



Award-winning mechanical and electrical building services engineering consultancy, Desco, has started work on the development of a specialist accommodation project at England's largest and most environmentally friendly winery, the Rathfinny Estate.

As work on the 1200 ton winery in the South Downs moves further forward, the estate is preparing to welcome the first round of seasonal workers from September 2014, all of whom will be housed at the brand new on site accommodation. Desco has been commissioned to provide design and consultancy services for the entire Rathfinny development, alongside award-winning East Sussex based Architect Anthony Sherwin and designer Martin Swatton, with further Architectural design by Design Cubed.

Work on redeveloping the derelict 19th Century Flint Barns began this spring with a key element of the project involving the use of sustainable design techniques and innovative low carbon technologies across the whole of the 46 bed hostel-style accommodation and wider estate. Alongside this, the core design team is taking extra consideration to remain sensitive to the historical nature of the building, developing accommodation that sits within the backdrop of the natural landscape.

A host of energy saving building techniques have been incorporated throughout the accommodation building and winery, including the use of locally sourced cladding to ensure minimum wastage from the cutting process and the use of quality composite window frames (aluminium and timber) for improved energy efficiency. The development of the on-site renewable cooling systems have also been a key mechanical focus, with air source heating pumps developed to lower carbon emissions.

Ken Beall, Director at Desco, which has offices in the North East, London and internationally, said: "We are delighted to have been involved in the Rathfinny project from the start and it has been extremely rewarding to see the team's vision begin to be realised. To work on such a highly acclaimed, one-of-a-kind development is a fantastic opportunity for the whole project team at Desco.

“During the most recent project at the Rathfinny estate, Desco has been appointed to provide design and consultancy services for the redevelopment of the current 1875 barn at the site. There is a key focus on sustainability in keeping with a sensitive restoration of this 19th Century building and, as experts in the field of sustainable development, this is a challenge we are relishing.

“We know there are certain green credentials that any modern day project must adhere to but Rathfinny is truly revolutionary in its approach with a sustainable infrastructure built to support the vineyard. A photovoltaic solar farm which has been developed to support the entire site, ensures that the enterprise is as energy efficient as is practical within a national park environment.”

Desco's dedicated team have been engrossed in the Rathfinny winery project from its very beginning, engineering state-of-the-art facilities since their appointment to provide consultancy services to the Rathfinny team in February 2012. Every aspect of the project has been developed around the principle of producing the highest quality sparkling wine with sustainability at its core.

Throughout the project, Desco has led on the engineering services of the development of a 50kW solar farm at the winery which includes photovoltaic generation capacity and incorporates a host of energy saving building techniques to enable as near carbon neutral production of high quality wines. Strongly supporting the estate's aim to become one of the most environmentally friendly wineries, the investment in renewable electricity will save 16 tonnes of carbon dioxide emissions per year.

Ground water is also being sourced from the Estate's own bore hole, purified to remove calcium and microbes and the waste water used within the wine making process will be treated on site and released back onto the land. With an extensive wildflower green roof to blend seamlessly into the national parkland setting, the roof will help to support thermal insulation of the building, whilst also providing significant solar shading avoiding the need to air condition spaces.

Mark Driver, owner of the Rathfinny Estate, said: “Every aspect of construction throughout the entire project to date has revolved around protecting the natural landscape – its beauty and ecology and sustainability is very important to Rathfinny. It has been great to work with our core

consultancy team, including Desco, to help turn Rathfinny into a reality.

“It has been an exciting step forward achieving planning permission for the accommodation building and starting work on the next phase of development, which will play such an important part in providing high quality accommodation for seasonal workers at Rathfinny, the first of whom will arrive next autumn.”