China Energy Updates

General overview

Trends[1] in China's energy sector **in June**:

- **Raw coal production switched from a decline to an increase**, reaching 410 million tonnes, up 3.6% year-on-year (YoY) and **7.9% month-on-month (MoM)**. Coal imports totalled 44.6 million tonnes, rising by 11.9% YoY and 1.8% MoM.
- **Crude oil** production stood at 17.95 million tonnes, up **2.4% YoY** but down **1.1% MoM**. Crude oil imports stood at 46.45 million tonnes, down by 10.7% YoY and 1.1% MoM.
- **Natural gas** production hit 20.2 billion cubic metres, an increase of 9.6% YoY but down **0.5% MoM**. Natural gas imports amounted to 10.43 million tonnes, up by 0.9% YoY but down by 7.9% MoM.
- **China's** total social power consumption in the first half of 2024 was **4.6575 TWh**, up 8.1% year-on-year; large-scale industrial power generation reached **4.4354 TWh**.

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Headline developments

- **A decision on further reforms to promote Chinese-style modernisation** is passed in the Third Plenary Session.
- New Action Plan for Low-Carbon Transformation and Construction of Coal-Fired Power (2024-27)**.**
- China publishes its 'China Oil and Gas Exploration and Development Report 2024'**.**

Regulatory and policy updates

A decision on further reforms to promote Chinese-style modernisation was passed at the Third Plenary Session of the 20th Central Committee of the Communist Party of China on 18 July 2024. Key energy reforms include:

- The independent operation of natural monopoly segments and market-oriented reforms.
- Advancing price reforms and improving **pricing mechanisms for refined oil**.
- Deepening **reforms to the energy management system**.
- Strengthening policies and governance for emerging industries.
- Enhancing mechanisms for the Belt and Road Initiative, building multilateral platforms.
- Establishing **a green and low-carbon development mechanism**.
- **Accelerating clean and efficient coal utilisation; constructing a new energy system; improving policies for renewable energy integration and regulation**.

The Action Plan for Low-Carbon Transformation and Construction of Coal-Fired Power (2024-27) was issued by the National Development and Reform Commission (NDRC) and the National Energy Administration (NEA) in July.

Its key objectives are as follows:

- By **2025**, initiate the first batch of decarbonisation transformation projects, reduce carbon emissions per unit of electricity by around **20%** compared to 2023 levels.
- By **2027**, broaden decarbonisation technology options, lower costs of coal fired power plant, cut carbon emissions per unit of electricity generation by about **50%** compared to 2023, and **tackle gas turbine emissions**.

Three methods proposed for renovation and construction are: **biomass co-firing**, **green ammonia co-firing**, and **carbon capture utilisation and storage (CCUS)**.

[1] These figures relate to enterprises above a designated size (with an annual business revenue of CNY 20 million or more).

Further requirements for these transformations are: **strategic project deployment**, **essential project criteria**, and **carbon reduction effectiveness**.

Four supportive measures proposed are: **enhanced financial support**， **strengthened policy support and guarantees**, **optimised grid operation scheduling**, and **strengthened technological innovation and application**.

A national green certificate issuance system has been launched: In June, the NEA announced that this would enhance efficiency and universal coverage, **with one certificate representing 1 000 kWh of renewable energy.**

Coal updates

Persistent heatwaves across China have fuelled coal consumption. Thermal power still accounts for around **60%** of total power generation. The raw coal output from major industrial enterprises reached **410 million tons** in June. Between 4 and 12 July, daily electricity output and coal consumption in coal-fired power plants rose by 13.4% and **12.3%** MoM, respectively.

The Daqin Railway, which is a key dedicated transport corridor for coal. now transports **over 1.2 million tons of coal** daily. From May to mid-July, it has transported over 80 million tons of thermal coal.

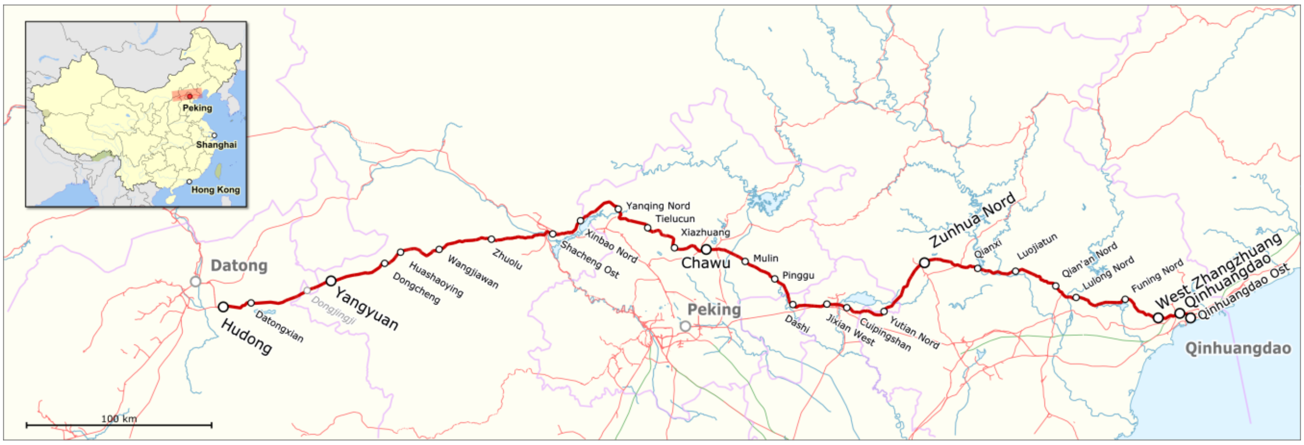

Figure 1: The Daqin Railway.

Source: National Railway Administration of China

Oil and gas updates

The 'China Oil and Gas Exploration and Development Report 2024' has been published. It was launched by the NEA at a meeting on 10 July, and is intended to **accelerate oil and gas exploration and development.** It highlights a steady increase in upstream oil and gas investments since 2018, averaging over **CNY 350 billion** annually.

The meeting emphasised:

- Increasing investment in **key basins**, and **accelerating the establishment of oil and gas exploration and development bases.**
- Advances in four major areas: ultra-deep earth, deep water, nano-scale unconventional resources, and efficient development of old oilfields.
- Promoting institutional reforms and innovations in oil and gas exploration and development.
- Accelerating the green transformation, clean and efficient oil and gas exploitation and utilisation, and the industrialisation of CCUS.

China's crude oil imports by enterprise (above designated size) dropped by 11% YoY in June. This drop is **partly due to weak demand and the sluggish real estate market.**

Large-scale industrial enterprises produced 107.05 million tons of crude oil in the first half of 2024, **up 1.9%**. Crude oil imports **dropped 2.3%** to 275.48 million tons, while crude oil processing **declined by 0.4%** YoY to 360.09 million tons.

Electricity updates

China's total social power consumption in the first half of 2024 was 4.6575 TWh, up 8.1% year-on-year; large-scale industrial power generation reached 4.4354 TWh.

The Assistant to the General Manager of State Grid Corporation (SGC), **Shan Yecai,** was reported in June to be facing investigation for alleged serious disciplinary violations.

Clean energy updates

July saw the launch of the 'Guangzhou-Zhanjiang Hydrogen Highway Demonstration Project Implementation Plan'. Guangdong Province's Development and Reform Commission issued the plan as the country's first provincial-level hydrogen highway implementation plan, focusing on a logistics cold chain network.

Figure 2. The Guangzhou - Zhanjiang Hydrogen Energy Highway Demonstration Project, Guangdong Province.
Source: ***Guangdong Province's Development and Reform Commission.***

The CHN Energy Investment Group's renewable energy capacity exceeded 1 000 GW by June, making this group the world leader in wind power.

A high-level meeting took place in June to address a subsidy dilemma that has resulted in widespread project stagnation in the agricultural and forestry biomass power generation sector for nearly four years. The NDRC, NEA, Ministry of Finance (MOF), China Securities Regulatory Commission (CSRC), and other departments held a meeting with biomass power generation companies to address the issue. About 80% of China's 500 biomass projects have ceased production due to lack of resources, following subsidy rule changes in 2019.

EU Energy Updates

International cooperation and trade updates

The EU is prioritising energy capacity restoration at the Energy Community Donor Conference in Brussels on 12 July. Commissioner Simson highlighted **the urgent need to restore Ukraine's severely damaged energy infrastructure. The Ukraine Energy Support Fund** has raised EUR 500 million for flexible disbursements, managed by the Ukrainian Energy Ministry, USAID, and the Energy Community. The EU Civil Protection Mechanism has also provided substantial aid.

EU notifies exit from Energy Charter Treaty and puts an end to intra-EU arbitration proceedings. On 28 June, the EU concluded its exit process from the Energy Charter Treaty (ECT), deeming it incompatible with the EU's climate objectives. The withdrawal would be effective one year from issuance. The EU and its Member States also formalised an agreement to terminate intra-EU arbitration proceedings under the ECT.

Regulatory and policy updates

The Ecodesign for Sustainable Products Regulation (ESPR) is announced on 19 July to make sustainable products the standard for consumers. Building upon the Ecodesign Directive's successes, the ESPR targets various of household items and mandates improved durability, reparability, reduced harmful chemicals, increased recycled material usage, and enhanced energy/resource efficiency. It introduces **digital product passports** for easy access to sustainability information.

Commission issued guidance to facilitate common approach to data interoperability repository. Issued on 5 July, the guidance aims at fostering a unified approach towards the establishment of a forthcoming database, and **achieving interoperability of electricity metering data**. It also obliges EU Member States to conduct and maintain updated mappings of their national practices.

Clean energy updates

Renewables take the lead in power generation in the EU in 2023. Renewables were reported to account for **44.7% (1.21 million GWh)** of total electricity production, having surpassed **fossil fuels** as the primary source of **electricity generation** in the EU during 2023. In contrast, electricity production from fossil fuels fell to 32.5% (0.88 million GWh) of the total. **Nuclear energy production** reached 0.62 million GWh, representing 22.8% of the EU's energy output. The shift towards renewables coincided with significant reductions in fossil fuel supplies.

Guidance on collaborative investment frameworks for offshore grid and renewable energy projects is published. Published on 27 June, **Guidance (C/2024/3998)** aimed to facilitate the investment frameworks for **cross-border offshore grid and renewable projects**. It supports **EU Member States**, **regulatory authorities**, and **system operators** in achieving regional offshore renewable targets by encouraging early collaboration, and call for **ENTSO-E** to refine modelling tools for better information exchange. The Guidance set parameters for fair cost-benefit analyses and allocation, with ENTSO-E to apply these in their **Offshore Network Development Plans** within a year.

The **European Climate, Infrastructure and Environment Executive Agency** (**CINEA) announced major funding for cross-border renewable energy (CB RES) initiatives.** The funding announced on 4 July is in line with the 2023 Connecting Europe Facility (CEF) Energy programme. These projects focus on offshore wind, green hydrogen, and solar PV, with a total EU funding of EUR 1.02 million.

EU invests close to EUR 3 billion of emissions trading revenues for cleaner energy systems in ten EU countries via the Modernisation Fund. The **Modernisation Fund**[2], announced on 24 June, its largest disbursement to date.

Commission approves state aid[3] schemes in Sweden, France, and Germany to support diverse green initiatives. A **EUR 3 billion Swedish state aid** was approved to promote the capture and storage of biogenic carbon dioxide. In France, a **EUR 10.82 billion state aid** was endorsed to accelerate **offshore wind energy deployment**, targeting substantial annual energy outputs. Earlier, German approved a **EUR 3 billion scheme** to develop a major **hydrogen pipeline network**.

Energy efficiency updates

The European Commission clarifies rules for energy labelling in visual advertising following court ruling. Issued on 15 July, the clarification mandates suppliers and retailers to include both the product's energy class and the full range of classes in their advertising. With immediate effect, traders are required to use a letter within an arrow symbol beside the class range in promotional material.

Commission sets new ecodesign rules for industrial fans. Announced on 3 July, the new rules aimed at reducing energy consumption and promoting repairability, applying to fans with motor power between 125 W and 500 kW, and encompassing a broad range of fan types used across various sectors, from industrial processes to **HVAC systems** in large buildings. By 2030, the new measures are expected to cut the EU's annual electricity consumption for industrial fans by approximately 31 TWh.

EIB invests EUR 490 million with Institut Català de Finances to finance the construction of over 4 300 affordable and energy-efficient homes in Catalonia. The initial tranche is EUR 163 million, signed on 15 July. Backed by the **EU's Invest EU programme**, the initiative is intended to address the region's lack of affordable housing, reduce energy consumption, and cut greenhouse gas emissions.

Oil and gas updates

EU imports of oil and gas continue to fall during the first quarter of 2024. The value of imports totalled EUR 95.5 billion for 183.8 million tonnes. This represents a 26.4% reduction in import value and a 10.4% decrease in net mass, compared to the same period in 2023. The import value and volume of both **gaseous natural gas** and **liquefied gas has** decreased, while petroleum products remained relatively stable.

Nuclear energy updates

The European Council agreed on the revision of Euratom Safeguards Regulation. The revision aimed at updating and enhancing the supervision of nuclear material users within the EU, accommodating recent nuclear sector advancements and improvements in information technology. The core objective is to ensure the ongoing efficacy of Euratom safeguards in ensuring the peaceful application of civil nuclear materials across the EU.

Commission opens in-depth state aid[4] investigation into Belgian support for lifetime extension of two nuclear reactors. The nuclear reactors under investigation, **Doel 4** and **Tihange 3**, are co-owned by **Engie**

[2] The Modernisation Fund is a programme from the European Union to support lower-income EU countries to reach their goals of climate neutrality by helping to modernise energy systems and improve energy efficiency.
[3] Same as footnote 5.
[4] State aid is a form of aid granted by EU Member States. It is important to note that the EU does not provide the funds itself; rather, it is the Member States that do so. The EU's role is to ensure that any state aid request is in compliance with State Aid Rules, preventing distortions of competition and

subsidiary Electrabel (89.8%) and **Luminus (10.2%)**. The probe will work out whether the planned support, totalling around EUR 2 billion, complies with **EU state aid regulations**.

Energy market updates

Declining market shares of biggest EU energy companies. Sixteen EU Member States witnessed a reduction in the market share of their largest **electricity producer**. In the natural gas sector, 11 out of 22 reporting EU countries noted a market share decline among their largest importers and producers.

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ensuring that such aid does not adversely affect trade between Member States. For details of State Aid Rules, please refer to https://eur-lex.europa.eu/legal-content/EN/TXT/HTML/?uri=CELEX:12008E107&from=EN.

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