

# Thames Water and Xylem set new standard for pump upgrades at scale.

A Xylem and Thames Water partnership represents a shift in how water companies can manage inherited infrastructure.

## The background

Thames Water set out to upgrade 130 small sewage pumping stations (SSPS) as part of a comprehensive programme to bring the assets into compliance. This initiative followed 2016 legislation that transferred ownership of previously private wastewater pumping stations to local water companies. This meant inheriting thousands of assets across its region, many of which had not been adequately maintained. To ensure the newly acquired SSPS met stringent regulatory and operational standards, Thames Water launched a comprehensive upgrade programme. The early phases focused on grouped batches of 20-30 stations, which proved effective but revealed limitations for scaling to larger volumes.

As Thames Water prepared for future upgrade phases, several challenges emerged including:

- **Scaling up delivery** - Moving from small-batch installations (20–30 stations) to high-volume delivery, targeting 130 stations within a 32-week timeline.
- **Asset location** - Many of the SSPS were in hard-to-reach locations, such as high-traffic areas, gardens and even underground car parks.
- **Approval and administration** - Lengthy site approval processes and complex administrative requirements, which had caused delays in earlier phases, highlighted the need to streamline actions.
- **Accelerating schedule** - Delivering high-quality refurbishments on an accelerated schedule without compromising safety or standards.
- **Resource availability** - Ensuring skilled teams, equipment and materials were available simultaneously for multiple sites.

## The solution

Recognising a new delivery approach was needed, Thames Water redefined its project requirements. This meant targeting an average price per station, drawn from historical cost data, to maintain cost efficiency at scale. Xylem was selected as the delivery partner of the new programme - SSPS Phase Five Refurbishments.



Thames Water SSPS small pumping station including flygt pumps, guide rails and float switches.

## Client

Thames Water

## Xylem's role

Xylem partnered with Thames Water to deliver the Phase Five SSPS refurbishment programme, providing pumps, panels, pipework, and access covers across 130 sites.

The company's bid introduced a new agile delivery strategy to optimise resources and timelines to radically improve project throughput. The strategy focused on delivering high-quality, cost effective refurbishment of approximately 130 pump stations - including the installation of pumps, panels, pipework and access cover - while maintaining compliance with all technical, safety and operational standards.

An accelerated delivery programme of four sites per week over 32 weeks was agreed. All sites were upgraded with leading Xylem Flygt products. This provided long-lasting reliability and efficiency, which was particularly valuable for sites that had not been upgraded in 20–30 years.

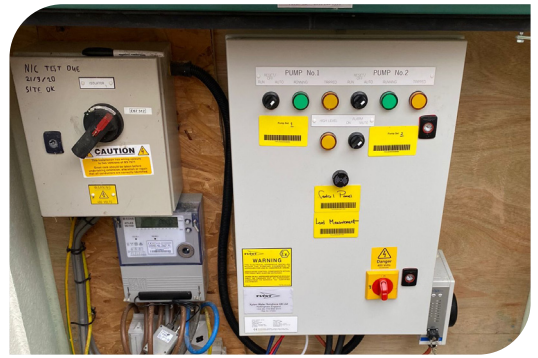
### The results

Xylem's delivery team, in partnership with Thames Water, met – in some cases exceeded - timeline goals, completing the entire programme within the 32-week schedule. The project was delivered on budget by leveraging resource-efficient methodologies and streamlining administrative processes compared to previous phases. This approach resulted in the high quality refurbishment of 130 pump stations that met rigorous technical, safety and operational standards.

Given the often challenging locations of SSPS sites, securing individual landowner cooperation required a sensitive approach. Measures such as installing new fencing, planting shrubs and adding park benches helped ensure landowners and householders were satisfied and engaged throughout. Ultimately this initiative has strengthened Thames Water's operational resilience, reduced long-term costs and positioned it as a leader in water infrastructure management. It sets a new benchmark for agile project delivery across the UK water sector and represents a shift in how water companies can manage inherited infrastructure.

**“This initiative marked a significant step forward for Thames Water, setting a new standard for upgrading existing SSPS sites to safe and serviceable conditions. The goal was ambitious: modernise 134 sites at a fixed average cost, with a delivery pace of four sites per week.”**

Alan Kemp, Project Engineer, Thames Water



Xylem control panel installed to monitor pumping stations.

**The project was shortlisted in the Alliance or Partnership of the Year category at the 2025 Water Industry Awards.**

