Future Power Markets Update

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Future Power Markets

The Future Power Markets team is focused on how the ambition of up to 80% renewable energy share in electricity (RES-E) will be facilitated through the market.

The team's work spans across a number of core project areas, including:

- Strategic Markets Programme (SMP)
- Future Arrangements for System Services (FASS)
- Scheduling and Dispatch Programme (SDP)

Additional workstreams include:

- Long Duration Energy Storage (LDES)
- Energy Market Policy (EMP)









Strategic Markets Programme

SMP has a wide scope, a significant portion of which are changes required for Celtic Interconnector Go-Live and enabling increased flexible technology incorporating:

- Full EU Integration: The Celtic Interconnector, that is due to go-live in Q4 2026, requires the SEM Markets and Operational Systems to be compatible with European standards, which includes re-coupling the day-ahead market but also new arrangements for coupled intraday markets and participation on the EU balancing platform
- o **Post-Brexit Trading Arrangements:** Changes to the trading of electricity between the SEM and GB to increase market efficiency
- o Balancing Market Reform: Changes to the balancing market to enable flexible technology.

Updates:

EU Integration

Work is ongoing to develop High Level Requirements for EU Integration requiring changes to market rules and schedules, operating processes and system scheduling.

Post-Brexit Trading Arrangements

No update as of now.

Balancing Market Reform Updates

- High level requirements for Balancing Market Reform initiatives are under development
- Further detail on initiatives is being explored through the Future Power Markets Industry Workshops, the latest one was facilitated on the 8th May, and insights to the Balancing Market Reform workstream was provided to the attendees.











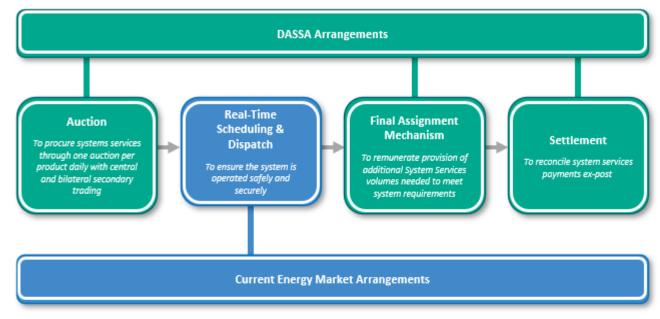


Future Arrangements for System Services

The design and implementation of Future Arrangements for System Services (FASS) includes:

- "To deliver a competitive framework for the procurement of System Services, that ensures secure operation of the electricity system with higher levels of non-synchronous generation", in line with the Single Electricity Market Committee (SEMC) request
- The implementation of a Day Ahead System Service Auction (daily auction/DASSA), Layered Procurement Framework and Fixed Term Contracts
- The creation of a System Services market code and updates to relevant codes and licenses.
- The TSOs facilitated an Industry Workshop on 24th April 2024. Slides are available here: <u>EirGrid</u> & <u>SONI</u>. TSOs written responses to queries received during the workshop are available here: <u>EirGrid</u> & SONI.
- The consultation period for the DASSA Design Consultation Paper has been extended by two weeks to 24th May 2024 at 5:00 pm.
- The Terms of Reference for the System Services Code Development Working Group was published on 1st May 2024 by the TSOs and is available at the following links: <u>EirGrid & SONI</u>.
- The TSOs and RAs are still engaging in relation to the funding application submitted by the TSOs on 16th February. Funding approval will be required to continue work on the programme.

Overview of the DASSA Design









Scheduling and Dispatch Programme

The Scheduling and Dispatch programme aims to:

- o To enhance the scheduling and dispatch systems and processes in Ireland and Northern Ireland
- To bring about compliance with the Clean Energy Package (CEP) and the treatment of variable Non-Priority Dispatch Renewables (NPDR)
- Facilitate low/zero carbon grid technologies such as Batteries, Synchronous Condensers in support of the broader goals of renewables and System Non-Synchronous Penetration (SNSP) penetration targets.
- The Scheduling and Dispatch Programme is composed of six initiatives, split into two tranches, with tranche 1 targeting a go live of April 2025:

Tranche 1:

SDP-01 Operation of Non-Priority Dispatch Renewables (NPDR)

SDP-02 Energy Storage Power Station (ESPS) integration

SDP-04 Wind dispatchability improvements

Tranche 2:

SDP-03 Fast Frequency Response (FFR)

SDP-05 Reserve services scheduling and dispatch

SDP-06 Synchronous condenser scheduling and dispatch

- > SDP issued the input into consultation for Annex SEM 13_011 to the Regulatory Authorities. Consultation to commence during summer 2024.
- An Industry workshop was held on 8th May. Participants were updated on Milestones and MODS Progress.
- Revised SDP_02 ESPS Mod was "recommended for approval" by the 23rd April and will be sent for RA Decision.

Scheduling and Dispatch: Programme Milestones

Phase 2

SOEF Milestone ID	Milestone	Dates
Tranche 1	Requirements Definition Complete for Scheduling and Dispatch Programme Tranche 1 Initiatives	September 2023
Tranche 1	System Design Complete for Scheduling and Dispatch Programme Tranche 1 Initiatives	
Tranche 1	TSC, CMS & GC Mods Review Complete for Scheduling and Dispatch Programme Tranche 1 Initiatives by the relevant review group (Mods Committee, Grid Code Review Panel, Capacity Market Workshops respectively)	March 2024
Tranche 2	Requirements Definition Complete for Scheduling and Dispatch Programme Tranche 2 Initiatives	July 2024
Tranche 2	Publication of milestones for Scheduling and Dispatch Programme Tranche 2 Initiatives	September 2024

Phase 3

	SOEF Milestone ID	Milestone	Dates
	Tranche 1	System Build Commenced for Scheduling and Dispatch Programme Tranche 1 Initiatives	March 2024
	Tranche 1	Publication of key milestones for testing and go-live, including revised ISEM Technical Specification of Scheduling and Dispatch Programme Tranche 1 Initiatives	June 2024
	Tranche 1	Regulatory Authority approval for TCS, CMC & GC Mods for Scheduling and Dispatch Programme Tranche 1 Initiatives	June 2024
	Tranche 1	Implementation and Go Live for Scheduling and Dispatch Programme Tranche 1 Initiatives	April 2025
		Implementation and Go Live for Scheduling and Dispatch Programme Tranche 2 Initiatives	Oct – Dec 2025







Additional Market Developments

Long Duration Energy Storage

- Work into additional Long Duration Energy Storage (LDES) modelling is progressing well with help from an independent consultancy. This work aims to get a clearer view of the benefit that longer duration storage assets (up to 100 hours) can provide to the grid and end consumer.
- EirGrid and SONI are continuing to engage with regulators and industry to brief on progress within the LDES workstream. Insights from these meetings will play a key role in determining the timelines and next steps for this programme.

Energy Market Policy

- ➤ Understanding the future trading arrangements between the Single Electricity Market (SEM) and market in Great Britain (GB) is a key priority for the Energy Market Policy team. Work continues to assess how the potential changing trading arrangements in GB will impact the SEM.
- At an EU level, we continue to actively contribute to market related developments through our membership of ENTSO-E. We await the outcome of the European Parliament elections in early June, which will shape the future direction of EU energy policy and the incoming EU Commission.







Future Power Markets Programmes: Consolidated View of Key Dates



06 November

09 October

Programme April 24 May 24 July 24 Aug 24 Sep 24 Oct 24 Nov 24 June 24 ESPS Modification Follow-Up Publication of Delivery schedule 05 Apr LDES DASSA Summary view. See FASS Phased Implementation DASSA Auction Design Auction Design ◆ DASSA Auction Design SEMC Decision Recommendations Roadmap for full view of programme milestones. Paper Workshop FASS Code Phased Product Review and Development Implementation Locational Methodology Panel TOR Roadmap 2 Consultation Paper **EMP** ◆FPM Industry Workshop FPM Industry Workshop Industry Workshop

03 July

07 August

11 September





11 April



05 June

Contact Information

If you require further information on what has been published in this update, please email:

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