

# Vietnam: Key power and energy legal developments to watch in 2021 for implementing the National Energy Development Strategy to 2030 with a vision to 2045

## In brief

The government of Vietnam recently issued Resolution No. 140/NQ-CP<sup>1</sup> promulgating the government's action program ("**Government's Action Program**") to implement Resolution No. 55-NQ/TW of the Politburo on the orientation of the National Energy Development Strategy to 2030, with a vision to 2045 ("**Resolution No. 55**"). The Government's Action Program highlights, among others, the specific tasks and responsibilities of state management agencies of Vietnam to implement the general and specific objectives of the energy development as earlier set forth in Resolution No. 55.

Resolution No. 140 also sets out a list of key specific laws, regulations, programs, projects and master plans required to be prepared and issued in the next 10 years for implementing the Government's Auction Program with specific agenda items for 2021.

While certain key legal frameworks for the energy sector are in progress and require final approval as soon as possible, this list indicates a roadmap for how the government of Vietnam will design the energy sector in the next five to 10 years with specific starting items for 2021. The list also covers a wide range of topics, from different sources of renewable energy, oil and gas, and coal, to energy efficiency, climate change and greenhouse gas emissions reduction.

Notably, in addition to upcoming legal mechanisms (e.g., new PDP8, energy master plan, pilot corporate virtual/synthetic DPPA program, solar/renewable energy auction/bidding mechanism, revised FITs for wind farms), from the Government's Action Program, there are some other key legal frameworks to watch in 2021, including:

- mechanisms for developing offshore wind power in line with the implementation of the Vietnam Sea Strategy;
- mechanisms to encourage the development of renewable energy for self-consumption (with priority for rooftop solar power);
- mechanisms for developing floating solar power;
- mechanisms for biogas power development;
- a comprehensive Law on Renewable Energy to be studied/drafted;
- proposed amendments to the Electricity Law in the period 2021-2022.

## Contact Information

**Frederick Burke**  
Partner  
Ho Chi Minh City

**Thanh Hai Nguyen**  
Special Counsel  
Hanoi

## Comments

If you would like to further discuss details of the Government's Action Program or the short- and long-term priorities of the energy sector in Vietnam, please do not hesitate to contact us.

## In depth

<sup>1</sup> Resolution No. 140/NQ-CP dated 2 October 2020 promulgating the Government's Action Program for implementing Resolution No. 55-NQ/TW dated 11 February 2020 of the Politburo regarding the orientations of the Vietnam National Energy Development Strategy to 2030, with a vision to 2045 ("**Resolution No. 140**").



## Overall objectives

The Government's Action Program is established based on the general objectives set out under Politburo Resolution No. 55, as follows:

- National energy security
- A sufficient, stable and high-quality energy supply at affordable rates, aiming at fast and sustainable socio-economic development, national defense and security, as well as improvement of Vietnamese people's lives, environmental and ecological protection
- Harmonized development among energy sub-sectors, together with synchronous, smart energy infrastructure that meets the ASEAN development standards
- Development of a competitive, transparent, efficient energy market;
- Efficient exploitation and use of local energy resources in combination with reasonable export and import of energy
- Application of economical and efficient energy use (energy efficiency)
- Production of major equipment in the energy sub-sectors
- Upgrade and construction of advanced transmission and distribution grids.

## Specific targets

The Government's Action Program aims to achieve the specific targets set out under Resolution No. 55, with further details as follows:

- Fully satisfy the national energy demand to serve the objectives of the 10-year (2021-2030) Socio-Economic Development Strategy, in which primary energy is expected to reach approximately 175-195 million TOE (tons of oil equivalent) by 2030 and 320-350 million TOE by 2045; total capacity of power sources to reach 125-130 GW by 2030; and power output to reach 550-600 billion kWh by 2030.
- The share of renewable energy sources in the total primary energy supply mix will reach approximately 15%-20% by 2030 and 25%-30% by 2045.
- Total final energy consumption will reach 105-115 million TOE by 2030 and 160-190 million TOE by 2045. Primary energy intensity will reach 420-460 kgOE/USD 1,000 GDP by 2030 and 375-410 kgOE/USD 1,000 GDP by 2045.
- A smart, efficient electricity system that ensures safe connection to the regional grid and a safe power supply that meets the N-1 criterion for important load areas and N-2 for especially important load areas will be constructed.
- The reliability of the power supply will be rated among the top four leading countries in ASEAN by 2030; meanwhile, the power access index will be rated among the top three leading countries in ASEAN by 2030.
- Oil filtration establishments will meet at least 70% of the national demand; strategic oil and petrol reserves will suffice for at least 90 days of net import; and the capability to import 8 billion m<sup>3</sup> of LNG by 2030 and 15 billion m<sup>3</sup> by 2045 will be realized.
- The energy efficiency ratio in terms of total final energy consumption compared to the business-as-usual (BAU) scenario will reach approximately 7% by 2030 and 14% by 2045.
- Greenhouse gas emissions from energy activities, compared to the business-as-usual (BAU) scenario, will be reduced by 15% in 2030 and 20% in 2045.

In terms of the vision towards 2045, Resolution No. 140 sets out specific targets as follows:

- Firmly ensure the national energy security.
- Synchronously establish elements of a competitive, transparent energy market.
- Sustainably develop the energy sub-sectors.
- Efficiently use natural resources, protect the environment and adapt to climate change.



- Develop synchronous, modern energy infrastructure, and improve connections to regional and international systems.
- Improve human resource quality, science and technology qualifications, and competency of the energy sector administration to meet the advanced level of a developed industrial country.

In order to achieve the above objectives, Resolution No. 140 sets out specific tasks and actions required for the relevant ministries in a number of key areas.

## Oil and gas

For the oil and gas exploration and exploitation industry, the government has the following main tasks:

- Proactively study and explore shallow water areas, new sediment areas, unconventional forms of oil and gas (e.g., coal gas, tight gas, shale gas, gas hydrate, etc.) to supplement oil and gas reserves for long-term extraction.
- Propose specific solutions for further attracting national and international investment funds in searching, exploring, developing, and exploiting oil and gas mines in conventional areas, as well as special mechanisms for exploring deep water, offshore and complicated areas.
- Develop and synchronize the oil and gas infrastructure, as well as incentivize the solutions for enhanced oil recovery.

For the gas industry, the government's main tasks are as follows:

- Promote projects for the extraction and transportation of natural gas (with a focus on the state's key projects such as Blue whale Gas Project, Block B Gas Project, Nam Con Son 2 Gas Pipeline, etc.).
- Promote economic, efficient and reasonable use of domestic national gas sources.
- Promote investment and construction of infrastructure of import ports, facilities for storage and distribution of LNG to ensure sufficient gas supply in response to demand of households.

For the petrochemical and oil refinery industry, the government's main tasks include the following:

- Focus on research and development of petrochemicals, deep processing of oil and gas products, and integration of oil refining petrochemicals to increase the added value of petroleum products.
- Direct petrochemical refineries in Vietnam to carry out research to upgrade their technology and capacity, diversify sources and mix ratio of input materials and product structure, and raise products' quality standards to meet current domestic and international regulations.

## Coal

Resolution No. 140 sets out the main tasks for the coal industry as follows:

- Formulate a new strategy for developing the coal industry oriented toward efficient overseas investment and reasonable long-term coal export and import.
- Perform tasks assigned by the Prime Minister in Decision No. 403/QĐ-TTg, which approves Vietnam's coal industry development plan for 2020, with a vision to 2030.
- Implement specific solutions to exploit, process and use domestic coal resources in line with the coal industry development plan and strategy approved by the Prime Minister; ensure safe, efficient and economical resources exploitation; improve the clean coal recovery index in coal mining and processing; and intensify research and application of mechanization and automation technologies in coal mining and processing.
- Cooperate with domestic and foreign organizations to research and invest in technology and appropriate exploration methods for efficient exploitation of Red River Coal Basin per the Prime Minister's directive in Document No. 74/TTg-CN dated 19 September 2018.
- Direct the assessment of pilot coal mining projects in the Red River Coal Basin; invest in renovating and expanding existing ports; and research and construct new large-scale coal transshipment ports to meet the demand for coal import, transit and supply, in line with the approved master plan for development of Vietnamese seaports.



- Continue to direct the implementation of Directive No. 29/CT-TTg of the Prime Minister on further strengthening the state management of coal production, trading and supply for electricity production; strengthen inspection and supervision of coal production and trading.

## Renewable energy

Resolution No. 140 sets out the following main tasks for renewable energy:

- Study and develop a new Law on Renewable Energy.
- Study and plan renewable energy centers in regions and localities with advantages and preferential mechanisms to promote the development of renewable energy centers.
- Develop technology, establish production testing projects, and encourage the use of hydrogen in line with global trends.

## Fast and sustainable development of the power sector

On the development policy, Resolution No. 140 sets out the following main tasks:

- Develop and implement the Vietnam Power Sector Development Strategy for the new period.
- Propose to the Prime Minister a power sector restructuring plan in line with the energy market level on the principle of separating costs of natural monopoly activities from costs of competitive activities in the power sector.

On power generation/source and grid, Resolution No. 140 sets out the following main tasks:

- Propose to the Prime Minister a suitable bidding and auction mechanism for energy supply, especially in renewable energy and new energy investment projects in the period 2020-2022.
- Propose to the Prime Minister incentive mechanisms for biogas power development in the period 2020-2022.
- Further develop small- and medium-sized hydropower plants selectively for socio-economic development and improve onsite power supply capacity; use hydropower reservoirs to supply irrigation water for agriculture and domestic use, especially in remote and ethnic areas; strengthen international cooperation in the power sector, especially for hydropower development in Laos in connection with import of power to Vietnam.
- Study and develop policies and mechanisms for developing offshore wind power in line with the implementation of the Vietnam Sea Strategy.
- Study and develop incentive mechanisms to encourage the development of renewable energy for self-consumption (with priority for rooftop solar power).
- Study and develop incentive mechanisms for developing floating solar power.
- Study and propose a policy for the development and production of hydrogen to ensure national energy security and integration into the regional and international energy markets.
- Study and develop mechanisms and policies for the development of thermal power to encourage economic sectors' involvement in implementing thermal power projects, in order to improve competitiveness, diversification of forms of ownership, and methods of doing business in the power supply sector.
- Study and develop mechanisms, policies, and regulations on the development of gas-fired thermal power to ensure development is aligned with the Vietnamese power system status. Develop gas thermal power, prioritizing the use of domestic gas sources and focusing on gas thermal power development using LNG.
- Develop coal-fired thermal power at a reasonable level, giving priority to machine units with large capacity, high performance, and advanced technologies such as ultra-supercritical technology; ensure the full implementation of laws on ecological environmental safety and environmental protection.
- Develop mechanisms for factories and plant clusters using hybrid technology to use different energy sources in combination with renewable energy such as solar power, wind power, hydropower, coal thermal power, biomass, and biogas.



- Develop mechanisms and policies to encourage investment in energy storage equipment/technology in areas with solar energy potential despite limited transmission grids in order to promote the system's capacity, save investment resources and ensure the electrical system's safety.
- Study and complete the financial mechanism and mobilize capital from all economic sectors toward investment in developing the electricity industry to meet the requirements of the electricity market and integration of large-scale renewable energy sources; ensure electricity network security and electricity service quality.
- Modernize the power dispatching system step-by-step and apply automatic and intelligent monitoring technology to the electricity system; research and apply super-high-voltage transmission and one-way transmission.

On the electricity market and tariff mechanism, Resolution No. 140 sets out the following main tasks:

- Study and propose amendments to the Law on Electricity in the period 2021-2022 and relevant legal documents on tariff, electricity regulation, as well as the national program for power demand management, power load adjustment and electricity market in line with the roadmap of transitioning the market to a competitive electricity market.
- Propose to the Prime Minister an electricity retail price structure to replace the Prime Minister's Decision No. 28/2014/QĐ-TTg dated 7 April 2014 and the mechanism for adjusting the average retail tariff to replace the Prime Minister's Decision No. 24/2017/QĐ-TTg dated 30 June 2017, ensuring the correct implementation of tariff management in line with the market mechanism.
- Develop a mechanism for direct power purchase agreements between renewable energy developers and major electricity consumers.
- Develop mechanisms to allow the development of power plants with on-the-spot production and self-supply of electricity in industrial zones, industrial clusters, export processing zones, etc.

## **Restructuring of energy consumption in parallel with energy efficiency**

Resolution No. 140 sets out the main tasks as follows:

- Research, review and amend the Law on Economical and Efficient Use of Energy.
- Study and develop relevant legal documents to perfect mechanisms, policies and legal corridors for promoting Smart Grid development and widely implement the power demand management and power load adjustment programs in Vietnam.
- Review, update and develop wastage norms in the production, exploitation, transportation and distribution of energy sources such as petroleum, gas and coal. Develop standards and regulations for managing power consumption intensity and solar panel performance.
- Develop compulsory standards and regulations together with sanctions on energy use in industries with high energy consumption. Develop a program to transform into high-efficiency energy consumption vehicles, equipment.
- Review, amend, and supplement national standards and regulations related to recycling and reuse of waste in the stages of exploitation, production, distribution, use, recycling, reuse and disposal in the energy sector.
- Research and develop electricity tariffs by industry sub-sector to promote the restructuring of the industry and electricity consumption sectors toward improving efficiency and reducing energy intensity.
- Promote the application of renewable energy and clean fuels (e.g., CNG, LPG, LNG, biofuel, electric energy and other potential energy) to replace traditional fuels for transportation vehicles and equipment; promote new technologies to improve the energy efficiency of transportation vehicles and equipment.
- Research and develop technical standards and regulations on energy consumption in buildings.



- Study and develop mechanisms to encourage construction works to use energy economically and efficiently in implementing documents of the Law amending the Construction Law.
- Study and develop an action plan for the construction industry to implement the National Program on Energy Efficiency for the period 2019-2030.
- Continue to guide the implementation of the regulations of national technical regulations on energy-efficient buildings.

## **Developing a sustainable and connected regional- energy infrastructure market**

Resolution No. 140 sets out the main tasks as follows:

- Continue to effectively implement Phase 2 (2017-2022), Phase 3 (after 2022) of the Roadmap for Developing a Smart Grid in Vietnam as approved by the Prime Minister in Decision No. 1670/QĐ-TTg, and the National Program on Electricity Demand Management for the period 2018-2020 with a vision to 2030 as approved by the Prime Minister in Decision No. 279/QĐ-TTg.
- Review current legal documents and propose to improve the legal framework of the energy sector, including: (i) study and propose amendments to the Law on Petroleum and other related legal documents; and (ii) develop a pilot project for a competitive energy market by 2030, with a vision to 2045.
- Study government guarantee support mechanisms for enterprises assigned to implement large-scale electricity projects with modern technology.

## **Implementing environmental protection policies for the energy sector**

Resolution No. 140 sets out the following main tasks :

- Formulate mechanisms and policies for controlling greenhouse gas emissions in the energy sector and for deploying the recovery and use of CO<sub>2</sub>.
- Develop guides and apply models for using environmentally friendly materials and products; waste reduction, collection and reuse; eco-friendly solutions; and energy efficiency in distribution and commercial establishments.
- Improve the policy framework develop the system of national standards and regulations on emissions and waste in the energy sector.
- Improve mechanisms and policies for state budget support for projects that use clean and environmentally friendly technologies. Promote mechanisms for low-emissions industrial production and closely connect industrial production with a circular industry and trade economy to ensure that waste from the production of one product will be the input for others.
- Stipulate mechanisms for classifying sources of waste and developing suitable waste management and treatment measures so that some industrial waste can be used as input materials for other production industries such as cement, construction material, and fertilizer.
- Develop policies for environmental industries and services, and create a favourable legal basis for environmental protection in general and effective waste treatment in particular.