



Case Study 12

Award in Understanding Wastewater Treatment – UK Water Company

Introduction

The Water Industry is in one of the most demanding periods in its history with present and future increasing demands and performance expectations. Water companies' wastewater functions need to meet customers' expectations, increased regulatory scrutiny and pressure on resources whilst ensuring the protection of the environment and demonstrating resilience to the impact of any risks arising from asset operations, climate change and third party thus reducing the likelihood of loss of service, incidents or failures.

The challenge was clear - maintain high quality wastewater treatment performance today while preparing for the future defined by stricter standards, climate uncertainty, and rapid technological change.

Meeting these expectations required more than new equipment or processes – it demanded a workforce proven to be equipped with the right skills, knowledge, and confidence to consistently deliver excellent results.

The Water Company demonstrated a proactive approach, working with ourselves to support existing staff and new starters with targeted learning interventions as a key part of a transformational development programme focused around the Level 3 Award in Understanding Wastewater Treatment which forms a key point in their strategy to ensure the competency of their operational and support teams.



What was the aim of the Programme?

The key focus of the programme:

1. Reinforcing present operational standards and future demands.
2. Expanding awareness of the types of processes and the steps within.
3. Highlighting the importance of operational procedures enabling application with confidence.
4. Building team working and effective decision making.
5. Opportunity to increase awareness by discussion.

The whole learning and development journey to be assessed with coordinated monitoring from inception so identifying any training needs; performance improvement and reduction in unplanned events and improved image.

This can be aligned to staff development via a progressive range of learning interventions (with recognised qualifications) linked to a competence framework with recognised standards for specific roles and levels. The course is designed to be relevant to all aspects of the wastewater treatment for the company.

Who was the target audience?

The target audience covered a range of roles from front line operational staff to various managerial, process scientist, maintenance technicians, field personnel and project and support roles.



What did the programme involve?

The course aims and content focus and delivery were discussed and agreed with the company's Project Lead Team. The methodology of delivery was modelled to meet and enable the target audience to achieve the objectives in a timely manner. The course, The ProQual Level 3 Award in Understanding Wastewater Treatment is delivered over 5 days with a blend of taught material, interactive team scenarios with visual impact, process calculations and reflective sessions. This was embellished with reference and discussion to any experiences and operational events experienced. The scenarios allowed the learners to demonstrate and realise going forward the level of knowledge present, shared and acquired together with reflective discussion.

This prepared the learners to individually complete a workbook with a range of explanations and activities, illustrations, and reference to any health and safety considerations in response to an approved set of questions.

The course involves description of the wastewater treatment process from arrival to the inlet and the subsequent preliminary, primary, secondary and tertiary treatment stages of the sewage flow plus the treatment of the wastewater sludge arising. The associated impact and roles of the regulators, asset care and design, monitoring and control with appreciation of the adaptation to climate change.



What were the outcomes?

To ensure continuous quality assurance, each cohort is surveyed using a structured course evaluation. A key performance indicator asks learners to rate their overall experience on a 1–4 scale, where 4 represents “excellent.”

Since the start of the programme, the average rating is 3.68 out of 4 (92%), demonstrating consistently high learner satisfaction and strong delivery performance across all cohorts.

This KPI provides a reliable, quantifiable measure of learner experience and confirms that the programme is meeting – and in many cases exceeding – participant expectations.

Knowledge Assessment Tool

With more than 200 learners having now completed the programme and undertaken both the pre and post training Knowledge Assessment Tool (KAT). This assessment was co-designed with the client to ensure it accurately measures knowledge and understanding across all key operational areas.

The results show:

- Over 20% average improvement in knowledge and understanding across the learner population.
- Consistent improvement across all categories, demonstrating balanced learning rather than isolated gains in specific topics.
- Marked individual improvements, with some learners showing significant progression from baseline.
- Greater consistency in the overall knowledge base, reducing variability between learners and strengthening team capability.
- Validation and strengthening of existing skills for high performing learners.
- Significant uplift for those with initial gaps, enabling them to meet expectations for their operational roles.

The Level 3 Award in Understanding Wastewater Treatment – a key part is the attainment of a recognised qualification to reward, motivate and recognise the personal achievement.

In summary - These outcomes demonstrates the investment and support by the company of their employees with a programme that is not only increasing individual competence and confidence, but also raising the collective capability of the workforce.

The data evidences a clear, measurable impact on operational readiness and supports the organisation’s wider performance and compliance objectives.



KAT[®]

Knowledge Assessment Tool

Learning & Development Associates

Advancing the Competence of the Water Industry

For more information on our qualifications

www.learninganddevelopment.associates

Tel: +44(0)7931 136966

Learning & Development Associates Ltd,
37 Burnley Road East, Rossendale
Lancashire BB4 9AG
email: enquiries@learninganddevelopment.associates

