



# **NESO Technology Advisory Council**

## **TAC-20**

**Public** 

**Date:** 05/09/2025 Location: Edinburgh Futures Institute / Virtual

**Start:** 09:00 End: 12:30

All material from the meeting can be found on the NESO Technology Advisory Council website: <a href="https://www.neso.energy/about/our-people/nesos-stakeholder-groups/neso-technology-advisory-council-tac">https://www.neso.energy/about/our-people/nesos-stakeholder-groups/neso-technology-advisory-council-tac</a>

# **Participants**

Attendee	Attend/Regrets	Attendee	Attend/Regrets
Eric Brown (Chair)	Attend	Anthony Riding	Attend
Keith Trilloe (Facilitator) (KJT)	Attend	Andy Hadland	Regrets
Shubhi Rajnish (SR)	Attend	Alex Waslin	Attend
Joseph Stepney (JS)	Attend	Chris Dent(CD)	Attend
Alastair Martin	Attend	Simon Pearson	Attend
James Houlton	Regrets	David Sykes	Attend
Kate Garth	Attend	Gareth Hislop	Regrets
Naomi Baker	Attend	Alvaro Sanchez-Miralles	Attend
Carolina Tortora (CT)	Attend	Fred Drewitt	Attend
Teodora Kaneva	Attend	Jo-Jo Hubbard	Regrets
Melissa Stark	Attend	Cameron Shade (CS)	Regrets
Nick Huntbatch	Attend		

# For specific Agenda Items

Sangeeta Agrawal Brendan Lyons





## **Agenda**

#	Topic	
1.	Welcome & Apologies	Eric Brown
2.	Minutes of last meeting and matters arising	Eric Brown
3.	Feedback from the last meeting	Keith Trilloe
4.	Roadmap for DSAP	Joe Stepney / Keith Trilloe
5.	NESO 1 & 2-year Business Plan	Joseph Stepney / Keith Trilloe
6.	Day 2 Change Journey	Sangeeta Agrawal
7.	Innovation showcase	Carolina Tortora
8.	Open Balancing Platform Update	Brendan Lyons
9.	Subgroups update	Joe Stepney
10.	Next meeting	Eric Brown
11.	AOB	Eric Brown

## **Decisions and Recommendations**

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#### 1. Welcome & Apologies

The chair welcomed all with the standard round of introductions.

The chair expressed the TAC's appreciation to the Futures Institute at the University of Edinburgh for hosting the meeting and for their kind hospitality.

The chair asked TAC members if there were any conflicts of interest to be declared; none were raised.

#### 2. Minutes of last meeting and matters arising

There were no further comments on the minutes from the last meeting. All outstanding actions were discussed and updated.

The updated Terms of Reference (ToR) for the TAC were circulated following the previous TAC meeting with a request for any comments. None had been received. The chair asked the meeting if there were any final comments. None were offered so the ToR are now taken as agreed and accepted.

The chair noted that not all members had responded to the survey circulated following the precious meeting to confirm membership. The chair asked those that had not yet replied to do so.

#### 3. Feedback from the last meeting

Feedback received from the previous meeting were discussed, highlighting actions since that meeting and further points were shared by the TAC.

• Communication Platform Transition: TAC discussed the transition from using Teams to a LinkedIn group for communications, with a plan to move to a SharePoint solution for more secure and effective collaboration with external stakeholders.





- Telecoms Sector Engagement: A meeting is scheduled with telecom providers to discuss relevant insights, and TAC recommended keeping the action, anticipating further developments.
- Engineering Advisory Council Status: The Engineering Advisory Council action was discussed, TAC agreed to close this action for now, acknowledging that it may be revisited in the future
- Collaborative Data Initiatives: A paper regarding a data initiative between Ofgem, DESNZ, and NESO is pending permission for wider sharing, and the NESO team are collaborating on common data models to avoid duplication and improve efficiency.

#### 4. Digital Strategy

The updated roadmap for the Digital Strategy and Action Plan Roadmap was presented, recapping details of Digital Charter development shared with the TAC subgroup, to prompt a broader discussion around industry alignment & engagement.

- Al Integration and Trust: The importance of building trust in Al systems was highlighted to TAC, including ensuring human oversight, and tracking Al initiatives across the business.
- Broader points included leveraging Al for operational improvements, such as solar generation forecasting, and the need to convince control room staff of Al's reliability.
- Data Engineering and Quality Issues: It was explained that operational data is generally well systemised but planning & market data can still exist in spreadsheets with varying quality.
- TAC discussions highlighted how this disparity creates challenges for AI adoption and requires significant effort to standardise and engineer data pipelines.
- Industry Alignment and Iterative Improvement: Participants discussed the need for ongoing alignment across the industry with feedback loops & iterative updates to strategies
- The group acknowledged the difficulty in predicting future needs and emphasised the importance of flexibility & adaptability in both strategy and implementation.
- Sector Digitalisation and Cultural Barriers: It was noted that the energy sector is inconsistent in digital maturity, with some organisations being digitally advanced while others still rely on outdated processes.
- Discussions with TAC highlighted the need for a cultural shift to embrace digital transformation and AI, identifying this as a fundamental challenge facing the whole industry.

#### 5. NESO 1 and 2-year Business Plan

The approach to the Business Plan creation in context with Digital Charter / DSAP and NESO Corporate Strategy was shared, followed by a deeper dive into Performance Objectives.

- Strategy and Charter Alignment: a process was described to TAC whereby the corporate strategy cascades down to directorate and role-based charters, ensuring alignment between top-down objectives and bottom-up input.
- Workshops are being held to gather input from various organisational levels, with the aim of integrating these perspectives into actionable charters.
- **Iterative and Flexible Planning:** TAC was advised that the charters are living documents, designed to be updated as new information and needs arise.
- The move towards DevOps and strong data engineering foundations is intended to provide the flexibility needed to adapt to changing market and operational conditions.

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- **Performance Objectives Development:** Eight performance objectives were outlined, covering areas such as operating an intelligent real-time grid, building a digitally connected energy system, and driving whole system resilience. These objectives are being used to structure the business plan and guide digital investments.
- Cross-Directorate and Market Engagement: TAC discussed the importance of considering cross-cutting roles and market participants in strategy development, ensuring that the impact on external stakeholders is understood and implementation is coordinated across different parts of the NESO organisation.

#### 6. Day 2 Change Journey

An update was provided regarding the ongoing activities required to separate NESO from National Grid. detailing the migration of IT, HR, finance, and procurement systems, and the adoption of a structured change management approach.

- **Separation Programme Overview:** the two-year journey to separate enabling functions from National Grid, including technology, HR, finance, and procurement was outlined to TAC.
- Key milestones include the migration to Azure, rollout of new devices, the implementation of new productivity and security tools. TAC noted the sheer scale and pace of change facing NESO, in addition to the separation programme activities.
- Change Management Approach: TAC was advised the change programme uses the ADKAR framework to manage awareness, desire, knowledge, ability, and reinforcement among staff.
- The approach is tailored to the intensity and impact of each change, with special attention to critical user groups and external stakeholders.
- **Lessons from M365 Migration:** The migration to M365 revealed the complexity of user workflows and the need for responsive support and training.
- Key learning points include anticipating unknown scenarios and emphasising the importance of executive sponsorship and early engagement with end users.
- Balancing Change and Business Continuity: TAC discussed the challenge of implementing major system changes alongside ongoing business operations
- TAC discussions highlighted the need for aggressive issue resolution and continuous feedback to minimise disruption and maintain productivity.

#### 7. Innovation Showcase

A summary of innovation developments, partnerships and engagements, outlining the balance between types of activities, growing focus on transformational projects, AI-drive capabilities and efforts to appropriately engagement consumers in flexibility and demand response initiatives.

- **Innovation Portfolio Structure**: TAC reviewed the innovation team portfolio, spanning early-stage R&D to near-commercialisation projects, with a focus on energy transition, whole systems, and consumer vulnerability.
- Projects are sourced from both internal and external stakeholders, with a rigorous approval and review process.

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- Al Control Room Initiatives: Major Al projects include the development of adaptive models for control room decision-making, dynamic reserve setting tools, and the integration of market and operational data to optimise system performance.
- Google has been engaged to support algorithm development for these initiatives.
- Consumer Engagement and Flexibility: Projects such as Crowdflex and Reveal aim to better understand and incentivise consumer participation in demand response and flexibility services.
- TAC was advised how NESO is working to segment consumers and test different engagement strategies, recognising the importance of consumer behaviour in system efficiency. TAC discussed at length the practical difficulties around consumer engagement.
- Cross-Vector and Future Asset Planning: Discussions included the need to consider cross-vector integration (e.g., electricity and gas), the impact of future asset upgrades (such as carbon capture), and the importance of forward guidance to ensure investments align with future system needs.

#### 8. Open Balancing Platform

Updates on Open Balancing Platform (OBP), including new services, technical milestones

- OBP Technical Progress: TAC was updated on the successful implementation of non-BM quick reserve, bulk dispatch capabilities, and ongoing work to replace the short-term operating reserve with slow reserve.
- The OBP now supports dispatching units across the Internet, marking a significant technical achievement.

#### 9. Subgroups Update

Updates on the digital and data strategy subgroup and the control room of the future subgroup were provided. The digital and data strategy subgroup discussed the development of digital charters. The control room of the future subgroup focused on the integration of planning approaches.

- Feedback outlined that the control room of the future subgroup continues to meet quarterly, providing feedback on the digital and data strategy, AI roadmap and the integration of bottomup and top-down planning approaches.
- Digital and Data Strategy next meeting is 10<sup>th</sup> October 2025.
- Next Control Room of the future TBC.

#### 10. Next meeting

Confirmation was given for the December virtual meeting. Details will be shared closer to the meeting.

5<sup>th</sup> December 2025

#### 11. AOB

- Sector Digitalisation Plan Engagement: TAC members were encouraged to read and engage with the Sector Digitalisation Plan and the Clean Flexibility Roadmap, as these documents are closely related and contain important statements and actions for the industry.
- The Sector Digitalisation Plan was published 1st September on the NESO website: Sector Digitalisation Plan | National Energy System Operator
- The Clean Flexibility Roadmap was published in July 2025.
  Clean flexibility roadmap GOV.UK





# **Action Item Log**

ID	Description	Owner	Due	Status	Comments
A02	Investigate whether teams can be used as an offline communication method with TAC members.	<del>JS</del>	07/06/2024	Complete	After NESO teams migration
A06	Work with SP and FD to organise a session with another sector.	Chair	06/09/2024	In progress	Pending Telecoms paper response
A11-	Draft 2 pages on what the ESO would like to discuss with Telecoms Organisation.	SR/ JS/ CS-	01/07/2024	Complete	
A13-	Respond with any feedback on the Flexibility files distributed with the TAC-16 minutes.	All	<del>07/03/2025</del>	Complete	
A15-	Feedback on the AI implementation on Digital Code Management (DCM) on the NESO website.	All-	<del>07/03/2025</del>	Complete	
A16-	Discuss updates to the TOR.	<del>SR /</del> <del>Chair</del>	<del>07/03/2025</del>	Complete	
A17	Come back to TAC with details on the Engineering Advisory Council.	<del>SR</del>	06/06/2025	Complete	SR talking to JL
A18-	Share any views on the TOR or membership of the TAC	All	06/06/2025	Complete	Update approved and agreed
A19-	Feedback on the Sector Digitalisation Plan	All	<del>06/06/2025</del>	Complete	
A20-	Continue the conversation on skip rates outside of the TAC meeting.	<del>BL/</del> SR-	<del>10/03/2025</del>	Complete	
A21	Review Control Room of the future subgroup.	<del>JS</del> -	06/06/2025	Complete	JS to return with recommendation
A22	Confirm location for September meeting.	<del>CD</del> -	06/06/2025	Complete	
A23-	Share suggestions for future agenda items.	All-	06/06/2025	Complete	
A24-	Share expected date for delivery of the LCP Delta Phase-3 work on calculating the cost of skip rates.	<del>BL</del>	06/06/2025	Complete	
A25	Check if there is anything shareable between NESO and DESNZ head of data regarding the volume of data initiatives and concerns about duplication of effort	SR	05/09/2025	In Progress	Update to be provided at next meeting





A26	Send out questionnaire on renewing membership including the refreshed TOR	<del>CS</del>	<del>05/09/2025</del>	Complete	
A27	Setup a discussion on DNO's lack of visibility on voltage information and acting on 'what if' scenarios	JS	05/09/2025	In Progress	Update to be provided at next meeting
A28	Confirm viability and potential implementation timescales for secure SharePoint based Extranet for TAC usage.	JS	05/12/2025	New	JS to investigate and confirm viability.
A29	Future TAC agenda item to include a Data Engineering & AI topic, covering culture/tech stack/data quality impact on AI adoption.	SR/EB	05/12/2025	New	CT / SR to lead on the content of this item.