

Riversmeet – Gillingham Community Leisure Centre



Project cost
£325,176

Estimated Savings
£48,000 / 195 tonnes of CO₂e per year

Equipment / Installer
ESG - air-source heat pumps & controls, Pool ventilation improvements, Pool Sentry pool water control system, Electrical & mechanical commissioning work. Electric Centre – 157 LED Bulbs. Ecocamel – 12 aerating shower heads

Grant awarded:
£130,070.40

Estimated Annual Savings: £48k / 195 tonnes of CO₂e*

The Project

Riversmeet is a community run leisure centre in Gillingham, Dorset. The centre is managed by the Gillingham Community and Leisure Trust as a not-for-profit community asset. In 2019, Riversmeet took significant steps to reduce the energy use and costs of their leisure facility by completely redesigning their pool heating and ventilation to be much more energy efficient using a novel heat pump system. They also installed LED lights and water and energy saving aerating shower heads. Combined these measures will save the centre around 195 tonnes of CO₂e a year and reduce their electricity costs by over 50%.

Getting started

With sustainability at its core, Riversmeet had already taken steps to reduce its environmental impact prior to reaching out to Low Carbon Dorset. One of these steps included changing to salt chlorination for their pool, this is now produced on site and drastically reduces transportation costs and emissions. This new electro-chlorination technique generates no waste sludge or by-products and is a much more environmentally friendly approach. They also invested in Vegware for their café and shop which has significantly reduced their waste from single-use-plastics and its associated emissions.



*CO₂e, or carbon dioxide equivalent, is a term used to describe different greenhouse gases in a common unit. For any quantity and type of greenhouse gas, CO₂e signifies the amount of CO₂ which would have the equivalent global warming impact. And allows us to express a carbon footprint consisting of lots of different greenhouse gases as a single number.

But as a not-for-profit organisation they were keen to reduce their energy use (and costs) further, with the aim of leaving a much more environmentally friendly, sustainable community asset to be enjoyed by generations to come.

Pool heating & ventilation system

As with many leisure facilities, Riversmeet's swimming pool was the biggest drain on their energy and money. With the help of a Low Carbon Dorset grant, the centre was able to invest in a novel holistic approach to pool heating and ventilation. This approach was based on the principles of a system already installed at the Osprey Leisure Centre in Portland and involved the installation of new air-source heat pumps and controls, improvements to the pool ventilation system, and a pool sentry water control system. This new approach to energy management will lead to huge carbon and cost savings for Riversmeet.

LEDs

The pool was not Riversmeet's only focus, they also recognised that a large amount of energy was being used to light the centre. By replacing 157 old lights with LEDs, which use up to 90% less energy and last up to 20x longer, they will save around 5 tonnes of CO₂e.

Aerating Shower Heads

They also installed aerating shower heads which work by injecting air directly into the water stream so less water is needed to experience a powerful shower - which also means less water to heat. This cheap measure (only £35 a shower head) will save an estimated 3.5 million litres of water and 25 tonnes of CO₂e a year! A simple measure which can be easily replicated.

Riversmeet is an excellent example of the level of carbon and cost savings that can be achieved when a holistic whole-building approach to energy management is taken.



'These new initiatives will be a pinnacle part of our green mission...We strive to become one of the most efficient sports facilities in the UK.'

Alan Waistell, General Manager - Riversmeet



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