



The Royal Wolverhampton Hospital NHS Foundation Trust

CEF first initiated the investment, development and operation of a combined heat and power plant for the Royal Wolverhampton Hospital in June 2011 and signed the project contract in March 2012. The new energy centre will provide low-carbon heating, hot water and electricity, saving the Trust a guaranteed 4,770 tonnes of carbon a year and reducing carbon emissions by almost 26% immediately and for the full 15 years.

The Brief

The New Cross Hospital is part of the Royal Wolverhampton Hospital NHS Foundation Trust. Facing statutory carbon reduction targets the Trust saw the CEF vehicle as the route to compliance repaid through guaranteed savings, and resolving electrical and controls backlog issues.

The Project

The Royal Wolverhampton Hospital has partnered with CEF to provide a new energy centre over a 15-year contract. The plant uses an reciprocating CHP with export potential to generate heat and power, which will, from time to time exceed the hospital's needs and generate useful income for the Trust.

Dalkia is the contractor and has accepted a 15 year savings guarantee and lifecycle commitment for the installation.

The Benefits

This energy strategy will materially lower the Trust's energy costs and carbon emissions with savings of over £14.5m and guaranteed CO₂ savings of 4,770 tonnes a year.

This will help the Trust surpass its sustainability targets. Grid electricity and gas consumption will be reduced by more than 78%, providing the Trust with increased energy resilience and with predictably priced energy over the long term.

The new energy centre will be able to provide heat and power to future NHS developments, and will support the future replacement of the Trust incinerator.

Key Facts

- The off-grid energy initiative will save the Royal Wolverhampton Hospital more than £950,000 pa, equivalent to hiring 23 new nurses a year
- The combined heat and power plant will reduce the hospital's annual carbon footprint by 3,770 tonnes, which exceeds current NHS targets
- Surplus energy will be sold and generate revenue for the Trust.