The world has decided: Nuclear will power the future

Published 3 July 2025

Mobeen Tahir
Director, Macroeconomics and Thematic Research

Key Takeaways

- At the United Nations Climate Change Conferences of 2023 and 2024, 31 countries pledged to triple nuclear power capacity.
- President Trump has signed executive orders to quadruple US nuclear power capacity by 2050.
- China is investing heavily in new nuclear reactors but others like UK and France are also making notable announcements.

Policy support for nuclear power has surged. Governments around the world are increasingly recognising the crucial role of nuclear energy in meeting the growing demand for electricity and achieving climate targets. This shift is particularly striking because, for many years, the sector faced either a lack of support or outright opposition. The renewed momentum is creating a significant sense of excitement in the markets. This blog details the major policy shifts by influential countries and organisations supporting nuclear energy expansion1.

United Nations, 1 December 2023

COP 28: Launch of the Nuclear Tripling Declaration

The declaration was signed by 25 countries, led by the US, UK, France, Japan, Canada, and others. The countries committed to tripling global nuclear capacity by 2050 to meet climate targets.

This marked the first major multilateral endorsement of nuclear energy as essential for net zero, urging international financial institutions (like the World Bank) to include nuclear energy in energy lending policies.

United Nations, 13 November 2024

COP29: Expansion of Nuclear Commitment

El Salvador, Kazakhstan, Kenya, Kosovo, Nigeria, and Turkey joined the declaration, bringing the total to 31 countries forming a “Global Coalition of the Ambitious”. Nuclear energy was officially recognised in a major COP decision as necessary for the 1.5°C goal; the US simultaneously launched a roadmap for 200 GW nuclear deployment by 2050, and global financial institutions began backing nuclear development.

World Bank, June 2025

Paving the way for more nuclear funding

The World Bank ended its decades-long ban (which ended on 12 June 2025) on funding nuclear energy, now supporting life extensions for existing reactors and accelerating Small Modular Reactor (SMR) deployment in developing nations. This opens a vital financing pathway for nuclear in the Global South, aligning with the COP28 goal to triple global nuclear capacity, and marks a historic shift in international energy policy by legitimising nuclear as a development tool.

United States, 23 May 2025

US Executive Orders to Quadruple Nuclear Capacity

President Trump signed executive orders to quadruple US nuclear capacity (from ~100 GW to 400 GW), fast-track 10 large new reactors by 2030, and prioritise advanced reactor deployment – including SMRs, microreactors, and Generation IV technologies.

This marks the most aggressive US nuclear push in decades, slashing licensing timelines (max 18 months), reviving domestic fuel cycles, reforming the Nuclear Regulatory Commission, and integrating nuclear into national security, energy independence, and clean technology strategies.

United Kingdom, 10 June 2025

Launch of Largest Nuclear Build Programme in a Generation

The UK government commits to £14.2 billion for the Sizewell C nuclear plant (3.2 GW, powering ~6 million homes), while selecting Rolls-Royce SMR as the UK's preferred small modular reactor technology, with deployment targeted for the mid-2030s.

These moves are cornerstones of the UK's 24 GW by 2050 nuclear strategy, aiming to secure energy independence, create tens of thousands of skilled jobs, and revive British nuclear leadership – heralding a "golden age for nuclear" with both large-scale and modular technologies.

China, as of June 2025

Largest nuclear reactor pipeline in the world

- 58 operable reactors currently (56,930 megawatt electric (Mwe) – third highest capacity in the world behind US and France)
- Operable capacity was 10,065 MWe in 2010 (more than 5x growth in 15 years)
- 32 reactors under construction (34,235 MWe)
- Self-sufficient in reactor design and construction
- 'Go global' policy of exporting nuclear technology

France, as of June 2025

Going from shutdowns to potentially new reactors

- Currently has 57 operable reactors (63,000 MWe – second highest in the world behind the US)
- Capacity has largely been steady for the last 3 decades
- 2023: abandoned its plan to reduce nuclear's share of electricity to 50% from 70%
- Has announced plans to build 6 new reactors and to consider building a further 8.

How WisdomTree Uranium and Nuclear Energy UCITS ETF (NCLR) captures the opportunity

The WisdomTree Uranium and Nuclear Energy UCITS ETF (NCLR) provides investors with access to the growth of uranium and nuclear energy.

1. Uranium is the fuel for nuclear energy and its supply deficit is expected to widen as more nuclear capacity is deployed. NCLR invests in this category.
2. Building more reactors means manufacturing more components like turbines and requiring more services to maintain the infrastructure. This is why midstream companies will become even more important. NCLR invests in this category.
3. There is a lot of mention of new technologies like small modular reactors (SMRs). Companies that are developing SMRs have been among the top-performing stocks in this theme this year. NCLR invests in this category.

Value chain approach

The ETF targets the most value-accretive segments of the uranium and nuclear value chain, including those poised for growth as nuclear energy adoption accelerates. This value chain consists of:

4. **Upstream activities (60% weight):** Uranium mining and the production of other raw materials for nuclear reactors.
5. **Midstream activities (25% weight):** Companies involved in uranium conversion, enrichment, fuel fabrication, and storage, as well as those supplying critical infrastructure, equipment, and services to the nuclear industry.
6. **Innovators (15% weight):** Developing advanced technologies such as small modular reactors and conducting research and development in fusion technology.

By investing across the nuclear value chain, investors gain exposure to established sectors like uranium mining and midstream companies that play a critical role in making uranium ready for reactors. The strategy also includes innovators driving next-generation nuclear technologies, such as small modular reactors and fusion research, both poised for significant growth.

Focus on purity

Stock selection and weighting are based on revenue exposure to the uranium and nuclear energy value chain. Upstream companies must derive at least 50% of their revenue from the theme, while midstream

companies require a minimum of 10%, a threshold that accounts for their strategic role in the value chain while acknowledging their diversified business models. Weightings are adjusted in favour of companies with higher revenue exposure, subject to caps and liquidity requirements.

1Sources: World Nuclear Association, World Nuclear News, US Department of Energy, June 2025. COP is the United Nations Climate Change Conference.

Important Risks Related to this Article

IMPORTANT INFORMATION

Marketing communications issued in the European Economic Area ("EEA"): This document has been issued and approved by WisdomTree Ireland Limited, which is authorised and regulated by the Central Bank of Ireland. **Marketing communications issued in jurisdictions outside of the EEA:** This document has been issued and approved by WisdomTree UK Limited, which is authorised and regulated by the United Kingdom Financial Conduct Authority. WisdomTree Ireland Limited and WisdomTree UK Limited are each referred to as "WisdomTree" (as applicable). Our Conflicts of Interest Policy and Inventory are available on request. This marketing communication has been prepared for professional investors, but the WisdomTree products set out in this document may be available in some jurisdictions to any investors, subject to applicable laws and regulations. As the product may not be authorised or its offering may be restricted in your jurisdiction, it is the responsibility of every person or entity to satisfy themselves as to the full observance of the laws and regulations of the relevant jurisdiction. Prior to any application investors are advised to take all necessary legal, regulatory, tax and investment advice on the suitability and consequences of an investment in the products. Past performance is not a reliable indicator of future performance. Any historical performance included in this document may be based on back testing. Back testing is the process of evaluating an investment strategy by applying it to historical data to simulate what the performance of such strategy would have been. Back tested performance is purely hypothetical and is provided in this document solely for informational purposes. Back tested data does not represent actual performance and should not be interpreted as an indication of actual or future performance. The value of any investment may be affected by exchange rate movements. Any decision to invest should be based on the information contained in the appropriate prospectus and affer seeking independent investment, tax and legal advice. These products may not be available in your market or suitable for you. The content of this document does not constitute investment advice nor an offer for sale nor a solicitation of an offer to buy any product or make any investment. An investment in exchange-traded products ("ETPs") is dependent on the performance of the underlying index, less costs, but it is not expected to match that performance precisely. ETPs involve numerous risks including among others, general market risks relating to the relevant underlying index, credit risks on the provider of index swaps utilised in the ETP, exchange rate risks, interest rate risks, inflationary risks, liquidity risks and legal and regulatory risks. The information contained in this document is not, and under no circumstances is to be construed as, an advertisement or any other step in furtherance of a public offering of shares in the United States or any province or territory thereof, where none of the issuers or their products are authorised or registered for distribution and where no prospectus of any of the issuers has been filed with any securities commission or regulatory authority. No document or information in this document should be taken, transmitted or distributed (directly or indirectly) into the United States. None of the issuers, nor any securities issued by them, have been or will be registered under the United States Securities Act of 1933 or the Investment Company Act of 1940 or qualified under any applicable state securities statutes. This document may contain independent market commentary prepared by WisdomTree based on publicly available information. Although WisdomTree endeavours to ensure the accuracy of the content in this document, WisdomTree does not warrant or

guarantee its accuracy or correctness. Any third party data providers used to source the information in this document make no warranties or representation of any kind relating to such data. Where WisdomTree has expressed its own opinions related to product or market activity, these views may change. Neither WisdomTree, nor any affiliate, nor any of their respective officers, directors, partners, or employees accepts any liability whatsoever for any direct or consequential loss arising from any use of this document or its contents. This document may contain forward looking statements including statements regarding our belief or current expectations with regards to the performance of certain assets classes and/or sectors. Forward looking statements are subject to certain risks, uncertainties and assumptions. There can be no assurance that such statements will be accurate and actual results could differ materially from those anticipated in such statements. WisdomTree strongly recommends that you do not place undue reliance on these forward-looking statements. The products discussed in this document are issued by WisdomTree Issuer ICAV ("WT Issuer"). WT Issuer is an umbrella investment company with variable capital having segregated liability between its funds organised under the laws of Ireland as an Irish Collective Asset-management Vehicle and authorised by the Central Bank of Ireland ("CBI"). WT Issuer is organised as an Undertaking for Collective Investment in Transferable Securities ("UCITS") under the laws of Ireland and shall issue a separate class of shares ("Shares") representing each fund. The Fund is described in a Key Information Document (KID) or Key Investor Information Document (KIID) for UK investors, and the prospectus of WT Issuer ("WT Prospectus"). A copy of the WT Prospectus and the KID / KIID is available, for EEA/UK only, in

English at www.wisdomtree.eu. Where required under national rules, the KID will also be available in the local language of the relevant EEA Member State. Investors should read the WT Prospectus before investing and should refer to the section of the WT Prospectus entitled 'Risk Factors' for further details of risks associated with an investment in the Shares. The summary of investor rights associated with an investment in the fund is available in English on WisdomTree Europe's website. WisdomTree Management Limited may decide to terminate the arrangements made for the marketing of its collective investment undertakings. In such circumstances, shareholders in the affected EEA Member State will be notified of this decision and will be provided with the opportunity to redeem their shareholding in the fund free of any charges or deductions for at least 30 working days from the date of such notification. Notice to Investors in Switzerland – Qualified Investors This document constitutes an advertisement of the financial product(s) mentioned herein. The prospectus and the key investor information documents (KIID) are available from WisdomTree's website: https://www.wisdomtree.eu/en-ch/resource-library/prospectus-and-regulatory-reports Some of the sub-funds referred to in this document may not have been registered with the Swiss Financial Market Supervisory Authority ("FINMA"). In Switzerland, such sub-funds that have not been registered with FINMA shall be distributed exclusively to qualified investors, as defined in the Swiss Federal Act on Collective Investment Schemes or its implementing ordinance (each, as amended from time to time). The representative and paying agent of the sub-funds in Switzerland is Société Générale Paris, Zurich Branch, Talacker 50, PO Box 5070, 8021 Zurich, Switzerland. The prospectus, the key investor information documents (KIID), the articles of association and the annual and semi-annual reports of the sub-funds are available free of charge from the representative and paying agent. As regards distribution in Switzerland, the place of jurisdiction and performance is at the registered seat of the representative and paying agent.

For Investors in France: The information in this document is intended exclusively for professional investors (as defined under the MiFID) investing for their own account and this material may not in any way be distributed to the public. The distribution of the Prospectus and the offering, sale and delivery of Shares in other jurisdictions may be restricted by law. WT Issuer is a UCITS governed by Irish legislation, and approved by the Financial Regulatory as UCITS compliant with European regulations although may not have to comply with the same rules as those applicable to a similar product approved in France. The Fund has been registered for marketing in France by the Financial Markets Authority (Autorité des Marchés Financiers) and may be distributed to investors in France. Copies of all documents (i.e. the Prospectus, the Key Investor Information Document, any supplements or addenda thereto, the latest annual reports and the memorandum of incorporation and articles of association) are available in France, free of charge at the French centralizing agent, Societe Generale at 29, Boulevard Haussmann, 75009, Paris, France. Any subscription for Shares of the Fund will be made on the basis of the terms of the prospectus and any supplements or addenda thereto. **For Investors in Malta:** This document does not constitute or form part of any offer or invitation to the public to subscribe for or purchase shares in the Fund and shall not be construed as such and no person other than the person to whom this document has been addressed or delivered shall be eligible to subscribe for or purchase shares in the Fund. Shares in the Fund will not in any event be marketed to the public in Malta without the prior authorisation of the Maltese Financial Services Authority. **For Investors in Monaco:** This communication is only intended for duly registered banks and/or licensed portfolio management companies in Monaco. This communication must not be sent to the public in Monaco.