



# Learning Insights

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## Basel III Endgame: US banks to be brought into line with Basel III

*The announcement of new proposals – referred to as the “Basel III Endgame” – to bring the regulatory capital framework in the United States into line with the final provisions of Basel III is well timed following well-publicized instances of the vulnerability of the US banking sector earlier in the year.*

The global financial crisis (GFC) of 2007-09 demonstrated conclusively the impact that failure of individual banks can have on the stability of the global financial system – a phenomenon known as systemic risk.

In particular, the crisis highlighted the fundamental role of capital adequacy in containing systemic risk. The response in the US was increased capital requirements for large banking organizations to enable them to better absorb losses that threaten to disrupt financial intermediation in the economy. It was also expected that the resulting enhanced resilience of the banking sector would support more stable lending through the economic cycle while reducing the possibility of fresh financial crises and their associated costs.



### Post-GFC capital measures

These US reforms to the regulatory capital framework were broadly consistent with an initial set of global standards published by the Basel Committee on Banking Supervision (BCBS) that followed the financial crisis. In line with the Dodd-Frank Wall Street Reform and Consumer Protection Act of 2010 (Dodd-Frank Act), the Federal Reserve also implemented capital planning and stress testing requirements for large bank holding companies and savings and loan (S&L) holding companies. Additional capital buffer requirements were also imposed to mitigate the financial stability risks posed by US global systemically important banks (G-SIBs), as well as other enhanced prudential standards.





Now, in a further tightening of the capital requirements regime (and informed by the experience since the crisis), the Office of the Comptroller of the Currency (OCC), the Board of Governors of the Federal Reserve System (Board), and the Federal Deposit Insurance Corporation (FDIC) (collectively referred to as the “agencies”) have issued a **Notice of Proposed Rulemaking (NPR)** that proposes to modify the capital requirements applicable to banking organizations. These new rules apply to institutions with total assets in excess of \$100 billion and their subsidiary depository institutions (“large banking organizations”) and to banking organizations with “significant trading activity.”

### US capital standards bank categories

In 2019, the agencies adopted rules establishing four categories of capital standards for US banking organizations with \$100 billion or more in total assets and foreign banking organizations with \$100 billion or more in combined US assets.

- *Category I:* US G-SIB holding companies and their depository institution subsidiaries.
- *Category II:* Banking organizations with at least \$700 billion in total consolidated assets or at least \$75 billion in cross-jurisdictional activity and their depository institution subsidiaries.
- *Category III:* Banking organizations with total consolidated assets of at least \$250 billion or at least \$75 billion in weighted short-term wholesale funding, nonbank assets, or off-balance sheet exposure and their depository institution subsidiaries.
- *Category IV:* Banking organizations with total consolidated assets of at least \$100 billion that do not meet the thresholds for a higher category and their depository institution subsidiaries.

Once again, the requirements under the proposed US rulemaking are consistent with the Basel III reforms issued by the BCBS, more specifically to the “final changes” published by the BCBS in December 2017 and the market risk framework in January 2019. There are, according to the NPR, “*variations to reflect specific characteristics of US markets, requirements under US generally accepted accounting principles (GAAP), practices of US banking organizations, and US legal requirements and policy objectives*”.

As often is the case, the proposed changes involve elements of “super-equivalence” – essentially being tougher than the reforms published by the BCBS, despite the fact that the US is represented on the BCBS and agreed to what the Committee published (the same is true of the EU and the Bank of England, though not to the same extent as it would appear for the US).

### Eliminate internal models for credit risk

For example, in the case of credit risk the proposal would effectively eliminate the use of banks’ internal models to calculate regulatory capital requirements and in its place apply a simpler, standardized framework. This would overcome a perceived lack of transparency and variability of results associated with internal models, and enhance the ability of supervisors and market participants to make independent assessments of a bank’s capital adequacy, individually and relative to its peers.





### Operational risk exposures

The NPR notes that as the size and complexity of a financial institution increases, there are more opportunities for operational risk issues to emerge. Operational risk exposures have been – and continue to be – a persistent and growing risk for banks, with the proposal stating that the current, models-based approach can “*produce estimates that exhibit substantial uncertainty and volatility as well as a lack of transparency and comparability*”. To address this, the NPR proposes a simpler, standardized calculation.

### Use of internal models for market risk

The GFC saw banks incur significant losses in their trading books. Banks had long used internal value at risk (VaR) models for these positions, but the crisis highlighted how these models inadequately captured the risks. While the NPR retains banks’ ability to use internal models for measuring market risk, it proposes replacing VaR with an expected shortfall (ES) methodology that better accounts for potential losses. The use of internal models would also be subject to enhanced requirements for model approval and ongoing performance testing.

The NPR also includes a standardized measure for market risk that is risk-sensitive and provides comparability across banking organizations. Banks may elect to use this rather than the models-based approach. Those that do not receive approval to use the models-based measure would be required to use the standardized measure.



### CVA risk

Counterparty credit risk (CCR) associated with financial derivatives is dealt with by the introduction of standardized approaches for credit valuation adjustment (CVA) risk. This refers to potential mark-to-market losses on derivatives transactions resulting from the credit risk of the counterparty. During the GFC, CVA risk was a major source of losses on banks’ derivatives portfolios.



## Scope of proposal

The NPR aims to streamline regulatory capital calculations by applying requirements more consistently across large banking organizations. To this end, the applicability of several aspects of the current rules have been expanded to apply to all categories of bank. Significantly, the proposal would include Category III and Category IV banks (generally those with between \$100 and \$700 billion in total assets) into much of the capital framework already applicable to the very largest banks (Category I), imposing substantial regulatory adjustment costs on those “smaller” organizations. This is likely a response to issues highlighted by the failure of Silicon Valley Bank (SVB) earlier this year.

## Estimated impact and transition

The impact of the NPR, should it be implemented as proposed, would “vary meaningfully by institution, depending on each banking organization’s activities and risk profile”. Some estimates suggest that it would increase common equity tier 1 (CET1) capital requirements by as much as 16% for holding companies and 9% for insured depository institutions.

According to the FDIC, the majority of banks that would be subject to the proposed rule currently have enough capital to meet the proposed requirements, and large banking organizations identified as having shortfalls currently would be able to achieve compliance through earnings over a short timeframe, even while maintaining their dividends.

The proposed changes would be phased in over a 3-year transition period with any final rule not expected to take effect until July 1, 2025. Taking the effective date and transition period together, the capital requirements under a final rule would not be fully effective until the second half of 2028.

## Intuition Know-How has a number of tutorials relevant to the content of this article:

- [Basel III – An Introduction](#)
- [Basel III – Pillar 1 & Capital Adequacy](#)
- [Basel III – Measurement Approaches](#)
- [Basel III – Liquidity & Leverage](#)
- [Basel III – Pillar 2 & ICAAP](#)
- [Basel III – Pillar 3 & Risk Reporting](#)
- [Global Financial Crisis – Causes, Impact, & Legacy](#)
- [Dodd-Frank Act](#)
- [Credit Risk – Measurement & Capital Requirements](#)
- [Credit Risk – Lessons from the Financial Crisis](#)
- [Credit Risk Measurement – Capital Calculations](#)
- [Operational Risk – An Introduction](#)
- [Operational Risk – Measurement & Reporting](#)
- [Market Risk – An Introduction](#)
- [Market Risk – Measurement](#)
- [VaR & Expected Shortfall – An Introduction](#)
- [VaR & Expected Shortfall – Measurement](#)
- [Counterparty Credit Risk \(CCR\) – An Introduction](#)
- [Counterparty Credit Risk \(CCR\) – Measurement](#)





## Fossil fuels and net zero – can they ever be compatible?

***The road to net zero is a complicated journey with multiple diversions, forks, and confusing terrain, not least exemplified by the contention that it can be achieved while actually increasing fossil fuel production.***

Climate change objectives are typically articulated in terms of a target date for achieving net-zero greenhouse gas (GHG) emissions, linked to the peak global temperature increases set out by the 2015 Paris Agreement. This aims to limit global warming to well-below 2°C above pre-industrial levels and to pursue efforts to limit it to 1.5°C.

The recent decision by UK Prime Minister Rishi Sunak to allow more oil and gas drilling in the North Sea while simultaneously reaffirming his party's pledge to cut carbon emissions to net zero by 2050 has focused attention on what may – and may not – qualify as legitimate tactics on the road to net zero.

Mr. Sunak sees no inherent contradiction between these two apparently opposing stances. For many, his statement on new drilling is a transparently opportunistic political maneuver as his party seeks to appease and appeal to climate change sceptics. Nonetheless, the defense of his position highlights the question as to whether there can ever be space for fossil fuels in the net-zero transition.



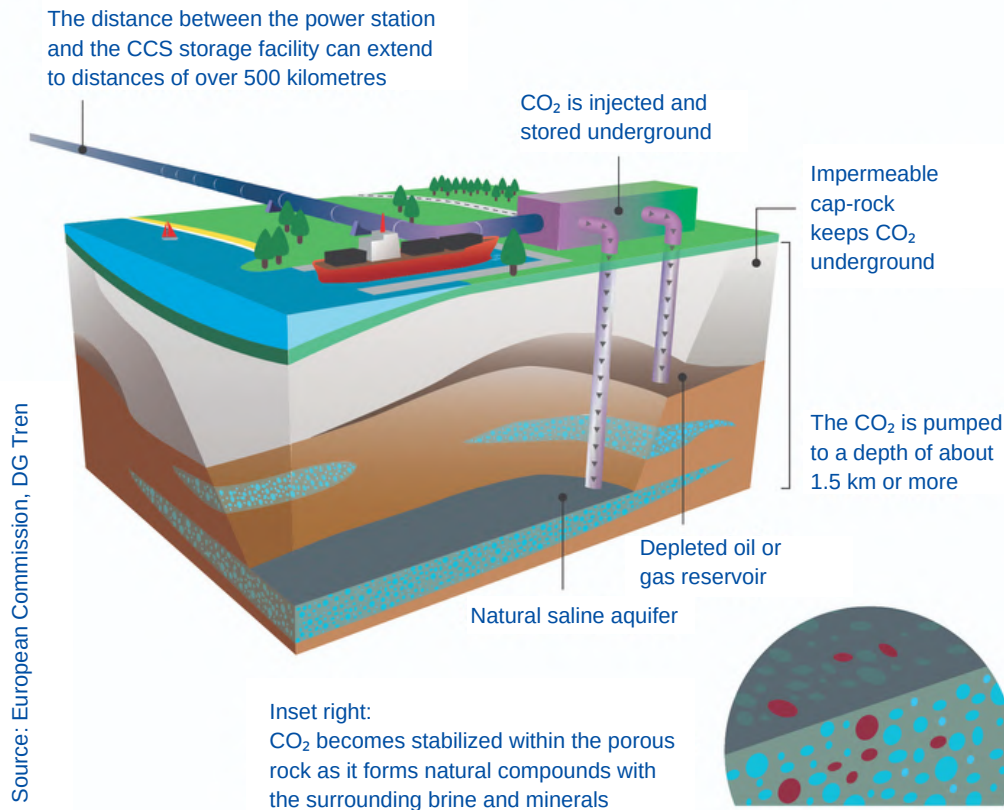
*Rishi Sunak, UK Prime Minister, who has decided to allow more oil and gas drilling in the North Sea (Source: Politico.eu)*

### **Carbon capture and storage justifies fossil fuel production**

The UK Prime Minister sought to justify the expansion of drilling by announcing simultaneously government support for two new carbon capture and storage (CCS) schemes. The capture of carbon dioxide emissions from industrial processes, including oil refining, and its planned storage in disused North Sea wells, is central to the UK's commitment to reach net zero by 2050. Indeed, it intends to continue to transition from fossil fuels after that date with CCS technology a critical part in its justification.



# Carbon Capture and Storage (CCS)



A recent report from the International Panel for Climate Change (IPCC) – and other research – would seem to offer Mr. Sunak some comfort in relation to continued fossil fuel emissions. Because renewable energy sources such as solar and wind power are intermittent, there is an argument that these need to be backed by traditional energy sources that may be called upon when the sun fails to shine and the wind dies down – but there is plenty of alternative research that contends that these shortcomings are close to being resolved through advancements in technology.

There is also the contention that as natural gas releases roughly half the carbon dioxide emissions as coal, so transitioning from coal to natural gas cuts down on CO<sub>2</sub> emissions. At the same time, some research asserts that natural gas emissions are hugely underestimated.

## CCS technology is still unreliable at scale

And so it is the area of carbon capture where the battleground lies. The IPCC contends that pairing natural gas and other fossil fuels with CCS and elimination of methane leaks could render these fuels low-to-zero emissions. But while carbon capture is central to every net zero scenario, even the IPCC admits that CCS technology is unproven at scale and unreliable as a means to limit global warming to 1.5°C. Hence, for many, CCS is simply a smokescreen for fossil fuel companies to retain the status quo indefinitely.

## Two types of carbon credits

The potential for CCS to make a meaningful contribution toward net zero is tightly bound to carbon markets and in particular the pricing of carbon credits. A carbon credit is an emissions unit that is issued by a carbon crediting scheme and represents a reduction or removal of GHG emissions. There are two major types. Avoidance credits are generated from renewable energy or forest conservation projects (but don't actually remove carbon from the atmosphere). Removal credits, meanwhile, are generated by projects that remove CO<sub>2</sub> directly from the atmosphere.





## **Carbon markets and the threat to net zero**

And there are two types of carbon markets. In compliance-led carbon markets, such as the EU Emissions Trading Scheme (EU ETS), governments impose a regulatory cap on emissions for specific industries. If these are exceeded, allowances for excess emissions must be purchased in the market, where unused allowances may also be sold. In voluntary carbon markets, emitters can voluntarily buy carbon offsets. These are certified and compensate for their emissions.

Right now, the UK's position on carbon pricing is also contentious and highlights issues around the role of carbon pricing in shaping net-zero policy. Specifically, by offering more carbon allowances and relaxed emissions reduction targets for polluters, the UK carbon price (under the UK Emissions Trading Scheme) is now nearly half that of its EU equivalent. The integrity of carbon markets has already been called into question by carbon credit projects allegedly exaggerating their emissions reductions. Underpricing of carbon credits likewise has potential to frustrate net-zero aspirations.

**Intuition [Know-How](#) has a number of tutorials relevant to the content of this article:**

- [Climate Risk – An Introduction](#)
- [Climate Risk Measurement – An Introduction](#)
- [Climate Risk Measurement – Approaches](#)
- [Climate Risk – Banking & Decarbonization](#)
- [Climate Risk – Stress Testing](#)
- [Commodities – An Introduction](#)
- [Commodities – Crude Oil](#)
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