



PETRONAS



RESILIENCE.  
**SUSTAINABLE GROWTH.**

PETRONAS CHEMICALS GROUP BERHAD  
SUSTAINABILITY REPORT 2020



Mangrove planting at ecoCare Environmental Education Centre (EEC), Kertih, Terengganu. (Picture was taken in 2018)

2-7

**OVERVIEW OF PCG**

- 2 Vision & Shared Values
- 3 About Us
- 4 Our Presence
- 6 Our Product Portfolio

1

32-39

**CATALYSING ECONOMIC PERFORMANCE**

- 32 Innovation & Product Stewardship
- 36 Customer Relationship Management
- 38 Supply Chain Management

7

8

**ABOUT THIS REPORT**

2

40-49

**CONTRIBUTING TO THE GREEN AGENDA**

- 40 GHG Emissions & Climate Adaptation
- 44 New Plastics Economy (NPE)
- 46 Environmental Stewardship

8

9-12

**LEADERSHIP COMMITMENT**

3

50-61

**EMPOWERING PEOPLE & COMMUNITIES**

- 50 Human Rights & Fair Employment
- 54 Workplace and Occupational Safety & Health
- 57 Talent Development
- 59 Community Engagement

9

13-22

**SUSTAINABILITY STRATEGY**

- 13 Stakeholder Engagement
- 16 Material Matters
- 22 Sustainability Framework

4

62-66

**STRENGTHENING ETHICS & INTEGRITY**

- 62 Corporate Governance
- 66 Cybersecurity

10

23-29

**SUSTAINABILITY GOVERNANCE**

- 23 Governance Structure
- 25 Memberships & Associations
- 26 Awards and Recognitions
- 28 Risk Management & Sustainability
- 29 Sustainability Guidelines

5

67-73

**ADDITIONAL INFORMATION**

- 67 Independent Limited Assurance Report
- 69 Global Reporting Initiative (GRI) Content Index

11

30-31

**SUSTAINABILITY SCORECARD**

6

# VISION

To be the preferred chemical company providing innovative customer solutions

## LOYALTY

Loyal to corporation

## INTEGRITY

Honest and upright

## PROFESSIONALISM

Strive for excellence

## COHESIVENESS

United, trust and respect for each other

# SHARED VALUES

Our shared values are deeply embedded in our culture and ensure we operate with integrity at all times while contributing to the well-being of people in every nation where we have presence

## ABOUT US



PETRONAS Chemicals Group Berhad (PCG) is the leading integrated chemicals producer in Malaysia and one of the largest in Southeast Asia. Listed on Bursa Malaysia and with over three decades of experience in the chemicals industry, PCG is established as part of the PETRONAS Group to maximise value from Malaysia's natural gas resources. Over the years, we have grown and delivered outstanding achievements, making us resilient for sustainable growth.

PCG is in the top quartile of the FTSE4Good Bursa Malaysia Index, the constituents of which are selected from the constituents of the FTSE Bursa Malaysia EMAS Index, screened in accordance with transparent and defined Environmental, Social and Governance (ESG) criteria. We are committed to ensuring that our business practices are in line with globally recognised standards for responsible ESG practices.

# OUR PRESENCE

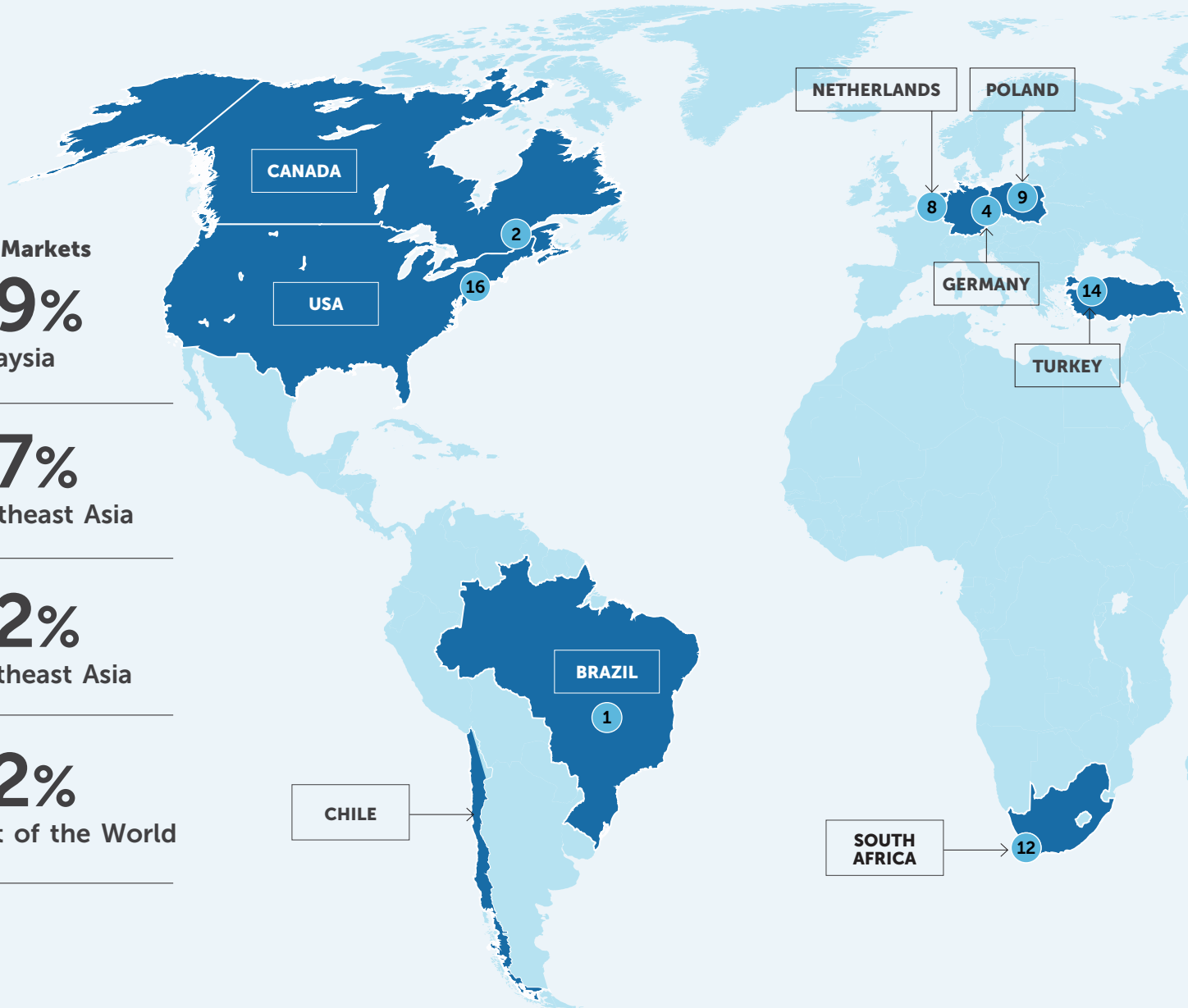
## Sales By Markets

→ **29%**  
Malaysia

→ **37%**  
Southeast Asia

→ **22%**  
Northeast Asia

→ **12%**  
Rest of the World



- ① BRAZIL
- ② CANADA
- ③ CHINA
- ④ GERMANY
- ⑤ INDIA
- ⑥ INDONESIA

- ⑦ MALAYSIA
- ⑧ NETHERLANDS
- ⑨ POLAND
- ⑩ PHILIPPINES
- ⑪ SINGAPORE
- ⑫ SOUTH AFRICA

- ⑬ THAILAND
- ⑭ TURKEY
- ⑮ UAE
- ⑯ USA
- ⑰ VIETNAM

Plant    Sales Office    Representative Office    R&D Laboratory

Countries of Product Distribution

We have 11 production sites in Malaysia, the Netherlands, Canada, Singapore and Germany, as well as 4 Research and Development (R&D) laboratories in Malaysia and the Netherlands.



**MALAYSIAN OPERATIONS**

**FEDERAL TERRITORY OF KUALA LUMPUR**

PETRONAS Chemicals Group is headquartered in the PETRONAS Twin Towers, Kuala Lumpur City Centre

**TERENGGANU**

**Kertih Integrated Petrochemical Complex (KIPC)**

- Ammonia
- Benzene
- Butanol
- Butyl Acetate
- Butyl Glycol Ethers
- Ethanolamines
- Ethylene
- Ethylene Glycols
- Ethoxylates
- Polyethylene Glycols
- Paraxylene
- Polyethylene
- Propylene
- Acetic Acid\*

**PAHANG**

**Gebeng Integrated Petrochemical Complex**

- Methyl Tertiary Butyl Ether
- Propylene
- Highly Reactive Polyisobutylene\*
- Acrylics\*
- Citral\*
- Citronellol\*
- L-Menthol\*
- 2-Ethylhexanoic Acid\*

**JOHOR**

**Pasir Gudang**

- Styrene Monomer\*

**KEDAH**

**Gurun**

- Ammonia
- Methanol
- Urea
- NPK Fertilisers\*

**FEDERAL TERRITORY OF LABUAN**

- Methanol

**SABAH**

**Sipitang**

- Ammonia
- Urea

**SARAWAK**

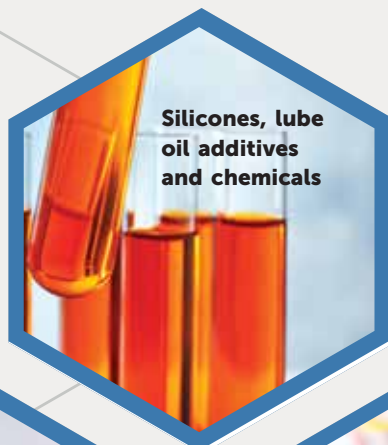
**Bintulu**

- Ammonia
- Urea

\* Produced by joint ventures and associates

# OUR PRODUCT PORTFOLIO

## P R O D U C T P O R T F O L I O



**Silicones, lube  
oil additives  
and chemicals**



**Polymers**



**Ammonia and  
fertilisers**



**Products from  
joint ventures  
and associates**



**Aromatics**



**Methanol  
and MTBE**



**Olefins, glycols  
and derivatives**



Further details of our products can be found on [www.petronaschemicals.com](http://www.petronaschemicals.com)



We produce a range of commodities and specialty chemicals that are used by customers in different sectors – from agriculture to automotive, and packaging to personal care – to manufacture items that enhance our daily life.

**A P P L I C A T I O N S**



# ABOUT THIS REPORT

## SCOPE OF REPORTING

For the past three years, we produced PCG's Sustainability Report to demonstrate our Environmental, Social and Governance (ESG) impact. The report provides a clear and concise account of what sustainability means to us, and how we deliver responsible, long-term value to our many stakeholders.

## REPORTING PERIOD & BOUNDARY

This report covers our sustainability performance for the 2020 calendar year, unless stated otherwise. Where available, we also include data from previous years to track our year-on-year progress. The report provides information on all our manufacturing subsidiaries in which we have more than 50% ownership. Following the acquisition of Da Vinci Group B.V. (DVG), we are only including data for DVG's operations in the Netherlands, where applicable. We will gradually include information from other DVG sites in future reports. The report also addresses our response to 12 material matters that impact business and stakeholder value, as shown on pages 18-21. The other four material matters are elaborated further in our Integrated Report 2020, pages 74-80.\*

## REPORTING STANDARDS

This report has been prepared in accordance with the Global Reporting Initiative (GRI) Standards: Core option. Additionally, we have adhered to the best practice sustainability guidelines, standards and frameworks as follows:

- Bursa Malaysia's Main Market Listing Requirements on Sustainability Reporting
- FTSE4Good Bursa Malaysia Index's Environmental, Social and Governance indicators
- International Petroleum Industry Environmental Conservation Associations' Oil and Gas Industry Guidance on Voluntary Sustainability Reporting
- Dow Jones Sustainability Index
- The United Nations Sustainable Development Goals

## INDEPENDENT ASSURANCE

The authenticity of the information provided in this report is verified with an independent assurance, as conducted by KPMG. This verification demonstrates our commitment to going the extra mile in our sustainability agenda.

## POINT OF CONTACT

We value your feedback and suggestions on how we can further improve our sustainability journey. Please contact our sustainability team at [petronaschemicals\\_ir@petronas.com](mailto:petronaschemicals_ir@petronas.com).



Further details of PETRONAS Chemicals Group Berhad can be found on [www.petronaschemicals.com](http://www.petronaschemicals.com)

## NAVIGATION ICONS

### MATERIAL MATTERS

	<b>Innovation &amp; Product Stewardship</b>		<b>Cybersecurity</b>
	<b>Customer Relationship Management</b>		<b>Supply Chain Management</b>
	<b>GHG Emissions &amp; Climate Adaptation</b>		<b>Corporate Governance</b>
	<b>Talent Development</b>		<b>Community Engagement</b>
	<b>New Plastics Economy (NPE)</b>		<b>Cost Management*</b>
	<b>Workplace and Occupational Safety &amp; Health (OSH)</b>		<b>Price Volatility*</b>
	<b>Human Rights &amp; Fair Employment</b>		<b>Asset Reliability*</b>
	<b>Environmental Stewardship</b>		<b>Market Volatility*</b>

### KEY STAKEHOLDER GROUPS

	<b>Employees</b>		<b>Shareholders &amp; Investment Community</b>
	<b>Customers</b>		<b>Government &amp; Regulators</b>
	<b>Suppliers &amp; Vendors</b>		<b>Communities</b>
	<b>Business Partners</b>		<b>Media</b>



While all the 17 SDGs are important, we have described in this report how PCG directly impacted 13 SDGs, as indicated by the coloured icons.

## LEADERSHIP COMMITMENT



**DATUK SAZALI HAMZAH**

*Managing Director/Chief Executive Officer*

### **DEAR STAKEHOLDERS,**

I am pleased to present PCG's Sustainability Report 2020. As we close the unprecedented year, we are proud to note that we did not falter on our sustainability commitments. The challenges faced in 2020 only intensified our focus on doing right for People, Planet & Profit, known as the 3Ps of our sustainability pillars.

## LEADERSHIP COMMITMENT



**We see sustainability as a way for us to remain profitable and competitive, now and into the future, while protecting employees, customers, communities, other stakeholders as well as the environment.**



We see sustainability as a way for us to remain profitable and competitive, now and into the future, while protecting employees, customers, communities, other stakeholders as well as the environment. We operate on the notion that environmental, social and governance (ESG) considerations are integral to our business growth.

The chemicals industry is a key player in driving sustainable development. This sector is at the centre of many global value chains, offering critical products that help society meet its needs. As one of the leading chemicals player in the region, we strive to catalyse the industry's sustainability journey. We continue to provide new solutions that meet stakeholders' demand for sustainable products; actively bringing innovation into value chains to help the world mitigate and recover from global challenges (e.g., low crude oil prices and COVID-19 pandemic amongst others). Working with our stakeholders, we aim to move the sector towards a more resilient and sustainable future.

#### **Economic Progress**

The work we do is an important engine of wealth creation. We deliver products and solutions to a range of crucial sectors, including agriculture, home & personal care, packaging, and construction. Our strong regional presence also spurs economic growth in the areas we operate; as we create employment opportunities and contribute to the local economy. With this in mind, we emphasise building long-term, responsible profits. This orientation allows us to meet customer expectations for products and solutions that contribute to our sustainable growth.

A key component of our product development is to look through our customers' lens. We continuously collaborate with international and domestic customers to better meet their needs. In doing so, we are able to deliver solutions that unlock customers' growth potential. Overall, we made great strides in innovation this year, in which we delivered

11 product solutions in response to the dynamic of the market and our customers' needs. For instance, we developed the PETRONAS Etilinas Alfatene PE3838MA, a high-quality and affordable bubble wrap that meet people's e-commerce packaging needs. With a rise in stakeholders' sustainability demands, we are also venturing into bio-based products and low-carbon solutions.

#### **Environmental Improvements**

We strive to minimise the environmental footprint of our operations, products and overall business. As the world faces increasing environmental challenges, such as climate change, pollution and waste mismanagement, we remain steadfast in playing our part. We see environmental stewardship as both a moral obligation and a business advantage.

Through responsible emissions management, we help mitigate global climate change as well as improve our operational costs. In 2017 we set an emissions reduction target of 100,000 tonne CO<sub>2</sub> equivalent (tCO<sub>2</sub>e) by 2024. With continuous improvement in energy efficiency through our Energy and Loss Management System, we are on track towards achieving our goal.

We understand the significant impact and concerns associated with plastic production. The current linear economy is contributing to plastic waste pollution, which impacts environmental and social health. Consequently, we are strongly committed to shifting the industry towards a New Plastics Economy. This means investing in innovative solutions and infrastructure that converts plastic waste into circular feedstock. In 2020, we completed a feasibility study with PLASTIC ENERGY Ltd to establish a facility that converts plastic waste to crude naphtha. Following this, we will continue with the next phase of the project, which is a detailed engineering study of the facility. By 2030, we aim to recover plastic waste that is equivalent to 100% of our domestic polymer sales volume. By supporting a circular economy, we can minimise waste, save resources and costs, as well as deliver value-added products to customers.

## LEADERSHIP COMMITMENT

**Social Development**

People are at the centre of everything we do. Employees drive our business forward; customers trust our product solutions to grow their business; suppliers deliver critical products and services for business continuity; and the communities where we operate provide essential support for the company. Therefore, through social responsibility, we focus on building an ecosystem of trust, respect and inclusion.

Firstly, we ensure that the rights of all stakeholders are consistently protected. We align with the United Nation's Guiding Principles on Business and Human Rights, which applies to all employees, suppliers and other parties working within our premises. In 2020, we introduced PCG's Human Rights Management e-learning module with the aim to raise awareness among employees of our commitment to human rights, the impacts of social risks to our business, and ways to control and mitigate these risks.

Additionally, we place the utmost priority on occupational safety and health. We invest in Safety Excellence to build a generative culture. Through our OSH efforts, we recorded a Lost Time Injury Frequency of 0.14, better than the industry benchmark of 0.26, which we have sustained since our inception in 2010. Following the health risks of COVID-19, we enhanced our safety guidelines and procedures to protect employees and contractors from the outbreak. The measures include implementing remote working arrangements, providing protective gear to onsite employees, constantly communicating with employees, contractors and suppliers on COVID-19 risks, proactively screening employees and immediate family members identified as frontliners, and conducting regular temperature screenings. We also collaborated closely with authorities, especially the Ministry of Health (MOH), for major activities such as plant turnaround, ensuring full compliance to Standard Operating Procedures and getting the necessary assistance from MOH.



**Through PCG's COVID-19 Relief Programme, we provided assistance and support to safeguard frontliners and community members against the pandemic. Overall, we reached over 70,000 people in-need through our community programmes.**



Furthermore, the dynamic chemicals industry means our talent requirements are continually evolving. We are continuously upskilling and developing our workforce to enable them to thrive – today and far into the future. This year, we invested RM17.6 million into employee training programmes, covering a range of areas including future-ready skills, leadership competency, commercial excellence and technical expertise.

As a responsible corporate citizen, our people empowerment initiatives also extend to local communities. We adopt Yayasan PETRONAS guiding principles and framework for community outreach, in which we deliver programmes focusing on Education, Community Well-Being & Development, and Environment. This year, we also prioritised easing the burden of those affected by COVID-19. Through PCG's COVID-19 Relief Programme, we provided assistance and support to safeguard frontliners and community members against the pandemic. Overall, we reached over 70,000 people in-need through our community programmes.

## LEADERSHIP COMMITMENT



Furthermore, we implemented measures to enhance cybersecurity and data protection. In the current era of digital, preserving the integrity of collected data is increasingly important.



#### Ethics & Integrity

Our commitment to integrity ensures that we always do the right thing for our stakeholders. We maintain good governance and ethical practices, which not only foster trust and respect, but also enable us to effectively execute our sustainability strategies. Our stringent system of integrity and ethics also makes us resilient against increased regulations and expectations on ESG issues. Therefore, we view good governance as a tool for sustainable growth. Our leadership team provides crucial oversight over key strategies and issues. We are guided by a Corporate Governance Framework, supported by stringent policies and guidelines designed to create transparency and trust.

Furthermore, we implement measures to enhance cybersecurity and data protection. In the current era of digital, preserving the integrity of collected data is increasingly important. We have a corporate responsibility to ensure that stakeholders' confidential data are protected from cyber risks, threats and attacks; as part of our cyber assurance. This year, we adopted and operationalised the PETRONAS Enterprise Cyber Security Governance Framework to effectively address and manage cyber threats, ensuring business-driven operational resilience. We also empowered employees' cybersecurity knowledge through a structured Human Firewall Campaign, which aims to raise cyber awareness and instil a sense of responsibility against cybersecurity threats, such as vigilance against phishing, safeguarding access and protecting company assets.

In closing, we understand that sustainability is an ongoing journey. It is continuously evolving based on emerging needs and challenges. At PCG, we will place greater focus on our sustainability agenda and fast-track our initiatives. Our goal is clear – to build a more **Resilient** world and propel the business towards **Sustainable Growth**.

#### DATUK SAZALI HAMZAH

*Managing Director/Chief Executive Officer*

# STAKEHOLDER ENGAGEMENT

At PCG, we understand and appreciate the important role that each stakeholder plays in our long-term success. Throughout the years, we actively engage with various stakeholder groups to keep them informed on our updates and, more importantly, to capture feedback on how we can better create value for them.

**Frequency of Engagement**

**D** Daily    **M** Monthly    **Q** Quarterly    **BA** Bi-Annually    **BM** Bi-Monthly  
**W** Weekly    **AM** Alternate Month    **A** Annually    **AR** As Required

**Quality of Engagement**

★ ★ ★ ★ ★ No existing relationship

★ ★ ★ ★ ★ Relationship established, but much work to be done to improve the quality of relationship

★ ★ ★ ★ ★ Relationship established, value-generating connection, but with some room for improvement

★ ★ ★ ★ ★ Good-quality, mutually beneficial relationship, with some room for improvement

★ ★ ★ ★ ★ Strong relationship of mutual benefit



## Employees

### WHY WE ENGAGE

With over 4,700 employees, we rely on our skilled and committed workforce to drive world-class manufacturing operations and execute our business objectives.

### KEY CONCERNS

- Health, safety and human rights
- Career progression
- Work-life balance
- Cybersecurity

### ENGAGEMENT PLATFORM

- Townhalls **A**
- Health, Safety & Environment (HSE) and cybersecurity campaigns **Q**
- People Development Committee meeting **AM**
- Intranet communication **W**
- Staff engagement **M**

### RESPONSE

- Closely monitor and enhance employee welfare and well-being
- Provide effective training and development programmes
- Offer flexible working arrangements
- Implement mandatory e-learning modules on cybersecurity



## Customers

### WHY WE ENGAGE

Our customers play a central role in our business growth. We need to understand their expectations in order to deliver value-added products that build customer loyalty.

### KEY CONCERNS

- Product quality and delivery
- Plastic and waste management
- Product pricing and credit terms

### ENGAGEMENT PLATFORM

- Meetings with customers **W**
- Customer satisfaction surveys **BA**
- Feedback management system **M**
- Customer appreciation programmes **A**
- Product stewardship and technical seminars **A**

### RESPONSE

- Design distinct value propositions for each customer segment
- Integrate product stewardship into product Research and Development process to develop safe and sustainable products
- Collaborate with strategic partners to develop high-performance and competitive products

STAKEHOLDER ENGAGEMENT




**Suppliers & Vendors**

**WHY WE ENGAGE**

Our suppliers deliver high-quality products and services that enable us to create value. At the same time, we provide suppliers with ongoing support and income to thrive in the market.

**ENGAGEMENT PLATFORM**

- Regular meetings
- Day-to-day interactions
- Forums
- Site visits

M  
D  
BA  
Q

**KEY CONCERNS**

- Health, safety and human rights
- Ethical business practices
- Sustainability in supply chain

**RESPONSE**

- Implement stringent policies that protect suppliers' welfare and well-being
- Provide robust grievance mechanisms for suppliers
- Incorporate environmental and social standards in our procurement process
- Conduct governance-related sharing sessions




**Business Partners**

**WHY WE ENGAGE**

We have business partnerships, through joint ventures, joint operations and associates, that provide mutually-beneficial support to the growth of our respective businesses.

**ENGAGEMENT PLATFORM**

- Day-to-day interactions
- Strategic dialogue
- Conferences/forums

M D  
BM  
BA

**KEY CONCERNS**

- Company performance
- Ethical business practices
- Continuous value creation

**RESPONSE**

- Closely monitor and enhance partnership benefits
- Strengthen good governance of business partnerships
- Provide a reliable supply of feedstock to partner ventures




**Shareholders & Investment Community**

**WHY WE ENGAGE**

Shareholders and investors provide the financial capital necessary for our sustainable growth. Therefore, we need to maintain their confidence in our ability to generate strong financial returns in a responsible manner.

**ENGAGEMENT PLATFORM**

- Investors & analyst briefings
- Site visits, meetings and conferences
- Annual general meetings
- Company website

Q  
M Q  
A  
Q AR

**KEY CONCERNS**

- Business sustainability
- Market dynamics
- Growth plans and project deliverables
- Shareholder returns
- Corporate governance

**RESPONSE**

- Maintain business excellence across manufacturing and commercial operations to optimise financial performance
- Enhance business continuity and crisis management plans
- Integrate sustainability development objectives into long-term corporate strategy and decision-making process
- Adopt corporate governance best practices
- Ensure compliance with internal and external policies and regulations
- Conduct governance-related training and awareness programmes for board members and employees



STAKEHOLDER ENGAGEMENT




**Government & Regulators**

**WHY WE ENGAGE**

The Government, through regulators, ensure that we operate within legal requirements. A strong relationship with government bodies allows us to stay ahead of changing regulations.

**KEY CONCERNS**

- Regulatory compliance
- Environmental management
- Health, safety and human rights
- Ethical business practices

**ENGAGEMENT PLATFORM**

- Regular reporting to relevant agencies **M**
- Plant visits by government agencies **Q**
- Regular meetings and briefings with agencies/regulators **Q**
- Joint working committee with state Governments **Q**

**RESPONSE**

- Strengthen governance policies, standards & frameworks and compliance towards regulation
- Regularly conduct internal and external audits
- Establish transparent communication with relevant bodies
- Collaborate with relevant agencies with common objectives




**Communities**

**WHY WE ENGAGE**

Communities may be directly or indirectly impacted by our operations, so it's important to understand their concerns. Community engagement also reflects our social citizenship and builds public trust.

**KEY CONCERNS**


- Safety of plant operations
- Quality of air and water emissions
- Job and other income-generating opportunities

**ENGAGEMENT PLATFORM**

- Corporate Social Responsibility (CSR) programmes **M**
- Briefings and engagement with local communities for each CSR programme **W**

**RESPONSE**

- Adopt stringent HSE best practices at PCG plants
- Regularly monitor air and water quality surrounding operations
- Invest in community development programmes

**Media**

**WHY WE ENGAGE**

The media presents an important communication link between our business and our stakeholders. They circulate important information that impacts our corporate brand reputation.

**KEY CONCERNS**

- Business performance
- Environmental management and sustainability efforts
- New innovation and technology

**ENGAGEMENT PLATFORM**

- Interviews with PCG management **Q**
- Media engagement **Q**
- Press releases **AR**

**RESPONSE**

- Foster open and transparent communication with the media
- Provide a speedy response to the media's enquiries on business developments
- Organise rapport-building activities

# MATERIAL MATTERS

A firm understanding of industry trends, operating challenges and stakeholder expectations enables us to deliver long-term value. Therefore, we devise our strategies and business plans according to the most material aspects of business growth and stakeholder needs. These material matters influence how PCG's leadership team steer the company towards sustainable growth.

## MATERIALITY ASSESSMENT

We conduct materiality assessments every two years to ensure that the material matters are timely and relevant, while also allowing time to incorporate the identified matters into our strategies. The material matters presented in this report are based on our most recent assessment, which was conducted in 2019. We apply the Global Reporting Initiative Principles of Stakeholder Inclusiveness, Sustainability Context, Materiality and Completeness during our materiality process.

### STEP 1. IDENTIFICATION



We review the trends, risks and opportunities that affect our strategic direction, which enables us to **identify** our most pertinent business issues

### STEP 2. STAKEHOLDER ENGAGEMENT



We analyse feedback received from internal and external **stakeholder engagement** channels to determine the top stakeholder concerns

### STEP 3. PRIORITISATION



We plot the identified topics onto a matrix to **prioritise** the top material matters that impact business growth and stakeholder decisions

### STEP 4. VALIDATION



We deliberate and **validate** the identified material matters with our Sustainable Development Working Committee and Management Committee

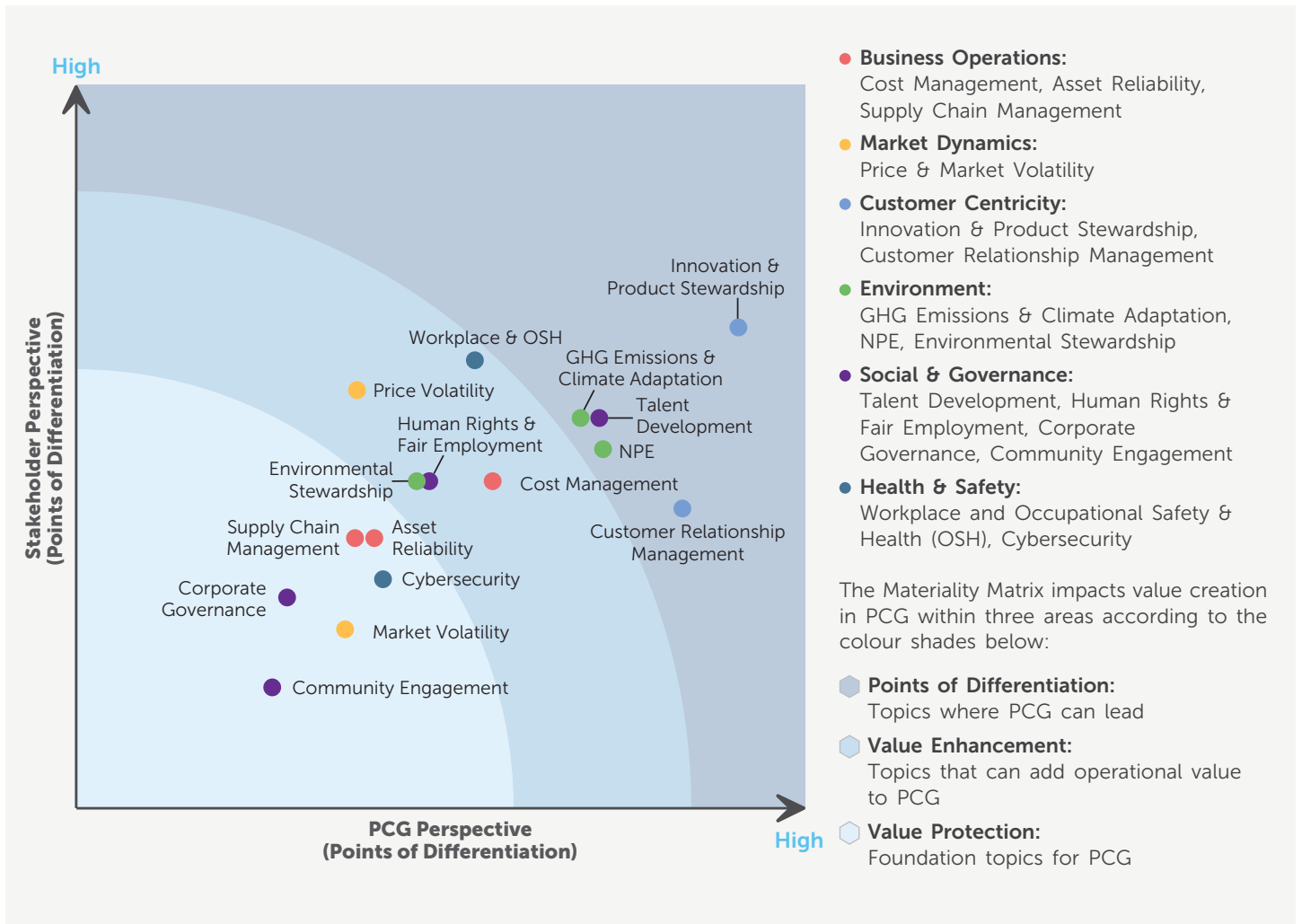
MATERIAL MATTERS

MATERIALITY MATRIX

Based on our materiality assessment, we identified 16 material matters that can either support or impede business growth. As shown in the materiality matrix, five of our material matters are of high priority:

- Innovation & Product Stewardship
- Customer Relationship Management
- Greenhouse Gas (GHG) Emissions & Climate Adaptation
- Talent Development
- New Plastics Economy (NPE)

Throughout this report, we focus on the 12 material matters essential to our sustainability agenda, as discussed on pages 18-21. The remaining four material matters – Cost Management, Price Volatility, Asset Reliability & Market Volatility – are discussed in detail in PCG’s Integrated Report 2020.




## MATERIAL MATTERS

## Our Material Matters

MATERIAL MATTERS	WHY IT IS IMPORTANT	RISKS
 <p><b>Innovation &amp; Product Stewardship</b></p>	<p>Innovative product solutions that are safe and sustainable enable us to meet customer and societal needs, providing us with a competitive edge.</p>	<ul style="list-style-type: none"> <li>• Late adoption of emerging technologies and innovations impacts our competitive edge</li> <li>• Slow expansion into specialty chemicals impedes growth aspirations</li> </ul>
 <p><b>Customer Relationship Management</b></p>	<p>Collaborative and meaningful customer relationships keep us in business. By staying ahead of their expectations, we build long-term customer trust and loyalty.</p>	<ul style="list-style-type: none"> <li>• Inability to sufficiently meet customer demands damages our brand reputation</li> <li>• Reduced customer confidence and loyalty lowers profitability and revenue</li> </ul>
 <p><b>GHG Emissions &amp; Climate Adaptation</b></p>	<p>Climate change poses direct and indirect threats to our profitability and sustainable growth. Mitigating and adapting to climate-related risks is crucial for resilience and sustainable growth.</p>	<ul style="list-style-type: none"> <li>• Reallocation of capitals to green investments by financial institutions impacts business funding</li> <li>• Inability to meet new climate-related regulations causes non-compliances and financial costs</li> </ul>
 <p><b>Talent Development</b></p>	<p>Employees drive our strategies forward. It is vital to attract and retain the industry's top talent, as well as future-proof them with skills needed to thrive in the long-term.</p>	<ul style="list-style-type: none"> <li>• Disengaged and underdeveloped employees contribute to poor productivity and performance</li> <li>• Lack of relevant skills and competencies hinders growth in derivatives and specialty chemicals</li> </ul>
 <p><b>New Plastics Economy</b></p>	<p>The current linear economy is unsustainable to environmental and social health. Addressing the growing plastic waste concern requires a circular economy approach that ensures sustainable consumption and production of plastic.</p>	<ul style="list-style-type: none"> <li>• Lack of action to address plastic waste damages the company's reputation</li> <li>• Slow transition to a circular economy lowers our competitive advantage in the long-term</li> </ul>
 <p><b>Workplace and Occupational Safety &amp; Health</b></p>	<p>As a responsible organisation, we need to always prioritise the health and safety of our people. In the conduct of business, OSH protects the company against financial, operational and legal ramifications.</p>	<ul style="list-style-type: none"> <li>• Accidents and injuries result in regulatory penalties and fines</li> <li>• Damaged assets impact operational continuity and financial loss</li> <li>• Restrictions in conducting business due to COVID-19</li> </ul>

MATERIAL MATTERS

OPPORTUNITIES	STAKEHOLDERS AFFECTED	OUR APPROACH, PERFORMANCE & KEY INITIATIVES	SDGs
<ul style="list-style-type: none"> <li>New and innovative products enable customers to penetrate new markets and grow their business</li> <li>Safe and sustainable products allow customers to maximise value from PCG products with minimum impact on health and the environment</li> </ul>		<p><b>SR</b> Read more on pages 32-35</p>	
<ul style="list-style-type: none"> <li>International collaborations and partnerships with customers maximise regional and global market growth</li> <li>Regular dialogues with customers enable continuous improvements to product solutions</li> </ul>		<p><b>SR</b> Read more on pages 36-37</p>	
<ul style="list-style-type: none"> <li>Effective emissions management improves stakeholder trust and public reputation</li> <li>Lower resource consumption contributes to cost savings and better performance</li> </ul>		<p><b>SR</b> Read more on pages 40-43</p>	
<ul style="list-style-type: none"> <li>An inclusive and empowering work culture improves agility and efficiency</li> <li>Effective employee development programmes attract top-quality industry talent</li> </ul>		<p><b>SR</b> Read more on pages 57-58</p>	
<ul style="list-style-type: none"> <li>Rapid advancements in NPE reinforces PCG's role as a chemicals industry leader</li> <li>Conversion of plastic waste into circular feedstock has the potential to create value-added products</li> </ul>		<p><b>SR</b> Read more on pages 44-45</p>	
<ul style="list-style-type: none"> <li>Emphasis on Health &amp; Safety culture attracts and retains top industry talent</li> <li>Branding as a safe and reputable manufacturer attracts investors</li> <li>Ensure business continuity without compromising the health and safety of the workers during the pandemic</li> </ul>		<p><b>SR</b> Read more on pages 54-56</p>	

## MATERIAL MATTERS

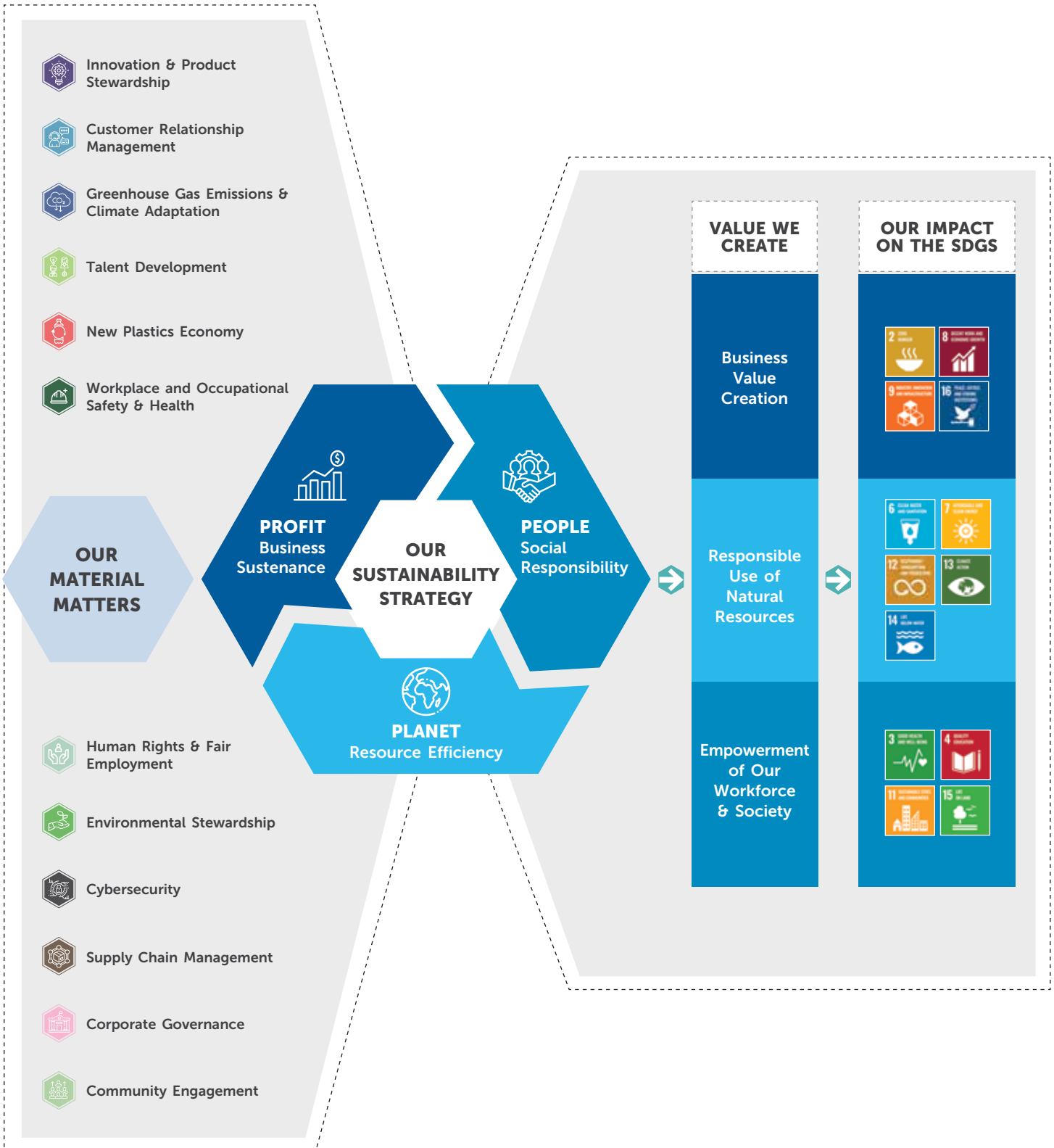
MATERIAL MATTERS	WHY IT IS IMPORTANT	RISKS
 <p><b>Human Rights &amp; Fair Employment</b></p>	<p>Basic human rights and fair employment is a fundamental aspect of any responsible business. Protecting these rights create a stable and inclusive operating environment in which all stakeholders can thrive.</p>	<ul style="list-style-type: none"> <li>• Breaches in human rights lead to regulatory penalties and costs</li> <li>• Reputational damage from breaches results in loss of customers and public trust</li> </ul>
 <p><b>Environmental Stewardship</b></p>	<p>Responsible environmental practices not only protect society and the planet from pollution and degradation, but also protects our business from regulatory, reputational and operational costs.</p>	<ul style="list-style-type: none"> <li>• Environmental non-compliances lead to regulatory penalties and fines</li> <li>• Unsustainable environmental practices negatively impact public trust and confidence</li> </ul>
 <p><b>Cybersecurity</b></p>	<p>As we enhance the digitalisation of systems and processes, we are increasingly exposed to cyber attacks and breaches. It is our corporate duty to protect the business and stakeholders from malicious cyber crime.</p>	<ul style="list-style-type: none"> <li>• Network intrusion of operations delays delivery of customer products</li> <li>• Cybersecurity breaches and data loss leads to significant recovery costs, business disruption and reputational damage</li> </ul>
 <p><b>Supply Chain Management</b></p>	<p>Issues faced by suppliers can create a ripple effect across the value chain. Strong supply chain management is key to operational efficiency, as we maintain reliable feedstock, end product deliveries and service from our suppliers.</p>	<ul style="list-style-type: none"> <li>• Disruptions in feedstock supply, end product deliveries and services directly impacts operational continuity, production volume, company financial health and reputation</li> <li>• Weak supply chain relationships result in unreliable service and adversely affect company market shares against competitors</li> </ul>
 <p><b>Corporate Governance</b></p>	<p>Good corporate governance is central to sustainable growth. A robust governance system protects the best interest of both business and stakeholders.</p>	<ul style="list-style-type: none"> <li>• Corruption and misconduct cases result in reputational damage</li> <li>• Severe breaches in corporate governance result in forced stop-work orders or business closure</li> </ul>
 <p><b>Community Engagement</b></p>	<p>Community engagement programmes create an ecosystem of trust and growth. By empowering communities where we operate, we reinforce our commitment to social development and corporate responsibility.</p>	<ul style="list-style-type: none"> <li>• Business activities that negatively impact communities leads to loss of stakeholder confidence</li> <li>• Community-related disagreements or tensions may result in protests and boycotts</li> </ul>

MATERIAL MATTERS

	OPPORTUNITIES	STAKEHOLDERS AFFECTED	OUR APPROACH, PERFORMANCE & KEY INITIATIVES	SDGs
	<ul style="list-style-type: none"> <li>• Branding as a fair employer attracts high-quality talents</li> <li>• Strong human rights practices reinforce reputation as a corporate citizen</li> </ul>		<p><b>SR</b> Read more on pages 50-53</p>	
	<ul style="list-style-type: none"> <li>• Waste reduction and resource efficiency reduce operational costs</li> <li>• Environmentally responsible activities attract investors and funding opportunities</li> </ul>		<p><b>SR</b> Read more on pages 46-49</p>	
	<ul style="list-style-type: none"> <li>• Robust cybersecurity measures build stakeholder trust</li> <li>• Safe use of digital application improves operational efficiency and supports innovation</li> </ul>		<p><b>SR</b> Read more on pages 66</p>	
	<ul style="list-style-type: none"> <li>• Strong partnerships with suppliers and customers enhance downstream supply and productivity</li> <li>• Relevantly skilled suppliers help maintain PCG's standard of HSE performance</li> </ul>		<p><b>SR</b> Read more on pages 38-39</p>	
	<ul style="list-style-type: none"> <li>• High transparency leads to the efficient execution of business plans and strategy</li> <li>• Good governance creates a high-performance work environment</li> </ul>		<p><b>SR</b> Read more on pages 62-65</p>	
	<ul style="list-style-type: none"> <li>• Community engagement provides insight into the efficient execution of key projects, e.g., NPE</li> <li>• Social responsibility programmes increase visibility as a caring organisation</li> <li>• Provide support and contribution to communities during the pandemic</li> </ul>		<p><b>SR</b> Read more on pages 59-61</p>	

# SUSTAINABILITY FRAMEWORK

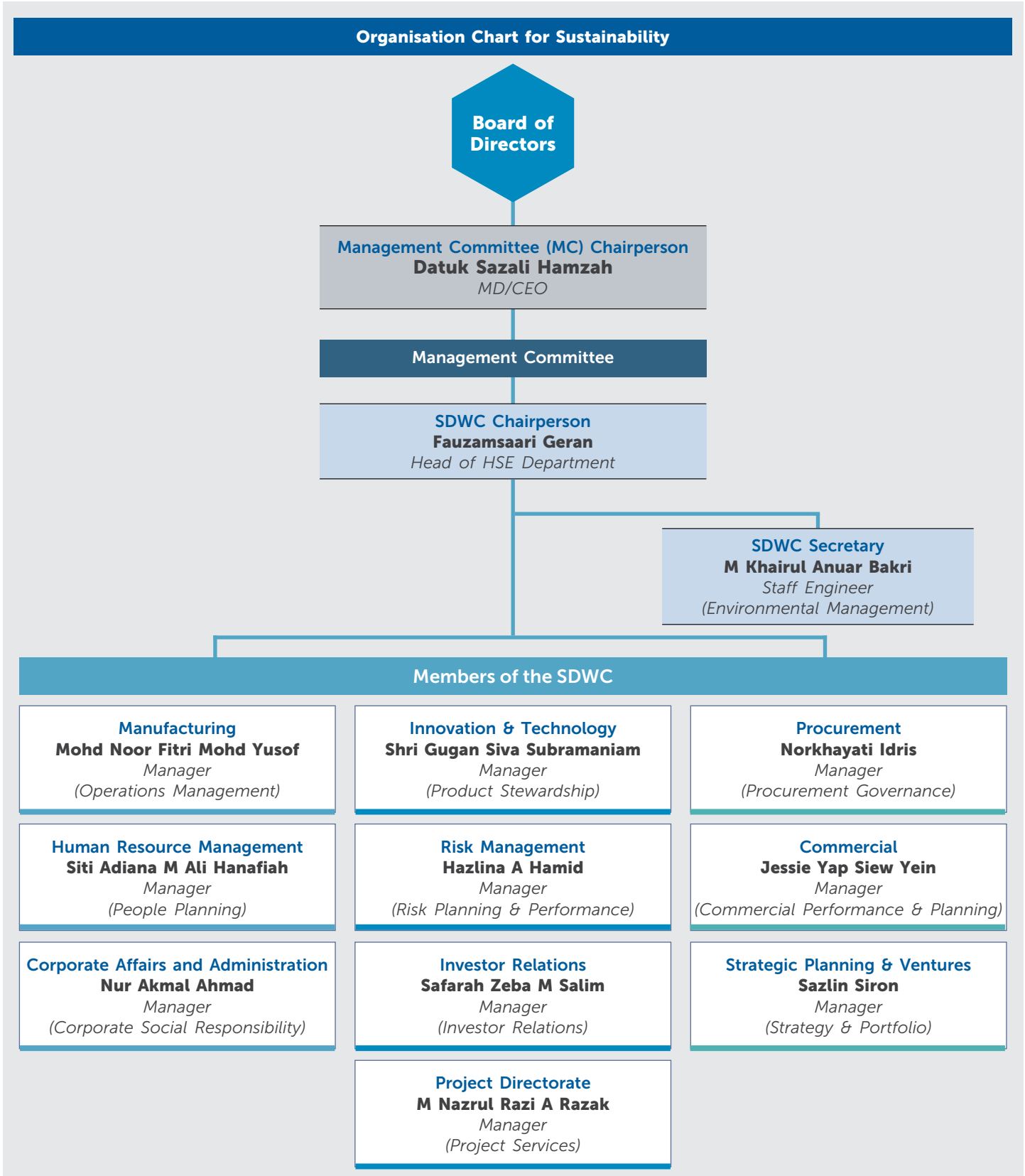
We are driven by a deep-rooted commitment to operating in a manner that is environmentally and socially responsible. A sustainability-based approach allows us to meet the needs of stakeholders, as well as deal with the complex challenges of a modern world. Hence, we developed a sustainability strategy that forms a blueprint for PCG's sustainability journey. It covers our three broad sustainability focus areas – Social Responsibility (People), Resource Efficiency (Planet), and Business Sustainance (Profit). The strategy aligns with the Group's business priorities and material matters, and brings a positive impact to the United Nation's Sustainable Development Goals (SDGs). To optimise our SDG contributions, we focus on 13 goals directly impacted by our operations and activities.





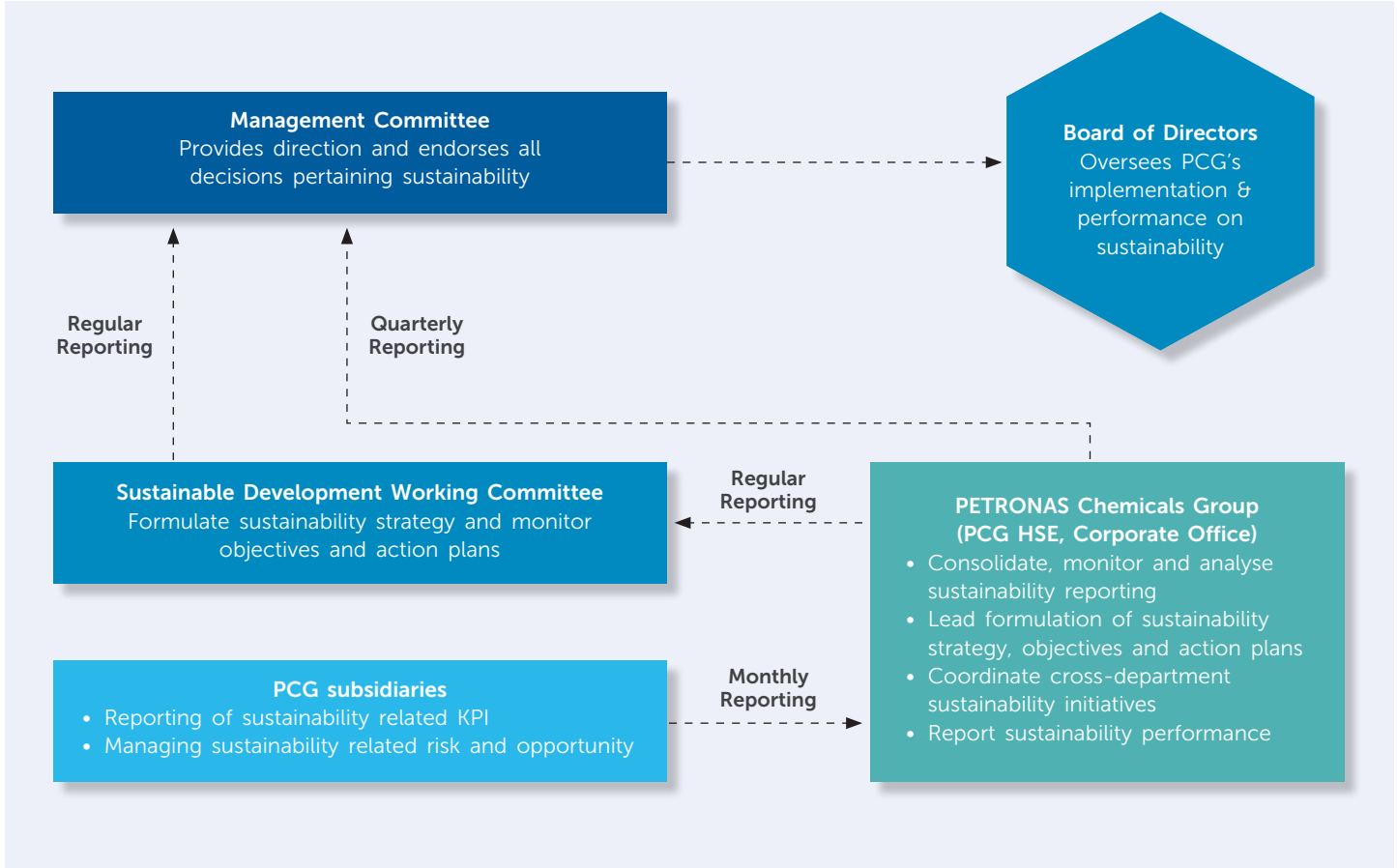
# GOVERNANCE STRUCTURE

Our governance structure enables transparency and accountability in executing our sustainability strategies. There is a clear delineation of roles and responsibilities for better decision-making and implementation. We have a Sustainable Development Working Committee (SDWC) that spearheads our sustainability agenda, which is then reviewed and approved by the Management Committee. Through strong sustainability governance, we uphold the highest level of integrity and efficiency in our sustainability agenda.



## GOVERNANCE STRUCTURE

### ROLES & RESPONSIBILITIES



• **Role of the SDWC:**

1. Reviews quarterly information that will be reported to the Management Committee. This includes:



2. Monitor quarterly performance indicators against targets.
3. Coordinates cross-departmental enhancements and initiatives.
4. Conducts an annual materiality assessment to determine PCG's sustainability focus areas and formulate sustainability strategy.
5. Reviews data related to each material matter that will be publicly reported.
6. Implement initiatives that are required to support each material matter.

# MEMBERSHIPS & ASSOCIATIONS

Our sustainability journey relies on strategic collaboration with public and private organisations across various sectors. We actively participate in a range of associations to exchange knowledge and insight into sustainability best practices, including industry trends, new regulations and technological advances.

Associations	Details	
Methanol Institute	Board Member	International
International Fertilizer Association	Member	International
Regional Olefins Producers Technical Committee	Member	International
Malaysian Petrochemicals Association	MPA Council President	National
Malaysia Sustainable Plastic Alliance	Founding Member	National
Fertilizer Industry Association of Malaysia	Committee Member	National
Institution of Chemical Engineers Malaysia Chapter	Board Member	National
Malaysian Plastics Manufacturers Association	Member	National



# AWARDS AND RECOGNITIONS

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**Royal Society for the Prevention of Accidents (RoSPA)**

- RoSPA President's Award
- Silver Award

**2019 ASEAN Corporate Governance Scorecard Awards by Minority Shareholders Watch Group (MSWG)**

- Industry Excellence Award (Industrial Product & Services category)
- Excellence Award for Overall Corporate Governance & Performance (4<sup>th</sup> ranking)

**Australasian Reporting Awards (ARA)**

Gold Award

**National Annual Corporate Reports Award (NACRA) 2020**

Best Sustainability Reporting (Gold)

**Prime Minister's Hibiscus Award 2019/2020**

- Excellent Achievement Award in Environmental Performance
- Exceptional Achievement Award in Environmental Performance
- Notable Achievement Award in Environmental Performance
- Silver Award for Special Project

**38<sup>th</sup> Malaysian Society for Occupational Safety & Health (MSOSH) OSH Award**

- Grand Award
- Gold Merit Award

**Institut Kimia Malaysia (IKM) Laboratory Excellence Award 2020**

- Silver Award
- Excellent Award

**IChemE Malaysia Awards 2020**

- Highly commendable award for Sustainability category
-

**Malaysia Productivity Corporation (MPC) – Annual Productivity & Innovation Conference and Exposition (APIC) 2020**

- Industry 4.0 Award
- Overall Winner of Manufacturing Category
- Top 20 team in Manufacturing Sector
- Top 20 team in 5S Category
- 5 Star Award

**MPC – Regional Innovation Showcase on Team Excellence (RISTEx)**

- Gold Award
- Industry 4.0 Award

**Best Graduate Employer in Malaysia category Chemical Sector awarded by GRADUATES' CHOICE AWARD**



## RISK MANAGEMENT & SUSTAINABILITY

At PCG, we proactively identify, analyse and manage risks that materially impact our value creation abilities, including sustainability related risks and opportunities. Environmental, Social and Governance (ESG) factors are fundamental to business resilience and stakeholder trust. Therefore, we adopt a holistic view on the interrelations between our strategy, ESG risks and sustainability.

We are guided by ISO 31000 Risk Management, which is incorporated into PCG's risk policy, frameworks and guidelines. The risk assessment includes evaluating sustainability issues across the Group, including at our plant and facilities, projects and various business levels. We apply our risk management approach for sustainability related areas, such as:

- Evaluate risks and opportunities arising from concerns over plastic pollution that may impact our polymer business
- Assess carbon pricing during project feasibility studies to identify carbon-related risks for new projects
- Conduct an Environmental Impact Assessment before commencing on new projects as well as Environmental Aspect Impact Assessment during operations
- Conduct a Social Risk Assessment, which covers potential human right breaches in our supply chain

Additionally, we strive to meet the standards of global sustainability indices to improve our governance and disclosures on sustainability-related risks in meeting our stakeholder expectations.

1. **Dow Jones Sustainability Index (DJSI):** Tracks our stock performance in terms of ESG criteria. Our near-term target is to be listed in the DJSI\*.
2. **FTSE4Good Bursa Malaysia Index:** Measures our performance and progress in environmental, social and governance practices, which is administered by the Financial Times Stock Exchange-Russell Group (FTSE).















Managing risk assessment at our plant

\* DJSI Global indices: top 10% based on sustainability scores  
DJSI Regional indices: top 20% based on sustainability scores

# SUSTAINABILITY GUIDELINES

Transparency, fairness and accountability are the values that guide our sustainability initiatives. The following policies and guidelines are put in place to govern the strategies and initiatives in relation to our material matters.

Material Matters	List of Policies
 <b>Innovation &amp; Product Stewardship</b>	<ul style="list-style-type: none"> <li>• Research &amp; Development management guideline for PETRONAS Chemicals Group</li> <li>• Product Sustainable Design Guideline</li> </ul>
 <b>Customer Relationship Management</b>	<ul style="list-style-type: none"> <li>• PETRONAS Anti-Bribery and Corruption (ABC) Manual</li> <li>• PETRONAS Code of Conduct &amp; Business Ethics</li> </ul>
 <b>GHG Emissions &amp; Climate Adaptation</b>	<ul style="list-style-type: none"> <li>• PETRONAS Net Zero Carbon Emissions Handbook</li> <li>• PETRONAS Sustainable Development Management Guideline</li> <li>• PETRONAS Carbon Commitments</li> </ul>
 <b>Talent Development</b>	<ul style="list-style-type: none"> <li>• PETRONAS Leadership Framework</li> </ul>
 <b>New Plastics Economy</b>	<ul style="list-style-type: none"> <li>• PCG Sustainability Agenda</li> <li>• NPE Communication Plan</li> </ul>
 <b>Workplace and Occupational Safety &amp; Health</b>	<ul style="list-style-type: none"> <li>• PCG Health, Safety &amp; Environment (HSE) Policy</li> <li>• PETRONAS Mandatory Control Framework</li> </ul>
 <b>Human Rights &amp; Fair Employment</b>	<ul style="list-style-type: none"> <li>• PETRONAS Human Rights Commitment</li> <li>• PETRONAS Contractors Code of Conduct on Human Rights</li> <li>• Collective Agreement Guidelines</li> </ul>
 <b>Environmental Stewardship</b>	<ul style="list-style-type: none"> <li>• PCG HSE Policy</li> <li>• PETRONAS Mandatory Control Framework</li> </ul>
 <b>Cybersecurity</b>	<ul style="list-style-type: none"> <li>• PETRONAS ICT Principles</li> <li>• PETRONAS Enterprise Cyber Security Governance Framework</li> <li>• PETRONAS Cyber Security Control Standards</li> <li>• PETRONAS Cyber Security Risk Management Guidelines</li> <li>• PETRONAS Records Management Standards &amp; Guidelines</li> </ul>
 <b>Supply Chain Management</b>	<ul style="list-style-type: none"> <li>• PETRONAS CoCHR</li> <li>• PETRONAS Tender and Contracts Administrative Manual</li> <li>• Compliance Clauses (Ethics And Anti-Bribery, Anti-Money Laundering, Competition Laws, Personal Data Protection, Sanctions, Human Rights)</li> </ul>
 <b>Corporate Governance</b>	<ul style="list-style-type: none"> <li>• PETRONAS ABC Manual</li> <li>• PETRONAS Code of Conduct &amp; Business Ethics</li> <li>• PETRONAS Whistleblowing Policy</li> </ul>
 <b>Community Engagement</b>	<ul style="list-style-type: none"> <li>• Yayasan PETRONAS Guidelines for Donation</li> <li>• Yayasan PETRONAS Guidelines for Programme Development and Execution</li> <li>• PETRONAS Strategic Communications Management System</li> </ul>

# SUSTAINABILITY SCORECARD

## ECONOMIC

Production Volume  
**10.7 million tpa**  
2019: 10.4 million tpa



Sales Volume  
**8.2 million tpa**  
2019: 8.4 million tpa



Plant Utilisation (PU)  
**94%**  
2019: 92%



Order Fulfilment Reliability  
**97%**  
2019: 97%

Combined Production capacity  
**12.8 million tpa**



**60%** of total procurement spending towards local suppliers



Number of new products launched  
**11 products**  
2019: 6 products



Number of Co-creations  
**21 Application Solutions**

## ENVIRONMENTAL

### AIR



GHG Emissions Intensity  
**0.80 tonne CO<sub>2</sub>e/tonne**  
2019: 0.83 tonne CO<sub>2</sub>e/tonne



GHG Emissions Intensity Reduction  
**4%** from 2019

GHG Emissions  
**7.10 million tonne CO<sub>2</sub>e**  
2019: 7.02 million tonne CO<sub>2</sub>e  
2024: 6.92 million tonne CO<sub>2</sub>e Target

GHG Emissions Reduction\*\*  
**0.05 million tonne CO<sub>2</sub>e**  
2019: 0.04 million tonne CO<sub>2</sub>e  
2024: 0.10 million tonne CO<sub>2</sub>e Target

Air Emissions Intensity  
**2.66 tonne/kilotonne**  
2019: 3.48 tonne/kilotonne

Air Emissions (NO<sub>x</sub>)  
**23.31 kilotonne**  
2019: 28.61 kilotonne

Air Emissions (SO<sub>x</sub>)  
**0.34 kilotonne**  
2019: 0.84 kilotonne

### WASTE



Waste 3R  
**85%**  
2019: 70%  
2024: 82% Target

Waste Generation  
**27.0 kilotonne**  
2019: 25.5 kilotonne



**SOCIAL**

**WATER**



Freshwater withdrawal  
**37.83**  
 million m<sup>3</sup>  
 2019: 37.06 million m<sup>3</sup>

Freshwater withdrawal Intensity  
**4.25 m<sup>3</sup>/tonne**  
 2019: 4.37 m<sup>3</sup>/tonne



Wastewater Discharge  
**170.9 tonne**  
 2019: 153.7 tonne

Wastewater Discharge Intensity  
**0.02 tonne/kilotonne**  
 2019: 0.02 tonne/kilotonne

**ENERGY**



Energy Intensity  
**15.73**  
 GJ/tonne  
 2019: 15.37 GJ/tonne  
 2020: 15.85 GJ/tonne <sup>Target</sup>

Energy Intensity Reduction  
**11%**  
 from baseline  
 2020: 10% <sup>Target</sup>

Energy Consumed  
**110.01**  
 million GJ

**ECOCARE**



Mangrove Trees/  
 Seedlings Planted  
**2,000**  
 2019: 6,319



Community Members Reached  
**~70,000 people**  
 2019: 20,000 people  
 2024: 100,000\*\* people <sup>Target</sup>

Product Stewardship  
**14 sessions**  
 2019: 8 sessions

Product stewardship and technical seminars conducted for 997 people from seven countries



World-Class Safety Performance  
**0.14**  
 Lost Time Injury Frequency (LTIF)  
 lower than oil & gas industry benchmark of 0.26  
 2019: 0.08



Employee Training & Development  
**RM17.6 million**  
 Invested

Female Workforce  
**17%**



Women in Board & Senior Management  
**25%**  
 of Board members and 24% of senior management are women



Training Hours  
**26 (man-hours)**  
 On average per employee



NPE Education Reach  
**1,300**  
 teachers

\* Intensity is calculated based on overall production  
 \*\* Cumulative numbers



## CATALYSING ECONOMIC PERFORMANCE

The chemicals industry is a major economic force – one that employs millions of people globally and generates billions of dollars in shareholder value and tax revenues for Governments. As the chemical industry lies at the heart of several value chains, it is also a solution provider to other economic sectors which plays a pivotal role in leading a sustainable economic recovery. Our emphasis is to maximise profitability in the long term, with our assets acting as an economic catalyst in our operating locations. This allows us to share the wealth generated with current and future stakeholders. With efficient collaboration, we offer solutions that meet new consumer demand for sustainable products, as well as play a proactive role in bringing innovation into value chains to help the sector move towards a renewable, circular and resilient future.



### Innovation & Product Stewardship

32 products and co-created application solutions



### Customer Relationship Management

97% Order Fulfilment Reliability



### Supply Chain Management

Zero cases of grievances received from suppliers

## INNOVATION & PRODUCT STEWARDSHIP

### WHY IS THIS IMPORTANT?

To meet the fast-changing market demands and emerging trends of the chemicals industry, it is essential to continuously innovate and develop solutions that position our businesses for future growth. Our competitive edge requires undertaking long-term ventures into emerging technologies that align with our strategic direction. The downstream market is increasingly shifting towards more sustainable solutions, such as products and services that contribute to a circular economy, support low-carbon transition, and meet developing population needs. These trends signal significant commercial opportunities in delivering products that meet customers and societal needs. The chemicals industry has the potential to deliver products that contribute to social and environmental well-being, thus contributing to the United Nations Sustainability Development Goals (UN SDGs).

Furthermore, customised product solutions help our customers penetrate new markets, grow their business, and derive optimal value from the products. At the same time, innovative, high-quality and safe product development strengthens our position as a reputable solutions partner and creates unshakeable customer loyalty. The early adoption of emerging technologies and innovations is key to staying ahead of the competition, and enables us to expand into specialty chemicals and new products that support our growth agenda.

## INNOVATION & PRODUCT STEWARDSHIP

### WHAT IS OUR APPROACH?

As a leading chemical solutions provider in the market, PCG delivers innovative product solutions that build a competitive advantage and meet customer and societal needs. Our approach focuses on working with Product Research and Development (R&D) programmes and collaborating with customers to meet their needs and aspirations. We systematically execute product R&D to create product solutions that address market risks and trends. As a signatory of the Responsible Care® Global Charter, we follow the principles and approach set out in the Responsible Care® programme to maximise the value of our innovations and minimise environmental impacts. This includes product design studies that allow us to assess raw materials for potentially hazardous substances and prioritise sustainable design criteria to maximise product benefits.

Our innovative culture requires looking through the customers' lens to increase product value. Through excellent customer collaboration, we co-create application solutions that meet customer needs and push product performance boundaries. Additionally, we place great emphasis on product quality. We proactively track and monitor legislative developments to ensure all our product innovations comply with regulatory requirements in the countries that PCG serves. This includes requirements across global chemical management, labelling requirements, dangerous goods transportation, banned/restricted chemical management, and Halal Assurance Systems. Our rigorous product stewardship programmes ensure all innovations fulfil the highest quality and safety standards throughout their lifecycle. Ultimately, we provide customers and relevant stakeholders with the skills and knowledge to safely handle and use our products while minimising their environmental footprint.



PCG's Surfactant Laboratory, Bangi

## INNOVATION & PRODUCT STEWARDSHIP

### HOW DID WE CREATE VALUE?

#### Product development and co-creation with customers

- Collaborated with customers to co-create product application solutions that improve sustainability across the value chain. These solutions unlock the full potential of customers' business growth, while minimising the environmental impacts and improving the social performance of countless end-use applications.
- 2020 has seen an achievement in innovation where PCG delivered 11 product solutions in response to the dynamic of the market and our customer's needs. In becoming a total solutions partner, our efforts are further intensified with webinars and online engagements. This creates more opportunities for PCG to provide technical support.

#### Sustainable Research & Technology (R&T)

- Focused on sustainable bio-based and natural chemicals derivatives as well as enabling a circular economy, where we are at the pilot stage of an R&T project for a single-step conversion of biomass into high-value chemicals.
- Ventured into three bio-based R&T projects which focus on creation of natural-based friendly specialty chemicals for home & personal care.

#### Product Stewardship

- Organised 14 product stewardship and technical seminars and reached an audience of 997 in Malaysia, Singapore, Thailand, Philippines, Indonesia, Vietnam and China. The seminars trained customers and relevant stakeholders on how to safely and responsibly handle our products, as well as derive its maximum value.
- Developed Global Product Safety Summaries for 23 key chemical products, to date, to tabulate accurate information on the hazards and risk mitigation of PCG chemical products. This was done in partnership with the International Council of Chemical Associations.

#### Regulatory Compliance

- Renewed the halal certification for PC LDPE Sdn Bhd and PC Polyethylene Sdn Bhd in November 2020.
- Organised an external audit for PC MTBE Sdn Bhd by the National Authority for Chemical Weapons Convention; reaffirming our compliance with the convention's obligations and requirements.
- Complied with the following international certifications to achieve best-in-class safety for food packaging:
  - United States Food and Drug Administration Approval
  - European Union (EU) 10/2011 Food Contact Material Certification
  - China GB 4806.1-2016: National Food Safety Standard-General Safety Requirements on Food Contact Materials and Articles
- Certified PC LPDE polymer grade C150Y to comply with China GB 4806.1-2016: National Food Safety Standard – General Safety Requirements on Food Contact Materials and Articles.



PC Methanol laboratory in Labuan

#### Lifecycle Assessment (LCA) of Products

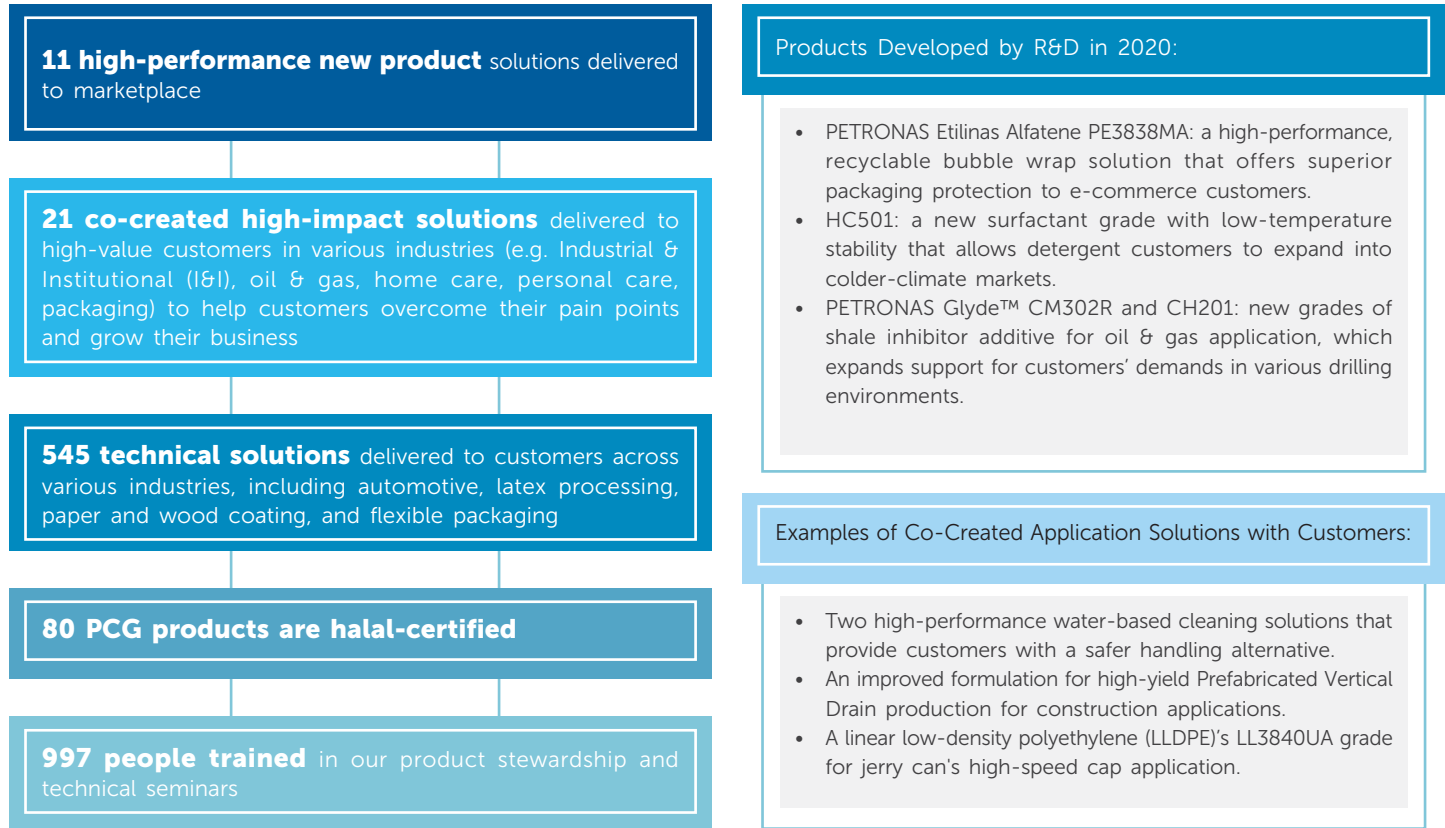
- Completed LCA for an additional four products by assessing their footprint on 18 health and environmental impact categories.
- Completed LCA assessments for 56% of all our existing products, to date, and aim to complete LCA assessments for all existing PCG products by 2023.

#### Halal Certification

- Ensured our products are halal-certified according to Malaysian Standards (MS) 1500: 2009 and MS 2200-1:2008. This enables us to serve customer segments that produce halal-certified consumer goods, such as food packaging, personal care and cosmetics.

## INNOVATION & PRODUCT STEWARDSHIP

### WHAT WERE THE ACHIEVEMENTS?



### Product Safety Communication

Responded to customer requests regarding products



Indicators	Target & Results	2018	2019	2020
Number of new products launched	Target	1	2	5
	Results	1	6	11
Number of co-creations	Target	10	15	20
	Results	10	13	21
Number of technical solutions	Target	50	100	350
	Results	53	183	545
Number of product stewardship & technical seminars	Target	3	5	6
	Results	6	8	14

We have revised our reporting boundary to include DVG for 2019 onwards. The changes have been restated in this year's report as above.

# CUSTOMER RELATIONSHIP MANAGEMENT

## WHY IS THIS IMPORTANT?

A meaningful Customer Relationship Management (CRM) is the ultimate business sustainability strategy. It is premised on building sustainable and collaborative partnerships with customers; delivering innovative products to meet their needs and add value to their business. As our customers are at the very heart of everything we do, our services' quality is anchored on staying ahead of their expectations to build long-term customer trust and loyalty. These relationships promote international partnerships with customers to maximise regional and global market growth. Regular dialogues and collaboration with customers also enable continuous improvements to product solutions. With an increasing number of market competitors, we are constantly expected to bring something new to the table. Utilising opportunities that other players would have missed, such as formulating customer engagement strategies, acts as our key differentiating factor.

## WHAT IS OUR APPROACH?

At PCG, we understand the importance of strong customer relationships in our sustainable growth. We enhance customer loyalty by proactively meeting customer expectations and requirements. This includes continuously strengthening our relationships with our existing customers while building strong relationships with new customers, based on a track record of consistent and high-quality product deliveries. Our customers' needs are continuously evolving, so innovating to satisfy their changing needs is part of our efforts to improve customer satisfaction. We offer distinct value propositions for different customer segments according to their specific pain points and business needs; collaborating with strategic partners to develop high-quality product offerings and application solutions. To further improve ongoing customer engagement and dialogues, PCG adopts digital systems that deliver a more reliable, efficient and effective customer experience.

## HOW DID WE CREATE VALUE?

### Digitalisation:

Implemented new digital systems to improve customer relationship management. These new systems include:

#### • Sales Force Automation (SFA)

- Expanded the functions of SFA with Account Management, Visit & Feedback management, Lead to Cash, and Order Management.
- Implemented a versatile yet scalable CRM application under SFA that provides PETRONAS Chemicals Marketing (Labuan) sales team with the necessary functions to win over customers.



#### • Customer Delivery Excellence (CDEx)

- Launched CDEx, a platform that offers better visibility and customer experience in terms of product delivery. Customers can easily arrange and monitor the delivery status once a sales order is released and will receive auto-notifications on their orders for both Delivered-at-Place and Ex-Work terms.

## CUSTOMER RELATIONSHIP MANAGEMENT

### Partnerships & Collaborations

- Engaged with local industry associations and authorities to effectively respond to customers' needs during the pandemic and accelerate our sustainability agenda. These associations and agencies include:

- Ministry of Domestic Trade and Consumer Affairs
- Ministry of International Trade and Industry
- Malaysian Petrochemicals Association
- Malaysian Plastic Manufacturers Association
- Federation of Malaysian Manufacturers

- Collaborated with an established partner to develop alternative surfactant for degreaser formulation for industrial and institutional application.

### Packaging & Transportation

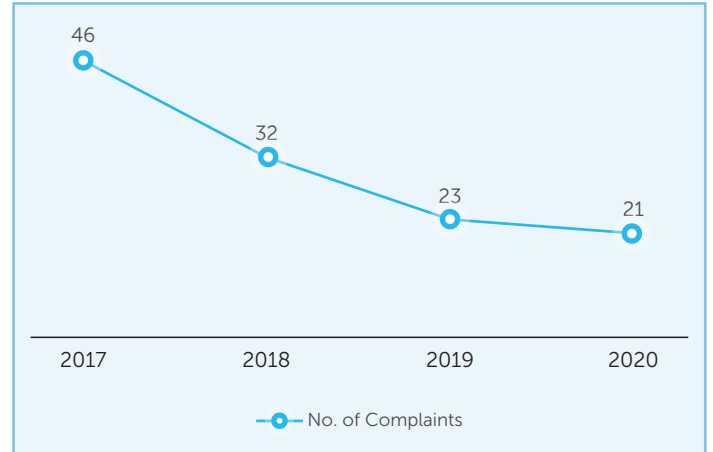
Expanded our product packaging method with two flexitank facilities, a cheaper alternative with a shorter lead time than ISO tank.

Embarked on a local methanol distribution in China and Indonesia, allowing us to store and deliver products to customers promptly (compared to shipping from Labuan).

Implemented our Road Transport Operational Guideline (RTOG) to logistics service providers for the safe and timely delivery of products to customers.

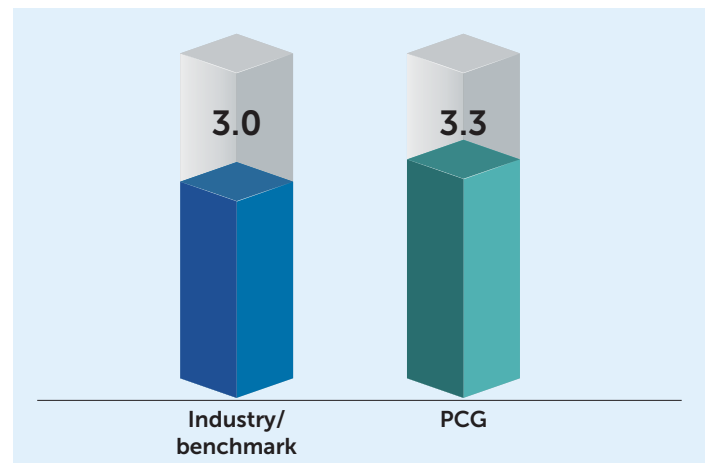
### WHAT WERE THE ACHIEVEMENTS?

#### Lowest number of complaints in 2020



Indicators	Target & Results	2018	2019	2020
Order fulfilment reliability (%)	Target	90	95	95
	Results	93	97	97
Total vehicle accident rate	Limit	0.25	0.25	0.24
	Results	0.34	0.07	0.13

### Overall Customer Satisfaction



The last survey, conducted at the end of 2018, was very encouraging, with PCG scoring 3.3 out of 4.0 compared to 3.0 previously. The results demonstrated customers' satisfaction, loyalty and trust with the Group. This year, we postponed our planned Customer Satisfaction Survey to 2021 to allow customers to focus on other important matters during the pandemic.

# SUPPLY CHAIN MANAGEMENT

## WHY IS THIS IMPORTANT?

As a corporate citizen, we need to incorporate ethical social, environmental, and governance practice across our supply chain, taking responsibility for the life cycle of products and protecting workers' rights. Issues faced by suppliers can create a ripple effect across the value chain, which disrupts our ability to meet stakeholder needs. Therefore, a strong supply chain management is key to operational efficiency, as we maintain reliable feedstock and service from suppliers. Strong partnerships with relevantly skilled suppliers enhance downstream productivity, as well as maintain PCG's standard of health, safety and environment (HSE) performance. This is essential to ensure operational continuity while securing social license to operate. In addition to protecting social and environmental well-being, responsible supply chain management is the perfect opportunity to maximise economic growth. By prioritising local suppliers, we can enhance the income opportunities and livelihoods of local communities.

## WHAT IS OUR APPROACH?

The governance of procurement is guided by PETRONAS' Tender and Contracts Administrative Manual. Adherence to the PETRONAS Anti-Bribery and Corruption Manual is also taken into consideration for the suppliers' selection and tendering process. All contractors must meet safety, technical, environmental and Code of Business Ethics (CoBE) requirements for the licensing, bidding, contracting and execution stages. We also provide a "Know Your Customer" questionnaire to suppliers during technical evaluations, strengthening third-party due diligence process and controls. This ensures that contractors, vendors, and joint venture partners consistently meet PETRONAS high integrity standards.

We have zero-tolerance for non-compliance or malpractices within our supply chain. Serious action is taken on suppliers that fail to comply with social and environmental regulations, including contract termination. Furthermore, we established a formal grievance system for stakeholders to safely report any misconduct or malpractice, which extend to the supply chain. All grievances are investigated and resolved based on specific site arrangement. Each facility has a dedicated grievance mechanism procedure, in which aggrieved stakeholders can raise their concerns and receive a remedy in a timely, fair and consistent manner. Following each grievance received, we conduct an in-depth analysis to identify root causes and prevent future cases from arising.

The key aspects of PCG's supply chain management include:

Health and safety training via the supplier training programmes or vendor mentoring programmes

Consideration of the PETRONAS Contractors Code of Conduct on Human Rights in the vendor's selection and tendering process

Prioritising local contractors and suppliers to support the development of the local chemicals industry



PCG's port facilities in Kertih, Terengganu



## SUPPLY CHAIN MANAGEMENT

### HOW DID WE CREATE VALUE?

#### Digitalisation

- Implemented PETRONAS’ digital approach, which integrates digital tools and technologies into the end-to-end procurement function. The objective is to improve procurement efficiency, enhance customer experience, ensure transparency, and provide useful data analytics for PCG.

#### Sustainable Supply Chain

- Identified 21 risk categories during the tendering process. The risks include health and safety, environment, governance, legal/regulatory, integrity, socio-economic, suppliers and human rights.
- Conducted a human rights assessment based on the PETRONAS Contractors Code of Conduct on Human Rights (CoCHR) principles to ensure that our contractors and suppliers adhere to basic human rights principles. The nine principles in PETRONAS CoCHR are Freedom of Labour, Prevention of Child Labour, Wages and Benefits, Working Hours, Grievance Mechanisms, Non-Discrimination, Freedom of Association, Humane Treatment and Foreign or Migrant Workers.
- Held a Grievance Mechanism Effectiveness Evaluation at PCG facilities based on the eight criteria listed in the United Nations Guiding Principles on Business and Human Rights. The evaluation strengthened the implementation and effectiveness of our facilities grievance mechanism process.
- Enforced PETRONAS’ Contractors Code of Conduct on Human Rights and HSE requirements.

#### Health and Safety

- Continued the Contractors HSE Mentorship Program to strengthen contractor capabilities in HSE Management and reduce HSE incidents caused by contractor management.
- Enforced the newly-developed Road Transport Operational Guideline (RTOG) to improve our logistical service providers’ safety.
- Provided ongoing education for contractors on HSE topics through training and mentoring programmes.

### WHAT WERE THE ACHIEVEMENTS?

Indicators	2019	2020
Total number of suppliers	1,608	1,445
Ratio of total procurement spending (Local : International)	68 : 32	60 : 40

We have revised our 2019 figure due to reaccounting adjustment. The changes have been restated in our disclosed values in this year’s report.

### Vendor Development Programme (VDP)

PETRONAS VDP focuses on nurturing Bumiputera vendors to be resilient and sustainable to achieve the following objectives:

- Technically competent
- Commercially attractive
- Developing homegrown technologies
- Fostering growth and going international
- Candidate for Bursa Malaysia listing – long term objective

VDP has evolved since its inception in 1993 with three types of schemes;

- VDP:** Focuses on import substitution, critical growth and regional growth
- VDP (2018):** Innovative approach to inject new momentum and scale-up Small and Medium Enterprise (SME) development in collaboration with main contractors and industry enablers
- VDP InnoTech (2019):** Designed to embrace Industrial Revolution 4.0, aspire to promote and nurture Bumiputera SMEs for innovation, technology advancement and the ownership of Intellectual Property (IP) wholly or partly to penetrate growth in the cutting-edge era of technology & digitalisation

The program has been successfully implemented and undergone various phases of learnings, in tandem with different challenges faced by the industry.

PETRONAS VDP has produced world-class Bumiputera companies that are able to compete in global markets, with success stories such as expanding their international footprints to over 30 countries, getting listed in Bursa Malaysia, receiving awards and accreditation from international and local agencies, and delivering innovative Malaysian-made inventions. This year, 11 suppliers from PETRONAS VDP have provided crucial support to our business, while we helped them remain competitive and resilient.



## CONTRIBUTING TO THE GREEN AGENDA

Chemicals play a significant role in our daily lives as it is utilised in almost every man-made product. Nonetheless, the responsible production, handling and disposal of chemical products must be carried out correctly to protect environmental well-being. This is a responsibility that we take to heart. Environmental stewardship enables us to do good while seizing competitive opportunities. Through responsible environmental practices, we improve productivity, lower costs, spur innovation, strengthen our resilience and, most importantly, create a safe and healthy environment. By pursuing a multi-pronged approach, we continue to focus on efficiency while researching breakthrough technologies for environmentally-friendly solutions. As stakeholders increasingly expect greener and sustainable practices, we strive to continuously improve our footprint; protecting the planet for current and future generations.



**GHG Emissions & Climate Adaptation**  
53,400 tonne CO<sub>2</sub>e avoided



**New Plastics Economy (NPE)**  
Clean Up programmes at 4 locations nationwide



**Environmental Stewardship**  
85% in waste recycling rate

## GHG EMISSIONS & CLIMATE ADAPTATION

### WHY IS THIS IMPORTANT?

A global delay in mitigating climate change has far-reaching consequences. Climate change threatens the stability of economic systems, social progress and planetary health. Governments, organisations and individuals all play a critical role in achieving the 2015 Paris Agreement to limit the increase in global average temperature to well below 2°C. As a business, climate change poses direct and indirect threats to our assets, profitability and sustainable growth. Mitigating and adapting to these climate-related risks is crucial for our long-term resilience. With this in mind, stakeholders are increasing the pressure for climate action. Customers, investors and regulators expect businesses to play their part in managing greenhouse gas (GHG) emissions. Financial institutions are increasingly reallocating their capital to green investments, while customers seek out low-carbon solutions. Additionally, governments and regulators are progressively introducing climate-related regulations, so it is essential to stay ahead of these changes. On the flip side, carbon-efficient operations contribute to better cost savings and overall performance. Therefore, effective emissions management is a win-win for both PCG business and stakeholder value.

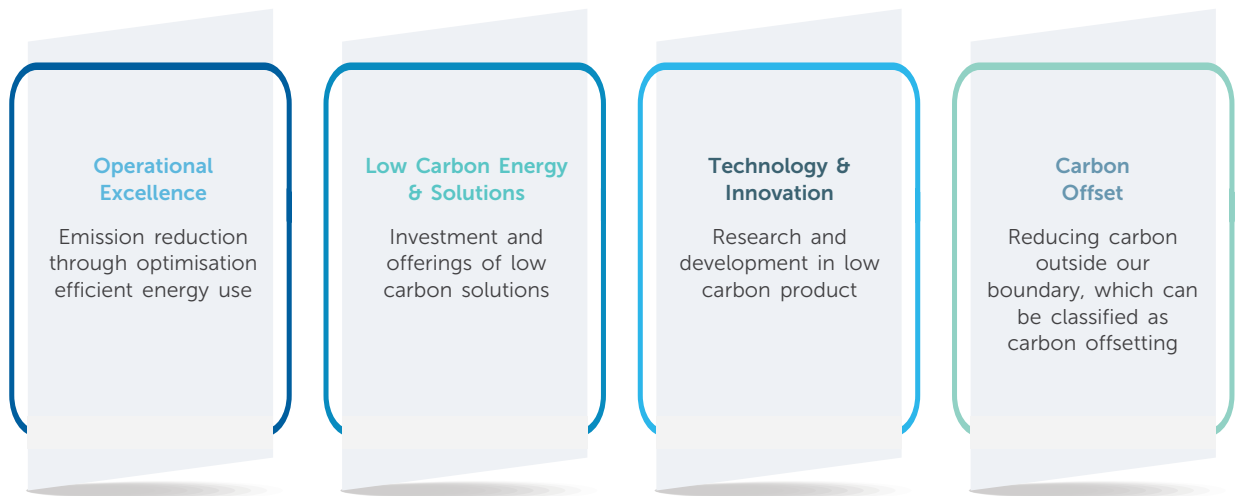
## GHG EMISSIONS & CLIMATE ADAPTATION

### WHAT IS OUR APPROACH?

We understand that tackling climate change requires transformational changes to the systems in which we operate. This means assessing our assets and operations' vulnerability to climate change and implementing the necessary mitigation measures. Our approach is to identify, evaluate and prioritise climate-related risks pertinent to our operations, as guided by the PETRONAS Climate Change Framework; as well as continuously improve energy efficiency according to PCG's Energy and Loss Management System. We remain alert to technological changes that may contribute to greater emissions reduction and climate change adaptation.

PCG's climate change efforts are guided by the principles and commitments detailed below:

The **PETRONAS Net Zero Carbon Emissions Handbook** are guiding principles that form the pathway to Net Zero with four building blocks:



The **PETRONAS Carbon Commitments** act as a guide to meeting climate change targets, and is particularly relevant for the downstream business:



## GHG EMISSIONS & CLIMATE ADAPTATION

We continuously seek for more ways to further reduce our carbon footprint.



Design new PCG projects with zero continuous flaring, as well as reduced flaring for existing facilities by monetising hydrocarbon gas. The decrease in continuous flaring aligns with Aspiration 2050.



Reduce GHG emissions through New Plastics Economy (NPE) initiative by converting plastic waste into renewable feedstock for the production of quality polymers, which lowers carbon emissions compared to using new resources to produce plastic materials.



Conduct Carbon Footprint Assessment (CFA) to calculate the Carbon Cost for new projects. Carbon Cost ensures that a project will be economically viable if a carbon tax is imposed during its operation phase. CFA also allows us to assess a project's compliance with PETRONAS' Carbon Commitments.

### HOW DID WE CREATE VALUE?

#### Emissions Reductions

- Replaced high-intensity discharge lighting to LED lighting at one of our plants in Terengganu. LED lighting is more carbon-friendly as it consumes less electricity and has high efficacy (due to a higher lumens/watt ratio)
- Implemented Cleaner Air through Process Control Advancement (CAPCA) project at our Kedah facility, which resulted in the modification of plant equipment for greater emissions reduction
- Optimised the use of additives in our LDPE manufacturing plant. Following a study done by the operation team, we developed a new set of formulations that lowered energy consumption and cost, without compromising the product's quality

#### Climate Adaptation

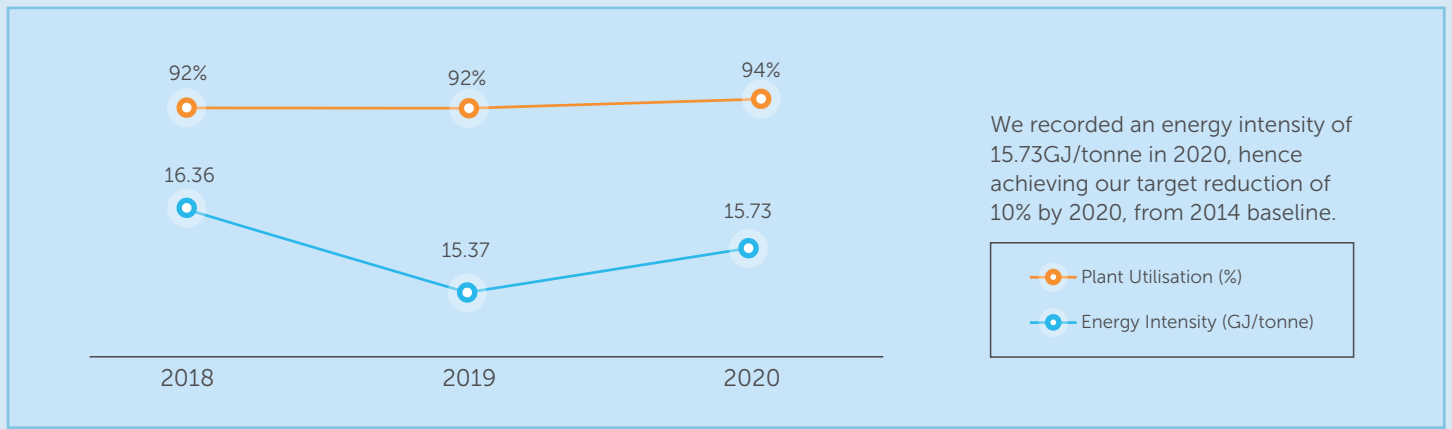
- Initiated a climate adaptation study to understand the vulnerability of our assets and operations, together with PETRONAS. Through this study, we aim to strengthen our climate-resilience in the locations where we operate

## GHG EMISSIONS & CLIMATE ADAPTATION

### WHAT WERE THE ACHIEVEMENTS?

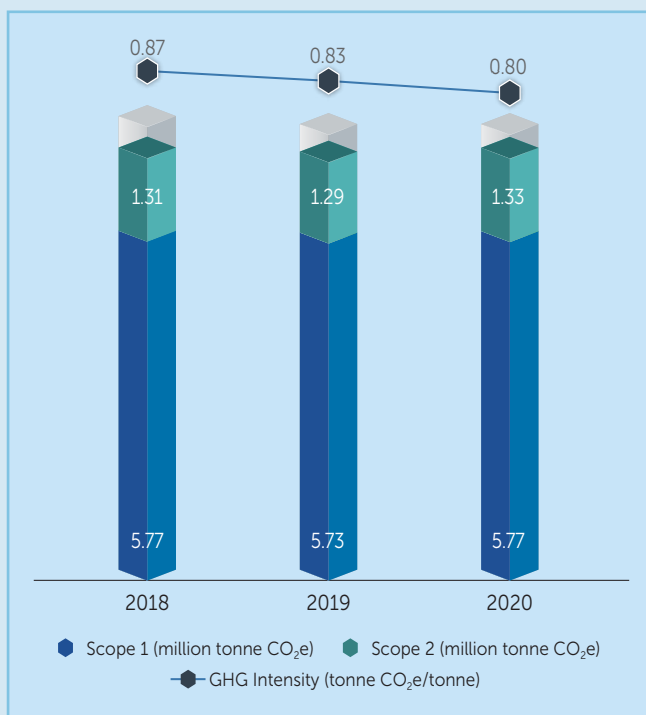
- **4% reduction** in GHG emissions intensity from 2019
- **50% of GHG emissions reduction achieved** against a target of 100,000 tonne CO<sub>2</sub>e by 2024
- **11% energy** intensity reduction against 2014 baseline
- **~9,000 tonne of CO<sub>2</sub>e reduction per year** from CAPCA project, equivalent to the amount of carbon absorbed by **410,000 trees**
- **1.3 MW of energy saved** annually from the new LED lighting system equivalent to 100,000 number of smartphones charged per year

### Energy Intensity



Indicator	Target	Result
Energy intensity reduction, from baseline year 2014 (%)	10	11

### GHG Emissions and Intensity



While our GHG emissions are slightly higher by 1%, mainly contributed by a higher production rate, we reduced our GHG intensity by 4%, resulting from various carbon reduction initiatives.

Indicator	Target	Result
GHG emissions (million tonne CO <sub>2</sub> e)	≤6.92 (by 2024)	7.10

# NEW PLASTICS ECONOMY (NPE)

## WHY IS THIS IMPORTANT?

Plastic is a threat to the environment if not managed effectively. The current linear economy for plastic is unsustainable to environmental & social health and the plastic supply chain. In the NPE, plastic does not end up as waste or pollution; it becomes a new resource. NPE provides a holistic approach to the circular economy concept, ensuring sustainable production and consumption of plastic. This would include decoupling the production of plastics from finite resources and eliminating plastic's impact to the environment.

For PCG, the rapid advancements in NPE will reinforce our role as a chemicals industry leader. This aligns with future expectations of improved design and recycling requirements by stakeholders. Also, turning plastic waste into new applications provides an opportunity to secure new and emerging megatrends. The conversion of plastic waste into circular feedstock has the potential to create value-added products. Ultimately, addressing plastic waste strengthens our resilience, competitive advantage and sustainable growth; all while protecting the future of our planet.

## WHAT IS OUR APPROACH?

Our collaboration with Malaysian authorities and stakeholders through the Malaysia Sustainable Plastic Alliance complements the Ministry of Environment and Water Malaysia's Roadmap Towards Zero Single-Use Plastic 2018-2030. By 2030, we target to recover 100% of plastic waste equivalent to our domestic polymer sales volume, which will be redirected into a circular economy. PCG's holistic approach to NPE covers four key workstreams:



### INNOVATION

Developing viable collaborations for innovative technology solutions that addresses plastic pollution. The innovative solutions focus on the below approaches:

**ReDESIGN:**  
Enhance the recyclability of plastic materials

**ReGENERATE:**  
Regenerate the end-of-life plastic into valuable materials

**ReNEWABLE:**  
Developing renewable-based plastic materials



### INFRASTRUCTURE

Establishing strategic partnerships to develop an effective sustainable waste recovery system



### EDUCATION

Imparting knowledge and education on plastic to address misconceptions and promote change in behaviour and culture



### CLEAN-UP

Enhancing awareness of caring for the environment through 3R education, CSR activities and green campaigns

## NEW PLASTICS ECONOMY (NPE)

### HOW DID WE CREATE VALUE?

#### Innovation

- Collaborated with London-based PLASTIC ENERGY Ltd to develop a solution that turns non-recyclable plastic waste into crude naphtha. This new technology helps divert low quality, mixed plastic waste from being accumulated by turning it into naphtha quality oil (TACOIL), which can be used to produce new virgin quality polymers.
- Conducted a feasibility study with PLASTIC ENERGY Ltd to establish a plastic waste to crude naphtha facility in Malaysia.

#### Infrastructure

- Partnered with reputable industry players and local suppliers to collect plastic waste. The recovered waste will then be used as feedstock for the naphtha facility.

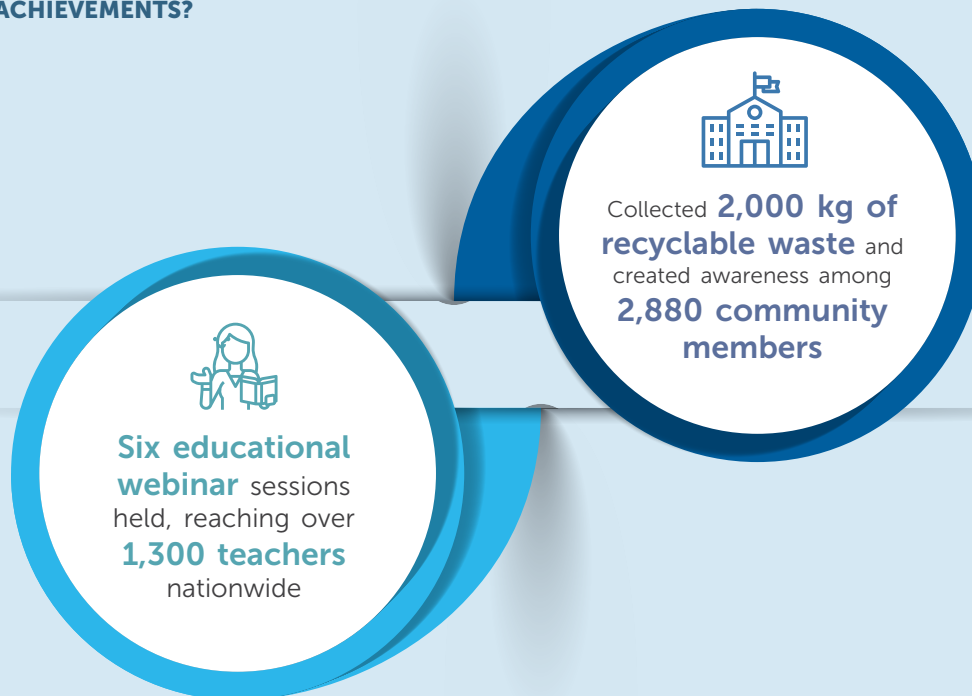
#### Clean-Up

- Conducted PCG's Be Green Programme, which focuses on educating surrounding communities at our area of operations on the importance of preserving the environment through proper waste and plastic management, as well as to conduct clean up activities. The programme was held in Bintulu, Kuantan, Kuala Lumpur and Kertih.

#### Education

- Established an education module titled "Plastic, Sustainability & You", which was distributed to schools nationwide in 2019. The module was developed by collaborating with the following agencies and experts:
  - The Ministry of Education
  - Solid Waste Management and Public Cleansing Corporation
  - Malaysian Plastics Manufacturers Association
- The module was then followed by a series of training with teachers in 2020 in order to equip them with the best practices in utilising the module in their classrooms.

### WHAT WERE THE ACHIEVEMENTS?



Indicator	Target & Results	2019	2020
Number of projects established	Target	2	1
	Results	2	1

Investments in NPE	2019	2020
Total investments in NPE (RM)	> RM8 million	RM3 million

# ENVIRONMENTAL STEWARDSHIP

## WHY IS THIS IMPORTANT?

Our business uses natural capital such as energy, water and other finite resources. As a corporate citizen, we have a responsibility to manage these resources for future generations. Responsible environmental practices not only protect society and the planet from pollution and degradation; they also protect our business from regulatory, reputational and operational costs. It is crucial to consistently comply with legal environmental standards to minimise our impact on the environment. Additionally, stakeholders are shifting their focus from the obligations of businesses to how we can implement better systems and create more sustainable practices. Subsequently, responsible environmental management is a growing concern, not only as part of a more ethical and eco-friendly approach to business, but also as a way to grow and enhance current operations.

## WHAT IS OUR APPROACH?

We seek to operate our business in the most environmentally responsible manner. To do so, we operate in compliance with all environmental regulations across all business units, and subscribe to voluntary environmental standards, such as ISO 14001:2015. We invest in technology that minimises material consumption and waste production. PCG's Health, Safety & Environment policy provides guidelines and practices to manage plants' water, waste and air emissions. Supporting this policy are other frameworks on environmental best practices, which cover the following:

**Zero cases**  
of non-compliance issued  
by regulators

**We achieved 3R**  
**rate of 85%**  
exceeding our target rate  
of 82% by 2024

## WATER CONSUMPTION AND EFFLUENTS QUALITY

**PETRONAS' Guidelines on Water Practices (WAPS):** The systems as follows are covered under WAPS – cooling water, ion exchange, reverse osmosis & electrode ionisation, steam generator system, condensate, wastewater discharge, collection & treatment and sludge handling. This year we focus on closing action items found during WAPS verification exercises. In 2021, we will work on establishing water reduction targets.

## WASTE MANAGEMENT

**PCG Waste Minimisation Plan:** Minimise the waste generated from our operations while managing any waste produced responsibly with minimal impact on the surrounding communities and environment. Through the PCG Waste Minimisation Blueprint, we have placed procedures and guidelines to manage waste beyond regulatory requirements. All waste is inventoried and stored safely in dedicated areas before being transported to licensed facilities for appropriate treatment. Most of the waste is recycled as fuel, solvents or lubricants. We also extract precious metals from spent catalyst to reduce waste. Our target is to increase our 3R rate to 82% (equivalent to 2,500MT of waste) by 2024.

## AIR QUALITY

**PCG Air Emissions Management:** Utilise a Leak Detection and Repair (LDAR) proactive approach in addressing fugitive emissions through small or any other potential leaks before it worsens. We also monitor our emissions via the Continuous Emission Monitoring System, which allows us to obtain real-time data and take prompt action should any abnormal readings are found.



## ENVIRONMENTAL STEWARDSHIP

## HOW DID WE CREATE VALUE?

## Water Quality

- Monitored compliance to WAPS strict standard and identified gap closure plan to further optimise water consumption and improve effluent quality.
- Introduced a new system that reduces wastewater pollutant discharge at PC Fertiliser Sabah Sdn Bhd. The off-spec process condensates was diverted using a new pipeline designed to pre-treat the effluent. We also improved our facility to address high-strength influent which reduced the wastewater chemical oxygen demand (COD) at the source.

## Waste Management

- Conducted review of annual waste minimisation plan and set a target to identify opportunities for waste reduction.
- Intensified waste recycling by implementing 3R on a targeted waste stream.
- Supported the Sarawak's Department of Environment e-waste campaign in conjunction with state-level National Environment Day 2020 at our ASEAN Bintulu Fertiliser Sdn Bhd plant.
- Reduced chemical waste at PC Fertiliser Sabah Sdn Bhd by recovering amine solution, which was used to remove carbon dioxide back into the regeneration system. This ultimately reduces the amount of chemical use and waste generated from the process.
- Improved our packaging design at PC Ethylene Sdn Bhd & PC Polyethylene Sdn Bhd, which reduces energy use, waste generation and costs. The properties improvement translates to 25% of energy saving. This initiative was recognised by Malaysian Productivity Centre Annual Productivity Innovation Conference.
- Reused 100% of our wood packaging at our Netherlands facility for customers in the automotive industry and recycled a large percentage of our plastic packaging to prevent plastic leakage to the environment, as part of our commitment to address plastic pollution.

## Air Quality

- Implemented 100% LDAR during inspections on joints, valves and potential leak points at all our operating plants.

## Biodiversity

- Continued the ecoCare programme to support high biodiversity and ecologically sensitive areas surrounding PCG operations, in collaboration with the Malaysian Nature Society.



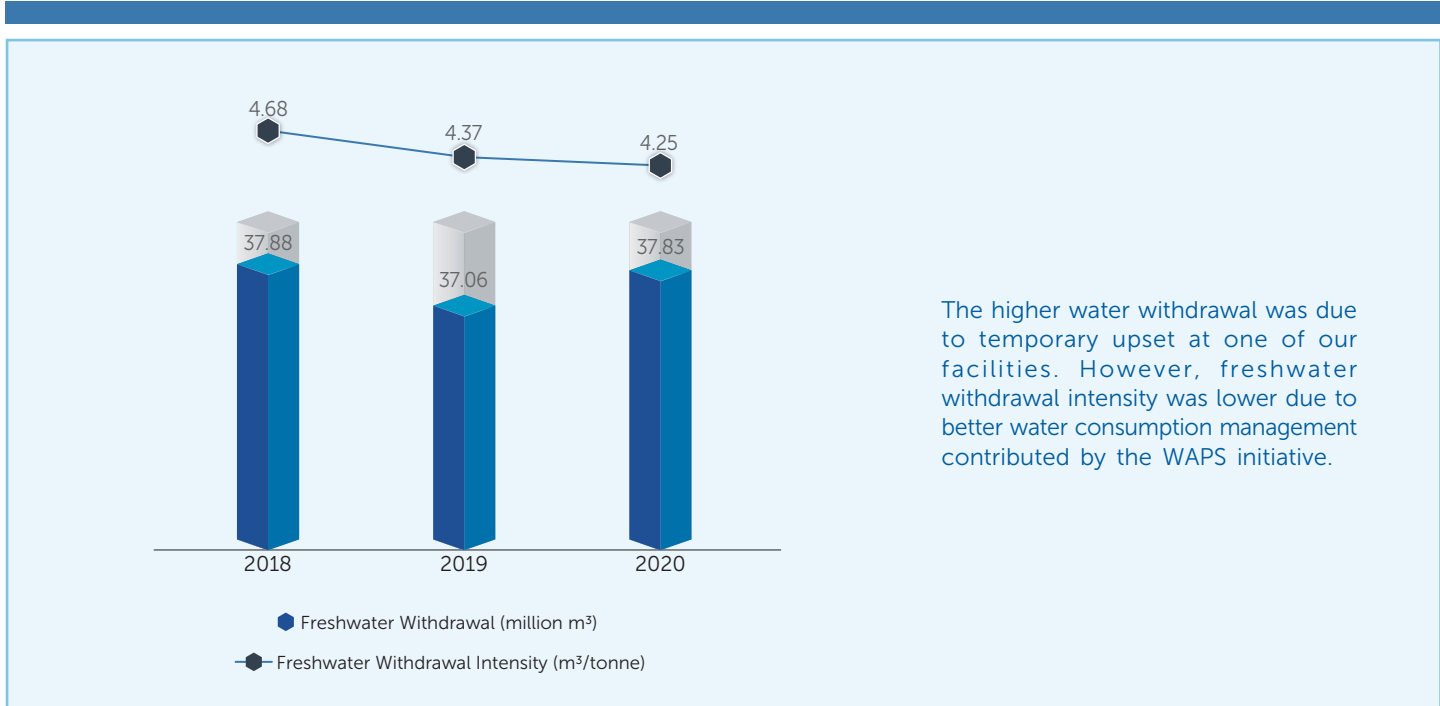
Ensuring non-toxic water effluents at our plants

## ENVIRONMENTAL STEWARDSHIP

### WHAT WERE THE ACHIEVEMENTS?

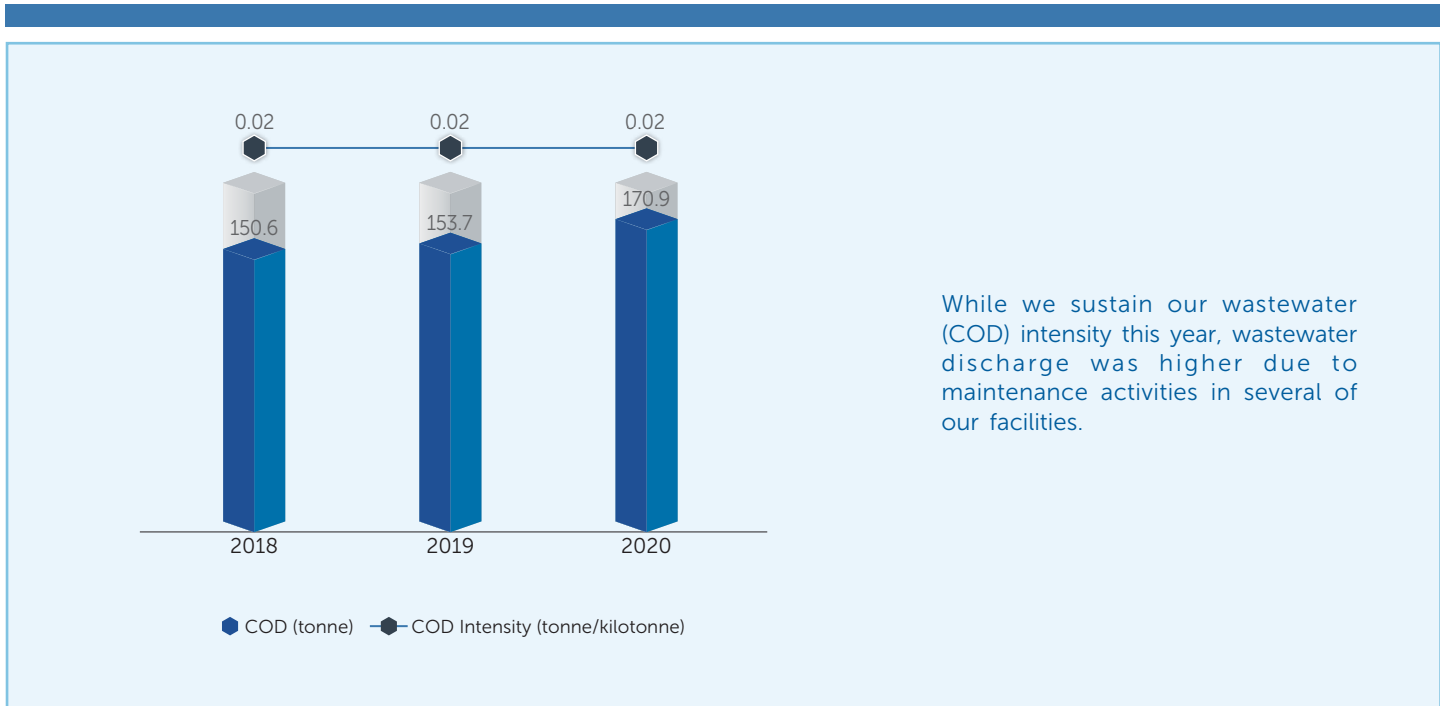
#### Freshwater Withdrawal

- **2% reduction** in freshwater **withdrawal intensity**



The higher water withdrawal was due to temporary upset at one of our facilities. However, freshwater withdrawal intensity was lower due to better water consumption management contributed by the WAPS initiative.

#### Wastewater Discharge

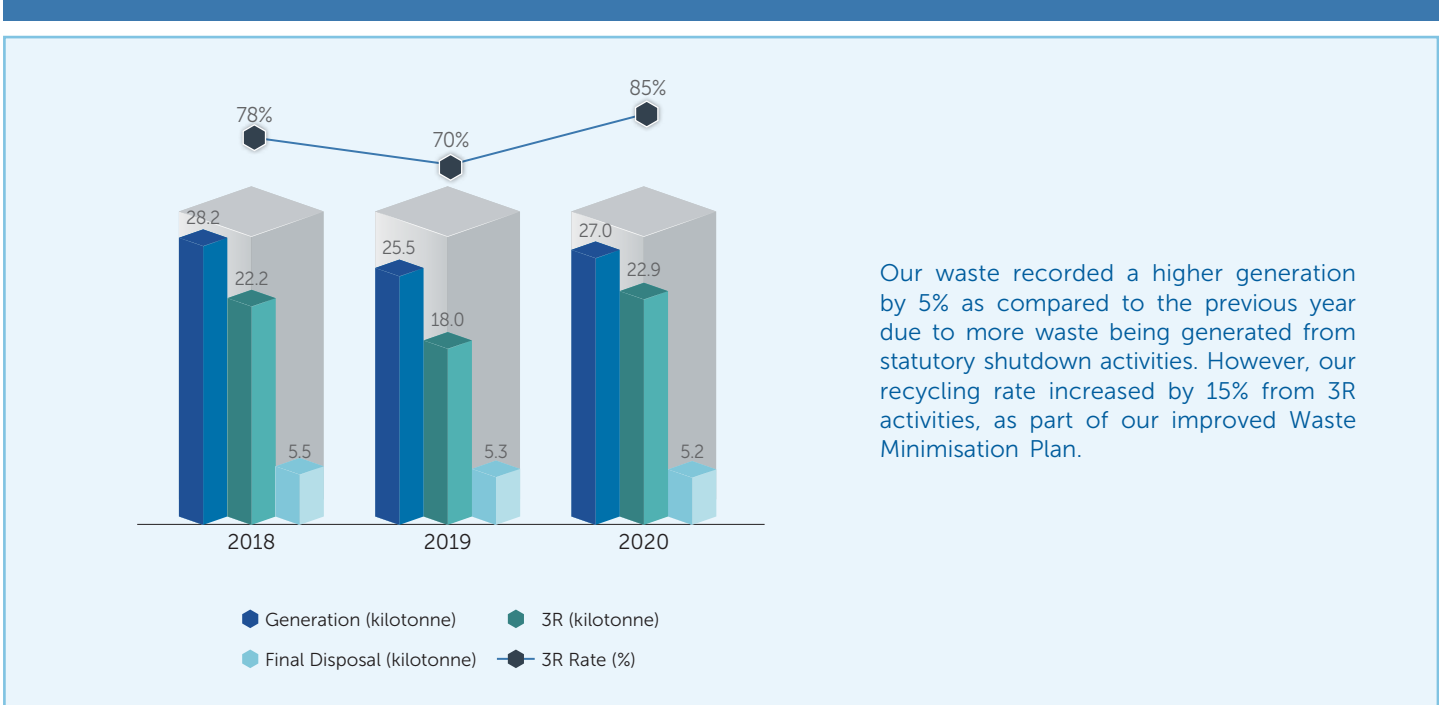


While we sustain our wastewater (COD) intensity this year, wastewater discharge was higher due to maintenance activities in several of our facilities.

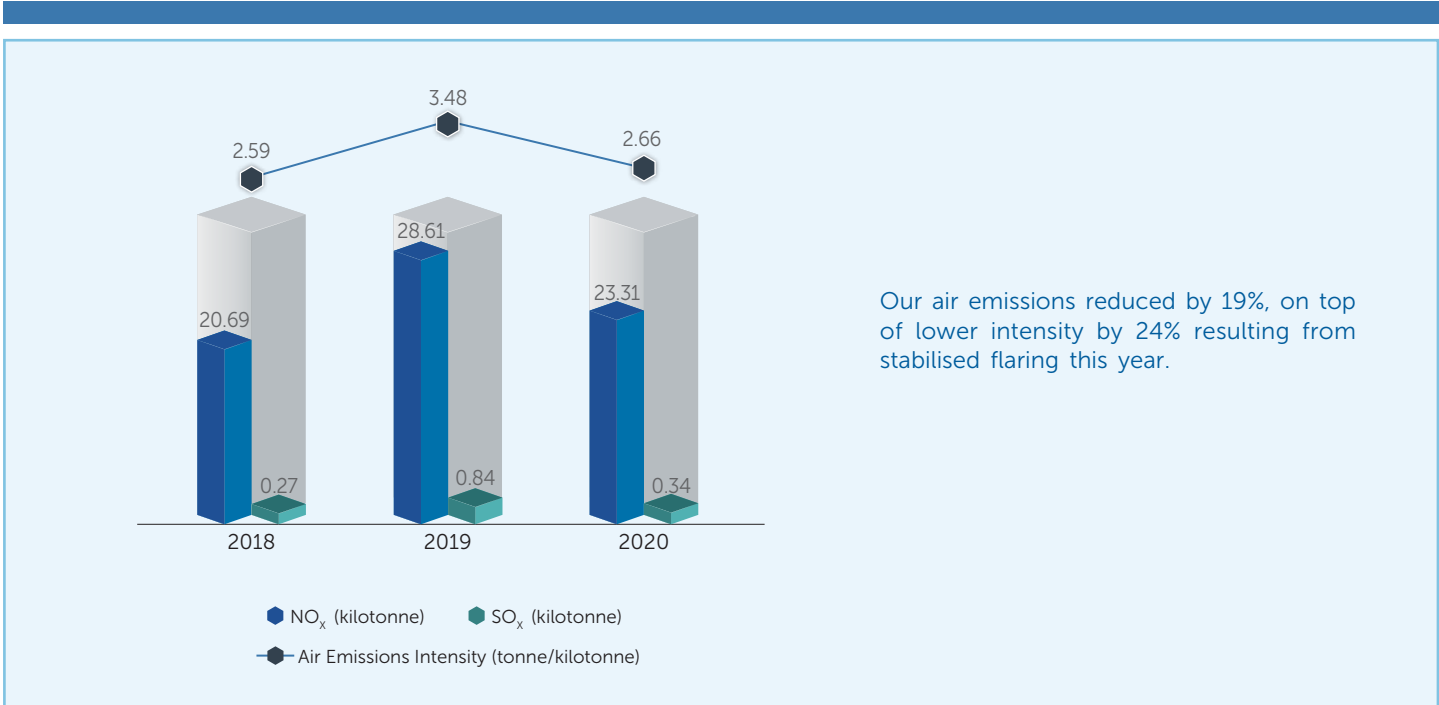
ENVIRONMENTAL STEWARDSHIP

Waste

- **85% in waste recycling rate** target achieved, against a goal of 82% by 2024



Air Emissions





## EMPOWERING PEOPLE & COMMUNITIES

With a rapidly changing chemical industry, we are focused on futureproofing our employees, enabling them to thrive now and far into the future. We see empowerment and motivation as strategic tools to creating an engaged, skilled and productive workforce. Furthermore, employee safety is also tantamount to our business. Our strong safety track record ensures our operational productivity and business continuity. More importantly, it protects our valued employees from injuries and harm. Beyond employees, we also strive to empower the communities in the areas we operate. As a responsible corporate citizen, giving back to the community allows us to take an active role in community development and foster a deeper sense of unity and trust.



**Human Rights & Fair Employment**  
launched Human Rights e-learning module



**Occupational Safety & Health**  
100% compliance with Safety Critical Protective Device management



**Talent Development**  
RM17.6 million invested on employee training



**Community Engagement**  
65,000 people helped through COVID-19 relief programme

## HUMAN RIGHTS & FAIR EMPLOYMENT

### WHY IS THIS IMPORTANT?

Human rights are the fundamental rights and freedoms of every individual. These basic rights are based on the principles of dignity, fairness, respect and equality. Human rights offer a common framework to understand societies' expectations and deliver value to stakeholders in a more sustainable way. At PCG, we can do a lot within the context of our own business to support and respect the observance of human rights. It refers to the fair and humane treatment of all employees; treating everyone with respect, and having zero tolerance for discrimination, harassment or bigotry. Being proactive on human rights makes good business sense, as well as being the right thing to do. Additionally, it is imperative that we maintain fair employment, fair remuneration and diversity in the workplace. Fair business and employment practices foster a productive work environment and an atmosphere of trust among employees, suppliers, and other stakeholders. At the same time, diversity pushes innovation through the exchange of perspectives and experiences.

## HUMAN RIGHTS & FAIR EMPLOYMENT

### WHAT IS OUR APPROACH?

As a company, we adhere to PETRONAS Human Rights Commitment, which aligns with the UN's Guiding Principles on Business and Human Rights. The objective of our commitment is to ensure our activities are governed by human rights principles and applied to all employees, contractors and any third party within our premises or performing work on behalf of PCG. This extends to the rights of local communities, contracted partners in our supply chain, our staff and all other stakeholders which we interact with across our operations.

In compliance with fair employment, we adhere to all relevant labour laws that protect employees' rights, including providing competitive salaries and benefits. Our non-executive employees rights are also protected through unions. The collective bargaining agreement process is led by the PETRONAS Industrial Relations group together with unions and management representatives. To promote gender diversity, we collaborate with PETRONAS Leading Women Network, a networking platform that aims to create diverse opportunities and a safe work environment for all. The objective of PLWN is to inspire and motivate all leading women to grow their passion and professionalism while delivering high-performance results with confidence.

### HOW DID WE CREATE VALUE?

#### Human Rights

- Introduced e-learning module that educates employees on our commitment to the human rights principles, as well as the impacts and mitigation measures of social risks.
- Conducted Social Risk Assessment (SRA) to assess the impact and mitigate the social risk in the areas we operate. The SRA is based on our internal guidelines and standards, which align with the UN Guiding Principles on Business and Human Rights, the International Petroleum Industry Environmental Conservation Association, and other industry best practices. The assessments emphasise four salient areas in accordance with PETRONAS Human Rights Commitments:
  - Community Well-Being
  - Supply Chain Management
  - Labour and Working Conditions
  - Responsible Security

#### Employee Benefits

- Approved 'Spousal Assistance with Leave Without Pay' for up to 36 months for employees on overseas assignments. The assignees and spouses must both be PETRONAS employees, and the provision is added to the current Leave Without Pay allowance of 365 days.
- Revised medical benefits for unionised employees upon the collective agreement, which includes:
  - i. Increase medical benefit limit for outpatient general practitioner & specialist, including paediatric care and hospitalisation & surgery.
  - ii. Revised maternity benefits, including increasing the number of delivery occasions from three to five and the standardisation of antenatal and postnatal treatment categorisation.
  - iii. Revised medical coverage for dependent children from 18 to 21 years old.



At PCG, we offer equal work opportunities to our employees

## HUMAN RIGHTS & FAIR EMPLOYMENT

### Diversity & Inclusion

- Supported the establishment of PETRONITA Crèche, a childcare centre, as part of an initiative by the association of wives and female employees of PETRONAS to help working mothers and encourage greater retention of female employees.
- Established a flexible working arrangement for pregnant employees for up to 28 weeks (seven months) of pregnancy i.e., to leave work one hour earlier than prescribed working hours.
- Created nursing rooms in the workplace with complete facilities i.e., fridge for temporary storage, sofas for resting, and a power supply cable.
- Increased maternity leave with full pay for a total of 90 consecutive calendar days, from the minimum statutory requirement of 60 consecutive days.
- Implemented paternity leave of five working days, although it is not part of the statutory requirement.
- Implemented pilgrimage leave enabling employees of all faiths to perform religious pilgrimage and rituals.



### Employee Welfare & Well-Being

- Implemented special working arrangements for employees with dependant(s) affected by contagious diseases.
- Implemented a new working arrangement during COVID-19, where work-from-home is the default working arrangement, unless the role requires a mandatory presence on site.
- Conducted regular union and staff engagement sessions.
- Implemented everyday FLEXWEAR (smart casual attire) to provide a positive, flexible and inclusive workplace environment for all employees.
- Organised three Mental Health Talk sessions for employees in collaboration with Gleneagles Hospital Kuala Lumpur.
- Implemented the Employee Assistance Programme, which aims to:
  - Promote awareness of stress and mental health management at the workplace
  - Develop mental resilience among employees
  - Provide support to employees in the form of confidential counselling services related to work and personal issues by qualified professional counsellors

### WHAT WERE THE ACHIEVEMENTS?

- Launched e-learning module on Human Rights

### Union Members

Indicator	2018	2019	2020
Percentage of union members out of total support staff (%)	73.8	74.3	76.0

### Parental Leave

Indicators		2018	2019	2020
Total number of employees who took parental leave	Female	60	61	56
	Male	404	386	412
The return of work rates of employees who took parental leave (%)	Female	100	100	100
	Male	100	100	100

## HUMAN RIGHTS &amp; FAIR EMPLOYMENT

## Number of Employees

Indicator	2018	2019	2020
Total number of employees	4,414	4,424	4,714

## Gender Diversity

Indicators		2018	2019	2020
Distribution of workforce by gender (%)	Female	17.5	17.4	17.2
	Male	82.5	82.6	82.8
Senior management (%)	Female	20.0	25.2	24.0
	Male	80.0	74.8	76.0
Management Committee (%)	Female	36.4	36.4	36.4
	Male	63.6	63.6	63.6
Board of Directors (%)	Female	22.0	25.0	25.0
	Male	78.0	75.0	75.0

## Employees by Age Group

Indicators	2018	2019	2020
29 and below	891	490	798
30-39	1,999	2,142	2,180
40-49	1,100	1,286	1,253
50-59	418	491	452
60 and above	6	15	31

## Employee Attrition and Turnover

Indicators	2018	2019	2020
Employee attrition rate (%)	2.8	3.3	3.0
Employee turnover rate (%)	2.1	0.7	0.8

## Employee New Hire Rates by Gender

Indicators	2018	2019	2020
Female (%)	83	15	25
Male (%)	17	85	75

# WORKPLACE AND OCCUPATIONAL SAFETY & HEALTH

## WHY IS THIS IMPORTANT?

Investing in health and safety is not just a case of doing the right thing; it is underpinned by a very strong business case. A strong health and safety culture safeguards our resources, both human and assets, as well as maintains our trust and license to operate. In business, Occupational Safety & Health (OSH) protects the company against financial, operational and legal ramifications. An emphasis on a Health & Safety culture attracts and retains top industry talent, and brands PCG as a safe and reputable manufacturer to stakeholders. Good health and safety measures allow our employees to work more efficiently and safely, boosting morale, increasing productivity, and reducing costs. Moreover, our high safety standards protect the Group from associated regulatory penalties and fines, while ensuring operational continuity and efficiency.

## WHAT IS OUR APPROACH?

We place the utmost priority on the health and safety of our employees and stakeholders. We have established a stringent Health, Safety and Environment (HSE) framework to inculcate a culture of HSE excellence. Through this framework, we generate an HSE Culture that continuously strives for zero safety incidents. Our HSE efforts focus on culture, compliance and competency: where culture reinforces leadership and personal accountability in amplifying generative culture; compliance intensifies efforts to strengthen adherence against established HSE systems and procedures; and competency intensifies the system's capabilities in driving HSE excellence. Furthermore, we are guided by the Balance of Consequences (BoC) to propel and accelerate our culture of compliance towards existing requirements. This not only focuses on the punitive for HSE non-compliances, but also rewards and recognises safe behaviours. From this, the assessment of compliance towards safety management would reflect all lessons learnt from any incidents.





## WORKPLACE AND OCCUPATIONAL SAFETY & HEALTH

### HOW DID WE CREATE VALUE?

#### Culture

- Continued to enhance Operational Excellence Result 2 (OE R2) transformation journey by placing critical capabilities close to high-risk HSE areas.
- Enhanced focus on reflective learning of past HSE incidents including process safety.
- Standardised HSE implementation across PCG to promote better compliance by contractors.
- Promoted housekeeping programme across all facilities, which demonstrates our Generative Culture. The programme instils personal accountability and a sense of ownership into day-to-day operations, thus minimising incidents across PCG facilities.

#### Compliance

- Standardised process flow for HSE BoC to ensure effective implementation and deter non-compliance.
- Ensured compliance with HSE Standards and Requirements by undergoing the Mandatory Control Framework Element 9 Revision 2 assessment.
- Established the Land Transport Committee to:
  - Review and discuss key land transportation safety performances
  - Address issues and concerns, as well as heighten safety standards
  - Endorse proposed interventions, initiatives and/or deviations at PCG level
- Assessed our facilities compliance towards managing Pressure Safety Valve, Safety Critical Protective Device (SCPD) and Safety Critical Element management.
- Developed an Integrated Process Safety Solution (IPSS) Management of Change (MoC) to ensure compliance, standardisation, data integrity, and analytical capabilities concerning HSE core modules.
- Conducted routine Chemical Health Risk Assessment and exposure monitoring in our facilities to minimise exposure of hazardous chemicals to our employees and contractor by means of appropriate controls.
- Enhancement of Automated Water Quality Monitoring System which can provide real-time monitoring of wastewater quality generated from our Terengganu’s facilities. This enables early detection of off-specification wastewater and prevent significant impact to the environment.
- Established a baseline for RTOG, with the PETRONAS Integrated Vision of Operation Excellence Technology (PIVOT) system used to assist in data analysis. We are also developing an electronic vehicle inspections system to replace manual inspections for all logistic operations.

#### Competency

- Enhancement of Crisis Management Plan to include undeclared tier responses incidents, including pandemics, natural disasters, transportation accidents, and public unrest. The Crisis Management Team Tier 3 exercise planned for 2020 was postponed due to COVID-19 and revised to 2021.

#### COVID-19

- Activated the Pandemic Preparedness Response Team (PPRT) since January 2020 to manage COVID-19 and its impact on the business. PPRT monitored the situation daily; delivering directives, advisories and memos to employees via Intranet and email blasts. The directives and plans cover:

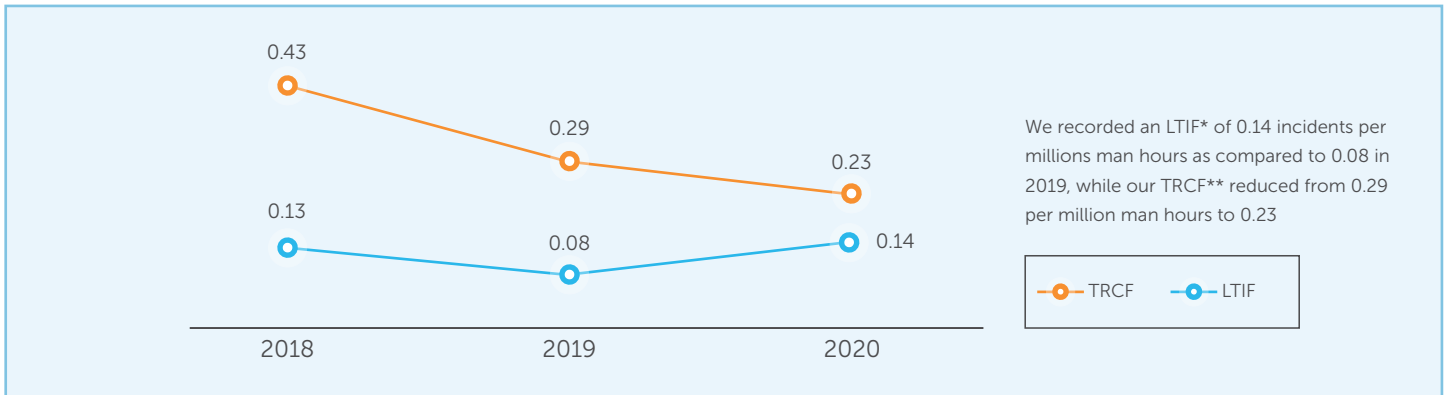


## WORKPLACE AND OCCUPATIONAL SAFETY & HEALTH

### WHAT WERE THE ACHIEVEMENTS?

- **Zero fatalities** in all PCG operations
- **100% compliance** in process safety management through the SCPD
- **Completion of IPSS MOC** standardisation, training, and utilisation for all PCG facilities

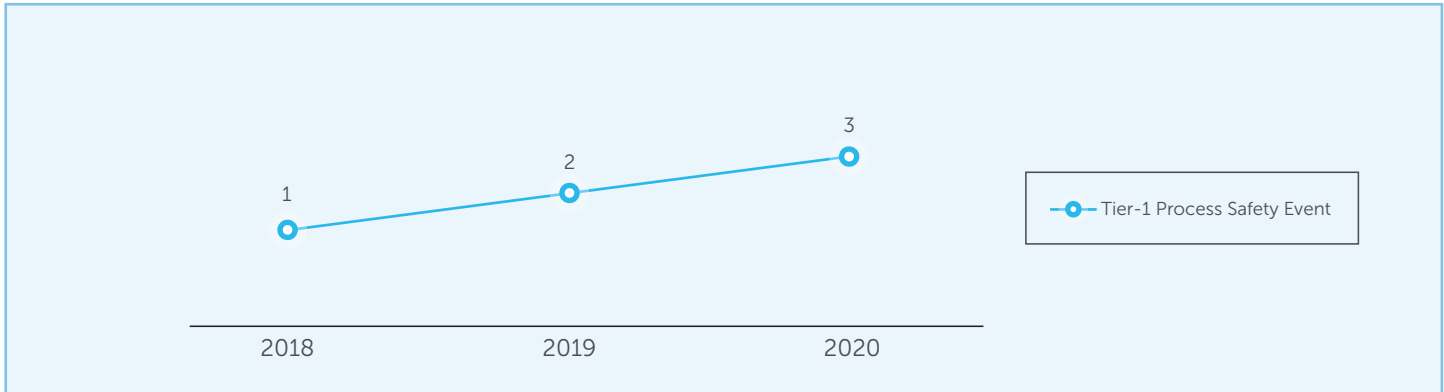
### Occupational Safety Incidents



\* LTIF: Lost time injury frequency – number of LTIs per million man-hours

\*\* TRCF: Total recordable case frequency – number of TRCs per million man-hours

### Tier 1 Process Safety Event



Tier 1 Process Safety Event has shown a slight increase in numbers from 2018 to 2020. This has triggered a laser focus on process safety matters. All of the incidents have been investigated and the recommendations are closely monitored and tracked by the Management Committee. Specific recommendations are communicated to all operating units to avoid recurrence. Process safety has been one of PCG’s key focus area to further cement the importance of process safety. In addition to that, a dedicated task force has been established to look into enhancing process safety reflective learning across PCG facilities.

We have revised our reporting on process safety incident to align with Process Safety Performance Indicators for the Refining and Petrochemical Industries, API Recommended Practice 754. The changes have been restated in our Tier 1 Process Safety Event values in this year’s report.

### Occupational Safety & Health

Indicators	2018	2019	2020
Total recordable cases (Number of cases)	10	7	5
Lost time injury (Number of cases)	3	2	3
Fatality (Number of cases)	1	0	0
Total recordable occupational illness frequency (TROIF) per million man-hours	1.71	0.08	0.14

# TALENT DEVELOPMENT

## WHY IS THIS IMPORTANT?

PCG wouldn't be where it's at without its employees – they drive our strategies and growth forward. It is essential to attract, develop and retain high-performing employees, as well as futureproof them with skills needed to thrive in the long-term. This starts with having a large pool of competent leaders, which would help employees realise their full potential to build their career progress. To deliver quality performance and achieve growth, we need to enhance operational capabilities and competencies continuously. Creating an inclusive and diverse workforce culture is also essential for business success in a rapidly changing external environment. Undoubtedly, a nurturing and empowering work culture would improve work agility and efficiency. This, in turn, would ensure effective employee development programmes and attract top-quality industry talent.

## WHAT IS OUR APPROACH?

We devised a talent strategy to incorporate trends in human capital development, such as generating meaning into the work itself. In adapting to the changing landscape, we utilise e-learning modules and other digital solutions in our talent development programmes. Integrated development programmes are then implemented to nurture employees' leadership competencies, including comprehensive and efficient succession plans to fill critical positions within the company. As such, recruitment efforts for scarce or niche competencies need to be prioritised to support business operations and growth.

Additionally, we have a "Fit-For-Purpose (F4P)" capability development plan for both technical and non-technical staff, whereby competencies and development plans align with employees' core job accountabilities. PCG's training and development model for employees adopt a 10:20:70 ratio. 10% would be from a formal learning programme such as e-learning training as provided by the company, 20% is through coaching and mentoring through formal and informal platforms, and 70% is learning through on-the-job application of knowledge and skills via various exposures including the employee's current job and projects. We have a range of training programmes available, ranging from leadership programmes tailored to different employee levels to technical training for respective skill groups.

## HOW DID WE CREATE VALUE?

### Talent Development Programmes

- Supported deserving talents to obtain accreditation from the Chartered Institute of Marketing (CIM), an internationally recognised professional marketing body based in the UK. CIM aims to improve global marketing practices, enhance the credibility of its members, and build a global network of marketing professionals. We enable our employees to pursue accreditation in the Certificate of Professional Marketing (Level 4 CIM) and the Diploma in Professional Marketing (Level 6 CIM).



Investing in our workforce ensures a high-performance culture

## TALENT DEVELOPMENT

- Cultivated leadership development training with the PETRONAS Leadership Framework and PCG Leadership Development Framework.
- Approved the PCG Leadership Development Framework to equip Potential Leaders on the required skills as they progress further, and to get exposure on either commercial strategy or build savviness and network within the company. The Framework has been developed based on the 70:20:10 model.

70% Leadership Development in Action	20% Inspired Learning	10% Classroom and Online Learning
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- Invested in Superior-Managed-Assessment (SMA) for technical and non-technical executives. The programme empowers superiors to manage the talent's competency development, review, tracking and analysis through an "Anywhere, Anytime, Anyway" approach. Talents are also inculcated with a self-accountability culture to close competency gaps as per F4P Job Competency Profile, guided by feedback from Competency Conversation, Personal Development Plan and Coaching.

- Established a Training Coordinator (TC) Network, a platform that strengthens the role of enabling and training potential successors. This network upskills TCs to plan, track and implement training programmes and use e-learning applications. It also provides open communication between TCs and employees to exchange best practices, guidance and insights.
- Set up the Technical Professional (TP) Network to develop TP potential successors in several areas of specialisation: Water Technology, Ammonia Process, Mechanical Engineering and Electrical Engineering. The programme enables TP successors to connect with peers of the same interest and gain guidance from experienced TPs themselves.
- Implemented the Steam Engineer Readiness Online Programme, which leverages coaching and mock-up assessments for a 2<sup>nd</sup> Grade Steam Engineer to increase the candidates' passing rate. In Q3 2020, we adopted the programme for all PCG plants.

### WHAT WERE THE ACHIEVEMENTS?

- **RM17.6 million invested** in employee training, reaching 4,408 employees
- **Achieved** SMA implementation of **95% for Technical Executives**
- **93% utilisation** of **e-learning modules**

Indicators	2018	2019	2020
Training days per employee	7.8	7.9	3.3
Training investment per employee (RM)	5,329	8,481	3,981
Average total hours of training per employee (man-hours)	62	49	26
Success Rate of Technical Professional Developed (%)	65	25	51

Indicators	Target & Results	2018	2019	2020
Capability assessment (%)	Target	100	100	80
	Results	85	95	95
TP developed (number)	Target	15	15	15
	Results	17	26	20
Ready talent to critical position (ratio)	Target (CCP)	2.2:1	2.4:1	2.7:1
	Results (CCP)	2.1:1	2.6:1	2.9:1
	Target (BCP)	2.0:1	3.0:1	2.8:1
	Result (BCP)	2.3:1	3.5:1	3.3:1

**Note:** BCP = Business Critical Position, CCP = Corporate Critical Position

# COMMUNITY ENGAGEMENT

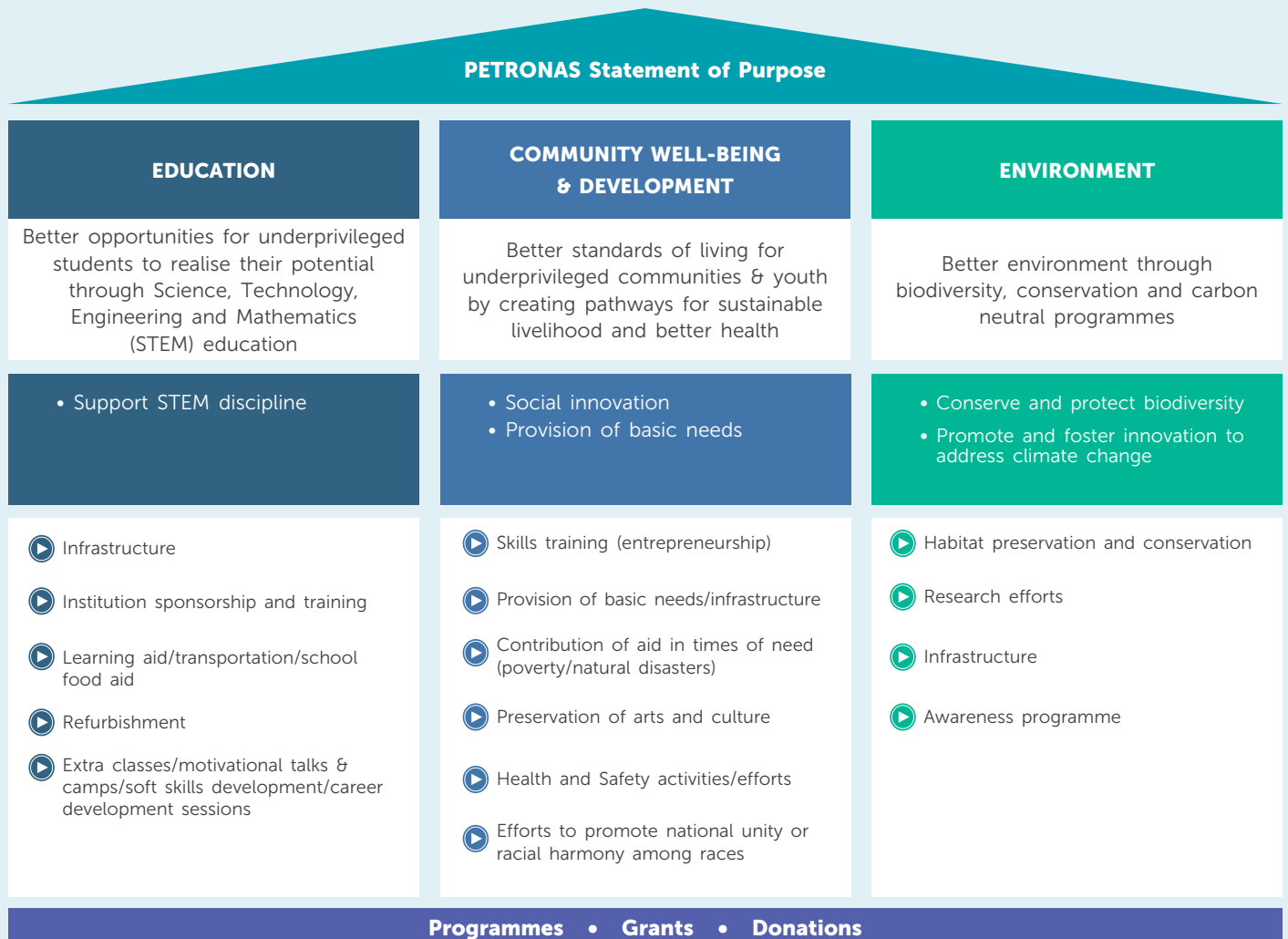
## WHY IS THIS IMPORTANT?

Community engagement programmes create an ecosystem of trust and growth. By empowering and contributing to the communities where we operate, we reinforce our commitment to social development and corporate responsibility. By giving back to the community, we can take an active role in community development, help community members succeed, and foster a deeper sense of unity. Our community work reinforces PCG’s position as an industry leader on social issues. Community involvement also helps with employee satisfaction, providing our people with purpose and fulfilment. Additionally, Corporate Social Responsibility (CSR) programmes provide critical insight into the efficient execution of key sustainability projects, such as the New Plastics Economy (NPE) and climate change adaptation.

## WHAT IS OUR APPROACH?

Our CSR programmes are designed to specifically support PCG’s Sustainability Strategy under the Social Responsibility Strategic Trust. We adopt the three pillars of Yayasan PETRONAS CSR Strategic Framework: Education, Community Well-being & Development, and Environment. Understanding the importance of partnerships, we collaborate with various stakeholders to offer impactful community solutions. Our community work aims to create value for all parties involved, including NGOs, collaborators and society at large. We strive to create sustainable impact through on-going, long-term interventions. In 2019, we set a target to reach 100,000 members from the various communities in areas we operate by 2024. Through our relentless efforts, we have reached over 70,000 individuals this year, exceeding our annual target of 20,000. To date, we have touched 90,000 lives cumulatively since 2019. Hence, we are currently looking at revising our target to expand our reach further.

### Yayasan PETRONAS CSR Strategic Framework



## COMMUNITY ENGAGEMENT

### HOW DID WE CREATE VALUE?

#### Education

- **Plastic, Sustainability & You School Module:** Conducted NPE webinar series via six sessions involving 1,300 teachers nationwide. The objective of the webinar is to educate teachers on sustainability, separation of waste at source and responsible plastic management so they can effectively teach the modules to primary and secondary school students.
- **Back to School:** Activated the programme in collaboration with Yayasan PETRONAS to alleviate the financial burdens of parents and bring cheer to students as they begin a new academic year.



PCG COVID-19 Relief Programme

#### Community Well-being and Development

- **Safe Handling of Chemicals for School (SHOC4School)/First Aider for Every Home (FAiEH):** Delivered a safety educational programme, in which we provided chemical spill kits and first aid kits to 12 secondary schools at six of our operation areas. Reaching 720 students, the programme aims to increase safety awareness in handling chemicals and first aid.
- **PCG COVID-19 Relief Programme:** Supported the nation's efforts to combat COVID-19 and ease the burdens of low-income communities affected by the pandemic. The programme includes:
  - Delivered food packages to 3,000 families living near our operating locations
  - Collaborated with Advanced Technology Training Centre, Universiti Teknologi MARA, German-Malaysian Institute, Universiti Teknikal Malaysia Melaka, to supply polymer as a raw material to produce 300,000 face shield frames for 21,000 frontliners
  - Joined forces with *Pejabat Kesihatan Sipitang* to perform sanitisation activities in the town of Sipitang, Sabah, to protect its 35,000 residents during the first and second outbreaks
- **Sentuhan Kasih Festive:** Instilled a culture of giving back to communities by providing necessities for festive celebrations. Under the banner of Yayasan PETRONAS, we activated the programme at selected locations.
- **Corporate Contribution:** Focused on "License-To-Operate" stakeholders or goodwill purposes by donating cash/in-kind contributions and/or participation in one-off programmes for temporary relief.

COMMUNITY ENGAGEMENT



Promoting 3R's (Reduce, Reuse and Recycle) through PCG Be Green programme

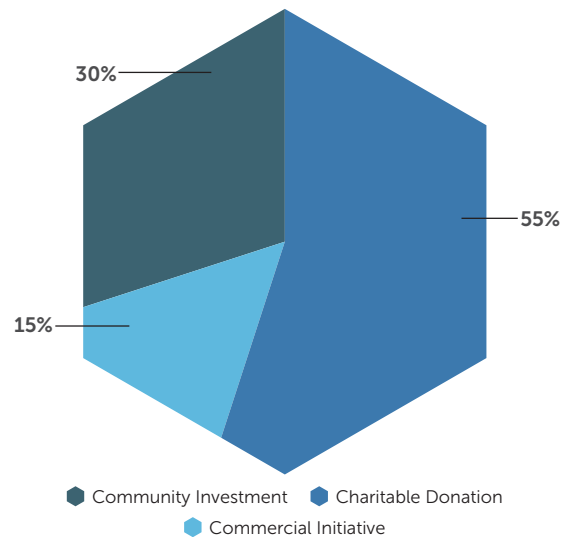
Environment

- **PCG Be Green:** Implemented Be Green programme at four locations to encourage community members to practice Reduce, Reuse and Recycle and educate on plastic waste.
- **ecoCare:** Planted mangrove trees and seedlings to preserve and restore mangroves, which protect coastlines against storms and floods.

WHAT WERE THE ACHIEVEMENTS?

- **Over 90,000 community members** reached since 2019, bringing us closer to our target of reaching 100,000 people by 2024
- About **2,000kg of recyclable waste collected**, and reached **2,880 community members** through PCG Be Green programme
- **Estimated 2,000 mangrove** trees and seedlings planted
- **65,000 people helped** through PCG's COVID-19 relief programme
- **1,300 teachers reached** nationwide for the 'Plastic, Sustainability & You' educational webinar

CSR Spending



Indicators	2018	2019	2020
Number of people reached	13,000	20,000	~70,000
Volunteer hours by employee	336	3,400	685



## STRENGTHENING ETHICS & INTEGRITY

Our commitment to ethics and integrity goes hand in hand with our commitment to our stakeholders. A stringent, clearly defined system of integrity and ethics is paramount for us to thrive in a climate of increased regulations and public awareness on Environmental, Social and Governance (ESG) issues. In fostering business relations and employee productivity, the foundation of ethical behaviour helps create long-lasting positive effects for PCG. This includes attracting and retaining highly talented individuals and building and maintaining a positive reputation among our stakeholders. From the top-down, we run the business in an ethical manner as it builds a stronger bond between stakeholders and ensures stability within the company.



### Corporate Governance

25% of Board leadership comprises female directors



### Cybersecurity

98% of workforce completed 164 training modules on cybersecurity

## CORPORATE GOVERNANCE

### WHY IS THIS IMPORTANT?

A robust governance system protects the best interest of both the business and stakeholders. PCG is committed to a well-defined and effective governance system, supporting our corporate strategy to deliver growth. For ethical, transparent and responsible governance, we need to build trust and communicate transparently with stakeholders. Integrity and trust are critical to our business success as it enhances our credibility and reinforces confidence in our stakeholders. Overall, it allows us to effectively assess, adapt to and manage risks. A culture of transparency and good governance is central to sustainable growth. It creates a high-performance work environment and efficient execution of business plans and strategy. Failure to achieve this allows severe breaches in corporate governance, such as corruption and misconduct, which could result in reputational damages, regulatory penalties, or at its absolute worst, business closure.

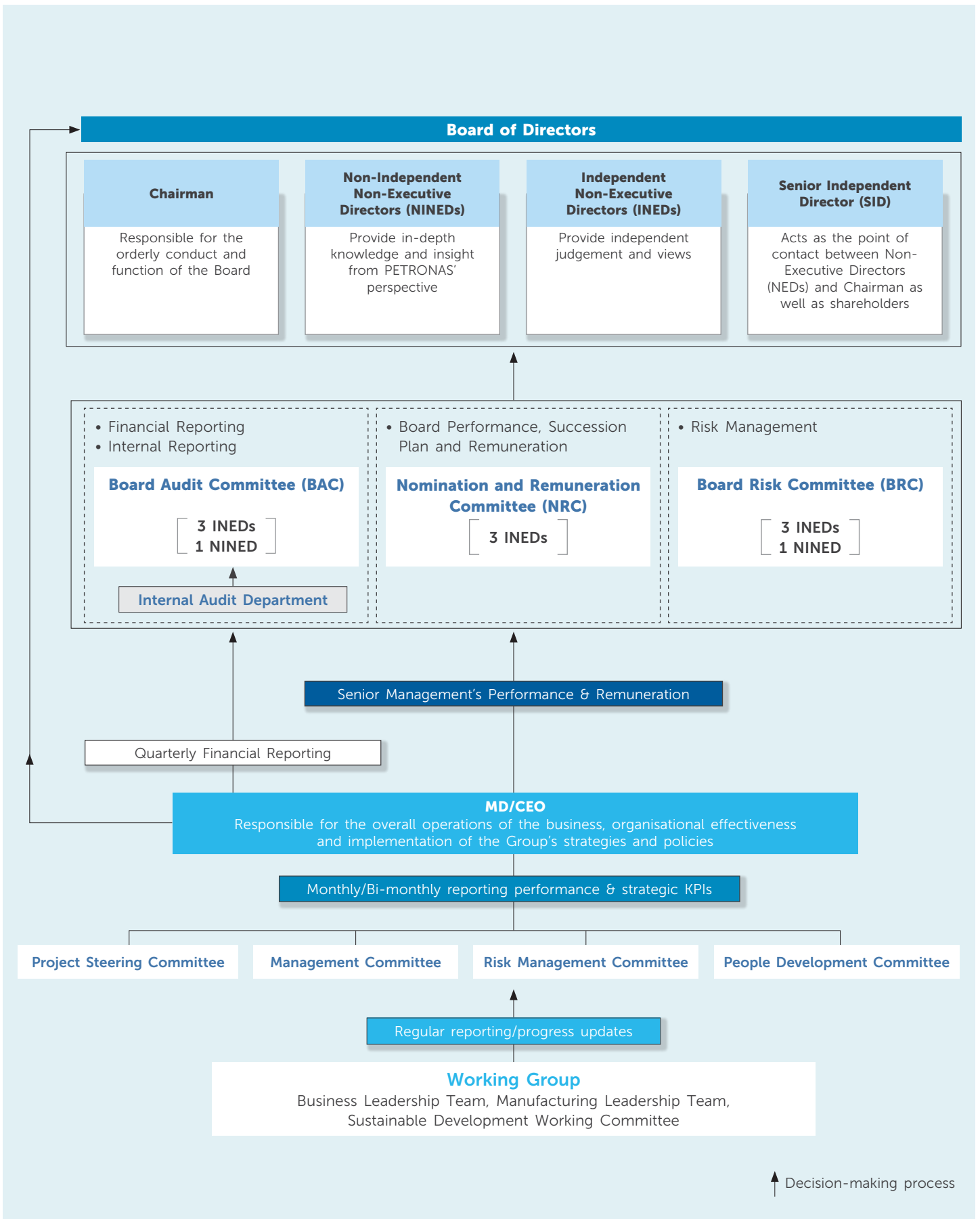
### WHAT IS OUR APPROACH?

PCG adheres to the Malaysian Code on Corporate Governance (MCCG 2017) and the relevant guidelines in all other markets where we operate. We also conduct our business according to the PETRONAS Code of Conduct and Business Ethics (CoBE); ensuring consistent compliance via the PETRONAS Integrity Compliance Framework.

Good governance is not just about leadership, but about ensuring an ethical and transparent corporate culture across the business. We understand that good governance starts at the top. With this in mind, the PCG Board provides guidance and oversight, while management executes the strategy while simultaneously managing risks. We maintain good governance by setting the right priorities, putting the appropriate team members in place, self-reflecting on our progress, enhancing our knowledge, and regularly communicating with our stakeholders. We strive to increase the representation of Independent Directors of the Board to be in line with Practice 4.1 of MCCG 2017.



CORPORATE GOVERNANCE



## CORPORATE GOVERNANCE



## HOW DID WE CREATE VALUE?

## Corporate Governance Framework

- Enhanced our governance framework to best adhere to new guidelines and governance practices.
- Identified key participants in good governance, the ways in which they relate to each other and the contribution each makes to the application of effective governance policies and processes.

## Board Diversity &amp; Competency

- Ensured an appropriate mix of diversity, skills and experience for the Board to discharge its responsibilities effectively. The Board comprises eight highly dedicated individuals from various nationalities, with a wide range of backgrounds and expertise with notable careers in their respective fields.
- Supported the country's aspirations of 30% female representation at Directors level, and remained committed to sourcing the right mix of talent, expertise and knowledge to strengthen the current membership.

## Policies &amp; Guidelines

- Continued to implement the following stringent policies and guidelines to uphold integrity and ethical practices:
  - **CoBE** – provides policy statements on the standards of behaviour and ethical conduct expected of employees of the Group and others performing work or services for or on behalf of the Group.

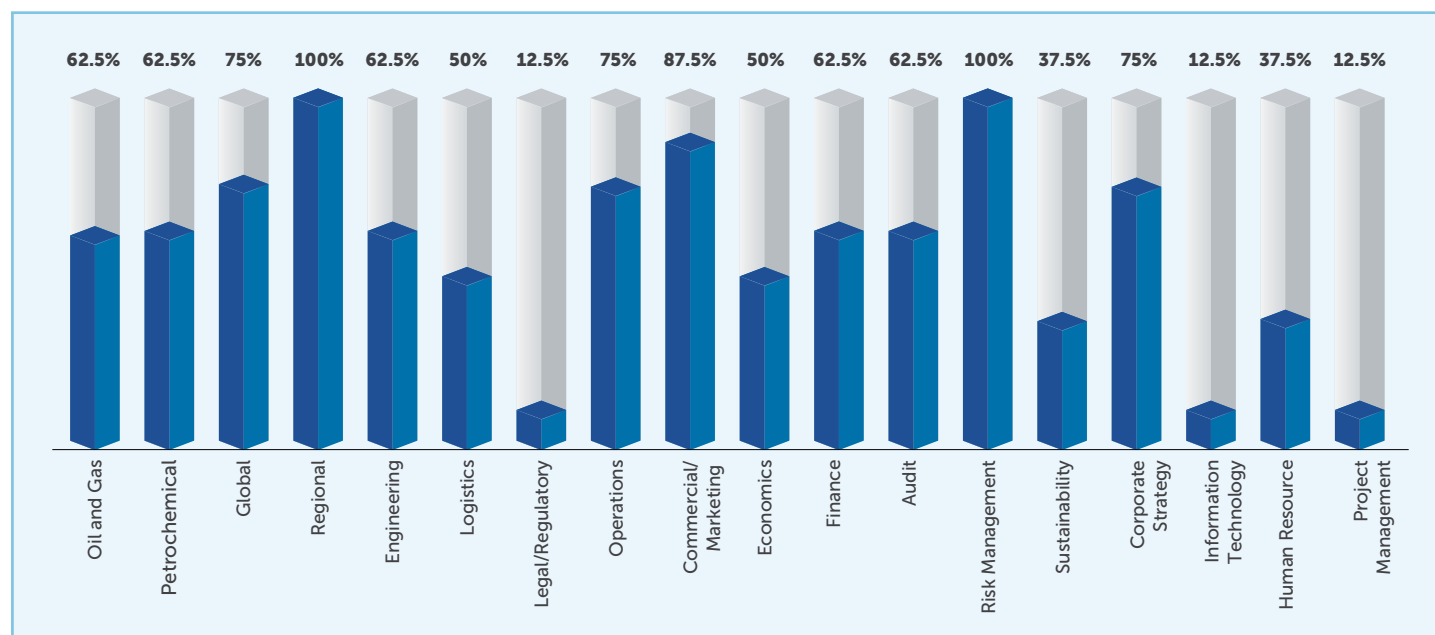
- **Anti-Bribery and Corruption Policy** – deals with improper solicitation, bribery and other corrupt activities that may arise in the course of business.
- **The PETRONAS Whistleblowing Policy** – offers an avenue for employees and other stakeholders to safely report misconduct within the Group.
- **Insider Trading** – prohibits the Board and principal officers from trading in securities based on knowledge acquired by virtue of their positions. Directors and Principal Officers are also reminded not to deal in the company's shares when in possession of price-sensitive information relating to the Group.
- **Corporate Disclosure Guide** – describes the disclosures and conduct on the dissemination of information. The guidelines are based on the Bursa Malaysia's Main Market Listing Requirements (MMLR) and the Corporate Disclosure Guidelines (3<sup>rd</sup> edition), which promotes transparency and accountability in the communication and dissemination of material information to the public.
- Organised e-learning modules for the Directors and employees, covering five critical areas of laws: Data Privacy, Third-Party Risk Management, Sanctions, Anti-Bribery & Corruption, and Competition.

## CORPORATE GOVERNANCE

### WHAT WERE THE ACHIEVEMENTS?

- **25%** of Board members comprising women
- **Certifications Received:**
  - ISO 45001:2018 Occupational Health and Safety Management Systems (OHSMS)<sup>1</sup>
  - ISO 9001:2015 Quality Management System (QMS)<sup>2</sup>
  - ISO 14001:2015 Environmental Management System (EMS)<sup>3</sup>

### Skills Experience



### BOARD OF DIRECTORS

#### NINEDs

- Datuk Md Arif Mahmood
- Freida Amat
- Noor Ilias Mohd Idris

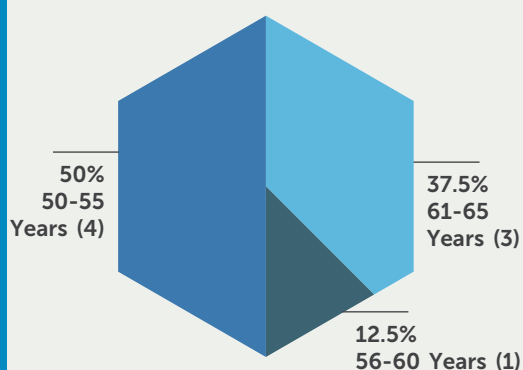
#### Executive Director

- Datuk Sazali Hamzah

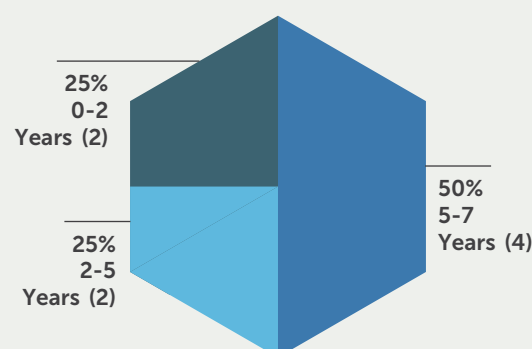
#### INEDs

- Datuk Toh Ah Wah (SID)
- Yeoh Siew Ming
- Warren William Wilder
- Dr Zafar Abdulmajid Momin

#### Age



#### Length of Service



Indicators	2020
<b>Number of internal audits conducted</b>	Completed: 10 audits Ongoing: 3 audits and 1 baseline assessment
<b>Resolutions from audits</b>	Resolved and Closed: 8 audit issues Open and On-Track: 9 audit issues

<sup>1</sup> 60% of PCG plants in operation

<sup>2</sup> 80% of PCG plants in operation

<sup>3</sup> 80% of PCG plants in operation, with a target to reach 100% by 2022

# CYBERSECURITY

## WHY IS THIS IMPORTANT?

Cyber crime is on the rise around the world, driven by global connectivity and the increasing use and reliance on digital services. Cyber attacks are an increasingly sophisticated and evolving danger to the business, as attackers employ new methods to circumvent traditional security controls. This presents new challenges to our businesses in ensuring the security of sensitive data. As PCG embraces the digitalisation of systems and processes, the company is increasingly exposed to cyber attacks and breaches. Protection of computer systems and networks from malware intrusions, safeguarding damage to the hardware or software and managing the misuse of data is critical. It is our corporate duty to protect the business and stakeholders from malicious cyber crime.

## WHAT IS OUR APPROACH?

Our cybersecurity efforts are guided by PETRONAS Enterprise Cyber Security Governance Framework (ECSGF), which aims to protect our systems and data from malicious attacks. Education is also a crucial part of our strategy to combat cyber crime, as it helps stakeholders understand the potential risks associated with utilising our network and applications. We educate our employees on simple social engineering scams to more sophisticated cybersecurity attacks designed to steal intellectual property or personal data. Last but not least, we empower our workforce's cybersecurity knowledge through structured Human Firewall Campaigns, specifically in raising cyber awareness and culture.

## HOW DID WE CREATE VALUE?

### Strengthening Cybersecurity

- Adopted the PETRONAS ECSGF, a single governance framework and standards for cybersecurity based on industry best practices and standards
- Actively monitored cyber threats and attacks in all our operations, which include conducting vulnerability assessments to prevent possible attacks
- Organised campaigns to raise employee awareness on cybersecurity, including best practices on how to avoid cyber threats
- Performed phishing tests to exercise caution when using digital communication platforms and protect the company against phishing scams
- Continued to conduct Cyber Security Risk Management as part of our remediation against cyber risks and threats

## WHAT WERE THE ACHIEVEMENTS?

- **98% of staff** attended and completed **164 modules** and assessments on cybersecurity by 31 December 2020
- Operationalisation of the **PETRONAS ECSGF in PCG**
- Initiation of the **Cyber Security Business Impact Assessment (CSBIA) and Legal & Regulatory Assessment (LRA)** on PCG ICT system assets to assess and address PCG cybersecurity vulnerabilities

# INDEPENDENT LIMITED ASSURANCE REPORT

TO THE MEMBERS OF PETRONAS CHEMICALS GROUP BERHAD

REGISTRATION NO: 199801003704 (459830-K)  
(INCORPORATED IN MALAYSIA)

## Report on the Limited Assurance of the Selected Non-Financial Material Matters

In accordance with the terms of our engagement, we, KPMG PLT, have been engaged by the Board of Directors of PETRONAS Chemicals Group Berhad (PCG) to provide limited assurance on the selected non-financial material matters reported in the Integrated Report 2020 (the Report) prepared by PCG for the year ended 31 December 2020, in accordance with the International <IR> Framework by the International Integrated Reporting Council (IIRC) (hereafter known as the International <IR> Framework).

### Management's Responsibilities

The Management of PETRONAS Chemicals Group Berhad (Management) is responsible for the preparation and presentation of the selected non-financial material matters reported in the Integrated Report 2020 in accordance with Management's calculation methodologies and the information and assertions contained within it and for establishing and maintaining appropriate performance management and internal control systems from which the reported performance information is derived.

Management is responsible for preventing and detecting fraud and for identifying and ensuring that PCG and its subsidiaries complies with laws and regulations applicable to its activities.

Management is also responsible for ensuring that staff involved with the preparation and presentation of the selected non-financial material matters in the Report are properly trained, information systems are properly updated and that any changes in the reporting process and systems is reported by all significant operating units.

### Our Responsibilities

Our responsibility is to plan and perform our limited assurance engagement and to express conclusion based on the evidence obtained, on whether anything has come to our attention that causes us to believe that the selected non-financial material matters in the Report is not prepared, in all material respects, in accordance with the International <IR> Framework.

Our evidence gathering procedures on the selected non-financial material matters as reported in the Report were designed to obtain a 'limited level' of assurance in accordance with the International Standard on Assurance Engagements (ISAE) 3000 (Revised), Assurance Engagements other than the Audits or Review of Historical Financial Information and the ISAE 3410, Assurance Engagements on Greenhouse Gas Statements issued by the International Auditing and Assurance Standards Board (IAASB). This Standard requires that we plan and perform the engagement to obtain limited assurance about whether the selected non-financial material matters is free from material misstatement.

## Selected Non-Financial Material Matters

The limited assurance on the selected non-financial material matters was undertaken on the premise of its application of the International <IR> Framework in relation to the selected non-financial material matters as below:

- Effluent Pollution Loading – Chemical Oxygen Demand (COD)
- Greenhouse Gas Emissions Scope 1 & Scope 2
- Lost Time Injury Frequency (LTIF)
- Total Recordable Occupational Illness Frequency (TROIF)
- Total non-renewable energy consumption.
- Total municipal water supplies (or from other water utilities)
- Total weight of NO<sub>x</sub> and SO<sub>x</sub> emissions from the selected operating sites
- Tier 1 Process Safety Event (T-1 PSE)

The boundary of the Limited Assurance on the selected non-financial material matters as reported in the Report was limited to PCG activities at the Group level (located at PCG headquarters at PETRONAS Twin Tower 1, Kuala Lumpur City Centre) and two (2) of its wholly-owned subsidiaries being, and PETRONAS Chemicals Ethylene Sdn Bhd (PC Ethylene) and PETRONAS Chemicals Polyethylene Sdn Bhd (PC Polyethylene) located in Kertih, Terengganu (collectively known as the operating units or OPU) for the site level data testing, and the remaining PCG's wholly-owned subsidiaries or OPU for the group level consolidated data testing.

## Procedures Performed over Selected Non-Financial Material Matters

The limited assurance engagement on the selected non-financial material matters consists of making inquiries, primarily of persons responsible for the preparation of material matters presented in the Report, and applying analytical and other evidence-gathering procedures, as appropriate. These procedures include:

- Virtual interviews with relevant committees and managers to understand the progress made by PCG in the year in pursuit of its objectives;
- Enquiries about the design and implementation of the systems and methods used to collect and process the information reported, including the aggregation of source data into the selected non-financial material matters;
- Comparing the information presented in the selected non-financial material matters as reported in the Report and its corresponding information in the relevant underlying sources to determine whether the relevant information has been prepared in accordance with Management's calculations and methodologies;

## INDEPENDENT LIMITED ASSURANCE REPORT

- Inquire the coverage of material issues and enterprise risk within the Report, which sets out PCG's strategic objectives, and other relevant information;
- Reading the Report to assess the application of the International <IR> Framework based on the data and statements pertaining to the selected non financial material matters;
- Conducted virtual site visits to the two (2) in-scope OPU's which were selected on the basis of risk portfolio, including the consideration of both quantitative and qualitative criteria; and
- Confirmation that data pertaining to the selected non-financial material matters, statements and assertions within the Report regarding PCG's activities which, based on our professional judgement and considered most significant, have been extracted appropriately from underlying documentation.

The procedures performed in a Limited Assurance engagement vary in nature and timing from, and are less in extent than for, a reasonable assurance engagement and consequently the level of assurance obtained in a limited assurance engagement is substantially lower than the assurance that would have been obtained had a reasonable assurance engagement been performed.

### Our Independence and Quality Control

We have complied with the independence and other relevant ethical requirements of the International Ethics Standards Board for Accountants' International Code of Ethics for Professional Accountants (including International Independence Standards) (IESBA Code), which is founded on fundamental principles of integrity, objectivity, professional competence and due care, confidentiality and professional behaviour.

KPMG PLT applies the Malaysian Approved Standard on Quality Control, ISQC 1 and accordingly maintains a comprehensive system of quality control including documented policies and procedures regarding compliance with ethical requirements, professional standards and applicable legal and regulatory requirements.

### Inherent Limitations

Due to the inherent limitations of any internal control structure it is possible that errors or irregularities in the information presented in the Report may occur and not be detected. Our engagement is not designed to detect all weaknesses in the internal controls over the preparation and presentation of the Report, as the engagement has not been performed continuously throughout the period and the procedures performed were undertaken on a test basis.

### Opinion

Our opinion has been formed on the basis of, and is subject to, the matters outlined in this Independent Limited Assurance Report.

We believe that the evidence we have obtained is sufficient and appropriate to provide a basis for our conclusion.

Materiality has been considered in the context of quantitative and qualitative factors (such as size), the nature and extent of the effect of these factors and the needs of the intended users of the limited assurance report on the evaluation or measurement of the selected non-financial material matters reported in the Integrated Report 2020.

Based on the procedures we have performed and the evidence we have obtained, nothing (both quantitative and qualitative) has come to our attention that causes us to believe that the selected non-financial material matters as reported in the Integrated Report for the year ended 31 December 2020 is not prepared, in all material respects, in accordance with the International <IR> Framework.

In accordance with the terms of our engagement, this Independent Limited Assurance Report on the Selected Non-Financial Material Matters been prepared for PCG and for no other purpose or in any other context.

### Restriction of use of our Independent Limited Assurance Report

Our Independent Limited Assurance Report should also not be regarded as suitable to be used or relied on by any party wishing to acquire rights against us other than PCG, for any purpose or in any other context. Any party other than PCG who obtains access to our Independent Limited Assurance Report or a copy thereof and chooses to rely on our Independent Limited Assurance Report (or any part thereof) will do so at its own risk. To the fullest extent permitted by law, we do not accept nor assume responsibility and deny any liability to any party other than PCG for our work, for this Independent Limited Assurance Report, or for the conclusions we have reached.

Our Independent Limited Assurance Report is released to PCG on the basis that it shall not be copied, referred to or disclosed, in whole (save for PCG's own internal purposes) or in part, without our prior written consent.

The KPMG logo is displayed in a stylized, handwritten font. The letters 'K', 'P', 'M', and 'G' are connected, with a horizontal line underneath the 'M' and 'G'.

**KPMG PLT** (LLP0010081-LCA & AF 0758)

Chartered Accountants

Petaling Jaya,

12 March 2021

# GLOBAL REPORTING INITIATIVE (GRI) CONTENT INDEX

The PCG's 2020 Sustainability Report has been prepared in accordance to the **GRI Sustainability Reporting Guidelines: Core Option**. The following table presents the GRI Content Index prepared by PCG.

## ORGANISATIONAL PROFILE

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
102-1	Name of organisation	PETRONAS Chemicals Group Berhad (PCG)	3	Full
102-2	Activities, brands, products, and services	<b>Overview of PCG</b>	6-7	Full
102-3	Location of headquarters	Kuala Lumpur, Malaysia	5	Full
102-4	Location of operations	<b>Overview of PCG</b>	5	Full
102-5	Ownership and legal form	PETRONAS Chemicals Group Berhad (PCG)	refer to IR	Full
102-6	Markets served	<b>Overview of PCG</b> PCG serves to key markets in 11 production sites in Malaysia, the Netherlands, Canada and Singapore.	5	Full
102-7	Scale of organisation	<b>Empowering People &amp; Communities – Human Rights &amp; Fair Employment</b>	53	Full
102-8	Information on employees and other workers	<b>Empowering People &amp; Communities – Human Rights &amp; Fair Employment</b> Information on employees were derived from our internal database.	53	Full
102-9	Supply chain	<b>Supply Chain Management</b>	39	Full
102-10	Significant changes to the organisation and its supply chain	<b>About This Report</b>	8	Full
102-11	Precautionary Principle or approach	We adopt a precautionary approach to sustainability-related risks and opportunities, as guided by PCG's risk policy, frameworks and guidelines.	8	Full
102-12	External initiatives	We align with the United Nation's Guiding Principles on Business and Human Rights and the United Nation's Sustainable Development Goals (SDGs).	8	Partial
102-13	Membership of associations	<b>Sustainability Governance</b> At PCG, our contributions go beyond paying the annual fee commitments.	25	Full

## STRATEGY

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
102-14	Statement from senior decision maker	<b>Leadership Commitment</b>	9-12	Full

## ETHICS AND INTEGRITY

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
102-16	Values, principles, standards, and norms of behaviour	<b>Overview of PCG, Sustainability Strategy</b>	2, 22	Full

## GRI CONTENT INDEX

## GOVERNANCE

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
102-18	Governance Structure	Sustainability Governance	23-24	Full

## STAKEHOLDER ENGAGEMENT

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
102-40	List of stakeholder group	About This Report – <i>Stakeholder Engagement</i>	13-15	Full
102-41	Collective bargaining agreement	Human Rights & Fair Employment 76.0% of union members out of total of support staff	52	Full
102-42	Identifying and selecting stakeholders	About This Report – <i>Stakeholder Engagement</i>	13-15	Full
102-43	Approach to stakeholder engagement	About This Report – <i>Stakeholder Engagement</i>	13-15	Full
102-44	Key topics and concerns raised	About This Report – <i>Stakeholder Engagement</i>	13-15	Full

## REPORTING PRACTICE

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
102-45	Entities included in the consolidated financial statements <sup>1</sup>	All entities are covered by the report in our GFR Financial Statements.	refer to GFR	Full
102-46	Defining report content and topic boundaries	The report covers our operations, performances, activities and initiatives from our production sites in Malaysia. Also, we only include data for DVG's operations in the Netherlands, where available, unless stated otherwise.	8	Full
102-47	List of material topics	About This Report – <i>Sustainability Material Matters</i>	16-21	Full
102-48	Restatements of information	Indicated within the report.	35, 39, 56	Full
102-49	Changes in reporting	This year, we included data for our newly-acquired DVG operations in Netherlands (where applicable).	8	Full
102-50	Reporting period	1 January 2020 to 31 December 2020, unless stated otherwise.	8	Full
102-51	Date of most recent report	PCG Sustainability Report 2019 was published in March 2020.	8	Full
102-52	Reporting cycle	Annual	8	Full
102-53	Contact point for questions regarding the report	petronaschemicals_ir@petronas.com	8	Full
102-54	Claims of reporting in accordance with the GRI Standards	About This Report This report was prepared "In Accordance with the GRI Standards – Core" option.	8	Full
102-55	GRI content index	This section.	69-73	Full
102-56	External assurance	Independent Assurance The authenticity of this report was verified by an external auditor, KPMG.	67-68	Full



## GRI CONTENT INDEX

## TOPIC-SPECIFIC DISCLOSURES

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
<b>Material Matters – Innovation &amp; Product Stewardship</b>				
103-1	Explanation of the material topic and its boundary <sup>1</sup>	Catalysing Economic Performance – <i>Innovation &amp; Product Stewardship</i>	32-34	Full
103-2	The management approach and its components	Catalysing Economic Performance – <i>Innovation &amp; Product Stewardship</i>	32-34	Full
103-3	Evaluation of the management approach	Catalysing Economic Performance – <i>Innovation &amp; Product Stewardship</i>	32-35	Full
417-1	Requirements for product and service information and labelling	We deliver innovative product solutions that meet the regulatory requirements and international safety/quality standards.	32-35	Full
<b>Material Matters – Customer Relationship Management</b>				
103-1	Explanation of the material topic and its boundary	Catalysing Economic Performance – <i>Customer Relationship Management</i>	36-37	Full
103-2	The management approach and its components	Catalysing Economic Performance – <i>Customer Relationship Management</i>	36-37	Full
103-3	Evaluation of the management approach	Catalysing Economic Performance – <i>Customer Relationship Management</i>	36-37	Full
<b>Material Matters – Supply Chain Management</b>				
103-1	Explanation of the material topic and its boundary	Catalysing Economic Performance – <i>Supply Chain Management</i>	38-39	Full
103-2	The management approach and its components	Catalysing Economic Performance – <i>Supply Chain Management</i>	38-39	Full
103-3	Evaluation of the management approach	Catalysing Economic Performance – <i>Supply Chain Management</i>	38-39	Partial
204-1	Proportion of spending on local suppliers	Amount spent to local suppliers, 60% from total procurement spending.	38-39	Full
308-1	New suppliers that were screened using environmental criteria	All contractors must meet our robust safety, technical, environmental and CoBE requirements.	38-39	Partial
409-1	Operations and suppliers at significant risks for incidents of forced or compulsory labour	We conduct human rights assessment for our suppliers based on PETRONAS Contractors Code of Conduct on Human Rights.	38-39	Partial
<b>Material Matters – GHG Emissions &amp; Climate Adaptation</b>				
103-1	Explanation of the material topic and its boundary <sup>1</sup>	Contributing to the Green Agenda – <i>GHG Emissions &amp; Climate Adaptation</i>	40-42	Full
103-2	The management approach and its components	Contributing to the Green Agenda – <i>GHG Emissions &amp; Climate Adaptation</i>	40-42	Full
103-3	Evaluation of the management approach	Contributing to the Green Agenda – <i>GHG Emissions &amp; Climate Adaptation</i>	40-42	Partial
302-1	Energy consumption within the organisation	Contributing to the Green Agenda – <i>GHG Emissions &amp; Climate Adaptation</i> 110.01 million GJ energy consumed	43	Full
305-1	Direct (Scope 1) GHG emissions <sup>1</sup>	Contributing to the Green Agenda – <i>GHG Emissions &amp; Climate Adaptation</i> 5.77 million tonne CO <sub>2</sub> e	43	Full
305-2	Energy indirect (Scope 2) GHG emissions <sup>1</sup>	Contributing to the Green Agenda – <i>GHG Emissions &amp; Climate Adaptation</i> 1.33 million tonne CO <sub>2</sub> e	43	Full
305-5	Reduction of GHG emissions <sup>1</sup>	Our GHG emissions intensity reduction is 4% from 2019.	43	Full

## GRI CONTENT INDEX

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
<b>Material Matters – New Plastics Economy</b>				
103-1	Explanation of the material topic and its boundary	Contributing to the Green Agenda – <i>New Plastics Economy</i>	44	Full
103-2	The management approach and its components	Contributing to the Green Agenda – <i>New Plastics Economy</i>	44	Full
103-3	Evaluation of the management approach	Contributing to the Green Agenda – <i>New Plastics Economy</i>	45	Full
<b>Material Matters – Environmental Stewardship</b>				
103-1	Explanation of the material topic and its boundary <sup>1</sup>	Contributing to the Green Agenda – <i>Environmental Stewardship</i>	46	Full
103-2	The management approach and its components	Contributing to the Green Agenda – <i>Environmental Stewardship</i>	46-47	Full
103-3	Evaluation of the management approach	Contributing to the Green Agenda – <i>Environmental Stewardship</i>	48-49	Full
<b>Material Matters – Human Rights &amp; Fair Employment</b>				
103-1	Explanation of the material topic and its boundary	Empowering People & Communities – <i>Human Rights &amp; Fair Employment</i>	50-51	Full
103-2	The management approach and its components	Empowering People & Communities – <i>Human Rights &amp; Fair Employment</i>	51-52	Full
103-3	Evaluation of the management approach	Empowering People & Communities – <i>Human Rights &amp; Fair Employment</i>	51-53	Full
401-1	New employee hires and employee turnover	Our employee new hire rate by gender is 25% female and 75% male and turnover for the year 2020 is 0.8%	53	Full
401-2	Benefits provided to full-time employees that are not provided to temporary or part-time employees	Empowering People & Communities – <i>Human Rights &amp; Fair Employment</i>	51	Full
401-3	Parental leave	Empowering People & Communities – <i>Human Rights &amp; Fair Employment</i> 56 female and 412 male employees took parental leave with 100% return of work rates after parental leave.	52	Full
405-1	Diversity of governance bodies and employees	Empowering People & Communities – <i>Human Rights &amp; Fair Employment</i> 25% of our Board members and 24% of senior management roles are women	53	Full
<b>Material Matters – Occupational Safety &amp; Health</b>				
103-1	Explanation of the material topic and its boundary	Empowering People & Communities – <i>Occupational Safety &amp; Health</i>	54	Full
103-2	The management approach and its components	Empowering People & Communities – <i>Occupational Safety &amp; Health</i>	54-55	Full
103-3	Evaluation of the management approach	Empowering People & Communities – <i>Occupational Safety &amp; Health</i>	54-55	Full
403-1	Occupational health and safety management system	Empowering People & Communities – <i>Occupational Safety &amp; Health</i>	54-55	Full
403-8	Workers covered by an occupational health and safety management system	We prioritise the health and safety of our staff, contractors and customers, with a stringent Health, Safety and Environment (HSE) framework in place.	54-55	Full
403-9	Work-related injuries	During the year, we recorded zero cases of fatality, with three LTI cases.	56	Full

GRI CONTENT INDEX

GRI Standards	Brief Description of the Disclosures	Brief Information on Key Disclosures, Reference	Page Number	Full or Partial Disclosure
<b>Material Matters – Talent Development</b>				
103-1	Explanation of the material topic and its boundary	<b>Empowering People &amp; Communities – Talent Development</b>	57	Full
103-2	The management approach and its components	<b>Empowering People &amp; Communities – Talent Development</b>	57	Full
103-3	Evaluation of the management approach	<b>Empowering People &amp; Communities – Talent Development</b>	57-58	Full
404-1	Average hours of training per year per employee	Average hours of training per year per employee, 26 man-hours.	58	Full
404-2	Programmes for upgrading employee skills and transition assistance programmes	Our training and development model adopts a 10:20:70 for formal learning, coaching & mentoring, and on-the-job application of knowledge and skills.	57-58	Partial
404-3	Percentage of employees receiving regular performance and career development reviews	As of 31 December 2020, 95% of PCG employees received their capability assessments, against an 80% target.	58	Full
<b>Material Matters – Community Engagement</b>				
103-1	Explanation of the material topic and its boundary	<b>Empowering People &amp; Communities – Community Engagement</b>	59	Full
103-2	The management approach and its components	<b>Empowering People &amp; Communities – Community Engagement</b>	59-61	Full
103-3	Evaluation of the management approach	<b>Empowering People &amp; Communities – Community Engagement</b>	60-61	Full
203-2	Significant indirect economic impacts	<b>Empowering People &amp; Communities – Community Engagement</b> Over 70,000 community members reached through our CSR programmes in 2020.	61	Full
413-1	Operations with local community engagement, impact assessments, and development programs	Under Yayasan PETRONAS CSR Strategic Framework, we engaged with local communities through numerous programmes held in 2020.	59-61	Partial
<b>Material Matters – Corporate Governance</b>				
103-1	Explanation of the material topic and its boundary	<b>Strengthening Ethics &amp; Integrity – Corporate Governance</b>	62-63	Full
103-2	The management approach and its components	<b>Strengthening Ethics &amp; Integrity – Corporate Governance</b>	64-65	Full
103-3	Evaluation of the management approach	<b>Strengthening Ethics &amp; Integrity – Corporate Governance</b>	64-65	Full
102-33	Communicating Critical Concerns	Our grievance channel offers an avenue for employees and other stakeholders to safely report their concerns.	64-65	Full
205-1	Operations assessed for risks related to corruption	Our Code of Conduct and Business Ethics (CoBE) as well as Anti-Bribery and Corruption Policy provides a guidance concerning bribery and corruption.	64-65	Partial
<b>Material Matters – Cybersecurity</b>				
103-1	Explanation of the material topic and its boundary	<b>Strengthening Ethics &amp; Integrity – Cybersecurity</b>	66	Full
103-2	The management approach and its components	<b>Strengthening Ethics &amp; Integrity – Cybersecurity</b>	66	Full
103-3	Evaluation of the management approach	<b>Strengthening Ethics &amp; Integrity – Cybersecurity</b>	66	Full

<sup>1</sup> Data includes DVG Netherlands operation





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