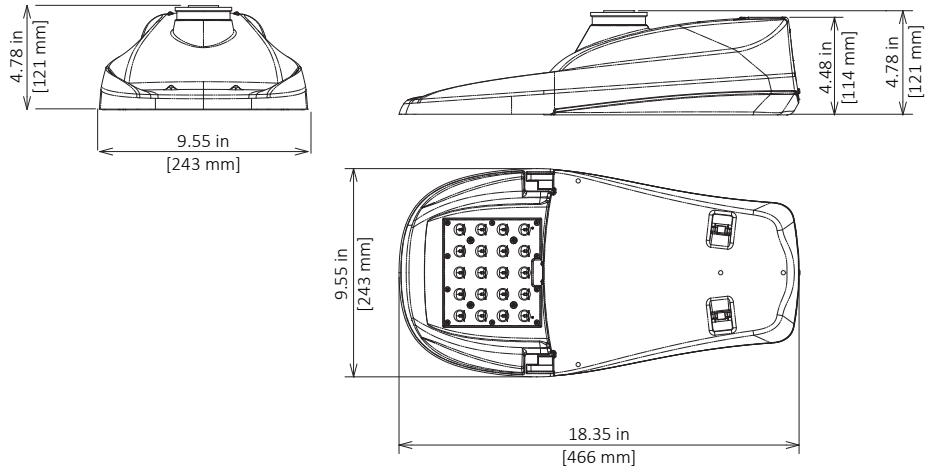


GreenCobra™ Jr. LED Street Light

GCJ H-Series Specification Data Sheet

Luminaire Data

Weight 7.7 lbs [3.5 kg]
EPA 0.39 ft²



Ordering Information

Sample Catalog No. GCJ1-20H-MV-NW-2R-GY-580

Product	LED Code	Voltage	Color Temperature	Distribution	Finish ¹	GCJ0 Drive Current Code ²	Options
GCJ0	15H	MV 120-277V HV 347-480V	WW 3000K NW 4000K CW 5000K	2R Type 2 3 Type 3 4 Type 4 5 Type 5	GY Gray DB Dark Bronze BK Black	300	FDC ³ Fixed Drive Current
						390	LPCR Less Photocontrol Receptacle
GCJ1	20H					490	PCR7 ⁴ ANSI 7-wire Photo-control Receptacle
						590	PCR7-CR ⁵ Control Ready 7-wire PC Receptacle
						700	MSL3 Motion Sensor, L3 Lens
						GCJ1 Drive Current Code ²	MSL7 Motion Sensor, L7 Lens
						350	LSSP2 Extreme Surge Protection, Fail-to-off, 20kV/10kA Rating
GCJ2	20H					530	WL Utility Wattage Label
						580	4B 4-Bolt Mounting Bracket
						700	RWG Rubber Wildlife Guard
						GCJ2 Drive Current Code ²	SWTB Straight Wire Terminal Block
						700	BBL Bubble Level
						830	DSC Door Safety Cable
900	CF ⁶ Coastal Paint Finish						
						1A	

Notes:

- 1 Gray, Black, and Dark Bronze standard. Consult factory for other finishes.
- 2 Specified drive current code is the factory set drive current. Field adjustable current selector enables fixture to be changed in the field to adjust light output for local conditions (not available with Fixed Drive Current (FDC) or PCR7-CR option). Consult factory if wattage limits require a special drive current.
- 3 Non-field adjustable, fixed drive current. Specify required drive current code. Not available with PCR7-CR option.
- 4 Includes current selector that enables field adjustability of light levels. Includes connectors to allow easy upgrade of wireless dimming via PCR7. Wireless node by others.
- 5 Control-ready wired at factory for wireless node dimming (node by others). Current selector not included in the fixture. Not able to adjust above specified drive current.
- 6 Specify the CF Option for coastal installation. See warranty for details.
- 7 Flush mounted house side shield. Shield cuts light off at 1/2 mounting height behind luminaire.
- 8 Flush mounted cul-de-sac shield. Shield cuts light off at 1/2 mounting height behind luminaire and 1-1/2 mounting height on either side of luminaire.
- 9 Flush mounted front side shield cuts light off at approximately one mounting height in front of luminaire (street side).
- 10 Specify Color (GY, DB, BK)
- 11 Specify MV (120-277V) or HV (347-480V).

Accessories*

HSSGCJ ⁷	House Side Shield, Snap-On*
CSSGCJ ⁸	Cul-De-Sac Side Shield, Snap-On*
FSSGCJ ⁹	Front Side Shield, Snap-On*
SPB ¹⁰	Square Pole Horizontal Arm Bracket
RPB ¹⁰	Round Pole Horizontal Arm Bracket
PTB ¹⁰	Pole Top Tenon Horizontal Arm Bracket
PTB2 ¹⁰	Pole Top Tenon Horizontal Arm Bracket (2@180°)
WB ¹⁰	Wall Horizontal Arm Bracket
BSK	Bird Deterrent Spider Kit
LLPC ¹¹	Long-Life Twist Lock Photocontrol
SC	Twist Lock Shorting Cap

*Unless specified for field installation, Shields and Shorting Caps are shipped installed. All other options are shipped separately.



Luminaire Specifications

Housing

Die cast aluminum housing with universal two-bolt slip fitter mounts to 1-1/4" to 2" (1-5/8" to 2-3/8" O.D.) diameter mast arm. One-piece aluminum housing provides passive heat-sinking of the LEDs and has upper surfaces that shed precipitation. Four-bolt mounting bracket is available. Mounting provisions meet 3G vibration per ANSI C136.31-2010 Normal Application, Bridge & Overpass. Mounting has leveling adjustment from ± 5° in 2.5° steps. All hardware is stainless steel. Electrical components are accessed without tools via die cast aluminum door with stainless steel quick-release latches. Provided standard with removable polycarbonate wild life guard. For additional protection, optional rubber wildlife guard (RWG) which conforms snugly to the mast arm is offered.

Light Emitting Diodes

LEDs produce minimum 90% of initial intensity at 60,000 hours of life per IES recommended lumen maintenance life projection based on 6 times the duration of the collected LM-80 data. For details on IESNA Position on LED Product Lifetime Prediction, PS-10-18. LEDs have correlated color temperature of 3000K (WW), 4000K (NW), or 5000K (CW) and 70 CRI minimum. LEDs are ROHS compliant, 100% mercury and lead free.

Field Adjustability

LED lumen output can be changed in the field to adjust drive current for local conditions (not available with PCR7-CR option). The specified driver current will be the factory set output. Field adjustments can be made with the output selector included in the fixture. Field adjustable range shown in performance data table.

Quality Control

Every luminaire is performance tested before and after a 2-hour burn-in period. Assembled in the USA.

Optical Systems

Micro-lens optical systems produce IESNA Type 2, Type 3, Type 4, or Type 5 distributions and are fully sealed to maintain an IP66 rating. Luminaire produces 0% total lumens above 90° (BUG Rating, U=0). Optional house side shield cuts light off at 1/2 mounting height behind luminaire. Front side shield cuts light off at approximately one mounting height in front of the luminaire (street side). Cul-de-sac shield provides back and side light control for end of cul-de-sac applications. All shields are field installable without tools.

Electrical

Rated life of electrical components is 100,000 hours. Uses isolated power supply that is 1-10V dimmable. Power supply is wired with quick-disconnect terminals. Power supply features a minimum power factor of .90 and <20% Total Harmonic Distortion (THD). EMC meets or exceeds FCC CFR Part 15. Terminal block accommodates 6 to 14 gauge wire. Surge protection complies with IEEE/ANSI C62.41 Category C High, 20kV/10kA and ANSI C136.2-2015, 20kV/10kA.

Controls

3-Wire photocontrol receptacle is standard. ANSI C136.41 7-wire (PCR7) photocontrol receptacles is available. All photocontrol receptacles have tool-less rotatable bases. Wireless control module is provided by others.

Finish

Housing receives a durable, fade-resistant polyester powder coat finish with 3.0 mil nominal thickness. Standard finish tested to withstand 5000 hours in salt spray exposure per ASTM B117 and Coastal Finish per ASTM G85. Finish meets scribe creepage rating 8 per ASTM D1654. Finish tested 500 hours in UV exposure per ASTM G154 and meets ASTM D523 gloss retention.

Listings/Ratings/Labels

Luminaires are UL listed for use in wet locations in the United States and Canada. DesignLights Consortium™ qualified product. Consult DLC QPL for Standard and Premium Classification Listings. All electronic components inside of the luminaire are NRTL damp location rated per ANSI 136.37-2011 Ingress Protection standard. International Dark Sky Association listed. Luminaire is qualified to operate at ambient temperatures of -40°C to 40°C. Assembled in the U.S.A

Photometry

Luminaires photometrics are tested by certified independent testing laboratories in accordance with IES LM-79 testing procedures.

Warranty

10-year limited warranty is standard on luminaire and components. See Leotek.com for warranty details.

Vandal Resistance

Housing and optics rated to IK10

Standards

Luminaire complies with:
ANSI: C136.2, C136.3, C136.10, C136.13, C136.15, C136.22, C136.31, C136.35, C136.37, C136.41, C62.41, C78.377, C82.77
Other: FCC 47 CFR, IEC 60598, ROHS II, UL 1449, UL 1598

Color Specifications

Order Code	Color	RAL #	Pantone Equivalent
GY	Gray	7040	429C
BK	Black	9004	426C
DB	Dark Bronze	6022	BLACK 2C

TM21 Lumen Maintenance per IES TM21-11 Calculation

Model Number	60,000 Hours*	80,000 Hours	100,000 Hours
All G CJ H	>95%	>94%	>93%

*Calculation based on IES position statement on Lumen Maintenance Life Projections

Performance Data: 3000K (WW)

All data nominal. IES files for all CCTs available at leotek.com.

Product	LED Code	Drive Current Code	System Wattage (W)	Delivered Lumens (Lm) ¹	Efficacy (Lm/W)	Field Adjustable Output Range
GCJ0	15H	300	15	1810	121	↕
		390	19	2280	120	
		490	24	2840	118	
		590	30	3410	114	
		700	35	3910	112	
GCJ1	20H	350	25	3040	122	↕
		450	29	3470	120	
		530	34	3980	117	
		580	39	4470	115	
		700	46	5130	112	
GCJ2	20H	700	45	5020	112	↕
		830	54	5780	107	
		900	58	6120	106	
		1A	68	6960	102	

Notes:

1 Nominal lumens. Normal tolerance $\pm 10\%$ due to factors including distribution type, LED bin variance, and ambient temperatures.

Performance Data: 4000K (NW) and 5000K (CW)

All data nominal. IES files for all CCTs available at leotek.com.

Product	LED Code	Drive Current Code	System Wattage (W)	Delivered Lumens (Lm) ¹	Efficacy (Lm/W)	Field Adjustable Output Range
GCJ0	15H	300	15	2000	133	↕
		390	19	2490	131	
		490	24	3070	128	
		590	30	3650	122	
		700	35	4180	119	
GCJ1	20H	350	25	3240	130	↕
		450	29	3720	128	
		530	34	4320	127	
		580	39	4850	124	
		700	46	5510	120	
GCJ2	20H	700	45	5430	121	↕
		830	54	6210	115	
		900	58	6630	114	
		1A	68	7430	109	

Notes:

1 Nominal lumens. Normal tolerance $\pm 10\%$ due to factors including distribution type, LED bin variance, and ambient temperatures.

BUG Ratings: 3000K (WW)

All data nominal. IES files for all CCTs are available at leotek.com.

Product & LED Code	Drive Current Code	Type 2R	Type 3	Type 4	Type 5
		BUG Rating	BUG Rating	BUG Rating	BUG Rating
GCJ0 15H	300	B0 U0 G0	B1 U0 G1	B1 U0 G1	B1 U0 G0
	390	B1 U0 G0	B1 U0 G1	B1 U0 G1	B1 U0 G0
	490	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G0
	590	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G0
	700	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
GCJ1 20H	350	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G0
	450	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G0
	530	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
	580	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
	700	B1 U0 G1	B2 U0 G1	B2 U0 G1	B3 U0 G1
GCJ2 20H	700	B1 U0 G1	B1 U0 G1	B2 U0 G1	B3 U0 G1
	830	B1 U0 G1	B2 U0 G2	B2 U0 G1	B3 U0 G1
	900	B1 U0 G1	B2 U0 G2	B2 U0 G1	B3 U0 G1
	1A	B1 U0 G2	B2 U0 G2	B2 U0 G2	B3 U0 G1

BUG Ratings: 4000K (NW) and 5000K (CW)

All data nominal. IES files for all CCTs are available at leotek.com.

Product & LED Code	Drive Current Code	Type 2R	Type 3	Type 4	Type 5
		BUG Rating	BUG Rating	BUG Rating	BUG Rating
GCJ0 15H	300	B1 U0 G0	B1 U0 G1	B1 U0 G1	B1 U0 G0
	390	B1 U0 G0	B1 U0 G1	B1 U0 G1	B1 U0 G0
	490	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G0
	590	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
	700	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
GCJ1 20H	350	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
	450	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
	530	B1 U0 G1	B1 U0 G1	B1 U0 G1	B2 U0 G1
	580	B1 U0 G1	B1 U0 G1	B2 U0 G1	B3 U0 G1
	700	B1 U0 G1	B2 U0 G1	B2 U0 G1	B3 U0 G1
GCJ2 20H	700	B1 U0 G1	B2 U0 G1	B2 U0 G1	B3 U0 G1
	830	B1 U0 G1	B2 U0 G2	B2 U0 G1	B3 U0 G1
	900	B1 U0 G1	B2 U0 G2	B2 U0 G2	B3 U0 G1
	1A	B1 U0 G2	B2 U0 G2	B2 U0 G2	B3 U0 G1