

Network Rail reaches major milestone of £116m reliability-boosting resignalling scheme

September 4, 2023



Network Rail has successfully switched on 116 new state of the art digital signals on the railway across parts of south west London and Berkshire, as part of the four-year resignalling programme to improve reliability.

The railway reopened as planned earlier this morning following a 14-day, three-part closure between Barnes and Virginia Water, Windsor & Eton Riverside and Hounslow, to allow Network Rail to switch on the newly installed signals.

Since Saturday 19 August, Network Rail's team of engineers has worked around the clock to commission the 116 new signals and finish upgrading seven level crossings during this multistage closure.

Following the completion of this work, passengers will benefit from more reliable journeys and fewer delays on the Windsor Lines, which are a key route for commuters in and out of London.

The previous signalling system and track circuits – which tell signallers where trains are on the network – were controlled by the Feltham Area Signalling Centre and dated back to 1974 so needed upgrading as



they had become less reliable and harder to maintain.

Control of this part of the railway has now moved to the Basingstoke Rail Operating Centre, a purpose-built rail hub that is shared with South Western Railway (SWR).

A four-year upgrade to improve reliability

Over the past four years, as part of the wider £116m Feltham and Wokingham re-signalling programme, Network Rail's engineers have installed 116 digital signals, 11km of new cabling housed in 14km of refurbished cable ducts, 27 new under-track cable routes to support the new technology and upgraded seven level crossings.

The Feltham and Wokingham re-signalling programme will be concluded in early 2024 with the completion of upgrades to key signalling equipment controlled by the Feltham Area Signalling Centre and Wokingham Signal Box, which jointly cover 80 miles of railway and 500 separate pieces of signalling equipment. A total of 13 level crossings will also have been renewed or upgraded, all with the aim of improving train performance and ensuring passengers enjoy more reliable journeys.

Mark Killick, Network Rail's Wessex route director, said: "I'm pleased to say we've now reached a significant milestone of our wider Feltham and Wokingham resignalling programme with the switching on of 116 new signals on the Windsor Lines.

"These new digital signals replace old equipment that had become unreliable and harder to maintain and will improve the reliability of this stretch of railway and in turn help reduce delays for our customers.

"I'd like to thank customers and local residents for their patience while we've carried out this work."

Peter Williams, South Western Railway's customer and commercial director, said: "This milestone in the Feltham to Wokingham resignalling programme is another step towards improving reliability and reducing delays for years to come. With the project entering the commission phase over the coming months, there will still be a need to close sections of the railway for further works, but the new signalling system will deliver a real boost to performance once complete.

"I realise these works have been disruptive, with rail replacement buses in operation and journeys taking longer. I'd like to thank customers and lineside neighbours for their patience and understanding while these essential improvements take place."

Scott Kelley, signalling managing director for Atkins, said: "As lead contractor, we are delighted to have successfully delivered the latest phases of the Feltham to Wokingham re-signalling programme, continuing our long-standing partnership with Network Rail.

"Atkins led a multi-disciplinary team to deliver this project, which saw a large deployment of innovative and digital solutions to achieve significant improvements in reliability, availability and safety of both the railway signalling system and level crossings in the area. This will benefit passengers, neighbours, and the railway."



Photo credit: Network Rail