

FIC COUNTRY REPORT MALAYSIA

Executive summary

One of the fastest growing economies in the Asia Pacific region, Malaysia is home to an ethnically, culturally and linguistically diverse society with a highly skilled domestic workforce. The energy industry is the largest pillar in the Malaysian economy, contributing about 20% to the country's total GDP and presenting the strongest opportunity for economic growth.

With 96.6Tcf of proven natural gas reserves, Malaysia is the second largest gas producer in Asia Pacific (BP Statistical Review 2018) as well as the world's third largest exporter of LNG after Qatar and Australia. Malaysia exported 26.4m tonnes of LNG in 2017, accounting for 9% of the world's total LNG exports. Development of fields including the K5 gas field, the NC3, NC8 and Kasawari gas fields, the Limbayong oil and gas field and the Pegaga gas field, will increase Malaysia's gas production by about 1.7Bcf/d by 2022. The EPCIC contract award for the Kasawari gas field in Block SK316 is underway and it is anticipated that Malaysia Marine & Heavy Engineering is the frontrunner to land the contract. The K5 gas field, discovered in 1970 in the South China Sea offshore Sarawak, is estimated to have large gas reserves of 21Tcf with 4Tcf of recoverable resources. Unlocking

a commercial development at K5, which contains up to 70% carbon dioxide, could prove pivotal to the future exploitation of other sour gas fields in Malaysian waters.

The country's mature oil fields still provide opportunities for future growth. Malaysia is the fourth largest oil producer in Asia Pacific with 3.6Bbbl of proven oil reserves. Total oil production has reduced by 10% since its peak production of 778,000bbl/d in 2004, however, innovative technologies are being applied to increase depleting oil production. The potential upstream projects are focused on maximising production of existing fields through innovative solutions for marginal fields, deepwater development, enhanced oil recovery projects as well as increasing exploration activities. Future activity in the sector will also provide abundant opportunities in decommissioning, with a total of 38 platforms, 50 pipelines and 291 wells to be plugged and abandoned by 2023. PETRONAS' aspirations towards cost efficient decommissioning focuses on disruptive technology, rig to reef methods and collaboration.

Readily available feedstock and its strategic geographical location are making Malaysia a viable downstream hub in the region. Development of the multi-billion-dollar Pengerang integrated complex (PIC) is one of the

largest industrial developments in this region, as well as PETRONAS' largest downstream investment to date. The complex houses an integrated oil refinery, naphtha cracker and petrochemical plants as well as LNG regasification terminal, crude and LNG storage facilities. Full completion of PIC is expected to go beyond 2035 and it will not only meet domestic demand but is also expected to capitalise on the growing need for petrochemical products in Asia in the next 20 years.

In the medium-term, by 2020 coalfired power plants are expected to continue to be utilised in Malaysia. However, the government is keen on more sustainable and green energy initiatives to comply with its GHG emission reduction pledge. The Green Technology Master Plan is being implemented to reduce carbon emissions from power plants by setting requirements to install clean coal technology for new coal-fired plants. Utilities and manufacturers could see this as an opportunity to introduce and adopt cutting edge technologies in Malaysia.

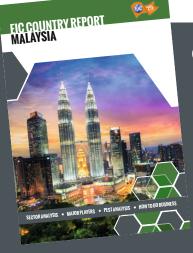


EIC members can download the full report via EICDataStream

Not an EIC member?

To buy a copy of the report, please contact Neil Golding, Head of Oil & Gas and Business Development

Email: neil.golding@the-eic.com







FIC COUNTRY REPORT MALAYSIA

Hydropower is the primary renewable energy resource in Malaysia that has been applied commercially on a large scale. Significant opportunities in the renewable sector include electricity generation from solar and biomass resources, currently utilised at a small scale. By the year 2020 solar power is expected to contribute a minimum of 220MW to the country's energy mix, as per the National Renewable Energy Policy target. Malaysia has targeted a total installed renewable energy capacity of 8,885MW by 2020.

Malaysia is considered a business-friendly country ranked 24 out of 190 countries in the World Bank's 2018
Ease of Doing Business index. A newly industrialised market economy, Malaysia is also part of the ASEAN economy, which is predicted to become the fourth largest single market by 2030. Major international oil companies that are operating in the market include ConocoPhillips, ExxonMobil, JAPEX, Murphy, Pertamina, Petrofac, Repsol, Shell and Talisman.

Under its Economic Transformation Programme, the government aims to strengthen the oil, gas and energy value chain by transforming Malaysia into the regional O&G hub by 2020. Malaysia has a large local oil and gas business community with significant experience and expertise in the region's energy value chain. The Malaysian government actively promotes Malaysian capabilities and encourages joint ventures between international and local companies. International companies have made Malaysia their regional hub over the years. For instance, McDermott, Subsea7 and TechnipFMC have relocated regional hubs to Malaysia from Singapore. Other key players such as Aker Solutions and Petrofac have established Malaysia as regional hubs to support their Asia Pacific operations.

Sixty-eight projects with over US\$75bn in capital expenditure are currently tracked on EICDataStream across all sectors in Malaysia. More than US\$37bn is to be spent in Malaysia's

energy sector
between 2020
and 2025 with
23 proposed
developments
undergoing
conceptual
design and
feasibility studies,
to be approved for
development in the near
future.

This report explores the state of country's energy industry, identifying the major current and future projects across all sectors including O&M activities, as well as introducing you to the key players in each market. A detailed overview of local companies, highlighting their capabilities and experience with links to their procurement portal is also included. It also assesses the impact of political, economic and social factors on doing business as well as providing essential information for starting up a business in Malaysia.

Other recommended EIC events and activities

To compliment this report we've suggested a selection of related EIC events that will give you a more complete picture of Malaysia and Asia Pacific's energy industries. These will provide you with the latest market updates, connect you with key players in Asia Pacific and give you an insight in to how to do business in the region.

EIC-DIT Vietnam Low Carbon Energy Conference, Hanoi, 11-12 March 2019

EIC Connect Energy Thailand, 15-16 May 2019

EIC Connect Energy South Korea, October 2019, date TBC

