



## Site selection and context

When siting a solar farm we look for a large area of suitable land with good solar irradiation in close proximity to a grid connection point. The Oaklands site meets all these criteria as it is close to the National Grid substation at the decommissioned Drakelow Power Station. A search for suitable and available areas of land, including brownfield and agricultural sites, in proximity to Drakelow was carried out and this identified the Oaklands site as the preferred option for development.

The site is located just to the south of the former Drakelow power station, which once dominated the local landscape. Although the power station has gone the connection to the national grid remains which is why there are so many power lines in the local landscape.

### Site design

Following the site selection process, the proposals have been developed following extensive review of the local area, site constraints and survey assessment results, as well as close consideration of the appearance of the site and technical considerations for the type of equipment to be installed during construction.

The proposed site layout can be seen opposite.



### Key constraints

Aside from the connection point and avoidance of existing infrastructure such as pylons and existing utilities running through the site, there are numerous site constraints which influence the site layout and design.

Constraints include: important hedgerows and trees, public rights of way, residential houses, watercourses and drainage, amongst others. These are all assessed through the Environmental Impact Assessment (EIA) process, which is explained further on Board 3.

### Why solar?

This scheme represents an important contribution to meeting the UK's legally binding target under the Climate Change Act 2008 to achieve a 'net zero' carbon account by 2050.

Like other renewable energies, solar power represents a 'clean' source of renewable energy as it doesn't release any harmful emissions or pollutants.

Solar energy is also one of the cheapest forms of new renewable power generation in the UK, and consequently can contribute to controlling consumer's energy bills into the future.

Solar projects are non-permanent (they generally have a lifetime of around 40 years) energy generation projects, that do not alter the site's planning status (meaning they remain classed as 'agricultural' sites). Some agricultural activities can be retained (such as sheep grazing), and there is opportunity to enhance local biodiversity through creation of new habitats and planting around the site. Find out more on Boards 4 and 8).



The former cooling towers at Drakelow Power Station