Product Description

The ZR14[™] LED troffer delivers 4000 lumens of superior 90 CRI light quality and is perfect for both new construction or renovation. Powered by Cree TrueWhite[®] Technology, the slim and lightweight ZR14 LED troffer boasts an efficacious 90 LPW performance along with 0-10V dimming to meet local energy codes. The ZR14 LED troffer embodies a breakthrough in balancing energy savings, visual comfort and initial cost.

Performance Summary

Utilizes Cree TrueWhite® Technology

Assembled in the US & Mexico

Efficacy: 90 LPW

Delivered Light Output: 4000 lumens

Input Power: 44 watts

CRI: 90 CRI

CCT: 3500K, 4000K

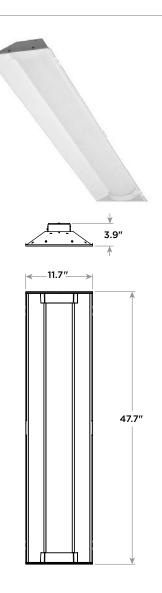
Input Voltage: 120-277 VAC

Limited Warranty: 10 years⁺

Lifetime: Designed to last up to 75,000 hours

Controls: 0-10V (Standard)*

Mounting: Recessed



Ordering Information

Example: ZR14-40L-35K-10V

ZR14	40L			10V	
Product	Lumen Output	Color Temp	Voltage	Control	Options
ZR14™	40L 44W, 4000 Lumens	35K 3500 Kelvin 40K 4000 Kelvin	Blank 120-277 Volt (Standard)	10V 0-10V Dimming 5%	EB Emergency Backup**

⁺ See www.cree.com/lighting/products/warranty for warranty terms

* Reference www.cree.com/lighting for recommended dimming controls and wiring diagrams

** EB option available Q2 2014



Rev. Date: 01/30/2014



Product Specifications

CREE TRUEWHITE® TECHNOLOGY

A revolutionary way to generate high efficacy light with superior color rendering and lifelong color consistency. Cree TrueWhite Technology delivers a no compromise solution to enhance any space.

LUMEN MAINTENANCE FACTORS

Reference www.cree.com/lighting for detailed lumen maintenance factors

CONSTRUCTION & MATERIALS

- Durable cold rolled steel housing provides strength and uniformity
- Ultra-thin 3.9" fixture height and lightweight design effectively target a broad range of plenum spaces and allow for easy installations
- · Fixture is pre-painted for enhanced smooth finish
- Provided t-bar clips and holes for mounting support wires enable recessed or suspended installation
- Fixture sides and ends are hemmed in for safe, easy handling

OPTICAL SYSTEM

- Unique fixture design creates perfect balance of both horizontal and vertical illumination
- Optimized smooth lens eliminates pixelation and delivers a low-glare, diffused light distribution

ELECTRICAL SYSTEM

- Cree born components including highly efficacious Cree® LED chips along with an integral high-efficiency Cree® driver
- Power Factor = 0.9 nominal
- · Input Power: Stays constant over life
- Input Voltage: 120-277V, 50/60Hz
- Battery Backup: Consult factory
- Temperature Rating: Designed to operate in temperatures 0-35 °C and below room side and plenum side
- Total Harmonic Distortion: <20%

CONTROLS

Continuous dimming to 5% with 0-10V controls comes standard*

REGULATORY & VOLUNTARY QUALIFICATIONS

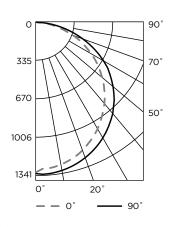
- UL924 (EB option)
- cULus Listed
- Suitable for damp locations
- Designed for Indoor use

*Reference www.cree.com/lighting for recommended dimming controls and wiring diagramss

Photometry

ZR14 BASED ON CESTL REPORT TEST #: 2014-0007

Fixture photometry has been conducted by a NVLAP accredited testing laboratory in accordance with IESNA LM-79-08. IESNA LM-79-08 specifies the entire luminaire as the source resulting in a fixture efficiency of 100%.



RCC %:	80				
RW %:	70	50	30	10	
RCR: 0	119	119	119	119	
1	107	102	97	93	
2	97	88	81	74	
3	88	77	68	61	
4	80	68	58	51	
5	74	60	51	44	
6	68	54	45	38	
7	63	49	40	33	
8	59	45	36	30	
9	55	41	32	27	
10	51	38	30	24	

Coefficients Of Utilization

Effective Floor Cavity Reflectance: 20%

Average Luminance Table (cd/m2)

	Horizontal Angle				
		0°	45°	90°	
	٥°	1035	1035	1035	
ngle	45°	664	710	759	
Vertical Angle	55°	504	579	657	
	65°	342	451	570	
	75°	262	393	507	
	85°	53	104	125	

-

Zonal Lumen Summary

Zone	Lumens	% Lamp	Luminaire
0-30	808	N/A	24.7%
0-40	1328	N/A	40.5%
0-60	2394	N/A	73.1%
0-90	3274	N/A	100%
0-180	3274	N/A	100%

Reference **www.cree.com/lighting** for detailed photometric data.

Application Reference

Open Space					
Spacing	Lumens	Wattage	LPW	w/ft²	Average fc
8 x 8	4000L	44W	90	0.66	56
8 x 10	4000L	44W	90	0.55	46
10 x 10	4000L	44W	90	0.44	37
10 x 12	4000L	44W	90	0.35	30

9' ceiling: 80/50/20 reflectances; 2.5' workplane, open room. LLF: 1.0 Initial Open Space: 50' x 40' x 10'

© 2014 Cree, Inc. and/or one of its susidiaries. All rights reserved. For informational purposes only. Content is subject to change. See www.cree.com/patents for patents that cover these products. Cree*, the Cree logo, Cree TrueWhite*, TrueWhite*, and the Cree TrueWhite logo are registered trademarks, and ZR14[™] is a trademark of Cree, Inc. The UL logo is a registered trademark of UL LLC.

