

CASE STUDY: WHITEHALL, LONDON

## RELIABILITY IN ROBOTICS: EMERGENCY REPAIR WORK

### PROJECT DETAIL

Cadent Gas were recently undertaking emergency gas work in close proximity to Trafalgar Square – one of London’s top tourist attractions with up to 15 million annual visitors. Seeing an opportunity to use technology to minimise disruption, Cadent collaborated with ULC Pipeline Robotics, Transport for London and the local council to deploy CISBOT to conduct key segments of the emergency repair work.

ULC Robotics stepped in at short notice to support the repair work, successfully remediating 359 meters of Cadent’s 30” low pressure network and sealing 105 joints using CISBOT technology.

CISBOT provides a reliable solution to support gas networks during times of emergency by sealing joints live within the main preventing the need to interrupt local businesses and customers gas supplies. Using CISBOT to seal joints extends the life of our clients’ assets by 50 years.

The need for multiple excavations is dramatically reduced when using CISBOT, travelling up to 460m from a single excavation. During conventional emergency remediation, gas networks would typically face challenges including:

- Labour and equipment resourcing due to work being reactive through reported gas leaks
- Time-consuming and sensitive works, particularly in a heavily populated area resulting in significant disruption to road
- Costly work due to traffic management fees, and reinstatement and labour costs

**Cadent**  
Your Gas Network

TOTAL LENGTH REMEDIATED:

359m

PIPE DIAMETER:

30”

TOTAL JOINTS SEALED:

105

PROJECT DURATION:

6 Weeks

**“It’s really important to us that we build trust with our local stakeholders and Local Authorities. By using CISBOT in Whitehall, we have been able to keep disruption to commuters and pedestrians to a minimum. The local council and TfL have really bought in to the project, and have been very complimentary about the benefits of CISBOT to local residents and businesses.”**

**Richard Sansom, Head of Customer Operations, Cadent**

With Cadent's emergency site situated in a high-profile area in London, CISBOT assisted in:

- Avoiding future disruption to stakeholders and the public by proactively remediating the pipeline at the time of exposure
- Reducing carbon emissions through proactive remediation of the pipeline, minimised excavations and the use of an eco-cabin
- Providing significant cost-savings as CISBOT decreased the number of excavations and the time needed to remediate a section of pipeline

When ULC were called by Cadent to support, the operational team quickly deployed CISBOT and remediated the gas mains within 6 weeks with our operatives working in a custom-built eco-cabin, minimising the noise impact for local residents and businesses. Throughout the duration of the project, traffic continued flowing around Nelson's Column while CISBOT worked quietly below the ground.

**Ready to integrate CISBOT into your reactive work strategy?**

Contact ULC Pipeline Robotics' UK team directly at **+44 (0)20 3617 4586** or email us at [ukenquiries@ulcrobotics.com](mailto:ukenquiries@ulcrobotics.com)



**"The historic infrastructure has served the city for well over 120 years and it's great to be able to deploy CISBOT to extend the life of this Victorian infrastructure to allow it to do so safely for many more years to come. Working with local highway authorities to carry out these works safely, whilst London's roads are quieter due to the impacts of COVID 19, maximises the benefits of our technology and further reduces the impact of these essential works on the general public."**

**Sam Wilson, UK Operations Director, ULC Robotics**