



SHETLAND ISLANDS

KEY

- Turbine Locations
- Study Area

Turbine Light Visibility:

Intensity of Turbine Light shown in Candela's (cd)

Vertical Angle	Turbine Lighting Intensity	
	200cd light	200cd light
0° to 3°	2200 to 2500cd	220 to 250cd
3° to 7°	980 to 980cd	98 to 98cd
7° to 12°	420 to 420cd	42 to 42cd
12° to 17°	220 to 220cd	22 to 22cd
17° to 22°	220 to 220cd	22 to 22cd
Below 22°	Below 220cd	Below 22cd

NOTES: Calculated using Earth's curvature (radius 6366km) and atmospheric refraction coefficient of 0.075.
 Terrain data is derived from OS Terrain 50 gridded height data, and OS Terrain 5 gridded height data in the immediate site area.
 ZTV calculation does not take into account any surface features such as trees and buildings.
 Lighting intensity analysis run for Turbines with proposed aviation lights (11, 12, 14, 15, 16, 19, 20, 24, 25, 26, 28) only
 No landform within the study area is above 3 degrees from the height of the turbine lighting.
 Perception of theoretical candela intensity does not take account of distance.
 ZTV calculations represent a worst case situation where predicted lighting intensity may be as a result of only one turbine in the layout.
 No landform within the study area is above 3 degrees from the height of the turbine lighting.
 ZTV view height - 2m
 ZTV calculation resolution - 50m

