

Welcome to our Flexibility Services May news update

Spring means longer days and the publication of a raft of new documents to update you on our recent progress and our plans for the future. That all makes for a bumper issue along with news of our progress on accelerating new connections, and an introduction to Alex Munnery our newest addition to Northern Powergrid's System Flexibility team.

We aim to provide you with information that's interesting and relevant, so we're interested in your feedback and what you'd like to hear more about. Contact us at <u>flexibility@northernpowergrid.com</u>

Tender update

We are now in the bidding window for the Spring tender. Like the Spring tender, the forthcoming Summer tender will be seeking the Scheduled Utilisation product to defer network reinforcement at both primary and distribution substations across our region. We will be contracting using the new version 3 of industry standard contract for flexibility services. More news on this, on our flexibility requirements and key dates will follow shortly.

New publications

Distribution Flexibility Services Report 2023/24 and datasheets on flexibility services tendered and procured and on our engagement activities in the past year. Highlights of the year include £1.2m of reinforcement deferred through the use of flexibility services, 24 sites offered to the market, use of flexibility services to address constraints in both our primary and secondary networks, and an expansion in the engagement and recruitment of flexibility services providers (FSPs) who are qualified to participate in tenders.



Distribution Flexibility Services Procurement Statement 2024/25 on our procurement and engagement plans for the year ahead. We will run three tenders in the year and provide updates on the actual timings as the Summer and Autumn timings in the statement are indicative.

The Network Development Plan 2024 suite of documents includes a Network Development Report (NDR) which outlines our plans for developing a network that meets the needs of our region as it moves to net zero. The NDR provides information on future network developments in accordance with our 'flexibility first' approach, as well as opportunities for new connections. The purpose of the NDR is to transparently communicate our investment decisions and future network intervention plans to stakeholders, and to highlight areas where Flexibility Services may be required. The NDR outlines requirements for loadrelated, condition, fault level, and connectiondriven developments for the next ten years. It covers the whole Northern Powergrid network down to the primary substation level.



Our Open Data Portal provides a wealth of important data and information about our electricity distribution network, including for example the data from the NDR about the upcoming requirement for flexibility services and the Distribution Flexibility Services Report datasheets. DSO Implementation Plan 2024/25. Developed with input from stakeholders and network users, the plan is framed around the critical Distribution System Operation (DSO) roles of planning and network development, network operation and market development. For developing the market for flexibility services, our three priorities are

- Delivering a methodology for short-term forecasting of the Primary network to inform the dispatch of flexibility services.
- Finding solutions to 'stackability' of flexibility products to allow FSPs to operate DSO and ESO flexibility products simultaneously.
- Delivering our flagship Community DSO project, which aims to develop new frameworks that will allow local communities and stakeholders to deploy Smart Local Energy Systems.

DSO Review Panel Annual Report 2023/24



The Northern Powergrid Distribution System Operation (DSO) Review Panel provides independent scrutiny and challenge of the decision-making process and the associated outcomes to ensure that decisions on the selection between flexible and conventional asset-based solutions are in line with published policies; and that the selections are just and inclusive so that no customers are left behind.

Using flexible connections to accelerate connections

We are working collaboratively with our customers and the industry to enable generation projects to get connected to our network – particularly those that have been held up by transmission congestion.

Flexible connections are a key tool to enable this: by offering flexible connections under NGESO's technical limits scheme we have provided 33 large projects with the opportunity to progress, reducing their lead time by over 6 years on average. We already have over 500MW of flexible connections operating on our network and will continue to use this innovative approach to benefit our customers.

In addition, we have launched an important new tool that will enable customers to make more informed decisions about how and where to connect. Our, major projects pipeline look-up tool provides transparency of which projects are connecting at each of Northern Powergrid's major interfaces with the transmission system - known as grid supply points or GSPs - helping customers to understand where their projects are in the queue, and to identify the areas where they are most likely to secure a quicker and more cost-effective connection.

As customers build this intelligence into their decision making, it will mean that capacity is freed up as less viable projects are removed from the connections pipeline.

A deep dive on flexibility products

We recently held a webinar on the standard Flexibility Products in conjunction with industry body the Electricity Networks Association (ENA), and with Piclo.

The webinar covered the detail on the industry aligned flexibility products developed by the ENA, including the Scheduled Utilisation product that we are using in our Spring and Summer tenders. There was also a demonstration of the Piclo platform showing the customer journey of Scheduled Utilisation and how this works in practice. Watch the webinar recording here.

Catch up on other events

including Accelerating Major Connections, our latest Network Development Plan and Distribution Future Energy Scenarios (DFES) and more.

Meet the team – Alex Munnery



Alex has been involved in the energy industry for 10 years, 5 years of which were in energy supply and then more recently, 5 years within electric vehicle charging.

During his time in energy supply, Alex's focus was industrial and commercial energy supply but with some exposure to the domestic market as well. In this period, he mainly worked in a business development capacity but also within commercial roles managing non-commodity electricity pricing. When involved in electric vehicle charging, Alex led business development activity for charging infrastructure projects including land rights agreements and new grid connections for development of public charging hubs.

Alex has joined Northern Powergrid as a Commercial Manager. In his role, he is responsible for increasing engagement with Flexibility Service Providers and driving growth in the liquidity and cost-effectiveness of our local flexibility market through new products and procurement processes. Alongside this, Alex is representing Northern Powergrid across several of the working groups in the Energy Networks Association's "Open Networks" project to support the development and implementation of sector-wide solutions to help develop the wider GB flexibility market.

Innovation project 'Artificial Forecasting'

One of the priorities set out in our DSO Implementation plan is to deliver a methodology for short-term forecasting of the Primary network to inform the dispatch of flexibility services. This is a key enabler for the introduction of nearer to real time procurement of flexibility services.

We are developing this through an innovation project that uses AI: the 'Artificial Forecasting' project. Our partners in this Strategic Innovation Fund (SIF) project are Faculty AI, a provider of AI solutions, and two flexibility service providers (FSPs) Oaktree Power and EV.Energy.

We have completed the Alpha phase, which is developing network operators' capabilities to give more detailed and robust flexibility service requests. We have developed and assessed the quality of highly automated demand forecasting techniques that provide up to day ahead magnitude and time of peak information that will enable FSPs to manage their assets against increasingly targeted information.

We are applying for funding to continue this project into the Beta phase which will implement the forecasting method on live systems that will be able to provide forecasts to Northern Powergrid, market platforms and Flexibility Service Providers.

Project datasets are on our Open Data Portal and further information is on the Smarter Network Portal.

Contact us

We're very happy to chat with new or existing flexibility service providers. If you have any questions or would like to set up a 1-2-1 meeting with one of our team, email us at flexibility@northernpowergrid.com.

Contact support@picloflex.com for help with setting up your account or using Piclo.