



The Al-Attiyah Foundation  
**ANNUAL REPORT 2020**



# OUR MEMBERS



# TABLE OF CONTENTS

CHAPTER 1 – ABOUT THE FOUNDATION	
6.	Our Mission
7.	Our Vision
8.	Organisational Set Up and The Foundation’s Board of Trustees
10.	Message from the Chairman
12.	Our Members
CHAPTER 2 – THE YEAR IN REVIEW	
28.	The Year in Review
29.	The Year in Online Awareness
32.	The Year in Print Media
34.	Virtual Events
50.	Publications
79.	Partnerships and Collaborations
CHAPTER 3 – CONCLUSION	
82.	Conclusion
82.	Our Partners



# 01

## ABOUT THE FOUNDATION



OUR MISSION

---

OUR VISION

---

ORGANISATIONAL SET UP AND  
THE FOUNDATION'S BOARD OF TRUSTEES

---

MESSAGE FROM THE CHAIRMAN

---

OUR MEMBERS

---



## ABOUT THE FOUNDATION

### OUR MISSION

To provide robust and practical knowledge and insights on global energy and sustainable development topics and communicate these for the benefit of the Foundation's members and the community.



### OUR VISION

To be an internationally respected independent think tank that is a thought leader focused on global energy and sustainable development topics.





# ORGANISATIONAL SETUP AND THE FOUNDATION'S BOARD OF TRUSTEES

The Foundation is an independent and non-profit organisation, led by the Founder and Chairman, H.E. Abdullah Bin Hamad Al-Attiyah, and the Board of Trustees. The Board of Trustees includes the following individuals with outstanding lifetime achievements in energy, socio-economic, geopolitics, climate change, finance, and sustainable business environment.

1.	H.E. Abdullah Bin Hamad Al-Attiyah	<i>Chairman</i> Former Deputy Prime Minister and Minister of Energy and Industry
2.	H.E. Dr. Ibrahim Ibrahim	<i>Vice Chairman</i> Former Economic Advisor at Amiri Diwan
3.	H.E. Saad Sherida Al-Kaabi	<i>Member</i> Minister of State for Energy Affairs and Member of the Cabinet President & CEO of QatarEnergy
4.	H.E. Ali Al-Naimi	<i>Member</i> Former Minister of Petroleum & Minerals, Kingdom of Saudi Arabia
5.	H.E. Abdulaziz Bin Ahmed Al-Malki	<i>Member</i> Ambassador Plenipotentiary and Extraordinary of the State of Qatar to the European Union since 2021
6.	H.E. Nasser Al Jaidah	<i>Member</i> Member, QatarEnergy Board of Directors Member, State of Qatar Advisory Council Former CEO, QatarEnergy International
7.	Mr. Hamad Rashid Al-Mohannadi	<i>Member</i> Former CEO of RasGas
8.	Mr. Fahad Bin Hamad Al-Mohannadi	<i>Member</i> Former Managing Director of QEWC
9.	Mr. Reda Ibrahim Ali	Managing Director of the Al-Attiyah Foundation
10.	Mr. Howard Bevan	Secretary to the Board of Trustees





# MESSAGE FROM THE CHAIRMAN



**H.E. ABDULLAH BIN HAMAD AL-ATTIYAH**

Chairman

*The Abdullah Bin Hamad Al-Attiyah  
International Foundation for Energy and Sustainable  
Development*

*Former Deputy Prime Minister  
and Minister of Energy & Industry*

In this past year, the period covered by this annual report, the world was profoundly impacted by the Covid-19 crisis. During this era, where work-life was completely thrown into turmoil, I was struck by the evidence of ingenuity and innovation that the coronavirus pandemic has highlighted. The way The Foundation quickly adapted to a new way of working was a good testament to this.

The Foundation's 2020 Annual Report highlights some positive things at a time of great challenge:

## PERSEVERANCE

With perseverance, it is possible to turn challenges into opportunities;

## UNDERSTANDING AND COOPERATION

With understanding and cooperation, mankind can overcome vulnerability to catastrophic events;

## CREATIVITY

With creativity, the use of technology could be limitless;

## COORDINATED EFFORTS

With coordinated efforts, it is possible to mount effective universal responses to global challenges;

## SOLIDARITY

With solidarity, humanity has the capacity to tackle crisis through the combination of small individual acts of selflessness and larger professional sacrifices; and

## GOODWILL

With goodwill, there are enough collective energies and resources that can be harnessed as a stimulus for global recovery and regeneration.

Following the outbreak of Covid-19 in 2020 and the containment lockdown measures that were implemented to slow the spread of the virus, The Foundation, like many organisations, realised the need to be inventive in pursuit of its deliverables. The Foundation's 2020 plans were radically impacted. While physical flagship events, such as The Al-Attiyah Awards and the CEO Roundtables, had to be cancelled, new virtual online meetings, such as podcasts and webinars, were successfully introduced. During the lockdown, the Foundation produced numerous articles on the coronavirus's impact on the energy sector, sustainability, and climate change. These articles that were published in local newspapers demonstrated the ease to which the Foundation was able to rise to the challenge and adapt quickly to the new way of working while pursuing its mission.

The Foundation would capitalise on the opportunities that arose due to the pandemic to further enhance its programmes and activities during 2021. While the environment created by Covid-19 would remain challenging for the foreseeable future, the accomplishments presented in this 2020 Annual Report give me the confidence that the Foundation would continue to deliver high standard outputs. I am excited to work with all our members and partners in 2021 to plot and chart the future journey to a sustainable world—a journey that has become even more pertinent and urgent than ever before.

“I was struck by the evidence of ingenuity and innovation that the coronavirus pandemic has highlighted.”





## OUR MEMBERS



QatarEnergy is a state-owned public corporation established by Emiri Decree No. 10 in 1974. It is responsible for all phases of the oil and gas industry in the State of Qatar. The principal activities of QE, its subsidiaries and joint ventures are the exploration, production, local and international sale of crude oil, natural gas and gas liquids, refined products, synthetic fuels, petrochemicals, fuel additives, fertilizers, liquefied natural gas (LNG), steel and aluminium. QE's strategy of conducting hydrocarbon exploration and development is through Exploration and Production Sharing Agreements (EPSA) and Development and Production Sharing Agreements (DPSA) concluded with major international oil and gas companies. Thriving on a spirit of enterprise, each of our joint ventures is underpinned by transparency, innovation and high standards of quality and service. At QatarEnergy, we are committed to one thing above all: Excellence.

[www.qp.com.qa](http://www.qp.com.qa)



Qatargas is a unique global energy operator in terms of size, service and reliability. The Company operates 14 Liquefied Natural Gas (LNG) trains with a total annual production capacity of 77 million tonnes. This makes Qatargas the largest LNG producer in the world. Established in 1984, Qatargas develops, produces, and markets hydrocarbons from the world's largest non-associated natural gas field. In addition to producing LNG, Qatargas is also a leading exporter of natural gas, helium, condensate and associated products. Today, Qatargas continues to set the benchmark in the LNG industry as it safely and reliably supplies energy to customers all over the world.

[www.qatargas.com](http://www.qatargas.com)



Qatar Fuel Q.P.S.C ("WOQOD") was formed in 2002 by an Emiri Decree with an aim to provide downstream, refined fuel storage, distribution and marketing services in the State of Qatar. Woqod was incorporated as a Joint Stock Company on 2nd July, 2002. Subsequently, Woqod came out with its Initial Public Offering in 2003 and became Qatari Public Shareholding Company. Woqod is listed on Qatar Exchange and its shares are publicly traded. WOQOD is exclusively responsible for the distribution of fuel needs within Qatar. This includes diesel, gasoline and aviation fuel. The company also trades in bunker fuels, ship-to-ship bunkering within Qatari waters, bitumen importation and distribution, LPG, and own-branded lubricants. In addition, it builds modern branded service stations across Qatar.

[www.woqod.com](http://www.woqod.com)







QNB Group was established in 1964 as the country's first Qatari-owned commercial bank, with an ownership structure split between the Qatar Investment Authority (50%) and the remaining (50%) held by members of the public. For the year ended 31 December 2019, Net Profit topped QAR14.4 billion (USD3.9 billion), an increase of 4% compared to same period last year. Total Assets reached QAR945 billion (USD259 billion), an increase by 10% from 30 December 2018, one of the best set of results in QNB Group's history. QNB Group's presence through its subsidiaries and associate companies extends to more than 31 countries across three continents providing a comprehensive range of advanced products and services. The total number of employees is more than 29,000 serving 25 million customers operating through 1,100 locations, with an ATM network of 4,300 machines.

[www.qnb.com](http://www.qnb.com)



Qatar Insurance Company (QIC) is a publicly listed composite insurer with a consistent performance history of over 50 years and a global underwriting footprint. Founded in 1964, QIC was the first domestic insurance company in the State of Qatar. Today, QIC is the market leader in Qatar and a dominant insurer in the GCC and MENA region. QIC is one of the highest rated insurers in the Gulf region with a rating of A/Stable from Standard & Poor's and A(Excellent) from A.M. Best. In terms of profitability and market capitalization, QIC is also the largest insurance company in the MENA region. It is listed on the Qatar Exchange and has a market capitalization of over USD 4 billion.

[www.qatarinsurance.com](http://www.qatarinsurance.com)



Qatar Electricity and Water Company (QEWCO), a Qatari public shareholding company, is one of the first private sector companies in the region that operates in the field of electricity generation and water desalination. Established in 1990 in accordance with the provisions of the Qatari Commercial Companies Law, its purpose was to own, manage, and sell the products of electricity generation and water desalination plants. QEWCO is the second largest company in the field of power generation and water desalination in the Middle East and North Africa (MENA) region. It is the main supplier for electricity and desalinated water in Qatar with a market share of 62% of electricity and 79% of water. The company generates electricity of 5.432 Megawatt and produces 258 million gallons of water per day.

[www.qewc.com](http://www.qewc.com)







The Dolphin Gas Project is a unique energy initiative delivering supplies of natural gas from Qatar to customers throughout the UAE and Oman. It is the only international gas network in the region. Dolphin Energy has been delivering 2 billion standard cubic feet of natural gas every single day, safely and reliably, to provide a source of clean, new energy for the Southern Gulf. It has maintained its production commitments every single year since operations began. Dolphin Energy's gas production in Qatar and subsequent transmission to the UAE and Oman demonstrates how the national and international stakeholders in Dolphin Energy have been able to assemble the skills, technologies and multidisciplinary implementation teams essential to the success of the Project.

[www.dolphinenergy.com](http://www.dolphinenergy.com)



Qatar Airways, the national carrier of the State of Qatar, is celebrating more than 20 years of Going Places Together with travellers across its more than 160 business and leisure destinations on board a modern fleet of more than 250 aircrafts. The world's fastest-growing airline will add a number of exciting new destinations to its growing network in 2020, including Osaka, Japan; Santorini, Greece; Dubrovnik, Croatia; Almaty and Nur-Sultan, Kazakhstan; Accra, Ghana; Cebu, Philippines; Lyon, France; Trabzon, Turkey; Siem Reap, Cambodia and Luanda, Angola. A multiple award-winning airline, Qatar Airways was named 'World's Best Airline' by the 2019 World Airline Awards, managed by international air transport rating organisation Skytrax. It was also named 'Best Airline in the Middle East', 'World's Best Business Class' and 'Best Business Class Seat', in recognition of its ground-breaking Business Class experience, Qsuite. Qatar Airways is the only airline to have been awarded the coveted "Skytrax Airline of the Year" title, which is recognised as the pinnacle of excellence in the airline industry, five times.

[www.qatarairways.com](http://www.qatarairways.com)



Qatar Petrochemical Company (QAPCO) Q.P.J.S.C. is one of the world's largest and most successful producers of low-density polyethylene (LDPE) – a basic plastic polymer that is derived from oil and natural gas. QAPCO's main facilities consist of an Ethylene plant (cracker) with a production capacity of 840 kilo tonnes per annum (ktpa), three LDPE plants with a total combined production capacity of over 780 ktpa and a Sulfur plant with a production capacity of 70 ktpa. The shareholders are Industries Qatar (80%) and Total (20%).

[www.qapco.com](http://www.qapco.com)







Founded in 1969 as a joint venture between the Government of Qatar and a number of foreign shareholders, QAFCO has evolved steadily over the past five decades as a world-class fertilizer producer. The country's first large-scale venture in the petrochemical sector, QAFCO was established to diversify the economy and utilize the nation's enormous gas reserve. QAFCO is currently owned 75% by Industries Qatar (IQ) and 25% by Yara Netherland. With 6 world-class plants producing a sizable annual capacity of 3.8 million MT of ammonia and 5.6 million MT of urea, QAFCO stands proudly as the world's largest single-site exporter of urea with up to 14% share of the world supply. QAFCO is strongly committed to operating its assets safely, efficiently and in an environmentally responsible manner to produce high quality Ammonia and Urea. Continuing with its commitment to excellence, QAFCO aims to be the largest producer of urea in the world by 2030, driving towards a greener earth.

[www.qafco.qa](http://www.qafco.qa)



The State of Qatar has been on a remarkable journey of economic development and growth. Shell is immensely proud to have been invited to be a partner in this exciting journey. Since 2006, Shell has invested over \$20 billion in Qatar to build a highly material business. As the largest foreign investor in the country, and working closely with QatarEnergy, Shell is committed to deliver long term value for Qatar and Shell for decades to come. Today, the scope of Shell's partnership with QatarEnergy covers key elements of the oil and gas business.

[www.shell.com.qa](http://www.shell.com.qa)

**Marubeni**

Marubeni Corporation and its consolidated subsidiaries use their broad business networks, both within Japan and overseas, to conduct importing and exporting, as well as domestic business, encompassing a diverse range of business activities across wide-ranging fields including lifestyle, ICT & real estate business, forest products, food, agri business, chemicals, power business, energy, metals & mineral resources, plant, aerospace & ship, finance & leasing business, construction, auto & industrial machinery, and next generation business development. Marubeni participates in global LNG projects in Qatar, Equatorial Guinea, Peru, and Papua New Guinea. Marubeni will continue to work on the smooth operation of existing LNG projects, while also focusing on the pursuit of investment opportunities and expanding trading operations to respond to the increasing global demand for LNG and strengthening its comprehensive approach from sourcing to delivery.

[www.marubeni.com](http://www.marubeni.com)







ConocoPhillips is one of the world's largest independent exploration and production companies, based on proved reserves and production of liquids and natural gas. Since becoming an independent exploration and production (E&P) company in May 2012, ConocoPhillips has focused solely on the core business of finding and producing oil and gas globally. ConocoPhillips endeavour to fully demonstrate its assets, capabilities and resources and strive to make a real difference in the communities where it operates in. This applies to financial and operational performance and also to the way ConocoPhillips does business. ConocoPhillips has a time-honoured tradition of placing safety, health and environmental stewardship at the top of its operating priorities. ConocoPhillips' technical capability, asset quality and scale, and financial strength are unmatched among independent E&P companies and uniquely position the company to compete anywhere in the world. ConocoPhillips production includes light oil, oil sands, natural gas liquids, conventional natural gas, coal seam gas, tight oil and gas, and liquefied natural gas. The partnership with QatarEnergy is a shining example of how the State of Qatar and ConocoPhillips are working safely and responsibly to provide the world with the energy it needs.

[www.conocophillips.qa](http://www.conocophillips.qa)



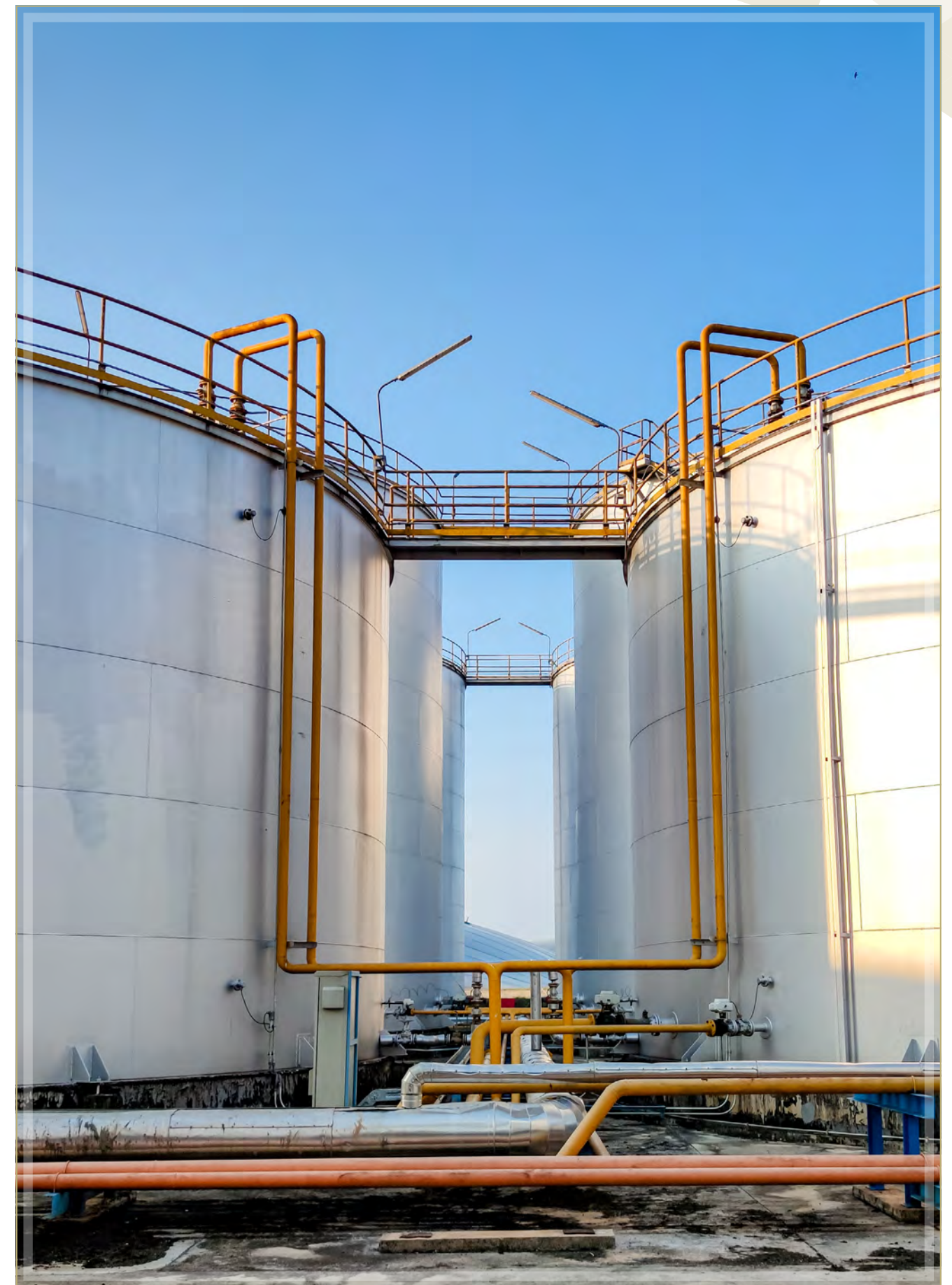
Established in 2017, North Oil Company (NOC) is a pioneering new Qatari offshore oil operator that unites the expertise of QatarEnergy and TOTAL. This dynamic joint-venture is set to continue the advancement of Al-Shaheen, Qatar's largest offshore oil field, for the next 25 years. Bringing the strengths and vast experience of QE and Total together enables NOC to solve the challenges of operating one of the world's most complex offshore fields. NOC looks forward to harnessing innovative technology and ensuring the highest safety standards to source energy that will serve the world.

[www.noc.qa](http://www.noc.qa)



Qatar Chemical Company Ltd. (Q-Chem) is a Qatari company owned by Mesaieed Petrochemical Holding Company Q.S.C. (MPHC) 49 percent, Chevron Phillips Chemical International Qatar Holdings LLC (Chevron Phillips Chemical Qatar) 49 percent, and QatarEnergy (QE) 2 percent. MPHC is majority owned by QE. The Q-Chem facility is a world-class integrated petrochemical plant producing highdensity and medium-density polyethylene (HDPE & MDPE), 1-hexene and other products, using state-of-the-art technology provided by Chevron Phillips Chemical, a major integrated producer of chemicals and plastics. Over US \$1 billion was invested to engineer, construct and commission the Q-Chem facility, which began commercial operations in 2004. Located in Mesaieed Industrial City, the Q-Chem complex has a production capacity of 453,000 metric tons per annum (MTA) of polyethylene and a 1-hexene unit with a production capacity 47,000 MTA. The complex also consists of sulfur recovery and solidification plant, a water treatment plant, seawater cooling system, dock facilities and administrative buildings.

[www.qchem.com.qa](http://www.qchem.com.qa)







Sasol is an international integrated chemicals and energy company that leverages technologies and the expertise of our 31,270 people working in 32 countries. We develop and commercialise technologies and build and operate world-scale facilities to produce a range of high-value product stream, including liquid fuels, chemicals and low-carbon electricity. By combining the talent of its people and its technological advantage, Sasol has been a pioneer in innovation for over six decades. As market needs and stakeholder expectations have changed, so too have its methods, facilities and products, driving progress to deliver long-term shareholder value sustainably. The growth and enhancement of its foundation businesses in Southern Africa is complemented by the significant chapter of growth, Sasol has entered in its history.

[www.sasol.com](http://www.sasol.com)



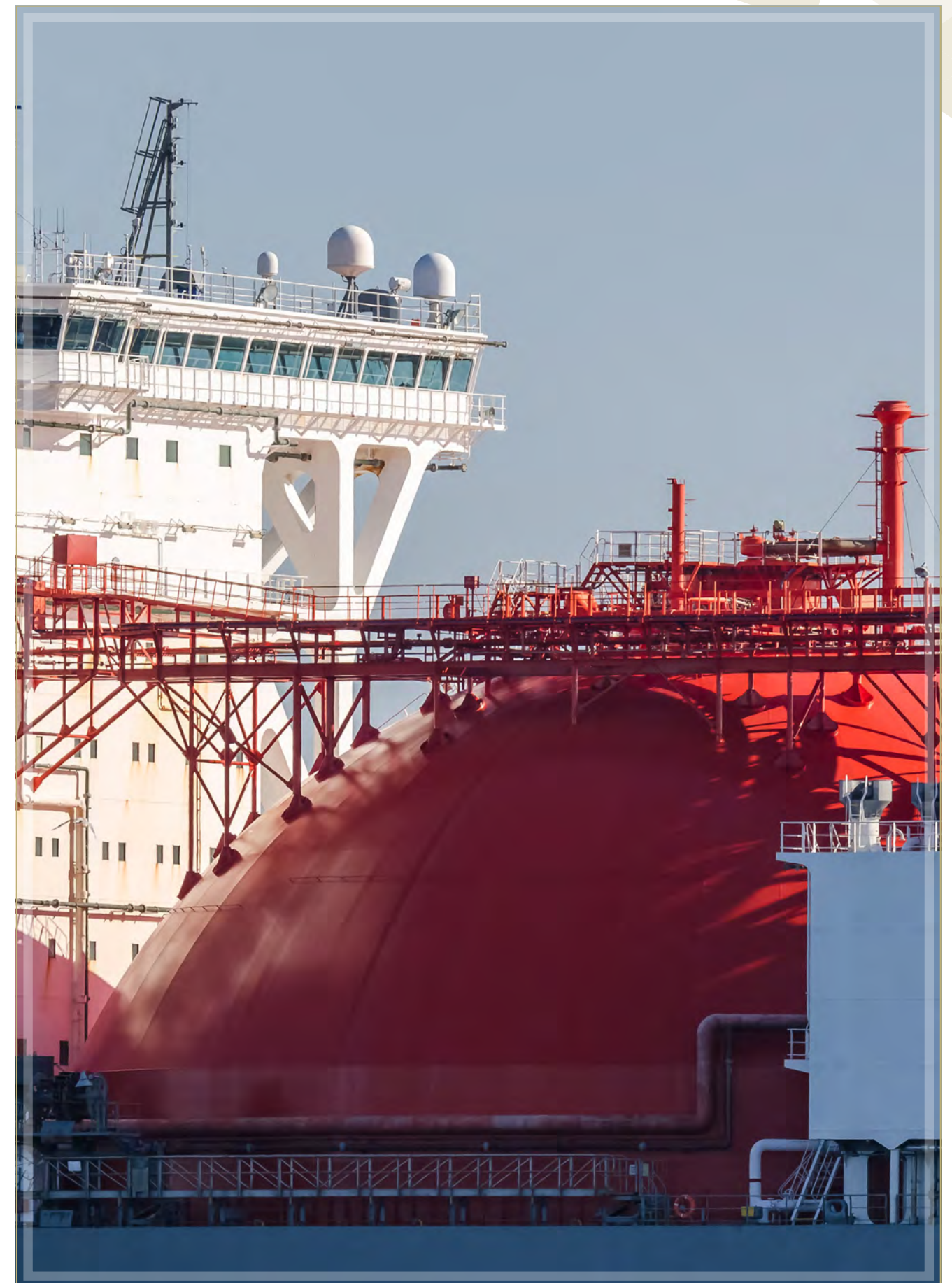
Established in 2004, Nakilat is a Qatari-owned shipping and maritime company providing the critical transportation link in the State of Qatar's LNG supply chain. The company's LNG shipping fleet is the largest in the world, comprising of 69 LNG vessels. Nakilat also owns 1 FSRU vessel and four large LPG carriers, with the latter operated by its in-house ship management arm, Nakilat Shipping Qatar Limited (NSQL). In addition to its core shipping activities, Nakilat operates the ship repair and construction facilities at Erhama Bin Jaber Al Jalahma Shipyard in Ras Laffan Industrial City via two strategic joint ventures: Nakilat-Keppel Offshore & Marine (N-KOM) and Nakilat Damen Shipyards Qatar (NDSQ). It also provides shipping agency services through Nakilat Agency Company (NAC) at all Qatari ports and terminals, as well as towage and other marine support services through its joint venture Nakilat SvitzerWijismuller (NSW) for vessels at the Port of Ras Laffan and around Qatar's Halul Island. Nakilat's comprehensive business portfolio of shipping and maritime services complements its vision to be a global leader and provider of choice for energy transportation and maritime services.

[www.nakilat.com](http://www.nakilat.com)



Gulf Helicopters Company (GHC) is one of the leading commercial aviation services providers. Our global footprint extends from Europe to Africa to Middle East to South Asia to Far East. Founded in 1970, with the primary objective of catering to the needs of Qatar's Oil and Gas Industry, Gulf Helicopters has grown over the years by leaps and bounds to successfully become a leading global aviation services provider. Gulf Helicopters outstanding engineering capabilities and multitype fleet offer cost efficient solutions to address the challenging demands of its esteemed clients with complete focus on performance and safety.

[www.gulfhelicopters.com](http://www.gulfhelicopters.com)







Qatar Cool is the leading district cooling company's in Qatar. Since its inception, Qatar Cool has aimed for operational excellence in every aspect of its business. Over the past 15 years, the company has developed solid technical and operational experience and has refined its approach on both business-to-business (B2B) and business-to-consumer (B2C) fronts. Currently, Qatar Cool is the leading commercial provider of district cooling services in Qatar. Qatar Cool currently owns and operates four cooling plants covering the West Bay and The Pearl-Qatar districts with the combined capacity of 237,000 tons of refrigeration.

[www.qatarcool.com](http://www.qatarcool.com)



Nebras Power is a global power development and investment company headquartered in Doha, Qatar. The mission of Nebras Power is to develop and manage a portfolio of strategic investments in the power sector globally. Set up to take advantage of energy investment opportunities created by the global growth in demand for electricity and water, Nebras Power is an active player in the evolving global power industry, pioneering future energy solutions through its long-term investments. Nebras Power forms part of Qatar's 2030 Vision to diversify the economy, to promote sustainable long-term development of the country and to be the custodian of wealth for future generations.

[www.nebras-power.com](http://www.nebras-power.com)



Excelerate Energy L.P. (Excelerate) is a US-based LNG company located in The Woodlands, Texas. Excelerate is owned by George B. Kaiser and is part of his energy group that also includes Kaiser Francis Oil Co, an E&P company with production in the U.S. and Canada along with significant midstream assets, and Cactus Drilling Co, the largest private drilling company in the US. Excelerate is the pioneer and market leader in innovative floating LNG solutions, providing integrated services along the entire LNG value chain with an objective of delivering rapid-to-market and reliable LNG solutions to customers. Excelerate offers a full range of floating regasification services from FSRU to infrastructure development to LNG supply. Excelerate has offices in Abu Dhabi, Buenos Aires, Chittagong, Dhaka, Doha, Dubai, Rio de Janeiro, Salem, Singapore, and Washington, DC.

[www.excelerateenergy.com](http://www.excelerateenergy.com)





# THE YEAR IN REVIEW

The review of outputs by the Foundation in 2020  
is presented under the following headings:

THE YEAR IN ONLINE AWARENESS

THE YEAR IN PRINT MEDIA

VIRTUAL EVENTS

PUBLICATIONS

PARTNERSHIPS AND COLLABORATIONS





# THE YEAR IN REVIEW

All the outputs produced by the Foundation in 2020 were circulated to the Foundation's members, through the Foundation's social media accounts, and select publications were issued to both local and international media channels. In all, the Foundation delivered the following activities to its members, senior policymakers, and the wider community, in Qatar and globally:

~200

EDITIONS

of Daily News Flash (DNF)

>45

EDITIONS

of Weekly Energy Market Review (WMR)

28

NEWS ARTICLES

12

MONTHLY ENERGY RESEARCH SERIES

12

MONTHLY SUSTAINABLE DEVELOPMENT RESEARCH SERIES

9

PODCAST INTERVIEWS

8

ENERGY INDUSTRY WEBINARS

6

HIGH LEVEL INTERVIEWS

QR CODE

Scan to visit our publications page

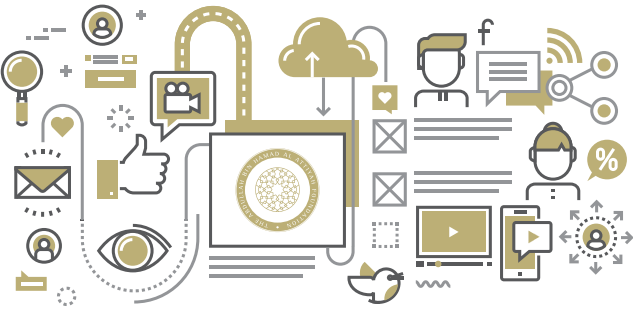
# THE YEAR IN ONLINE AWARENESS

## SOCIAL MEDIA PLATFORM GROWTH

Throughout 2020 the Foundation continued to utilise Twitter and LinkedIn as its two primary online channels to promote the Foundation, its events, and its activities. After only two years, both platforms have grown considerably, driving large amounts of awareness for the Foundation, particularly in the local market.

Both channels benefited from the continued use of video content, with the continuation of short monthly 60 second videos used to promote each of the Foundations Research Series, and with the new added video content provided from both the Podcast Interviews, and the Webinars. All of which was developed, recorded, and edited in-house.

Further, to ensure a balance of interesting, engaging content for the Foundation's online audiences, content was varied with the new inclusion of Members Content (shared posts from our members), and News based posts (from credible international sources) to supplement the Foundations promotional posts.



	Twitter	Linked In	CUMULATIVE SOCIAL MEDIA AWARENESS
	Posts to Platform	Posts to Platform	Posts to Platform
	250	250	500
	Total Followers	Total Followers	Total Followers
	2,045	5,863	7,908
	New Followers	New Followers	New Followers
	550	1,400	1,950
	Impressions	Impressions	Impressions
	2,036,100	500,000	2,536,100



## DIGITAL COMMUNICATION



With a growing membership base, speakers contacts, alumni, fellows and partners of the Al-Attiyah Foundation a digital online distribution platform (Mail-Chimp) was once again employed to efficiently database member contacts and ensure a high-end delivery of content to the Foundations members.

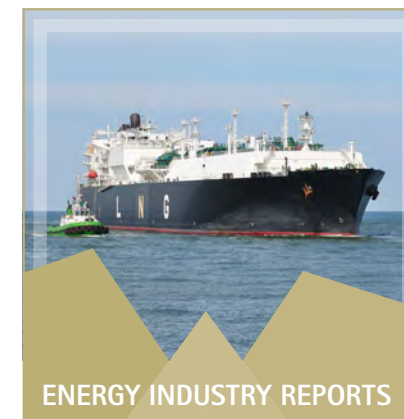
Further, with the decision to release Foundation content to the public, as part of the Foundations efforts to grow in its role as a Corporate Social Responsibility (CSR) entity on behalf of its member, the Mail-Chimp platform provided an opportunity to systematically release content to members with a two-week exclusivity period, before it was released onto mass market platforms such as the Foundations newly formed publications library, and social media.



## ONLINE PUBLICATIONS LIBRARY

In order to effectively collate, catalogue, and share the Foundations more than 300 publications, interviews, podcasts, webinars, white papers, and much more, the Foundation launched an online library in 2020. This library is free to the public and provides a valuable resource with all foundation content categorised, and available for download.

While historically all of this content was reserved for Foundation members, the sharing of this valuable information, made possible by Foundation members, was a key step in ensuring the Foundation continued to act in its role as a Corporate Social Responsibility (CSR) partner on behalf of all of its members.





## THE YEAR IN PRINT MEDIA

As in previous years, the Foundation produced a weekly energy market newsletter in Arabic & English, covering an analytical overview of oil and gas's global developments.. The weekly bulletin was regularly published in all the major newspapers in Qatar. In addition, The Foundation issued many articles in several print media and on its website. These articles promote the research reports produced by The Foundation and in-depth insight on interesting themes impacting the energy industry. The impact of Covid-19 on the energy sector and sustainability received comprehensive coverage in many of the articles.

## LIST OF ARTICLES PUBLISHED IN 2020

S.N.	Article Title	Publishing Date
1.	Global transport on verge of the biggest change in 100 years	11 Mar 2020
2.	How Low Can Oil Go?	25 Mar 2020
3.	Europe May Shut Down. China Starts Up	26 Mar 2020
4.	Covid-19 Crushes Oil & Gas Markets	27 Mar 2020
5.	Can Renewables Clean Up Oil's Price Spill	29 Mar 2020
6.	Covid-19 - A Double Edge Sword for Climate Change	30 Mar 2020
7.	Why Did Russia Feel the Proposed Cuts Wouldn't Work	01 Apr 2020
8.	The Storage Dilemma	02 Apr 2020
9.	Crude Prices in Focus	06 Apr 2020
10.	Who Can Survive Below \$20 per Barrel Oil?	08 Apr 2020
11.	Difficult Decisions for Producers	09 Apr 2020
12.	Covid-19 Crisis Dampens 2020 Outlook for Clean Energy	14 Apr 2020
13.	2020's LNG Maintenance & Operability Challenges	16 Apr 2020
14.	More Stability Expected Following the OPEC+ Deal?	17 Apr 2020
15.	The Vital Role of LPG In Developing Nations	19 Apr 2020
16.	US Oil Futures, The Only Way Is Up	21 Apr 2020
17.	It's not all Doom & Gloom for Natural Gas'	24 Apr 2020
18.	Signs of Economic Recovery in China	27 Apr 2020
19.	Brent - WTI: Spread & Storage	28 Apr 2020
20.	The Planet Comes Up for Air	30 Apr 2020
21.	Will a Vaccine Save Oil?	01 May 2020
22.	Covid-19 & Air Pollution - A Tale of Two Killers	18 May 2020
23.	Chemicals to become the new frontier for oil demand post-2020	15 Jun 2020
24.	The United Nations SDGs & Global Recovery from Covid-19	16 Jun 2020
25.	Traded Gas Hubs	18 Aug 2020
26.	Corporate Social Responsibility Has Unlikely Patrons Amongst Evermore Demands	25 Aug 2020
27.	Can The Market Limit Climate Change?	14 Sept 2020
28.	US Shale Oil and The Speed Bumps Ahead	05 Oct 2020

[illegible]

# Global transport on verge of change of biggest change in 100 years: Al Attiyah Foundation

THE PENINSULA, [KSA]:

The global transport industry is on the verge of major changes, unprecedented for the last century or even one hundred years. The transport sector will see emerging with rising new technologies including electric vehicles, autonomous driving, and ride-sharing. The leading actors in transportation and major cities, enterprises, and state entities, the transportation industry will be driven by both efficiency, market forces, carbon management, and environmental challenges.

In the Al Attiyah Foundation's report entitled "Global Transport 2030: The new growth market expected to double what transport will look like in the future," market makers will remain for hydrocarbon and will major oil and gas producers will continue and even benefit from this transition.

Such transformational changes are an absolute inevit-

ability in the energy industry. Nations are pushing to diversify their economies, and improving vehicle efficiency. These changes are driven by the availability and improvement of new technologies, environmental pressures to improve greenhouse gases and other pollutants, economic drivers to improve faster routes, and changing consumer tastes. In transport accounts for 23% of global energy demand and 25% of oil demand. Emerging changes in transportation have huge implications for the energy business. Transformation in transport will allow more sustainable, efficient, and greener cities, which themselves affect the broader energy industry.

Final energy use in transport is a big trend, from gradually increasing in the 2020s, driven by the major increase in efficiency with electric vehicles. By 2050, energy in transport is predicted to be about 1.5 times the 2020 level and the size of gas in transport will increase but will

be much less than oil. Changes in the energy mix that lead to a world of declining oil and of demand, with consequent reduced demand for trucks and both cars, would have significant impact on the transportation sector. Demand for oil carriers is expected to be flat after 2025 and falling after 2030.

Currently, the similarity between the broader energy

sector and the transport sector is limited to energy use for vehicle manufacturing and the movement of people and goods including energy intensive fuel oil gas.

Increasing electrification of the hydrocarbon and storage to carbon capture and energy have the potential to supply the energy and transport sector much more efficiently. In particular, electric vehicles may act as a collective giant battery, choosing at times

of surplus electricity (such as during leisurely sunny periods) and purifying discharging at night to support the grid. Surplus renewable energy may be used to produce for eventual use as a transport fuel. Battery charging demand will alter daytime patterns of electricity demand in a dramatic, and in particular, require strengthening of distribution networks for high demand concentrations at charging points, such as work places and cities.

Moreover, changes in transportation sector have far reaching and unpredictable social, economic and environmental consequences. For instance, autonomous vehicles could lead to safer and quicker, less congested and cheaper travel. They would have fewer accidents, would drive more efficiently, and shorten the time wasted waiting for parking bays that may crucially also further reducing fuel consumption, thus improvements in the transport

system would make travel more regular, improve accessibility, convenience, and allow new services to flourish between the young and elderly. These good things in themselves, like reduced congestion, urban sprawl outside the downtown, less pollution, and more widespread job losses among taxi drivers, chauffeurs, delivery drivers, insurers, car rental and others.

The shift in future transport presents some opportunities, but also challenges, for many of our gas exporters. These radical changes in transport are at their early stages. They may be used to diversify the economy, with half 25% of new car sales in 2020 being electric. But looking at the coming years, companies and consumers have to watch out for the following signals indicating increasing competition of electric vehicles over conventional ones. Their growth to carbon-adjacent markets such as heavy-duty and the increasing reliance by governments to electrification will be the signals for energy emerging technologies.



A prominent picture of a Green Car:

likely to be much less than oil. Changes in the energy mix that lead to a world of declining oil and of demand, with consequent reduced demand for trucks and both cars, would have significant impact on the transportation sector. Demand for oil carriers is expected to be flat after 2025 and falling after 2030.

Currently, the similarity between the broader energy

sector and the transport sector is limited to energy use for vehicle manufacturing and the movement of people and goods including energy intensive fuel oil gas.

Increasing electrification of the hydrocarbon and storage to carbon capture and energy have the potential to supply the energy and transport sector much more efficiently. In particular, electric vehicles may act as a collective giant battery, choosing at times

of surplus electricity (such as during leisurely sunny periods) and purifying discharging at night to support the grid. Surplus renewable energy may be used to produce for eventual use as a transport fuel. Battery charging demand will alter daytime patterns of electricity demand in a dramatic, and in particular, require strengthening of distribution networks for high demand concentrations at charging points, such as work places and cities.

Moreover, changes in transportation sector have far reaching and unpredictable social, economic and environmental consequences. For instance, autonomous vehicles could lead to safer and quicker, less congested and cheaper travel. They would have fewer accidents, would drive more efficiently, and shorten the time wasted waiting for parking bays that may crucially also further reducing fuel consumption, thus improvements in the transport

system would make travel more regular, improve accessibility, convenience, and allow new services to flourish between the young and elderly. These good things in themselves, like reduced congestion, urban sprawl outside the downtown, less pollution, and more widespread job losses among taxi drivers, chauffeurs, delivery drivers, insurers, car rental and others.

The shift in future transport presents some opportunities, but also challenges, for many of our gas exporters. These radical changes in transport are at their early stages. They may be used to diversify the economy, with half 25% of new car sales in 2020 being electric. But looking at the coming years, companies and consumers have to watch out for the following signals indicating increasing competition of electric vehicles over conventional ones. Their growth to carbon-adjacent markets such as heavy-duty and the increasing reliance by governments to electrification will be the signals for energy emerging technologies.

COVID-19

# Attayah Foundation Special Report: A Tale of Two Oil Traders

Posted on May 27, 2020

[illegible]

**Al-Attiyah Foundation Special Report: Corporate Social Responsibility in the Energy Sector**

[illegible]

## Petrochemicals seen to become new frontier for energy demand post-2020

Global petrochemical demand 'will fall seriously in 2020,' considering the global coronavirus pandemic resulting in travel restrictions and many industries grinding to a halt, the Akiyama Foundation said in its latest report.

However, chemicals is set to become the new frontier for oil demand post-2020. A combination of smart chemistry and innovation is key to adding value, the report also said.

In its latest research report, the Foundation studied the short-term market uncertainties, oil pricing volatilities, and the acute need for certain petrochemical products whilst others diminished.

Oil-based petrochemicals integrated with refining will make a comeback, versus gas-based, due to the overhang of cheaply priced crude and condensate, and the growing diversity of outputs, the report said.

Nevertheless, the cheapest route to ethylene and its derivatives is via ethane cracking, where those gas producers who have rich wet gas will retain their competitive advantage," it said.

The report said that post-crisis, the rate of growth for transportation fuels will continue to decline, causing



feedstocks to produce the maximum chemicals with the fewest utilities and the least waste gas production. Environmental pressures, post-2020, on petrochemical use in advanced economies, will force exporters to adapt, reducing carbon footprint, improving energy efficiency, and moving towards the circular economy, the report said.

Petrochemicals are currently challenged by the Covid-19 crisis, like most parts of the hydrocarbon business. However, they will still be key to lead oil demand growth. This prospect is now solidly established, meaning that most national oil companies (NOCs) and several large international oil companies (IOCs) are already focused on this area.

"With the fall in oil and gas prices and the full allocation of advantaged feedstock greatly reducing the competitive advantage of certain geographies, new technological investments will have to be predicted much more on capital and operational improvements and market responsiveness," the report said.

■ The full research paper will be available to download at [www.abnfoundation.org](http://www.abnfoundation.org)

[illegible]



## VIRTUAL EVENTS

In 2020, The Foundation introduced a series of monthly podcast interviews to benefit The Foundation's members and the general public. In addition to the monthly podcasts, The Foundation also delivered a series of online webinars hosted in partnership with Refinitiv (Reuters) and The Financial Times. The following tables show the Foundation's 2020 webinars and podcasts, respectively.

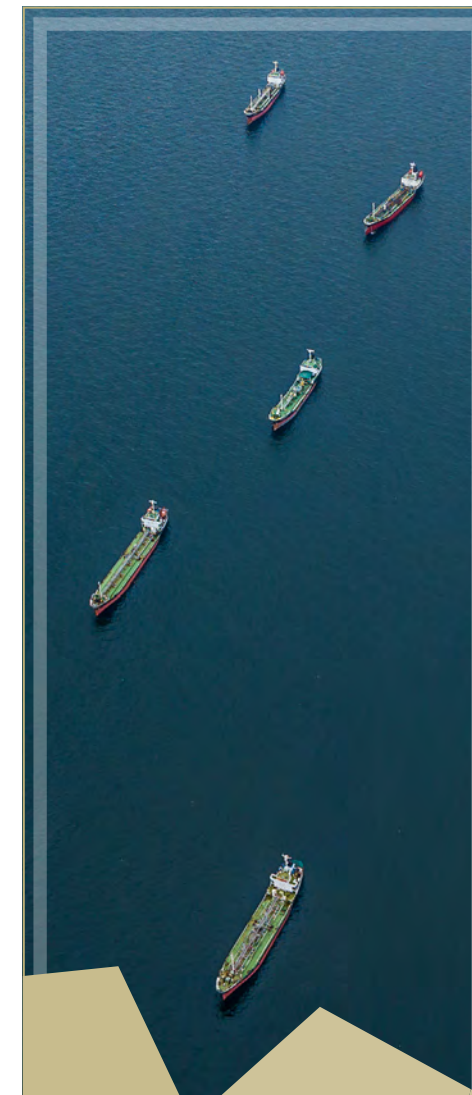


## WEBINARS

### 1 | WEBINAR THEME

06 MAY 2020

### THE FUTURE OF CRUDE OIL



.....

The webinar had successfully brought together industry leaders in discussing the consequences of Covid-19 for the global oil markets

#### Session Overview:

The spread of Covid-19 poses a significant threat to the global oil and gas industry. Crude oil and refined product markets are oversupplied, refiners are scrambling to find storage and tanker rates are increasing. With limited storage options, refiners are reducing output. As onshore storage fills up, demand for floating storage is booming, with traders and producers stashing oil in hopes of delivering when prices pick up.

The webinar had successfully brought together industry leaders in discussing the consequences of Covid-19 for the global oil markets, changing oil market dynamics, and the way forward.

#### Discussion Topics:

- How deeply and quickly will the OPEC+ cuts materialise, and will the deal effectively solve the demand crisis?
- While production cuts have been agreed upon, selling prices have also been dropped? Is there more to it than meets the eye?
- How have trade flows changed in recent times?
- How will the cuts impact trade flows? Will we see new patterns emerge?
- How have the shipping markets reacted? Can we expect the strength to remain?
- Will we see a pick-up in refined product demand? If so, which products could find support?

#### Session Moderator:

Axel Threlfall, Editor at Large, Reuters.

#### Session Speakers:

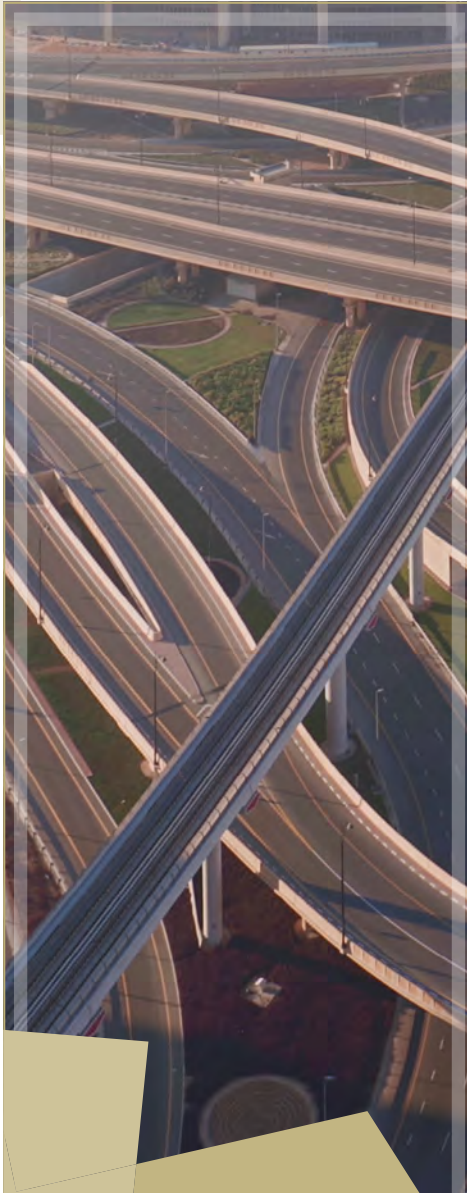
- Mr. Alan Gelder, VP of Refining, Chemicals and Oil Markets, Wood Mackenzie
- Mr. Sudharsan Sarathy, Senior Research Analyst for Shipping and Oil Research, Refinitiv.



Webinar Link:  
[The Future of Crude Oil - YouTube](#)



## WILL GLOBAL TRANSPORT FUEL CONSUMPTION TAKE THE BIGGEST HIT POST COVID-19?



### Session Overview:

Transportation accounts for about 25% of world energy demand and around 60% of all the oil used each year. Road transport and aviation were especially strong sources of fuel demand growth in recent years, accounting for 85% and 8% of the energy consumed by transportation, respectively. With most vehicles staying off the road during the coronavirus lockdown and with the suspension of international flights and maritime travel, the energy sector will have to cope with a drastically reduced demand for transport fuel. This falling demand, along with the lack of oil-storage options, has pushed the price of worldwide benchmark Brent crude below \$20 in April.

The lockdowns have led to an increase in remote working and video conferencing, which means fewer people are using cars and planes, a trend that may continue after the Covid-19 crisis. On the other hand, people who need to go out are choosing their cars because they are afraid to use public transport. When it comes to air travel, the landscape is also changing. Social distancing measures in planes are expected to increase the cost of flights, while traveling may take much longer as people queue up for mandatory thermal scans and Covid-19 swab tests.

### Discussion Topics:

- The future of energy.
- The future of transport and travel, as well as the interplay between these industries.

### Session Moderator:

Stephen Cole, Host & Exec Producer, The Agenda, CGTN

### Session Speakers:

- Prof. Paul Stevens, Chatham House
- John Simlett, EY Strategy Services
- Marcus Willand, Porsche (MHP)



Webinar Link:  
[Will Global Transport Fuel Take The Biggest Hit Post Covid-19? - YouTube](#)

.....  
 The falling demand, along with the lack of oil-storage options, has pushed the price of worldwide benchmark Brent crude below

**\$20** in April

## LNG: SHORT TERM PAIN, LONG TERM GAIN?



### Session Overview:

The LNG market was already oversupplied before the arrival of the coronavirus pandemic, a trend that has triggered low prices and led to supply-contract cancellations and cargo deferments by importing countries. But despite the current headwinds being faced by the LNG industry, there are good reasons to be optimistic about a brighter future.

### Discussion Topics:

Evaluate the opportunities and challenges for the LNG industry as the world gears up to ease lockdown restrictions.

### Session Moderator:

Eithne Treanor, CNBC Special Correspondent

### Session Speakers:

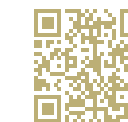
- Graeme Wildgoose, LNG & Gas Consulting at Poten & Partners
- Wayne Bryan, Director of European Gas Research at Refinitiv
- Luke Cottell, LNG Analyst at S&P Global Platts.

### Some of the key summary points:

- Warm winters and extra supply from major producers weighed on LNG prices prior to the pandemic;
- Uncertainty over the post-pandemic global economy clouds the price outlook for LNG; and
- The long-term market fundamentals remain positive—increased demand from emerging Asia will drive LNG industry growth.

.....

Despite the current headwinds being faced by the LNG industry, there are good reasons to be optimistic about a brighter future



Webinar Link:  
[LNG: Short-Term Pain, Long-Term Gain? - YouTube](#)



## THE ROLE OF SUSTAINABLE ENERGY IN ECONOMIC RECOVERY PACKAGES



• • • • •

The world will make a big leap towards achieving the much talked about 'energy revolution'

## Session Overview:

Governments worldwide are planning to inject huge amounts of money into their economies as they look to bounce back from the Covid-19 lockdowns. Using the momentum created by the global pandemic, both policymakers and global businesses can make a fresh start and ensure that these stimulus packages and fiscal incentives shape a sustainable future.

While progress is being made, there is room for nations and corporations to do much more. If governments put clean energy at the heart of Covid-19 economic recovery, the world will make a big leap towards achieving the much talked about 'energy revolution'.

## Session Moderator:

Dr. Matt Kennedy, Associate Director, Arup

## Session Speakers:

- Prof. Jos Delbeke, European University Institute and KU Leuven.
- Thomas Rieger, Co-founder and CEO of Solarkiosk.



Webinar Link:  
[The Role of Sustainable Energy in Economic Recovery Packages - YouTube](#)

## HARNESSING GREEN HYDROGEN FOR SECURE AND AFFORDABLE ENERGY



• • • • •

About

**70** million tonnes of hydrogen are produced annually worldwide for various applications

## Session Overview:

Hydrogen production plays a vital role in any industrialised society. About 70 million tonnes of hydrogen are produced annually worldwide for various applications, including oil refining, ammonia and methanol production, metal processing, food processing, transportation, and power generation. Most of this—around 95%—is produced from fossil fuels by steam methane reforming (SMR) of natural gas (the cheapest and most common method), and partial oxidation of methane and coal gasification. Oil refineries also produce hydrogen internally to make lower-sulfur, cleaner-burning transportation fuels.

According to the International Energy Agency, the current production of hydrogen results in the emission of around 830 million tonnes of carbon dioxide per year. Therefore, there is significant potential for producing hydrogen using low-carbon methods. Other, more sustainable methods of hydrogen production are biomass gasification and electrolysis of water.

Green hydrogen, produced by water electrolysis, can accelerate the deployment of intermittent renewable energies, allowing them to be stored in large quantities. Green hydrogen has been gaining momentum among businesses and governments over the past 12 months, with the number of dedicated strategies and large-scale projects worldwide notably increasing. With its zero-carbon potential, green hydrogen as an alternative fuel can play a huge role in decarbonising the global economy, especially in hard-to-decarbonise sectors such as long-haul transport, chemicals, and iron and steel.

## Discussion Topics:

- The role of hydrogen in the green economy.
- Barriers to widespread uptake.
- How governments can incorporate this clean fuel into their plans for a net-zero emissions future.

## Session Moderator:

Eithne Treanor, Managing Director, ETreanor Media

## Session Speakers:

- Prof. David Hart, Director E4tech
- Filip Smeets, Senior Vice President, Nel Electrolyser Division, Nel Hydrogen.
- Yeo Yu Kin, Senior Vice President for Asia & Middle East, Argus Consulting Services.



Webinar Link:  
[\(Harnessing Green Hydrogen for Secure & Affordable Energy - YouTube\)](#)



## ACHIEVING WATER SECURITY IN A CHANGING WORLD

### Session Overview:

The United Nations Sustainable Development Goal number 6 is "Access to clean water and Sustainable Sanitation to all by 2030." While substantial progress has been made in increasing access to clean drinking water and sanitation, billions of people—mostly in rural areas—still lack these basic services. Worldwide, 3 in 10 people lack access to safely managed drinking water services, 6 in 10 people lack access to safely managed sanitation facilities., 2 out of 5 people do not have a basic hand-washing facility with soap and water, and more than 892 million people still practise open defecation.

Water Action has forecast that there may be a 40% shortfall in freshwater resources by 2030. With a rising world population and increasing water pollution, this has the world careening towards a global water crisis. Recognising the growing challenge of water scarcity, the UN General Assembly launched the Water Action Decade on 22 March 2018 to mobilise action to transform how we manage water.

In the world's arid regions, such as the Middle East, where water resources are scarce, most water needs are met through energy-intensive seawater desalination coupled with co-generation of electricity.



To meet the sustainable development goals and ensure food and water security, it is crucial to develop and implement environmentally friendly waste and water management solutions. In particular, water-scarce countries need to use all available sources to relieve the water-stress level, including reusing treated wastewater.

In particular, the GCC that has a growing problem of increasing salinity of the Arabian Gulf, which is the main source of water for GCC countries, should begin to fully explore and maximise the use of abundant wastewater effluents from oil and gas operations.

The reuse of treated wastewater provides a more sustainable approach to satisfying some of these needs, requiring about nine times less energy compared to desalination by traditional Multi-Stage Flash technology. Similarly, biosolids, an organic by-product of the wastewater treatment process, represent a nutrient-rich source that can be used to fertilise the GCC's arid land. These reuse schemes are well demonstrated in many parts of the world. However, in the GCC, the response to measures to ameliorate water shortages has been slow.

### Session Moderator:

Stephen Cole, Host and Executive Producer, The Agenda with Stephen Cole, CGTN

### Session Speakers:

- Konstantina Toli, Theme Leader & Senior Programme Officer, Global Water Partnership Mediterranean (GWP-Med).
- Abdourahman HG Maki, Land and Water Officer, Food and Agriculture Organization of the United Nations.
- Dr. Jauad El Kharraz, Head of Research, Middle East Desalination Research Center.
- Johnny Obeid, Vice President, Veolia Water Technologies – Middle East.



Webinar Link:

[Achieving Water Security in a Changing World - YouTube](#)

## LNG MARKET: THE ROAD TO RECOVERY

### Session Overview:

It's been a turbulent six months for the LNG market, but positive developments are already emerging. While total global gas demand is forecast to decline by around 3% in 2020, it is expected to make a quick and robust recovery, growing by an average of 3.4% a year to 2040, according to Cheniere Marketing, a subsidiary of LNG company Cheniere Energy.

In the last four months, Total signed a \$14.9 billion financing agreement from 28 entities for its massive LNG project in Mozambique—the country's first onshore LNG development. South Korea's Posco International also won a tender to supply LNG to Pakistan, Vietnam has approved a \$5 billion LNG-to-power project that is expected to be developed by ExxonMobil, and Mitsui-Beach joint venture said it was finalising an agreement to process gas at the North West Shelf LNG facility in Australia.

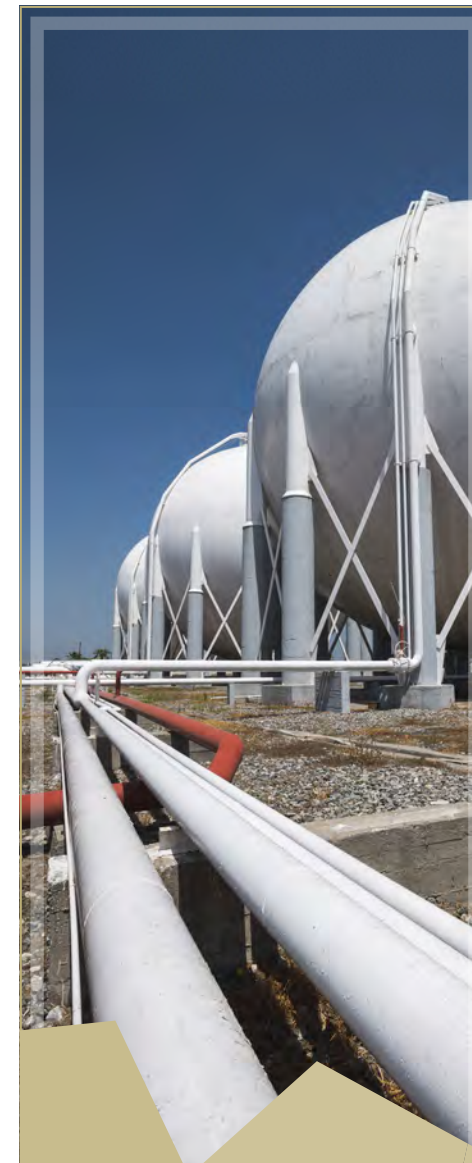
In light of these developments, how resilient will the LNG industry's recovery be, and what forces will shape the global gas market in the coming years?

### Session Moderator:

Axel Threlfall, Editor-at-Large, Reuters

### Session Speakers:

- Giles Farrer, Director, Head of Gas & LNG Asset Research, Wood Mackenzie.
- Jan Bruil, Senior Consultant LNG and Natural Gas Advisors, Poten & Partners
- Luke Cottell, LNG Analyst, EMEA, S&P Global Platts Analytics.
- Patricia Roberts, Managing Director, LNG Worldwide Ltd.



• • • •

While total global gas demand is forecast to decline by around 3% in 2020, it is expected to make a quick and robust recovery, growing by an average of

**3.4%** a year to 2040

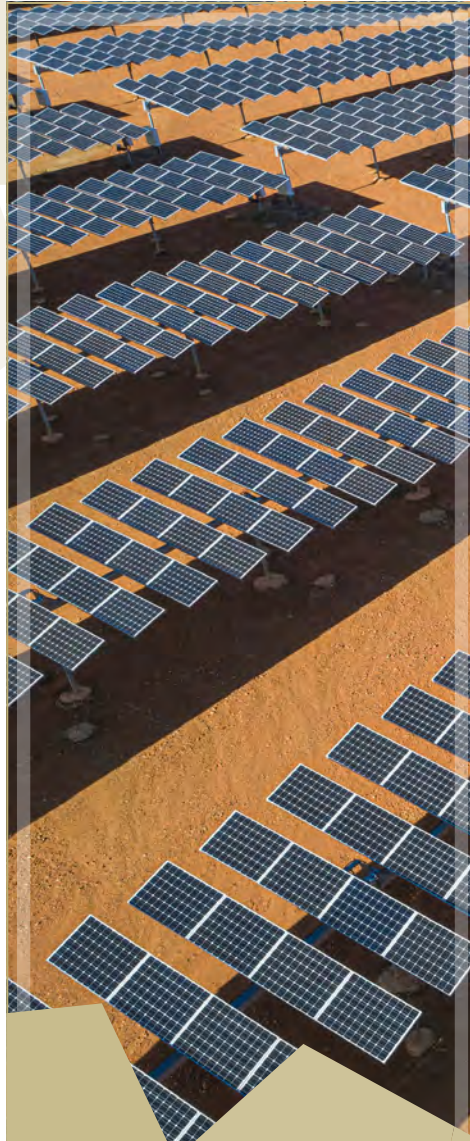


Webinar Link:

[LNG Market - The Road to Recovery - YouTube](#)



## THE GLOBAL ENERGY OUTLOOK: FROM CRISIS TO GROWTH



.....  
Covid-19 and its  
continuing impact on  
energy demand will likely  
remain the background

.....  
**2021**  
will be a significant year  
for the energy industry

**Session Overview:**

As the world looks forward to 2021, Covid-19 and its continuing impact on energy demand will likely remain the background against which other significant events will unfold. Yet, by any measure, 2021 will be a significant year for the industry. Policy changes arising from the COP-26 meeting in November, the potentially game-changing transformation of energy in the US post the November 2020 election, and the launch of the 14th Five-Year Plan in China will all have repercussions, adding to the uncertainties the sector is already facing.

**Discussion Topics:**

- The continuing major factors affecting energy markets.
- The strategies needed to adapt and build resilience in a fast-evolving energy market.
- How the energy debate will be reframed by climate change, customers, and investors.

**Panel Moderator:**

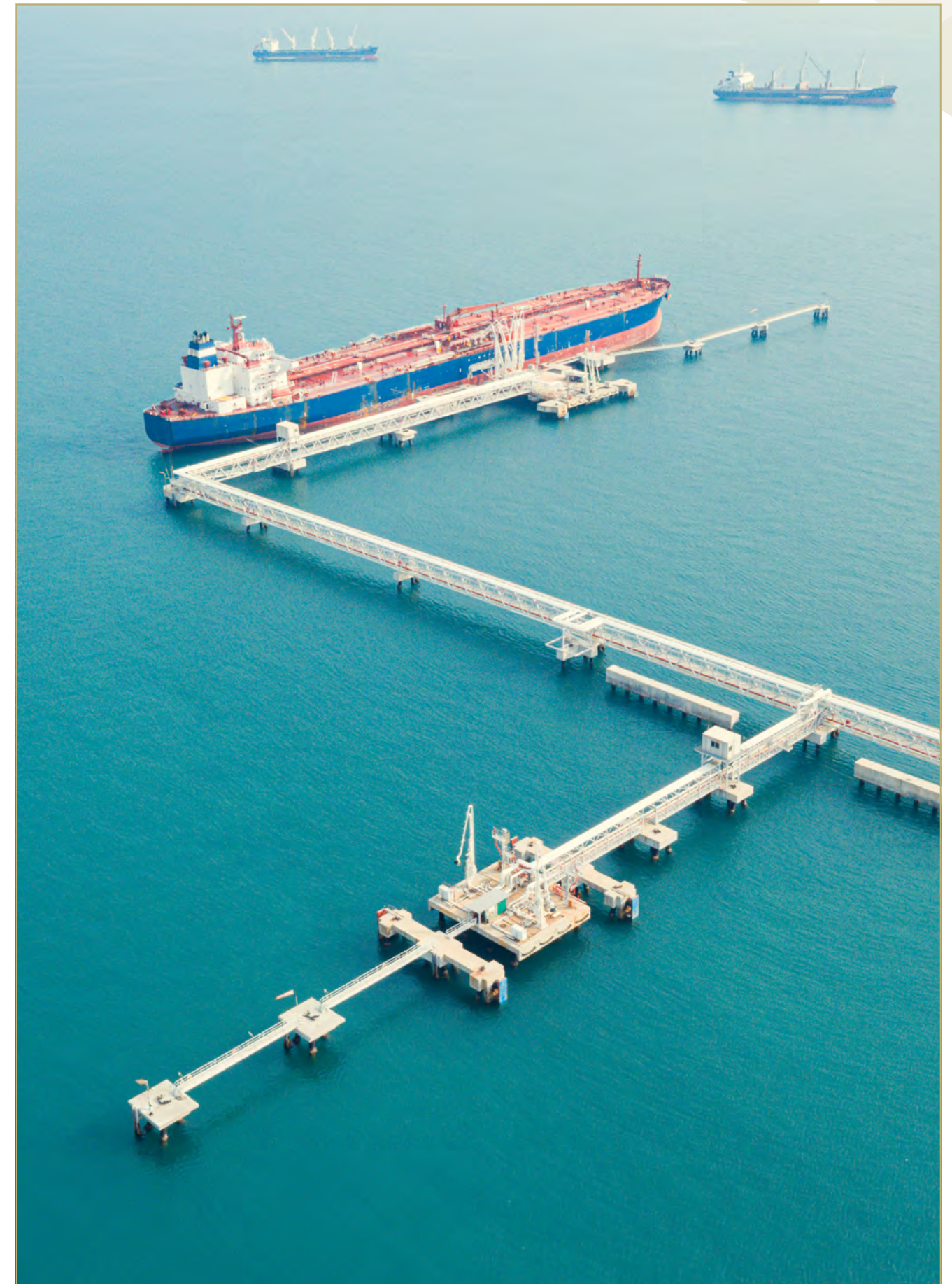
Derek Brower, US Energy Editor, Financial Times

**Panellists:**

- Lord Adair Turner, Chair, Energy Transitions Commission (ETC).
- Pierce Riemer, Director General, World Petroleum Council.
- Jeffrey Currie, Global Head of Commodities Research, Goldman Sachs.
- Laszlo Varro, Chief Economist, International Energy Agency (IEA).



Webinar Link:  
[Al-Attayah Foundation & The Financial Times Webinar - The Global Energy Outlook - YouTube](#)





# PODCASTS

1 | PODCAST THEME

29 APRIL 2020

## AFTER THE CRASH – SHORT-TERM OIL PRICE BEHAVIOUR



### Discussion Topics:

- The unprecedented volatility currently seen in the crude oil markets
- Collaborative opportunities between key countries.
- The OPEC+ cuts and their effect on supply. Price drivers that will make recycling feasible.
- Gas price implications as a result of low crude oil prices.
- Challenges ahead for oil-producing countries and balancing of fiscal budgets.

### Moderator:

Axel Threlfall, Editor at Large, Reuters.

### Podcast Guest:

Robin Mills, CEO at Qamar Energy and Fellow at Columbia University's SIPA.



Podcast Link:  
[After the Crash – Short-Term Oil Price Behaviour](#)

2 | PODCAST THEME

12 MAY 2020

## AFTER THE CRASH – PROGRESS SO FAR



### Discussion Topics:

- "Demand Destruction".
- The OPEC+ cuts, are they too little too late?
- The changing landscape of fuel supply.
- After the pandemic is over, what of the future?

### Moderator:

Sami Zeidan, Senior Presenter at Al Jazeera English.

### Podcast Guest:

Prof. Paul Stevens, Distinguished Fellow at Chatham House.

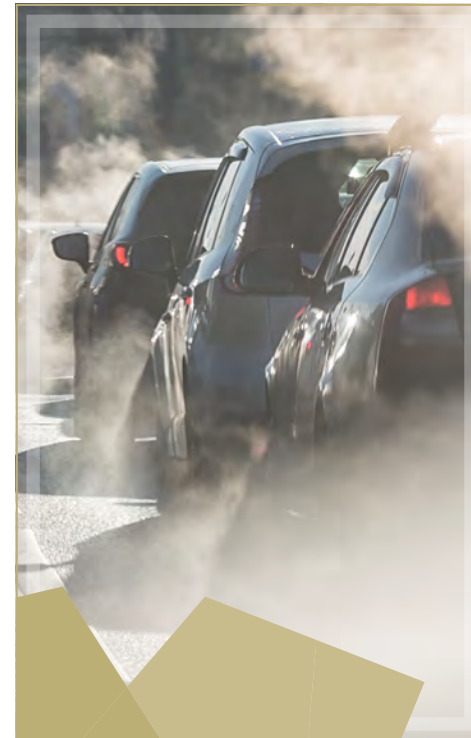


Podcast Link:  
[Al-Attiah Foundation Podcast: After the Crash – Progress so Far](#)

3 | PODCAST THEME

23 JUNE 2020

## THE NEW NORMAL IN ENERGY & SUSTAINABLE DEVELOPMENT



### Discussion Topics:

- The role of energy in a post-Covid world.
- What does the "New Normal" entail for the energy sector?
- Stimulus packages for revitalising economies.
- A carbon tax, international co-operation, and policymaking.

### Moderator:

Nawied Jabarkhyl, Correspondent at CGTN Europe.

### Podcast Guest:

Jos Delbeke, Prof. at the European University Institute and at the KU Leuven, and Former Director-General of the European Commission's DG for Climate Action.



Podcast Link:  
[The 'New Normal' in Energy & Sustainable Development](#)

4 | PODCAST THEME

28 JULY 2020

## A NEW NORMAL – THE CHANGING WORLD OF NATURAL GAS



Amid the Covid-19 pandemic, the world is seeing infection and death rates reducing in some countries and increasing in others. The growing global debate across all industries and sectors is "has the world changed?" and/or "what is the new normal?" Major reductions in demand for energy fuels have been felt worldwide, promoting the question, will the planet go back to its pre-Covid-19 patterns of growth or has the globe changed forever?

### Moderator:

Axel Threlfall, Editor at Large, Reuters.

### Podcast Guest:

His Excellency, Dr. Yury Sentyurin, the Secretary General of The Gas Exporting Countries Forum (GECF).



Podcast Link:  
[Al-Attiah Foundation Podcast: A New Normal – The Changing World of Natural Gas](#)



5 | PODCAST THEME

17 AUG 2020

## A NEW NORMAL – 2020 HAS BEEN AN INTERESTING YEAR FOR GAS. WHAT MIGHT 2021 BRING?



Amid the Covid-19 pandemic, the world is seeing infection and death rates reducing in some countries and increasing in others. The growing global debate across all industries and sectors is "has the world changed?" and/or "what is the new normal?" Major reductions in demand for energy fuels have been felt worldwide, promoting the question, will the planet go back to its pre-Covid-19 patterns of growth or has the globe changed forever?

### Moderator:

Nawied Jabarkhyl, Correspondent at CGTN Europe.

### Podcast Guest:

Luke Cottell, Analyst with S&P Global Platts Analytics.



Podcast Link:

[Al-Attiah Foundation Podcast: 2020 Has Been An Interesting Year For LNG. What Might 2021 Bring?](#)

6 | PODCAST THEME

02 SEPT 2020

## THE CIRCULAR ECONOMY & FUTURE DEVELOPMENTS



The actions needed to combat climate change are quickly becoming well established. However, the idea that the world should simply use less new material of all types and more recycled material is substantially less established.

### Discussion Topics:

- Ongoing research on the global transition to an inclusive Circular Economy.
- Collaborative opportunities between key countries.
- Technical progress and innovation to aid the Circular Economy.
- Price drivers that will make recycling feasible.
- Building an evidence base for trade in the Circular Economy.

### Moderator:

Axel Threlfall, Editor at Large, Reuters.

### Podcast Guest:

Dr. Patrick Schröder, Senior research fellow in the Energy, Environment, and Resources Department, Chatham House.



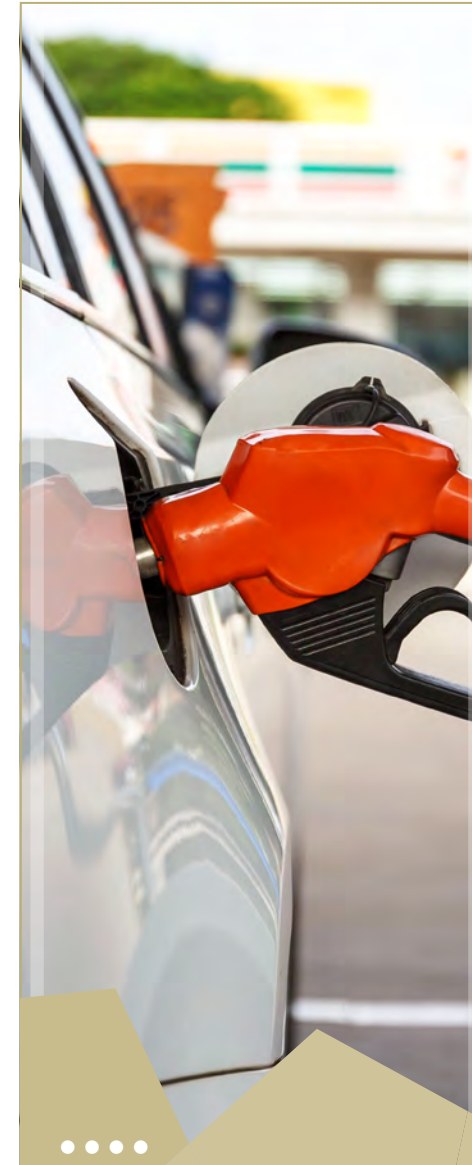
Podcast Link:

[Al-Attiah Foundation Podcast: The Circular Economy & Future Developments](#)

7 | PODCAST THEME

18 SEPT 2020

## WILL THE PANDEMIC ALSO CLAIM REFINERY VICTIMS?



.....  
The Covid-19 pandemic has caused a reduction in demand for crude oil

.....  
The demands for final products such as gasoline, kerosene, gas oils, and diesel have been affected differently by the pandemic

The Covid-19 pandemic has caused a reduction in demand for crude oil. However, what is less spoken about is how that reduction affects the chain of actors in the oil production process.

Practically all crude oil is refined into final products for consumers. The demands for final products such as gasoline, kerosene, gas oils, and diesel have been affected differently by the pandemic. This has caused numerous challenges for all refiners, and while most refiners have some flexibility as to what mix of products they produce, they are not immune to demand reduction.

### Discussion Topics:

- How will refiners, therefore, cope with the large changes in demand?
- Will some refiners collapse soon, or at all?
- How will they manage in the long term as the world moves towards "A New Normal".

### Moderator:

Sami Zeidan, Senior Presenter at Al Jazeera English.

### Podcast Guest:

Alan Gelder, Vice President of Refining, Chemicals & Oil Markets with Wood Mackenzie Ltd.



Podcast Link:

[Al-Attiah Foundation Podcast: Will The Pandemic Also Claim Refinery Victims?](#)



8 | PODCAST THEME

21 SEPT 2020

## THE ROLE OF OIL &amp; GAS IN A LOW CARBON ECONOMY



Dramatic changes are occurring in the oil industry in both obvious and subtle ways. Changes propelled by various weighing influences reported every day, such as climate change and the ongoing global agenda to reduce carbon dioxide emissions. These changes have come from an undeniable growing need for energy and the inescapable fact that 'green growth' is essential. Many factors in motion are altering the rules of low-cost energy. Technological changes allow clean energy sources to encroach upon oil dominance and steer energy cost reductions in many fields. Hydrogen is being prospectively spoken of as a future fuel while generating electricity is changing how it is created, stored, and used.

**Moderator:**

Stephen Cole, Host & Executive Producer, The Agenda, CGTN.

**Podcast Guest:**

Alan Gelder, Vice President of Refining, Chemicals & Oil Markets with Wood Mackenzie Ltd.



Podcast Link:

[Al-Attiyah Foundation Podcast - The Role of Oil & Gas in a Low Carbon Economy](#)

9 | PODCAST THEME

09 OCTOBER 2020

## HYDROGEN, NEW INDUSTRIES &amp; TACKLING CLIMATE CHANGE

As the world looks for a solution to its energy-devouring paradigm, the energy industry has set its sights firmly on green growth. However, finding a balance between a high-energy substitute to carbon, which can also mollify and solve environmental problems, has been problematic.

One budding option coming into view, which could build new industries and substitute for carbon without the negative consequences, is hydrogen. The current hydrogen economy uses hydrogen as a low carbon fuel, particularly for heat and other various applications.

There are, however, opportunities to develop hydrogen vehicles, seasonal energy storage, and long-distance transport. This incorporation of hydrogen into different sectors could replace fossil fuels and limit global warming as hydrogen is created from, and combusts into, nothing more than water. Though numerous technical challenges persist in preventing the creation of a working large-scale hydrogen economy, like long-term storage and safe engine technology, there is significant potential for producing hydrogen using low-carbon methods.

**Moderator:**

Nawied Jabarkhyl, Correspondent at CGTN Europe.

**Podcast Guest:**

Dr. David Hart, Director at Sustainable energy consultancy E4tech's and visiting prof. at Imperial College London.



Podcast Link:

[Al-Attiyah Foundation Podcast: Hydrogen, New Industries & Tackling Climate Change](#)

10 | PODCAST THEME

26 NOV 2020

## IMPLICATIONS FOR ENERGY POLICY AFTER THE 2020 US ELECTIONS



Marianne Kah joins The Foundation in this podcast to discuss "Implications for Energy policy after the 2020 US Elections". She was previously the Chief Economist of ConocoPhillips at its Houston headquarters for 25 years where she was responsible for developing the company's market outlooks for oil and natural gas and was the company's expert in scenario planning.

**Moderator:**

Axel Threlfall, Editor at Large, Reuters.

**Podcast Guest:**

Ms. Marianne Kah, Senior Research Scholar and Advisory Board Member at The Centre on Global Energy Policy at Columbia University SIPA.



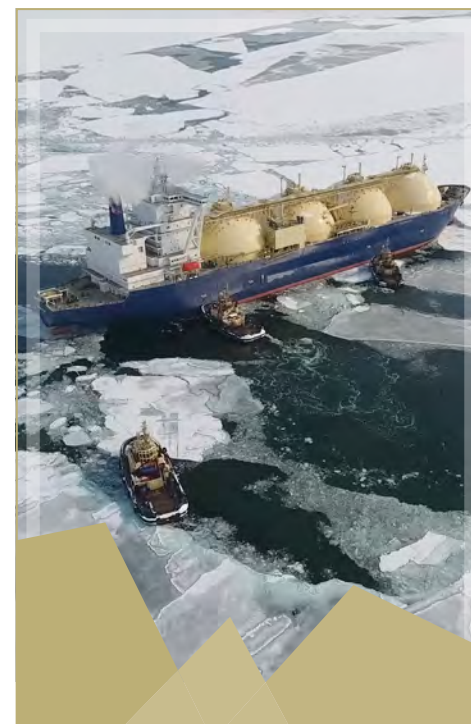
Podcast Link:

[Al-Attiyah Foundation Podcast: Implications for Energy policy after the 2020 US Elections](#)

11 | PODCAST THEME

20 DEC 2020

## OUTLOOK FOR LNG WORLDWIDE

**Moderator:**

Stephen Cole, Host & Executive Producer, The Agenda, CGTN.

**Podcast Guest:**

Patricia Roberts, Managing Director, LNG Worldwide Ltd.



Podcast Link:

[Al-Attiyah Foundation Podcast: Outlook for LNG Worldwide](#)



## PUBLICATIONS

In addition to the Daily News Flash, the Weekly Market Energy Review, and the Articles, highlighted under the sections on social and print media above, The Foundation also produced the following major publications:



### 1. Monthly Energy Research Series

In 2020, the Foundation produced a monthly energy-related report that provides robust and practical knowledge and insights on global energy development topics. The details are shown in Table 3 below.

### 2. Monthly Sustainable Development Research Series

In 2020, the Foundation produced a monthly report that provides in-depth insights on prevalent sustainable development topics, listed in Table 4.

### 3. Whitepapers

In previous years, after each CEO Roundtable, the Foundation usually prepare a Whitepaper that captures the important outcomes of the CEO Roundtable session. Since no CEO roundtable took place in 2020, due to the coronavirus pandemic, the Foundation produced similar Whitepapers for five of the webinar sessions as detailed in Table 5.

### 4. Annual Foundation Book

In 2020, the Foundation produced its annual book on "The growing world of renewable", in the form of an eBook. The eBook was made publicly available on the Foundation website.

### 5. Special Publication

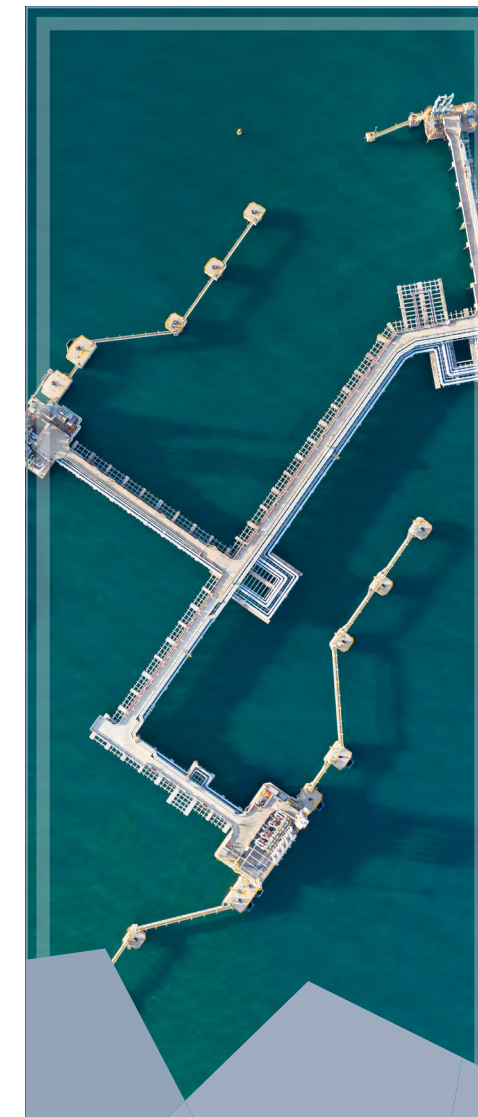
A special paper on carbon pricing, titled: "Can the market limit climate change?", was produced by the Foundation, including contributed articles from the World Bank, the International Civil Aviation Organization (ICAO), and the Natural Capital Partners.

## MONTHLY ENERGY RESEARCH REPORTS

RESEARCH THEME

JANUARY

### LNG'S UNCERTAIN FUTURE: WILL SPOT AND SHORT-TERM PRICING AND CONTRACTING BECOME THE NORM



#### Headline Messages

- LNG contracting has changed over the past decade, with more liquidity and flexibility, a greater variety of suppliers, traders and buyers, a greater variety of pricing methods, and more use of spot and short-term trade.
- The last year or so of oversupply has led to spot prices in Europe and East Asia falling well below oil-linked prices and pushed traditional long-term contracts towards review and renegotiation.
- Cost-based, Henry Hub-linked contracts from the US have proved problematic due to exposure to global LNG prices and the lack of linkage to end-user markets in Asia. But oil-linked contracts are also out of sync with LNG market dynamics, with oil prices remaining relatively robust.
- Nevertheless, the divergence between Japan Korea Marker (JKM) and oil-indexed Japan Crude Cocktail does not ensure that Asian LNG importers will shift to spot pricing, as JKM is not yet a fully traded price.
- From 2020 onwards, the LNG market will see further growth in hybrid pricing, with a mix of indexations in short as well as long-term contracts.
- A single LNG pricing hub will not emerge, and arbitrage will remain between the main pricing points, although there should be a degree of price convergence.

• • • •

From 2020 onwards, the LNG market will see further growth in hybrid pricing, with a mix of indexations in short as well as long-term contracts



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)



## RESEARCH THEME

FEBRUARY

## GAS IN THE EUROPEAN UNION – AN UNPREDICTABLE FUTURE?



## Headline Messages

- Gas demand in the EU is expected to decline by 2040, but domestic production will plunge even further, raising required imports.
- Russia will further increase its role as the primary external supplier to the EU, followed by the US (as LNG).
- New pipeline projects, including the Trans-Adriatic Pipeline, Nord Stream 2 and TurkStream, change supply routes but do not drastically affect the EU internal gas market.
- Algeria will continue supplying Southern Europe with natural gas but at reduced volumes and contract durations.
- Renewables already produce significantly more European power than fossil fuels. Gas is replacing coal in Western European power plants, but less so in Central and Eastern Europe.
- Gas can be “squeezed out” by renewables from power generation and to an extent, building, but it would be difficult to do so in the industrial sector.
- The European gas business and industries have recently begun to show more interest in decarbonised gases (hydrogen, synthetic methane, and biogas/biomethane).
- The current share of renewable gases in the energy mix is still very limited and, thus, would require the adoption and implementation of support schemes.

• • • •

New pipeline projects, including the Trans-Adriatic Pipeline, Nord Stream 2 and TurkStream, change supply routes but do not drastically affect the EU internal gas market



Webinars and Podcasts Link:

[Al-Attayah Foundation – YouTube Channel](#)

## RESEARCH THEME

MARCH

## AFTER THE CRASH: SHORT-TERM OIL PRICE BEHAVIOUR



## Headline Messages

- The current coronavirus crisis, severe economic recession, and the end of the OPEC+ agreement have combined to produce potentially the worst oil oversupply in history.
- The key part of the puzzle is oil demand loss, which could be as deep as 10 Mbbbl/ day in April, depending on the intensity of shutdown measures, the length of the outbreak in different countries before it is properly contained or eliminated, and follow-on effects from job losses, corporate bankruptcies, and other economic damage.
- Prices have dropped sharply from \$50 to around \$25/bbl, but are likely to go lower still, potentially below \$10/bbl, as storage fills up and high-cost producers are forced to shut-in.
- OPEC+ countries able to increase production will do so, recovering market share, while US shale and other high-cost non-OPEC producers must make the bulk of adjustment.

• • • •

Prices have dropped sharply from \$50 to around \$25/bbl, but are likely to go lower still, potentially below

**\$10** /bbl



Webinars and Podcasts Link:

[Al-Attayah Foundation – YouTube Channel](#)



## RESEARCH THEME

APRIL

## NEW MODELS FOR VALUE CREATION IN PETROCHEMICALS



.....  
Global petrochemical  
demand will fall seriously

in **2020**

.....  
Oil-based petrochemicals  
integrated with refining  
will make a comeback,  
versus gas-based

## Headline Messages

- Global petrochemical demand will fall seriously in 2020. A post-pandemic recovery in GDP should support strong but overall slowing growth in emerging markets.
- Short-term market uncertainties – the coronavirus outbreak, oil pricing volatilities – have resulted in an acute need for specific petrochemical products, shifting focus from traditional models.
- Chemicals shall become the new frontier for oil demand post-2020. A combination of smart chemistry and innovation is key to add value.
- Oil-based petrochemicals integrated with refining will make a comeback, versus gas-based, due to the overhang of cheaply priced crude and condensate and the greater diversity of outputs.
- Post-crisis, the rate of growth for transportation fuels will continue to decline, causing refining companies to put more emphasis on their petrochemical strategies.



Webinars and Podcasts Link:  
[Al-Attayah Foundation - YouTube Channel](#)

## RESEARCH THEME

MAY

PATHWAYS TO HYDROGEN AS AN ENERGY CARRIER:  
THE HYDROGEN ECONOMY

## Headline Messages

- Hydrogen is already used in significant quantities in specific applications but has recently emerged as a candidate as an attractive zero-carbon energy carrier.
- Hydrogen can be made from fossil fuels (requiring carbon capture, use and storage to be low-carbon 'blue hydrogen') or by water electrolysis using zero-carbon electricity to make 'green hydrogen'. Production from natural gas is likely to be the cheapest option, in most cases, for at least one to two decades.
- Hydrogen can fill key sectors that are otherwise hard to decarbonise, notably aviation, shipping fuel, industrial heat, building heating, some petrochemicals, and metal ore smelting.
- The economics of hydrogen are specific to each potential application, and most of them require additional research and development.
- Hydrogen is relatively expensive and difficult to transport over long distances because of its low density. Several different transport methods are under consideration. Hydrogen will not be as flexible or globalised an industry as oil or LNG.
- A growing number of significant hydrogen production projects are under development, mostly in Europe. The EU, Japan, and Australia have all launched hydrogen strategies.

.....  
Hydrogen can fill key  
sectors that are otherwise  
hard to decarbonise

.....  
A growing number of  
significant hydrogen  
production projects are  
under development



Webinars and Podcasts Link:  
[Al-Attayah Foundation - YouTube Channel](#)



## RESEARCH THEME

JUNE

## WATERFALL: THE ROLE OF HYDROELECTRICITY



## Headline Messages

- Hydropower is a mature technology and is still the largest installed form of renewable energy. It is dispatchable and has highly competitive costs and (usually) low greenhouse gas emissions.
- Hydropower growth rates remain significant, though much slower than wind and solar. Further expansion is constrained by a lack of suitable sites, but there is still room for growth in Africa and Asia in particular.
- The range of forecasts for future hydropower is much smaller than for fossil fuels or other renewables, with typical ranges of 6000–8600 TWh/year by 2050, from just over 4000 TWh/year today.
- Large hydropower schemes bring several environmental and social problems, including displacing people, drowning habitats and historic sites, disturbing ecosystems and in some locations, releasing high levels of greenhouse gases from decomposing vegetation.
- Large dams are highly political projects and are already concerned with significant disputes and controversies in parts of Africa, South-East and South Asia. Financing and constructing large hydropower is a significant component of China's Belt and Road Initiative.

••••

The range of forecasts for future hydropower is much smaller than for fossil fuels or other renewables, with typical ranges of

**6000–8600**

TWh/year by

**2050**



Webinars and Podcasts Link:

[Al-Attiah Foundation - YouTube Channel](#)

## RESEARCH THEME

JULY

## AVOIDING SHIPWRECK: STRANDED ASSETS IN OIL AND GAS



## Headline Messages

- 'Stranded assets' are oil, gas and coal reserves that cannot be produced because of climate change policies and/or competition from other energy sources.
- Such policies may include outright bans, carbon taxes or caps, or policies that improve the competitiveness of nonfossil fuelled technologies such as electric vehicles.
- The 1.5°C target of the Paris Agreement allows for no more than 464 gigatonnes of CO<sub>2</sub> emissions to 2100, but current oil and gas reserves would yield 1,120 gigatonnes and coal another 2,100 gigatonnes.
- However, because of the natural decline of oil and gas fields, significant new investment will still be required up to 2040.
- Low-cost and low-carbon assets will be advantaged; the 'stranded assets' will be those that are high-cost and/or high carbon.
- Most value in current production accrues in the first few years, and most reserves are held by governments and NOCs. Therefore, 'stranded assets' are a problem more for major resource-holding countries than for international oil companies with strategic options and relatively short reserves lives.

••••

The 1.5°C target of the Paris Agreement allows for no more than 464 gigatonnes of CO<sub>2</sub> emissions to

**2100**



Webinars and Podcasts Link:

[Al-Attiah Foundation - YouTube Channel](#)



## RESEARCH THEME

AUGUST

## THE NEXT GENERATION: FUTURE NUCLEAR TECHNOLOGIES



• • • •

Large advanced reactor designs (Generation IV) seem unlikely to be deployed commercially until the

**2030s**

## Headline Messages

- Advanced nuclear power has attracted attention in recent years as a possible source of dispatchable low-carbon electricity that would be safer, faster to build, and cheaper than traditional nuclear reactors.
- Nuclear is a key part of many climate scenarios that keep warming below 1.5°C. The current pace of deployment, however, is likely to lead only to slow growth, not a rapid expansion. That would put more stress on renewables, carbon capture and storage (CCS) and other low-carbon options.
- Generation III/III+ reactors now entering service should be safer, more efficient, and cheaper than traditional Generation II designs. However, skill shortages and project management failings have led to massive delays and budget overruns at new reactors in Europe and the US.
- Large advanced reactor designs (Generation IV) seem unlikely to be deployed commercially until the 2030s, and nuclear fusion not until the 2040s or after.
- Small modular reactors (SMRs), mostly based on larger traditional concepts, appear the most promising because of their inherent safety, lower financial risk, potential for cost reductions, and other advantages. They should enter the market during the 2020s.



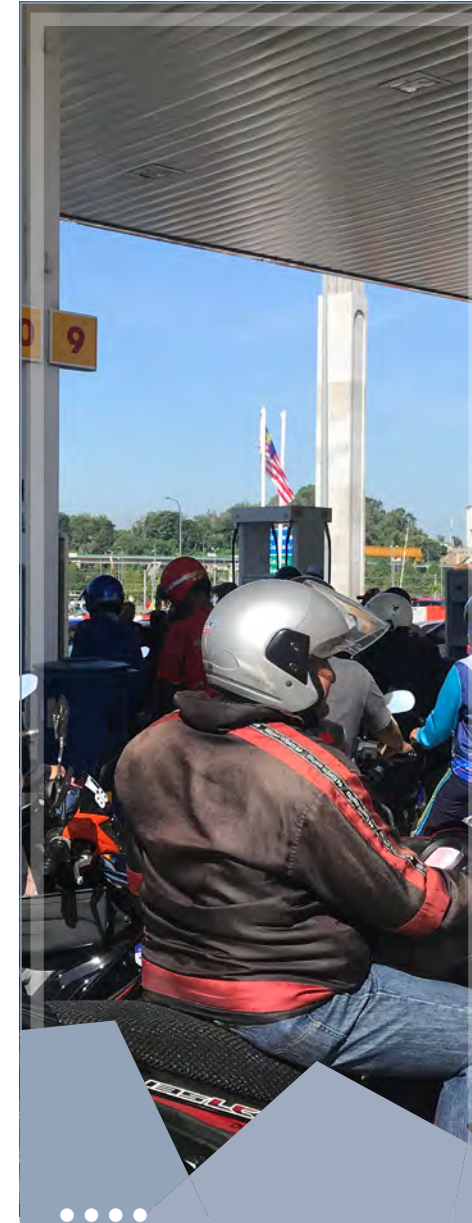
Webinars and Podcasts Link:

[Al-Attiah Foundation - YouTube Channel](#)

## RESEARCH THEME

SEPTEMBER

## PRESSURE ON THE PUMP: THE FUTURE OF FUEL RETAIL



• • • •

Fuel demand growth will continue, at least for some time, in emerging Asian economies and Africa

• • • •

In the long term, autonomous vehicles are likely to take a more significant market share

## Headline Messages

- Four forces are reshaping the traditional fuel retail: most importantly, electric vehicles; changing customer tastes; shifting geographies; and automation and digitalisation.
- The rise of electrification, along with the impact of Covid-19 and improved vehicle efficiency, will dramatically reduce overall fuel (petrol/gasoline and diesel) sales over the next one to two decades. Cars will likely be charged primarily at home or work or at retail and entertainment locations.
- This will result in lower throughput per station, particularly in urban locations, making many of them unprofitable. Highway locations, though, may gain, at least in the medium term.
- Changing customer tastes include desires for greater speed, convenience, customer service and quality of the offering, as well as improved environmental performance.
- Fuel demand growth will continue, at least for some time, in emerging Asian economies and Africa. These new geographies create opportunities for domestic upstarts as well as international players but come with their peculiarities. China, for instance, is quite open and fragmented, while India is still dominated by state-owned incumbents and a couple of large domestic conglomerates.
- In the medium term, digitalisation will be increasingly important to drive sales and margins via approaches such as loyalty programmes, customisation, data analytics, and easy payment options.
- In the long term, autonomous vehicles are likely to take a more significant market share. They would change travel patterns substantially and likely further erode the demand for roadside filling or charging.



Webinars and Podcasts Link:

[Al-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

OCTOBER

## SMART ENERGY: THE IMPACT OF AI ON THE ENERGY BUSINESS



### Headline Messages

- Artificial intelligence (AI) is the core part of digitalisation, the developing suite of techniques that acquires, interprets, and decides on digital data.
- AI is increasingly being employed in the energy sector in a wide range of applications in petroleum and electricity.
- However, at the moment, it is primarily used in isolated applications instead of systematically integrated into an entire company's business model and operations.
- Intelligent, networked systems will become the norm across energy company operations, and power grids, with the integration of 'smart homes' and the 'IoT'.
- The growing use of AI raises concerns about cybersecurity, transparency, and control, which have to be planned into systems in widespread adoption.

• • • •

AI is increasingly being employed in the energy sector in a wide range of applications

• • • •

Intelligent, networked systems will become the norm across energy company operations



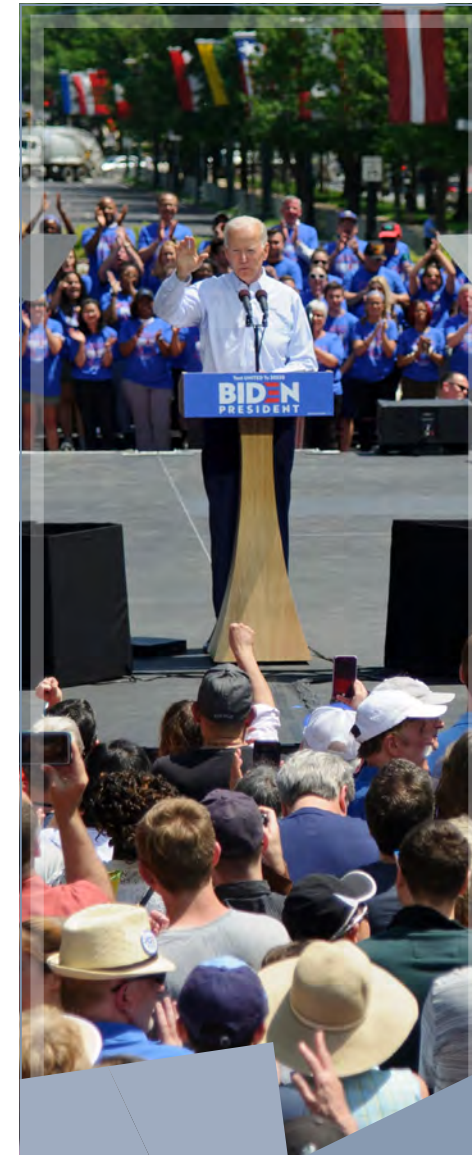
Webinars and Podcasts Link:

[AI-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

NOVEMBER

## POWER AND ENERGY: THE IMPACT OF THE US ELECTIONS



### Headline Messages

- Mr. Biden's impact on energy will revolve around four key axes: the economy (and Covid-19 recovery); sanctions and geopolitics (particularly concerning Iran); climate and environmental policy, at home and internationally; and China, trade, and tariffs.
- He will have a relatively free hand in international affairs and in dealing with China given a bipartisan consensus on being 'tough' on Beijing. Some two million barrels per day (Mb/d) of Iranian oil production could return to the market, but a deal is only likely in late 2021 at best.
- His ability to push through ambitious economic stimulus and pro-employment, environmental, and climate policies at home depends crucially on control of the Senate, to be decided on 5 January.
- Mr. Biden can take a fair range of climate actions through executive orders without control of the Senate. Still, these would be vulnerable to reversal if a Republican wins election in 2024.
- He has a broad-based climate plan, which covers most major emitting sectors and viable low-carbon technologies, as well as reinvigorating global climate action. The plan is likely to lead to more ambitious action from other major economies and to possible alignment on 'carbon border tariffs' or similar measures against countries with high carbon footprints.

• • • •

Mr. Biden can take a fair range of climate actions through executive orders without control of the Senate. Still, these would be vulnerable to reversal if a Republican wins election in

# 2024



Webinars and Podcasts Link:

[AI-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

DECEMBER

## UNCONVENTIONAL FOSSIL FUELS: STRANDED IN A CLIMATE-CONSTRAINED WORLD?



### Headline Messages

- North America is the long-running centre of unconventional development; other regions are advancing, such as Argentina, China, Russia, and the Middle East.
- Unconventionals have a large spread in costs and environmental impact. At oil prices of \$50–60/bbl, oil sands expansion is unlikely, but existing operations are viable; deepwater developments can be highly attractive. United States (US) shale output will be steady but probably not grow significantly.
- Environmental issues include local effects on land, water, air, and greenhouse gas (GHG) emissions. Oil sands have particularly high GHG emissions, which is likely to constrain their expansion. High levels of gas flaring from US shale output weaken its environmental credentials and may constrain exports.
- Continued technological and environmental improvements and the conventional resource base's maturity will lead to an expanded role for unconventionals. However, community, NGO, and government opposition will prevent growth in many promising areas.

• • • •

Continued technological and environmental improvements and the conventional resource base's maturity will lead to an expanded role for unconventionals



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)





# MONTHLY SUSTAINABILITY REPORTS

RESEARCH THEME

JANUARY

## GREEN LNG – OPPORTUNITIES AND CHALLENGES



### Headline Messages

- Gas, in general, is seen as having the brightest future of fossil fuels because of its abundance, reasonable cost, clean-burning nature, and relatively low carbon footprint compared to coal and oil.
- LNG delivered to Europe or China has a greenhouse gas (GHG) footprint barely half that of coal. It can gain significant market share from coal and oil by leveraging its environmental advantages if it can remain cost-competitive and assure supply security.
- However, gas is coming under environmental pressure in the EU and parts of the US because of its emissions of CO2 and methane.
- The sustainability challenges to LNG are therefore dual: to gas in general and to LNG in particular.
- LNG has, in general, though not always, somewhat higher greenhouse gas (GHG) intensity than gas delivered by pipeline because of the energy used in the liquefaction process.
- Different projects have widely varying GHG footprints and other sustainability benchmarks because of differences in resource quality, liquefaction efficiency, transportation distance, local environmental and community impact, applicable regulations, and other factors.

• • • •

Gas, in general, is seen as having the brightest future of fossil fuels

• • • •

LNG delivered to Europe or China has a greenhouse gas (GHG) footprint barely half that of coal



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

FEBRUARY

## CARBON PRICING: LESSONS FOR THE MIDDLE EAST



### Headline Messages

- Carbon pricing initiatives are increasingly being adopted worldwide but do not yet have enough coverage or high enough prices to make a major contribution to reducing greenhouse gas emissions.
- The two major options are 'cap and trade' (setting an overall limit on emissions and allowing firms to trade compliance) and a carbon tax (a fixed charge on each tonne of emissions).
- Cap-and-trade gives certainty on emissions reductions, while a carbon tax gives certainty on price.
- Europe, China, Japan, South Korea, and some US and Canadian regions are among important energy markets that have adopted some form of carbon pricing.
- The use of carbon tax/allowance revenues strongly influences the political feasibility and affects the distributional impacts of carbon pricing. Revenues can be used to reduce general taxation or debt, 'hypothecated' for environmental initiatives, or returned to residents as a 'carbon dividend'.

• • • •

The use of carbon tax/allowance revenues strongly influences the political feasibility and affects the distributional impacts of carbon pricing



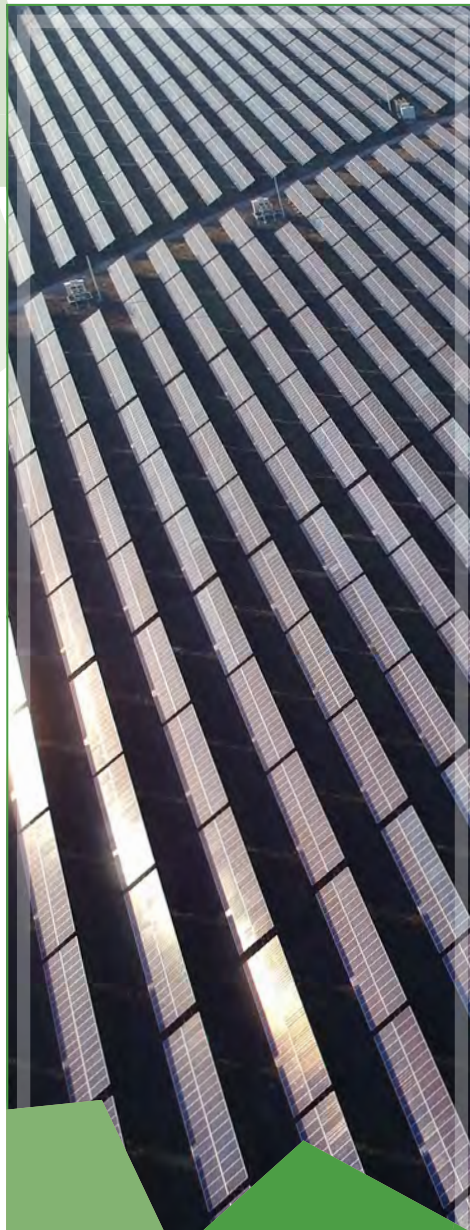
Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

MARCH

## RENEWABLE ENERGY POLICIES: WORK IN PROGRESS



.....  
Limiting global warming to a maximum 1.5°C will require greenhouse gas (GHG) emissions to fall by 7.6% per year till

# 2030

### Headline Messages

- Countries have been adopting multiple policies to support renewable energy, driven by the objective to limit climate change and meet their obligations under the Kyoto (1997) and Paris (2016) Agreements.
- Limiting global warming to a maximum 1.5°C will require greenhouse gas (GHG) emissions to fall by 7.6% per year till 2030. Depending on the scenario, renewables will likely have to grow by 50-90% by 2050 and non-hydro/biomass by a factor of 2-10 times.
- Although there is an uptake in renewables, energy efficiency, and energy access are growing rapidly, the world is not on track to meet the Paris Agreement or the Sustainable Development Goal 7 (SDG7 targets).
- Renewables policies can be divided into supporting R&D, deployment, integration and decarbonisation.
- A consistent, coherent and context-specific mix of renewable energy policies proves more effective in boosting renewable energy in the energy mix.
- Despite the remarkable progress observed in the power generation sector, extensive policy efforts are needed to encourage incremental research and development as well as breakthroughs, from early-stage research to commercialisation.
- Renewable energy policies continue to focus on the power sector, while far less growth has taken place in the cooling, heating, and transport sectors.
- Although the initial purpose of these policies was to reduce GHG emissions, many countries now adopt them for their perceived socio-economic benefits. But optimising this may require somewhat different policies.
- The recent success in growing the size and reducing the cost of renewables now requires new policies on grid integration, long-term storage, electricity market design, international cooperation, and non-electric renewables.

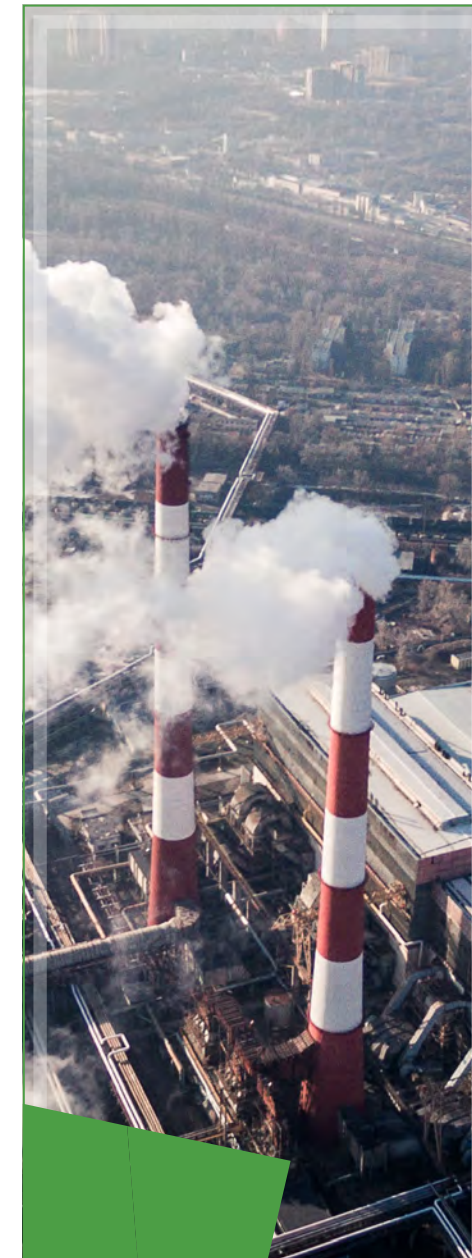


Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

APRIL

## CARBON CAPTURE AND STORAGE: WHAT IS ITS ROLE IN CLIMATE MITIGATION?



.....  
Direct Air Capture (DAC) or bioenergy with CCS (BECCS) are required in many climate scenarios to reduce atmospheric CO2 levels directly

### Headline Messages

- Carbon capture and storage (CCS), or carbon capture, use and storage (CCUS), is assessed by bodies such as the IPCC as one of the crucial methods for reducing carbon dioxide emissions, alongside energy efficiency, renewables, nuclear and land-use change.
- Scenarios cover a wide range, with some not making use of CCS at all, and others indicating that the application of CCS to limit warming to 1.5°C might require a captured amount of 0.05-2 gigatonnes (Gt) CO2 per year by 2030 and 0.7-9.3 Gt/year by 2050 (The total global CO2 emissions in 2019 was about 33 Gt).
- The basic technology of CCS is quite mature, but substantial room remains for cost improvements. CO2-enhanced oil recovery (EOR) is also well-established, while most other large-scale uses of CO2 (cement, synthetic fuels, plastics, etc.) are in research or early commercial stages.
- CCS can be applied to power generation and to industries, such as petrochemicals, steel, aluminium, and cement. Industrial use is gaining in importance as there are few other cost-effective and technically mature solutions for these sectors.
- With experience, capture costs could fall to \$20/tonne CO2 for low-cost options and \$40/tonne for medium-cost options, and these price levels are below the range of likely carbon prices and competitive with other large-scale mitigation options. Progress over the last decade has been steady but slow, rising to about 25 Mt per year in 2019. This needs to be scaled up 14 times in order to meet median climate scenarios for 2030.
- CCS has received much less policy support than other low-carbon options such as renewables and energy efficiency. Recent increases/introduction of carbon prices and tax credits in the EU and US could move CCS towards widespread economic viability.
- Direct Air Capture (DAC) or bioenergy with CCS (BECCS) are required in many climate scenarios to reduce atmospheric CO2 levels directly, as emissions are unlikely to fall fast enough through other methods.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

MAY

## CLIMATE ADAPTATION: RISKS AND MEASURES



••••

Climate change brings a wide range of impacts, which vary greatly between and within countries and industries. Therefore, the options for adapting are also considerably varied

### Headline Messages

- The world is already experiencing significant climate change, and substantial further damage is predicted to occur up to 2100, even if the Paris Agreement's 1.5°C target is achieved. The world is on course for more than 3°C if action is not taken. Consequently, no country is immune to the devastating impact of climate change, making adaption measures a necessity for all countries.
- Adaptation is not a choice; it is unavoidable. The question is whether it is done well or badly, cost-effectively, or not, how much climate damage is tolerated and how it is distributed.
- Climate change impacts include much higher temperatures, extreme weather (hurricanes, droughts, floods), glacier melting, the spread of vector-borne diseases, lower crop yields, ecosystem changes, coral reef die-off, sea-level rise, and many others. These have consequences, including economic damage, weakening of state's institutions/ systems, and mass migration.
- Adaptation is a complex challenge involving long-range planning and integrated thinking. Nations can cooperate, but, unlike mitigation, it is largely a local and national issue rather than a global one.
- A range of plans and financing instruments have been made available for adaptation under the UNFCCC and the Paris Agreement, though they remain underfunded.
- The MENA region is particularly vulnerable to climate change because of high temperatures, (semi)-arid climates, insufficient indigenous food production, and exposure of major cities and infrastructure to sea-level rise. The region can learn from and cooperate with some other countries in similar situations.
- Qatar has a wide range of options to meet its adaptation challenges, and several of them have already been implemented or studied. All the options need to be fully assessed for cost and feasibility and incorporated into a comprehensive overall strategy and plan.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

JUNE

## WASTE MANAGEMENT IN THE OIL & GAS INDUSTRY



••••

Produced water is the largest waste volumetrically and by treatment expenditure, at approximately

**\$30-200**  
billion annually

### Headline Messages

- A wide range of wastes in the form of gases, liquid, solid, and heat are produced from oil and gas operations.
- These wastes, often in large volumes, have varying levels of an environmental and safety hazard.
- Due to its environmental impacts and greenhouse pollution, waste constitutes a major threat to the industry's public image and licence to operate.
- Produced water is the largest waste volumetrically and by treatment expenditure, at approximately \$30-200 billion annually.
- Carbon dioxide and methane attract the most policy attention and are the greatest long-term threat to the industry.
- The 'circular economy' framework that follows a Reduce-Reuse-Recycle approach is becoming popular with companies that wish to maximise the sustainability and profitability that such framework offers.
- Active engagement and collaboration with government, environmental groups, and civil society, is essential for the establishment of improved, reasonable, workable, and comprehensive regulations that are consistent across different industry sectors.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

JULY

## CORPORATE SOCIAL RESPONSIBILITY IN THE ENERGY SECTOR



• • • •

The oil and gas industry has been among the champions of CSR practices because of its international operations

• • • •

The Covid-19 pandemic is likely to put more pressure on the energy sector's CSR programmes

### Headline Messages

- CSR has a long history and has become more sophisticated and demanding over time. From a voluntary corporate action, it has increasingly been demanded by shareholders, governments, and society. Its concerns reflect wider social trends and issues of the day. Companies' CSR adoption is motivated by internal and external drivers, with economic and political factors being the most dominant.
- The main drivers for the adoption of CSR are cost savings and profitability, along with the avoidance of legal, financial, and environmental liabilities.
- The oil and gas industry has been among the champions of CSR practices because of its international operations, the various impacts it has on the environment, and the consequent scrutiny from environmental and social non-governmental organisations (NGOs).
- CSR emerging trends are focused on greenhouse gas footprints, improved energy efficiency, renewable energy investment, and increased financial disclosure and anti-corruption measures.
- Many oil and gas producing countries are experiencing ever-growing demand for social and economic development, continually putting pressure on international oil companies (IOCs) to increase their CSR programme, which could worsen if these IOCs are overtaxed.
- Local communities sometimes have unrealistic demands, especially with regard to the provision of employment opportunities.
- The Covid-19 pandemic is likely to put more pressure on the energy sector's CSR programmes, especially as its profitability falls, local unemployment surges, and workforce mobility diminishes.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

AUGUST

## ARE WE DOING ENOUGH? GLOBAL ACTION ON CLIMATE CHANGE



• • • •

Current NDCs are very varied in ambition, detail and methodology. Overall, they appear consistent with

**2.3-3.5°C**  
of warming

### Headline Messages

- The Paris Agreement of 2015 aspired to limit global warming levels to no more than 1.5°C by 2100.
- The signatories to the Agreement, nearly all countries across the planet, agreed to submit voluntary NDCs outlining their plans to meet their share of the required greenhouse gas (GHG) emissions mitigation and also discussing their plans for climate adaptation and finance.
- The NDCs are meant to be updated every five years, so new NDCs should be submitted in 2020, ideally including greater ambition on mitigation. Covid-19 and political developments, notably the role of the US, may delay some countries' updates until 2021.
- Current NDCs are very varied in ambition, detail and methodology. Overall, they appear consistent with 2.3- 3.5°C of warming, well above the Paris aspirations. Only a few countries, mostly small emitters, have NDCs that appear consistent with the 1.5°C goal.
- Existing NDCs examined here are strong on efficiency and renewable targets and (for developing countries) land-use change, but generally weak on industry, electric transport, aviation, nuclear, hydrogen, and carbon capture, use and storage (CCUS).
- As formulated, the NDCs would probably have a relatively modest impact up to 2030 and a stronger one thereafter. They would reduce energy use through efficiency and cut coal consumption, with the main effect being in the power sector.
- Several major emitters have indicated they will not strengthen their NDC targets in this round. This will put the burden of deeper material commitments on the EU, China, India, and the GCC. But NDC updates in 2020 should bring more detail and specificity, possibly updates on technologies that have advanced since 2015, such as solar power and battery cars, and more attention on adaptation.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

SEPTEMBER

## CARBON DISCLOSURE AND CARBON NEUTRAL CERTIFICATION



.....  
The Carbon Disclosure Project (CDP) has become the leading assessor of disclosure, and the Greenhouse Gas Protocol is the most widely accepted set of standards

### Headline Messages

- Carbon disclosure has become increasingly important because of public, investor, and government pressure.
- It is the practice of assessing and reporting a company's greenhouse gas (GHG) emissions, its impact on climate, its strategic and risk management processes on climate, the impact on its business, and its plans and targets for improvement.
- Carbon certification is a part of wider ESG (Environmental, Social and Governance) criteria, which has become favoured by sustainable investors and argued to be correlated with improved business performance.
- The Carbon Disclosure Project (CDP) has become the leading assessor of disclosure, and the Greenhouse Gas Protocol is the most widely accepted set of standards.
- Companies are increasingly adopting carbon disclosure because of pressure from shareholders, business partners, employees, and civil society. Mandatory disclosure will likely be introduced by several regulatory bodies soon.
- Companies also see carbon disclosure as a way to systematise and improve their internal management of emissions and climate risks.
- Key current trends in carbon disclosure are:
  - › A widening scope by the number of companies and geography (including cities, regions, and countries as well as corporations);
  - › Greater standardisation of methodology and reporting; and
  - › More use of the results by investors and by companies themselves to drive internal performance improvements.

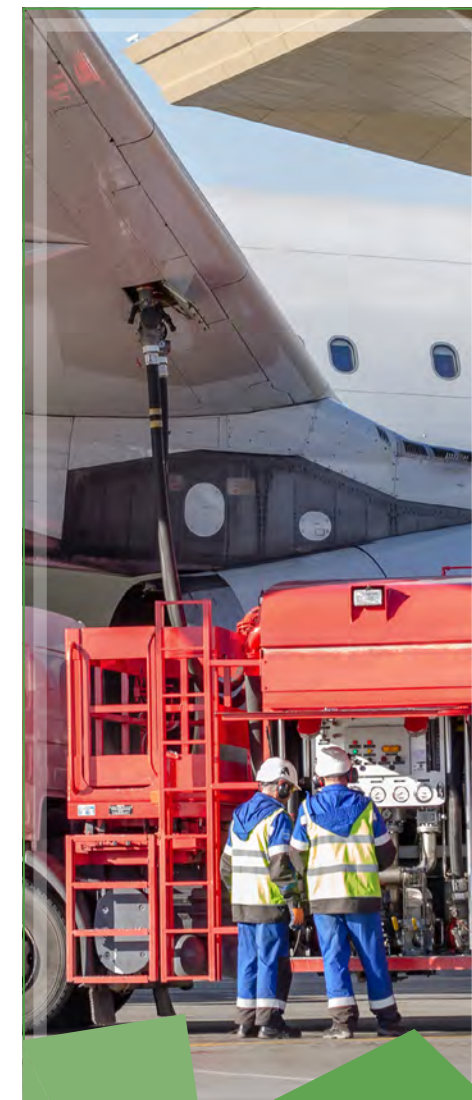


Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

OCTOBER

## PLAIN SAILING AND SOARING SMOOTHLY: EMISSIONS REDUCTION STRATEGIES IN SHIPPING AND AVIATION



.....  
Depending on the forecast, combined oil use in maritime and aviation could be from  
**4.3-14**  
Mbbbl/day in 2050 compared to  
12.9 Mbbbl/day in 2019

### Headline Messages

- Aviation and shipping are not large emitting sectors in the global total. They are, however, forecast to grow relatively rapidly, and abatement options are more limited than in sectors such as power and ground transport.
- The IMO and the ICAO have therefore put forward emissions reduction plans intended to be compatible with the Paris Agreement. However, these fall well short of carbon neutrality by 2050.
- Both sectors' governing bodies have similar targets of reducing emissions by 50% by 2050, but their medium-term targets vary significantly.
- Efficiency measures can mostly achieve the IMO's target for improving shipping carbon intensity by 40% by 2030 on 2008 levels. However, improvements beyond that will likely require lower-carbon fuels or propulsion.
- The ICAO's objective of cutting aviation emissions 50% by 2050 can probably be met with a mix of efficiency measures and alternative fuels. However, low-carbon aviation fuels are relatively technically immature, limited in volume, and costly.
- Depending on the forecast, combined oil use in maritime and aviation could be from 4.3-14 Mbbbl/day in 2050, compared to 12.9 Mbbbl/day in 2019. The relative balance of offsets, efficiency, and alternative fuels is, therefore, crucial for future oil demand.
- Climate policy in these sectors is likely to be driven by a mix of carbon pricing/ trading, mandates, corporate and consumer demands, and subsidies for new technologies and alternative fuels.
- As the experience of IMO 2020 sulphur regulations shows, carbon policies will have to be integrated between fuel suppliers, port/ airport operators, airlines, and shipping lines.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)



RESEARCH THEME

NOVEMBER

## GROWING CLIMATE CHANGE ACTIVISM



• • • •

In 2019, growing attention on oil and gas companies' greenhouse gas (GHG) emissions—mostly carbon dioxide (CO<sub>2</sub>), methane, and nitrous oxides—resulted in high-profile opposition to fossil fuels

### Headline Messages

- Climate activism has developed from earlier environmental movements dating back to the 1960s and sometimes even earlier but has gained shape during the 1980s. It has worked alongside and in synergy (and sometimes competition) with international climate diplomacy.
- The global landscape of climate activism is becoming densely populated, with the most recent manifestations, such as Greta Thunberg, Fridays for Future, and Extinction Rebellion, pressuring government policymakers and stakeholders to be accountable and reform climate policy to limit future climate exposure.
- In 2019, growing attention on oil and gas companies' greenhouse gas (GHG) emissions—mostly carbon dioxide (CO<sub>2</sub>), methane, and nitrous oxides—resulted in high-profile opposition to fossil fuels through climate strikes the world over from activist groups.
- Divestment campaigners are relatively new entrants to climate activism. Still, they have already made important contributions through the strategy of directly targeting financial actors responsible for the funding of fossil fuel projects.
- Various jurisdictions, led by the EU, are now imposing carbon border taxes or considering restricting the import of high-carbon energy and other products or both.
- Other jurisdictions in developing countries such as non-OECD Asia and Africa may fall in line as pressure rises from localised climate justice movements, putting stress on oil and gas producers to meet these standards and maintain market access.
- The current coronavirus pandemic comes at a crucial time for the climate crisis, forcing activists and campaigners to change tactics and adopt a large online presence. This adoption has, in turn, led to a rise in media activism and a social media culture of stigmatisation, forcing large corporate stakeholders and businesses in the energy sector to respond to and initiate climate activism programmes of their own.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

RESEARCH THEME

DECEMBER

## NATIONALISM – A THREAT TO GLOBAL ENVIRONMENTAL DIPLOMACY & POLICY?



• • • •

The new US administration of Joe Biden, with John Kerry as climate envoy, promises a return to the multilateral approach, including re-joining the Paris Agreement



### Headline Messages

- Globalisation, the process of increasing globalism, has faced recent challenges from populist-nationalist leaders and movements, supported by people concerned about economic, demographic, and cultural change.
- This is, in turn, a threat to the integrated world economy and to international environmental diplomacy and cooperation. This includes sustainability of climate and other environmental issues, alongside economic, health (including pandemic recovery), social, and human rights sustainability.
- The new US administration of Joe Biden, with John Kerry as climate envoy, promises a return to the multilateral approach, including re-joining the Paris Agreement and aligning domestic action with its goals. This will help other countries deepen their own Paris commitments at the end of 2021. However, Mr. Biden faces challenges from the domestic political system, a loss of US credibility, and uncertainty about whether his policies can be sustained after his term in office.
- Globalisation will continue, but a more contested and fragmented form may see more international conflict and slower and less equal economic growth. Environmental cooperation may be partitioned into regions and sectors, with global cooperation such as that under the 2015 Paris Agreement being outpaced by cooperative initiatives between non-state actors. Fossil fuel resources may lose geopolitical importance. Instead, international clean energy investment and access to renewable resources and key energy minerals can become areas of contestation and trade barriers. However, such contests will not follow the same pattern as past struggles over oil and gas resources and transit routes.
- Climate action via regional and sectoral clubs, including sub-national entities, NGOs, and corporations alongside sovereign countries, can help resolve the globalist and nationalist tensions in world action on sustainability. A combination of international climate diplomacy with non-state commitments, economic incentives, and incorporation into international business practices will be more robust than multilateral treaties alone.



Webinars and Podcasts Link:  
[Al-Attiah Foundation - YouTube Channel](#)

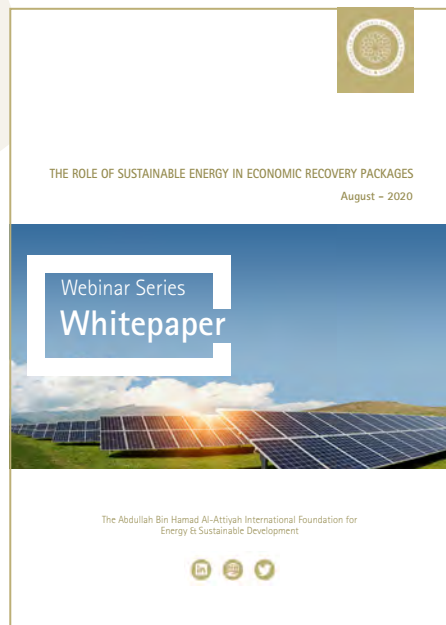


# THE KEY HIGHLIGHTS FROM WEBINAR WHITEPAPERS

WEBINAR THEME

AUGUST

## THE ROLE OF SUSTAINABLE ENERGY IN ECONOMIC RECOVERY PACKAGES



### Key Highlights

- Effective carbon pricing mechanisms, along with the removal of hydrocarbon subsidies, are fundamental to reducing fossil fuel consumption.
- Low-interest rates and economic stimulus packages, which often include generous incentives, provide carbon-intensive industries with an unprecedented opportunity to become more sustainable.
- Plunging solar panel costs are bringing power to societies beyond the electricity grid, providing greater economic opportunities for marginalised peoples.



[Webinar Series: White Paper - August 2020](#)

WEBINAR THEME

SEPTEMBER

## OPPORTUNITIES AND CHALLENGES IN THE ENERGY INDUSTRY: HYDROGEN



### Key Highlights

- At present, green hydrogen cannot compete price-wise with other forms of hydrogen or fossil fuels, so carbon taxes and subsidies are needed to support fledgling industry.
- Tumbling renewable electricity costs and renewables' growing share of the energy mix make hydrogen viable in the long term.
- Hydrogen is currently better suited to industrial applications than as a transport fuel.



[Webinar Series: White Paper - September 2020](#)

WEBINAR THEME

OCTOBER

## ACHIEVING WATER SECURITY IN A CHANGING WORLD



### Key Highlights

- Water shortages weigh on regional GDP and can cause geopolitical strife as rival countries compete for scarce resources.
- Wastewater can ease MENA's acute water stress, but a sceptical public needs reassurance about the safety of recycled water.
- Policymakers should first focus on less controversial wastewater uses, such as for industrial processes like oil and gas production and district cooling.



[Webinar Series: White Paper - October 2020](#)

WEBINAR THEME

NOVEMBER

## LNG MARKET ROAD TO RECOVERY



### Key Highlights

- Amid the tumult of 2020, price convergence across LNG's three main benchmarks showed the beginnings of an efficient, well-functioning global gas market
- East Asia will remain LNG's most important market due to the region's large population and state moves to switch from coal to less-polluting energy sources
- Oil majors are more cautious about investing in LNG but are still committed to the industry



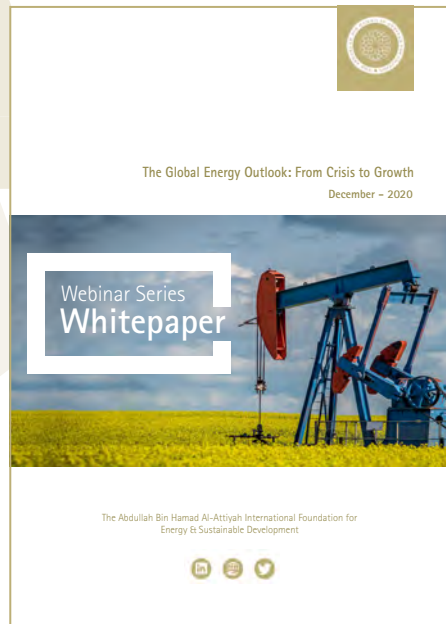
[Webinar Series: White Paper - November 2020](#)



## WEBINAR THEME

DECEMBER

## THE GLOBAL ENERGY OUTLOOK: FROM CRISIS TO GROWTH



## Key Highlights

- The belief that the zero-carbon economy is attainable by mid-century is increasing. This optimism is driven by several factors, including climate change momentum generated by the Paris Agreement, increasing commitment to net-zero carbon emissions, and encouraging trends in the development of technologies needed to achieve a zero-carbon economy.
- In the context of its climate change ambition and targets, the way China handles coal will be one of the biggest issues for the climate.
- There is much potential for hydrogen. While in the short term, the focus would be on blue hydrogen, in the medium to longer term, green hydrogen will become more affordable.
- The outlook for future energy markets is bullish. The expected increase in investment in renewables will provide a secondary boost for natural gas as the most convenient "standby fuel".
- Geopolitics will continue to play a more significant impact on the global energy landscape, with countries that rely heavily on fossil fuels expected to face substantial challenges. However, countries that are low-cost producers would be able to address the challenges efficiently.
- In the future, the energy powerhouses would become wider spread, and high-cost producers should be rightly concerned about ending up with substantial stranded assets.
- The transformation of the energy sector could come faster than we expect, happening rather suddenly instead of through a gradual process.
- The finance required for the transition to cleaner energy will come from both public and private sources, with more substantial amounts coming from the public as governments will need to increase spending on social and climate change issues.



[Webinar Series: White Paper-December 2020](#)

## PARTNERSHIPS AND COLLABORATIONS

The Foundation is continually engaged in ongoing projects, sometimes with members and partners. The projects completed during the year under review or ongoing into next year include:

1. Project researching the "Public and end-user perception of the reuse of by-products of oil and gas industry (Bio-sludge and treated industrial water)". The project that was conducted in partnership with Hamad Bin Khalifa University (HBKU) has been completed. The outcome was discussed in a webinar and publicised in local media, and published in an international journal.



2. Research Project focusing on *Measures to Improve Energy Efficiency in Qatar*. The project, in partnership with Mitsui and the Institute for Energy Efficiency Japan (IEEJ), is still ongoing. In 2020, the Foundation facilitated the involvement and participation of Kahramaa in the project



**MITSUI & CO.**





03

# CONCLUSION





## CONCLUSION

The past year has been indeed challenging due to the unprecedented impact of the coronavirus pandemic. Understandably, much of the world's attention was rightly focused on the human toll of Covid-19, providing the required health facilities, and stimulating the recovery process for the battered economy.

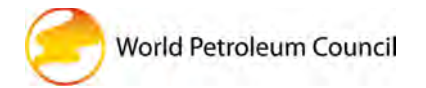
While these measures introduced to curtail the spread of the virus were largely effective, the emergence of second waves and mutating strains of the virus signify that the impacts of Covid-19 will remain longer than anticipated. Looking forward to 2021, there would be policy changes in many nations that would have huge implications for the energy sector. With all think tanks and like-minded organisations, that seek to continually decipher the changing landscape of energy transformation, the Foundation is excited about the challenges and opportunities that lie ahead.

Issues such as outcomes from the climate change conference in Glasgow (COP26); energy policy of the new US administration; the launch of a 14th Five-Year Plan in China; and the push by many countries to achieve net-zero carbon emissions are expected to shape the global energy landscape. These issues form the cornerstone of the Foundation's 2021 Business Plan. Covid-19 has served as a wakeup call and provided the Foundation with the opportunity to take a holistic and proactive look at its work programme. The Foundation will leverage the actions put in place to achieve the deliverables reported in this 2020 Annual Report.



## OUR PARTNERS

The Al-Attiyah Foundation collaborates with its partners on various projects and research within the themes of energy and sustainable development. For more information on each of our partners, please visit the Foundation's website at [www.abhafoundation.org](http://www.abhafoundation.org).







### Address

Barzan Tower,  
4<sup>th</sup> Floor, West Bay  
PO Box 1916 – Doha, Qatar



**Phone:** + (974) 4042 8000

**Fax :** + (974) 4042 8099



[www.abhafoundation.org](http://www.abhafoundation.org)



AIAttiyahFnd



The AI-Attiyah Foundation

The AI-Attiyah Foundation is the only independent, non-profit, Energy and Sustainable Development think tank based in Qatar. Over the last five years, the Foundation has become a hub for thought-leadership in the fields of energy and sustainable development, engaging world-renowned speakers to participate in a high-level dialogue series, conferences and panel discussions.

©2020 All Rights Reserved.