# Virginia Pipeline Scheme

(reference site only, no longer operated by TRILITY)



## TRILITY operated and maintained the Virginia Pipeline Scheme which provided sustainable water infrastructure



The Virginia Pipeline Scheme (VPS) in South Australia provides 20 GL per year of recycled water to more than 360 customers. TRILITY operated the 142km recycled water pipeline under a contract with SA Water.



TRILITY employees were equipped with smartphones and iPads which provided an ideal platform for remote access to the Virginia Scheme's virtual control room 24/7 from any location in the world.

The Virginia Pipeline Scheme, through Water Reticulation Systems Virginia (WRSV), incorporates a main pump station with five 250 kW pumps, a booster station with two 110 kW installed pumps for the Angle Vale extension and three 37 kW pumps to re-boost the network.

A web-based system is used to manage customer demands, their recycled water use and model a wide range of scenarios based on historical trends. This ensures customers continuously receive agreed levels of service.

TRILITY employees used a web-based virtual control room to access online PLC control systems and maintenance program which which was used to oversee the management of the pipeline distribution network, pumping stations and booster pumps.

Operators were equipped with smartphones and iPads which provide an ideal platform for remote access to the virtual control room 24/7 from any location in the world.

This enabled TRILITY to monitor the network performance at every hour in real time and control the pipeline network to manage volumes and recycled water quality. Employees also accessed third party datasets such as groundwater or surface water depth and quality.



### Who

SA Water is a water utility wholly owned by the South Australian Government. It provides water and wastewater services to approximately 1.6 million people across South Australia and has more than 1,400 employees.

#### What

Recycled water from the Bolivar Wastewater Treatment Plant (WWTP) is supplied to more than 360 customers in the Virginia region, South Australia. TRILITY operates and maintains the network which provides these customers with the recycled water and ensures that their requirements in terms of quality and quantity are met.

#### Where

Northern Adelaide Plains.

### Why

The Virginia Pipeline Scheme extends a rich tradition by supplying safe, high quality, water for crop and pasture recycled irrigation in the Virginia region.

#### Awards

**2011** Australian Water Association, Program Innovation, Award Finalist

**2010** Water Reuse Association Awards, International Project, Category Finalist

**2010** United Nations Association of Australia, World Environment Day, Awards Finalist

#### Snapshot

Client	SA Water
Type of Contract	Operate and Maintain (O&M)
Facilities	142km of Acrylonitrile butadiene styrene and polyvinyl chloride pipeline networks and 2 pumping stations
Technology	Dissolved air flotation and filtration plant (SA Water operated)
Design Capacity	20GL/year of recycled water
Term	2 years concession





#### For further information

TRILITY Communications TRILITY Pty Ltd Level 10, 115 Grenfell Street Adelaide SA 5000 T: +61 8 8408 6500 E: adloffice@trility.com.au Visit us online at: www.trility.com.au

©2019 TRILITY Pty Ltd All Rights Reserved