



Wolgan Valley Resort and Spa makes perfect marriage with Grundfos pumps

The Grundfos situation

Wolgan Valley Resort & Spa, owned by Emirates Airline, is located at the southern end of the Wolgan Valley, a three hour drive 190 km west of Sydney, New South Wales.

It is one of Australia's most environmentally responsible tourist destinations and is built around a completely restored homestead. Building such a complex, which encompasses 40 freestanding luxury suites, each with its own private terrace and swimming pool, plus the restaurant, administration centre and other facilities was a major undertaking.

The luxury resort was built using today's cutting edge technology to blend seamlessly with the vastness and dramatic beauty of Australia's hinterland terrain.

But, of course, Wolgan Valley required a substantial – and reliable – water and pumping system. This was where Grundfos stepped in.

The Grundfos situation

One of Emirates Airline's engineering and construction consultants, Hansen Yuncken, specified Grundfos pumps for the job, and Grundfos dealer Kelair Pumps, of Arndell Park NSW, was the successful tenderer. Kelair worked closely with a chosen installer and Grundfos NSW.

The pumping equipment included:

Grundfos supplied

- 1,2 bed villa and staff accommodation = 40 Hydro Solo E CRE
- Manager's villa = 1 Hydro Solo
- Main building = 1 Hydro MPC E 2CRE + PT80.
- Gatehouse = 1 Hydro Solo E CRE.
- Communal staff building = 1 Hydro MPC E 2 CRE + PT80.
- Maintenance building = 1 Hydro MPC E 2 CRE + PT80.
- Stables = 1 Hydro MPC E 2 CRE + PT80
- Potable water supply booster pumps = 1 Hydro MPC EF 3 x CR64 + PT80HP.
- Non potable water supply booster pumps = 2 Hydro MPC EF 3 x CR6 + PT80HP.
- 4 x sewer pump station No 1 and 2 PUMPS, SEV.
- CIM - CIU 200 Modbus interfaces

Installation staff stayed in local accommodation, such was the remoteness of the site, and during the build, all materials were pre-ordered to meet construction dates. The ecological impact of the resort is minimised with all water being supplied via a local spring and rainwater with filtration using Grundfos pumps.

The irrigation supply comes from a grey water re-use system, again using Grundfos pumps, and the homestead's and villas' hot water is supplemented by solar panels.

The 40 guest villas and staff accommodation each have their own potable water system provided by Hydro Solo E CRE1-11, while the Manager's villa has a Hydro Solo 3-10, the homestead has a Hydro MPC E 2CRE15-5 +1 PT80, and the Gatehouse uses a Hydro Solo E CRE1-15.

In keeping with the facility's emphasis on the environment, black and grey water is collected from the resort and staff precincts and is treated through the Resort's sewage treatment plant (STP) - one of the largest private STP plants of its type. The treated water comes out as Class A and is then recycled to the resort for irrigation or sent to the north of the plant to the spray out facility and horse paddocks.

One of the most critical parts of the pumping system are the CIU/ CIM 200 Modbus interface control units, which enables the pumps' performances to be monitored and controlled centrally.

The outcome

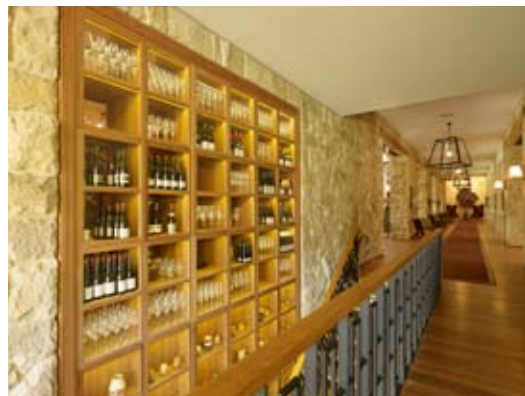
Philip Cram, the Resort's facilities manager, came on stream after the installation of the pumping equipment, and is reaping the benefits.

He says: "The ability to control the water system and pump performances centrally is a major plus for us.

"The Grundfos pumps have been installed more than 12 months and apart from the expected minor initial problems they have all operated faultlessly.

"I am very pleased with the overall system. Because of our remote location it is important to have reliable equipment, and so far Grundfos pumps have performed very well.

"The reliability of Grundfos pumps was the reason they were specified for the job. We needed a system that could be relied on to perform because our location – while not as remote as it was during construction – is nevertheless well off the beaten track. This is part of its strong appeal to our clients."



Facilities and technology in harmony with the environment.



CIU 200 Modbus interfaces enables the pumps to be monitored and controlled centrally.

Relevant product families:

- > CIM / CIU 200 Modbus interfaces
- > CRE
- > Hydro MPC
- > Hydro Solo-E