

Ultra High Output LED Floodlights

The installation of highly efficient LED floodlights for local area lighting has been universally accepted on UK construction sites. However, for specialist applications, such as lighting the deep access shafts found in tunnelling projects, ultra high output luminaires with specialist optics are required. The Blakley Projects Team has recently been involved with finding lighting solutions for two deep shafts.

The first shaft was 45m deep with a 15m diameter. The solution for this project was to install 2 no. 900W ultra high output luminaires with CR concentrating optics at the top of the shaft, which will provide an average illumination level of 145 lux on the floor of the shaft at a depth of 45m.

The second project was for a shaft 29m deep with a diameter of 25m. The proposed solution for this project involved two stages. Firstly installing 2 no. 600W ultra high output luminaires with symmetrical optics. Once the shaft depth exceeds 10 to 12 metres an additional 2 no. 900W ultra high output luminaires with CR concentrating optics are to be installed. The expected average illumination level at the floor of the finished shaft is 185 lux.

Both schemes were also modelled using conventional 110V site LED floodlights but the results fell far short of those achieved with these specialist luminaires.

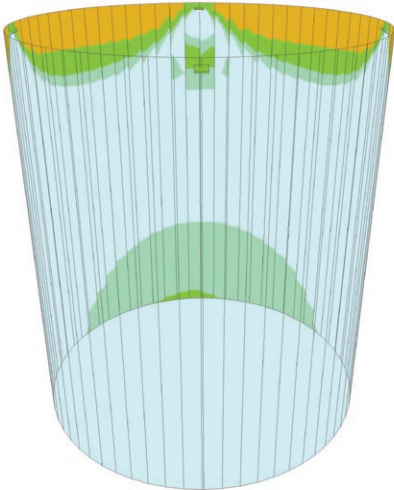
If you have a requirement for lighting a deep shaft, please contact the Blakley Projects Team who will be pleased to explore options.



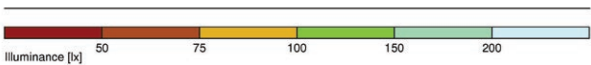
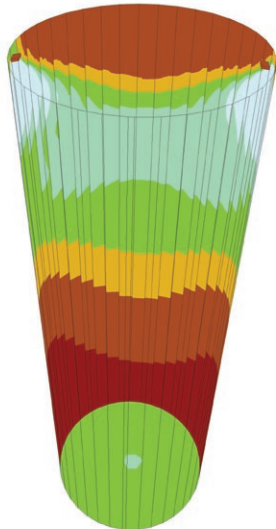
A5410046 Ultra LED Floodlight, 900W with CR Concentrating Optics



Separate Driver Enclosure for Ultra LED Floodlight



29m shaft with a diameter of 25m. 2 x 600W and 2 x 900W luminaires achieve an average of 185 lux



45m shaft with a diameter of 15m. 2 x 900W luminaires achieve an average of 145 lux.