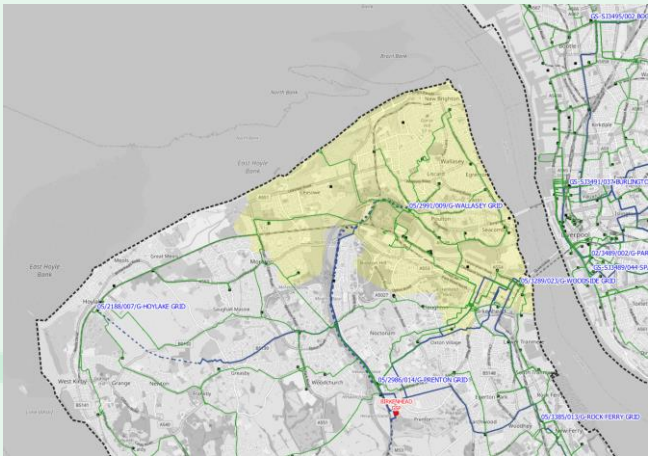


Woodside Grid 33kV fault level mitigation

Reinforce without flexibility



The Wallasey-Woodside 33kV grid group is located within the Birkenhead 132kV grid supply point (GSP) group and supplies the north-eastern corner of the Wirral Peninsula including areas of Birkenhead, Wallasey, and Woodside. This group supplies ca. 43,000 customers. Woodside operates with a split point with the Prenton-Rock Ferry 33kV group, run normally open to reduce the fault levels.

Constraint

FAULT LEVEL

At Woodside Grid substation the make duty fault level is in excess of the rating, and break duty is at 100% of the rating of the existing legacy switchgear on the 33kV side that is interconnected to Wallasey. The site is operationally managed requiring switching actions to temporarily reduce the fault levels prior to certain switching actions on the Woodside switchgear. The high fault levels at this site present a barrier to low-cost timely connection of generation.

Decision

Reinforce without flexibility

Replace existing 9-panel 33kV switchboard with higher rated switchgear and carry out associated remote end protection modifications.

Justification for decision

Due to the predicted increase in fault levels, operational management is not an enduring solution. Procurement of flexibility would not reduce fault level.

Flexibility product

N/A

Constraint season(s)

Year round

Flexibility guide price

N/A

Reinforcement timescale

2025/26



Flexibility position at March 2024	2023/24	2024/25	2025/26	2026/27	2027/28
Risk duration (hours)					
Peak flexibility required (MW)					
Flexibility procured (MW)					
Flexible MW capacity met (%)					

Flexibility Tendering

Closed

Flexibility would not relieve fault level constraints.

Technical Appraisal

More detailed technical information on the nature of the constraint, network impacts, solutions considered and selected intervention are available in this scheme's [Engineering Justification Paper](#)

To ensure that our plans and publications cover the needs of our stakeholders, customers, and the communities we serve, we welcome ongoing feedback.

Feedback can be emailed to: systemdesignteam@spenergynetworks.co.uk