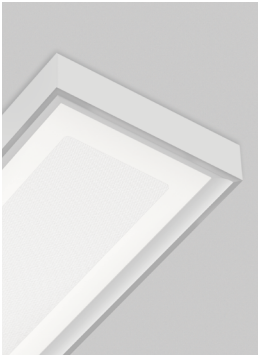


# PRIMO 1x4 LED

SURFACE



Shown with CMO optics



Shown with PMO optics

## DESCRIPTION

**Primo** is the fresh face of recessed LED lighting. The unique concentric micro optic creates a subtle, yet distinctive, graphical appearance appropriate for important spaces, large and small. The precise, square-base-prism design achieves both luminous consistency and overall visual comfort from all viewing angles. Using advanced LED engines and optics, Primo provides comfortable and efficient illumination where it's needed, while integrating cleanly into the architecture. See separate spec sheets for other available mountings.

PROJECT: \_\_\_\_\_

APPROVED BY: \_\_\_\_\_

SIGNATURE: \_\_\_\_\_

TYPE	QTY



## ORDER GUIDE

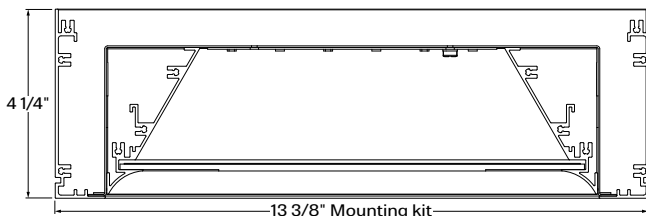
up to 101 lm/w performance

PRIS	14			SW		
LUMINAIRE ID	SIZE	OPTICS	LIGHT SOURCE	CRI	LUMEN PACKAGES	COLOR TEMP.
PRIS - primo surface	14 - 1'x4'	<b>CMO</b> - Concentric Micro-Prism Optic <b>PMO</b> - Precision Micro-Prism Optic	SW - Static white	<b>80</b> - 80CRI <b>90</b> - 90CRI	<b>2000</b> - min. low output 2000lm <b>3200</b> - medium output 3200lm <b>4200</b> - high output 4200lm <b>5000</b> - max. ultra high output 5000lm* ***** - other required lm * not available in 2700K	<b>27</b> - 2700k <b>30</b> - 3000k <b>35</b> - 3500k <b>40</b> - 4000k

			SUR	W		
VOLTAGE	DRIVER	ELECTRICAL	MOUNTING	FINISH	OPTIONS	
<b>120</b> - 120V <b>277</b> - 277V <b>UNV</b> - 120V-277V <b>347</b> - 347V (not available with Lutron)	<b>D1</b> - 1% dimming 0-10V <b>DA</b> - Dali <b>LDE1</b> - Lutron Hi-lume 1% Eco	<b>1</b> - 1 circuit + <b>EB</b> - emergency battery pack + <b>GTD###</b> - generator transfer device, 120V or 277V + <b>M</b> - master (consult factory) + <b>S</b> - satellite (consult factory)	SUR - surface mount kit	W - matte white	<b>FU120</b> - Fuse 120V <b>FU277</b> - Fuse 277V <b>CU</b> - custom	

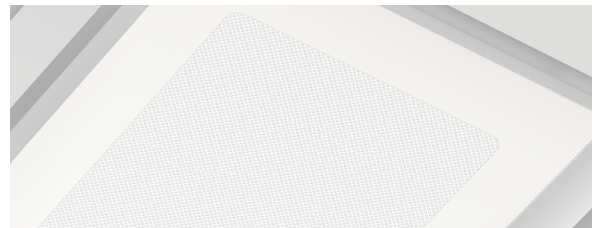
See page 3 for ordering code detailed information

## CROSS SECTION



SUR - surface mount kit

## OPTICS



CMO - Concentric Micro-Prism Optic

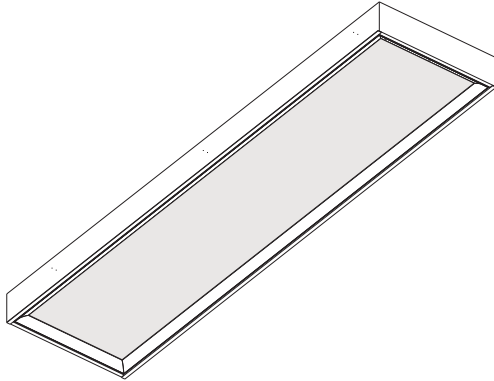


PMO - Precision Micro-Prism Optic

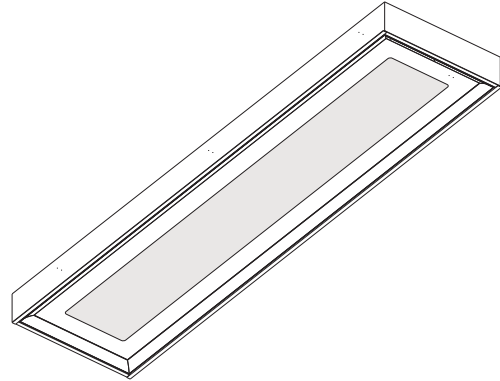
# PRIMO 1x4 LED

SURFACE

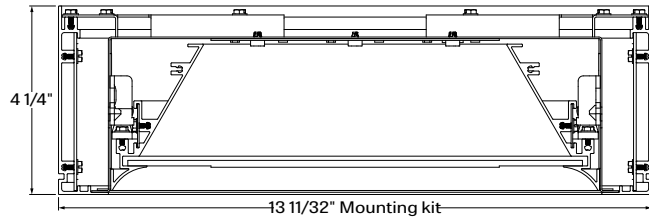
## PRIMO PMO



## PRIMO CMO



### PRIMO - SUR surface



# PRIMO 1x4 LED

SURFACE

## OPTICS

**PRECISION MICRO-PRISM-OPTIC (PMO) / CONCENTRIC MICRO-OPTIC (CMO)** - utilizes a specially designed catadioptric lens that combines refraction and internal reflection. The square-base prism is 24% the size of those used in a high-performance fluorescent lens.

The acrylic material itself is untinted, relying entirely on catadioptric control for effective source obscuration. A highly efficient TIR process at the acrylic-air interface on the prism surfaces redirects incident light with less than a 0.1% loss per reflection. As a result, these LumenWerx optics attain a high optical efficiency greater than 90%, while maintaining visual comfort at normal viewing angles and presenting a pleasing luminous appearance.

**PRECISION MICRO-PRISM-OPTIC (PMO)** - The exclusive two-dimensional array of prisms is designed to eliminate the glare found at higher viewing angles and as such, enables a glare cut-off at a 45° viewing angle.

**CONCENTRIC MICRO-PRISM-OPTIC (CMO)** - With the smaller prisms of the outer optic giving way to the larger prisms found in the inner optic, the exclusive pyramidal forms provide an outstanding level of control over high angle brightness as well as a gentle brightness gradient from different viewing angles.

## LIGHT SOURCE - LED

Custom Linear array of mid-flux LED's are mounted directly to the housing for optimal thermal performance. Available in 3000K, 3500K and 4000K with a minimum 80 CRI and an option for 90 CRI with elevated R9 value. Color consistency maintained to within 3 SDCM. LEDs operated at reduced drive current to optimize efficacy and lumen maintenance.

All LEDs have been tested in accordance with IESNA LM-80-08 and the results have shown L80 lumen maintenance greater than 60,000 hours. Absolute product photometry is measured and presented in accordance with IESNA LM-79, unless otherwise indicated.

LED output	Color Temp	Watts	Nominal Delivered Lumens	Efficacy LPW
low output	4000K	20	2000	101
medium output	4000K	33	3200	97
high output	4000K	45	4200	94
ultra high output	4000K	54	5000	92

## ELECTRICAL

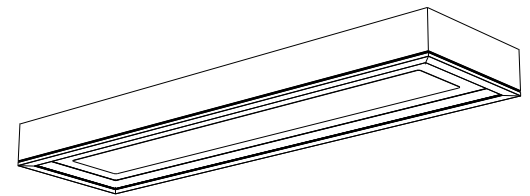
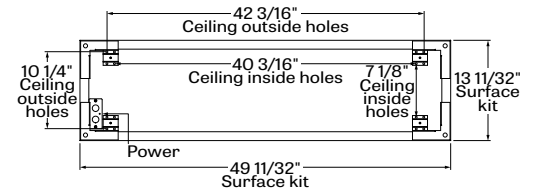
Factory-set, adjustable output current LED driver with universal (120-277VAC) input. Dimmable from 100% to 1% with 0-10V dimming control. Rated life (90% survivorship) of 50,000 hours at 50°C max. ambient (and 70°C max. case) temperature. At maximum driver load: Efficiency>84%, PF>0.9, THD<20%. Other specifiable options include Lutron Hi-Lume 1% Eco and DALI protocol drivers. All of our standard 0-10V drivers are NEMA 410 compliant.

## EMERGENCY

Factory installed long life high temperature recyclable Ni-Cad battery pack with test switch and charge indicator, minimum of 90 minutes operation, up to 1300 lumens (25°C) emergency lighting output. Recharge time of 24 hours.

## MOUNTING OPTIONS

A separate kit for mounting fixtures directly to the ceiling surface. Kit is compatible with T-Bar, hard surface and drywall ceilings.



SUR - surface mount kit

## FINISH

**Interior** - 95% reflective, matte white powder coating

**Exterior** - matte white powder coating.

## CONSTRUCTION

**Housing** - Die formed cold rolled sheet steel 20 gauge thick, matte white powder coating.

**Reflectors** - Extruded Aluminum 0.07" nominal, integrated into a door system, 95% reflective matte white painted.

**Door system** - integrated frame with no visible attachment, made of extruded Aluminum and lens made in clear PMMA precisely molded into optical prismatic forms offered in different patterns.

**Surface mount kit** - Extruded Aluminum 0.07" nominal, matte white or aluminum powder coating. Custom finishes are also available.

## WEIGHT

**Primo 1x4:** 26.54lbs - 12.05kg

# PRIMO 1x4 LED

SURFACE

## CERTIFICATIONS

**ETL** - Rated for Indoor Dry/Damp locations. Conforms to UL Standard 1598 and certified to CAN/CSA Standard C22.2 No. 250.0.

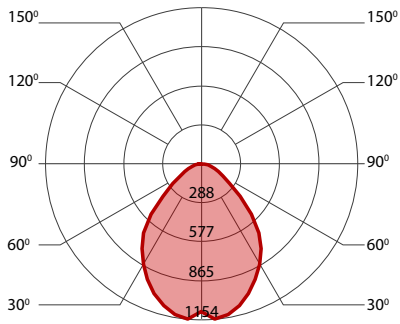
## WARRANTY

LumenWerx provides a five-year limited warranty of electrical and mechanical performance of the luminaires, including the LED boards, drivers, and auxiliary electronics. LumenWerx will repair or replace defective luminaires or components at our discretion, provided they have been installed and operated in accordance with our specifications. Other limitations apply, please refer to the full warranty on our website.

# PRIMO 1x4 LED

SURFACE

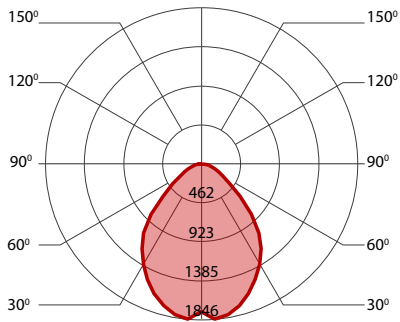
## 2000 LUMEN AT 80CRI - LOW OUTPUT



### PERFORMANCE

LED output	Color Temp	Watts	Nominal Delivered Lumens	Efficacy LPW
low output	2700K	21.5	2000	92
low output	3000K	21	2000	95
low output	3500K	20	2000	98
low output	4000K	20	2000	101

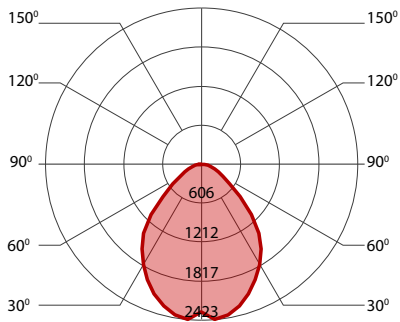
## 3200 LUMEN AT 80CRI - MEDIUM OUTPUT



### PERFORMANCE

LED output	Color Temp	Watts	Nominal Delivered Lumens	Efficacy LPW
medium output	2700K	35.5	3200	90
medium output	3000K	35	3200	91
medium output	3500K	34	3200	94
medium output	4000K	33	3200	97

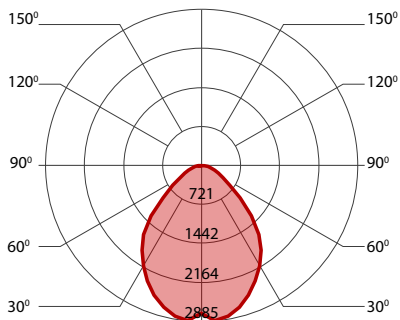
## 4200 LUMEN AT 80CRI - HIGH OUTPUT



### PERFORMANCE

LED output	Color Temp	Watts	Nominal Delivered Lumens	Efficacy LPW
high output	2700K	48	4200	88
high output	3000K	48	4200	88
high output	3500K	46	4200	91
high output	4000K	45	4200	94

## 5000 LUMEN AT 80CRI - ULTRA HIGH OUTPUT



### PERFORMANCE

LED output	Color Temp	Watts	Nominal Delivered Lumens	Efficacy LPW
ultra high output	3000K	58	5000	86
ultra high output	3500K	56	5000	89
ultra high output	4000K	54	5000	92