# 2024 Year in Infrastructure and Going Digital Awards





**User name:** Amey

Project name: Core Valley Lines (CVL) transformation - South Wales Metro, UK

Location: Cardiff, Wales, United Kingdom

## **Background:**

- The GBP 1 billion Core Valley Lines (CVL) Transformation project will add new track loops, increase line speed, and update signaling systems and stations in South Wales.
- The project will also incorporate new hybrid battery-electric trains, greatly reducing carbon emissions.
- Amey was tasked with providing an initial design of the project, constructing the overhead line assets and a new train depot, and ensuring safe operation and maintenance.

### **Challenges:**

- Needed to securely and efficiently manage data across four main contractors and numerous subcontractors.
- The complexity of the project was heightened by the pandemic, Brexit, and the geology of historic mining regions.
- Initial use of a simple web-based connected data environment did not meet the project's needs.

#### Solution:

- Migrated to ProjectWise, enabling collaborative work on designs, reports, surveys, and other project data.
- ProjectWise also granted the capability to configure multistage workflows and management of user lists and permissions.
- The team developed over 30 different, ISO 19650-compliant, automated workflows for improved collaboration and management of assets.

### **Outcomes:**

- 1,500 users across 40 organizations shared data.
- The project improved line accessibility, providing four trains per hour on most of the network.

**Quote:** "Bentley's software and support coupled with our domain knowledge of infrastructure, the environment and social value has enabled us to bring this together and use digital engineering processes from start to finish to manage and deliver the programme in record time, despite facing global challenges such as Covid-19." – Alex Gilbert, Managing Director, Amey

**Image caption/courtesy 1:** ProjectWise enabled collaborative work on designs, reports, surveys, and other project data. *Image courtesy of Amey*.

**Image caption/courtesy 2:** With ProjectWise, they configured multistage workflows and managed user lists and permissions. *Image courtesy of Amey*.

**Image caption/courtesy 3:** The team developed over 30 different, ISO 19650-compliant, automated workflows for improved collaboration and management of assets. *Image courtesy of Amey*.

For more information, please contact Bentley PR at PR@news.bentley.com.