

THE ENERGY
REGULATION
AND MARKETS
REVIEW

NINTH EDITION

Editor
David L Schwartz

THE LAWREVIEWS

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PREFACE

In our ninth year of writing and publishing *The Energy Regulation and Markets Review*, the most pressing global concerns have revolved around the covid-19 pandemic. Accordingly, many of our contributing authors have emphasised concerns associated with the effects of the crisis on energy demand and consumption, and delays in the development of infrastructure. Beyond this crisis, we have seen many other significant geopolitical changes that have added uncertainties to global energy policies. For example, oil prices have hit record lows, which has slowed exploration and production efforts, and has threatened economic stability for countries that depend upon oil revenues. The United Kingdom is now within its 11-month transition period to exit from the European Union (a process known as Brexit), creating uncertainties regarding the future of the UK's energy policies and its coordination and cooperation with the European Union, including with respect to commitments to reduce greenhouse gases (GHGs). The Trump administration's 'America First' trade policies have continued to alienate US allies and historical trading partners. Despite its withdrawal from the Paris Agreement and expressions of support from the Trump administration for the coal industry, the United States has continued its extensive investment in renewable generation resources. The 2011 Fukushima nuclear incident continues to affect energy policy in many countries. Finally, there are continued efforts to liberalise the energy sector globally.

I CLIMATE CHANGE DEVELOPMENTS

Despite the US withdrawal from the Paris Agreement, we continue to see significant carbon reduction efforts globally, including increased use of renewable resources, and measures to improve energy efficiency and reduce demand.

In the United States, despite the Trump administration's support for the US coal industry, coal and other aged fossil fuel plants are retiring at an unprecedented rate. Additionally, many states have pushed for the procurement of thousands of megawatts of renewable resources, including from new offshore wind development projects on the east coast. However, the US Bureau of Ocean Energy Management has delayed granting approvals for offshore wind projects, and the Federal Energy Regulatory Commission has imposed regulatory restrictions on the ability of state-subsidised renewable energy projects to clear in the regional capacity markets through a minimum offer price rule to mitigate buyer market power.

The European Union issued a revised Renewable Energy Directive, which will take effect in 2021, targeting 32 per cent renewable consumption by 2030. Despite continued efforts to follow through on Brexit, the United Kingdom's renewable energy targets already exceed those of the European Union. France is seeking to double its wind and solar capacity and President Macron has announced a goal to close the remaining coal plants by 2022.

Italy had previously targeted a 28 per cent reliance on renewable energy by 2030 but is now working to reach the 32 per cent target adopted by the European Union. Belgium has continued its significant offshore wind procurement efforts, and is seeking to reduce subsidies in future procurements. In Denmark, renewables already constitute 40 per cent of electricity consumption and the aim is to have all energy demand met by renewables by 2050. Germany will not meet its goal of reducing emissions by 40 per cent by 2020, or its goal to reduce energy consumption by 20 per cent as compared with 2008, but remains focused on the continued development of renewable generation, energy efficiency and conservation, as well as energy storage technologies. Poland has been struggling to meet the European Union renewable energy targets but has plans to develop offshore wind generation.

Japan has continued its efforts to develop solar and wind resources, including opening new sea areas for offshore wind. But the shutdown of most of its nuclear generation has resulted in a significant reliance upon natural gas, including liquefied natural gas, and reductions in renewable energy prices has caused a slowdown in new solar and wind development. China continues to have ambitious renewable energy goals, capping energy from coal generation to an amount equivalent to 5 billion tonnes and aiming to have 15 per cent of generation supplied by non-fossil fuel generation. Korea aims to generate 20 per cent of its power needs from renewable energy and has committed to cut GHGs by 37 per cent by 2030.

This year, Australia has reached almost 20 per cent reliance on renewable energy resources, including significant amounts of energy storage capacity (battery and pumped water) and South Africa increased its renewable independent power procurement efforts, with a goal of producing 17,800MW of renewable energy by 2030.

The United Arab Emirates aims to reduce its carbon footprint by 70 per cent by relying on 50 per cent renewable energy by 2050, and Abu Dhabi is seeking to reduce electricity consumption by 22 per cent by 2030. In Brazil, hydroelectric resources already constitute more than 60 per cent of its installed generation capacity, and efforts continue to increase wind and solar generation as the cost of renewable generation has decreased. Colombia has significant renewable energy resources and recently completed its first auctions for renewable projects, with 1,398MW awarded and installed.

II INFRASTRUCTURE DEVELOPMENT

For many countries, a reliable energy supply remains the primary concern, regardless of fuel source. As only 35 per cent of Myanmar is connected to the grid, there are continued efforts to electrify remote parts of the country. Lebanon is hoping to solicit bids for the development of 890MW on floating barges to increase electricity supply. Panama and Colombia continue to seek foreign investment.

South Africa is utilising its Integrated Resource Planning process with a goal of doubling its generation and transmission capacity by 2030. Australia is developing the Snowy Hydro Project, which, at 2,000MW, will be one of the largest pumped hydroelectric storage projects in the world. Colombia is developing a large hydroelectric project that is expected to produce up to 17 per cent of the country's energy needs, but that effort is hindered by construction delays.

In its eighth licensing round for oil and gas exploration in the North Sea, Denmark received five new applications, but owing to political pressure relating to GHGs, Denmark has put this licensing round on hold indefinitely.

III NUCLEAR POWER GENERATION

Nine years after the Fukushima disaster, Japan has stopped operations at all but nine of its 48 nuclear power stations, and 11 nuclear power stations are in the process of being reviewed for restart under Japan's new stringent safety standards. Germany continues efforts to phase out all nuclear generation by 2022, and Belgium's nuclear plants have often been offline for maintenance for technical issues in the past few years. France was seeking to eliminate nuclear generation by 2025 but has extended that date to 2035. South Korea has continued its efforts to phase out nuclear power (replacing nuclear plants with new renewable facilities over time). South Africa's nuclear ambitions appear to be on hold at least until 2030.

However, the phasing out of nuclear energy is not universal. The United Arab Emirates' new 5,600MW Barakh nuclear power station is almost complete and one of its units is already operational. When all units are on-line, Barakh will supply 25 per cent of the emirates' electrical needs. Poland still intends to explore the development of nuclear power in the future. In the United States, even though the early retirement of certain nuclear plants has been driven by cost and power market considerations (rather than safety concerns), some states have passed legislation to subsidise nuclear energy to allow owners to continue to operate through zero emissions credit programmes, including Illinois, New York, New Jersey and Ohio, with similar legislation being considered in Pennsylvania.

IV LIBERALISATION OF THE ENERGY SECTOR

We have seen significant energy sector regulatory reforms in many countries. The European Union has sought to continue efforts to centralise the regulation of the EU energy sector. France has taken significant steps towards further liberalisation of its energy sector. Japan has fully liberalised its electricity and gas sectors and is encouraging market entry. Australia has opened access to transmission through regulatory reforms to encourage entry into the generation market and is undertaking significant energy market reforms to send more accurate price signals to market participants. Brazil continues its efforts to implement net metering regulations this year. China has reduced subsidies for renewable energy, prices transmission and distribution rates based upon a cost-plus regulatory methodology, and has implemented a market-priced mechanism for pricing coal-based generation. The United Kingdom has implemented a competitive tender process for the development of offshore transmission. In the United States, while states have continued to subsidise nuclear and renewable generation, the Federal Energy Regulatory Commission has permitted regional markets to implement minimum offer price rules to combat buyer-side mitigation in an effort to maintain competitive capacity markets.

I would like to thank all the authors for their thoughtful consideration of the myriad interesting, yet challenging, issues that they have identified in their chapters in this ninth edition of *The Energy Regulation and Markets Review*.

David L Schwartz

Latham & Watkins LLP

Washington, DC

May 2020

CHINA

Monica Sun, James Zhang and Qiujiie Tan¹

I OVERVIEW

Energy regulation in China involves a number of stakeholders, including various government authorities that heavily regulate the energy sector, monopolistic state-owned enterprises (SOEs), private companies that are trying to catch up, foreign companies that have had varying degrees of success and a vast number of consumers. Currently, and for the foreseeable future, energy regulation is anchored in China's ambitious economic restructuring agenda. The main priority in China's economic reform plan is environmental goals and the deployment of cleaner energy. The 'energy revolution' proposed in the 13th Five-Year Plan for National Economic and Social Development (2016 to 2020) is in three main sections, namely upgrading the energy structure, developing the energy transmission network and establishing a smart energy internet.

China, as one of the world's largest economies, is deeply embedded in the global energy value chain. The effects of China's energy consumption and production extend well beyond its borders.

China's prominent role in the global energy market underlines the importance of understanding the domestic energy regulation regime and its market structure. This chapter aims to provide an overview of these, with a focus on oil and gas, power and renewable energy from a foreign investment perspective. The authors have endeavoured to state China's energy regulation and practice on the basis of the materials available as of March 2020.

II REGULATORY REGIME

i The regulators

Oil and gas

The National Development and Reform Commission (NDRC) is in charge of setting out and implementing policies in respect of the oil and gas sector. It is also responsible for approving certain investment projects. The National Energy Administration (NEA) is established under the NDRC, with broad duties ranging from drafting energy strategies, proposing reform advice and implementing the management of the various energy sectors.

In the upstream sector:

- a the Ministry of Natural Resources (MNR) is responsible for the supervision and administration of the exploration and exploitation of mineral resources throughout

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China. It has the authority to grant the licences required for the exploration and production of crude oil and natural gas. It also has a role in the examination and approval of blocks open to private and foreign investment;

- b* the NEA was previously charged with the authority to examine and approve the overall development plans for individual upstream oil and gas projects; however, in February 2019, the approval requirements for overall development plans were officially removed, and replaced with a record filing procedure and continuing, post-event supervision by the NDRC and the NEA; and
- c* the Ministry of Commerce (MOFCOM) was previously in charge of review and approval of entry into and amendments of all production sharing contracts (PSCs). This approval is no longer applicable and was replaced in 2013 with a requirement to file records at MOFCOM.

In the midstream and downstream sectors, the NDRC is responsible for price regulation and MOFCOM is responsible for licensing in certain categories of trading businesses.

Power

The NDRC and the NEA (which took over from the State Electricity Regulatory Commission in 2013) regulate the power industry. They are responsible for the enactment and enforcement of regulations and for granting power business permits to power companies.

Others

Other regulators include:

- a* the Ministry of Ecology and Environment, which is in charge of administering and enforcing environmental protection matters in China;
- b* the National Nuclear Safety Administration, an authority under the Ministry of Ecology and Environment that acts as the central government agency responsible for regulating nuclear safety and supervising all civilian nuclear infrastructure in China. It also inspects nuclear safety activities and regulates the project approval mechanism; and
- c* the Ministry of Emergency Management, which is responsible for overseeing and administering safety at work nationwide.

ii Laws and regulations

The principle laws and regulations governing the energy sector include the following.

Oil and gas

- a* The Mineral Resources Law (1986, amended 1996 and 2009) and its Implementation Rules (1994) establish the basic legal framework under which exploration and production activities (including oil and gas development) are to be carried out.
- b* The Oil and Natural Gas Pipeline Protection Law (2010) provides for the security requirements for the construction and operation of pipelines.
- c* The Regulation on Registration of Exploitation of Mineral Resources (1998, amended 2014) provides detailed requirements on the registration of mineral resources exploitation and the issuance of exploitation licences.

- d* The Measures for the Administration of Transfer of Mineral Exploration Rights and Exploitation Rights (1998, amended 2014) regulate the transfer of exploration rights and exploitation rights.
- e* The Regulation on Sino-foreign Cooperation in the Exploitation of Onshore Petroleum Resources (1993, amended 2001, 2007, 2011 and 2013) is the basis for foreign companies to participate in the exploration and exploitation of onshore blocks in China through PSCs.
- f* The Regulation on Sino-foreign Cooperation in the Exploitation of Offshore Petroleum Resources (1982, amended 2001, 2011 and 2013) is the basis for foreign companies to participate in the exploration and exploitation of offshore blocks in China through PSCs.
- g* The Measures for Regulation of Fair and Open Access to Oil and Gas Pipeline Facilities (2019) provide the access regime that allows third parties to use the surplus capacity of pipeline facilities.
- h* The Measures for the Administration of Natural Gas Pipeline Transportation Prices (for Trial Implementation) (2016) provide that the pipeline transportation price is determined by the price administration department under the State Council following the principle of 'allowed cost plus reasonable profits'.
- i* The Measures for the Supervision and Review of Natural Gas Pipeline Transportation Pricing Costs (for Trial Implementation) (2016) provide that the price administration department under the State Council shall be in charge of the supervision and review of pipeline transportation pricing following the principles of legality, relevance and rationality.
- j* The Guiding Opinions on Strengthening Regulations over the Gas Distribution Price (2017) provide that gas distribution prices shall be determined and reviewed separately, following the principle of 'allowed cost plus reasonable profits'.
- k* The Opinions regarding Further Reform of Oil and Gas Regime (2017). This document was issued by Central Committee of the Chinese Communist Party and the State Council, and was long expected to set out a road map for the next phase of reform in the oil and gas sectors. However, the full text of the document is not yet in the public domain.
- l* The Regulations on the Administration of Grant of Mining Right (Draft for Comment) (2019). This draft regulation was issued by the MNR, emphasising the decisive role of the market in the grant of mining rights.

Power

- a* The Electric Power Law (1996, amended 2009, 2015 and 2018) is the main legislation governing the electricity sector.
- b* The Circular on the Power Industry Institutional Reform Plan (2002) initiated reform across the industry with a focus on the unbundling of power generation and power transmission.
- c* The Circular on the Reform Plan for Power Prices (2003) sets out the targets for the reform of power prices and is followed by the Regulation on Feed-in Tariffs (2005), the Regulation on Power Sales Price (2005) and the Regulation on Transmission and Distribution Price (2005).
- d* The Regulation on Electricity Regulation was issued in 2005 to strengthen and improve electricity regulation, including a permitting regime for power businesses, focusing on

maintaining the order of electricity markets and promoting the development of the electric power industry. The Measures on Electricity Market Regulation (2005) clarified the types of market players in the electricity sector, which include power generation, transmission and supply companies, electricity users and government authorities.

- e* The Administrative Regulation on Power Industry Business Permits (2005) sets out the types of power generation, transmission and supply companies subject to a permitting regime and the conditions and procedures for acquiring those permits.
- f* The Opinions regarding Further Reform of the Electric Power Regime (2015) set out the plan for further reform, which mainly aims to open up sales of electricity, develop the electricity market and establish market-oriented prices for electricity.
- g* The Circular by the NDRC and NEA on Issuing Supporting Documents for Power Industry Institutional Reforms (2015) provides six implementation measures for the reform of the power regime, covering the areas of power distribution price, power market development, power trading centre, power planning, power sales reform and coal-fired captive power plant.
- b* The Measures on the Supervision and Examination of the Cost of Power Transmission and Distribution (2015, amended in 2019) sets out rules for determining the costs of power transmission and distribution.
- i* The Circular by the NDRC and NEA on Issuing Administrative Measures on Electricity Companies' Entrance and Exit and the Administrative Measures on Orderly Derestriction of the Electricity Distribution Network Business (2016) provide opportunities for social capital to enter into the electricity distribution industry.
- j* The Circular by the NDRC and NEA on Orderly Derestriction of the Power Generation and Consumption Plans (2017) provides plans for promoting electricity traded through market-based transactions.
- k* The Circular by the NDRC and NEA on Actively Promoting Market-oriented Power Transactions and Further Improving the Trading Mechanism (2018) sets out the road map to remove restrictions on market players in respect of their participation in seeking market-oriented power transactions.
- l* The Circular by the NDRC on Fully Liberalising Power Generation and Consumption Plans for Commercial Power Users (2019) deregulates power generation and consumption plans for commercial users.
- m* The Measures for Transmission and Distribution Prices for the Provincial Network (2020) and the Measures for Transmission and Distribution Prices for the Regional Network (2020) provide further detailed rules regarding the calculation of transmission prices.

Renewables

- a* The Energy Conservation Law (1997, amended 2008, 2016 and 2018) aims to promote energy conservation.
- b* The Renewable Energy Law (2005, amended 2010) sets out general principles on renewable energy.
- c* The Guiding Opinions on Facilitating the Development and Utilisation of Geothermal Power (2013) aims at promoting the development and utilisation of geothermal power.
- d* The Administrative Regulation on Guaranteed Purchase of Renewable Energy-generated Power in Full Amount (2016) sets out detailed rules to guarantee the purchase of power generated by renewable energy.

- e* The Rules for Issuance and Voluntary Subscription of Green Power Certificate (for Trial Implementation) (2017) provide for the regime of issuing and free trading of green power certificates.
- f* The NDRC Notice on the Program for the Establishment of a National Carbon Emissions Trading Market (Power Generation Industry) (2017) sets out detailed plans for promoting the establishment of a national carbon emissions trading market based on the current regional carbon trading pilots regime.
- g* The Circular by the NDRC and NEA on Positively Promoting the Work on Subsidy-free Grid Price Parity for Wind Power and Photovoltaic Power (2019) aims to implement a subsidy-free policy to reduce subsidies in the solar and wind sectors.
- h* The Circular by the NDRC on Improving the Feed-in Tariff Mechanism for Photovoltaic Power Generation (2019) and the Circular by the NDRC on Improving the Feed-in Tariff Mechanism for Wind Power Generation (2019) set guidance prices for solar and wind power feed-in tariffs (FITs).
- i* The Circular by the NDRC and NEA on Establishing and Improving the Mechanism to Guarantee the Consumption of Electricity from Renewable Energy Sources (2019).
- j* The Opinions on Promoting the Healthy Development of Non-hydro Renewable Energies (2020) set out broad policy guidance, including to develop green power certificate trading under a quota regime, the objective to decrease FITs for renewable energy and the development of distributed photovoltaic solar power generation in residential areas.

In addition, there are numerous regulations and rules enacted by various administrative authorities to define specific procedures or particular issues with respect to the electricity sector under the framework of the principle law and regulations.

iii Regulated activities

Oil and gas

Upstream oil and gas exploration and production activities are subject to exploration and exploitation licences issued by the MNR.

In the upstream oil and gas sector, foreign companies typically partner with and enter into PSCs with legally designated national oil companies; however, China is pushing for deregulation in this regard (see also Section II.iv).

Pipeline design and construction activities are subject to government review based on criteria relating to safety, environmental protection, optimal land use and economic feasibility. The construction of oil and gas pipeline networks must be approved by the NDRC or its local branches. The qualifications of the enterprises and personnel engaged in the design, installation, use and inspection of pipelines must be accredited by the General Administration for Market Regulatory or its local branch, as the case may be.

A specific business permit is required for retail of refined oil products. The storage and domestic trading of crude oil and refined oil products were previously subject to similar specific business permits but have been gradually liberalised since 2019.

Power

Power companies are required to obtain electric power business permits issued by the NEA. There are specific permits for different types of businesses: (1) a power generation permit for power generation companies; (2) a power transmission permit for power transmission companies; and (3) a power supply permit for power supply companies (power supply business is defined to cover both distribution and sale of power).

A company applying for an electric power business permit must demonstrate that it has the financial capability and personnel with the required experience. In addition, power companies must obtain approval for each specific power project from relevant authorities and comply with the environmental regulations issued with the electric power business licence.

Through an NEA notice issued in April 2014 and further amended in December 2016, the following types of generation projects enjoy a general exemption for a power generation licence:

- a* distributed generation projects registered or approved by the NEA;
- b* small hydropower stations with single-station generating capacity below 6MW;
- c* new-energy generation projects (such as solar, wind, biomass, ocean power and geothermal power) with generating capacity below 6MW;
- d* power projects with comprehensive use of heat and pressure by-products with generating capacity below 6MW; and
- e* captive power plants without direct combustion of fossil fuel and that are dispatched by dispatching organisations at city level or below.

In addition, companies that undertake the installation, reparation or commissioning of electricity facilities shall obtain a permit for those businesses accordingly.

iv Ownership and market access restrictions

General foreign investment regime

China's foreign investment regime is undergoing significant changes introduced by the new Foreign Investment Law in 2019 (the FIL 2019), which entered into force on 1 January 2020 with the Implementing Regulation for Foreign Investment Law. The FIL 2019 formally adopts a 'pre-establishment national treatment and negative list' approach nationwide. Foreign investments are given same level of market entry as domestic investors, subject to specified exceptions in consolidated lists.

China periodically publishes Special Administrative Measures for Access of Foreign Investment (the Foreign Investment Negative List). These catalogues are typically the first regulatory guides to look at when making investments in China. The latest version of the Foreign Investment Negative List was jointly published by the NDRC and MOFCOM in 2019, and includes (1) Special Administrative Measures (Negative List) for Access of Foreign Investment (2019 Edition), which applies nationwide to all foreign investments (other than free trade zones) and (2) Special Administrative Measures (Negative List) for Access of Foreign Investment in Pilot Free Trade Zones (2019 Edition), which is less restrictive and applies to foreign investments in free trade zones only. Under the Foreign Investment Negative List, the prohibited items are entirely closed to foreign investment, while the restrictive items typically impose one or more restrictive measures on foreign investments, such as maximum limits for shareholding by foreign investors.

Certain sectors and businesses are specified as those in which foreign investment is encouraged, and additional incentives are provided. Similar to the negative lists, China

periodically publishes catalogues of these ‘encouraged’ sectors, the latest version of which, published by the NDRC and MOFCOM in 2019, is the Catalogue of Industries for Encouraged Foreign Investment (2019 Edition) (the Foreign Investment Encouraged List).

Oil and gas

The state has ownership of all mineral resources within the territory of China. Pursuant to the Mineral Resources Law, a licensing regime has been adopted and the MNR has the authority to grant exploration licences and production licences.

For a long time, foreign investment in oil and gas exploration and production activities has been restricted to joint ventures or cooperation with Chinese companies. In practice, the national oil companies (NOCs) (i.e., China National Petroleum Corporation (CNPC), China Petrochemical Corporation (Sinopec) and China National Offshore Oil Corporation (CNOOC)) hold the licences, and foreign companies need to partner with an NOC through a PSC arrangement to invest in onshore and offshore exploration and production in China.

However, the door has gradually been opening wider. The first step was marked by shale gas being recognised as ‘unconventional gas’ in 2011, for which two rounds of exploration licence tenders were held. Private investors (domestic or foreign) were eligible to participate in the tender, however, foreign investors could only participate by incorporating a joint venture with majority interests controlled by Chinese investors. In 2017, the ‘joint venture or cooperation’ requirement was removed in respect of oil shale, oil sands and shale gas. In July 2019, the restriction was removed in respect of conventional oil and gas (including coal-bed gas). In December 2019, the MNR issued a new Opinion on Several Matters Concerning Promoting the Reform of Mineral Resources Administration (for Trial Implementation), which is effective from 1 May 2020. It is provided that all companies incorporated in mainland China (either domestic or foreign invested) with net assets of at least 300 million yuan shall be qualified to apply for oil and gas mining rights. Owing to the continuing efforts of deregulation, future opportunities are expected to be available for foreign investors in the upstream oil and gas sector.

The midstream oil and gas industry is dominated by the NOCs. The CNPC controls nearly all the long-distance pipeline networks in China, including the West-East Pipelines system. In addition, approximately 90 per cent of the liquefied natural gas (LNG) receiving capacity is now controlled by the NOCs. On 9 December 2019, a national oil and gas pipeline network company (PipeChina) was incorporated, after more than two years of preparation driven by the central government. It is planned that PipeChina will take over the midstream assets from the NOCs and operate the infrastructure assets as an independent business, which will open up the energy market, making access to the infrastructure available to more players. However, it remains unclear which assets will be injected into PipeChina, and at what pace. It is anticipated that the company will not be truly ready for operation until the end of a transition period of one to two years.

The downstream oil sector, including refineries, petrochemical production and gasoline retail businesses, is still dominated by the NOCs, although it is generally open to both private and foreign investment, subject to ordinary permitting procedures. The downstream gas sector (including distribution of gas utilities) is much more diversified. The provincial SOEs play an important part in the intra-province pipeline networks, especially in the coastal provinces such as Guangdong and Jiangsu. For city utility businesses, there are many private

investment players (such as ENN and Guanghai), and SOE conglomerates (such as China Resources). In practice, it is less common for foreign invested companies to participate in downstream oil and gas business.

Power

The main market players in the power industry include generation companies (among which the five large state-owned generators are China Huaneng Group, China Datang Corporation, China Huadian Corporation, State Energy Investment Corporation (through the recent merger of China Guodian Corporation and China Shenhua Group) and State Power Investment Corporation (through the recent merger of China Power Investment and State Nuclear Power Technology Corporation), two grid companies (namely, State Grid Corporation of China and China Southern Power Grid Co) and companies engaged in power engineering and construction business (such as China Energy Engineering Group Co and Power Construction Corporation of China).

With continuing reforms to open up the power sales businesses and to develop a competitive power market, more and more power sales companies have been registered at the power trading centres. In 2019, the NDRC announced that the control over power generation and consumption plans for commercial users would be lifted. Commercial users are encouraged to freely negotiate power purchase prices with power generation companies. It can be foreseen that this policy will further boost a dynamic power market and strengthen the role of power sales companies and direct purchase users as emerging market players.

It is apparent that there have been attempts by foreign investors to invest in power distribution networks, which is now generally open to private investment. However, the main opportunities for foreign investors in the power industry remain in the construction and operation of power stations with pioneering technologies and in the renewable energy sub-sector. Specifically, the following types of businesses in the power industry are included in the Foreign Investment Encouraged List:

- a* construction and operation of ultra-supercritical power stations with single unit power of 600,000kW or more;
- b* construction and operation of power stations for heat-power co-generation units of back-pressure (extraction-back) type, heat-power-cool multi-generation units, and heat-power co-generation units of 300,000kW or more;
- c* construction and operation of power stations with large air-cooled generation units with single unit power of 600,000kW or more in regions suffering from water shortage;
- d* construction and operation of projects of power generation via integrated gasification combined cycle and other clean coal power generation projects;
- e* construction and operation of power generation projects with single unit power of 300,000kW or more that use fluidised bed boilers and coal gangue, middling and coal slurry;
- f* construction and operation of hydropower stations for the primary purpose of power generation;
- g* construction and operation of nuclear power stations (the Chinese party must hold a controlling interest);
- h* construction and operation of new-energy power stations (including solar, wind, geothermal, tidal, wave and biomass);
- i* construction and operation of natural gas peaking power stations and natural gas distributed energy stations in important load centres with secured gas supply;

- j* development and application of hybrid systems of gas-fired power generation and renewable power generation; and
- k* construction and operation of a power grid.

Although not specifically addressed in the Foreign Investment Negative List, some types of projects are typically restricted or prohibited for all (foreign or domestic) investors, pursuant to the Market Access Negative List (2019) issued by the NDRC and MOFCOM and the Guiding Catalogue for Industrial Structure Adjustments (2019) issued by the NDRC:

- a* within the coverage of the large power grid, wet-cooled power generator with coal consumption levels higher than 300g standard coal per kWh, and air-cooled power generator with coal consumption levels higher than 305g standard coal per kWh;
- b* diversion-type hydroelectric power generation without draining ecological flow;
- c* conventional coal-fired power plants whose single generator capacity is 300,000kW or less and is not compliant with standards, and oil-fired boilers and generating units mainly for power generation;
- d* coal-fired generator, oil-fired generator or coal-fired thermal generator that is not compliant with national requirements; and
- e* captive coal-fired power plant for new construction projects located in the Beijing-Tianjin-Hebei region, Yangtze River delta region and Pearl River delta region.

v Transfers of control and assignments

The transfer of exploration rights and exploitation rights for mineral resources (including oil and gas) is subject to the approval of the MNR, provided that the following conditions are satisfied:

- a* two full years have passed since the issue of the exploration licence, or the discovery of the mineral resources available for further exploration or exploitation in the exploration zone,² or one full year has passed since the exploitation enterprise began exploitation;
- b* the specified minimum input for exploration has been fulfilled;
- c* no disputes have arisen regarding the ownership of the exploration rights and exploitation rights;
- d* the exploration right usage fees, exploitation fees or any price for the exploration and exploitation rights have been paid; and
- e* a transferee of mineral exploration rights or exploitation rights should meet the qualifications of a mineral exploration right applicant or exploitation right applicant prescribed in the Measures for Area Registration Administration of Mineral Resources Exploration and Survey or the Measures for the Registration Administration of Mineral Resources Exploitation.

² The MNR issued a notice in late 2017 that applies only to 'minerals other than oil and gas' (note that it is not clear whether oil sands or other types of unconventional oil and gas will fall into this category). For exploration rights acquired by ways of (1) prior application, (2) bidding, (3) auction, or (4) listing (i.e., other than by private agreement), the conditions for transfer of exploration right shall include that two years have passed since the issue of the exploration licence, or one year has passed if a geographical report has been filed for recordation after reserve assessment at or above the general survey level. If the exploration right was acquired by private agreement, then 10 years shall have passed, otherwise the requirements and procedures for a new private agreement shall apply to such transfers.

The MNR will determine whether to approve the transfer within 40 days of receipt of the application. The transfer will take effect as of the day of approval.

As mentioned above, in most cases, the rights for exploration and exploitation of oil and gas are held by the three NOCs, with whom the foreign investors would enter into a PSC. There is no regulatory requirement for the transfer of a participating interest under a PSC. Previously, any amendments to a PSC were required to be approved by MOFCOM. This requirement was abolished in 2013 and now only record filing with MOFCOM is required. In terms of operatorship, Chinese PSCs often provide that the consent of a foreign investor is required if the NOCs propose to take over the production operations before the foreign contractor's full recovery of the development costs. After the full recovery of the development costs incurred in accordance with the overall development plan of any oil or gas field within the contract area, the NOCs may, at any time, have the right to take over the production operations by giving written notice to the foreign contractor.

The transfer of power generation units in operation requires a change to the power business permit, which needs to be approved by the NEA. The NEA will review whether the requirements for granting the relevant permits are still satisfied.

III TRANSMISSION/TRANSPORTATION AND DISTRIBUTION SERVICES

i Vertical integration and unbundling

The State Grid and China Southern Grid control the electricity transmission and distribution networks in China, and are used to monopolise the supply of electricity by purchasing power from power generators at regulated FITs and sell power at the regulated power sales prices.

The current power price reform, however, aims to separate the sale of power from grid companies. The Opinions regarding Further Reform of the Electric Power Regime (2015) and the Circular by the NDRC and NEA on Issuing Supporting Documents for Power Industry Institutional Reforms (2015) provide that power generators will enter into agreements directly with retailers or users with term contracts or spot trades, with the power price being freely negotiated between the parties. The transmission and distribution tariff will be regulated by the government on the basis of 'cost plus reasonable profits'.

Since 2009, the user-generator direct trading system has been trialled in more than 20 provinces. Companies with high electricity consumption (such as aluminium electrolysis and steel plants) can purchase electricity directly from generators. The price paid by these consumers is composed of the power purchase price negotiated between the generator and the consumer (under a power purchase contract), the transmission and distribution price paid to the grid company (under a service contract) and government surcharges. The Opinions regarding Further Reform of the Electric Power Regime (2015) also set out further goals for the development of this user-generator direct trading system.

ii Transmission/transportation and distribution access

Oil and gas

China's midstream oil and gas infrastructure ownership and operations have been dominated by SOEs, which has hindered market liberalisation of the petroleum and energy value chain.

In 2014, China started a five-year trial for a third-party access scheme to provide market participants (non-NOCs) with access to the midstream oil and gas infrastructure. Under this regime, pipeline and facility operators should grant third parties access to pipeline networks and associated facilities if operators have surplus capacity and, in the case of multiple

third-party users, non-discrimination principles should apply, but priority should be given to contracts already in place. The facilities to be opened to third parties include not only trunk pipelines and branch pipelines for crude oil, refined oil and natural gas, but also the relevant associated facilities, including ports, receiving terminals, and liquefaction, compression and storage facilities. However, there are various issues jeopardising the implementation of the open-access scheme. One of these is the lack of a clear definition of 'surplus capacity', and there is no clear mechanism to determine it. As a result, the five-year trial period came to an end in February 2019, with a very limited number of facilities having been opened for third-party access.

On this basis, in May 2019, the new Measures for Regulation of Fair and Open Access to Oil and Gas Pipeline Facilities were published. This regulation emphasises that operators of oil and gas pipeline facilities within China are obliged to grant third-party users 'fair and open access' to their facilities, and provides for new principles and policies to support this access. Conditions and the process for access, metering, pricing related requirements are also provided in this new regulation. It is expected to provide a more integrated and detailed legal framework to support further development of a fair and open access regime in China in the next five years.

Power

A grid operator must ensure non-discriminatory and fair access of its grid to qualified power plants and disclose the following information to power plants within its network:

- a* grid structure and line layouts;
- b* amount and status of transformation facilities;
- c* total installed capacity;
- d* power supply and demand and transmission capacity of major lines and outgoing lines; and
- e* tariffs and prices for inter-provincial power transactions and direct trading.

An interconnection agreement will be entered into by the grid operator and the power generator, specifying terms and conditions, including capacity and FIT.

Grid companies must ensure non-discriminatory and fair access to their grid to qualified power plants. The NEA issued a draft Measures for Regulation of Fair Access to Power Grids for public comment in 2019, which provides a more detailed regime for securing non-discriminatory and fair access to power grid.

For renewable power generation (RPG) enterprises, the grid operators are required to:

- a* build and manage the interconnection system for qualified RPG projects;
- b* enter into grid connection agreements with qualified RPG enterprises; and
- c* purchase all the on-grid power generated by RPG projects at a higher FIT.

iii Rates

Oil and gas

According to Measures for the Administration of Natural Gas Pipeline Transportation Prices (for Trial Implementation) (2016) and Measures for the Supervision and Review of Natural Gas Pipeline Transportation Pricing Costs (for Trial Implementation) (2016), inter-provincial pipeline transportation tariffs are regulated by the NDRC on the basis of 'allowed cost plus reasonable profits'. The NDRC completed the costs assessment of 13 interprovincial pipeline systems in August 2017 and published reduced tariffs effective from September 2017.

These tariffs were adjusted in March 2019 to reflect the reduced rates of value added tax. Intra-province pipeline transportation tariffs are regulated by local development and reform commissions and are reported to the NDRC annually.

According to the Circular by the NDRC on Issuing the Guiding Opinions on Strengthening Regulations over the Gas Distribution Price (2017), gas distribution prices shall be determined and reviewed separately, following the principle of ‘allowed cost plus reasonable profits’. This marks a further big step by the state to achieve the goal of ‘regulating the middle while liberalising the front and end’.

Power

Power transmission prices are regulated by the government. The Measures for Transmission and Distribution Prices of the Provincial Network and the Measures for Transmission and Distribution Prices of the Regional Network issued in early 2020 improved and clarified pricing mechanisms in power transmission and distribution. Different tranches of transmission prices were established and approved for different types of users (including large industrial users, general industrial and commercial users, other users, residential users and agricultural users) and different voltage levels of power transmission.

iv Security and technology restrictions

Oil and gas pipeline owners and operators have obligations under the Oil and Natural Gas Pipeline Protection Law, including those to patrol, inspect and maintain the pipelines; to upgrade, transform or stop using those pipelines that do not satisfy the safe use requirements in a timely manner; to post, repair or change signs related to the pipeline; and to take effective safety protection measures for a pipeline not in operation.

As gas pipelines are considered to be ‘specialised equipment’ under the specialised equipment regulatory regime, a pipeline operator is required to hold a Specialised Equipment Registration Certificate. In addition, both natural gas and gas pipelines are considered to be ‘hazardous material’ under the hazardous material regulatory regime. The ‘producer’ of hazardous material is required to hold a Production Safety Permit and the ‘trader’ of hazardous material is required to hold a Hazardous Material Operation Permit. However, it is not clear whether the pipeline owner and operators will be considered producers or traders of hazardous material.

Power grid operators also have security obligations under the Electricity Law. The power grids shall be operated in accordance with the principles of safety, high quality and economy. Power grid operations must be maintained in an uninterrupted and steady way, with a stable supply of electricity guaranteed.

IV ENERGY MARKETS

i Development of energy markets

The price of refined oil products is regulated by the NDRC. Prices of gas (including LNG) used to be heavily regulated by the NDRC, but there has been a steady process of deregulation. According to an NDRC press release, as of October 2017, the price for 50 per cent of all gas consumption in China was completely deregulated, 30 per cent was regulated on a base-price basis, and the remaining 20 per cent was for residential use and the price was set by the government.

In respect of electricity, under the current regime, grid companies purchase power from power-generation companies at regulated fixed prices and sell power to the customers at regulated fixed prices. Generation is dispatched on a fair and equal basis. Under the current power price reforms, the Chinese government is exploring the possibility of opening up electricity markets, including a plan to continue the deregulation of power generation and consumption. The aim at this stage is to establish a medium- to long-term market and a spot market.

ii Energy market rules and regulation

Oil and gas

To engage in refined oil retail, a specific business permit issued by MOFCOM is required. There are certain requirements for applicants to obtain a business permit, including a certain amount of registered capital, long-term supply agreements, and stable sales channels and facilities. Foreign-invested enterprises may also apply for permits.

State trading enterprises and non-state trading enterprises may engage in the importation of crude oil and refined oil. MOFCOM publishes a list of state trading enterprises, and companies not included on that list may become a non-state trading enterprise if they:

- a* have a foreign trade business qualification;
- b* satisfy the requirements published by MOFCOM; and
- c* register with MOFCOM.

Both state trading enterprises and non-state trading enterprises must obtain an import licence issued by MOFCOM. However, non-state trading enterprises shall be subject to import quotas. This quota for the year 2020 is 202 million tonnes for crude oil. In 2015, MOFCOM issued a notice setting out the detailed requirements for refineries to import crude oil, including requirements regarding equipment, product quality, safety management and personnel. In 2018–2019, MOFCOM issued notices regarding the qualifications and process for companies registered in Zhejiang, Fujian and Shanghai free trade zones to import crude oil, which provide for fewer restrictions.

Use of imported crude oil was previously limited to the NOCs. In February 2015, the NDRC issued a notice breaking the monopoly. Local refineries can now apply to use imported crude oil if they meet certain requirements, including requirements regarding equipment, product quality and safety management. Forty refineries have obtained a permit from the NDRC to use imported crude oil as of November 2018.

There is no market entry restriction on the import or export of gas or LNG.

In addition, trading of oil and gas requires safety permits under, for example, the hazardous material regulatory regime.

Power

Sale of power to customers has been largely controlled by the State Grid and China Southern Grid through their subsidiaries. Under the power sector reform, however, more participants are expected to come on the market. Apart from the user–generator direct trading system, the Circular by the NDRC and NEA on Issuing Supporting Documents for Power Industry Institutional Reforms (2015) also allows independent power supply companies to participate in the market provided that certain conditions, including on total assets, equipment and expertise, and the electric power business licence issued by NEA, are met.

iii Contracts for sale of energy

Oil and gas

There are two types of government regulated prices:

- a* government fixed price; and
- b* government guidance price.

The former is fixed and there is no flexibility, while the latter is more flexible. Government guidance price can be in the form of:

- a* a benchmark price with a float range;
- b* maximum price;
- c* minimum price;
- d* the rate of price difference; and
- e* the profit rate.

When a foreign company invests in upstream oil and gas through the PSC regime, parties would normally agree in the PSC that the NOC will sell the foreign investor's share of oil and gas on its behalf. Usually the price is determined by reference to the prevailing price in an arm's-length transaction for a long-term sales contract of similar quality of crude oil in the main world oil markets with adjustment to be made for quality, delivery, transportation, payment and other terms, and expressed as a 'free on board' price at the delivery point in China.

Upstream crude oil prices and gas prices are not regulated, while refined oil prices and natural gas city gate prices are subject to government regulation:

- a* the retail and wholesale of gasoline and diesel, and the sale of gasoline and diesel to wholesale businesses, railway customers and transportation customers are subject to the government guidance prices; and
- b* the supply of gasoline and diesel for state reserves or Xinjiang Production and Construction Corps, and the factory price of aviation gasoline, are subject to government (fixed) pricing.

The price of gasoline and diesel is adjusted every 10 business days based on the international crude oil price, processing cost, taxes, transmission fees and reasonable profits.

For natural gas, the government provides a base city gate price for natural gas, which means gas supplier and city gas utilities may negotiate the city gate price and that price shall not exceed 120 per cent of the base price. The prices of gas produced from unconventional gas (including shale gas, coal-bed gas and coal gas), domestic offshore production and imported LNG are deregulated and can be determined by parties. The prices for direct sale arrangements between upstream gas producers and industrial users under a direct supply arrangement and gas traded at the Shanghai and Chongqing exchanges are also deregulated.

In addition, in the latest Catalogue of Pricing Control by Central Government (2020) issued by the NDRC, the price of gas sold to gas utilities in provinces where a competitive market exists can also be negotiated by parties and is not subject to regulation, meaning that gas prices in those qualified provinces will be completely deregulated. In the earlier edition of the Catalogue, Fujian is the only named province that benefits from this deregulation as a pilot. The change of references in the 2020 Catalogue suggests that the deregulation will be extended to more provinces; the scope of this is not yet clear.

Power

To a large extent, the power prices are set by the government, taking into account the power purchasing cost, the loss from power transmission and distribution, power transmission and distribution price and government funds. The prices vary depending on a number of factors, including season, peak hour, region and type of user (whether residential, agricultural or industrial and commercial).

Customers are allowed to participate in the power market if certain criteria are met, and may choose to enter into power purchase agreements with power supply companies or directly with power generators. The terms and conditions of these agreements can be freely negotiated between the two parties.

The Opinions regarding Further Reform of the Electric Power Regime (2015) and the Circular by the NDRC and NEA on Issuing Supporting Documents for Power Industry Institutional Reforms (2015) sets out future steps to further facilitate the reform, including determining qualified generators based on energy conservation and environmental protection requirements, expanding the direct trading to power supply companies and encouraging long-term agreements between generators and customers.

The NDRC and NEA issued the Circular on Actively Promoting the Market-oriented Power Transactions and Further Improving the Trading Mechanism in 2018, which stipulates a further increase in the scale of market-oriented power trading, the speed of development of power consumption plans, the scope of market entities, and the active promotion of the participation of various market entities in power market transactions.

V RENEWABLE ENERGY AND CONSERVATION

As part of government policies in response to climate change and in line with China's commitments to the international community, the State Council set an objective to control energy consumption to 5 billion tonnes of standard coal within the term of the 13th Five-Year Plan (2016 to 2020). The NDRC also set medium to long-term for renewable energy development: 10 per cent of total energy consumption should be sourced from renewable sources by 2010 and 15 per cent by 2020. The mid-term target (10 per cent by 2010) was achieved. In July 2017, the NEA issued Guidelines for the National Energy Administration on the Implementation of the 13th Five-Year Development Plan for Renewable Energy, listing the overall development plan for wind power, biomass and solar plants (2017 to 2020).

For about a decade, China's renewable energy projects benefited from higher FITs to encourage power generation from renewable energy. The difference between renewable energy FITs and the benchmark FITs for desulfurised coal-fired power is paid from the Renewable Energy Development Fund. With developments in technologies and the decline of manufacturing costs during the past few years, the renewable energy FITs set by the government has been in continual decline and the renewables sector is expected to compete with coal-fired utilities on a subsidy-free basis.

The tables below set out the current policy on FITs for wind, biomass and solar power, effective from 1 July 2019.

Wind and biomass

Electricity source	FITs
Wind	<p>Onshore projects: guidance prices are set in four tiers ranging from 0.34 yuan/kWh to 0.52 yuan/kWh (for projects approved in 2019) and from 0.29 yuan/kWh to 0.47 yuan/kWh (for new projects approved in 2020), depending on project locations. If, at any location, the guidance prices are lower than the benchmark FITs for coal-fired power plants, then the benchmark FITs for coal-fired power plants shall apply as the guidance prices.</p> <p>Offshore projects: guidance prices are set at 0.8 yuan/kWh (for projects approved in 2019) and 0.75 yuan/kWh (for projects approved in 2020).</p> <p>Newly approved centralised onshore wind power projects and offshore wind power projects: feed-in tariffs shall be determined through competition and not be higher than guidance prices introduced above.</p>
Biomass	0.75 yuan/kWh

Solar

Resource area	Centralised photovoltaic: feed-in tariff		Distributed photovoltaic: subsidy payments		
	General (guidance price)	Poverty alleviation projects	Industrial and commercial use	Residential use	Poverty alleviation projects
Class I regions	0.4 yuan/kWh	0.65 yuan/kWh	0.1 yuan/kWh	0.18 yuan/kWh	In line with local policies
Class II regions	0.45 yuan/kWh	0.75 yuan/kWh			
Class III regions	0.55 yuan/kWh	0.85 yuan/kWh			
Notes					
1. The photovoltaic power plant feed-in tariff in Tibet is 1.05 yuan/kWh.					
2. The FIT and subsidies for photovoltaic projects are decreasing over the years, and the rates above are applicable to new projects connected to grid since 1 July 2019.					
3. A new policy was released in early 2020 to update the guidance prices regarding solar power in 2020 but do not enter into force until 1 June 2020.					

Other incentives include:

- a surcharges collected from all electricity end users are used to subsidise the difference between FITs and the benchmark price for desulfurised coal generators, operations and maintenance for independent public power systems, and costs for connecting renewable energy generators to power grids;
- b favourable loans with financial discounts for renewable energy projects listed in the guidance catalogue for renewable energy industry development;
- c subsidies for renewable energy development in areas such as new-energy vehicles, building-integrated solar photovoltaic systems, wind turbines and biomass power generation; and
- d tax incentives and land supply priority.

However, the Action Plan (2014–2020) for Energy Development Strategy marks a concerted shift to a more market-driven approach to future build-out in China. To implement this plan, the Circular on Photovoltaic Power Generation (2018) and the Circular on Positively Promoting the Work on Subsidy-free Grid Price Parity for Wind Power and Photovoltaic Power (2019) were issued to gradually reduce subsidies in the solar and wind sectors.

After the Fukushima Daiichi nuclear accident in 2011, the NDRC approved a nuclear project in March 2015 marking the official relaunch of nuclear projects in China. The Mid-to-Long Development Plan of Nuclear Power by the State Council sets the target for nuclear power at installed capacity of 58 million kW and 30 million kW under construction by 2020, which represents a shortfall of 39 million kW. The industry was expecting a large wave

of investment in nuclear power in the near future. In January 2019, two units of Zhangzhou Nuclear Project Phase I (a joint investment by China National Nuclear Corporation and China Guodian Corporation) and two units of Huizhou Taipingling Nuclear Project Phase I (investment by China General Nuclear Power Corporation) were finally approved by the State Council, which marked the end of a three-year period during which no new nuclear projects were approved. In early April 2019, the NDRC issued a new circular providing that the first batch of third-generation nuclear power projects shall apply FITs case by case.

To help reduce government subsidies to the renewables sector, the NDRC, with the Ministry of Finance and the NEA, issued a Circular on the Trial Implementation of the Renewable Energy Green Power Certificate Issuance and Voluntary Subscription Transaction System in January 2017. According to this Circular, solar and wind power producers would apply for and be issued tradeable certificates for the renewable electricity they generate. End users are encouraged to buy these certificates at an agreed price through negotiation or a bidding process. Solar and wind power producers will not receive a direct subsidy (higher FITs) for the electricity corresponding to the certificates sold. In July 2017, an official website for trading of the Green Power Certificate was launched. As of March 2020, while more than 27 million certificates have been issued, only around 37,000 certificates have been traded.

Also aiming to promote clean energy, a carbon emissions trading system has been operated on a pilot basis in parallel. In December 2017, the NDRC announced that it would be rolled out nationally. The interaction and reconciliation between the green certificate regime and the carbon emissions trading system are to be further observed in the future.

VI THE YEAR IN REVIEW

In February 2017, the State Council released the 13th Five-Year Plan for Energy Development (2016 to 2020), listing future energy strategies for an efficient, clean and safe energy system. According to the Plan, the annual primary energy consumption will be capped at an amount equivalent to 5 billion tonnes of standard coal by the end of 2020. The Plan sets goals on future energy structure, with at least 15 per cent of energy supplied from non-fossil fuels, 20 per cent supplied from natural gas and no more than 58 per cent from coal by the end of 2020.

China continues towards achieving the marketisation of its energy supply from upstream to downstream. Removal of investment restrictions opens up upstream oil and gas industry further to attract more investors, both foreign and domestic. The establishment of PipeChina and publication of new rules on a fair and open-access regime for oil and gas pipeline networks marks one step towards breaking up the monopoly and denomination of the midstream oil and gas sector by the NOCs. In the downstream sector, gas price deregulation also continues.

During 2019, there was further development in electricity industrial reform. Power generation and utilisation plans have been liberalised for commercial users. China has also set up a market-orient pricing regime for coal-fired power plants. Further regulation of transmission and distribution tariffs requires that these tariffs shall be calculated based on 'permitted costs plus reasonable profits'. In the renewables sector, China continues to reduce the subsidies for the fast-growing wind and solar industry and promote a more competitive energy supply market.

However, it is also acknowledged that there is a long way to go before China has a completely competitive energy market. A draft Energy Law was published by the NEA in early April 2020 for public comments. This new law aims to work as a comprehensive and overall legal regime for the energy sector.

The novel coronavirus pandemic hit China towards the end of 2019 and has caused significant disruption to the economy in the first quarter of 2020. China is facing unique challenges and it is expected the energy demand and consumption in 2020 will be widely affected, which may have a consequential effect on the current reforms.

VII CONCLUSIONS AND OUTLOOK

The regulatory environment is changing quickly in China, and the energy sector is no exception. Both the economic restructuring plan and the development of green energy technology have had a profound influence on the energy industry. Various stakeholders and their demands contribute to innovation in the industry, while also adding complexity to the reform process. With reforms taking place in the regulatory regime and the restructuring of the market continuing, it is vital to keep a close eye on energy regulations in China.

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