

# **Towards an investible SAF sector:**

The role of price support mechanisms Ingrid Holmes, Executive Director

### Introduction to the Green Finance Institute



Seed-funded by the UK Government and the City of London Corporation, trusted by finance and led by former financial services practitioners, we provide a neutral platform to co-design, test and scale new financial solutions and supporting enabling measures that channel capital into net-zero and nature positive outcomes.

#### **Our Vision**

We believe in a greener future made possible by finance.

#### **Our Mission**

We want to accelerate the transition to a clean, resilient and environmentally sustainable economy, by channelling **private capital at pace towards real-economy outcomes** that will create jobs and increase prosperity for all.

#### **Our Work**

We sit at **the nexus of the public and private sectors** to co-design financial mechanisms, enabling frameworks, market guidance and policy ideas. We focus on sectors and industries to deliver this.

#### **Our Niche**

As an independent organisation with a proven track record, our credibility, capability and cross-sector engagement enables us to **respond to market barriers and develop solutions** where others can't.



### SAF - as with other first of a kind technology - face a number of key risks

Key milestones	Pain points	Risk category
Final investment decision	Permits and licensing	Regulatory
	EPC contract agreement	Construction / Technology
	Technology performance insurance	Technology
	Feedstock supply contracts	Feedstock
	Offtake agreements	Price / Volume
	Other agreements (e.g. land lease, technology, utilities)	Technology / Market
Project completion	Construction & procurement	Construction
	Mechanical completion	Construction / Technology
	Achieving nameplate capacity	Technology / Feedstock / Operational
Plant operation	Supply chain management	Feedstock / Operational
	Operational efficiency	Technology / Operational
	Revenue stability	Price / Volume



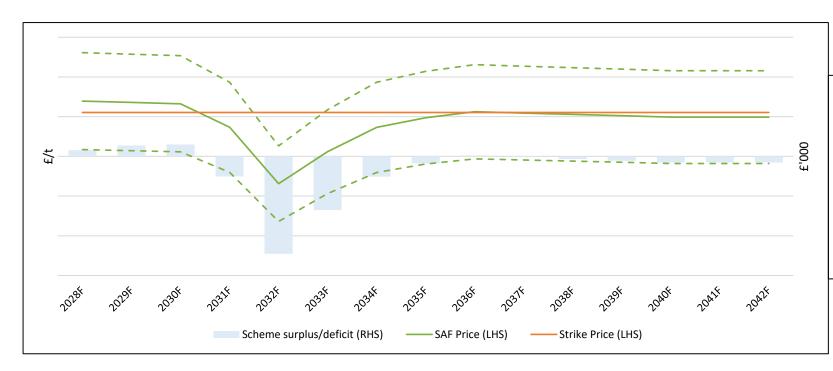
### Why do SAF developers need price support?

- The capital required to build new SAF plant is significant it is infrastructure scale but with a venture capital risk profile
- Access to debt capital to lower plant cost is key to ensure affordability of the end product and viability of the business
- But inherent risks are too material for debt capital to accept including revenue certainty
- A revenue certainty mechanism, in the form of a legislated, private law contract, akin to the CfD used in the renewables market could solve for this price risk
- This then starts to unlock other risk solutions including offtake which in turn are key to unlock access to debt capital
- The UK government have committed to implementing a revenue certainty mechanism by 2026. The two front runners under consideration are a guaranteed strike price and a buyer of last resort.



### **Guaranteed Strike Price (GSP)**

Similar to the CfD model, the GSP provides developers with a fixed price (strike price) for every tonne of SAF they produce. The strike price is theoretically set at a price that covers the cost of production, debt financing costs and provides a return for equity investors. The price is the same for every tonne produced; if the market price is lower than the strike price, then the scheme underwriter pays the difference. If the market price is higher than the strike price, the developer pays back the difference to the underwriter.

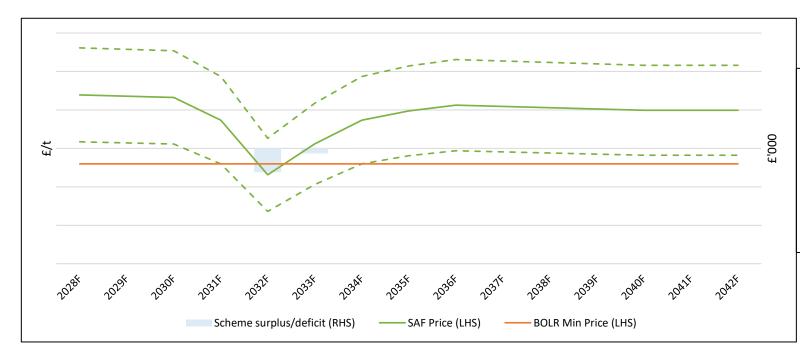


How to read the chart: The blue bars in the charts indicate the annual surplus (deficit) to the scheme underwriter each year and is measured on the right-hand-side (RHS) axis. All other elements are represented on the left-hand-side (LHS) axis. The solid green line is the SAF price forecast, with the green dashed lines representing the upper and lower bounds of price volatility each year. The orange line is GSP.



## **Buyer of last resort (BOLR)**

The BOLR provides developers with a minimum price for every tonne of SAF they produce. The minimum price is theoretically set at a price that covers the cost of production and debt financing costs. If the market price is lower than the minimum price, the scheme underwriter pays the difference. However, when the market price is above the minimum price, the difference is profit to the developer that provide equity returns.



How to read the chart: The blue bars in the charts indicate the annual surplus (deficit) to the scheme underwriter each year and is measured on the right-hand-side (RHS) axis. All other elements are represented on the left-hand-side (LHS) axis. The solid green line is the SAF price forecast, with the green dashed lines representing the upper and lower bounds of price volatility each year. The orange line is BOLR price.



# Considerations in the design of a revenue certainty mechanism

The details need to be worked through, notably



How the scheme is funded



Price setting process



Price discovery



### Revenue certainty mechanisms – what's the best option?



At the right price, either a Guaranteed Strike Price (GSP) or a Buyer-of-last-resort (BOLR) mechanism would provide enough revenue certainty for investors to manage price risk. Combining the GSP or BOLR with a ratchet mechanism should minimise downside risk to the underwriter.



If the government is underwriting the scheme, a BOLR may be the best option as it has lower downside risk.

If the airline industry is underwriting the scheme, a GSP may be the best option as it allows them to more accurately forecast the cost of SAF (e.g. the GSP is the price they pay for SAF). Under this scenario, the government could provide some level of risk sharing that caps the cost of the scheme (e.g. carries the risk below a certain price of SAF).



The detailed design of the scheme will be critical. Considerations include: the price setting process (for the first few SAF plant, prices should be set through competitive tender or bilateral negotiation), price discovery on GSP reference prices, and first-of-a-kind technology risk and the impact on prices.



Without a revenue certainty mechanism, there won't be a UK SAF industry. And it needs to happen quickly.



# Potential solutions needed to all key risks

- To attract private investment in the first few UK SAF plant, multiple risks not just revenue certainty need to be addressed in parallel
- So there is more work to be done ... especially to support 2g and 3g SAF developers

