

# PETRONAS Energy Transition Strategy

Employees on routine walkabout at Malaysian Refining Company in Melaka, Malaysia.



**The PETRONAS Energy Transition Strategy charts our path forward in a rapidly evolving energy landscape shaped by the ongoing imperatives of security, affordability and sustainability. We leverage our integrated portfolio, capital discipline and execution capability to support our ability to deliver energy that is reliable, affordable and progressively lower-carbon.**

Our Energy Transition Strategy is anchored on **three strategic pillars**: strengthening and delivering our Core Business, scaling New Business and pursuing a credible Pathway to Net Zero by 2050.

Collectively, these pillars position us to deliver reliable energy solutions with lower emissions that adapt to evolving customer needs, diversify our portfolio through disciplined expansion into lower-carbon businesses, and embed decarbonisation and sustainability considerations into how we allocate capital and make strategic decisions.



## Core Business

### More Energy, Less Emissions

#### What It Means

Core Business centres on delivering an integrated hydrocarbon value chain, with a disciplined focus on progressively lowering carbon intensity across operations. It encompasses our Upstream, Gas and Maritime, and Downstream segments, spanning both domestic and international footprints.

As a substantial component of our portfolio, Core Business remains a primary cash generator, sustaining current commitments while providing the financial capacity to fund New Business growth and progress our decarbonisation agenda.

We are strengthening our Core Business through more differentiated business and partnership models, and increasing capital recycling to unlock the next wave of growth and drive value creation.

In Malaysia, Core Business continues to serve as a critical economic pillar, catalysing foreign direct investment and supporting the resilience of the local Oil and Gas Services and Equipment ecosystem.

Decarbonisation and sustainability considerations are increasingly embedded into investment and operational decisions, ensuring the systematic reduction of carbon intensity across our Core Business portfolio.

The **three primary areas** of PETRONAS Core Business are:

#### Core Business

##### Upstream

- Our Upstream strategy focuses on delivering advantaged barrels safely at low cost and lower emissions, while strengthening long-term competitiveness by accelerating value delivery across the exploration, development and production life cycle.
- We prioritise disciplined portfolio management through high-grading and optimisation, faster maturation of resources and selective capital deployment to enhance resilience and value creation.
- Operational excellence remains a core pillar, anchored in fit-for-purpose design, standardised development models and disciplined execution, delivering safer, lower-cost and lower-emissions production through integrated planning and strong asset reliability.
- Advanced digital and data-driven capabilities are progressively embedded to improve decision quality, resource certainty and recovery outcomes.
- Safety, reliability and environmental responsibility are integral to how we operate. We continue to strengthen lower-emission practices across our Upstream activities, including emissions management and readiness for carbon capture and storage (CCS) solutions.
- We actively pursue strategic partnerships and technology collaborations to enable sustainable growth, strengthen competitiveness and build long-term resilience in a changing energy landscape.

##### Gas and Maritime

- Our Gas and Maritime business is evolving into a provider of integrated, more emission-efficient energy solutions, driven by a commitment to supply resilience, commercial agility and operational excellence. Anchored by a portfolio where gas comprises two-thirds of our mix, we are strategically positioned to play a key role in the global energy transition.
- We are expanding our supply base and penetrating new markets by balancing long-term asset-backed positions with flexible, asset-light arrangements. This ensures a competitive supply of lower-carbon liquefied natural gas (LNG) as a critical transition fuel for our customers globally.
- We deliver high-efficiency maritime services by deploying vessels with reduced emissions and optimising fleet utilisation, creating enterprise-wide synergies across the LNG value chain.
- Our offerings span the full spectrum, from infrastructure and processing to transportation and trading, supported by targeted decarbonisation initiatives that reinforce our commitment to a net-zero carbon future.

##### Downstream

- Our Downstream business refines, trades and markets crude oil, petroleum products and chemicals, including commodity and specialty chemicals, for domestic and international markets.
- We create and preserve value in retail, commercial and industrial segments across commodity cycles by leveraging operational excellence of integrated assets and deep market insights.
- We expand product offerings and solutions that evolve with market and customer needs, through strategic partnerships and differentiated business models, providing new value sources to Downstream.

#### What It Delivers

- Energy security by ensuring stable and reliable supply to domestic and international markets.
- Strong cash flows to fund dividends to shareholders and reinvestment into New Business and energy transition initiatives.
- A lower greenhouse gas intensity hydrocarbon portfolio, supporting long-term resilience and sustainability.

# PETRONAS Energy Transition Strategy



## New Business Capturing New Growth Opportunities

### What It Means

New Business represents our pursuit of portfolio diversification, guided by evolving customer needs and the transition towards a cleaner, lower-carbon and more sustainable energy system.

Our investments in New Business remain deliberate, selective and disciplined, with a clear focus on capital efficiency and value accretive outcomes.

Complementing our hydrocarbon-based solutions, New Business enables integrated lower-carbon solutions that address customer demand for energy security while meeting their carbon reduction and cost targets.

In doing so, New Business provides a hedge against earnings volatility arising from the inherent cyclical nature of oil and gas markets, helping to preserve overall portfolio resilience.

Today, PETRONAS is advancing **six New Business verticals**:

#### New Business

##### Renewable Energy

We pursue renewable energy growth with discipline, in selected countries with strong demand growth, activate best-practice funding structures that can deliver robust returns, emphasise renewable energy-hydrogen synergies and unlock value through long-duration energy storage.

##### Specialty Chemicals

We strengthen our specialty chemicals portfolio through continuous innovation and disciplined growth, with a differentiated approach from product to product, while gaining access to new capabilities, markets and geographies.

##### Bio-based Value Chain

We embark on bio-based solutioning aligned with evolving customer preferences, ensuring a sustainable value chain, leveraging strategic partnerships to accelerate market access and capability development.

##### Hydrogen

We undertake progressive growth in green hydrogen and ammonia projects, secure offtake to underpin investments, improve cost competitiveness and strengthen market positioning through partnerships and technology, balancing long-term hydrogen market potential and short-term challenges.

##### Green Mobility

We expand electric vehicle charging infrastructure, leveraging partnerships to support growing adoption of sustainable mobility solutions.

##### Carbon Capture and Storage

We are building a carbon capture and storage (CCS) ecosystem to position Malaysia as a regional hub, enabling decarbonisation across industries. By leveraging our subsurface expertise, existing infrastructure and strategic partnerships across the CCS value chain, we are developing scalable carbon management capabilities to address residual emissions that cannot be eliminated through operational efficiency alone.

### What It Delivers

- Diversification of revenue streams beyond traditional hydrocarbons.
- Integrated solutions to customers.
- Strengthens PETRONAS' position as an integrated energy company, supporting long-term growth.



## Net Zero Carbon Emissions

### Pathway to Net Zero

#### What It Means

We pursue our pathway to net zero carbon emissions (NZCE), aligned with our commitment to achieve NZCE by 2050, by embedding decarbonisation across our portfolio. Decarbonisation and sustainability considerations are increasingly integrated into investment and operational decisions, ensuring the systematic reduction of carbon intensity across our portfolio.

The energy transition is not linear. Over the past year, its pace has evolved in response to policy developments, cost dynamics and technological progress. As a result, today's transition is increasingly shaped by pragmatic and practical solutions that balance emissions reduction with energy security and affordability.

In this context, we adopt a disciplined and integrated approach that focuses on practical and scalable solutions, portfolio prioritisation and capital discipline to deliver measurable emissions reduction. This ensures our decarbonisation efforts remain responsible, credible and aligned with business realities.

Our decarbonisation efforts are driven by **four key abatement levers**, which form the foundation of our operational emissions reduction pathway:

#### Key Abatement Levers

##### Zero Routine Flaring and Venting

We commit to systematically eliminating routine flaring and venting across existing and new production sites in support of the World Bank's Zero Routine Flaring by 2030 initiative. This includes flare gas recovery, enhanced compressor capacity and the conversion of venting-to-flare systems - recovering otherwise-wasted gas, and reducing methane and carbon emissions from upstream operations.

##### Energy Efficiency

We drive energy efficiency across our operations through optimising asset performance, deploying digital solutions and implementing targeted process improvements to reduce greenhouse gas intensity. This includes enhancements in plant performance, heat recovery and equipment efficiency, enabling us to deliver more output with less energy.

##### Electrification

We electrify our operations, where feasible, with lower-carbon power through asset modification, infrastructure development and the integration of renewable energy, reducing direct emissions from on-site combustion.

##### Carbon Capture and Storage

We advance carbon capture and storage (CCS) solutions to capture carbon dioxide from identified high-emission assets and store it securely in geological formations. CCS supports the reduction of residual emissions that cannot currently be eliminated through operational efficiency, electrification or other abatement measures.

Beyond operational decarbonisation, our Net Zero Carbon Emissions by 2050 Pathway is supported by broader sustainability considerations, including the protection of nature and biodiversity, and respect for human rights. These priorities are addressed through our Sustainability Approach.

#### What It Delivers

- Reduction of operational emissions.
- Alignment with evolving regulatory and policy requirements.
- Strengthening access to transition finance and sustainable capital to support PETRONAS' long-term transformation.