

Cairn Homes PLC

Cooldown Commons Phase 3



External Lighting

CHCWP3-ETH-XX-XX-SH-E-001

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Planning Issue

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1. EXTERNAL LIGHTING DESIGN

The external lighting design follows all relevant local and national standards. The design follows the requirements external spaces as set out in BS8300 Design of an accessible and inclusive built environment; CIBSE Lighting Guide 6: the exterior environment; and TGD Part M.

Extra consideration is given to the local wildlife, as highlighted in the separate report issued by a bat specialist. The public road lighting is designed by a separate specialist, but those fittings are included within this design proposal (useful light spillage etc.).

This development is phase 3 of the Cairn Homes works in the area. As such the external lighting design follows a similar pattern to the previous phases. Road lamps and private area lamps will match what is currently installed from previous phases.

Key elements are as follow:

- Lighting of all entrance and exits points
- Lighting of all steps and ramps
- Lighting of set-down and collection areas
- Lighting of external pathways
- Lighting of public spaces

As part of the wildlife report the type and set-up of the lamps are selected to minimise disruption to the bats in the area. In particular on the east side of the development adjacent to the open area. Final design and layout will be reviewed and agreed with all parties: civil roads; public lighting specialist; landscaping; wildlife specialist and planners.


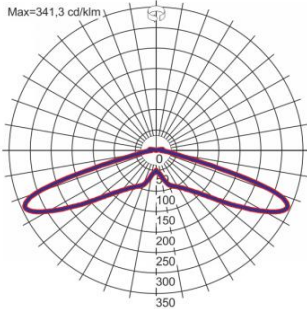
Please refer to drawing "CHCWP3-ETH-ZZ-00-DR-E-SS100 - Site Services - External Lighting Layout" for locations, and below is the lamp technical data.


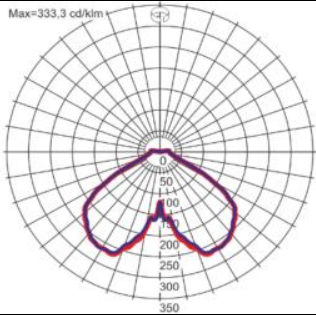
2. NOTES


1. Electrical Contractor to include for changes in RAL Colour for all light fittings. Colours to be agreed with Architect.
2. Electrical Contractor to include for all suspension wires, brackets, fixings for all fittings.
3. All lamps to be LED type.
4. All light fittings are to be equal and approved.
5. Colour temperature to be agreed with Architect, Landscaper and Specialists for public and wildlife
6. Luminaires to have a luminous flux depreciation of 90% after the number hours highlighted in the schedule below i.e. L90.
7. Luminaires to have a minimum failure fraction of 10% i.e. B10.
8. Luminaires to have a minimum combined gradual and total failures of 10% i.e. F10.
9. Luminaires to be within 3 Macadam steps.
10. All external luminaires to be UV protected to avoid impact on IP rating due to direct sunlight.


3. ELECTRICAL INSTALLATION


3.1. Exterior Lighting


Luminaire Schedule	
Project Name	City West
Client	Cairn
Reference	Type Ext-A
Typical Image	
	
Manufacturer: AVENIDA LENS	
Supplier: LUG LIGHTING	
Name: AVENIDA LENS LED	
Technical Data	
Description	Exterior LED lamp
Ingress protection	IP66
Lamp type	LED 2700/3000/4000K
CRI	70 min
Lamp life	100,000 hours
Luminaire lumen	6350 Lm
Power	49 Watts
Control	ON/OFF
Location	External Areas
130272.5L142.071	

Luminaire Schedule			
Project Name	City West	Document Ref	Luminaire Schedule
Client	Cairn		
Reference	Type Ext-B		
Typical Image			
			
Manufacturer: AVENIDA LENS			
Supplier: LUG LIGHTING			
Name: AVENIDA LENS LED			
Technical Data			
Description	Exterior LED lamp		
Ingress protection	IP66		
Lamp type	LED 2700/3000/4000K		
CRI	70 min		
Lamp life	100,000 hours		
Luminaire lumen	2700 Lm		
Power	19 Watts		
Control	ON/OFF		
Location	External Areas		
130275.5L162.131			

Luminaire Schedule	
Project Name	City West
Client	Cairn
Reference	Type Ext-C
Typical Image	
	
Manufacturer: CU PHOSCO LIGHTING	
Supplier: SABRE LIGHTING	
Name: P852	
Technical Data	
Description	Exterior LED Post top fitting
Ingress protection	IP66
Lamp type	LED 2700/3000/4000K
CRI	80 min
Lamp life	50,000 hours
Luminaire lumen	3480 Lm
Power	29 Watts
Control	ON/OFF
Location	External Areas

Luminaire Schedule	
Project Name	City West
Client	Cairn
Reference	Type Ext-D
Typical Image	
	
Manufacturer: CU PHOSCO LIGHTING	
Supplier: SABRE LIGHTING	
Name: P852	
Technical Data	
Description	Exterior LED Post top fitting
Ingress protection	IP66
Lamp type	LED 2700/3000/4000K
CRI	80 min
Lamp life	50,000 hours
Luminaire lumen	2510 Lm
Power	20 Watts
Control	ON/OFF
Location	External Areas

Luminaire Schedule			
Project Name	City West	Document Ref	Luminaire Schedule
Client	Cairn		
Reference	Type Ext-F		
Typical Image			
			
Manufacturer: CU PHOSCO LIGHTING			
Supplier: SABRE LIGHTING			
Name: P852			
Technical Data			
Description	Exterior LED Post top fitting		
Ingress protection	IP66		
Lamp type	LED 2700/3000/4000K		
CRI	80 min		
Lamp life	50,000 hours		
Luminaire lumen	4380 Lm		
Power	38 Watts		
Control	ON/OFF		
Location	External Areas		

Luminaire Schedule	
Project Name	City West
Client	Cairn
Document Ref	Luminaire Schedule
Reference	Type Ext-G
Typical Image	
	
Manufacturer: ARCLUCE	
Supplier: KAVANGH LIGHTING	
Name: EMPHASIS	
Technical Data	
Description	Above doorway LED
Ingress protection	IP65
Lamp type	LED 2700/3000/4000K
CRI	80 min
Lamp life	60,000 hours
Luminaire lumen	3200 Lm
Power	34 Watts
Control	ON/OFF
Location	Above Doorways
8054378322846	