Engineering Center Develops Next Four-Cylinder Gasoline Engine Generation for Groupe PSA”  
 13/06/2018 press release: <https://int-media.opel.com/en/r%C3%BCsselsheim-engineering-center-develops-next-four-cylinder-petrol-engine-generation-groupe-psa>

“LCV development responsibility for Groupe PSA to be based in Rüsselsheim” 26/06/2018 press release: <https://int-media.opel.com/en/04-04-lcv-development>

“Nine additional Centers of Competence for Engineering Center at Opel in Rüsselsheim”  
 22/03/2018 press release: <https://int-media.opel.com/en/03-22-engineering-center>

“Opel: Rüsselsheim Engineering Center to Receive Over 160 Charging Stations for Electric Cars and to Research Charging Infrastructure of the Future”  
 07/11/2018 press release: <https://int-media.opel.com/en/opel-r%C3%BCsselsheim-engineering-center-receive-over-160-charging-stations-electric-cars-and-research>

The R&D “jobs and skills” strategy aims to **focus available resources on the most strategic areas for the business**:

- via its expertise network established in 2010, which today includes 23 senior experts, 159 experts and 462 specialists for R&D, who provide the Group with key competencies;
- via internal reconversions: 1,885 career paths were designed by the Quality and Engineering Department (QED as part of the internal reconversion programme called “Top Compétences”), enabling employees to focus on and acquire skills that are highly valuable for the Group’s R&D;
- via targeted recruitment: a total of 94 in 2018 for the QED;
- by subcontracting a share of standard operations to core suppliers of engineering services.

Initiated in November 2016 with the UXCT (User eXperience Cockpit Team) workspace, the cross-functional, multi-business line implementation mode had been deployed for several projects such as “ADAS and New Electronic Architecture”, “Factory Booster”, “Connected Vehicles and Services”.



“UXCT: taking a fresh approach to imagining life on board the cars of the future” video:  
<https://youtu.be/ogOHQ-MhIKo>

### 2.0.3.3. Partnerships

#### 2.0.3.3.1. Development, production and marketing partnerships

To rollout an efficient roadmap towards cutting-edge technologies, Groupe PSA relies on leveraging in-house assets and expertise, combined with strategic and local partnerships.

With regard to clean technologies, Groupe PSA has announced two joint ventures, one with Nidec on the design and production of electrical machines and the other with Punch Powertrain on the electrified transmission system (e-DCT).

With regard to connectivity, Groupe PSA is collaborating with one major Chinese player on our CVMP (Connected Vehicle Modular Platform) in relation to the PSA Cloud; with Qualcomm on connected cockpits in anticipation of 5G; and with Harman for wireless infotainment (2020+).

These collaborative developments come in addition to:

- previous joint developments in terms of technologies and vehicles:
  - a CMP platform and its electric version eCMP were developed with DONGFENG MOTOR CORP as part of DCPA joint venture in Wuhan (China),
  - gearbox components with Renault,
  - diesel engines with Ford,
  - segment A vehicles (PEUGEOT 108 and CITROËN C1), as part of its TPCA joint venture with Toyota at Kolin in the Czech Republic,
  - commercial vehicles, as part of a contractual partnership with Toyota Motor Europe,
  - commercial vehicles, as part of the Sevelsud joint venture with Fiat at Val Di Sangro (Italy),
  - a one-tonne pickup in collaboration with CHANGAN PSA AUTOMOBILES;

- partnerships for the production and marketing of its vehicles:
  - in Jizzakh (Uzbekistan) as part of the Uzbekistan PEUGEOT CITROËN Automotive joint venture with SC Uzavtosanoat, for the assembly and manufacture of light commercial vehicles (PEUGEOT Expert and Boxer; CITROËN Jumpy and Jumper),
  - in Kaluga (Russia) as part of the PCMA joint venture with Mitsubishi Motors Corp, consolidated in the CSR reports, for the PEUGEOT 408, CITROËN C4 Sedan, PEUGEOT and CITROËN Commercial Vehicles and their passenger versions,
  - in Tunis (Tunisia) with STAFIM, for the assembly and marketing of a PEUGEOT Pick-up from 2018,
  - in Oran (Algeria) with Condor Electronics, Palpa Pro and the Entreprise Nationale de Production de Machines-Outils for manufacturing which will be operational in 2019,
  - in Kaduna (Nigeria) with PAN Nigeria Ltd for the assembly of the PEUGEOT 301 and 508, and as part of the Dangote PEUGEOT Automobiles Nigeria Limited joint venture with Dangote Industries Limited and the Kaduna State Government, for the assembly and distribution of PEUGEOT vehicles in the future,
  - in Wukro (Ethiopia) with MIE (Mesfin Industrial Engineering), for the assembly and marketing of the PEUGEOT 301, 208 and 2008,
  - in Thika (Kenya) with URYSIA for the PEUGEOT 308 SW, 508, 2008 and 3008,
  - in Hosur in the Tamil Nadu region (India), as part of the PSA AVTEC Powertrain Pvt. Ltd. joint venture with AVTEC (CK Birla Group) for powertrains manufacturing,
  - in Delhi (India) as part of the "PCA Automobiles India Private Limited", joint venture with HMFCL (Hindustan Motor Finance Corporation Limited) for one compact SUV (production starting at the end of 2019),
  - in Wuhan (China) as part of the DPCA joint venture with DONGFENG MOTOR CORP. for the manufacture of DONGFENG PEUGEOT (301, 308, 408, 508, 208 and 3008) and DONGFENG CITROËN vehicles (C-Elysée, C4 and C4L, C5 and C6, C3-XR, C4 Aircross), and in Chengdu (China) for the DONGFENG PEUGEOT 4008, DONGFENG CITROËN C5 Aircross and DONGFENG PEUGEOT 5008,
  - in Shenzhen (China) as part of the CAPSA joint venture with CHANGAN PSA AUTOMOBILES, for the assembly of high-end DS AUTOMOBILES vehicles,
  - in Gurun (Malaysia) with Naza Automotive Manufacturing SDN BHD, for the assembly of the PEUGEOT 3008 and 5008,
  - in Chu Lai (Vietnam) with the Vietnamese group THACO for the assembly of the 3008, 5008 and SUV-C,
  - in Okazaki (Japan) with Mitsubishi, for the manufacture of the CITROËN C4 Air Cross and 4008, and in Mizushima (Japan) for the production of the electric vehicles CITROËN C-Zero and PEUGEOT iOn,
  - in Montevideo (Uruguay) with EASA and Nordex for the manufacture of PEUGEOT Expert and CITROËN Jumpy.

Note that following the US withdrawal from the JCPOA announced on 8 May 2018, Groupe PSA has decided to suspend its JVs activities in Iran, in order to comply with US law.

### 2.0.3.3.2. Innovation partnerships

**For Groupe PSA, Open Innovation aims to build and manage relationships driven by shared value creation with stakeholders** from four ecosystems: individuals, companies, academia and institutions. Through this initiative of "openness", Groupe PSA aims to expand its ability to innovate (see 1.2.3.3.).

#### — THE “INDIVIDUALS” ECOSYSTEM

In 2015, an incubator to host and support employees who have ideas for innovation or new businesses for the Group was established in France. This initiative was expanded outside of France in 2016 with the opening of an incubator in Latin America. By 2018, more than 470 applications had been received and 24 projects launched.

#### — THE “BUSINESS” ECOSYSTEM

The foundations of the partnership strategy with SMEs/VSEs were established in 2013: adapt innovation contracts that specifically focus on the exploration phases and implement personalised coaching to support small companies that wish to collaborate with the Group in phases far upstream of innovation.

To develop new partnerships, in January 2014, Groupe PSA created an SME partner portal called "Innovating with Groupe PSA", that can be accessed from the Group's website. The portal lists the Group's needs with respect to technological innovations and services. SMEs, VSEs and startups can use it to submit their proposals which may lead to a partnership.



"Innovating with Groupe PSA" portal: <https://www.groupe-psa.com/en/automotive-group/innovation/innovating-with-psa/>

"Groupe PSA Business Lab and Latin America Division partner with Cubo Itaú in Brazil" 06/04/2018 press release: <https://media.groupe-psa.com/en/groupe-psa%20%99s-business-lab-and-latin-america-division-partner-cubo-ita%C3%BA-brazil>

#### — THE “ACADEMIC” ECOSYSTEM

In 2010, Groupe PSA created the StelLab (Science & Technologies Exploratory Lean LABoratory) network which establishes scientific partnerships with cutting-edge laboratories worldwide through its chairs and OpenLabs network. The OpenLabs are mixed research structures that pool the research teams and scientific resources of the Group and those of its partner laboratories.

The network includes 19 OpenLabs and four academic chairs managed in close collaboration with PSA University:

- the OpenLabs: Automotive Motion Lab in Marseille, Electronics and Systems for Automotive in Bordeaux, Energetics in Orleans, Materials and Processes in Metz, Fluidics in Poitiers, Computational Mechanics in the greater Paris region, Vibro-Acoustic-Tribology in Lyon, Competitive Intelligence in Bordeaux, OpenLab Design in Paris and Nantes, Biologie-Chimie-Physique in Paris, PhOVeA, and Electrical Engineering for Mobility in Saclay, Artificial Intelligence in France, "Multimodal design and intelligent vehicles" in Beijing, Optoelectronic devices for automotive in Wuhan, Energy Storage and Human Machine Interface and Accidentology in Shanghai, Sustainable Mobility for Africa in Morocco, and Efficient omnivorous engines and biofuels in São Paulo;

 "OpenLab Design, co-construct the future's mobility" video: <https://www.youtube.com/watch?v=btE7CbDHTVM>

- academic chairs: the "Armand PEUGEOT" chair, the "André CITROËN" chair, the "Drive for All" chair dedicated to the autonomous vehicle and the Embedded Lighting System's chair dedicated to lighting for ADAS.

It should be noted that the network StellLab was also reinforced during first six-months of 2018, with the signature of the Open LAB Artificial Intelligence with INRIA. This OpenLab will concern the work on the algorithms of artificial intelligence for the control of the autonomous vehicle in complex environments; the optimisation of the car's body design; the multimodal identification of passengers; and the modelling of complex systems such as cities to offer needs-adapted mobility services.

As part of governmental initiatives to make France a centre of excellence in AI, a French institute was launched to bring together scientific and industrial leaders in Artificial Intelligence around the development of fundamental and application research activities. The Institute PRAIRIE (Paris Artificial Intelligence Research InstitutE) is created in April 2018; Groupe PSA was one of the founder members alongside INRIA, AMAZON, CRITEO, FACEBOOK, FAURECIA, GOOGLE, MICROSOFT, NAVER LABS, NOKIA Bell Labs, SUEZ and VALEO.

 "Groupe PSA and Inria create an OpenLab dedicated to artificial intelligence" 05/07/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-and-inria-create-openlab-dedicated-artificial-intelligence>

"Groupe PSA, founding member of the PRAIRIE Institute, a centre of excellence dedicated to artificial intelligence" 03/04/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-founding-member-prairie-institute-centre-excellence-dedicated-artificial-intelligence>

The Group contributes to the StellLab network's activities by organising Innovation Scientific Meetings (*Rencontres Scientifiques Innovation*) that bring together universities, engineering schools, research laboratories, spin-offs, startups and SMEs. The meetings are forums for discovering ground-breaking techniques; knowledge sharing and raising awareness about new social trends; initiating new partnerships; increasing innovation capacities and helping to enhance the Group's competitive edge. In 2018, eight meetings were held on topics of strategic importance for the Group: embedded intelligent vision systems, economic intelligence and business analysis; design of experiment for mobile robots; electronics and systems for automotive; physical modelling for vehicles; dynamics control; Israeli Open Innovation opportunities; national security and cyber security aspects; workshop composite; sensor communications car to X.

#### — THE "INSTITUTIONS" ECOSYSTEM

Through its involvement in collaborative projects, the Group can share costs and results, which has a leverage effect for Groupe PSA. In addition, the financial assistance from public authorities favours these collaborative projects and helps to structure the industry.

These collaborative projects, most of which are pre-competitive, receive the support of:

- the technological research institutes to which Groupe PSA belongs ("M2P" Metallurgical Products & Process); "SystemX" (Digital Systems Engineering); "Jules Verne" (Composite Materials);
- VEDECOM (the French institute for low-carbon communicating vehicles and their mobility), which has some 40 members, including Groupe PSA;
- the Economic Interest Grouping RE PSA Renault, in particular through the *Laboratoire d'Accidentologie et de Biomécanique* (LAB);
- the *Groupement Scientifique Moteur* (GSM), an Economic Interest Grouping of Groupe PSA, Groupe Renault and the French Institute for New Gasolineum Energies (IFPEN);
- the PFA (*Plateforme Automobile*);
- direct collaborations.

In 2018, Groupe PSA took part in:

- 21 European commission financed projects (e.g. the connected autonomous vehicle through the SCOOP and L3PILOT projects; new urban mobility objects through EU-LIVE; the production plant of the future through the Thomas, Versatile and Scalable projects);
- approximately 15 projects supported by the French Government, mainly through the National Research Agency, the Public Investment Bank and the Agency for the Environment and Energy Management (ADEME). (e.g. adapting of the autonomous vehicle automation strategy to the driver's needs and situation through the AutoConduct project; air quality in the passenger compartment (QAlcars project); the development of innovative battery packs (the Innovative Equipment for Electric Vehicles project).

Groupe PSA is an active member of competitiveness clusters in the automotive industry (PFA, VEDECOM, MOV'EO, Car of the Future, iD4car), which promote the emergence of collaborative projects, links with SMEs and startups, and the meeting of potential new partners. In addition, Groupe PSA, as a member of VEDECOM, has targeted the activities of the Institut pour la Ville en Mouvement (IVM) for the period 2017-2019. One of the projects, "Hyperlieux mobiles", addresses the subject of the autonomous connected vehicle, no longer characterised by its sole function of transporting people or goods, but by the activities that it can be used for (mobile office, foodtruck, medical practice, etc.). More than 250 cases of mobile activities will be presented during sessions that are designed as public hearings of experts. They will outline the way forward, especially for the second phase of this project: the development of demonstrators.

## 2.1. REDUCE VEHICLE GREENHOUSE GAS EMISSIONS

DPEF.16 DPEF.27 GRI.103-2 GRI.103-3 GRI.302-5 GRI.305-3 SASB-410a.3

Mindful of sustainable development, the Group devotes 38% of its research & development budget to clean technologies. Many of the patents published in 2018 centre on technologies that help reduce vehicle fuel consumption and pollutant emissions. There are a number of focuses:

- powertrain efficiency (IC, hybrid or electric) and depollution systems;
- making vehicles lighter and more ecological in every respect (consumption and reduced need for raw materials);
- vehicle energy efficiency.

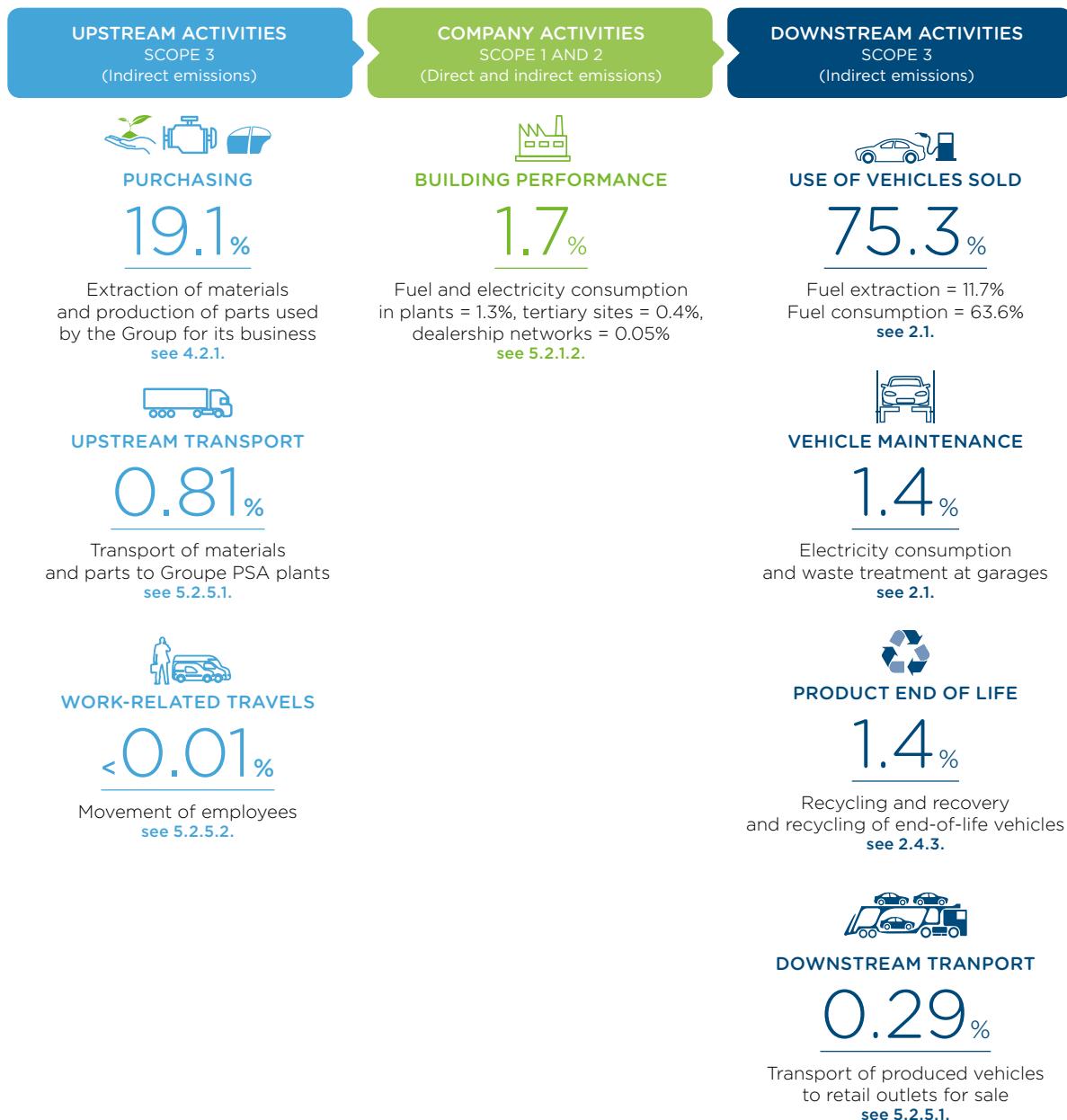
**38%**

of the R&D budget devoted to clean tech

**Three-quarters of the total carbon footprint of the Group's vehicles come from the vehicles' CO<sub>2</sub> emissions (see diagram below). As a result, the Group devotes particular effort to this emission source.**

Beyond the technological developments in the vehicles themselves, the Group is committed to an overall approach involving the reduction of CO<sub>2</sub> emissions by re-imagining mobility (see 2.5.).

### TOTAL CARBON FOOTPRINT OF VEHICLES PRODUCED BY THE GROUP DURING THE YEAR: MAIN EMISSION ITEMS



The calculation method is explained in section 2.4.4.2.

The steps taken by the Group to reduce the emissions of these emission sources are described in the sections indicated.

## 2.1.0. The Group's innovations and new technologies in clean technologies

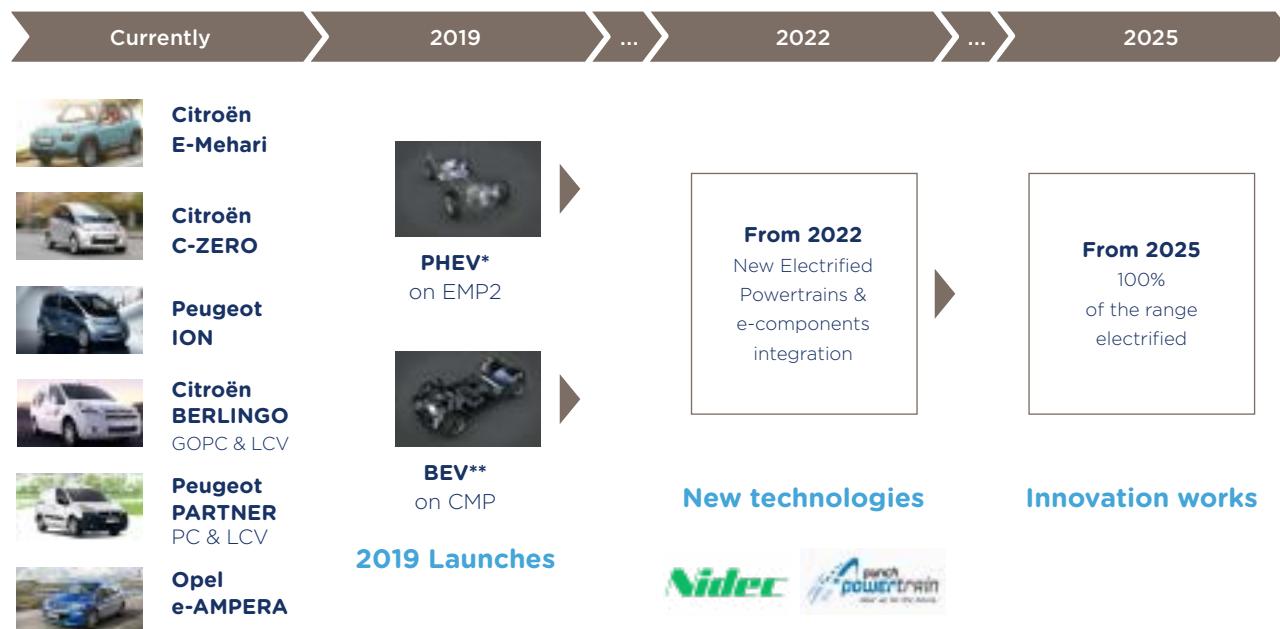
Groupe PSA is a key actor of the PFA (Plateforme Automobile - Automobile French Platform and mobilities). PFA defines and implements measures that help bolster the French automobile sector based on five federated, structured programmes that are at the forefront of the industry, which embed the Group within the framework for the national solution towards "an ecological mobility". These include:

- the new programme "Véhicule à faible empreinte environnementale" (vehicle with low environmental impact), and continuation of the programme "2 L/100 km" by New Industry France;

- the programmes "Stockage de l'énergie" (energy storage) and "Electro mobility" which feed into the programme "Low environmental footprint", by developing solutions for batteries, hydrogen mobility and refilling stations.

### 2.1.0.1. New electrified powertrains

#### GROUPE PSA ROADMAP FOR ELECTRIFICATION



\* PHEV: plug-in hybrid electric vehicle.

\*\* BEV: battery electric vehicle.

From 2019 onwards, through its two multi-energy platforms, Groupe PSA will supplement its range of engines with electrified powertrains (plug-in hybrid and electric) which will respond to market developments, stricter regulations – including access to zero emission areas – and new customer expectations.

In 2025, 100 %  
of models marketed will include  
an electrified version

The **creation of the Low Emission Vehicles Business Unit** in April 2018 is a step towards the Group's aim of developing an electric offering covering its entire range by 2025.

"Creation of a Business Unit dedicated to electric vehicles" 05/04/2018 press release: <https://media.groupe-psa.com/en/creation-business-unit-dedicated-electric-vehicles-alexandre-guignard-appointed-head-new-bu>

In 2017, to step up its electrified vehicle deployment, Groupe PSA also set up a separate department to handle the electric vehicle programmes and announced the creation of a joint venture with Nidec Leroy-Somer Holding named "**Nidec PSA e-motors**", which was endorsed in May 2018. Both partners will benefit from the joint venture, which will enable them **to face the technological challenges ahead and develop cutting-edge electric traction motors for electrified vehicles**.

The aim of the partnership is to design, develop, manufacture and sell a range of electric traction engines of the highest market standard, for mild-hybrid electric vehicles ("MHEV"), battery electric vehicles ("BEV") and plug-in hybrid vehicles ("PHEV"). Production will begin in 2022, with a target of 900,000 units, not only to meet the needs of Groupe PSA, but also those of other car manufacturers.



"Nidec-PSA emotors joint venture created by Groupe PSA and Nidec starts the design of its future electric motors" 22/05/2018 press release: <https://media.groupe-psa.com/en/%E2%80%9Cnidec-psa-emotors%E2%80%9D-joint-venture-created-groupe-psa-and-nidec-starts-design-its-future-electric>

"Groupe PSA and Nidec to set-up a leading joint venture for automotive electric traction motor" 04/12/2017 press release: <https://media.groupe-psa.com/en/groupe-psa-and-nidec-set-leading-joint-venture-automotive-electric-traction-motor>

In September 2018, Groupe PSA and Punch Powertrain announced their intention to sign a joint-venture agreement, named "**Punch Powertrain PSA e-transmissions**", to produce the future generation of the electrified transmission (e-DCT), starting in 2022. The Metz plant will have an annual production capacity of 600,000 e-DCTs. In preparation for production, Punch Powertrain will carry out industrialisation and design of the state-of-the-art production line.

This electrified dual clutch transmission will be:

- designed and developed in Punch Powertrain research centres in Belgium and the Netherlands;
- manufactured at the Group's plant in Metz (Grand Est region, France), chosen for its cost-efficiency and renowned for its expertise in gearbox production.

**With excellent performance, this gearbox will save up to 15% in fuel consumption and reduce emissions in the city thanks to the use of ZEV mode in heavy traffic conditions.** This e-DCT technology will set the benchmark for dual-clutch transmissions in the passenger car and light commercial vehicle segments. With its revolutionary design, the e-DCT gearbox with a 48V configuration, will equip the Group's future mild-hybrid electric vehicles (MHEV).



"Groupe PSA and Punch Powertrain are negotiating terms of a joint venture agreement for the Group's future electrified transmissions" 27/09/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-and-punch-powertrain-are-negotiating-terms-joint-venture-agreement-group%E2%80%99s-future>

Groupe PSA selects Punch Powertrain technology for its future electrified transmission systems 07/05/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-selects-punch-powertrain-technology-its-future-electrified-transmission-systems>

With the electric transition, the manufacturers are likely to lose 60-70% of the added value of vehicles (engines, gearboxes and batteries). To address this risk, the Group's made the choice to integrate with production stages located in France, in a shared and responsible approach with its social partners, through the two joint-ventures mentioned above. Groupe PSA also designs internal battery trays and power electronics, and only purchases cells and modules.



### STAKEHOLDERS DIALOGUE

To support employees in understanding the changes related to energy transformation, PSA University has developed a training plan called "Electric Quest", which offers a 10-minute e-learning session every month for a year to understand upcoming issues.

### Battery electric vehicles (BEV)

For the next generation of electric powertrains from 2025, the innovations are focused on the customers' needs:

- extend range in customer use by:
  - different battery technologies in order to assess their suitability for projected conditions of use,
  - the research of the best efficiency of the electric powertrain;
- lower charging times in line with future available charging powers (350 kW) and easier connection to charging stations (induction charging technologies, for example);
- work on radiant flux (smart grids) in order to absorb the consumption peaks that will inevitably hit the worldwide grid as more electric vehicles enter circulation.

### The plug-in hybrid electric vehicle (PHEV)

For the next generation of full-hybrid powertrains and in particular plug-in hybrid gasoline-electric powertrains, the main focuses are:

- increasing range in ZEV (zero-emission vehicle) mode by using technologies that make it possible to improve the power-to-battery volume ratio, optimising electric engines and reducing agents that transfer the power of the electric engine to the wheel;
- reducing CO<sub>2</sub> emissions by optimising the operation of the powertrain (adapting the technologies to full-hybrid powertrains and developing internal combustion engines that can operate in full-hybrid powertrains);
- increasing temperature comfort in the passenger compartment (air conditioning and heat) with new technologies such as heat pumps.

Finally, the Group is stepping up its work on fuel cell vehicle innovations with a Center of Competences in Rüsselsheim.

### 2.1.0.2. Optimisation of internal combustion engines

Concerning internal combustion powertrains, innovation activities are directed at:

- reducing the consumption of the subassemblies that make up the powertrain while improving their performance. The innovative technologies being studied target: optimisation of the thermodynamic cycle for the internal combustion engine (Miller cycle); the variable compression rate; reducing internal friction of the different subassemblies;
- using after-treatment to reduce pollutant emissions. The systems studied make it possible to eliminate pollutants, no matter what the vehicle's conditions of use, while working on the inter-dependence within their scope of efficiency. Systems containing additional electric heating are being studied to increase the operating ranges.

#### Mild-HYbrid48V (MHEV)

Groupe PSA is working on a new development in internal combustion engines with the addition of Mild-HYbrid48V combined with a small battery, which recovers the energy generated on braking to reuse it for vehicle traction, thus cutting down on fuel use.

For a slightly higher cost, this new generation of electrified IC engines will reduce CO<sub>2</sub> emissions by around 15% compared to a vehicle powered entirely by an internal combustion engine.

As part of this, the Group is investing in the PFA platform's Forty-Eight collaborative project, which forms one of the technological building blocks of the "2 l/100 km Vehicle", proposing the migration of the energy-intensive equipment (air conditioning, heated windscreens, etc.) to the 48V circuit for electrified internal combustion engines (Mild-HYbrid48V) in order to reduce the vehicle's fuel consumption and CO<sub>2</sub> emissions.

### 2.1.0.3. Breakthrough actions by Groupe PSA: a partnership with NGOs to measure the real-world fuel consumption of its vehicles

#### Breakthrough actions by Groupe PSA

##### — A PARTNERSHIP WITH NGOS TO PUBLISH THE REAL-WORLD EMISSIONS OF ITS VEHICLES

In November 2015, amid media reports discrediting the automotive industry, Groupe PSA decided to take a uniquely transparent approach to customer communication, publishing the real-world fuel consumption figures for its cars. This initiative was the first of its kind in the world in the automotive industry.

**In October 2017 the initiative was awarded the ECOBEST prize** by an AUTOBEST panel of 28 representatives from the European media. ECOBEST is a prize awarded to environmental preservation programmes. The vote was unanimous – the project by Groupe PSA impressed all members of the panel, who judged it to be enterprising, in particular for its scientific approach to real world consumption and emissions.



"The test protocol developed by Groupe PSA, T&E, FNE and Bureau Veritas wins the ECOBEST 2017"

05/10/2017 press release: <http://media.groupe-psa.com/en/test-protocol-developed-groupe-psa-te-fne-and-bureau-veritas-wins-ecobest-2017>

"A world-leading commitment to transparency" video: <https://www.youtube.com/watch?v=IhfvlifNV9Q&feature=youtu.be>

"Groupe PSA discloses vehicle emissions in real driving conditions" 06/03/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-discloses-vehicle-emissions-real-driving-conditions>

Mindful of gaining its customers' trust, the Group adopted an approach that is more proactive than the regulations require, taking the initiative to publish, real-world (road driving) fuel consumption figures for its top-selling vehicles, under the supervision of independent third-party organisations; Measurements are taken in accordance with a test protocol outlined by two NGOs and audited by Bureau Veritas, an internationally renowned independent organisation. Inspired by the "Real Driving Emissions" (RDE) European project, the protocol uses portable equipment known as PEMS (Portable Emission Measurement System) that is installed on the vehicle. Bureau Veritas vouches for the protocol and its performance under specified conditions (public roads open to traffic, use of air conditioning, luggage and passenger weight, non-professional drivers, etc.) and certifies the fair presentation and integrity of the results. The results of measurements conducted on 60 mid-range models were published on the PEUGEOT, CITROËN and DS AUTOMOBILES websites.

The measurements obtained on the 60 mid-range models made it possible to estimate the consumption in real-world driving conditions of more than 1,000 versions of PEUGEOT, CITROËN and DS AUTOMOBILES vehicles. In 2017, using this as a base and still with the aim of providing customers with full and transparent information about the real-world fuel consumption of the models, PEUGEOT, CITROËN and DS AUTOMOBILES launched an application on their website that enables customers to:

- view the fuel consumption data for their model in a web-based application, by entering its characteristics (body type, trim level, engine, gearbox and type of tyres);
- estimate their own consumption based on the actual use of their vehicle (number of passengers, load, driving style, etc.) using an online configurator.

The configurator is now available on the brands' websites in 12 European countries, enabling customers to choose the most fuel-efficient models.

In 2018, additional measurements have been made on light commercial vehicles (LCV), and customer average fuel economy for this category of vehicles are now available on-line (Euro 6.b versions).

In 2019, Groupe PSA is studying the possibility of extending the protocol to OV vehicles.

## Contributing to public debate: the protocol for measuring real-world vehicle emissions is distributed in open source

Groupe PSA made public the protocol for measuring real-world fuel consumption that outlines the resources and methods which must be systematically used to measure the average customer's average real consumption. In this way, the Group positioned itself as a leading player by publishing and sharing a protocol that can serve as a reference.

In September 2017, after 18 months of tests on 60 vehicles, 430 on-road trials and over 40,000 kilometres travelled, Groupe PSA, the NGOs and Bureau Veritas published a detailed report containing information taken from the real-world fuel consumption measurements.

The results show that:

- PEMS tests provide a robust, representative and repeatable basis for measuring real-world fuel economy and CO<sub>2</sub> emissions. The test protocol has a margin of error of just ±3%. The roughly one thousand results not only match internal data held by Groupe PSA from the Group's customers, but also the information uploaded by the drivers themselves onto public web-based data sets such as Germany's [www.spritmonitor.de](http://www.spritmonitor.de);
- for an average consumption of 6 l/100 km in real driving conditions, there is a 10% difference between the measurements taken in the WLTP cycle and 42% with those of the NEDC cycle (which will be used as a reference until January 2019).

In 2019, Groupe PSA intends to adapt the test Protocol for hybrid vehicles. This will allow customers to get clear information on next generation of plug-in hybrid vehicles that will be launched by Groupe PSA in 2019.



## STAKEHOLDERS DIALOGUE

On 6 September 2017, Groupe PSA and the NGO Transport & Environment submitted the results of the real-world fuel consumption tests to the European Commission.

Gilles Le Borgne, Head of Quality and Engineering at Groupe PSA, said: "This robust protocol is the fruit of an unprecedented, successful collaboration between a manufacturer, NGOs and a certifying body. It's available so that others can use it as a resource for promoting more transparency with their customers and enable them to choose more fuel-efficient vehicles."

Greg Archer, Director, Clean Vehicles, at the NGO Transport & Environment, said: "The test for measuring real-world fuel consumption that was developed with Groupe PSA provides information that's more representative than laboratory tests. These tests show that it is perfectly possible to achieve CO<sub>2</sub> emissions and fuel consumption figures almost identical to those obtained by drivers on the road. But real-driving tests are only part of the solution to the emission cheating scandal. The EU decisions on how and who approves cars for sale will be key to ensuring the system of testing and approving cars is independent and rigorously enforced."



"A real-world fuel consumption test protocol developed by Groupe PSA, T&E, FNE and Bureau Veritas provides accurate information for drivers" 05/09/2017 press release: <http://media.groupe-psa.com/en/titre>

"Groupe PSA, NGOs T&E and FNE, and Bureau Veritas publish the protocol for measuring real-world fuel consumption" 10/10/2016 press release: <http://media.groupe-psa.com/en/press-releases/group-realworld-fuel-consumption-protocol-publication>

## 2.1.1. Strategy for reducing vehicle fuel consumption and CO<sub>2</sub> emissions

DPEF.15

GRI-201.2

### 2.1.1.1. CO<sub>2</sub> emissions: a decisive CSR issue for the Group's economic performance

#### Tightening regulations at the global level and related financial risks

In Europe and Brazil, emissions regulations focus mainly on environmental protection. Chinese emission control systems also aim to strengthen the country's energy independence.

In the decade between 2015 and 2025, **regulatory requirements such as CAFE (Corporate Average Fuel Efficiency)** standards will be tightened worldwide and will be reflected in CO<sub>2</sub> and fuel consumption targets that must be achieved on the average number of vehicles sold annually. Failure to achieve these annual targets will result in hefty fines or suspensions of sales, depending on the geographical area. These penalties are based on the amount by which the threshold is exceeded and the total number of vehicles per car manufacturer.

#### ● CAFE Europe:

- target set for each car manufacturer based on the average weight of vehicles sold (target for average car manufacturers: 95 g/km of CO<sub>2</sub> in 2020 for 95% of the fleet, and starting 2021 for 100% of the fleet);
- calculation method includes:
  - > phase-in 95% in 2020 (95% of the fleet of passenger cars has to be compliant with exclusion of the worst 5% in 2020, 100% has to be compliant from 2021),
  - > super-credits for low-emission vehicles (electrical and plug-in hybrid vehicles, whose CO<sub>2</sub> emission is lower than 50 g/km of CO<sub>2</sub>): for instance, starting from an average of 100 g/km CO<sub>2</sub>, the addition of 1% of electrical vehicles will decrease the CO<sub>2</sub> average to 98 g/km of CO<sub>2</sub> in 2020 (super-credit equal 2 in 2020),

- > eco-innovations (technologies that allow CO<sub>2</sub> emission reduction in real-world driving conditions, which is not measurable with the approval procedure);

if these objectives are exceeded, a penalty will be applied amounting to €95 per g/km of CO<sub>2</sub> and per vehicle, e.g. for Groupe PSA approximately €240 million for 1 g/km of CO<sub>2</sub> exceeding the target, considering the order of magnitude of total sales of passenger cars in Europe, including OPEL and VAUXHALL;

- CAFE China:
  - as in Europe, target set for each car manufacturer based on the average weight of vehicles sold (target for average car manufacturers: 4.9 l/100 km in 2020),
  - if the target is exceeded, there will be a suspension of authorisation for new investments; suspension to market vehicles that exceed the thresholds; and negative publicity;
- CAFE Brazil: if the target is exceeded, vehicles produced locally are subject to the same tax as, imported vehicles which is a 30% increase, corresponding to a risk of more than €40 million for the Group;

- other existing regulations: Mexico, Japan, South Korea, Saudi Arabia, India, Iran.

In 2017, China officially published a new regulation to impose electric and hybrid vehicle quotas from 2019. Already in place in the US and South Korea, these quota rulings for a particular technology could be introduced in other regions.

At the same time, **tax incentives** (France, the Netherlands, Germany, China, etc.), vehicle **fuel consumption labelling** (Brazil, India, Korea, Iran, etc.), and the spread of limited access downtown areas and low-emission zones are accelerating the development of more environmentally responsible technologies. These programmes are changing consumer behaviour by encouraging the purchase of vehicles with low CO<sub>2</sub> emissions. As the Group is seeking to increase its market share, it needs to adapt its vehicles and technologies to customers' changing expectations.

## Large-scale capital expenditures

The R&D budget is distributed based on the priorities set out in the Push to Pass strategic plan. (See 2.0.2.)



### *Impact measurement and economic assessment*

Environmental innovations relating to the product, which make it possible to reduce fuel consumption and CO<sub>2</sub> emissions, are essential for two reasons:

- the need to control operational risks (non-approval of vehicles) and financial risks (payment of fines, increase in taxes) in case of non-compliance with the fuel consumption or emission thresholds set by regulations in the various Group markets. **The annual risk for a company the size of Groupe PSA is around €1-2 billion in loss of revenue**, depending on where the vehicles are sold;
- sales development opportunities: the Group's new environmental technologies are in line with consumers' changing expectations. Vehicles that emit less than 100 g/km of CO<sub>2</sub> accounted for more than 18% of the Group's sales volumes in 2018. In addition, **the strategy to deploy plug-in hybrid powertrains and electric vehicles offers potential additional revenue for the Group estimated at between 4% and 5%**.

The Group's strategy is to take full advantage of the market opportunities generated by the combined effect of consumer preference for flexible and efficient mobility and stricter environment standards. **The Group is reducing its vehicle diversity to focus on developing environmentally-friendly technologies that can be applied on a large scale and boast the dual advantage of capitalising on research and development investments through high production volumes, which are having an environmental impact on the emissions of the entire fleet.**

Advances in clean technology have also had a favourable economic impact for customers. For instance, thanks to the environmental performance improvements of the PureTech engine, a business (B2B) customer in France saves around €170<sup>(1)</sup> per month in usage costs for his vehicle, compared to the previous model of this same vehicle: the tax on company cars and the fuel consumption are a major portion of the TCO (Total Cost of Ownership) of the vehicle.

(1) Comparison CITROËN C4 gasoline passenger car 120 hp Euro 5 and 130 hp Euro 6 based on 30,000 km annually, fuel cost: €1.40/l.

### 2.1.1.2. CO<sub>2</sub> performances of Group vehicles: a trajectory in line with the COP21 commitments

DPEF.28

GRI.305-4

GRI.305-5

SASB-410a.1

By 2025, the automotive industry should have proven that it can be more energy efficient and environmentally friendly.

The Group has publicly committed to reducing the average CO<sub>2</sub> emissions level of its vehicles marketed globally between 2012 and 2025 by 30% and to further reduce these levels by 55% by 2035.

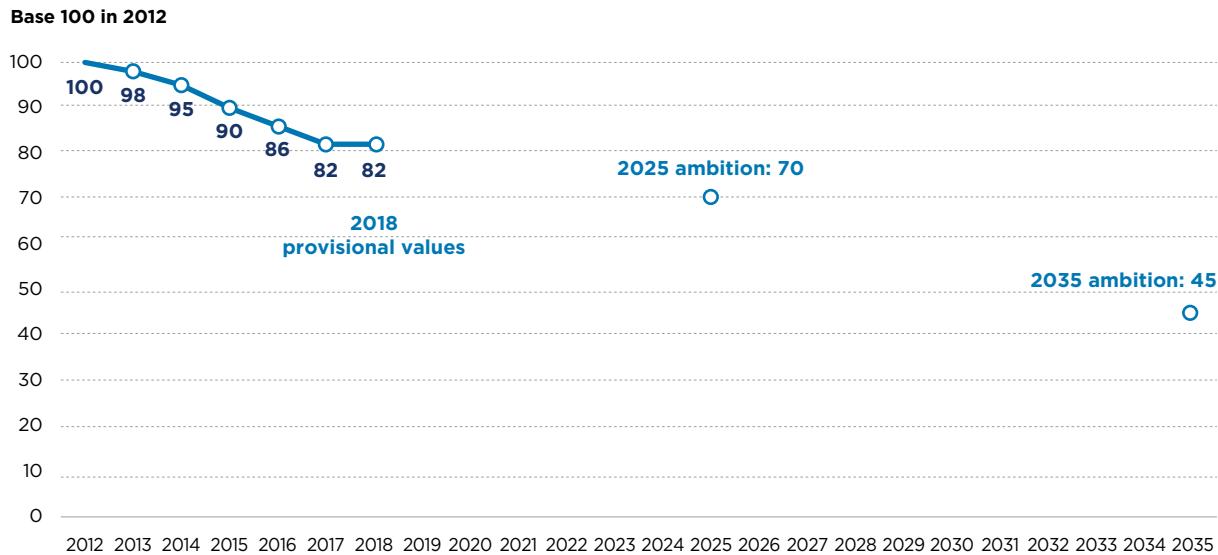
#### Reduce Group emissions by 30% between 2012 and 2025, and 55% between 2012 and 2035

To consolidate its position as an environmental leader, Groupe PSA aims to systematically offer:

- for the highest-selling models in the main segments, one of the top cars for CO<sub>2</sub> emissions;
- vehicles with ground-breaking fuel consumptions, but that still deliver superior features and equipment.

The monthly CO<sub>2</sub> Corporate Committee gathers the Managing Board and Executive Committee to share the forecast of vehicles CO<sub>2</sub> emission average for short, middle and long-term in all countries/areas (especially where CAFE/CO<sub>2</sub> regulation exists). All hypotheses are calculated by the Group's CO<sub>2</sub> experts using internal data related to Group's current and future technologies and external data related to climate scenarios and market trends. Action plans (technical enablers, product plan adaptation and strategy) to reach the Group's targets are then decided by the CO<sub>2</sub> Corporate Committee members.

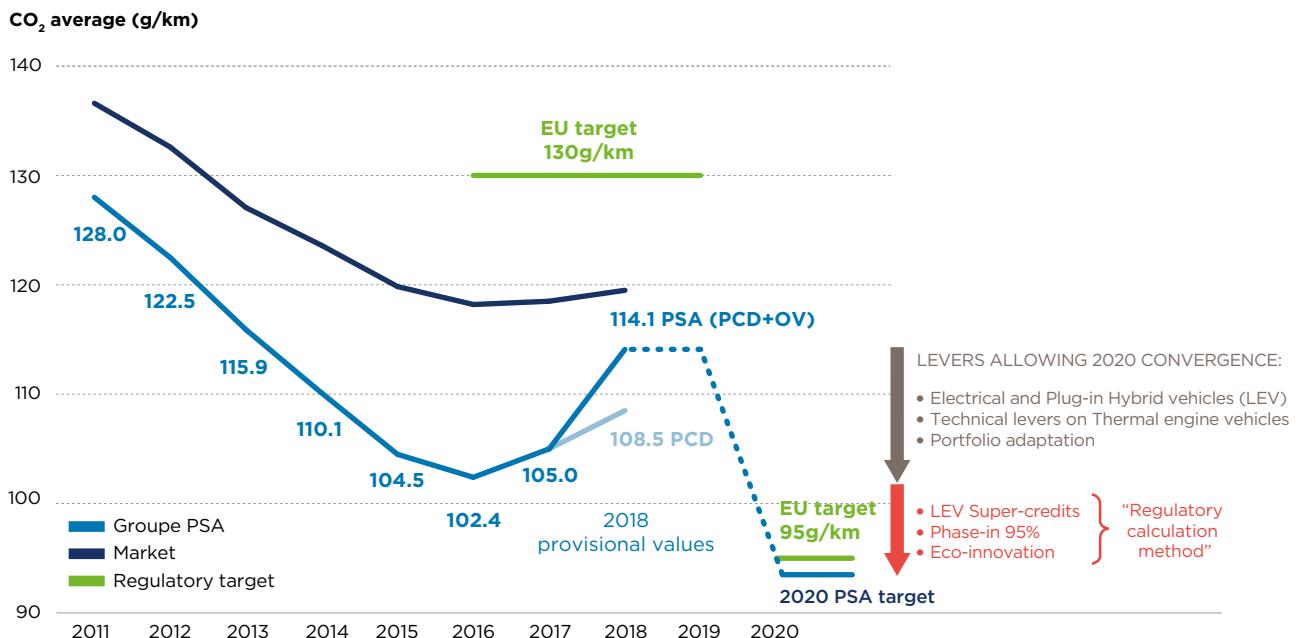
#### CO<sub>2</sub> TRENDS OF THE GROUP WORLDWIDE\*



\* NB: the suggested base = 100 approach makes it possible to place the contributions of each market in a single benchmark, in the context of the standards in the different areas not being consistent on regulated physical size (CO<sub>2</sub> emissions, fuel consumption or energy efficiency) or measurement procedures (see CAFE standards in 2.1.1.1.).

Globally, the Group's worldwide CO<sub>2</sub> emissions average in 2018 is stable compared to 2017, despite the integration of OPEL and VAUXHALL. The improvements in other areas enable the downward trend in CO<sub>2</sub> emission in Europe to be balanced out.

THE GROUP'S CO<sub>2</sub> TREND IN EUROPE 28 (PASSENGER CARS) AND LEVERS ALLOWING THE REVERSE OF THE TREND



In 2018, for Passenger Cars in Europe, the steep fall in the diesel market share (diesel vehicles' CO<sub>2</sub> emissions are lower than those of gasoline cars), and the upscaling of vehicles sold (increase in sales of SUVs), led to a 3.3% increase of average CO<sub>2</sub> emissions compared to 2017, for PCD perimeter. The same trend can be noticed for the whole European market. In addition, Groupe PSA integrated the OPEL and VAUXHALL fleet in 2018, which led to an additional increase of 5.3% of CO<sub>2</sub> average for Passenger cars in Europe. Nevertheless, despite the OPEL and VAUXHALL integration – with CO<sub>2</sub> emissions of 114 g/km – **Groupe PSA remains better placed than the European market and has a margin of 8% compared to its European regulatory target.**

**114** g/km of CO<sub>2</sub>  
approved average emissions in Europe  
in 2018, including OV

Groupe PSA, as an historic leader on CO<sub>2</sub> performance, has proved many times its ability to deploy innovative technologies to meet regulatory and environmental requirements. **The whole company is committed on CO<sub>2</sub> convergence, from the R&D department to commercial network, in order to maintain regulatory compliance and the position of Groupe PSA among CO<sub>2</sub> performance leaders:**

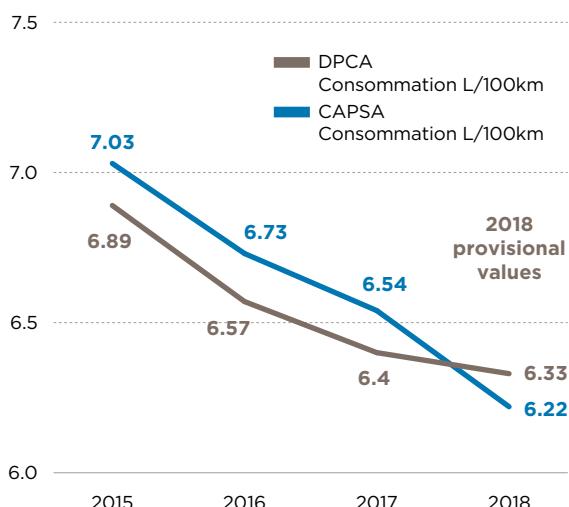
- For European passenger cars, Groupe PSA commits to reach a Q4-2019 CO<sub>2</sub> average of produced cars lower than 2018;
- Groupe PSA will launch four plug-in hybrids (on EMP2 platform) and two BEVs (on e-CMP platform) before the end of 2019;
- by 2020, Groupe PSA will drastically decrease the CO<sub>2</sub> average thanks to the deployment of electrical and plug-in hybrid vehicles; technical levers on ICE vehicles (see 2.1.3.); and portfolio updates. Synergy with PSA technologies will allow a faster improvement of CO<sub>2</sub> performance of OPEL and VAUXHALL vehicles. All these actions are part of Push to Pass plan and PACE! plan and will ensure both compliance

with regulatory CO<sub>2</sub> levels and preservation of economic performance of the company, even in the case of an energy mix with diesel down to 10% and LEV sales limited to 7%.

In 2018, 18% of the Group's vehicles sold had CO<sub>2</sub> emissions of less than 100 g/km, while on the European market as a whole, these models represented only 14% of passenger car sales. The Group therefore positions itself as a key player in the low-CO<sub>2</sub> emissions segment.

THE POSITION OF THE GROUP'S JOINT VENTURES IN CHINA

Approved fuel consumption average (l/100km)



The Group's two joint ventures in China, DPCA (DONGFENG PCA) and CAPSA (CHANGAN PSA AUTOMOBILES), posted average fuel consumption (Corporate Average Fuel Consumption or CAFC, measured in l/100 km according to regulations) that was on average a 1.21% improvement in 2018, compared to 2017.

In China, a comparable effort to the one in Europe is being deployed applying the same technical levers: deploying of the three-cylinder EB PureTech engine, fourth-generation automatic gearboxes, lighter EMP2 (Efficient Modular Platform 2) and CMP (Common Modular Platform), and constantly improving all areas of the vehicle (including beneficial technologies in real-world driving conditions known as off-cycle technologies).

### Avoided emissions

By using its low-emission vehicles, Groupe PSA estimates that 223 Mt of CO<sub>2</sub> will be avoided in the world over a 13-year period (2012-2025).

The method for calculating avoided emissions is based on a comparison between the average emissions of Group vehicles worldwide in 2012 (153 g/km of CO<sub>2</sub>) and 2018 (126 g/km of CO<sub>2</sub>),

i.e. a reduction of 3.2% per annum. Based on an assumption of a 3% reduction per year, in line with our target of 30% between 2012 and 2025 – and 4 million vehicles sold (including OPEL and VAUXHALL), with an average of 15,000 km travelled per year per vehicle and an average of 10 years of car use, the quantity of avoided CO<sub>2</sub> emissions between 2012 and 2025 is as follows: in 2013: 2.8 Mt; in 2014: 5.4 Mt; etc.; in 2025: 30.1 Mt - a total of 223 Mt of CO<sub>2</sub> avoided.

**223** million  
tonnes of CO<sub>2</sub> avoided between 2012 and 2025

### 2.1.2. Engine development serving the CO<sub>2</sub> trend

DPEF.16 DPEF.24 DPEF.27 SASB-410a.2

#### GROUP VEHICLE SALES BY REGION AND FUEL TYPE

		China and ASEAN	Eurasia	Europe	India and Pacific	Latin America	Middle East and Africa	Total	as a % of total annual sales	
<b>Gasoline (+ LPG)</b>	<b>2018 (PCD+OV)</b>	<b>261,126</b>	<b>7,657</b>	<b>1,722,282</b>	<b>13,802</b>	<b>113,082</b>	<b>203,177</b>	<b>2,321,127</b>	<b>59.86%</b>	
	<i>2018 (o/w OV)</i>	494	349	700,193		1,120	22,617	724,774	69.82%	
	<i>2018 (o/w PCD)</i>	260,632	7,308	1,022,089	13,802	111,962	180,560	1,596,353	56.38%	
	<i>2017 (PCD)</i>	385,885	7,057	848,580	14,744	145,042	483,127	1,884,435	58.37%	
	<i>2016 (PCD)</i>	616,602	5,925	750,724	11,250	132,199	269,710	1,786,410	56.78%	
<b>Diesel</b>	<b>2018 (PCD+OV)</b>	<b>1,410</b>	<b>11,888</b>	<b>1,368,342</b>	<b>12,660</b>	<b>62,262</b>	<b>89,617</b>	<b>1,546,178</b>	<b>39.87%</b>	
	<i>2018 (o/w OV)</i>	40	94	300,422		104	10,290	301,949	29.95%	
	<i>2018 (o/w PCD)</i>	1,370	11,794	1,067,920	12,660	62,158	79,327	1,235,229	43.62%	
	<i>2017 (PCD)</i>	1,127	7,849	1,147,066	11,292	61,079	108,859	1,337,272	41.42%	
	<i>2016 (PCD)</i>	1,750	4,564	1,171,665	8,617	51,708	113,769	1,352,073	42.97%	
<b>Hybrid</b>	<b>2018 (PCD+OV)</b>			<b>72</b>			<b>1</b>	<b>73</b>	<b>0.00%</b>	
	<i>2018 (o/w OV)</i>								0.00%	
	<i>2018 (o/w PCD)</i>			72			1	73	0.00%	
	<i>2017 (PCD)</i>			441			2	443	0.01%	
	<i>2016 (PCD)</i>			1,536	2		2	1,540	0.05%	
<b>Electric</b>	<b>2018 (PCD+OV)</b>			<b>10,222</b>	<b>17</b>	<b>27</b>	<b>121</b>	<b>10,387</b>	<b>0.27%</b>	
	<i>2018 (o/w OV)</i>			2,334				2,334	0.22%	
	<i>2018 (o/w PCD)</i>			7,888	17	27	121	8,053	0.28%	
	<i>2017 (PCD)</i>			2	6,175	12	12	30	6,231	0.19%
	<i>2016 (PCD)</i>			1	6,333	17		8	6,359	0.20%

As an environmental pioneer in CO<sub>2</sub> emissions from passenger cars, the Group is continuing to develop more and more efficient products by identifying technical solutions whose cost effectiveness is best for its customers. The technical solutions studied for all of the Group's markets, including China, centre around the major approaches listed below.

### 2.1.2.1. Electrification: an ambitious plan to roll out hybrid and electric technologies

DPEF.16 DPEF.24 DPEF.26 DPEF.27

The environmental challenges associated with vehicle use are being met by technological solutions designed to drive powerful breakthroughs in fuel efficiency and CO<sub>2</sub> emissions. The introduction of hybrid solutions ranging from micro-hybridisation such as Stop & Start, to plug-in hybrid vehicles, and to zero-emission electric vehicles are poised to enable the Group to consolidate its position in the low-emission vehicle segment in Europe and extend its expertise to all of its other markets.

Solutions	Potential of reduction of CO <sub>2</sub> emissions
Stop & Start technology	5%
Hybrid vehicles	15%
Plug-in hybrid vehicles	65%
Battery electric vehicles	100%
Fuel cell vehicles	100%

In its Push to Pass strategic plan, the Group has committed to putting eight plug-in hybrid vehicles and seven battery electric vehicles with different-sized engines and battery capacity on the market between 2019 and 2021, thereby meeting a wide range of types of use and budgets.

With the *PACE!* plan, launched in November 2017, OPEL and VAUXHALL turned a corner on its journey towards electrification. With unrestricted access to Groupe PSA technologies, OPEL and VAUXHALL will be able to offer a range of electrified passenger cars in Europe by 2024. These vehicles will have a 100% electric or plug-in hybrid engine, to supplement efficient internal combustion engines. By 2020, OPEL and VAUXHALL will have four electrified carlines on the market, including the Grandland X PHEV and the next generation Corsa as a fully electric vehicle.

**In 2025, 100% of the models marketed by the Group worldwide will be offered in electric or plug-in hybrid versions. The LEV European sales trends expected for the Group is aligned with LEV bonus threshold of post 2020 CO<sub>2</sub> emission coming regulations (around 15% in 2025 and 35% in 2030 for Passenger Cars). This progression is consistent with 2035 ambition of 50% of sales.**

#### Battery electric vehicles

The Group is working on both extending its range of electric vehicles and the related mobility services, and is developing technologies to boost vehicle performance.

#### Electric vehicle range

Since 2010, the Group – a pioneer in electric vehicles – has sold 39,400 electric vehicles worldwide. In 2017, two new versions of electric passenger leisure-activity vehicles were added to its range, including both passenger cars and light commercial vehicles (PEUGEOT iOn and Partner, CITROËN C-Zero and Berlingo); PEUGEOT Partner Tepee Electric and CITROËN e-Berlingo Multispace. These vehicles have an approved range of 170 km, which is in line with the usage of most European drivers who travel on average less than 60 km a day. OPEL also offers the e-Ampera.

**To help it meet its target of 100% of its models marketed being electrified by 2025, the Group is developing an electric vehicle programme with DONGFENG MOTOR CORP. Based on an electric version of the CMP platform (e-CMP), it will spawn a new generation of versatile and spacious electric vehicles with lithium-ion battery technology, enabling them to run for up to 350 km (WLTP) on one charge and offering ultra-fast charging up to 80% of the battery in less than 30 minutes.**

7  
new electric models by 2021

 “New generation electric vehicles”  
video: <https://www.youtube.com/watch?v=rlj944NM6YE&list=PL6CCD8AAB157C61E8>

#### Electric mobility offerings

The Group's electric vehicles are already used in many urban car-sharing services set up with communities and private partners in numerous European cities (see 2.5.1).

The Group has a “ChargeMyPEUGEOT” and “ChargeMyCITROËN” service offering, whereby customers can charge their electric vehicles in an extensive network of public charging points, through its ChargeNow partner.

 “Groupe PSA and DCS offer access to a French network of more than 6,300 electric charging stations for PEUGEOT & CITROËN vehicles” 06/03/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-and-dcs-offer-access-french-network-more-6300-electric-charging-stations-PEUGEOT-citro%C3%ABn>

For OPEL e-Ampera customers, an “Opel charge card” is available, based on a partnership with NewMotion in Germany, the Netherlands and Switzerland.

#### Plug-in hybrid vehicles

Armed with the experience gained from developing the hybrid-diesel technology, the Group is now developing a plug-in full-hybrid powertrain connected to a gasoline engine in order to support its worldwide growth. **It will help compliance with future emission regulations worldwide, by enabling emission levels of less than 49 g/km of CO<sub>2</sub>, i.e. 2.2 l/100 km in all areas and will run 50 km (WLTP) in fully electric mode in urban and suburban environments.**

Eight high-end plug-in hybrid vehicles (SUVs and sedans) will be launched between 2019 and 2021. For easier use, the plug-in hybrid will be sold with a system that charges the car in under four hours and an option for a fast two-hour charging time.

8  
new plug-in hybrid models by 2021



"Plug-in hybrid" video: <https://www.youtube.com/watch?v=fDdSB55gnYE&list=PL6CCD8AAB157C61E8&index=2>

"Behind the Scenes Plug-In Hybrid Electric Vehicles" press kit: <https://media.groupe-psa.com/en/behind-scenes-plug-hybrid-electric-vehicles?idtok=ad330bbb230>

In September 2018, during the Paris Motor Show, the PEUGEOT brand presented its new plug-in hybrid gasoline engines. The HYBRID engine and the HYBRID4 (four-wheel-drive) engine will be integrated to the new PEUGEOT 508 and 3008 respectively. They will be available by the Q2-2019.



"New PEUGEOT PLUG-IN HYBRID: So efficient, So Exciting!" 24/09/2018 press release: <https://int-media.PEUGEOT.com/en/new-PEUGEOT-plug-hybrid-so-efficient-so-exciting-0?idtok=b9502bbb408>

### Micro-hybridisation: Stop & Start technology and e-HDi

Stop & Start technology allows the engine to shut down automatically when the vehicle is standing still or in neutral and to start up again instantly and noiselessly when reactivated by the driver. As a result, it helps to **reduce carbon emissions by up to 15%** in city driving. When combined with the system's cost-effectiveness, its features help to provide an efficient solution to a number of traffic-related issues in cities, where 75% of Europeans live.

Introduced by the Group in 2004, this technology is now deployed across almost all the PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL ranges in Europe and in 67% of vehicles in China in 2018, compared to 40% in 2017. The Group's strategy consists in extending deployment to all geographical areas, by combining it with recent advances in diesel and gasoline engines as well as innovative technologies for managing vehicle electrical consumption.



"Micro-hybridization: e-HDi technology" video: [https://www.youtube.com/watch?v=cfJ9lpg\\_Zeo](https://www.youtube.com/watch?v=cfJ9lpg_Zeo)

### 2.1.2.2. Continued optimisation of internal combustion engines

[DPEF.16](#) [DPEF.24](#) [DPEF.26](#) [DPEF.27](#)

Groupe PSA is continuing to optimise its internal combustion engines in all geographical areas to reduce their fuel consumption and consequently their CO<sub>2</sub> emissions.

**The Group implements highly innovative technological solutions in engine architecture as well as in fuel intake, injection and emissions-control systems.** The main levers for optimising efficiency include:

- downsizing (reducing engine size and the number of cylinders), sometimes combined with turbo charging, thereby reducing fuel consumption while maintaining performance;

- increasing torque while reducing maximum power, thus lengthening the power and torque bands and increasing fuel efficiency;
- reducing mechanical friction (oil, piston rings, oil pump, actuators, accessories, permeability, etc.);
- optimising combustion technology.

Some of the highest-performance technical solutions for internal combustion engines are available on Groupe PSA vehicles, with the deployment of new-generation gasoline engines.

In addition to these performance optimisations, Groupe PSA is working on a new development in internal combustion gasoline engines through Mild-HYbrid48V. (See 2.1.0.2.)

#### Reducing thermal engine fuel consumption and exhaust emissions

At the end 2013, of the Group launched the EB Turbo PureTech engine, a three-cylinder, 1.2-litre gasoline engine that combines reduced dimensions and weight for benefits and performance unprecedented for this level of displacement. By 2019, annual production will be in excess of 1 million units.

The first version of this three-cylinder EB Turbo PureTech gasoline engine, which is the subject of 120 patents, helped reduce fuel consumption and CO<sub>2</sub> emissions by 18% compared to the earlier four-cylinder gasoline versions. Significant improvements were made in 2017 which increased performance and fuel consumption by up to 4%

In June 2018, this engine won the **2018 Engine of the Year Award** in the 1 litre to 1.4 litre category. **This is the 4<sup>th</sup> consecutive time the engine has won the award.**



"The Group's Turbo PureTech gasoline engine named International Engine of the Year" 06/05/2018 press release: <https://media.groupe-psa.com/en/groupe-psa's-turbo-puretech-petrol-engine-named-international-engine-year>

Launched in 2017 on the new PEUGEOT 308, the new generation is now being deployed on Groupe PSA vehicles across some 100 applications in more than 70 countries.

This engine completes the modular family of three-cylinder PureTech gasoline engines (1-litre and 1.2-litre) with many high-tech features unveiled by the Group in 2012, ranging in power from 50 to 100 kW and offering gasoline-engine vehicles that emit less than 100 g/km of CO<sub>2</sub> in the naturally aspirated version and less than 110 g/km with the turbo engine.

Since 2006, the Group has been selling the EP 1.6-litre range of four-cylinder gasoline engines, which have been named engine of the year eight times in their category by Engine Technology International.

To boost its growth outside Europe, Groupe PSA has decided to introduce these clean, efficient, high-performance, high-tech gasoline engines as early as possible to these markets. In emerging markets, where mainly gasoline engines are being deployed, there are growing trends toward European-style regulations, government incentives and consumer expectations.

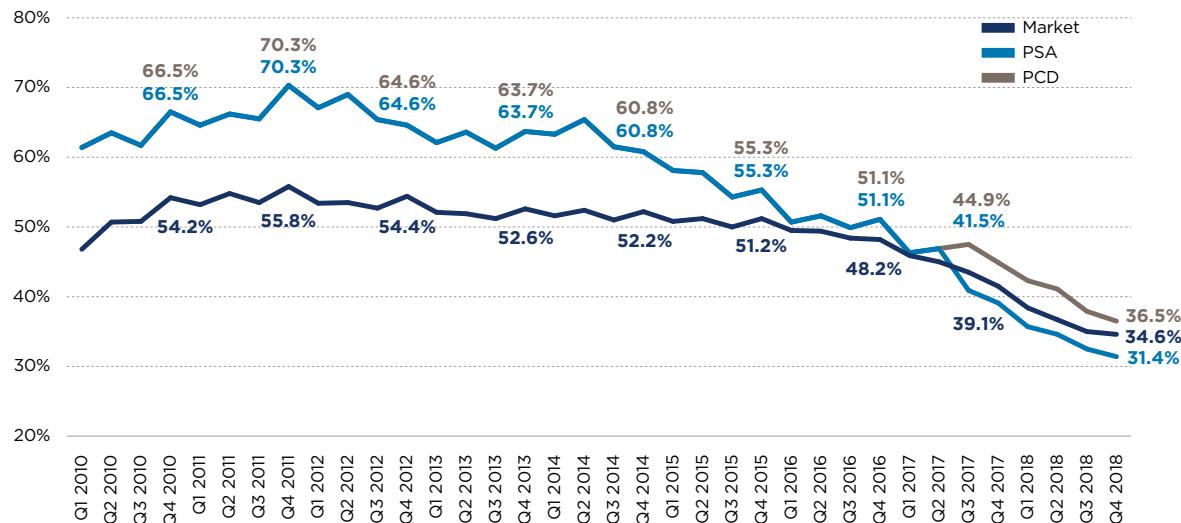
These new developments take into account the specific expectations of the main markets:

- flex-fuel models for the Brazilian market;
- the deployment in China of these new engines will enable the Group to meet its targets to reduce the CO<sub>2</sub> emissions of its vehicles on this market.



### *Impact measurement and economic assessment*

DIESEL'S MARKET SHARE FOR GROUPE PSA PASSENGER CARS (PC) BELOW AVERAGE MARKET SHARE FOR SALES IN EUROPE (IN THE EUROPE 22 SCOPE).



To meet growing demand from customers for gasoline and electric engines:

- the Group has doubled its production of the three-cylinder turbo gasoline engine in France in 2018, with the new production line launched in Trémery late 2017, in addition to the production of Douvrin. This has increased the potential to almost 700,000 engines per year. Early 2019, the Group inaugurated a new assembly line for this engine in the Tychy plant, in Poland, for a production capacity projected up to 460,000 engines. With this new line, the EB Turbo PureTech gasoline engine is gradually becoming a global-scale engine for Groupe PSA. The EB Engine will be produced from 2019 onwards in Hungary (Szentgotthard), Morocco (Kenitra), and from 2020 in India (Hosur);
- Groupe PSA announced in December 2017 that its future electric engines would be produced in Trémery as part of a joint venture with the holding company of the Japanese car manufacturer Nidec Leroy-Somer. Under this agreement, main components of the electric traction motor will be designed, engineered and produced in France. Production will begin in 2022, with a target of 900,000 units.

All these decisions are part of the Group's deployment of its technological offensive to adapt to the changing market and to modernise its plants.

### 2.1.2.3. Change of gearboxes

The Group is continually seeking to optimise its powertrains by focusing on two main areas: gearbox performance and adapting the powertrain (i.e., gear ratios, gear ratio change strategies, compatibility with Stop & Start), to take maximum advantage of improvements to engines and operate under optimum conditions of fuel consumption.

In this area, the new solutions launched in 2017 are:

- a mid-range manual six-speed gearbox (BVM6), which emits 1.5% less CO<sub>2</sub> and is 10 kg lighter;
- an automatic eight-speed gearbox (EAT8) that follows the current generation (EAT6) that has already helped reduce the powertrain's total fuel consumption by 15% since the end of 2013. The EAT8 gearbox optimises consumption at between -4% and -7%, thanks to its eight speeds, a Stop & Start system operating at increased speed and an ECO mode with freewheeling function to reduce engine friction and thereby fuel consumption.

To accelerate its development and improve its competitiveness, Groupe PSA took a new step in 2018 as part of the strategic partnership with AISIN AW to produce the 6-speed EAT6 automatic gearboxes in France, from 2020 onwards. Valenciennes production plant will benefit of a production capacity of 300,000 automatic gearboxes per year.



"Groupe PSA invests in Valenciennes to produce automatic transmission under Aisin AW license 21/03/2018" press release: <https://media.groupe-psa.com/en/groupe-psa-invests-valenciennes-produce-automatic-transmission-under-aisin-aw-license>

### 2.1.2.4. Use of alternative fuels DPEF.24

DPEF.25DPEF.26DPEF.27DPEF.32

Another way to reduce a vehicle's carbon footprint is to use fuels other than gasoline and diesel, such as natural gas, LPG and biofuels. Groupe PSA has reaffirmed its commitment to the responsible use of biofuels by stressing the need to take sustainability criteria into account in developing its products and the related industry segments, in particular the changes in how farmland is used. R&D on alternate fuels is now reinforced thanks to the know-how of the OV teams. Since November 2017, the Expertise Centre "Alternative fuels (LPG, CGN)" was entrusted to the R & D teams of Russelsheim.

#### Natural gas

Compressed natural gas (CNG) is among the energy sources used by the Group's vehicles on the markets where local conditions are favourable to its development (secure gas supply, political commitment to set up a distribution network, tax incentives), such as Argentina, China and Iran. Using CNG also helps to reduce CO<sub>2</sub> emissions by around 20% compared with conventional gasoline engines (in a global approach of tank-to-wheel calculation). The inclusion of biogas (from the methanisation of waste), when possible, increases the benefit for the environment.

#### Ethanol flex-fuel, biodiesel vehicles

The Group has developed vehicles based on flex-fuel technology, which run on gasoline-ethanol blends in variable proportions: for example, from 20% to 100% ethanol in Brazil, the number-one market in the world for this fuel and flex-fuel vehicles. In 2015, a flex-fuel version of the latest 1.6-litre EP engine launched in Europe was released on the Brazilian market. The vehicles equipped with these engines benefit from a reduction in their consumption (and therefore their CO<sub>2</sub> emissions). In addition, the use of renewable bioethanol will help reducing environmental impact.

The GMP EB2F MA flex-fuel engine, which is on the PEUGEOT 208 and CITROËN C3 on the Brazilian market, has become a model in terms of fuel consumption. When this engine was launched commercially in 2016, it quickly came to be viewed as the most economical in Brazil, and the press lauded it for its remarkable noise and vibration level for a three-cylinder engine. This performance is the outcome of a productive cooperation between the Latin American and European R&D teams, which brought together first-hand knowledge of country specificities and requirements with expert understanding of the EB engine.

All the Group's diesel vehicles with Groupe PSA intellectual property can run on B10 (a blend with up to 10% of biodiesel) and B30, provided that the fuel is of high quality and the vehicle is maintained accordingly.

Groupe PSA signed the E10 bioethanol guidelines, which aim for more transparency in Europe on vehicles that are compatible with SP95-E10. The Group plans to abide by this commitment

for all its internal combustion engines. In accordance with the EC Directive for the development of the infrastructure for distribution of alternative fuels (2014/94/EU), the Group's new vehicles will now have labels inside the fuel tank flap with the notation [E5] or [E10] on gasoline versions and the notation [B7], [B10], (XTL) or [B30] on diesel versions.



#### STAKEHOLDERS DIALOGUE

The Group is participating in various studies on the development of biofuels and is also involved in developing standards to ensure the minimum quality levels required to meet the technical requirements of engines and to ensure consumer satisfaction. For example, Groupe PSA is leading the FAME (fatty acid methyl esters) task force within the European Committee for Standardisation. The Group is also a member of the Steering Committee of ETIP (European Technology Innovation Platform for Bioenergy), which was formerly known as the European Biofuels Technology Platform, and it participates in the European H2020 projects on the development of future E20/E25 gasolines.

#### Advanced biofuels

To avoid the problems of land use linked to biofuels from agricultural crops, the challenge is to develop "advanced biofuels" from non-food resources (biomass waste, organic waste, micro-algae).



#### STAKEHOLDERS DIALOGUE

The Group is frequently consulted on the impact of these new biofuels on engines and it takes part in study groups and task forces, such as ANCRE's (French National Alliance for Coordination of Research on Energy) Programming Group and ETIP Bioenergy.

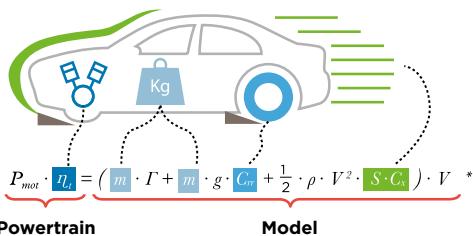
In Brazil, the Group has partnerships with the Petrobras gasoline Group which aims to cut CO<sub>2</sub> emissions by optimising combustion based on local fuels and biofuels; the São Paulo State organisation FAPESP (Fundação de Amparo à Pesquisa do Estado de São Paulo); and four universities. Their goal is to create a research centre on engines and biofuels over 10 years. Moreover, Groupe PSA works with the Federal University of Paraná in Curitiba, Brazil, on the production of lipid biofuels from micro-algae.

## 2.1.3. Change of vehicle equipment and architecture: serving the CO<sub>2</sub> trend

DPEF.16 DPEF.24 DPEF.26 DPEF.27

Beyond the technologies related to engines and fuels, the Group aims to leverage all the features of its vehicles in order to position itself as a leader when it comes to fuel consumption and CO<sub>2</sub> emissions. **The Group is working on all the technical levers that help to reduce CO<sub>2</sub> emissions:** weight, aerodynamics, vehicle architecture, materials, tyre rolling resistance, losses through mechanical friction (brakes, rolling, bearings, etc.), management of parts that use electricity (sensors, actuators, engines), comfort features (air conditioning system, etc.), safety features and driver assistance features:

### FACTORS AFFECTING FUEL CONSUMPTION



\* The powertrain provides power equivalent to the sum of the power consumed by vehicle acceleration, tyre friction, drag and electricity usage

Physical size	CO <sub>2</sub> efficiency on WLTP cycle
Powertrain energy efficiency $\eta_t$	+1% $\eta \rightarrow -1.2 \text{ g/km}$
Weight $m$	-100 kg $\rightarrow -6 \text{ g/km}$ <b>(with secondary effects)</b>
Rolling resistance Crr $C_{rr}$	-1 kg/t $\rightarrow -2 \text{ g/km}$
Aerodynamics $S \cdot C_x$	-10 dm <sup>2</sup> $\rightarrow -5 \text{ g/km}$
Electrical consumption (W)	-100 W $\rightarrow -1.5 \text{ g/km}$

The Group will keep its competitive advantage through significant technological efforts as well as by an on-going search for the right balance of sizes, optimised weight and highly attractive features such as spaciousness, comfort, road-holding and accessories. The strategy relating to all these levers has also been planned for the medium and long-term, combined with "breakthrough" technological innovations, in all geographical areas.

### 2.1.3.1. Optimising vehicle architecture: efficient, multi-energy platforms

As part of its Push to Pass strategic plan and its Core Technology Strategy (see 1.1.1.6.), Groupe PSA has been scaling back the number of its platforms worldwide so as to optimise the effectiveness of its R&D costs and its industrial and production processes in a sustainable manner.

This initiative will ultimately lead to the manufacture of all Groupe PSA passenger cars on two multi-energy platforms namely the **Efficient Modular Platform 2 (EMP2)** launched in 2013 and the **Common Modular Platform (CMP)** first launched with the DS3 Crossback, in October 2018.

CMP has been designed and optimised to limit CO<sub>2</sub> emissions by leveraging all of the factors that contribute to lower consumption:

- weight reduction: a decrease of up to 1.2 g/km of CO<sub>2</sub> using high-performance materials such as advanced and ultra-high strength steel (AHSS and UHSS), press hardened steel, aluminium and composites;
- better aerodynamics: a decrease of up to 1.5 g/km of CO<sub>2</sub> by smoothing the underbody and using controlled air intake systems on the vehicles' front end;
- lower rolling resistance: a decrease of up to 2.5 g/km of CO<sub>2</sub> by using Class A tyres and reducing mechanical friction on the axles.

Starting in 2019:

- **e-CMP platform will allow to manufacture the latest generation of electric vehicles.** They will be equipped with a 100kW (136hp) electric motor, a 50-kWh lithium-ion battery pack and a high-performance heat pump;
- **EMP2 platform will make it possible to produce the first plug-in gasoline hybrid models** that support the best features of hybrid technology:
  - SUV (Sport Utility Vehicle) and CUV (Compact Utility Vehicle) models with high-performance 4WD electric driveability;
  - a range of 50 km minimum in full electric mode ;
  - generous and uncompromising cabin space (passengers and boot);
  - outstanding efficiency in urban driving conditions: 40% gain in efficiency compared to a pure internal combustion model.



"CMP, the New Modular multi-energy Platform for Groupe PSA" 02/10/2018 press kit: <https://media.groupe-psa.com/en/cmp-new-modular-multi-energy-platform-groupe-psa?idtok=ee20ebbb230>

"First Fully Electric OPEL and VAUXHALL Corsa Will be Made in Zaragoza" 14/02/2018 press release: <https://media.groupe-psa.com/en/first-fully-electric-opelvauxhall-corsa-will-be-made-zaragoza>

### 2.1.3.2. Weight: the virtuous cycle of reducing weight

Already a market leader in terms of average vehicle weight, the Group continues to develop more lightweight vehicles, making this a major lever in reducing their environmental footprint.

At the same time as the Group is optimising its vehicle architecture, it is also focusing on the choice of materials. High-tensile steel is preferred because of its superior rigidity. However, whenever technically feasible and cost effective, weight is being reduced by choosing lower-density materials, such as aluminium, composite materials and thermoplastics instead of steel. Innovative process techniques provide further gains (heat stamping, laser welding, joining structure, etc.) by helping reduce the weight of the car body while improving resistance to impact.

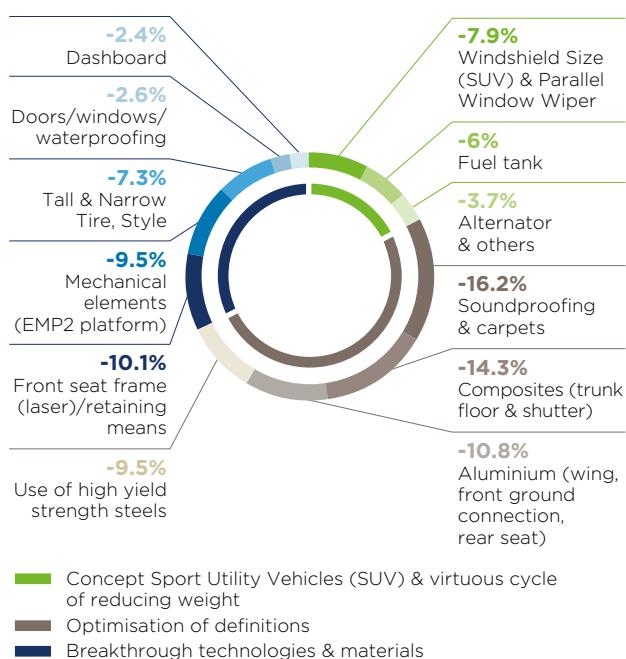
#### **Each new vehicle design is focusing on lightweighting.**

Consequently, the optimised architecture that marks a breakthrough in terms of vehicle weight is now part of the Group's standards.

The benefits of the new EMP2 platform, combined with an optimised weight/overall size/benefits ratio in every respect, result in a lightweighting of new models compared to previous ones: 100 kg reduction for the new PEUGEOT 3008 and 70 kg reduction for the new PEUGEOT 508.

**-100 kg**  
on the new PEUGEOT 3008  
compared to previous one

#### BREAKDOWN OF THE WEIGHT REDUCTIONS ON THE NEW PEUGEOT 3008



### 2.1.3.3. Limited air resistance and rolling resistance

As can be seen in the table at the opening of 2.1.3., aerodynamics and rolling resistance have a major impact on fuel consumption, and the Group endeavours to continually optimise these levers.

**The significant increase in the use of digital simulation, alongside wind tunnel tests, led to considerable improvements in the aerodynamics of the vehicles launched in 2018:**

- with the launching of the new CMP platform in 2018, Groupe PSA drastically optimises the underbody covers and deflectors on the new DS3 Crossback. In addition, air curtains have been created by openings in the bumpers. All new vehicles on CMP will benefit from these improvements;
- the double active air shutters will become standard equipment on future vehicles of Groupe PSA:
  - inaugurated by the new DS 3 Crossback on business versions, these new double active air shutters will be deployed on the next vehicles of the CMP platform,
  - with the evolution of the EMP2 platform, the new double active air shutters will upgrade new PEUGEOT 508 equipment and will replace the first generation of simple active shutters on superior segment vehicles;
- optimisation of the front face of the new CITROËN Berlingo and significant reduction of the front section of the new PEUGEOT 508 will allow CO<sub>2</sub> reduction on those new models.

In terms of rolling resistance, using 17" or 18" ultra-low rolling resistance tyres, or a 19" mount in slimline format (also known as Tall & Narrow) – which was developed by Michelin (in 205 55 R19) – also boosts the efficiency of the new PEUGEOT 3008.

All Groupe PSA compact SUVs come fitted with these slimline tyres.

### 2.1.3.4. Better management of onboard electricity

**Reducing electricity consumption in the car is a way to lower fuel consumption.** The electricity used in the vehicle (to power the air conditioning, lighting, dashboard, etc.) is generated by the alternator, which transforms the engine's mechanical energy. The more efficient the alternator, the less need there is for the mechanical energy from the engine, and the less fuel the engine consumes.

As a result, the Group decided to deploy the following levers:

- optimising the operating phases of the alternator through an intelligent control system (charge the alternator at times when fuel consumption is lower), lever incorporated into the new generation of engines;
- optimising the alternator's efficiency, with a deployment of high-efficiency alternators targeted from 2019 (10% more efficient than the current alternators);
- high charge acceptance on 12-V battery technology to optimise alternator recovery strategy (beyond 2021).

Alongside this, the Group is working to reduce the load of the energy-intensive equipment (air conditioning, heated windscreens, lighting, etc.):

- using specific LED (Light Emitting Diode) lights to optimise the electricity consumption of the lighting functions. These will be deployed more widely on the vehicle lines by 2020;
- study to optimise the air conditioning and engine cooling circuit, to be deployed by 2025.

It should be noted that these innovations offer improvements in real-world fuel consumption but are not all directly measurable over the certification cycle. This approach is in line with the Group's aim to focus on real-world fuel consumption. (See 2.1.0.3.)

## 2.1.4. The onboard functions to help drivers reduce fuel consumption

DPEF.16

Groupe PSA will launch two new onboard functions aimed at reducing fuel consumption:

- the "Eco-coaching" function which, in real time and with a consumption report at the end of the trip, informs and advises customers via the vehicle's dashboard about gear changes, optimal braking, the use of the Stop & Start function and managing acceleration to help them improve their eco-driving. It will be launched in 2019 on plug-in hybrid vehicles;
- the "ECO mode" function, which allows the driver to select a fuel-efficient operating mode (activating the freewheeling function, for example).

**These functions, each of which offer potential fuel savings of around 5%, will be gradually rolled out to all future lines.**

## 2.1.5. Reducing the environmental impact of refrigerants

DPEF.16

DPEF.26

DPEF.27

GRI.305-6

European Directive 2006/40/EC gradually phases out the use of refrigerants in vehicle air conditioning systems, which provide air conditioning in the passenger compartment, which have a global warming potential (GWP) of more than 150 eq. CO<sub>2</sub>. This regulation has applied to all models on the market that weigh less than 3.5 tonnes since 2017.

New types of vehicle produced by the Group since 2011 use refrigerants that meet this regulatory standard. For example, the PEUGEOT 308, CITROËN C4 Cactus and CITROËN C4 Picasso no longer use fluoride gas R134 a.

Among innovations tied to the connected car and Intelligent Transport Systems (ITS), Groupe PSA plans to roll out its eco-adaptive cruise control system by 2023. This function adjusts the vehicle's speed to optimise its fuel consumption and reduce its CO<sub>2</sub> emissions using data from the navigation system, other vehicles (Car2Car) or infrastructure (Car2I), and environmental sensors such as cameras and radars. Car2I communication includes the communication between the traffic light and the vehicle: the vehicle knows when the light is about to turn green or red, and it can adjust its speed, resulting in a smoother, more comfortable ride.

Finally, eco-driving help and tutorials can help drivers to optimise the use of their vehicles. (See 2.5.2.)

In 2008, the Group began carrying out refrigerant leakage inspections to check for substances with a GWP of more than 150 eq. CO<sub>2</sub> in all its vehicles on the market. A leak of up to 40 g is authorised for a single evaporator and 60 g for a double evaporator.

## 2.2. IMPROVE AIR QUALITY BY REDUCING VEHICLE EMISSIONS

DPEF.16 DPEF.22 DPEF.36 GRI.103-2 GRI.103-3

Being proactive in the debate concerning mobility-related public health and environmental issues, Groupe PSA has incorporated the issue of air quality into its research and development programmes for many years now. This has enabled it to roll out engines and technologies across its ranges that drastically reduce:

- **particulate emissions:** inventor of the diesel particulate filter (DPF), which Groupe PSA began selling in 2000, more than nine years before Euro 5 standards which made it compulsory from September 2009;
- **nitrous oxide emissions:** Groupe PSA is the first car manufacturer to have opted to roll out the SCR (Selective Catalytic Reduction) solution, reducing nitrogen oxide emissions by up to 95% and marketed since 2013 on its Euro 6 vehicles.

The range of solutions to improve air quality also includes the electrification of vehicles ranging from micro-hybridisation such as Stop & Start, and mild hybridation (*48-V mild hybrid: addition of a starter-alternator and a small 48-volt battery - see 2.1.0.2*), up to plug-in hybrid vehicles that can be recharged by the customer, as well as electric “zero-emission” vehicles (ZEV) using a battery (*Battery electric vehicle*) or a Fuel Cell.

With its Push to Pass strategic plan and *PACE!* plan, the Group has committed to putting eight plug-in hybrid vehicles and seven electric vehicles on the market between 2019 and 2021. By 2023, 80% of the vehicles proposed by the Group worldwide will be available in an electric or plug-in hybrid version (see 2.1.0.1, 2.1.2.1 and 2.1.2.2). In 2025, 100% of models marketed will include an electrified version.

### 2017: entry into force of two new protocols for measuring pollutant emissions, which are more representative of real-world driving conditions

Since 1 September 2017, under European regulations (EU 2017/1151) to obtain vehicle approval two new measurement protocols must be applied (new step in the Euro 6 regulations):

- the WLTP (Worldwide harmonized Light Vehicles Test Procedure), which is performed in a laboratory;
- the RDE (Real Driving Emissions) procedure, which is performed on the road in “real-life driving conditions”, measures the

pollutants emitted using a PEMS (Portable Emissions Measurement System) and defines the admitted conformity factors (the excursion permitted between real usage and the regulatory limits of the WLTP protocol). The NO<sub>x</sub> conformity factor admitted has been 2.1 since September 2017 and will be changed to 1 in 2020 (excluding measurement dispersion, limited to 0.43).

**For approval of its new vehicles in Europe, Groupe PSA committed to meet a NO<sub>x</sub> conformity factor in RDE of less than 1 (excluding measurement dispersion, limited to 0.43, which is the margin value set by the regulation). This commitment has been made from 1 September 2017, i.e. three years before the 2020 regulatory requirement.**

These new measurement protocols aim to be more representative of real-life driving conditions in order to reduce the discrepancy between the emissions determined in the laboratory and those in real-life driving conditions on the road.

Groupe PSA passenger cars were all certified under the WLTP new laboratory test before the end of August 2018 thanks to sound technological choices made in anticipation of the regulations – SCR (Selective Catalytic Reduction) and GPF (Gasoline Particulate Filter).



“The Group’s passenger cars are all certified under the WLTP new laboratory test and are available for customers” 29/08/2018 press release: <https://media.groupe-psa.com/en/groupe-psa%E2%80%99s-passenger-cars-are-all-certified-under-wltp-new-laboratory-test-and-are-available>

The OPEL and VAUXHALL brands will gradually adopt Groupe PSA pollutant emission reduction technologies (around 15% of the models in 2017 with the Crossland X and Grandland X, 40% in 2019 and 100% by 2024).

### 2.2.0. Group innovations to improve air quality

The Groupe is taking a proactive approach of researching ways to reduce emissions generated (reducing engine emissions, improving the performance of after-treatment systems, etc.) and fuel consumption (see 2.1.0.).

## 2.2.1. Breakthrough technologies to reduce atmospheric pollutants from vehicles DPEF.15 GRI.305-7

Breakthrough technologies to reduce atmospheric pollutants from Groupe PSA vehicles are equally valid on combustion vehicles and hybrid vehicles.

### 2.2.1.1. The Group's particulate filter: the only technology which is effective in all of the vehicle's operating conditions

DPEF.18

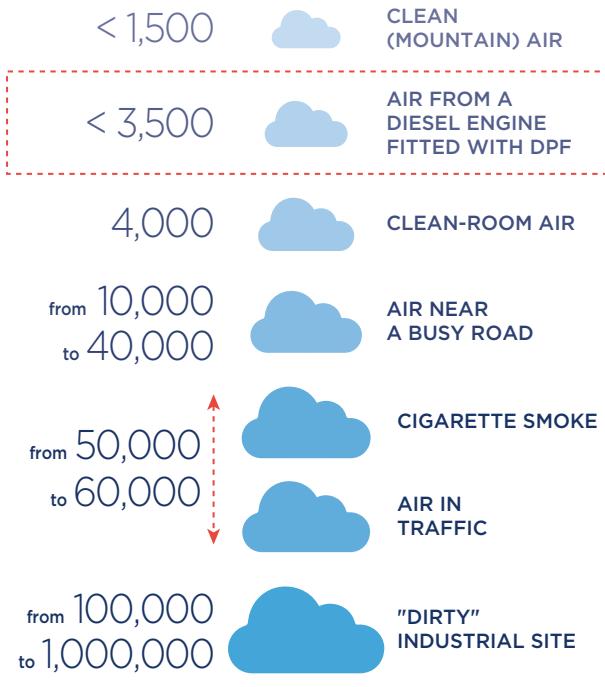
The Group identified the need to tackle particulate pollution in the late 1990s and released a new generation of diesel HDi engines onto the market. These have cut particulate emissions by 60% compared to the previous generation (to 100 mg/km from the HDi engines, compared to 250 mg/km in earlier versions). The Group subsequently equipped this engine with a **high-performance filtration technology, called "diesel particulate filter" (DPF)**, which it began selling in 2000, more than nine years before Euro 5 standards which made it compulsory from September 2009.

#### The question of fine and ultra-fine particulates

The DPF effectively screens out both fine and ultra-fine particulate matter: 99.7% by number and more than 95% by mass; (source Agency for the Environment and Energy Management (ADEME): particulate and NO<sub>x</sub> emissions by road vehicles - May 2018). In the late 1990s, particulate emissions plummeted from more than 3,500,000 particulates per cm<sup>3</sup> in an unfiltered diesel engine to less than 3,500 particulates per cm<sup>3</sup> in a diesel engine with a particulate filter. The DPF removes particulates in all driving conditions. The DPF is a mechanical system, which is fully operational and effective throughout all phases of engine operation - load, warm engine/cold engine, urban/motorway driving - even when the filter is full.

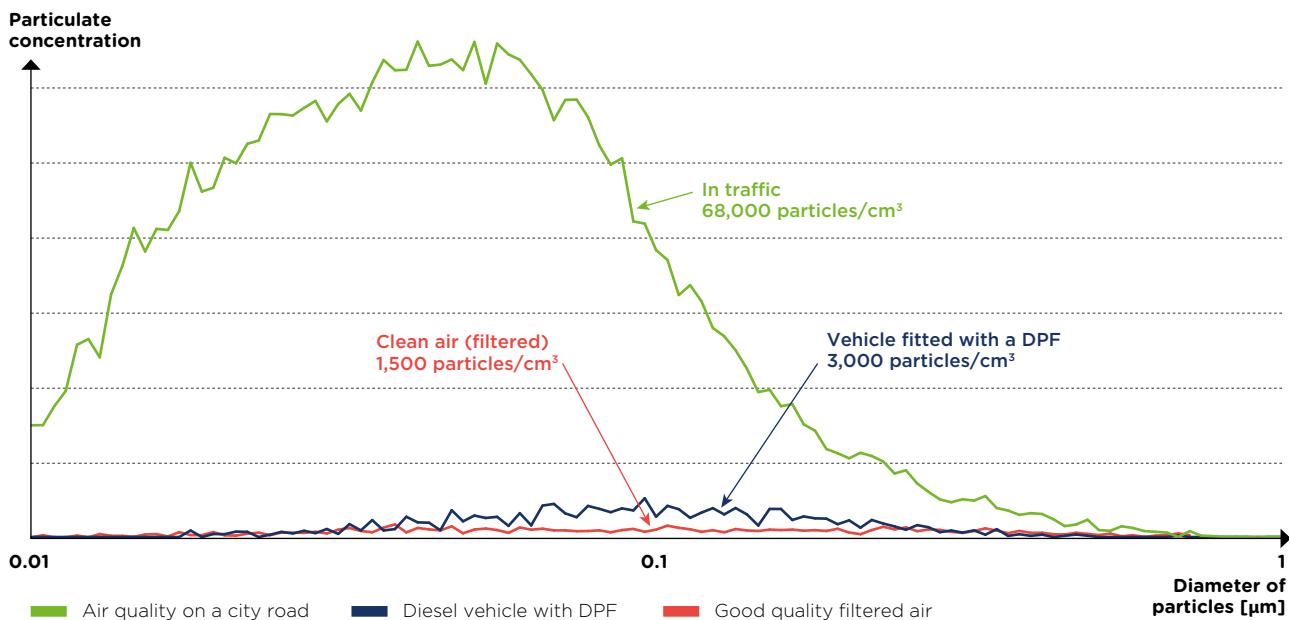
A diesel engine fitted with a particulate filter emits less particulate matter than a latest generation direct-injection gasoline engine, with particulate emission levels significantly lower than the thresholds required under current regulations (20 times less in mass, up to 100 times in number).

COMPARISON OF PARTICULATE EMISSIONS LEVELS OF A DIESEL ENGINE FITTED WITH A DPF



Source: AIRPARIF / PSA.

## EFFICIENT DPF FOR ALL SIZES OF PARTICULATE MATTER (INCLUDING ULTRA-FINE)



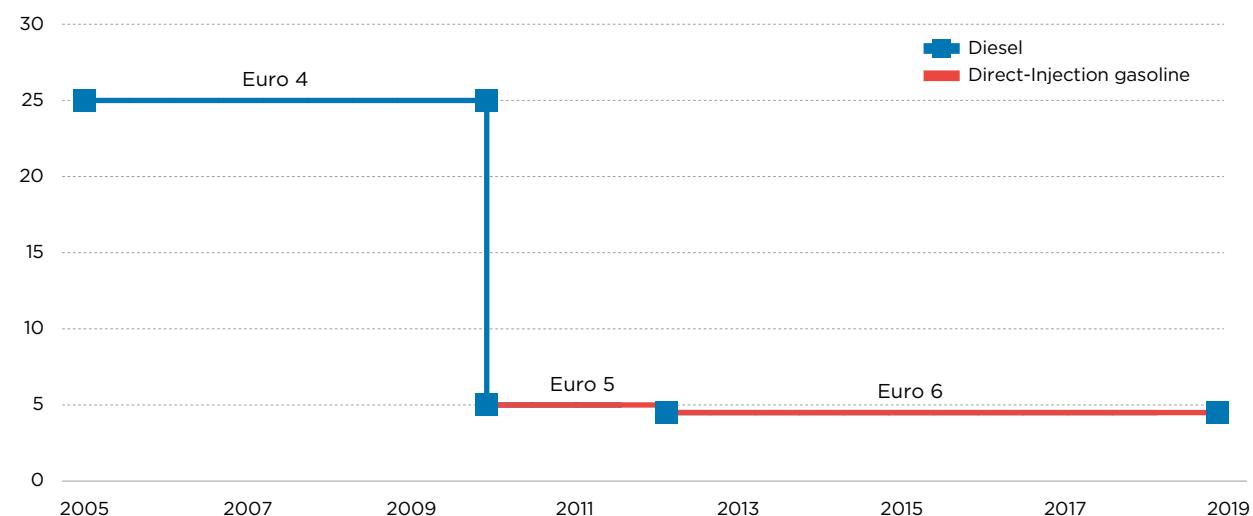
Source: Groupe PSA internal measurements.

Note: Fine particulates (PM 2.5) = particulates with a diameter < 2.5 micromètre

The particulate filter has been fitted as standard across the Group's diesel models since 2010 and has been mandatory in all vehicles sold since the introduction of the Euro 5 regulation for all types (January 2011).

## CHANGING REGULATORY LIMITS ON PARTICULATE EMISSIONS APPLICABLE TO GROUP VEHICLES IN EUROPE

## Particulate emissions (mg/km)



On all its global markets, vehicles sold by the Group comply with the regulations in force in each local market and benefit from advanced technologies developed for the European market.

A pioneer in this field, the Group had sold a total of 17.2 million diesel vehicles fitted with DPF by the end of 2018.

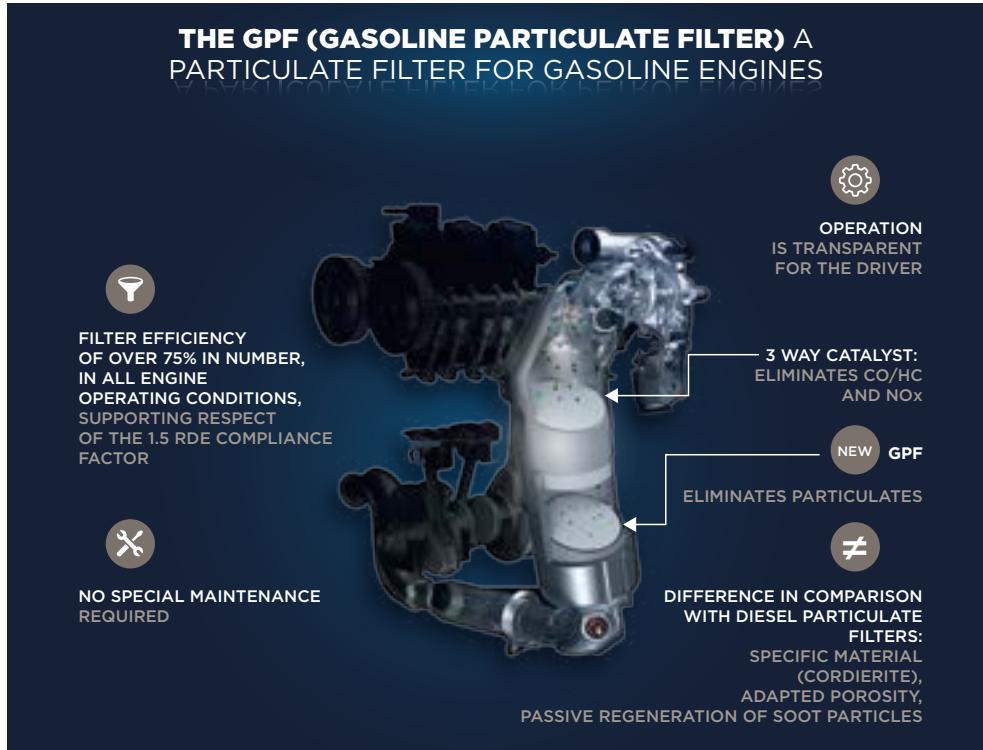
In 2018, vehicles equipped with DPF accounted for 91% of the Group's total diesel vehicle sales worldwide, compared to 97% in 2017 and 37% in 2009.

The second stage of Euro 6 (Euro 6d-TEMP) imposes a tougher limit in terms of number of particles for direct-injection gasoline vehicles (same limit as diesel engines) and a new constraint consisting in an emission reduction in real driving conditions.

To comply with the second stage of Euro 6, in addition to optimising injection systems, **the Group introduced a particulate filter system (GPF) with passive regeneration in October 2017 to reduce the number and mass of particulate emissions in its direct-injection gasoline engines.** This solution, which will be rolled out to all direct-injection gasoline engines, eliminates more than 75% (in number) of all particulate matter – both fine and ultra-fine – whatever the driving conditions.

The Group decided to fit the particulate filter under the turbo downstream of the TWC (Three-Way-Catalyst) in order to have sufficient temperature in the GPF to regenerate the soot when the foot is taken off the pedal. In this way, management of the filter is perfectly transparent for the driver.

In addition, the Group decided to fit a bare filter to supplement the catalyst volume to guarantee optimal pollutant conversion efficiency of the TWC, particularly in cold conditions, which is an issue in cities.



By the end of 2018, the Group had sold a total of 280,000 direct-injection gasoline vehicles equipped with the GPF. In 2018, the direct-injection gasoline vehicles equipped with GPF accounted for 33.1% of all direct-injection gasoline vehicles sold in 2018.

For several years, Groupe PSA has invested in, and continues to invest in, the optimisation of gaseous pollutant emissions and particulate emissions from the combustion chamber in addition to the optimisation of the after-treatment system for direct-injection gasoline vehicles.

The use of new means, such as CFD (Computational Fluid Dynamics) simulation and VisioFlamme device (allowing the observation of the particle emission sources in the combustion chamber), enables the injectors sprays to be positioned optimally and the internal aerodynamic movement of air in combustion chamber to decrease particle formation inside the internal combustion engine. In addition, the generalisation of the high-pressure system (between 200 and 350 bar) in gasoline engines, as well as the optimisation of injection settings – with several injections before each combustion – improve the vaporisation of gasoline during injection, which further reduces particulate emissions. **All of these optimisations have reduced particulate emissions by more than 50% in the combustion chamber and further gains are expected in the future.**

In addition, Groupe PSA works on activating the catalyst as quickly as possible to reduce emissions of gaseous pollutant. The use of high-pressure injection systems and the optimisation of injection settings with several injections before each combustion enable the temperature at the outlet of the engine to increase, thereby increasing the catalyst temperature more rapidly without affecting drivability.

Finally, Groupe PSA decided to launch an evolution of its GPF which increases its efficiency even further by approximately 10% to around 85% (in number), with an additional decrease in the number of tailpipe particulates by another 40% as a result. This evolution will be available from 2019 on some 1.2-litre gasoline engines and PHEV vehicles, and it will gradually extend to a big part of the Groupe PSA production.

### 2.2.1.2. SCR (Selective Catalytic Reduction): the most effective solution to reduce nitrogen oxides

DPEF.18 DPEF.36

**The SCR after-treatment technology substantially reduces nitrogen oxide ( $\text{NO}_x$ ) emissions by injecting a reducing agent (AdBlue®, a mixture of 32.5% urea and 67.5% water) into the exhaust line upstream of a specific catalyst.**

Integrated into new emission control architecture upstream of the particulate filter, SCR helps to optimise the fuel efficiency and  $\text{CO}_2$  emissions of diesel engines.

To meet the requirements of the second stage of Euro 6, **Groupe PSA has developed a new after-treatment architecture which enables its diesel engines to treat nitrogen oxides more efficiently, in addition to particulates, carbon monoxide and unburned hydrocarbons.** This new BlueHDI line comprises:

- an oxidation catalyst with NO<sub>x</sub> storage at low temperatures before the SCR system is operational;
- an NO<sub>x</sub> emission after-treatment system including an SCR (Selective Catalytic Reduction) brick, a particulate filter with an

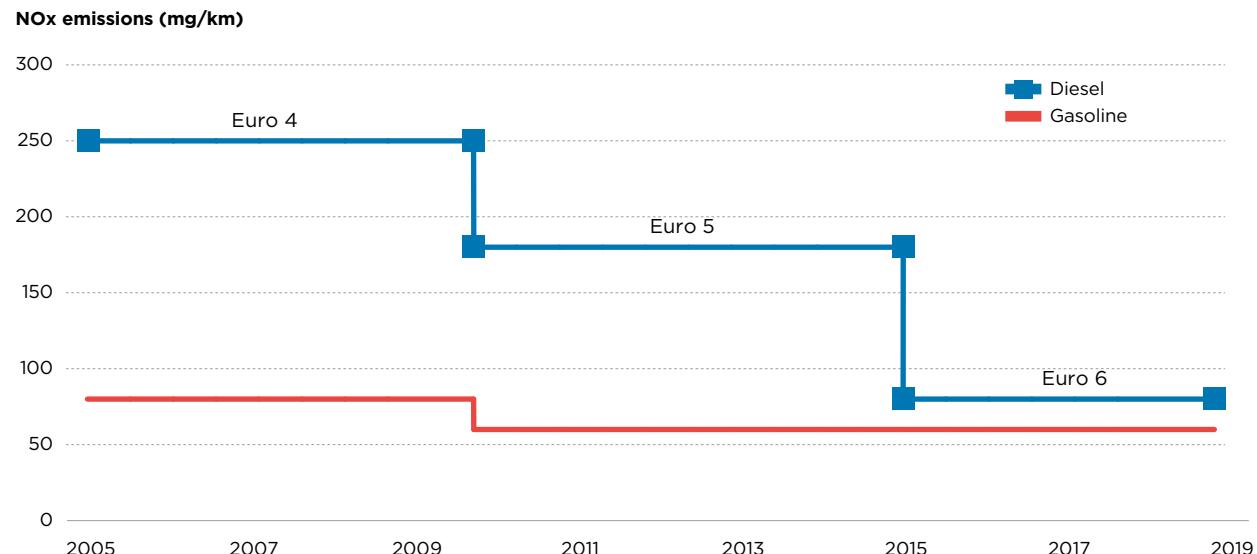
SCR coating and a compact urea injection system (BlueBox®) which eliminates up to 95% of NO<sub>x</sub> emissions from the engine;

- this particulate filter can eliminate 99.7% of particulates (by number) whatever their size in all driving conditions.

This choice clearly demonstrates the Group's commitment to reduce its vehicles' emissions in real-world driving conditions, while maintaining fuel consumption and CO<sub>2</sub> emissions at the optimal level.

This new BlueHDI line has been fitted as standard since October 2017 on all new vehicles with 1.5 l diesel engines.

### CHANGING REGULATORY LIMITS ON NO<sub>x</sub> EMISSIONS APPLICABLE TO GROUP VEHICLES IN EUROPE



In 2018, vehicles with BlueHDI lines represented 83% of diesel vehicles fitted with DPF (including 80% of Groupe PSA original design and 3% of General Motors original design), with 4.3 million total vehicles sold globally at the end of 2018 (including 4.2 million of Groupe PSA original design and 100,000 of General Motors original design).

The BlueHDI line is currently used by all diesel passenger vehicles manufactured by the Group to reduce NO<sub>x</sub> emissions to levels close to those of gasoline vehicles, whilst retaining the diesel advantage (15% lower CO<sub>2</sub> emissions).

The BlueHDI technology is the subject of approximately 100 patents filed by Groupe PSA. The Group continues to refine its technologies, notably with the introduction of an ASC (Ammonia Slip Catalyst) in its commercial vehicles in 2018 and in its passenger vehicles in the future (third stage of Euro 6 - Euro 6d-ISC-FCM). The ASC treats ammonia leaks (NH<sub>3</sub>), thereby increasing its efficiency in eliminating NO<sub>x</sub> emissions treated by the upstream SCR system.

AdBlue® was originally intended to be refilled in Groupe PSA vehicles during maintenance work at the frequency stated in the service manual. From now on, filling up with AdBlue® will be made easier with a refill opening that is conveniently placed in the fuel tank flap, thereby further enhancing the performance of the

Group's new vehicles, (second stage Euro 6 vehicles). However, this requires an extensive distribution network in France and Europe for urea (AdBlue®), the reducing agent used to convert NO<sub>x</sub> into nitrogen.



*Opening designed for AdBlue® refills in the fuel tank flap – rolled out on all Group vehicles.*

## 2.2.2. Forging new ground: being transparent with and responsibly informing customers and communities DPEF.15

Not only is Groupe PSA a trailblazer when it comes to technological solutions, it also distinguishes itself in how it provides information to its customers.

It also takes part in public debates (conferences, etc.) and advocates strongly for manufacturers to have the freedom to devise the most effective solutions (see patents filed) that are challenged by the thresholds set by regulators.

Confident in the suitability of its technological solutions in the face of climate and air quality issues, the Group announced its **partnership with two environmental NGOs**, Transport & Environment (T&E) and *France Nature Environnement* (FNE) in November 2015, and together with them published the real-world fuel consumption for over 1,000 of the Group's vehicle models. **The measurement protocol developed with T&E has proven to be extremely reliable for testing real-world fuel consumption and CO<sub>2</sub> emissions (see 2.1.0.3.).**

**Backed by this success, the experiment was reproduced to measure NO<sub>x</sub> and particulate emissions.** In early March 2018 Groupe PSA published the first results of these tests. This new step contributes to further increasing the reliability of automotive tests and measurements.



"Groupe PSA discloses vehicle emissions in real driving conditions" 06/03/2018 press release: <http://media.groupe-psa.com/en/groupe-psa-discloses-vehicle-emissions-real-driving-conditions?idtok=e1ee1bbb235>

**To date, Groupe PSA is the only car manufacturer to have made such a commitment of transparency towards its customers.**

In addition, the results of the RDE test emissions recently certified Groupe PSA vehicles are now on the website <http://www.acea.be/publications/article/access-to-euro-6-rde-monitoring-data>

## 2.2.3. Significant R&D investments in order to meet stakeholders' expectations DPEF.16 DPEF.17 GRI.305-7

Groupe PSA is keenly attuned to civil society's legitimate expectations when it comes to air quality, and it devotes significant resources to R&D in order to identify and market effective technical solutions that can be distributed as broadly as possible – the only solutions that can have a concrete environmental impact.

When developing its vehicle projects, the Group takes into account real-world driving conditions and accepts technological trade-offs in anticipation of regulatory thresholds being made tougher.



### Impact measurement and economic assessment

The Group deploys massive R&D investment into improving air quality and reducing greenhouse gas emissions.

These investments, including €1,15 billion to develop powertrains in 2018, have led to the development of a unique solution that reduces **both fuel** consumption and emissions of CO<sub>2</sub>, NO<sub>x</sub> and particulate matter from diesel engines. This technology, which features the SCR (Selective Catalytic Reduction) system, comes at an **extra cost of €200 to €500 per car**, but is the most efficient solution and makes no compromise between air quality and fuel consumption.

Environmental innovations relating to the product are essential to control operational risks (non-approval of vehicles) and financial risks (payment of fines, increase in taxes) in case of non-compliance with the fuel consumption or emission thresholds set by regulations in the various Group markets. **The annual risk for a company the size of Groupe PSA is a shortfall of €1 to €2 billion in the event** of a failure to obtain approval or recall a vehicle due to unstable performance.

### Euro X regulatory stages: spotlight on the last three stages – Euro 4, Euro 5 and Euro 6

These European standards set the maximum admissible levels of regulated pollutants: CO, HC, NMHC, NO<sub>x</sub> and particulate matter (based on two criteria: particulate mass (PM) and particle number (PN) since Euro 5).

Euro 5 and Euro 6 (Brussels regulations (EC) No. 715/2007 and 692/2008, then EU 2017/1151) drastically reduce the permitted limits of particulate matter and nitrogen oxides (NO<sub>x</sub>) emitted by

diesel and gasoline vehicles (especially direct-injection gasoline technology, with regard to particulate emissions). Under Euro 5 and Euro 6, diesel particulate mass emissions were cut by more than 80% compared with Euro 4. To meet the standard for the number of diesel particles, a high level of filtering efficiency is required (more than 99%). The Euro 5 standard represents a 30% reduction in diesel NO<sub>x</sub> and Euro 6 represents a 70% reduction in diesel NO<sub>x</sub> compared to Euro 4.

## EXTRACT OF EURO 4, 5 AND 6 EMISSION LIMITS MEASUREMENTS AT AMBIENT TEMPERATURE "23 °C" FOR GASOLINE OR DIESEL PASSENGER CARS AND LIGHT COMMERCIAL VEHICLES (N1 CLASS 1)

Exhaust emissions at ambient temperature (23 °C)	Gasoline vehicle*, CNG, LPG (g/km)			Diesel vehicle (g/km)		
	Euro 4	Euro 5	Euro 6	Euro 4	Euro 5	Euro 6
CO	1.00	1.00	1.00	0.50	0.50	0.50
Non-methane HC (NMHC)	-	0.068	0.068	-	-	-
THC	0.10	0.10	0.10	-	-	-
NO <sub>x</sub>	0.08	0.06	0.06	0.25	0.18	0.08
THC + NO <sub>x</sub>	-			0.30	0.23	0.17
Mass of particulate matter	-	0.005/0.0045**	0.0045**	0.025	0.005/0.0045**	0.0045**
			6'×10 <sup>12</sup> part./km <sup>(1)</sup>			
Particle numbers	-	-	6'×10 <sup>11</sup> part./km <sup>(2)</sup>	-	6'×10 <sup>11</sup> part./km <sup>(3)</sup>	6'×10 <sup>11</sup> part./km
Durability (km)	100,000	160,000	160,000	100,000	160,000	160,000

\* Limits set for particulate matter (mass and number) apply only to vehicles with direct-injection gasoline engines beginning with Euro 5.

\*\* On the application dates - 01/09/2011 for new vehicle types and 01/01/2013 for all vehicles - a changeover to a more precise measurement procedure will reduce the maximum admissible level from 0.005 g/km to 0.0045 g/km. On the same dates: introduction of particle number (PN) emission limits, first for diesel.

(1) Extension of PN limits at the manufacturer's request until 31/08/2017 for new vehicle types and 31/08/2018 for all vehicles (one year later for certain categories).

(2) Stricter PN limits beginning on 01/09/2017 for new vehicle types and 01/09/2018 for all vehicles (one year later for certain categories).

(3) Introduction of PN emission limits for diesel beginning on 01/09/2011 for new vehicle types and on 01/01/2013 for all vehicles.

## DATES OF NEW TYPE/ALL VEHICLES AND IN-LAB POLLUTANT EMISSION MEASUREMENT PROCEDURES FOR GASOLINE OR DIESEL PASSENGER CARS AND LIGHT COMMERCIAL VEHICLES (N1 CLASS 1)

Dates and procedures	Euro 4	Euro 5	Euro 6
Date new type	01/01/2005	01/09/2009	01/09/2014 (Euro 6b), then 01/09/2017 (Euro 6d-TEMP), then 01/01/2020 (Euro 6d-ISC-FCM)
Date all vehicles	01/01/2006	01/01/2011	01/09/2015 (Euro 6b), then 01/09/2019 (Euro 6d-TEMP), then 01/01/2021 (Euro 6d-ISC-FCM)
Procedure	NEDC*	NEDC*	NEDC*, then WLTP**, then WLTP**

\* NEDC (New European Driving Cycle).

\*\* WLTP (Worldwide harmonized Light vehicles Test Procedure).

## RDE (REAL DRIVING EMISSIONS): POLLUTANT EMISSION MEASUREMENT PROCEDURE WITH PEMS (PORTABLE EMISSIONS MEASUREMENT SYSTEM) ON THE ROAD IN "REAL-LIFE DRIVING CONDITIONS" FOR GASOLINE OR DIESEL PASSENGER CARS AND LIGHT COMMERCIAL VEHICLES

Conformity factors	Euro 6d-TEMP***	Euro 6d-ISC-FCM***
CO	-	-
NO <sub>x</sub>	2.1	1 + margin*
Particle numbers	1 + margin*	1 + margin*

\* The margin value was set at 0.5 for particulate emissions and 0.43 for NO<sub>x</sub> emissions but will be revised based on the maturity of the PEMS (Portable Emission Measurement System).

\*\* Euro 6d-TEMP: 01/09/2017 for new vehicle types and 01/09/2019 for all vehicles (one year later for certain categories).

\*\* Euro 6d-ISC-FCM: 01/01/2020 for new vehicle types and 01/01/2021 for all vehicles (one year later for certain categories).

## EVAPORATION EMISSIONS FOR GASOLINE PASSENGER CARS AND GASOLINE LIGHT COMMERCIAL VEHICLES

Evaporation emissions	Gasoline vehicle, CNG, LPG (g/test)			Diesel vehicle (g/test)		
	Euro 4	Euro 5	Euro 6	Euro 4	Euro 5	Euro 6
HC	2	2	2*	-	-	-

\* Measurement procedure changing on 01/09/2019 for all vehicles.

HC: Unburned hydrocarbons - NMHC: Non-methane unburned hydrocarbons (with no CH4) - CO: Carbon monoxide - NO<sub>x</sub>: nitrogen oxides.

In Europe, the Group's gasoline and diesel passenger cars have complied with Euro 6d-TEMP since September 2017 for new models brought onto the market.

In the rest of the world, vehicles sold by the Group are in compliance with the regulations in force in each local market and benefit from the advanced technologies developed for the European market.

## 2.3. VEHICLE QUALITY AND SAFETY

### 2.3.1. Vehicle and service quality GRI.103-2 GRI.103-3

#### 2.3.1.0. Group innovations to improve service quality

##### Power Supply: connected supply chain

The Supply Chain Department decided to work with KBRW (a company identified by the Business Lab) in 2018 to provide a new application to improve customer service for its Distrigo logistics hubs. This application called "Power Supply" recalculates delivery dates for backorders daily with extreme accuracy and also offers alternative parts. **Thanks to the application, the backorders portfolio of the Distrigo hubs was virtually halved and Groupe PSA call-centre activity concerning the claim process was cut down to a third.** Power Supply was built in a very short time and its deployment is almost complete in Europe at end of 2018 (less than one year for the whole process: an impressive and rare performance).

##### Digital vehicle passport: for more security and traceability

In September 2018, Groupe PSA, together with IRT SystemX, several insurance companies (such as AXA, Covéa, Matmut), assistance group IMA and multibrand dealer shop Mobivia, launched an initiative to develop a consortium blockchain to create a digital vehicle passport. The objective of this joint work is to study both the technical and economic feasibility of such a solution which could **provide a greater transparency for second-hand vehicle buyers and avoid odometer fraud** for example. The benefit of the blockchain technology is to enhance the security and traceability of data that can be shared among the different players in the value chain.

##### Self-reception: a flexible and secure solution for routine maintenance services

Self-reception allows dealership customers to try out a convenient and dematerialised solution for routine maintenance services. Self-service reception kiosks provide customers with **a completely secure option**, allowing them to **drop off and pick up their car 24/7** (outside regular opening hours), **and pay online**. Enabling the after-market transformation with enhanced digital capabilities, this solution frees up customer service advisors to spend more time with in-store visitors and attend to those in need of more technical car repairs. The service was launched at the end of 2018 in two French locations and is gradually being rolled out across the whole retail network.

 "PSA Retail launches after-market Self-Reception solution, a first in Europe" 09/11/2018 press release: <https://media.groupe-psa.com/en/psa-retail-launches-aftermarket-self-reception-solution-first-europe>

#### Dial Once's Visual IVR: digitalisation of the after-market customer centre

PSA Retail is testing Dial Once's Visual IVR solution that offers customers a seamless journey. This contact platform enables customers to express their needs, access a self-guided journey, or connect to the right person to answer their questions 24/7, even out of call centre opening hours.

 Video "Visual IVR on smartphone and desktop - Demo": <https://www.youtube.com/watch?v=R55T6WjgUkw>

##### On-demand fuel delivery

PSA Retail is testing a new and convenient way to fill up cars, directly at the dealership. Two sites in Paris are using the service to optimise their efficiency in monitoring gasoline costs for their fleet, potentially providing a value-added service to rental customers, for instance. This service is also the first step towards optimising traffic and CO<sub>2</sub> reduction in Paris.

#### 2.3.1.1. The Group's objective: quality first!

 **Making quality the number-one priority – with no exceptions – guarantees customer satisfaction and protects the Company's long-term future. Long-term economic performance cannot be achieved if quality is not up to the mark. All behaviours, processes and decisions must be customer-focussed.** 

**Carlos Tavares**

##### Targeting the no. 1 spot

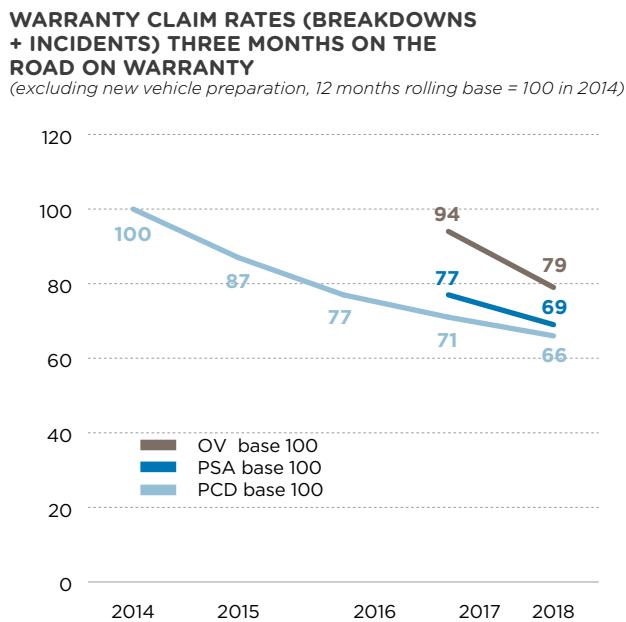
To meet customer expectations, Groupe PSA aspires to guarantee top-notch reliability and product performances and provide high-quality service upon purchase and delivery of the vehicle as well as in after-sales.

On these two commitments, with the Push to Pass plan, the Group aims to reach the number one position in each region where the Group has a major presence, thus becoming its customers' preferred car manufacturer and mobility supplier.

## A TRENDSETTER IN SUSTAINABLE MOBILITY

Vehicle quality and safety

The graphs below show the progression of results:



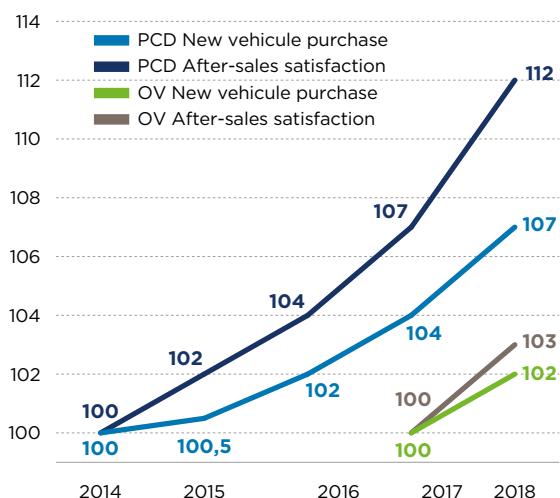
In order to align with other car manufacturers, Groupe PSA slightly changed the calculation methodology of this KPI in January 2018:

- perimeter Europe now includes all countries instead of only eight before, Latin America includes all countries instead of two, India - Pacific includes all countries instead of three;
- road assistance operations not related to a warranty repair in the Group's network are now excluded.

The whole graph (including previous years) has been rebuilt taking these changes into account.

### RECOMMENDATION RATE IN INTERNAL SERVICE QUALITY SURVEYS FOR NEW VEHICLE PURCHASES AND AFTER-SALES PROCEDURES

(% recommendation World - 12 months combined -  
Scope: PEUGEOT/CITROËN/DS AUTOMOBILES - Base = 100 in 2014;  
OPEL and VAUXHALL - Base 100 in 2017 as OPEL and VAUXHALL used another methodology before; from 2017, the methodology is the same as PEUGEOT/CITROËN/DS AUTOMOBILES)



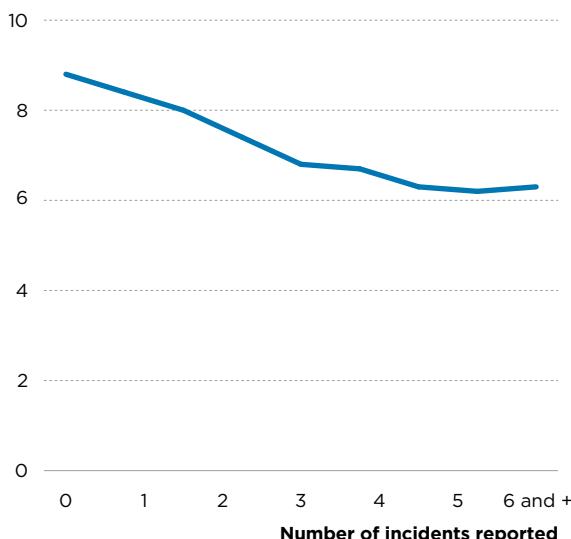
### The role of quality in sustainable economic performance

Through this ambition, the Group is targeting customer satisfaction, customer loyalty and also increased economic performance:

- brand loyalty correlates to the level of incidents experienced with the product: customer satisfaction falls when the number of incidents rises:

### RELATIONSHIP BETWEEN INCIDENTS AND PRODUCT QUALITY SATISFACTION SCORE <sup>(1)</sup>

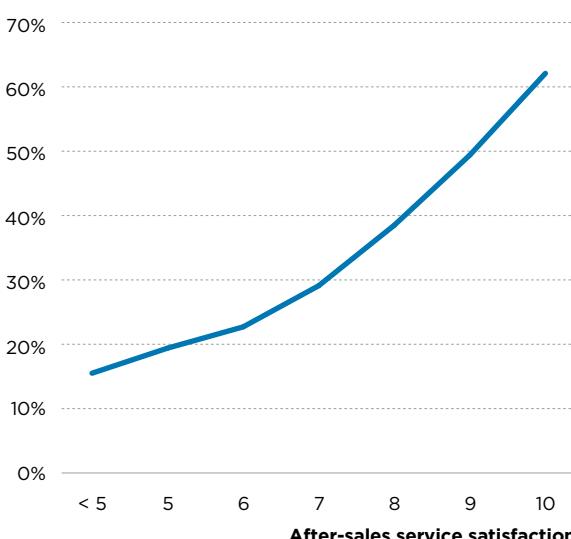
#### Total satisfaction score - new vehicle



- customer loyalty to the network correlates to the quality of the sales and after-sales service: it increases with the level of satisfaction:

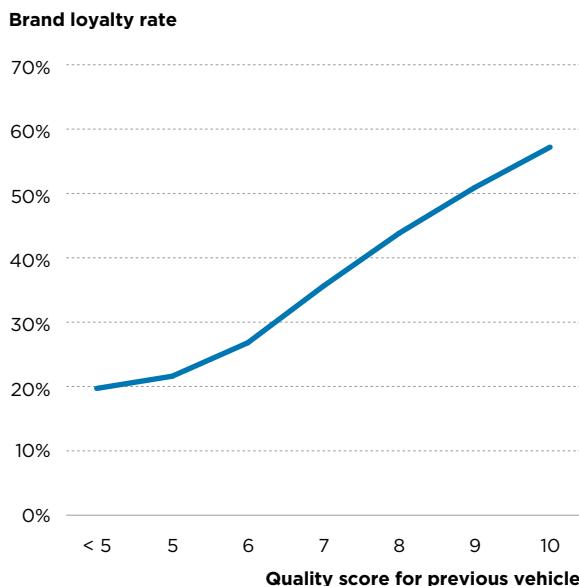
### RELATIONSHIP BETWEEN LOYALTY TO THE DEALER AND AFTER-SALES SATISFACTION <sup>(1)</sup>

#### Dealer loyalty



(1) The survey was conducted between January and October 2017 (interviews) related to new vehicles delivered between September 2016 and August 2017.

#### RELATIONSHIP BETWEEN LOYALTY AND PRODUCT QUALITY<sup>(1)</sup>



(1) The survey was conducted between January and October 2017 (interviews) related to new vehicles delivered between September 2016 and August 2017.

Better quality means both a higher loyalty to the brand and a higher market share over competing brands.

At the same time, better quality enables warranty costs to be reduced for the Group and we are on the way to halving warranty costs by the end of the Push to Pass plan.

#### 2.3.1.2. Organisation and governance in support of ambition

The Group has established a quality policy that is applied throughout the value chain and in all the countries where it operates.

It is stated through the Quality Management System, which is based on requirements linked to quality results, over the Company's entire value chain (scheduling, design and engineering, purchasing, production, transport, sales, after-sales).

These requirements are the basis for the Group's operational processes and quality standards.

Field assessments run by the entities and the quality results achieved support the conclusion that the QMS is efficient and makes it possible to identify improvement actions.

The new version of the IATF 16949 automotive quality management standard is now fully in effect. Transition to the new standard has been successfully achieved by the majority of tier 1 supplier sites and by all of the Group's powertrain and mechanical plants (global Groupe PSA perimeter).

The IATF 16949 certification aims to bring higher quality performance to the Group's automotive products and thus to the Group's customers.

The Group's quality governance is global:

- the Quality Senior Vice-President (SVP) manages the Corporate Quality Division, oversees the Quality Directors of the Group regions and Corporate Divisions including business units; he reports to the Executive Committee. He ensures that the Group meets its quality objectives. Convergence with OPEL and VAUXHALL Quality organisation is in progress; the processes are being gradually aligned, and common quality objectives are being set for the second phase of the Push to Pass strategic plan;
- the quality teams in the Group Divisions oversee operational managers with a view to efficiency and achieving initial quality targets in products and services. Technical guidelines include expectations to reach specific high-quality targets in all regions;
- the quality teams in the regions are in charge of the quality of the region's products and services; this includes the plants and points of sale. They support the points of sale in their implementation of the operational quality standards and ensure that customers receive a tailored response from all parts of the network. Their goal is to encourage employees to have direct customer contact. The regions guarantee that operational managers are highly skilled and that all work is performed to a very high standard.

Over the year, the Executive Committees, along with the Quality SVP, help identify or confirm the strategic quality ambitions and guide the quality initiatives of the business lines and regions. The quality results of the regions are communicated and reported monthly during the Executive Committees' business reviews.

The Quality Division performs an internal and external communication plan throughout the year: dissemination of the Customer Attitude, supplier quality meeting, Yammer group quality, quality breaks within the teams, etc.

### 2.3.1.3. Customer expectations of Groupe PSA brands



#### The quality commitment of Groupe PSA is centred on customer expectations.

The products must meet the following fundamental requirements:

- perceived quality must promote trust and encourage the purchase decision;
- product performances (performance, style, comfort, convenience, etc.) align with the customer expectations for the segment and brand;
- reliability must be flawless (zero incidents when new and during use);
- perceived quality in use (aesthetic and functional) is retained: "the vehicle is like new after three years in service"; the residual value is preserved;
- durability is guaranteed, breakdowns and defects are handled with state-of-the-art methods, vehicle unavailability and expenditures on maintenance and warranty are under control.

All the Group brands must guarantee excellent service quality during the customers' physical and digital ("phygital") experience:

- at the pre-sale stage and at the time of purchase (information searches, configuration, welcome, advice, explanations, handover);
- after-sales service (information searches, online purchase, welcome, care, vehicle maintenance, repair, adherence to deadlines);
- in terms of digital and mobility offerings.

### 2.3.1.4. Resources deployed to support product quality

#### 2.3.1.4.1. At the design and engineering phase

The Group has tools in place to guarantee product quality at every stage of the customer's journey:

##### – PERCEIVED QUALITY AT THE TIME OF PURCHASE

The shape, style and lines of the vehicle are all factors which sway the customer's perception of quality, but finish, sturdy parts and the materials used both inside and outside the vehicle also play an important role. Perceived quality is a major factor in the customer's purchasing decision. It is also a major factor in the criteria used by influencers/lessees to determine the initial resale value when a new model is released.

Groupe PSA aims to position each future model at the highest competitive level of each of its five brands. It has identified more than 1,500 characteristics that contribute to the impression of perceived quality, and it uses evaluation tools and technical benchmarks to drive vehicle projects to the targets.

##### – PERFORMANCES AND RELIABILITY DURING USE OF THE VEHICLE

- Quality of product performances: based on customer expectations for a given sector and the brand experience it wishes to convey, the brand identifies the quality standards for around 40 of the main static and dynamic performances (e.g. visibility, seat comfort, etc.) which are split into sub-categories to be precisely evaluated. The Group wants to position each future model among the leaders at the competitive end of the target market. It uses static and dynamic evaluation tools that for the vehicle projects to be monitored, adjusted and steered.
- Initial quality and reliability: to guarantee the best level of quality and reliability delivered to the customer, well-structured preventive processes are applied at each step (design, development, and manufacturing, within the Group and with the suppliers). Particularly, design takes into account specific use cases of all our commercial regions with severe endurance driving sessions to simulate vehicle ageing.

##### – QUALITY IN USE FOR THE POSSIBLE RESALE OF THE VEHICLE

Quality-in-use criteria encompass the aesthetic (ageing of materials, tolerance of harsh treatment resulting from daily use, etc.) and the functional (background noises and sets of controls, loss of minor performances, etc.).

The challenge is to improve vehicle quality in order for it to look "like new after three years in service", which is the average time for customers and lessees to renew their vehicles. Maximising resale value is a major issue for both customers and the Group: the quality of the vehicle and the cost of bringing it up to the optimum used-vehicle standard are important factors that impact the resale value.

Specific vehicle tests at 60,000 km (vibrations, climate cycles, load, etc.) are conducted to improve the baseline design requirements and manage the ageing of the vehicle after three to five years of use (depending on geographical area and usage profile) so as to improve the scope of use and resale value.

#### — DURABILITY FOR LONG-TERM USE

Customers expect a vehicle that ages well and does not incur excessive future expenditure. Durability is the performance of the vehicle over time, factoring in the variability of customer use. The goal is to guarantee all product performances without a major loss of functionality over time and without breakdown or defect.

Groupe PSA is aiming to be number one in quality and durability; it is one major lever that leads to a sustainable customer satisfaction. To that end, we have set up a continuous improvement process to target the best-in-class position in durability for each part or sub-system.

#### 2.3.1.4.2. Manufacturing quality

Strict adherence to the quality processes outlined in the PSA Excellent Plant initiative, compliance of parts delivered by suppliers and quality control at the workstation all guarantee the compliance of the vehicles that are manufactured:

- 1,800 functional and aesthetic features are checked on every car;
- vehicles are taken out daily and tested by professional operators in both stationary and driving states on specially designed tracks and on roads outside the plant;
- a monitoring and audit plan drawn up by the Quality Assurance Department ensures the plant employees in charge of the daily quality checks meet the requirements of the industry benchmarks.

Main processes and KPIs are now converged between PCD and OV manufacturing plants in compliance with our reference standards. To achieve the highest quality level in all plants, best practices are being deployed on both sides: PCD to OV and OV to PCD. That will be achieved by the end of the first semester of 2019.

**1,800**  
functional and aesthetic features  
are checked on every car

#### 2.3.1.4.3. Supplier quality management and development

The Groupe PSA Purchasing Department has been the first one to merge PCD and OV teams for common supplier management and development. The teams are now completely integrated and processes have been aligned:

- one single Supplier Quality Manufacturing Engineer per supplier manufacturing location, regardless of whether the supplier location delivers OV or PCD manufacturing plants;
- homogeneous key processes and certifications (e.g. critical supplier management);
- identical supplier KPIs (e.g. warranty performance);
- a common supplier surveillance system with defined countermeasures to be activated in case of problems (e.g. IATF 16949 decertification);
- one single Advanced Product Quality Planning and one single Production Part Approval Process.

#### 2.3.1.4.4. A global approach

All the actions are adapted to the most demanding customer expectations, according to region, in order to handle perceived quality, quality in use and the durability of PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL vehicles.

The same analysis, processing and feedback standards and campaigns for quality and safety issues are applied for vehicles produced by the Group's joint ventures, for example in China (DPCA and CAPSA).

#### 2.3.1.5. Resources deployed to improve service quality

DPEF.10      DPEF.11

In 2016, Groupe PSA made customer satisfaction the leading priority of its strategy and also included it in the business model for its dealership network.

The Quality Department sets out the customer satisfaction requirements for both sales and after-sales, in application of the Group quality policy in this area.

#### Top-level operational skills

Service quality hinges on the skills of the Group's operations teams at each of its points of sale.

- Showroom and workshop standards give the country quality managers an outline of the tasks that must be performed to implement service quality. They help ensure that the service quality reference guide is shared at the country level (subsidiaries and importers).
- Job standards – the first building block of each new entrant's self-training – describe the full range of tasks for Zone Managers and each key function of the dealership. In a sales team, for example, this includes dealership personnel such as sales manager, sales consultant sales assistant and the delivery manager.
- In 2018, top Group managers in Europe were trained on how to monitor the aforementioned standards.
- In 2018, the Group devoted special attention in training sales consultants on behavioural skills. Customer-centric mindset and reciprocity play a major role in customer satisfaction and are a vital addition to expertise.
- The Group training policy applies to all the key sales and technical positions at the point of sale. In 2018, the PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL dealership networks delivered 2,474,603 hours of training (in-class, remotely and through online classes), of which 1,792,603 hours were for PCD networks and 682,000 hours were for OV networks.

#### A service quality roadmap structured around “Service Quality Plans and Country Training”

The service quality roadmap has been updated worldwide for the 2019/2022 period for PEUGEOT, CITROËN and DS AUTOMOBILES. It helps guarantee that progress is managed and that the operational targets of the Push to Pass plan are met.

Each country is responsible for its own annual Service Quality and Training Plan, which is structured around four key actions:

- skills assessment and execution of the training plans;
- deployment of Simplified Operating Standards (SOS) in each point of sale. These standards contain and guarantee all of the Brands' requirements which must be met by each point of sale;
- control of the delivered quality at each point of sale;
- reducing variation between points of sale.

When discrepancies in training and service quality are identified, it becomes possible to assess the most important countermeasures that need to be taken.

Each country's annual Service Quality Plan is the subject of a mid-year follow-up meeting led by the region with the assistance of the central business lines, and its implementation at the day-to-day level is addressed in monthly meetings of the Country Quality Committees.

### A process that delivers results

A key priority is to check the effectiveness of the dealership processes:

- standard "Manager's Tour" has been created for the head of each point of sale to ensure they see their site and activities from the customer's perspective at all times;
- in accordance with the job standard for the Zone Manager, Internal Audits are regularly conducted at all points of sale;
- in most of the countries, external audits (one or two audit campaigns per year) are conducted annually on the proper enforcement of operating standards.

The same process is being implemented for OPEL and VAUXHALL: the SOS will first be launched in February 2019 with a gradual roll-out (one standard every two months).

The Zone Manager will start to conduct Internal Audits on the existing standards in 2019. External audits will not start before 2020.

In addition, the Corporate Quality Division runs process audits each year at a number of subsidiaries. Based on Groupe PSA Quality Management System requirements, audits ensure fulfilment of international standards ISO 9000 across the whole network. The action plans resulting from the detected deviations are followed by the auditors until closing.

The auditors will run a follow-up check to ensure that deviations do not occur any longer. The whole auditing process is closely supervised by the country management. The lessons learnt from each single audit are distributed as best practices across the other subsidiaries.

State-of-the-art tools are used in these processes to streamline customer relations and strengthen trust and transparency. PSA Retail has adopted Video Check, a digital solution that uses online video to enhance customer relations in after-sales. The feedback received has shown a high level of customer satisfaction. PSA Retail is implementing this system in all its customer contact points across the network.

For more efficiency, a new technical solution was implemented at the end of 2018. The target is to deliver Video Check to all dealers in 2019 so as to improve transparency in the relationship between agreed repairers and customers, thus improving customer satisfaction and loyalty. Gradual deployment will also include OPEL and VAUXHALL.

### Ongoing performance measurement and a structured approach

There are mechanisms in place to measure the quality performance of dealers of new vehicles and after-sales repairers:

- a customer quality survey (see 2.3.1.6.);
- visits from mystery shoppers (four to twelve visits to the point of sale each year, mystery leads, mystery calls);

Using the "CITROËN ADVISOR" app, which was introduced in Europe in 2015, customers can immediately review the quality-of-service they received at their own initiative (see 2.3.1.6.).

Coordinated, ongoing initiatives are in place to remind the Group Brand subsidiaries and importers of the importance of customer satisfaction.



"My quality is:" videos: [https://www.youtube.com/playlist?list=PLpXLwEad5ZrZ9SbKhNGWlx2\\_IK3pTzQ1d](https://www.youtube.com/playlist?list=PLpXLwEad5ZrZ9SbKhNGWlx2_IK3pTzQ1d)

### 2.3.1.6. Customer relations and a listening ear

For many years, Groupe PSA has had a procedure in place that enables the Group's Brands to maintain continuous contact with their customers and respond in the shortest timescale in case of difficulty. This procedure is evolving rapidly to adapt to new customer expectations and habits and to new available technologies.

#### The surveys

The system is based on surveys managed by the Group to measure, as close to the ground as possible, the progress and effectiveness of actions:

- since 2008, the Group has developed an extensive system of online customer surveys following vehicle purchase, and following contact with the after-sales service. In 2018, 2.5 million of Groupe PSA customers responded from 30 countries including European countries, Russia, Ukraine, Japan, Turkey, Algeria, Brazil, Argentina, Mexico and Chile. All customers are invited to answer the open-ended online questionnaire at their convenience. In less than 48 hours after completing the survey, the results are shared with the relevant points of sales. The relevant dealer is requested to engage actions with customers who are not fully satisfied. In-depth analysis of the results enable the Group to better respond to the customers' expectations and update network standards.

In early 2016, the Group rolled out a quality portal for subsidiaries and the network, allowing the points of sale to benchmark best results in the country/region/area versus its own. This facilitates and streamlines processing of the survey verbatim and monitoring of an individual customer's turnaround from dissatisfied to satisfied.

Around 47 importing countries outside Europe also use the Group's master surveys or their own surveys to follow up with customers:

- the Group has real-time access to the results from product-focused surveys and customer feedback from the network. These results identify areas for vehicle improvements (failures, frustrations) and prioritises them with a responsive device that has been deployed globally.

In each region, multibrand surveys on experience (Free2Move mobility, vehicle purchase/delivery and after-sales actions) and on product (product quality, reliability and satisfaction with performance levels) rank each brand in relation to the competition and help to better target customer expectations according to the markets.

The Group continuously monitors the changing expectations of customers through studies and surveys, and the identified new requirements are integrated into future products. The studies show in particular that there is growing awareness of energy use and increasing requirements for on-board safety and uninterrupted connectivity.

### **Customer Engagement Centre (CEC): a unique call centre to optimise the customer journey**

- **Streamlining call centres to revolutionise customer service**

Car manufacturers often turn to different call centres in each country, for each brand and each type of business. The result is completely divided work arrangements for a single customer.

To make greater strides in creating a seamless customer experience, Groupe PSA launched the “CEC” project for PEUGEOT, CITROËN, DS AUTOMOBILES, which overhauls call centre services so that every country has an integrated platform of customer interactions at a single point of contact with multi-skill call agents.

Currently OPEL and VAUXHALL manage their own centralised approach to customer care at a European level, with customers of these brands being supported from five core OPEL locations.

Groupe PSA plans to extend the CEC principle to OPEL, VAUXHALL, and Free2Move. A call for tenders for a single CEC for the six brands will be launched in 2019 with an implementation start date in 2020.

- **“Service Cloud”: an omni-channel customer relations platform**

CARé&Business is an international app which is available for the three brands, PEUGEOT, CITROËN, DS AUTOMOBILES. This multi-channel customer relations app places satisfaction within easier reach of the customer. This satisfaction is closely linked to loyalty and Brand recommendations.

The solution was regularly updated by the most recent supplier developments and technical issues to satisfy more and more our customers.

In addition to campaign activities, the CEC develops other features relative to leads qualification for vehicles or services, and also integrates the Apps moderation and chatbot.

OPEL and VAUXHALL will converge, little by little, to PCD tools through the “Customer FIRST” project.

### **Customer Relationship Management (CRM): “Customer FIRST!”**

The ambition of Groupe PSA for its CRM (Customer Relationship Management) is to provide the customers of each brand with a personal, multi-channel customer experience to position the Group as a benchmark car manufacturer for customer acquisition, satisfaction and loyalty.

Customer expectations include a quality experience, a rapid exchange of relevant, coherent information and a guarantee that their personal details are handled with due care and attention.

To this end, in 2017 Groupe PSA launched the “Customer FIRST” programme, which revolves around placing customers at the centre of our business:

- consideration for the current and future expectations of our customers and prospects, stressing a smooth, personalised experience, no matter what communication channel is chosen;
- adaptation of Groupe PSA internal processes to this new requirement, in sync with the spirit of each brand;
- re-engineering CRM tools and global rollout of a solution that can respond to customer needs and the requirements of our business line processes.

The “Customer FIRST” programme is ambitious. It applies to:

- all the business lines and businesses that are focussed on customers and prospects;
- an estimated user population of over 100,000 in 14,000 sites of all major countries with Groupe PSA distribution activity.

This customer and prospect-oriented programme became a reality in 2018, and the first functions were rolled out in the first three pilot countries – Poland, Chile and Algeria.

At the same time, Groupe PSA is introducing a master data management solution for customer information named “PSA Customer Database”. This programme, which started as a standalone programme in France, Italy, Poland, Spain, and Portugal initially, has adopted the same country roll-out roadmap as the “Customer FIRST” programme: all major countries with PSA distribution activity, all automotive and aftersales customers B2C and B2B. This is currently valid for the brands PEUGEOT, CITROËN and DS AUTOMOBILES; assessment and preparation work to integrate with OPEL and VAUXHALL are already in progress.

The aim is to provide a Unique Customer ID through a deduplication process, and consolidating and enriching the data. The PSA Customer Database also includes a data mart to store comprehensive customer data from the “Customer FIRST” programme for data science research and for new business opportunities.

In the first countries, all brand actors working in the “Customer FIRST” programme will share the relevant customer information to provide the customer with better service.

### Responsible brand experiences for customers

The Group's brands develop a long-term responsible, personal, appropriate and transparent relationship with each customer (see 7.4.2.).



#### *Impact measurement and economic assessment*

Improvements to the quality of the Group's products have led to:

- drastic reductions in factory quality control and touch-up costs, with savings of €64 per vehicle produced globally (same scope as in 2014 that is PCD) since 2014 (thanks to an increased number of vehicles without fault during the final approval and a reduction in damage sustained during transport);
- a reduction in its warranty expenditure by 23% between 2012 and 2018 under a comparable volume and product mix, that means on PCD scope (reporting scope of the consolidated companies);
- a reduction in warranty provisions of €110 million in 2018 (global PSA scope).
- important savings in the launch phase of a new vehicle (about 25% compared to previous launches) including industrialisation of a new vehicle without disrupting the production system (e.g.: production loss on the line, activities of control/remanufacturing of parts, remanufacturing of vehicles in factory, modernisation of parks, etc.)
- ability to anticipate the ramp-up, which ensures a launch plan on time in all countries, with a large number of vehicles available (and consistent with media communication).

This improvement is also one of the factors that legitimises the positioning of the DS AUTOMOBILES brand in the high-end segment and the move of the PEUGEOT brand upmarket.

### 2.3.2. Vehicle safety DPEF.36 GRI.103-2 GRI.103-3

The safety of each individual road user has always been the top priority for Groupe PSA.

At all stages of the vehicle lifecycle, Groupe PSA implements and maintains a global state-of-the-art safety approach, which covers:

- advanced development including driving assistance systems and autonomous vehicles;
- development and manufacturing phases through safety standards compliance and dedicated safety processes and assessments;
- after-sales safety activities including identifying potential emerging safety issues and related field actions including recalls if necessary.

Additionally, **the Group is focusing on technologies that have a proven ability to make automobiles safer, at an affordable cost for the majority of motorists.**

The Group is continuously improving three aspects of vehicle safety: primary, secondary and tertiary. It is also carrying out vital work on vehicle resistance to intrusion and new threats linked to the cyber security of connected vehicles.

#### 2.3.2.0. Group innovations to improve safety through the development of the autonomous and connected vehicle

The autonomous and connected cars of tomorrow will encourage the emergence of new transport and mobility models, while saving customers time and energy.

##### 2.3.2.0.1. The communicating connected car

The communicating connected car marks the transition from a closed-off vehicle to a more open vehicle, with mobile devices connected to the cloud. It expands the realm of possibility in terms of mobility. The technological building blocks that Groupe PSA is developing will drive the emergence of new connected services that promise to significantly alter car use.

Groupe PSA pioneered the communicating car with the emergency call service (eCall) that was launched in 2003 and, since 2010, has equipped its new models, particularly in Europe, with an autonomous telematics box. So far, 2.8 million vehicles are connected with the autonomous telematics box.

By 2020, "Car to X" ("Car to Car" and "Car to Infrastructure") communication is expected to become a reality, helping to optimise travelling time or fuel consumption, and better anticipate road accidents.

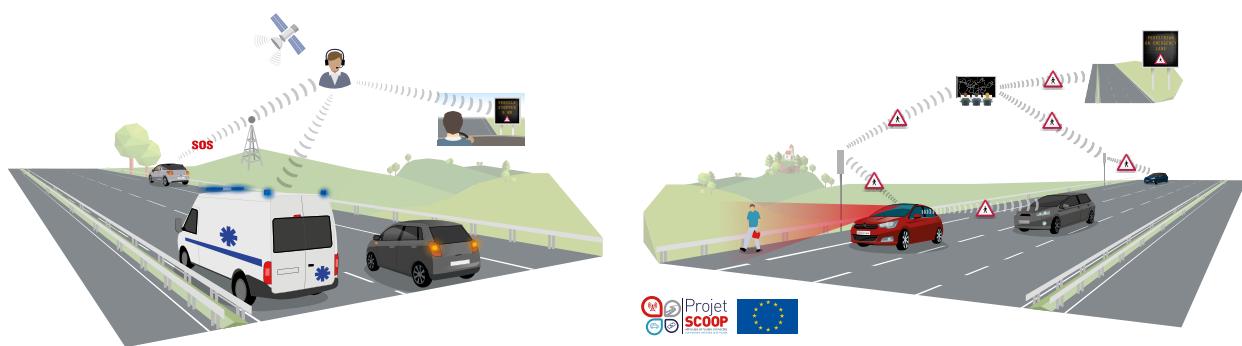
**COMMUNICATING CONNECTED CARS: FROM EMERGENCY CALL TO “CAR TO X”**

**Since 2003**

Groupe PSA pioneer of Emergency call

**By 2023**

The car will be integrated in the IoT (Internet of Things), providing a wide range of connected features and services



**FAST TECH AGILE DEVELOPMENT  
FOR “FOREVER UP TO DATE” CARS**

The (“Car to Car” and “Car to Infrastructure”) communication systems devised by the Group are a new source of information and help drivers become more familiar with the vehicle’s environment, using information provided by other nearby vehicles

or infrastructure. **This source of information combined with the driving features in autonomous mode will further increase the system’s reliability and, consequently, passenger safety.**



**STAKEHOLDERS DIALOGUE**

Since 2014, Groupe PSA has been participating in the SCOOP@F programme, a pilot project to institute cooperative intelligent transport systems, which are systems based on communication between vehicles or between the vehicle and the road. Vehicles are fitted with sensors that detect events such as a slippery road, a collision, and sudden braking, etc., with on-board units that send information to vehicles upstream (V2V) and to the Management System (V2I) via roadside units. The Management System can also send information, e.g. about roadworks, to the vehicles’ onboard units (I2V).

The project brings together numerous public and private partners involved with the French Ministry for the Ecological and Inclusive Transition, which coordinates local authorities, road operators, Groupe PSA and Renault car manufacturers, universities and research centres. Additional partners joined the project in January 2016: a telecom operator (Orange), a security services supplier and Austrian, Spanish and Portuguese partners.

SCOOP@F is a European project, so cross-border tests will be conducted with Austria, Portugal and Spain.

In 2018, 15 Groupe PSA communicating vehicles (among 80 involved in SCOOP) were on France’s roads for large-scale testing.

“Car to infrastructure communication: pedestrian detection (SCOOP Project)” video: <https://www.youtube.com/watch?v=15chTIV15aM>

“DS 4 and CITROËN C4 owners can take part in the SCOOP project” 06/04/2018 press release: <https://media.groupe-psa.com/en/ds-4-and-citro%C3%ABn-c4-owners-can-take-part-scoop-project>

The development of “Car to Car” and “Car to Infrastructure” technologies will make the cars of the future more intelligent and consequently more comfortable for users. **The autonomous functions will be used to lower the number of accidents caused by human error and reduce driver fatigue in monotonous driving conditions.**

To accomplish this, the Group needs to take up several challenges:

- develop open-source upgradable telematic platforms in partnership with software development companies. These platforms allow for fast, easy introduction of services such as IVI (In Vehicle Infotainment), Smart Antenna, etc.;
- integrate innovative connectivity solutions that provide secure, complete, economical and high added-value connectivity that is compatible with the development cycles of mass market electronics, as SmartDeviceLink and Car Easy Apps;
- offer ground-breaking solutions that take Groupe PSA vehicles into the realm of the Internet of Things, communicate with household devices and interact continually with the vehicle through smart devices such as smartphones. To do this, the Group is working with the GAFAM/BAT digital giants, such as Banma in China, to explore personal assistant solutions;
- over time, introduce new telecommunications and infrastructure technologies (5G, G5, etc.) to deploy intelligent transport systems leading to safer driving and new connected services for the intelligent autonomous vehicle. In this vein, Groupe PSA is involved in collaborative projects including 5GCAR, Autopilot, Concordia and Scoop, and is joining alliances and consortia including 5GAA and TIAA to speed up the introduction of these technologies.

Groupe PSA is a pioneer in the development of V2X technology for intelligent connected vehicles and autonomous driving. Road tests and public demonstrations have been conducted since early 2018 to assess the advanced performance of this technology to improve road safety and traffic management. “V” refers to vehicle; “X” refers to everything (infrastructures, vehicles, pedestrians, etc.).

C-V2X is a global solution for V2X communications allowing vehicles to exchange information with other vehicles and with pedestrian devices. C-V2X supports improved automotive safety, automated driving and traffic efficiency.

In 2018, Groupe PSA and Qualcomm advance testing for communication between vehicles: Cellular Vehicle-to-Everything (C-V2X) communication technology is a relevant step for connected and autonomous vehicle deployment and for enhanced road safety. The Group’s C-V2X technology will be deployed from 2020.

 “Groupe PSA and Qualcomm advance testing for communication between vehicles” 21/02/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-and-qualcomm-advance-testing-communication-between-vehicles>

LTE-V2X technology is a wireless communication solution developed for the transport industry and is important for both intelligent connected vehicles and autonomous driving.

During the 2018 World IoT (Internet of Things) Expo in Wuxi (China), Groupe PSA presented its latest LTE-V2X achievement. The demonstrations marked the beginning of a series of Groupe PSA field trials in China with Intelligent Connected Vehicles, consistent with its international technological strategy in the field of connectivity.

The Group’s LTE-V2X direct communication technology is expected to come to market as early as 2020.



“Groupe PSA showcases the leading-edge V2X communication technology for connected cars in China”  
14/09/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-showcases-leading-edge-v2x-communication-technology-connected-cars-china>

### 2.3.2.0.2. Self-driving: towards the autonomous vehicle

In 2017, Groupe PSA introduced its AVA (“Autonomous Vehicle for All”) programme, bringing together all the functionalities of driving assistance to create a simple, intuitive autonomous vehicle that offers a safe and comfortable driving experience.

The Group’s autonomous vehicle is characterised by:

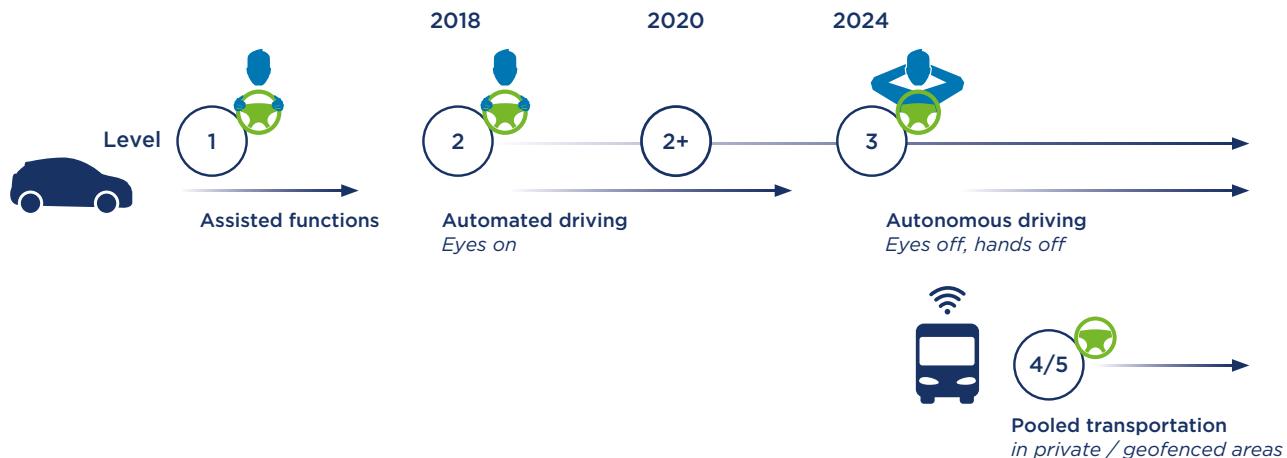
- a technology “for all”: easy for anyone to use. Groupe PSA designs simple, intuitive interfaces to allow drivers to interact comfortably with their car;
- a “for all” offer made up of different degrees of autonomy to respond to varying customer needs;
- a “for all” programme: deployed across all the brands.

In order to offer increasingly safer cars to its customers, cars that take the pressure off the driver during tedious driving conditions, and thereby make daily life easier, **Groupe PSA is launching a wide range of assistance functions that will gradually lead to the option to partially, and then totally, hand over responsibility to the vehicle.**

As such, the autonomous vehicle will gradually become a reality, with regulated automation and autonomy levels developed in a safe incremental approach.

Beyond level 3, the cost of the technology (vehicle and road infrastructure, will make the full autonomous vehicle not affordable enough for individual customers on the medium term. Nevertheless, advances associated with level three will open a way for level 4/5, for pooled transportation (autonomous shuttle designed to provide shared, driverless transportation in safe, well-defined urban settings).

## STAGES OF THE AVA (AUTONOMOUS VEHICLE FOR ALL) PROGRAMME



In 2016, Groupe PSA introduced the first level 1 functions, which include the following examples: The vehicle:

- adapts to the speed of what is in front of it, maintains a safe distance and can use Adaptive Cruise Control to stop automatically;
- uses Front Collision Warning to alert the driver in case of risk of collision; if necessary, it can automatically activate the brakes using the Autonomous Emergency Braking System;
- uses the Lane Keeping Assist function to automatically return to its lane in case it drifts;
- detects a parking space according to its size and uses the Park Assist function to park.

Driving assistance functions are already fitted on the new PEUGEOT 3008, 4008 and 5008 and Traveller, the CITROËN C4 Picasso, C3, C6 and SpaceTourer, and the DS 7 Crossback, the OPEL Crossland X, Grandland X, Insignia, Astra, ADAM, Corsa.

The Group plans to introduce now level 2 (Automatic driving) and then level 3 (Autonomous driving) technologies at low speeds and in high-traffic conditions. These technologies will subsequently be expanded to the full speed range on expressways. The technology will be accessible to all thanks to simple and intuitive interfaces. These progressively autonomous functions will allow drivers to delegate driving to the vehicle, without supervision, so that they can experience a trip without feeling stress or fatigue, especially during monotonous driving situations. For that purpose, Groupe PSA is working on a new electronic architecture (NEA) which, in short, is the car's central nervous system that guarantees safe operation in all situations, passenger safety and data security.

In 2018, Groupe PSA started level 2 by generalising the active safety features launched on the DS 7 Crossback. As a result, the new PEUGEOT 508 and 508 SW are equipped with a wide range of latest-generation driving aids like the Night Vision, the Lane Keeping Assist and the Lane Positioning Assist, the latest Active Safety Brake system, the Driver Attention alert, etc.

“The New PEUGEOT 508: the radical saloon”  
22/02/2018 press release: <https://int-media.peugeot.com/en/new-peugeot-508-radical-saloon>  
“New PEUGEOT 508 SW Breaking the codes”  
06/06/2018 press release: <https://int-media.peugeot.com/en/new-peugeot-508-sw-n-breaking-codes>

Level 4 technologies will be marketed from 2024, beginning with pooled transportation (people, goods) in private/geofenced areas.

Patents also cover Human Machine Interfaces (HMI) that help drivers when they are transferring from autonomous driving mode to manual driving mode.

**As proof of its successful technologies, the Group is the first car manufacturer:**

- to have the authorisations required to drive its autonomous prototypes on the open road – since July 2015 in France and since January 2019 in China;
- to have conducted tests with “non-expert drivers” since March 2017.

“Groupe PSA starts autonomous driving tests on open roads in China” 30/01/2019 press release:  
<https://media.groupe-psa.com/en/groupe-psa-starts-autonomous-driving-tests-open-roads-china>

During the Innovation Days in June 2017, Groupe PSA hosted more than 200 visitors, including journalists, bloggers, investors, institutions and the general public, at its Vélizy site to test its level 3 and level 4 autonomous demonstrators in real-world driving conditions.

As of the end of 2018, more than 170,000 kilometres had been driven in autonomous mode (levels 2, 3 and 4) on European highways.

These tests chiefly aim to fine-tune the various operating safety aspects of the systems to detect potentially dangerous situations in relation to infrastructure and other road users. In all, 20 autonomous vehicles developed by the Group were tested internally or by other partners of the Group. The various testing environments have made it possible to improve driving algorithms and on-board intelligence to ensure that the Group's autonomous vehicles are safe. As a result, the autonomous driving system has achieved a high level of reliability in all situations.

**170,000 km**

travelled in autonomous mode  
by Groupe PSA vehicles on European roads  
by the end of 2018

 “Groupe PSA autonomous car tests by non-expert drivers” video: <https://www.youtube.com/watch?v=DLBhoH1aoil>

“Autonomous car test” video: <https://www.youtube.com/watch?v=4AOiu550jA&list=PL6CCD8AAB157C61E8&index=6>

“The Group’s safe and intuitive autonomous car tested by the general public at the Innovation Days” 26/03/2017 press release: <http://media.groupe-psa.com/en/groupe-psa%20%99s-safe-and-intuitive-autonomous-car-tested-general-public-innovation-days>

“Best Of - Innovation Days Groupe PSA” video: <https://www.youtube.com/watch?v=LnaOGXZisy0&list=PL6CCD8AAB157C61E8&index=4>

### 2.3.2.1. Safety, a commitment that goes beyond the product

In terms of its products, research and development is pursuing efforts to improve vehicle safety as the Group wishes to manufacture vehicles which help to make the roads safer.

However, addressing road safety issues involves more than just installing increasingly sophisticated on-board safety systems. Roadway infrastructure must also be upgraded, while motorists and other road users must be effectively educated in safe driving and road use practices. The Group continues to improve its road safety measures, specifically by reviewing the travel habits of its employees, stipulating precise rules for business travel and commutes to work, and organising road safety awareness campaigns at its various sites.

At World Anti-Counterfeiting Day in June 2017, the Global Anti-Counterfeiting Network gave Groupe PSA the Technology Award for innovative technology used to protect its accessories and its PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL, VAUXHALL and Eurorepar spare parts. In the automotive field in particular, anti-counterfeiting products do not offer the same guarantees in terms of security, respect for the environment and regulatory requirements. The endeavour involves placing a secure label on packaging, which allows customers, suppliers and customs officials to authenticate original PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL parts and Eurorepar parts.

 “Groupe PSA rewarded for its technological solution choice for the protection of its brands” 08/06/2017 press release: <http://media.groupe-psa.com/en/groupe-psa-rewarded-its-technological-solution-choice-protection-its-brands>

### 2.3.2.2. Safety during development

The first priority for Groupe PSA is to ensure customer safety. To achieve this goal, the Group implements safety measures at each step of the vehicle development phases.

Groupe PSA has appointed a network of experts to define, apply, monitor and improve state-of-the-art safety practices, including international standards.



### STAKEHOLDERS DIALOGUE

For over 10 years, Groupe PSA has been actively participating in a project to bring the safety of vehicle on-board systems in line with ISO standards. It is part of a group of some hundred experts including car manufacturers, equipment suppliers universities and government bodies. Groupe PSA leads a new standardisation initiative on safety of the intended functionality focusing on driver assistance system. This approach seeks to ensure that these systems make the correct decision in all scenarios of a customer's life. This is vital for the advanced driver assistance systems (ADAS) and, beyond that, the functions of autonomous vehicles. This work follows on from the previous work which focused on defects.

The first normative document on this topic, PAS21448, has been issued for publication to the ISO secretary in 2018.

For every vehicle project, Groupe PSA experts perform safety assessments whose results are escalated to the R&D top management for appropriate decisions.



“Groupe PSA – Talent(s) builder: Nicolas, operating safety expert master”: <https://www.youtube.com/watch?v=eJ8oTNWH6CE>

### 2.3.2.3. Primary safety: avoiding accidents

#### Chassis systems

Suspension, steering, braking and other systems are designed to deliver handling performance, precision steering and braking efficiency that rank among the best in the market.

Groupe PSA had anticipated changes in regulations by equipping its vehicles with driving assistance technologies aimed at helping the driver:

- the ABS, or Anti Blocking System, which stops the brakes from blocking when performing an emergency stop;
- the EBA, or Emergency Brake Assist, which increases braking power when performing an emergency stop;
- ESC, or Electronic Stability Control, which helps drivers maintain control even in a skid;
- TPMS, or Tyre Pressure Monitoring System, which alerts the driver to potential loss of air pressure that can destabilise the vehicle.

#### Controlling trajectory and safety distances

- LDW, or Lane Departure Warning, warns drivers when they unintentionally leave their lane;
- LKA, or Lane Keeping Assist, operates on the steering system to keep the vehicle in lane;
- LPA, or Lane Positioning Assist, operates on the steering system to follow the trajectory selected by the driver;
- Front Collision Warning function emits a sound and visual alert to notify the driver of an imminent risk of collision;

- ACC, or Adaptive Cruise Control, adjusts the speed of the vehicle according to the traffic;
- SLI, or Speed Limit Information, recognises and indicates the speed limit to the driver;
- ISA, or Intelligent Speed Adaptation, proposes to the driver to set the speed detected by SLI as a reference for the cruise control or the Adaptive Cruise Control (ACC);
- AEBS, or Autonomous Emergency Braking System, when confronted with a risk of collision with a vehicle or pedestrian, alerts and intensifies the braking if the driver reacts, or brakes automatically if the driver does not react;
- Driver Attention Alert system assesses risky driver behaviour and alerts the driver if necessary;
- AFL, or Adaptive Forward Lighting (including IntelliLux LED Matrix headlights), is an adaptive and/or directional headlights;
- DDS, or Driver Drowsiness System, is an autonomous emergency braking system, dedicated to OPEL and VAUXHALL Crossland X, Grandland X, Insignia, Astra;
- RCTA, or Rear Cross Traffic Alert, prevents dangerous reversing dedicated to OPEL and VAUXHALL Insignia.

### See and be seen better

Groupe PSA has moved beyond the technologies which are in widespread use (camera-assisted reverse sensors, panoramic vision, LED lighting) to develop many new, ground-breaking innovations which are available on several vehicle lines:

- lighting to support the safety features (including automatic activation of hazard warning lights in the event of sudden deceleration and automatic switch between dipped beam/full beam);
- the blind spot information system (Blind Spot Monitoring, or BSM) to warn of the presence of a vehicle (especially motorbikes) through an icon that lights up in the wing mirror. If the driver changes lanes, BSM and LKA can work together to react to the presence of a vehicle in the blind spot.

With PEUGEOT Partner, CITROËN Berlingo and OPEL and VAUXHALL Combo Vans – which were awarded Van of the Year – Groupe PSA has proposed two technologies that are unique on the low commercial vehicles (LCV) market: the overload indicator and surround rear vision.



"Groupe PSA wins the 2019 International Van of the Year (IVOTY) Award" 19/09/2018 press release:  
<https://media.groupe-psa.com/en/groupe-psa-wins-2019-international-van-year-ivoty-award?idtok=b09d5bbb235>

### Ergonomics and human-machine interface (HMI)

The proliferation of driver assistance systems and infotainment services compels Groupe PSA to be especially attuned during the IHM design process to be able to diagnose the state of alertness of drivers and suggest interactions that will enable them to refocus on driving.

The "user experience cockpit team" in charge of designing Groupe PSA cockpits and man-machine interfaces turned two years old in 2018. A new multidisciplinary antenna has been created in Germany (Rüsselsheim) and has joined the French team to support the research and development of the OPEL and VAUXHALL cockpits. The new working methods inspired by startups, the web and consumer electronics are already showing results: the number of specifications required to create the interfaces of an

information system has been divided by at least four, and the agile development of a new information system is significantly faster than before. User tests are conducted quarterly in several regions of the world simultaneously throughout the development process to ensure that our customers' experience is perfect.

Recently, new HMI technologies gained particular attention during the Group's latest launches. The i-cockpit is the first to be adapted to the architecture and postural comfort of a sedan in the new PEUGEOT 508, and the introduction of a head-up display in a B-segment vehicle with the new DS 3 Crossback.

Through collaborative projects such as "Car to X" SCOOP@F (which takes over from SCOREF, the French Experimental On-Road Cooperative System) which are based on new information and communications technologies (NICT), researchers are looking at ways to send drivers targeted information that may either warn them about risks of an accident (suggested speed, weather alerts, traffic, obstacles) or provide a service (service stations, recommended route, etc.). All this information must be delivered to drivers without distracting their attention or disturbing their driving. The project is in its experimental phase and the results of the user tests will allow Groupe PSA to provide a new V2X ergonomic experience (vehicle to infrastructure) in the near future in a 5G environment to keep up with the developments in regulations.

### 2.3.2.4. Secondary safety: protection during an accident

The *Laboratoire d'Accidentologie, de Biomécanique et d'Étude du comportement humain* (LAB) is a road safety association created jointly by Groupe PSA and Renault. A unique organisation, LAB has conducted research projects since 1969 (27,582 accidents in its database) to enhance understanding of accident mechanisms and their related injury mechanisms.

LAB is behind a number of core advances in automotive safety, including load-limiting retractors, airbags and stronger structural components for passenger compartments. It also helps foster active safety research for the definition of the road holding and driver assistance validation criteria.

The Group's work focuses on two specific areas:

#### Body structure and bodywork

Vehicles are structurally designed to dissipate an impact in a controlled manner, thanks to the positioning of the shock absorption structures and deformable crash boxes (shock absorbers), whilst also that ensuring the vehicle will be repairable. The passenger compartment is treated as a survival unit, by reducing its deformation to a minimum, and deploying powerful restraints.

#### Airbags and restraint systems

The capacity of structures to absorb energy and protect the occupants' compartment leads to a reduction in the impact on occupants in crashes through sophisticated restraint systems.

Airbags (up to eight depending on cars):

- front airbags: they protect the head, neck and thorax of the driver and front passenger in a frontal impact;
- front side airbags: they protect the thorax, abdomen and pelvis of the driver and front passenger in a side impact;
- curtain airbags: these protect the side of the head of front and rear occupants in a side impact;
- rear side airbags: these protect the thorax of the rear passengers in a side impact.

They are also equipped with front and rear seatbelts with pretensioning devices and load-limiting retractor.

Seatbelt reminders sound a warning and light up to warn the driver when someone has not buckled their belt.

Thanks to ISOFIX attachment points, compatible with the iSize standard, Groupe PSA vehicles ensure the proper use of child safety seats.

### 2.3.2.5. Tertiary safety: post-accident emergency response

Groupe PSA has played a pioneering role and remains the European leader in post-accident or tertiary safety, which helps to attenuate the effects of an accident by facilitating emergency rescue in two ways.

#### Emergency call system

Implementing the devices before European regulation PE/112 comes into effect on 30 March 2018, the Group is the first mainstream car manufacturer to have deployed a wide-scale, geo-located emergency call system. Since March 2010, the Connect Box developed by Groupe PSA includes a SIM card and separates the telematics function from the radio, navigation and telephone functions. In case of accident or health related incident on board a vehicle, the occupants are connected with a dedicated assistance centre that pinpoints the vehicle. This saves time and allows for more effective assistance to be provided. According to the European Commission, equipping every vehicle on the road with such a system could save more than 2,500 lives a year in Europe. The emergency call system is particularly useful when accidents occur in isolated areas with no eyewitnesses.

The confidential information relating to customer journeys is not saved.

	Cumulative total through 2016	Cumulative total through 2017	Cumulative total through 2018
Cumulative total of PEUGEOT, CITROËN and DS AUTOMOBILES vehicles equipped as standard with the Group's emergency call system	2,300,764	2,902,611	4,654,491
Cumulative total of OPEL and VAUXHALL vehicles equipped with an emergency call system			1,485,249
Cumulative total alerts sent to emergency services (PCD)	20,184	24,824	32,500
Cumulative total alerts sent to emergency services (OPEL, VAUXHALL)			10,421
Countries in which the PEUGEOT, CITROËN and DS AUTOMOBILES emergency call service is marketed	17 countries: France, Germany, Italy, Spain, Belgium, Luxembourg, the Netherlands, Portugal, Austria, Switzerland, Denmark, Poland, the United Kingdom, Czechia, Slovakia, Norway and Sweden	17 countries: as in 2016	17 countries as in 2016 and 2017
Countries in which the OPEL and VAUXHALL emergency call service is marketed	NA	NA	33 countries: Austria, Denmark, Finland, France, Germany, Greece, Ireland, Italy, Netherlands, Norway, Poland, Portugal, Spain, Sweden, Switzerland, United Kingdom, Czechia, Slovakia, Belgium, Luxembourg, Bulgaria, Croatia, Estonia, Hungary, Latvia, Lithuania, Romania, Slovenia, Malta, Cyprus, Andorra, Gibraltar, Iceland

More than **6** million

Groupe PSA vehicles are fitted with the emergency call service as standard, helping to improve road safety

Motorway control centres in France are automatically warned of any accidents on their roads via the emergency call service in equipped PEUGEOT, CITROËN, DS AUTOMOBILES and OPEL vehicles. It is a legal obligation in France. Drivers can also use emergency call in their vehicles to alert the emergency services if they witness an accident. Messages can then be displayed on motorway signs to warn other drivers of the potential dangers they may encounter.

In the future, other vehicles will provide the data that will enhance drivers' awareness of their surrounding environment. For example, a vehicle will be informed by the vehicle in front if a pedestrian is on the road to anticipate automatic braking in the safest conditions possible.

### **Victim removal instruction and rescue sheets**

To facilitate the job of first responders after a casualty, the Group works with French rescue teams to prepare victim removal instructions for each of its models. Training sessions are held with the Public Safety Services of the French Interior Ministry and the zonal victim removal group to update the teams' knowledge of the new vehicles and the new technologies that are about to go on the market.

Rescue sheets are available for after-sales services and in some countries on the brand's website.



### **STAKEHOLDERS DIALOGUE**

Groupe PSA led efforts within the ISO to establish an international standard for a single extrication instruction document, which has been applicable since January 2015 and will become a worldwide standard.

Work on ISO standardisation continued in 2017 with the development of a standard for emergency guide books for any type of vehicle and is currently in the validation phase: the Group is participating in initiatives led by the CTIF (International Association of Fire and Rescue Services).

The Group also contributes to the future EuroNCAP evolutions on tertiary safety

### **2.3.2.6. Results of NCAP tests** SASB-250a.1

**The Group vehicles tested by NCAP organisations in different regions were awarded strong scores, reflecting the high safety standards we offer to the customers of the PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL brands.**

The scope of measurement of these programmes is changing to address new standards. As a result, Euro NCAP in Europe:

- since 2009, vehicles tested have received an overall rating which combines results for adults, pedestrians and children (which were previously awarded three separate scores) as well as for the presence of safety equipment;
- as of 2014, it has also factored in the performance of the primary safety systems such as Lane Departure Warning and automatic emergency braking for vehicles. These tightening regulations have affected assessment: five stars are now reserved for vehicles that also have this type of equipment, while vehicles with a high level of passive safety earn four stars;
- from 2016, the Euro NCAP also assessed the performance of the automatic emergency braking systems for pedestrians and the Lane Keeping Assist;
- from 2018, EuroNCAP highly strengthened the requirements and coverage of ADAS evaluations.

### **EURO NCAP: 42% OF MODELS TESTED RECEIVED FIVE STARS**

#### **VEHICLES WHICH HAVE RETAINED THEIR NCAP SCORE (VALID FOR SIX YEARS)**

No. of stars	Model (year launched/year tested)
5*	<ul style="list-style-type: none"> <li>• PEUGEOT: 508 (2018/2018) - 5008 (2017/2016) - 3008 (2016/2016) - Traveller<sup>(1)</sup> (2015/2015) - 308 (2013/2013) - 2008 (2013/2013) - 208 (2012/2012)</li> <li>• CITROËN: C3 Aircross (2017/2017) - SpaceTourer<sup>(1)</sup> (2015/2015) - C4 Picasso/SpaceTourer (2013/2013)</li> <li>• DS AUTOMOBILES: DS 7 (2017/2017)</li> <li>• OPEL and VAUXHALL Crossland X (2017/2017) - Grandland X (2017/2017) - Insignia (2017/2017) - Astra (2016/2015) - Moka (2012/2012)</li> </ul>
4*	<ul style="list-style-type: none"> <li>• PEUGEOT: 108<sup>(2)</sup> (2014/2014), Rifter (2018/2018)</li> <li>• CITROËN: Berlingo (2018/2018) - C3 (2017/2017) - C1<sup>(2)</sup> (2014/2014) - C4 Cactus (2014/2014)</li> <li>• OPEL and VAUXHALL Combo (2018/2018) - Ampera-E (2017/2017) - Corsa (2015/2014) - Adam (2013/2013)</li> </ul>
3*	<ul style="list-style-type: none"> <li>• PEUGEOT: 301<sup>(3)</sup> (2013/2014) - Partner<sup>(4)</sup> (2008/2014) - 107<sup>(5)</sup> (2005/2012) - Expert<sup>(6)</sup> (2007/2012)</li> <li>• CITROËN: E-MEHARI (2017/2017) - C Elysee<sup>(3)</sup> (2013/2014) - Berlingo<sup>(4)</sup> (2008/2014) - C1<sup>(5)</sup> (2005/2012) - Jumpy<sup>(6)</sup> (2007/2012)</li> <li>• DS AUTOMOBILES: DS 3 (2017/2017)</li> <li>• OPEL and VAUXHALL Karl (2015/2017) - Vivaro (2014/2015)</li> </ul>

Models marked <sup>(\*)</sup> with the same numbers have the same technical specifications.

### **CHINA NCAP: 94% OF MODELS TESTED RECEIVED FIVE STARS**

No. of stars	Model (year launched/year tested)
5*	<ul style="list-style-type: none"> <li>• PEUGEOT: 4008 (P84C) (2016/2017) - 308S (T91) (2015/2016) - 408 (new) (2014/2015) - 2008 (2014/2014) - 3008 (2013/2013) - 308 (2012/2012) - 508 (2011/2011) - 408 (2010/2010) - 307 sedan (2009/2009)</li> <li>• CITROËN: C5 Aircross (2017/2018) - C4 (BZ3) (2015/2016) - C4L (2012/2013) - C5 (2010/2010) - C Triomphe (2006/2007)</li> <li>• DS AUTOMOBILES: DS 6 (2014/2015) - DS 5 (2013/2014)</li> </ul>
4*	• CITROËN: C-Quatre (2008/2009)

## AUSTRALASIAN NCAP: 83% OF MODELS TESTED RECEIVED FIVE STARS

No. of stars	Model (year launched/year tested)
5*	• PEUGEOT: 5008 (2017/2018) - 3008 (2017/2017) - 308 (2014/2014) - 2008 (2013/2014) - 208 (2012/2013) - 508 (2011/2011)
	• CITROËN: Grand C4 Picasso (2014/2014) - C4 (2011/2011)
4*	• DS AUTOMOBILES: DS 4 (2012/2012) - DS 3 (2010/2011)
4*	• CITROËN: C3 (2017/2018) - Berlingo (2009/2011)

## ASEAN NCAP: ONE MODEL TESTED, 0% RECEIVED FIVE STARS

No. of stars	Model (year launched/year tested)
4*	• PEUGEOT: 208 (2013/2013)

## KOREAN NCAP: ONE MODEL TESTED, 0% RECEIVED FIVE STARS

No. of stars	Model (year launched/year tested)
4*	• PEUGEOT: 2008 (2014/2016) the result is 2 <sup>nd</sup> Grade. No overall rating in South Korea, adult rating provided here

## LATIN NCAP: THREE MODELS TESTED, 0% RECEIVED FIVE STARS

No. of stars	Model (year launched/year tested)
4*	• PEUGEOT: 208 (2013/2014)
	• CITROËN: C3 (2014/2015)
2*	• PEUGEOT: 208 (2013/2016)

**US NCAP and IIHS:** no sales in USA, no result.

**Japan NCAP:** no models tested.

### 2.3.2.7. Vehicle resistance to intrusion

Groupe PSA has long been working on making vehicles resistant to theft as it has a duty to guarantee the protection of vehicles and the objects inside them from malicious persons. Vehicles are designed to withstand break-ins according to standards in line with current knowledge and leading authorities such as Thatcham.

Since 2011, a unit has been analysing and addressing potential or known vulnerabilities, conducting statistical and Internet monitoring, and analysing theft methods in conjunction with the police. This work has, for example, spurred alterations to the design of door locks to strengthen their resistance to break-ins.

The unit works closely with cybersecurity experts (see 2.3.2.8.) and is assisted by specialised firms.

For instance, encryption algorithms are used to protect vehicle unlocking and starting. These algorithms are continually improved as existing knowledge changes. The latest-generation vehicles use encryptions that meet the highest standards.

### 2.3.2.8. Cybersecurity of the connected vehicle

In light of the emergence of new malicious hacking threats on vehicles, Groupe PSA has implemented a reference guide and methodology modelled on operating safety, and a dedicated organisation that depends on a group of experts who are also involved in drafting international standards on personal data security, such as the Europe-wide General Data Protection Regulation (see 7.4.1.1.).

The organisation is tasked with compiling immediate responses for the event that risks are detected at the design stage, or by customers on existing vehicles, and with constructing a secure on-board electronic architecture for future Group vehicles, beginning with the driverless connected vehicle.



#### STAKEHOLDERS DIALOGUE

Groupe PSA experts are involved through JWG SAE/ISO in the drafting of an international Cybersecurity Standard (ISO 21434) setting out the basic cybersecurity compliance rules. This standard is a prerequisite for the government bills that are currently being discussed by the European Automobile Manufacturers' Association (ACEA) and European and Chinese governments.

The Group is also involved in wider research aimed at finding security solutions for car (IRT SystemX), rail and air transport.

### 2.3.2.9. Protecting consumer health and safety

GRI.419-1 GRI.416-1  
GRI.416-2

Vehicles are not subject to a regulation requiring a comprehensive description of their components for consumers. However, standards governing the approval of vehicles by the government include, among other points, passenger and pedestrian safety criteria, environmental compliance criteria (including CO<sub>2</sub> emissions) and human health-related criteria (REACH for components, European Euro X emission standards for air pollutants). These points are described in sections 2.1, 2.2, 2.3.2 and 2.4.1.3.

All Group brand vehicles are evaluated on their health and safety impact through approval procedures and are compliant with regulations.

#### Violation of regulations on health and safety of consumers

In 2018, CITROËN in Brazil was ordered to pay moral damages (€50,000) and material damages corresponding to the "maintenance allowance" to beneficiaries after an accident inside a Xsara Picasso CX 2002, which allegedly involved an air-bag failure on the passenger side.

### 2.3.2.10. Handling customer incidents

SASB-250a.2 SASB-250a.3

#### Field investigation activity

The improvement of quality in the field is done through procedures of early detection, resolution and field actions including recall campaigns. The dealers provide different types of data (warranty claims, dealer issue detection for incidents, safety incidents or assistance). From these data, issues are addressed, as quickly as possible, to the right owner (supplier, manufacturing plant, Design Division) to fix the problem for new cars, assess the risks for owners of cars already in the field and provide fixes for the after-market. The procedures include several actions starting from weak signals detected to crisis management, and immediate actions.

Safety is a central focus for our five brands:

- all failures reported by our networks and those that may be related to safety (2,073 in 2018) are examined;
- all safety-related questions by the authorities (237 in 2018) are answered directly.

A global "detection efficiency" plan is currently being rolled out to further improve the speed and quality of the information coming from the network.

#### Recall campaigns

In compliance with all the national regulations governing recall campaigns, the Group's field action decision process aims to maintain a high level of safety and quality for vehicles in circulation, evaluating potential defects as soon as they are known. This process is applied, as necessary and on the Group's initiative, for vehicles of our brands.

The final decision is independently made by the Quality Senior Vice-President for safety, compliance and quality.

In 2018, for the entire Group and for the five brands scope, **74** campaigns were engaged on **1.9** million vehicles (of which **44** campaigns carried out on the PEUGEOT/CITROËN/DS AUTOMOBILES scope) for units ranging from several dozen to more than 500,000 vehicles. The number of recalled vehicles increased compared to 2017 as OPEL and VAUXHALL campaigns have been integrated (about 400,000 cars) and, in coordination with another OEM, an exceptional recall campaign was launched on the PCD scope for a possible rear door glass fixation defect on approximately one million vehicles of two common Group models produced between 2005 and 2013.

All of these campaigns are issued voluntarily by the car manufacturer.

These campaigns are carried out transparently with respect to:

- the relevant requirements of authorities (regulatory filing of declarations for safety campaigns):
  - each notification document submitted to the authorities indicates: the models and parts concerned, vehicle manufacture dates, type of risk, description of the defect and corrective measures taken;
- PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL dealership networks:
  - the traceability of the components purchased during manufacture enables Groupe PSA to draw up a list of vehicles that are potentially concerned. As soon as a campaign is launched, an alert including all the information (list of vehicles concerned, content of message to customers, necessary procedure, parts required, etc.) is sent to the dealership networks via the appropriate IT systems;
  - the owners of the cars involved notified individually:
    - the method used to notify the customer is in line with the local regulations in each country. The affected customers are invited to make an appointment with an authorised brand repairer to make the necessary adjustments;
    - the workshop contacted will provide all the necessary information, including the appointment date, how long the repair will take, the confirmation that the repairs are free of charge, the terms for using a replacement vehicle, etc.;
    - the customer is asked to notify the brand of any change in vehicle status, including its sale, end of life or change of address.

The Group monitors the implementation of each campaign specifically based on progress indicators: the actual repairs made in application of each campaign are recorded in a centralised database. Repeat requests are sent to customers who do not come forward until the end of the campaign. The operations carried out are free of charge for the customer.

Additionally, a tool called "Check VIN" allows all customers to check if their car is involved in a recall campaign, just entering their VIN number.

## 2.4. ENVIRONMENTAL IMPACT OF MATERIALS: CIRCULAR ECONOMY AND SUSTAINABLE MANAGEMENT OF MATERIALS

DPEF.16 DPEF.19 DPEF.23 GRI.103-2 GRI.103-3

**From the vehicle design phases through to each stage of its life cycle, Groupe PSA teams are tasked with limiting the vehicle's environmental footprint as much as possible** by controlling fuel consumption, CO<sub>2</sub> emissions and pollutants, and through the responsible use of natural resources, by improving recyclability,

repairability, etc. In addition to ensuring that its vehicles comply with local environmental legislation, eco-design also guarantees that the Group will stay ahead of the competition in terms of sustainable mobility and new materials.

Life cycle stage	Core challenges
<b>Product definition</b>	Define new automotive products and services taking into account the mobility needs of consumers around the world, local legislation and people's expectations with regard to the environment, safety, etc.
<b>Design and engineering</b>	Design vehicles at an acceptable cost and reduce their impact: • on the environment: CO <sub>2</sub> emissions, local pollutants, the use of resources and recyclability; • on society: road safety, noise pollution, traffic congestion, etc.
<b>Production</b>	Reduce the environmental impact of automobile manufacturing. Ensure workplace safety. Participate in the economic and social life of local communities.
<b>Transport and sale</b>	Integrate environmental concerns into supply chain and dealership network management. Responsibly inform customers in its advertising and labelling, and ensure a satisfying ownership experience with effective sales and customer service processes.
<b>Use</b>	Help limit the impacts associated with car use: promote the safest and most environmentally friendly driving practices, reduce vehicle fuel consumption, and develop increasingly effective exhaust emission control systems. Promote the use of parts from circular economy in vehicle maintenance
<b>End of life</b>	Facilitate the collection and processing of end-of-life vehicles and components by specialised providers and optimise their recyclability (pollution control, recycling, recovery and reuse).



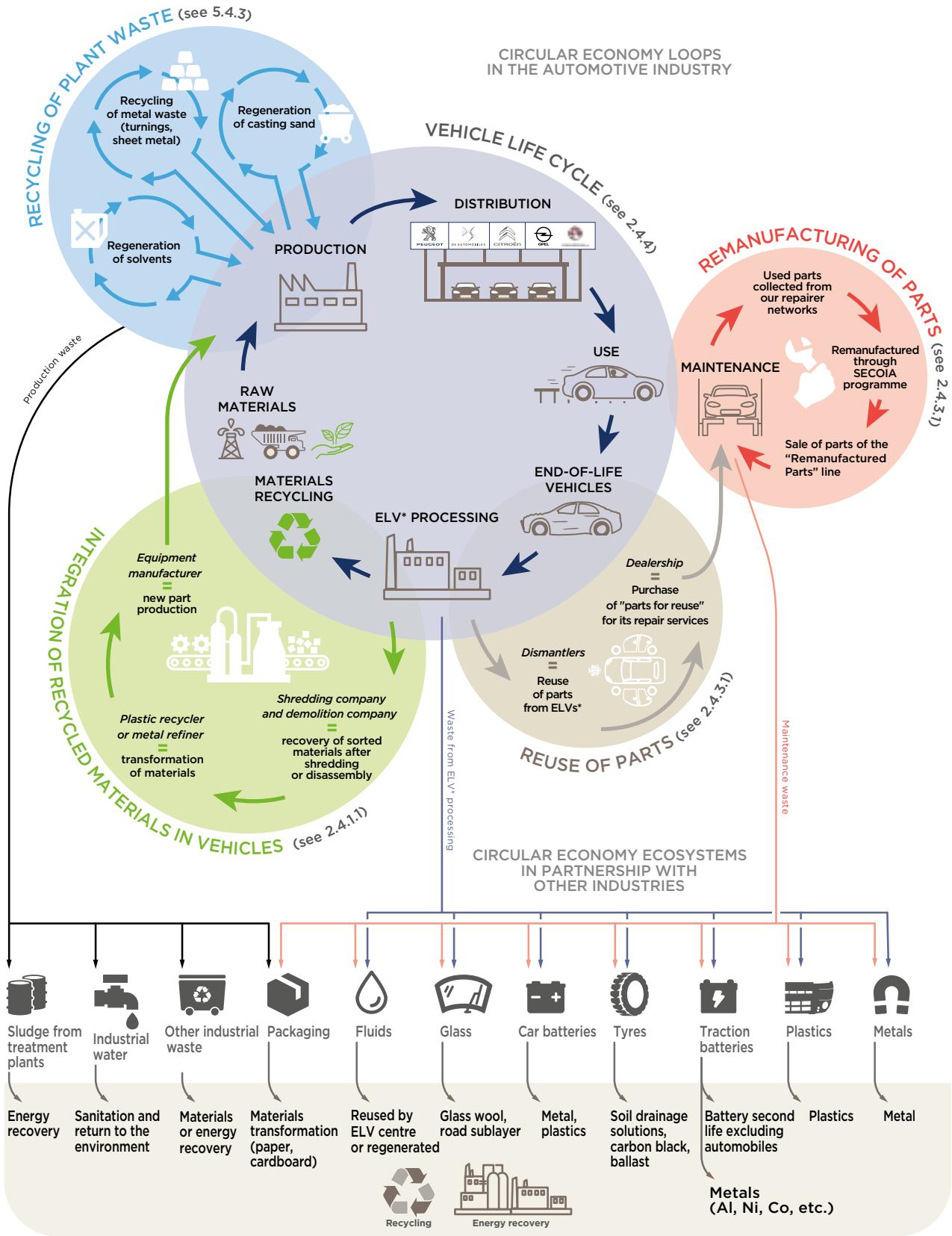
### STAKEHOLDERS DIALOGUE

In October 2018, the materials and eco-design expert at Groupe PSA gave a presentation on the circular economy for future vehicles. This event, organised by the car engineering association SIA (*Société des ingénieurs de l'automobile*) focused on the actions of carmakers to implement the circular economy and the main stakes in the future.

Groupe PSA jointly organised a conference on "Eco-design and Circular Economy" with the *Arts et Métiers* school in Bordeaux in October 2018. This annual thematic workshop of the association ECOSD, which focuses on eco-design, developed solutions to promote circular economy. The presentations and posters will be published in an ongoing edition of *Presses des Mines* on sustainable development.

The Group is developing internal procedures and partnerships with industrial players from the automotive industry and other sectors to reduce the pressure on natural resources, for the different stages in the life cycle of its vehicles, and close the gaps in the circular economy.

## EXAMPLES OF SOME OF THE TYPICAL CIRCULAR ECONOMY INITIATIVES BY GROUPE PSA





### *Impact measurement and economic assessment*

The raw materials management by Groupe PSA allows it to combine **competitiveness with resource conservation**.

#### **Cost savings:**

The Group maintains its efforts to fulfil its commitment to build vehicles with 30% of recycled or bio-sourced materials, which is a way to **control material purchasing costs**: the use of recycled polypropylene and polyamide (rather than the same virgin materials) yielded **savings of €9.5 million in 2018** (€7.2 million were saved in 2017, for EU vehicle sales), which **advances the goal of reducing production cost** and improves the sustainability of end-of-life vehicle management systems while guaranteeing an outlet in the automotive industry for recycled materials from ELVs.

#### **Revenue generated:**

Through its choice of materials, the Group also aims to promote the recyclability of its products and guarantees approval of its vehicles and their sales. This goal also generates additional revenue for distribution networks in some cases. In Europe, **the collection and treatment of end-of-life vehicles generated a total revenue of €2.2 million in 2018**, for the sole company-owned network (PSA Retail) and used vehicle sales branches.

In addition, the brands, together with their dealer networks, have entered the **circular economy** through different offerings (see 2.4.3.1): the Remanufactured parts offer (mainly EE and mechanical parts) and "Repair & Return" service in Europe; the reused parts from end-of-life vehicles dismantling in France. In 2018, these business lines for PCD and OV generated **total revenue of €195.7 million**.

**€197.9 million**

**revenues generated from product  
end-of-life management**

## 2.4.0. Innovating to reduce the environmental impact of materials

### Eco-design

Groupe PSA develops partnerships on additive manufacturing (an industrial process that optimises material use) for both metal and plastic parts, and for spare parts and customised parts. The first customisation application was launched in 2017 on the DS 3 Dark Side for trim parts and decorative features on the key.

### Circular economy after-market

In 2018, Groupe PSA decided to create a business unit dedicated to the circular economy in the after-market. All related activities are now included in a team that has all the required expertise, from business development to manufacturing and marketing. The goal of the business unit is to build a sustainable and profitable

business based on circular economy principles everywhere (worldwide scope) and whenever (technical limitation) it makes sense. This includes, but is not limited to, giving a reusing or recycling plant surplus, network damaged parts and end-of-life vehicle parts. From 2019 onwards, a label will make any related service recognisable.



"Creation of a Business Unit dedicated to the circular economy in the after-market" 14/09/2018 press release:  
<https://media.groupe-psa.com/en/creation-business-unit-dedicated-circular-economy-aftermarket>

## 2.4.1. Responsible use of materials

DPEF.23

Eager to optimise its use of natural resources and to limit the impact of its products on the environment right up to the end of their useful life, the Group is implementing a life cycle analysis procedure to evaluate and validate the selection of materials in new projects. Each stage of the life cycle and the main environmental issues are examined. (See 2.4.4.)

This policy to search for new materials is being implemented in conjunction with the Group's commitment to using more renewable, recycled or bio-sourced materials in its vehicles.



### STAKEHOLDERS DIALOGUE

This approach to analysing strategic material requirements is shared with other French manufacturers within a national think tank led by the French Ministry of Industry, so that analysis tools adapted to this methodology can be rolled out in small and medium-sized companies (COMES Committee of Strategic Metals).

#### 2.4.1.1. Reducing consumption of materials

GRI.301-1

In 2018, the Group used:

- 3,000,000 tonnes of steel, 720,000 tonnes of which were used directly;
- 460,000 tonnes of non-ferrous metals, 84,000 tonnes of which were aluminium and were used directly;
- 700,000 tonnes of synthetic materials, polymers and elastomers.

These volumes come from: purchased masses of raw materials; parts assembled in the Group's own factories (excluding Latin America); spare parts; and parts supplied to assembly plants operated in cooperation.

#### 2.4.1.2. An assertive commitment to use green materials

GRI.301-2

**Groupe PSA has pledged to reach an average rate of 30% recycled and natural materials in the Group's vehicles.** The integration of recycled materials covers all materials used in vehicles. Although metals are a type of material which is widely recycled, the target is to promote the recycling of these metals in automotive products.

All of the new European vehicles have green materials monitoring system, including new vehicles that will be developed with the OV engineering team and sold from 2019.

### DISTRIBUTION OF MATERIALS IN THE COMPOSITION OF THE AVERAGE GROUP VEHICLE

Average PCD vehicles Europe 2018	Composition of materials	Green materials
Metals	69.4%	28.8%
Polymers	21.3%	2.0%
Natural materials	0.6%	0.6%
Mineral materials	2.9%	
Fluids and oils	5.5%	
Electronics	0.2%	
<b>TOTAL</b>	<b>100.0%</b>	<b>31.3%</b>

Furthermore, the Group is pursuing research efforts into recycled polymers (non-metallic and non-mineral), since polymers account for 20% of total vehicle mass on average. In order to expand the use of recycled plastics, Groupe PSA is committed to a minimum use of 15 kg of recycled polymers for new vehicles in 2025 regardless of design.

For the most part, other materials – such as metals, fluids, etc. – are already recyclable and are widely recycled.

**The Group defines three categories of materials as “green materials”:** recycled materials, materials of natural origin (wood, plant fibres, etc.) and bio-sourced materials (polymers that come from renewable resources rather than the petrochemical industry).

**There are several advantages to using them: reducing the use of mined and fossil-based materials, and fostering the development of the recycling industries by increasing demand.**

The wider application of green materials requires the development of robust supply chains and more research on new materials. To meet its targets, the Group is actively selecting and certifying materials that offer the best cost/technical trade-offs, thereby creating a portfolio of solutions for future vehicle projects.

From the PCD side, the use of green materials is now included in the engineering design guidelines and in the tender specifications for supplying parts and components. The use of green materials is also one of the selection criteria when choosing suppliers.

Initially launched in Europe, the policy has now been rolled out to Latin America where vehicles have mudguards made from 100% recycled thermoplastics and rear seat trays made from locally-sourced natural fibres, for example. Five new green materials were validated in Latin America in 2018.

Likewise, investigations have begun in China to identify potential sources of green materials which meet the automotive parts specifications.

From the OV side, the recycled polymers policy has been in effect for several years with the validation of more than 200 green materials available for parts design in previous Opel Vauxhall vehicles.



## STAKEHOLDERS DIALOGUE

Groupe PSA is involved in a large number of scientific partnerships to boost the development of the green materials industry and expand the use of these materials in vehicles:

- through the Regional Association of the Automotive Industry of Île-de-France, Groupe PSA is a partner of the "BIOMass for the future/Miscanthus" project alongside the INRA (French National Institute for Agricultural Research). The Group's involvement consists of taking part in the validation tests of materials containing miscanthus fibres. The project led to the validation of mouldability with representative parts in the PSA workshop, as well as the complete validation of the material PP-NF30 - ADDIPLAST;
- the Group leads the ADEME (Agency for the Environment and Energy Management) COCCY-BIO (*Tenue aux ChOCs et reCYclage de BI/Ocomposites multifibres* - performance under impact and recycling of multi-fibre bio-composites) project with the following partners: ADDIPLAST SA, COPFIMO, Université de Bretagne Sud, Université de Strasbourg, and the "Car of the Future" and IAR competitiveness clusters;
- Groupe PSA participates in the FUI (*fonds unique interministériel*) RUSTINE project (extruded recycling for the valorisation of polymer waste) with industrial and academic partners (GALLOO PLASTICS, WIPAK, NUTRIPACK, UMET and ARMINES). The objective is to develop a process for decontaminating plastic waste from different sectors, in particular automobile. Groupe PSA aims at developing validated products with recycled polyolefin materials for interior parts, without losing the properties required for virgin materials, in particular odour and volatile organic compounds.

The latest vehicles brought to the market illustrate the results obtained on the inclusion of materials that are recycled or from natural sources:

- the new PEUGEOT 508 has an average of 31% of recycled and natural-origin materials in the overall vehicle. Approximately 80 polymer parts incorporate recycled materials and materials of natural origin. Among the notable applications on the new 508, we can cite:
  - the use of natural hemp fibres in windshield defrost ducts,
  - the use of recycled polypropylene in deflectors, the 12V SLI battery tray, or even the storage box device for spare tyre;
- the CITROËN C5 Aircross has an average of 31% recycled materials and materials of natural origin in the overall vehicle. Approximately 85 polymer parts incorporate recycled materials and natural-origin materials. Among the remarkable applications on the CITROËN C5 Aircross, we can cite:
  - the use of natural hemp fibres in side door panel fittings;
  - the use of recycled polypropylene in the deflectors, the 12V SLI battery tray, the door trims, the front/rear mud guards and bumpers, the air extractors and the spare type storage,
  - the use of recycled polyamide in the fan motor, filters and air exchanger,
  - the use of recycled polyethylene in the boot carpet, soundproof cockpit and carpets.

The average integration rate of green materials in PCD vehicles sold in 2018 was more than 30% (volume-weighted average of European PCD vehicle sales in 2018).

**30%**  
of natural and recycled materials  
in PCD vehicles

In 2018, 660,000 tonnes of green materials were used to manufacture the vehicles on the market for PCD vehicles, including 640,000 tonnes of recycled materials.

### 2.4.1.3. Reduction of hazardous substances

DPEF.18 DPEF.36

For many years now, Groupe PSA has been attentive to the health and safety of its customers and employees.

Regulatory requirements regarding the use of hazardous substances are factored into all phases of vehicle life, from design and manufacture to use and end-of-life recycling, **in close cooperation with suppliers so as to guarantee the full compliance of everything we provide**. To ensure the traceability of all substances referred to in regulations, the Group collects information from suppliers using the IMDS (International Material Data System) tool. For every part delivered, the Group requests that its suppliers provide a declaration of conformity regarding chemical substance regulations.

This initiative centres around two key issues:

- the elimination of four heavy metals (lead, mercury, cadmium and hexavalent chromium) that are regulated by European Directive No 2000/53/EC on end-of-life vehicles. Examples include:
  - chromium VI used in anti-corrosion coatings for many metal parts has been replaced,
  - from January 2016, lead could no longer be used in the seals of the electronic boards of new vehicles;
- compliance with the REACH regulation. As the final link in the production chain, the Group has set up an organisation and a communication system to monitor its partners and suppliers and ensure that they comply with the REACH regulation:
  - Groupe PSA uses the REACH automotive industry guidelines to which it contributed as a member of the European Automobile Manufacturers' Association (ACEA),
  - as part of the French automotive platform, Groupe PSA supports its supply chain in enacting compliance initiatives while striving to stay competitive.



## STAKEHOLDERS DIALOGUE

In June 2018, Groupe PSA helped to set up a conference involving several French professional organisations in the automotive industry (SNCP, *Fédération Plasturgie*, etc.) to promote a common win-win approach within the whole supply chain to meet the chemicals regulation challenges in an optimal manner.

Groupe PSA has set itself the goal of minimising the use of substances on the REACH candidate list and anticipating the restrictions in appendices XIV and XVII by working as far upstream as it can during the new material research and innovation phase. Examples include the replacement DEHP (diethylhexyl phthalate), which is used as a plasticiser in PVC sheaths for wiring harnesses.



"REACH: Automotive Industry Guideline" article:  
<http://www.acea.be/publications/article/reach-automotive-industry-guideline>

Other regulations on chemical substances – such as regulations on persistent organic pollutants, biocides, etc. – which affect part design and/or production, are also followed.

Furthermore, in order to manage any possible risk related to the use of nanomaterials, the in-house tool for internal chemical product management is used to trace the use of nanomaterials in chemical products at the plants. This requirement is also implemented as far upstream as possible since it is part of the environmental evaluation process for innovations. As a result, companies supplying new innovations are asked to declare the use of nanomaterials and, together with Groupe PSA, define the action plan needed to manage any possible risk.

### Interior air quality

In addition to respecting regulatory requirements, **Groupe PSA has voluntarily introduced technical solutions to ensure the highest levels of customer health and safety**. These include filters for air coming into the passenger compartment and limits on volatile organic compounds (VOCs) in the materials used. The air in the passenger compartment is checked for VOCs before the vehicle goes on the market.



Certification label granted to the PEUGEOT 3008 high-performance filter.

Groupe PSA has begun to develop testing methods that can measure filter performance when it comes to mould and bacteria. These methods were validated by UL Environment, and this allowed the Group to obtain a performance certification label for the high-efficiency filter introduced on the new PEUGEOT 3008, which filters more than 92% of fine particulates and more than 98% of mould and bacteria. This performance certification label will be phased in for all the filters fitted on new Groupe PSA vehicles.

### 2.4.1.4. Monitoring material criticality

SASB-440a.1

Groupe PSA is keen to control the risks associated with the supply of its materials. It has therefore begun to identify and monitor the materials it deems to be "strategic". These materials are evaluated according to different criticality criteria:

- use criticality: materials used for special features which are important for competitiveness, and for which there is little or no current alternative;
- supply criticality/potential scarcity: limited global production or unreliable supply chains;
- CSR criticality: the extraction or use of these materials is questionable from a CSR viewpoint (environmental impact, breach of human rights, etc.).

Rare earth are monitored separately following tensions on this market. A detailed analysis of the use of the different rare earth materials identified possible alternatives and allowed for the continued production of the applications which require these materials.

Polymers were also included. This material is critical due to a high concentration of some of the stages of the production process among a very small number of suppliers.

Groupe PSA also introduced a traceability system for supplies that contain conflict minerals (see 4.2. Suppliers: linchpins of the sustainability chain).

### Materials Strategy Committee

A Materials Strategy Committee, run jointly by the Heads of Purchasing and the Research and Development Department maps current and forecasts materials risks according to different criteria for each raw material: significance in developing and existing technologies; scarcity and geographic location; social and environmental impacts (including recyclability) and conditions of extraction/production; geopolitical or logistical accessibility; cost and share of our needs compared to global market demand; market players, etc. Based on this risk mapping, the Committee validates the R&D roadmap on substitutive materials or alternative supplies, to manage and secure the Group's supplies over the long-term, notably through collaborative actions with metallurgical and mining industries.

The Finance Department performs cost monitoring on materials in liaison with operational purchasing and R&D teams to better anticipate and manage cost developments, as well as helping to diversify and manage the most strategic supplies.

In the context of increasing scarcity and expense of raw materials in the long-term, the supplier relationship is a lever to implement our material and product development policies.

Groupe PSA pays particular attention to the materials used in batteries for electrified vehicles through the supply chain (see 4.2.2.1.) and supports initiatives for innovative supplies of raw materials.

For instance, in partnership with Eramet and *Électricité de Strasbourg*, Groupe PSA is participating in EuGeLi, a European project that aims to extract lithium from geothermal sources in Alsace (France) in combination with geothermal energy production.

## 2.4.2. Eco-design for better recycling

DPEF.20 SASB-440b.3

The Group's actions in this field fall within the framework of European Directive No. 2000/53/EC of 18 September 2000 on end-of-life vehicles (ELV) which sets vehicle design requirements and operational processing requirements for the vehicle at the end of its service life. It establishes three types of recovery for end-of-life vehicles: reuse of parts, recycling of materials and energy recovery. Until 2015, it required vehicles to be overall 85% recoverable by vehicle weight, of which 80% is actually reusable or recyclable. As of 2016, vehicles have to be 95% recoverable, of which 85% is reusable or recyclable.

In order to meet these obligations, the Group has organised a network. This highly horizontal organisation brings together all the skills to deal with upstream and downstream processes. The activity is managed at two levels: upstream, which seeks eco-design solutions, and downstream, which involves monitoring the collection and treatment of end-of-life vehicles. This work is conducted in close collaboration with Group partners such as suppliers, recycling operators and car manufacturers' associations. This structure, which was originally implemented in Europe, is being rolled out on the Group's other sales platforms.

### Prevention measures: commitment to recyclability

**The impacts of recycling end-of-life vehicles (ELVs) are taken into account from the design phase. Vehicle materials are selected according to increasingly strict criteria that are designed to foster the development of recovery and recycling facilities.** To ensure that its vehicles are highly recyclable, the Group is committed to:

- using easily recyclable materials;
- reducing the variety of plastics in a car to facilitate sorting after shredding, optimise the related recovery processes and ensure their profitability;
- using a single family of plastics per core function, so that an entire sub-assembly can be recycled without prior dismantling;
- marking all plastic parts with standardised codes to ensure identification, sorting and traceability;
- introducing green materials, especially recycled materials, into vehicle design to support the emergence or development of new markets for certain materials;
- integrating recycling considerations very far upstream, starting with the innovation phases, with particular attention to new materials or vehicle parts. For example, Groupe PSA has

developed a tool for assessing the impact of innovation on the recyclability of future vehicles. These assessments identify the actions to be undertaken with suppliers to develop and improve recycling facilities;

- the Group is undertaking research and development projects with automotive industry partners tasked with treating end-of-life vehicles:
  - designing the vehicle taking into account the depollution phase. Depollution, or pre-treatment, is the first mandatory step in the processing of end-of-life vehicles. It involves draining all fluids from the vehicle, neutralising pyrotechnic components and disassembling parts considered harmful to the environment. The objective of this step is to avoid any pollution transfer during the ELV treatment. Design requirements are defined to allow this depollution phase, such as for the housing of automatic transmissions with the creation of weak spot in addition to the drain screw, which can be pierced to drain all the oil,
  - as a participant in the International Dismantling Information System (IDIS) project, the Group provides recycling facilities with disassembly instructions for the Group's vehicle brands.

On 30 May 2018, the Group received a three-year renewal of the **UTAC certificate** verifying its ability to implement the processes needed to fulfil the 95% recyclability/recovery requirement (in vehicle weight), including 85% in reusing or recycling materials. Two audits were conducted by UTAC for PCD vehicles on one side and for OV vehicles on the other side. The audits applied to the traceability processes for information on the weight of materials, substances and the corresponding assessments and analyses. All PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL vehicles are now accredited to meet this requirement.

All the Group's vehicles  
in Europe are

95%  
recoverable

85%  
recyclable

## 2.4.3. Management of end-of-life products

DPEF.23

GRI.301-3

A business unit dedicated to circular economy was created in 2018 to generate business opportunities (see 2.4.0).

### 2.4.3.1. Parts from circular economy

#### The remanufacturing of parts and subassemblies with high value

In 1967, PCD created SECOIA (*Service ÉCologique pour l'Industrie Automobile*) in Hérimoncourt (France) which collects damaged parts from the dealer networks and sorts them before they are sent to a selected partner for remanufacturing. In parallel, OV has been in the remanufacturing business for more than 30 years. In 1997, OV created a European Core Return Centre in Rüsselsheim (Germany).

From 2018, Groupe PSA manage two Remanufacturing Centre and have a strong position to offer remanufactured parts in Europe.



#### Impact measurement and economic assessment

Remanufacturing saves up to 80% on raw materials and 50% on energy compared to a brand-new product. It is also up to 40% cheaper for the end customer.



Supplier example showing environmental benefit of remanufacturing: [http://br.bosch-automotive.com/en/Internet/parts/parts\\_and\\_accessories\\_2/specials\\_1/commercial\\_vehicle\(repairs\\_exchange/bosch\)\\_exchange\\_2/environmental\\_protection\\_2/environmental\\_protection\\_3.html](http://br.bosch-automotive.com/en/Internet/parts/parts_and_accessories_2/specials_1/commercial_vehicle(repairs_exchange/bosch)_exchange_2/environmental_protection_2/environmental_protection_3.html)

In 2018, 52% of engines, 56% of gearboxes, 52% of clutches, 68% of injectors, 79% of alternators and 79% of particulate filters sold by brands in Europe were from the remanufacturing offer. These parts are offered to the public with the same manufacturer warranty as new parts.

# 641,148

remanufactured parts sold in 2018

Remanufacturing of high-voltage batteries is also taken into account by Groupe PSA (see 2.4.3.3).

### Reused parts: the recovery of parts from end-of-life vehicles

In 2017, the brands marketed a "reused parts" service with parts coming from end-of-life vehicles. **This service provides customers with an alternative and economical solution to brand-new parts when body shop work is more expensive than the vehicle's market value.**

By the end of 2018 in France, this offer was extended to body parts to all kind of vehicle situation, in accordance with French Decree (n° 2016-703) on the use of parts coming from the circular economy. It is now available directly from the PCD brand's dealer B2B portal, facilitating access to a portfolio of components (about 380,000 parts coming from a dismantler network). It will be available soon for OV with the same access.



"Partnership signed between Indra Automobile Recycling and Groupe PSA to increase the use of reused spare parts" 14/01/2019 press release: <https://media.groupe-psa.com/en/partnership-signed-between-indra-automobile-recycling-and-groupe-psa-increase-use-re-used-spare>

### "Repair & Return" service: extending the durability of complex products

The brands propose a "Repair & Return" service for both automatic gearboxes and complex electronic products:

- on automatic gearbox through a network of 16 selected centres around the world;
- on electronic products through a unique European centre that can handle such items as the navigation system from Groupe PSA vehicles as well as other brands.

**This service helps extend product durability and consequently conserves natural resources as well as providing end customers with a cost-effective solution that is up to 75% cheaper than a brand-new component.**

### 2.4.3.2. End-of-life vehicles (ELV)

SASB-440b.2

The Group has been involved in the take-back of ELVs through partnerships with vehicle dismantling and shredding companies for nearly 30 years.

As part of the Circular Economy Business Unit, one central ELV team integrates all ELV activities for all Brands.

This set-up allows all synergies to be maximised by:

- exchanging information with authorities at an EU as well as country level;
- streamlining the Group's ELV activities in all countries in Europe and in regions outside Europe;
- negotiating with all the Group's partners in the entire ELV chain at a central and local level;
- contributing to the work by automobile associations at a country level as well a European and global level;
- analysing and generating new business and revenue opportunities.



"Vehicle life cycle - End-of-life vehicles management of Groupe PSA" video: <https://www.youtube.com/watch?v=ZgJ2131FgVs&t=3s>

In 2000, the EU End-of-Life Vehicle Directive came into force, requiring all vehicle manufacturers and importers to take back vehicles from the last owners or holders when the cars have reached the end of their life. For that purpose and by following the different national requirements, Groupe PSA has built up take-back networks in each EU member state. The set-up of the system in different countries varies between implementation and maintenance by the manufacturers themselves, assigning a service provider to do so on their behalf, or where required participating in a collective take-back system.

The basic principle for all different models is to contract authorised treatment facilities to ensure the environmentally sound treatment of ELVs. The contracted parties are mainly dismantling and shredder companies. Whereas the dismantlers are responsible for a state-of-the-art depollution of all fluids and hazardous materials, as well as the partial or total manual disassembly of the vehicles, the main task of the shredder companies is to separate the remaining hulks mechanically into different material streams – such as ferrous and non-ferrous metals, as well as non-metallic fractions for subsequent recycling processes.

After 18 years of successful implementation and execution of all legal requirements, the EU decided to review the EU ELV Directive and, if deemed necessary, come up with proposals for a revision by the end of 2020. Groupe PSA, together with the other members of ACEA, are currently focusing on defining country-specific best processes for the treatment of ELV to ensure the best environmental results as part of a self-sustainable ELV business.

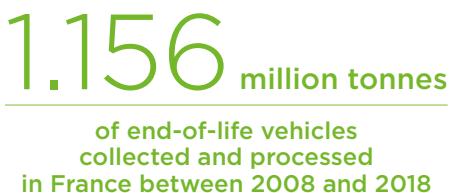
The following paragraphs show the national implementation of the ELV Directive for 4 major markets:

**In France**, the Group uses industrial partnerships of a high standard, both technically and financially. They ensure full tracking of ELVs and guarantee that the overall recovery rate is

achieved. The Group's industrial partners work with networks of certified dismantling companies (331 ELV dismantlers at 2018 year end), that collect ELVs, deregister and depollute them and then dismantle them to resell certain parts for reuse.

 "What happens to end-of-life vehicles (ELVs)?"  
26/08/2017 In Movement article: <http://www.inmvt.com/en/sustainable-mobility/end-of-life-vehicles-recycling-backstage/>

Between 2008 and 2018, this strategy resulted in the collection and processing of over 1,000,000 ELVs from PEUGEOT, CITROËN, DS and OPEL and VAUXHALL (since August 2017) dealership showrooms.



The Group's performance in France for overall recovery of ELVs collected through its network is compliant with European regulations and better than the national average: the Group's performance in 2017 was 95.0%, of which 88.0% was reused or recycled by weight<sup>(1)</sup>. As previously reported, the most recent ADEME data (2017) on the national situation stated that overall performance in reuse, recycling and recovery was 94.5% (of which 87.3% was recycled and reused).

The core challenge is still to maintain favourable economic conditions for the ELV sector, while ensuring the ambitious 95% recycling and recovery rates achieved for ELVs is collected.

To meet this requirement, the Group relies on industrial partners that can achieve these targets: regulatory compliance; adherence to collection deadlines; incentive pay in the brand networks; 95% total recovery rate; and investments in R&D to find new recycling and energy recovery industry outlets.

This strategy also opens new opportunities for automotive materials sourcing making it possible to incorporate recycled materials such as plastics, metals, etc. into the production of new vehicles, in line with the Group's design objectives.

To enable retail customers to return their end-of-life vehicle directly to a dismantling company that complies with the highest environmental standards, the Group has developed a location-based search tool for its brands so that customers can find their nearest ELV dismantler partner based on their postcode or town. This application is available where used PEUGEOT, CITROËN and DS, OPEL and VAUXHALL (since August 2017) vehicles are sold.

Groupe PSA made a major contribution to the drafting of a cross-manufacturer action plan for the re-absorption of historic stocks of ELVs – estimated at 60,000 vehicles in May 2015 – in the French overseas territories in which the French Environmental Code applies (Guadeloupe, St Martin, Martinique, Guyana, Reunion Island and Mayotte). This plan, which addresses the environmental and health issues that arise when vehicles are abandoned by their last owner, resulted in the signing of a framework agreement between manufacturers on 24 October 2018.

In anticipation of the conversion premium to be enacted in 2018 by the French Ministry for the ecological and inclusive transition, PEUGEOT France, CITROËN France and DS France launched a scheme in October 2017 to scrap diesel vehicles older than 16 years and gasoline vehicles older than 20 years when purchasing a new or used vehicle. These end-of-life vehicles are treated in accordance with the procedures implemented by Groupe PSA to ensure 100% traceability and over 95% recovery. In 2018, this commercial policy removed more than 80,000 vehicles based on older technologies, which is an increase of +283% compared to the previous year.

**In Germany**, PEUGEOT, CITROËN and OPEL started building up nationwide voluntary take-back networks in the early 1990s. After national implementation of the ELV Directive in 2002, the national transcription of the ELV Directive in 2002, these preparatory efforts enabled initiatives to start promptly with a ready and available nationwide network. The three Groupe PSA brands on the German market currently each hold contracts with 139 authorised dismantlers to ensure the cost-free take-back of all related brands. Dedicated specialists from the Group's own ELV Department select the partners. Each candidate is audited through an on-site visit followed by a classification. If the contracting is successful, the partners are regularly visited and supervised by the Group's responsible persons for network maintenance.

**In Spain**, its partnership with one of the key players in the ELV processing industry over last few years has proven to meet all the requirements of ELV regulation. Since 1 January 2017, dismantlers have been required to market 5% of the weight of the ELVs they treated as used parts and components to increase their reuse. This quota will rise to 15% from 1 January 2026. Groupe PSA seeks to increase the reuse of parts and components in Spain by looking for established cooperation partners for the distribution of used parts and components in the highly developed used-part market.

**In Great Britain**, Groupe PSA is successful with great results from its local service partners who face the challenges of the market around ELV's. Since 2007 all eligible vehicles, regardless of when they were first registered, are taken back free of charge, depolluted and treated in an environmentally friendly manner, achieving a recycling performance well above target. This is supported by an efficient waste processing industry operating at a global level. This will continue in a smooth transition once Great Britain leaves the European Union (Brexit) in 2019.

#### 2.4.3.3. Circular economy of high - voltage batteries from hybrid and electric vehicles

In accordance with Directive No. 2006/66/EC, the Group has implemented collection and treatment procedures for its high-voltage batteries (HV Batteries) used in hybrid and electric vehicles sold in Europe. The battery technology in electric and hybrid vehicles requires specific handling methods.

##### Remanufacturing

To extend the use phase and to avoid the premature recycling of high-voltage batteries, OPEL and VAUXHALL started remanufacturing in 2012. Since then, more than 500 HV batteries have been remanufactured.

<sup>(1)</sup> Since ADEME has not released official statements for the end of 2018 concerning ELV operators in France, the Group has not yet been able to determine its performance for 2018.

Groupe PSA will introduce a remanufacturing process for the new generation of high-voltage batteries developed for all its brands from 2019. If the battery fails, it will be sent to a remanufacturing centre for repair, after analysis by the Groupe's dealer network. The remanufactured battery could then be used in another used electric vehicle to maintain the electric mobility of the Group's customers as much as possible.

## 2<sup>nd</sup> life

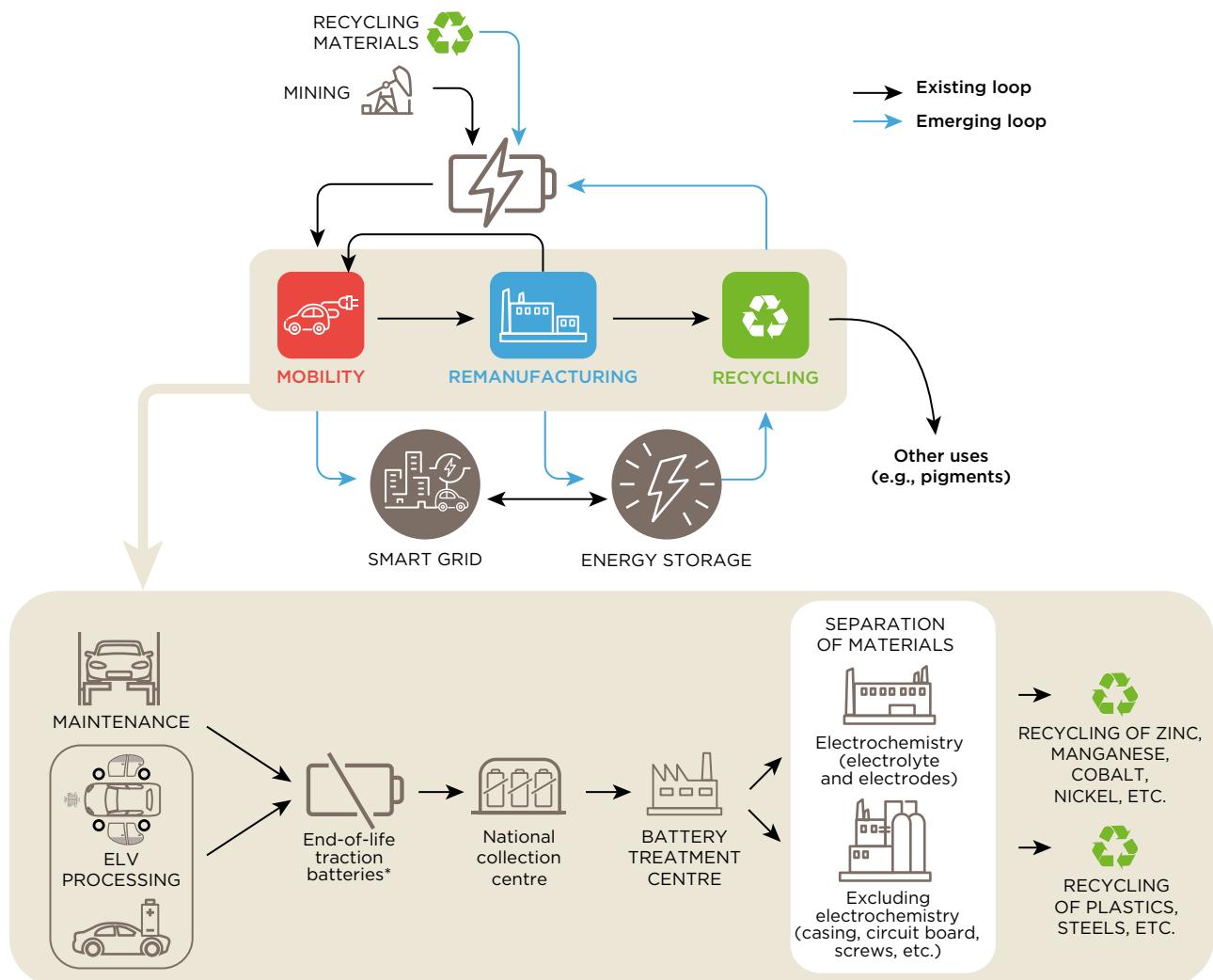
Groupe PSA is also working on solutions to reuse HV batteries in stationary storage facilities. As a proof of this plan, a first container including eight used batteries, from vehicles "PEUGEOT iOn" and "CITROËN C-Zero", was installed in Carrières-sous-Poissy in 2018 and connected to the site grid to explore energy services with the stationary usage of second-life batteries. This container will enable to optimise the energy consumption in buildings by many ways including load shifting, storage of energy during the night and use during the day, or balancing services to the grid. Another project will be entering a real-life phase at the OPEL test centre in Dudenhofen, where a container including used OPEL Ampera batteries will be installed to enable energy buffering for the charging station used for test driving electric vehicles, thereby.

## Recycling batteries from hybrid and electric vehicles

PCD has a contract for the entire European market with a single, efficient partner, whose recycling rates in 2017 were 77.4% for Li-ion batteries of electric vehicles and 84.0% for the Ni-MH batteries of hybrid vehicles. These rates are significantly higher than the 50% regulatory thresholds for recycling efficiency. The agreement covers all of the PCD's dealership networks and industrial sites for all traction battery technology across all European marketing regions. In terms of battery legislation, the Group is closely involved in developing standards via the European Automobile Manufacturers' Association (ACEA). Outside Europe, particularly in China, Groupe PSA makes an active contribution in partnership with local joint ventures.

OV is committed to apply the same strategy with the same partner from 2019.

## CIRCULAR ECONOMY OF HIGH-VOLTAGE BATTERIES\*



\* Batteries from hybrid and electric vehicles.

#### **2.4.3.4. Recycling of tyres**

Based on the extended producer responsibility principle, the Group's brands in France have implemented procedures for collecting and processing tyres held by authorised dismantlers. In 2018, at least 50% of the 5,340 tonnes of tyres from ELVs were treated as "materials recovery" (for reuse, drainage solutions, granulation, etc.).

Thanks to the support of Groupe PSA for one of its partners, a new materials recovery process based on vapour thermolysis was unveiled at the end of 2015. This method ensures high-quality materials recycling from used end-of-life tyres (45% fuel oil, 32% carbon black and 5% metal; the remaining 18% is used to power the thermolysis process).

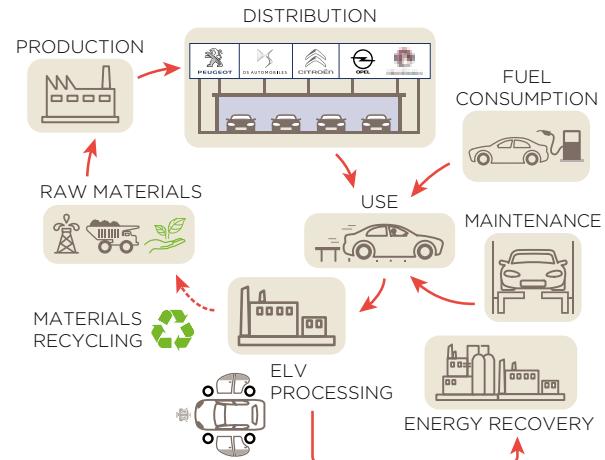
#### 2.4.4. Vehicle life cycle and carbon footprint analyses

#### **2.4.4.1. Life cycle analysis to improve the vehicles' environmental record**

The results of life cycle analyses help to:

- highlight the environmental advantage of one innovative solution compared to another, and, more broadly, the overall environmental impact of a product;
  - identify possible pollution transfers from one phase of the life cycle to another;
  - highlight core environmental impacts;
  - choose more environmentally friendly technologies and materials.

## SIMPLIFIED DIAGRAM OF A VEHICLE LIFE CYCLE



## **MAIN INDICATORS OF ENVIRONMENTAL IMPACTS MONITORED BY GROUPE PSA**

<b>Impact on air</b>	Global warming potential in kg CO <sub>2</sub> -eq.: characterises the average increase in substances that contribute to global warming (CO <sub>2</sub> , CH <sub>4</sub> , N <sub>2</sub> O, etc.).
	Acidification potential in kg SO <sub>2</sub> eq.: characterises the increase in the content of acidifying substances that cause acid rain and decay of some forests (SO <sub>2</sub> , etc.).
	Photochemical ozone creation potential in kg ethene eq.: characterises the phenomena leading to the formation of ozone which have harmful effects on human health and on plants (VOCs, etc.).
<b>Impact on water</b>	Eutrophication potential in kg phosphate eq.: characterises the introduction of nutrients such as nitrogen and phosphate compounds that promote the growth of certain algae (NO <sub>2</sub> , etc.).
<b>Impact on natural resources</b>	Potential for the depletion of natural mineral resources in kg antimony eq. (Sb): aims to measure the extraction of mineral resources considered to be non-renewable.

Usually conducted at the end of product design, life cycle analyses can be used at the innovation phase to consider environmental impacts as early as possible (recyclability, critical materials, etc.). The Group has therefore developed a method for assessing the environmental performance of innovations for the Advanced Research & Development Division teams.



## STAKEHOLDERS DIALOGUE

Groupe PSA is a founding member of the EcoSD network, a 1901-Law association whose main purpose is to foster exchanges and interaction between researchers and industry players in order to create and disseminate eco-sustainable design expertise (EcoSD) in France and beyond, thereby promoting France's EcoSD expertise internationally.

The Group participates in collaborative projects with industry and laboratory members of the network, with the support of the Agency for the Environment and Energy Management (ADEME). Achievements of these projects include:

- an assessment of the methodology used to measure the "water footprint" of an entire vehicle;
- the creation of a tool which takes environmental criteria into account in the design of traction batteries for electric vehicles;
- in 2018, a collaborative research project was carried out to draw up a guide of good practices for LCA practitioners on using mineral depletion indicators and on taking into account material criticality issues. The project was carried out in partnership with the University of Troyes. The guide will be published in 2019.

Ph.D. thesis work was also begun with the aim of achieving environmental optimisation of automotive products and services systems such as car-sharing.

The Group participates in annual themed workshops and the Doctoral Courses of Excellence delivered by members of the association.

EcoSD website: <http://www.ecosd.fr/fr>

2

The Group conducts life cycle analyses on its vehicles and components, within the framework defined in the ISO 14040/044 standards. These studies analyse the multi-criteria environmental footprint of a vehicle and validate its component and materials design. The entire product life cycle is taken into account from raw material extraction, to manufacture, use and end of life. The methodology used to conduct the vehicle LCAs was certified by a critical review by THINKSTEP - a firm with expertise in life cycle analyses - in 2018.

The Group has set a goal to analyse the life cycle of each new family of vehicles. Since 2014, all new vehicles, except for those designed with joint venture partners, have been subject to life cycle analyses. In addition, for each core technological change or strategic innovation, a study is carried out to assess any developments in the environmental impacts from these technologies.

**100%**  
of new vehicles undergo  
a life cycle analysis

In 2018, life cycle analyses covered 58.7% of the total PCD and OV fleet sold, up from 45.4% in 2017 (focus on PCD vehicles only in 2017). Some vehicles did not undergo life cycle analyses:

- vehicles designed with joint venture partners;
- old models that are still sold and will be analysed when a new version is developed.

### Examples of the application of life cycle analysis

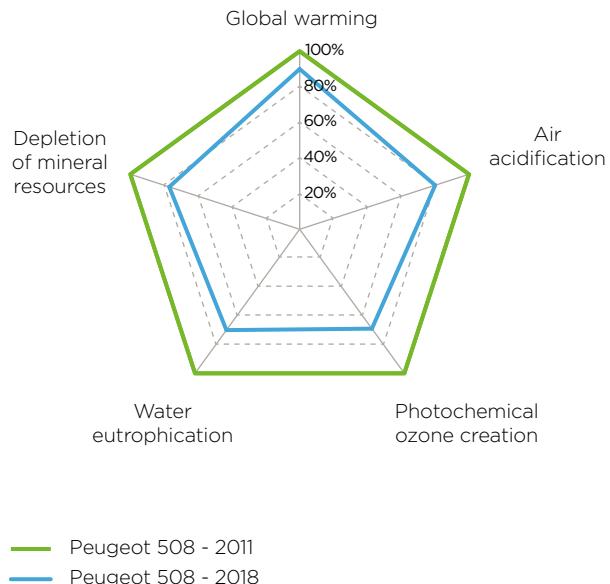
These analyses are carried out using software linked to environmental databases that makes it possible to calculate a product's environmental impact.

The goal is to guarantee that the environmental impacts from a new model are less than those of the previous generation. These results were verified with regard to:

- the new PEUGEOT 508 in its diesel version compared to the previous PEUGEOT 508 version;

- the PEUGEOT Rifter and CITROËN Berlingo in their gasoline versions compared to the previous PEUGEOT partner and CITROËN Berlingo;
- the new CITROËN C5 Aircross in its diesel version compared to the current PEUGEOT 3008 version;
- the OPEL Adam and OPEL Corsa in their gasoline versions compared to the current PEUGEOT 208 version.

### RESULT OF THE LIFE CYCLE ANALYSIS DONE ON THE PEUGEOT 508



The analysis found that the total environmental footprint between the two versions of the PEUGEOT 508 had shrunk. This analysis was based on a comparison of the environmental impacts of the PEUGEOT 508 sold in 2011 with those of the new PEUGEOT 508 sold in 2018. The environmental impacts diminished from 11% to 39% thanks to lower fuel consumption, reduced exhaust emissions and the production of lighter vehicles.

In addition, the Group cooperates with suppliers to conduct life cycle analyses on vehicle parts or components going into core innovations (changes in raw materials, inclusion of natural/recycled materials, strategic or functional innovations, etc.).

For example, a life cycle analysis performed in collaboration with Plastic Omnium showed that replacing the steel on a rear floor with a composite material created an environmental benefit throughout the life cycle, particularly in terms of resource depletion, global warming, air acidification and the creation of photochemical ozone.

In 2019, the Group plans to conduct a life cycle analysis on the new DS 3 CROSSBACK and the next generation of PEUGEOT 208 and 2008 models. It will also continue to study major innovations and the introduction of green materials or composite materials.

#### 2.4.4.2. Vehicle carbon footprint

GRI.302-2 GRI.305-3

Group PSA conducts a process to determine the total CO<sub>2</sub> equivalent emitted from its operations in Europe, each year.

**These calculations take into consideration all Group activities that emit greenhouse gases (primarily CO<sub>2</sub>) over the whole life cycle of an automotive product. Both PCD and OV activities are covered in Europe with these evaluations.**

Accordingly, this assessment will take into account emissions from the following over one year of activity:

- the production of materials and components for vehicles manufactured: all component materials of vehicles manufactured in 2018 have been taken into account, from extraction to moulding and assembly on the vehicle, using life cycle analysis databases;
- the Group's manufacturing plants (assembly plants or components factories) and tertiary sites (including development sites): this information is derived from GHG (greenhouse gas) assessments carried out at all Group plants and tertiary sites (reference: 2018 GHG Report);
- fuel extraction and production necessary to use the vehicles manufactured;

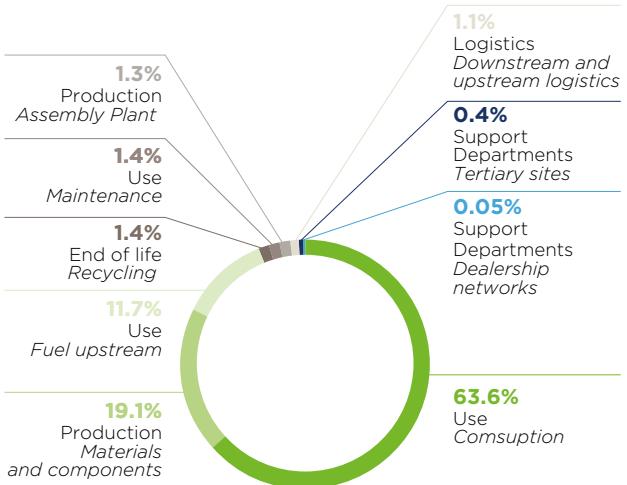
- use phase of the vehicles manufactured:

The use of vehicles produced in 2018 has been taken into account according to the following operating criterion: use over 10 years with 150,000 km driven. This assumption allows us to assess the amount of fuel consumed. The impact of the production of these fuels is taken into account using the life cycle analysis databases. Similarly, CO<sub>2</sub> emissions data for each vehicle produced were taken into account;

- vehicle end-of-life: the vehicle end-of-life was modelled on current treatment, enabling CO<sub>2</sub> emissions to be assessed for the vehicles treated.

**The method was verified and approved by Eco Act**, a firm specialising in environmental analysis and greenhouse gas diagnostics.

#### DISTRIBUTION OF GREENHOUSE GAS EMISSIONS FOR PCD AND OV VEHICLES SOLD IN 2018 IN EUROPE



Total emissions of CO<sub>2</sub> equivalent for vehicles produced by the Group in 2018 in Europe amounted to 82.9 million tonnes.

The vehicle use phase represents almost 80% of the CO<sub>2</sub> emissions equivalent of the overall vehicle carbon footprint. For this reason, the Group devotes significant research and development effort on the issues of fuel consumption and vehicle weight reduction (see 2.1.).

## 2.5. A PRESENCE ON ALL MOBILITY SEGMENTS

DPEF.27 GRI.102-6 GRI.103-2 GRI.103-3 GRI.302-5

### Groupe PSA is a pioneer in communicating cars and is working towards becoming a first-class provider of mobility services

Social, environmental and technical changes impact consumer behaviour when it comes to travel: urbanisation, regulations on air quality and CO<sub>2</sub> emissions, economic crises, Generation Y and the routine use of connected devices have fostered a boom in the sharing economy, which is particularly well illustrated in the mobility segment.

The car is no exception to this general trend, and it tends to be perceived less as a tangible asset than as an object of mobility, especially by new generations. According to Frost & Sullivan's study entitled "Future of Carsharing Market to 2025" (August 2016), France has the third-largest user population in Europe (320,000 members in 2015) after Germany and Italy, and it is number 2 in shared vehicles (7,500 in 2015) after Germany. The number of users of car-sharing services worldwide is expected to increase from 8 million to 36 million between 2015 and 2025.

Groupe PSA positions itself on this market based on its experience and technical expertise in terms of communicating cars: since 2003, the Group has been renowned for its best-selling emergency call services and automated assistance systems, which automatically call for help in case of an accident. To date, more than 4.6 million PEUGEOT, CITROËN and DS AUTOMOBILES vehicles have been equipped with this system (see 2.3.2.5.). OPEL and VAUXHALL models are currently equipped with their own technology (with a fleet of 1.4 million vehicles equipped) and new models will be equipped with Groupe PSA technology starting from May 2019.

Carsharing and rental are growing and becoming more widespread among individuals. Thanks to Group offers, these practices are becoming fully secure and more widespread, thereby helping to limit prolonged periods during which the vehicle is not in use and maximise the use of the existing fleet. To mark itself out as a socially responsible Group, Groupe PSA is developing a portfolio of mobility services in response to the changing expectations of its stakeholders, whether they are consumers or host communities.

The Group aims to become a first-class provider of mobility services. Its strategy is to have a presence on all mobility segments. The director of the Group's dedicated business unit for mobility services is now a member of the Executive Committee.



"Carlos Tavares' speech at the Mobility Days event - 28/09/2016" video: [https://www.youtube.com/watch?v=J923fhb63\\_8](https://www.youtube.com/watch?v=J923fhb63_8)



### Impact measurement and economic assessment

Groupe PSA projections see the European mobility market growing to more than €13.6 billion in 2020, from €7.7 billion in 2014 – an explosion of 56%. In the G10 European countries, 1.7 million vehicles would be required to serve this market in 2020 (vs 1.27 million in 2014), including 500,000 for car sharing alone.

As part of the Push to Pass plan for the period 2016-2021, the Group intends to invest €100 million in risk capital to expand its portfolio of mobility solutions, primarily by investing in startups, to attain revenue of €400 million by 2021.

By the end of 2018, the Group had generated €124 million in revenue, resulting in profitable growth (revenue multiplied by four compared to 2015) for the Free2Move mobility services.

### Groupe PSA has grouped all of its connected and mobility services under a new brand: Free2Move



In 2016, Groupe PSA launched **Free2Move, its new brand** that enhances the experience of sustainable, intelligent, safe, shared mobility for as many people as possible. Free2Move pools all of the new Groupe PSA mobility services to meet its customers' different mobility requirements:

- "Free2Move Car Sharing": car-sharing services run by Free2Move or outside partners;
- "Free2Move Smart Services": connected services to simplify life and save time;
- "Free2Move Fleet Sharing" and "Free2Move Connect Fleet": corporate fleet services;
- "Free2Move Lease": financial solutions to make vehicle ownership more affordable.

Free2Move also offers car rental services run by PEUGEOT, CITROËN and DS AUTOMOBILES, as well as partners of Groupe PSA. OPEL and VAUXHALL car rental services are gradually being included in the Free2Move brand, starting in Germany and France.

As of the end of 2018, Free2Move has approximately 500,000 active B2C customers in Europe, China and the United States (excluding Free2Move Lease).

The **Free2Move app**, which was released in April 2017, is available in Europe (Germany, Italy, Austria, Sweden, the United Kingdom, Spain, France, Belgium, Portugal, the Netherlands and Denmark) and in the USA (Portland, Seattle and Washington). This app, which includes 49 operators in 34 cities, lets users choose the mode of transportation that is best for them in a few clicks by showing all of the services located near the user and comparing their features and cost of use. It offers a solution to every need, with options to rent a bicycle, scooter or car, for a few minutes or a few days, from a service operated by Groupe PSA or a partner. By the end of 2018, the app had been downloaded 1,600,000 times.



"Mobility Talks 14/11/2017 - Part 5: use a car, a scooter or a bike with just one app" video: <https://www.youtube.com/watch?v=8PsAW6UPYsY&feature=youtu.be>

## COMPLEMENTARY SERVICES TO MEET ALL MOBILITY NEEDS

		Mobility services and fleet management			Connected after-sales	Data analysis	
		I WANT TO USE A CAR	I OPTIMISE MY AUTOMOBILE BUDGET			MY BRAND MAKES MY LIFE EASIER	I'M LOOKING FOR EASY, SAFE TRANSPORT
Services developed by Groupe PSA	Rental	Urban car-sharing	Peer-to-peer car-sharing	User based insurance	Long-term leasing, fleet management and corporate car-sharing	Trip Partner / Predictive maintenance	Smart cities
	   	   			  	 Telemaintenance	
					 (car-sharing for companies)		
Acquisition of non-discretionary profit-sharing					  (Fleet management)		
Partnerships						 (Traffic Management)	



## STAKEHOLDERS DIALOGUE

At the Paris Motor Show held in October 2018, Groupe PSA organised two events to raise awareness of mobility issues:

- Carlos Tavares shared his views on seven megatrends that will shape the future of the automotive industry during a keynote with Jacques Attali.
- "Groupe PSA - Tomorrow in Motion" video: <https://www.youtube.com/watch?v=mfn1o2XZOSA&feature=youtube&LinkId=57928377>;
- The Executive Vice-President of Mobility and Connectivity Services held a press conference about how Free2Move is meeting today's urban mobility challenges;
- "FREE2MOVE" 21/09/2018 press kit: <https://media.groupe-psa.com/en/press-kit-free2move?idtok=99baebbb230>.

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### 2.5.0. Innovation to boost the mobility of the future

#### Developing new connectivity technologies

The communicating connected car expands the realm of possibility in terms of mobility. The technological building blocks that Groupe PSA is developing will encourage the emergence of new connected services. (See 2.3.2.0.1.).

#### Partnering with startups to anticipate new uses

With a view to branching out into new business, the Group uses the Business Lab to cultivate contacts with additional startups whose business dovetails with its ambition to be the go-to mobility provider.

#### e-bike: bike-sharing solution for electric and geo-located bikes

In 2018, the Group's Business Lab Singapore, with the support of its brand Free2Move, and in partnership with local Singaporean university NTU (Nanyang Technological University), tested a

shared electric bike solution within the university campus. Over several months, the students and staff were able to try out the 20 PEUGEOT e-bikes for their daily commute within the university precinct. Over 450 students downloaded the app and tested the solution, providing a great deal of feedback and information regarding their mobility needs, and this feedback can be used for possible future deployment of such an active and eco-friendly electro-mobility service.

#### nuTonomy: on-demand autonomous mobility solutions in an urban environment

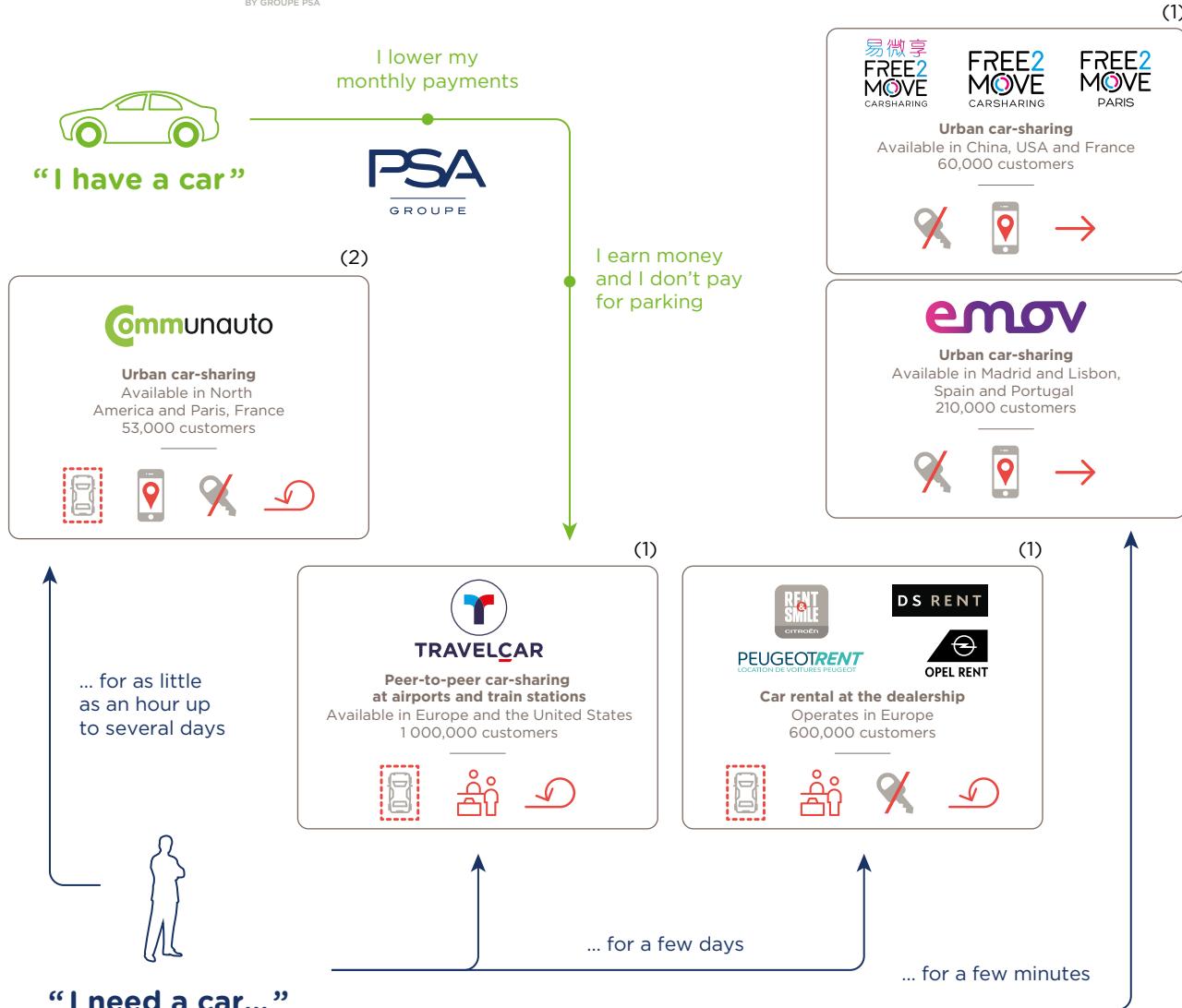
In June 2018, Groupe PSA and nuTonomy demonstrated the capabilities of the new PEUGEOT 3008 SUV equipped with nuTonomy's autonomous system in the One North neighbourhood, Singapore. After one year of collaboration, Groupe PSA and nuTonomy have been able to analyse the performance of the complete autonomous vehicle system in an urban environment and thereby get a vision of what a future on-demand autonomous mobility service can be.

### 2.5.1. Shared mobility

The Group offers a wide range of affordable mobility services in response to the new uses and different mobility needs of businesses and individuals. These services are proposed through the Group's partners and the PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and Free2Move brands.

# Shared MOBILITY

BY GROUPE PSA



## PARKING



### At a station

Go to the station to access the car



### In an open parking space

Use your smartphone to find the car, and then go pick it up on the street

## ACCESS TO THE CAR



### At a booth

Retrieve the keys from an operator



### Keyless entry

- Unlock the car with an ID card or your smartphone
- Use the keys inside the car to start the engine

## TRIP TYPE



### Round-trip

Return the car to the place where you picked it up



### One way

Finish your rental wherever you'd like within a predefined area

(1) Wholly-owned services

(2) Services run with partners

### 2.5.1.1. Urban car-sharing

#### Wholly-owned services

##### — FREE2MOVE PARIS



Since December 2018, Free2Move Paris has been providing access to a fleet of 550 electric PEUGEOT iOn and CITROËN C-Zero vehicles via the Free2Move Paris app. With no minimum rental period, users can choose between two options: a monthly subscription for regular use or occasional use without a subscription. Insurance costs and free parking in Paris are included. The Free2Move Paris service is available 24/7, and dedicated teams regularly recharge the cars.

“Free2Move launches its car sharing service in Paris”  
29/11/2018 Press Release: <https://media.groupe-psa.com/en/free2move-launches-its-car-sharing-service-paris?idtok=ff028bbb235>

##### — FREE2MOVE WASHINGTON



In October 2018, Groupe PSA launched its Free2Move Car Sharing service in Washington, with a “free-floating” service, which provides 24/7 access to a fleet of 600 cars parked on public streets across all eight wards in the District of Columbia. The Free2Move Car Sharing app allows new members to join in a few clicks. With a valid driving licence and a \$10 membership fee, booking a car and getting from point A to point B for a few minutes, hours or days is easy. The app provides all of the logistics required to locate, book, open/lock and pay for its vehicles throughout the city.

“Groupe PSA chooses Washington, D.C. to start Free2Move CARSHARING and mobility services in the USA” 25/10/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-chooses-washington-dc-start-free2move-carsharing-and-mobility-services-usa>

##### — YIWEIXIANG FREE2MOVE CAR SHARING



In September 2018, Groupe PSA started its carsharing service in Wuhan with a fleet of 300 electric vehicles, both “free-floating” and in stations. The fleet will expand to 3,000 vehicles in 2019. Users can access the service from the Yiweixiang Free2Move car-sharing app. They can pick up an electric vehicle at any location and leave it in any available public roadside parking space (“free-floating” mode). A local team provides highly convenient, user-friendly and safe mobility services to Wuhan’s inhabitants.

“Free2Move launches its carsharing service in Wuhan”  
28/09/2018 press release: <https://media.groupe-psa.com/en/free2move-launches-its-carsharing-service-wuhan>

##### — EMOV IN MADRID AND LISBON



The new emov electric car sharing service was launched in December 2016 in Madrid. This service was run by a joint venture between Groupe PSA and Spanish operator EYSA. In December 2018, Groupe PSA purchased 100% of emov. This illustrates the Group's decision to focus on wholly-owned services.

emov in Madrid comprises a fleet of 600 CITROËN C-Zero models. The area it covers is one of its key selling points: the vehicles can be used outside Madrid city centre as it serves some of the areas surrounding the city. Another major asset is the “free-floating” system, whereby users can leave the vehicle anywhere they like when they are done with it. Driving a fully-electric car in Madrid offers several important benefits: the vehicle can be parked free of charge in a parking space that is usually paid for; traffic restrictions imposed during peak pollution periods do not apply to emov users; and drivers can access areas reserved for residents and areas that are temporarily closed to traffic.

emov launched Lisbon's first all-electric car-sharing service in April 2018. The fleet of 150 CITROËN C-Zero electric vehicles is available beyond the city centre. Users will be able to start and end their journeys in close proximity to the airport. Both residents and tourists will be able to access the service through their smartphones.

By the end of 2018, Free2Move's 100% electric emov service already had more than 200,000 users.

“emov heads to Lisbon to launch the city's first all-electric carsharing service” 19/03/2018 Press release: <https://media.groupe-psa.com/en/emov-heads-lisbon-launch-city%27s-first-all-electric-carsharing-service>

### Services run with partners

#### — COMMUNAUTO IN NORTH AMERICA AND PARIS



In September 2016, the Group became a shareholder in Communauto, which operates in Paris and in seven Canadian cities and offers car-sharing services with a mixed fleet of vehicles (electric, gasoline and hybrid) and inter-modality with public transport services.

This was a joint capital expenditure of Groupe PSA and MKB, a merchant bank specialising in private investments in the renewable energy and smart cities sector. The transaction will help Communauto speed up its international expansion, consolidate its leadership position in North America and roll out its electrification strategy.

This partnership with a long-standing player in the North American car sharing market is part of the Groupe PSA Push to Pass strategic plan. It fulfils a twofold objective of the Group: meeting customer's various mobility needs, particularly through car-sharing, and enabling the Group to offer mobility services to the North American market.

53,000 users.

#### — BLUELY IN LYON AND BLUECUB IN BORDEAUX



A strategic cooperation agreement was signed between Groupe PSA and Bolloré Group in June 2015. In December 2018, Groupe PSA decided to end this cooperation, in line with its strategic reorientation towards services operated under the Free2Move brand.

### 2.5.1.2. Peer-to-peer car-sharing

#### — KOOLICAR



The KCH Group, in which Groupe PSA has had a minority stake since 2016, decided at the end of 2018 to end the activities of Koolicar, its B2C subsidiary operating in peer-to-peer car-sharing.

#### — TRAVELCAR



After having taken an equity interest in TravelCar in June 2016, Groupe PSA bought 99% of this company in February 2019. TravelCar is a French startup offering a hybrid model somewhere between a traditional rental agency and a platform to connect private car owners. Users are offered a quality service whilst supporting an environmentally-friendly, sustainable, resource-saving initiative, in this case maximising the use of the existing car fleet.

TravelCar services aim to make life easier for car owners and renters by:

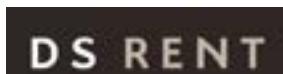
- offering free parking to owners who offer their vehicle for rental. For example, rather than paying for airport parking, TravelCar offers owners the option of putting their car up for rental for the duration of their trip and the car is covered by fully comprehensive insurance. Not only do owners not have to pay for parking, but they actually receive payment if their vehicle is rented out;
- reduced price peer-to-peer car rental. This service is operated by TravelCar agencies that connect owners with renters. The renter saves up to 50% compared to the cost of renting a car from a traditional car hire company.

These offers are available in selected airports, train stations and city centres in 60 countries, including the United States since April 2017. TravelCar currently has 1,000,000 customers.

In addition, in partnership with TravelCar, CITROËN has launched a novel long-term leasing option, which allows the customer to leave their vehicle at one of the partner drop-off locations when they are not using it. The more the customer shares their care, the more they lower the costs of their leases.

"TravelCar: get paid to park!" video: <https://www.youtube.com/watch?v=4jZtkBFydmO>

### 2.5.1.3. Short-term car rental



OPEL RENT



Since 2010, PEUGEOT has offered short-term vehicle rental via the PEUGEOT RENT service in France, Germany and the United Kingdom. By the end of 2018, **PEUGEOT RENT** had a fleet of 7,000 vehicles.

In 2016, CITROËN and DS AUTOMOBILES launched the same short-term rental service: **CITROËN RENT & SMILE** and **DS RENT**, which have fleets of 2,050 and 150 vehicles, respectively.

**OPEL RENT** was launched in 2000 and now operates in Germany, Austria and France.

The four services reached 600,000 customers by the end of 2018.

From April 2019, PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL dealers are able to offer a 24/7 car rental service called **FAST RENT** (after a six-month pilot phase conducted by the Business Lab). Fast Rent helps to improve customer service by offering 24/7 vehicle leasing with digital capabilities, meaning that the customer does not need to wait to pick up the keys thanks to a smartphone app. This solution also helps dealers increase the vehicles' occupancy rate and it frees up their employees to work with customers on other things. The 24/7 car rental service, starting in France, will be gradually rolled out in Europe.

#### 2.5.1.4. Free2Move Lease: multi-brand long-term leasing for professionals



In January 2017, Groupe PSA introduced Free2Move Lease which is dedicated to long-term leasing with services that target a corporate clientele, ranging from self-employed individuals to employees of large companies. Free2Move Lease offers a complete range of services to meet mobility and car fleet management needs.

This solution optimises the total cost of ownership of vehicles as the VAT on commercial vehicle leases is refundable if the business is liable to pay VAT, and it makes everyday life easier for drivers.

With 430,000 vehicles leased and nearly 110,000 professional customers, Free2Move Lease is currently operating in France, Germany, the United Kingdom, Spain, Italy, Belgium, Portugal and the Netherlands. It continues to be rolled out in Europe and Free2Move Lease will launch operations in Austria, Poland and Switzerland during the first six months of 2019 before expanding into other countries.

Free2Move Lease website: <https://www.free2move-lease.co.uk/>



#### STAKEHOLDERS DIALOGUE

At B2B Day, organised by Groupe PSA in June 2017, some 100 corporate customers and a group of automotive and corporate fleet journalists were introduced to Free2Move Lease, Free2Move Fleet Sharing and Free2Move Connect Fleet. After listening to a presentation by the Head of Mobility Services and the Head of Free2Move Lease, attendees had a chance to meet Group experts during workshops on each service. The event was an effective way to reach customers and gain a new market share in the fleet domain.

#### 2.5.1.5. Free2Move Fleet Sharing: a car-sharing solution for businesses



This service, which is primarily intended for medium-sized and large business car fleets, allows employees to reserve their vehicles online via a simple, user-friendly electronic platform, and access them without keys using an ID card system. It includes all of the services in a standard long-term leasing (maintenance, insurance, etc.), online assistance, and car-sharing technology installed in the vehicles covered under their warranties. It is available in eight countries: the Netherlands, Belgium, Luxembourg, Germany, Spain, Portugal, Italy and France.

This solution allows companies to:

- reduce mobility costs by up to 25% through the optimised use of vehicles, lower taxi/public transport costs and additional revenue generated by private use of the vehicles: in the latter case, employees can use company vehicles at the weekend for example, in return for a rental fee;



- provide an employee incentive: 24/7 access to vehicles, flexible use (booking up to 15 minutes before departure).

The service has been marketed since the last quarter of 2017.

Free2Move Business Solutions Website: <https://free2move-business.fr/>

## 2.5.2. Easier mobility

### 2.5.2.1. Vehicle efficiency services for individuals

#### Free2Move Services

For car-owners, Free2Move transitioned to the next level in October 2018 with the launch of the new Free2Move Services trip partner app. Available on iOS and Android devices, the app enables users to pay for parking on the street or in car parks, as well as tolls and valet parking services at train stations and airports. These e-payments are all consolidated into a single bill, making the expenses easier to manage for users. Other services will be added to the app in the future (insurance, dedicated services for electric and hybrid cars: location of charging station, etc.).

#### MyPEUGEOT, MyCITROËN, MyDS, MyOPEL and MyVAUXHALL

These free, simple and intuitive apps extend the driving experience to the smartphone. Customers stay connected to their vehicle and can access driving data, locate their vehicle and receive warnings about any assistance or maintenance requirements. They receive service and maintenance reminders and have access to their service agreements. Finally, they can make appointments online, obtain a quote or request advice from their contacts (point of sale, customer relations and helpline).

Since 2016, over 1,000,000 customers have downloaded these apps.

MyOPEL runs from beginning of 2019.

#### PEUGEOT teleservices, CITROËN teleservices, DS telemaintenance, OPEL and VAUXHALL after-sales services

If a mechanical problem or "service due" warning is automatically detected, the customer is contacted by the call centre or point of sale to offer them an appointment with the network. The customer no longer has to worry about maintenance deadlines as they will be contacted directly by the network if there is a problem with the vehicle. New OPEL and VAUXHALL models will be included from October 2019.



#### Impact measurement and economic assessment

Through PEUGEOT teleservices, CITROËN teleservices and DS telemaintenance, the customer is contacted at the right moment by the point of sale, which can arrange an appointment according to the problem detected. The brands thus improve customer satisfaction and customer loyalty, and thereby revenue. Studies carried out by the Group show that the services increase customer loyalty by 15 points compared to the averages reported by the GIPA observatory, the leader for after-sales market studies.

The connected after-sales smart services reached 344,000 subscriptions by the end of 2018.

### 2.5.2.2. Fleet optimisation solutions for fleet managers

According to the President of the *Observatoire du Véhicule d'Entreprise*, the observatory for company cars, which publishes an annual TCO (total cost of ownership) study, the way vehicles are used can increase the TCO by up to 40% through higher consumption, insurance premiums, maintenance and administration costs (processing fines) and even the residual value. For this reason, it is important to have tools in today's fleets which monitor consumption and pass on information on driver behaviour.

#### Free2Move Connect Fleet



To meet this need, the Group offers a special service for companies: Free2Move Connect Fleet, which addresses three issues encountered by fleet managers: fleet maintenance with reporting of all mechanical and technical alerts; the environment with CO<sub>2</sub>, actual consumption and an eco-driving module that gives drivers personalised recommendations; and the optimisation of vehicle use with reporting of hours of use, GPS tracking and mileage.

**Overall, Free2Move Connect Fleet helps reduce the TCO (total cost of ownership) of the fleet vehicles by 5%.**

It runs on Groupe PSA cars but is also compatible with other brands.

The service, available in nine European countries (the United Kingdom, Germany, the Netherlands, Italy, Spain, Portugal, Belgium, Luxembourg and France) will be deployed in Brazil and Mexico mid of 2019. It is operated by the partners of Groupe PSA on their service platforms. In fact, the Group made the decision to open its vehicle data to its partners to enable customers to continue to hold service reports on the platforms already used. The Group is the only manufacturer to have done this and its partners are among the best-known on the fleet management market in Europe, including TomTom Telematics, Masternaut and Orange Business Services.

The service was launched in September 2014, and by the end of 2018 it had already been sold to over 1,800 companies with a combined fleet of more than 180,000 connected cars.



#### Impact measurement and economic assessment

The 2BR Mobilité group, which has equipped its fleet with the Free2Move Connect Fleet service, estimates that it has made fuel savings of around 5%, thereby reducing the cost of owning Groupe PSA vehicles rather than competitors' vehicles by the same percentage. It also anticipates a saving in insurance costs, mainly through the installation of eco-driving measures.

 Free2Move Business Solutions website:  
<https://free2move-business.fr/>  
"Free2Move Connect Fleet" video: <https://www.youtube.com/watch?v=lkuSQMJTEAc>

### PEUGEOT Green Connect

PEUGEOT also offers the PEUGEOT Green Connect service, in partnership with Mobicgreen, which trains drivers in eco-driving techniques through an e-learning module on a dedicated website in combination with on-road training.

## 2.5.3. Safe mobility

Although it was required by law in Europe only from April 2018, the Group has led the market of emergency call services and assistance systems, which automatically call the emergency services in the event of an accident, since 2003. To date, more than 4.6 million PEUGEOT, CITROËN and DS AUTOMOBILES vehicles have been equipped with this system. (See 2.3.2.5.)

The Group was also one of the first car manufacturers to use smartphone screen-to-vehicle transfer technology.

### 2.5.3.1. Customised road safety promotion services for cities

In partnership with IBM, the Group is providing cities, local communities and facilities managers with decision-making tools which use anonymous data from PEUGEOT, CITROËN and DS AUTOMOBILES vehicles circulating in the area. New OPEL and VAUXHALL models will be included from October 2019. This data can be used to solve traffic congestion problems and detect danger areas in order to draw up development plans. For example, if it is found that ABS is triggered frequently on a particular bend in the road, the bend can be classified as dangerous, thereby speeding up the introduction of corrective measures (speed reduction measures or lowering the speed limit, etc.).

**“***The "Smarter cities" project is currently being deployed in the Nice Côte d'Azur, Lyon, Lille and Tours Metropolis, Gironde, Loire Atlantique, Val d'Oise, Seine et Marne, Yvelines and the Wallonia (Belgium) region. The Wallonia region reports: Initial results that we have obtained to date from a test area are very encouraging. They have allowed us to see problematic areas in a new light. By detecting "at risk" areas, managers can take action to alter the infrastructures before accidents happen. The system also offers new road safety developments and opportunities for the road management departments.”***”**

### Impact measurement and economic assessment

These new services actively contribute to the development of safer, smarter and more user-focused mobility (all data used is automatically anonymised). They also provide an additional source of revenue for Groupe PSA and its partner, IBM.

In November 2017, the *Centre d'études et d'expertise sur les risques, l'environnement, la mobilité et l'aménagement* (CEREMA, a French public institution under the joint supervision of the French Ministry of Territorial Cohesion and the French Ministry for the Ecological and Inclusive Transition) awarded the IBM-PSA partnership a contract on gathering on-board data. For the next two years, this contract will make it easier to introduce the two partners' innovative offering to French communities.

### 2.5.3.2. Cars that communicate to prevent accidents

The large-scale trial of SCOOP@F, which started in 2018, will permit communication between vehicles and road infrastructure in France through a special Wi-Fi system for cars – the ITS G5 communication system. (See 2.3.2.0.1.)

### 2.5.4. Dedicated finance and insurance packages

BANQUE PSA FINANCE (BPF) relies on a business model of cooperation in order to ensure the best competitiveness of offers proposed to PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL brands networks.

Different partnerships have been developed:

- one with Santander Group in 2015 for 11 European countries and Brazil serving the commercial activities of PEUGEOT, CITROËN and DS AUTOMOBILES;
- a partnership was also set up in 2017 with BNP Paribas for OPEL and VAUXHALL activities;
- other agreements are in place in Argentina, China, Mexico and Russia.

In terms of financing and services, they are designed in close collaboration with the brands teams. In this spirit, specific offers are developed for low emission vehicles.

To enhance the attractiveness of these products, BPF promotes "loyalty" products (financing + services + buyback at the end of the contract) allowing to finance only the use of the vehicle.

This type of solution allows a complete package of services to be offered, including insurance coverage for the loan and the car and a complete package of mobility services with features such as an extended warranty or maintenance contract.

With these services, the customer has a competitive global offering optimal protection for the vehicle and a greater facility to renew his vehicle more quickly.

Furthermore, BANQUE PSA FINANCE accompanies and supports the Groupe PSA in the implementation of "Push to Pass" and "PACE!" growth plans, one axis of which aims to make PSA a major player in the market for new mobility solutions.

BPF is a provider of financing and mobility services, and facilitates payment by:

- integrating service, insurance and mobility solutions into all projects and products for B2C and B2B customers;
- creating e-payment solutions.

BANQUE PSA FINANCE is actively involved in the deployment of the PSA Mobility Group brand, FREE2MOVE and its corporate mobility offering by setting up dedicated centres in Europe. With many years of experience in the long-term rental market, BANQUE PSA FINANCE now manages a fleet of more than 400,000 vehicles and offers mobility services for companies

under the Free2Move Fleet Sharing labels, Free2Move Connect Fleet for PEUGEOT, CITROËN and DS AUTOMOBILES brands.

For its corporate customers, financing solutions designed for fleets of vehicles allow customers, depending on their profile, to opt for a variable budget based on the mileage travelled by their vehicles or for a constant budget. An extranet site is also available in six countries, which allows professional fleet managers to monitor the cost of their vehicles in real time (total cost of ownership), to optimise their fleet and to manage their fuel consumption.

When tenders are received relating to Brands, BANQUE PSA FINANCE:

- provides leading customers with eco-driving training for drivers of financed vehicles to help them control fuel costs by explaining how to use less fuel, thereby reducing emissions and risk of accidents, and promoting a greater respect for the rules of the road;
- encourages customers to purchase a professional pack, including a GPS and Bluetooth device, in order to restructure their travel time and reduce the risk of accidents.

BANQUE PSA FINANCE facilitates its customers' use of electric vehicles by offering services such as car rental and battery maintenance in a global offer (vehicle rental and battery). BANQUE PSA FINANCE has also worked with the Brands to create flexible financing services tailored to the needs of electric vehicle buyers. These buyers can use a vehicle with a combustion engine for a specified period, for example while on holiday. This type of service has been tested in several countries and will be extended in 2019.

Specific financial conditions are offered in the different countries to promote electric models. The PEUGEOT brand also offers Group employees the opportunity to purchase an iOn model with a special employee discount, while the CITROËN brand offers Group employees this discount for the C-Zero model. These programmes, developed in association with BANQUE PSA FINANCE, are designed to encourage employees to use electric vehicles.

#### User-based insurance: pay how you drive

The principle is to reward drivers for their good behaviour by offering them cheaper car insurance: a reduction of 10 to 25% depending on the behaviour of the driver on the road that is measured thanks to the information communicated by an embedded box in the vehicles. This type of service is offered in France and the UK and will be gradually extended to other countries in 2019.

## 2.6. REPORTING SCOPE AND METHODOLOGY

GRI.102-48

GRI.102-49

The data in this section correspond to all of the products and services designed and marketed by the Group in the regions where it operates. Where the scope is different, this difference is noted at each indicator.

Information on vehicle emissions is taken from the compliance certificates issued by independent third-party bodies in the countries where the vehicles are sold as part of the regulated, standardised process to measure and verify compliance with the standards in force.





To engage an agile co-construction of the company's future, Groupe PSA relies on an active dialogue with employee representatives. It is committed to protect employees' health and safety in the workplace to unleash the full potential of their talents.



# 3.

## HUMAN RESOURCES: DRIVING GROUPE PSA TRANSFORMATION

GRI.102-15

GRI.103-1

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Leading the Group's transformation is above all based on our human resources. The Group must be able to count on ambitious teams to challenge the best competitors. The integration of the OPEL and VAUXHALL teams and the development of new talent in its new technological and geographical boundaries are highlights of 2018 and a pillar of Groupe PSA sustainable performance.

For Groupe PSA, company performance and social performance are bound together. Recognising talent and ensuring equal opportunities are based on merit to reward individual and collective results. Giving everyone the opportunity to grow and reach their potential therefore provides the Company with major leverage for boosting performance.

To ensure the success of its strategic plan, Groupe PSA also relies on a shared willingness with employee representatives to co-construct the future and support change within the Company. This constructive dialogue with employee representatives is a competitive advantage for the Company.

The Group's human resources policy aims to offer an employee experience based on well-being at work, by preparing for the future with new working methods and giving a creative space to express individual and collective talents. The goal is to foster sharing, agility and cross-functionality. Digitalisation in particular is an opportunity to boost collaborative working methods and flexibility, and to provide solutions that simplify employees' day-to-day lives.

Groupe PSA is willing to apply its human resources policy worldwide, using as its foundation the Group's Global Framework Agreement on social responsibility.

A materiality analysis of the human resources CSR priorities has highlighted four key issues which have been assessed in terms of their economic, environmental and social impacts:

- **Management of company transformations and social dialogue – internal and external impacts**

The profound transformations instigated by societal and environmental demands, customers' new uses and expectations, and innovations when it comes to connected services are central to the Push to Pass strategic plan. This plan seeks to propel Groupe PSA to the highest level of performance as a car manufacturer and help it to grow as a supplier of mobility services. This also applies at OPEL and VAUXHALL with the PACE! plan to recover profitability, go electric and go global. To guide these transformations, the maturity and quality of the social dialogue within the Company are a key condition for success.

Drawing on a practice of co-constructing with employee representatives by sharing its strategy upstream, Groupe PSA has improved its performance and laid the foundations for its future. Its challenge is to continue this approach of co-construction, which it will do by being accessible, creating trust and transparency and using company agreements to find agile, responsible solutions that will allow the Company to adapt, improve its performance, continue to grow and protect employees.

See 3.0., 3.1. and 3.2. for more details.

- **Attracting and developing talent – internal and external impacts**

As part of the Group's transformation, its international expansion and the cultivation of its performance culture, talent management takes centre stage in Groupe PSA human resources policy. The Group endeavours to give all employees a chance to express their talents individually and collectively. Being attractive to candidates in the different regions and in all its business lines is a priority for the Group, along with the ability to develop talent, embody meritocracy and reward performance.

See 3.3. for more details.

- **Health, safety and well-being in the workplace – internal impacts**

Employees' workplace health and safety is top concern for Groupe PSA. The Group has been working hard on this for many years, and its efforts have paid off, making it one of the top safety performers in the world. It aims to be the global leader in the automotive industry. This performance demonstrates the effectiveness of its Workplace Safety and Health Management System, and the commitment of all employees to enacting it. The Group is also attentive to its employees' well-being, and to that end it applies a methodical approach that involves all its stakeholders, employees, employee representatives, the medical community and management.

See 3.4. for more details.

- **Diversity and equal opportunity – internal impacts**

For Groupe PSA, diversity is a source of added value and economic performance provided that it guarantees equal opportunity. It is a way to promote employee engagement and motivation, and it is a condition for cultivating a culture of performance and economic efficiency.

The Company is characterised by its diversity of cultures, nationalities and ages. However, the automotive industry remains associated with male stereotypes and there is not enough gender diversity yet. To overcome this, Groupe PSA applies a proactive equal opportunities policy. The Group's priorities and commitments focus on gender equality in business lines, and the HR processes guarantee equal opportunities and access to all levels of responsibility.

See 3.5. for more details.

## COMMITMENTS SCOREBOARD

MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Human capital</b> 	<b>Management of company transformations and social dialogue*</b> Organiser: Head of Human Resources	<b>By 2035</b> Engage in agile co-construction for the Company's future with employee representatives and unions, which: <ul style="list-style-type: none"><li>• helps the Company make technological and economic adaptations quickly;</li><li>• promotes employees' professional development and employability;</li><li>• allows all employees to be covered by a collective agreement or a company agreement.</li></ul> Conduct this dialogue within the Global Framework Agreement which notably ensures respect for Human Rights.	Onboarding of 2,000 new employees (permanent contracts) into Groupe PSA.	<b>Target met</b> Onboarding of more than 5,000 new employees in 2018.	Onboarding 2,500 new employees (permanent contracts) into Groupe PSA.
<b>Health, safety and well-being in the workplace</b> Organiser: Head of Human Resources	<b>By 2035</b> Keep the Group as a benchmark for occupational accident as well as for illness and stress, to reach: <ul style="list-style-type: none"><li>• total lost-time accident frequency rate <sup>(2)</sup> &lt; 1 point;</li><li>• excess stress frequency rate &lt; 7%.</li></ul>	Merge PCD's and OV's workplace health and safety and working conditions policies and align the health and safety management systems to achieve a lost-time incident frequency rate of around 1 point.		<b>Target met</b> Integration of OV in health and safety policy. Achievement of an excellent result of 0,8 point total lost-time accident frequency rate.	<ul style="list-style-type: none"><li>• Total lost-time accident frequency rate <sup>(1)</sup> &lt; 1 point.</li><li>• Increase average level of motivation <sup>(2)</sup> to more than 1 point.</li></ul>
<b>Attracting and developing all talent</b> Organiser: Head of Human Resources	<b>By 2035</b> <ul style="list-style-type: none"><li>• Make the Group attractive through its talent development policy that produces high-quality management, empowerment and expertise.</li><li>• Guarantee a 100% access rate to training.</li></ul>	Increase the annual access rate to training to 80%.		<b>Target partially met</b> 83% of PCD employees have had at least one training course in the year (55% of OV employees, 75% at Group level).	Increase training rate to 85% for PCD and extend the Group training objective for OV with a roadmap to reach the same level in 2020.
<b>Diversity and equal opportunity</b> Organiser: Head of Human Resources	<b>By 2035</b> <ul style="list-style-type: none"><li>• Make the Group attractive by its inclusive policy.</li><li>• Internationalisation and diversity of management.</li><li>• Feminise top management beyond the average rate of feminisation of the automotive industry and of the Company.</li></ul>	Continue the pace of increase of the proportion of women in top management by including OV in this target and reaching 14.5% by the end of 2018.		<b>Target met</b> 15.4% of women in top management (including ExCom members, including OV).	Reach a rate of 17% of women in top management by the end of 2019.

\* Strategic issue monitored by the Executive Committee and presented to the Supervisory Board.

(1) TFI: lost-time accident frequency rate includes Group employees and temporary employees. It corresponds to the number of lost-time occupational accidents times one million divided by the number of hours worked.

(2) Motivation: average level of motivation on a scale out of 100 from a survey of approximately 10,000 employees conducted in several countries.

## 3.0. INNOVATION LEADING TO THE GROUP'S TRANSFORMATION

GRI.103-2

GRI.103-3

The major key levers for the transformation of the Group are brought together into a single division that combines the digital, data and connectivity engineering divisions and the real estate division. This new division, linking human challenges with new information technologies and new workspaces, will support the strategic "Push To Pass" plan and will make the Group more agile.



An illustration of the initiatives taken in 2018 under this new organisation:

"Groupe PSA accelerates its digital transformation with the Digital Factory" 24/05/2018 press release:

<https://media.groupe-psa.com/en/groupe-psa-steps-its-digital-transformation-digital-factory>

This digital transformation will be made possible thanks to talented teams with a mindset focused on digital technology. It is the reason why the Group is centred on collaborative innovation.

### Collaborative innovation

At Groupe PSA, we are continually looking for ways to provide unique opportunities for our best talent to help us achieve the Group ambitions in line with its values.

#### Cross-functional teams (CFTs)

CFTs were widely used during 2018 at all levels within the organisation to develop innovative transversal thinking. Using employee experience from different countries, and often from multiple job families, their objective is to propose, and in some cases deliver, solutions for particular business concerns. An example of this is "Product planning strategy across a 10-year time frame".

#### Spring Board

Devised specifically to help us explore new and innovative ideas and develop our young talent pipeline at the same time, Spring Board is a group of 12 international best talents who will directly support the Executive Committee (EXCOM). Conceived and created in 2018, the programme started in January 2019. The Group will work together over a 12-month period to give their opinions on transformational projects, projects validated by the EXCOM and/or propose projects of their own. The success of this initiative will be explored in more detail in the 2019 CSR report.

#### Lend Your Talent

During 2018, Groupe PSA launched "Lend Your Talent", an innovative programme with multiple benefits:

For individuals, this provides, an opportunity to develop new skills, display their abilities outside of their normal work area and feel part of the Company's transformation.

For the Company, this creates increased engagement from participants and those working around them, enhanced employee digital competencies/skills, new innovative ideas and the beginning of a creative/international network of business partners who can support each other, as well as support other projects worldwide.

Employees volunteered to participate in the pilot project. Following an objective selection process, three international candidates were selected to work on the project - 1 from Brazil, 1 from Slovakia and 1 from France. This project included virtual reality training in Brazil, robotic process automation in Slovakia and connected vehicle delivery tracking pilots in France as a result.

Due to its success, another wave of digital volunteers started and are now working with other Divisions to expand the project to other disciplines.

#### Business Lab

The creation of the Business Lab in 2016 was a Group initiative to form an innovative tool to identify and support new value propositions for its customers, shareholders and employees. The Business Lab promotes an intrapreneurial approach through the Incubator and the Business Innovation Factory.

The Incubator, inaugurated in 2015, welcomes and guides Group employees who have innovative ideas or new business ideas. The methodology, which is used by startups, focuses on key items: #PitchDays, where employees present their ideas; #debugs, where employees who wish to help people who have ideas can come together in a brainstorming session; and #ProjectReviews, a review at the end of the incubation before the Steering Committee. Since the beginning of the Incubator, 570 proposals have been examined, more than 100 have been incubated and 22 have been transformed.

The Business Factory experiments with new businesses that have been identified as strategic for the Group. This enables full-scale testing of new businesses in the field in order to assess their potential and benefit to Group customers. It gives employees an opportunity to work in startup mode where they can experiment with new businesses that are often far from their area of expertise.

To support this initiative, *Incub's basics*, a COOC (corporate online open course) has been created and is available for all Group employees. This online training allows Group employees to get used to lean startup methods and innovative ecosystems more quickly.

## 3.1. CO-CONSTRUCTING MOMENTUM WITH SOCIAL PARTNERS

GRI.103-2

GRI.103-3

Groupe PSA has demonstrated that the approach of co-construction through social dialogue within the Company contributes to performance and protects employees. Based on a responsible relationship built on trust and transparency, quality social dialogue helps to reconcile economic performance and social performance by implementing the most appropriate and pragmatic solutions. This ability is held as a competitive advantage for the Group in a more and more demanding environment.

Each industrial site, both within PCD and now OV, has its own site project that strives to achieve sustainable performance, which is supported by a collective performance agreement co-constructed with unions' representatives.

### 3.1.1. The Global Framework Agreement on Groupe PSA social responsibility

DPEF.8

DPEF.9

DPEF.10

DPEF.14

DPEF.15

DPEF.32

DPEF.34

DPEF.35

DPEF.37

DPEF.38

DPEF.39

DPEF.40

DPEF.41

DPEF.42

Groupe PSA has chosen to involve a wide range of stakeholders in the Corporate Social Responsibility process by signing a Global Framework Agreement on corporate social responsibility in 2006.

On 7 March 2017, Groupe PSA and the IndustriALL Global Union and IndustriALL European Union trade union federations signed a new agreement in Geneva. This new agreement expresses the ambition of Groupe PSA to co-construct its future with the employee representatives on a global scale, and to involve all employees in its global human resources policy. It applies to all facilities and was contractually extended to its partners, suppliers and distributors.

This agreement is made up of two parts. The first part gives a formal framework to **the Group's Social Responsibility policy**, enrolls stakeholders and sets out its social requirements in terms of the supply chain. The second part adds the goal of introducing **an international human resources policy** that develops talent and skills, quality of life and well-being in the workplace, with respect for diversity and equality of treatment. In addition, the agreement reinforces the global dimension of the Group Works Council and its mission to share economic and social issues on a worldwide scale.

The Group therefore has **an adapted framework to efficiently and transparently implement the United Nations Guiding Principles on Business and Human Rights (Ruggie Principles) and the OECD Guidelines for Multinational Enterprises**.

**The application of this global framework agreement is monitored and assessed on an ongoing basis using a structured system involving local general management, HR management and employee representatives.** IndustriALL and all unions exercise continuous vigilance and can report non-compliance, and their opinion is regularly solicited on the application of the agreement's commitments. The Group is committed to handling claims and complaints are raised of this agreement and ensuring due diligence with suppliers in the supply chain.

The agreement has been translated into 14 languages. Employees are kept regularly informed of progress. The text of the agreement is public and is available on the Internet.

In December 2017, Groupe PSA joined the Global Deal multi-stakeholder initiative, which promotes respect for employees' rights and more inclusive growth.



"IndustriALL signs new global agreement with Groupe PSA" 08/03/2017 article: <http://www.industriall-union.org/industriall-signs-new-global-agreement-with-the-psa-group-0>

#### The 15 commitments of the Global Framework Agreement

##### Groupe PSA responsible and sustainable development

1. Respect for human rights and protection of employees against all forms of violence
2. Freedom of association and right to collective bargaining
3. Commitment against child labour and forced labour
4. Commitment against discrimination and toward diversity
5. Commitment to decent and attractive employment
6. Protection of health and safety in the workplace
7. Commitment against corruption
8. Consideration of the impact of company activity at the local level
9. Protection of the environment

##### Groupe PSA human capital development

10. Professional development and access to training
11. Professional mobility and preparation for changes
12. Promotion of health and well-being in the workplace
13. Work-life balance
14. Gender equality in the workplace
15. Support for new digital and collaborative ways of working

To apply this agreement, every year, each subsidiary identifies its priorities for action and applies action plans to improve their ability to fulfil the commitments. In 2018, 120 action plans were designed in the 52 Group companies based in 24 countries on four continents.

**Every three years, each subsidiary carries out a self-assessment of the agreement application and involves the trade unions in the process.** 85% of the unions and staff representative bodies involved reported that they had made progress in applying the agreement commitments toward social responsibility.

## 47 unions

### involved in monitoring the commitments of the Global Framework Agreement on CSR

In addition, Groupe PSA is dedicated to abiding by laws and regulations and to preventing disputes. 717 employment grievances were filed in 2018; 652 of them were filed with an official external body (court, employment tribunal, public mediation body, etc.) and 65 were filed according to an internal procedure. 805 grievances were settled during the year.

#### 3.1.1. Free exercise of the right to organise DPEF.8 SASB-310a.2

Groupe PSA recognises the essential role of unions in company dialogue and social cohesion. The Group actively supports employee freedom of association and employee representation, is committed to respecting the independence and pluralism of trade unions at all its sites and exercises an active collective agreements policy. In all countries and on all sites with a large workforce, Works Committees or Councils are formed of employee representatives. 98% of employees are represented by trade unions or employee representatives. In the event of no employee representation, other participatory actions are set up, such as the Voice of Employees in China, a body that shares information and engages in dialogue with Groupe PSA employees.

## 98%

of employees are represented by trade  
unions or employee representatives

Employee representation is part of the Group in the Group's governance, within its Supervisory Board (see 1.4.1).

This employee relations policy is in force at all Group sites. It is an important component of the Group's Global Framework Agreement on social responsibility. The policy aims to anticipate and support the Company's transitions by incorporating the human dimension, consequently helping to create a harmonious labour environment.

No major strikes took place within Groupe PSA in 2018 according to the definition of SASB-310a.2.

#### 3.1.2. Human rights DPEF.32 DPEF.34

DPEF.35	DPEF.38	DPEF.40
DPEF.41	DPEF.42	GRI.412-1

**Groupe PSA Global Framework Agreement on Social Responsibility of 7 March 2017 formalises the Group's commitments to its stakeholders in a detailed and public manner**, and shares its social requirements with suppliers, subcontractor, industrial partners and dealer networks.

In this agreement, Groupe PSA undertakes to go beyond simply complying with local and national standards and to work within a recognised framework for fundamental human rights. The agreement refers to conventions 87, 135 and 98 of the International Labour organisation, respectively on freedom of association and

protection of the right to organise, on workers' representatives, on the right to organise and to bargain collectively, conventions 29 and 105 on the abolition of forced labour, conventions 138 and 182 on the abolition of child labour and the minimum age for admission to employment, convention 111 on preventing discrimination, convention 100 on equal compensation and convention 155 on occupational safety and health.

Groupe PSA promotes the respect of human rights in every host country, even in regions where such respect is not always apparent. Since joining the United Nations' Global Compact in 2003, the Group committed to respecting and promoting its ten principles as well as the Universal Declaration of Human Rights, the ILO Declaration on Fundamental Rights and Principles at Work, the Rio Declaration on Environment and Development, the United Nations Convention against Corruption, the United Nations Guiding Principles on Business and Human Rights (Ruggie Principles) and the OECD Guidelines for Multinational Enterprises.

The agreement also refers to specific PSA policies addressing the salient human rights issues as discussed with union representatives, and this agreement is applied globally. Such policies include the method of assessing and monitoring occupational stress to prevent psychosocial risks, the procedures to reporting and resolving cases of harassment or discrimination, the policy of gender equality and diversity based on UN and UN Women WE principles at global level.

Groupe PSA is committed to respecting **privacy** and to **protecting employee personal data**, which is held as a fundamental right. Its global policy in this matter complies with the European Union regulation while respecting local laws and regulations. In 2018, Groupe PSA also introduced extensive information and training for employees and updated the ways in which employees can exercise their rights.

**Groupe PSA is committed to making respect for human rights a determining criterion in its selection of suppliers.** It follows a responsible monitoring plan with regard to respect for human rights in line with OECD recommendations (see 4.2.1 and 4.2.2).

Groupe PSA policy on the fight against forced or compulsory labour practices and modern slavery is applied jointly by the Purchasing Division with regards to the supply chain and by the HR division to reinforce the effectiveness of Group requirements within its areas of responsibility. In 2018, HR managers of all countries (for PCD) have been requested to check the practices under their control regarding the at-risk points related to temporary workers and recruitment consultancy, such as wages paid to temporary workers in accordance with the law and reference wages agreed, the invoicing for services provided in a suitable manner, and the absence of fees or financial burdens imposed on workers or applicants.

**Speak4Compliance** (see 6.1.3.1), rolled out in 2018, is a whistleblowing system that ensures that any violation of Groupe PSA compliance rules can be reported and received securely and confidentially, and processed and managed properly. One category of reporting concerns the violation of fundamental Human Rights. Our whistleblowers are briefed on following examples of cases that can be reported: discrimination, harassment, racism, sexism, xenophobia and homophobia; disrespectful behaviour and sexual harassment; lack of respect for private life; threat, violence or infliction of injuries or other physical or psychological harm to a person; unequal treatment due to gender, religion, ethnicity or beliefs; breach of human rights such as forced labour, child labour, restriction of the freedom of association, illicit employment, working hours violations; violations of occupational health and safety regulations and lack of employee protection.

Groupe PSA has assessed and addressed claims sent by its stakeholders in accordance with the Global Framework Agreement on Social Responsibility.

The annual monitoring process of the Global Framework Agreement provides trade unions with the opportunity to **report non-compliance with the agreement**. In 2018, this led to local discussions in three countries on subjects such as the feminisation of production staff, equal treatment in recruitment and the application of tariff agreements.

In 2018, the Group also processed two alerts raised by IndustriALLGlobal Union regarding the supply chain. One was related to a second-tier supplier, the other one to a Group supplier subsidiary that was not supplying one of the Group plants. The alerts made it possible to seek explanations, remind these companies about the Group's social requirements and to exercise greater vigilance over the supply chain.

In 2018, the Group received no convictions for the violation of fundamental human rights.

### 3.1.1.3. Training on human rights policies and procedures

DPEF.32    DPEF.38    DPEF.39  
DPEF.40    DPEF.41    DPEF.42  
GRI.412-2

In 2018, 69,625 Group employees undertook dedicated training in human rights policies and procedures. This included guards and security staff. When these activities are outsourced, specialist contractors are selected and must comply with the Global Framework Agreement on social responsibility requirements.

In 2018, extensive training programmes were deployed on issues related to anti-corruption, privacy and personal data protection, and competition law compliance.

A training course on "Managing diversity – Preventing discrimination" is provided to a large number of managers and human resources teams. Since 2009, about 4,000 people have completed this training aimed at promoting inclusive management practices, realistically applying the principles of respect for differences and forbidding all discrimination. These training sessions include a presentation of reporting procedures.

#### TRAINING ON HUMAN RIGHTS POLICIES AND PROCEDURES (For the year)

Areas	Number of hours	Number of employees
Equal opportunity, diversity, anti-discrimination training	8,119	2,012
Compliance with internal rules, global agreement, Code of Ethics, IT policy and procedure	44,527	26,986
Corruption, conflicts of interest	16,979	17,744
<b>TOTAL</b>	<b>69,625</b>	

### 3.1.2. International social dialogue bodies

DPEF.8

#### The Global Works Council

The Global Works Council is the body that brings together employee representatives of Groupe PSA at a global level. It is part of the co-constructing efforts conducted at the international level, with employee representatives coming from all countries with at least 500 employees. The Global Works Council comprises a European body (Group European Works Council) and an extra-European body. Through the extra-European body, employees of Groupe PSA Automotive Division benefit from global representation.

Reflecting the Group's global activity, the Global Works Council makes it possible to share implementation of the Group's strategic plan across all regions and to conduct a dialogue with employee representatives.

During the 2018 meeting of its Global Works Council, Groupe PSA welcomed new representatives from IG Metall, Unite, UGT, NSZZ Solidarność, PRO GE and Járműgyártók Szakszervezeti Bizottsága trade unions at the beginning of the paragraph, who act on behalf of OPEL and VAUXHALL employees.

 "New phase in social dialogue: OPEL and VAUXHALL employee representatives join the Group Global Works Council" 22/06/2018 press release:  
<https://media.groupe-psa.com/en/new-phase-social-dialogue-opel-and-vauxhall-employee-representatives-join-global-group-works-council-0>

The Global Works Council met once in 2018 and the European Works Council and its Liaison Committee met 9 times.

## The Joint Union-Management Strategy Committee

This international body resulting from the initiative of a company agreement allows greater involvement of the employee representatives in the Group strategy at an earlier stage. The Group has stepped up communication with the Committee with a view to increasing sharing, exchanges and transparency upstream in relation to strategic topics such as product plans, guidelines of the three-year Medium-Term Plan and industrial strategy.

The French representative organisations and the main trade unions of the non-French European companies are represented on the Committee. Slovakia has been represented since 2017. The Joint Union-Management Strategy Committee met twice in 2018.



### STAKEHOLDERS DIALOGUE

#### ***Energy transition anticipation and employment impact mitigation***

Anticipating the evolving context of energy transition, issues relating to powertrain and gearbox industrial strategy have been on the meeting agendas of the Joint Strategy Committee and of some other local representative bodies several times in the last few years. The purpose was to share with trade union representatives the analysis of various scenarios of fuel market mix shift, the vision of evolving technologies and ways to mitigate energy transition impacts on engine and gearbox manufacturing facilities.

This dialogue has been part of a strategic orientation for investment in Europe aimed at supporting the industrial transition of existing facilities and at ensuring these plants produce components designed for future electric vehicles ("EV"), plug-in hybrid ("PHEV") and mild-hybrid vehicles ("MHEV"). This guidance gives an opportunity to the historic Group plants of Trémery, Metz and Valenciennes to manufacture electric traction machines, gear reducers and specific gearboxes to ensure a smooth transition in production.

As a result of this strategic decision, Groupe PSA entered into a partnership with Nidec Leroy-Somer on December 2017 with the aim to design, develop, manufacture and sell a range of efficient electric traction machines. The "Nidec-PSA emotors" joint venture has now been operational since June 2018.

Another achievement is the highly strategic decision announced in June 2018 by Groupe PSA to select Punch Powertrain as the supplier of its next-generation electrified transmission systems. In September 2018, the two companies announced their intention to create a joint venture ("Punch Powertrain PSA e-transmissions") to produce the future generation of the electrified transmission (e-DCT) at the Metz plant. The e-DCT gearbox with a 48V configuration will equip future Groupe PSA mild hybrid electric vehicles (MHEV).

Energy transition was again an important topic discussed at the Joint Strategy Committee on 16 November 2018, regarding new regulations to be enforced in 2020 and further evolutions by 2030.

### 3.1.3. Negotiation of company agreements

DPEF.9

GRI.102-41

GRI.402-1

SASB-310a.1

Groupe PSA is committed to enacting a high-quality collective agreements policy, based on a sound understanding of the Company, seeking out innovative solutions and demonstrating a capacity to reconcile the Company's economic and social challenges.

In 2018, 183 company agreements were concluded, 99 within PCD and 84 within OV.

183  
company agreements signed in 2018

Worldwide, 94% of Group employees are covered by a collective bargaining agreement at sectoral and/or company level.

On 19 January 2018 in France, five out of six trade unions representing 80% of employees signed an agreement in line with the measures provided for under the "New Momentum for Growth" agreement covering the period 2017-2019. The outcome illustrates the maturity of labour relations within Groupe PSA and its active commitment to working alongside employee

representatives. Commitments made in France for 2018 are as follows:

- more than 1,300 new hires on permanent contracts, including 400 in manufacturing, to drive the commercial success of new models;
- at least half of entry-level positions to be filled by the Group's former interns or apprentices, and at least 2,000 apprentices to be hired;
- more than 6,000 internal transfers and over 1,000 internal retraining courses;
- secure around 1,300 outplacements (through retraining leave, business creation and career transition passports).



A new agreement in line with the "New Momentum for Growth" agreement:

"Five out of six trade unions, representing 80% of employees, sign the 2018 DAEC agreement" 19/01/2018 press release:

<https://media.groupe-psa.com/en/five-out-six-trade-unions-representing-80-employees-sign-2018-daec-agreement>

Outside France, agreements concluded with unions pertained to a range of topics including salaries and bonuses, professional development appraisals, working hours and working together to support company changes in a way that is tailored to local economic and social circumstances.

At all OPEL and VAUXHALL industrial sites in Europe over the past months, social dialogue has led to the conclusion of performance agreements that make it possible to increase competitiveness, ensure investments to implement ambitious site projects and thus protect the future and the employees.

 [OPEL Germany: one year of co-constructive dialogue with social partners:](#)  
 "Management, Works Council and IG Metall Agree on Social Framework Agreement for a Sustainable Future" 15/12/2017 press release:  
<https://media.groupe-psa.com/en/management-works-council-and-ig-metall-agree-social-framework-agreement-sustainable-future-en>  
 "Opel launches voluntary leave program" 27/03/2018 press release:  
<https://media.groupe-psa.com/en/opel-launches-voluntary-leave-program>  
 "Opel and IG Metall/Works Council Agree on Measures for Improved Competitiveness and Investments" 29/05/2018 press release:  
<https://media.groupe-psa.com/en/opel-and-ig-metallworks-council-agree-measures-improved-competitiveness-and-investments>

## Minimum notice periods for changes in organisation

Anticipating impacts on employability and fostering a social approach to corporate changes are part of the Group's human resources policy. The right to information and the right of the employee representatives to be consulted on major decisions affecting business activity are part of the commitments of the Group's Global Framework Agreement on Social Responsibility.

The provisions vary in accordance with the country regulations and the types of changes in organisation expected. The notice procedures and conditions for execution and compensation for collective work schedules are set out in local company agreements. In France, for example, the agreement "New Momentum For Growth", covering the period 2017-2019, provides for measures to anticipate and support changes, including information and consultation procedures, the creation of joint committees, a minimum period of two to five months between the first information meeting and the changes implementation, and the training of managers to support change.

## 3.2. A RESPONSIBLE EMPLOYMENT POLICY

GRI.401-1

DPEF.8

GRI.103-2

GRI.103-3

To achieve its transformation plans, Groupe PSA engages in ongoing dialogue with employee representatives and promotes a contractual approach. The Group operates according to a policy of responsible employment, and it aims to anticipate transformations and bolster workers' employability by safeguarding careers.

### 3.2.1. Workforce

GRI.102-8

DPEF.1.a

DPEF.1.b

DPEF.1.c

DPEF.1.d

NUMBER OF EMPLOYEES\* OVER THREE YEARS BY REGION

		Europe	Rest of the world	Total
<b>Automotive Division</b>	(PCD + OV) 2018	110,081	7,252	117,333
	o/w OV 2018	34,179	72	34,251
	o/w PCD 2018	75,902	7,180	83,082
	(PCD) 2017	78,480	7,317	85,797
	(PCD) 2016	82,545	7,382	89,927
<b>Other Activities</b>	<b>2018</b>	<b>785</b>	<b>11</b>	<b>796</b>
	2017	800	11	811
	2016	400	11	411
<b>TOTAL</b>	<b>2018</b>	<b>110,866</b>	<b>7,263</b>	<b>118,129</b>
	2017	79,280	7,328	86,608
	2016	82,945	7,393	90,338

\* With permanent or fixed-term contracts.

**93%**  
of employees are employed with permanent contracts

More one-third of employees on fixed-term contracts are on work-study training contracts. As at 31 December 2018, the Group had 118,129 employees: 93%, or 109,878 people, were on permanent contracts.

Only employees working in companies in which the Group holds a majority stake are consolidated in this report.

The workforce employed as of the end of 2018 in the joint ventures was as follows:

- DPCA (DONGFENG PEUGEOT CITROËN Automobiles), joint venture with DONGFENG MOTOR CORP., in Wuhan, Chengdu and Xiangyang (China): 8,082 employees;
- CAPSA (CHANGAN PSA AUTOMOBILES), joint venture with Changan, in Shenzhen (China): 1,167 employees;
- TPCA (Toyota PEUGEOT CITROËN Automobiles), joint venture with Toyota, in Kolin (Czech Republic): 2,148 employees;
- SEVELSUD, joint venture with Fiat, in Val Di Sangro (Italy): 5,987 employees;

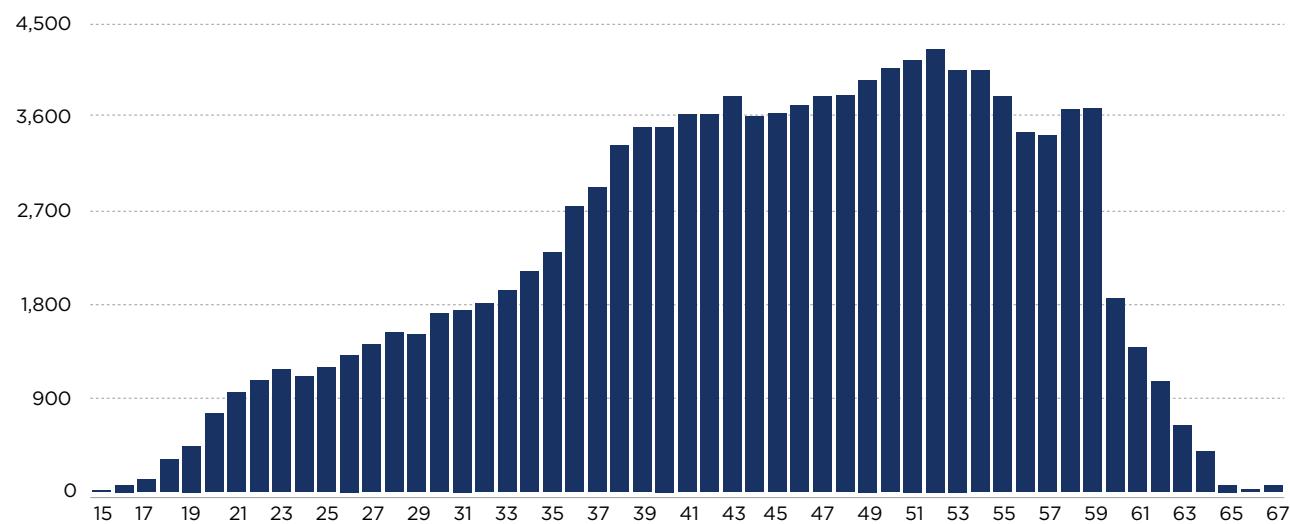
- UPCA (Uzbekistan PEUGEOT CITROËN Automotive), joint venture with SC Uzavtosanoat, in Jizzakh (Uzbekistan): 41 employees;
- the joint ventures between BANQUE PSA FINANCE and Santander total 2,093 employees worldwide; the joint ventures between OPEL and VAUXHALL FINANCE and BNP Paribas total 1,045 employees worldwide.

### BREAKDOWN OF EMPLOYEES ON PERMANENT AND FIXED-TERM CONTRACTS BY SOCIO-PROFESSIONAL CATEGORY (For the year)



#### AGE PYRAMID

(Number of employees on permanent contracts and fixed-term contract as at 31 December)



#### 3.2.2. Recruitment

DPEF.2.a

DPEF.1.d

DPEF.13

DPEF.14

The Group has been hiring actively worldwide, with more than 3,500 permanent contract hirings and more than 2,500 apprenticeship hirings. This hiring is happening across functions (R&D, Industrial, Sales/Marketing, Purchasing, IT, Digital, etc.) for sites that are experiencing an increase in business. It encompasses both junior positions and more senior positions in all socio-professional categories: engineers, technicians and operators.

To attract top talent, a new recruitment website was launched worldwide in September 2017 and given the seal of approval by AccessiWeb (in association with BrailleNet), thus increasing digital access to job postings by workers with disabilities.

Integration processes have been deployed within the Group across different countries to support the arrival and integration of these new talents.

#### PERMANENT CONTRACT HIRING BY REGION

(As at 31 December, including transfers from fixed-term to permanent contracts)

		Europe	Rest of the world	Total
Automotive Division	(PCD + OV) 2018	4,726	681	5,407
	o/w OV 2018	925	17	942
	o/w PCD 2018	3,801	664	4,465
	(PCD) 2017	3,038	490	3,528
Other Activities	(PCD) 2016	1,562	208	1,770
	<b>2018</b>	<b>36</b>	<b>1</b>	<b>37</b>
	2017	31	2	33
	2016	20	1	21
<b>TOTAL</b>	<b>2018</b>	<b>4,762</b>	<b>682</b>	<b>5,444</b>
	2017	3,069	492	3,561
	2016	1,582	209	1,791

#### EMPLOYEES HIRED ON PERMANENT CONTRACTS BY SOCIO-PROFESSIONAL CATEGORY AND REGION

(For the year)

	Europe			Rest of the world			Total		
	Operators and Administrative Employees	Technicians and Supervisors	Managers	Operators and Administrative Employees	Technicians and Supervisors	Managers	Operators and Administrative Employees	Technicians and Supervisors	Managers
Automotive Division	3,283	1,016	427	126	265	290	3,409	1,281	717
o/w PCD	2,443	952	406	126	259	279	2,569	1,211	685
o/w OV	840	64	21	0	6	11	840	70	32
Other Activities	0	8	28	0	0	1	0	8	29
<b>TOTAL</b>	<b>3,283</b>	<b>1,024</b>	<b>445</b>	<b>126</b>	<b>265</b>	<b>291</b>	<b>3,409</b>	<b>1,289</b>	<b>746</b>

In 2018, the Group hired 5,444 employees. Women totalled 24% of recruitment on permanent contracts in 2018.

63% of permanent contract hirings were operators and administrative employees, 24% were technicians and administrative employees and 14% were managers.

The percentage of permanent contract hirings (permanent contract hirings/total permanent contract workforce) was 5% in 2018.

#### FIXED-TERM CONTRACT HIRINGS BY REGION

(For the year)

	Europe	Rest of the world	Total
Automotive Division	6,512	412	6,924
o/w PCD	6,283	412	6,695
o/w OV	229	0	229
Other Activities	44	0	44
<b>TOTAL</b>	<b>6,556</b>	<b>412</b>	<b>6,968</b>

In 2018, the proportion of women recruited on fixed-term contracts was 26%.

#### A policy of employing young people for fostering integration into the labour market

GRI.404-2 GRI.405-1 DPEF.10 DPEF.32

Groupe PSA implements a youth employment policy based on a responsible commitment. The aim is to develop young people's employability through training and increase their chances of being hired at the end of an apprenticeship. More than 50% of permanent junior contracts were granted to the Group's young apprentices in 2018.

Being a young employee in Groupe PSA entails experiencing full immersion in the teams and getting individual support from a mentor.

The Group also engages in more targeted initiatives to help young people from underprivileged areas, such as partnering with organisations to support integration in their workplace and attending recruitment forums.

**6,000**  
young people trained within the Group

## INTERNSHIPS AND WORK-STUDY CONTRACTS BY GENDER

	Interns (cumulative total through 2018)		Work-study contracts (as at 31 December 2018)		o/w skill-acquisition contracts		o/w apprenticeship contracts	
	Workforce	% of Women	Workforce	% of Women	Workforce	% of Women	Workforce	% of Women
Automotive Division	3,048	34%	2,854	26%	578	31%	2,276	25%
o/w PCD	2,402	36%	2,288	30%	578	31%	1,710	30%
o/w OV	646	24%	566	10%			566	10%
Other Activities	66	39%	50	52%	1	100%	49	51%
<b>TOTAL</b>	<b>3,114</b>	<b>34%</b>	<b>2,904</b>	<b>26%</b>	<b>579</b>	<b>31%</b>	<b>2,325</b>	<b>25%</b>

## Partnerships with academic institutions



### STAKEHOLDERS DIALOGUE

To attract a diverse range of talent, PSA University has joined forces with internationally recognised schools to offer placements or the opportunity to study for PhDs at the Group's facilities. PSA University currently partners with approximately 30 scientific and management schools and universities in Europe, Asia, America and Africa. These partnerships are implemented in places such as Brazil (Universities of São Paulo and Rio), China (Universities of Beijing and Shanghai), the United States (Georgia Tech in Atlanta) and Morocco (UIR, Mohammed V University, Ibn Tofail University, etc.).

These partnerships constitute the "cornerstone" of strategic relations with worldwide renowned schools. The "Extended University" concept is based on lasting relationships with schools and universities, as well as the implementation of shared laboratories (the "StelLab" programme), teaching or research chairs and academic partners.

The partnership between Groupe PSA and the French Ministry of National Education makes employing young people and workplace integration a central priority for Groupe PSA. With expert support from the French vocational educational system, the Group helps to pass on its professional know-how with 66 technical academic institutions in France. In 2018, 645 young people joined training programmes emerging from this partnership to earn a vocational secondary school degree, with a view to workplace integration in the Group's industrial and economic realm and more broadly in the automotive industry. The success rate in exams is around 95% and the conversion rate to working contracts or further education is around 70%.

Drawing on this experience, Groupe PSA forges relationships with the education sector in other countries where it has a strong presence. This has been the case recently in Morocco where the Group is aiming to build up skill pools in the medium and long-term.

### 3.2.3. Cross-functional management of Group job families and professions

DPEF.10

The job family and profession strategy developed by Groupe PSA is central to the Group's human resources development policy to manage talent and skills, both now and in the future. This governance of skills at a global level is based on 20 job families and 103 cross-functional professions across the Group's structures.

**Each of the Group's 20 job families creates a forward-looking vision of its professions by anticipating strategic changes and identifying the skills that the business line will need in the future.** This strategy makes it possible to prepare for transitions and design appropriate skill development programmes and training plans. It gives employees points of reference to help them construct their career paths. It also experts to be recognised, which helps to retain them and prepare for the future according to the needs of the Company.

As a result of job families and professions:

- 90% of positions and strategic skills have at least one "immediately-ready" replacement;
- all employees are aware of the technical skills required for the position and the development actions enabling them to progress, and 120 career paths granting qualifications;
- 26 master-experts, 193 experts and 633 specialists ensure the highest level of expertise in their field.

Each profession coordinates its processes and standards at the global level. By cultivating job families and professions, Groupe PSA demonstrates its ability to retain and grow its automotive expertise.

### The Professions and Skills Observatory, to anticipate changes

A joint Union-Management body implemented by the Group in France, the Professions and Skills Observatory, helps to develop a prospective vision of the evolution of Group professions and establish shared analyses of professions in high demand (unmet needs) and of at-risk professions (downsizing and retraining needs). The Observatory meets once a year at the corporate level and twice a year at the local level, and implements ongoing action plans to restore balance among professions.

The Professions and Skills Observatory is a key Group tool to anticipate employment developments, communicate with transparency and responsibility, and trigger professional mobility in order to identify the skills it needs to retain or recruit, and to prevent overstaffing. This transparency and access to information allow all employees to take control of their careers.

### 3.2.4. Anticipating the Company's needs

DPEF.10

DPEF.32

Groupe PSA is keen to ensure its sustainability as well as that of its workers' employment by drawing on operational excellence, performance and agility. The Group operates according to a policy of responsible employment, with an ambition to anticipate transformation demands for skills, and to boost its workers' employability. As such, the Group offers employees secure careers internally, such as through retraining, as well as externally.

#### Safeguarding career paths

The safeguarding of internal careers is accomplished with the global internal retraining programme known as "*Top Compétences*". Since 2012, more than 3,700 employees have had the opportunity to be trained in a new Group profession through training programmes lasting an average of 80 hours over 18-24 months.



#### *Impact measurement and economic assessment*

The priority is given to internal resources and their development. The "*Top Compétences*" programme meets the Group's competitiveness and skill reallocation needs. This training programme offers retraining opportunities and enhances employability for the mutual benefit of the Company and the employees. Employees following this training programme tend to gain entry to the business lines with a key role in the Group's future.

In addition to addressing a social issue, the "*Top Compétences*" programme responds to a simple economic equation: the capital expenditure devoted to it helps to avoid both external recruitment expenses and costs for restructuring plans.

In 2018, "*Top Compétences*" represented expenditure of €1,600 per beneficiary, excluding continued wage cost, for a very favourable cost/benefit assessment compared to costs for restructuring plans. This programme makes Groupe PSA more agile and provides a return on investment in the year following workplace retraining.

Safeguarding career paths has also taken the form of external professional mobility supported by re-employment, retraining in a new activity and setting up businesses.

In France, Groupe PSA was the first company to implement the collective contractual termination in 2018. The purpose of this measure is to manage the process of voluntary departures, and it is based on the combination of a collective agreement between the employer and the trade unions and an individual agreement. The quality of the dialogue with social partners and the trusting relationships built up over the years have allowed an agreement to be reached that has been signed by 5 out of 6 unions representing 80% of employees.

As part of this agreement on voluntary redundancy plans, employees who are planning a career change or planning to start their own business receive individual advice from an external advisor who continues to assist them even after the employee has left the Group. Groupe PSA also funds retraining and training to start a business. Those who decide to leave the Group for another employer have the option of returning to PSA to an equivalent position if the probationary period is unsuccessful.

Regarding OPEL, a similar responsible employment policy has been deployed and several framework agreements have been signed with unions in all the countries in which the Group operates in order to ensure a sustainable future for the Company.

#### Building an ecosystem that is beneficial to employment



#### STAKEHOLDERS DIALOGUE

The Territorial Career Mobility and Transition Platforms (PTMTP) are an example of the Group's corporate social and societal responsibility approach, helping safeguard careers at regional level. They are the outcome of sustained dialogue with regional stakeholders.

Created with the support of public authorities in six French regions in which the Group operates, these platforms are based on partnerships forged with recruiting companies of a variety of sizes, from SMEs to international corporations such as RATP, Solvay and Hermès.

These partnerships in career transition allow employees interested in career transitioning to fill the gap between their current and future job while remaining Groupe PSA employees until they are definitively hired. Partner companies benefit from a process of selection, training and professional integration involving motivated and experienced employees. The scheme boosts the local job market and supports regional development in line with Groupe PSA societal commitment.

## NET CHANGE IN JOBS, 2016-2018

DPEF.1.a

DPEF.2.a

	Workforce as at 31/12/2016	2016-2018 acquisitions/ disposals balance	Net jobs development	Workforce as at 31/12/2018
Europe	82,945	38,650	(10,729)	110,866
Rest of the world	7,393	60	(190)	7,263
<b>TOTAL WORLDWIDE</b>	<b>90,338</b>	<b>38,710</b>	<b>(10,919)</b>	<b>118,129</b>

## LEAVERS ON A PERMANENT CONTRACT

	Europe	Rest of the world	Total
<b>2018</b>	<b>13,703</b>	<b>828</b>	<b>14,531</b>
o/w OV	5,874	5	5,879
o/w PCD	7,829	823	8,652
2017	7,400	738	8,138
2016	7,819	946	8,765

## PERMANENT CONTRACT TURNOVER RATE

DPEF.2.b

(For the year)

	2016	2017	2018
Turnover rate	6.2%	7.0%	9.7%

The turnover rate is calculated by taking all leavers on a permanent contract over the year, excluding collective redundancy, as a percentage of the total Group workforce on permanent contracts as at 31 December.

## TURNOVER RATE OF EMPLOYEES ON PERMANENT CONTRACTS BY AGE RANGE, GENDER AND REGION

(For the year)

	< 30 years old		30-39 years old		40-49 years old		50 years and over		Total		Total (M+W)
	W	M	W	M	W	M	W	M	W	M	
Europe	23.5%	26.4%	10.9%	10.5%	4.9%	5.0%	10.8%	10.1%	9.7%	9.5%	9.5%
Rest of the world	14.3%	14.8%	12.8%	11.8%	15.7%	11.0%	21.4%	15.0%	14.2%	12.4%	12.7%
<b>TOTAL</b>	<b>22.0%</b>	<b>25.2%</b>	<b>11.2%</b>	<b>10.6%</b>	<b>5.3%</b>	<b>5.3%</b>	<b>11.0%</b>	<b>10.2%</b>	<b>10.0%</b>	<b>9.7%</b>	<b>9.7%</b>

The following table shows all Group leavers and all reasons combined, separating volumes by category of reason. The breakdown of leavers demonstrates good control of workforce adjustment, giving priority to voluntary departures.

## LEAVERS ON PERMANENT CONTRACTS BY AGE RANGE, GENDER AND TYPE OF DEPARTURE

(For the year)

	< 30 years old		30-39 years old		40-49 years old		50 years and over		Total		Total (M+W)
	W	M	W	M	W	M	W	M	W	M	
Resignations	195	765	312	1006	170	657	78	336	755	2,764	3,519
Dismissals	17	91	45	146	40	180	33	217	135	634	769
Redundancies and transfer of activity	20	147	95	452	142	554	302	2138	559	3,291	3,850
Other departures: expiration of contract, retirement, death, etc.	132	634	187	710	119	751	507	3353	945	5,448	6,393
<b>TOTAL</b>	<b>364</b>	<b>1,637</b>	<b>639</b>	<b>2,314</b>	<b>471</b>	<b>2,142</b>	<b>920</b>	<b>6,044</b>	<b>2,394</b>	<b>12,137</b>	<b>14,531</b>

### 3.2.5. A socially-controlled policy of sourcing temporary employees and subcontractors

GRI.102-8

DPEF.39

Groupe PSA is committed to abiding by the standards and best practices that structure the employment conditions of temporary employees, and insists that the temporary employment agencies it selects make the same commitments. The purpose of this practice is to keep temporary employees informed about the length of their assignment and to guarantee that temporary employees' working conditions are similar to those of the Group's permanent employees, free from any form of discrimination.

With its intermediary employment partners, the Group is committed to carrying out occupational integration and training programmes that promote a return to work, such as Training Actions Prior to Recruitment (AFPR) and Operational Preparation for Employment (POE) in France.

**A trendsetting partnership was created between Groupe PSA temporary employment agencies to increase the use of temporary employee permanent contracts.** These permanent work contracts guarantee strong and permanent employability within Groupe PSA as well as in the employment region using Territorial Career Mobility and Transition Platforms regional mobility platforms, while reinforcing the Group's economic performance through optimised industrial flexibility. Of the Group's temporary employees, 1,000 have a permanent work contract.

#### NUMBER OF TEMPORARY EMPLOYEES

(Average annual numbers)

The average annual number of temporary employees is calculated by dividing the total of the temporary workforce by 12 at the end of each month.

		Europe	Rest of the world	Total
Automotive Division	(PCD + OV) 2018	9,796	172	9,968
	o/w OV 2018	0	0	0
	o/w PCD 2018	9,796	172	9,968
	(PCD) 2017	8,522	116	8,638
Other Activities	(PCD) 2016	6,238	54	6,292
	<b>2018</b>	1	0	1
	2017	1	<b>0</b>	1
	2016	1	0	1
<b>TOTAL</b>	<b>2018</b>	<b>9,797</b>	<b>172</b>	<b>9,969</b>
	2017	8,523	116	8,638
	2016	6,239	54	6,293

Staff from contractors made available to the Group through service provider contracts and working on Group sites are accounted for. The main activities covered by non-manual services are R&D engineering and IT. **Service providers are consulted for skills that are specific or unavailable in-house and allow for**

**flexibility in the overall expenses essential to the performance and shortening of R&D processes.** Since 2014, a technical policy has been in force to make it possible to engage in these activities more often outside the Group's infrastructure.

#### NUMBER OF EMPLOYEES FROM CONTRACTORS WORKING ONSITE

(As at 31 December, full-time equivalent)

		Europe	Rest of the world	Total
Automotive Division	(PCD + OV) 2018	2,765	803	3,568
	o/w OV 2018	339	2	341
	o/w PCD 2018	2,426	801	3,227
	(PCD) 2017	3,425	611	4,036
Other Activities	(PCD) 2016	3,327	665	3,992
	<b>2018</b>	6	1	7
	2017	<b>74</b>	2	76
	2016	9	1	10
<b>TOTAL</b>	<b>2018</b>	<b>2,771</b>	<b>804</b>	<b>3,575</b>
	2017	3,499	613	4,112
	2016	3,336	666	4,002

### 3.2.6. Organisation of working hours

DPEF.4

In every host country, working hours are equal to or less than the legal work week or industry practices.

#### OVERTIME

		Europe	Rest of the world	Total
<b>Automotive Division</b>	(PCD + OV) 2018	1,788,870	188,924	1,977,794
	o/w OV 2018	337,965	0	337,965
	o/w PCD 2018	1,450,905	188,924	1,639,829
	(PCD) 2017	1,339,855	443,457	1,783,312
	(PCD) 2016	924,812	267,770	1,192,582
<b>Other Activities</b>	<b>2018</b>	500	0	500
	2017	<b>418</b>	0	418
	2016	428	0	428
<b>TOTAL</b>	<b>2018</b>	<b>1,789,370</b>	<b>188,924</b>	<b>1,978,294</b>
	2017	1,340,273	443,457	1,783,730
	2016	925,240	267,770	1,193,010

Groupe PSA has implemented flexible working hours initiatives, also known as banks of hours, in most countries with industrial or logistics facilities. As such, working hours are determined on an annual or multi-year basis in these countries.

In 2018, overtime accounted for 1.3% of hours worked in the Group.

#### SHORT-TIME WORKING HOURS

		Total
<b>Automotive Division</b>	(PCD + OV) 2018	<b>2,208,812</b>
	o/w OV 2018	2,121,907
	o/w PCD 2018	86,905
	(PCD) 2017	368,828
	(PCD) 2016	1,200,679
<b>Other Activities</b>	<b>2018</b>	<b>0</b>
	2017	0
	2016	0
<b>TOTAL</b>	<b>2018</b>	<b>2,208,812</b>
	2017	368,828
	2016	1,200,679

For the Group, short-time work is a way to keep employment protected during a time of major changes in the market that require the business to adapt fast and in substantial ways. This scheme allowed OPEL and VAUXHALL to recover profitability within the PACE! plan.

#### PAID ABSENCES FOR SICKNESS

DPEF.5

GRI.403-2

(For the year)

		Europe	Rest of the world	Total
<b>Automotive Division</b>	(PCD + OV) 2018	6,039,235	174,511	6,041,095
	o/w OV 2018	2,938,231	2,678	2,940,909
	o/w PCD 2018	3,101,004	171,833	3,272,837
	(PCD) 2017	3,146,400	184,847	3,331,247
	(PCD) 2016	3,403,046	205,484	3,608,530
<b>Other Activities</b>	<b>2018</b>	1,860	152	2,012
	2017	<b>3,942</b>	0	3,942
	2016	4,794	128	4,922
<b>TOTAL</b>	<b>2018</b>	<b>6,041,095</b>	<b>174,663</b>	<b>6,215,758</b>
	2017	3,150,342	184,847	3,335,189
	2016	3,407,840	205,612	3,613,452

In 2018, out of 155 million hours worked, the rate of sick leave was 4%. In addition, 922,319 hours of maternity leave were recorded.

### 3.3. GROWING OUR TALENTS

GRI.103-2

GRI.103-3

Groupe PSA aims to offer the best opportunities for development and employability to all its employees with the ambition to build talent. The success of the Push to Pass plan comes down to talent management at every level of the organisation.

**The goal is to give all individuals the opportunity to demonstrate their talent, both individually and collectively.** The human resources ambition can be summed up in the slogan: "Unleashing the power of our talents to win". The talent development programmes aim to continually encourage initiative and creativity and to compensate performance based on concrete results.

#### Groupe PSA human capital

DPEF.10

The following key indicators illustrate how Groupe PSA assesses, develops and rewards its human capital.

#### INDICATORS FOR THE DEVELOPMENT OF GROUPE PSA HUMAN CAPITAL



#### Values

In 2019, the values were updated. For all Group employees, PCD as well as OV, they form the basis of everyone's actions and enable rapid implementation of the strategy.

- Win together
- Agility
- Efficiency

This reference guide for values has been given a central role in identifying and developing talent with the goal of demonstrating it in a concrete way through behaviours.

A "PSA leadership profile" was released in 2018 in order to clarify the managerial skills reference guide used to identify, assess and train employees.

### 3.3.1. Talent management: unleashing the power of our talent

GRI.404-2

DPEF.10

DPEF.12

DPEF.30

Contributing directly to the corporate strategy, the talent management approach taken by Groupe PSA seeks to diversify profiles and experiences, identify talent more deeply within the organisation, assign young talent to key positions, support new businesses, protect knowledge and know-how, promote and develop local skills, and objectify and reward performance.

#### 3.3.1.1. Talent management priorities

For 2018, talent management priorities are:

- OPEL integration: identify and develop key talent;
- diversity: increase the number of women and international profiles in top management as a lever of performance;
- expatriation: promote expatriation for high potentials while developing local talent;
- development of key talent: implementation of specific development actions.

**OPEL integration.** Following the Group's acquisition of OPEL and VAUXHALL in 2017, in addition to harmonising Group processes to find business efficiencies, getting to know OPEL and VAUXHALL talent and integrating them into existing Group succession plans as quickly as possible has been an important achievement. Doing this has allowed us to put the right people into key PSA positions or projects, boost internal mobility through moves across departments and countries and promote diversity, specifically international profiles in corporate roles.

Two specific programmes were initiated to facilitate this. "Talent Exchange" is a programme that proactively moves talent from one corporate role into a sister corporate role and vice versa. Around 40 people have currently moved roles with further exchanges planned. "OV Talent Reviews", is a programme that reviews all OPEL and VAUXHALL talent with the potential to move into the most senior roles within the organisation. Talent reviews held by job family involved the Executive Committee members from PCD as well as OV.

**Development of key talent.** Development plans exist for all levels of employee within PSA and are updated as part of the professional development review process. This action allows the Group to focus on specific development actions to help reach operational objectives, e.g. career plans for key local talent or women, retention actions, annual promotions, etc.

The development of key talent is also managed at a local country level. This allows us to respond to immediate skills and competency requirements as well as cultural differences. The corporate teams continue to provide support for these initiatives to ensure global consistency. In Asia, "Talent Lab" was launched to identify, develop and retain the next generation of Chinese leaders.

#### 3.3.1.2. Talent Review

A fundamental part of the Talent Management Cycle, Talent Review provides all levels of management (including the Executive Committee) with an opportunity to identify and evaluate the talent within the organisation to ensure that succession plans are ready for all of our key and/or strategic roles.

The process provides HR and the business with the necessary information to deliver training and development, manage strategic career paths or to make decisions regarding external recruitment requirements. The data collected also enables the Group to evaluate its performance in line with its strategic objectives e.g. the talent pipeline for women within the organisation to ensure that the Group will meet its targets for women in top management. During the Talent Review follow-up meetings (twice a year), actions are planned to address any identified talent management concerns.

Innovative programmes like Lend Your Talent, CFT and Spring Board all provide a win/win situation for PSA. The programmes develop the people who take part in them and, in turn, PSA benefits from increased skills and competencies as well as from the ideas generated from these programmes.

Several countries around the world already run **specific programmes to develop local talent** supported by the corporate HR team. The Asia department launched a new programme in 2018 with three elements: DASI Elite (leadership development, exposure), DASI Next Generation (skills development, recognition, motivation) and DASI Think Tank (strategic thinking, exposure, leadership, creativity)

**Assessment and Development Centres** are successfully used internally to identify the technical and behavioural competencies required for key roles within the organisation and to evaluate employees against these competencies. In 2018, we have constructed specific sessions for manufacturing senior managers and zone managers in addition to extending our existing commercial and marketing sessions to include OPEL and VAUXHALL employees.

#### 3.3.1.3 Supporting the Group's international expansion

GRI.202-2

DPEF.30

The talent management approaches and processes already described all support the internationalisation of the Group through the global identification of our employees, their skills and their geographical mobility.

Our strategy finds a balance between the promotion of local talent and the need to build international career paths for our high potential talent.

Reserving the expatriation process for high potentials allows the Group to improve the way we manage the costs of expatriation for the business and to encourage the development of local talent. Three distinct types of expatriation packages are set to respond to the various operational needs. This differentiation allows us to manage the need to post employees with the relevant technical expertise to other Group locations for short periods in addition to providing international careers to those people who we believe have the potential to reach the highest level of management positions. This approach is both cost effective and operationally efficient.

At the end of 2018, 316 women and men were working as expatriates in 33 countries in the world. Women represented 8% of Group expatriates. The main countries of destination are, in descending order, China, Morocco, France, Germany and India.

### 3.3.1.4. Meritocracy as a core driver

DPEF.3

DPEF.10

GRI.404-3

The **Annual Appraisal** is a fundamental strategy for assessing individual performance and development. Groupe PSA applies the same process globally for all staff and manager-level employees using a common IT system around three key milestones. The annual appraisal process will be deployed in OV companies from 2019 onwards.

- Setting objectives: By mid-March, each employee and his/her line manager will agree the key missions for the year ahead and set between three and five SMART objectives (Specific, Measurable, Ambitious, Realistic, Time-bound). These objectives will be a combination of both individual and collective objectives. Several members of the same team may share an objective in order to reinforce common goals.

- Mid-year professional development review: Between May and September, employees have the opportunity to spend time with their line manager to discuss their career and development. Information on career aspirations, mobility, behavioural and technical competency strengths and development areas and work-life balance is discussed and recorded. This discussion is an invaluable opportunity in engaging employees in their career development to discuss training and to resolve any concerns. The information is efficiently gathered and is vital for future internal mobility/career succession planning decisions.
- Annual appraisal: Before the middle of February, an employee's performance is evaluated against the key mission(s) and objectives that were set at the beginning of the previous year. The format of the objective-setting process allows employees to evaluate their own performance ahead of face-to-face meetings with line managers. The line manager will award an overall level of achievement to the employee as well as agreeing the percentage objectives achieved. The assessment of the objectives has a direct impact on the variable pay for eligible employees. It is very transparent.

In addition, a skill-based assessment process is used for workers ("SCOP", deployed in France, Spain and Slovakia). Based on skills and competencies toolkit, it aims to assess skills and performance in real work situations, and objectives to encourage progress in the position are set.

In 2018, 88% of PCD Group employees worldwide had an annual appraisal, and most of them updated their CV and technical skills which they had self-assessed on the basis of a catalogue of 330 technical skills.

A survey conducted on managers measured their satisfaction in the use of the available tools and the benefits of these tools for their managerial role. Of the managers surveyed, 92% reported that they felt the appraisal was productive. The survey showed that the professional development appraisals offered a chance to design development actions with the job position in 80% of cases, training actions in 68% of cases and collaborative development actions (mentoring, coaching, co-development, etc.) in 58% of cases.

**PERCENTAGE OF EMPLOYEES WHO HAD AN ANNUAL APPRAISAL**  
(For the year)

	Operators and administrative employees			Technicians and supervisors			Managers			Total (all socio-professional categories combined)		
	Women	Men	Total	Women	Men	Total	Women	Men	Total	Women	Men	Total
Europe	75.4%	57.6%	59.7%	69.4%	65.1%	66.1%	98.6%	96.1%	96.5%	79.1%	67.1%	68.9%
o/w PCD	90.3%	88.9%	89.1%	82.8%	83.5%	83.4%	97.8%	95.4%	95.9%	89.9%	89.1%	89.3%
o/w OV	7.5%	4.3%	4.4%	39.5%	21.7%	25.7%	100.0%	97.9%	98.5%	41.9%	22.9%	25.0%
Rest of the world	100.0%	57.0%	61.5%	81.6%	75.9%	77.5%	87.5%	91.7%	90.7%	91.2%	72.3%	75.7%
o/w PCD	100.0%	56.7%	60.9%	81.2%	75.6%	77.2%	87.2%	91.5%	90.5%	90.3%	71.9%	75.2%
o/w OV	0.0%	0.0%	0.0%	100.0%	92.0%	97.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
<b>TOTAL</b>	<b>76.9%</b>	<b>57.6%</b>	<b>59.8%</b>	<b>70.6%</b>	<b>65.9%</b>	<b>67.0%</b>	<b>97.3%</b>	<b>95.7%</b>	<b>96.0%</b>	<b>79.9%</b>	<b>67.4%</b>	<b>69.4%</b>
o/w PCD	91.6%	86.5%	87.2%	82.6%	82.7%	82.7%	96.3%	95.0%	95.2%	90.0%	87.6%	88.0%
o/w OV	8.1%	4.3%	4.5%	39.8%	22.0%	26.1%	100.0%	97.9%	98.5%	42.5%	23.1%	25.2%

### 3.3.2. PSA University to support Group transformation

DPEF.10    DPEF.11    GRI.404-1    GRI.404-2

Launched to support employees within the Group's change dynamic, PSA University is a powerful lever for performance and development of human capital in the Group. The purpose of PSA University is to transfer knowledge and know-how to all the men and women throughout Groupe PSA worldwide. Skills are a performance lever and they are also a marker of adaptability in an environment that experiences wide-ranging changes, especially changes generated by the digital revolution. PSA University endeavours to enhance its workers' employability, and it contributes to cultural change, conditions that are inextricably intertwined with success.

PSA University is structured as four academies: Research & Development Academy, Industrial Academy, Sales & Marketing Academy and Corporate Academy. They act to implement job family objectives by providing an adequate learning offer and organising the rollout of this offer according to the priorities of the business lines concerned throughout the various countries.

In 2018, common activities were developed to create further synergies between PCD and OV and to support growing together as one company. Digital learning offers have been aligned. These include "Learning Booster", a global event that boosted employee training across two dedicated working days, which included OPEL and VAUXHALL for the first time.



#### AVERAGE HOURS OF TRAINING PER EMPLOYEE BY SOCIO-PROFESSIONAL CATEGORY AND GENDER, BASED ON TOTAL WORKFORCE (For the year, present employees\*)

	Women	Men	Total
Operators and administrative employees	25.1	19.1	19.9
Technicians and supervisors	18.2	18.7	18.6
Managers	22.5	18.8	19.5
<b>AVERAGE</b>	<b>22.2</b>	<b>19.0</b>	<b>19.5</b>

\* Present employees (i.e., excluding relocation leaves and job retention leaves for senior employees).

#### NUMBER OF HOURS OF TRAINING BY REGION (As at 31 December, present employees\*)

	Total hours of training (in thousands of hours)	Average hours of training per employee	
		2017	2018
Europe	1,466	1,907	21.0
Rest of the world	181	202	25.3
<b>TOTAL</b>	<b>1,647</b>	<b>2,109</b>	<b>21.4</b>
			<b>19.5</b>

\* Present employees (i.e., excluding relocation leaves and job retention leaves for senior employees).

### Becoming a "self-learning" organisation: a technological and cultural challenge

To support change, PSA University is aiming to transform the Group into a "learning organisation" and give employees ownership of their own development. As they are invested in continually updating their knowledge and skills, employees can use new educational resources, particularly those that are related to digital learning.

### 2018 key figures

**More than 2 million hours of training were provided within the Group, in the form of face-to-face learning, e-learning or a combination of both, along with tutorials. It represents an investment of over €90 million.**

Each employee dedicates three days on average per year to training. The average annual training expenditure per Group employee was €840 per paid employee.

80,778 employees benefited from at least one training course during the year. 83% of PCD employees had at least one training course in the year, as well as 55% of OV employees, which represents 75% at the Group level.

75%

of employees benefitted from at least one training course during the year

To enable all employees to train at their own pace and according to their needs, PSA University is continuing to expand its digital training catalogue (more than 3,000 resources are available in the form of e-learning, videos, tutorials, MOOCs, etc.) through a Learning Management System (LMS) known as "Learn'in". This is also accessible through an app, and it ensures that as many employees as possible can have free access to these training resources.

To promote digital culture within the Group, PSA University manages a programme known as "Do you speak digital?" This programme includes digital "passports" and "journeys", "happy digital" conferences and workshops on social media. The training offerings change regularly with the addition of thematic programmes and gamification to develop new skill-building methods and to include more and more countries. The goal is to complete 25% of training hours through digital learning in 2019.

To encourage Groupe PSA employees to take charge of developing their skills, a second Learning Booster session was held on 16 and 17 October 2018. Engaging all departments and countries, this event sought to train a maximum number of employees as well as spark employees' interest and familiarise them with all the resources available to develop their skills.

### A new management culture to support the Group's strategic issues

The Leadership Academy, part of PSA University, delivers programmes that are specially designed for managers. The Leadership Academy is the agent that supports the Group's strategy and culture change. The approach to all programmes is to mobilise and equip all managers with the most effective mindset and behaviours to tackle the business and the transformation of the Group. The "**Leadership In Action**" (LIA) programme, which works on leadership concepts and is based on collective intelligence, was designed to help managers become motivating leaders for their teams who can keep up with cultural changes by adopting the new Group values and new behaviours. This programme has also been rolled out in Latin America and Asia.

### PSA University in support of employability

Worker employability, which is defined as an individual's ability to progress in their work, retain a job and adapt to change throughout their career, is a major concern for the Group. The training plans that exist for each country meet priority skill acquisition needs identified by the business lines in accordance with their strategic vision and annual skill assessments, and the imperative of maintaining employability. The "*Top Compétences*" programme set out in section 3.2.4 illustrates this commitment.

In France, the "base of knowledge and skills for the workplace", which was established in 2015, is promoted among employees who are reminded to use their individual training account (CPF).

PSA University places a premium on creating internal training courses that lead to certification that is officially recognised by public authorities or by the market. For example, language training typically culminates in sitting the Bright Test, and the Group encourages a substantial number of employees to enter qualifying trade programmes, particularly those leading to Joint Qualification Certificates in Metallurgy in France (CQPM). (in 2018, 674 employees earned a CQPM).

PSA University's innovative initiatives were rewarded in 2016 by U-Spring with a Gold Trophy for Best Corporate University in the large company category.

In 2018, PSA University obtained a new accreditation from the CLIP (Corporate Learning Improvement Process) for the next five years (accredited by EFMD for the first time in 2012), joining a select group of corporate universities that are accredited worldwide. The CLIP accreditation is based on identifying key factors that determine quality in the design and operation of corporate universities and learning organisations.

### 3.3.3. A comprehensive compensation policy that rewards performance

DPEF.3

Groupe PSA compensation policy aims to be consistent, competitive and fair on all benchmark markets in the countries where it operates.

It also fulfils the objectives set out in a new Group "HR signature", *My Advantages*, which was launched in September 2017. *My Advantages* communicates to all employees in all countries, the various aspects of the human resources package which includes compensation, social benefits, health and disability insurance, personal development and working environment. The goal is to design a comprehensive reward policy.

This reward policy is intended to apply to OPEL and VAUXHALL. Harmonisation has started and the path will follow three main rules: respect for the interests of employees and social dialogue, respect for fair treatment of employees allowing equivalent remuneration for comparable responsibilities and respect for sustainable collective performance consistent with good market practices.

#### 3.3.3.1. Fair compensation based on competitiveness and performance

DPEF.14

GRI.202-1

GRI.405-2

As evidence of the ability of the employee representatives to reconcile cost control, competitiveness and rewarding performance, 70 salary agreements were signed in most countries, for example in France on 1 March 2018.

**The Group compensation policy has three main objectives: to reward performance, to promote equal opportunities based on equal treatment of all employees and to retain and attract key talent.**

**Collective variable compensation** is a component of the comprehensive compensation offered by Groupe PSA to its employees. The variable compensation schemes target all categories of employee and aim to reward collective performance and engage employees in value creation for the Company.

These collective compensation schemes may be specific to certain countries, as is the case in France with non-discretionary and discretionary profit-sharing, and in Brazil with the *Programa de Participação nos Resultados*. In other countries, the Group has instituted a Collective Local Performance Incentive (CLPI) scheme. The CLPI, which is deployed on the basis of the Group's economic performance, is distributed among the countries involved on a shared basis and is paid out according to terms defined by each country based on collective economic performance achievement criteria. In 2017, this collective bonus scheme was expanded and its calculation improved. In 2018, the CLPI was expanded to Morocco and Slovakia. The CLPI is not in place in OPEL and VAUXHALL subsidiaries.

In addition to this fixed and variable compensation, there is **an individual bonus scheme**. The Group's determination to reward merit was demonstrated through the expansion of the bonus schemes. Since 2017, all managers worldwide have been eligible to individual bonuses. This made it possible to motivate employees around individual and collective targets that contribute to the Company's performance. In 2018, 19,441 Group employees were eligible to receive bonuses.

Groupe PSA offers a **Long-Term Incentive (LTI)** for specific top managers and key talent. Based on long-term and ambitious company performance criteria, LTI schemes are important to retain and attract key talent. Two schemes were created in 2018, with a specific one for OPEL and VAUXHALL beneficiaries in order to motivate them on OV performance targets.

**WAGE COSTS** DPEF.3  
*(For the year)*

<i>(In millions of euros)</i>	Europe	Rest of the world	Total
Automotive Division	6,515	280	6,795
o/w PCD	4,210	276	4,486
o/w OV	2,305	4	2,309
Other Activities	139	4	143
<b>TOTAL</b>	<b>6,654</b>	<b>284</b>	<b>6,938</b>

In 2018, total wages paid came to €5,510 million, while related payroll taxes amounted to €1,428 million.

The median annual wage in France was €38,667 in 2018.

**GROUP BONUS, DISCRETIONARY AND NON-DISCRETIONARY PROFIT-SHARING**

	2016	2017	2018	Amount due for 2018 performance
Cost of group bonus (o/w discretionary profit-sharing and non-discretionary profit-sharing in France) <i>(rounded to the nearest million euros)</i>	172	163	188	214

**GROUP MINIMUM WAGE VERSUS LOCAL LEGAL MINIMUM WAGE BY COUNTRY** DPEF.30  
*(For the year, base 100)*

Country	Ratio	Legal minimum salary
Germany	119%	Minimum legal salary of country
Argentina	228%	Minimum legal salary of country (Ratio = 110 over minimum salary of UOM Convention)
Austria	100%	Sector-based agreement
Belgium	121%	RMMMG (Guaranteed Minimum Average Monthly Salary)
Brazil	152%	Minimum legal salary of country
China	Wuhan:436% Shanghai: 336%	Minimum legal salary of region
Spain	126%	Minimum legal salary of country
France	119%	SMIC (Minimum legal salary of country)
Hungary	142%	Minimum legal salary of country
Italy	103%	Minimum legal salary of country
Morocco	100%	Minimum legal salary of country
Poland	114%	Minimum legal salary of country
Portugal	103%	Minimum legal salary of country
UK	100%	Minimum legal salary of country > 21 y.o. (hourly)
Russia	260%	Minimum legal salary of region (Kaluga)
Slovakia	156%	Minimum legal salary of country
Switzerland		No minimum legal salary, no sector-based agreement

Information is reported for countries representative of the Group's structure with more than 300 employees. The ratio is calculated based on each country's statutory minimum wage (when one exists), without considering any regional variations.

**Comparison of average wages for men and women operators and administrative employees, technicians and supervisors** DPEF.12

**FRANCE (PSA AUTOMOBILES)**

(For the year, base 100)

The ratios of average salaries between men and women are presented based on the classification grid from the metalworking industry collective bargaining agreement.

Operators and administrative employees	Male/female wage ratio	Technicians and supervisors	Male/female wage ratio
170	101.80	255	105.67
175	99.43	270	104.08
180	99.42	285	103.04
185	98.93	305	101.41
190	100.54	320	100.65
195	101.03	335	99.61
200	101.20	365	99.48
215	100.67	395	97.71
225	101.55		
240	102.36		
255	103.05		
270	105.60		
285	NS		
305	NS		

NS: not significant (insufficient representative sample).

Once again, Groupe PSA discloses these ratios measuring equal pay. This is the result of a compensation policy ensuring that the proportion of wages allocated to women is always equal to or greater than the proportion for men through a series of indicators sending warnings to managers and supervised by the HR Department.

The French law of 5 September 2018 introduces new measures for professional equality between men and women. In particular, it imposes an obligation of results on companies by measuring an index that measures equal pay. For PSA Automobiles, the index stands at 89 points for 2018, out of a scale of 100, showing the absence of pay gaps between women and men.

This outcome is the result of the policy being applied for 15 years within the Company.



*With a score of 89 points, this index shows the absence of pay gaps between women and men, at comparable positions and ages, and the same chance of having an pay increase or promotion for women as for men in the Group.*

*This achievement is the result of a common will with our social partners to take the lead on equality between women and men, a will that has been reflected since 2003 by the signing of various equality agreements.*

*I'm proud of it!*

*This encourages us to continue our action in this direction.*



Xavier Chéreau,  
Human Resources & Transformation EVP

**COMPARISON OF MEN AND WOMEN'S AVERAGE WAGES AMONG MANAGERS**  
*(For the year, base 100, countries with over 300 managers)*

DPEF.12

Managers	Male/Female wage ratio																		
	Argentina		Brazil		China		France		Germany		Italy		Morocco		Poland		Spain		UK
Managers	PCD	PCD	PCD	PCD	PCD*	OV	PCD	OV	PCD	OV	PCD	OV	PCD	OV	PCD	OV	PCD	OV	
Senior managers	NS	NS	NS	103	NS	NS	102	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	NS	
Senior management	102	114	79	106	86	106	111	93	107	88	NS	90	110	100	116	112			
Experienced managers	112	108	106	101	105	118	111	109	105	107	102	120	102	104	123	116			
Junior managers	105	108	112	101	NA	115	NA	102	NA	132	114	NA	106	NA	107	NA			

NS: not significant (insufficient representative sample).

NA: not applicable.

\* PSA Automobiles S.A.

In France, this information has been taken from the metalworking industry collective bargaining agreement, supplemented by company agreements. For the other countries, the information is presented based on the Group's current manager classification.

### 3.3.3.2. Employee savings schemes

Employee savings schemes allow PCD employees from several countries to invest in Group shares or other diversified instruments (shares, bonds, monetary) with a varied yield/risk ratio depending on the instrument. At the end of December 2018, employee savings schemes represented €553.5 million.

#### Employee shareholding scheme: Accelerate

In order to involve employees in the Group's profitable growth strategy and the resulting value creation, Groupe PSA performed two successful shareholding operations reserved for employees, branded *Accelerate*, in 2015 and in 2017.

Through these programmes, which were enacted in 15 countries, PCD employees had a chance to buy Peugeot S.A. shares on preferential terms, receiving a discount on the reference price, an employer matching contribution and a guaranteed investment opportunity as part of the rules filed with the Financial Markets Authorities (AMF).

### 3.3.3.3. Social benefits: comprehensive compensation and social responsibility

GRI.401-2

Employee benefits in the various host countries supplement the Group's compensation policy in an "overall compensation" approach designed to meet the challenges of offering competitive and motivating compensation while controlling costs and meeting the Group's social responsibility commitments. As such, the Group guarantees that it insures all its employees worldwide against major risks, offering life insurance in all countries where Group insurance can be set up.

#### Health and welfare insurance

The Group initiated a partnership with an international insurance broker several years ago. The Company is therefore able to run its health and welfare schemes worldwide throughout the year and optimise the cost/services ratio for the benefit of the Company and the employees who make partial contributions. Several calls for tender were issued in 2018 in order to limit the increase in premiums and to improve insurers' service quality for example in the Netherlands, Russia and Turkey. OPEL and VAUXHALL health and disability insurance is operated through another scheme of a unique insurance company. Continuity of employee health and disability cover has been successfully guaranteed during the takeover period.

#### Pensions

At the end of 2018, the commitments recorded in the Group's accounts under **defined-benefits pension schemes** were €6,314 million and were covered by outside funds of €6,134 billion. These evaluations are conducted annually, in accordance with the IAS 19 standard, by an international actuary firm, based on theories audited by the Group's Statutory Auditors.

A large number of defined benefits plans had been inherited by OPEL and VAUXHALL following their integration, with locations mainly in Germany, Austria, the United Kingdom, Belgium and Switzerland.

The Group has set up **defined-contribution pension schemes** in all countries where necessary according to market practices and available resources. Such plans are in place in Germany, Belgium, Spain, France, Japan, the Netherlands, the Czech Republic, Slovakia, the United Kingdom and Turkey. Managed by local joint labour management committees, these schemes are designed to provide beneficiaries with additional retirement income on top of regulatory provisions. In addition, specific pension schemes exist in Brazil and Argentina alongside statutory requirements.

**SUPPLEMENTARY PENSION PLANS BY DIVISION**  
(For the year)

	<b>Employer contributions from 01/01 to 31/12 (in thousands of euros)</b>	<b>Employee contributions from 01/01 to 31/12 (in thousands of euros)</b>	<b>Number of employees involved</b>
Automotive Division	36,212	15,648	36,464
o/w PCD	31,024	13,995	35,465
o/w OV	5,188	1,653	999
Other Activities	953	476	730
<b>TOTAL</b>	<b>37,165</b>	<b>16,124</b>	<b>37,194</b>

**SUPPLEMENTARY PENSION PLANS BY REGION**  
(For the year)

	<b>Employer contributions from 01/01 to 31/12 (in thousands of euros)</b>	<b>Employee contributions from 01/01 to 31/12 (in thousands of euros)</b>	<b>Number of employees involved</b>
Europe	35,174	14,651	34,937
Rest of the world	1,991	1,473	2,257
<b>TOTAL</b>	<b>37,165</b>	<b>16,124</b>	<b>37,194</b>

### Social services

All Group companies and facilities contribute to social and cultural activities, as well as improving working conditions based on national and local opportunities. More than €236 million were paid by the Group (automotive and other activities) in 2018 as social benefits. Representing 3.4% of the total payroll,

this amount includes employee payments for accommodation, transportation, meals, medical and social services, company concierge services, childcare centres, healthcare and personal protection insurance and subsidies paid to Works Councils for employee welfare programmes.

## 3.4. SAFETY, HEALTH AND WELL-BEING IN THE WORKPLACE

GRI.103-2

GRI.103-3

DPEF.6

DPEF.7

Groupe PSA health and safety results are among the best in the manufacturing sector thanks to its policy that puts health preservation as the primary requirement.

Groupe PSA is committed to taking all the necessary steps to guarantee the health and safety of everyone who is part of the Group's business, everywhere in the world. This commitment is demonstrated through a structured, guided approach designed to reduce risks and control safety in every workplace scenario. The Group is bolstering these actions in order to enhance all employees' health capital and their well-being at work throughout their working lives.

A global Health and Safety policy, revamped at the beginning of 2018, was signed by all members of the Executive Committee. This policy is applicable within both PCD and OV and is displayed on every site.

This policy asserts the following principles: At Groupe PSA, we enshrine values that return people home healthy; and this applies to every person, every site, every day. Our vision is to eliminate occupational fatalities, disabilities, injuries and illnesses for every individual working for the Group whether they are employees, temporary employees or contractors. Our strategy is based on:

- protecting people;
- engaging people;
- promoting health and well-being.

Three behaviours support this policy:

- setting an example;
- vigilance;
- responsiveness.



We All Care

— Health & Safety —

"We All Care" is the new motto that embodies this policy, launched in October 2018 during the first Group health and safety week, gathering initiatives from every region where the Group operates and sharing best practices related to vigilance and prevention.

### 3.4.1. Occupational health and safety

DPEF.6

DPEF.7

#### 3.4.1.1. Groupe PSA Workplace Health and Safety Management System

**The Group's health and safety policy is supported by the Workplace Health and Safety Management System (WHSMS).**

This is grounded in the principle that safety is considered, planned for and implemented every day. Management at all levels of the Company work constantly to ensure compliance with the fundamental notions and with the enactment of the principles stated in the health and safety policy, within a mindset of continual improvement.

**With the WHSMS, Groupe PSA is compliant with the occupational health and safety recommendations of the International Labour organisation (ILO-OSH 2001) and performs its obligations in all countries.** This Management System was designed and rolled out in 2009, with the methodical application of the road map so that it could be adopted and mastered on a step-by-step basis.

In 2018, the Group Health, Safety and Working Conditions department performed 14 cross audits alongside safety standards compliance checks carried out by all sites.

Encompassing all the OHSAS 18001 areas, the WHSMS is a means to assess, monitor and manage risks systematically. The WHSMS goes even further and also includes specific requirements

regarding policy, commitment and the role of the Health and safety committee. These requirements are in effect at all sites and at all levels. **The WHSMS also incorporates a description of personal protective equipment, the modus operandi for handling external visitors and contractors, and specifies prevention on various risks (psychosocial risks, chemical risks, musculoskeletal disorders, commuting risks, etc.).** In taking into account the principles outlined in OHSAS 18001, the WHSMS appraises them according to six maturity stages, thus making it possible to guide them and monitor their progress. The best practices known within the Group are also incorporated into the reference guide before being shared with the other entities and becoming a standard.

The management principles of this system are applied in Europe, Latin America and China. Its enforcement is one of the commitments of Groupe PSA Global Framework Agreement on Social Responsibility.

This management method is based on six guiding principles and 22 standards that define the areas to pay special attention to and to check: this is the health and safety reference guide that applies to all Group entities and subsidiaries, shown in a roadmap describing maturity stages (raise awareness, change mind sets, change behaviours, change habits and align the corporate culture). The five maturity stages that make up this roadmap constitute essential steps leading to a mature process and lasting change.

##### The Workplace Health and Safety Management System – 6 principles and 22 standards

6 principles	22 standards
1. Executive management involvement	Executive management involvement
2. Structured leadership	Safety communication Health and safety committee
3. Clearly established and applied standards	Incorporation of safety and ergonomics into work standards Protective equipment Safety during the design and engineering of manufacturing facilities
4. Defined roles	Work authorisations and clearances Contractors Temporary work Reception of visitors Assessment of individual performance
5. Effective alert systems	Work-related alerts Staff representative bodies
6. Effective monitoring and improvement resources	Field visit and examination Survey and announcement after incidents or accidents Health and safety scoreboard and reporting
+ Controlled risks	Risk assessment Control of risk families, identification and management of high-priority risks Preventing chemical risks Preventing psychosocial risks Preventing musculoskeletal disorders (MSD) Road safety prevention, work-related travel risk prevention

The WHSMS is operational at all PCD facilities.

At OV companies, a specific workplace health and safety Management System is grounded in 18 standards organised through a "Plan Do Check Act" approach. Having aligned the

health and safety policy for the Group in 2018, the ongoing project consists of merging PCD and OV health and safety systems in 2019, through adjusting safety standards to ensure best practices, with both systems currently providing excellent safety results.

### 3.4.1.2. Groupe PSA performance in safety and workplace accident prevention

DPEF.7

GRI.403-2

#### Total lost-time accident frequency rate

**0.8** point

The total lost-time accident frequency rate is the Group's first indicator for measuring its safety performance. The Group's ambition is to be the leader in the automotive industry with a lost-time accident frequency rate sustainably under one point.

The Group achieved a frequency rate of less than one for the second time, with this result now including OV. This target of 1 point had been set in 2010 with the launch of the Workplace Safety and Health Management System.

The Group is among one the best performers in the industry. These results reflect safe practices by both permanent and temporary employees. Since 2009, with a view to ensuring the

protection of all employees, the Group decided to manage this indicator by using the total lost-time incident frequency rate including Group employees and temporary employees ("TFI Management"). With emphasis on training from the first day on the job and on the attention paid to all categories of workers, the lost-time accident frequency rate for temporary workers is now as low as for Group employees.

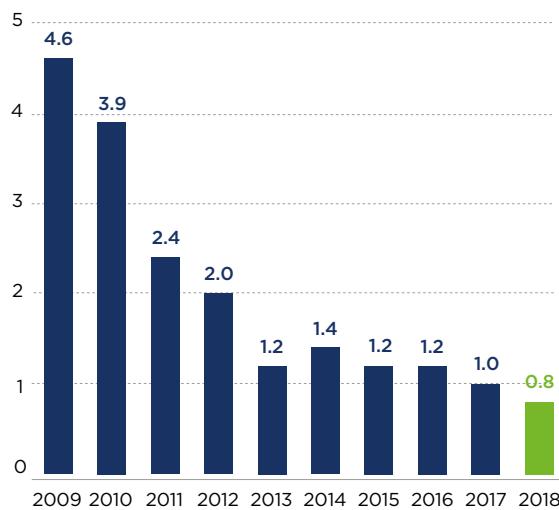


#### Impact measurement and economic assessment

The Group's notable performance in occupational safety results from every employee's operational involvement on a daily basis, grounded in a performance obligation: the Workplace Health and Safety Management System.

Human investment (ergonomists, OHS consultants, workplace medical services, etc.) and economic investment (personal protective equipment, capital expenditure excluding projects) devoted to safety are producing tangible results: the lost-time incident frequency rate is 20 times lower than the average recorded in France's metalworking industry.

#### TOTAL LOST-TIME OCCUPATIONAL ACCIDENT FREQUENCY RATE



\* Lost-time occupational accident frequency rate includes Group employees and temporary employees. It corresponds to the number of lost-time occupational accidents times one million divided by the number of hours worked.

#### LOST-TIME OCCUPATIONAL ACCIDENT FREQUENCY RATE BY REGION

(For the year)

	Europe	Rest of the world
<b>TOTAL</b>	<b>0.88</b>	<b>0.08</b>

**SEVERITY RATES BY REGION**

(For the year)

	Europe	Rest of the world
Automotive Division	0.08	0.00
o/w PCD	0.11	0.00
o/w OV	0.03	0.00
Other Activities	0.01	0.00
<b>TOTAL</b>	<b>0.09</b>	<b>0.00</b>

The severity rate corresponds to the number of consecutive days lost to accidents multiplied by one thousand divided by the number of hours worked.

The severity rate was 0.08 in 2018, compared to 0.13 in 2017 and 2016.

**COMMUTING ACCIDENTS**

(For the year)

	2016	2017	2018
Frequency ratio	2.6	3.0	2.7
o/w PCD			2.9
o/w OV			2.5

The frequency ratio corresponds to the number of lost-time commuting accidents multiplied by one thousand divided by the number of employees.

**NUMBER OF FATAL ACCIDENTS**

(For the year)

	Europe	Rest of the world	Total
Automotive Division	0	0	0
o/w PCD	0	0	0
o/w OV	0	0	0
Other Activities	0	0	0
<b>TOTAL</b>	<b>0</b>	<b>0</b>	<b>0</b>

**Health and safety for all**

Safety concerns every person that works on Group sites, including employees of service provider companies.

Without superseding their legal liability, the Group ensures that these companies respect the safety rules and asks them to apply the Workplace Safety and Health Management System requirements.

A monitoring and business support initiative has been set up with temporary agencies. It emphasises the interactions between temporary agencies and the Group in the prevention

and management of temporary employees' health and safety. Accordingly, representatives from temporary agencies visit Group sites, participate in the safety training observation programme (STOP™) and in assessments of workplace accidents. In 2018, the total lost-time accident frequency rate among temporary employees was 1.1 point, compared to 1 point in 2017 and 2.3 in 2016.

Special attention is provided to the safety management of contractors, in particular during projects or summer maintenance. When this work is being carried out, a special Group organisation is responsible for training each worker and conducting 9,300 health and safety audits.

**OCCUPATIONAL ACCIDENTS CONCERNING EMPLOYEES OF CONTRACTORS OR TEMPORARY EMPLOYMENT AGENCIES**

(For the year)

	Europe		Rest of the world		Total	
	Contractors	Temporary employees	Contractors	Temporary employees	Contractors	Temporary employees
<b>TOTAL</b>	<b>1,079</b>	<b>1,466</b>	<b>13</b>	<b>1</b>	<b>1,092</b>	<b>1,467</b>

### 3.4.1.3. Groupe PSA performance in health and occupational illness

DPEF.7

GRI.403-2

Good health is essential to sustaining the performance of human resources and business operations. The Group views health as a state of physical, psychological and social well-being, and as a foundation of its performance.

Its policy aims to maintain and improve employee health.

Social dialogue and multi-disciplinarity, including a structured coordination of the occupational health network, are key factors of improvement. Groupe PSA regularly make use of internal health services comprising occupational physicians, nurses and physiotherapists who work within the Company to support employee health.

This strategy is based on:

- protecting people through implementing the Workplace Health and Safety Management System with the highest demands placed on workplace ergonomics;
- engaging people by fostering an environment in which each stakeholder owns their own and each person's safety;
- promoting health and well-being to support and enhance an engaged and motivated workforce.

These principles apply with the following priorities:

- health monitoring through the health services, to highlight the main health determinants;
- specific communication and training regarding those determinants. For example, four health topics have been promoted during 2018: blood pressure, diabetes, tobacco and sleep, with the support of public partnerships;
- ergonomic study of workstations, their design and their management in daily life;
- the work-related alerts (ALT), a structured approach, which allow difficulties in the workplace to be reported. A few thousand of them are issued every year. On top of that, some plants are experimenting with a bespoke problem-solving process (BEST "Bien-Être en Situation de

*Travail*" or Wellbeing in the Workplace), based on how the working teams are dealing with the difficulties they were experiencing. Providing every participant with the occasion to express difficulties and contribute to solving these difficulties by themselves provides interesting results in terms of social relations and motivation.

Groupe PSA is committed to applying best practices and to constructing relevant partnerships. For example, Groupe PSA and *La Ligue contre le Cancer* (e.g. a charity that funds research into cancer) signed an agreement in 2018 to improve the return-to-work process for employees suffering from cancer and to support managers through a co-constructed training. This engagement has been completed by the signature of the charter of the 11 "Cancer and Employment" commitments from the French National Cancer Institute (INCA). This kind of partnership has also been initiated in other countries.

 [Partnership agreement to improve support measures for employees affected by cancer and to promote good health](#):

"La Ligue Contre le Cancer and Groupe PSA team up to help employees affected by cancer" 05/02/2018 press release:

<https://media.groupe-psa.com/en/la-ligue-contre-le-cancer-and-groupe-psa-team-help-employees-affected-cancer>

#### OCCUPATIONAL ILLNESSES

(For the year – Number of reported illnesses)

	Europe	Rest of the world	Total
Musculoskeletal disorders of the upper limbs	263	0	263
Carrying heavy loads	16	0	16
Occupational illnesses after exposure to asbestos	30	0	30
Noise-related hearing loss	34	0	34
Other	22	1	23
<b>TOTAL</b>	<b>365</b>	<b>1</b>	<b>366</b>

All these initiatives are part of the Group commitment to the "Healthy Workplaces" programme spearheaded by the European Agency for Safety and Health at Work. Awarded in Spain in 2017 for its action in favour of solidarity between generations in the workplace, Groupe PSA is also involved in the 2018 and 2019 campaigns on the use of chemicals.

As a result of its health policy and associated actions, the number of reported occupational diseases has constantly decreased in the last four years, even when taking into account the Group's headcount reduction.

### 3.4.1.4. The Group's priority commitments on health and safety GRI.403-3

In order to control the main risks to which employees are exposed, Groupe PSA is bolstering its overall approach through five high-priority commitments relating to the following risks:

- preventing musculoskeletal disorders (MSD);
- chemical risks;
- psychosocial risks;
- road risks;
- workstation safety: "STOP™" audits.

These priorities were originally established for PCD and are now being applied in a consistent manner to OV. The common policy is already in place and the alignment of the health and safety management systems is ongoing.

#### Preventing musculoskeletal disorders

**Musculoskeletal disorders (MSDs) are a leading cause of work-related injuries and illnesses. Therefore, preventing MSDs is a key occupational health and safety policy priority.** In 1999, Groupe PSA started using sizing tools on workstations and designed improvement trajectories that have been in use since then. In order to address the complex interplay of all the factors that can cause MSDs, the Group has developed a structured

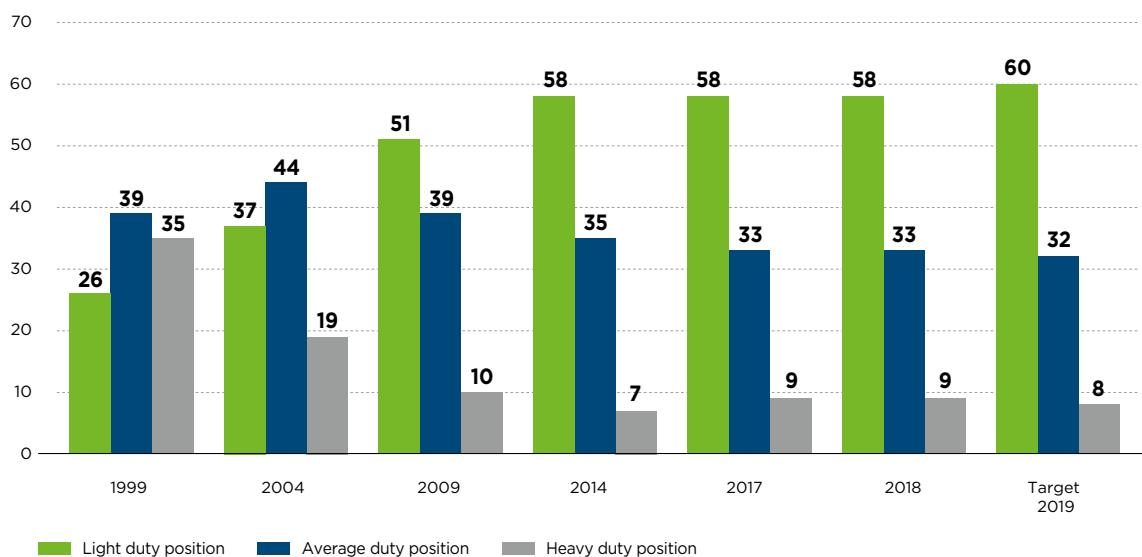
approach that analyses the causes of MSDs and ways to prevent MSDs by simultaneously monitoring physical factors (posture, exertion, angulation of the upper limbs) and non-physical factors (organisation of the activity in terms of duration and frequency of use; mental workload, i.e., information processing, relationships with colleagues or superiors; perception of operators—recognition and motivation, for example).

The Group carried out a review of workstations requiring repetitive movement at all manufacturing sites. Based on seven factors taken from the Ergonomics Management System (EMaS), this assessment identified the risk level for each workstation and detected factors with the greatest risk of causing MSDs. Every year, action plans are set and implemented in all Group plants, especially based on the Work Related Alert ("ALT") process, allowing every worker to escalate any difficulty they face at a workstation.

In tandem with this action, the Group continues to pay attention to workstations, with manufacturing sites focusing on alleviating physical and postural stress by reducing the number of workstations rated as "heavy". This is taken into account during the design stage for products and processes and is based on a rigorous methodology for rating workstations. From 1999 to the end of 2018, the proportion of "heavy" workstations fell from 35% to 9%, while "light" workstations rose from 26% to 58%. It is the Group's ambition to make further progress in this area and achieve a rate of 60% "light" workstations in 2019.

#### CHANGES IN THE PROPORTION OF "LIGHT", "MEDIUM" AND "HEAVY" WORKSTATIONS

(Manufacturing activity of the PCD Automotive Division, in % based on the METEO\* rating)



\* Workplace and organisational evaluation method.

## Chemical risks

Chemical risks are a major focus of the preventive measures the Group has taken to manage health and safety. They are not only risks related to the use of products and substances but also those related to the pollutants generated by certain processes.

The Group uses more than 8,000 chemical products and substances at its R&D and manufacturing sites and more than 1,500 in its sales activities. Each of these products has to be approved prior to use by the Group's Toxicology department, which is led by a toxicologist physician. The products are listed in a computerised database and have a workstation instruction sheet that is validated according to Group protocol, whether it is for manufacturing, R&D or sales activities. The other priorities regarding chemical risk management consist of the quality of how the risks are weighed up, the substitution of potentially harmful products by neutral ones and the training of every user. In 2018, more than 400 stakeholders, especially managers, undertook dedicated training.

All facilities have a surveillance plan for air quality inside the manufacturing, R&D and sales activities areas. In 2018, a common database was developed in France to store, compare and use the results provided by every site to closer coordinate the related action plans.

## Psychosocial risks

With support from the medical community, since 2007 Groupe PSA has been developing expertise in detecting stress and identifying motivation factors in support of its ongoing ambition to decrease stress and improve motivation. These assessment tools have helped the Company to publicly report its results in this area, the stress frequency rates measured and the improvement targets adopted.

A survey conducted within the Group in 2018 revealed that 6.6% of employees are experiencing excess stress and that the average level of motivation per employee is 65.4 on a 100-points scale. These figures show an improvement for the fourth consecutive year.

Managed through a dedicated roadmap, the psycho-social risk management pillars are:

- the constant monitoring of risk through:
  - medical and social services who play an important everyday role where they deal with warnings about situation where employees are in distress, as well as assisting people who need help,
  - the stress measuring and monitoring programme, based on individual questionnaires. This initiative, managed by the occupational health services, makes it possible to detect and treat potential individual problems on 52 different factors (individual results are discussed between the occupational physician and the patient), and makes it possible to collate a collective measurement of workplace stress. Collective data are gathered and shared with managers, which helps them to design action plans. The Stress Measuring and Monitoring Programme is operational at PCD in Europe, Latin America and, since 2018, in Russia. In 2018, 16,159 confidential surveys were filled out;

- the training through the "Safety Box" and e-learning: all employees receive training specifically adapted to them. The Group is also extremely focused on providing managers with the relevant tools to balance the permanent demand of performance with caring for employees' health. Since 2014, more than 3,500 managers have completed a dedicated psychosocial training module which is organised internally. Now integrated into a wider cycle, this training has been updated and is now offered under the name "Creating the conditions for sustainable performance", and must be completed by every manager. The second step of this training cycle is now organised worldwide.

Thanks to this approach, the stress frequency rate stayed below 8% and the motivation indicator improved in 2018, demonstrating good support of the Company's transformations.

As Groupe PSA is committed to decreasing the stress levels and reducing the exposure to stressors and demotivation factors, it is now involved in developing well-being and motivation as key factors of sustainable performance.

## Preventing road risks

As a car manufacturer, the Group naturally puts a high priority on road safety. **In collaboration with employee representatives, the Group renewed a work-related Road Risk Prevention Charter setting out the principles to be respected in 2010.** The charter, communicated to all employees, specifies the rules for using vehicles for professional purposes or when commuting to and from work.

In signing the call for companies' commitment to road safety on 11 October 2016, which was initiated by France's Interior and Labour ministries, Groupe PSA reaffirmed its long-standing commitment to road safety, which it demonstrates through its products, its top-of-the-range technologies used worldwide and its constant concern for employees' safety in their day-to-day work.

Awareness-raising initiatives, training and monitoring helped to lower the number of road accidents. As a result, a 20% reduction in these accidents was recorded over the period 2016-2018.

## Workstation safety: "STOP™" audits

The safety at work by preventive observation (STOP™) programme has been in place at the Group's plants since 2009. The programme trains managers to detect dangerous situations or behaviours.

**During the programme, managers are made aware of how to speak to the employee so as to have a positive discussion about prevention.** This programme aims to achieve progress for both the manager and the employee. Each month, working in pairs, managers carry out two work area visits to manage the STOP™ scheme and solve risky situations in workshops.

### 3.4.1.5. Joint management-worker health and safety committees and agreements

DPEF.9

GRI.403-1

GRI.403-4

In most host countries, joint management-worker organisations are in charge of monitoring the application of employee health and safety practices.

97% of Group employees are represented by joint management-worker health and safety committees.

#### Joint Management-Worker Health and Safety Committees

Country	Organisation	Membership
Algeria	Hygiene and Safety Committee	Employer representatives, Employee representatives
Argentina	Safety, Ergonomics and Fire Prevention Committee	Employee representatives, Employer representatives, Safety manager
Austria	Health and Safety Committee	Plant management, Human resources, Occupational physician, Safety managers
	Occupational Health and Safety Central Committee	Works Council, Occupational physician, Safety managers, Head of Department
Belgium	Occupational Prevention and Protection Committee	Employer representative, Employee representatives, Prevention consultant
Brazil	Internal Accident Prevention Committee	Employee representatives, Employer representatives
Chile	Hygiene and Safety Committee	Employee representatives, Employer representatives
France	Industrial Hygiene, Safety and Working Conditions Committees	Employee representatives, Employer representatives, Occupational physicians, Safety manager
	Psychosocial Risk monitoring unit	Head of Human Resources, Occupational physician, Social worker, Employee representative
Germany	Health and Safety Committee	Employee representatives, Occupational physician, Safety manager, Head of Department
	Psychosocial Risk monitoring unit (Retail)	Branch director, Member of the Works Council, Health manager, Occupational physician
	Safety Review Boards	Director, Safety engineer, Plant manager, Human Resources manager, Area managers, Environmental engineer, Union representatives
Italy	Health and Safety Committee Annual Risk Plan Committee	Employee representatives, Medical officer, Prevention and protection services manager, Legal representative
Japan	Health and Hygiene Committee	Employee representatives, Employer representatives, Occupational physician, CEO, CFO and Human Resources
Morocco	Health and Hygiene Committee	HR manager, Safety manager, Occupational physician, Employee representatives
Netherlands	Health and Safety Committee	Employer representatives, Employee representatives, Emergency response team
Poland	Health and Safety Committee	Occupational physician, Employee Relations manager, Labour inspectors, Company Labour inspector, Health and Safety manager
Portugal	Health and Safety Committee	Employee representatives, Employer representatives, Health and Safety manager, Occupational physician
Russia	Health and Safety Committee	Employee representatives, Employer representatives, Health and Safety officer
Slovakia	Health and Safety Committee	Employee representatives, Employer representatives, Health and Safety officer, Plant manager
Spain	Health and Safety Committee	Employee representatives, Employer representatives, Prevention representatives
Ukraine	Health and Safety Committee	Executive team member, IT team member, Quality team member, Homologation representative, Parts and Service team member, Office manager
United Kingdom	Health and Safety Committee	Executive managers, Head of Human Resources, Head of Health and Safety, Health and safety consultants, Head of the Technical Centre, Employee representatives
	Plant Safety Review Board	Plant director, Health and Safety manager, Union representatives, Facilities manager, Human Resources manager and main contractors

#### Health and safety agreements

Groupe PSA is committed to implementing the best occupational health and safety standards and practices, and has made health and safety a top priority. This commitment is demonstrated in the occupational health and safety policy, as well as in several national company agreements.

Each year, health and safety agreements are signed in the countries where the Group operates. 16 health and safety agreements were signed in 2018, .

### 3.4.1.6. Training and prevention programmes

DPEF.10

Training programmes are based on the existing risks present within the entities.

In 2018, workplace health and safety prevention represented 114,172 hours of training at PCD France, i.e. 13.6% of the training plan and 36,749 hours at OV, i.e. 15%.

**150,000** hours  
of training on health prevention and workplace safety

### 3.4.2. Quality of life at work

DPEF.6

When it comes to quality of life and well-being at work, Groupe PSA is an expert in workstation ergonomics and the assessment of stress. As part of the Push to Pass plan in 2016, Groupe PSA stated a new ambition to offer an employee experience based on well-being at work by laying the groundwork for the future with new work methods and consequently providing a space for individual and group talent to blossom.

#### 3.4.2.1 Attentiveness to employees

DPEF.8

Employee motivation and engagement are based on participatory actions. The Group conducts regular satisfaction surveys and monitors a social barometer.

##### Social barometer

The Group has a set of tools for measuring the satisfaction of employees and better assessing their aspirations. Surveys conducted on a regular basis by opinion study organisations measure the satisfaction and confidence levels of Group employees.

**The stress measuring and monitoring programme, beyond gauging stress factors, can regularly estimate a motivation index and provide information on the fluctuation of the index and the factors that affect it.** Action plans are put in place in order to anticipate psychosocial risks and increase employees' engagement and motivation (see 3.4.1.4.).

##### Participatory actions

Groupe PSA works hard to keep employees informed, listen to them and implement participatory initiatives. A company-wide social media network has been launched and has met with great success: already more than 20,000 regular users, more than 5,000 groups created and more than 2,000 active groups over the last 30 days at the end of 2018. This collaborative tool helps to free up initiatives and develop transversal and intercultural relationships.

**The Group encourages and places value on suggestions from operators.** A business support system makes it possible to collect ideas for improvement, quickly process them in view of their application and reward the best ideas. This participatory initiative is an indication of employee engagement and motivation.

The S-Box or Safety Box was an initiative that came from the Vigo (Spain) site. It began in 2012 and was gradually rolled out, it to all PCD sites. Made up of six rooms that form a journey, this 110 sq.m. training space is fully interactive. Using different media (notices, videos, soundtracks, games, quizzes, etc.), ten participants per session take part in the activities offered. **This type of training boosts the comprehension of participants and improves their active engagement in terms of prevention.**

A dedicated version that focused solely on psychosocial risk prevention was launched at services sites, research and development sites.

In 2018, the Group started to digitalise the S-Boxes using virtual reality helmets. This will help to spread the safety messages and rules across all Company sites, especially in the smaller facilities (e.g. repair workshops)

#### 3.4.2.2. Improving working conditions

**The Group strives to provide modern, digital and attractive workspaces.** Renovated workspaces seek to promote collaborative work, cross-functionality and information sharing while improving efficiency. This is also a way to enhance collaboration, streamline dialogue between teams and consequently reduce bureaucracy.

The reconfiguration of the sites according to this master plan, which makes them more open, agile and collaborative, transforms working practices and the way employees collaborate, as well as strengthening teams. **In a modern, energetic, inviting environment, multiple workspace configurations promote informal, productive gatherings and dialogue.** All managers, including Executive Committee members, benefit from these open, flexible, collaborative spaces, as they bring them closer to their teams.

**Production workstations are also being examined from the perspective of the human worker.** A team of around 40 ergonomists, reporting to the Human Resources Division, is working on ensuring that human considerations are properly factored into the Group's organisational and manufacturing choices. This is reflected in significant investment in workstation ergonomics. In addition to reducing the amount of human energy required to operate workstations, there is also the need to address other types of strenuousness, such as biomechanical stress, physical factors in the appearance of musculoskeletal disorders (MSD) and mental, cognitive and psychological stress, which play a role in the risk of developing MSDs and in psychosocial risks.

Ergonomists also participate in developing and validating the use of new technologies such as exoskeletons and collaborative robots, so that their implementation in the field associates industrial performance with wellbeing enhancement.

### 3.4.2.3. Achieving a healthy work-life balance

DPEF.4

GRI.102-8

GRI.401-3

Establishing a collaborative work method is incorporated into the new Global Framework Agreement and applies to workspaces as well as the expansion of Remote working. In France, an annual account of 25 days of remote work is now offered. This allows employees to occasionally work from home or another location. The goal is to offer more flexible work arrangements without damaging collective productivity.

**Achieving a good work-life balance leads to better performance and prevents stress. Capitalising on that, the Group willingly offers employees part-time schedules or teleworking arrangements when this is feasible.**

Where possible, the Group approves employees' requests to work part-time. The aim is to devise suitable solutions, such as part-time by the day or half day, part-time in hours, etc. Part-time hours are chosen by employees and are not imposed by the Group. In 2018, the Group had more than 10,000 part-time employees worldwide (including 2,203 employees who worked 50% of a working week), distributed as follows: 34% women and 66% men.

#### PART-TIME EMPLOYEES ON PERMANENT OR FIXED-TERM CONTRACTS

(For the year)

		Europe	Rest of the world	Total
<b>Automotive Division</b>	<b>(PCD + OV) 2018</b>	<b>10,393</b>	<b>1</b>	<b>10,394</b>
	o/w OV 2018	2,654	0	2,654
	o/w PCD 2018	7,739	1	7,740
	(PCD) 2017	8,234	0	8,234
	(PCD) 2016	8,826	0	8,826
<b>Other Activities</b>	<b>2018</b>	<b>34</b>	<b>0</b>	<b>34</b>
	2017	46	0	46
	2016	27	0	27
<b>TOTAL</b>	<b>2018</b>	<b>10,427</b>	<b>1</b>	<b>10,428</b>
	2017	6,351	0	8,280
	2016	6,801	0	8,853

**Community life is encouraged, and there are over 80 very active sporting, cultural and charity organisations.** PSA Challenges, PSA Challenges, including multi-site sports meets involving different countries, involving different countries, have become events not to be missed.

**4,768**  
teleworkers in the Group

After a two-year experimental phase demonstrated the positive impact of Remote working on working conditions and quality of life, particularly by reducing commuting time, a labour agreement made Remote working one of the possible work arrangements at Groupe PSA in 2014. French technicians, administrative employees and managers have the option of working from home between one and three days per week.

At the end of 2018, 3,358 employees in France had opted for Remote working.

The Group endeavours to apply Remote working at global level on a voluntary basis and as a flexible organisation improving working conditions. Driven by this aspiration, Remote working is now also in use in Argentina (140 teleworkers), Belgium (68), Brazil (207), China (313), Hungary (14), Italy (83), the Netherlands (109), Poland (102), Romania (22), Spain (137), Slovakia (153), Turkey (12) and the UK (10). It is being launched in Austria, Germany, Malta and Switzerland in 2019.

The "New Momentum for Growth" agreement in France proposes other new, innovative actions. Accordingly, the Group is expanding its Remote working option: three days of Remote working per week on a trial basis, a half day of Remote working combined

with a half day off for part-time employees and Remote working from a location other than the primary place of residence.

The Group is also implementing an innovative quality-of-life improvement at work by creating an annual account of 25 days of remote working. This system offers new flexibility to employees, technicians, administrative employees and managers who do not work in production, and the option to perform their jobs occasionally from their primary residence or another personal residence in France or a third-party location is now available. In 2018, under this pattern, 10,086 employees used at least one day of remote working and a total of 110,000 days have been used for remote working.



#### Impact measurement and economic assessment

A perception survey of 1,675 Group teleworkers and 388 managers measured a 99% satisfaction rate among teleworkers and a 98% satisfaction rate among managers. 90% of teleworkers experienced a positive impact on their efficiency and saw Remote working as a vote of confidence from their manager. Less time spent commuting to and from work is the leading factor of satisfaction mentioned by 80% of teleworkers.

The impact of Remote working on the department's efficiency was seen as neutral by 51% of respondents and as positive by 49% of respondents. This positive rating was up 8 points from the previous survey. 95% of managers would recommend Remote working to another manager; this score had also increased..

### **Maternity, paternity and educational parental leave**

Groupe PSA takes parenthood into account as part of its respect for gender equality in the workplace. By supporting a work environment encouraging employees to return to work after maternity leave, PSA's policy helps employees who are parents to achieve a better work-life balance. It also ensures employees are informed about the various parental leave options, encouraging both mothers and fathers to take advantage of it.

In order to support working parents, a company agreement was signed in June 2014 in France with all trade unions to establish an innovative social cohesion system based on the values of solidarity and mutual assistance. Starting on 1 November 2016, an amendment extended the scheme to spouses, common-law

spouses and partners. Under this agreement, employees can donate days off to parents with a sick child, anonymously and without receiving anything in return. The donated days are banked in a Solidarity Fund created for this purpose and is managed by the workplace social services. This programme has received a strong response: 1,988 days have been donated, 220 days were contributed by the Company and 1,215 days were granted to 83 employees to help them cope with a variety of situations including illness, disability or accidents.

In addition, employees are provided with abundant information on existing rights such as legal provisions, exceptional leave stipulated by company agreements and the action of the workplace social services.

#### **NUMBER OF EMPLOYEES ON MATERNITY, PATERNITY AND EDUCATIONAL PARENTAL LEAVE BY SOCIO-PROFESSIONAL CATEGORY**

(For the year)

	Maternity leave			Paternity leave			Educational parental leave					
	Operators and administrative employees	Technicians and supervisors	Managers	Total	Operators and administrative employees	Technicians and supervisors	Managers	Total	Operators and administrative employees	Technicians and supervisors	Managers	Total
Automotive Division	354	463	253	1,070	1,176	558	349	2,083	304	517	186	1,007
o/w PCD	276	246	184	706	753	220	236	1,209	182	118	69	369
o/w OV	78	217	69	364	423	338	113	874	122	399	117	638
Other Activities	0	3	9	12	0	0	8	8	0	2	6	8
<b>TOTAL</b>	<b>1,524</b>	<b>667</b>	<b>660</b>	<b>2,851</b>	<b>2,225</b>	<b>796</b>	<b>920</b>	<b>3,944</b>	<b>881</b>	<b>676</b>	<b>384</b>	<b>1,941</b>

### **Negotiated work schedules**

#### **SPECIFIC WORK SCHEDULES**

(For the year, not including OV)

		Europe	Rest of the world	Total
<b>Automotive Division</b>	Two shifts	20,297	2,610	22,907
	Three shifts or night work shift	9,981	58	10,039
	Weekend shift	3,890	7	3,897
<b>Other Activities</b>	Two shifts			0
	Three shifts or night work shift			0
	Weekend shift			0

#### **3.4.2.4. Workplace social services for employees**

The main role of social workers is to facilitate job integration by assisting employees dealing with issues in their personal and/or professional life that are having an impact on their occupation. Social services are a place to discuss issues and be listened to. They also provide specialist advice to managers, and help implement the corporate social policy.

**Workplace social services are provided to all employees in France through a network of 20 social workers employed at all office or manufacturing facilities.** These services were added to the Company-owned dealership network all over France. Under the same scheme, social services have now been set up in other countries such as, Morocco. Brazil now employs two social workers at its Porto Real plant and has set up the *Conte Comigo* programme which offers free telephone assistance for employees from other sites.

## 3.5. EQUALITY AND DIVERSITY

GRI.103-2

GRI.103-3

DPEF.14

DPEF.32

DPEF.39

Groupe PSA considers the diversity of its employees and cultures to be a source of added value and economic performance provided that equal opportunity is guaranteed. By encouraging equal opportunity and basing its practice on the objective criteria of skills and performance, Groupe PSA promotes employee commitment and motivation and develops a culture of performance and economic efficiency.

**This societal issue concerns all the countries where Groupe PSA operates.** Groupe PSA has involved all its stakeholders in this commitment by establishing the Global Framework

Agreement on Corporate Social Responsibility, which outlines non-discrimination and equal opportunity rules. As such, all stakeholders are involved in enacting inclusive management, considering skills in access to employment and professional development, recognising merit and preventing all forms of discrimination and intolerance of differences. This agreement states the Group's commitment to fighting racism, xenophobia, sexism and homophobia.

### 3.5.1. Gender equality

DPEF.12

GRI.405-1

GRI.102-8

For the past 15 years, Groupe PSA has adopted a proactive policy to promoting gender diversity and professional equality between men and women. In view of its traditionally male sector of activity, Groupe PSA considers the feminisation of its core businesses and key positions as a fundamental objective of its responsible and sustainable development and of its employees' quality of life at work.

At the end of 2018, the Group designed a new long-term objective for this policy. It is based on gender diversity helping to transform the Company through creativity, performance and development of new businesses in digital activities. This objective is broken down into two indicators and is planned for the medium and long-term as follows:

- gender diversity of top management: 20% by 2021, eliminating under-representation of women in top management and 30% by 2035 for supporting Company transformation;
- feminisation of our recruitment and development of our attractiveness: 30% of our white-collar hires by 2021 by developing a women's friendly employer brand that sends a positive message to women. We are aiming for 50% by 2035 reflect our customer base.

**Groupe PSA signed up to the Women's Empowerment Principles, an initiative of the UN and UN Women which encourages companies to promote the inclusion of women in the workplace and gender equality.** This commitment by the Group attests to the Group's drive to expand its policy of diversity and gender equality in the workplace globally.

Subscribing to the Women's Empowerment Principles offers an internationally - recognised standard that the Group intends to apply to all its companies in all countries. Since subscribing to these principles in 2016, the Group took the initiative to perform an assessment of its practices based on a questionnaire inspired by WE principles at the beginning of 2018. The results from in various countries have made it possible to identify new actions for progress and promote best practices.

The Group analysed issues in their context and profession, and formulated structured action plans centred around four topics:

- gender mix in the business lines;
- human resources processes to guarantee equal opportunities;
- access to higher levels of responsibility for women;
- preventing sexism and gender violence.

The cross-functional management of Group job families and professions (see 3.2.3.) incorporates **objectives of gender diversity and of feminisation of key positions**. Each job family has appointed a female ambassador who promotes gender diversity and creates action plans adapted to her business line.

Human resources policies are designed to foster equal opportunities with particular attention to **equal pay** (see 3.3.3.1 for more details).

Considering that the **presence of women in management positions** is of particular importance to bring about cultural and sustainable change, the indicator of feminisation of senior and executive managers is a key indicator of the Group (see the commitments scoreboard at the beginning of this section and achievements below). Objectives of increasing the feminisation rate is also pursued for other flagship, and more generally the functions of managers, based on action plans to identify talent pools, prepare and support the exercise of responsibilities and promote female role models.

**Groupe PSA has long been committed to fighting sexism and violence against women.** As early as 2006, the Group's Global Framework Agreement on Social Responsibility has firmly demonstrated that the Group has a zero tolerance policy on sexism.

Since since 2006, measures have been taken to support employees who are victims of domestic violence. In Spain, a company agreement signed in 2006 strengthens victim rights and protection measures. In France, since 2007, a system for reporting cases of harassment in the workplace has been in place, which includes a special email address, harclement@mpsa.com, and the appointment of equality and diversity advisers. This system has been supplemented in 2018 by the "Speak4Compliance" whistleblowing system (see 6.1.3.1).

In March 2017, Groupe PSA kicked off a mobilisation campaign to instil a corporate culture that is free from sexism and that safeguards good working relationships between women and men, as well as improving well-being and collective performance. It is the outcome of a task force that includes members of the "Women Engaged for PSA" women's network that has collected testimonials of experiences. This led to the production and release of a film to raise awareness and change behaviours. This action plan also includes an action guide, "Groupe PSA Committed to Fighting Sexism", which provides key information on the realities of sexism, legislation and sanctions, information for victims of and witnesses to sexist behaviour, and encouragement to report any misconduct.

## A recognised commitment

Groupe PSA was the first company to receive the "Gender Equality label" in France in 2005. The renewal of this label on 11 December 2017 marks the Group's long-term commitment and ongoing progress toward gender equality. This label was awarded following an audit conducted by following an audit on several sites conducted by the AFNOR certification firm and then certification of several sites and then a review by a joint labour Management Committee meeting under the authority of the French Ministry for Women's Rights. In Spain, Groupe PSA was awarded the Equality label from the Ministry for Social Affairs and Equality in 2013 and for its commercial subsidiaries in 2015.

## Women networking with Women Engaged for PSA (WEP)

This network acts as a think tank that contributes to business issues and helps the women members of the network to be actors of tomorrow's Groupe PSA in key management or expertise positions. WEP contributes to the cultural change of the Company thanks to its initiative and empowerment-based operation. Created in 2010, WEP reached important milestones in its development in 2018: the network now has 400 members and 100 "WEP partners", who are men and women committed to supporting the network's actions. It is active in 18 countries and 23 departments and has 200 members outside France. It has started joint activities with OPEL and VAUXHALL women's networks: Women@OPEL, Women's Council VAUXHALL, and OPEL bank Women's Inspiration Network.

### PERCENTAGE OF FEMALE EMPLOYEES ON PERMANENT OR FIXED-TERM CONTRACTS BY SOCIO-PROFESSIONAL CATEGORY DPEF.1.b

(For the year)

	Operators and administrative employees	Technicians and supervisors	Managers	Total
<b>(PCD + OV)</b>	<b>13.4%</b>	<b>25.0%</b>	<b>19.0%</b>	<b>17.1%</b>
Automotive Division	o/w PCD	16.4%	24.8%	20.3%
	o/w OV	7.0%	25.6%	14.9%
Other Activities		51.0%	71.1%	44.6%
<b>TOTAL</b>	<b>13.5%</b>	<b>25.1%</b>	<b>19.8%</b>	<b>17.3%</b>

### CHANGE IN THE PERCENTAGE OF WOMEN EMPLOYEES ON PERMANENT AND FIXED-TERM CONTRACTS DPEF.1.b

(For the year)

% women in the workforce	2016	2017	2018
<b>TOTAL</b>	<b>18.6%</b>	<b>18.9%</b>	<b>17.3%</b>

### EMPLOYEES ON PERMANENT OR FIXED-TERM CONTRACTS BY GENDER AND REGION DPEF.1.b DPEF.1.d

(For the year)

	Europe		Rest of the world		Total	
	Women	Men	Women	Men	Women	Men
Automotive Division	18,746	91,335	1,336	5,916	20,082	97,251
o/w PCD	14,594	61,308	1,321	5,859	15,915	67,167
o/w OV	4,152	30,027	15	57	4,167	30,084
Other Activities	380	405	0	11	380	416
<b>TOTAL</b>	<b>19,126</b>	<b>91,740</b>	<b>1,336</b>	<b>5,927</b>	<b>20,462</b>	<b>97,667</b>

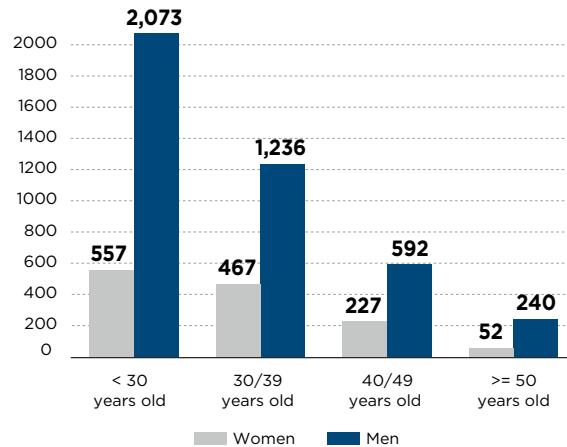
### EMPLOYEES ON PERMANENT OR FIXED-TERM CONTRACTS BY AGE GROUP AND GENDER DPEF.1b DPEF.1c

(For the year)

	< 30 years old		30-39 years old		40-49 years old		50 years and over		Total	
	Women	Men	Women	Men	Women	Men	Women	Men	Women	Men
Automotive Division	2,901	10,003	5,289	18,638	6,354	30,356	5,538	38,254	20,082	97,251
o/w PCD	2,303	6,796	4,016	13,775	5,318	23,244	4,278	23,352	15,915	67,167
o/w OV	598	3,207	1,273	4,863	1,036	7,112	1,260	14,902	4,167	30,084
Other Activities	47	41	82	80	137	165	114	130	380	416
<b>TOTAL</b>	<b>2,948</b>	<b>10,044</b>	<b>5,371</b>	<b>18,718</b>	<b>6,491</b>	<b>30,521</b>	<b>5,652</b>	<b>38,384</b>	<b>20,462</b>	<b>97,667</b>

## HIRINGS WITH PERMANENT CONTRACTS BY AGE GROUP AND GENDER

(For the year)



Women represented 24% of permanent contract hirings in 2018 with all socio-professional categories combined.

## PERCENTAGE OF WOMEN MANAGERS ON PERMANENT OR FIXED-TERM CONTRACTS BY AGE GROUP

(For the year) DPEF.14

	< 30 years old	30-39 years old	40-49 years old	50 years and over	Total
Number of women managers	275	1,196	1,853	1,182	4,506
Total number of managers	818	4,232	8,752	8,990	22,792
% of women managers	33.6%	28.3%	21.2%	13.1%	19.8%

## EVOLUTION

	2016	2017	2018
% of women in the managerial workforce	20.1%	20.8%	19.8%

# 20%

of group managers were women, i.e.,  
a higher rate than the total percentage  
of women in the Company

## SENIOR AND EXECUTIVE MANAGERS BY AGE GROUP AND GENDER

(For the year. Scope includes all executives managed by Groupe PSA, all companies combined. Does not include ExCom members or OV Board members)

	30-39 years old		40-49 years old		50 years and over		Total	
	Men	Women	Men	Women	Men	Women	Men	Women
<b>TOTAL</b>	<b>7</b>	<b>7</b>	<b>230</b>	<b>63</b>	<b>420</b>	<b>49</b>	<b>657</b>	<b>119</b>
o/w PCD	5	6	188	62	341	40	534	108
o/w OV	2	1	42	1	79	9	123	11

The table includes "executive managers" in charge of designing and implementing Group strategy, policies and programmes, and "senior managers" in charge of rolling them out. It does not include

members of the Executive Committee. In 2018, the proportion of female senior and executive managers was 15.3%, which demonstrates progress in the whole scope of the Group, including OV.

### 3.5.2. Promoting diversity for social cohesion and performance

GRI.405-1 GRI.406-1 DPEF.14 DPEF.39

107  
nationalities within Groupe PSA

Groupe PSA voluntarily formalised its actions in favour of diversity in its social dialogue. On an international scale, the Group's Global Framework Agreement on Social Responsibility is committed to exceeding local legal requirements in applying and promoting the fight against racism, sexism, xenophobia and homophobia and, more generally, against intolerance of differences and ensuring respect for privacy.

**An agreement on diversity and social cohesion concluded in France** reaffirms the Group's commitment to ensure equal treatment using objective criteria such as skills and performance, to combat prejudice and to prevent direct or indirect, conscious or unconscious discrimination, particularly with regard to the real or supposed origins of people.

**Groupe PSA is diversifying its hiring channels and is building partnerships with education systems and public employment services, developing online job offers and using social media to reach a wider public.** It also works to ensure that no stages in the hiring process are discriminatory. A best practice guide is given to recruiters and a service agreement that sets out the assessment procedures is concluded with line managers involved in recruitment. Candidates are selected objectively using tools such as the skill-based and simulation-based recruitment method (MRS).

Groupe PSA supports public policies in favour of diversity. The Group was one of the first French companies to be awarded the Diversity label in recognition of the Group's human resources policy and best practices in promoting diversity and equal opportunity and preventing discrimination. Since obtaining this label in 2009, Groupe PSA has maintained its commitment and obtained this label again in 2012 and February 2018. This label is awarded after a demanding certification process conducted by AFNOR Certification via an on-site audit. Similarly, in Spain, since 2009 the Group has held the *Diversidad* label, which was started by the Diversity Foundation with the support of the Spanish Ministry of Equality, and this label was renewed in 2012 and 2015.

 Groupe PSA is recognised for its equal opportunity and diversity commitments: <https://media.groupe-psa.com/en/groupe-psa-recognised-its-equal-opportunity-and-diversity-commitments>

### Preventing workplace harassment, discrimination and violence

DPEF.6 DPEF.10

**The Group condemns all infringements of respect for individual rights and dignity, verbal or physical abuse, harassment, workplace violence and discrimination.** These behaviours are liable to sanctions and measures have been set in every country to prevent any form of misconduct. Employees are regularly informed about these policies and a large number of managers have participated in awareness-raising campaigns.

An e-learning module provided to Group employees uses interactive role-playing exercises to help employees describe and identify psychological harassment, detect at-risk situations, and prevent and manage harassment situations. More than 6,000 people have taken this e-learning module.

Employees who are victims of or witnesses to workplace harassment, discrimination or bullying are informed of existing reporting procedures. This information specifies that the report allows for an investigation to be conducted, victims to be protected, the prohibited wrongdoing to be stopped and mediation or sanctions to be carried out. Employees can use different reporting channels. HR managers have a duty to take charge of any situation that appears to be harassment or discrimination. **A standard processing and tracking procedure is applicable in all countries.**

Two e-mail addresses, harcelement@mpsa.com and diversite@mpsa.com, provide a means of reporting harassment or discrimination.

In addition, Speak4Compliance (see 6.1.3.1.), rolled out in 2018, is a whistleblowing system that enables reports regarding violations of the compliance rules of Groupe PSA to be received, processed and managed securely and confidentially. One category of reporting concerns non-respect and infringement of the rights and dignity of people, as well as verbal or physical abuse and harassment.

Each report triggers an internal investigation conducted in the best conditions of neutrality and respect for people in order to check and qualify facts. In 2018, 81 cases of workplace harassment, discrimination or violence were processed.

## Intergenerational management

Keeping older employees (37.3% of the Group's workforce is aged 50 or over) in work and motivated is one of the Group's Corporate Social Responsibility commitments. The aim is to ensure equal opportunity and fair treatment for all, including older employees. **The measures included in the PSA intergenerational contract seek to consolidate the place of older employees in the Company, to better consider their experience as an advantage for the Group's success and to consider generation's coexistence and knowledge transfer as an asset for social cohesion and business performance.**

In addition, the programme to bring young people into the workforce is enriched by knowledge transfer and training of the younger generations. In 2018, as part of its programme, the Group welcomed 2,904 work-study programme participants (skills-acquisition and apprenticeship contracts) and 3,114 interns.

### 3.5.3. Employing people with disabilities

DPEF.13

GRI.405-1

The Group has 6,405 employees with disabilities worldwide. Recognition of disability is written into local laws. 77% of employees with disabilities are operators and administrative employees, 17% are technicians and supervisors and 5% are managers.

**6,405**  
 employees with disabilities in the Group

Six successive agreements have been signed since 2000 to support the Group's efforts regarding social and occupational inclusion of people with disabilities. This policy is enacted worldwide through the Global Framework Agreement with the goal of keeping workers with disabilities employed, carrying out preventive actions and promoting their integration into the workplace. Taking such an approach benefits everyone as well as the Company's performance.

As a result of its efforts, Groupe PSA now has a **7.4% employment rate of people with disabilities in the Automotive Division in France**, more than the legal requirement of 6%. This rate jumps to 10.4% when purchasing from sheltered workshops is factored in.

In France, Groupe PSA signed the sixth agreement on social and occupational inclusion of people with disabilities on 21 February 2017, confirming its motivation to step up its commitments in this area.

The agreement is structured around four main areas of application:

- changing how we look at disability by raising awareness among employees throughout the year and by reinforcing the training of managers and trainers;

- promoting recognition of the status of workers with disabilities, by offering subsidies and guarantees to employees with disabilities in their personal and professional lives;
- taking action to integrate and retain employees with disabilities and maintain them in their jobs by supporting them and providing adjusted work solutions or specially adapted workstations;
- mobilising all those involved in coordinated management by improving awareness of the agreement and of measures in favour of the workers concerned (local disability correspondent, social service, medical service, human resources function, management, employee representatives and employees) and by setting up preventive measures.

In France, expenditure on integrating staff with disabilities was €2.2 million. Accessibility assessments provide site inventories at all facilities and undertake priority investment actions.

"Disability Week" and other events related to disability provide a forum for raising awareness toward the Group's disability policy.

Subcontracting with sheltered workshops is one aspect of the Group's agreement for the social and occupational inclusion of people with disabilities. This Group engagement with sheltered workshops for direct parts (e.g., instrument panels, interior trim, pedals, etc.) is a policy that dates back to more than 20 years ago, and has put Groupe PSA in the position of being the top purchaser from sheltered workshops in France, with added value in 2018 of €49.8 million for these businesses which represents 2,444 persons employed, mainly in industry (see 4.2.1.2). 100% of the cars built in Europe by Groupe PSA therefore have at least one part manufactured by the adapted and sheltered sector.

**EMPLOYEES WITH DISABILITIES**  
(For the year)

		Europe	Rest of the world	Total
<b>Automotive Division</b>	<b>(PCD + OV) 2018</b>	<b>6,383</b>	<b>5</b>	<b>6,388</b>
	o/w OV 2018	1,656	3	1,659
	o/w PCD 2018	4,727	2	4,729
	(PCD) 2017	5,096	26	5,122
<b>Other Activities</b>	(PCD) 2016	5,359	4	5,363
	<b>2018</b>	<b>17</b>	<b>0</b>	<b>17</b>
	2017	14	0	14
	2016	12	0	12
<b>TOTAL</b>	<b>2018</b>	<b>6,400</b>	<b>5</b>	<b>6,405</b>
	2017	5,110	0	5,136
	2016	5,371	4	5,375

## 3.6. REPORTING SCOPE AND METHODOLOGY

GRI.102-48 GRI.102-49 DPEF.32 DPEF.39

The employee-related indicators were produced for the subsidiaries as defined by Article L. 233-1 of the French Commercial Code and the companies controlled by the Group within the meaning of Article L. 233-3 of the French Commercial Code and assessed on 31 December 2018. The workforce of the joint ventures accounted for using the equity method are not consolidated within the Group scope due to a lack of exclusive control.

"PCD Automotive Division" consists of PEUGEOT CITROËN DS automotive activities (including PSA Automobiles SA) and PCD automotive retail activities. "OV Automotive Division" comprises the OPEL and VAUXHALL companies.

The "Other Activities" include the Peugeot S.A. holding company and BANQUE PSA FINANCE (BPF). The joint ventures of the partnership between BANQUE PSA FINANCE and Santander Consumer Finance are not consolidated within the Group scope due to the absence of exclusive control.

"Europe" refers to geographical Europe, including EU and non-EU countries, and includes Russia.

The social reporting process involves over 240 contributors from all subsidiaries in 29 countries, using interactive applications to compile data, and is led by a dedicated corporate team.

The definitions of calculation rules or reference conventions used are international standards. A reference guide of technical data sheets specifying the definitions and calculation procedures is used by the reporting contributors to ensure the quality and consistency of the consolidated information.

Employees reported are on permanent or fixed-term registered contracts. The fixed-term contracts include apprenticeship contracts, skill-acquisition contracts and CIFRE PhDs student contracts.

The manager's category includes engineers and managers with a job description similar to so-called "cadres" in France.

Whenever the document refers to a policy, this applies to all Group companies. In particular, this applies to the following topics: the workplace health and safety policy; the human resources development policy, including training; the employee relations policy including social dialogue and measures taken to improve gender equality and anti-discrimination. When there is additional information that might apply to only one company, this is specified. Where it is not, the information should be understood as applying to PSA Automobiles SA.



## NO COMPROMISE ON HUMAN RIGHTS AND ENVIRONMENT IN THE SUPPLY CHAIN

Managing social, environmental and ethical impacts in the supply chain is a priority for Groupe PSA, given its expansion in emerging countries. Hence suppliers selection is based on a third party CSR assessment, and their ability to ensure the CSR performance of their own supply chain.



4.

# RESPONSIBLE SUPPLY CHAIN MANAGEMENT

GRI.102-15 GRI.103-1

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The Purchasing Department was a leader in merging the former independent purchasing departments of PCD and OV into one, new and integrated organisation. The merged department is responsible for the whole Group, including all five vehicle brands globally. The aim was to have one responsibility, regardless of whether the resource is located at an OV site or a PCD site. This truly ensures that the department uses the same, common processes and has one voice towards its suppliers and stakeholders.

 "Groupe PSA will enhance purchasing performance by setting up a new joint Purchasing organisation"  
15/12/2017 press release: <https://media.groupe-psa.com/en/groupe-psa-will-enhance-purchasing-performance-by-setting-up-a-new-joint-purchasing-organization>

A materiality analysis carried out by the Group (as described in section 1.2.2) highlights the following three CSR priorities as being the most pertinent and substantial for the Purchasing Department.

- **"Human rights in the supply chain"** SASB440a.1

Managing social, societal and ethical impacts in the supply chain is a core priority for Groupe PSA, given its extensive international expansion primarily in emerging countries. The Group ensures that the standards defined by supranational bodies (International Labour organisation, Global Compact, ISO 26000, ISO 20400, ISO 14021, UK Modern Slavery Act, REACH, US regulations and the European Directive on conflict minerals, human rights, ethical principles, etc.) are fully integrated into the Company's internal processes to effectively manage not only the risks incurred by the Company, but also risks to stakeholders arising from the Company's business activities, for the entire subcontracting chain.

The Group must therefore ensure that forced or compulsory labour and child labour is not tolerated and forbidden throughout the entire supply chain, including raw materials suppliers, and ensure that its suppliers also comply with these international principles.

Expectations from stakeholders are growing. Nowadays, stakeholders expect to be informed about the production conditions and origin of the products that they buy. It is therefore crucial that the Group is able to prove that there is transparency throughout the supply chain, regardless of how difficult this is to implement.

A failure to comply with social, societal and ethical standards in the supply chain could have severe negative impacts on the Group. Its economic performance would be exposed to three core risks:

- major damage to its reputation which may reduce its revenue and pricing power;
- cost of inadequate quality and potential supply disruptions;
- remediation costs.

Consequently, Groupe PSA must put in place all necessary preventive measures proportionate to the risks involved to produce vehicles which comply with social and ethical standards (OECD Guiding Principles) and meet all customer expectations.

These points are detailed in section 4.2.

- **"Local sourcing development in host territories"**

It is crucial to boost local production in order to support the Group's increasing internationalisation and to reduce inequality in terms of economic development in host communities. In order to achieve this, the Group is implementing measures in two separate areas: first, it identifies local suppliers and helps them to gain the skills that they need, and second it encourages its existing suppliers to relocate to clusters near to its facilities.

Doing so will reduce long distance shipping of parts.

This strategy has major financial implications:

- it reduces inbound logistics costs (€138 per vehicle in Russia and €19 per vehicle in Latin America);
- it limits customs duties (e.g. 35% of the production cost of a vehicle imported into Latin America);
- it reduces exposure to exchange rate fluctuations which impact production cost, margins and sales volumes.

Local sourcing also provides the Group with:

- increased knowledge of the expectations of local stakeholders;
- the option to find technological solutions which fit local context and constraints in the best way;
- operational proximity to its partners, enabling it to help them achieve technological, logistical, social and environmental progress;
- increased supply chain flexibility.

These points are detailed in section 4.1.

- **"Environmental performance in the supply chain: purchasing and logistics"**

One of the priorities for Groupe PSA is to reduce its carbon footprint. The Purchasing Department involves suppliers in the Group's approach to reducing CO<sub>2</sub> emissions in the supply chain. One example is the emissions produced by its suppliers for the production of goods and services purchased by the Group.

The Purchasing Department's strategy to reduce GHG (greenhouse gas) emissions in its entire supply chain consists of:

- selecting suppliers according to environmental criteria such as the ISO 14001 certification, or their capacity to develop products which incorporate green or recycled materials;
- collecting a status report from its major suppliers on their current and future CO<sub>2</sub> emissions and implementing a reduction plan.

Section 4.2.1.1 covers environmental issues related to purchasing. The carbon impact of logistics is addressed in section 5.2.5.

Faced with these challenges, Groupe PSA has set up the following systems.

## COMMITMENTS SCOREBOARD

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Human rights and business ethics violation</b> 	<b>Human rights in the supply chain</b> Organiser: Head of Purchasing	<b>By 2035</b> <ul style="list-style-type: none"> <li>Select suppliers based on their compliance with the Group's human rights requirements and their ability to ensure the compliance and transparency of their own supply chain to achieve an average supplier score of 50/100 on human rights (assessment by EcoVadis).</li> <li>As soon as a breach of fundamental human rights is identified by Groupe PSA, the supplier will be excluded from the supply base.</li> </ul>	<ul style="list-style-type: none"> <li>Increase the average social score for suppliers referenced by the Group from 48.8/100 in 2017 (PCD scope) to 49/100 in 2018 (Groupe PSA scope).</li> <li>Implement CSR processes for OV suppliers and purchasing teams, and boost PCD indirect suppliers in CSR implementation.</li> <li>Involve the Group in an international responsible mineral supply initiative.</li> </ul>	<p><b>Target partially met</b></p> <p><b>Target not met</b></p> <ul style="list-style-type: none"> <li>2018 average social score for suppliers referenced by the Group for overall CSR performance improved vs. 2017: 48.9/100 but below 2018 target of 49/100.</li> </ul> <p><b>Target met</b></p> <ul style="list-style-type: none"> <li>CSR processes for OV suppliers and purchasing teams fully implemented; plan launched to boost indirect suppliers in CSR implementation in place.</li> </ul> <p><b>Target met</b></p> <ul style="list-style-type: none"> <li>Groupe PSA joined the Responsible Mineral Initiative (RMI).</li> </ul>	<ul style="list-style-type: none"> <li>Increase the average social score for all suppliers to 49/100.</li> <li>Determine the 30 most critical raw materials and develop a raw material cartography for these Materials specifically considering human rights.</li> <li>Maintain Ecovadis CSR assessment for at least 93%<sup>(1)</sup> of direct material suppliers and extend scope for indirect suppliers to 60%<sup>(1)</sup>.</li> </ul>
<b>Unbalanced economics development of territories</b> 	<b>Local sourcing development in host territories</b> Organiser: Head of Purchasing	<b>By 2035</b> <p>In each host territory, implement conditions to ensure that local sourcing via an ecosystem (suppliers, research laboratories, training centres, etc.) allowing in-depth integration: creation of direct and indirect jobs, skill improvement, infrastructure development and value creation for a territory local sourcing rate of:</p> <ul style="list-style-type: none"> <li>70% in Russia;</li> <li>80% in Latin America.</li> </ul>	Achieve a local sourcing rate of: <ul style="list-style-type: none"> <li>40% in Russia;</li> <li>58.3% in Latin America.</li> </ul>	<p><b>Target not met</b></p> <p>2018 local sourcing rates are:</p> <ul style="list-style-type: none"> <li>33.5% in Russia vs. 40% expected;</li> <li>57.5% in Latin America vs. 58.3% expected.</li> </ul>	Achieve a local sourcing rate of: <ul style="list-style-type: none"> <li>35% in Russia;</li> <li>58.6% in Latin America;</li> <li>55% in Morocco.</li> </ul>

(1) % is evaluated on related annual purchasing amount

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Climate change</b> 	<b>Environmental performance in the supply chain: purchasing and logistics</b> Organiser: Industrial Director and Head of Purchasing	<p><b>By 2035</b></p> <p><u>Purchasing</u></p> <p>Systematically involve suppliers to meet the Group's environmental objectives by selecting them:</p> <ul style="list-style-type: none"> <li>• based on their compliance with the Group's environmental requirements (including a compliance and transparency guarantee for their own supply chain) to achieve an average supplier score of 50/100 on environmental dimension (assessment by EcoVadis);</li> <li>• for key partners and key suppliers (including logistic suppliers) <ul style="list-style-type: none"> <li>• based on their CO<sub>2</sub> trends in compliance with the Paris Agreement (COP21),</li> <li>• based on their suggestions to enable the Group to meet its circular economy targets (green or replacement materials and recyclability).</li> </ul> </li> </ul> <p><u>Logistics</u></p> <p>reduce CO<sub>2</sub> emissions for each vehicle transported by 33% between 2016 and 2035 (i.e. -2.1% per year, in line with the Paris Agreement), primarily by limiting intercontinental flows through the regionalisation of the Group's activities and by optimising transport patterns (routes, transportation mode, filling rate and packaging).</p>	<p><b>Purchasing</b></p> <ul style="list-style-type: none"> <li>• Increase the average environmental score for suppliers referenced by the Group from 53.5/100 in 2017 (PCD scope) to 54/100 in 2018 (Groupe PSA scope).</li> <li>• 60% of key partners and key suppliers must demonstrate a CO<sub>2</sub> trend which complies with the Paris Agreement.</li> <li>• Implement CSR processes for OV suppliers and purchasing teams, and boost Groupe PSA indirect suppliers in CSR implementation.</li> </ul> <p><b>Logistics</b></p> <p>Logistics KPIs are presented in the scoreboard in the introduction to section 5.</p>	<p><b>Purchasing</b></p> <p><b>Target partially met</b></p> <ul style="list-style-type: none"> <li>• Average environmental score for suppliers referenced by the Group: 52.2/100 vs. 54/100 expected (inclusion of OV and new rated suppliers in India, AMLAT and China).</li> </ul> <p><b>Target met</b></p> <ul style="list-style-type: none"> <li>• 61% of key partners and key suppliers in direct material demonstrate a CO<sub>2</sub> trend that complies with the Paris Agreement.</li> </ul> <p><b>Logistics</b></p> <p>Logistics KPIs are presented in the scoreboard in the introduction to section 5.</p>	<p><b>Purchasing</b></p> <ul style="list-style-type: none"> <li>• Improve the average environmental score for all suppliers to 54/100;</li> <li>• 70% of key partners and key suppliers must demonstrate a CO<sub>2</sub> trend which complies with the Paris Agreement.</li> </ul> <p><b>Logistics</b></p> <p>Logistics KPIs are presented in the scoreboard in the introduction to section 5.</p>

(1) % is evaluated on related annual purchasing amount



## 4.0. JOINT INNOVATION WITH SUPPLIERS TO PREPARE FOR THE MOBILITY OF THE FUTURE

**The Purchasing Department views the innovation process as preparing with its suppliers for a more sustainable, connected and appealing mobility of the future, as well as contributing to the development of the countries in which the Group is based.**

In order to meet new environmental and automotive safety regulations and anticipate customers' future expectations, in 2018 Groupe PSA selected again 20 suppliers for innovation contracts. All in all, Groupe PSA works with 300-400 suppliers on future technologies. Main areas of innovation are: autonomous vehicle, driver assistance technologies and energy transfer (for electric vehicles of the future).

The Purchasing Department also encourages its suppliers to share their innovations with Groupe PSA by organising "Supplier Innovation Days". These events provide the opportunity for suppliers to present their new products, their existing portfolio and their know-how to buyers, engineers, stylists, etc. In 2018, seven Supplier Innovation Days were held at Vélizy Technical Center with suppliers of all sizes and different part ranges. Between 200 and 500 Group employees attended each of these days, which boasted an extremely high supplier satisfaction rate (up to 90%). After each of these days, a portfolio of the innovations which best fit the Group's strategy is shared with the Group's technical teams and the supplier, thereby improving future collaboration.

## 4.1. SUPPLIERS: MAJOR LINKS IN THE VALUE CREATION CHAIN

Purchasing is crucial to the Group's international development and to its integration in the industrial ecosystems of the countries where it operates.

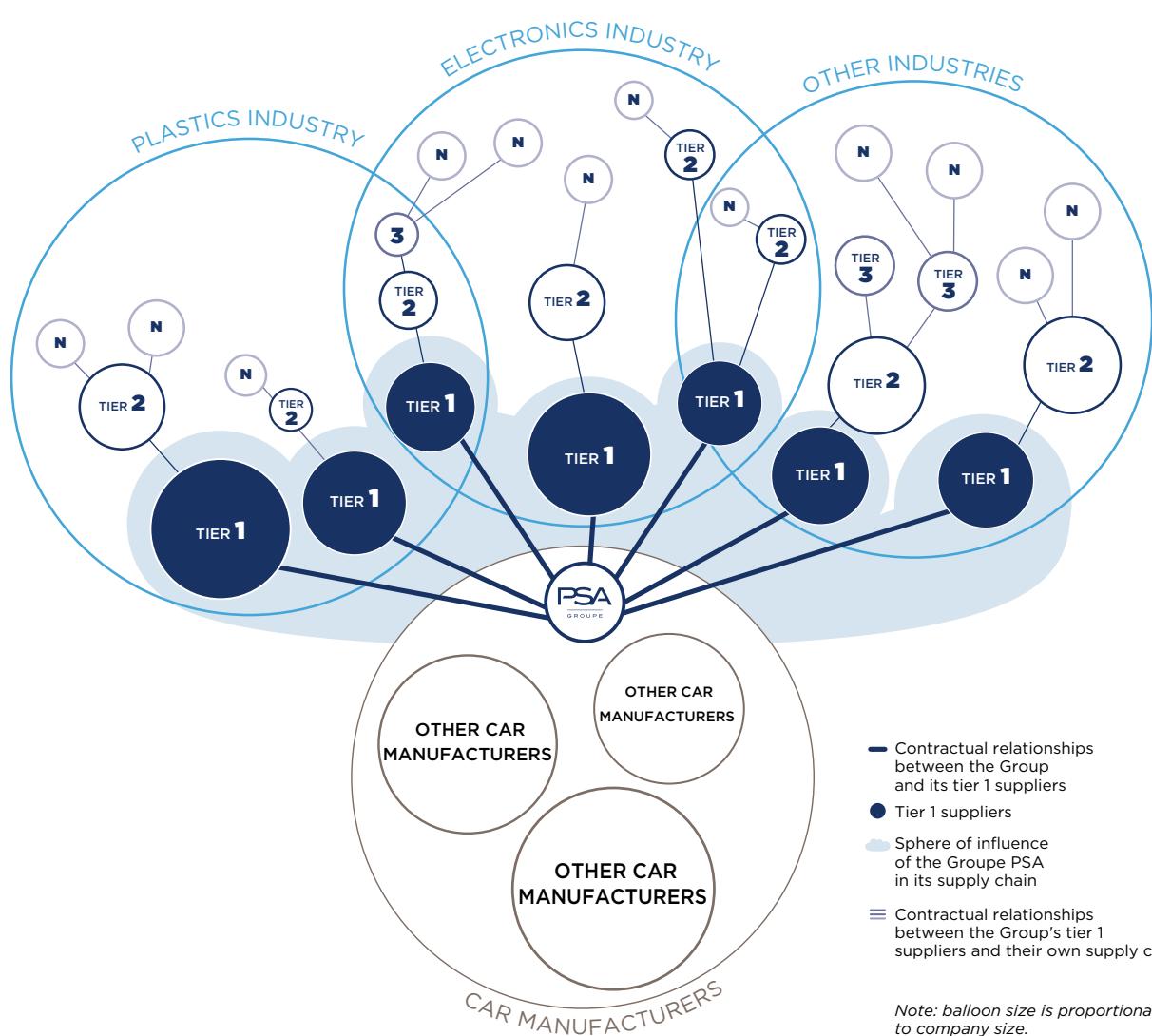
Groupe PSA has a direct contractual relationship with more than 8,000 tier-1 suppliers. It requires all of them to meet the CSR commitments set out in its responsible purchasing policy (see 4.2.2.2). By signing the Group's CSR Charter, tier-1 suppliers agree to choose their subcontractors (tier-2 to tier N suppliers for the Group) based on the same CSR criteria. The CSR criteria must be confirmed at each level of the subcontracting chain as part of the direct contractual relationship between those parties.

**Responsibility for managing the supply chain rests upon each actor of the supply chain. However, given the emerging CSR issues (on the origin of raw materials, human rights, etc.), Groupe PSA conducts targeted audits where risks are identified. The Group is vigilant and implements tailored measures within its sphere of influence.**

## Groupe PSA sphere of influence in its supply chain

In 2017, Groupe PSA was the 9<sup>th</sup> largest global car manufacturer by revenue (in % of net revenue). Partners supplying to Groupe PSA range from the largest global automotive suppliers down to small and medium enterprises in areas as diverse as electronics, plastics and casting. The Group's sphere of influence is proportional

to the revenue it represents for its suppliers, which very often work either with other car manufacturers, or with other major economic actors in other key sectors such as electronics, plastics and casting.



### 4.1.1. The Group's supply chain DPEF.35 GRI.102-9 GRI.102-10

#### Characteristics of Groupe PSA supply chain

All actors involved in the manufacturing and sale of the Group's products and services compose the supply chain. It relies on the flow of goods and information, from the lowest tier supplier to the end customer, with the aim of delivering the right product (parts, vehicles or spare parts) to the right place at the right time with outstanding quality and, in doing so, also improving inventory, cost, risk and customer satisfaction.

The Group's supply chain has two distinguishing features:

- it is complex and involves a large number of different actors, starting from receiving a customer order up to the delivery of vehicles, parts or services;
- it must handle a wide diversity of possible combinations, and relies on its ability to successfully supply millions of different component combinations every day.

The Group has chosen to sub-contract its operational logistic to the supplier GEFCO.

## KEY SUPPLY CHAIN FIGURES



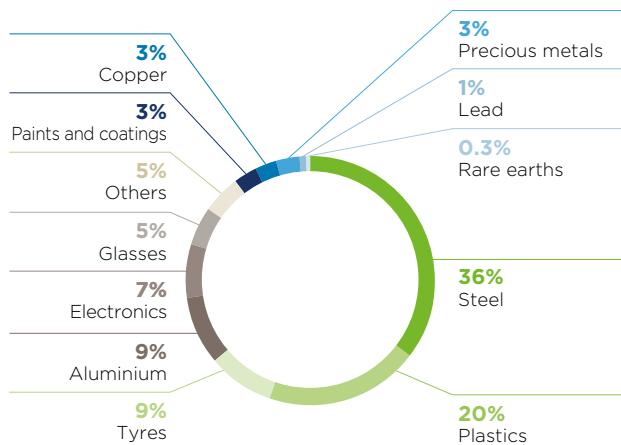
## Type of purchases

The Group's purchases include:

- direct parts (76% of the total value of purchases), of which:
  - vehicle direct parts and subassemblies (of which 22% corresponds to materials included in the price of parts);
  - raw material purchases (13% of the total value of purchases);
 The direct parts purchased represent more than 75% of a vehicle's production cost;
- spare parts and accessories (4% of the total value of purchases);
- indirect Machinery & Equipment: overhead costs, services, commercial facilities, competition, IT and telecoms (20% of the total value of purchases).

more than **75%**  
of a vehicle's production cost  
= value of direct parts purchased

## DISTRIBUTION OF THE VALUE OF TOTAL PURCHASES BY MATERIAL PURCHASED



## WORLDWIDE PURCHASES BY MANUFACTURING REGION IN 2018

(in million euros)	Europe	Latin America	Eurasia	Middle East and Africa	China	Total
Direct parts	30,776	549	133	81	68	31,607
Spare parts	1,830	32	-	-	-	1,830
Indirect machinery and equipment	7,549	179	27	35	425	8,215
<b>TOTAL</b>	<b>40,155</b>	<b>728</b>	<b>160</b>	<b>116</b>	<b>493</b>	<b>41,651</b>

Purchases by the Group's Automotive Divisions in 2018 totalled €41 billion, i.e. 55% of the Group's revenue. Until 1 January 2019, purchases of direct automotive parts worldwide were supplied from 822 supplier groups delivering products out of more than 5,200 facilities globally.

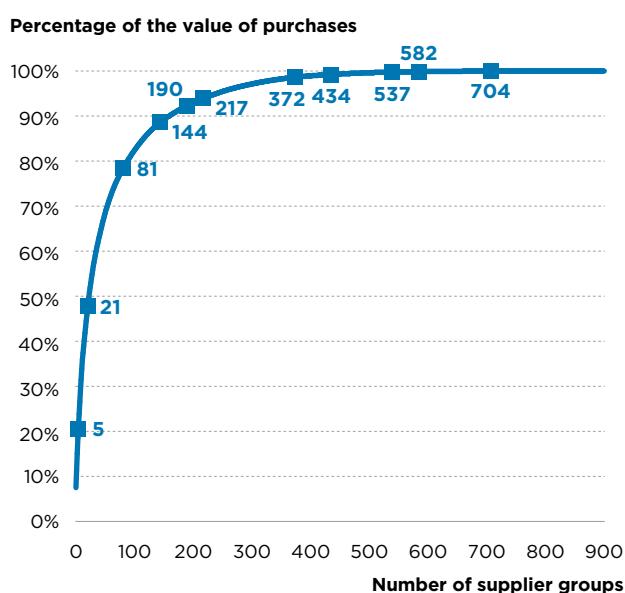
## Groupe PSA suppliers

The Purchasing Department relies on a "win-win" approach with all of its suppliers. The objective is to pool know-how of each partner and establish a long-term relationship, to enable mutual ongoing development. With this approach the Group aims to partner with suppliers having a strong financial structure and capacity for innovation, which can help further the Group's development, especially internationally.

The Group has a contractual relationship with more than 8,000 suppliers, helping to create value in 13 areas, including:

- innovation;
- optimisation of industrial capacity;
- optimisation of processes and development costs to avoid redundant R&D expenditure between the Group and its supplier;
- improving control of tier-2 suppliers to better take account of the supply risks inherent in the multi-layered subcontracting chain.

## CONCENTRATION OF DIRECT MATERIAL PURCHASES AMONG A SMALL NUMBER OF SUPPLIERS



90 %

of direct material and spare parts turnover is realised by 146 supplier groups, representing 17.8% of all supplier groups

In 2018, 22 supplier groups accounted for more than 50% of the Group's direct material purchases (Aisin Seiki Co. Ltd, Arcelor Mittal, Benteler International AG, Compagnie Générale des Établissements Michelin, Continental AG, Denso Corp., DPH Holdings Corporation (Delphi), FAURECIA, Gestamp Automocion SA, Johnson Controls Inc., Jtekt Corporation, Lear Corporation, Leoni AG, Magna International Inc., Magneti Marelli SpA, Mahle Stiftung, Plastic Omnium, Robert Bosch GmbH, Total SA, Valeo, Yazaki Corp. and ZF (Zeppelin-Stiftung).

Groupe PSA relies on individual supplier relationships to improve performance (see 4.2.2.3). It has put a supplier classification in place, which categorises its entire supplier base into 3 groups as described below.

In value terms, purchases are concentrated among a small number of supplier groups. 80% of turnover is made with only 81 supplier groups, out of the 822 listed for direct and spare parts.

## SUPPLIER CLASSIFICATION

	Key partners	Key suppliers	Other suppliers
<b>Geographical location</b>	Worldwide based supplier, able to accompany Groupe PSA anywhere in the world	Key supplier in one or more regions	N/A
<b>Technical expertise</b>	Technical expertise in several product groups identified as strategic for the Group's future developments and strategies	Supplier committed to the automotive industry for the long-term (significant investment in resources and R&D) across its entire scope	N/A
<b>Nature of the relationship between the Group and its suppliers:</b>	Essential relationship or interdependence on one or more groups of strategic components that the supplier develops and produces for Groupe PSA	Close relationship with a group of components that the supplier develops and produces for Groupe PSA	N/A
<b>Know-how and Innovation</b>	World-class expertise or know-how with a disruptive innovation strategy shared with or developed in partnership with Groupe PSA	Valued and recognised technical expertise by the Group to meet the expected level of quality	N/A
<b>CSR performance</b>	Set an example by obtaining a minimum overall score of 50/100 in the third-party CSR assessment, with a score of 50/100 for "subcontractor management"	To satisfy CSR requirements, suppliers are asked to set an example by obtaining a minimum overall score of 45/100 in the third-party CSR assessment, with a score of 50/100 for "subcontractor management"	To satisfy CSR requirements, suppliers are asked to obtain or commit to obtaining a minimum overall score of 45/100 in the third-party CSR assessment
<b>Handling subcontractors</b>	Commit to introducing active monitoring of their own supply chain from tier 1 down to tier N in four areas: environment, social, ethics and handling subcontractors		
<b>Reporting requirements</b>	Disclose the composition of parts covered by REACH legislation on chemicals. Identify and disclose the origin of the minerals used, particularly those from conflict zones (including tungsten, tantalum, tin and gold)		
<b>Governance of the supplier relationship</b>	Managed at the highest level of the Group and its suppliers as part of partner business reviews (PBRs)	Managed as part of supplier business reviews (SBRs)	Coordinated via performance reviews
<b>Number</b>	12	50	+8,000

In 2018, key partners and key suppliers for direct material represented almost 58% of turnover. Partner business reviews (PBRs) and Supplier business reviews (SBRs) for these suppliers are aimed at sharing and aligning strategies at the highest level of both companies. The objectives are to identify mutually beneficial value creation initiatives.



## STAKEHOLDERS DIALOGUE

### **Creation of a “Supplier Think Tank”**

In 2016, the Group set up a Supplier Think Tank to involve suppliers in the improvement of its processes in all areas of the relationship (logistics, quality, competitiveness and innovation). This decision was based on the results of the satisfaction survey conducted by the Group, as well as supplier perceptions shared during various governance reviews (partner business review and supplier business review). Seven suppliers were selected to participate in these working groups for a period of three years, in accordance with compliance rules.

### **CSR within the French automotive industry**

Groupe PSA has signed the second joint CSR Charter for the automotive sector, via the French government's automotive industry platform (PFA) and the French Car Manufacturers' Committee (CCFA). In 2016, this charter was based around six main CSR components, which are: human rights; labour rights; social responsibility; the environment; ethical conduct and anti-corruption. The purpose of the charter is to formally set out the industry's responsibilities and to foster a CSR approach throughout the supply chain so that it effectively boosts performance and competitiveness.

### **CSR within the German automotive industry**

OV is part of the German Association of the Automotive Industry (VDA), the leading and most relevant automotive association in Germany. Selected individuals from the Purchasing Department are active members of workgroups and committees, such as the “Automotive Supply Chain Committee” or the “Expert Group Sustainability” in the supply chain.

## 4.1.2. Purchasing and Group strategy

### 4.1.2.1. The key role of procurement to drive results for the strategic plan

After the acquisition of OPEL and VAUXHALL in 2017, one of the main levers to enhance competitiveness was to create a Global Purchasing organisation merging both teams from PEUGEOT CITROËN DS and OPEL and VAUXHALL.

The Group's strategic plan is based on five pillars. Together with its suppliers, the Purchasing Department has implemented specific measures in order to make a proactive contribution to the plan.

### STRATEGIC PLAN

Pillars	Supplier/Purchasing actions	Results
<b>Quality First</b>	<ul style="list-style-type: none"> <li>Support the launch of best-in-class products</li> </ul>	<ul style="list-style-type: none"> <li>Quality indicator after three months in field 2017: 34,200 ppm (-7% compared to 2016)</li> </ul>
<b>Core model and techno strategy</b>	<ul style="list-style-type: none"> <li>Offer ground-breaking innovations to enable the Group to meet its goals related to: environmental performance, quality, connectivity and weight reduction</li> <li>Offer on-board systems that tie in with the Group's roadmap for autonomous vehicles</li> </ul>	<ul style="list-style-type: none"> <li>Groupe PSA wins the 2019 International Van of the Year (IVOTY) award for new generation of PEUGEOT Partner, CITROËN Berlingo, OPEL Combo and VAUXHALL Combo vans</li> <li>1.2-litre 3-cylinder Turbo PureTech engine voted Engine of the Year for the 4<sup>th</sup> consecutive time</li> <li>First manufacturer to give the public the chance to test autonomous car technology on the open road in Europe in February 2017</li> <li>80% of vehicles equipped with autonomous functions by 2030</li> </ul>
<b>Brand power</b>	<ul style="list-style-type: none"> <li>Develop plug-in hybrid and electric vehicles with low CO<sub>2</sub> emissions</li> </ul>	<ul style="list-style-type: none"> <li>In September 2018 Groupe PSA and Punch Powertrain announced that they were establishing a joint venture for electrified double-clutch transmissions resulting up to 15% of fuel savings and emission reduction in heavy traffic situations</li> </ul>
<b>Core efficiency</b>	<ul style="list-style-type: none"> <li>Realize Synergies after acquisition of Opel Vauxhall as 2<sup>nd</sup> largest European carmaker</li> <li>Offer the Group local production at competitive prices in order to reduce CO<sub>2</sub> emissions</li> <li>Adjust production in line with the success of new product launches</li> </ul>	<ul style="list-style-type: none"> <li>Sourcing for new Madrid Project: Expanded supply base with OPEL and VAUXHALL suppliers: <ul style="list-style-type: none"> <li>Seats</li> <li>Stamping and welding</li> <li>Cockpit</li> </ul> </li> <li>CMP platform: Vigo-Madrid-Zaragoza synergies</li> <li>Efficient launch of additional capacity of EB turbo engines and MB6 transmissions to Szentgotthard, Tychy and Aspern plants, including supply chain optimisation for the additional locations of this product</li> </ul>
<b>New frontiers</b>	<ul style="list-style-type: none"> <li>Support the Group's product launches worldwide by forming supplier clusters</li> <li>Support the Group in each of its six regions by campaigning for human rights among local suppliers</li> </ul>	<ul style="list-style-type: none"> <li>27 new suppliers have decided to invest in greenfield plants in Morocco to join the Group's cluster at present</li> </ul>



### *Impact measurement and economic assessment*

The Group has borrowed from Monozukuri – a Japanese performance tool enabling global optimisation of the value chain – to set up projects since 2013. This cross-cutting approach involves the active participation of employees and suppliers and aims to reduce waste throughout the entire value chain. By deploying 64 coordinators worldwide (mainly in Europe/Latam, and small local teams in Russia/Morocco) and with contributions from more than 350 suppliers, an increase of more than €168 million was achieved in 2018. This includes a stake of OPEL and VAUXHALL-generated synergies, where this approach was also successfully rolled out after the takeover.

On 9 October 2018, the 4<sup>th</sup> VA/VE (Value Analysis/Value Engineering) supplier day was conducted in Poissy. A total of 35 suppliers representing more than 50% of the global spend presented their plans to meet the performance indicators of the Group's strategic plan. More than 800 proposals were reviewed.

The Purchasing Department undertook a central initiative (ECO-PRF) with its strategic and core suppliers which allowed them to reduce the cost price of a vehicle. The deployment of this high-level initiative increased the achievement rate of economically significant ideas for PCD for all suppliers to 73% in 2018 (key partners 87%). Overall, the efforts made by the Group together with its suppliers helped to **reduce the average purchase cost of parts on a vehicle by €172 in 2018**.

#### 4.1.2.2. Local sourcing: a key element of Groupe PSA procurement policy

DPEF.30

DPEF.34

GRI.102-10

GRI.103-2

GRI.103-2

GRI.103-3

GRI.203-1

GRI.203-2

GRI.204-1

Given the economic challenges of being present in various host countries on different continents, the Group is committed to make supplier relationship management part of its core strategy. Groupe PSA is a fully-fledged partner to its host countries. It therefore commits to continuing to enforce its strategy to source parts and direct material as close as possible to its production plants, which also contributes to maintain subcontracting activities on-site, and helps to:

- reduce the Group's carbon footprint through the environmental optimisation of upstream logistics;

- involve suppliers in ongoing improvements to technological, logistical and CSR aspects;
- strengthen the Group's due diligence processes due to operational proximity with its partners.

By doing so, Groupe PSA reduces its risk of exposure in the global supply chain.



### *Impact measurement and economic assessment*

The Group is focusing on growth in Latin America and Russia with a target of 80% local sourcing in Latin America and 70% in Russia by 2035.

Local sourcing reduces the core risk of currency fluctuation which impacts manufacturing cost margins and sales volumes.

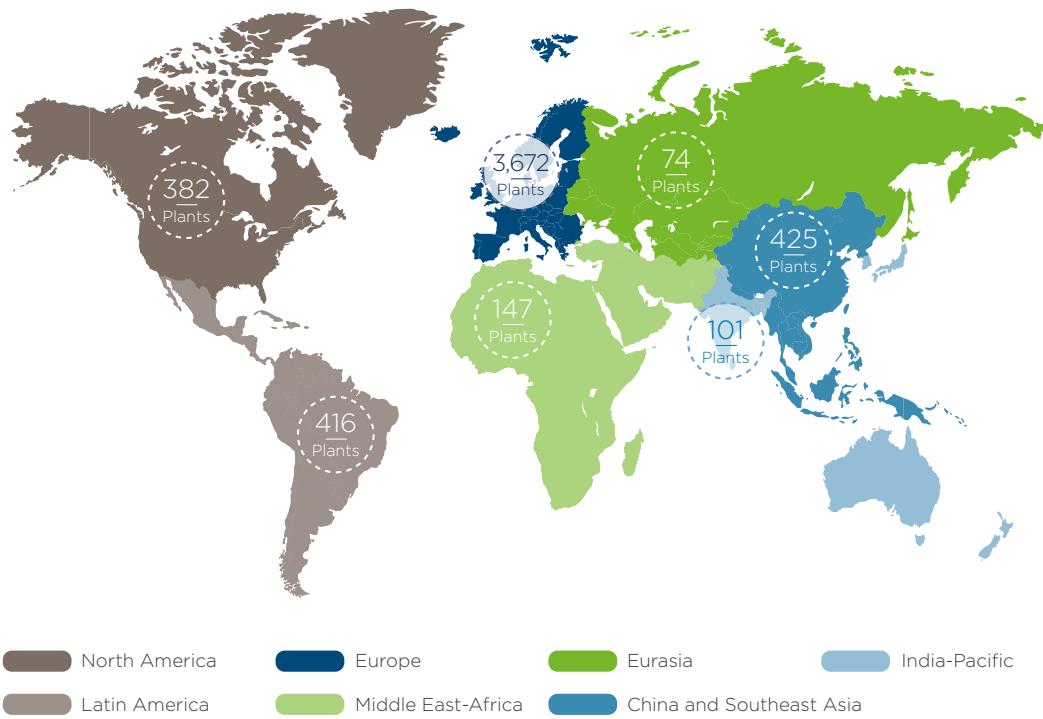
Local sourcing also helps the Group to achieve its objective of reducing the manufacturing costs price, particularly in logistics (€138 for Russia and €19 for Latin America), limiting customs duties and taxes (for example, in Brazil and Argentina, customs duties on each imported vehicle are 35% of the production cost), and gaining better control of lead times, all of which are key success factors in both these markets.

Local sourcing is also reinforced by the type of raw material resources available on the local market and the technologies used locally which are often more in line with client expectations and better suited to local conditions (for example, climate and condition of the road infrastructure).

Local sourcing of purchases in Russia are to be increased following significant fluctuations in the RUB/EUR exchange rate due to the instability of the rouble in past years. This also enables the Group to establish Russian manufacturing facilities which can be used for future projects in the Eurasian region. The number of local suppliers in Russia has doubled in the past two years from 28 to 56 to the end of 2018.

The Group is currently working on the local sourcing of subcomponents and raw material, and is also focused on vertical integration and localisation. Main commodities are seat fabrics, polypropylene as raw material for various plastic parts and steel grades. It contributes to continuous improvement and development of lower tier suppliers and accelerates manufacturing sites to be IATF 16949-certified.

MAP OF PRODUCTION PLANTS OF TIER-1 DIRECT MATERIAL SUPPLIERS



**ORIGIN OF PARTS (DIRECT MATERIAL AND SPARE PARTS) PURCHASED FROM 1<sup>ST</sup> TIER SUPPLIERS BY GROUPE PSA PRODUCTION PLANTS**

(in percentage of total purchase value) 2018

Origin of parts (tier 1 suppliers)	Europe	France	Rest of Europe	Eurasia	Latin America
Europe	<b>86.9%</b>	87.2%	86.6%	18.6%	19.2%
Of which France		<b>48.2%</b>	11.7%	9.9%	13.4%
outside France		39.0%	<b>74.9%</b>	8.6%	5.8%
Russia	0.3%	0.2%	0.5%	<b>33.5%</b>	0.0%
Latin America	0.5%	0.1%	0.9%	0.1%	57.5%
Rest of world	12.2%	12.4%	12.0%	47.9%	23.3%

The local sourcing rate corresponds to the value of a region's purchases from its production plants of 1<sup>st</sup> tier suppliers in that region, divided by the total value of purchases for the same region. These rates are shown in bold in the table above.

Groupe PSA is a fully-fledged partner to its host countries. It therefore commits to continuing to increase its purchases in the area around its production plants, a policy which also helps grow and sustain local subcontractor activity.

**By 2021, the Group aims to exceed a local sourcing rate of 85% in each region.**

**87 %**  
of the direct material parts used in the Group's European plants are sourced in Europe

### In Europe

- 87% of the direct material parts used in the Group's plants in France are sourced in Europe, the largest part of this being in France.

Thanks to its deep manufacturing roots in France, the Group has once again made a positive contribution to France's trade balance, with an import/export surplus of 362,000 vehicles and a trade surplus of €4.9 billion in 2018.

With more than 1.2 million vehicles produced in France, an increase of 6.4% vs. 2017, Groupe PSA is on track to fulfil the commitment it made as part of the "New Momentum for Growth" agreement in July 2016 to produce an average of 1 million vehicles in France over the next three years.

To maintain a strong industrial base in France, the Group has embarked on an ambitious plan to modernise its plants – with optimal logistics, more compact shop floors, simplified workflows, etc. – to improve the performance of its manufacturing assets.

The "Origine France Garantie" (Made in France) label provides a guarantee to consumers that the product they are buying is French-made. It is awarded to products whose final assembly is done in France and where 50% of the value of these products is also produced in France, following certification by Bureau Veritas.

#### **At 2018 year-end, 14 Group vehicles are currently certified:**

- Peugeot 5008, Citroën E-MEHARI produced in Rennes (Ille-et-Vilaine);
- Peugeot 208 GTI, DS 3 produced in Poissy (Yvelines);
- Peugeot 2008, Citroën C4 and DS 4 produced in Mulhouse (Haut-Rhin);
- Peugeot 308, Peugeot 3008 and DS 5 produced in Sochaux (Doubs);
- Peugeot Expert and Traveller, and Citroën Jumpy and SpaceTourer produced at Hordain (Nord).

#### **In Russia**

In 2018 new light commercial vehicles were successfully launched. These vehicles will further improve our localisation rate in this region and will prepare the new launches with an improved integration level. Their current integration rate is at 50%. The Group is looking into the possibility of further improving local integration in specific commodities like powertrains, chassis, electronics and electricity.

#### **In Latin America**

- in Porto Real (Brazil), 66% of parts are purchased in Latin America and 65% are purchased in Brazil;
- in Buenos Aires in Argentina, the local sourcing rate (source: Latin America) is 44% for sourcing in Latin America and 29% for sourcing in Argentina.

The Group's development plan sets targets in order to expand local sourcing beyond tier 1 suppliers.

#### **In Morocco**

Groupe PSA is building an engine and vehicle assembly plant in Kenitra (near Rabat) in Morocco. The production plant will cover a total area of 100 hectares, with 60 hectares for Groupe PSA and around 40 hectares for suppliers. Work on the plant is set to finish in 2019, and in 2020 the plant will increase its capacity to produce 200,000 vehicles. The local sourcing rate is initially estimated at 60% but will eventually rise to 80%. One of the major challenges concerns tier 2 and 3 suppliers, which are not yet widely established in Morocco. To achieve this localisation goal, the Group will rely on existing Moroccan suppliers and actively develop the local industry to secure additional suppliers (tier 1 as well as lower tiers).

#### **In Algeria**

Groupe PSA is investing €100 million to build an assembly plant close to Oran which will be operational in 2020 and which will have an initial annual capacity of 50,000 units, subsequently increasing to 75,000 units per year.

Its objective is to achieve a local sourcing rate of 40% five years after starting serial production to set up a proper local system, by encouraging global players to enter into partnerships in Algeria.

## **Two examples of strong commitment: the French automotive industry and supplier clusters**

#### **The French automotive industry**

Groupe PSA has steadily stepped up its commitment to the French automotive industry since it took part in the *États Généraux de l'Automobile* symposium in 2009:

- the Group abides by the Code of Performance and Good Practice of 9 February 2009 governing the client-supplier relationship in the automotive industry. This code sets out a number of operational rules, specifically in the areas of intellectual property and terms of payment. In 2018, Groupe PSA met more than 95% of all its payment deadlines;
- the Group actively contributes to the work of the *Plateforme de la Filière Automobile* (automotive industry platform - PFA) whose mission is to revitalise the French car industry. Ten or so of the Group's managers are involved in the work and governance of the PFA, France's regional automotive industry associations (ARIAS) or competitiveness clusters. In 2015, the Purchasing Department boosted this system by introducing DAPIs (industrial purchasing representatives for each industrial cluster in Europe). The role of industrial purchasing representatives is to report back on the risks and opportunities of their site. One of their goals is to achieve the plant excellence criteria of the Group, one aspect of which is basing some suppliers within its plants.

One example is the work carried out in the stamping sector. A thorough review has been carried out of the stakeholders involved and capacity requirements over the coming years. Suitable consolidation proposals have been put forward and are currently undergoing research:

- Groupe PSA supports the work of the French government's automotive industry support platform (PFA) (national survey and working groups) on the quality of customer-supplier relations in the French automotive industry;
- the Group also plays a role in the *Fonds de Modernisation des Équipements Automobiles* (FMEA), renamed *Fonds Avenir Automobile* (FAA), which was set up in 2009 to accompany and support the projects of equipment manufacturers and thereby help finance the recovery of the industry;
- in 2012, a working group on CSR was created in the French automotive industry (*Comité des Constructeurs Français d'Automobiles* - CCFA). This working group aims to identify CSR best practices at each member company and standardise them across working group members, so that they can be more easily implemented across the industry. In addition, the Group supports small- and medium-sized businesses in the French automotive sector with the implementation of CSR through the work of the Regional Automotive Industry Association (ARIA). In 2017, a working group was set up to work on securing and safeguarding the raw materials supply chain.



## Supplier Clusters

### — CLUSTERS OF AUTOMOTIVE COMPANIES IN SPAIN

The Group plant in Vigo is the second-largest plant in Spain in terms of volume and is a key participant in the Galicia cluster of automotive companies (CEAGA). In 2017, this cluster comprised 118 automotive component companies and accounted for 20,800 direct jobs (4.8% more than the end of the previous year), with an average of 13,570 training hours per year. In 2017, vehicle production in Galicia accounted for approximately 15.3% of Spanish production. Revenue from the Galician automotive industry reached €8.680 million in 2017, a 4.3% increase on 2016. Companies in the sector invested €245 million in 2017 to adapt to new changes required by this cutting-edge industry. The sector has invested nearly €500 million over the past two years and increased its exports by 21.6%, reaching its historic maximum. The Galician automotive industry exports in 2017 represented 32% of Galicia's total exports.

The Group has entered into a number of agreements with education and training centres and the Xunta de Galicia Ministry for Education to help develop academic programmes, training courses and even to organise plant visits for students. More than 2,400 students visited the Vigo centre between 2013 and 2017.

A similar cluster has been established around the plant in Figueras near Zaragoza, which is the largest plant in Spain (by volume). In this cluster (CAAR) more than 60 companies and 6 organisations have been working together since it was founded in 2008.

### — THE AUTOMOTIVE CLUSTER IN SUL-FLUMINENSE, RIO DE JANEIRO

The Group, in association with other car manufacturers and core equipment suppliers, initiated a project in 2012 to create another such cluster around its production plant in Porto Real, Brazil. The project, aimed at promoting local development and competitiveness through public-private partnerships (local authorities, universities, equipment manufacturers, etc.) led to the creation of the "Sul-Fluminense automotive cluster".

This cluster in the southern region of the state of Rio de Janeiro where the Group's plant is located was first published in April 2013. It now comprises 18 companies, the car manufacturers and their equipment suppliers in the region. The principal members are Groupe PSA, Michelin, MAN Trucks and Nissan. The cluster's priorities for action are the improvement of road and logistical infrastructures, electric power, the telecommunications network and training. In this context to date, regular contact with governmental agencies (municipalities of the region and the state of Rio de Janeiro) is now frequent, advancing progress in the region's sustainable development and competitiveness.

### — EXTENDED PLANT IN ARGENTINA

The Palomar plant in Argentina is rolling out an "extended plant" project to bring suppliers into the production line, whereby 2,300 m<sup>2</sup> of space has been made available to suppliers. This covers three projects launched to ensure that brake tubes, fuel hoses and tanks can be sourced internally from suppliers.

### — GROWTH OF MOROCCO'S INDUSTRIAL NETWORK

Construction works on the Kenitra plant in Morocco have been entrusted to a Moroccan company. 1,500 operators and 100 companies have been involved in the works. The Group has set itself the target of achieving 60% local sourcing (vehicle and engine components) as soon as the first vehicle is produced, with a long-term goal of 80%. To achieve this goal, the Group will rely on existing Moroccan suppliers and will actively develop the local industry to secure additional suppliers (tier 1 as well as tiers 2 and 3). The future plant will have an initial capacity of 90,000 vehicles per year. The goal is therefore to create, at the end of 2019, approximately 2200 direct jobs for PSA, 3,700 direct jobs with our suppliers and 20,000 indirect jobs at the end of 2019. Groupe PSA will be seeking 1,600 technicians and senior engineers from 2017 to 2019, as well as production operators, training officers and team leaders.



"Kenitra Plant to Double Production Capacity as Early as 2020" 09/04/2018 press release: <http://northafricapost.com/25226-psa-group-kenitra-plant-to-double-production-capacity-as-early-as-2020.html>

### 4.1.2.3. Partnerships with the Group's suppliers

To enable us to roll out and promote responsible purchasing policies throughout the supply chain, it is vital that we support our suppliers and communicate regularly with them.

#### A partnership based on clear, formalised principles

Relations with our suppliers are based on simple, very precise rules:

- compliance of all goods supplied to the Group;
- clearly identified responsibilities between Groupe PSA and its supply base;
- transparency and duty to alert;
- compliance and respect of mutual contractual obligations;
- application of sustainable development objectives.

The Purchasing Department defines its strategy based on technical and industrial purchasing policies, which involve different areas of the Group (purchasing, engineering, quality, supply chain, etc.). Thanks to the business models in place, these permit a segmentation of the supply base and the adoption of a targeted management approach guided by efficiency and value creation criteria such as:

- brand differentiation through innovation;
- improved competitiveness through optimisation of supplier performance programmes (Monozukuri projects, environmental performance initiative with suppliers, reduction of R&D costs, etc.) using the know-how of the supply base;
- international growth (China, Latin America, Russia and emerging markets) obtained by increased global calls for tender and increased local contract placing;
- global implementation of a targeted strategy to downsize the number of platforms;
- improving control of tier-2 suppliers to mitigate supply risks inherent in the multi-layered subcontracting chain.

### A partnership founded on a reciprocal exchange of information:

#### — SUPPLIER INFORMATION MEETINGS

A supplier information meeting (SIM) is a monthly meeting open to all direct parts suppliers. These meetings keep suppliers up to date on the Group and its purchases, vehicle and subassembly budgets, discontinued products, cycle highlights, future production volumes, scheduled production stoppages, feedback from supplier satisfaction surveys, innovations and CSR news both in terms of current and forthcoming regulatory developments and best practice. This provides suppliers with all the information they need to adapt and optimise their production. The meeting is held as a video conference so that everybody globally is able to attend without travelling or creating any CO<sub>2</sub> emissions. The content presented is additionally available as a download on the B2B portal. The meeting is available to all Groupe PSA registered serial suppliers and all major suppliers get invited as well.

#### — THE SUPPLIER COMMITTEE

The Supplier Committee, set up in 2017, is an event where the Purchasing Executive Committee shares its strategy (stake, perspectives, interests, specific messages, etc.) with a limited and selected number of suppliers. The aim is to reinforce relationship with the Group's key partners and key suppliers. It can occur up to four times in a year, each time with a dedicated topic e.g. quality first, booster day, supplier performance review, etc.

### A partnership that promotes sustainable performance: supplier awards

The "Supplier Awards" are an opportunity to reaffirm the strategic importance of the supplier relationship as a fundamental driver in achieving the Group's strategic plan for profitable growth (Push to Pass) and developing differentiating technological innovations in response to the challenges of global competitiveness.

In 2018, the Purchasing Department rewarded the best suppliers in several categories. One of these categories is CSR - Performance.

The list of award-winning suppliers is validated by the Purchasing Department Committee to ensure that the suppliers present no difficulties with regard to the assessment criteria in other categories. For example, a supplier cannot be given an award in the "value creation" category unless it has reached the required CSR level.

In 2018, 16 suppliers were rewarded for their commitment and the quality of their response to the Group's expectations. The event is also an opportunity to award the "best supplier plants" prize, which recognises the performance of 16 industrial sites for their industrial excellence and meeting the Group's quality requirements.



"Excellence rewarded at Groupe PSA 2018 Supplier Awards" 26/06/2018 press release: <https://media.groupe-psa.com/en/excellence-rewarded-groupe-psa%20%99s-2018-supplier-awards>

### A partnership measured by supplier surveys

Every two years, the Purchasing Department conducts a survey among a representative sample of its key partners, key suppliers and other significant suppliers to measure the quality of our mutual relationship. The suppliers questioned account for 78% of total turnover. The survey involves a questionnaire on seven topics: management of the supplier relationship; project management; quality; innovation; competitiveness; logistics and spare parts. Areas for improvement are identified by analysing supplier responses, providing a basis for action plans and changes to the Group's practices. (see 4.1.1. on supplier think tanks).



### STAKEHOLDERS DIALOGUE

#### Supplier mediation

In the context of the CCFA and PFA, the Automotive Sector Mediation Centre was set up in October 2014. This independent entity provides support to automotive companies for amicable dispute resolution (in disputes relating to the business relationship between customer and supplier). The main complaints relate to payment terms or dependence between companies. In 2018, one mediation case occurred where an agreement was signed and reached between PSA and the supplier.

## 4.2. SUPPLIERS: KEY PLAYERS IN THE CHAIN OF RESPONSIBILITY

GRI.103-2

GRI.103-3

Groupe PSA believes that there can be no performance without responsibility. As one consequence, the Groupe has signed the Global Compact and follows the due diligence approach advocated by the OECD. Groupe PSA has set out its procurement policy in compliance with International Labour Organization (ILO) rules (human rights such as child labour and forced labour) on health and safety standards. Additionally, the policy contains standards relating to environmental practices (ISO 14001) and the most stringent standards for use and disposal of substances (e.g. REACH regulations) as well as the supply of specific materials such

as conflict minerals that also require particular attention. In this policy, in awareness of its consciousness the Group encourages its suppliers to be vigilant for CSR risks within their supply chain. This policy is available on the Group's website.



The responsible purchasing policy is available on the Group's website: <https://www.groupe-psa.com/en/automotive-group/responsibility/societal-commitment/>

## 4.2.1. Groupe PSA procurement policy: performance and responsibility

DPEF.21

In line with the missions and objectives of the Group, the Purchasing Department defines and manages the procurement policy for goods and services worldwide as part of the Group's Automotive Division. It also ensures that the contracts with suppliers are fulfilled and executed in a sustainable manner.

**The Purchasing Department acts as the interface between Groupe PSA and its suppliers, specifically for meeting all legal and regulatory requirements under its responsibility in order to ensure that all suppliers are fully compliant with the Group's policies and so mitigate the risk exposure of the Group. This is its major duty of care towards suppliers across the globe.**

Consequently, the Purchasing Department works closely with engineering, industrial and programm teams and more generally works with all entities within Groupe PSA and its outside stakeholders.

As such, in conjunction with the other departments involved, the Purchasing Department is responsible for:

- involving suppliers in the design of products and manufacturing facilities;
- ordering and delivering automotive parts, equipment and services that meet the Group's requirements in terms of social and environmental responsibility, quality, price and time. For instance, this includes catering services delivered in the Group's facilities: suppliers are requested to promote responsible use of natural resources and to implement measures to reduce food waste.

To fulfil its role, the Purchasing Department organises its work around the following priorities:

- ensuring the competitiveness and responsible procurement of products, equipment and services purchased for the manufacture of Group vehicles and subassemblies by selecting world-class responsible suppliers able to meet the Group's requirements in the best conditions;
- ensuring successful collaboration between the Group and its suppliers for the design, development and manufacture of the automotive brands PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL products and services by forming dynamic, competitive partnerships with them and its partner departments;
- ensuring that suppliers provide the Group with innovative, sustainable solutions that can give it a competitive edge, by liaising closely with the Automotive Research and Advanced Engineering Departments;
- ensuring that the Group benefits from the expertise of its suppliers on the best economic terms by continually recommending improvements to quality and costs and seeing that they feed into all phases of the product life cycle;
- ensuring the quality and security of supplies by verifying that suppliers intrinsically meet the standards required by the Group in terms of social and environmental responsibility, quality and logistics;
- ensuring that a panel of responsible, viable and world-class suppliers is established by taking all the necessary actions to support and secure the automotive industry in the best interests of Groupe PSA;

- ensuring the buy-in and effective engagement of all of its staff in achieving the Group's objectives by organising and overseeing the work of its employees with a view to building exemplary partnerships with staff from other Group departments, as well as with suppliers, through upholding the principles of ethical and professional conduct. As such, the Group ensures the continuous improvement and application of its employees' professional skills.

In a bid to optimise its procurement policy, the Purchasing Department is coordinating its actions at different levels: centrally, in its international sites and within its various local offices.

### 4.2.1.1. Procurement policy: human rights, ethical and environmental standards

DPEF.34	DPEF.35	GRI.305-3	GRI.308-1
GRI.308-2	GRI.407-1	GRI.408-1	
GRI.409-1	GRI.412-3	GRI.414-1	
GRI.414-2	SASB-440a.1		

CSR is a global initiative. To ensure that sustainable progress is made in this area, which can then be rolled out throughout the entire supply chain, all stakeholders must be involved. When Groupe PSA joined the Global Compact in 2003, the Group promised to adhere to and promote to its suppliers the ten principles based on the Universal Declaration of Human Rights, the Declaration on Fundamental Principles and Rights at Work, the Rio Declaration on the Environment and Development and the United Nations Convention against Corruption.

#### Incorporating workforce-related and social criteria into the purchasing process: focus on human rights

Groupe PSA policy on human rights is based on the recommendations of the OECD.

**1. A public commitment to human rights:** each year, Groupe PSA renews its commitment to the Global Compact. It has recently signed a new version of its Global Framework Agreement with the relevant stakeholders, and requests that its suppliers also meet this commitment through its "responsible purchasing policy". This commitment is fully integrated in the operational procurement processes. Compliance with human rights is an overriding criterion when selecting new suppliers, as well as for all suppliers already listed in our supply base.

**2. Risk mapping for human rights infringements:** the Group has set up a risk mapping process for each purchasing commodity using the EcoVadis Rating Framework methodology as explained in section 4.2.2.1. This mapping process enables procurement teams to focus their due diligence on purchases identified as being potentially high-risk.

**3. Preventive measures to address identified risks:** each new supplier must systematically comply with the following criteria in order to be listed in our supply base: environmental practices, employment practices, human rights (non-discrimination, freedom of association and right to collective bargaining, abolition of child labour, abolition of forced or compulsory

labour, safety practices and anti-corruption). New suppliers are expected to be assessed by a third party (EcoVadis) before they can be awarded for new business. Groupe PSA also requires its existing suppliers to be reassessed each year by an independent third party. By doing so, Groupe PSA expects its suppliers to continuously improve their CSR performance. The Group reserves the right to conduct or commission audits of its suppliers at any time and to check that their practices comply with Group requirements as described in the Responsible Purchasing Charter. In 2018, 62% of suppliers had actions in place to fight against forced and child labour. Groupe PSA continues to identify any supplier extracting raw materials such as mica and cobalt, and ensures that these materials are responsibly supplied. A new clause has therefore been added to our purchase contract for certain critical commodities.

**4. Corrective action must be taken for suppliers potentially or currently involved in a human rights infringement.** If the supplier fails to comply with any of the listed criteria, corrective action plans are put in place and a sanction may be imposed. This means the supplier may be put on business hold or be removed from our supply base.

**5. Action plan monitoring:** any supplier involved or potentially involved in human rights breaches must prove that the corrective measures agreed with Groupe PSA have been implemented, according to a timetable drawn up in view of the severity of the breach. Corrective action plans may apply to the supplier's supply chain. The Group will systematically request a follow up audit by a third party to check if the supplier is now compliant and will remain compliant to stay on the panel.

**6. Communication of measures put in place:** each year, an overview is provided to union representatives according to the commitments set out in the Global Framework Agreement. The results are also published in the annual CSR report.

— **EXAMPLE: THE GROUP'S POLICY ON CONFLICT MINERALS.**

A specific clause has been inserted in the general terms and conditions of purchase (clause 14), stating that the supplier must disclose the detailed composition of the materials used to manufacture the parts supplied, as well as any changes in that composition. The supplier must also provide the written information necessary to comply with the legislation in force, particularly on consumer protection and conflict minerals. From the R&D Department, who is in charge of the management of sensitive products, the Purchasing Department has begun to systematically request the entire supplier base to identify the suppliers concerned. The Conflict Minerals Reporting Template is requested for the suppliers using the 3TG metals (tungsten, tantalum, tin and gold). If they have not sourced any compliant raw materials, the suppliers have to set up alternative sources. The Group thus seeks to exercise its duty of care and foster sustainable procurement.



The Conflict Minerals policy is available on the Group's website:  
[https://www.groupe-psa.com/en/automotive-group/  
responsibility/societal-commitment](https://www.groupe-psa.com/en/automotive-group/responsibility/societal-commitment)

## CONFLICT MINERALS: EVALUATION OF THE SUPPLIER BASE AT THE END OF 2018

Number of supplier groups unaware of whether they use these minerals	49
Number of supplier groups declaring that they use these minerals	290
<i>Of which: number of supplier groups having a policy for these minerals</i>	123
<i>Of which: number of supplier groups that have taken actions implemented to identify the presence and mitigate risks of conflict minerals within the supply chain</i>	183
<i>Of which: number of supplier groups that have published a due diligence report on conflict minerals</i>	113

## Suppliers make a significant contribution to the Group's environmental targets

Most of the Group's suppliers in the automotive industry face the same environmental issues as Groupe PSA. These include reducing their carbon footprint and water consumption, managing their industrial waste, improving waste recycling and protecting biodiversity. Groupe PSA involves them in its efforts to monitor its environmental roadmap.

The Group's environmental objectives for its products are translated into contractual commitments via specifications and purchasing policies according to two different criteria: the type of materials used and the CO<sub>2</sub> emissions generated:

- ambitious targets have been set on the percentage of "green/recyclable materials". These objectives are also a key focus of the innovation policy that is part of the Group's supplier certification criteria (see 4.2.1). Furthermore, suppliers also have a key role to play in the Group's commitments on reducing hazardous substances in two main areas: first, the elimination of four heavy metals (lead, mercury, cadmium and hexavalent chromium), and second, compliance with REACH regulations based on the recommendations issued by ACEA, in which the Group is a member (see 2.4.1.3);

- regarding CO<sub>2</sub> emissions linked to the Group's purchases (scope 3) from its suppliers, the Purchasing Department encourages suppliers to draw up an emission reduction plan. In 2018, 74% of the Group's suppliers set up a reporting process for energy consumption or greenhouse gas emissions. The Group asks its suppliers to assist it in its various host countries in order to develop the local economy, build environmentally safe plants and reduce CO<sub>2</sub> emissions from logistics (see 5.2.5). For the overall carbon footprint (scopes 1, 2 and 3), see 2.1.

For example, Groupe PSA benefited from carbon neutrality for 100% of the mail services entrusted to La Poste in France, which represents 463 tCO<sub>2</sub>e offset in 2017.

## CO<sub>2</sub> EMISSIONS LINKED TO PURCHASES OF MATERIALS AND COMPONENTS (SCOPE 3)

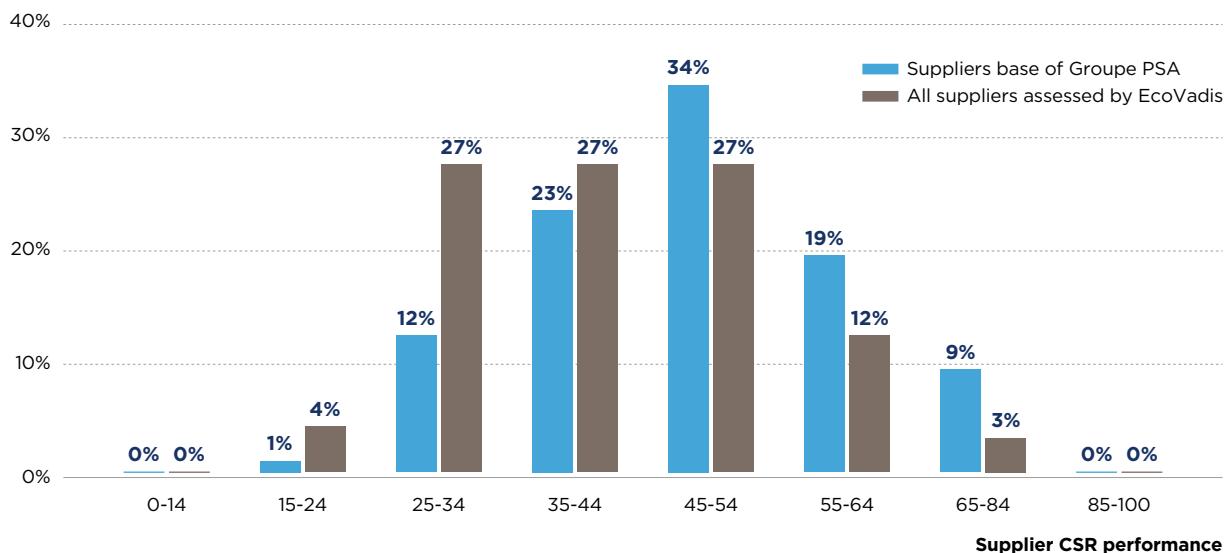
CO <sub>2</sub> emissions (in thousand of tonnes of CO <sub>2</sub> )	2017
Production of parts	6,153

These CO<sub>2</sub> emissions correspond to 47% of the purchases made in 2017.

## A supplier selection method designed to improve CSR performance

### CSR PERFORMANCE: SCORES OF GROUPE PSA SUPPLIERS COMPARED WITH SCORES OF ALL SUPPLIERS ASSESSED BY ECOVADIS IN 2018

#### Supplier distribution



With an average score of 48.12, Groupe PSA suppliers outperformed all suppliers assessed by EcoVadis, who have an average score of 42.2.

#### 4.2.1.2. The Group's strong commitment to the adapted sector

DPEF.33

GRI.204-1

For over 30 years, the Group has been sourcing direct parts (e.g. instrument panels, interior trims, pedals, etc.) from the adapted and sheltered sector. Subcontracting to this sector is one aspect of the Group's agreement for the social and occupational inclusion of people with disabilities. The 6<sup>th</sup> agreement was signed on 21 February 2017.

Suppliers in the adapted and sheltered sector are now expected to meet the same standards as the Group's other suppliers based on criteria such as quality, responsiveness and financial performance. The Purchasing Department, supported by all other Groupe PSA departments, has helped them to implement the changes necessary to reach this performance level. Since developing this expertise, some sheltered workshops have marketed their know-how to other customers and business sectors (rail, aeronautical, etc.).

Monozukuri initiatives that have been launched with some sheltered workshops have made it possible to strengthen our partnership, particularly through the inclusion of an Adapei du Doubs team at Sochaux plant in 2017. This approach was repeated in August 2018 where workers with disabilities from the supplier Bretagne Ateliers were integrated into the Rennes plant, in order to carry out all assembly tasks which were previously supplied by a different supplier.

Key figures (concerning only PCD plants):

- the services bought from the adapted and sheltered sector have generated €49.8 million in added value for these companies;
- the Group works with:
  - 6 major French associations: Adapei in Doubs, Adapei in Haute-Saône, Bretagne Ateliers, Adapei Papillons Blancs in Alsace, Les Ateliers de l'Ostrevent and the AMIPI/SLAMI Foundation, together with Spanish association ILUNION,
  - 2,444 units covered (full-time equivalent for ESAT or EA workers with disabilities), including 2,425 units covered in the industrial sector, with a 3.95% disabled employment rate for Groupe PSA in France;
- 100% of the cars built in Europe by the Group have at least one part manufactured by the adapted and sheltered sector.

Groupe PSA is a main actor of the purchases to adapted sector (firms specialised in hiring people with disabilities) and sheltered sector (organisations helping people with disabilities into work) in 2017. This has been accomplished as a result of the strategy adopted by the Group, which decided more than ten years ago to give responsibility to a member of staff within the Purchasing Department for purchases of industrial parts from the adapted and sheltered sector.

In 2017, on the basis of its experience in France, Groupe PSA extended its employment policy to the adapted and sheltered sector for direct material parts in Spain by adding a new supplier, ILUNION, which represents 70 full-time-equivalent workers with disabilities.

## 4.2.2. Practicing due diligence



### STAKEHOLDERS DIALOGUE

In addition to applying its social policy to all entities and employees, Groupe PSA also applies due diligence to ensure that its social demands are met by its suppliers. The measures put in place by the Purchasing Department ensure that suppliers fulfil social and environmental commitments. They have been improved to form a robust due diligence plan. The plan identifies, prevents and mitigates the risks of non-compliance and any failure to comply with basic human rights. The plan also provides the option to perform on-site audits.

The Group's Global Works Council meeting was held in Paris in June 2018 to carry out an annual review of how the Global Framework Agreement is applied to the Group's social responsibility processes. Groupe PSA European Works Council has now expanded with the presence of OPEL and VAUXHALL entities representatives.

Groupe PSA follows the OECD Due Diligence Guidance for its supply chain. In accordance with Act no. 2017-399 of 27 March 2017 on the duty of care of parent companies and instructing companies, the due diligence plan introduced by this section comprises reasonable due diligence measures to identify risks and prevent serious infringements of human rights and fundamental freedoms, and personal and environmental health and safety, arising from the activities of subcontractors or suppliers with whom there is an established business relationship.

#### 4.2.2.1. Identifying CSR risks in the supply chain

DPEF.30

DPEF.31

GRI.308-2

GRI.414-2

Groupe PSA uses risk analysis (mapping) to identify and prioritise actual or potential incidents in the supply chain.

Where risk is identified, Groupe PSA has a prevention system to implement and monitor specific action plans with involved suppliers to prevent or mitigate any impact to the supply chain.

If there is an impact, Groupe PSA takes necessary actions to solve it.

The Group is transparent about the measures taken and the results obtained, and these are published in its annual CSR report.

#### Risk mapping

Groupe PSA has opted to identify risk by commodity for both direct and indirect material purchases. The methodology used is built and based on the EcoVadis Rating Framework:

- CSR risk profiles according to the various internal Groupe PSA commodities matched to 78 international standard industrial classification (ISIC) commodities developed by the United Nations (as a single reference guide in order to generate a cross-reference table with Groupe PSA procurement commodities);
- CSR risk profiles by country (according to the EcoVadis listing that currently includes 189 countries);

- the database created by EcoVadis for supplier CSR performance assessments (currently more than 50,000 suppliers assessed, an increase of approximately 10,000 suppliers since last year);
- additional sources including information from unions, NGOs, media or even data collection specialists (2,500 additional sources are considered).

The overall CSR risk level is established for each commodity. By commodity the following four risk themes were analysed: environmental risk; social risk (which contains human rights); ethical risk; and supply chain risk. This risk level is then enhanced through data from supplier performance assessments, followed by risks inherent to the country in which the supplier is located. Procurement risks are also incorporated, such as expenditure volumes, exposure and the strategic importance of each commodity. All of these components combined enable the risks to be ranked across six levels in order to create an action plan based on the highest-risk procurement commodities.

The Group Managing Board reviewed and approved the mapping process internally.

#### Risk detection process and impact analysis

As a result of several crises in the automotive industry that occurred over past years, the Group has upgraded its risk analysis procedure to ensure it offers robust risk prevention and better reactivity to any risk.

In line with the Group's risk policy (see section 1), purchases can be broken down into 710 different commodities to which the Purchasing Department applies a multi-criteria risk analysis (quality, logistics, financial, CSR, etc.) to define a "technical and industrial purchasing strategy" (TIPS) for each commodity. Buyers, in collaboration with experts from other divisions of the Group, including financial analysts, logistics experts, quality experts and engineers, manage the "TIPS".

#### Critical suppliers

A critical supplier is a tier 1/tier N supplier who could cause production stoppages at Groupe PSA plants or delay the sales launch of new vehicles. There are three categories of high-risk suppliers:

- suppliers who are the only source of a product or component;
- suppliers for whom Group purchases represent over 30% of their annual revenue;
- suppliers whose failure to adhere to Groupe PSA CSR policy could damage the Group's reputation. These suppliers might cause a substantial negative impact on the environment, employment, human rights or society (particularly through unethical conduct).

#### Various types of supply chain incidents

Groupe PSA has identified four types of potential negative impacts that might occur:

- **Environmental damage:** this is damage caused to water, air and soil either as a result of natural disasters or industrial accidents, or due to overexploitation of natural resources;
- **Focus on industrial supplier risks:** Groupe PSA has implemented a special industrial risk prevention mechanism based on feedback from past crises (including the Ibaraki

(Japan) earthquake in 2016). This mechanism enables the buyer to quickly identify the Group's exposure to the risks linked to each supplier production plant, using a matrix which takes into account criteria such as: geographical location (risk of natural disaster), the Group's share in the plant's production, how specific the technology used by the supplier is, how many of the Group's vehicles are affected by production at this plant, etc. This assessment method is used systematically to prepare technical and industrial procurement policies for each product group and each call for tenders. This result is systematically taken into consideration in the supplier selection process globally. The Purchasing Department (SIRF<sup>(1)</sup> in charge of managing the supplier risks) validated a list of at-risk countries where specific measures to secure procurement or to award new business should be set up.

- **Focus on raw material risks:** material risk mapping has been developed to establish a list of "strategic" materials in terms of their criticality (materials with specific characteristics, important for competitiveness, and with little or no current alternative), potential scarcity (limited global production or fragile supply chains), and questionable CSR conditions (e.g. conflict minerals, mica, cobalt). This mapping is designed to enable the Group to manage and secure its supply over the long-term and focus its R&D work on replacement materials. This policy to seek out new, innovative materials combines with the Group's quest to increase the proportion of renewable and environment-neutral materials in its vehicles (see 2.4.1.4);

- **Violations of employment rights** which may take the form of forced labour (which may also be linked to illegal activities such as conflict minerals), child labour, failure to respect the freedom of association, discrimination or failure to comply with international standards on workplace health and safety;

- **Focus on human rights in the supply chain:** in line with its long-standing commitment to the Global Compact and building on its Global Framework Agreement which extends to suppliers and partners, the Group identifies the regions and areas that have the largest risk of human rights violations and modern slavery. The regions and areas at risk are identified based on two criteria: the country (countries that have not signed up to global agreements, countries ill-equipped to enforce international laws) and the manufacturing process (whether it requires a significant amount of low-skilled labour and additionally is dangerous). Based on this, the Group applies a graduated reasonable efforts approach. This might result in removing a supplier from the panel or bid if it should become evident that it was directly or indirectly involved in this type of practice. It is the Group's policy to assist and guide suppliers so that they can improve. However, if they are clearly unwilling to make changes, the Group reserves the right to cease all contact and to remove them from its supplier database,



The Group's policy on the fight against forced or compulsory labour practices and modern slavery is available on its websites:

<https://media.PEUGEOT.co.uk/file/17/5/modern-slavery-statement-2017.440175.pdf>

<https://www.vauxhall.co.uk/content/dam/vauxhall/Home/PDFs/modern-slavery-act/modern-slavery-act-notice.pdf>

- **Focus on conflict minerals:** earnings from mining gold, tin, tantalum and tungsten might be used to finance armed conflict in the Republic of the Congo and surrounding countries. In accordance with the US Dodd-Frank Act of 2010, the Group's policy requires the utmost transparency from its suppliers about the origin of any raw materials and minerals they use;

- **Ethical breaches** such as corruption, conflict of interest, deliberate non-compliance with specifications (quality risk), or threats to a balanced business relationship (financial or technological dependencies):

- **Focus on supplier quality risk:** handling supplier quality risks is entrusted to dedicated teams and is formally documented in the SQM (Supplier Quality Manual). Within the Supplier Quality Development (SQD) Department is a dedicated team of quality/lean manufacturing experts responsible for monitoring suppliers' production plants. Each supplier plant has a single point of contact within the Group. This personal approach allows the Group to pick up on "signs of weakness" (early stages of a quality or logistics problem) to prevent supply disruptions which are a huge waste of resources. This organisation is deployed throughout all regions where the Group has a presence, allowing them to be as close as possible to the supplier pools. The results in terms of quality for suppliers currently in development and during the lifetime of the part are consolidated on a worldwide basis. These results are frequently reviewed with suppliers in order to guide suppliers at the corporate level. These results are also used for awarding new business to suppliers:

> the SQM is based on compliance with the following fundamental principles: customer satisfaction and safety; goal achievement planning; compliance of all goods delivered; transparency; duty of notification and responsiveness,

> SQM covers the entire life cycle of supplies (from the choice of supplier to the last spare part delivered). Quality risk is one selection criteria for suppliers. This risk is monitored carefully from the development phase of new parts until the process is industrialised and the product is in mass production, supplier quality performance is monitored through the "scoring bidlist", which contains penalty points by supplier plant. Each perturbation will result in a loss of points according to a predefined scale starting from a total of 100 points. Suppliers below 80 points are "red suppliers" and are excluded from new business awards. A corrective action plan is put in place to control quality risk for customers. "Red suppliers" represent 7.3% of the Group's global supplier base,

- **Focus on an emerging risk linked to the automotive industry: changes in the relationship between international car manufacturers and equipment manufacturers.**

Equipment manufacturers are called upon to support the global development of car manufacturers. They have become major economic stakeholders whose responsibility weighs heavily on the subcontracting chain, in terms of technologies (investments in R&D and training), production capacities (meeting the needs of several competing car manufacturers), confidentiality, societal issues (acceptability for countries in which the Group operates and CSR impacts on), etc. In view of this risk, the Group has implemented operating procedures with these global players that ensure a quality long-term relationship, and involve said suppliers

(1) Stratégie industrielle et risques fournisseurs.

in the risk management process (including CSR risks) across the subcontracting chain. Worldwide, 22 supplier groups represent 50% of the value of Group purchases (excluding joint ventures);

- Focus on the risk of financial sustainability of suppliers:** Groupe PSA has implemented a systematic tracking system. The financial results of all suppliers are analysed, which prevents new contracts from being awarded to suppliers in difficulty and identifies all suppliers at significant risk of default (financial health, shareholder morality, etc.). A status report on suppliers with a significant default risk is presented each month to the Purchasing Department Committee. This authorises action plans and may recommend either cash flow support (one-time reduction in payment terms) or back-up measures (duplicating production, search for successors or investors, advance inventory, etc.). The Group has put in place an adaptive organisation and processes to ensure that it meets the contractual payment deadlines agreed with its suppliers. An action plan is in place to tackle late payments made to suppliers. This will identify any reasons for recurring delays and provide the necessary structural solutions. In 2018, the curative or preventive monitoring of suppliers with a high risk of failure based on financial criteria covered 42 companies representing approximately 7.6% of the purchasing costs;

- Social damage in areas where suppliers have production plants** which can result in loss of local jobs, threats to indigenous or displaced peoples, or even political or economic conflicts that jeopardise the local economy (country risk):
  - Focus on country risk:** The country risk is fully integrated into the process of listing suppliers on multiple levels. During calls for tender, suppliers are assessed based on their financial sustainability. This listing is completed with the help of a specialist third party, and takes into account the country risk. Similarly, suppliers are assessed based on

their social, environmental and ethical performance, and their ability to manage their supply chain. The supplier's host country is also taken into account here.

To carry on with its business and manage the risks identified above, the Group has an organisation that governs the relationship with its suppliers. (See 4.2.2.3 for more details).

#### 4.2.2.2. Assessment of suppliers' CSR performance

DPEF.30	DPEF.37	DPEF.38
DPEF.39	DPEF.40	DPEF.41
DPEF.42	GRI.308-1	GRI.308-2
GRI.407-1	GRI.408-1	GRI.409-1
GRI.414-1	GRI.414-2	GRI.205-2

For Groupe PSA, assessing CSR performance of suppliers is a key factor in the supplier selection process. For example, more than 90%<sup>(1)</sup> of suppliers were selected in 2018 based on their CSR rating.

90 %

of direct material suppliers selected  
on the basis of CSR criteria in 2018

In 2017, self-assessment questionnaires for supplier production plants were replaced by audits performed on the basis of IATF standard 16949. The CSR rating is based on the following components:

#### SUPPLIER CSR ASSESSMENT SYSTEM



(1) For suppliers without CSR assessment, Groupe PSA is using a deviation process approved by Purchasing directors. This requires:  
- the formal signature of the supplier of the Group's Charter;  
- an official commitment to be assessed by EcoVadis in the near future.

## **Signing the responsible purchasing policy**

Principles of the Group's CSR policy are listed in the document "Responsible Purchasing Policy" which stipulates the commitments that suppliers must adhere to.

The Purchasing Department has responsibility for this document which requires:

- compliance with law;
- promotion of and compliance with internationally-accepted human rights;
- freedom of association and the effective recognition of the right to collective bargaining;
- elimination of any forms of forced or compulsory labour;
- effective fight against child labour;
- elimination of discrimination in terms of hiring and occupation;
- anti-corruption measures and the prevention of conflicts of interest;
- compliance with the legal minimum wage;
- working hours not exceeding those set out in national legislation or collective bargaining agreements;
- compliance with health and safety at work;
- implementation of an Environmental Management System (ISO 14001 certification);
- banning the use of prohibited substances and materials;
- suppliers to obtain CSR commitment from their own suppliers;
- combating the use of minerals originating from areas of conflict;
- storage and use of personal data;
- implementation of an environmental policy for research on green or recycled materials and the reduction of CO<sub>2</sub> emissions;
- protection of animal welfare.

All suppliers on the panel are required to confirm their commitment to these principles by signing the document. Exceptionally they may provide evidence that they subscribe to an equivalent reference guide and also undertake to promote these principles to their own supply base and subcontractors.

At the end of 2018, 1,192 suppliers had committed, equating to 94% of purchases.

74% of the revenue generated by Mister Auto (equivalent to 0.32% of the annual value of Groupe PSA direct material purchases) consists of parts purchased from major equipment manufacturers who have signed the "responsible purchasing policy" as tier 1 suppliers.

This reference guide is part of all purchase contracts and the Group's purchasing processes and is also available on its B2B portal and web site.

## **Audits of production plants in accordance with IATF standard 16949**

Groupe PSA requires its suppliers and their production plants to be IATF 16949-certified. In October 2017, this new reference guide replaced the ISO/TS 16949 standard previously required by Groupe PSA. This new IATF standard meets the growing expectations of markets and governments in relation to ethical business practices. It also incorporates changes and complexities specific to the automotive sector, such as requirements for onboard software, and strengthening product traceability in accordance with regulatory changes.

Groupe PSA has opted to specify additional specific requirements for this certification. These additions include adherence to the 2017 responsible purchasing policy and also contain specific CSR advice and actions to be carried out by every supplier. (External) IATF certifying bodies carry out audits to ensure compliance with these specific requirements.

IATF 16949 certification is granted for three years, and the certification body conducts an annual monitoring audit. The certificate will be suspended in the event of any core compliance failure, and additional audits will be carried out to reveal these compliance failures. 68% of Groupe PSA supplier production plants are ISO/TS 16949 or IATF 16949-certified, while the other plants have a minimum of ISO 9001 certification.



Specific requirements of IATF: <http://www.iatfglobaloversight.org/oem-requirements/customer-specific-requirements>

Specific requirements of Groupe PSA:

- OPEL and VAUXHALL: [https://www.iatfglobaloversight.org/wp/wp-content/uploads/2018/04/IATF16949\\_Opel\\_Vauxhall\\_CSR\\_April\\_2018\\_edition\\_1.pdf](https://www.iatfglobaloversight.org/wp/wp-content/uploads/2018/04/IATF16949_Opel_Vauxhall_CSR_April_2018_edition_1.pdf)
- Groupe PSA: [https://www.iatfglobaloversight.org/wp/wp-content/uploads/2018/04/01598\\_17\\_00316\\_Groupe\\_PSA\\_-\\_CSR-IATF16949\\_april\\_2018\\_V2.pdf](https://www.iatfglobaloversight.org/wp/wp-content/uploads/2018/04/01598_17_00316_Groupe_PSA_-_CSR-IATF16949_april_2018_V2.pdf)

## **Assessment by an external company**

To support the supplier assessment process on any CSR criteria and make it more robust, Groupe PSA has embarked on an assessment of its entire supplier base using criteria relating to the environment, workforce, ethics and subcontracting chain. It has outsourced this assessment to an independent external company, EcoVadis. The first step was to identify supplier risks more precisely.

The Group informed its suppliers that this evaluation was a prerequisite not only for the placement of any future business, but also to remain on the supplier panel. A corrective action plan is automatically required for any suppliers that do not receive a score high enough to meet the necessary standard set by Groupe PSA.

In 2018, 975 supplier groups were assessed, which accounts for more than 93% of the value of purchases of direct parts.

## **Audits of suppliers at risk**

In addition to the assessment as described above, on-site audits are randomly performed. These audits are performed for suppliers identified as risky according to the following three CSR criteria: countries (non-signatory country or country with questionable governance), products (inherently risky, such as promotional items) or processes (manufacturing processes involving hazardous substances). These social and environmental audits are also managed by an independent external service provider (see 4.2.2.1). Based on the Group's values, an audit table has been put together and covers the following topics: CSR policy; human rights; working conditions; workplace health and safety; environment and the Management System. These audits provide a snapshot of how the supplier is performing in terms of the Group's reference guide and the local statutes and regulations. The specifications stipulate that local auditors who speak the language of the audited site and who have a thorough knowledge of the applicable local laws, regulations and practices applicable to the site must carry out the audit.

The external auditor draws up an audit report on each occasion. The report describes any non-compliance encountered and grades them according to four classifications (critical, core, minor and observations only), each requiring corrective action plans.

If no satisfactory solution can be found to a critical or core non-compliance, a disengagement plan may be put in place after consultation with the Group's internal players affected by the decision.

If necessary, an audit may be carried out to check if the action plan has been implemented.

Since 2008, 92 social and environmental audits have been performed at the sites of tier 1, 2 or 3 suppliers.

#### 4.2.2.3. Steps taken to prevent risks: governance of the supplier relationship

Risk prevention takes place in the day-to-day relationship between buyers and suppliers. The Group pays particular attention to their training and provides them with tools enabling them to rapidly identify and properly react to risk situations.

##### Training for buyers

For new buyers, the Group's purchasing business school organises annual training sessions in Europe and Latin America. The course includes a specific CSR module which is updated each year. Since 2008, 534 PCD employees have been trained in Europe, and in Latin America 78% of all the Purchasing Department employees were trained up, which was an increase from 65% in 2017. In 2018, more than 307 OV employees were trained all over Europe on the CSR approach of the Group and how to perform CSR.

In addition, each operational buyer receives ongoing training in changes to regulatory requirements, best practices, tools, etc. to practice responsible procurement (including ethics, human rights, environment, etc.) properly.

Buyers are offered e-learning in multiple languages on assessing suppliers' social, environmental and ethical performance and handling subcontractors.

##### Supplier training

**The Group's ambition is to have trained 90% of these suppliers in CSR risks and the Group's requirements by 2025.** To achieve this goal, it helps its suppliers by providing them with various learning, training and development tools.

- Supplier briefings are held each month to provide suppliers with CSR updates, communicate the Group's CSR expectations and inform them of legal and regulatory developments in CSR matters.
- Suppliers have access to e-learning on CSR principles to evaluate and improve their CSR performance, and how to build up robust internal processes supporting CSR via the dedicated platform.

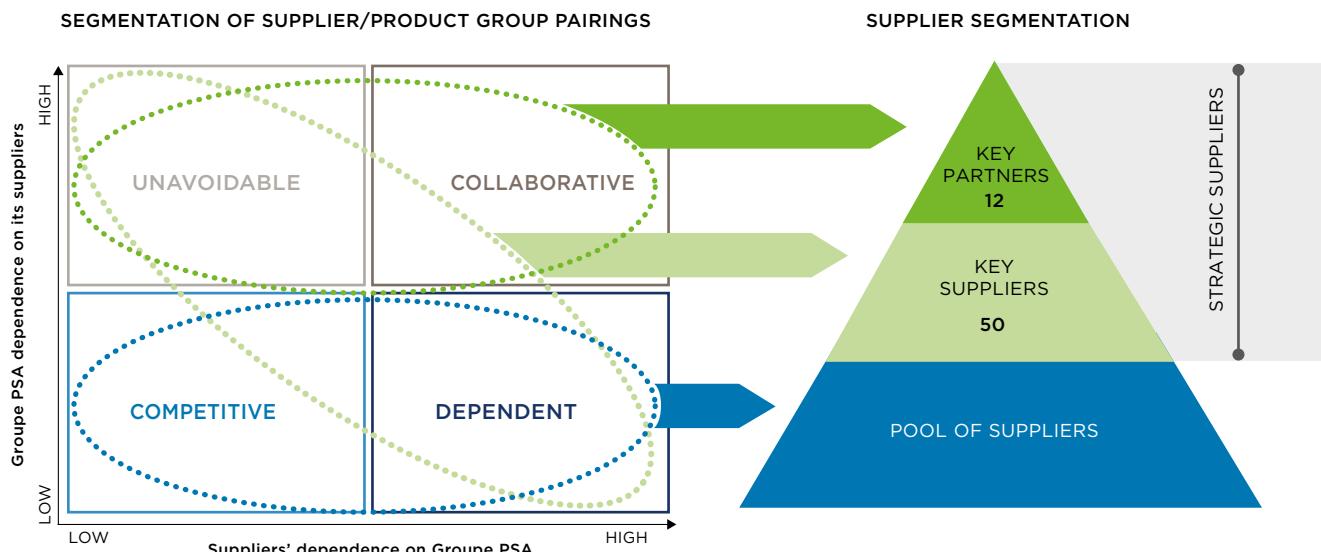
##### The "Excellence in the Supplier Relationship Management (SRM)" approach through segmentation of the supplier base: better governance at the right level

In order to define an appropriate procurement policy, the nature of the Group's relationship with its suppliers is analysed.

The supplier/product group pairings are split into four categories according to the level of interdependence with Groupe PSA:

- Category A – Unavoidable relationship: Groupe PSA relies heavily on the supplier for this product group;
- Category B – Collaborative relationship: Groupe PSA and its supplier rely heavily on each other for this product group;
- Category C – Dependent relationship: the supplier relies heavily on Groupe PSA for this product group;
- Category D – Competitive relationship: Groupe PSA does not rely on the supplier (there are many other suppliers for the purchase group in question) and the supplier does not depend on the Group for this product group.

##### SEGMENTATION OF SUPPLIER PANEL





The aim of the SRM ("Supplier Relationship Management") initiative is:

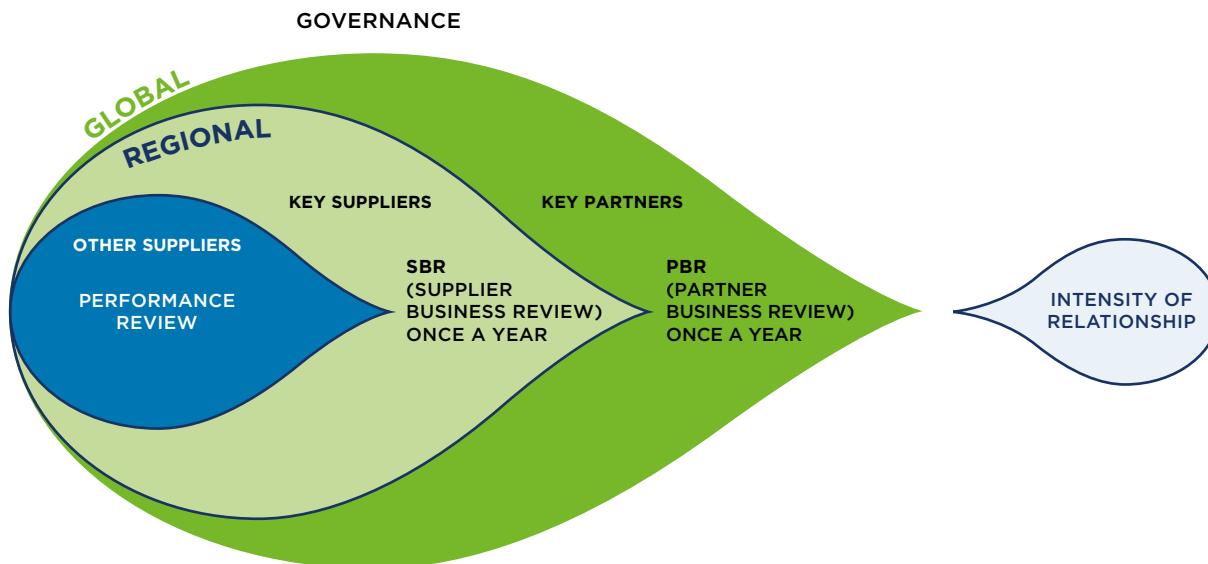
- to work closer with some of our suppliers, specifically through a stronger, better-targeted governance, to create value for both parties over a broad spectrum (strategic vision, innovation, R&D processes, globalisation, simplification of the quality processes, optimisation of logistics performance, etc.);
- to reduce the number of the Group's dependent suppliers (supplier dependent relationship rate of over 30%).

Based on its supplier panel segmentation, which separates key partners and key suppliers from all other suppliers, Groupe PSA furthers the relationship by means of:

- partner business reviews (PBR) for key partners;
- supplier business reviews (SBR) for key suppliers;
- performance reviews for the other suppliers.

Partner business reviews (PBRs) and supplier business reviews (SBRs) for these suppliers are aimed at sharing and aligning strategies at the highest level of both companies. The objectives are to identify value creation initiatives for mutual benefit.

## FURTHERING THE SUPPLIER RELATIONSHIP



### 4.2.2.4. Monitoring signs of weakness to eliminate the causes of risk

Several tools are in place to identify potential risks:

- **the discovery report**: this is an internal tool used by Groupe PSA which is available to anyone visiting a supplier production plant (buyer, quality auditor, driver, analyst, etc.). It can be used to report any observed or suspected incidents during a visit to a supplier's production plant. The questionnaire is sent to the CSR coordinator who decides what action should be taken (e.g. on-site audit);
- **an early internal warning system** based on a specific internal procedure has been put in place. This is accompanied by partial and local whistleblowing (see 6.1.3.1);
- **a global external online warning** whistleblowing system has been implemented in all European countries within Groupe PSA (only exception is Opel Germany). It will be rolled out to all global countries as well. It is initially launched only for administrative employees of the Groupe, but it may be opened up to external partners (including suppliers and NGOs) who intent to report infringements of laws or national conventions to Groupe PSA, all in accordance with relevant regulations and national requirements;
- **stakeholder feedback**:
  - NGOs regularly publish reports on a particular topic, such as Amnesty International reporting on improper working conditions mining Cobalt in Democratic Republic of Congo.

Groupe PSA looks out for these reports and decides whether to take corrective or preventive action against its suppliers. In particular for Cobalt, battery suppliers have strict obligations to disclose their Raw Material suppliers to Groupe PSA. This is an extended part of the Groupe's T&C's for this specific commodity,

- journalists are also a valuable source: through their investigations they alert us on potential issues, such as the UK newspaper "The Guardian" reports on poor working conditions and child labour in Indian Mica mines. The Purchasing Department decides whether to take targeted action against any supplier potentially involved. Again in 2018 all paint suppliers were asked to confirm that the mica used in the Group's products was not extracted under the conditions described in the report and their accomplishments in fighting against such working condition,
- under the Group's Global Framework Agreement on Corporate Social Responsibility, it works closely with trade unions which send regular reports of potential violations by suppliers. These reports lead to action being taken against suppliers by the Purchasing Department, which requests an explanation or performs an audit to resolve the issues flagged (see 3.1.1).

All reports are reviewed and action is taken against the suppliers concerned: letter from the Head of Purchasing, on-site audit, etc.

#### 4.2.2.5. Monitoring and measuring implemented initiatives and assessment of their effectiveness

GRI.407-1

GRI.408-1

GRI.409-1

Internal checks verify the effectiveness of the measures implemented, as shown below.

##### Transparent communication on the results of due diligence

GRI.308-2

GRI.414-2

##### RESULTS FROM 2017 ON IATF AUDITS OF SUPPLIER PRODUCTION PLANTS

2017 IATF audit of supplier production plants	Certified	Missing certificates*
Active supplier production plants	68%	32%

\* Missing certificates are those that cannot be found in the IATF database.

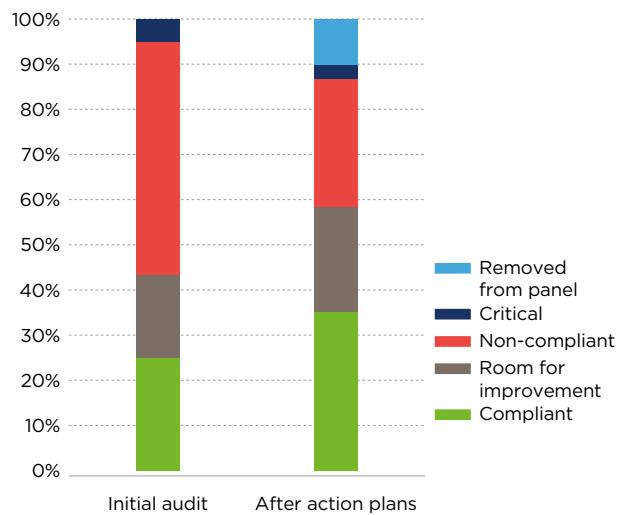
##### CSR PERFORMANCE OF GROUP SUPPLIERS ASSESSED BY AN EXTERNAL COMPANY (ECOVADIS)

	Compliant	Minor non-compliance	Core non-compliance
Global CSR performance	63%	35%	2%
Environmental performance	68%	30%	2%
Social performance	63%	35%	2%
Ethical performance	47%	49%	4%
Subcontracting chain management	38%	52%	10%

##### SUMMARY OF 2018 AUDITS OF CRITICAL SUPPLIERS

General organisation	Sub-topics	Observations	Minor non-compliance	Core non-compliance	Critical non-compliance	Total
CSR policy	CSR policy	1	1	0	0	2
	Uphold freedom of association and the effective recognition of the right to collective bargaining	1	1	0	0	
	Elimination of any forms of forced or compulsory labour	0	0	0	0	
	Abolition of child labour	0	0	1	0	
	Elimination of discrimination in terms of employment and occupation	0	0	0	0	
	Anti-corruption measures and the prevention of conflicts of interest	1	0	0	0	
Human rights	Labour organisation and disciplinary practice	0	0	0	0	4
	Remuneration	0	1	1	1	
Working conditions	Working hours	0	0	6	4	13
	Organisation	1	7	3	0	
	Buildings	0	4	1	0	
	Fire Prevention	3	5	9	1	
	Machines/electrics	1	5	1	0	
	Hazardous substances	1	4	5	0	
Workplace health and safety	Canteen	1	2	0	0	
	Dormitories	0	0	0	0	54
	General organisation	0	0	2	0	
	Waste	0	2	2	0	
	Waste water	0	0	0	0	
	Air emissions	0	2	1	0	
	Soil	0	0	0	0	
Environment	Water and energy consumption	1	0	0	0	10
Management System	Supply chain	2	2	1	0	5
<b>TOTAL</b>		<b>13</b>	<b>36</b>	<b>33</b>	<b>6</b>	

#### CHANGE IN CSR PERFORMANCE OF SUPPLIERS ASSESSED BETWEEN 2008 AND 2018



#### Measures taken if suppliers are found to be non-compliant with CSR requirements

The Group has introduced a comprehensive toolkit to measure the social and environmental performance of its suppliers and to identify any shortcomings or risks. The suppliers questioned or audited systematically receive an analysis of their performance. For suppliers who do not achieve the required standard, a corrective action plan is put in place.

The buyer and CSR coordinator arrange meetings to help suppliers implement action plans. Suppliers also have access to an e-learning tool, which gives them a better understanding of the Group's expectations in terms of CSR.

Several types of non-compliance may be identified (see above table). Suppliers who are found to be non-compliant or critical will be closely monitored and corrective actions including being excluded from the Group's supplier panel, may be taken.

Here are some examples of actions taken by suppliers following CSR audits carried out by the Group that were re-audited in 2018 (taken from reports of on-site audits):

- development of a sustainability policy and actions to inform and train employees about it within the company';
- policy deployment and training for employees on anti-corruption followed by the creation of an alert process to identify bribery;
- implementation of equivalent policies on human rights, safety and environmental issues for own suppliers and further down the supply chain into lower tiers within the supplier assessment system.

#### Complaints made against the Group for CSR infringements and measures taken

- Environmental impacts: no complaints were filed against the Group through official channels in the reporting period.
- Impacts on employment: a dedicated team works alongside suppliers to develop alternative solutions to minimise impacts (see 4.1.2.2 on the French automotive industry).
- Human rights impacts: no complaints were filed against the Group through official channels in the reporting period.
- Social impacts: no complaints were filed against the Group through official channels in the reporting period.

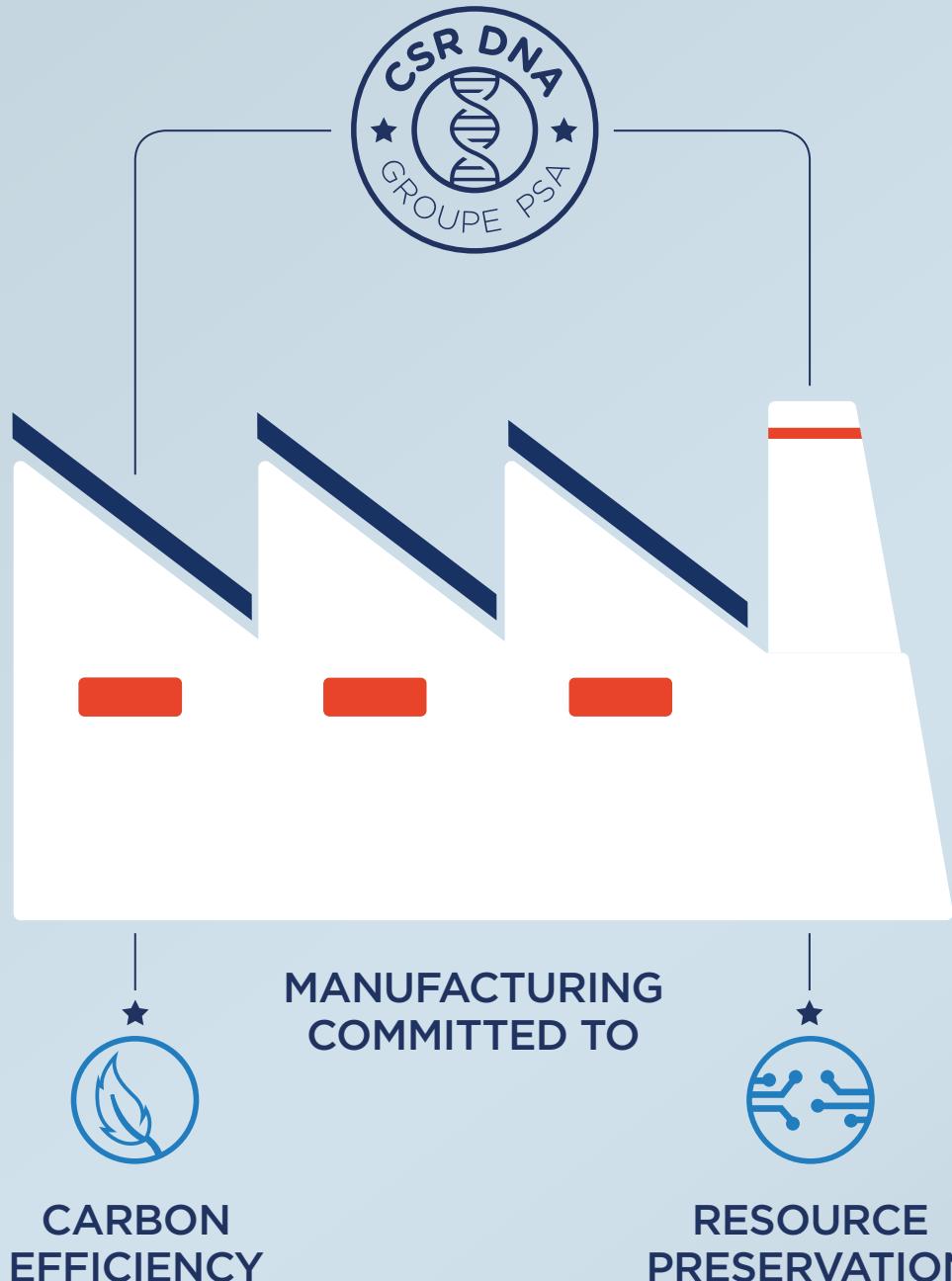
### 4.3. REPORTING SCOPE AND METHODOLOGY GRI.102-48 GRI.102-49

The Purchasing Department covers procurement for PSA Automobiles S.A. (which includes the Group's industrial and support activities) and on behalf of the central brand divisions. It is also responsible for the core purchases made by BANQUE PSA FINANCE (BPF).

The scope of reporting does not include subsidiaries jointly owned with other car manufacturers or joint ventures accounted

for by the equity method, due to the Group's lack of exclusive control within the subsidiaries. In these joint ventures, the Group exercises its role as shareholder and industrial partner with a view to long-term development.

In 2015 the Group acquired Mister Auto, an online spare parts retailer. The purchasing processes and policies described in this section apply to Mister Auto.



Following the Paris Agreement on Climate, the Group's plants are committed to reduce their emissions to reach carbon neutrality by 2050. All industrial processes are designed to optimise use of natural resources and waste recovery, notably through circular economy loops.



# 5.

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

GRI.102-15 GRI.103-1

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Groupe PSA has identified six material environmental issues concerning its manufacturing operations:

- **“Energy/industrial carbon footprint”**

As a result of its energy consumption, the car manufacturing process generates greenhouse gases. The 1.1 million tonnes released by the plants every year represent a challenge for each manufacturing plant.

The Group's ambition to reduce and eventually eliminate greenhouse gas emissions relies on reduced energy consumption through controlled production processes, reduced factory land use through more compact workshops and the use of carbon-free energy. This will prevent the expected tax increases on fossil energies from adversely affecting operating costs. By 2050, all plants will be carbon-neutral, which will be achieved through the use of renewable energies and new carbon-free technologies, and by offsetting inevitable emissions.

See 5.2. for more details.

- **“Environmental performance in the supply chain: purchasing and logistics”**

The environmental impact production related of transport is far-reaching, ranging from localised impact (sound, air pollution, etc.) to global warming. This impact accounts for 1.5% of the Group's CO<sub>2</sub> emissions. The challenge for car manufacturers is to optimise transport plans, the loads and volumes carried and the use of multimodal transport, in order to reduce not only their cost and environmental impact, but also upstream and downstream delivery times, which is a decisive factor in customer satisfaction. Exposure to ecotaxes levied on transport, as well as fossil energy price fluctuations, are major factors for consideration.

The carbon impact of logistics is addressed in 5.2.5. The environmental issues related to purchasing are discussed in 4.2.11.

- **“Control of industrial discharges and nuisances”**

The automotive production processes involve many substances and products that generate potentially polluting emissions affecting air quality, natural environments<sup>(1)</sup> and the quality of life in the neighbourhood. Air emissions are the result of combustion products, which are limited through the exclusive use of gas for fuel and through volatile organic compounds (VOCs) in the painting workshops, which account for only 1% of total VOC emissions in France.

The target for 2050 is “zero-VOC emissions” for all manufacturing operations, with the rollout of clean painting processes and/or the post-processing of residual emissions. Lastly, noise and odour levels are monitored to control pollution in local communities.

See 5.3. for more details.

- **“Optimisation of material cycles in industrial processes (including waste)”**

Industrial efficiency can also be assessed based on the optimisation of materials used in processes and the recovery of waste produced. This is especially true given that waste management regulations are becoming more stringent in many countries where the Group has operations.

Today, 75% of the waste produced is metal waste which is subsequently recycled. Other waste which accounts for 107 kg/car, is recovered at a rate of 91%, and many plants, including OV's, are landfill free. The Group's ambition is to achieve 100% recovered waste in the medium-term (by 2035) with positive economic performance (by 2050). This will be achieved through short circular economy cycles, an appropriate component of packaging (which comprises 50% of waste taken from bodywork plants), and less diversity in the use of materials.

This will have a positive impact on a vehicle's production cost. The rationalisation of materials' consumption, the decrease in the volume of waste per vehicle and the optimal recycling of this waste guarantee economic efficiency and ecological performance in line with the principles of the circular economy. See 5.4. for more details.

- **“Sustainable water management”**

Water has only become a major issue in recent years. Previously, it was a resource that was inexpensive and freely available, and consumption amounted to about 4 m<sup>3</sup>/car. With the Group's establishment of facilities in more sensitive regions, the situation has changed, and the consumption curve has begun to show a downward trend.

To anticipate conflicts of use in water-stressed areas, which could have significant repercussions (adverse environmental effects due to reduced water availability, disruption in ecosystems, change in relations with stakeholders due to economic and social impacts, etc.), and to comply with a developing regulatory framework, the Group is continuing its efforts in this direction through more thorough assessments of its water-consuming activities, by establishing less water-dependent processes and by considering the recycling of its industrial water. This will result in zero water consumption by 2050, with the exception of evaporated water from the manufacturing process.

Lastly, the Group aims to minimise the impact of discharge into water bodies.

See 5.5. for more details.

- **“Biodiversity”**

The loss of biodiversity is becoming a major public concern. The impact of the Group's manufacturing operations is relatively limited. However, most of the plants have conducted biodiversity inventories and have developed programmes to increase the workforce's awareness on this topic. They also conduct projects with universities in most of the cases where the issues are focused relevant to the areas around the plants.

These assessments will help us to confirm action plans for the years to come, in addition to the Amazon carbon sink plan established by the Group several years ago.

See 5.6. for more details.

Faced with these issues, Groupe PSA has set up the following systems.

<sup>(1)</sup> In particular, sulphur oxides (SO<sub>x</sub>) and nitrous oxides (NO<sub>x</sub>), as well as volatile organic compounds (VOCs), are known to cause acidification (formation of acid rain), eutrophication (disruption in ecological balance due to an excess of nitrogen) and photochemical smog (formation of oxidising agents, such as ozone).

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

## COMMITMENTS SCOREBOARD

MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Climate change</b>  	<b>Energy/ industrial carbon footprint</b>  Organiser: Industrial Director	<b>By 2050</b>  Guarantee the carbon neutrality of the Group's plants (zero CO <sub>2</sub> emissions) through: <ul style="list-style-type: none"><li>the use of renewable energies, mostly through self-energy supply;</li><li>offsetting residual emissions (reselling the excess energy produced, developing forests, etc.).</li></ul>	<ul style="list-style-type: none"> <li>Energy consumption of 2.14 MWh, i.e. 370 kg CO<sub>2</sub> eq. emitted per vehicle produced (of which PCD: 2 MWh, i.e. 263 kg CO<sub>2</sub> eq.).</li> <li>Increasing the share of renewable energies in electricity consumption to 22% (of which PCD: 19%).</li> </ul>	<p><b>Target partially met</b></p> <p><b>Target met</b></p> <ul style="list-style-type: none"> <li>Energy consumption 1.997 MWh/c and 372 kg CO<sub>2</sub> emitted per car produced, excluding cogeneration emission. It represents 1.162 kt CO<sub>2</sub> in absolute emissions.</li> </ul> <p><b>Target not met</b></p> <ul style="list-style-type: none"> <li>Part of renewable 17%.</li> </ul>	<ul style="list-style-type: none"> <li>Reach energy consumption at 2.07 MWh per car produced. i.e. 1.100 kt CO<sub>2</sub> in absolute emissions (345 kg CO<sub>2</sub> per car), excluding emissions from cogeneration plants operated by PSA.</li> <li>Increase the share of renewable energies to 22%.</li> </ul>
	<b>Environmental performance in the supply chain: purchasing and logistics</b>  Organisers: Industrial Director and Head of Purchasing	<b>By 2035</b>  <u>The long-term purchasing</u>  Ambition on this matter is presented in the scoreboard in the introduction to section 4.  <u>Logistics</u>  Reduce CO <sub>2</sub> emissions for each vehicle transported by 33% between 2016 and 2035 (i.e. -2.1% per year, in line with the Paris Agreement), primarily by limiting intercontinental flows. This will be achieved by regionalising the Group's activities and by optimising transport patterns (routes, transportation mode, filling rate and packaging, etc.).	<u>Purchasing</u>  KPIs are presented in the scoreboard in the introduction to section 4.  <u>Logistics</u>  <ul style="list-style-type: none"> <li>For PCD: Reduce the Group's CO<sub>2</sub> emissions in the upstream and downstream supply chain worldwide, per vehicle and per kilometre by 2.1% per year compared with 2016 to meet the 33% reduction target between 2016 and 2035.</li> <li>For OV: Define the benchmark and roadmap for the reduction of CO<sub>2</sub> emissions in upstream and downstream supply.</li> </ul>	<u>Purchasing</u>  KPIs are presented in the scoreboard in the introduction to section 4.  <u>Logistics</u>  <p><b>Target partially met</b></p> <p><b>Target not met</b></p> <ul style="list-style-type: none"> <li>For PCD: upstream (not met); 186 kg CO<sub>2</sub>/car vs 192 in 2016, slightly below the objective (184 kg CO<sub>2</sub>/car).</li> </ul> <p><b>Target met</b></p> <ul style="list-style-type: none"> <li>For PCD: Downstream 63 kg CO<sub>2</sub> per car vs 71 in 2016.</li> </ul> <p><b>Target met</b></p> <ul style="list-style-type: none"> <li>For OV: baseline defined: <ul style="list-style-type: none"> <li>upstream: 249 kg CO<sub>2</sub>/car;</li> <li>downstream: 59 kg CO<sub>2</sub>/car.</li> </ul> </li> </ul>	<u>Purchasing</u>  KPIs are presented in the scoreboard in the introduction to section 4.  <u>Logistics</u>  <ul style="list-style-type: none"> <li>Reduce the Group's CO<sub>2</sub> emissions in the upstream and downstream supply chain worldwide, per vehicle and per kilometre by 2.1% in line with Group's climate trajectory (33% reduction target between 2016 and 2035).</li> </ul>

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Natural resource scarcity</b>  	<b>Optimisation of material cycles in industrial processes (including waste)</b>  Organiser: Industrial Director	<b>By 2035</b> <ul style="list-style-type: none"> <li>Minimise waste volume for all industrial processes, from conception to mass production.</li> <li>Ensure 100% waste recovery in local loops of the circular economy.</li> </ul>	<ul style="list-style-type: none"> <li>Reduce the waste per vehicle produced to 45 kg.</li> <li>Zero landfill waste in assembly plants in Europe.</li> </ul>	<b>Target not met</b> <ul style="list-style-type: none"> <li>Waste: 52.2 kg per car produced excluding demolition waste.</li> <li>12 assembly plants in Europe (out of 15) are landfill free.</li> </ul>	<ul style="list-style-type: none"> <li>Reduce waste per vehicle produced to 50 kg per car (excluding demolition waste).</li> <li>Increase the number of landfill-free assembly plants from 12/15 in 2018 to 13/15.</li> </ul>
	<b>Sustainable water management</b>  Organiser: Industrial Director	<b>By 2050</b> <p>Water abstraction is limited to the compensation of evaporation to the sole compensation of the evaporated water during industrial processes (closed cycle -0.5 m<sup>3</sup>/vehicle produced). Prevent any discharge into water.</p>	<ul style="list-style-type: none"> <li>Water consumption at 3.8 m<sup>3</sup> per vehicle produced (of which PCD: 3.3 m<sup>3</sup>).</li> <li>Map the water emissions of all PCD + OV industrial plants.</li> </ul>	<b>Target met</b> <ul style="list-style-type: none"> <li>Water consumption: 3.8 m<sup>3</sup> per car produced.</li> <li>Water emission mapping for all plants.</li> </ul>	Reduce water consumption to 3.7 m <sup>3</sup> per car produced. Scope of emission of the 4 main heavy metals in waste water per plant.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Health and safety: growing demand of civil society</b> 	<b>Control of industrial discharges and nuisances</b> Organiser: Industrial Director	<p><b>By 2050</b></p> <p>Protect residents from all noise and odour nuisances and all soil and air pollution:</p> <ul style="list-style-type: none"> <li>• to be checked as soon as new locations are chosen;</li> <li>• through continuous monitoring and corrective plans if discrepancies are observed in operating sites;</li> <li>• by improving VOC treatment processes to achieve zero emissions.</li> </ul>	Limit VOC emissions to 2.8 kg per vehicle produced.	<p><b>Target not met</b></p> <p>VOC emissions: 2.97 kg par car produced (increase due to increase of car size and OV integration, with large amount of cars produced in solvent-based plants). Average VOC emission in g/m<sup>3</sup> has slightly decreased.</p>	Limit VOC emissions to 3.05 kg per car produced and maintain stability in VOC emissions in g/m <sup>3</sup> . Continuous increases in vehicle sizes and demand for two colours may cause issues.
	<b>Biodiversity</b> Organiser: Industrial Director	<p><b>By 2035</b></p> <p>Ensure that each of the Group's plants commits to biodiversity knowledge and preventative actions relevant to its geographic scope, resulting in the annual publication of a fauna/flora review (prepared by a third party - either universities or local associations).</p>	15% of the plants have prepared their first fauna and flora review.	<p><b>Target met</b></p> <p>15% of the plants have had a fauna and flora appraisal carried out.</p>	Prepare fauna and flora reviews for 30% of the plants.

### 5.1. THE GROUP'S ENVIRONMENTAL PROTECTION POLICY AT MANUFACTURING LEVEL: ORGANISATION AND STRATEGY

GRI.103-2

GRI.103-3

**The environmental policy of the Group's Industrial Department applies to all regional division entities.** It aims to reach optimum operational efficiency, thus ranking it among the best in the world. This vision requires all Group plants to embrace the "Excellent Plant" concept, on a par with the world's leading manufacturers, by pooling the know-how of the various industrial business teams, including environmental activities.

Targets responding to each of the main challenges have been set up to 2025 and are part of a vision looking further ahead to 2050. Having defined the path, the attainment of intermediary targets will be based on five fundamentals, which are already well established:

- ensure compliance with all legal requirements and transparency in relations with administration bodies;
- involvement of all staff;

#### 5.1.1. A solid, proven organisation

DPEF.15

DPEF.31

For many years, the Group has been engaged in proactive environmental stewardship at its production, research and development sites. The Group has a commitment to ensuring that their operations comply with local regulations, fully safeguarding the surrounding environment and the quality of life of host communities, while demanding continuous improvement.

**The Group's industrial strategy integrates environmental protection with a commitment to continuous improvement based on rigorous organisation, a methodology that is structured around the Environmental Management System (ISO 14001 standard), and the allocation of adequate financial resources.**

The main environmental aspects and risks are identified according to widely-applied internal rules, which ensure an harmonised approach.

Environmental data for all industrial facilities are collected through the same software. The data collected since 1989 have been retained, which has allowed the Group to prioritise and work effectively on the most important environmental challenges relating to its operations.

**Within the Automotive Division, to ensure that the targets are met, the Group has identified the environment as a key function within the business competences needed to cover all of its core operations.** According to this conclusion, necessary skills are listed and the training path for every major environmental contributor is defined, thus contributing to the full completion of his or her activity. These training courses include face-to-face sessions where people can share learning and experiences alongside, e-learning courses, and learning is monitored to ensure knowledge is maintained at an optimum level.

- rollout of an Environmental Management System at all manufacturing sites in line with ISO 14001 and require suppliers to maintain similar certified management systems;
- production methods which incorporate the best available technologies not entailing excessive cost and energy efficient processes from the design stage onwards, covering all the aspects of production (logistics, maintenance, production);
- employing shared best practices in these production methods to optimise consumption and emissions.

Above these basic requirements, plants are encouraged to go further. As an example, OV is implementing a programme leading to ISO 50001 certification of all its plants.

On operational level in each facility, an environmental engineer is in charge of implementing and managing the Environmental Management System according to the Group's commitments, and in compliance with ISO 14001 standard. This engineer works with representatives appointed in each workshop, and is part of a network of specialists in environmental management.

The Environmental Central Department is in charge to help the facilities with legal compliance and to coordinate the Environmental Management System in all facilities. To ensure compliance to ISO Standard and assure continuous improvement in line with the environmental targets as mentioned previously.

The Research and Development Department also has environmental specialists who provide technical support to the plants, particularly during capital projects.

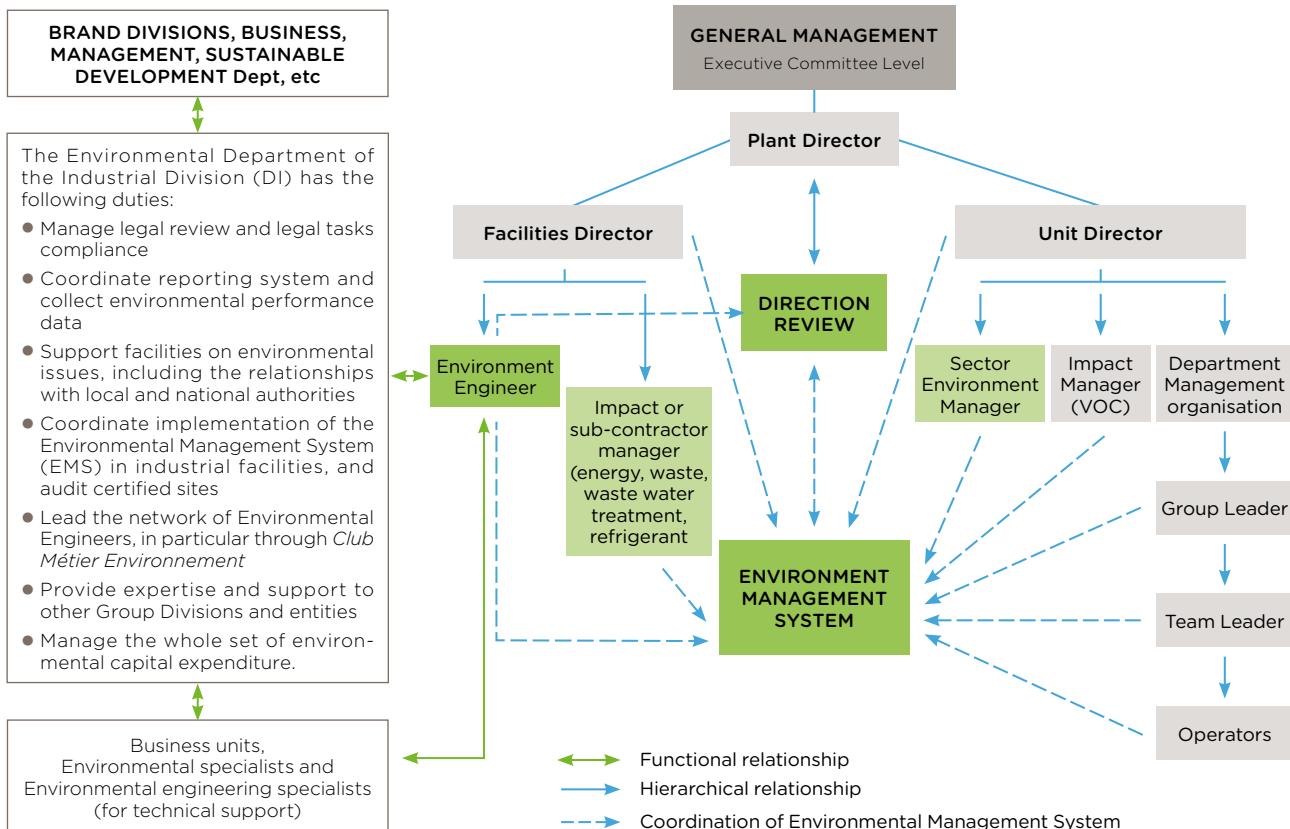
In all, some 500 people are directly involved in managing the Group's industrial environment.

In October 2018, the Group's Kaluga plant was recognised for its good environmental management and won an award in the "Enterprise ECO 2018" competition for the second year running. They achieved second place in the "environmental responsibility in production, large production plant" category.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

The Group's environmental protection policy at manufacturing level: organisation and strategy

## GROUPE PSA ENVIRONMENTAL MANAGEMENT ORGANISATION



### 5.1.2. Environmental issues at the heart of the industrial strategy

#### 5.1.2.1. The “Excellent Plant” roadmap:

The Group's “Excellent Plant” industrial strategy aims to position each production plant among the best global automotive sites across all areas of industrial performance. **In addition to production and quality performance, the Excellent Plant strategy aims to control and reduce the environmental impacts of the Group's operations.** Given the number and size of its operating sites, and the scope of its operations which range from sourcing supplies for production (casting, components, sub-assemblies, finished vehicles, etc.) to the delivery of vehicles for sale, the Group is aware of its responsibility to protect the ecosystems in which it operates.

**To this end, the Group has implemented environmental management systems at all manufacturing sites** – along with others which could potentially have significant environmental impacts – based on the PDCA process as set out in ISO 14001. **All systems are independently certified and a plan has been established for all certification audits to be carried out by one body in the future, ensuring a high-level of consistency.** This environmental policy fosters the development of better energy consumption practices in the production plants and helps to reduce environmental impacts.

#### STAKEHOLDERS DIALOGUE

In accordance with the commitments made under its Global Framework Agreement, the Group presents a review of how it is applying this agreement in view of Groupe PSA social responsibility every year at the plenary meeting of the Group's European Works Council (expanded to include the Global Works Council with Argentina, Brazil and Russia). It discusses the initiatives undertaken under commitment No. 15 of the agreement, namely environmental protection.

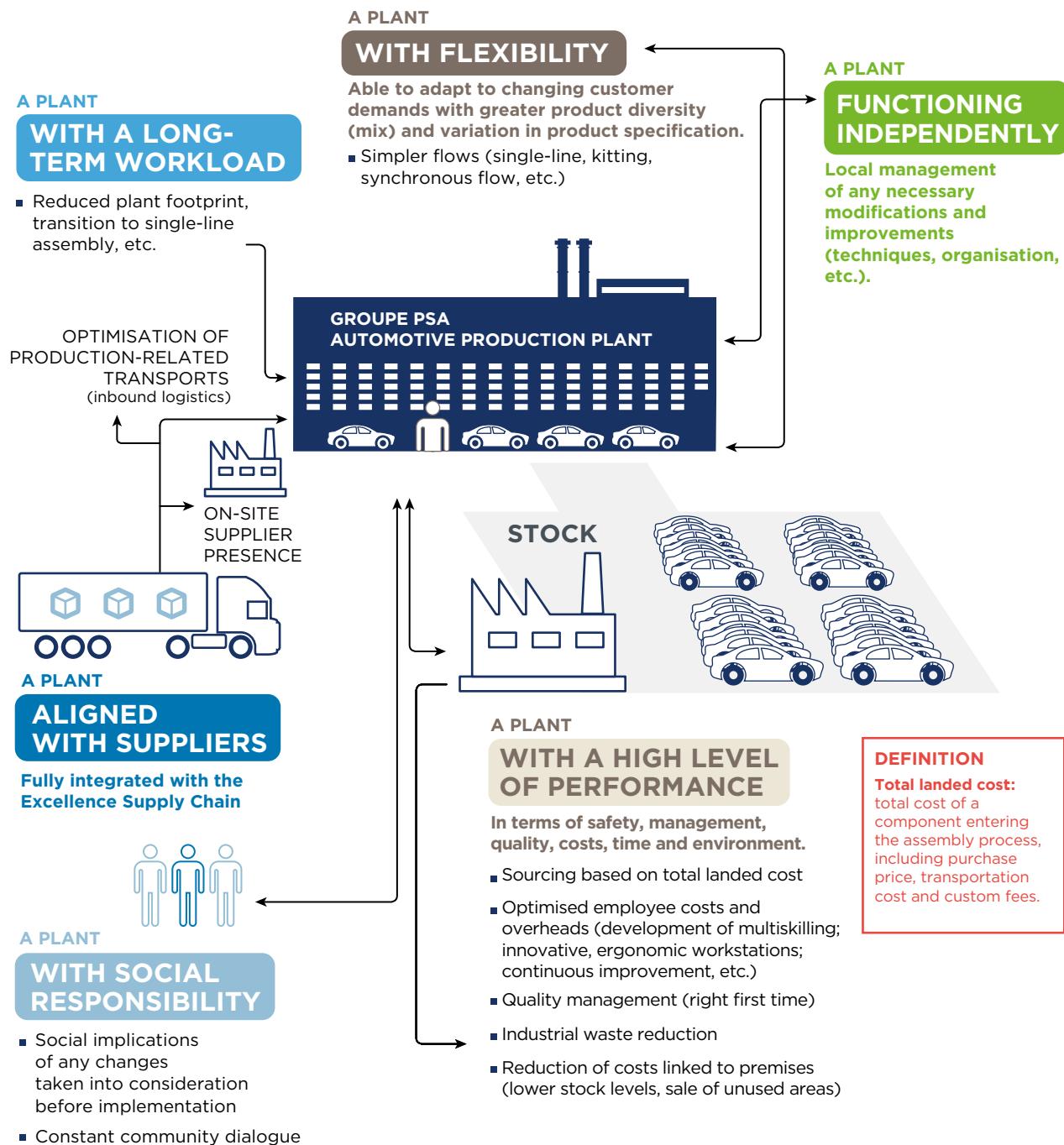
Accordingly, every year, the worldwide indicators (water and energy use, greenhouse gas emissions, volatile organic compound emissions, waste production and recovery rates) are presented to the employee representatives and compared with the Group's commitments in the field.

“The Excellent Plant - Groupe PSA” video: <https://www.youtube.com/watch?v=oXGoxxVTDe4&index=10&list=PL7E48342FA2A19DE8>

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

The Group's environmental protection policy at manufacturing level: organisation and strategy

### THE GROUP'S INDUSTRIAL STRATEGY: THE EXCELLENT PLANT



From an environmental point of view, the contribution to the Excellent plant is based on the best performance relating to each environmental aspect, and determined annually in all the group's facilities. the exchange of best practices between the

different plants is the basis on which each plant improves its own performance and reduces the distance between it and the best performers.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

The Group's environmental protection policy at manufacturing level: organisation and strategy

## 5.1.3. Resources implemented

### 5.1.3.1. Environmental risk analysis

Conducted in accordance with ISO 14001, this analysis means that the significant environmental aspects linked to the sites' operations can be identified for each site and integrated into the Environmental Management System. The analysis, which is regularly updated, serves to identify the core environmental challenges at each plant and prepare action plans to address these challenges, which are approved and monitored by management.

**Regular audits by the Internal Auditors and an accredited testing laboratory (UTAC) provide assurance that the Environmental Management System is properly applied.** OV also follows a standardised risk evaluation process and carries out quarterly risk assessments on all manufacturing sites and reports these to senior leadership. In addition, clear cases of non-compliance are reported, providing a risk overview to the senior leadership. This process ensures that - in addition to the sites' risks - corporate risks are recognised and addressed.

### 5.1.3.2. An active certification policy

DPEF.10

DPEF.15

An Environmental Management System is in place at all Group production plants. It is based on the international standard ISO 14001, which is an acknowledged standard for management and organisation. This approach has made it possible to implement a common environmental strategy, to identify the material environmental aspects of each site and to reduce their impact accordingly, to draft procedures and standards for the policy's successful implementation and functioning, to drive regulatory compliance, and to strive for continuous improvement – the foundation of environmental protection.

#### The Environmental Management System

A new version of ISO 14001 was published in September 2015. It introduced major changes to the Environmental Management System. The key changes relate to:

- greater focus on leadership and the involvement of senior management;
- considering the plant's context to strengthen the correlation between strategy and environmental approach;
- process-based management;
- considering life cycle issues, risks and opportunities, and strengthening dialogue with the most relevant stakeholders.

For the PCD scope, these changes created an opportunity to drastically update the Environmental Management System of the plants. The EMS is now **fully in line with the Group's Excellence System (PES), and the operational processes now incorporate environmental considerations.** In the course of rolling out and adopting these production processes, each manager knows and controls their entity's contribution to the plant's environmental progress. The stakeholders' requirements for each process are identified, and the managers will consider the requirements that they deem to be relevant, in addition to the related risks and opportunities. Lastly, the life cycle approach, implemented for the automotive product, is currently available for the activities and services that the plants are able to control or influence. **This new approach ensures that all Group employees are much more involved in controlling environmental impacts, and that any discrepancies can be dealt with closer to the source.**

The major changes generated by this new standard are coordinated by the Environment business line which, in collaboration with plant specialists, develops this new Environmental Management System and ensures its cross-site consistency.

The implementation of a structured and audited approach surrounding the ISO 14001 standard helps to strengthen the system for preventing environmental impacts, incidents and damage, and to effectively manage natural resource use and waste production. Moreover, ISO certification demonstrates the Group's environmental commitment to local authorities and stakeholders.

The OV plants are also all certified according to the same ISO 14001 standard. **The convergence and harmonisation of environmental management systems will be one of the projects initiated in 2018 to successfully establish a uniform system shared by all manufacturing plants by 2022.** At that time, the plants will all be audited using the same process. This timeline is required so that the PSA Excellence System (PES) can be implemented in OPEL and VAUXHALL facilities, and then so that an Environmental Management System can be developed in line with PES. As a first step, all Groupe PSA plants will be audited by the same external third party (UTAC). This will be an opportunity to cross-check practices.

#### The involvement and skills of everyone

The key elements in successfully controlling the environmental impact of sites are the competency and involvement of the individuals in the environmental sector.

In 2018, 45,500 hours of training were provided to increase the up-skilling of employees with respect to environmental issues, in line with the requirements from the Environmental Business channel. In addition, training was provided directly in the workshops by unit managers as part of the "PSA Excellence System" management control. These training sessions enable environmental impacts to be controlled in the workplace. Lastly, as part of ISO 14001, each employee, whether they are on permanent or fixed-term contracts or temporary or work experience contracts, receives environmental awareness training appropriate to their position and function. This initiative also applies to external service providers working at the plants when the prevention plan is being established. For OV, similar operational training is being organised through toolbox training and five-minute talks, allow specific environmental aspects to be presented to employees in an accessible way. This type of training added up to more than 10,000 hours in 2018.

45,500

hours dedicated to environmental training in 2018

**Sharing experience is also a way of accelerating environmental progress.** Since 2015, an environment business club regularly brings together all environmental managers, either by audio-conference or face-to-face at a manufacturing plant. This club fosters fruitful discussions between Environmental managers to exchange environmental best practices and incorporate them into the shared Environmental Management System. This joint work is encouraged by annual award ceremonies recognising the plants with the best performance in terms of controlling

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their environmental impacts (waste production and water use). Three establishments were recognised in this way in 2018: an assembly plant (Vigo - Spain for its 2017 results), a components plant (Trémery - France) and an office and research facility (Vesoul - France Central Warehouse).

In 2019, since all facilities will use the same reporting tool for data collection, this good practice, which already existed in a different format in the OV plants, will be rolled out to them to enhance this continuous improvement process.

### ISO 14001 certification schedule for the manufacturing plants

**Launched more than 20 years ago, the certification process is now fully implemented in the production plants, which are all ISO 14001 certified.** Today, the process is being deployed in R&D and spare parts facilities. ISO 14001 certification is part of the standards with which each new production plant must comply. In 2018, all plants comply with new ISO 14001-2015 standard.

#### SCHEDULE OF THE FIRST ISO 14001 CERTIFICATIONS OF MANUFACTURING PLANTS

1995	1997	1999	2000	2001	2002	2003	2004	2007	2010	2014
Ellesmere Port	Eisenach	Mulhouse	Poissy	Rennes	Caen	Metz	Saint-Ouen	Trnava	Belchamp	Kaluga
	Szentgotthard	Sochaux	Vigo	Porto Real	Charleville-Mézières		Mangualde		Vesoul	
	Zaragoza	Trémery	Héricourt	Sept-Fons		Bochum				
	Aspern	Madrid		Valenciennes			Rüsselsheim	Rüsselsheim (R&D)		
		Buenos Aires		Gliwice						
		Sevel Nord		Kaiserslautern						
		Française de Mécanique								
		Luton								
		Tychy								

Beyond this scope, the following automotive industry joint ventures are certified: TPCA with Toyota located in Kolin, Czech Republic, DPCA with DONGFENG MOTOR CORP. located in Hubei Province (Wuhan and Xiangfan) in China, Kaluga with Mitsubishi located in Russia, and Sevelsud with Fiat located in Val Di Sangro, Italy.

#### 5.1.3.3. Using the best available techniques without excessive cost

DPEF.15

DPEF.16

The Industrial Department's environmental policy is developed starting with the design of new production methods, so that environmental impacts can be taken into account. The Industrial Environment Department carries out regulatory monitoring to identify future structural regulatory change, and it shares this data with the production resources design departments to better anticipate future regulatory constraints which production plants will need to comply with. This fully reflects the Group's commitment to setting an example in all territories in which it operates, via the Excellent Plant concept, which aims to mobilise all Group plants around attaining the best global level, including in terms of environmental impacts.

#### 5.1.3.4. Environmental expenditure related to manufacturing

Environmental expenditure is broken down into three components:

- environmental risks are taken into account in new production process design, and the prevention of these risks is integrated in equipment design, and are part of overall industrial capital expenditure. In 2018, we estimate that 1% of total industrial capital expenditure is related to environmental risk management;

- a specific annual capital expenditure plan, managed by the Industrial Environment Department, used to fund plant compliance measures relating to regulatory changes and the reduction of pollution and environmental risks. This annual capital expenditure plan was €4.5 million in Europe in 2018;
- a specific training plan that guarantees the implementation and development of employees' environmental skills (see 5.1.3.2.).

100%  
of plants are ISO 14001-certified

#### FOCUS: the Carry Over, or how to give a second life to industrial assets as part of a circular economy approach

The Carry Over, which refers to the reuse of industrial assets (including large assets) has become one of the strategic areas of the Group's Industrial Department over recent years. Based on the circular economy principle, the approach consists of recycling and adapting machines rather than purchasing new equipment. Machines and tools that are no longer used can be reused within the same plant, in other Group plants or even sold outside of the Group. This methodology has been implemented in OV plants, for example to launch production of EB engines in Tychy and Szentgotthard and gearboxes in Aspern, by adapting existing lines to these new products.

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The advantages of Carry Over practices are numerous:

- decreased environmental footprint at the plants: by encouraging the reuse of existing equipment rather than purchasing new equipment, this solution enables the Group to reduce its pressure on natural resources;
- economic gains: Carry Over practices helped to save 30% on capital expenditure costs to launch new projects.

The Company's management (up to the highest level) is currently committed to encouraging this economical approach.

**-30%**

on the capital expenditure cost for new projects in plants due to the reuse of industrial equipment

## 5.1.3.5. Industrial innovation

Its vision of the "Plant of the Future" projects Groupe PSA into a **new growth model designed to address key challenges**:

- performance of the industrial organisation: optimisation of flows, quality, traceability, productivity and production line flexibility;
- manufacturing technologies in the digital age: connected plant, robotics, optimised maintenance tools, 3D printing;
- sustainable plant: resource optimisation, eco-design, more compact facilities;
- human factor: learning community, training, working conditions, empowered teams.

👉 "Groupe PSA to show its Plant of the Future at the Global Industrie Exhibition" 27/03/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-show-its-plant-future-global-industrie-exhibition>  
"The Future's Plant by Groupe PSA" video: <https://www.youtube.com/watch?v=ISrFv9bAlC0&t=65s>



## STAKEHOLDERS DIALOGUE

During the Global Industrie Exhibition, which took place in March 2018 in Paris (France), Groupe PSA held 8 roundtables with invited experts on various topics, including: "Plant of the future and energy performance", "The environmental challenge at the heart of the industry of the future" and "The impact of electric and autonomous cars on the industry".

From September 2016, Groupe PSA has been creating partnerships with other manufacturers to create Factory Lab, an innovation platform managed by companies who have a set of practical needs and problems to be resolved. Groupe PSA participates in the Factory Lab to accelerate the implementation of innovative and effective solutions to increase the flexibility of its manufacturing facilities and the reliability of assembly lines, while pooling prototyping and development costs. The watchword at Factory Lab is pragmatism: the solutions put forward are immediately

tested on the ground and approved by the operators. The results are tangible. For example, one of the projects led to a significant reduction in hoist handling time (which now takes 15 minutes, compared with 3 hours previously) while making the process safer for operators.

In order to support the modernisation of its plants, the Group created the Factory Booster in 2017, a unique place that accelerates the development of cross-business subjects deemed a priority in the "Plant of the Future" project. Located in the heart of the Group's research and development centre, in Vélizy, it is a place for sharing that brings together all stakeholders who are striving to accelerate the industrialisation of innovations within the plants.



## STAKEHOLDERS DIALOGUE

In October 2018, Groupe PSA organised a "Booster Day" at the Poissy plant (France), which brought together 60 major partners including suppliers, integrators, startups, laboratories, universities, research institutes and public bodies. Organised in a consortium, the partners came up with concrete solutions to the manufacturing challenges posed by the Group, and 30 demonstrations were held/created.

Booster Day is now a key date for Groupe PSA and its partners, as it is where solutions to the issues the Group faces are identified, and they can also be tested quickly in the plants.

"Groupe PSA holds its third annual Booster Day, posing 12 technological challenges for the Plant of the Future" 10/10/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-holds-its-third-annual-booster-day-posing-12-technological-challenges-plant-future>

Many innovations have been tested and implemented in plants:

- in Mulhouse: screwdrivers operating on an industrial Wi-Fi connection to ensure the right settings and recover traceability data, collaborative robots hand-guided by operators to learn the right path, RFID technology to implement a connected logistics system, etc.;
- in Sochaux: the plant is testing automated technology on a portion of its logistics platform. The TractEasy autonomous industrial tow tractor can navigate the plant environment without any human intervention. This is a world first in the manufacturing industry and the technology on trial is one example of the 4.0 industry solutions that the Sochaux plant aims to adopt as part of its Sochaux 2022 transformation project.



"Groupe PSA and EasyMile trial an autonomous tow tractor in Sochaux" 19/09/2018 press release: <https://media.groupe-psa.com/en/groupe-psa-and-easymile-trial-autonomous-tow-tractor-sochaux>

The Trémery-Metz division also includes an innovative industrial ecosystem with FFLO (Future Factory @Lorraine), an original platform for the integration of new technologies, which encourages industrial collaboration and enables the development of innovation on the ground to meet current requirements. For example, a pilot line, similar to part of a production line, is now in place. This validates certain technologies before they are implemented on the production line (kitting, collaborative robots, etc.).

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"The Full Kitting" video: <https://www.youtube.com/watch?v=Uma7uAqSahA>

Lastly, efficient and easy-to-implement operational actions are also being rolled out in the plants. 3D printing is rapidly expanding, and has applications across all sectors of the industry. **Today, all PCD European bodywork plants have the necessary equipment to manufacture replacement parts used in the production processes quickly and upon request, mainly in bodywork welding and assembly processes.** This good practice has now been extended to OV and mechanical plants, and it enables each plant to manufacture small-size parts when needed.

Due to this development, plants no longer need to source parts from external workshops. This reduces CO<sub>2</sub> emissions related to local transport and removes the need for packaging and for managing these products in the inventory. The material used (a plant-based plastic) also improves the end-of-life recycling of these parts.

### 5.1.3.6. The environmental approach in the Brand dealership networks

PSA Retail encourages its points of sale to manage their environmental indicators (water, energy and waste) in order to boost their performance.

Since 2008, the Group has been using an information system that collects, monitors and consolidates environmental data from its whole network.

Since 2016, a multi-annual capital expenditure budget has been established to maintain our assets and encourage the integration of new technologies (for example LED) and the self-sufficiency of buildings, thereby improving the Group's energy footprint.

## 5.2. ENERGY AND CARBON FOOTPRINT OF MANUFACTURING AND LOGISTICS OPERATIONS

DPEF.27

GRI.103-2

GRI.103-3

Following the example of product strategy, which focuses on developing low-carbon vehicles, the Industrial Department's environmental policy is committed to supporting the Group's efforts to reduce its carbon footprint. This involves implementing the energy management approach to map the energy performance of all manufacturing plants and identifying the areas in need of attention to fully overhaul their energy patterns, and the associated short-term capital expenditure to reduce energy consumption.

Another method of reducing the carbon footprint is to take action to reduce the CO<sub>2</sub> emissions related to logistics (see 5.2.5.1).

Finally, the third reduction method identified is to increase the share of renewable energies used in the Group's industrial processes to further reduce its carbon footprint. (see 5.2.4.)

### Greenhouse gas emissions assessments

DPEF.26

Pursuant to Article L. 75 of the French Environmental Code, which resulted from the Grenelle environment laws, PSA Automobiles and approximately ten of its subsidiaries (companies employing more than 500 people) performed a greenhouse gas emissions (GHG) assessment for their operations in France (covering six greenhouse gases addressed by the Kyoto protocol) based on emissions from 2014.

These checks have taken into account the following sources, under operational control of the respective companies:

Emissions category	No.	Emission items	Example of emission sources
Direct GHG emissions	1	Direct emissions from fixed combustion sources	Energy consumption from fixed sources
	2	Direct emissions from mobile sources with heat engine	Fuel consumption from mobile sources
	3	Direct emissions from processes excluding energy	Non-combustion-related industrial processes, which could result from decarbonation, chemical reactions, etc.
	4	Direct fugitive emissions	Leakage of refrigerants, livestock, nitrogen fertilisation, treatment of organic waste, etc.
	5	Biomass emissions (land and forests)	Biomass from land activities, humid areas or the exploitation of forests
Indirect emissions related to energy	6	Indirect emissions related to electricity consumption	Production, transport and distribution of electricity
	7	Indirect emissions related to the consumption of steam, heat or cooling	Production, transport and distribution of steam, heat and cold

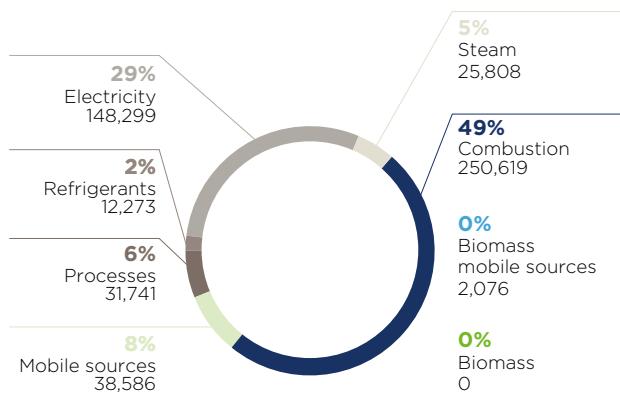
Every facility involved in this regulation has carried out its checks by applying the methodology established at the Group level, and has passed it on to the local authority in December 2015.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

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## GREENHOUSE GAS EMISSIONS ASSESSMENTS FOR PSA AUTOMOBILES SA AND ITS FRENCH SUBSIDIARIES

*in tonnes CO<sub>2</sub> equivalent*



This analysis of the direct and indirect CO<sub>2</sub> emissions of manufacturing operations is the second such analysis that was based on a similar scope and an identical methodology. This enables representative comparisons. The GHG emissions of French sites are representative of the split of emissions of all Groupe PSA facilities when we exclude the emissions from cogeneration plants operated in 3 OV facilities. As such, the findings of this comparative study can also be extrapolated to all the Group's plants.

The main conclusions are as follows:

- the target of cutting 60,000 tonnes of CO<sub>2</sub> over the 2012-2014 period was met, since the comparison shows a reduction of 80,000 tonnes. This confirms that the action plan was successful;
- more than 80% of GHG emissions are due to gas, electricity and steam consumption (items 1, 6 and 7 of the GHG assessment). Accordingly, the main lever in reducing the greenhouse gas emissions of manufacturing plants is to control energy consumption.

These observations are listed in the action plans included in each GHG assessment, which cover the 2015-2017 period and for which the total expected gain is estimated at more than 40,000 tonnes of CO<sub>2</sub> equivalent. They involve primarily the

ongoing implementation of the energy control plan (e.g. reduced electricity or gas consumption), specific GHG emission reduction initiatives (e.g. use of refrigerants with a lower global warming potential), and footprint reduction processes within plants.

In 2019, this GHG emission assessment will be conducted in the French facilities using the same methodology.

### A roadmap for industrial CO<sub>2</sub> emissions, approved by the Science Based Targets initiative.

Based on these results, in 2016 the Group established a forecast of the CO<sub>2</sub> emissions of its manufacturing operations for 2025. This study was updated in 2018 to take into account OV facilities. This action modifies the absolute data of emissions, but not the main conclusions about the main contributing factors. The question about emissions produced by cogeneration plants in order to produce electricity and steam is studied separately from this analysis:

- the impact of indirect emissions generated by electricity production based on the location of the sites, the availability of renewable energy locally. Accordingly, major discrepancies were observed between France, with its low-carbon electricity, and Poland, which relies heavily on electricity generated from fossil fuels;
- the impact of weather conditions and increasing or reducing gas consumption to heat the workshops. This study demonstrated that the difference between a mild and severe winter could cause a 15% fluctuation in industrial CO<sub>2</sub> emissions.

Nevertheless, the progress plans implemented in the plants encourage actions to reduce the main sources of energy consumption. **Site compaction, which aims to vacate certain buildings completely, helps to reduce plant sensitivity to weather conditions. The optimisation of production lines helps to control electricity and gas consumption.**

The inclusion of this information has made it possible to develop a CO<sub>2</sub> roadmap for manufacturing operations that complies with European Union commitments, namely a 60% reduction in CO<sub>2</sub> emissions over the 2010-2050 period. On a straight-line basis, this effort represents an annual decline of 2.1% as at 2010. This study also confirmed the geographical areas in which the development of low-carbon power supply solutions are given priority, thereby encouraging discussions based on possible scenarios (purchasing low-carbon electricity, local production, etc.).

## 5.2.1. Managing energy use in manufacturing activities

DPEF.24

### 5.2.1.1. Breakdown of energy consumption

GRI.302-1

Energy audits covering 65% of energy expenditure were conducted at the European sites in compliance with the criteria set out in regulations. The findings confirm the information reported in the GHG assessments, and the analysis was conducted as part of developing the Group's strategy regarding CO<sub>2</sub> emissions from manufacturing operations.

Reported energy consumption is expressed in MWh LCV (the most common unit of measurement). In terms of method, the

use of calorific values is recommended by the French decree of 31 October 2012 as part of the application of European regulation No. 601/2012 on the monitoring and declaration of greenhouse gas emissions under Directive 2003/87/EC of the European Parliament and Council. The coefficients proposed by these two regulations are derived from the work of the IPCC (Intergovernmental Panel on Climate Change), as are those of the Greenhouse Gas (GHG) Protocol, used as a reference by the Global Reporting Initiative (GRI). Following this approach, values expressed in MWh can be converted to GJ simply by applying a multiplying factor of 3.6 (1 Wh = 3.6 kJ).

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### ENERGY CONSUMPTION

Year	Combustible energy					Non-combustible energy			Total energy consumption	
	Non-renewable			Renewable	Biomass (wood)	Electricity	Of which renewable electricity	Steam		
	Heavy fuels	HHO	NG + LPG	Coke						
Automotive Division	(PCD + OV) 2018	1,477	2,272,343	86,946	17,190	3,100,239	533,186	763,858	6,242,053	
	o/w OV 2018	168	495,268			863,649	171,376	601,115	1,960,200	
	o/w PCD 2018	1,309	1,777,075	86,946	17,190	2,236,590	361,810	162,743	4,281,853	
	(PCD) 2017	794	1,770,354	86,733	15,968	2,226,320	324,162	159,603	4,259,772	
	(PCD) 2016	2,587	1,758,271	80,430	16,881	2,175,096	397,825	154,815	4,188,082	
Automotive Trade	(PCD + OV) 2018	419	4,464	91,191		77,217	17,196	1,865	175,156	
	(PCD) 2017	417	4,383	103,764		85,517	20,900	2,485	196,566	
	(PCD) 2016	432	7,290	103,540		100,090	27,768	2,542	213,893	
<b>TOTAL</b>	<b>2018</b>	<b>419</b>	<b>5,941</b>	<b>2,363,534</b>	<b>86,946</b>	<b>17,190</b>	<b>3,177,456</b>	<b>550,382</b>	<b>765,723</b>	<b>6,417,209</b>
	2017	417	5,177	1,874,118	86,733	15,968	2,311,837	345,103	162,088	4,456,338
	2016	432	9,877	1,861,811	80,430	16,881	2,275,186	425,593	157,357	4,401,974

Heavy fuel oil = HSFO + LSFO + VLSFO.

HSFO = High-sulphur fuel oil.

LSFO = Low-sulphur fuel oil.

VLSFO = Very low-sulphur fuel oil.

HHO = Home heating oil.

NG = Natural gas.

LPG = Liquefied petroleum gas.

Energy indicators are expressed in the same unit of measurement (MWh LCV) by applying officially recognised conversion coefficients.

2018 is the first year that 12 OV facilities have been integrated into the reporting. This makes comparison with previous years quite difficult, so we have provided split values to allow some analysis.

A second new element is linked to the fact that OV operates 3 cogeneration plants to produce electricity and steam from gas combustion. The above figures represent the energy consumption for automotive production. Almost 2/3 of the energy produced are used in OV plants and appear in the above figures, and the remaining 1/3 is sold to external customers, and the gas burned to produce these energies sold outside Groupe PSA represents around 550,000 MWh LCVn, which is not included in the above data.

On the PCD side, energy consumption to produce cars remains quite stable with an increase of 0.5%, whereas production has increased by 2%, and the ratio falls to 1.93 MWh/car, in comparison to 1.96 in 2017. The energy Management System in use for some years confirms that this is a good way to improve energy management performance in all facilities. In 2018, the main points were that:

- the development is comparable for all energy types, except for diesel fuel, which is only used for security equipment;

- an increase of 2% in the size of cars has a negative impact on gas and steam consumption, especially in paint shops. To compensate for this increase, continuous improvements in paint shop processes, surface reductions in some plants (Sochaux, Metz, Trémery, Vélizy) and the optimisation of offices surfaces (closure of Grande Armée) helped to limit the increase of energy use in addition to a milder winter;
- in terms of electricity consumption, use of LEDs is still being implemented in plants, and the continually improving and sharing best practices are helping to maintain the level of performance of energy use.

On the OV side, the Energy Management System is ISO 50001 certified in seven plants and has been certified for more than five years, and performance is at 2.13 MWh/car.

The share of renewable energies slightly increases in 2018 compared to 2017, at 17.2% (16.2% for PCD and 19.1% for OV). Apart from the Trnava and Porto Real plants, which purchased green electricity, no specific action was undertaken with suppliers in favour of green electricity purchases. The situation will change in 2019, in particular in Spain.

Data from Groupe PSA dealerships relate on average to 99% of sites in 2018 (100% in 2017, 98% in 2016) for direct energy consumption and 97% of sites in 2018 (99% in 2017, 98% in 2016) for indirect energy consumption. Changes in the PSA Retail dealership network's energy consumption are explained in 5.2.1.2.



### **Impact measurement and economic assessment**

The implementation of PCD's tools to manage energy saving investments in OV facilities was conducted during 2018, then it is difficult to give a global overview on the whole PCDOV perimeter for the year. The information provided below are for the last time only on PCD perimeter for economical data.

In 2018, actions to control energy consumption led to **savings of approximately €2 million on an overall bill of approximately €220 million for PCD activities**, representing a cost saving of about 1%.

These savings are broken down as follows:

- surface reduction in plants (Sochaux, Metz, Trémery, Caen, Velizy, Grande Armée and CITROËN headquarters) generate a global reduction of around 50,000 MWh of electricity, gas and air consumption combined;
- process improvement, especially in paint shops (Mulhouse and Rennes) with implementation of a new painting process called 4Wet. This development has led to an oven taken out of use in each plant. In addition, the use of robots for certain painting operations as tested in the Mangualde plant allowed the air flows in the spraybooth to be adapted (also implemented in Gliwice and Madrid). All these actions generate a reduction of around 15,000 MWh of gas consumption;
- continuous improvement and daily analysis of deviations in energy use have led to other solutions being implemented. These solutions include the adjustment of cooling temperatures (Bessoncourt) adding a solenoid valve to an air circuit (Madrid), optimisation of air flows in the workshops (Charleville), and optimisation of air flows during shut down (Rüsselsheim, Szentgotthárd). In parallel, Led implementation is being carried out in plants where they have not yet been implemented. These actions create a global reduction of approximately 10,000 MWh of gas and electricity consumption combined.

These figures are included in the vehicle production costs and affect the Group's overall economic performance. The actions implemented in the plants and listed above generate **savings of about €0.7 per car**, for the whole PCDOV perimeter.

**€2 million**

**invested in energy savings, making an €0.7 contribution to production cost control per vehicle**

#### **5.2.1.2. Change in energy consumption and energy intensity**

GRI.302-3

GRI.302-4

The Group is in the process of thoroughly reviewing its energy efficiency: a consumption control plan has allowed the Group to map the performance of the largest plants in order to identify the lines of action necessary for the full overhaul of their energy patterns, as well as the related short-term capital expenditure required to reduce consumption.

Plans are being implemented at each plant to rationalise production space, mainly by making plants more compact (retaining the same production capacity), thereby saving energy, particularly on heating and air conditioning in facilities.

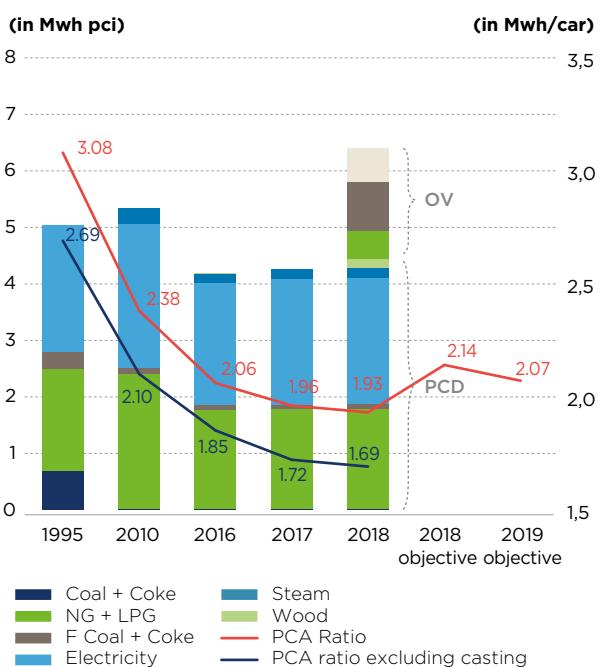
Since 1990, work to modernise facilities, replace fuel oil (since 2012) and carbon with natural gas and the development of cogeneration and energy management strategies have helped to improve energy performance and reduce greenhouse gas emissions.

Today, the success of this energy consumption management policy, which is now strongly implemented in plants, is recognised. Four PCD plants received ISO 50001 certification. The assessment after a full cycle did not show an acceleration in these plants' energy performance compared with the Group's other plants committed to the energy management strategy. It was decided not to continue this certification at the Mulhouse, Sochaux and Trnava plants and Bessoncourt facility. Seven OV plants are certified according to this standard.

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### CHANGE IN ENERGY CONSUMPTION



This graph shows the energy consumption of the Automotive Division with and without casting. This presents Group data that can be compared with data from other manufacturers in the sector without casting operations.

Within the Automotive Division, vehicle manufacturing uses energy for a wide range of industrial processes including casting, machining, paint curing, heat treatment, etc., as well as lighting and heating buildings.

Energy consumption has changed significantly since 1995, and the energy consumed per painted vehicle has decreased significantly. The reasons for this change are as follows:

- increased vehicle production;
- changing production processes. The painting processes, which represent the largest part of the plants' energy consumption, have seen major changes. The rollout of water-based paints, enabling the reduction of VOC emissions, led to a slight increase in the energy used, on account of higher drying temperatures. However, this increase was more than offset by the rollout of so-called short-range paint processes, with one fewer stage, thereby reducing energy consumption. Nickel-free surface treatment also created an opportunity for a more energy-efficient process;
- the implementation of the energy Management System. This managerial approach involves operators of production machinery, and it initially targeted the reduction of energy losses in non-production stages: that is, the principle of the base load. The following stage consists of developing solutions to reduce consumption during other production phases. Good ideas are also shared during Business Club meetings and the resulting good practices are then rolled out across all the plants.

In its global energy use scheme, the Group uses energy produced by cogeneration plants, managed by two different approaches.

For PCD, plants have signed contracts with external suppliers which provide steam/hot water used in paint shop process in Sochaux, Rennes and Mulhouse, and in Sevel Nord since 2018.

OV operates three cogeneration plants and produces electricity and steam from gas. The energy produced is partly used in the plant, but a large part is also sold to other OV facilities or to external customers. This represents 1,685,000 MWh LCV, and delivers 639,000 MWh of electricity and 555,850 MWh of steam.

For Groupe PSA, the geographic breakdown of overall energy consumption in 2018 was as follows: 96.3% for the European Union and 3.7% for the rest of the world. The increase of European share of energy consumption is directly linked to OV integration.

### Reduction in energy consumption

#### — WITHIN THE AUTOMOTIVE ACTIVITIES

In 2018, the plants continued to implement solutions aiming to reduce their energy consumption while building on the achievements of previous years. The actions implemented can be divided into four categories:

- the continued rollout of LED lighting as part of a multi-annual plan in Eisenach, Gliwice, Luton, Palomar, Rennes, Trnava and Zaragoza. An estimated 2,500 MWh is saved per year;
- the rollout of good management practices for some production-related facilities (controlled valves, indexing the functioning of air conditioning equipment depending on the outside temperature, revising the conditions for distributing compressed air or superheated water including lowering the settings, etc.) helps to reduce energy consumption outside of the production process;
- actions specific to each site, with the implementation of a new painting process in Mulhouse and Rennes, which means that one oven can be taken out of use in each plant. For mechanical plants, actions to recover heat from equipment are being tested (in Française de Mécanique and Trémery), and foundries continue to optimise their casting processes, which are significant energy users. Charleville has also improved the efficiency of its sand thermal treatment installation.

These actions generated electricity savings of 5,000 MWh and approximately 20,000 MWh NCV of natural gas.

In order to improve its energy efficiency approach, Groupe PSA initiated a pilot project at the Poissy plant in 2017, and implemented a Big Data solution proposed by Engie (Blue by ENGIE). After an initial test on a portion of the plant and some interesting results, the extension to a whole workshop revealed difficulties in tool development and in data consistency collection. The solutions to these problems will affect whether any future approaches can be implemented.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

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All the plants have also initiated compaction plans to reduce their production areas, thereby reducing the building volume to be heated. These highly ambitious plans come into force in Sochaux, at Française de Mécanique, in Caen and Trémery with the sale of buildings taken over by other manufacturers. At other plants, the vacated space was rented to suppliers who then occupied the plant. In other cases, this extra space was used to reintroduce businesses within certain buildings that were previously established elsewhere. Accordingly, the Madrid plant now houses the automotive spare parts centre for Spain, previously located in Pinto. For these situations, energy savings are not quantified by the site directly, but the shortened supply chain can be assessed. These plans often involve significant changes to production lines and the relocation of resources. They will continue over the next few years and will be extended to OV facilities. For 2018, we consider these actions to have generated a reduction of 50,000 MWh in gas and electricity consumption.



## Impact measurement and economic assessment

**Energy management** is widely implemented in all the plants, but actions are also carried out in offices and R&D facilities. Since 2015, energy management has reduced the energy bills by €4 million. Around €2 million came from shutting down some offices and gathering offices activities, and the other €2 million (approximately 9,000 MWh per year) came from energy management, including the implementation of an energy committee in each facility, using meters to measure energy, LED installation and energy is automatically shut down when nobody is in the building. These actions will be continued in the years to come, with a target of 25% reduction of energy use in this scope from now to 2021.

### — WITHIN THE AUTOMOTIVE TRADE

Since 2016, the work conducted on bulk energy purchases, coordinating consumption and rolling out new technologies enabled PSA Retail to meet the reduction targets set by the Push to Pass plan for the 2018 financial year.



## Impact measurement and economic assessment

The actions undertaken to reach the Push to Pass objective are similar to those implemented in offices where the priority is for a LED lighting plan, which was first rolled out across the showrooms of the entire network.

These actions led to a reduction of 18% in the energy consumption between 2015 and 2018 in French dealership sites. The comparison was carried out on the same facilities in 2015 and 2018. A cost reduction of €900,000 over the same period of time and scope is also achieved on energy bills. These actions will be rolled out across the Group's whole retail sector until 2021.

Data from the brands related on average to 94% of sites in 2018 (100% in 2017 and 97% in 2016) for direct energy consumption and 96% of sites in 2018 (96% in 2017 and 98% in 2016) for indirect energy consumption.

## 5.2.2. Managing industrial greenhouse gas emissions

In light of the environmental challenges related to greenhouse gas emissions, and considering that **industrial greenhouse gas emissions represent less than 2% of the vehicle's carbon footprint throughout its life cycle**, the Industrial Department continued its discussions regarding a strategy towards reduced CO<sub>2</sub> emissions by 2025 and beyond.

2018 is the first year of total integration of all OV industrial facilities in this reporting. This creates new issues.

OV operates in three cogeneration plants (Rüsselsheim, Eisenach and Zaragoza) which produce electricity and heat or hot water by burning gas. Part of the energy produced is used in OV plants, but the other part is sold to external customers. However, the GHG emissions from gas combustion are part of the emission of each plant. This significantly changes the absolute emissions of Groupe PSA industrial activities and will bring significant updates to the emission reduction plan.

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

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### 5.2.2.1. Greenhouse gas emissions

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GRI.305-2

GRI.305-5

Note: Direct emissions are calculated based on the direct energy consumption by applying emission factors acknowledged by the greenhouse gas emissions trading system (EU ETS) in compliance with the decree of 31 October 2012 or European Regulation

2012/601 in the case of CO<sub>2</sub>, and the circular of 15 April 2002 for all other gases. Changes in emission levels are thus directly related to changes in energy consumption.

(unit: t)	Year	CO <sub>2</sub>	N <sub>2</sub> O	CH <sub>4</sub>	Direct GHG emissions in CO <sub>2</sub> eq. (scope 1)	GHG emissions from renewable sources (CO <sub>2</sub> eq.)*	Indirect GHG emissions in CO <sub>2</sub> eq. (scope 2)	Total GHG emissions (scope 1 + scope 2)
<b>Automotive Division</b>	(PCD + OV) 2018	<b>845,348</b>	<b>35.74</b>	<b>58.73</b>	<b>857,661</b>	<b>5,693</b>	<b>416,827</b>	<b>1,274,488</b>
	o/w OV 2018	445,213	19.49	31.18	451,910		248,053	699,963
	o/w PCD 2018	400,135	16.25	27.55	405,751	5,693	168,775	574,526
	(PCD) 2017	398,201	16.17	27.28	403,786	5,289	160,080	563,866
<b>Automotive Trade</b>	(PCD) 2016	394,434	16.08	27.21	399,991	5,591	161,513	561,504
	(PCD + OV) 2018	<b>20,072</b>	<b>0.85</b>	<b>1.34</b>	<b>20,352</b>		<b>19,116</b>	<b>39,468</b>
	(PCD) 2017	22,633	0.96	1.52	22,951		22,468	45,419
	(PCD) 2016	23,375	0.97	1.53	23,697		25,456	49,154
<b>TOTAL</b>	<b>2018</b>	<b>865,420</b>	<b>36.59</b>	<b>60.07</b>	<b>878,013</b>	<b>5,693</b>	<b>435,943</b>	<b>1,313,956</b>
	2017	420,834	17.15	28.80	426,737	5,289	182,548	609,285
	2016	417,809	17.05	28.74	423,688	5,591	186,969	610,658

\* Greenhouse gas emissions from the combustion of biomass are not included in direct emissions in accordance with the GHG Protocol guidelines.

Direct GHG emissions expressed in t CO<sub>2</sub> eq. are calculated by applying coefficients (global warming potential) of 298 for N<sub>2</sub>O and 21 for CH<sub>4</sub> (source: IPCC reports, 2006 and 1995 respectively). Indirect emissions are calculated from electricity and steam purchases in compliance with emission factors obtained from suppliers for steam, based on the previous year's electricity factors.

The data provided above take into account all emissions from all PCDOV industrial facilities, and also include direct emissions from the three OV cogeneration plants. This new situation drastically changes the profile of Groupe PSA on this topic, and it will lead the Group to completely review its CO<sub>2</sub> plan. The Group will also use this opportunity to update its strategy by using absolute emissions rather than relative emissions in kgCO<sub>2</sub> per car, and will take 2018's emissions as a starting point for this new vision. The 2050 target (carbon-neutral activity) will remain the same, and will remain compliant with Paris Agreement target. This new plan is under construction and will be submitted to SBTi in 2019 and published in the next CSR report.

The impact of cogeneration activity, in terms of energy produced and sold to external customers, is 112,000 tonnes of CO<sub>2</sub> emitted by gas combustion. 21,900 tonnes of CO<sub>2</sub> are emitted to produce the electricity and steam used by the OV plants which do not operate these cogeneration plants.

The electricity produced by OV's cogeneration plants and used by OV plants represents 92,900 tonnes of CO<sub>2</sub> compared with the supply from local electricity providers. This shows a reduction of 55,500 tonnes of CO<sub>2</sub> because the emission factor of the cogeneration plants is far lower than those of these local suppliers.

OV also operates plants in countries where emission factors for electricity are far higher than in France, where PCD operates most of facilities. This explains the difference between indirect emissions for both companies. This point confirms the previous conclusions of the CO<sub>2</sub> study conducted by PCD about the sensitivity to geographical locations.

The aforementioned study about the impact of CO<sub>2</sub> emission on external conditions highlighted the impact of weather conditions on GHG emissions, because about one-third of gas consumption is used to heat buildings, and the difference between a severe winter and a mild winter leads to a fluctuation in GHG emissions of approximately 15%. In 2018, climate impact, based on degree-day evolution, had no influence on energy consumption, or CO<sub>2</sub> emissions.

Following comparison with the 2017 results, global CO<sub>2</sub> emissions remained stable despite the increase in production for PCD. This confirms that the management of energy use in the plants is efficient.

**Automotive Trade results** indicated above refer to the same proportion of sites as that of energy consumption (see 5.2.1.1.).



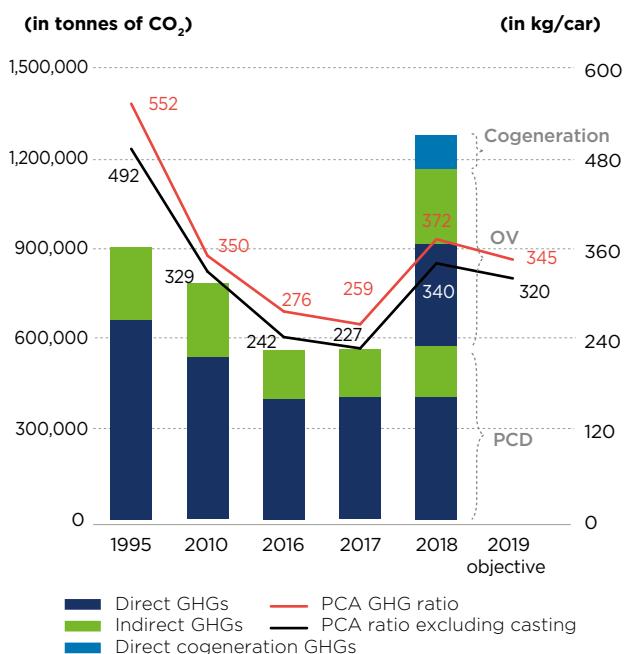
### 5.2.2.2. Changes in and intensity of greenhouse gas emissions

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#### CHANGES IN GREENHOUSE GAS EMISSIONS (GHG) (Automotive Division)



Note: data for indirect emissions for 1995 were calculated using electric emissions factors proposed by the IEA for the same year.

This graph shows the CO<sub>2</sub> emissions for PCDOV industrial facilities, including and excluding casting. This presents Group data that can be compared with data from other manufacturers in the sector without casting operations.

It also highlights the impact of cogeneration activity on global emissions.

The main conclusions of the study was carried out in 2016 on PCDOV scope remains consistent with OV facilities integration. Only cogeneration emissions do not form part of this study. Group strengths and weaknesses remain similar, and the strategic orientations to strengthen the roadmap for reducing industrial GHG emissions are also similar. The geographical breakdown of direct greenhouse gas emissions in 2018 was as follows: 97.1% for the European Union and 2.9% for the rest of the world. For

indirect emissions, this breakdown amounted to 94.4% for Europe and 5.6% for the rest of the world. This division only takes into account South American and Russian plants. In these locations, one is supplied by green electricity, and the result demonstrates the impact of local electricity production methods on the Group's GHG emissions.

### 5.2.2.3. A roadmap in line with the COP21 commitments: avoiding greenhouse gas emissions

With the inclusion of OV activities in 2018, comparisons with results of previous years and with the plan created in 2016 are not possible. Where CO<sub>2</sub> emission profiles of production activities are similar between both companies, the existence of cogeneration plants make a big difference to the amount of emissions, in particular direct emissions, and the improvement actions could not be the same as for production plants. The study related to CO<sub>2</sub> emissions produced by industrial activities and a new plan will be created in 2019. This new CO<sub>2</sub> industrial vision will be designed by the "Industrial CO<sub>2</sub> Committee" which is the new instance launched in 2018 to manage this topic, which also includes emissions from logistics activities. This Committee is chaired by the Industrial EVP. After validation by the Industrial CO<sub>2</sub> Committee, the new vision will be proposed to SBTI.

On specific PCD performance, we can note the following elements. With a similar performance in 2017 and 2018, the total emissions would have reached approximately 579,000 tonnes. The decrease of CO<sub>2</sub> produced from 259 to 258 kg/car manufactured demonstrates the improvement made of 5,000 tonnes. This improvement can be divided as follows:

- increase in emissions, especially direct emissions, due to paint shop consumption of 7,500 tonnes. The main reason is the increase in the size of cars;
- a reduction of 12,000 tonnes of emissions. This is a direct result of the improvement made in energy performance at the plants;
- for this year, the weather conditions have had no significant impact. The hot summer may have affected the performance of the cooling systems, but we cannot see this impact on energy consumption;

### 5.2.3. Participation in the CO<sub>2</sub> emission allowance scheme

DPEF.15

DPEF.26

The Group is part of the CO<sub>2</sub> allowance trading scheme implemented by European Directive No. 2003/87/EC, also called ETS regulation amended for combustion operations (heating and processes) of its largest plants and for one of its castings. As part of the third phase of the CO<sub>2</sub> emission allowance scheme scheduled from 2013 to 2020, 14 plants are involved, 5 for OV and 9 for PCD.

Following energy performance improvements made over many years, the Vélizy facility stopped using one of its boilers in 2017 and no longer meets the ETS conditions, so does not appear in the list of plants.

For OV, the deficit of allowances comes from cogeneration plants.

Year	Free allocations (quotas)	Emissions* (tonnes of CO <sub>2</sub> )
2016	353,181	265,816
2017	361,375	273,664
<b>2018 (PCD+OV)</b>	<b>553,543</b>	<b>668,653</b>
of which OV	186,784	409,950
of which PCD	366,759	258,703

\* Sum of verified Groupe PSA emissions and theoretical emissions related to purchased steam, for which we receive allowances.

From 1 January 2015, pursuant to an EU decision, the automotive industry has been included in the list of sectors exposed to a carbon leakage risk, which includes a revised allocation of free quotas.

### 5.2.4. Use of renewable energy

DPEF.15

DPEF.26

The share of renewable energies used by the Group, beyond the electricity generated by photovoltaic panels at the Sochaux site, amounted to 521,900 MWh for manufacturing facilities, i.e. 17% of the electricity used. The share of renewable electricity comes directly from electricity suppliers.

**As part of establishing the Group's CO<sub>2</sub> roadmap, discussions are being held on the rollout of renewable energies and the priorities in terms of actions with local partners.** Accordingly, the analysis of the market and of green energy offers enabled the Trnava plant (in Slovakia) to sign a contract for the supply of renewable electricity to cover all of its requirements as from 2016. In Brazil, the Porto Real plant is also powered by 100% renewable electricity.

For 2019, Groupe PSA has signed a contract with a Spanish electricity supplier, who will provide green electricity to the 3 Spanish plants.

The wood furnace in the Vesoul plant (Groupe PSA central warehouse) produced 17,190 MWh in 2018 (5,693 tonnes of CO<sub>2</sub>) by burning wood packaging waste directly "produced" on site. This action reduces waste transportation and avoids fossil fuel emissions.

The transition to renewable energy at Trnava and Porto Real reduced indirect CO<sub>2</sub> emissions by 19,000 t CO<sub>2</sub> eq.

A contract has been signed with a supplier which allows the Charleville plant to collect the lost heat produced by the foundry and transfer to the town of Charleville, a few miles away from the plant.. The energy recovered from this allows the commune of Charleville to stop part of its plant that is used to provide heating and hot water to homes. The supplier has also invested in a wood furnace as a back-up heat supply if there is a cold winter. Thus, Groupe PSA contributes to reducing CO<sub>2</sub> emission of around 7,000 tonnes per year in the city of Charleville-Mézières.

**-7,000 tonnes CO<sub>2</sub>**  
**emitted by the city of Charleville-Mézières**  
**per year thanks to energy recovered**  
**from the Group's plant**

A second surface will be covered by solar panels at the Sochaux plant. This new equipment, managed like the existing one by an external company, will cover a parking place for new cars before they are sent onto dealerships.

## 5.2.5. Environmental optimisation of logistics and travel

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DPEF.27

GRI.305-3

GRI.305-4

GRI.305-5

The environmental impact of transport is far-reaching, from localised pollution (sound, air pollution, etc.) to global warming. Evaluating the impact of transporting the products, goods and materials through the supply chain (from the purchase of raw materials to network distribution) and staff travel are an essential part of the global environmental strategy planning process.

### 5.2.5.1. Impact of logistics operations on the carbon footprint of the Group's manufacturing operations

Groupe PSA logistics operations are part of scope 3 and represent only a small part (1.5%) of the Group's total CO<sub>2</sub> emissions (see 2.1.).

However, when defining the environmental policy of the Industrial Department, the logistics operations were identified as having a core impact on the carbon footprint of the Group's manufacturing operations.

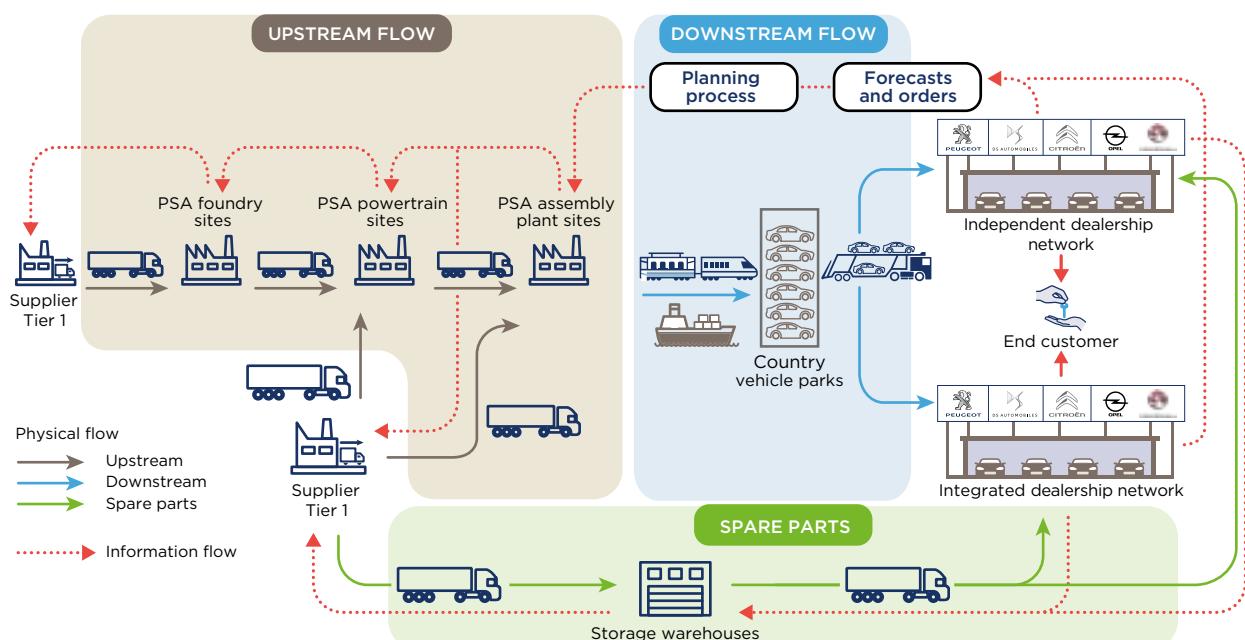
The supply chain ambition for the Group's carbon footprint has been defined in the long term for both OV and PCD. It aims to reduce logistics carbon emissions by a third per vehicle between 2016 and 2035, as a continuation of the previous carbon footprint roadmap. This means an average decrease of 2.1% per year.

In 2018, the OV logistics team established their baseline for their logistics carbon footprint with reports and animation.

#### Supply chain diagram

The supply chain encompasses all the Group players in charge of all the physical workflows and the information flows, from suppliers to end customers. Company employees and suppliers are working on a joint improvement initiative aimed at increasing client satisfaction in terms of leadtimes and quality, optimising inventories and reducing the cost and environmental impact of transport.

#### LOGISTIC FLOWS



## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

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### Groupe PSA transport policy

Groupe PSA is a global car manufacturer and manages thousands of flows on a daily basis, from sourcing supplies for its plants to delivering vehicles and spare parts to its clients.

#### — SUBCONTRACTING TRANSPORT

In 2016, PCD and GEFCO signed a new exclusivity agreement under which the Group entrusts GEFCO with the management and optimisation of its entire global manufacturing supply chain, from supplying components to production and assembly plants to distributing finished vehicles, in compliance with the social and environmental requirements set out by Groupe PSA. These upstream and downstream logistics operations are supplemented with the distribution of spare parts. This agreement concerns the design and implementation of comprehensive logistics and transport solutions for the PEUGEOT, CITROËN and DS AUTOMOBILES brands.

For the OPEL and VAUXHALL brands, a new contract was established with GEFCO in 2018, starting in January 2019 and based on the same exclusivity concept.

GEFCO operates as a logistic provider for PCD and coordinates several logistics providers for OV.

#### — GOVERNANCE OF THE EXCLUSIVITY AGREEMENT WITH GEFCO

**GEFCO is a key partner of Groupe PSA. As such, it is fully involved in the Group's strategy for assessing social and environmental performance, as conducted with the Group's service provider EcoVadis.** Its results are regularly monitored at the Executive level of the Company under a Partner Business Review (see 4.2.2.3.).

23 GEFCO subsidiaries have ISO 9001 certification (involving 255 sites), and 15 have ISO 14001 certification (involving 59 sites).

GEFCO is committed to implementing a strict and sustainable development policy with the following aims as agreed in the contract with Groupe PSA:

- make every effort to use the least polluting transport methods available, in line with the most stringent environmental standards;

- prioritise alternatives to road transport and make proposals to reduce the CO<sub>2</sub> footprint of transport;
- comply, and ensure its subcontractors comply with, all legislation and regulations in force in the country in question, specifically that all heavy goods vehicles used in the European Union will meet the Euro 4 standard and above, and any vehicles replaced in the fleet will meet the Euro 5 standard as a minimum requirement.

The initial contract was signed in 2012. Since then, GEFCO has upgraded its policy and each new truck in its European fleet is to be replaced with Euro 6-compliant vehicles.

In 2017, Groupe PSA launched an innovation team to optimise vehicle distribution flows in collaboration with GEFCO, taking environmental implications into consideration too. This common entity brings together the Group's teams and GEFCO's team in the same place with shared targets. It aims to improve performance and accelerate the implementation of ideas. In 2019, such collaborative teams will be implemented for the transport of components.

Environmental performance is also monitored on a monthly basis with respect to the transport of components and vehicle distribution.

OPEL and VAUXHALL transportation data are now included in the monthly standard reporting starting in Q4, 2017, and will provide enough information to establish a 2018 baseline for the footprint improvement target until 2035.

Since 2014, Groupe PSA has also been rolling out a target architecture of the vehicle procurement and distribution flows, with the aim of improving transport costs both upstream (parts) and downstream (vehicles) and of reducing the environmental impact:

- all parts transported from suppliers to all Groupe PSA European plants are pooled. This bulk transport reduces the number of trucks on the road; and any opportunity to merge PCD and OV flows is analysed;
- the Group is also exploring alternatives to road transport by increasing its use of rail and river transport.

### THE DIFFERENT FLOWS BROKEN DOWN BY MODE OF TRANSPORT (SCOPE: WORLD EXCLUDING JVS, 2018)

Breakdown in tonnes of goods or vehicles transported, by mode of transport	Upstream flow				Downstream flow			
	2016	2017	2018 (PCD)	2018 (PCD + OV)	2016	2017	2018 (PCD)	2018 (PCD + OV)
Air	0%	0%	0%	0%	-	-		
Rail	0%	1%	0%	3%	15%	15%	13%	11%
Road	98%	98%	98%	94%	69%	72%	73%	73%
River/sea	2%	1%	2%	3%	16%	13%	14%	16%

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

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## Actions undertaken by Groupe PSA

Actions	Levers used	Gains/results obtained
<b>Optimisation of packaging and volumes transported</b>	All packaging is sustainable and reusable.  DESIGN To LOGISTICS initiative launched at the end of 2013 to track the transport impact of parts right from the design phase. Technical specifications for logistics (TSFLs) have been drawn up for the large majority of part families, and these set out our logistics requirements for our research and development centers.	Waste reduction: the reuse of returnable containers (this accounts for 98% of sustainable packaging) in new vehicle projects is growing, by taking into account catalogue parts of existing containers at the design stage, rather than developing them separately.  Volume of parts transported for a new vehicle reduced by 1 m <sup>3</sup> minimum (compared with a replaced vehicle or equivalent). This rationale is built into the specifications of vehicle projects with a launch date later than 2016. For example, the replacement of the CITROËN BERLINGO will decrease the volume of parts transported by 6%.
<b>Reduced industrial waste (upstream)</b>	Reusing disposable packaging for overseas flows.	<ul style="list-style-type: none"> <li>Groupe PSA global policy about overseas packaging and associated waste is based on the reduction of necessary packaging, the reuse of packaging used for shipping and finally the valorization if reuse is not possible.</li> <li>Waste reduction: the reuse of disposable packaging has been studied by PCD and implemented for flows between France and Russia or Latin America. Wooden packaging is now reused, which reduces the quantity of waste at the customer's plant.</li> <li>Introduction of returnable containers on intercontinental flows was piloted in 2018 by OV and will be further extended in 2019. This is forecast to reduce packaging waste by over 400 tonnes.</li> <li>These two main ideas have been shared between the brands and will be widely implemented into Groupe PSA practices.</li> </ul>
<b>Roll-out of Groupe PSA CSR policy among transport and logistics suppliers</b>	Implementation of a joint monitoring system between Groupe PSA and GEFCO regarding upstream and downstream CO <sub>2</sub> emissions.	Improved awareness with a shared goal between Groupe PSA and its logistics provider. More frequent (monthly) monitoring of the indicator of the CO <sub>2</sub> emission of Gefco for downstream and upstream.

## Actions undertaken by Groupe PSA in collaboration with GEFCO

Actions	Levers used	Gains/results obtained
<b>Filling rate of trucks and shipping containers</b>	Implementation of a tool for 3D visualisation of the theoretical loading of HGVs based on daily orders sent to suppliers. In 2019, this tool will be implemented for shipping containers.  Pooling of flows between several suppliers, milk runs, regular optimisation of the uplift frequency.	<ul style="list-style-type: none"> <li>For overall truck transportation, the filling rate is 80%. Specifically for Full Truck Load, filling rates of over 90% are being achieved. The fill rate of the trucks arriving at the plants is measured and action plans put in place if any anomalies are detected.</li> <li>The filling rate of shipping containers being shipped to intercontinental plants (Latin America, Russia, China) has been affected by through shopfloor workshops, new loading processes and packaging improvement. The filling rate has therefore improved, reaching more than 80% of air volume.</li> </ul>
<b>Intercontinental flows</b>	Redesign of procurement flows.	<ul style="list-style-type: none"> <li>In 2018, direct flows between European powertrain plants (Trémery and Hordain) and the Kaluga plant in Russia have been implemented, reducing the necessity to operate via a platform and reducing the number of kilometres by 23,000 km</li> <li>In 2018, the Group studied how to ship parts from suppliers in the north of France to Russia via a platform located in Hordain. This will be implemented in Q2, 2019, which will reduce truck transport by 52,800 km a year.</li> </ul>

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Energy and carbon footprint of manufacturing and logistics operations

Actions	Levers used	Gains/results obtained
<b>Use of multimodal transport</b>	Move to more environmentally-friendly modes of transport (already high usage of rail transport and sea transport).	<ul style="list-style-type: none"> <li>For PCD: Reduction in road traffic and corresponding pollution: a regular sea route service between Saint-Nazaire and Vigo (the so-called "sea motorway") has been in operation for several years, increasing from two to three weekly journeys from 2015. This means that, each truck reduces its mileage by 1,300 km, thus helping to ease congestion and reduce polluting emissions.</li> <li>The China Europe Express train between China (Chongqing) and Europe (Duisburg), largely electrified and first used in 2017 by the Group, is now an alternative mode of transport to aeroplane transport, and consumes 10 times less CO<sub>2</sub> emissions. Train transportation is also being studied as an alternative to sea shipping.</li> <li>In Morocco, for Groupe PSA Kenitra plant, starting 2019, vehicle transport by train has been studied from the start. The plant was designed with this in mind, and 90% of vehicles will be transported to the port via the rail network.</li> <li>To transport components between Morocco and the Vigo plant in Spain, multimodal flows have been used since December 2018, through a maritime shuttle between Tanger and Vigo. This mode of transport enables each truck to reduce its road journey by 950 km, thus helping to ease congestion and reduce polluting emissions.</li> <li>Manufactured in Uruguay since mid-2017, the CITROËN Jumpy and PEUGEOT Expert use components from the SevelNord plant, which are transported by river from the plant to the Port of Antwerp, instead of by lorry. Nearly 900 ships used this route in 2017, which increased to 2,400 in 2018.</li> <li>Modal shift has been studied for flows between France and Russia, switching from lorries to short sea shipping. It will be implemented by 2019 and this will save 1,700 trucks between France and Russia per year which includes a third of round trips.</li> <li>For OV: Rail transport is regularly used to transport parts and materials between plants, e.g. between our plants in Eisenach (Germany) to Zaragoza (Spain) and vice versa (which is equivalent to 100 lorries doing a round trip per week).</li> <li>A combined study between PCD and OV has been launched to use rail travel for upstream transportation from CEE (Central and Eastern Europe), through Germany to the eastern part of France. This train (one per day) will replace 50 trucks each day in both directions.</li> </ul>
<b>Development of downstream vehicle logistics</b>	In collaboration with GEFCO, supply chain rolled out a project to develop downstream logistics for vehicles produced in Europe in 2015. This optimised the distribution costs and times as part of the supply chain master plan.	This action plan is based on two main points: <ul style="list-style-type: none"> <li>reduction of the distance covered by new vehicles by increasingly supplying vehicles directly from our assembly plants;</li> <li>only using transport once the final destination is known, thus avoiding transport to a temporary storage location.</li> </ul>
<b>Setting up Gigaliner lorry traffic flows</b>	Commissioning of a new type of truck, in line with new Spanish legislation.	The Madrid and Vigo plants have been carrying out studies on the use of Gigaliner lorries (also known as mega trucks), and have started to use them. They are 25 m long and can transport more goods with a single trailer than in a standard semi-trailer, which saves 16% in CO <sub>2</sub> per tonne transported. Gigaliners are also expected to be tested on French roads. This solution is pending approval by the French authorities.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Energy and carbon footprint of manufacturing and logistics operations

## Summary of greenhouse gas emissions per type of shipment

The methodology used to assess greenhouse gas emissions is implemented by GEFICO in collaboration with Eco Transit World. Energy consumption is determined for each traffic flow and by mode of transport by using an emission factor corresponding to this energy. This measurement is performed in CO<sub>2</sub> equivalent (thus including other greenhouse gases). The scope for downstream distribution includes capillary flows to the dealers.

		CO <sub>2</sub> eq. emissions in tonnes - 2016 (PCD)	CO <sub>2</sub> eq. emissions in tonnes - 2017 (PCD)	CO <sub>2</sub> eq. emissions in tonnes - 2018 (PCD)	CO <sub>2</sub> eq. emissions in tonnes - 2018 (PCD + OV)
<b>TOTAL</b>		<b>534,506</b>	<b>541,473</b>	<b>569,185</b>	<b>879,344</b>
<b>Upstream transport</b>	Road	331,185	85%	356,694	88%
	Air	41,722	11%	32,740	8%
	Rail	0	0%	670	0%
	Sea	15,186	4%	14,986	4%
	<b>Total</b>	<b>388,094</b>	<b>100%</b>	<b>405,090</b>	<b>100%</b>
Ratio of kg of CO <sub>2</sub> from transport/ vehicle produced upstream		192		186	
				186	
					204
<b>Downstream transport</b>	Road	107,670	74%	102,530	75%
	Rail	5,755	4%	5,265	4%
	Sea	32,987	23%	28,589	21%
	<b>Total</b>	<b>146,413</b>	<b>100%</b>	<b>136,383</b>	<b>100%</b>
<b>RATIO OF KG OF CO<sub>2</sub> FROM TRANSPORT/VEHICLE DISTRIBUTED DOWNSTREAM</b>		<b>71</b>		<b>63</b>	
				<b>63</b>	
					<b>62</b>

### 5.2.5.2. Impact and optimisation of employee and business travel

For several years, Groupe PSA has undertaken a policy to optimise employee mobility and reduce CO<sub>2</sub> emissions related to business travel. This approach encourages a more frugal approach to travel and encourages alternatives to traditional individual transport.

In 2018, Groupe PSA launched a major action plan to anticipate intensive use of electric and plug-in hybrid electric vehicles by its employees. The ambition is to make employees electric car ambassadors and ensure that they adopt an exemplary, socially responsible approach.

The plan will support the shift in usage and behaviour related to electric vehicles, and will modernise infrastructures to prepare for the Group's future vehicles. It will result in a significant increase in the number of electric charging points within the Group's facilities.

This plan includes a training programme, "Electric Quest", which has been rolled out for all employees. Starting with the stakes of electrification, the step-by-step programme will raise the level of knowledge about electric car technologies and marketing. It is a powerful catalyst for mobilising employees.

The employee travel policy focuses on the following initiatives:

- **teleworking** the Group has been rolling out Remote working practices since 2004. Remote working was promoted to managers and various categories of eligible employees. Less time spent commuting to and from work is the leading

factor of satisfaction mentioned by 80% of teleworkers (satisfaction survey conducted internally in June 2017 among 1,675 teleworkers of Groupe PSA). Groupe PSA has 4,768 teleworkers worldwide, including 3,358 in France;

- **remote working** an employee annual account of 25 remote working days was created in France in 2017. This innovative arrangement enables employees to occasionally work from their primary residence or other personal residence in France, or even from a third-party location. In 2018, under this pattern, 10,086 employees used at least one day of remote working and a total of 110,000 days have been worked remotely;
- **promoting public transportation and carpooling** for employees' commute to and from work as alternatives to passenger cars. Work'in PSA, an app that can be downloaded on employees' smartphones, provides access to train and bus traffic information, shuttle services, carpooling websites for drivers and passengers, and more. The Group promotes the innovative Peer2Peer car rental services of Koolicar and Travelcar to its employees for their private use;
- **encouraging the use of remote meeting tools** (audio, online meeting systems, video conferences) instead of travelling to meetings. The number of business trips fell by more 10% between 2016 and 2018. Video conferencing rooms have been installed in the Group's facilities worldwide and have significantly reduced the need for travel. The use of laptops has become a widespread standard for audio communication and meetings within the Group and beyond;

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Industrial discharges and nuisances: managing the impact on the environment and local residents

### TOTAL NUMBER OF BUSINESS TRIPS\*

	2016	2017	2018
Number	135,177	122,630	119,321
Change vs previous year	-1%	-10%	-3%

\* Business trips from and within France.

- **prioritising rail transport** and the use of shuttles for business travel between the Group's plants and outside of the Group. In France 20,551 trips were made by train in 2018 and 25,335 in other countries;

### ASSESSMENT OF CO<sub>2</sub> EMISSIONS GENERATED BY BUSINESS AIR TRAVEL\*

(in kg)	2016	2017	2018
Number	17,138,436	16,712,477	25,462,845

\* PCD scope - Trips leaving from Germany, Austria, Belgium, Spain, France, Italy, the Netherlands, Portugal and the United Kingdom, extended in 2018 to Argentina, Brazil, Morocco, Russia.

- **reducing the average emissions of the service vehicle fleet:** the Group provides its employees with service vehicles for their work-related travel. The increase shown at the end of 2018 is linked to the move upmarket, in line with our customer sales;

### AVERAGE CO<sub>2</sub> EMISSIONS FROM COMPANY VEHICLES\* - FRANCE

(in g/km)	2016	2017	2018
Fleet (number of vehicles)	1,070	950	917
CO <sub>2</sub> level	106	106	113

\* Vehicles reserved for employee travel (excluding commercial vehicles).

- **developing car-sharing solutions:** the Group is developing a car-sharing solution for its employees called Free2Move Fleet Sharing. This mobility service, currently being trialled at the Group's sites in the Paris region, addresses the various mobility needs of employees. Thanks to Free2Move Fleet

Sharing, employees can book their vehicle between 48 hours and 5 minutes prior to departure. Since it was set up in Rueil-Malmaison in 2017, the entire fleet of the Group's headquarters has been managed through this car-sharing approach. It has also been implemented at other sites in 2018.

## 5.3. INDUSTRIAL DISCHARGES AND NUISANCES: MANAGING THE IMPACT ON THE ENVIRONMENT AND LOCAL RESIDENTS

GRI.103-2 GRI.103-3

The third issue identified in the Industrial Department's environment policy is managing the impact of industrial facilities on the environment. This aspect reflects the Group's determination to manage the impact of using chemical products in its operations (mainly components, stamping and painting).

The main issues being targeted are air pollution by atmospheric pollutant emissions such as VOCs and substances harmful to the ozone layer, prevention of soil pollution, biodiversity and accidental discharges.

### 5.3.1. Air quality

DPEF.18

The Group is working to limit sulphur oxide and nitrogen oxide emissions as well as volatile organic compounds (VOCs). VOCs are regulated, because these pollutants are involved in acidification processes (formation of acid rain), eutrophication (disruption of

the biological balance of water caused by excess nitrogen) and photochemical pollution (formation of oxidising compounds, such as ozone).

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Industrial discharges and nuisances: managing the impact on the environment and local residents

## 5.3.1.1. Emissions of regulated air pollutants

GRI.305-7

### VOC emissions

Identified as ozone-producing pollutants in the late 1980s, VOCs are closely monitored and an action plan to reduce them has been implemented.

Within the Group, although overall VOC emissions from its paint workshop facilities are marginal with respect to overall French VOC emissions (less than 1% of anthropogenic emissions in France, i.e. 689 kt; source CITEPA: Inventory of air pollutant and greenhouse gas emissions (GHG) in France, 2014), they still represent the main environmental challenge in relation to site-by-site emissions.

### VOC EMISSIONS OF BODY STRUCTURE PAINT WORKSHOP FACILITIES BY OPERATION

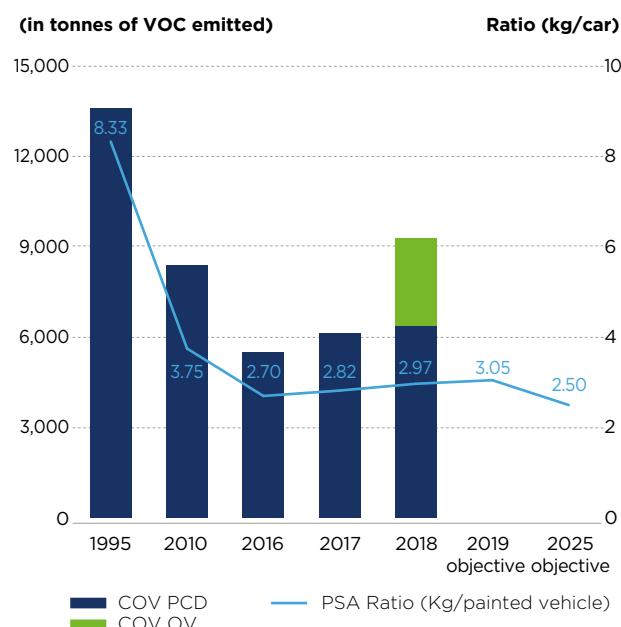
(unit: t)	Year	VOCs (tonnes)	Ratio (in kg per vehicle produced)
<b>Automotive Activities</b>	<b>(PCD + OV) 2018</b>	<b>9,294</b>	<b>2.97</b>
	o/w OV 2018	2,928	3.25
	o/w PCD 2018	6,366	2.86
	(PCD) 2017	6,139	2.82
	(PCD) 2016	5,506	2.7
<b>TOTAL</b>	<b>2018</b>	<b>9,224</b>	<b>2.97</b>
	2017	6,139	2.82
	2016	5,506	2.7

VOCs: volatile organic compounds.

N/A: not applicable.

VOC emissions from Groupe PSA paintshop facilities are determined using a material assessment method that complies with the principles of European Directive No. 2010/75/EU on industrial emissions.

### CHANGE IN VOC EMISSIONS OF BODY STRUCTURE PAINT SHOP FACILITIES (Groupe PSA scope)



The policy for reducing use and emission of these compounds is built around the following four areas:

- optimising paint shops by reducing consumption of paints (and therefore solvents). This is achieved by using processes with higher application efficiency, by selecting low-solvent paints and by recycling used solvents;
- implementing low-emission technologies in new paint shops;
- installing air treatment equipment that incinerates VOCs on site when necessary;
- encouraging Group plants to share their experience and best practices.

This action plan, which involves using the best available technology (BAT), has enabled the Group to reduce the VOC emissions of its paint shop facilities threefold in 20 years, and has ensured that each plant has been able to stay within the limits set out in the VOCs chapter of Directive 2010/75/EU on industrial emissions, which came into force in 2010.

Continued systematic implementation of the best available technologies at cost-effective prices has enabled the Group to reduce its VOC emissions to below 3 kg per vehicle produced since 2013.

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Industrial discharges and nuisances: managing the impact on the environment and local residents

As the 2018 data published include VOC emissions from OV plants, this means that comparison with previous years is difficult. The following elements explain the result obtained. The share of cars produced in solvent-based paint shops is higher on for OV than for PCD. Light commercial vehicles sold well in 2017, a trend which continued into 2018, and this has had a significant impact on the average size of the produced cars as there has been an increase of almost 2% in the average PCD car size. Two colours cars are also still popular, and this contributes to increased solvent consumptions and VOC emissions. However, improvements are still being made, such as the use of robots in Manguelde and new painting processes (known as the four-wet process) in Mulhouse and Rennes, which has meant that one of the ovens in the latter two plants no longer needs to be used. Sharing best practices also helps to improve our solvent use when cleaning, especially in Rüsselsheim and Zaragoza. These actions and the rigorous management of VOC emissions in all plants have resulted in a stable level or a slight decrease of VOC emissions in g/m<sup>2</sup>.

This VOC emission control strategy (investing resources, using low-emission products, etc.) also applies to component factories using surface treatments.

The geographic distribution of VOC emissions in 2018 is as follows: 96% for the European Union and 4% for the rest of the world.

### SO<sub>2</sub> and NO<sub>2</sub> emissions

The discontinued use of heavy fuel oil at the plants in 2012, and its replacement by gas, brought SO<sub>2</sub> emissions at plants down to around nine tonnes per year.

NO<sub>2</sub> emissions are controlled through the modernisation of the fleet of combustion facilities and the introduction of low-NO<sub>x</sub> burners. The major plans to renovate these burners have now been completed and are yielding the expected results. Emissions are now below 900 tonnes per year in the industrial area, which is still where the majority of the Group's emissions come from.

#### DIRECT SO<sub>2</sub> AND NO<sub>2</sub> EMISSIONS PER BUSINESS, IN TONNES

Entities	Year	SO <sub>2</sub>	NO <sub>2</sub>
	(PCD + OV) 2018	<b>9.03</b>	<b>864.53</b>
	o/w OV 2018	4.39	467.83
<b>Automotive Activities</b>	o/w PCD 2018	4.64	396.7
	(PCD) 2017	4.41	394.18
	(PCD) 2016	5.05	392.87
	<b>(PCD + OV) 2018</b>	<b>2.47</b>	<b>21.56</b>
<b>Automotive Trade</b>	(PCD) 2017	2.46	24.25
	(PCD) 2016	3.49	25.25
	<b>2018</b>	<b>11.5</b>	<b>886.09</b>
<b>TOTAL</b>	2017	6.87	418.43
	2016	8.54	418.12

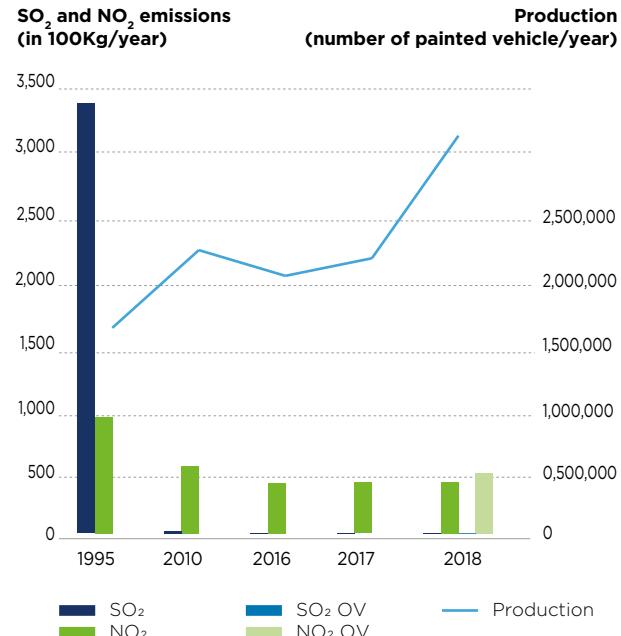
SO<sub>2</sub> = Sulphur dioxide - NO<sub>2</sub> = Nitrogen dioxide.

Note: Direct SO<sub>2</sub>/NO<sub>2</sub> emissions are calculated based on primary energy consumption according to applicable regulations.

Integrating OV industrial activities has increased the total amount of emissions, but has not changed the scope of emission of these emissions, because all industrial facilities use quite only natural gas a combustible. The main source of OV emissions is linked to the cogeneration plants.

The same percentage of sites reported dealership data ad direct energy consumption (see 5.2.11.).

#### CHANGE IN DIRECT SO<sub>2</sub> AND NO<sub>2</sub> EMISSIONS (Automotive Division)



All of this progress helps to improve air quality at the plants.

After the inclusion of OV data collected, the geographic distribution of NO<sub>2</sub> and SO<sub>2</sub> emissions in 2018 was as follows: 97.3% for the European Union and 2.7% for the rest of the world.

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Industrial discharges and nuisances: managing the impact on the environment and local residents

## 5.3.1.2. Refrigerant use and emissions

GRI.305-6

Limiting emissions of gases which damage the ozone layer is included in the Environmental Management System of the plants.

Usage of trichloroethane and halon was phased out between 1999 and 2003, although CFCs and HCFCs are still used in some "cold units" (which are used to cool production equipment, such as cutting liquids for machine tools) and in electric control boxes, as well as on certain premises.

Systems containing liquids harmful to the ozone layer are checked for leaks every year and, when leakages are detected, corrective action is taken. Resupplying facilities with CFCs has been prohibited since 2001 and resupplying HCFC facilities with recycled fluid was authorised until 31 December 2014.

**Groupe PSA has implemented a plan to replace HCFC cooling systems with HFC-type fluids by 2018 at a cost of several million euros. HFC-type fluids are not harmful to the ozone layer according to the Montreal protocol. This plan is now complete and has involved more than 550 pieces of equipment.**

The year's performance was as follows: 16,805 tonnes of CO<sub>2</sub> equivalent in refrigerant leaks for fixed installations across the total PCDOV perimeter, including OV for the first time, representing a loss of 6.7 tonnes of various fluids. The main sources of these

leaks are from R&D facilities where large climatic test equipment is used. This result is in line with previous years, as CO<sub>2</sub> emissions remain stable despite the increase of the quantity in tonnes of fluids. This shows that fluids have been substituted and that this has created positive results.

The second source of refrigerant emissions comes from filling mobile air conditioning systems on car assembly lines. Since 2017, R134a has been replaced by HFO 1234yf for most of the cars produced, in accordance with European requirements. This has three main consequences. Firstly, HFO 1234yf has much less of an impact on Ozone depletion. Secondly, a new distribution system has had to be built in each plant, which greatly decreases the risk of leaks. On the other side, the third impact is linked with the low use of the R134a installation. Leaks on these equipments could be lately detected because of this low use. In 2017, the Group refined its reporting questionnaire to better identify these leaks. In 2018, the calculation method, based on a mass balance calculation, has been improved and implemented in all the assembly plants, and this method now gives solid results.

In terms of refrigerant leaks on vehicle assembly lines when filling air-conditioning systems, losses amounted to 6,794 tonnes of CO<sub>2</sub> equivalent including OV emissions, made up exclusively of R134a leaks. This is a third fewer leaks compared to 2017 this figure includes. Using smaller equipment has been studied, and the first tests have been successful. This will be launched in all plants where this is necessary.

## 5.3.2. Preventing chemical risks

DPEF.15

### 5.3.2.1. Industrial chemical risks

The Group strives to manage the use of hazardous chemicals at all its plants in a rigorous manner.

When a new chemical product is introduced at a plant, it is analysed by a network of experts who check the nature and acceptability of the health and environmental impacts and define the main risk prevention requirements to be implemented. All products authorised in this manner, together with their safety data sheets, are managed and made available to everyone via a single application called CHEMA (Chemical Health and Environment Management Application).

In addition to these introduction conditions, building techniques (building workshops over retention basins and using overhead pipe systems to carry polluting liquids) considerably limit the impact in case of accident when using these chemicals. For other risks, regular audits of compliance with environmental procedures are carried out during walk-through inspections by production line managers as part of Groupe PSA Production System. Compliance with environmental procedures is also confirmed by ISO 14001 audits. Lastly, each site regularly analyses the amount of chemical products in stock and is careful to limit the volumes available on-site to the bare minimum.

Naturally, all of the Group's industrial projects also undergo impact and safety studies to determine the suitable prevention (and if applicable, response) measures.

**Significant changes in European and national legislation on these matters (particularly as a result of the REACH and CLP regulations, and the Seveso III Directive) have resulted in the Group reinforcing its leadership and management tools to maintain a high-level of chemical risk prevention.** Under the new EU regulatory framework for the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), which came into effect on 1 June 2007, the Group is certified as:

- a "producer of articles", and as such has taken the necessary steps to respond to customer queries concerning the possible presence of "substances of concern" in its products;
- a "downstream producer" and as such, in partnership with other European car manufacturers (grouped under the ACEA - European Automobile Manufacturers' Association), has implemented an initiative with the Group's suppliers. It aims to ensure they are properly taken into account by these regulations both to ensure delivery continuity of the substances and mixes necessary for automotive production, and to supply the information necessary for them to be used in accordance with regulations.

### 5.3.2.2. Soil pollution

DPEF.18

DPEF.25

#### Within the Automotive Activities

The Group continues to operate a strict policy to prevent soil contamination at operational sites, notably:

- by using retention basins for stocks of liquid products;
- by avoiding the use of underground pipelines to transport polluting liquids wherever possible.

In addition, it aims to discover what past pollution may be present in the soil on its sites.

**Either at the instigation of public authorities or at the Group's initiative, soil contamination has been assessed at a large number of sites.** After these investigations, experts have concluded that some sites fell into the category which requires self-monitoring. Depending on the site, these surveys were supported by a small number of one-off remediation or prevention programmes.

Other pollution risk assessment and soil testing also takes place when manufacturing premises, but also in the event of disinvestment from some premises are sold or bought or if premises are disinvested.

As part of the plant compaction processes, the soil of all the plots likely to be sold is systematically investigated and the findings shared with potential buyers.

#### Within the Automotive Trade

Since 2016, the Group has maintained its decision to perform soil studies on sites that are identified as being potentially pollutant.

**Special attention is given to all points of sale with underground works. The aim is to ensure that maintenance on all sites is carried out to the highest standards.** In case of proven pollution, the Group implements an action plan to treat this pollution, in compliance with regulatory constraints.

### 5.3.2.3. Reducing other forms of pollution in local communities

DPEF.19

DPEF.31

Potential impacts on the local population's tranquillity and the measures to be taken to manage them are assessed and adopted during impact studies or additional impact studies whose content is defined by regulations. These studies assess the sensitivity of residential areas in the immediate area surrounding the plants, according to diverse criteria such as sound levels, unpleasant odours, traffic, etc. They are carried out at new facilities or renewed at each significant stage of development of a plant (extension, new installation or new equipment) and are legally subject to public disclosure and the approval by the administrative authorities.



#### STAKEHOLDERS DIALOGUE

The impact of all changes associated with production line compaction and restructuring operations is automatically taken into account. The findings of noise measurements and odour analyses are interpreted based on new property boundaries, and hazard studies updated with new locations are presented to the competent authorities.

### 5.3.2.4. Accidental discharges

DPEF.16

DPEF.17

DPEF.31

GRI.306-3

GRI.307-1

GRI.419-1

Any accident with an obvious environmental impact and where the authorities have had to be notified is considered as significant.

In 2018, nine incidents were reported to the local authorities:

- four were related to diesel and machining fluid leaks. Three (*Française de Mécanique*), Porto Real and Carrières-sous-Poissy) occurred during delivery operation, and impacts were limited to the delivery surface with no impact. The last one related to an underground tank leak in Palomar (Argentina). Actions to avoid external impact are in place and corrective actions have been put in place;
- three dealt with a release of gases into the air. Two of them were refrigerant leaks (Sochaux, Belchamp), and one was because of a mistake in chemical delivery, which caused gases to be released into the air (Ellesmere Port);
- a lorry fire from an external logistics company in the Vesoul facility, with no impact on the warehouse;
- a building demolition disturbed a protected species of birds. Compensation measures have been successfully implemented.

#### Compensation paid for environmental damage pursuant to a judicial decision

The Group did not have to pay any such compensation in 2018.

#### Amount of provisions and guarantees for environmental risks

In accordance with Decree 2012-633 of 3 May 2012, since July 2014, the Group has set aside €1 million in financing guarantees in order to legal requirement: some plants with significant environmental impact have to set a guarantee system with insurance to secure remediation action in case of failure, some of which are French sites. By 2019, the Group will have set aside financing guarantees of around €5 million. This requirement will extend to two other facilities in 2019, and an update of the existing requirements is also be conducted this year. Similar regulation are in force in Spain since 2018, but the three facilities operated by Groupe PSA do not reach the threshold for implementation.

## **5.4. WASTE AND MATERIALS CYCLE: OPTIMISING PRODUCTION PROCESSES TO REDUCE THE USE OF RESOURCES AND INCREASE WASTE RECOVERY**

GRI.103-2 GRI.103-3

Eager to apply the concepts of responsible development advocated by the Group's policy and to stay in line with a product strategy that promotes better recovery and recyclability for its vehicles, the Group's manufacturing plants are committed to developing a circular economy wherever they are located. The Group wants to avoid wasting natural resources and only use the quantity of raw materials necessary. Moreover, this strategy also extends into waste management, through the achievement of zero landfill waste and by encouraging the use of recovery and recycling channels. Some sites are also studying potential local opportunities to exchange resources and waste as part of industrial ecology experiments. As such, the Group takes part in

an inter-company working group, LAEI (industrial ecology working group), to carry out local testing in areas where its members are active. This initiative did not materialise, as the Poissy plant replaced the installation that prepared water to be pumped into the River Seine by a smaller installation that was more compliant with the current plant's water requirements. Accordingly, the volumes of waste produced are too low compared with the requirements of another manufacturer to purify its exhaust gases.

In France, the prospects of developing such solutions come up against administrative constraints related to waste status and end-of-waste status, which make this type of action very difficult to implement.

### **5.4.1. Reducing material consumption through optimised manufacturing processes**

DPEF.23

A great deal of the efforts needed to reduce material consumption is carried out during the product design stage (see 2.1.3.2.). Work carried out on reducing vehicle mass entailed an overall decrease in material masses (specifically steel) in the production of the Group's vehicles (see 2.4.1.1.). In addition to the work to reduce product mass, the Group's Industrial Department is also undertaking action plans to reduce material consumption.

#### **5.4.1.1. Reducing metal consumption**

74% of the Group's overall waste tonnage every year is scrap metal. This scrap metal is derived from stamping scraps (83%), which has increased since OV was integrated, and scraps of metal coming from machining operations from component factories and foundries (17%). The machining turnings were made up of derelict test vehicles and various types of waste materials. This evolution is directly linked to internal stamping activity which is higher in OV than in PCD.

**For mechanical parts, the reduction of turning relies on the optimised definition of finished parts.** The roll-out of pressurised casting was a significant advance, as this means that cast parts and finished parts can have almost identical measurements, which prevents the materials used to make the parts from being too thick. Today, this technology is widely applied to the production of aluminium cylinder crankcases for DV, EP and EB engines. This has several advantages, such as lighter engine components manufactured from aluminium rather than iron, and less substantial machining, although the production process is more delicate. The turnings, dried and compressed in bricks to best recover the cutting liquids reintroduced into the machining processes, are then sent to the Group's casting facilities or to steelworkers.

**For stamping, the MUR (Material Use Ratio) is one of the main levers coordinating the business line.** This approach makes it possible to optimise the consumption of sheets in the process of shaping bodywork parts. This action makes a direct contribution to controlling the main source of waste from manufacturing operations. Although all of these scraps are recycled in casting facilities, reducing the amount of them remains a huge challenge. In practical terms, the MUR approach quantifies the share of the material used to produce bodywork parts with respect to the total volume of material used. Stamping requires a percentage of "lost" material to secure the sheet metal between the two parts of the tool. As such, optimisation means reducing this share of lost material through the design of parts and tools (shape of sheet metal, depth of stamping). The other line of work concerns the possibility of producing other parts in cut-out shapes. Accordingly, the material cut out for use in glazed areas (windscreen, side windows, rear window) can be used as raw material to produce smaller parts. The MUR approach quantifies this progress. It increased from 47% in the design of the PEUGEOT 207 to 55% for the PEUGEOT 208. It even reached 60% for the new PEUGEOT 3008. This is also evident at OV with the following results about the Corsa, which increased from 52.8% in the design of the old model to 55.3% in the design of the new one.

The second major category of waste produced in the Group is generated by the casting. In this area, pressurised casting is characterised by almost zero waste production, since aluminium is cast directly into steel tools that can be reused multiple times. For more conventional casting facilities using sand moulds, the Group rolled out substantial resources for on-site recycling. This allows the plants to regenerate and reuse almost the total amount of sand used in production process.

### 5.4.2.1. Reducing consumption of other materials

Excluding casting and metal waste, production waste comprises 73% non-hazardous waste and 27% hazardous waste. The ratio of non-hazardous waste has increased, in particular due to OV integration.

Assembly is the main generator of non-hazardous waste, primarily due to the disposal of packaging waste. The second-largest source is common waste, similar to household waste and proportional to the workforce of each building overall.

Painting, machining of parts and water treatment processes (physical-chemical plants, biological plants) are the main producers of hazardous waste. **With respect to painting processes, the regeneration of cleaning and purge solvents has been carried out for several years. Collected from the facilities, these solvents are then sent to a service provider that carries out the necessary regeneration process so that the products can be reused in facility cleaning processes.** Plants using solvent-based paint are the main users of this short process, and it represents the full extent of their cleaning and purge solvent consumption. The volumes treated in this circular economy line totalled approximately 1,800 tonnes in 2018.

This waste topography helps target reduction actions during the design and operating stages. This information is listed below.

### 5.4.2. Reducing waste production

DPEF.16

DPEF.18

DPEF.20

#### Within the Automotive Division

The Group's waste management policy is to reduce waste mass per vehicle manufactured, and decrease landfill in favour of waste recovery and recycling.

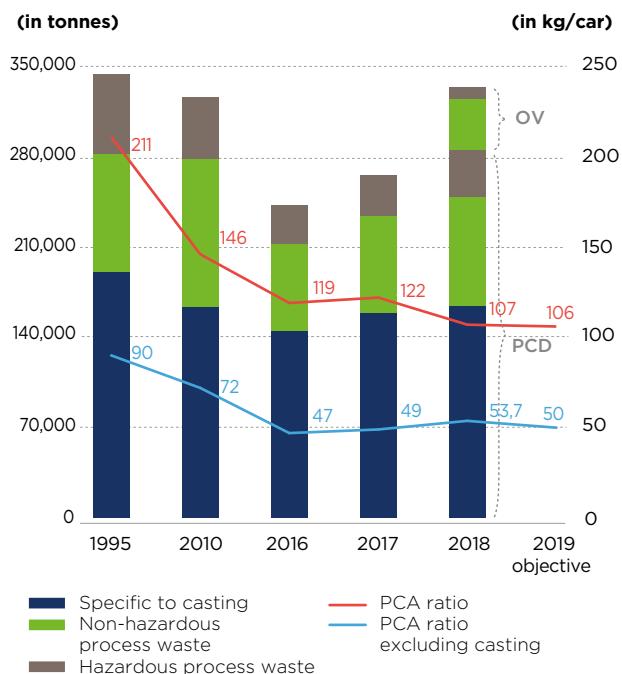
To meet these targets, efforts are needed at the design stage to optimise the packaging required to build a vehicle to avoid producing waste. When waste production is unavoidable, the most environmentally-friendly method of recycling or recovery should be identified and implemented, so that a portion of the Group's waste is incorporated into the circular economy, where it is reused.

Apart from scrap metal (sheet metal, turnings, etc.), which is almost entirely recovered and can be reused in the steel industry or the Group's casting facilities, the results obtained since 1995 confirm that this policy has been correctly implemented:

- the weight of waste per vehicle produced has been halved;
- the analysis and characterisation of waste produced during the different stages of production (casting, foundry work, components, stamping, paint and final assembly) have made it possible to identify processing channels that provide an alternative to landfill. **The gradual addition of new processing methods, depending on local supply, helps to regularly increase the waste recovery rate.**

#### CHANGES IN THE AMOUNT OF WASTE BY TYPE

(Automotive Division excluding metal waste, almost all of which is recycled, for 2018)



The amount of waste (excluding scrap metal) per vehicle produced was 107 kg in 2018. The improvement is only due to integration of OV facilities, which do not operate foundries. Foundry waste remains stable compared with 2017, as well as the quantity of onsite regenerated sand. Without foundry waste, the ratio of waste per car increases to 53.8 kg, and the growth is similar for hazardous and non hazardous waste. Demolition waste amounted to 4,800 tonnes in 2018, which equates to 1.5 kg per car.

In 20 years, the amount of  
waste per vehicle produced was

divided by 2

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

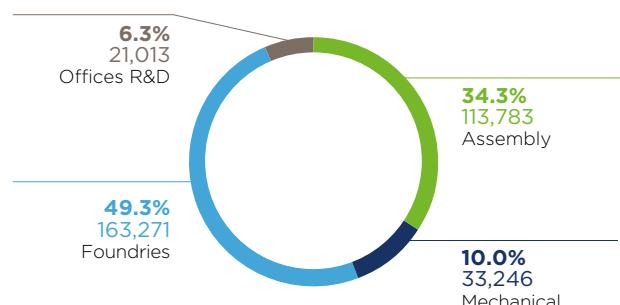
Waste and materials cycle: optimising production processes to reduce the use of resources and increase waste recovery

The geographic distribution of the total volume of waste in 2018 was as follows: 93% for the European Union and 7% for the rest of the world. The comparatively large proportion of waste produced outside of Europe is due primarily to packaging waste related to long-distance transport requirements.

Due to the integration of OV facilities, comparing results between 2017 and 2018 is difficult. The amount of waste per car, excluding foundry waste, is similar for both companies at around 53.5 kg. Analysing the changes in results can only be conducted for PCD waste. With foundry waste increases of 3%, in line with production increases, non-hazardous waste of 9% and hazardous waste of 17.5%, the global result is an increase of 6.7%, or around 4.6 kg per car produced. The reasons for these changes depend on waste family. In line with the situation of 2017, an increase of non-hazardous waste is directly linked to the use of non-returnable packaging due to the success of new launches and the delay to implement enough returnable packaging in logistics loops. Most of this single-use packaging is made of wood and cardboard, which are easier to reuse. For hazardous waste, the main causes are the footprint reduction of some mechanical plants (Trémery, Metz, Française de Mécanique (Douvrin), Caen) where a lot of old equipment was dismantled. Equipment that was not reused in carry-over operations has been treated as hazardous waste.

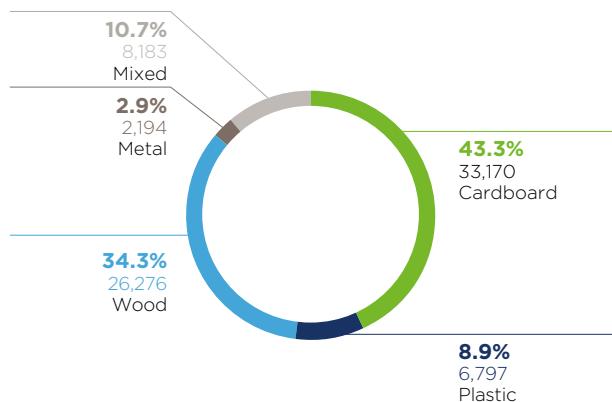
The waste production figures are based on the European waste and disposal method categorisations.

### BREAKDOWN OF WASTE PRODUCTION BY BUSINESS (Automotive Division, excluding scrap metal, 2018)



With the integration of OV industrial activities in the scope of reporting, the split of waste production changes, because OV does not operate any foundry. Then the share of foundry waste decrease from 59% to 49% despite a quite constant absolute amount. Then the part of foundry waste represents only 52 kg/car in 2018. Most of this waste is recycled in the production process after regeneration treatment on site. Waste from assembly activities drops from 26 to 34% while waste from components plants and offices and R&D activities remain stable in proportion.

### FOCUS ON PACKAGING WASTE (Automotive Division, 2018)



76,600 tonnes of packaging waste accounts for a significant proportion of the waste produced on the various sites. OV integration explains the main part of the increase, but PCD packaging waste an increase of 7,000 tonnes. Compared to 2017 for PCD, cardboard waste is the main contributor with + 3,700 tonnes, but wood (1,500 tonnes) and mixed material (1,500 tonnes) also contribute to this result, while plastic waste has been reduced by 350 tonnes.

**Reducing package waste starts at the design stage of a new vehicle and the definition of supply sources for the various components helps with this.** The use of sustainable containers is particularly popular in European plants which benefit from reduced transport distances between suppliers and assembly plants (or even no distance, when these suppliers are located in buildings vacated by the production plants). For more remote plants, the economic and CO<sub>2</sub> footprint can offer an incentive to use non-returnable packaging.

In 2018, the Group started working with packaging experts to find packaging solutions with a CO<sub>2</sub> dimension throughout the life cycle of this equipment. This study aims to strike the best compromise between the cost of packaging (including their end-of-life disposal) and CO<sub>2</sub> emissions throughout their use, with a view to integrating these conclusions to define the packaging solutions used in future projects.

Less than 2% of this packaging waste is considered as hazardous waste. They are mainly metallic drums contaminated by the products they contained. The processing method consists of burning metal barrels, which eliminates residual product traces while preserving the shape and possibility of reusing these containers for the same purposes as they were previously. Plastic barrels are treated through a cleaning process, which enables them to be reused. Then all packaging waste is recycled or recovered, and contributes to the improvement of the ratio of waste recovery.

In addition to the issues discussed above, 3,400 tonnes of wood derived from broken transport pallets which are used for fuel in Vesoul.

### Focus on paper use

Paper is managed and quantified at all levels within the Group, including in manufacturing plants, office facilities and commercial subsidiaries. Paper is used on-site for office applications or print-outs (brochures, sales leaflets, annual publications, etc.) produced by external printers. The Group is careful to check the origin of the paper used, and chooses paper from sustainably managed forests (PEFC or FSC labels).

Office paper use is optimised through awareness-raising campaigns and the implementation of a system of printer-sharing at most French sites. A large percentage of the used paper is sorted and collected, usually by private suppliers who then process it through recycling channels.

Regarding print-outs, the Group is a founding member of CITEO (formerly "EcoFolio"). It declares the yearly tonnages of print-outs produced and pays an eco-contribution to pay for the collection, recycling and recovery of the paper by local authorities. In this context, with the gradual digitalisation of certain materials, the Industrial Department remains well below the threshold (5 tonnes).

### 5.4.3. Fostering recycling and waste recovery by implementing circular economy systems

DPEF.18

DPEF.20

GRI.301-2

GRI.306-2

GRI.306-4

SASB-440b.1

#### Within the Automotive Activities

**To create circular economy strategies, the Industrial Department defined the "zero landfill waste" target for assembly plants in Europe.** Extending this approach to other assembly plants outside of Europe will require a good understanding of the local context of the treatment possibilities. For components factories, the availability of processing methods for specific manufacturing waste is a prerequisite for the definition of such a target. Analysis of these options began in 2017, and the waste component will be included in the review of the environmental vision for 2025.

In 2018, the OV and PCD plants generated 986,645 tonnes of waste, including metals, internally recycled casting waste and all production waste.

Metal waste (not shown in the graphs and tables below) makes up the largest part of this volume at 654,779 tonnes. Often no longer classified as waste, these by-products are recycled in the Group castings (71,000 tonnes) or in the steel industry.

100%  
of scrap metal recycled

Internal facilities for the regeneration of casting sand at Charleville-Mézières and Sept-Fons processed 103,313 tonnes of sand in 2018, similar to 2017. This very short cycle (since the processing is performed directly at the production site before the cleansed sand is reused) is high-performing and makes it possible to meet nearly all of the sites' sand requirements.

103,313 tonnes

of casting sand regenerated onsite at Sept-Fons and Charleville-Mézières in 2018

In 2018, the Group's castings recycled 45,473 tonnes of metal waste purchased externally.

Actions that have been undertaken for several years to optimise waste treatment channels continue. Landfill was divided by 15 in 20 years. In 2018, this improvement continues, and the total amount of waste in landfill is 4,711 tonnes, or 1.5 kg per car produced. At the end of 2018, only three out of 15 assembly plants are not landfill-free if we do not include the waste which must be sent to landfill to comply with regulations, in particular all the demolition waste containing asbestos which represents one third of the total, due to building demolition in many facilities (Mulhouse, Luton, Rüsselheim). The remaining landfilled waste amounts to approximately 1 kg/car and is:

- household waste, collected by the municipalities (Madrid, Mangualde) for which the processing channels are decided by these collectors. At Sevel Nord, household waste is also buried, since it cannot be incinerated nearby;
- sludge from treatment stations at the Mangualde plant for which economic alternatives are being examined. In 2017, Vigo buried this waste, but was able to find an economical alternative in 2018 and so does not bury waste any more.

Economic and technical analyses will be continued, and include any pre-treatment and transport costs related to these waste types intended for processing.

Office facilities and research sites in the Paris region have not contributed to landfill since 2012.

Excluding metal waste and foundry sand which is recycled onsite, 87% of waste is recovered as either material or energy through recycling or ballast. OV integration contributes to this improvement and for PCD, the ratio stays at 81% (as it was in 2017) when foundry waste is excluding.

Drawing on all of these actions, 97% of waste produced (metals included) in all industrial facilities of Groupe PSA plants worldwide are recovered in processing centres. This confirms that this processing method works to reduce waste, firstly because of increased internal recycling, and secondly because recycling and recovery solutions are implemented as waste treatment when reducing waste generated on-site is not possible. On this same basis, landfill waste represents less than 0.5% of the total amount.

97%  
of the waste produced by the Group's plants is recovered

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Waste and materials cycle: optimising production processes to reduce the use of resources and increase waste recovery

## Amount of waste by disposal method

### PCD AUTOMOTIVE ACTIVITIES

(unit: t)	Year	Landfill	Recovery and recycling	Other disposal methods <sup>(1)</sup>	Total	On-site recycling <sup>(2)</sup>
<b>Foundry waste</b>	<b>2018</b>	0	<b>58,539</b>	2,104	<b>60,644</b>	<b>103,313</b>
	2018 ratio (kg/car)	0	26.3	0,95	27,3	46,5
	2017	1,511	52,819	794	55,124	103,320
	2016	4,830	43,671	0	48,501	95,946
<b>Non-hazardous waste</b>	<b>2018</b>	<b>3,400</b>	<b>73,986</b>	<b>5,589</b>	<b>82,975</b>	<b>1,478</b>
	2018 ratio	1,5	33,3	2,5	37,3	0,7
	2017	4,328	67,386	4,013	75,727	1,744
	2016	4,570	58,962	2,413	65,946	2,240
<b>Hazardous waste</b>	<b>2018</b>	<b>311</b>	<b>22,289</b>	<b>14,051</b>	<b>36,651</b>	
	2018 ratio	0,1	10	6,3	16,5	
	2017	278	19,060	11,839	31,177	
	2016	461	16,515	12,652	29,628	
<b>TOTAL</b>	<b>2018</b>	<b>3,711</b>	<b>154,814</b>	<b>21,745</b>	<b>180,270</b>	<b>104,791</b>
	2018 ratio	1,7	69,6	9,8	81,1	47,1
	2017	6,117	139,265	16,646	162,028	105,064
	2016	9,861	119,148	15,065	144,075	98,186

This table does not include metal waste (446,507 tonnes in 2018, 100% of which is recycled).

Outside of the casting facilities, the waste per car produced ratio reaches 53.8 kg/car, or 52.3 without demolition waste which are not part of production process. The share of hazardous waste increased in 2018 to approximately 2.5 kg/car. There are two main reasons for this result. The first reason is that the reduction in the carbon footprint of plants (mainly in component plants such as Trémery, Metz and Caen) meant that a lot of equipment could be drained before it was dismantled or transferred to another plant. This generated approximately 1.5 kg/car of extra waste. The second reason is that the difficulties in wastewater treatment

in Trémery and Metz meant that effluent had to be transferred and treated externally, which generated approximately 1 kg/car of extra waste. If we do not take into account these unusual situations the quantity of hazardous waste remains stable.

Non-hazardous waste increases too because of non-returnable packaging. It can also be noted that waste in landfill continues to decrease, and this way of treatment now represents less than 1.7 kg/car.

In addition, the manufacturing plants at Rennes and Vigo join Trnava, Sochaux, Mulhouse, Poissy, Hérimoncourt and Valenciennes as facilities which no longer bury any waste at all (except the tiny fraction required by law to be buried).

### OV AUTOMOTIVE ACTIVITIES

(unit: t)	Year	Landfill	Recovery and recycling	Other disposal methods <sup>(1)</sup>	Total	On-site recycling <sup>(2)</sup>
<b>Foundry waste</b>	<b>2018</b>	0	0	9	9	0
	2018 ratio (kg/car)					
<b>Non-hazardous waste</b>	<b>2018</b>	<b>833</b>	<b>38,353</b>	<b>525</b>	<b>39,711</b>	
	2018 ratio	0,9	42,5	0,6	44,0	
<b>Hazardous waste</b>	<b>2018</b>	<b>168</b>	<b>5,600</b>	<b>2,797</b>	<b>8,565</b>	
	2018 ratio	0,2	6,2	3,1	9,5	
<b>TOTAL</b>	<b>2018</b>	<b>1,001</b>	<b>43,953</b>	<b>3,322</b>	<b>48,285</b>	
2018 ratio		1,1	48,7	3,7	53,6	

For the first year, data from OV are integrated in the scope of this reporting. This means that no comparisons can be carried out with previous years. If we do not take into account specific foundry waste created by PCD, we see that amounts of waste per car produced are at similar level around 53.5 kg (or 51 kg without demolition waste), but the distribution differs between hazardous and non-hazardous waste and this difference affects

how the waste is treated. The Club Métier Environnement carries out detailed comparisons to identify why these differences occur, and then propose best practices to improve performance.

OV assembly plants are landfill-free. The waste indicated here is demolition waste containing asbestos. The main contributor to this result is Luton's plant.

(1) Of the 21,745 tonnes of waste recorded under "Other disposal methods", hazardous waste comprises:

- half liquid effluents (paint effluents, water from washing machines or cutting liquids from components factories, etc.), half of which is incinerated without energy recovery (calorific value too low), while the other half is subject to additional physical and chemical processing to separate the different fractions;  
- half sludge, mainly from our internal processing stations. This sludge is processed in nearly the same way as liquids, mainly via incineration and physico-chemical treatment.

Mixed common waste represents non-hazardous waste, which is incinerated due to its similarity to household waste.

(2) Onsite recycling deals with sand regeneration in foundries for the main part (103,313 tonnes). The other onsite recycling is packaging reused in Vesoul for parts reconditioning before delivery to local warehouses, and in Vigo for similar part reconditioning operations inside the assembly plant.

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

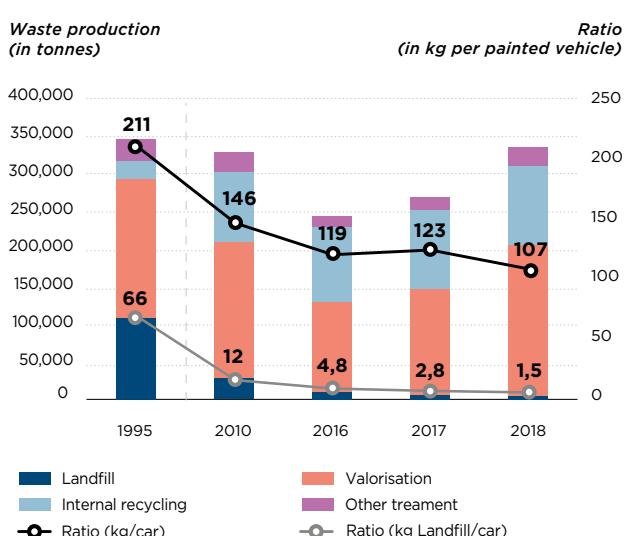
Waste and materials cycle: optimising production processes to reduce the use of resources and increase waste recovery

### 12 plants out of 15

in Europe met the zero buried waste target

#### CHANGES IN THE AMOUNT OF WASTE BY DISPOSAL METHOD

(Automotive Division, excluding metal waste, almost all of which is recycled)



#### A review of hazardous waste

Hazardous waste is derived from three main processes: the surface treatment and painting of bodywork, the processing of metal parts and casting.

The change in the quantity of hazardous waste from 2017 to 2018 has been explained above for PCD results. The difference in terms of ratio between PCD and OV results means that comparisons can be drawn between sister plants (paint shops on one side and component plants on the other side) to find ways to improve. Reducing the use of dangerous substances in production processes are continued in parallel, such as micro lubrication in component plants, which drastically reduces the use of machining fluids and subsequent wastewater and sludge, or use of cleaning products with less solvent in paint shops.

**In solvent-based paint processes, solvents used to purge application tools between two painting processes or solvents used to clean the facilities, are automatically recovered.** The products collected are sent to a regeneration plant located in the Aisne department in north-east France for French plants. Once they have been processed, the solvents return to the plant to be re-injected into technical cleaning and purging processes. All the Group's plants apply this method in collaboration with local players. Approximately 1,800 tonnes of regenerated solvent are reused in the plants every year, and this quantity remains stable from one year to the other.



#### Impact measurement and economic assessment

In November 2018, the Porto Real plant received a silver medal from UNIDO (United Nations Industrial Development organisation) during the Fourth Global Chemical Leasing Award Ceremony and Green Chemistry Conference. This medal, shared with its partner and supplier of products Green Chemicals of Brazil, rewards good management of cleaning solvents in the paint shop. This good management means that the cost of cleaning chemicals was cut by a fifth in the three years following 2013 (change in solvent definition, collection and regeneration of used solvent by the supplier).

Landfill is responsible for the most significant environmental impact. The Group is gradually making efforts to phase out landfill waste (2018 target: zero landfill for assembly plants in Europe). When it comes to hazardous waste, the Group is particularly mindful of the performance of treatment and recovery channels developed by specialists in the field. Use of these channels guarantees a controlled environmental impact.

Hazardous waste in landfill represent 479 tonnes in 2018 for Groupe PSA industrial activities. 368 tonnes are demolition waste containing asbestos, for which no other treatment is allowed. The remaining, 111 tonnes is sludge from processing stations. The type of waste remains constant over time, reflecting the difficulty of finding alternative, economically viable channels for this type of waste, in relatively reduced quantities for each plant.

The proportion of hazardous waste recovered stays at approximately 61% of the processing methods. The remaining 40% classified under other treatments are for around 2/3 of liquid waste which cannot be treated in the onsite installations. The final 1/3 is sludge, either from the waste water treatment plant inside the facilities, or from production processes. Material recovery is the main processing method (64% of waste). This applies to sludge that contains solvents or metal, and machining waste (cutting liquids, filter cloths), which is processed at facilities separating the various components and recovering the dissolved metals. The collected fractions are then recycled in the manufacturing processes and the water is treated, then discharged. Often rich in combustibles, the concentrates are then used to produce energy when the calorific values are sufficient, otherwise they are incinerated.

Lastly, general waste (a mixture of water and hydrocarbons from separators on all site roads and car parks, physicochemical treatment plant sludge) is treated in the same channels as those mentioned above. The very low hydrocarbon content in separator water generally prevents any recovery from concentrates.

## Cross-border transfer of waste GRI.306-4

In 2018, 1,336 tonnes of waste produced in one country were transferred to another one for treatment. These operations only occur in Europe and concerned the following waste:

- 1,142 tonnes of sludge from machining operations generated in the *Française de Mécanique* and Trémery plants which was sent for treatment in Belgium, as in previous years;
- metallic drums and plastics containers with residual dangerous substances from Ellesmere Port;

- 46 tonnes of end-of-life vehicles, or prototypes from Trnava sent to Austria for depollution and treatment. These cars were used as training for the launch of a new car in the plant in 2018.

The reason behind implementing these treatment channels remain the same as previous year:

- efficiency of the waste treatment plant: we will use local treatment plants where possible when treatment plants perform similarly;
- distance between production and waste treatment.

## Within automotive trade

### AUTOMOTIVE TRADE - OWN BRAND NETWORK SCOPE (EXCLUDING METAL WASTE)

(unit: t)	Year	Landfill	Recovery and recycling	Other disposal methods	Total
	<b>(PCD + OV) 2018</b>	<b>717</b>	<b>5,039</b>	<b>55</b>	<b>5,812</b>
<b>Non-hazardous waste</b>	(PCD) 2017	991	6,448	102	7,541
	(PCD) 2016	346	8,892	58	9,296
	<b>(PCD + OV) 2018</b>	<b>52</b>	<b>2,620</b>	<b>124</b>	<b>2,796</b>
<b>Hazardous waste</b>	(PCD) 2017	53	3,242	156	3,450
	(PCD) 2016	24	3,221	201	3,447
	<b>(PCD + OV) 2018</b>	<b>769</b>	<b>7,659</b>	<b>179</b>	<b>8,608</b>
<b>TOTAL</b>	(PCD) 2017	1,044	9,690	258	10,991
	(PCD) 2016	370	12,113	259	12,742

This table does not include scrap metal (1,609 tonnes in 2018).

up in landfill decreased, more because the best way of treating this waste was understood rather than because the situation had changed.

**For dealership networks in Europe, Groupe PSA confirms its intention to sign framework agreements with specialist hazardous and non-hazardous waste management providers.** This approach helps to optimise waste monitoring and ensure waste traceability within the processing channels.

The above-mentioned data from brands was an average of 91% their sites in 2018 (92% in 2017 and 97% in 2016).

In 2018, the first impact of this strategy is an improvement in the recovery and recycling rate. The amount of waste that ended

The waste management described above does not concern the Group's circular economy initiatives, including reused and remanufactured parts (see 2.4.3.).

## 5.5. CONTROLLING THE WATER CYCLE IN FACILITIES

GRI.103-2

GRI.103-3

Water consumption by the manufacturing activities is characterised by the following volumes:

include sludge from various processing operations (plant sludge, decarbonised sludge, etc.) which often have a significant water content (dryness of less than 30%), and certain treatment baths (cataphoresis bath, surface bath, etc.). The quantities of this waste amount to 10% of the water actually consumed.

Water cooling of the OV cogeneration plants is a source of wastewater of a type not previously discharged from the Group's facilities. In 2018, 62,824,013 m<sup>3</sup> of cooling water was discharged to rivers untreated. The only impact on the receiving waters was a slight increase in temperature. Otherwise, the water use profile of OV facilities is the same as that of the PCD plants.

**Use analysis shows that painting is the largest user of water.** It accounts for between 50 and 60% of an assembly plant's water consumption. Water-based paint workshops are the greatest consumers, and are also the main generators of steam, since paint curing in this case consists of evaporating the water solvent used.

As far as the other water uses discussed below are concerned, approximately 70% of the total amount abstracted is discharged into the environment, either directly or via municipal installations..

**After paint, the second-largest source of consumption is represented by industrial refrigeration facilities, often comprising air-cooling towers. On average, this represents 15% to 20% of a plant's consumption.** Although this equipment is fitted with closed circuits, the heat discharge leads to the use of water, which is often discharged directly into the natural environment after processing in the physical and chemical plants.

Whatever the case, the quality of this water is monitored daily and storage facilities have been established in plants to deal with possible drifts.

The largest portion of the 30% of water actually used evaporates during production processes. As such, it is difficult to quantify the volumes discharged in that manner. Other water outfalls

which is often discharged directly into the natural environment after processing in the physical and chemical plants.

The largest portion of the 30% of water actually used evaporates during production processes. As such, it is difficult to quantify the volumes discharged in that manner. Other water outfalls

The other uses are less significant, such as the constitution of cutting liquids in component factories, but in that case the use of evaporating concentrators makes it possible to separate the cutting liquid and water phases at the baths' end of life, which then enables either the water to be reused or to be discharged in the plant. This item represents about 10% of Groupe PSA plants' water consumption.

The use of drinking water accounts for less than 10% of the Group's water consumption. Apart from a few plants which have no other source of supply (Madrid and study and research centres),

this water is intended exclusively for sanitary use (cloakrooms, restaurant, bathrooms).

In terms of significant use, we can mention the water used by the fire and rescue services during exercises conducted across all plants (approximately 2%), workshop cleaning processes (approximately 2%), and washing water and leak test water for end-of-assembly vehicles.

This general mapping is detailed plant by plant, which means that each building knows its main sources of consumption.

## 5.5.1. Annual water abstraction and recycling

GRI.303-1 GRI.303-2

The environmental issues caused by water consumption and liquid waste from the manufacturing plants, while significant, remain limited for the Group, as only one plant is located in an area identified by the World Resources Institute as being at high risk of water stress.

However, in 2018, due to the long and hot summer in France, the local authorities published requirements which forced the plants of Vesoul, Sochaux and Herimoncourt to limit their water abstraction in the rivers. For most other French plants, alerts were broadcasted by authorities to reduce water use.

### 5.5.1.1. Annual water abstraction by source and business

DPEF.22

**Saving water is a key objective for each manufacturing plant. As with energy, each plant has its own water consumption management plan based on the widespread use of metering systems, displaying the least water-intensive operating parameters for each workstation, and using recycling systems.**

The concept of available resources is different for each site. When performing impact studies, an analysis is conducted to determine the plant's water requirements and how these requirements fit in with the natural environment (e.g. what percentage of the river flow will be taken).

Since 1995, these measures have led to an almost 75% reduction in water consumption per vehicle produced, thereby helping to conserve resources.

At the same time, the volume of water taken per painted vehicle, has been reduced threefold. The Group has set itself a target of 3.8 m<sup>3</sup> per vehicle by 2018, including OV activities.

The Trnava and Mangualde plants confirmed their strong performance below 1 m<sup>3</sup> per car in 2018 and serve as a benchmark for the other plants.

#### ANNUAL WATER ABSTRACTION BY SOURCE AND BUSINESS

Water abstraction (in m<sup>3</sup>)

Entities	Year	City water	Surface water	Underground water	Total
<b>Automotive Activities</b>	(PCD + OV) 2018	<b>2,511,557</b>	<b>6,096,420</b>	<b>3,313,731</b>	<b>11,921,708</b>
	o/w OV 2018	648,464	2,708,158	803,310	4,159,932
	o/w PCD 2018	1,863,093	3,388,262	2,510,421	7,761,776
	(PCD) 2017	1,870,739	2,914,497	2,711,309	7,496,545
	(PCD) 2016	1,776,519	3,151,690	2,836,853	7,765,062
<b>Automotive Trade</b>	(PCD + OV) 2018	<b>329,203</b>			<b>329,203</b>
	(PCD) 2017	404,806			404,806
	(PCD) 2016	457,421	0	0	457,421
<b>TOTAL</b>	<b>2018</b>	<b>284,760</b>	<b>6,096,420</b>	<b>3,313,731</b>	<b>12,250,911</b>
	2017	2,275,545	2,914,497	2,711,309	7,901,351
	2016	2,233,940	3,151,690	2,836,853	8,222,483

While the split between water supply sources shows a similar profile for PCD and OV plants, when cogeneration plants cooling water is excluded, the specific water use figures differ noticeably. The overall average PSA figure is 3.81 m<sup>3</sup> per car, with PCD at 3.49 m<sup>3</sup>/car and OV at 4.61 m<sup>3</sup>/car. As the figures for OV were only incorporated into the results in 2018, annual performance comparisons can only be carried out for PCD. The overall 2018

value was higher than that for 2017, despite every facility improving its own performance. This can be explained by considering how the level of water consumption performance varies from plant to plant. In 2018 more than 500,000 cars were produced in Sochaux, which is the least efficient plant in terms of water usage. It is the oldest PCD plant, with old and long underground water pipes. Identification and treatment of leaks from these pipes is

# REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Controlling the water cycle In facilities

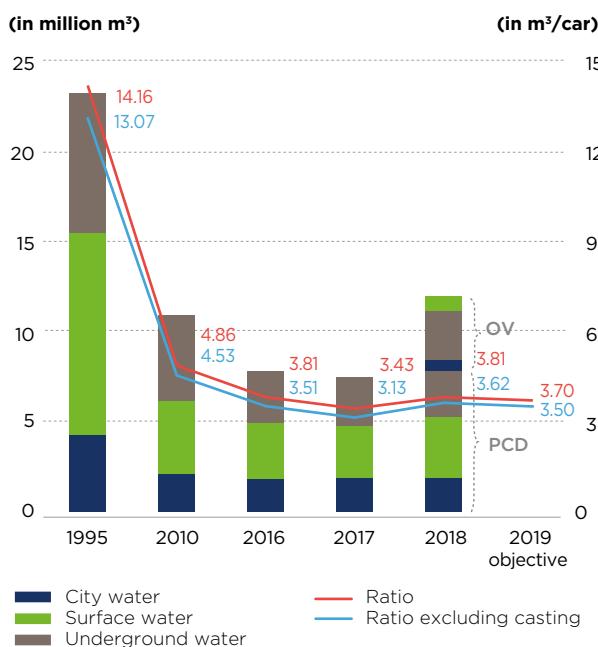
difficult. Important improvements will result from the project "Sochaux 2022", which will greatly reduce the land area of the plant, with the result that the total length of water distribution piping will also be reduced.

A reduction of 18% in water consumption was recorded **in the dealership networks** compared to 2017.

**Data for the brands** was reported from 99% of sites in 2018 (90% in 2017 and 94% in 2016). Network water consumption is essentially linked to sanitary use and vehicle maintenance for sales outlets equipped with wash stations.

## 5.5.1.2. Change in the volume of water abstracted

### CHANGE IN THE VOLUME OF WATER ABSTRACTED (Automotive Division)



The geographic breakdown of water abstraction in 2018 was as follows: 95.4% for the European Union and 4.6% for the rest of the world. The change compared with 2017 is due to OV integration which has increased the proportion of the total consumed in Europe.

## 5.5.2. Significant industrial effluent discharges

In 20 years, water consumption per vehicle produced was

divided by **4**

### 5.5.1.3. Recycled and reused water

DPEF.16      DPEF.18      DPEF.22  
GRI.303-3

The Group is careful about water abstraction and preserving water. A number of best practices in terms of water recycling, which have been implemented at all the Group's plants, can be mentioned as an example of this, particularly in the very water-intensive processes of the paint workshops where water can be used in eight reverse cascade rinsing stages on body structures. Evapo concentration systems have been included in the components factories to separate the oil phases from the water phases of the machines which wash the parts. This water recycled by evapoconcentration is reintroduced into the parts washing process. Water recycled in this way is estimated at 2.7 million m³ per year. OV represents more than a quarter of the Group's total consumption.

**2.7** million m<sup>3</sup>

of water recycled every year, equal to more than a quarter of the Group's total consumption

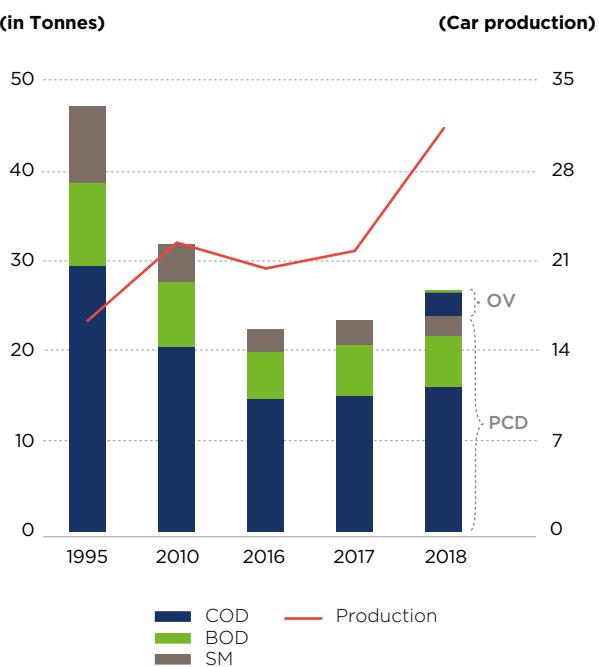
### GROSS DISCHARGES INTO WATER FROM PLANTS

	Year	COD	BOD5	MES
	(PCD + OV) 2018	<b>1,849,692</b>	<b>579,551</b>	<b>242,527</b>
	o/w OV 2018	252,599	19,723	18,572
<b>Automotive Activities</b>	o/w PCD 2018	1,597,094	559,828	223,954
	(PCD) 2017	1,498,471	564,996	271,341
	(PCD) 2016	1,467,091	511,104	260,032
	<b>2018</b>	<b>1,849,692</b>	<b>579,551</b>	<b>242,527</b>
<b>TOTAL</b>	2017	1,498,471	564,996	271,341
	2016	1,467,091	511,104	260,032

BOD5 = biochemical oxygen demand in five days; COD = chemical oxygen demand; SM = suspended matter.

## 5.5.2.2. Change in gross industrial effluent discharge DPEF.18

(AUTOMOTIVE DIVISION)



The graph above shows the amalgamated waste water discharges from each Groupe PSA plant. It gives a picture at the discharge point of each plant, regardless of whether or not complementary treatment, such as at a city wastewater treatment plant, takes place before the wastewater is released to the environment. Annual data for the PCD plants can be compared as the same methodology for generating them has been used for many years, and because no changes to the wastewater treatment and discharge processes occurred in 2018.

However, these factors give an indication as to changes in the loads discharged by plants. The quality of the discharge remains relatively stable across all production types, which indicates consistency in this discharge.

The geographic breakdown of pollutant flows in 2018 was as follows: 99% for the European Union and 1% for the rest of the world.

This indicator presents the gross yearly discharge of the plants which perform regular self-monitoring. In 2018, these sites represented 97.8% of all water abstraction from PCD and OV industrial plants.

## 5.5.2.3. Discharge of heavy metals into industrial effluents

In order to meet the objectives of the Wastewater Framework Directive (2000/60/CE) on the quality of surface water, countries have implemented regulations to control the discharge of heavy metals, and these regulations have been regularly revised to enlarge the list of controlled substances or to further restrict emission limit values. These modifications are reflected in changes to the permits of Groupe PSA's plants. These permits also specify the frequency of measurement (weekly or monthly control). The data provided below are the synthesis of these results and give a global view of the quantities of heavy metals discharged

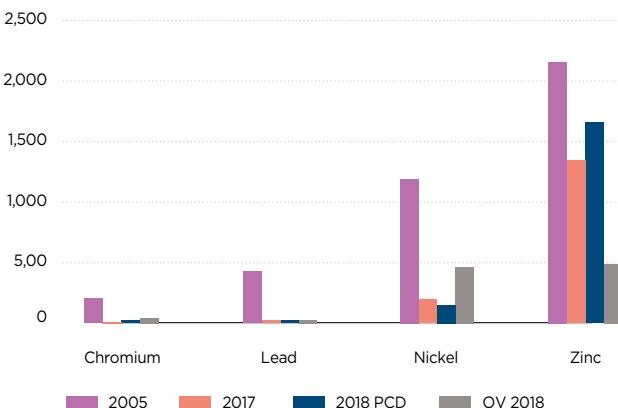
by the plants, prior to any post-treatment in city waste water treatment plants.

In France, the list of substances to be controlled has been expanded in 2018, in particular to phenols with very low emission limits. This led the Trémery plant needing to collect its wastewater and send it to an external waste water treatment plant (see section 5.4.3. about waste), and to introduce an action plan to identify the origin of these substances in the wastewater. The source was found to be additives used in part machining workshop, which have now been respecified to eliminate the problem.

Similar analyses have been carried out in all French plants and particular attention has been paid to heavy metals and dangerous substances in waste water discharged by the plants. This shows the pairs of heavy metals that are linked to the car manufacturing business and surface treatment and their potential impacts on the receiving environment. It confirms that any heavy metal discharges, such as mercury, cadmium, arsenic, lead and copper, are insignificant in terms of flow, and as such the Group has no specific obligation to monitor these substances in the long-term. It has emerged that the significant metals are chrome, lead, nickel and zinc.

## 5.5.2.4. Change in discharge of heavy metals into industrial effluents

*Discharge of heavy metals into water (kg/year)*



In 2018, OV data are introduced for the first time, on the same basis for calculation, with concentration measured according to the requirements of the permit multiplied by the average flow.

The first point which could be highlighted is the impact of nickel-free surface treatment used in most of PCD plants and not in OV facilities. The impact on discharge is significant.

Chromium and lead levels from PCD and OV plants are very low. Most of the concentrations measured in plants are below the quantification limit of the laboratory, and for those which exceed this value, the impact of the flow explains the difference from one year to the next.

PCD zinc emissions have increased, but remain at similar levels as in previous years. The calculation methodology is the main reason for these fluctuations in results. Zinc is part of many products used for water treatment in cooling towers, and is used in plants to reduce water consumption. For some plants, control is done once a month, and if the control is done during tower treatment, it can influence the result and this happened in Vigo last year.



## 5.6. PROTECTION OF NATURAL ENVIRONMENTS AND BIODIVERSITY EFFORTS

GRI.103-2

GRI.103-3

GRI.304-3

Groupe PSA car manufacturing operations do not intrinsically pose a high risk to the environment. The manufacturing facilities are large, however, due to the demands of mass-market production.

### 5.6.1. Presence close to protected zones

DPEF.25

GRI.304-1

Taking into account OV facilities, the Group's manufacturing facilities worldwide include 31 manufacturing plants and 12 study centres and tertiary sites. These 43 facilities occupy an area of approximately 4,900 ha, of which 47% are waterproofed. Comparison with data provided last year is complicated because of the integration of OV facilities in the data.

For PCD only, the total surface area is 3,608 ha, of which 44% is waterproof, i.e. a decrease of approximately 2%. The reduction is equal between buildings (waterproof surfaces), due to the fact that Groupe PSA moved out of its Grande Armée, Paris XVII,

PEUGEOT Sports and Vélizy B buildings, and sold workshops and surfaces in Caen, and sealed surfaces in Metz and Rennes.

Most of these sites are located in suburban industrial areas. No site is located in an area defined as wetland (RAMSAR convention) or in an area regulated for the protection of fauna and flora (national parks, Natura 2000 areas, nature reserves, areas covered by biotope orders, etc.). Although some facilities listed below are located near these areas, their proximity has no consequence identified to date on the environments concerned.

Plant	Business	Surface area (sq. m.)	Waterproofed surface area	Proximity to a regulated area	
				Distance between the plant and the regulated area	Type of area
Aspern	Components plant	605,220	46%	Less than 3 km	Natura 2000 area
Bessoncourt	IT centre	57,400	51%	Less than 3 km	Natura 2000 area
Dudenhofen	Testing centre	2,754,300	20%	Less than 1 km	Natura 2000 area
Caen	Component plant	585,000	47%	Over 3 km	Natura 2000 area
Charleville-Mézières	Casting	550,000	35%	Between 1 and 3 km	Nature reserve
Eisenach	Automotive production	394,376	74%	Less than 3 km	Natura 2000 area
Ellesmere Port	Automotive production	1,265,737	64%	Less than 3 km	Natura 2000 area
Kaiserslautern	Component plant	1,340,000	37%	Less than 3 km	Natura 2000 area
La Ferté-Vidame	Testing centre	8,080,000	4%	Less than 3 km	Natura 2000 area
Kaluga	Automotive production	1,430,000	41%	Over 3 km	National park
Mulhouse	Automotive production	3,169,106	63%	Less than 1 km	Natura 2000 area
Rüsselsheim	Automotive production	2,481,866	87%	Less than 3 km	Natura 2000 area
Sept-Fons	Casting	202,262	48%	Less than 1 km	Natura 2000 area
Szentgotthard	Components plant	349,640	64%	Less than 3 km	Natura 2000 area
Trnava	Automotive production	1,825,754	32%	Over 3 km	Natura 2000 area
Valenciennes	Gearbox production	890,000	35%	Between 1 and 3 km	Regional nature park
Vesoul	Spare parts warehouse	1,197,606	89%	Over 3 km	Natura 2000 area
Zaragoza	Automotive production	1,785,500	65%	Less than 1 km	Prefectoral biotope protection order

## 5.6.2. Biodiversity efforts

DPEF.19

DPEF.29

GRI.304-2

### Embracing biodiversity at Groupe PSA manufacturing plants

**Measures required to preserve natural habitats and flora and fauna are assessed and defined during initial or additional environmental impact studies conducted before the installation of any new plant facilities or equipment whose content is defined by regulations.** These studies assess the sensitivity of natural environments located in the immediate vicinity of the sites, and particularly the proximity of special protection areas of fauna and flora. **They are carried out at new facilities or renewed at each significant development stage of a site** (extension, new installation or new equipment), and are legally subject to public notice and the approval of the administrative authorities.

As a result, approximately ten impact studies are conducted annually on the Group's sites. In addition to these studies, analyses of the environmental impacts from business activity are conducted annually using the ISO 14001 Environmental Management System on all of the Group's certified sites.

Since facilities and the regions in which they are located have very different characteristics, each facility is granted considerable independence in setting up its biodiversity management programme.

Each OV manufacturing plant runs a biodiversity programme. The programmes address various biodiversity aspects depending on the availability of natural habitats at each site. Some of the OV plants promote and monitor protected species in an onsite wildlife habitat, others have established programs to protect local flora and fauna. OV biodiversity programs often combine onsite efforts with biodiversity education and reach out to local residents with practical onsite examples and activities. Each programme is guided by qualified external biodiversity professionals to ensure its quality. Some sites have obtained Wildlife Habitat Council Organization certification for their programmes.

In addition, during environmental week, many plants from both companies organised presentations of environmental information to their employees, or planted trees (Porto Real) during the "Brazilian tree week". In Belchamp, the arboretum tours launched in 2017 were successfully continued.

**For PCD,** flora and fauna assessments have been conducted in Sochaux and Caen. Another project is in progress in Valenciennes with students from the local university.

Forests at the Belchamp and La Ferté-Vidame sites have earned Pan-European Forest Certification (PEFC) for their sustainable management practices;

After a first attempt of agricultural grazing at the Trémery plant in 2017, which was successful for both the plant and the breeder, the experiment was tried again at the Metz plant in 2018. In Szentgotthard, a similar project with cows was undertaken in 2018.

### The PEUGEOT-ONF forest carbon sink project in the Amazon

The PEUGEOT brand, in partnership with France's National Forestry Office (ONF), has contributed to the PEUGEOT-ONF forest carbon sink project it has sponsored in the Amazon since 1998. The project involves reforesting areas of degraded land and restoring biodiversity, while studying the relationship between reforestation and the absorption of atmospheric carbon dioxide.

**At the end of 2018, when the project had already been running for 20 years, the total amount of carbon sequestered by biomass and soil was estimated to be about 700,000 tonnes of CO<sub>2</sub> equivalent** according to the measurement methods of the VCS (Verified Carbon Standard).

The 595,445 carbon credits (VCUs = Verified Carbon Units) corresponding to the 2015 inventory are currently undergoing VCS verification. 61,530 VCUs issued from the first verification in 2011 were sold under the VCS protocol methodology. The revenues from this collected are systematically reinvested in the project.

The average annual carbon sequestration (about 35,000 tonnes) represents 2.7% of the 1,274,488 tonnes of CO<sub>2</sub> emitted by the Group's plants in 2018.

**2 million trees, including more than 50 native species, were reintroduced in a plantation of nearly 2,000 hectares.** At the heart of the project, an area of 1,800 hectares of virgin forest with high biodiversity value has been devoted to scientific research since 2009.

The results of a decade of scientific research were presented by the project in 2018 during the Brazil/France Bilateral Biodiversity Symposium.

More than 20 new global species were discovered, among them a new fish named "Hypessobrycon peugeotii" and a new species of beetle called "Hansreia peugeotii". In 2018, a new coral snake named "Micrurus boicora" has been discovered, and a possible new species of bird is currently being verified ("Psarocolius sp").

Research with amphibian toxins as tools to treat cancer and malaria, carried out with material collected at the project site, are showing promising results.

More than **20**  
new global species discovered



### STAKEHOLDERS DIALOGUE

The carbon sink's long-term success hinges on its seamless integration into the region's economic and social fabric. In 2012, the project partners set up PETRA, an experimental platform for the management of Brazilian Amazon rural land, to develop initiatives aimed at reconciling economic activities with the preservation of the forest in rural Amazon areas. The project encourages small local producers to develop sustainable forestry systems (agro-forestry and woodland grazing, among others).



## 5.7. REPORTING SCOPE AND METHODOLOGY

GRI.102-48

GRI.102-49

### Inclusions in the scope

The environmental indicators were produced for the subsidiaries as defined by Article L. 233-1 of the French Commercial Code and for the companies come under the jurisdiction of Article L. 233-3 of the French Commercial Code. These parts of the Group were as assessed as at/on 31 December 2018:

- “**Automotive Activities**” include production plant activities, R&D centres and office facilities activities (see details below), i.e. 43 sites, including 12 from OV;
- “**Automotive Trade**” includes the five automotive brands dealership activity (see details below), i.e. 213 sites in 2018.

These two scopes are collectively referred to as the “**Automotive Division**”.

#### Automotive Activities

For the Automotive Activities, the scope of consolidation includes the following types of sites:

- production plants;
- technical, R&D and IT centres;

- the main office establishments;
- the spare parts centre in Vesoul.

The table below shows where these sites are located:

<b>Automotive Activities (43 sites)</b>	<b>France</b>	Belchamp Bessoncourt Caen Carrières-sous-Poissy Charleville-Mézières Héricourt La Ferté-Vidame La Garenne-Colombe Metz	Douvrin (formerly Française de Mécanique) Mulhouse Poissy Poissy Offices Division Rennes Saint-Ouen Hordain (formerly SevelNord)	Sept-Fons Sochaux Trémery Valenciennes Vélizy Vesoul CITROËN RACING Rueil-Malmaison
	<b>Spain</b>	Madrid	Vigo	Zaragoza (OV)
	<b>Portugal</b>	Mangualde		
	<b>Slovakia</b>	Trnava		
	<b>Germany</b>	Bochum (OV) Kaiserslautern (OV)	Dudenhofen (OV) Rüsselsheim (OV)	Eisenach (OV)
	<b>Austria</b>	Aspern (OV)		
	<b>UK</b>	Ellesmere Port (OV)	Luton (OV)	
	<b>Poland</b>	Gliwice (OV)	Tychy (OV)	
	<b>Hungary</b>	Szentgotthard (OV)		
	<b>Argentina</b>	Buenos Aires		
	<b>Brazil</b>	Porto Real		
	<b>Russia</b>	Kaluga		

## REDUCING THE ENVIRONMENTAL IMPACT OF MANUFACTURING AND LOGISTICS OPERATIONS

Reporting scope and methodology

### Automotive Trade

The Automotive Trade reporting data covers dealership activity for the PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL brands set out below.

It includes the following types of sites:

- the headquarters of the commercial subsidiaries;
- The Group's own dealership network (of which PSA Retail);

- training centres;
- regional offices;
- Groupe PSA spare parts warehouses (logistics warehouses).

As some of the Automotive Trade sites comprise multiple activities, it was decided that the consolidation of data would relate to the site's main activity.

The table below shows where these sites are located:

<b>Automotive Trade (213)</b>	<b>Commercial subsidiaries (8)</b>	Algeria	Belgium	Italy
	Germany	Brazil	Spain	
	Switzerland			
	<b>Groupe PSA own dealership network - PSA Retail (181)</b>	Germany	Spain	Poland
		Austria	France	Portugal
		Belgium	Italy	United Kingdom
	<b>Groupe PSA own dealership network - outside PSA Retail (outside Europe) (10)</b>	Algeria	Argentina	Chile
	<b>Training centres (1)</b>	United Kingdom		
	<b>Regional offices (1)</b>	United Kingdom		
	<b>Spare parts warehouses (12)</b>	Germany	France	Belgium
		Argentina	Italy	Russia
			United Kingdom	Austria

For the Automotive Trade, the reporting period corresponds to a rolling year from 1 November of the previous year to 31 October of the current year, and the scope of reporting comprises the sites with at least six months' activity during the period covering the year (open before 1 May), but does not comprise sites closed on 31 October.

Coverage rates for the Automotive Trade, presented in the comments of the results, correspond to the percentage of total sites that have already reported data for the year and that are concerned by the specific indicators. Failure to report data may be due to the inability of the facility to respond or to calculate the indicator concerned (lack of metering systems, for example). Unless otherwise mentioned, data concern all sites.

In 2018, as in 2017, showrooms or administrative offices of less than 6,000 sq.m. were excluded from the scope. For the other asset categories (retail, logistics, etc.), sites of less than 2,000 sq.m were excluded from the scope in 2018. All these exclusions represent 6% of the network activity's energy consumption in 2018.

The OV dealers integrated into the 2018 Automotive Trade reporting scope are located in the United Kingdom. These 10 sites, previously operated under the name Go VAUXHALL, were included in the 2018 PSA Retail scope.

### Excluded from the scope

The transport of Mister Auto parts is not included in Groupe PSA upstream or downstream logistics reporting (scope 3) but it accounts for less than 1% of Groupe PSA transport costs, which in turn accounts for 1.4% of the Group's global carbon footprint. The impact of the transport of Mister Auto parts on the Group's global carbon footprint is therefore considered to be non-material.

The Paris Grande Armée and Paris XVII sites, and the Sports Centre of PEUGEOT Sports closed in 2017. They do not appear in the 2018 Automotive Activities reporting.

The environmental data of BANQUE PSA FINANCE account for a marginal proportion of the Group's emissions and consumption and are therefore not included in the environmental reporting.

### Note

Some results from previous years have been adjusted to reflect more detailed data reported after the previous Registration Document was published. These amendments have been explained for each discrepancy exceeding 1%.

The emission factors taken into account to calculate the emissions linked to fossil fuel energy consumption have been updated for this exercise in order to take into account OV plants integration and use an homogeneous database for all calculations.





Preserving the interests of civil society and long-term economic development depends on fair and balanced business relationships. It requires the respect of ethical rules by all players. Groupe PSA discourages any attempts of corruption, in cooperation with partners.



# 6.

## ETHICAL PRACTICES, ECONOMICS AND CORPORATE GOVERNANCE

GRI.102-15

GRI.103-1

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Groupe PSA has identified two significant issues in terms of "governance, ethical practices and economy":

- **"Ethics in business practices"**

Adhering to regulations and ethical principles is the only way to ensure fair and balanced business relations in addition to preserving the interests of civil society. These ethical principles pertain to public relations practices, anti-corruption or the promotion of sustainable relations with suppliers and the dealer network. Leading groups such as Groupe PSA play a key role in these fields, in order to build trust between civil society and economic players.

In particular, car manufacturers must make sure that their activities, including in countries categorised as "high risk" by specialised NGOs, do not expose them to international regulatory infringements. Faced with ethical or corruption risks, convictions resulting from non-compliance may lead to significant fines, but may also have a lasting impact on the Group's presence in one or more markets. The scope of application of some national laws, particularly those of the United States, the United Kingdom and now France, extends beyond national borders.

All stakeholders – shareholders, government authorities, opinion makers – expect companies to ensure consistency between their commitments and stated policies with respect to environmental, social, economic and other issues, and the positions they defend in the context of their strategy of influence. This consistency is an advantage to consolidate the reputations of companies like Groupe PSA in the area of Corporate Social Responsibility.

See 6.1 and 6.3 for more details.

- **"Balanced governance and distribution of added value"**

Public opinion is increasingly sceptical about the methods used by multinational companies to redistribute the wealth they generate, and their suspicions are exacerbated by debates in society on salary disparities and controversies surrounding the remuneration of executives.

In addition, the various stakeholders (government officials, public opinion) are demanding full transparency in fiscal matters: the European Commission has already ordered banking institutions to report the taxes paid and subsidies received for each country. The planned extension of this report to all sectors is still being debated by the European Authorities.

Core industrial firms like Groupe PSA must therefore begin to focus their effort in order to eventually meet these expectations and demonstrate their contributions to economic development in the countries where they operate.

Groupe PSA governance method has evolved to better incorporate CSR issues.

See 6.2, 6.4 and 6.5 for more details.

Faced with these challenges, the Group has set up the following systems.

## COMMITMENTS SCOREBOARD

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Human rights and business ethics violation</b> 	<b>Ethics in business practices</b> Organiser: General Secretary	<b>By 2035</b> <ul style="list-style-type: none"> <li>Using its ethical reputation, discourage any attempts at direct or indirect corruption (100% of employees have signed up to the anti-corruption code and Code of Ethics), and take part in eliminating corruption in cooperation with partners and suppliers (including via their third-party assessment).</li> <li>Maintain a policy of transparency on the positions that the Group defends and disclose the list of professional associations to which it adheres in the various regions where it has plants.</li> </ul>	<u>Business ethics</u> <ul style="list-style-type: none"> <li>Get managers from PCD's main country locations to adhere to the anti-corruption code:             <ul style="list-style-type: none"> <li>rollout carried out in at least 10 of the main countries,</li> <li>70% of the managers targeted formally confirmed their commitment;</li> </ul> </li> <li>Roll out the Code of Ethics and the anti-corruption code for 100% of OV employees.</li> <li>Roll out the whistleblowing system across all countries where Groupe PSA has employees (PCD+OV).</li> </ul> <u>Relations with public institutions</u> <p>Publish the Charter for responsible relations with public institutions in the Corporate Rules handbook governing the behaviours expected from the Group's employees.</p>	<u>Business ethics</u> <b>Target met</b> <ul style="list-style-type: none"> <li>Campaign was rolled out in 34 countries.</li> <li>93% of the managers targeted confirmed their commitment</li> </ul> <b>Partially met</b> <ul style="list-style-type: none"> <li>Code of Ethics was rolled out in all countries for OV except Germany.</li> <li>OV employees still under OV integrity code which shares the same principles with Groupe PSA anti-corruption code. The latter will be rolled out in 2019.</li> </ul> <b>Partially met</b> <p>Carried out in all European countries apart from Germany (not carried out in Opel Germany). In progress in other regions on a country-by-country basis.</p> <u>Relations with public institutions</u> <b>Target met</b> <p>The Charter for responsible relations with public institutions was published in the Corporate Rules handbook.- Formal adherence to this code in Europe via auditable questionnaire (100% adherence at level of Governmental affairs employees - 80% within department in charge of Regulation, Homologation and Standards.</p>	<u>Business ethics</u> <ul style="list-style-type: none"> <li>Achieve full harmonisation between PCD and OV on Code of Ethics, anticorruption code, whistleblowing system (Speak4Compliance) and roll out for 100% of PCD and OV employees in all countries.</li> <li>Reinforce and structure due diligence processes for partnerships: definition of Group's standards, and use of Dow Jones tool.</li> </ul> <u>Relations with public institutions</u> <p>In order to make it clear to all stakeholders that direct relations with institutional bodies representatives are essentially limited to answering their requests with the highest integrity, update of the charter for responsible relations with public institutions and roll out the updated practice in Europe and worldwide.</p>
<b>Unbalanced economic development of territories</b> 	<b>Balanced governance and distribution of added value</b> Organiser: General Secretary	<b>By 2035</b> <p>Between 2025 and 2035, disclose the distribution of value creation by operating region (between territories, suppliers, employees, governments, shareholders and technological development).</p>	Include OV entities in the country-by-country reporting that will be implemented in 2018 on 2017 financial statements.	<b>Target met</b> <p>Country-by-country report for financial year 2017, including OPEL and VAUXHALL, filed with the French tax authorities in 2018.</p>	Develop the data collection processes to be able to disclose the country-by-country amount of taxes paid by the Group in the extra financial reporting (audited FY2019 data to be available 1 <sup>st</sup> quarter of 2020).

## 6.1. ETHICAL PRACTICES IN BUSINESS RELATIONS

GRI.102-16

GRI.103-2

GRI.103-3

The Group's history has evolved to embrace a corporate culture founded on respect and responsibility. This ethical outlook is formalised through policies, signing of agreements (Global Framework Agreement) or adhering to international standards (Global Compact).

This requirement leads to collective commitments with its stakeholders: customers; employees; shareholders; partners and wider civil society. To fulfil these commitments, the managers and all employees must comply with shared ethical guidelines.

These rules, compiled in the Group Code of Ethics, are organised around the following requirements: respect for the law; respect for people; respect for the environment; respect for customers; respect for the Company.

The Group's ethics and compliance policy is based on: a structured organisation for ethics and compliance; established reference guides; prevention and control systems; results in line with expectations.

### 6.1.0. The Group's innovative adaptation to the changing regulatory environment

**As shown in 2018, the Group's approach is unique in its close association between operating activities and ethics and compliance management.**

Far from being a superstructure that is removed from the field and its reality, ethics and compliance are driving each decision level. In addition, managers in charge of compliance at the various levels themselves have operational duties to carry out often in the field most impacted by the relevant topic. For instance, the Compliance Officer type approval is responsible for the relevant entity and implements the procedures required in his department. With this principle, it is possible to provide various "ethics and compliance" players with a strong legitimacy in the eyes of employees, while ensuring that ethical requirements are adhered to, which are related to the core of the Group's operations.

In parallel, in 2018, the team responsible for facilitating departments on this topic which is now known as METRIC (Management of

Ethics, Risks, Internal Control and Compliance) was strengthened, by including a compliance member of OPEL. In June 2017, the Chairman of the Managing Board himself took part in an entire session, and brought together the various compliance players to ratify this approach and mark his personal commitment to these topics.

#### Adaptation of the anti-corruption system based on the Sapin 2 Law

Based on this principle of association between operational implementers and compliance, the Group renewed its anti-corruption system in line with the eight measures required by the Sapin 2 Law, Article 17. The Anti-Corruption Compliance Officer, nominated in 2016, holds the position of Head of a Purchasing Department, and has had various other roles, including Head of Management Control. In parallel, the Group implemented the eight new measures as required, with the implementers' support as part of a reinforced anti-corruption programme (see 6.1.3.2.).

### 6.1.1. Organisational structure of ethical governance bodies and players

DPEF.37

GRI.205-2

#### 6.1.1.1. A four-tier ethics and compliance policy

##### Management by the Ethics and Compliance Committee

In 2010, the Group created an Ethics and Compliance Committee which reports to the Executive Committee. It is chaired by the General Secretary and comprises the Head of Human Resources, the Head of the Group's Protection, Audit and Risks Department, and, since July 2015, the Chief Legal Officer (new Competition Compliance Officer). The Anti-Corruption Compliance Officer took part in all of the Committee's sessions in 2016, 2017 and 2018.

This Committee is the linchpin of the ethics and compliance policy. As such, it determines the main guidelines, sets the targets and reports to the Executive Committee and, when necessary, to the Supervisory Board, in particular through the Finance and Audit Committee.

The Committee is responsible for:

- determining the general direction of the Group's ethics and compliance policy, based in particular on external intelligence (new risks, emerging stakeholder expectations and new legislation) It also decides on the development of tools and reference systems of the ethics system;
- overseeing operational deployment including setting and monitoring annual objectives and monitoring indicators. It guarantees the proper functioning of relay networks;
- analysing, processing and tracking "ethics cases" reported to it;
- acting as the liaison for employees who have questions about ethics;
- reporting on ethics and compliance issues to the Executive Committee and Supervisory Board.

If a case of non-compliance poses a core risk for the Company, the Ethics and Compliance Committee warns the Managing Board, which decides whether or not it is necessary to inform the Supervisory Board's Finance and Audit Committee.

The Ethics and Compliance Committee met four times in 2018. In mid-2018, at the request of the Ethics and Compliance Chairman, meetings were held with the Compliance Officers present. From 2019, these meetings will be held every 2 months.

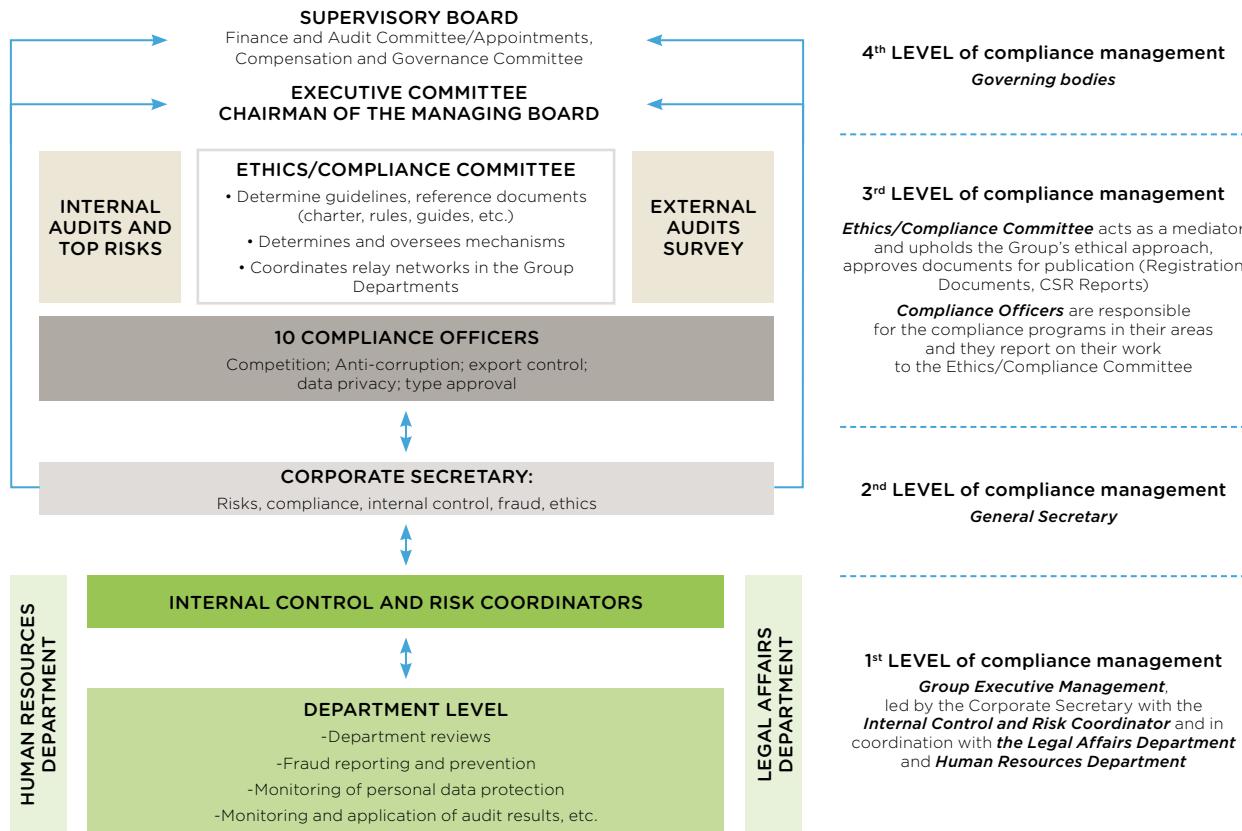
## The four levels of ethics governance and compliance

- The 22 Group departments, led by members of the Executive Committee or by Heads of Department reporting to the Chairman of the Managing Board, are the **first** and most critical **level** in enforcing the ethics and compliance policy. The departments, led by their Internal Control and Risk Coordinator (ICRC), who in turn is supervised by the General Secretary and the Compliance Officers, roll out the core components of the policy under the leadership of the Head of Department. At least once a year, risks and achievements associated with ethics and compliance are assessed, adjusted and clearly identified. This makes it possible to define action plans during METRIC (Management of Ethics, Risks, Internal Control and Compliance) reviews, which is a focal point of the policy. The departments and their Heads are responsible for applying

the Code of Ethics and compliance imperatives in their area, and for implementing suitable systems according to the risk levels identified. They define and monitor the related KPIs.

- The Corporate Secretary acts at the **second level** of compliance management. The Protection, Audit and Risk Management Department checks that the processes have actually been implemented and assists departments with internal control. It confirms and analyses any cases of fraud or corruption. Each audit of a site or a subsidiary includes a section that analyses this risk.
- The Ethics and Compliance Committee, with the assistance of the ten Compliance Officers, gets involved at the **third level** where necessary to settle any issues and to ensure that the procedures are followed properly. It can ask for an internal or external audit to take place.
- The Supervisory Board and the relevant committees get involved at the **fourth level** if they are referred to by the Managing Board and as part of the Finance and Audit Committee, or if it is a specific item to be debated by the Supervisory Board.

## THE ETHICS AND COMPLIANCE SYSTEM



### 6.1.1.2. Distribution of the various players' roles and responsibilities

#### The Compliance Officers

Competition, anti-corruption, data privacy, type approval and export control Compliance Officers were appointed in 2016, 2017 and 2018.

To ensure operational convergence with OPEL and VAUXHALL and encourage the exchange of best practices, Compliance Officers now work in pairs, with PCD on one side and OV on the other, for each of the areas above.

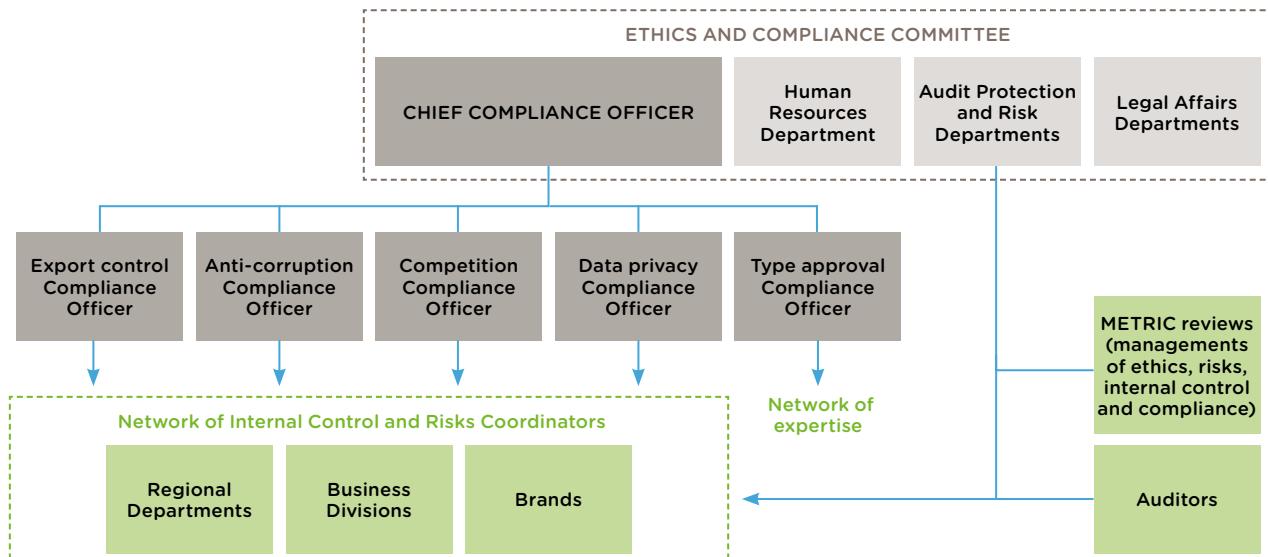
**These five areas embody the core areas of compliance in the automotive industry, and Compliance Officers play a key role in this monitoring system.**

They report to the Group General Secretary, who directs them both individually and collectively, and report their activities to the Group Ethics and Compliance Committee, at every Committee meeting. This includes using the Internal Control and Risk Management (ICRC) Managers to ensure that the compliance programmes that they are establishing in their respective fields are deployed within the departments and to monitor their implementation. If an action infringes the Group's rules, they have the capacity to block it.

More specifically, the Compliance Officer, liaising with external regulators:

- monitors developments, complies and oversees compliance with legislative and regulatory provisions as well as industry standards in his field;
- includes these in the Group's internal corporate rules;
- identifies the areas and people at risk and is the key contact person for all issues in connection with his field and within his delegation. He deals with the cases received;
- formulates suggestions and gives technical advice, backed by the support departments and the ICRCs;
- proposes and helps to design and/or takes part in training initiatives for operational staff;
- helps to draw up, if necessary, a communication plan on these topics for Group staff and employees.

#### ORGANISATION OF ETHICAL GOVERNANCE PLAYERS



The METRIC (Management of Ethics, Risks, Internal Control and Compliance) team of the General Secretary assists Compliance Officers and manages ICRCs. This team now includes OPEL and VAUXHALL.

#### The Internal Control and Risk Coordinators (ICRCs)

**Nominated by their head in all departments, the 22 ICRCs play operational roles.**

Under the direction of their Head of Department, who remains responsible for ethics and compliance in his department, ICRCs are in charge of leading the approach, developing and monitoring the corruption risk mapping and related action plans, and checking compliance of operations. They are supported by the Fraud Detection managers, who meet on a monthly basis and who, in turn, map fraud risks (including external fraud), analyse failures, adapt corrective and prevention measures, and manage anti-fraud action plans.

Acting as relays for the Compliance Officers, ICRCs ensure that internal control rules are taken into account in operational processes, through self-assessments, and regularly submit updates to their department committee, regarding the internal control and compliance programme, particularly as part of the METRIC review. They propose action plans or updates of processes to ensure their compliance.

In 2018, OV organisations aligned with PCD's process, with the appointment of 14 ICRCs performing the same functions and completing the PCD network of 22 ICRCs.

#### Countries'HR and Chief Ethics Officers

The Ethics and Compliance Committee, in addition to working with the Compliance Officers and the ICRCs, also works with a **worldwide global network of HR by countries including the 11 Chief Ethics Officers covering the geographical areas where the Group operates. These officers oversee that ethical policies are locally applied.** HR or legal counsels, they make it possible to adapt the compliance and sanction systems based on the national legal specific characteristics.



## 6.1.2. Reference guides and registration documents GRI.102-17

### 6.1.2.1. The Code of Ethics

The Code of Ethics is the main reference point for employees, as it covers and governs employee behaviour and Group activities. It was updated in 2017. It is part of six main areas of Groupe PSA policy, and complements, in regard to employees, the Company's commitments as part of the signature of the Global Framework Agreement, which was renewed in 2017.

**Comprising 16 rules, the Code of Ethics has been designed to provide employees with updated guidelines that reflect the Company's business, social and environmental responsibilities.** Its compact format ensures it can be understood quickly and is easy to display. It is available in 22 languages and has been disseminated across 30 countries. It applies to all the Group's subsidiaries (excluding joint ventures), including BANQUE PSA FINANCE, except for FAURECIA which has its own Code of Ethics. The Code was expanded in June 2015 and now includes a foreword on the formal ethics commitment made by the Group's executive managers, which has been signed by the Executive Committee.

**“ Now that we are firmly back in the race, our competitive and performance-based culture must be guided by ethical standards as set forth in our Code of Ethics. Our Group's reputation depends on it.**

**The trust that our clients, shareholders and partners place in us is underpinned by everyone's integrity regardless of position, seniority or country. Any breach of these rules could expose the Group to serious business and financial damage as well as tarnish its reputation.**

**It is therefore mandatory that all of us comply with the Code of Ethics. The Executive Committee is the first to embrace this commitment.**

**We are counting on Group employees to ensure that everyone abides by the Code of Ethics on a daily basis, therefore making it a way to propel sustainable performance. ”**

**As a preamble to the Code of Ethics,  
by the members of the Executive Committee**

Along with the "Daily Ethics" handbook on real-life examples of situations which might occur, the Code of Ethics is made directly available to employees on the Group's intranet. It is one of the new employee documents given to all new staff.

In 2015, the two Chinese joint ventures, DPCA and CAPSA, adopted their own codes of ethics to prevent corruption.

PCMA, the Russian joint venture created by Groupe PSA and Mitsubishi, updated its Code of Ethics in 2016, which is now aligned with that of the Group and also includes specific provisions similar to those that can be found in the internal rules of French establishments.

### The deployment of the Code of Ethics

In 2015, 2016 and 2017, a campaign for the Code of Ethics was carried out for all relevant Group employees, based on a specific schedule for each country.

The Chairman of the Managing Board oversees this campaign, reflecting how closely top-ranking executive managers are involved in this process.



*Certain infringements to the laws and regulations set forth in our Code of Ethics could lead to serious ramifications. As a manager of the Group, you have specific responsibilities with respect to these laws and regulations.*

*I am therefore counting on every one of you to join in with all the other Group senior and executive managers in signing for the first time or in renewing your commitment to uphold our Code of Ethics.*

*I expect outstanding results from this campaign, as a sign of our deep involvement and shared commitment to sustainable success. ”*

**Carlos Tavares**

At the end of 2018, 18,122 people had individually signed up to the Code of Ethics, i.e. 91% of targeted employees (population of managers and buyers across the world, sales staff in the dealership networks and employees from the Purchasing Department), including 100% of executive managers and senior managers.

**18,122**

**signatories of the Code of Ethics worldwide,  
or 91% of targeted employees**

Membership campaigns were launched in France, Germany, Italy, Spain, the United Kingdom, Portugal, Czech Republic, Austria, Switzerland, Belgium, Argentina, Brazil, China, Algeria and Japan.

In 2017 and 2018, Groupe PSA Code of Ethics was rolled out in all OV subsidiaries, except for Germany, thus ensuring a common and shared vision of the principles and values of Groupe PSA.

### 6.1.2.2. The anti-corruption code

In 2017, the Group published its anti-corruption code. As per Article 17 of the Sapin 2 Law, this code specifies the Group's zero-tolerance policy in relation to corruption in all forms, and complements the Code of Ethics by describing the corruption or influence peddling behaviours prohibited by law and by the Company in greater detail, including the rules concerning gifts and invitations, conflicts of interest, facilitation payments, relations with agents, intermediaries and consulting companies. It provides examples of warning signals to sharpen discernment and refers to disciplinary sanctions that apply in cases of infringement.

Groupe PSA, as a responsible company, forbids its employees to use corrupt practices, regardless of their form or objective.

This prohibition covers all types of corruption: active corruption; passive corruption; direct or indirect; influence peddling; corruption of public or private agents; facilitation payment; favouritism; extortion; collusion with a supplier.

This Code of Conduct is an integral part of the Company's internal rules. As such, on 26 June 2017, it was part of the consultation procedure with employee representatives (as set in Article L. 1321-4 of the French Labour Code), and was approved. Therefore, it is legally enforceable against employees in France. In other countries, this principle will also apply, taking local requirements into account, including legal ones.

In 2018, the anti-corruption Code of Conduct has been translated into 13 languages and deployed in all countries where the Group operates. It was forwarded to DONGFENG MOTORS, the DPCA joint venture partner.

From March 2018, a global adhesion campaign has taken place. An email signed by Carlos Tavares has been distributed individually to each of the PCD global managers. This campaign, placed under the authority of the Chairman of the Executive Board, is a sign of involvement at the highest level in the issue of anticorruption.



*At Groupe PSA, our behaviour is guided by strict ethical principles, as reflected in our Code of Ethics.*

*To enhance this approach, I decided together with the Comex members to adopt an anti-corruption Code of Conduct. This code reiterated Groupe PSA zero tolerance policy towards corruption. It applies to all Group countries and entities. It is designed to specify and clarify our expectations with respect to business integrity.*

*I and the rest of the Executive Committee personally pledge to ensure that, with the support of the Anti-corruption Compliance Officer, our anti-corruption rules are widely known and applied within the Group.*

*I expect exemplary results from this campaign, as a sign of our commitment and common will to achieve sustainable success, while respecting the highest standards of business ethics.*



**Carlos Tavares**

PCD managers had formally accepted the terms of the anti-corruption Code of Conduct and signed it.

By mid-February, 2019, 16,285 managers had signed it.

OV employees are still bound by their own rules included in their integrity code which are more precise but consistent with Groupe PSA anticorruption code. The Group's anti-corruption code will be rolled out in 2019.

### 6.1.2.3. The Stock Market Code of Ethics

All corporate officers have signed up to the Stock Market Code of Ethics, as updated in December 2016. This Code aims to define the preventive measures authorising members of the Supervisory Board, Managing Board, the Executive Committee and/or non-voting member(s) of the Supervisory Board to intervene in Peugeot S.A. and/or FAURECIA shares, in line with market integrity rules (with a reminder of confidentiality obligations and the obligation to refrain from such activity in the event of access to inside information and the applicable penalties, declaration obligations, definition of blackout periods, inclusion on the list of permanent insiders, etc.). It is available in full on the Group's website. Corporate officers are periodically reminded of these obligations by the Company.

### 6.1.3. Prevention and control systems

GRI.102-17

#### 6.1.3.1. General systems

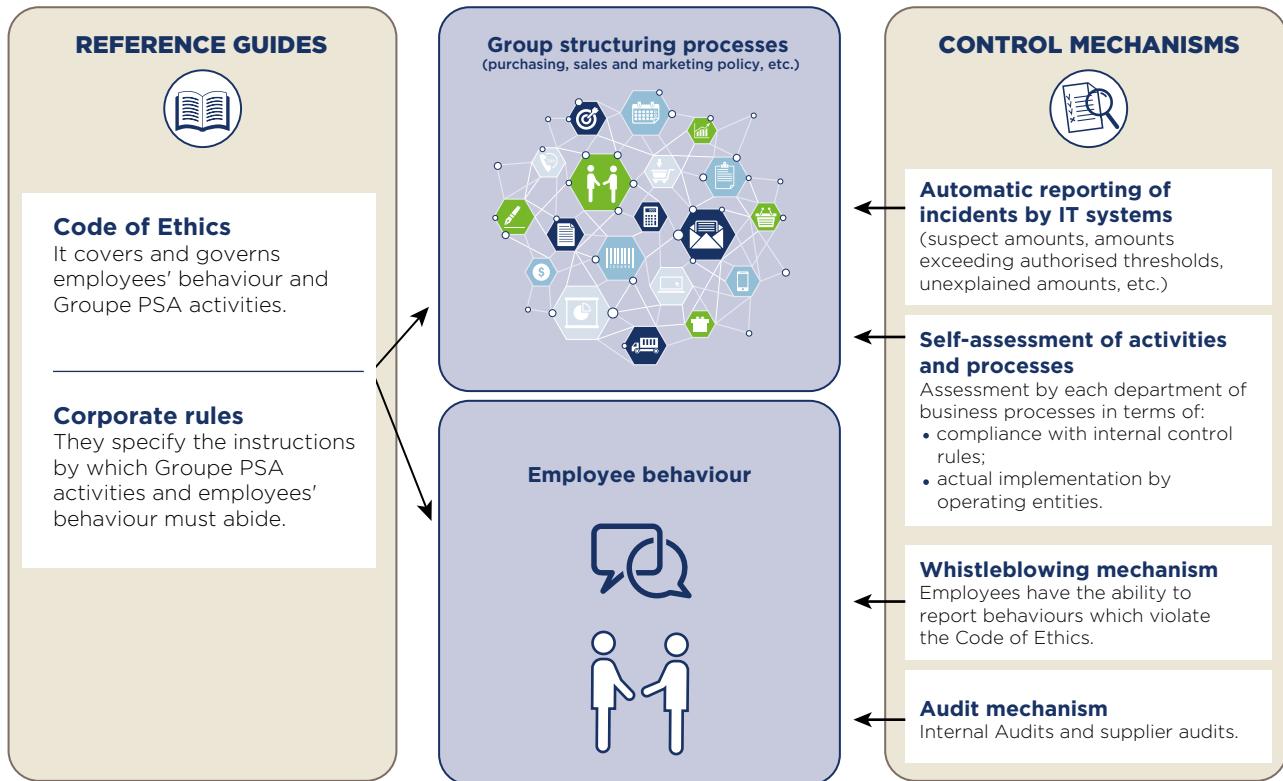
Prevention and control systems for ethical and compliance risks are addressed using the general risk Management System implemented by the Group described in section 1 of this report.

**To guarantee good faith and fair dealing and to prevent fraud and corruption, the Group relies on principles shared throughout the Group:**

- employees' engagement (signature of the Stock Market Code of Ethics and Code of Conduct, communication, awareness and training);

- analysis of risks and a defined process for controlling them, usually in the form of mapping;
- traceability and control of transactions;
- separation of powers and multiple sign-offs depending on the sums involved;
- selection of partners (due diligence).

THE TARGET SYSTEM DESIGNED TO MANAGE ETHICAL AND COMPLIANCE RISKS



**METRIC (Management of Ethics, Risks, Internal Control and Compliance) annual review: distribution of results from self-assessment of activities and processes**

In accordance with the requirements of the Ethics and Compliance Committee, METRIC reviews are conducted in the departments that report directly to the Chairman of the Managing Board, as well as in four additional entities, whose business requires a special process (Replacement Parts and Services, IT Department, PSA Retail and BANQUE PSA FINANCE).

Once a year, all the departments must organise a focus session on ethical risks and compliance. It takes the form of a committee and includes the Head of Department and employees directly reporting to him/her.

This session, facilitated by the ICRC, allows the results of the department's self-assessment of activities and processes to be reported in relation to the internal control and compliance rules.

In 2018, about 30 corporate internal control rules, both educational with their dos and don'ts and accessible to all, set forth and illustrate the key compliance standards that Group activities and employee behaviours must comply with. These internal control rules now cover a large scope combining compliance, (competition, fraud, corruption, data privacy, etc.), internal control basics and Groupe PSA specific requirements, as set by the Executive Committee.

The Group's structuring processes (purchasing, sales and marketing policy, etc.) are assessed to check they are compliant with such rules. The Head of Department supports the result of this assessment and adapts the action plan or the process accordingly.

Additional analyses will supplement these results if the department has identified breaches of the Code of Ethics during the year. Based on these results, action plans are drawn up and are monitored by the ICRC and the General Secretary. The overall aim of this department review is to assess the main areas in ethical business practices, particularly in relation to competition, corruption and data privacy and see whether such issues are reviewed, both in the general risk analysis conducted by the department and in the assessment of its main processes.

In 2018, 20 departments carried out an analysis of their ethical and compliance risks. This included a detailed mapping of corruption risks that took into consideration their business characteristics and their operating area. These mapping exercises are included in Groupe PSA monitoring system for ethical risks. They allow the targeting of functions and countries that need to be increasingly scrutinised and where in-depth personnel training is required.

The consolidation of this work by Groupe PSA provides the Ethics and Compliance Committee with a general picture of the risks related to ethics and compliance and the action plans in each department.

**Whistleblowing: ethical cases reporting system**

Until 2017, Groupe PSA whistleblowing system was based on a specific internal organisation in addition to partial and local whistleblowing systems.

Based on the issue's subject and level of severity, employees report to line managers, human resources managers, ICRCs, Compliance Officers or Chief Ethics Officers (national or regional level). This subsidiarity principle, which was put in place for efficiency purposes, ensures that only alerts based on specific criteria (amount involved, the position of the person potentially involved, etc.) are directly reported to the Ethics Committee.

In addition, a web-based whistleblowing system was introduced in Latin America. This system is managed by an independent organisation (KPMG in 2018) and provides data to the local Group Ethics and Compliance Committee. For example, 98 cases were reported through this channel in 2018. As a result of the investigation, five employees were dismissed and two received warning letters. In this region, a local Ethics Committee handles cases of Group non-compliance in Argentina, Brazil, Chile and Mexico in close liaison with the Group Ethics and Compliance Committee.

Lastly, in accordance with the management process set out in the Global Framework Agreement (see 3.1.1), these strictly internal cases are supplemented by reports on potential breaches identified with suppliers. Such cases trigger an action from the Purchasing Department to resolve the issue with the relevant suppliers (4.2.2.4.).

Groupe PSA, in collaboration with a specialised external partner, implemented a **global worldwide whistleblowing system** in 2018. It makes it possible to offer all of the Group's employees, via a website, a fully secured platform to report incidents. The system's overall architecture is designed to ensure an efficient circuit and processing of these "ethical and compliance" issues, while fully preserving their confidentiality.

Named "Speak4Compliance", the whistleblowing system has been fully implemented in Europe, and the deployment outside Europe is currently in progress: 20 countries are already covered and for the other ten, the system implementation starts at the beginning of 2019.

Although the whistleblowing system Speak4Compliance (S4C) is, as a website, already accessible to anybody online, the first goal for the Group is internal employees. In the future, the Group envisages progressively extending the usage of the system to groups of external parties involved in the Group's sphere of influence (such as importers, suppliers, etc).

It aims to provide the Company with an additional tool for timely alerts through its employees worldwide, regarding crimes or offences, violations of laws or international commitments, corrupt practices or threats of serious prejudices for the public interest. The identity of reporting employees and individuals targeted by them, as well as the information collected by the reporting recipients, are processed confidentially with encrypted connections and contents.

This system is in line with the law of 9 December 2016 pertaining to transparency, anti-corruption and business practice modernisation (called the Sapin 2 Law) as well as with the CNIL decision No. 2017-191 of 22 June 2017 amending decision No. 2005-305 of 8 December 2005 regarding the single authorisation of automated processing of personal data implemented as part of work whistleblowing systems (AU-004).

It was declared to CNIL on 21 November 2017 for both OV and PCD companies.

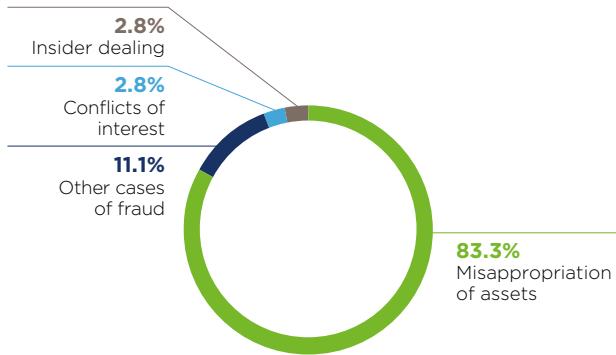
In France, for PCD, preliminary information was submitted to the Central Works Council in June, followed by approval in December 2017. It was then presented in work councils at all sites and displayed on plants' notice boards.

As a unique Groupe PSA system, the same roll - out of its whistleblowing system was applied by OV and is covering almost all employees – after receiving the approval of employee representatives, except German ones.

Ethical issues therefore have been processed as follows in 2018:

- employees confronted by practices or situations that run contrary to the rules of the Code of Ethics or the anti-corruption code have different options to report them. All of the options ensure that their request for action remains confidential. Anonymous requests are processed even if this is not encouraged;
- the natural channels for reporting inside the Company are the official channels for ethics-related questions or situations. Employees can also refer the matter to their Human Resources Manager, their Chief Ethics Officer, their Fraud Detection manager, their ICRC, the relevant Compliance Officer, or directly to the Ethics Committee;
- any manager who is informed by an employee of a violation of the Code must report this through one of the above channels;
- offenders of any proven violations of the ethical guidelines may be sanctioned or even dismissed under this process.

#### BREAKDOWN OF CASES REPORTED TO THE ETHICS COMMITTEE IN 2018, FROM JANUARY TO OCTOBER



#### Audit mechanisms

##### — SUPPLIER AUDITS

For the non-Group scope, audits are conducted on suppliers. The Purchasing Department performs the supplier CSR audits. Since 2008, the Group has conducted 92 social and environmental audits with tier-1, 2 or 3 suppliers. They systematically involve an audit of anti-corruption practices and policy. In 2015, the Group started using an external platform to evaluate suppliers (EcoVadis), which incorporates the indicators of fair practice and compliance (see 4.2.).

##### — INTERNAL AUDITS

The share of Internal Audits pertaining to ethics and compliance is constantly increasing, including for respect of competition rules, the fight against corruption, data privacy and export control rules.

**Training** GRI.205-2 DPEF.10 DPEF.11

### TRAINING ON HUMAN RIGHTS AND ETHICS POLICIES AND PROCEDURES (Group scope, situation in 2018)

Areas	2018 (PCD + OV)			2017 (PCD)		
	Number of hours	Number of employees	% of employees trained	Number of hours	Number of employees	% of employees trained
Equal opportunity, diversity, anti-discrimination training	8,119	2,012	1.7%	4,921	1,656	1.91%
Compliance with internal rules, Global Agreement, data privacy guidelines, etc.	44,527	26,986	22.84%	10,811	5,337	6.16%
Corruption, conflicts of interest, etc.	16,979	17,744	15.02%	1,775	1,987	2.29%
Competition	708	628	0.53%	136	272	0.31%
<b>TOTAL</b>	<b>70,333</b>			<b>16,560</b>	-	

In 2018, general training on ethics represented a total of 70,333 hours for more than 27 000 employees (more than 4 times the number of hours in 2017). A certain amount of this more general training covered subjects like corruption. For example, under the terms of the Global Framework Agreement on Social Responsibility, the Group is committed to fighting against all forms of corruption and avoiding conflicts of interest. Every Group employee has been informed of this commitment and made aware of its importance.

All Group employees must behave in line with current laws and regulations, whether national or European, when performing their work. Experts from the Legal Department and the Corporate Secretary's Office spearheaded training on issues such as competition and corruption for employees in at-risk positions.

In 2018, 628 senior executives attended sessions on competition law, majority of them attending in class sessions.

From July 2017 to February 2019, around 20 000 employees attended a course on anticorruption. Among them 2 348 employees (PCD+OV) attended in-class training on anti-corruption measures and 18 908 took a web-based course.

**70,000**  
hours dedicated to ethics training in 2018

### 6.1.3.2. Issue-based systems

GRI.205-1 GRI.205-2

#### Anti-corruption

##### — EMPLOYEES

The Chairman of the Management Board, Carlos Tavares, is particularly involved in this issue: he participated personally and in full in the field meeting of the ICRCs and Compliance Officers held in June 2017, which mainly dealt with anticorruption issues.

An Anti-corruption Compliance Officer was nominated in May 2016 at Carlos Tavares and Excom's request. He is responsible for implementing and monitoring this programme, and for processing any potential cases that might occur. He is the key contact person for Group employees seeking information on compliance with anticorruption rules. He therefore receives any work-related issues reported via the dedicated whistleblowing system.

The following are the responsibility of the Executive Committee, and are monitored by the Anti-Corruption compliance Officer.

- 1) The anti-corruption code, published in 2017 and translated into 13 languages, applies to all of the Group's subsidiaries (see 6.1.2.2.) The Executive Committee itself led its promotion via a post in its blog in October 2017. In combination with the anti-corruption guide and a reference guide which specifically addresses the precautions that should be considered when dealing with agents and intermediaries, this code and its additions can be accessed in two clicks via the Group's intranet Live'In and are redistributed to support the in-class training modules put in place in this regard. In 2018, around 17,500 managers all around the world received an e-mail from their CEO, Carlos Tavares, which explained the reason why this code was designed. It highlighted the importance of this code, recalled the zero-tolerance policy of the Group and asked them to reiterate their adhesion to this code. As of the beginning of 2019, more than 16,200 managers i.e. 93% of PCD managers, had adhered to the approach.

- 2) The aim of the global whistleblowing system, which is currently being implemented (see 6.1.3.1), includes the confidential escalation of corruption reports. Corruption is one of the main categories defined in the system. The Anti-corruption Compliance Officer, together with the Regional Compliance Officer (if a region employee is concerned), are the examiners for all reports related to corruption. The Anti-corruption Compliance Officer was trained for that purpose and signed an NDA.
  - 3) Detailed corruption risk mappings are developed in each department, under the responsibility of the relevant Executive Committee member or Head of Department. In compliance with the law, they are documents, which are regularly updated in order to identify, analyse and prioritise the Company's risks of exposure to corruption purposes. They include the characteristics of the automotive industry and of the countries where the Company operates. The Anti-corruption Compliance Officer validated the regions' risk mapping. Action plans are developed to minimise these risks. In this regard, particular attention is paid during training sessions to functions identified as being at risk. The Group's corporate risk mapping is established by synthesising the risks of the identified divisions and risk scenarios. It was presented by the Anti-corruption Compliance and validated by the Excom on 27 February 2018.
  - 4) Considering the results of the risk analysis, third-party assessment procedures are strengthened, in compliance with action 4 of the Sapin 2 law, Article 17. A specific standard dealing with "how to work with intermediaries" is appended to the anti-corruption code. Potential partners, such as new importers, are subject to an in-depth analysis (background check) applied by standard. A screening tool allowing Groupe PSA to check the compliance of its partners: suppliers, importers, consultants, JV partners, etc. was acquired in 2018. This allows the Group to review all of its partner bases with respect to their reputation and compliance with the laws. The systematic use of this tool is currently of being integrated into standards regarding relations with importers. As this tool concerns only the first level of verification, in-depth due diligence processes are carried out by each department when necessary. Standardisation of these due diligence processes is under review.
  - 5) Internal and accounting control procedures, which are aimed at checking that accounts do not hide any corruption practices, are implemented, along with the existing system. As part of this internal control, the Group's structuring processes are analysed to, amongst other things, check that they include the anti-corruption principles: segregation of duties; double or triple validation; adequate processing of conflicts of interest; checking partners' integrity; adhering to the delegation process, etc. Additional controls are carried out based on relevant indicators from the risk mapping.
  - 6) In 2017, in-depth training sessions were conducted by the Compliance Officer taking part in the various regional department committees and through the in-class training sessions that he directly led himself in the countries where the Group rolls out its operations.
- In 2018, a broad training programme on anticorruption was carried out with mandatory training based on exposure to risks. People to be trained were methodically identified, with systemic and personalised approach linked to the results of the risk mapping and including input from divisions, the compliance team, and the Anti-corruption Compliance Officer. Considering their exposure to risks, employees had to follow

either an "advanced" training programme (face-to-face in-depth training) or a "basic" one (e-learning).

These training sessions were carried out with people in positions exposed to risk: purchasing and purchasing advisers/buyers; sales (particularly in at-risk regions; B2B; public procurement; key accounts; importer relations; retail; services and parts); joint ventures; finance (investor and bank relations); customs; marketing; communications (press; sponsoring; advertising; media buying; event organisation); sports; institutional relations and real-estate departments, etc.

E-learning training is a complete module comprising four elements:

- an educational video, which is accessible to everyone and shows the main components and dangers of corruption and bribery. It is a short awareness raising tool that can be seen at any time or shown for introductory purposes during in-class training sessions;
- a message from the Compliance Officer, through an interview format;
- reinforced e-learning that shows the main possible situations of corruption and how members of the Group should act in such cases;
- quiz to check the knowledge acquired.

This module takes 30 to 40 minutes to complete; a minimum result of 80% is required:

- 18,908 employees participated in the basic course;
- 2,348 people completed the advanced session.

- 7) In case of any infringement of the Company's Code of Conduct by company employees, the disciplinary system is in place to sanction these employees: the Company can apply sanctions to any employee who commits an act of corruption, up to and including dismissal.. The progression of possible intermediary sanctions (suspension, warning, etc.) is yet to be established in each country, based on the local legislation.

- 8) An Internal Audit took place in 2018, so as to assess the completeness of the anticorruption programme and its efficiency.

In addition, in Latin America and the United Kingdom, managers and employees regularly complete a conflict of interest and gift statement form, which is returned to the heads of department. An extension of this process to all managers and employees worldwide is under review.

#### — SUPPLIERS

The Group insists that suppliers also comply with its procedures to prevent corruption and avoid conflicts of interest. These aspects are specified in the responsible purchasing policy.

A supplier assessment procedure, particularly in regard to "fair business practices", is managed by EcoVadis. Moreover, CSR supplier audits systematically include an audit of anti-corruption practices and policies.

#### Compliance with competition rules

- 1) The message from the Chairman of the Managing Board on this topic is always available on the intranet portal, in the form of a statement that clearly confirms his desire to combat anti-competitive practices.

- 2) The Competition Compliance Officer, in charge of the competition compliance programme, is a member of the Ethics and Compliance Committee. He is responsible for implementing and monitoring this programme and processing any potential cases that might occur. He is the key contact person for Group employees seeking information on compliance with competition rules. He will therefore receive any work-related issues reported via the dedicated whistleblowing system. In 2017, a communication was elaborated in the form of an interview with the Compliance Officer and was published on the Group's intranet portal where it still can be found. This is an educational reminder to all employees about the basics of competition rules and the sustainability of the obligations to be followed.
- 3) In 2018, the previous whistleblowing system specifically designed for competition issues was replaced by the global and worldwide system Speak4Compliance through an Internet site. One of the eight categories that the whistleblower can include in the report is anticompetitive practices. The Competition Compliance Officer is the direct examiner of reports concerning competition. He signed the relevant NDA and was trained to deal with the system and actual reports.
- 4) Competition liaison contacts appointed in the relevant departments (sales, purchasing, partnerships and joint ventures, research and development, services and parts) are regularly met by the Legal Affairs Department. They contribute to ensuring the proper implementation of the compliance policy in their department and have a duly signed mission statement describing the terms of their duties.
- 5) A supervisory mechanism prior to industry association meetings involving competitors was implemented. It requires the authorisation of the Legal Affairs Department prior to Group's enrolment in an association. Lists of the associations and authorised employees must be drawn up and kept up to date, and meetings must be kept up-to-date as well.
- 6) A compulsory in-class training session for executive and senior managers was implemented. At the end of the session, the participant takes a test and must obtain a score above the minimum threshold to validate their training programme. Moreover, these managers must formalise their commitment to compliance with competition rules by signing an agreement. The relevant training modules are available on the Group's intranet at all times.
- 7) An e-learning module has been designed. It is also supplemented by a quiz requiring a minimal score to validate the training course. This module is not only available to senior managers but to all employees that are potentially concerned.
- 8) A special process was put in place to inform all new employees regarding existing operating procedures, and more specifically on the competition procedure.
- 9) A specific provision has been added to the employment contracts of executive and senior managers in connection with competition breach.

The system in place, aimed at preventing anti-competition practices, was deemed compliant by the Internal Audit conducted in 2018.

### **The anti-fraud system**

A strengthened anti-fraud system has been in place in the Group's Automotive Division since 2012 (BANQUE PSA FINANCE has its own system). It is placed under the responsibility of Groupe PSA Ethics and Compliance Committee, which has tasked the Audit Protection and Risk Department (one of the entities of the Group General Secretary) with managing it, carrying out investigations, monitoring and reporting incidents. Audited in 2015, the anti-fraud system is based on preventing, identifying, investigating and handling incidents as well as making ongoing improvements. In 2015, the Local Security managers, Fraud Detection managers and Chief Ethics Officers began to play a greater role in this system:

- prevention and deterrence are provided by the departments that have committed to abide by the minimum measures of the internal control system: updating delegations of authority; principles of segregation of duties; dual sign-off principle; best practices in managing IT access, etc.;
- for fraud detection, the Protection, Audit and Risk Department works hand in hand with a network of Fraud Detection managers, one in each Group department, and some 50 Local Security Managers appointed by the establishments;
- investigations are overseen by the Protection, Audit and Risk Department, in close collaboration with the Legal Affairs Department, the Audit and the Human Resources Department. The department's Operating Officer hands down any decisions/sanctions. Operating officers can also seek advice from consultants or external lawyers, specialists in national legislation on certain issues, to develop their analysis and find the appropriate solutions;
- in an ongoing effort to improve the system, fraud attempts and cases of fraud are analysed in terms of new fraud techniques, the ability to detect fraud more quickly and its impact, in order to reduce loopholes in the system.

Restructured and further expanded in 2017, this network includes a monthly presentation and helps, together with the ICRCs, to map fraud risks and fine-tune corrective and preventative measures. It analyses attempted fraud and cases of fraud as well as any potential weaknesses in terms of procedure or human intervention. It also spearheads fraud prevention initiatives. These managers are in turn supported up by the 50 or so Local Security managers appointed in each Group establishment.

In all, approximately 100 individuals (excluding auditors) – who are distributed by Group activities, companies and geographical areas – provide optimum coverage for the Group. They are specifically tasked with alerting and reporting any instances of fraud and monitoring action plans in place.

**Approximately 100**  
**employees are specifically mandated to combat fraud**

The anti-fraud measures set up in 2018 include the following:

- a monthly information meeting of the Fraud and Detection Managers network (sharing of new fraud practices; discussions on cases and attempts that occurred in the previous month; feedback and improvement of cross-functional processes, where necessary);
- monthly newsletter from the Directorate General for Industrial Strategies (fraud case analysis and guidance);
- in each department committee, during the METRIC review, presentation of the department's results in anti-fraud for year N and action plans to be validated for N+1;
- launch of a fraud awareness campaign (*Together, let's act against fraud!*) intended for all PSA employees (PCD and OV). This campaign took place over two months with a sequenced release of eight videos dealing with counterfeiting; arrangement with suppliers; collusion with dealers; misappropriation of assets; identity theft; and cybercrime. More than 8,000 PSA employees attended the campaign;
- the implementation of the SOC (Security Operations Security), an internal automated IT detection tool, enabled more fraud attempts to be detected. Its powerful upswing with new use-cases will ensure that we are more effective in the fight against the risks of fraud;

- confidentiality and control of information: training for all senior and executive managers plus an e-learning module. In 2018, more than 20,000 individuals took the information control test.

Each of these programmes accounts for approximately two hours and fifteen minutes of training.



Groupe PSA website, "Responsibility and Ethics" webpage, "The ethical charter" document: <https://www.groupe-psa.com/en/automotive-group/responsibility/>

Groupe PSA website, "Responsibility and Ethics" webpage, "Anti-Corruption Code of Conduct" document: <https://www.groupe-psa.com/en/automotive-group/responsibility/>

Groupe PSA website, "Responsibility and Ethics" webpage, "Anti-Corruption Handbook" document: <https://www.groupe-psa.com/en/automotive-group/responsibility/>

### 6.1.4. 2018 results: non-compliance records and complaints upheld

GRI.205-3

GRI.206-1

GRI.419-1

#### Cases of corruption

There were no major cases of corruption reported in 2018.

#### Cases of conflict of interest

There were no major cases of conflict of interest reported in 2018.

#### Cases of non-compliance with competition laws

No new major cases of non-compliance with competition laws were reported in 2018.

In July 2015, the Spanish Anti-Competition Commission fined 21 car manufacturers for exchanging sensitive data on business and strategy.

The Spanish subsidiaries of the Group, PEUGEOT España and CITROËN España, were fined €15.7 million and €14.7 million respectively. The Group filed appeals with the Spanish courts in October 2016. The proceedings are ongoing.

In 2011, PEUGEOT Turkey Popas was fined €6 million. PEUGEOT Turkey Popas has appealed the decision. The proceedings are ongoing.

In December 2015, the French Anti-Competition Authority fined parcel and logistics companies for violating competition laws for a total of €672.3 million, with GEFCO being fined €30.6 million.

The Group is involved in this proceeding as GEFCO was a wholly-owned subsidiary at the time of the alleged violations. GEFCO and Groupe PSA have appealed this decision. The proceedings are ongoing.

On 9 January 2019, the Italian Competition Authority issued a decision concerning its investigation of alleged exchange of sensitive information, partly through trade associations, between captive financial companies. BANQUE PSA FINANCE, who operated in Italy through a branch prior to the creation of its current joint venture with SANTANDER, has been fined €38.5 million and BANCA PSA ITALIA SpA €6.1 million. OPEL and VAUXHALL FINANCE has been fined €10.0 million jointly with GM Company. BPF, JVIT and OPEL and VAUXHALL FINANCE, are currently evaluating the possibilities to appeal this decision. Note that provision of statistics by BANQUE PSA FINANCE to this professional association stopped in January 2017.

#### Cases of fraud

Attempted fraud and financial fraud are becoming increasingly international. Cases of fraud are mainly associated with the misappropriation of tangible assets (theft of cars, computers, parts, tools, raw materials, etc.), but also involve cyber attacks, counterfeit and identity theft.



### 6.1.5. Focus: banking business

Due to its status as a banking establishment, BANQUE PSA FINANCE is subject to banking regulations, which govern the resources and actions of the internal control function.

For several years, BANQUE PSA FINANCE has implemented, pursuant to the Order of 3 November 2014 on the internal control of banking institutions (formerly under CRBF regulation No. 97-02), the following procedures and systems to prevent risks which all financial institutions may encounter, especially in terms of its control and ethics policy:

- BANQUE PSA FINANCE has established an Internal Control Charter setting out the fundamental principles on which the organisation and operation of its internal control system are based. The bank's Internal Control Charter defines the organisation, resources, scope and tasks. It also sets out the way in which the bank's control system functions. With the partnership established with Santander Consumer Finance, BANQUE PSA FINANCE has kept an internal control mechanism based on the three levels described in the Order of 3 November 2014. The Internal Control Charter was broadly disseminated and may be consulted at any time by all employees on the bank's database; it notably elaborates on the principles of the segregation of duties and prevention of conflicts of interest which apply to everyone. A similar framework is currently being rolled out for OPEL and VAUXHALL FINANCE in relation to BNP Paribas;

In addition, first-tier controls have been set up in the operating entities. The role of the bodies overseeing permanent control is to ensure that risks are prevented and dealt with at the onset. They do so by identifying, assessing and managing any risks efficiently;

- an Anti-Money-Laundering and Combating the Financing of Terrorism (AML/CFT) system is in place. This system is based on the BANQUE PSA FINANCE framework agreement, which includes local procedures and checks for risks identified in each operating process. Risks of money laundering and financing terrorism are assessed quarterly when the non-compliance risk assessment is drawn up and certified by each Managing Director of a BANQUE PSA FINANCE entity;

A new IT system was rolled out for the joint ventures with Santander Consumer Finance throughout 2018. The OPEL and VAUXHALL IT system functionalities are also regularly upgraded. These systems signal out individuals or companies whose assets have been frozen so as to avoid having any business dealings with them, monitor customers throughout the business dealing and monitor potentially suspicious transactions. The status of politically exposed persons is also checked to establish the necessary level of vigilance, in particular with respect to the identification and source of funds. Employees are frequently trained on the rules and legislation on Anti-Money Laundering and Combating the Financing of Terrorism (AML/CFT) and the procedures that they must put in place;

- BANQUE PSA FINANCE complies with the Group Code of Ethics and performs an ethics review each year; the two main cooperations with SANTANDER and BNP Paribas have dedicated versions of the Code of Ethics;
- a system to protect personal data is operational and was upgraded in compliance with the GDPR regulation. This system is based on the BANQUE PSA FINANCE framework agreement, which includes local procedures, appropriate checks and ongoing training for staff. Protecting personal data is discussed quarterly when the non-compliance risk assessment is drawn up and certified by each managing director of a BANQUE PSA FINANCE entity, as well as a dedicated programme for OPEL and VAUXHALL FINANCE entities;
- finally, in addition to the various systems described above, BANQUE PSA FINANCE has set up a whistleblowing system for all Group employees to report any non-compliance related to the institutions' activities to the Corporate Compliance Officer (members of the Board of Directors for joint ventures with Santander). This tool, placed in a context of strict adherence to the rules set by an ad hoc internal procedure and confidentiality imperatives, is part of the internal anti-fraud and conflict of interest procedure.

## 6.2. DISTRIBUTION OF ADDED VALUE

GRI.103-2

GRI.103-3

### 6.2.0. An innovative shareholding system aimed at engaging employees with the Group's strategy

In accordance with the commitments in the "New Momentum for Growth" performance agreement signed in July 2016, and following the success of the first Group-wide capital increase reserved for employees implemented in 2015, Groupe PSA started its second employee share offering, "ACCELERATE 2017". **This new offering, which takes place at a key stage of the Group's development, offered employees the opportunity to become shareholders in Groupe PSA, indirectly, via corporate mutual funds with preferential conditions.**

"ACCELERATE 2017" provided for a total subscription amount of €25 million (employer matching contribution - *abondement* - included) and consisted of a sale of existing treasury shares repurchased by Groupe PSA within the framework of a buyback programme. 87,000 Group employees were eligible for the offer, which was implemented in 15 countries. 11,200 employees took part, showing their will to support the Group in its development and their trust in the future. **Demand was greater than the maximum threshold filed with the French Financial Markets Authority (*Autorité des Marchés Financiers*).** Therefore, the budget allocated for the offer was entirely subscribed.

## 6.2.1. Distribution of the value created by Groupe PSA

GRI.201-1

GRI.201-4

### DISTRIBUTION OF ADDED VALUE

(Automotive and Banking Divisions)

	2015	2016	2017 (including O/V)		2018 (including O/V)	
Revenue (in millions of euros)	37,761	37,211	47,263		58,609	
Distributions (in millions of euros)	(as a % of revenue)	(in millions of euros)	(as a % of revenue)	(in millions of euros)	(as a % of revenue)	(in millions of euros)
CAPEX + R&D <sup>(1)</sup>	2,945	7.8%	3,487	9.4%	4,169	8.8%
Public sector <sup>(2)</sup>	626	1.7%	743	2.0%	810	1.7%
Employees <sup>(3)</sup>	388	1.0%	427	1.1%	484	1.0%
Shareholders <sup>(4)</sup>	0	0.0%	0	0.0%	431	0.9%
					4,804	8.2%
					999	1.7%
					558	1.0%
					474	0.8%

<sup>(1)</sup> Gross R and D Expenses, research tax credit and subsidies excluded.<sup>(2)</sup> Corporate Tax, import duties.<sup>(3)</sup> Bonuses and profit sharing included.<sup>(4)</sup> Dividends paid to PSA Shareholders.

The Group also creates value in its host communities by using local suppliers. See section 4 of this CSR report for more information.

Payment of payroll taxes is also a component of this value creation and is discussed further in section 3 of this CSR report.

### Subsidies received

(Automotive Division)

Under subsidies received in Europe reported in the financial statements, there were €171.2 million in 2018, versus €194.8 million in 2017, €177.5 million in 2016 and €167.1 million in 2015. The impact of these subsidies is broken down between profits/(loss) and investment deductions.

## 6.2.2. Tax transparency

### Fiscal policy

DPEF.45

Compliant with the Code of Ethics, based on long-term objectives and in line with its global strategy and targets, **the Group's tax policy complies with rules of transparency and responsibility**. It is based on the following principles:

- 1) Fiscal policy always complies with applicable laws and regulations. It is guided by relevant international standards (for example OECD guidelines). Groupe PSA aims to comply with the spirit as well as the letter of the law. Tax filings and payments as well as book-keeping and tax reporting are carried out in compliance with all local regulations in the countries where the Group operates;
- 2) The Group addresses all tax matters with integrity and transparency. It strives to maintain constructive partnerships with the tax authorities as this can result in a more timely resolution of any disputes. Tax legislation and procedures are, however, complex areas; when it is not possible to resolve a disagreement with the tax authorities quickly and professionally, the Group uses all the available remedies to assert its rights and its interpretation of the law;
- 3) In all the countries where the Group operates, it manages its tax matters in a proactive manner:
  - it does not use contrived or abnormal structures that are intended for tax avoidance, have no business justification (tax haven) and do not follow local or international law,
  - it strives to meet a two-fold objective: increasing the value created for its shareholders and fully complying with all relevant legal and regulatory requirements in line with stakeholder expectations;
- 4) The Group's fiscal policy also attests to its responsibility. It pays the taxes and duties legally due in the countries where direct economic value is created within the normal course of its industrial or commercial activity. Consequently, all transfers of goods and services among Group companies

are conducted under arm's length conditions. The prices of these operations are based on market conditions and reflect the commercial nature of transactions.

### Organisational structure

The conduct of the Group's tax affairs and the management of tax risks are handled by an international team that guarantees compliance with these principles.

As described in the Registration Document, the financial strategy is defined by the Managing Board, is implemented under the direction of the Group's Chief Financial Officer and is submitted to the Supervisory Board's Finance and Audit Committee for verification.

In daily business, the conduct of the Group's tax affairs and the management of tax risks are handled by an international team that guarantees compliance with the principles of fiscal policy set out above. This team reports to the Group's Chief Financial Officer who must approve any decision which has a material effect on the Group.

As the Group's fiscal policy is to pay the taxes and duties legally due in the countries within the course of its industrial or commercial activities, the Group's strategy is not driven by fiscal considerations.

### Moving towards country-by-country reporting

In 2017, Groupe PSA implemented information systems in support of the country-by-country-reporting setup for tax administrations. The one covering financial year 2017 and integrating the OPEL and VAUXHALL subgroup was submitted to the French authorities in the forms and timeframe as required.

### 6.2.3. Compensation of executive managers

GRI.102-35

GRI.102-37

GRI.201-3

The principles and rules decided on by the Supervisory Board (regarding the proposal of the Appointments, Remuneration and Governance Committee, including grant performance shares - 2019 LTI Plan) to determine the compensation and benefits granted to corporate officers are presented and detailed in section 3.2.1. of the Registration Document.

It takes into account principles of completeness, balance, consistency, readability and measurement.

All compensation components for each member of the Managing Board are reviewed every year to assess the overall compensation or each member (fixed compensation, variable compensation, allocation of performance shares, supplementary pension plan, company car) and are voted on by shareholders.

Since 2016, the compensation structure encourages the attainment of short- and long-term targets with a view to streamlining and aligning the interests of Managing Board members with those of the employees, the Company and its shareholders. It comprises an annual variable share based on performance targets, notably the Group's collective objectives, and a long-term compensation plan (performance shares).

For 2019, three CSR criteria related to vehicle CO<sub>2</sub> emission level, vehicle quality and service quality were integrated into the variable compensation plan for executive managers and Group employee beneficiaries. CO<sub>2</sub> emission level of the vehicles in stock also serves as one element of the triple-trigger that conditions the payment of all individual and collective compensations. In addition, CSR criteria related to workplace safety and the proportion of women in the Group's top management were adopted to quantify the variable compensation of executive managers. The achievement rate of these targets will be reviewed by the Supervisory Board in February 2020, on the basis of the Group's 2019 economic performance.

No member of the Managing Board has a salaried position within the Group.

Supervisory Board members and non-voting members of the Supervisory Board are paid annual attendance fees up to an aggregate amount determined in advance by the Shareholders' Meeting. Pursuant to the decision of Peugeot S.A. Shareholders' General Meeting of 27 April 2016, this amount has been set at €1,100,000 until further notice (see sections 3.2.2. and 3.2.5. of the Registration Document for more details on distribution).

## 6.3. TRANSPARENCY AND INTEGRITY OF INFLUENCE PRACTICES

DPEF.37

GRI.103-2

GRI.103-3

Groupe PSA maintains relations with public institutions by responding to their requests for information, in order to support economic, social, scientific and cultural developments within the framework of a democratic, healthy and effective debate.

### 6.3.0. Innovative practices for participation in public debate

Groupe PSA regularly accepts the invitations it receives to participate in public debates such as:

- in March 2018, Carlos Tavares, Chairman of Groupe PSA Managing Board, was invited by the "commission des Affaires économiques de l'Assemblée nationale" and discussed its vision for the future of the automotive industry and the challenges of electrification, the transition to a low carbon economy and connected vehicles;
- in September 2018, Benjamin Sokolowski, Head of Public Affairs and Government Relations, participated in a public debate by the State Government of Hesse on the consequences of Brexit;
- in October 2018:
  - Grégoire Olivier met with the President of COP 24, Mr Michał Kurtyka,

- Gilles Le Borgne outlined Groupe PSA position regarding electromobility in the "*Office parlementaire d'évaluation des choix scientifiques et technologiques*".

Carlos Tavares took over the Presidency of ACEA in 2018. As ACEA President, Mr Tavares had meetings with Commissioners Mr Canete, Mr Moedas, Mrs Malmstöm and Mr Katainen. Furthermore, Mr Tavares hosted the ACEA annual reception in January and took the opportunity to outline the industry challenges on CO<sub>2</sub>, safety and Brexit. Finally, Mr Tavares held a press conference to highlight the automotive industry concerns regarding the transition to electrification, low emissions and affordability.

Other examples of meetings organised by the Group are disclosed within the boxes "Stakeholder dialogue", which are located in different sections in this report.

### 6.3.1. Group organisation

The Public Affairs Department ensures the harmonisation of the Group's positions across the countries in which it operates.

Headed by a Head of Public Affairs and Government Relations, this department is placed under the authority of the General Secretary who reports directly to the Chairman of the Managing Board.

In Europe, it is responsible for relations with European Union institutions; national public authorities (government, parliament, public agencies and administrations, local administrations); public authorities and diplomatic delegates in host countries; and, by extension, business and professional communities and non-governmental organisations.

In the Group's other regions, the Public Affairs Department oversees the work of institutional relations officers who report directly to the Executive Vice-President of their region.

The Public Affairs Department is tasked with the following missions:

- preparing and coordinating the Group's positions on all kinds of proposed public measures in collaboration with the business lines;
- representing the Group's interests and, at the same time, promoting its positions to any authorities likely to make decisions impacting it;
- informing government authorities and opinion leaders about the Group's various business, industrial and employee relations issues, in particular by sharing the expertise necessary to make them aware of and understand the Group's positions;
- representing the Group with regard to the European Union (Commission, Parliament, Council, etc.); public institutions in countries where the Group has operations or interests; local trade associations as well as research associations, foundations and organisations in which the Group participates;
- staying current with legislation and keeping the Group informed so that the Group may exercise its duty of care.

### 6.3.1.1. Registration Documents

The Group's organisation of the process for relations with public institutions is in line with the Group's first Operating Procedures Rule, which was approved by the Executive Committee.

At an operational level, the managers in the Public Affairs Department have embraced the Group Code of Ethics and expressly pledged to uphold its principles. All new hires in the department are given a copy of the code, with special attention paid to the rules that concern them.

**To accompany this Code of Ethics, Groupe PSA developed a specific charter focusing on its public affairs practices, in 2016.**

This charter, which is public and available on the Group's website, defines the principles that all Group employees carrying out relations with public institutions formally commit to following. **It is built around the four following fundamental commitments: 1. Transparency, 2. Ethical values and anti-corruption, 3. Political neutrality, 4. Dialogue.**



Groupe PSA website, "Responsibility and Ethics" webpage, "Groupe PSA Charter for responsible relations with public institutions: <https://www.groupe-psa.com/en/automotive-group/responsibility/>

Furthermore, Groupe PSA developed a specific internal Corporate Rule that outlines in more details what responsible relations with public institutions mean for Groupe PSA with specific examples of what is allowed and what is prohibited.

A formal adherence via a questionnaire was set up in 2018. This adherence process covers the Code of Ethics, the Charter for responsible relations with public institutions and the Responsible Corporate Rule. The process was initially rolled out in Europe within the Government Relations and Public Affairs Department and the Regulations, Homologations and Standards Department.

All employees in the Governmental Relations and Public Affairs Department signed up to the Groupe PSA responsible relations with public institutions practices. In the Regulations, Homologations and Standards Department, 80% of the employees approved the guidelines. The objective is to roll out the process in the other regions in 2019.

### 6.3.1.2. Monitoring practices

The public affairs strategy, positions and measures are overseen by the General Secretary of Groupe PSA, who has also been responsible for the Group's Compliance Officers since 2016.

The positions which the Group publicly supports fall in line with its strategy. The Head of Public Affairs supervises the work conducted daily by department members. Employees in the Public Affairs Department and departments in charge of communications and CSR have regular consistency meetings. The various regions are represented during these meetings. The Head of Public Affairs reports on his work twice a month to the General Secretary.

The Public Affairs Department may be audited by the Group Audit and Risk Protection Department, which acts independently. More specifically, the audit may be performed as part of a wider assessment of the Public Affairs Department's compliance with the rules of the Code of Ethics.

If breaches of the principles set out in the Code concerning relations with public authorities are identified, they can be submitted to the Ethics Committee according to the principles set out in section 6.1.2.

Groupe PSA has signed the EU Code of Ethics for Lobbyists and the French codes of the National Assembly and the Senate. Groupe PSA discloses its practice in the EU and in France in line with the guidelines of these transparency registers. In the UK, Poland and Hungary there is no transparency register.

### 6.3.1.3. Resources

GRI.415-1

The OV Governmental Affairs Department was integrated with the PCD Governmental Affairs Department in 2018. In Europe, this process caused the number of employees and the membership of associations to be significantly restructured. At the end of 2018, approximately 15 Groupe PSA employees were assigned to public affairs in Europe. In the other parts of the world, these functions are generally the responsibility of the local management on a part-time basis.

In Europe, the Group allocated a budget of approximately €2.37 million to its public affairs activities. In order to report on Groupe PSA expenses for relations with public bodies, the Group decided to follow the guidelines issued by the European Commission and European Parliament on this matter. As such, this amount includes:

- personnel costs based on a full-time equivalent (50% of the total personnel costs);
- the office and administrative expenses (100% of the costs, except for mobility costs covered at 50%);
- the costs related to professional associations (25%);
- externalisation costs (100%).



## 2018 CONTRIBUTION

(in millions of euros)

<b>Internal</b>	1.32
<b>Trade associations</b>	0.85
<b>Consultancy</b>	0.20
<b>TOTAL CONTRIBUTION</b>	<b>2.37</b>

The Group is a member of professional and industrial associations in its main host countries. These associations enable updates to regulations to be monitored and public authorities' requests regarding the development of the automotive industry to be addressed, focusing on a sectoral approach. The main organisations of which Groupe PSA is a member are: in Europe, the ACEA - European Automobile Manufacturers' Association, in France, the CCFA - *Comité des constructeurs français d'automobiles* (French automotive industry), the PFA - Automotive and Mobility sector, the AFEP - *Association française des entreprises privées* (French association of private companies); in Germany, the VDA - *Verband der Automobilindustrie*; in Spain, the ANFAC - *Asociación Española de Fabricantes de Automóviles y Camiones* (Spanish national association of car and truck manufacturers); and in the UK, the SMMT *Society of Motor Manufacturers and Traders*.

In Europe, Goupe PSA reports its relations with public institutions activities in the EU and in France:

- for European institutions, Groupe PSA spending ranges between €500,000 and €599,999 in 2018 as reported in the EU Transparency Register No. 39900807417 - 87;
- in France, the resources that the Group allocates to public relations activities are reported in the lobbyist register of the French National Assembly. In 2018, €250,000 was spent, which is an estimation of the costs related to interest representation. The reported amount is in line with the guidelines applicable in the transparency register since the application of the "Sapin 2 Law" from the second semester of 2017. The reported amount includes direct expenses (salary, event, consultants) and the total of the associations' fees.

The budget allocated to these activities is planned and monitored by the Management Control Department, which is the same as those used for other activities, as part of the Group's budgetary procedures.

### 6.3.2. The Group's public policies and positions

The Group is committed to keeping public officials and stakeholders updated on all of the challenges it faces.

As such, the Group addressed the public authorities' requests in 2018 in its host countries. For example, in France:

- January 2018: Carlos Tavares presented the seven megatrends of the automotive industry in Detroit;
- March 2018: Carlos Tavares, Chairman of the Group's Managing Board, spoke to the French National Assembly's Economic Affairs Commission to discuss the future of the automotive industry;
- April 2018: Carlos Tavares and OPEL CEO Michael Lohscheller met with Peter Altmaier, German Federal Minister of Economic Affairs and Energy and Hubertus Heil, German Federal Minister of Labour and Social Affairs, to discuss the various elements of a sustainable future for OPEL;

- May 2018: Brigitte Courtehoux presented mobility services in Montreal;
- November 2018: French President Emmanuel Macron visited the industrial site of Charleville-Mézières (Ardennes region).

In line with its CSR commitments and issues, the Group actively takes part in public debate on issues related to the industry, the automotive sector, ecology and the environment, transportation and mobility, data protection, road safety, regional development and international trade. It defends the positions presented in the following table.

All positions in the table below are coherent with corresponding actions carried out by the Group, which are also specified in the sections covering each of the issues addressed in this report.

Macro risk	Issue	Group position
Climate change	<b>Vehicle CO<sub>2</sub> emissions</b> 	<p><b>CO<sub>2</sub> emissions</b></p> <p>With increasing global awareness, the eco-car of the future remains a core topic of public debate. With respect to regulations on CO<sub>2</sub> emissions of vehicles, the Group supports the idea of a worldwide harmonisation of emission measurement cycles and test procedures (Worldwide Light Vehicle Test Procedure) and their swift roll-out in Europe. All Groupe PSA passenger cars were successfully certified (type approval) by the 1 September 2018 deadline.</p> <p>More generally, the Group asserts that there is no "one-size fits-all" technology that will produce a carbon-free environment. Instead, reducing overall CO<sub>2</sub> emissions will require the marketing of several complementary technologies to meet the various usage patterns and price requirements of customers around the world. It is generally believed that internal combustion vehicles will still account for 85% of automotive sales in 2020, and 15% will be electric and hybrid vehicles.</p> <p>The Group is working with public authorities to help define the conditions that would enable the emergence of a market for low-carbon vehicles. To this end, the Group assists in designing and testing out technologies and standards for electric infrastructures. The Group also urges governments to support the development of electric vehicles, hybrids and plug-in hybrids with incentives for buyers and users on these emerging markets.</p> <p>Concerning biofuels, the Group is in favour of introducing blends of up to 10% to achieve a meaningful impact quickly. That said, it is important to apply sustainability criteria in developing a biofuel industry, notably to address the potential conflict in using crops for fuel instead of food.</p> <p>In order to better inform its customers on the vehicles' actual emissions, the Group started a partnership with the European NGO Transport &amp; Environment and its French partner <i>France Nature Environnement</i> in November 2015. In 2017, in addition to the publication of vehicles' average consumption, our brands integrated a consumption simulator in the customer's vehicle selection journey that shows use-based consumption (number of passengers, mix city, motorway, driving type).</p> <p><b>Automotive taxation</b></p> <p>As part of the technological neutrality principle, the Group supports a progressive redistribution of taxes on internal combustion engines between diesel and petrol. This approach, the consequences of which include the loss of residual value for the diesel vehicle fleet, should be accompanied with aids for renewal (bonus and conversion premium, including in support of electric vehicles).</p> <p>As for the TICPE (domestic consumption tax on petroleum products) convergence on diesel and petrol, the Group recommends that SP 95 – E10 fuel should now be used as reference petrol instead of SP 95 fuel, insofar as SP 95 – E10 fuel makes it possible to reduce overall CO<sub>2</sub> emissions by incorporating 10% of ethanol.</p> <p>In line with the report from the "Fact-finding mission on the French automotive industry from a manufacturing, energy and tax perspective" (October 2016), the Group supports all actions to guide revenues gained from increased taxes on fossil fuels towards actions aimed at transforming the sector, such as preparing for the energy transition (e.g. investments in recharge facilities).</p>
Energy/industrial carbon footprint		<p>For many years now, the Group has been rolling out a process for controlling its environmental impacts and ensuring continuous improvement. This has led to all of its plants becoming ISO 14001-certified and the environmental footprint of its manufacturing operations being regularly reduced.</p> <p>For more details, see 5.2.</p>
Environmental performance of the supply chain: purchasing and logistics		<p><b>Structuring of the industry</b></p> <p>Groupe PSA supports the development of suppliers in the automotive industry, including through an organised initiative of the French automotive industry at the national (PFA) and regional levels (by the ARIAs, regional automotive industry associations) with public authorities and the administration.</p> <p>The Group focuses its action on the regions where the automotive industry has manufacturing operations. The Group has campaigned for the merger of automotive competitiveness clusters and with the ARIA, which started in 2015.</p> <p>Since 2015, the Purchasing Department has supplemented this strengthened framework in the automotive industry and its ecosystem by appointing DAPIs (manufacturing division purchasing representatives) in each manufacturing division in Europe: Iberian (Vigo, Madrid and Mangualde), Paris region (Poissy and Saint-Ouen), Central Europe (Trnava), eastern France (Trémery/Metz, Mulhouse and Sochaux) and northern France (Hordain, Douvrin and Valenciennes).</p> <p><b>Development of CSR in the supply chain</b></p> <p>One of the priorities for Groupe PSA is to reduce its carbon footprint. The Purchasing Department involves suppliers in the Group's approach to reducing CO<sub>2</sub> emissions in the supply chain, i.e. emissions by its suppliers for the production of goods and services purchased by the Group.</p> <p>Groupe PSA has a direct contractual relationship with more than 7,000 tier-1 suppliers. It requires all of them to meet the CSR commitments set out in its responsible purchasing policy. By signing the Group's CSR Charter, tier-1 suppliers agree to choose their subcontractors (tier-2 suppliers for the Group) on the basis of the same CSR criteria. The CSR criteria must be replicated at each level of the subcontracting chain as part of the direct contractual relationship between the client and supplier.</p> <p>Responsibility for managing the supply chain lies with each actor in the chain. However, given the emerging CSR issues (on the origin of raw materials, human rights, etc.), Groupe PSA conducts targeted audits where risks are identified. The Group is vigilant and implements tailored measures within its sphere of influence (see 4.2.2.2. for further details).</p> <p>The Group is a member of GALIA (a group for the improvement of relationships in the automotive industry), a French branch of the European network ODETTE that works in the fields of logistics (packaging, labels, EDI, etc.) and engineering (CAD exchanges and technical documentation, etc.) and which simplifies automated communications between industry members. The Group supports the merger between GALIA and the French Government's automotive industry support platform (PFA) to further improve efficiency in the supply-chain. Today, GALIA is associated with the PFA's operational working groups which also include the ARIAs, as well as with the initiatives related to the "Plants of the future" programme (PIAVE).</p>

Macro risk	Issue	Group position
<b>Natural resource scarcity</b> 	<b>Wise use of material in the vehicle life cycle (including product recycling)</b>	<p><b>The circular economy</b></p> <p>The Group is involved in circular economy initiatives. It promotes the repair of its products and, as such, develops a range of remanufactured spare parts and proposes second-hand parts and a spare parts repair service.</p> <p>Through its action in the Automotive Industry Platform (PFA), it also supports the development of a harmonised methodology for measuring the rate of incorporation of recycled and natural materials.</p> <p>The Group promotes the adoption of best practices by EU Member States to implement the European Directive on the treatment of end-of-life Vehicles (ELV). It advocates for the professionalisation of the recycling industry and higher output (ELV decontamination centres, shredding, sorting after shredding, etc.). It participates in the Environmental ELV steering committees of the European Automobile Manufacturers Association (ACEA) to facilitate the elaboration of the Energy Transition and Circular Economy package in Europe.</p> <p>Groupe PSA leverages its knowledge and experience of recycling and has decided to create a business unit dedicated to circular economy. The aim of the business unit is to build a sustainable and profitable business based on a global circular economy everywhere (worldwide scope) whenever it is possible (technical limitations).</p>
	<b>Sustainable water management</b>	For many years now, the Group has rolled out a process for controlling its environmental impacts and to ensure continuous improvement. This has led to the obtaining of ISO 14001 certification for all its plants and the regular reduction in the environmental footprint of its manufacturing operations.
	<b>Optimisation of material cycles in industrial processes (including waste)</b>	For more details, see 5.4 and 5.5.
<b>Health and safety: growing demand of civil society</b> 	<b>Biodiversity</b>	For many years now, the Group has been rolling out a process for controlling its environmental impacts and ensuring continuous improvement. This has led to all of its plants becoming ISO 14001-certified and the environmental footprint of its manufacturing operations being regularly reduced.
	<b>Vehicle safety</b>	<p><b>Certification and monitoring of the motor vehicles market</b></p> <p>The Group is concerned with the European Commission's proposal regarding the review of the certification framework and monitoring of the motor vehicles market. Groupe PSA supports the objectives to regain consumers' trust, implement an effective monitoring system and ensure a solid and uniform approval framework, but it believes that concrete answers should be rational, efficient and feasible. The certifications' validity, the cost and conduct of market monitoring, the skills and availability of technical services and test capabilities are therefore many structuring points that the European legislator should further address in light of industrial risks, network competitiveness, customer impacts, global competitiveness and fairness principles and legal security, in order to regulate well.</p> <p><b>Vehicle safety</b></p> <p>Vehicle passive safety performance continues to improve despite the obligation to reduce vehicle weight in an effort to lower CO<sub>2</sub> emissions and reduce global warming.</p> <p>For automotive technologies that help reduce the number of road fatalities, the focus is increasingly placed on accident avoidance, in particular through the use of new driver assistance and communication.</p> <p>Groupe PSA insists, along with consumer bodies (NCAP), that the assessment criteria used should be based on actual accident analysis efficiency, drawing on its research work within the LAB (<i>Laboratoire d'accidentologie</i>), a joint lab between Groupe PSA and Renault.</p> <p>Alongside the VEDECOM Institute, Groupe PSA is involved in the PFA's work on the legalities of assisted-driving systems, focusing on the liability systems as well as the discussions on the current amendments to the Vienna Convention.</p>
	<b>Vehicle impact on air quality</b>	<p>In 2017, Groupe PSA anticipated the required RDE level for 2020 (CF = 1.5 NO<sub>x</sub>; compliance factor of 1.5 times the Euro 6 emissions limit for nitrogen oxides). Groupe PSA notes that the results regarding the emissions levels from the RDE monitoring data on its recently certified vehicles are available on the following web page: <a href="http://www.acea.be/publications/article/access-to-euro-6-rde-monitoring-data">http://www.acea.be/publications/article/access-to-euro-6-rde-monitoring-data</a></p> <p><b>AdBlue® distribution</b></p> <p>The launch of the second generation of SCR diesel engines in 2017 (Euro 6d-TEMP) will require the setup of a dense network at the European level to distribute AdBlue, i.e. urea acting as a reducing agent to transform NO<sub>x</sub> into nitrogen and necessary for operating the SCR (Selective Catalytic Reduction) depollution system.</p> <p>Therefore, it is vital to expand the distribution network of AdBlue in such a way that all customers can easily refill with AdBlue, as the Group's vehicles are equipped with a tank containing 17 litres of this product.</p> <p><b>The problem of the older car population</b></p> <p>The impact of road transport on pollution in urban areas is primarily due to older vehicles. Groupe PSA advocates for a European alignment of city traffic restriction measures that should mainly target older vehicles, which have higher emissions.</p>
	<b>Control of industrial discharges and nuisances</b>	For many years now, the Group has been rolling out a process for controlling its environmental impacts and ensuring continuous improvement. This has led to all of its plants becoming ISO 14001-certified and the environmental footprint of its manufacturing operations being regularly reduced.
		For more details, see 5.3.

Macro risk	Issue	Group position
<b>Unbalanced economic development of territories</b> 	<b>Local sourcing development in host territories</b>	<p>It is crucial to boost local production to support the Group's increasing internationalisation and combat global warming. In order to achieve this, the Group is implementing measures in two separate areas: firstly, it identifies local suppliers and helps them gain the skills that they need, and secondly it encourages its own suppliers to relocate to clusters near to its plants.</p> <p>Local sourcing also provides the Group with:</p> <ul style="list-style-type: none"> <li>• better knowledge of the expectations of local stakeholders;</li> <li>• the option to find technological solutions which fit the context and local constraints;</li> <li>• operational proximity to its partners, enabling it to help them achieve technological, logistical, social or environmental progress;</li> <li>• greater supply chain flexibility</li> </ul> <p>Consequently, the Group must ensure the best conditions to build and sell vehicles that meet the customer's expectations, in compliance with social, environmental and ethical standards (OECD Guiding Principles)(see further details in 4.1.2.2. for further details).</p>
	<b>Balanced governance and distribution of added value</b>	<p><b>Reducing trade obstacles in global regions</b></p> <p>With operations spanning more than 160 countries, the Group faces technical barriers technical barriers and price hikes that could disrupt trade between countries or regions.</p> <p>At a multilateral level, the Group promotes the UNECE international regulations and its agreements entitled the "1958 Agreement" and the "1998 Agreement".</p> <p>At a bilateral level, the Group actively follows the negotiations in the European Union to finalise the free trade agreements. The Group closely monitors all developments related to Brexit and calls on negotiators to provide certainty and sufficient leadtime and maintain the competitiveness of the European auto industry. The Group is championing proposals to provide better market access by reducing technical barriers and customs in both a proportional and coordinated manner. This will guarantee that the parties enjoy mutual benefits in each zone.</p> <p>The Group supports efforts to conclude the trade negotiations between the European Union and Latin America.</p> <p>In the same vein, the Group supports the negotiations that were recently started between the European Union, Australia and New Zealand.</p> <p><b>Involvement in host communities</b></p> <p>The Group contributes to structuring the automotive industry (manufacturers, suppliers, equipment manufacturers) across its host communities. In France, the Group's efforts are coordinated with those of the French Government's automotive industry support platform (PFA) and a partner network, regional industry associations, automotive competitiveness clusters, mobile, the Union of Metallurgies Industries (UIMM), the Industrial Federations Group (GFI), professional branches, etc.</p> <p>Both regionally (ARIA) and nationally (PFA), the Group is a stakeholder in initiatives to increase the automotive industry's profile (planetautomobile.com, career conferences, etc.).</p> <p>Groupe PSA also contributes to the development of companies of the future, for example, through the use of revitalisation funds.</p> <p>In support of its economic activity in its hosting communities, Groupe PSA commits locally to contribute to research and the development of scientific and technical skills and knowledge. In France, a scientific partnership was signed was signed between Groupe PSA, the Bourgogne France-Comté region, the CNRS, and three regional training and research institutions in 2016. Over a four-year period, Groupe PSA will support joint research works (notably on clean technologies, the autonomous vehicle and the plant of the future) that will directly benefit regional excellence in cutting-edge research.</p> <p>Two regional agreements were signed by Groupe PSA, one with the Bretagne region and the other with Rennes Metropole, notably with a view to expanding the Group's industrial research in the region and investing in cutting-edge technologies in cybersecurity.</p> <p>In Galicia, many applied research projects are being developed in collaboration with the CTAG (<i>Centro Tecnológico de Automoción de Galicia</i>) based on a multi-year partnership contract with Groupe PSA. Projects under development notably relate to production data digitisation, advanced automation and collaborative robotics, and artificial vision. These activities, in line with the Galicia region's objectives and the European framework programme Horizon 2020, contribute to the increase of R&amp;D skills of the local industrial fabric, the automotive industry and the improvement in the performance and competitiveness of Groupe PSA plants.</p>
<b>Philanthropy and socially responsible mobility</b>		<p>The value given to local ties with Groupe PSA is also reflected through PSA Foundation initiatives, which aim to support mobility in close proximity with citizens' lives. Benefiting from an initial five-year operational period, Groupe PSA demonstrated a very positive assessment of its commitment through PSA Foundation, bringing hope to its host regions (see quantified balance in 7.3.).</p>

Macro risk	Issue	Group position
<b>Human rights and business ethics violation</b> 	<b>Ethics in business practices</b>	Every employee must behave in line with the rules set out in the Groupe PSA Code of Ethics when performing their work. These rules are organised around the following requirements: respect for the law, respect for people and the environment, respect for customers and respect for the Company.
	<b>Human rights in the supply chain</b>	<p>When it joined the Global Compact on 9 April 2013, the Group promised to follow and promote to its suppliers the ten principles based on the Universal Declaration of Human Rights, the Declaration on Fundamental Principles and Rights at Work, the Rio Declaration on Environment and Development, and the United Nations Convention against Corruption.</p> <p>The Groupe PSA policy on human rights is based on the recommendations of the OECD Guidelines and of the UN Guiding Principles (i.e. for multinational enterprises, for business and human rights):</p> <ul style="list-style-type: none"> <li>• a public commitment to human rights: on 7 March 2017, Groupe PSA signed a new version of its Global Framework Agreement on Group social responsibility with the relevant stakeholders and requests that its suppliers also meet this commitment through its "responsible purchasing policy";</li> <li>• risk mapping for human rights infringements: the Group has set up a risk mapping process for each procurement category, using the "EcoVadis Rating Framework";</li> <li>• preventive measures to address identified risks: each new supplier must systematically comply with the following criteria in order to be listed in the supplier base: environmental, employment practices, and human rights;</li> <li>• corrective action must be taken for suppliers potentially or actually involved in a human rights infringement. If the supplier fails to comply with any of the listed criteria, corrective action plans are put in place and a sanction may be imposed. In the worst-case scenario, the supplier may be removed from the base;</li> <li>• action plan monitoring: any supplier guilty or potentially guilty of human rights violations must prove that the corrective measures agreed with Groupe PSA have been implemented;</li> <li>• communication of measures put in place: each year, an overview is provided to the employee representatives according to the commitments set out in the Global Framework Agreement. The results are also published in the annual CSR report.</li> </ul>
<b>Human capital</b> 	<b>Attracting and developing all talents</b>	<p>Groupe PSA considers talent management to be a key issue in its human resources policy. It highlighted this issue, both internally and externally, by stating that everyone should feel free to express their talent, individually or collectively.</p> <p>Groupe PSA has set up governance for its job families and professions to preserve its know-how and expertise and develop its talents across the Group, including now at OPEL and VAUXHALL. It supports meritocracy as a basis for equal opportunities and performance-based assessments.</p>
	<b>Management of company transformations and social dialogue</b>	<p>The Group focuses on social dialogue to drive transformations in the Company. It ensures that its partners are engaged, and via company agreements, it explores responsible solutions to adapt the Company, improve its performance and protect employees.</p> <p>The signature of a new global agreement on 7 March 2017 publicly illustrates its support for co-construction with employee representatives.</p> <p>The objective of Groupe PSA is for each industrial site within PCD – and now OV – to have its own site project aimed at sustainable performance, supported by a collective performance agreement co-constructed with the social partners.</p>
<b>Health, safety and well-being in the workplace</b>	<b>Health, safety and well-being in the workplace</b>	<p>Groupe PSA considers the protection of health and safety at work to be an essential requirement. Groupe PSA made efforts to follow the recommendations of the ILO and the WHO, including the Health and Safety Management System that continually rolled out for over 10 years, within the Group. Thanks to its strict application, its results are the best in its business segment.</p> <p>Groupe PSA is engaged in professional networks for work ergonomics and developed the policy to prevent psychosocial risks which it is systematically deploying, including in the regions where societal concerns are yet to be raised in this field.</p> <p>The Group advocates for an overall health approach that goes beyond health at work and contributes to public health policies. It supports the "Healthy Workplaces" initiative promoted by the European Union and the WHO.</p>
	<b>Diversity and equal opportunity</b>	<p>Groupe PSA publicly calls for diversity, the prevention of discrimination and the promotion of equal opportunities. It has detailed its commitments in various company agreements as well as in its Global Framework Agreement on Corporate Social Responsibility.</p> <p>It embeds this policy within a continued progressive approach that also involves labelling its practices (Gender Equality label, Diversity label). For several years and in multiple countries, Groupe PSA has supported public policies and endeavoured to prevent violence against women, implement whistleblowing systems and help victims of discrimination.</p>

Macro risk	Issue	Group position
<b>Customer's expectations and market risks</b> 	<b>Responsible management of customer's data and relationship</b>	<p><b>Consumer personal data protection</b></p> <p>The Group wants to strike a balance between the legitimate protection of consumers and the Company's performance.</p> <p>The protection of personal data is a strategic issue for the customers and encourages satisfaction because it is an important factor of confidence and loyalty. It requires us to have in-depth knowledge of customers' needs while guaranteeing that the freedom and fundamental rights of individuals are respected at the same time.</p> <p>For Groupe PSA, the collection and processing of personal data are essential to build, maintain and personalised the link between consumers and the organisation, and propose services and products expected by consumers. Of course, these processes must respect the principles of lawfulness, fairness and transparency to ensure that consumers trust how their data will be used, in the context of the new European privacy regulation (General Data Protection Regulation - GDPR) which entered into force on 25 May 2018.</p> <p>The Group had already committed to the essential principles of "privacy by design" and "privacy by default" and is constantly improving the security of its data storage and exchange networks, especially with the connected car that has transformed car manufacturers into players at the heart of the data protection issue. It carries out training and awareness-raising actions within the Company and takes part in working groups among professionals to foster the exchange of best practices.</p> <p>With French automotive stakeholders, Groupe PSA participated in the development of a specific compliance package for connected vehicles, which was released in October 2017 by the French data protection agency (CNIL - <i>Commission nationale de l'informatique et des libertés</i>). In early 2018, Groupe PSA and CNIL shared this compliance package with other European automotive stakeholders in the context of the ACEA in order to set a European version of this compliance package.</p> <p>The digital revolution requires organising and managing car data security, and Groupe PSA is rising to the challenge by developing a global automotive software platform in partnership with Huawei, one of the world leaders in information and communication technologies. Its internationally recognised know-how ensures the use of best standards in regulations and data security.</p> <p>The new platform, known as the Connected Vehicle Modular Platform (CVMP) ensures that all digital interactions between the car and the cloud are managed securely while at the same time guaranteeing data integrity, authenticity and confidentiality.</p> <p>CVMP makes it possible to introduce new services such as remote on-demand car diagnostics and remote control solutions such as battery charging and pre-heating; wireless car software updates, traffic information and navigation; car sharing and corporate fleet management; and customised on-board services such as personal assistant solutions.</p> <p>The first applications of the CVMP platform have been operational since 2018 for customers in Europe and China and subsequently in the rest of the world. New services tailored to customer needs will be rolled out gradually.</p>
<b>Development of new mobility solutions</b>	<p><b>New mobilities</b></p> <p>Cars still have their place: as the best choice for freedom and flexible mobility, cars represent a major economic and social issue, particularly outside cities in the absence of alternative solutions. New uses and therefore new services are being created.</p> <p>To become a leading provider of mobility services, the Group created a brand dedicated to new mobilities in 2016: Free2Move, which develops experiences of a sustainable, smart and shared mobility for all. Free2Move pools all of the Group's new mobility services on a single platform: car-sharing services; connected services to make life easier and save time; corporate fleet services; and financial offerings to facilitate vehicle accessibility.</p> <p>In addition, the Group furthered its acquisitions of equity stakes in startups. A new entity "The Business Lab" was created at the end of 2016, with the aim of detecting, experimenting and transforming opportunities, both in terms of mobility and digital technologies, into new activities. The Group set up an investment fund of €100 million to develop these activities.</p> <p><b>The connected vehicle</b></p> <p>Cars are increasingly connected to their external environment through a wide range of communication technologies. These new data exchange capacities raise issues that are technical, economic and societal. The Group is very aware of these issues and works with a large number of groups of experts on the standardisation and protection of personal data. Operating safety, the protection of the technical specifications of vehicles throughout their life cycle, data protection and road safety are at the heart of the Group's concerns.</p> <p>In 2017, the Group launched a new platform, known as the Connected Vehicle Modular Platform (CVMP), which will ensure that all digital interactions between the car and the cloud are managed securely while guaranteeing data integrity, authenticity and confidentiality at the same time.</p> <p>To preserve the safety of people and goods, the Group's experts actively take part in the process for global standardisation (ISO) that lays out the conditions to remotely access connected vehicles. These "expanded model" ISO standards specify the limits of liability for car manufacturers and implement access procedures for third-party providers of connected services, so as to protect the integrity of the vehicle and its performance, ensuring onboard safety, in line with balanced market rules.</p> <p>In 2017, the Group developed an extended vehicle "proof of concept" that was presented to decision-makers of the European Commission and to France.</p>	

## 6.4. GOVERNANCE PRINCIPLES

GRI.102-18

GRI.103-2

GRI.103-3

The Group's corporate governance is based on compliance with recommended governance practices and on the Code of Ethics described in section 6.3.1. of this document.

### 6.4.1. AFEP-MEDEF Corporate Governance Code

The Company refers to the AFEP-MEDEF Corporate Governance Code, which was revised in November 2016, as applicable to French joint stock companies with a Managing Board and Supervisory Board. This code can be viewed online at: <http://www.medef.com/>

A summary table in section 3.1.6. of the Registration Document presents the only provision of the code which was not kept, with explanations.

### 6.4.2. Disclosures on the situation of the members of the Supervisory Board and the Managing Board

GRI.102-22

GRI.102-23

GRI.102-24

The composition of the Supervisory Board and the status of its different members (including independent members) is detailed in chapter 3.1.2. of the Registration Document.

Groupe PSA is also assembling a wide range of skills and talents required for its expansion (these skills and talents are discussed further in section 1 of this CSR report). The skills matrix for the members of the Board is included in the Registration Document.

This balanced membership ensures the quality of the debates and decisions taken by the Supervisory Board.

Please refer to chapter 3.1. of the Registration Document for further developments about the Supervisory Board's composition (introduction of the members, developments in 2018, terms of office, statements on conflicts of interest, family ties, etc.).

50%

of the members of the Supervisory Board are independent

46%

of the members of the Supervisory Board are women

### 6.4.3. Conflict of interests within managing and supervisory bodies

GRI.102-25

See 3.1.3.2., 3.1.3.3. and 3.1.4.2. of the Registration Document for complete information.

### 6.4.4. Handling and reporting of critical events

GRI.102-33

GRI.102-34

Critical events are handled and reported according to a structured process:

- for events related to product quality, there is a dedicated process through the Quality Division;
- for the management of crises not involving product quality, the process is formalised in a summary document updated in 2015. This document specifies the criteria for assessing triggering of the crisis, the people to contact, the composition of the management team and the appointment and management procedure of the team. This document can be rapidly and easily accessed by members of the Executive Committee through different means (laptop, tablet, mobile phone).

In addition, for all events that expose the Group to significant risk, the Chairman of the Managing Board, the Director of the Risk Management and Audit Department or the "Statutory Auditors" refer the case to the Finance and Audit Committee of the Supervisory Board and inform the Supervisory Board if necessary.

Lastly, in accordance with the Internal Rules of the Supervisory Board, "the Supervisory Board is alerted by the Managing Board as soon as possible in the case of an external event or internal developments which significantly jeopardise the Company's outlook or the projections submitted to the Supervisory Board".

In 2018, no critical event occurred with respect to the management of crises not related to product quality.

## 6.5. INTEGRATION OF CSR INTO GOVERNANCE GRI.103-2 GRI.103-3

### 6.5.1. Organisation, delegation and appointment process GRI.102-19

The structure of the Group's corporate governance is described in Section 1 of this CSR report and in Section 3 of the Registration Document which contains information about the current or past experience of members of the Board and Managing Board and the date of their recruitment.

The Board comprises diversified profiles in terms of gender, expertise and country of origin of members.

### 6.5.2. CSR performance of governance bodies GRI.102-28

In section 3.2. of the Registration Document, you are reminded that the Supervisory Board discusses at least once a year on its practices.

At least once every three years, a formal evaluation takes place. It is performed by the Appointments, Compensation and Governance Committee, with the assistance of an external consultant if required. Every year the shareholders are notified of the evaluations and any follow-up measures in the Annual Report. A meeting of the members of the Supervisory Board is held once a year to assess the performances of the Managing Board and reflect on its future.

Every April the Supervisory Board reviews the Group's Corporate Social Responsibility programme in accordance with the recommendations of the financial market authorities (AMF).

Furthermore, collective and individual objectives related to CSR issues are assigned to the Managing Board's members. These objectives are described in the Registration Document.

## 6.6. REPORTING SCOPE AND METHODOLOGY GRI.102-48 GRI.102-49

The reported data concern the production plants, the research and development centres, the main office sites, the PSA Retail dealership networks and the activities of BANQUE PSA FINANCE (BPF).

Due to the lack of exclusive control, the scope of reporting does not include subsidiaries jointly owned with other car manufacturers or joint ventures accounted for by the equity method. In these joint ventures, Groupe PSA exercises its role as shareholder and industrial partner with a view to long-term development.





**MOBILITY IS  
A FUNDAMENTAL  
RIGHT**

**WITHOUT MOBILITY,  
NO ACCESS  
TO EDUCATION,  
HEALTH, CULTURE,  
OCCUPATION**

Mobility reduces social and economic exclusion. The Group supports the most vulnerable populations through its Foundation, which sponsors socially responsible mobility projects to remove barriers to education and integration.



# 7

## THE GROUP'S COMMITMENT TO SOCIETY

GRI.102-15 GRI.103-1

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Groupe PSA has identified three major societal issues:

- **"Philanthropy and socially responsible mobility"**

Today, mobility is a fundamental need which provides access to employment, education, health, leisure activities and culture, and reduces isolation and social and economic exclusion.

According to ONPES (France's national observatory on poverty and social exclusion), almost one French person in four (23%) says they have turned down a job or training course because they did not have transport to get there.

Mobility players, including car manufacturers, are in the best position to address this issue and are working to improve access to mobility for the most vulnerable populations.

A large number of studies on mobility needs and practices have been conducted and have addressed "the right to mobility" for people in isolated rural and outlying urban areas (urban spread).

Solidarity garages, introduced before the 2000s, are an example of a socially responsible mobility solution for people in vulnerable situations. Each solidarity garage welcomes 450 users every year on average, and this figure rises to 530 for those in rural areas (see EEXIST 2015 study).

These elements are detailed in 7.1, 7.2 and 7.3.

- **"Responsible management of customer's data and relationship"**

This issue concerns:

- responsible support for customers who have been granted consumer credit;
- protecting the personal data of customers, users of products and services and prospective customers, which is obtained via Groupe PSA websites and apps, in the network or via the in-vehicle systems, and ensuring that they are used with due regard for their confidentiality, in the interest of maintaining a relationship founded on trust;
- respecting customers' preferred contact methods.

Given today's ever-expanding connectivity, the growing popularity of social media and the exponential rise in online shopping, Internet users who are not well-versed in the legal issues surrounding the confidentiality of information are becoming increasingly wary. The challenge for car manufacturers is to give clear indications that all personal data shared with them by their customers will be kept confidential in the interest of maintaining a relationship founded on trust. In addition, the new European General Data Protection Regulation, which came into force in May 2018, is of key importance for Groupe PSA (financial penalties of up to 4% of international revenue can be incurred for non-compliance).

These elements are detailed in 7.4.1.1.

- **"Responsible information and marketing"**

This issue concerns:

- responsible marketing which relates to the transparency and ethical nature of the information communicated to civil society;
- Group information for accountability purposes (relating in particular to the environment, health and safety).

As a result, car manufacturers must therefore demonstrate their ability to fulfil their legal obligations with respect to their communications and marketing efforts (risk of fines/penalties, e.g. a €1,500 fine for every advert found to be in violation of the recommendations of France's professional advertising regulation agency — ARPP). However, it is also important for manufacturers to ensure that their messages achieve the desired aims without overstating their case, thus exposing themselves to the risk of controversy (e.g. "green washing"). Furthermore, companies in the sector have a duty to encourage responsible behaviour and ensure that their practices are exemplary.

These elements are detailed in 7.4.2.

Faced with these challenges, the Group has set up the following systems.

## COMMITMENTS SCOREBOARD

MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Unbalanced economic development of territories</b> 	<b>Philanthropy and socially responsible mobility</b> Organiser: PSA Foundation	<b>By 2035</b> Support the most vulnerable populations through a charitable initiative centred on socially responsible mobility projects, which remove barriers to inclusion and education.	<u>Mobility and inclusion:</u> continue support programme for social garages to enhance their professionalism.	<b>Target met</b> <u>Mobility and inclusion</u> €1.061m granted to projects. <ul style="list-style-type: none"> <li>Publication of a methodology guide to structure and develop a social garage (investments, operational management, human resources, etc.).</li> <li>Publication of an online map of social garages in France.</li> <li>A national event in Paris organised by PSA Foundation to promote social garages to their stakeholders;</li> <li>2011-2018: PSA Foundation has supported more than 50% of French social garages.</li> </ul> <u>Mobility and education</u> €800k granted to projects. <ul style="list-style-type: none"> <li>2 projects related to road safety education (driving licence), including 1 new major project dedicated to teenagers.</li> <li>10 off-site cultural projects currently running. One major project dedicated to sustainable mobility education.</li> </ul>	<u>Mobility and inclusion</u> Support for social garages: focus on helping them to better communicate with their stakeholders (utility measurement tool and training).
<b>Customers' expectations and market risks</b> 	<b>Responsible management of customer's data and relationship</b> Organisers: General Secretary and Brand Directors	<b>By 2035</b> Respect customers' privacy (including data protection, only requesting data which is absolutely necessary and with a tangible benefit for the customer) and be recognised by customers as a benchmark corporation in this respect: <ul style="list-style-type: none"> <li>no conviction of the Group;</li> <li>increase in the number of Internal Audits and audits of subcontractors;</li> <li>improvement in the Group's position in customer surveys and on benchmarks.</li> </ul>	<u>Scope PSA Europe</u> • Run an Internal Audit to ensure that the action plan currently being implemented guarantees the level of compliance expected by the supervisory authorities. • Prepare the teams in contact with customers and prospective customers for the requirements post-application of the GDPR (25/05/2018). • Introduce measurement indicators for the Data Protection Officer.	<b>Target met</b> An Internal Audit was carried out simultaneously at OV and PCD in March 2018. Action plans have been proposed and implemented in the context of the GDPR compliance project. A set of e-learning modules were recently provided in September 2018 to the teams in contact with customers. Each team has chosen the appropriate modules and managed its own training schedule. A first draft of the "Group DPO dashboard" was built at the end of 2018. This dashboard will be produced in 2019.	<ul style="list-style-type: none"> <li>Ensure 100% GDPR compliance for data protection accountability registers.</li> <li>Implement Privacy-by-Design milestones in the management of 6-8 major projects.</li> <li>Maintain 100% of business domains in the GDPR scope.</li> <li>Continue to monitor activity in order to detect and correct data protection issues.</li> </ul>

					
MACRO-RISKS	CSR ISSUES	AMBITIONS	TARGETS 2018	RESULTS 2018	TARGETS 2019
<b>Human rights and business ethics violation</b> 	<b>Responsible information and marketing</b> Organisers: Brand Directors	<b>By 2035</b> Systematically encourage customers to become active players in the Group's environmental commitment (energy transition and circular economy) by: <b>1.</b> offering them mobility solutions and services best adapted to their needs and promoting the energy transition through communication and marketing practices;  <b>2.</b> advising them to comply with maintenance conditions to preserve safety and energy efficiency during the lifetime of their vehicle;  <b>3.</b> facilitating the hand-over process for their end-of-life vehicles to authorised dismantling partners to ensure environmentally-sound treatment (100% of the Group brands, vehicles can be recovered at agreed dismantling partners).	<b>1.</b> Demonstrate the brands' commitment to the energy transition by promoting electrical mobility throughout the year.  <b>2.</b> As carried out in 2017 by PEUGEOT and CITROËN with the Monitoring Pack <sup>(2)</sup> , offer a monitoring tool for DS AUTOMOBILES customers in France.  <b>3.</b> In all European countries where Groupe PSA has partnerships with approved used-car centres, the brands and their European subsidiaries are putting together an action plan to communicate the "Where can I recycle my vehicle?" information on websites handling new or used vehicles.	<b>Target met</b> 1. Promotion of the Group's commitment to providing electrified vehicles in all car ranges by 2025. Examples: <ul style="list-style-type: none"> <li>• PEUGEOT: reveal of PEUGEOT e-LEGEND concept 100% electric and 3008 HYBRID4 and new 508/508 SW HYBRID;</li> <li>• DS AUTOMOBILES: communication on its electrification strategy: From 2025, each new DS model will only be available in electrified engines: PHEV, 100% electric, or even both;</li> <li>• CITROËN: reveal of the C5 Aircross SUV Hybrid Concept to announce the first PHEV model for CITROËN in 2020. From this time, all CITROËN models launched will have an electrified version;</li> <li>• OPEL: electric Ampera-e delivered to customers and the expansion of the electric vehicle portfolio was announced as part of the PACE! plan.</li> </ul> 2. MyDS app, available to all DS AUTOMOBILES customers for trip history, average consumption, virtual maintenance logbook, etc.	<b>1.</b> Implement the Group's electrification plan by launching hybrid and electric models of the market <sup>(1)</sup> . Raise customers' awareness of the overall benefit of the Group's electrified technologies on their purchasing power (favourable Total Cost of Ownership) and on the environment (CO <sub>2</sub> emission reductions). New offers of spare parts from the circular economy (reman, reuse); roll out a promotion plan in Europe and define a roadmap for the other regions (South America, North Africa, China etc.).  <b>2.</b> Encourage customers to download the brands' mobile apps to monitor the maintenance of their vehicle.  <b>3.</b> In Europe, optimise the end-of-life vehicle network of agreed dismantling partners to ensure adequate coverage for our customers. Define a roadmap for end-of-life vehicles for the other regions where the Group operates (South America, North Africa, China etc.).

(1) Notably with DS7 CROSSBACK F-TENSE 4x4, DS 3 CROSSBACK E-TENSE, PEUGEOT 3008 HYBRID4, PEUGEOT 508 HYBRID, PEUGEOT e-208, OPEL Grandland X Hybrid and OPEL Corsa-e.

(2) The Monitoring Pack provides a virtual log book (automatic monitoring of mileage and servicing schedule, warning when maintenance work required).

## 7.1. THE GROUP'S SPONSORSHIP AND PHILANTHROPY STRATEGY

DPEF.31

DPEF.33

GRI.103-2

GRI.103-3

GRI.203-1

GRI.203-2

### 7.1.1. Group policy and priorities

**The Group is firmly convinced that mobility is an important global challenge faced by society and a fundamental right. It has an effect on everyone's lives and is a key driver for economic development. It underpins independence, progress and innovation.** The Group can claim its legitimacy in discussing this issue. Backed by this seasoned expertise, the Group is focusing on projects that are useful to the community.

Groupe PSA demonstrates its ongoing commitment to socially responsible mobility through its Corporate Foundation, created on 18 June 2011, and renewed this commitment for five years in June 2016. PSA Foundation lends its support to projects that use mobility to promote social integration, strengthen social ties and expand access to culture and education. Its activities are supported by a five-year budget of €9.5 million.

As a member of the *Laboratoire de la Mobilité Inclusive* (a foundation of public and private players addressing inclusive mobility issues), PSA Foundation embodies its commitment through its actions informed by the research and testing carried out. The research conducted on mobility access also enables the Group to explore new business models.

The projects supported by PSA Foundation are put forward by public interest organisations around the world, with special emphasis on the Group's areas of development.

Support given to organisations located close to the Group's employee pool strengthens the bond between it and its host communities.

### 7.1.2. Philanthropy backed by innovation

In terms of workplace or social integration, PSA Foundation works to combat mobility-related vulnerability by promoting financially-viable solutions (a professional attitude in the solidarity garages, support for the mobility platforms, etc.) or through its support for innovative "reverse mobility" projects.

- PSA Foundation supports innovative and inclusive mobility experiments, mainly through its involvement in calls for projects to bring to light new mobility systems.



#### STAKEHOLDERS DIALOGUE

Seven years since its inception, PSA Foundation is now a recognised expert in socially responsible and inclusive mobility solutions. Since 2014, it has taken part in the work of the *Laboratoire de la Mobilité Inclusive* alongside key players in this area, including companies (Total, Michelin, Macif, Transdev, the French postal service, etc.), NGOs (*Secours Catholique*, the Red Cross, Wimoo, FACE, etc.), and institutions (Pôle Emploi, FASTT, CNML – the central and local government consultative body, and ADEME). The mission of the *Laboratoire de la Mobilité Inclusive* is to advise on inclusive mobility issues, mainly relating to individuals with integration needs, seniors and people in isolated rural and outlying urban areas. The *Laboratoire* also works with players from the social and solidarity economy to trial mobility services, and presents the mobility needs of the less fortunate to the French authorities.

- In addition to financial support, PSA Foundation develops a new philanthropic approach, which enhances the social agents in the field professionalism to facilitate their sustainability.

Having noted the emergence of solidarity garages in France (see EEXIST 2015 study), and their needs, the Foundation has decided to launch an initiative specifically aimed at these social agents. Since 2017, backed by an engineering firm specialised in the social and solidarity economy (AVISE), it is supporting and piloting a comprehensive multi-year professionalisation programme. It addresses topics such as the management of solidarity garages, relations with the local authorities, and recycling of garage waste. It is based on field studies, needs analyses, working groups, access to manufacturer methods, sharing of best practices between the solidarity garages, etc.

Among the social garages awarded by PSA Foundation 22 of them have joined a working group which contributed to a methodological guide named "*Comment créer et développer un garage solidaire*". It was published in open source in 2018.



PSA Foundation's website, "Social garages" webpage:  
<https://www.fondation-psa.com/en/nos-actions/insertion/social-garages>

In terms of access to culture, PSA Foundation supports and co-constructs innovative mechanisms to make culture more widely accessible and bring it to populations who live far away from cultural hubs. Touring workshops, exhibitions in industrial sites and mobile museums are just a few examples of the projects developed in 2018. Brief summaries of these are available on the Foundation's website.

### 7.1.3. Summarised statement of contributions committed to

2018	Monetary contribution	Donations in kind	Overhead expenses	Total	
Activities of PSA Foundation	€1,860,700	-	€281,790	<b>€2,142,490</b>	4.8%
Philanthropic activities of the Group's sites, brands and subsidiaries <sup>(1)</sup>	€5,068,412	€103,440	€100,000	<b>€5,271,852</b>	11.9%
Business initiatives (sponsoring) of the Group's brands <sup>(2)</sup>	€36,426,350	€419,000	-	<b>€36,845,350</b>	83.2%
<b>TOTAL</b>	<b>€43,355,462</b>	<b>€522,440</b>	<b>€381,790</b>	<b>€44,259,692</b>	<b>100%</b>
	98%	1.2%	0.9%		

(1) Included in the reporting scope sites and the brands PEUGEOT CITROËN DS AUTOMOBILES and OPEL.

(2) Included in the reporting scope: PEUGEOT (France), CITROËN (France), DS AUTOMOBILES and OPEL (Germany).

The monetary contribution is in line with the amounts committed in 2018.

## 7.2. SOCIALLY RESPONSIBLE MOBILITY: THE FOUNDATION'S INITIATIVES

DPEF.31

DPEF.33

GRI.103-2

GRI.103-3

GRI.203-1

GRI.203-2

### 7.2.1. The Corporate Foundation

PSA Foundation lends its support to projects in the area of socially responsible mobility. To carry out its philanthropic mission, the Foundation is backed by a multi-year action plan with a five-year budget of €9.5 million. The Foundation provides support in the form of funding, equipment or personnel.

#### Mode of governance (established on 11 July 2011)

- The Board of Directors: composed of nine members (two founders, four representatives of Group entities and three independent experts) and chaired by the Chairman of the Group's Managing Board, with Marie-Hélène Peugeot-Roncoroni, a member of the Supervisory Board, as Vice-Chairman.
- General Delegation of the Foundation: a team led by a General Delegate who reports to the Group's Communications Department.



PSA Foundation's website, "Governance" webpage:  
<https://www.fondation-psa.com/en/governance>

#### Project selection procedure

PSA Foundation receives applications for subsidies when there are calls for projects (two submission periods in 2018; see the website for the schedule). The projects come from recognised public interest associations or NGOs.

Only projects relating to mobility for inclusion and mobility for education and culture (including support for disability and environmental issues), which are submitted via the online form when there are calls for projects, are accepted for consideration by the Foundation. Each project's details are recorded in a standardised description sheet. A selection Committee (whose members are half Groupe PSA employees and half external experts) appointed by the Foundation's General Delegate

is mandated to select the projects which will be supported by the Foundation. They score each project on eight criteria: relevance of the project (including its ability to reduce the environmental impacts of mobility); the organisation's experience; the social impact of the project and number of beneficiaries; its innovativeness; its potential spin-offs; its territory; the degree of involvement of the sponsor (if the project is sponsored by an employee); and the potential impact on the Foundation's reputation. The Foundation's Board of Directors is the deciding body for multi-year projects.

#### Outcome

598

projects supported since  
the inception of PSA Foundation

Since it was founded, the Foundation has donated €14.5 million to various public interest organisations. In 2018, donations totalling €1.9 million were paid to support 37 new projects in two areas in one:

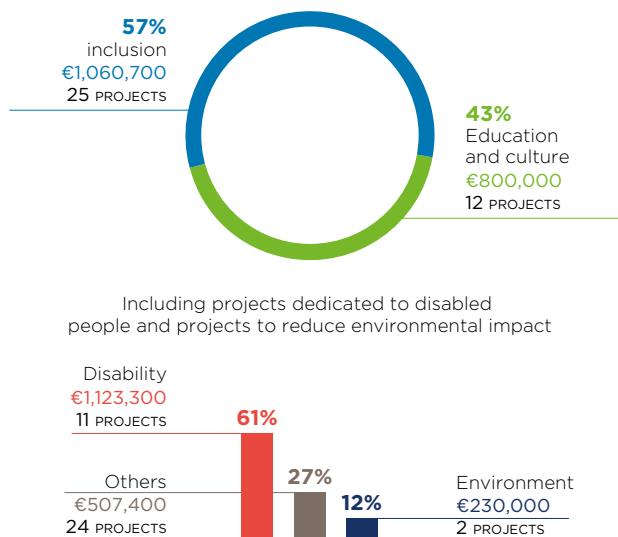
- "mobility and integration": these initiatives help people join the workforce or help highly disadvantaged people, including people with disabilities;
- "mobility and educational and cultural action": these initiatives use mobility to promote equal opportunity (including for people with disabilities) and give at-risk youth a second chance.

€1.9 million

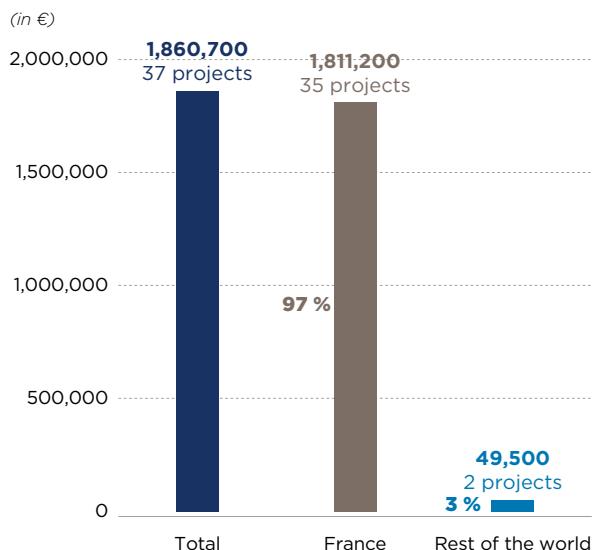
donated to various public interest  
organisations in 2018

## Distribution of budgets allocated in 2018 by the Foundation

DISTRIBUTION OF BUDGETS ALLOCATED IN 2018 BY THE FOUNDATION BY CATEGORY



DISTRIBUTION OF BUDGETS ALLOCATED IN 2018 BY THE FOUNDATION BY REGION



## The "Grand Prix" awards

Keen to promote volunteering among the Group's workforce, the Foundation grants three annual "Grand Prix" awards in support of mobility-related projects sponsored by employees. In addition to the grants awarded to selected projects by selection Committees, these projects receive an additional €10,000.

- the Mobility and Social Inclusion Grand Prix is awarded by the selection Committee to a sponsored association among the winners of the Inclusion call for projects;

- the Mobility and Education-Culture Grand Prix is awarded by the selection committee to a sponsored association among the winners of the Education and Culture call for projects;
- the Grand Prix of the Public is awarded to a sponsored association chosen by the public from a selected number of projects supported by PSA Foundation during the year. The project with the highest number of Internet votes wins.

## 7.2.2. Socially responsible mobility projects

DPEF.43

GRI.413-1

### 7.2.2.1. Mobility and Social Inclusion

The Foundation supports organisations that are active in rural communities or in outlying urban areas who work closely with social agencies and local authorities to implement socially responsible mobility solutions in aid of people referred by social services. The goal is to remove the mobility obstacles for the unemployed to receive training or find a new job. The mobility service experience the Group has gained with partner associations allows it to identify new players, new needs of BoP customers and, more generally, new car usage models (other than ownership) to test the effectiveness of new business models for mobility services, one of the key pillars of the "Push to Pass" strategic plan.

In 2018, the Foundation helped over 25 social garages active in the area of socially responsible mobility.

The Foundation's action is fourfold:

- Workplace integration: financial and operational support for solidarity garages**

The Foundation supports these community garages aimed at welfare recipients. They allow people to have vehicles repaired, rent or buy them at a low cost. These garages also hire the unemployed to help them return to the workforce. Since its inception, the Foundation has supported the financial

investment of over 61 solidarity garages in France, 11 of which in 2018, with projects to create new garages or develop existing ones.

- Assistance for people integrating into the workforce through the provision of tailored mobility solutions: support for mobility platforms**

These platforms offer a range of different mobility services for specific communities: mobility evaluation and advice; rental of vehicles at a special rate; transport on demand; access to driving licences; etc.

PSA Foundation helps structure their networks. For example, it provided the Mob'In network in the French Grand Est region with financial support to purchase 12 vehicles.

Adopting a comprehensive local approach, the Foundation supports:

- inclusive driving schools:** for the long-term unemployed, welfare recipients and struggling youth. With the help of targeted instruction methods, they are a powerful tool for social and professional integration;
- solidarity car leasing:** being able to hire a car at a lower cost can help a person find a job or become qualified for one;

- **transport on demand:** on-demand transportation services strengthen social ties and make getting about easier for low-income people and/or those isolated in rural communities or outlying urban areas with poor public transportation.
- **“Reverse mobility” for the vulnerable: support for the “Red Cross on wheels” programme**

The programme, launched with the French Red Cross in 2012, is based on a social assistance road show which reaches out to the most disadvantaged and vulnerable people. Equipped with a specially-adapted commercial vehicle, the service offers advice and help to fight against instability which leads to lack of food, clothes and toiletries. On the back of an impact study run by the Red Cross in 2015, the programme was rolled out and expanded: with 46 mobile units travelling the length and breadth of France by the end of 2018. PSA Foundation funded 21 of these, including three social transport services.

- **Mobility at the heart of a global initiative to end hardship: a joint project with Emmaüs**

Working with Emmaüs and capitalising on its extensive community since 2017, the Foundation has initiated an innovative approach to tackle the instability linked to a lack of mobility. The programme creates a network of mobility contributors and beneficiaries and develops strong local ties with all stakeholders in French rural areas. This three-year innovative, self-sufficient and unique experiment will present its findings in 2021 and will help Emmaüs to enlarge its approach to inclusive mobility.

 PSA Foundation's website, "Mobility and Social Inclusion" webpage: <https://www.fondation-psa.com/en/inclusion>

### 7.2.2.2. Mobility and Education-Culture

PSA Foundation focuses its education and cultural philanthropic initiatives on three areas: road safety education, sustainable and inclusive mobility education and touring “off-site” culture. In terms of the latter, for example, one of the key initiatives in 2018 was its continued support of the Louvre museum’s *Petite Galerie* project. This partnership improves access to culture for all: the *Petite Galerie* project is a multidisciplinary space open in particular to school groups and summer camps in the *Île-de-France* region. A travelling exhibition stemming from the *Petite Galerie* project completes this programme and regularly puts its first steps out on PSA industrial sites where it meets workers who are guided around by a dedicated guide on several meetings (Saint-Ouen in 2016, Poissy in 2017 and 2018). Then the touring exhibitions are displayed in secondary schools, universities, shopping centres, etc., giving a wide range of audiences an opportunity to hear explanations by the “guide” travelling with the exhibition.

 PSA Foundation's website, "Mobility and Education-Culture" webpage: <https://www.fondation-psa.com/en/education-culture>

### 7.2.2.3. Disability and environment as a focus for inclusive mobility

In 2018, the Foundation supported 11 initiatives in France and abroad that offered mobility solutions to people with physical and mental disabilities, so that mobility is no longer an obstacle but a springboard to greater independence and improved quality of life.

In 2018, *France Nature Environment (FNE)* and PSA Foundation have been working together on shaping the future of sustainable mobility. They published a practical document for teachers and educators, which was the result of two years' work, in order to promote sustainable mobility with educational and awareness-raising actions aimed at young people. This educational guide to sustainable mobility approved by the French Ministry of Education aims at supporting education institutions to raise awareness of sustainability issues.

## 7.3. LOCAL PHILANTHROPIC INVESTMENT

DPEF.31

DPEF.33

GRI.103-2

GRI.103-3

GRI.203-1

GRI.203-2

GRI.413-1

### The “L'Aventure PEUGEOT CITROËN DS” association

As a core industrial player in France for many years, the Group supports the three French automotive brands’ history through the “L'Aventure PEUGEOT CITROËN DS” project. In addition to two heritage entities: the Automobile Adventure Collection in Poissy (CAAPY) and the Peugeot Industrial Heritage Endowment Fund.

Created in 2015, this association aims to preserve, share, develop and promote the industrial heritage of these brands in France and around the world. It is a must for those who are interested in 200 years of automotive history.

 “L'Aventure PEUGEOT CITROËN DS” website: <https://www.laventurepeugeotcitroends.fr/en/join-aventure/>

## 7.4. INFORMATION AND RESPECT FOR CUSTOMERS

### 7.4.1. Consumer protection

#### 7.4.1.1. Protection of personal data

GRI.103-2    GRI.103-3    GRI.418-1  
GRI.419-1

**For Groupe PSA, the protection of personal data is a strategic issue for customers satisfaction because it is an important factor of confidence and loyalty. It requires the Group to have in-depth knowledge of customers' needs while guaranteeing that the freedom and fundamental rights of individuals are respected at the same time.**

Rapid technological developments and globalisation have brought new challenges for the protection of personal data. Personal data are part of a natural person's life because they help facilitate their daily activities and because they are integral to their relationships with companies or administrations (contract, legal requirements, etc.). In addition, natural persons should have control of their own personal data.

For Groupe PSA, the collection and processing of personal data are essential to building, maintaining and personalising the link between customers and the organisation and enable us to offer customers the services and products they want. These processes must respect the principles of lawfulness, fairness and transparency to ensure that consumers trust how their data will be used in the context of the new European privacy regulation (General Data Protection Regulation – GDPR), which has been in force since 25 May 2018.

Beyond compliance with regulations, personal data processing is an issue of trust and competitiveness.

For many years, **Groupe PSA has been committed to an active process with the French Data Protection Commission (CNIL)**, leading to the publication of a "conformity package for connected vehicles" in October 2017, which explains how the new regulations apply to the vehicle and connected services.

The Group is also represented in local and European bodies such as CCFA (*Comité des Constructeurs Automobiles Français*), VDA (*Verband der Automobilindustrie*), ACEA (European Automobile Manufacturers' Association), in order to work with the European authorities to shape how the GDPR is applied to car manufacturers' activities.

Groupe PSA has appointed two Group Data Protection Officers (DPO): one for PCD and one for OV. On their respective perimeters within Groupe PSA, they are in charge of monitoring compliance with the rules of personal data protection; informing, advising and issuing recommendations; establishing the respective data protection culture; and cooperating with the respective responsible supervisory authorities (e.g. CNIL in France) on issues related to the processing of personal data. Two networks of in-house representatives back up the Group DPOs:

- for business divisions: the Internal Control and Risk Managers;
- for European National Sales Companies: the Privacy Champions (until the convergence of OV and PCD organisations in 2019, OV National Sales Companies keep their existing local DPO).

Managers of Groupe PSA ensure integration by design for the protection of personal data and compliance when processing the affected activities, even when working with external subcontractors or services. Each employee is involved in respecting the Group's data protection policy.

Groupe PSA published an internal Group data protection policy in March 2018. The main purpose of this policy is to ensure that Groupe PSA has set up the proper governance and control structures, methods and procedures, regarding the protection of personal data:

- by giving transparent information to customers:  
periodic update of all privacy statements; adjustment of vehicle's hand-over standards to include a description of data protection issues for connected services;
- by improving the efficiency of consent management:  
constantly checking of the privacy statements to detect non-compliant consent issues, design and implementation of a central tool for consent management;
- by helping consumers to exercise their rights regarding their personal data:  
call centre procedures implemented in time for May 2018 to supply answer to the right of access, the right to be forgotten etc.;
- by implementing "Privacy by Design/by Default" principles during projects:  
guidelines released in 2018; Groupe PSA predicts adaptation of methods in 2018-2019; strong information system security policy in force for several years;
- by ensuring the same level of data protection from our subcontractors:  
OV/PCD converged Data Processing Agreement templates created in 2018; adaptation of the purchasing process;
- by constantly raising awareness or training the managers and the employees:  
more than 18,000 PCD employees trained with the 30-minute awareness module in 2018; roll out of specific training courses dedicated to frontlines (e.g. vendors in the dealership);
- by monitoring and periodically auditing the organisation:  
yearly Internal Audit (first in April 2018); GDPR self-assessment launched in November 2018;
- by constantly improving the security of its data storage and networks:  
use of the latest cybersecurity techniques to protect against malicious intrusion;
- by monitoring potential security breaches and applying data breaches procedures:  
SOC (Security Operational Centre) monitoring information systems and networks, data breach procedure tested and validated;
- by maintaining close and confident relationships with Data Protection Authorities:  
a dedicated point of contact for the respective responsible supervisory authorities, in particular for the French CNIL and for the responsible German supervisory authority.

### Infringement of consumer privacy regulations

(GDPR and local data protection regulation, European scope: PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL)

In 2018, Groupe PSA was not convicted for infringement of the GDPR.

In addition, customers are asking many questions – either directly or through their local supervisory authority in their country – about the geolocation devices fitted in the vehicles. These questions reinforce the need to educate customers and provide them with simple and clear information.

#### 7.4.1.2. Protection of consumer credit customers

DPEF.36

The distribution of retail credits, which makes up about 70% of total credits distributed by BANQUE PSA FINANCE subsidiaries (70% of retail credits for consumers and companies and 30% of dealership credits), is subject to specific regulations that protect consumer rights. This is the case in the European Union specifically since adopting the Directive No 2008/48/EC on consumer credit, which has now been written into domestic law by the different Member States.

This directive, which has created new stricter obligations regarding advertising, pre-contractual information, creditworthiness of borrowers, and contractual information, has been implemented by BANQUE PSA FINANCE and the joint ventures and/or subsidiaries or branches affected.

In 2015, BANQUE PSA FINANCE FRANCE introduced a system to identify its private customers who were experiencing financial problems, by applying the Charter for banking inclusion and the prevention of excess debt adopted by the French Association of Investment Firms and Credit Institutions (*Association Française des Établissements de Crédit et des Entreprises d'Investissement - AFECEI*). The system, which was introduced in after-sales and debt recovery, sets out a series of predefined criteria to tenable vulnerable customers to be detected early, which allows BANQUE PSA FINANCE to support them and help them find solutions that will not further aggravate their financial situation. Employees working with the system have received the appropriate training.

More generally, in the interests of quality and improving its customer processes, BANQUE PSA FINANCE FRANCE has implemented a system for handling customer complaints designed to ensure that the processing of complaints is in line with quality assurance guidelines (commitment on response times, requirement for a written response, etc.). This system is based on a framework instruction which requires all local subsidiaries or branches of BANQUE PSA FINANCE to appoint a Head of Complaints to deal with complaints received in accordance with the instruction; monitor the types and volume of complaints; analyse this data; and, where this indicates poor practice, take appropriate corrective measures.

Furthermore, BANQUE PSA FINANCE FRANCE joined a mediation system set up by the ASF and cites contact details for the appointed ombudsman in all its credit agreements alongside those for its own Consumer Department, which is responsible for handling complaints. If a specific customer's claim receives a negative response from the Consumer Department, their details are passed on to the ombudsman.

BANQUE PSA FINANCE FRANCE also signed up to the "Agreement on the amicable recovery of consumer credit" between the ASF and various consumer representative bodies. The Agreement seeks to assure customers that a number of best practice rules will be followed (progressive stages in the recovery process, respect for confidentiality and privacy, transparency in the relationship with the customer). In this way it seeks to promote the amicable settlement of unpaid debts.

BANQUE PSA FINANCE FRANCE takes part in ASF working groups on the protection of consumers (borrowers) and the prevention against over-indebtedness.

As the Internet has become a vital tool in the handling of customer relations, BANQUE PSA FINANCE now queries its customers online to further increase their satisfaction and improve the effectiveness of its customer service teams. For the past two years, unsatisfied customers have been contacted to give them better service wherever possible.

### 7.4.2. Responsible communication and marketing

DPEF.36

GRI.103-2

GRI.103-3

#### 7.4.2.0. Cutting-edge innovation to strengthen ties with customers

##### Partnership with NGOs results in a transparency approach not found elsewhere in the world

Groupe PSA has taken a unique approach to customer transparency by publishing its vehicles' real (on the road) fuel consumption. Measurements were taken in accordance with a test protocol outlined by the NGOs Transport & Environment (T&E) and France Nature Environnement (FNE) and audited by Bureau Veritas, an internationally renowned independent organisation (see 2.1.0.3. for more details).

##### CITROËN Co-Expérience: first steps towards an electric vehicle

CITROËN gives prospective customers the opportunity to test drive the electric vehicle of an existing customer before purchasing.

This 'CITROËN Co-Expérience' service is available for private electric cars in the CITROËN range: C-Zero and e-Berlingo Multispace. It helps to promote the brand's electric range on the premise that there is nobody better than an existing customer to talk about using an electric vehicle, give advice, and dispel any misconceptions about this mode of transport. This new CITROËN service is supported by the customer experience-sharing expertise of the startup Demooz, through a Business Lab experiment.



Demooz website:

- CITROËN C-Zero: <https://demooz.com/fr/produit/citroen-e-mehari>
- CITROËN E-Berlingo Multispace: <https://demooz.com/fr/produit/citroen-e-berlingo>

## PEUGEOT meets the sustainable urban mobility challenges with last kilometre transportation solutions

Travel the final few kilometres of a trip into the city, using the PEUGEOT eF01 electrically assisted folding bicycle. The ebike can be recharged in the boot of a moving car, at home or in your office. It has an autonomy of up to 30 kilometres at a speed of 20 km/h. Its hydraulic disc brakes ensure optimal control and safety in any conditions.

The French Institute of Design conferred the JANUS Industry Award to the PEUGEOT eF01 electric folding bicycle during a ceremony held on 17 December at the Quai d'Orsay in Paris. The jury was seduced by the "last kilometre" mobility concept of the bicycle, the simplicity and rapidity of its folding mechanism and its value for money.

PEUGEOT offers a full range of urban mobility products such as the new eLEGEND eLC01 compact urban ebike, the new eTO1 full suspension and hard tail Trekking ebikes that integrate the latest PowerTube battery technology directly into the bicycles frame.



"The PEUGEOT eF01 bicycle wins the JANUS Industry Award" 17/12/2018 press release: <https://int-media.PEUGEOT.com/en/PEUGEOT-ef01-bicycle-wins-janus-industry-award?idtok=4095ebbb407>

### 7.4.2.1. The Responsible Communications Charter

In 2008, marketing teams prepared a Responsible Communications Charter for all of Groupe PSA to ensure that its advertising

and marketing reflected corporate social and environmental responsibility concerns, such as respect for people, the environment and awareness of the economic issues involved in buying a car, etc.

Groupe PSA Responsible Communications Charter is posted on the Group's website. The charter applies to all communications materials produced by the Group, the brands, regional offices and dealer networks, including TV, online and print advertising, events and POS displays and collaterals, regardless of target audience, media or country. Available in French, English, Spanish and Chinese, it is distributed to Group and brand teams involved in communications, marketing, legal affairs, procurement and other processes, as well as their vendors.

Moreover, Groupe PSA signed the Responsible Communication Charter issued by the UDA (the professional association representing French advertisers) in 2008 and confirmed its commitment by signing the new version of this charter renamed *Programme FAIRe*, at the end of 2017. On this occasion, PEUGEOT, CITROËN, DS AUTOMOBILES and OPEL France each created a two-man team consisting of the Brand Director and a Senior Operating Officer (the brand's CSR representative) to handle and roll out the initiative.

This charter is built around five commitments, which inform all of the initiatives deployed by the brands. Each commitment involves several actions which fall into two categories:

- unavoidable actions: which the advertiser commits to having in place two years after signing the charter;
- additional actions: to take the commitment further.

## 1 - THE ADVERTISER SIGNING UP TO THE CHARTER ENSURES THE MESSAGES DIFFUSED ARE CLEAR AND FAITHFUL AND IS ATTENTIVE TO THEIR IMPACT ON SOCIETY

<b>Unavoidable action</b>	<b>No. 1</b> <b>It must disseminate a guide to persons responsible for communicating with the public (employees, agencies) which sets out the rules of responsible communication and provides useful resources for creating responsible messages.</b>	<ul style="list-style-type: none"> <li>The Groupe PSA Responsible Communications Charter, first published in 2008, aims to apply the Group's corporate social and environmental responsibilities to all forms of communication to the public. It is circulated to all Groupe PSA employees to ensure that it is adhered to in all international communications. It permits the sharing of best practices in communications, particularly in advertising. Since 2016, the Groupe PSA Responsible Communications Charter has been systematically appended to the specifications for all new calls for tender for the purchase of "advertising and brand communication" materials and products. As such, the charter is part of the document which sets out the contractual relationship with the selected branches. The Purchasing Department was involved in this process.</li> <li>On 1 August 2017, OPEL and VAUXHALL published one internal guideline (named "Guideline 700") which governs how to deal with the public and the media.</li> <li>At the end of 2017, CITROËN, PEUGEOT, DS AUTOMOBILES and OPEL France signed the new UDA Charter <i>Programme FAIRe</i> for responsible communication and shared <i>Programme FAIRe</i> with their respective marketing and brand communication teams, and with their main advertising/communications agencies.</li> <li>In 2018, CITROËN, DS AUTOMOBILES and PEUGEOT shared <i>Programme FAIRe</i> with their respective marketing and brand communication teams, and with their main advertising/communications agencies. OPEL France shared the new UDA charter with the OPEL corporate team in charge of advertising and branded contents.</li> <li>In addition, the Groupe PSA Legal Department provides regular training on advertising regulations to all the automotive Brands employees involved in the production and/or distribution of video or photo content.</li> </ul>
<b>Unavoidable action</b>	<b>No. 2</b> <b>It must put in place and roll out, to persons responsible for communicating with the public, a communications approval circuit incorporating the rules of responsible communication.</b>	<ul style="list-style-type: none"> <li>Press releases are validated according to the internal memorandum: "Operating procedures for external communications/press relations" This validation process for external communications was expanded to include online communications. This offers traceability for the press relations material production process and ensures the information communicated to media targets is coherent and relevant.</li> <li>Since 2004, the advertising validation procedures have been regularly strengthened to meet compliance and responsible marketing guidelines, such as in 2008 with the worldwide deployment of Groupe PSA Responsible Communications Charter. PEUGEOT, CITROËN, DS AUTOMOBILES, OPEL and VAUXHALL review all advertising campaigns to ensure they meet the rules laid down in the charter, a reference document and a list of standard clauses that the Legal Department regularly provides to help the teams preparing current advertising campaigns. The assistance of the Legal Department must be sought for adverts defined as sensitive or "new communication". In addition, each advertising/communications agency working on adverts for television channels sends the TV scripts to France's professional advertising regulation agency, the ARPP, or its equivalent in other countries for their opinion prior to production. They thereby avoid the financial and legal risks of litigation in relation to their media and non-media communications.</li> </ul>
<b>Unavoidable action</b>	<b>No. 3</b> <b>It must analyse its communication in order to identify any recurrent stereotypes, disparaging or otherwise, and take account of the results when creating subsequent campaigns.</b>	<ul style="list-style-type: none"> <li>PEUGEOT, CITROËN, DS AUTOMOBILES and OPEL France have been working with other advertisers to build an analysis grid to avoid any recurrent stereotype. The UDA grid for avoiding stereotypes was officially presented to French brand content teams and some agencies on 01 February 2019, given that all the brands already make every effort to avoid stereotypes.</li> </ul>

<b>Additional action</b>	<b>No. 1</b> <i>The advertiser signing up to the charter informs its consumers, customers and employees of the environmental and social impacts of its products/services and the action taken to limit them, and encourages responsible use of these products/services.</i>	<ul style="list-style-type: none"> <li>• In 2016, PEUGEOT, CITROËN and DS AUTOMOBILES introduced one communications policy which systematically highlights the environmental benefits of their models, including fuel consumption and CO<sub>2</sub> emission figures in real driving conditions. Groupe PSA has committed to being transparent (see 2.1.0.) with its customers – who can find these measurements on the PEUGEOT, CITROËN and DS AUTOMOBILES brand websites – to offer them easier access to better information. <ul style="list-style-type: none"> <li>• PEUGEOT: <a href="https://www.PEUGEOT.co.uk/consumption-calculator/">https://www.PEUGEOT.co.uk/consumption-calculator/</a></li> <li>• CITROËN: <a href="https://www.CITROËN.co.uk/about-CITROËN/technology/real-use-vehicle-consumption">https://www.CITROËN.co.uk/about-CITROËN/technology/real-use-vehicle-consumption</a></li> <li>• DS AUTOMOBILES: <a href="https://www.dsautomobiles.co.uk/inside-ds/consumption-based-on-usage#">https://www.dsautomobiles.co.uk/inside-ds/consumption-based-on-usage#</a></li> </ul> </li> <li>• These measures will extend to OPEL and VAUXHALL vehicles in 2019.</li> <li>• An across-the-board advertising campaign for the "Engine of the Year" prize, awarded to the Turbo PureTech 3-cylinder 110 and 130 for the fourth consecutive year in 2018, was made available in the different countries. The "Engine of the Year" logo has been incorporated into all advertising materials (for DS AUTOMOBILES, the logo appears on sales brochures only) and mentioned in press releases and commercial websites (for DS AUTOMOBILES, some countries used web banners with the logo).</li> <li>• The Échange Standard line, including the majority of mechanical parts, is offered to customers of the Group's network of approved repair centres, with the same manufacturer's warranty as new original parts. This solution, which involves recovering used parts and refurbishing them without generating waste, offers customers the opportunity to join in the Group's efforts to promote the circular economy.</li> <li>• The MyPEUGEOT, MyCITROËN and MyDS services allow customers to track the fuel consumption of their vehicles through personal accounts online. These apps can be downloaded free of charge on all smartphones. Through the apps, the brands can get to know their customers better and communicate transparently on the fuel consumption of their models.</li> <li>• PEUGEOT has joined forces with Mobicgreen, the eco-driving training institute, to offer businesses the PEUGEOT Green Connect training programme. Intended for businesses, this training programme allows them to adopt eco-driving techniques by way of an e-learning module offered on a dedicated website combined with on-road training in these techniques: <a href="https://peugeotretailbusiness.fr/eco-conduite-peugeot-green-connect/">https://peugeotretailbusiness.fr/eco-conduite-peugeot-green-connect/</a></li> <li>• CITROËN and DS AUTOMOBILES created a "sustainable mobility" section on their websites to offer their customers eco-driving tips and inform them about the Group's sustainable mobility strategy: <a href="http://www.citroen.co.uk/about-citroen/environment;">http://www.citroen.co.uk/about-citroen/environment;</a> <a href="https://www.dsautomobiles.co.uk/inside-ds/environment#">https://www.dsautomobiles.co.uk/inside-ds/environment#</a></li> <li>• The Free2Move Connect Fleet service – offered by PEUGEOT, CITROËN and DS AUTOMOBILES – enables companies to monitor fuel consumption and CO<sub>2</sub> emission trends using an online fleet management tool and gives fleet drivers access to the eco-driving module.</li> <li>• CITROËN offers its customers buying a new vehicle the opportunity to earn money when they are not using their vehicle, through a car-sharing solution introduced by TravelCar. Called "Earn&amp;Drive", this service offers free parking to customers when they offer their car up for use by others when they are not using it themselves. They also receive payment when it is rented out.</li> <li>• DS AUTOMOBILES has already started to communicate about its new electrified offering (during Formula E ePrix races, motor shows, reveal events, etc.) and strategic objectives (from 2025 all new DS models to be exclusively available in electrified versions). <p>In 2019, DS AUTOMOBILES will launch its first electrified models on the market: DS 7 Crossback E-Tense 4x4 (hybrid plug-in) and DS 3 Crossback E-Tense (full electric). Consequently, the DS advertising campaigns will emphasise the electrified offers and its signature 'E-Tense, Haute Couture Electric'.</p> </li> <li>• OPEL and VAUXHALL environmental and energy policy serves as a framework and orientation for employees and summarises the commitments to environmental protection, energy efficiency and sustainability.</li> </ul>
<b>Additional action</b>	<b>No. 2</b> <i>The advertiser signing up to the charter uses its means of communication to disseminate content which is useful to society, in relation to its activity (distribution of societal information, promotion of NGO initiatives, etc.).</i>	<ul style="list-style-type: none"> <li>• CITROËN Advisor, successfully AFNOR-certified since July 2015, is CITROËN's online review site where customers can give their opinion on the service they received at the point of sale (Advisor Dealer) or the product purchased (Advisor Product). At the end of 2018, CITROËN Advisor listed over 250,000 customer reviews with an average rating of 4.8/5 and had been rolled out in 38 countries. Since summer 2018, DS AUTOMOBILES implemented DS CUSTOMER REVIEW, its own e-reputation tool. The roll-out has already begun in Spain, Italy, Belgium, the UK, Germany, Argentina, Switzerland and Austria, and will continue in other countries in 2019.</li> <li>• In 2018, OPEL Nederland's advertising campaigns inspired women to pursue a career in a male-dominated workplace and break with taboos, thereby initiating and shaping the conversation about gender in the automotive industry.</li> </ul>

## 2 - THE ADVERTISER SIGNING UP TO THE CHARTER MUST LIMIT THE ENVIRONMENTAL AND SOCIAL IMPACT OF ITS COMMUNICATION MEDIA

<b>Unavoidable action</b>	<b>No. 1</b> <b>It must create a framework of environmental and social criteria to be applied to its printed documents, POS displays, stands and events.</b>	<ul style="list-style-type: none"> <li>• Groupe PSA uses PEFC or FSC paper for recurrent publications and prints only the number of copies required. In France, the Group is a member of Citeo. The corresponding Citeo contribution is given to local authorities to support their paper sorting and collection systems. All printers have Imprim'vert or Imprim'Lux certification which guarantees that they sort and recycle all their printing waste and inks.</li> <li>• Groupe PSA selects suppliers who: <ul style="list-style-type: none"> <li>• are committed to reducing the environmental impact of their stands (choice of materials used, recycling and reuse);</li> <li>• use wood which comes entirely from sustainably-managed forests and recycle 100% of the waste from the production/demolition of the stands (wood and other materials separately);</li> <li>• reuse at least 35% of the stand components for other stands (floors, partitions, mezzanines, lights, screens, furniture, etc.). By factoring in the 15% of brand components which are also reused, the total of components reused in other stands is 50%.</li> </ul> </li> <li>• PEUGEOT, CITROËN and DS AUTOMOBILES have also committed to gender equality. Their customer greeting teams at car shows are made up of equal numbers of men and women. The brands have employed both men and women on their stands since 2014.</li> </ul>
<b>Unavoidable action</b>	<b>No. 2</b> <b>It must make employees aware of the environmental impacts of digital communication technologies (emails, websites, etc.) in order to mitigate them.</b>	<ul style="list-style-type: none"> <li>• Email practices: <ul style="list-style-type: none"> <li>• Groupe PSA encourages the use of a document Management System (DocInfo Groupe), collaborative working platforms such as Microsoft Office 365 tools to avoid multiplication of emails with heavy attachments;</li> <li>• the Group bans systematic push email, replaced by an optional subscription to a newsletter.</li> </ul> </li> </ul>
<b>Additional action</b>	<b>No. 1</b> <b>The advertiser signing up to the charter creates a framework of environmental and social criteria to be applied to its websites on their creation/revision.</b>	<ul style="list-style-type: none"> <li>• Groupe PSA (corporate and brands) specifications stipulate that each new website or intranet site must have an eco-design. For example, the website's video content is hosted on platforms to avoid multiple downloads (use of YouTube streaming for public videos on the website, and the internal video platform for private videos on the intranet sites).</li> <li>• The Bessoncourt IT site which hosts the Group's servers is ISO 50001 certified (energy management certification).</li> </ul>
<b>Additional action</b>	<b>No. 2</b> <b>The advertiser will prioritise, whenever possible, collaborations with local companies (close to the event, production location, head office, etc.).</b>	<ul style="list-style-type: none"> <li>• For advertising video or photo shoots, CITROËN and PEUGEOT choose France and European destinations when possible. For instance in 2018, PEUGEOT partner advertising campaigns were shot in France; the new PEUGEOT 508 in Croatia; the new CITROËN Berlingo and Berlingo Van advertising campaigns were shot in France and Spain; and the "120 years" campaign by OPEL was shot in Baden-Baden (Germany), Rotterdam (the Netherlands), and Budapest (Hungary).</li> <li>• DS AUTOMOBILES focuses on advertising shoots in Paris and France.</li> <li>• Groupe PSA technical production teams are always hired in the country where the video or photo shoots take place.</li> </ul>
<b>Additional action</b>	<b>No. 3</b> <b>The advertiser signing up to the charter calls upon social integration enterprises or ESAT (organisation for workers with disabilities from the sheltered or adapted sectors) to create its materials or organise its events wherever possible.</b>	<ul style="list-style-type: none"> <li>• Since 2009, the PEUGEOT and CITROËN out-of-home advertising have been recycled into accessories such as bags and wallets by the Ateliers de Chennevières ESAT. These items are sold to Group employees in the Paris region at events jointly organised by the sites' Works Councils and ESAT and a special initiative is also run annually during disability week.</li> </ul>

**3 - THE ADVERTISER SIGNING UP TO THE CHARTER MUST AVOID EXCESSIVE DISSEMINATION OF ITS COMMUNICATIONS AND ENSURE CAREFULLY-CONSIDERED USE OF THE DATA COLLECTED**

<b>Unavoidable action</b>	<b>No. 1</b> <b>It must put in place a controlled communications dissemination policy to avoid too many, or inappropriate, requests being sent to recipients and must keep an eye on its dissemination domain of field.</b>	<ul style="list-style-type: none"> <li>In 2016, PEUGEOT, CITROËN and DS AUTOMOBILES completely revised their contact plan to make better use of customer data for targeted marketing campaigns which offer added value for the customer. Since 2017, contact plans have been deployed to all PCD brand subsidiaries, to encourage using customer databases in a more responsible way.</li> <li>This initiative gradually rolled out to the European subsidiaries allows the brands to run better-targeted marketing campaigns to customers who have chosen to receive this information.</li> </ul> <p>As part of the transition of OPEL into Groupe PSA, OPEL France will follow the same principles as those established for PEUGEOT, CITROËN and DS AUTOMOBILES brands.</p>
<b>Unavoidable action</b>	<b>No. 2</b> <b>It must choose advertising formats which are easy to use on digital media, in line with the reference guidelines available, and encourage its service providers and the media marketing the promotional offer to develop the use of these formats.</b>	<ul style="list-style-type: none"> <li>In 2018, CITROËN France, DS AUTOMOBILES France and PEUGEOT France applied the following reference guidelines: <ul style="list-style-type: none"> <li>coalition for better ads standards (avoiding the purchase of intrusive formats);</li> <li>Digital Ad Trust (respect for the wishes and comfort of the Internet user).</li> </ul> </li> <li>From 1 January 2019, CITROËN, DS AUTOMOBILES and PEUGEOT France will prioritise advertising on websites which are certified by Digital Ad Trust.</li> <li>For the international perimeter, Group M (media agency working with DS AUTOMOBILES) adheres to the Coalition for Better Ads Charter. It also works with IAS tracking which tracks ad frauds and viewability.</li> <li>For OPEL and VAUXHALL, Internet Advertising Bureau (IAB) advertising formats have standardised specifications for the embedding of online advertising media to guarantee a technically flawless process.</li> </ul>
<b>Unavoidable action</b>	<b>No. 3</b> <b>It must include in its contracts with communications service providers a clause pertaining to "combating the funding of illegal activities through online advertising".</b>	<ul style="list-style-type: none"> <li>The Groupe PSA responsible purchasing policy, updated in 2017 and signed by the Group's accredited suppliers, includes a clause requiring suppliers to comply with the laws and regulations in force in all countries in which they operate – (4.2.2.). This policy is used for all purchases made by Groupe PSA.</li> </ul>
<b>Unavoidable action</b>	<b>No. 4</b> <b>In addition to the Data Protection Act, it must make every effort to inform consumers, in a friendly and educational manner, about the collection and use of their personal data.</b>	<ul style="list-style-type: none"> <li>In 2018, all employees of Groupe PSA were invited to participate in training sessions, which explained the various aspects of the new privacy regulation and should enable them to be aware of personal data processing so that they can provide consumers with clear information and explanations about their personal data. In addition, Groupe PSA "Privacy by Design and Default" principles are available and applied.</li> <li>On CITROËN and PEUGEOT websites, the cookies consent pop-up is mandatory the first time you enter the website. For examples: <a href="https://www.citroen.co.uk/home">https://www.citroen.co.uk/home</a>, <a href="https://www.peugeot.co.uk/">https://www.peugeot.co.uk/</a></li> <li>DS AUTOMOBILES has been following the same approach since the end of 2018 and is gradually implementing it on DS websites in all countries.</li> <li>The topic is also covered in the FAQs: <a href="https://citroen-fr-fr.custhelp.com/app/answers/list/p/5">https://citroen-fr-fr.custhelp.com/app/answers/list/p/5</a> <a href="http://dsautomobiles-fr-fr.custhelp.com/app/answers/list">http://dsautomobiles-fr-fr.custhelp.com/app/answers/list</a></li> </ul>
<b>Additional action</b>	<b>No. 1</b> <b>The advertiser signing up to the charter provides assistance for employees in the use of social media and personal data.</b>	<ul style="list-style-type: none"> <li>PEUGEOT, CITROËN and DS AUTOMOBILES employees have access to guidelines when posting on social media. These guidelines are automatically emailed to all new starters and are available on the Group's intranet. They were updated in 2017 and are accompanied by an awareness film on the intranet, which is available on YouTube: <a href="https://youtu.be/90ygrblLQSG">https://youtu.be/90ygrblLQSG</a></li> <li>To optimise the integration of digital culture, the Group supports employees by giving them a shared body of knowledge on the uses and trends of digital via the "digital passport" programme. (see 3.3.2.), and an e-learning training module on personal data has been made available to all employees.</li> <li>In 2017, Groupe PSA appointed two Data Protection Officers who are in charge of networks of representatives (by division, country, etc.) who structure the awareness and training initiatives.</li> <li>In 2018, OPEL and VAUXHALL conducted a self-assessment which provided the GDPR compliance team and the Group DPOs with a good overview of the current requirements for compliance with GDPR and the priorities identified to enhance compliance and build action plans accordingly.</li> </ul>
<b>Additional action</b>	<b>No. 2</b> <b>The advertiser signing up to the charter sets up a new marketing and communications technology watch in order to anticipate behaviours and find the middle ground between commercial policy and respect for privacy.</b>	<ul style="list-style-type: none"> <li>In 2015, "Privacy by Design" compliant processing recommendations were incorporated into the specifications (information systems creation/upgrade) for every new project by the automotive brands, legal notices were integrated into the online forms in France, and work was undertaken with the export subsidiaries to take into consideration the national data protection requirements.</li> <li>The PEUGEOT, CITROËN and DS Automobiles brands' marketing databases were revamped in 2015/2016 and customers' personal data processing rights are now automatically observed. This work keeps up as part of the CustomerShare and CustomerFirst initiatives and the Group's programme for bringing its information systems in line with regulatory developments in personal data regulations aimed to roll out the necessary procedures (implementation of the European initiative) since early 2018.</li> <li>As a result, "Privacy by Design and Default" became integrated into the Groupe PSA standard project management process to ensure that all new initiatives will be carried out in compliance with the current regulations.</li> </ul>

## 4 - THE ADVERTISER SIGNING UP TO THE CHARTER MUST OFFER ALL ITS AUDIENCES EASY ACCESS TO ITS COMMUNICATIONS

<b>Unavoidable action</b>	<b>No. 1</b>	<b>It must subtitle its main advertising campaigns.</b>	<ul style="list-style-type: none"> <li>Groupe PSA automotive brands do not currently comply with this mandatory action but, via the UDA FAIRe initiative, they commit to having all the necessary actions in place by 2020. At this time, only digital advertising campaigns are subtitled.</li> </ul>
<b>Unavoidable action</b>	<b>No. 2</b>	<b>It must make every possible effort to ensure people with no Internet connection can access its offers.</b>	<ul style="list-style-type: none"> <li>All of the Groupe PSA automotive brands offers are available at the point of sale through brochures, catalogues and POS displays, as well as via the sales and after-sales teams.</li> </ul>
<b>Unavoidable action</b>	<b>No. 3</b>	<b>It must mention the communication-related issues in its exchanges with its external stakeholders.</b>	<ul style="list-style-type: none"> <li>PEUGEOT, CITROËN, DS AUTOMOBILES and OPEL France are members of the UDA (French advertisers' union) and have signed up to the "FAIRe" programme. This ensures regular discussions on legal developments and external stakeholders' expectations in terms of responsible communications and marketing.</li> <li>CITROËN has also developed innovative customer experience communications with its "CITROËN CAMPUS" – an open debate between CITROËN and a leading brand (all sectors and sizes) about a brand experience issue.</li> <li>In 2018, OPEL France organised several meetings with its marketing partners regarding innovation and customer experience (TF1, Amazon, Facebook, LinkedIn, Google, Altice, etc.).</li> </ul>
<b>Additional action</b>	<b>No. 1</b>	<b>When the advertiser signing up to the charter revamps its media, it ensures that the content can be accessed by people with disabilities (the visually impaired, blind and hard of hearing).</b>	<ul style="list-style-type: none"> <li>The CITROËN websites apply the Web Content Accessibility Guidelines, depending on the countries.</li> <li>To provide the visually-impaired with access to our financial information, the Finance Department has introduced a freephone number (0800 424 091) that features a special shareholders' relations service which offers all information on Groupe PSA results in audio format.</li> <li>CITROËN took the initiative to make its dealerships accessible to people who are hard of hearing, providing customers with a free-of-charge service via <a href="http://www.citroen.fr">www.citroen.fr</a> since March 2015 to contact CITROËN using the Acceo solution, which is available on all devices (computer, smartphone and tablet): <a href="http://www.acce-o.fr/client/citroen">www.acce-o.fr/client/citroen</a>.</li> <li>DS AUTOMOBILES commissioned W3C to conduct an audit for the launch of its website and took on board its recommendations in order to make its website more accessible.</li> </ul>
<b>Additional action</b>	<b>No. 2</b>	<b>The advertiser signing up to the charter ensures that its events can be accessed by people with disabilities (impaired mobility, blind, hard of hearing, etc.).</b>	<ul style="list-style-type: none"> <li>At the stands for Groupe PSA automotive brands at motor shows, all public areas are accessible to people with reduced mobility. They all use a supplier to check fire risks, panic risks, and disabled access.</li> </ul>
<b>Additional action</b>	<b>No. 3</b>	<b>The advertiser signing up to the charter, when promoting the responsible aspect of its offer, offers easy access to further information and details to all consumers/clients who wish to see this information.</b>	<ul style="list-style-type: none"> <li>Groupe PSA shares information about its CSR strategy on its corporate website with a dedicated section that allows the public to access key figures about CSR at Groupe PSA and reference documents such as the Group's CSR Report, the responsible purchasing policy, or the Code of Ethics: <a href="https://www.groupe-psa.com/en/automotive-group/responsibility/">https://www.groupe-psa.com/en/automotive-group/responsibility/</a></li> <li>OPEL and VAUXHALL also shares information about their environmental and energy policy on their corporate website: <a href="https://int-media.opel.com/en/taxonomy/term/5700">https://int-media.opel.com/en/taxonomy/term/5700</a></li> <li>CITROËN gives prospective customers the opportunity to test drive private electric cars in the CITROËN range, such as the C-Zero and e-Berlingo Multispace, before purchasing through the service 'CITROËN Co-Expérience'. This CITROËN service is supported by the customer experience-sharing expertise of the startup Demooz (<a href="https://demooz.com/fr/categories/voitures">https://demooz.com/fr/categories/voitures</a>).</li> </ul>

## 5 - THE ADVERTISER SIGNING UP TO THE CHARTER MAINTAINS A FAIR AND RESPONSIBLE RELATIONSHIP WITH ITS PARTNERS

<b>Unavoidable action</b>	<b>No. 1</b> <b>It must include environmental and social criteria in the selection of its communications providers.</b>	<ul style="list-style-type: none"> <li>Groupe PSA responsible purchasing policy, updated in 2017 and signed by the Group's accredited suppliers, includes social (compliance with the ILO conventions) and environmental criteria (see 4.2.2.2.), and excludes suspicious communications providers via blacklisting.</li> </ul>
<b>Unavoidable action</b>	<b>No. 2</b> <b>It must ensure that its calls for tender with agencies are transparent, fair and responsible.</b>	<ul style="list-style-type: none"> <li>The Groupe PSA Code of Ethics, which can be accessed by all Group employees, includes a transparency, integrity and loyalty rule for relationships with suppliers and service providers.</li> <li>More specifically, all Group employees must refrain from any anti-competitive practices: restrictive trade practices, abuse of dominant position, abuse of economic dependence, etc.</li> </ul>
<b>Unavoidable action</b>	<b>No. 3</b> <b>It must ensure a balance in its day-to-day dealings with its partners and hold regular discussions on the progress of the partnership to ensure that corrective measures are taken, where necessary.</b>	<ul style="list-style-type: none"> <li>In 2018, Groupe PSA and MediaCom jointly developed an initiative to accurately assess their working relationship on a bi-annual basis by creating "The Relationship Panel", available in the 21 countries where MediaCom and the Group are working together, to raise the working standard in a consistent and unified way.</li> <li>DS AUTOMOBILES requires the different countries to conduct regular assessments of its advertising agency (LA MAISON) to measure their satisfaction and implement action plans to improve relations, where necessary. The 2019 assessment will be reciprocal and LA MAISON will also assess its DS AUTOMOBILES partners in the countries where it operates.</li> <li>Since 2015, DS AUTOMOBILES and the events agency AUDITOIRE have conducted mutual project management assessments as well.</li> <li>OPEL and VAUXHALL concludes agency contracts with clear KPIs (media as well as creative agency contracts) and regularly reviews the contract contents.</li> </ul>
<b>Additional action</b>	<b>No. 1</b> <b>The advertiser signing up to the charter creates a Code of Conduct for its commercial practices (gifts, etc.)</b>	<ul style="list-style-type: none"> <li>Groupe PSA created a practical guide on anti-corruption measures which was promoted in an in-house communication campaign. It specifies the Group's overall position (zero tolerance) on corruption. It describes precisely the rules concerning gifts and invitations, conflicts of interest, facilitation payments, relations with agents, intermediaries and consulting companies, etc., and provides contacts and examples of warning signals to raise suspicion. (see 6.1.2.).</li> <li>In 2018, e-learning training sessions were given to all managers and other employees exposed to Groupe PSA corruption risks in order to prevent corruption occurring.</li> </ul>
<b>Additional action</b>	<b>No. 2</b> <b>The advertiser signing up to the charter implements processes to ensure sub-contractors comply with ILO rules, specifically when production takes place abroad, (e.g. promotional gifts).</b>	<ul style="list-style-type: none"> <li>Groupe PSA conducts annual assessments of its suppliers via third parties and audits them to ensure that they are adhering to ILO rules (see 4.2.2.2.).</li> </ul>

### 7.4.2.2. Compliance with advertising and marketing, labelling and consumer information regulations

GRI.417-1

GRI.417-2

GRI.417-3

#### Labelling and information provided to customers

To improve car buyer information, PEUGEOT and CITROËN provided their dealers with fuel-efficiency labels in January 2006, ahead of the regulatory deadline. The labels display each model's average fuel consumption and CO<sub>2</sub> emissions. Eco-labels to identify the most environmentally friendly cars were introduced by both brands in 2007 and revised in October 2010.

By the time the new WLTP standard was implemented on 1 September 2018, 100% of Groupe PSA passenger cars were certified under this new standard. All corresponding information is available for customers (see 2.2.).

#### Infringements of regulations on advertising, marketing, labelling and consumer information

In 2018, CITROËN was ordered to pay an administrative fine of €3,600 in Galicia (Spain) for having mentioned on the CITROËN website that the information available on the site was general and had no contractual value.

## 7.5. REPORTING SCOPE AND METHODOLOGY

GRI.102-48

GRI.102-49

The data reported concern the production plants, research and development centres, the main office sites, the PEUGEOT, CITROËN, DS AUTOMOBILES and OPEL and VAUXHALL dealerships gathered into PSA Retail network and the activities of BANQUE PSA FINANCE (BPF).

Due to the lack of exclusive control, the scope of reporting does not include subsidiaries jointly owned with other car manufacturers or joint ventures accounted for by the equity method. In these joint ventures, Groupe PSA exercises its role as shareholder and industrial partner with a view to long-term development.



# 8.

## APPENDICES

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## 8.1. CSR REFERENCE GUIDES FOLLOWED BY GROUPE PSA AND EXTERNAL COMMITMENTS

### Charters, principles and other initiatives

In implementing its sustainable development approach, the Group refers to a structured set of international or industry reference guides and benchmarks, including:

#### External standards GRI.102-12

- When it comes to regulations related to CSR reporting, Groupe PSA proactively enforces French laws ahead of schedule (see section 8.4.2. for more details).
- ISO 14001 for the environment: The certification of all Groupe PSA manufacturing sites began in 1999 and was completed in 2014 with the certification of the Kaluga site.
- Societal responsibility: ISO 26000 (non-certifiable). The Group ensures that its sustainable development policy incorporates the guidelines in the standard.
- Sustainable Development Reporting: Global Reporting Initiative guidelines have been used to prepare the Group's CSR Report covering, the actions of all subsidiaries. In 2017, the reference to the transportation sector indicators of the US-based SASB (Sustainability Accounting Standards Board) standard was added.
- Integrated thinking: This Report is informed by the reference framework published by the International Integrated Reporting Council (IIRC). This Report follows an integrated approach, putting it into the perspective of our vision and strategy, linking material information and providing an outlook to the future.
- Global Compact which the Group joined in 2003: In 2009, the Group joined Caring for Climate, a voluntary and complementary action platform for United Nations Global Compact participants who seek to demonstrate leadership on the issue of climate change; since 2015, the Group has been among the companies that are classed as Advanced on these issues.
- Sustainable Development Goals (SDGs): The Group supports the 17 global SDGs published by the UN in September 2015 at the Sustainable Development Summit to put an end to poverty, combat inequality and injustice and face up to climate change by 2030. A cross-reference table of the Group's commitments and those of the UN can be found in section 8.5.4.
- Communication: The Charter of Responsible Communication Commitments for Advertisers issued by the professional association representing French advertisers (UDA) became the "Programme FAIRe" in 2017, which the Group signed, following on from the first publication of this document in 2008. (see 7.4.2.1. for more details).

#### Internal standards

The Group has developed its own benchmarks:

- social: the Group Global Framework Agreement on Social Responsibility signed with the International Metalworkers' Federation (IMF) and the European Metalworkers' Federation (EMF) in March 2006, renewed in 2010 and then 2017, at which point it was jointly drawn up with IndustriALL;
- ethics: Code of Ethics. The Group's new Code of Ethics, adopted in 2010, renews and expands on the Code of Ethics published in 2003;

- purchasing: the "Group's requirements regarding social and environmental responsibility with respect to its suppliers", published in 2006, was amended in 2017 to include new issues and was renamed the "Responsible Purchasing Policy";
- responsible marketing and advertising: the Group's Responsible Communications Charter was signed in 2008.

### Memberships of national and international associations and organisations

GRI.102-13

The Group is a member of several organisations promoting sustainable development in France: Comité 21, and the UDA.

It also takes part in the work carried out by the MEDEF, the AFEP, the CCFA and the ACEA for the deployment of CSR. For example, the Group is a member of MEDEF CSR Committee and takes part in the "ESG Performance" and "CSR Practices" working groups.

The Group became a member of the China Business Council for Sustainable Development (CBCSD) in March 2006.

The brands also work closely with various bodies who are advocates of CSR: they are signatories of the CNPA's Challenge for

the Environment (a French association of automotive professionals) since 2004, adherents to Recyvalor (whose aim is to collect and recycle abandoned stockpiles of tyres), and founding members of Citeo (formerly Ecofolio), the state-accredited non-profit organisation responsible for paper collection and recycling on behalf of municipalities throughout France.

On 21 May 2015, Groupe PSA signed the "Business Proposals for COP21", presented at the 2015 Paris Climate Conference. To further its commitment, the Group signed a French Business Climate Pledge, published on the occasion of the One Planet Summit in December 2017.

## 8.2. FORUMS FOR DIALOGUE WITH STAKEHOLDERS INTRODUCED BY GROUPE PSA

GRI.102-40

GRI.102-43

GRI.102-44

### PRESENTATION OF THE MAIN FORUMS FOR DIALOGUE BASED ON THREE LEVELS: INFORMATION, DIALOGUE AND PARTNERSHIP

STAKEHOLDER	MAIN TOPICS	INFORMATION - COMMUNICATION	DIALOGUE - CONSULTATION AND FREQUENCY OF EXCHANGES	AGREEMENTS - PARTNERSHIPS
<b>Employees</b>	Strategy, results, company news.	Daily internal communication processes (newsletters, websites, events, etc.). Annual awareness campaigns on sustainable development (sustainable development week, diversity, disability, eco-driving, driver safety, etc.).	<ul style="list-style-type: none"> <li>Dialogue implemented on a daily basis by the management structure, platforms and discussions among employees within basic work units (UEs).</li> <li>Suggestion boxes.</li> <li>Periodic satisfaction surveys.</li> </ul>	Training.
<b>Employee and labour union representatives</b>	Strategy, results, company news. Workforce and skills planning. Occupational health and safety.	Literature related to employee relations.	<ul style="list-style-type: none"> <li>Dialogue with employee representatives in line with employee relations objectives and via various bodies, including:           <ul style="list-style-type: none"> <li>the European Works Council expanded to a Global Works Council (at least once a year);</li> <li>the Joint Union-Management Strategy Committee (at least once a year);</li> <li>informal sessions at sites.</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>The Group's Global Framework Agreement on Social Responsibility.</li> <li>Collective bargaining agreements and employee relations agreements with labour unions.</li> <li>New Social Contract in 2013.</li> <li>Agreement on the Jobs and Skills Matching System signed in 2014.</li> </ul>
<b>Customers and consumer organisations, road user organisations</b>	Quality of products and services, environmental performance of vehicles, road safety, sustainable mobility.	<ul style="list-style-type: none"> <li>Brand websites.</li> <li>Responsible Communication Charter.</li> <li>Information on road safety features when a vehicle is delivered.</li> </ul>	<ul style="list-style-type: none"> <li>Dealership network and their Customer Relations Departments over the course of the year.</li> <li>Consultation with consumer panels over the course of the year.</li> <li>Customer relations teams on a daily basis.</li> <li>Group blogs and social media presence.</li> <li>CITROËN Advisor customer forum.</li> </ul>	Sales or repair contracts.
<b>Dealership networks</b>	<ul style="list-style-type: none"> <li>Financial and strategic performance.</li> <li>Quality of products and services and customer satisfaction.</li> <li>Environmental performance of vehicles and manufacturing facilities.</li> <li>Sustainable mobility.</li> </ul>	<ul style="list-style-type: none"> <li>Literature accessible to everyone.</li> <li>Training of sales and marketing employees.</li> </ul>	<ul style="list-style-type: none"> <li>Analysis of periodic customer satisfaction surveys.</li> <li>Monitoring of financial performance and prospects.</li> </ul>	<ul style="list-style-type: none"> <li>Analysis of all types of risk (including ethical) before a dealership contract is signed.</li> <li>Distribution and/or repair service contract including clauses related to sustainable development.</li> </ul>
<b>Shareholders and other investors</b>	Financial performance and CSR, impact on results and prospects.	<ul style="list-style-type: none"> <li>Letter to shareholders.</li> <li>CSR Report and Registration Document published annually.</li> <li>Corporate website.</li> <li>Annual and interim financial results.</li> </ul>	<ul style="list-style-type: none"> <li>Consultation Committee.</li> <li>Shareholders' Meeting.</li> <li>Investor meetings.</li> <li>Conferences presenting the Group's strategy to financial analysts (roadshows).</li> </ul>	
<b>Financial and SRI rating agencies CSR experts and dedicated entities</b>	Financial performance and CSR, impact on results and prospects.	Annual publication of the CSR Report.	<ul style="list-style-type: none"> <li>Responses to recurring questionnaires and one-off requests.</li> <li>Discussion sessions.</li> </ul>	

## APPENDICES

Forums for dialogue with stakeholders introduced by Groupe PSA

STAKEHOLDER	MAIN TOPICS	INFORMATION - COMMUNICATION	DIALOGUE - CONSULTATION AND FREQUENCY OF EXCHANGES	AGREEMENTS - PARTNERSHIPS
<b>Suppliers</b>	CSR performance in supply chain, innovation, financial performance and measures to support the Group's strategy.	<ul style="list-style-type: none"> <li>Monthly information meetings.</li> <li>Innovation days.</li> <li>Annual supplier awards.</li> </ul>	<ul style="list-style-type: none"> <li>Suppliers' Convention (attended by the Chairman and CEO of the 300 largest suppliers) and products/projects meeting.</li> <li>Presence of Groupe PSA delegates in regions, in France, in automotive industry bodies.</li> <li>Supplier relations teams.</li> <li>Self-assessment questionnaires.</li> </ul>	<ul style="list-style-type: none"> <li>Responsible purchasing policy.</li> <li>Sustainability clauses in sales contracts and terms and conditions of sale.</li> <li>Involvement in France's PFA, a platform set up to foster ongoing discussion and exchange among automotive industry stakeholders, and in the ARIAs (regional professional associations for the automotive industry).</li> </ul>
<b>Partners in cooperation projects and joint ventures</b>	Group projects for products and industrial initiatives.			Joint development and production of vehicle components and bases, notably for electric vehicles, hybrid components and Euro 6-compliant engines.
<b>Industry institutions and professional associations</b>	Existing or upcoming regulations relating to the Group's business activities.		<ul style="list-style-type: none"> <li>Regular contacts with European and international institutions, as well as with French authorities.</li> <li>Local contacts with consulates.</li> <li>Member of French and European trade associations (such as CCFA in France and ACEA and EUCAR in Europe).</li> <li>Member of national trade associations in all host countries.</li> </ul>	
<b>NGOs and associations</b>	CSR topics such as sustainable mobility, the circular economy and road safety.	<ul style="list-style-type: none"> <li>Annual publication of the CSR Report.</li> <li>Group blogs and social media presence.</li> </ul>	<ul style="list-style-type: none"> <li>Responses to requests.</li> <li>Meetings with NGOs, frequent formal discussions, held directly or through institutions of which the Group is a member (EPE, C3D, etc.).</li> <li>Joint publications.</li> </ul>	Participation in the local community (infrastructure, support of local associations, etc.) Support from PSA Foundation for projects and charities.
<b>Host communities and site neighbours</b>	Economic and social development in host communities, environmental issues at sites.	Events on road safety, environmental issues, sustainable mobility and other topics.	<ul style="list-style-type: none"> <li>Discussions with local officials.</li> <li>Open days and site visits.</li> </ul>	Group commitment to local supplier integration and the development of clusters around its sites.
<b>Teaching and research</b>	CSR topics such as sustainable mobility, the circular economy and road safety and product innovation.	<ul style="list-style-type: none"> <li>Forum for France's leading business and engineering schools.</li> <li>Awareness campaigns with local schools, participation in industry week.</li> </ul>	<ul style="list-style-type: none"> <li>Intern and apprenticeship programmes, and laboratory space for doctoral candidates.</li> <li>Work on urban and inclusive mobility within the City on the Move Institute (IVM).</li> </ul>	<ul style="list-style-type: none"> <li>Agreements to create Open Labs and endowed chairs at universities, engineering schools and business schools in France and abroad.</li> <li>Partnerships with national educational systems in each host country.</li> <li>Visits, vehicle donations and educational events held by Group sites.</li> </ul>

## 8.3. CONCERNING THIS REPORT

Measured by operational indicators, the Group's sustainable development performance is the subject of annual reporting presented in this report, and it supplements Chapter 2 of the 2018 Registration Document.

### 8.3.1. Reporting period GRI.102-50

The information and indicators in this report concern the year 2018 and were closed at the end of the period on 31 December 2018 (except for any information or indicators listed in the methodological note in the relevant section).

The majority of the indicators are presented with the relevant history on the changes in the Group or the calculation method associated with each indicator. The history is generally for three years whenever possible and may periodically be more than three years when it corresponds to a reference year (for example, before a policy or action plan has been set up).

### 8.3.2. Reporting cycle GRI.102-52

The CSR Report is published annually.

### 8.3.3. Date of publication GRI.102-51

This CSR Report, covering financial year 2018, was published in April 2019.

The previous report, covering financial year 2017, was published in April 2018.

### 8.3.4. Content of the report GRI.102-46 GRI.102-49

The social, environmental and societal information contained in this report meet the requirements of:

- Article L. 225-102-1 of Order No. 2017-1180 of 19 July 2017, modified, and Articles R. 225-105 et seq. of the French Commercial Code as amended by Decree No. 2017-1265 of 9 August 2017 in application of the aforementioned Order, transposing Directive 2014/95/EU of the European Parliament and of the Council of 22 October 2014: the "DPEF" (*Déclaration de Performance Extra-Financière* (extra-financial performance declaration));
- the Global Reporting Initiative (GRI) and the Sustainability Accounting Standards Board (SASB).

They are based on the expectations of stakeholders and rating agencies. This report presents the Group's commitments, visions and achievements on all issues, whatever the degree of materiality.

### 8.3.5. Contact GRI.102-3 GRI.102-53

For more information, in particular on reporting procedures, you may write to Group PSA Sustainable Development Department, 7, rue Henri Sainte-Claire-Deville, 92500 Rueil-Malmaison, or contact the department by email: sustain.psa@mpsa.com.

## 8.4. REPORTING SCOPE AND METHODOLOGY

GRI.102-48

GRI.102-49

### 8.4.1. Reporting scope

GRI.102-10

GRI.102-45

This report is based on the economic, social and environmental performance of the fully consolidated companies of Groupe PSA.

#### Activities included in reporting

Detailed social, environmental and societal data as well as information on sustainable development initiatives cover:

##### Automotive Activities:

The “automotive” section covers the subsidiaries PSA Automobiles SA and OPEL Automobile GmbH (manufacturing facilities, R&D facilities and office sites) as well as commercial subsidiaries of the brands

PCMA Automotiv RUS, located in Kaluga, Russia, a joint venture with Mitsubishi Motors Corp, is also included in the societal and environmental components of the “automotive” reporting scope because the Group has a 70% stake in its shares;

##### Automotive Trade Activities:

These include the proprietary dealership network, training centres for network personnel, spare parts warehouses, regional offices and import subsidiary registered offices. The “automotive trade” companies are included under the “automotive” heading with respect to HR but are stated separately with respect to the environment.

In 2015, the Group acquired Mister Auto, an online website selling spare parts. The CSR impacts that are considered significant for Groupe PSA are gradually incorporated into the extra-financial reporting.

##### Note 1 - Automotive Division

The Automotive Division gathers Automotive Activities and Automotive Trade Activities.

##### Note 2 - PCD and OV

Two acronyms are used where required to differentiate scopes within the activities defined above:

- PCD for the historical scope of PEUGEOT, CITROËN and DS AUTOMOBILES brands
- OV for the scope of OPEL and VAUXHALL brands.

##### Other Activities:

These comprise the Peugeot S.A. holding company and the social and societal information of BANQUE PSA FINANCE (BPF). The information published for BPF consolidates entities wholly owned by BPF As at 31 December 2018. This methodology, brought into line with the BPF consolidation rules, does not include the joint ventures created with Santander and with BNP Paribas in the scope of the CSR reporting.

#### The exclusions from the CSR reporting versus the financial reporting

The scope of reporting does not include:

- the industrial and trade cooperations which are contractual relationships but have not resulted in joint ventures. A detailed list of these can be found in section 2.0.3.3.1.;
- joint ventures with other car manufacturers, accounted for by the equity method, due to the lack of exclusive control. These are also listed in section 2.0.3.3.1.:
  - TPCA (Toyota PEUGEOT CITROËN Automobile), in Kolín, a joint venture with Toyota,
  - DPCA (DONGFENG PEUGEOT CITROËN Automobile), in Wuhan, a joint venture with DONGFENG MOTOR CORP.,
  - CAPSA (CHANGAN PSA AUTOMOBILES), in Shenzhen, a joint venture with Changan Automobiles,
  - Sevelsud, in Val Di Sangro, a joint venture with Fiat,
  - Uzbekistan PEUGEOT CITROËN Automotive, in Jizzakh, a joint venture with SC Uzavtosanoat,
  - Dangote PEUGEOT Automobiles Nigeria Limited joint, in Kaduna (Nigeria) with Dangote Industries Limited and the Kaduna State Government,
  - PSA AVTEC Powertrain Pvt. Ltd, in Hosur (India), with AVTEC (CK Birla Group),
  - PCA Automobiles India Private Limited, in Delhi (India) with HMFCL (Hindustan Motor Finance Corporation Limited),

In these cooperations and joint ventures, the Group exercises its role as shareholder and industrial partner with a view to long-term development. The joint ventures and cooperations report their social and environmental performance at different levels, depending on the management structure in place with the industrial partner.

In 2007, at the Group's initiative and with the agreement of co-shareholder DONGFENG MOTOR CORP., DPCA published its first Sustainable Development Report – the first such report ever prepared by a car manufacturer in China;

- FAURECIA, a listed company in which Peugeot S.A. holds a 46.3% interest and which has, taking into account its business activity, complete managerial autonomy. The FAURECIA CSR reporting appears in its own publications, available via the links below;
- Environmental information of BANQUE PSA FINANCE, because the environmental impacts of BPF activities are not significant.



DPCA CSR Report (click on the first line in red – Chinese only): <http://www.dPCA.com.cn/dPCA/publish/report.html>

FAURECIA Registration Document: <http://www.FAURECIA.com/en/finance/amf-regulated-information>

A list of the Group's companies included in the financial reporting is published in section 5.6 of its Registration Document.

## 8.4.2. Reporting methodology GRI.102-46

The Group consolidates and publishes indicators according to three guiding principles: to be transparent, to be thorough and to provide high-quality information. In compliance with regulations, quantitative data were reported using cross-functional, comparable indicators when relevant. The calculation procedures, changes in scope, corrections made to the previous data or adjustments are specified in each section.

The social, environmental and societal information contained in this section meet the requirements of:

- Article L. 225-102-1 of Order No. 2017-1180 of 19 July 2017, modified, and Articles R. 225-105 et seq. of the French Commercial Code as amended by Decree No. 2017-1265 of 9 August 2017 in application of the aforementioned Order, transposing Directive 2014/95/EU of the European Parliament and of the Council of 22 October 2014: the "DPEF" (*Déclaration de Performance Extra-Financière*);
- the Global Reporting Initiative (GRI) and the Sustainability Accounting Standards Board (SASB). Cross-reference indexes with GRI and SASB indicators.

### Method used to update the materiality matrix

The Group identified its macro-risks and CSR issues when updating its materiality matrix. The new matrix (see section 1.2.2.), which prioritises the 23 CSR issues in 7 macro-risk categories, was validated by the members of the Executive Committee in September 2017.

To identify the CSR issues and macro-risks, the Group made use of the business expertise of its network of CSR contributors, representing all of its business activities. The result was confirmed by a review of issues reported by industry peers, an analysis of worldwide CSR reference frameworks (including the Global Reporting Initiative) and a review of information in the media,

before a representative sample of the Group's stakeholders were interviewed to ascertain their opinion.

This structured approach enabled the Group to draw up a list of all the factors contributing to the materiality of each issue.

The issues were scored and depicted in graph format:

1. the position of the issue on the x-axis shows the importance for business performance according to three criteria:
  - likelihood of the threat materialising and opportunities created by the issue;
  - the seriousness of the impact for the Group. For each issue, the opportunities and threats were put into three categories (business, operations and reputation) and their impact was quantified in monetary terms by the department affected;
  - impact on long-term performance;
2. the position of the issue on the y-axis represents the importance of stakeholder expectations, taking account of the legitimacy of each stakeholder to express an opinion on each issue.

The Group used an external provider to ensure each issue was scored strictly and fairly using a standard methodology.

### Third-party audit

The process of developing consolidated workforce-related, environmental and societal information of Groupe PSA published in this report, fulfilling the requirements of the new Articles L. 225-102-1 and R. 225-105 et seq. of the French Commercial Code, was verified by an independent third party (Grant Thornton).

Financial or corporate governance information taken from the Registration Document has also been verified by an external third party whose report appears in the Registration Document.

The presence and accuracy of Groupe PSA CSR information was certified by the independent third-party body Grant Thornton and is available in its entirety in section 8.6. of this document.

## 8.5. INDEXES

### 8.5.1. Global Reporting Initiative (GRI) content index

GRI.102-54

GRI.102-55

This report has been prepared in accordance with the GRI Sustainability Reporting Standards published in 2016 (Core option).

The items required by GRI standards are indicated in this report using the following icon:

GRI.XXX-XX

Selected information has been validated by the audit firm Grant Thornton (see their detailed report in section 8.6).

GRI Standard	Disclosure	Section number(s) and/or URL(s)	Omission
<b>GENERAL DISCLOSURES</b>			
<b>GRI 102: General Disclosures</b>			
	<b>Organizational profile</b>		
102-1	Name of the organization	1.1.1.	
102-2	Activities, brands, products, and services	1.1.1.2.1.	
102-3	Location of headquarters	8.3.5.	
102-4	Location of operations	1.1.1.3.	
102-5	Ownership and legal form	1.4.	
102-6	Markets served	1.1.1.3./1.1.1.4./2.5.	
102-7	Scale of the organization	1.1.1./6.1.2.	
102-8	Information on employees and other workers	3.2.1./3.2.5./3.4.2.3./3.5.1.	
102-9	Supply chain	4.1.1.	
102-10	Significant changes to the organization and its supply chain	1.1.1./1.4./4.1.1./4.1.2.2./8.4.1.	
102-11	Precautionary principle or approach	1.2.1./1.4.3.	
102-12	External initiatives	8.1.	
102-13	Membership of associations	8.1.	
	<b>Strategy</b>		
102-14	Statement from senior decision-maker	Message of the Chairman of the Managing Board	
102-15	Key impacts, risks and opportunities	1.2.1.1./1.2.2./2./3./4./5./6./7.	
	<b>Ethics and integrity</b>		
102-16	Values, principles, standards and norms of behaviour	6.1.	
102-17	Mechanisms for advice and concerns about ethics	6.1.2./6.1.3.	
	<b>Governance</b>		
102-18	Governance structure	1.4./6.4.	
102-19	Delegating authority	1.4.1.2./6.5.1.	
102-20	Executive-level responsibility for economic, environmental and social topics	1.4.1.	
102-21	Consulting stakeholders on economic, environmental and social topics	1.4.1.	
102-22	Composition of the highest governance body and its committees	1.4./6.4.	
102-23	Chair of the highest governance body	1.4./6.4.	
102-24	Nominating and selecting the highest governance body	1.4./6.4.	
102-25	Conflicts of interest	CSR Report: 1.4.1.1./6.4.3. Registration Document: 3.1.3.2./3.1.3.3./3.1.4.2.	
102-26	Role of highest governance body in setting purpose, values and strategy	1.4.1.	
102-27	Collective knowledge of highest governance body	1.4.1.	
102-28	Evaluating the highest governance body's performance	6.5.2.	
102-29	Identifying and managing economic, environmental and social impacts	1.2.2./1.2.1.3./1.4.1.	
102-30	Effectiveness of risk management processes	1.4.1.1.	
102-31	Review of economic, environmental and social topics	1.4.1.1.	

GRI Standard	Disclosure	Section number(s) and/or URL(s)	Omission
	102-32 Highest governance body's role in sustainability reporting	1.2.2.	
	102-33 Communicating critical concerns	6.4.4.	
	102-34 Nature and total number of critical concerns	6.4.4.	
	102-35 Remuneration policies	6.2.3.	
	102-36 Process for determining remuneration	1.4.1.1.	
	102-37 Stakeholders' involvement in remuneration	6.2.3.	
	102-38 Annual total compensation ratio	Ø	
	102-39 Percentage increase in annual total compensation ratio	Ø	
	<b>Stakeholder engagement</b>		
	102-40 List of stakeholder groups	1.2.1.3./8.2.	
	102-41 Collective bargaining agreements	3.1.3.	
	102-42 Identifying and selecting stakeholders	1.2.1.3.	
	102-43 Approach to stakeholder engagement	8.2.	
	102-44 Key topics and concerns raised	8.2.	
	<b>Reporting practice</b>		
	102-45 Entities included in the consolidated financial statements	CSR Report: 8.4.1. Registration Document: 5.6. Note 21	
	102-46 Defining report content and topic Boundaries	1.2.1.1./8.3.4./8.4.2.	
	102-47 List of material topics	1.2.1.1.	
	102-48 Restatements of information	2.6./3.6./4.3./5.7./6.6./7. 5./8.4.	
	102-49 Changes in reporting	1.2.1.1./1.2.2./2.6./3.6./4.3./5. .7./6.6./7.5./8.3.4./8.4.	
	102-50 Reporting period	8.3.1.	
	102-51 Date of most recent report	8.3.3.	
	102-52 Reporting cycle	8.3.2.	
	102-53 Contact point for questions regarding the report	8.3.5.	
	102-54 Claims of reporting in accordance with the GRI Standards	8.5.1	
	102-55 GRI content index	8.5.1	
	102-56 External assurance	8.6.	
<b>MATERIAL TOPICS</b>			
<b>▶ Vehicle CO<sub>2</sub> emissions</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	2./6.	
	103-2 The management approach and its components	2.1./3.1./6.1.	
	103-3 Evaluation of the management approach	2.1./3.1./6.1.	
<b>GRI 302: Energy</b>	302-2 Energy consumption outside of the organization	2.4.4.2.	
	302-5 Reductions in energy requirements of products and services	2.1./2.5.	
<b>GRI 305: Emissions</b>	305-3 Other indirect (Scope 3) GHG emissions	2.1./2.4.4.2.	
	305-4 GHG emissions intensity	2.1.1.2.	
	305-5 Reduction of GHG emissions	2.1.1.2.	
	305-6 Emissions of ozone-depleting substances (ODS)	2.1.5.	
<b>▶ Energy/Industrial carbon footprint</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	5.	
	103-2 The management approach and its components	5.1./5.2.	
	103-3 Evaluation of the management approach	5.1./5.2.	
<b>GRI 302: Energy</b>	302-1 Energy consumption within the organization	5.2.1.1.	
	302-3 Energy intensity	5.2.1.2.	
	302-4 Reduction of energy consumption	5.2.1.2.	

▶ *Bringing a tangible impact on climate change*

● *Enhancing responsible natural resource use*

leaf *Meeting growing societal expectations on health and safety*

★ *Supporting the balanced economic development of regions*

hexagon *Ensuring protection of human rights and preventing ethics violation*

circle *Enhancing competitiveness through the development of human capital*

purple square *Offering new mobility solutions adapted to customer needs*

GRI Standard	Disclosure	Section number(s) and/or URL(s)	Omission
<b>GRI 305: Emissions</b>	305-1 Direct (Scope 1) GHG emissions	5.2.2.1.	
	305-2 Energy indirect (Scope 2) GHG emissions	5.2.2.1.	
	305-4 GHG emissions intensity	5.2.2.2.	
	305-5 Reduction of GHG emissions	5.2.2.1./5.2.2.2.	
	305-6 Emissions of ozone-depleting substances (ODS)	5.3.1.2.	
 <b>Environmental performance in the supply chain: purchasing and logistics</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	4./5.	
	103-2 The management approach and its components	4.2./5.1./5.2./6.4.	
	103-3 Evaluation of the management approach	4.2./5.1./5.2./6.4.	
<b>GRI 305: Emissions</b>	305-3 Other indirect (Scope 3) GHG emissions	4.2.1.1./5.2.5.	
	305-4 GHG emissions intensity	5.2.5.	
	305-5 Reduction of GHG emissions	5.2.5.	
<b>GRI 308: Supplier Environmental Assessment</b>	308-1 New suppliers that were screened using environmental criteria	4.2.1.1./4.2.2.2.	
	308-2 Negative environmental impacts in the supply chain and actions taken	4.2.1.1./4.2.2.1./4.2.2.2./4.2.2.5.	
 <b>Wise use of material in the vehicle life cycle (including product recycling)</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	2.	
	103-2 The management approach and its components	2.4.	
	103-3 Evaluation of the management approach	2.4.	
<b>GRI 301: Materials</b>	301-1 Materials used by weight or volume	2.4.1.1.	
	301-2 Recycled input materials used	2.4.1.2.	
	301-3 Reclaimed products and their packaging materials	2.4.3.	
 <b>Sustainable water management</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	5.	
	103-2 The management approach and its components	5.1./5.5.	
	103-3 Evaluation of the management approach	5.1./5.5.	
<b>GRI 303: Water</b>	303-1 Water withdrawal by source	5.5.1.	
	303-2 Water sources significantly affected by withdrawal of water	5.5.1.	
	303-3 Water recycled and reused	5.5.1.3.	
 <b>Optimisation of material cycles in industrial processes (including waste)</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	5.	
	103-2 The management approach and its components	5.1./5.4.	
	103-3 Evaluation of the management approach	5.1./5.4.	
<b>GRI 301: Materials</b>	301-2 Recycled input materials used	5.4.3.	
<b>GRI 306: Effluents and Waste</b>	306-2 Waste by type and disposal method	5.4.3.	
 <b>Vehicle Safety</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	2.	
	103-2 The management approach and its components	2.3.2.	
	103-3 Evaluation of the management approach	2.3.2.	
<b>GRI 416: Customer Health and Safety</b>	416-1 Assessment of the health and safety impacts of product and service categories	2.3.2.9.	
	416-2 Incidents of non-compliance concerning the health and safety impacts of products and services	2.3.2.9.	
<b>GRI 419: Socioeconomic Compliance</b>	419-1 Non-compliance with laws and regulations in the social and economic area	2.3.2.9.	
 <b>Vehicle impact on air quality</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	2.	
	103-2 The management approach and its components	2.2.	
	103-3 Evaluation of the management approach	2.2.	
<b>GRI 305: Emissions</b>	305-7 Nitrogen oxides (NO <sub>x</sub> ), sulfur oxides (SO <sub>x</sub> ), and other significant air emissions	2.2.1./2.2.3.	

-  **Bringing a tangible impact on climate change**
-  **Enhancing responsible natural resource use**
-  **Meeting growing societal expectations on health and safety**
-  **Supporting the balanced economic development of regions**
-  **Ensuring protection of human rights and preventing ethics violation**
-  **Enhancing competitiveness through the development of human capital**
-  **Offering new mobility solutions adapted to customer needs**

GRI Standard	Disclosure	Section number(s) and/or URL(s)	Omission
<b>Control of industrial discharges and nuisances</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	5. 5.1./5.3. 5.1./5.3.	
<b>GRI 305: Emissions</b>	305-7 Nitrogen oxides (NO <sub>x</sub> ), sulfur oxides (SO <sub>x</sub> ), and other significant air emissions	5.3.1.1.	
<b>GRI 306: Effluents and Waste</b>	306-1 Water discharge by quality and destination 306-3 Significant spills 306-4 Transport of hazardous waste	5.5.2. 5.3.2.4. 5.4.3.	
<b>GRI 307: Environmental Compliance</b>	307-1 Non-compliance with environmental laws and regulations	5.3.2.4.	
<b>GRI 419: Socioeconomic Compliance</b>	419-1 Non-compliance with laws and regulations in the social and economic area	5.3.2.4.	
<b>Biodiversity</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	5. 5.1./5.6. 5.1./5.6.	
<b>GRI 304: Biodiversity</b>	304-1 Operational sites owned, leased, managed in, or adjacent to, protected areas and areas of high biodiversity value outside protected areas 304-2 Significant impacts of activities, products, and services on biodiversity 304-3 Habitats protected or restored	5.6.1. 5.6.2. 5.6.	
<b>Local sourcing development in host territories</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	4. 4.1.2.2. 4.1.2.2.	
<b>GRI 203: Indirect Economic Impacts</b>	203-1 Infrastructure investments and services supported 203-2 Significant indirect economic impacts	4.1.2.2.	
<b>GRI 204: Procurement Practices</b>	204-1 Proportion of spending on local suppliers	4.1.2.2./4.2.1.2.	
<b>Balanced governance and distribution of added value</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	6. 6.1./6.2./6.3./6.4./6.5. 6.1./6.2./6.3./6.4./6.5.	
<b>GRI 201: Economic Performance</b>	201-1 Direct economic value generated and distributed 201-2 Financial implications and other risks and opportunities due to climate change 201-3 Defined benefit plan obligations and other retirement plans 201-4 Financial assistance received from government	1.3.3./6.2.1. 1.2.1.1./2.1.1. 6.2.3./Registration Document, section 3.2.1. 6.2.1.	
<b>GRI 203: Indirect Economic Impacts</b>	203-2 Significant indirect economic impacts	1.2.2./1.3.3.	
<b>Philanthropy and socially responsible mobility</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	7. 7.1./7.2./7.3. 7.1./7.2./7.3.	
<b>GRI 203: Indirect Economic Impacts</b>	203-1 Infrastructure investments and services supported 203-2 Significant indirect economic impacts	7.1./7.2./7.3. 7.1./7.2./7.3.	
<b>GRI 413: Local Communities</b>	413-1 Operations with local community engagement, impact assessments and development programmes	7.2.2./7.3.	
<b>Human rights in the supply chain</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	4. 4.2. 4.2.	

► Bringing a tangible impact on climate change

● Enhancing responsible natural resource use

leaf Meeting growing societal expectations on health and safety

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◆ Ensuring protection of human rights and preventing ethics violation

● Enhancing competitiveness through the development of human capital

■ Offering new mobility solutions adapted to customer needs

GRI Standard	Disclosure	Section number(s) and/or URL(s)	Omission
<b>GRI 407: Freedom of Association and Collective Bargaining</b>	407-1 Operations and suppliers in which the right to freedom of association and collective bargaining may be at risk	4.2.1.1./4.2.2.2./4.2.2.5.	
<b>GRI 408: Child Labor</b>	408-1 Operations and suppliers at significant risk for incidents of child labor	4.2.1.1./4.2.2.2./4.2.2.5.	
<b>GRI 409: Forced or Compulsory Labor</b>	409-1 Operations and suppliers at significant risk for incidents of forced or compulsory labor	4.2.1.1./4.2.2.2./4.2.2.5.	
<b>GRI 414: Supplier Social Assessment</b>	414-1 New suppliers that were screened using social criteria 414-2 Negative social impacts in the supply chain and actions taken	4.2.1.1./4.2.2.2. 4.2.1.1./4.2.2.1./4.2.2.2./4.2.2.5.	
<b>◆ Ethics in business practices</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	6. 6.1./6.2./6.3./6.4./6.5 6.1./6.2./6.3./6.4./6.5	
<b>GRI 205: Anti-Corruption</b>	205-1 Operations assessed for risks related to corruption 205-2 Communication and training about anti-corruption policies and procedures 205-3 Confirmed incidents of corruption and actions taken	6.1.3.2. 4.2.2.2./6.1.1./6.1.3.1./6.1.3.2. 6.1.4.	
<b>GRI 206: Anti-Competitive Behavior</b>	206-1 Legal actions for anti-competitive behaviour, anti trust and monopoly practices	6.1.4.	
<b>GRI 415: Public Policy</b>	415-1 Political contributions	6.3.1.3.	
<b>GRI 419: Socioeconomic Compliance</b>	419-1 Non-compliance with laws and regulations in the social and economic area	6.1.4.	
<b>◆ Responsible information and marketing</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	7. 6.2./7.4.2. 6.2./7.4.2.	
<b>GRI 417: Marketing and Labeling</b>	417-1 Requirements for product and service information and labeling 417-2 Incidents of non-compliance concerning product and service information and labeling 417-3 Incidents of non-compliance concerning marketing communications	7.4.2.2. 7.4.2.2. 7.4.2.2.	
<b>◆ Management of company transformations and social dialogue</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	3. 3.0./3.1./3.2./3.3./3.4./3.5. 3.0./3.1./3.2./3.3./3.4./3.5.	
<b>GRI 401: Employment</b>	401-1 New employee hires and employee turnover	3.2.	
<b>GRI 402: Labor/Management Relations</b>	402-1 Minimum notice periods regarding operational changes 412-1 Operations that have been subject to human rights reviews or impact assessments	3.1.3. 3.1.1.2.	
<b>GRI 412: Human Rights Assessment</b>	412-2 Employee training on human rights policies or procedures 412-3 Significant investment agreements and contracts that include human rights clauses or that underwent human rights screening	3.1.1.3. 4.2.1.1.	
<b>◆ Health, safety and well-being in the workplace</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary 103-2 The management approach and its components 103-3 Evaluation of the management approach	3. 3.0./3.1./3.2./3.3./3.4./3.5. 3.0./3.1./3.2./3.3./3.4./3.5.	
<b>GRI 401: Employment</b>	401-3 Parental leave	3.4.2.3.	

- *Bringing a tangible impact on climate change*
- *Enhancing responsible natural resource use*
- leaf *Meeting growing societal expectations on health and safety*
- ★ *Supporting the balanced economic development of regions*
- hexagon *Ensuring protection of human rights and preventing ethics violation*
- circle *Enhancing competitiveness through the development of human capital*
- square *Offering new mobility solutions adapted to customer needs*

GRI Standard	Disclosure	Section number(s) and/or URL(s)	Omission
<b>GRI 403: Occupational Health and Safety</b>	403-1 Workers, representation in formal joint management worker health and safety committees	3.4.1.5.	
	403-2 Types of injury and rates of injury, occupational diseases, lost days, absenteeism, and number of work-related fatalities	3.2.6./3.4.1.2./3.4.1.3.	
	403-3 Workers with high incidence or high risk of diseases related to their occupation	3.4.1.4.	
	403-4 Health and safety topics covered in formal agreements with trade unions	3.4.1.5.	
<b>● Diversity and equal opportunity</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	3.	
	103-2 The management approach and its components	3.5.	
	103-3 Evaluation of the management approach	3.5.	
<b>GRI 405: Diversity and Equal Opportunity</b>	405-1 Diversity of governance bodies and employees	3.2.2./3.5.1./3.5.2./3.5.3./ Registration Document 3.1.	
	405-2 Ratio of basic salary and remuneration of women to men	3.3.3.1.	
<b>GRI 406: Non-Discrimination</b>	406-1 Incidents of discrimination and corrective actions taken	3.5.2.	
<b>● Attracting and developing all talents</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	3.	
	103-2 The management approach and its components	3.0./3.1./3.2./3.3./3.4./3.5.	
	103-3 Evaluation of the management approach	3.0./3.1./3.2./3.3./3.4./3.5.	
<b>GRI 202: Market Presence</b>	202-1 Ratios of standard entry level wage by gender compared to local minimum wage	3.3.3.1.	
	202-2 Proportion of senior management hired from the local community	3.3.1.3.	
<b>GRI 401: Employment</b>	401-2 Benefits provided to full-time employees that are not provided to temporary or part-time employees	3.3.3.3.	
<b>GRI 404: Training and Education</b>	404-1 Average hours of training per year per employee	3.3.2.	
	404-2 Programmes for upgrading employee skills and transition assistance programmes	3.2.2./3.3.1./3.3.2.	
	404-3 Percentage of employees receiving regular performance and career development reviews	3.3.1.4.	
<b>■ Vehicle and service quality - customer satisfaction</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	2.	
	103-2 The management approach and its components	2.3.1.	
	103-3 Evaluation of the management approach	2.3.1.	
<b>■ Development of new mobility solutions</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	2.	
	103-2 The management approach and its components	2.5.	
	103-3 Evaluation of the management approach	2.5.	
<b>■ Responsible management of customer's data and relationship</b>			
<b>GRI 103: Management Approach</b>	103-1 Explanation of the material topic and its boundary	7.	
	103-2 The management approach and its components	7.4.1.1.	
	103-3 Evaluation of the management approach	7.4.1.1.	
<b>GRI 418: Customer Privacy</b>	418-1 Substantiated complaints concerning breaches of customer privacy and losses of customer data	7.4.1.1.	
<b>GRI 419: Socioeconomic Compliance</b>	419-1 Non-compliance with laws and regulations in the social and economic area	7.4.1.1.	

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## 8.5.2. Regulatory requirements index

The index below sets out the requirements of Articles L. 225-102-1 and R. 225-105 et seq. of the French Commercial Code which transpose Directive 2014/95/EU, applicable from the 2018 financial year, but which Groupe PSA opted to apply from the 2017 financial year.

The requirements of Articles L. 225-102-1 and R. 225-105 et seq. of the French Commercial Code are shown in this report by three types of icon<sup>(1)</sup>:

- DPEF.A for Groupe PSA business model;
- DPEF.B for the description of the main Corporate Social Responsibility risks inherent in Groupe PSA activity;
- DPEF.X for the other indicators, including three indicators reported with anticipation to the future Decree of application to Law No.2018 -938 of 30 October 2018 - art 55 for the balance of trade relations in the agricultural and food sectors and healthy, sustainable and accessible food for all, and Law No. 2018-898 of 23 October 2018 for the fight against fraud. They are featured at the end of the index and have modified article L.225-102-1 of the French Commercial Code.

Expected	Codification of the DPEF indicators	CSR Report (relevant sections)	Degree of response*
The Company's business model	DPEF.A	1.2.3.	<input type="button" value=""/>
Main risks inherent in the Company's activity	DPEF.B	1.2.1.	<input type="button" value=""/>
<b>1° SOCIAL INFORMATION</b>			
<b>a) Employment</b>			
Total workforce	DPEF.1.a	3.2.1./3.2.4.	<input type="button" value=""/>
Employees by gender	DPEF.1.b	3.2.1./3.5.1.	<input type="button" value=""/>
Employees by age	DPEF.1.c	3.2.1./3.5.1.	<input type="button" value=""/>
Employees by geographical segment	DPEF.1.d	3.2.1./3.2.2./3.5.1.	<input type="button" value=""/>
Hirings	DPEF.2.a	3.2.2./3.2.4.	<input type="button" value=""/>
Dismissals	DPEF.2.b	3.2.4.	<input type="button" value=""/>
Compensation and changes therein	DPEF.3	3.3.3./3.3.3.1.	<input type="button" value=""/>
<b>b) Work arrangements</b>			
Organisation of working hours	DPEF.4	3.2.6./3.4.2.3.	<input type="button" value=""/>
Absenteeism	DPEF.5	3.2.6.	<input type="button" value=""/>
<b>c) Health and safety</b>			
Health and safety conditions in the workplace	DPEF.6	3.4./3.4.1./3.4.2./3.5.2.	<input type="button" value=""/>
Workplace accidents, particularly their frequency and severity, along with occupational illnesses	DPEF.7	3.4./3.4.1./3.4.1.2./3.4.1.3.	<input type="button" value=""/>
<b>d) Industrial relations</b>			
Organisation of social dialogue, especially procedures for informing, consulting and negotiating with personnel	DPEF.8	3.1.1./3.1.1.1./3.1.2./3.2./3.4.2.1.	<input type="button" value=""/>
Summary of labour agreements, in particular relating to workplace health and safety	DPEF.9	3.1.1./3.1.3./3.4.1.5.	<input type="button" value=""/>
<b>e) Training</b>			
Training policies put into practice, specifically those relating to environmental protection expected	DPEF.10	2.3.1.5./3.1.1./3.2.2./3.2.3./3.2.4./3.3./3.3.1.4./3.3.2./3.4.1.6./3.5.2./5.1.3.2./6.1.3.1	<input type="button" value=""/>
Total number of hours of training	DPEF.11	2.3.1.5./3.3.2./6.1.3.1.	<input type="button" value=""/>
<b>f) Non-discrimination</b>			
Measures taken to ensure gender equality	DPEF.12	3.3.1./3.3.3.1./3.5.1.	<input type="button" value=""/>
Measures taken to ensure the hiring and integration of persons with disabilities	DPEF.13	3.2.2./3.5.3.	<input type="button" value=""/>
Anti-discrimination policy	DPEF.14	3.1.1./3.2.2./3.3.3.1./3.5./3.5.1./3.5.2.	<input type="button" value=""/>

(1) Déclaration de Performance Extra-Financière (DPEF).

Expected	Codification of the DPEF indicators	CSR Report (relevant sections)	Degree of response*
<b>2° ENVIRONMENTAL INFORMATION</b>			
<b>a) General environmental policy</b>			
The organisation of the Company so as to take environmental questions into consideration and, where appropriate, carrying out environmental assessment or certification initiatives	DPEF.15	1.2.1.3./2.0./2.1.1./2.2.1./ 2.2.2./3.1.1./5.1.1./5.1.3.2./ 5.1.3.3./5.2.3./5.2.4./5.3.2.	
Resources committed to preventing environmental risks and pollution	DPEF.16	2.0.3./2.1./2.1.2./2.1.21./2.1.2. 2./2.1.3./2.1.4./2.1.5./2.2./ 2.2.3./2.4./5.1.3.3./5.2.2.1./ 5.3.2.4./5.4.2./5.5.1.3.	
The amount of the provisions and warranties made for environmental risks, provided this information is not of a nature that might be seriously adverse to the Company in a current legal dispute	DPEF.17	2.2.3./5.3.2.4	
<b>b) Pollution</b>			
Measures to prevent, reduce or repair emissions into the air, water or ground that seriously affect the environment	DPEF.18	2.2.1.1./2.2.1.2./2.4.1.3./ 5.3.1./5.3.2.2./5.4.2./5.4.3./ 5.5.1.3./5.5.2.2.	
Handling all types of pollution specific to an activity, in particular sound and light pollution	DPEF.19	2.4./5.3.2.3./5.6.2.	
<b>c) The circular economy</b>			
I) Waste prevention and management			
Measures to prevent, recycle, reuse and recover or eliminate waste	DPEF.20	2.4.2./5.4.2./5.4.3.	
Actions to combat food waste	DPEF.21	4.2.1.	
II) Sustainable use of resources			
Water consumption and sourcing in light of local constraints	DPEF.22	2.2./5.5.1.1./5.5.1.3.	
Consumption of raw materials and measures taken to use them more efficiently	DPEF.23	2.4./2.4.1./2.4.3./5.4.1.	
Consumption of energy, measures taken to improve energy efficiency and use of renewable energy	DPEF.24	2.1.2./2.1.2.1./2.1.2.2./2.1.2.4./ 2.1.3./5.2.1	
Use of land	DPEF.25	2.1.2.4./5.3.2.2./5.6.1	
<b>d) Climate change</b>			
Significant greenhouse gas emissions due to the Company's activity, notably through the use of goods and services it produces	DPEF.26	2.1.2.1./2.1.2.2./2.1.2.4./ 2.1.3./2.1.5./5.2./5.2.3./ 5.2.4./5.2.5	
Measures taken to adapt to the consequences of climate change	DPEF.27	2.1./2.1.2./2.1.2.1./2.1.2.2./2.1. 2.4./2.1.3./2.1.5./2.5./5.2./5. 2.2./5.2.5	
The voluntary medium and long-term targets set to reduce greenhouse gas emissions and the relevant resources implemented	DPEF.28	2.1.1.2.	
<b>e) Protection of biodiversity</b>			
Measures taken to preserve or restore biodiversity	DPEF.29	5.6.2.	
<b>3° SOCIETAL INFORMATION</b>			
<b>a) Corporate sustainable development commitment</b>			
The impact of the Company's activity on employment and local development	DEPF.30	3.3.1./3.3.1.3./3.3.3.1. 4.1.2.2./4.2.2.1./4.2.2.2.	
The impact of the Company's activity on neighbouring or local residents	DEPF.31	4.2.2.1./5.1.1./5.3.2.3./5.3.2. 4./7.1./7.2./7.3.	
Relations with stakeholders and means of dialogue with them	DEPF.32	1.2.1.3./2.1.2.4./3.1.1./ 3.1.1.2./3.1.1.3./3.2.2./ 3.2.4./3.5./3.6.	
Support, partnerships and philanthropy provided	DEPF.33	4.2.1.2./7.1./7.2./7.3.	
<b>b) Subcontractors and suppliers</b>			
Consideration given to social and environmental issues in procurement policies	DEPF.34	3.1.1./3.1.1.2./4.1.2.2./4.2.1.1.	
Inclusion of social and environmental responsibility in subcontractor and supplier relationships	DEPF.35	3.1.1./3.1.1.2./4.1.1./4.2.1.1.	
<b>c) Fair operating practices</b>			
Measures taken benefiting the health and safety of consumers	DEPF.36	2.2./2.2.1.2./2.3.2./ 2.4.1.3./7.4.1.2./7.4.2.	
Anti-corruption actions	DEPF.37	3.1.1./4.2.2.2./6.1.1./6.3.	

Expected	Codification of the DPEF indicators	CSR Report (relevant sections)	Degree of response*
<b>4° INFORMATION ABOUT INITIATIVES TO PROTECT HUMAN RIGHTS</b>			
<b>a) Promotion and observance of the core conventions of the International Labour organisation:</b>			
With respect for freedom of association and the right to collective bargaining	DPEF.38	3.1.1./3.1.1.2./3.1.1.3./4.2.2.2.	<input type="checkbox"/>
Eliminating discrimination in terms of hiring and occupation	DPEF.39	3.1.1./3.1.1.3./3.2.5./3.5./ 3.5.2./3.6./4.2.2.2.	<input type="checkbox"/>
Eliminating forced or compulsory labour expected	DPEF.40	3.1.1./3.1.1.2./3.1.1.3./4.2.2.2.	<input type="checkbox"/>
The effective abolition of child labour	DPEF.41	3.1.1./3.1.1.2./3.1.1.3./4.2.2.2.	<input type="checkbox"/>
<b>b) Other actions undertaken to protect human rights</b>	DPEF.42	3.1.1./3.1.1.2./3.1.1.3./4.2.2.2.	<input type="checkbox"/>
<b>Most recent additional requirements included in article L. 225-102-1 modified in autumn 2018</b>			
Fighting food insecurity	DPEF.43	7.2.2.	<input type="checkbox"/>
Respect for animal welfare	DPEF.44	4.2.2.2.	<input type="checkbox"/>
Fighting tax evasion	DPEF.45	6.2.2.	<input type="checkbox"/>

\* The reporting status indicates a response by the Group to each of the 45 DPEF topics and the coverage rate for this response among the relevant subsidiaries.

The Group has responded to the DPEF topic and the response covers 100% of subsidiaries required to publish detailed information.

### 8.5.3. 10 UN Global Compact principles index with related GRI codes

Areas	Principle	GRI codes
<b>1. Human rights</b>	1. Businesses should support and respect the protection of internationally proclaimed human rights; and 2. make sure that they are not complicit in human rights abuses.	410-1, 411-1, 412-1, 412-2, 413-1, 413-2 412-3, 414-1, 414-2
<b>2. Labour standards</b>	3. Businesses should uphold the freedom of association and the effective recognition of the right to collective bargaining; 4. the elimination of all forms of forced and compulsory labour; 5. the effective abolition of child labour; and 6. the elimination of discrimination in respect of employment and occupation.	102-41, 402-1, 407-1 409-1 408-1
<b>3. The environment</b>	7. Businesses should support a precautionary approach to environmental challenges; 8. undertake initiatives to promote greater environmentally-friendly; and 9. encourage the development and diffusion of environmentally friendly technologies.	201-2, 301-1, 302-1, 303-1, 305-1, 305-2, 305-3, 305-6, 305-7 301-1, 301-2, 301-3, 302-1, 302-2, 302-3, 302-4, 302-5, 303-1, 303-2, 303-3, 304-1, 304-2, 304-3, 304-4, 305-1, 305-2, 305-3, 305-4, 305-5, 305-6, 305-7, 306-1, 306-2, 306-3, 306-4, 306-5, 307-1, 308-1, 308-2 302-4, 302-5, 305-5,
<b>4. Anti-corruption</b>	10. Businesses should work against corruption in all its forms, including extortion and bribery.	102-16, 102-17, 205-2, 205-3, 415-1, 413-2

### 8.5.4. 17 UN Sustainable Development Goals index

Please refer to the "Groupe PSA contribution to global sustainable development goals" section, at the beginning of this report.

## 8.5.5. ISO 26000 index

<b>Key central questions and areas of action</b>		<b>CSR Report (relevant sections)</b>
<b>Key question</b>	<b>Governance of the organisation</b>	1.4./1.4.1./6.1.1./6.4.
<b>Key question</b>	<b>Human rights</b>	
Area of action 1	Duty of vigilance	4.1./4.2.
Area of action 2	Situations that present a risk to human rights	4.2.2.1.
Area of action 3	Avoiding complicity	4.2.2.2./4.2.2.3./6.1.
Area of action 4	Remedying infringements on human rights	4.2.2.
Area of action 5	Discrimination and vulnerable groups	3.5./3.5.3.
Area of action 6	Civil and political rights	4.2.2.5.
Area of action 7	Economic, social and cultural rights	4.2.2.
Area of action 8	Basic workplace principles and rights	4.2.2.
<b>Key question</b>	<b>Working relations and conditions</b>	
Area of action 1	Employment and employer/employee relations	3.1./3.4.1.4./3.5.1.
Area of action 2	Working conditions and social protection	3.4./3.4.1.
Area of action 3	Social dialogue	3.1.
Area of action 4	Workplace health and safety	3.4.1.
Area of action 5	Development of human capital	3.3.
<b>Key question</b>	<b>Environment</b>	
Area of action 1	Preventing pollution	2.1./2.2.1./2.4./2.5.1./5.1.3./5.3.
Area of action 2	Sustainable use of resources	2.4.1./2.4.3./5.4./5.5.
Area of action 3	Reducing and adapting to climate change	2.1./2.4./5.2.
Area of action 4	Preserving the environment, biodiversity and restoring natural habitats	5.6.
<b>Key question</b>	<b>Fair operating practices</b>	
Area of action 1	Anti-corruption	6.1.
Area of action 2	Responsible policy commitment	6.1.
Area of action 3	Loyal competition	6.1.1./6.1.3./6.1.4.
Area of action 4	Promoting corporate responsibility in the value chain	1.
Area of action 5	Respecting property rights	6.3.2.
<b>Key question</b>	<b>Matters concerning consumers</b>	
Area of action 1	Loyal marketing, information and contract practices	7.4.
Area of action 2	Protecting consumer health and safety	2.3.3.
Area of action 3	Sustainable consumption	2.1.4./2.4.
Area of action 4	Customer service, assistance and consumer claims and disputes resolution	2.2.2./2.3.1./2.3.2.5./2.5.2./2.5.3.
Area of action 5	Protecting consumers' data and private lives	6.3.2./7.4.1.
Area of action 6	Access to basic services	7.1.2./7.2.
Area of action 7	Education and awareness	2.1.4./2.5./2.5.2./7.1.1/7.2.2.2./7.3.
<b>Key question</b>	<b>Communities and local development</b>	
Area of action 1	Involvement with communities	4.1.2.2./7.2./7.3.
Area of action 2	Education and culture	7.2.
Area of action 3	Creating jobs and developing skills	7.1.1./7.2.2.
Area of action 4	Developing technologies and access to technology	7.3.
Area of action 5	Creating wealth and revenue	4.1.2.2./4.2./7.1.
Area of action 6	Health	2.2.
Area of action 7	Investment in the Company	7.3.

### 8.5.6. SASB Transportation Standard index

References to the automotive industry ESG reporting of the SASB (Sustainability Accounting Standards Board) are denoted by:  
SASB-XXXX.x

	Accounting metric	CODE <sup>(1)</sup>	2018 CSR Report (relevant sections)	2016 (PCD)	2017 (PCD)	2018 (PSA)	2018 o/w PCD
<b>Activity</b>	Number of vehicles manufactured	SASB-000.A	1.1.1.3.	3,152,787	3,649,742	3,902,378	NA
	Number of vehicles sold <sup>(2)</sup>	SASB-000.B	1.1.1.4.	3,146,000	3,228,400	3,877,765	2,839,708
	Percentage of models rated by NCAP programmes with overall 5-star safety rating, by region	SASB-250a.1	2.3.2.6.				
	Europe			56%	57%	42%	41%
	China			93%	94%	94%	94%
	South America			NA	0%	0%	0%
<b>Product Safety</b>	North America			NA	NA	NA	NA
	Australia/New Zeland			NA	92%	83%	83%
	Number of safety-related defect complaints, percentage investigated	SASB-250a.2	2.3.1.4.3.	NA	2,927	2,310	NA
	Number of vehicles recalled (Mveh)	SASB-250a.3	2.3.1.4.3.				NA
	Mandatory recalls			0	0	0	0
	Voluntary recalls			0.891	0.731	1.9*	1,5*
	<i>* Note: There was a one-off campaign in 2018 for a potential glass fixing defect on -1 Mveh produced between 2005 and 2013</i>						
<b>Labour Practices</b>	Percentage of active workforce covered under collective-bargaining agreements	SASB-310a.1	3.1.3.	95%	95%	94%	NA
	Number of work stoppages and total days idle	SASB-310a.2	3.1.1.1.	0 0	0 0	0 0	0 0
<b>Fuel Economy and Use-phase Emissions</b>	Sales-weighted average passenger fleet fuel emissions, by region (base 100)	SASB-410a.1	2.1.1.2.	86	82	82	NA
	Europe (g/km)			102.4	105.0	114.1	108.5
	China (DPCA) (l/100km)			6.73	6.54	6.33	6.33
	Number of zero emission vehicles (ZEV) sold	SASB-410a.2	2.1.2.	6,359	6,231	10,387	8,053
	Number of hybrid vehicles sold			1,536	441	73	73
	Number of plug-in hybrid vehicles sold			0	0	0	0
	Discussion of strategies and approach to managing fleet fuel economy and emissions risks and opportunities	SASB-410a.3	2.1.	Disclosed	Disclosed	Disclosed	NA
	Description of the management of risks associated with the use of critical materials	SASB-440a.1	2.4.1.4./ 4 introduction/ 4.2.1.1.	Disclosed	Disclosed	Disclosed	NA
	Total amount of waste from manufacturing (t) percentage recycled	SASB-440b.1	5.4.3.	692,035 96%	714,963 96.8%	986,645 97.0%	NA
	Weight of end-of-life material recovered (t), percentage recycled <sup>(3)</sup>	SASB-440b.2	2.4.3.2.	30,810 88%	27,663 88%	118,662 NA <sup>(3)</sup>	107,826 NA <sup>(3)</sup>
	Average recyclability of vehicles sold	SASB-440b.3	2.4.2.	95%	95%	95%	95%

(1) The standard codification of the SASB indicators in the format SASB TR-AU-XXXX.x is simplified into SASB - XXXx.x.

(2) Number of vehicles sold in 2017: 403,900 units sold for OV between August and December 2017, for a total of 3,632,300 units.

(3) Official information from French Authorities on French scope only. Data is only available with 1.5 years delay.

NA: Information is Not Available.

## 8.6. AUDITOR'S EXAMINATION REPORT GRI.102-56

The Company decided to obtain an independent auditor's opinion on the truthfulness of the consolidated social, societal and environmental information presented in the CSR Report. The firm Grant Thornton was appointed as independent auditor. The conclusions of this report are presented below.

### **Report by the independent third party, on consolidated social, environmental and societal information included in the CSR report**

**Peugeot S.A.**

**For the year ended 31<sup>st</sup> December 2018**

**To the Shareholders,**

In our capacity as an independent third party of Peugeot S.A. and accredited by COFRAC under number n°3-1080<sup>(1)</sup>, we hereby report to you on the consolidated social, environmental and societal information for the year ended 31st December 2018 (hereinafter the "CSR Information"), included in the CSR report.

#### **The entity's responsibility**

The CSR Information has been prepared under the responsibility of the Executive Board in accordance with the entity's procedures (hereinafter the "Guidelines"), the main elements of which are presented in the CSR report.

#### **Independence and quality control**

Our independence is defined by the provisions of article L. 822-11-3 of the French Commercial Code and the French Code of Ethics (*Code de déontologie*) of our profession. In addition, we have implemented a system of quality control including documented policies and procedures regarding compliance with the ethical requirements, French professional guidance and applicable legal and regulatory requirements.

#### **Responsibility of the independent third party verifier**

On the basis of our work, our responsibility is to:

- provide a report expressing a limited assurance conclusion on the fairness of the CSR Information in compliance with the Guidelines;
- express a reasonable assurance conclusion that a selection of CSR Information has been established, in all material aspects, in compliance with the Guidelines.

However, it is not our responsibility to comment on:

- the entity's compliance with other applicable legal and regulatory provisions, in particular the French duty of care law and anti-corruption;
- the compliance of products and services with the applicable regulations.

#### **1. Limited assurance conclusion on the fairness of the CSR Information**

##### **Nature and scope of our work**

The work described below was performed in accordance with the provisions of articles A. 225-1 et seq. of the French Commercial Code determining the conditions in which the independent third party performs its engagement and with ISAE 3000 - Assurance engagements other than audits or reviews of historical financial information.

We obtained an understanding of all the consolidated entities' activities, the description of the social and environmental risks associated with their activities and the impact of this activity on compliance with human rights and anticorruption and tax evasion legislation, as well as the resulting policies and their outcomes.

We assessed the suitability of the Guidelines with respect to their relevance, completeness, reliability, neutrality and understandability, taking into account industry best practices, where appropriate.

We assessed the process used to identify and confirm the principal risks and asked what internal control and risk management procedures the entity has put in place.

We assessed the consistency of the outcomes and the key performance indicators used with respect to the principal risks and the policies presented.

We verified that the CSR Information covers the scope of consolidation, i.e. all the entities included in the scope of consolidation in accordance with article L. 233-16 within the limitations set out in the CSR report.

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<sup>(1)</sup> Whose scope is available at [www.cofrac.fr](http://www.cofrac.fr)

We assessed the data collection process implemented by the entity to ensure the completeness and fairness of the information:

- for the key performance indicators and other quantitative outcomes<sup>(1)</sup> that we considered to be the most important, we implemented:
  - analytical procedures to verify the proper consolidation of the data collected and the consistency of any changes in those data,
  - substantive tests of details, using sampling techniques, in order to verify the proper application of the definitions and procedures and reconcile the data with the supporting documents. This work was carried out on a selection of contributing entities<sup>(2)</sup> and covers between 28% and 52% of the consolidated data relating to the key performance indicators and outcomes selected for these tests;
- we referred to documentary sources and conducted interviews to corroborate the qualitative information (measures and outcomes) that we considered to be the most important<sup>(3)</sup> ;
- we assessed the overall consistency of the CSR report based on our knowledge of the entity the consolidated entities.

We believe that the work performed, based on our professional judgement, is sufficient to provide a basis for our limited assurance conclusion; a higher level of assurance would have required us to carry out more extensive procedures.

### Conclusion

Based on the work performed, nothing material has come to our attention that causes us to believe that the CSR Information, taken as a whole, is not presented fairly in accordance with the Guidelines.

## 2. Reasonable assurance on a selection of CSR Information

### Nature and scope of work

Regarding the CRS Information selected<sup>(4)</sup> by the company, we undertook work of the same nature as those described in the part 1 above for the non-financial information considered the most important, but in a more in-depth manner, in particular in relation to the number of tests.

The sample selected<sup>(5)</sup> represents between 31 % and 52 % of quantitative information selected.

We consider that this work allows us to express a reasonable assurance opinion on the information selected by company.

### Conclusion

In our opinion, the CSR Information selected by the company has been established, in all material aspects, in compliance with the Guidelines.

Neuilly-sur-Seine, 29 March 2019

*Original French report signed by:*

Independent third-party body

Grant Thornton

French member de Grant Thornton International

Vincent Frambourt

Partner

(1) **Social information:** number of employees under permanent or fixed-term contract by region, gender and age group; hiring for open-end contracts; breakdown of leavers under permanent contracts and dismissals; total management lost-time accident frequency rate (TF1 Management); severity rate; occupational illnesses; hours of training.

**Environmental information:** water use; overall energy consumption; scope 1 and 2 greenhouse gas emissions (GHG); VOC emissions from paint shop facilities; gross discharges into water from plants (COD, DBO5, MES); total weight of waste by type (foundry waste, non-hazardous waste, hazardous waste) and disposal method.

(2) **For social and environmental information:** Belchamp; Charleville; Hordain; Kaluga; Madrid; Metz; Mulhouse; Aspern; Eisenach; Gliwice; Zaragoza.  
**For environmental information related to retail:** PSA Retail Madrid Doctor Esquierdo; PSA Retail Zaragoza Cogullada; DLPA Austria Spillern; PEUGEOT CSA SIA de Mulhouse Illzach; SCC - Saint-Louis.

(3) **Qualitative information:** "Reduce vehicle greenhouse gas emissions"; "Vehicle quality and safety"; "A presence on all mobility segments"; "Co-constructing the momentum with social partners"; "A responsible employment policy"; "Growing our talents"; "Safety, health and well-being in the workplace"; "Equality and diversity"; "Joint innovation with suppliers to prepare for the mobility of the future"; "Suppliers: major links in the value and responsibility creation chain"; "Ethical practices in business relations"; "The Group's commitment to society".

(4) **Environmental information:** water use; overall energy consumption; scope 1 and 2 greenhouse gas emissions (GHG); VOC emissions from paint shop facilities; total weight of waste by type (non-hazardous waste and hazardous waste).

**Social information:** number of employees under permanent or fixed-term contract; total management lost-time accident frequency rate (TF1 Management); severity rate.

**Societal information:** supplier self-assessment results; number of suppliers evaluated by an external body (ECOVADIS); CSR supplier performance evaluated by an external body (ECOVADIS).

(5) **For social and environmental information:** Belchamp; Charleville; Hordain; Kaluga; Madrid; Metz; Mulhouse; Aspern; Eisenach; Gliwice; Zaragoza.  
**For environmental information related to retail:** PSA Retail Madrid Doctor Esquierdo; PSA Retail Zaragoza Cogullada; DLPA Austria Spillern; PEUGEOT CSA SIA de Mulhouse Illzach; SCC - Saint-Louis.





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