

Ofgem's experience in supporting renewables



Office of Gas and Electricity Markets

Who we are

Non-ministerial government department and an independent regulator

Our principal duty

Protect GB consumers' interests now and in the future by working to deliver a greener, fairer energy system

How we fulfill our duty

Working with government, industry and consumer groups to deliver a net-zero economy, at the lowest cost to consumers

Stamping out sharp and bad practice, ensuring fair treatment for all consumers, especially the vulnerable

Enabling competition and innovation, which drives down prices and results in new products and services for consumers

Areas Ofgem specialises in

- Regulation of electricity and gas networks (distribution, transmission, and system operation functions)
- Regulation of electricity and gas retail and wholesale markets
- Delivering GB environmental / social schemes and offshore transmission owner process
- Cross-border infrastructure, i.e. interconnectors
- Regulation of data and digitization, including being a Networks and Information System competent authority, managing cyber security
- Use of tools and techniques to develop regulation, e.g. behavioural insights and data

Schemes

- Contracts for Difference (CfD)
- Feed-in Tariff (FIT)

Policies

- Smart Export Guarantee (SEG)
- Renewables Obligation

Other regulatory functions

- Offshore transmission owner (OFTO) tendering process
- Grid code reviewal

Contracts for Difference (CfDs)

- Involved in dispute resolution process by arbitrating allocation round appeals and disputes
- No key learnings to report today

Feed-in tariff (FITs)

Summary

Purpose	Incentivise small-scale renewable electricity generation by offering support for (typically) 20 years for an accredited installation
Focus	Up to 5MW - Anaerobic digestion (AD), hydro, wind, and solar photovoltaic (PV) generators Up to 2kW - micro-CHP
Funding	The FIT tariff is paid by electricity retail suppliers for generation and exports (note: costs to supplier are added to customer's electricity bills) Ofgem's role in administration is funded by UK government (BEIS)
Key dates	2010 scheme started and 2019 closed to new entrants

Key learnings

Value for money

Without mechanisms to adjust tariffs, FiT payments may not represent value for money if technology costs rapidly decrease. Unfair on consumers who ultimately pay.

Wider benefits

Empowers people and gives them a direct stake in the transition to a low-carbon economy.

Renewable Obligation (RO)

Summary

Purpose	Financial mechanism to incentivise large-scale renewable electricity generation by offering support for 20 years for an accredited generating station
Focus	Microgenerator (where DNC is 50kw or less) to large scale renewable electricity generation – including fuelled technologies and other technologies like hydro-electric, wind and solar PV.
Funding	Self-funding as the scheme created a market and value for ROCs driven by increasing supplier obligation. Ofgem’s administration funded from ‘buy out’ fund
Key dates	2002 started in GB ; 2017 closed to new entrants

Key learnings

Cost control

Consideration should be given to how costs might be controlled. Options include quarterly or annual caps on permitted new capacity, more frequent and swift reviews of the support levels, or setting an end point for new capacity.

Level of the obligation

The accuracy of forecast for ROC supply is important. Too low an obligation results in a surplus of ROCs, reducing their value to generators; if too high, there will be a shortage of ROCs, increasing their value, and increasing the cost to consumers.

Smart Export Guarantee (SEG)

Purpose	To ensure small scale renewable generators are paid for electricity exported back to the national grid
Focus	Up to 5MW - AD, hydro, onshore wind, and solar PV generators; Up to 50kW micro-CHP
Funding	The SEG tariff is paid by electricity retail suppliers Ofgem’s role in administration is funded by UK government (BEIS)
Key dates	Jan 2020 scheme started

Offshore Transmission Owner (OFTO)



Purpose	To minimise the cost of provision and operation of the associated offshore transmission assets, and to ensure that the assets were operated to a high standard.
Focus	Offshore network investment
Key dates	Launched in 2009

Grid code reviewal

- The Grid Code details the technical requirements for connecting to and the operation and use of, the national electricity transmission system (NETS)
- The Grid Code requirements are applicable to grid connected renewables
- Modifications can be raised by users and derogations can be sought where it is disproportionate for users to meet the requirement
- Ofgem or the Grid Code Review Panel review all proposed changes to the Grid Code and where appropriate, approve them

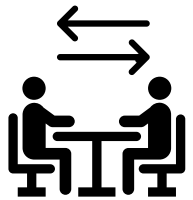
Summary

- UK PACT = Partnering for Accelerated Climate Transitions
- Programme funded by the UK Government
- By being country-led and responsive to change, works to support partner countries to accelerate their clean growth transition, raise climate ambitions and meet their Nationally Determined Contributions
- Includes three components, of which the following Vietnam is eligible for:



Green Recovery Challenge Fund

- Support for innovative capacity building projects to promote emissions reductions and low carbon solutions



Skill-Shares and Secondments

- Short term skill shares between UK experts and their country counterparts, and long term secondments into key institutions

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