



## **Architectural Luminaires with Remote-Mounted DMX or 0-10V Power Supplies**

For Performance Spaces & High Ceilings

www.kirlinlighting.com







**Recessed Round Luminaires** 

4", 6", or 7" in **1500L-6500L** Downlight, Adjustable, Wall Wash **Page 6-7** 



**Recessed Square Luminaires** 4" or 6" in **1500L-6500L** Downlight, Adjustable, Wall Wash **Page 8-9** 



Surface Round Luminaires 9"or 12" in 2500L-6500L Downlight, Adjustable, Direct-Indirect Page 10



Surface Square Luminaires 7" in 2500L-6500L Downlight, Direct-Indirect Page 11



Surface Sconces Decorative Round and Square Sconce Page 11



**DMX Remote Driver** Smooth Dim to Black Programmable via RDM **Page 12** 



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**0-10V Remote Driver** Smooth Dim to Black Modular Cabinet Design *Page 13* 



# The UL Listed LED Lighting System with Remote DMX or 0-10V Drivers

Perfect for theaters, auditoriums, lecture halls, and churches

A separate house lighting dimming system is a thing of the past.

For the better part of the last century, owners and operators of entertainment, education, and worship spaces have been seeking a better lighting system. Kirlin provides the solution: a collection of high performance LED luminaires and remote drivers which are controlled by DMX or 0-10V.

Large venues often require a lighting system with higher mountings, directly over permanent seating ~ a configuration that is incredibly difficult to service and maintain. Therefore, these architectural spaces require lighting with higher light output and long life, minimizing service frequency and downtime. Excellent color rendering is mandatory, as well as sophisticated dimming capabilities. The solution: LED technology from Kirlin, with conveniently located remote drivers.

The critical link in the life of any LED lighting system is the driver. Locating a driver within each luminaire in large venues does not facilitate cost-effective maintenance because:

- Luminaires are difficult to access from below
- Individual DMX drivers are expensive
- Dual wiring is more costly (control and line voltage is required)

Why Specify Symphony?	Advantage
DMX Controlled House Lighting	One theatrical dimming system for both stage and house
Smooth Dim to Black	Best in class dimming provided (standard)
High Definition Video Capability	Flicker free dimmable lighting
Driverless Luminaires	Drivers may be located where most convenient
Individual Luminaire Address	Precise control over each luminaire: what to do; when and how to do it
Lower Installed Cost	Less wire, smaller gauge and Class II low voltage
Lower Maintenance Cost	Quick servicing at eye level: no lifts or catwalks
Breadth of Luminaire Series	Recessed & surface downlights, adjustables, wall washes
Variety of Lumen Packages	Select the most energy efficient luminaire for your project: -1500L, -2500L, -4000L, -5000L, or -6500L Lumen Series
Variety of Beam Spreads	Precise performance: SPT, NFL, MFL, WFL
Long Life LED	Lower operating and maintenance costs

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# Features and Specifications

- Downlights, adjustables, wall washes, and sconces
- -6500L, -5000L, -4000L, -2500L, and -1500L Lumen Series
- 3500°K standard; optional 2700°K, 3000°K, or 4100°K
- Up to 4 spacing criteria: -SPT, -NFL, -MFL, and -WFL (from 0.3 to 1.2 SC)
- Precision engineered TIR optics maximize efficiency and provide up to four unique beam spreads: 10° - SPT 40° - MFL

25° - NFL 80° - WFL

- 80+ CRI; LM-80 qualified LEDs, LM-79 certified photometry
- Option -HC: 90+ CRI
- Up to 90,000 hour L70
- Type IC standard on -1500L, and -2500L Lumen Series
- Adjustables: -1500L up to 45°; -2500L, -4000L, -5000L, and -6500L up to 35°
- Maximum distance from luminaire
   to driver: 250 feet

Remote Driver System Selection and Configuration: ORDER ONE						
DMX System	-1500L Lumen Series or Sconces	-2500L Lumen Series	-4000L Lumen Series	-5000L Lumen Series	-6500L Lumen Series	
Quantity of luminaires operated on a single <u>SYM-DMXPS</u> power supply	*Up to 16	- Up to 8	Up to 8	Up to 4	Up to 4	
	Up to 8					
Driver Dimming/Control Capabilities	*2 fixtures per DMX address	1 fixture per DMX address	1 fixture per DMX address	1 fixture per (2) DMX address	1 fixture per (2) DMX address	
	1 fixture per DMX address					

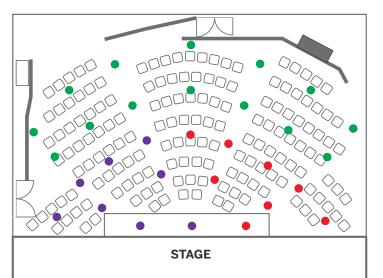
0-10V System	-1500L Lumen Series or Sconces	-2500L Lumen Series	-4000L Lumen Series	-5000L Lumen Series	-6500L Lumen Series
Quantity of luminaires	*Up to 16	Lin to O	Up to 8	Up to 4	Up to 4
operated on a fully-loaded <u>SYM-CABNT</u> driver cabinet	Up to 8	Up to 8			
Driver Dimming/Control Capabilities	*2 fixtures per channel in series	1 fixture per	1 fixture per channel	1 fixture per 2 channels	1 fixture per 2 channels
	1 fixture per channel	channel			

\* Two fixtures wired in series on one channel. Pairs will be controlled together.





# Lighting System Typical Layout Design Guide



- 1. Run photometric calcs to determine quantity of luminaires (Example: 16x SRR-06602-4000L and 14x SRR-06115-1500L).
- Determine number of remote power supply channels required (Example: 16 channels required to operate (16) 4000L fixtures; 7 channels required to operate (14) 1500L fixtures).
- 3. Locate remote power supplies in a convenient, serviceable location (not to exceed maximum cable distance of 250 feet to any luminaire), such as over an aisle, back stage, or service room.
- 4. Develop riser (for DMX commissioning agent) depicting remote power supply addresses and corresponding assigned channel addresses (see chart for example).

Symphony	RDM-Programmed	Corresponding Channel	Fixtures
DMX Power Supply	Channel Addresses	Number (Circuit)	
SYM-DMXPS-8	001, 002, 003, 004, 005, 006, 007, 008	1, 2, 3, 4, 5, 6, 7, 8	8 x <u>SRR-06602-</u> 4000L
SYM-DMXPS-8	009, 010, 011, 012, 013, 014, 015, 016	1, 2, 3, 4, 5, 6, 7, 8	8 x <u>SRR-06602-</u> <u>4000L</u>
SYM-DMXPS-7	017, 018, 019,	1, 2, 3,	14 × <u>SRR-06115-</u>
	020, 021, 022, 023	4, 5, 6, 7	<u>1500L</u>





# **Recessed Round Luminaires 1500L Low Output**

#### **Downlight Adjustable** Wall Wash **SRR-04100** SRR-04105 **SRR-04110** 4" Open Appearance Downlight 4" Open Appearance Adjustable 4" Lensed Wall Wash 1500L 1500L 1500L -11<sup>7</sup>⁄<sub>8</sub>" sq [302mm]-–11%" sq [302mm]--117/8" sq [302mm]-11 $\bigcirc$ 5<sup>5</sup>/8' 55% 55%" [143mm] [143mm] [143mm] 5⁄8" 5⁄8" [16mm] <sup>5</sup>⁄8" [16mm] [101mm] [101mm] - 4" -[101mm] [16mm] - 51/5"-[140mm] [140mm] - 5½"-[140mm] 51/2"-MFL (SPT, NFL optional) NFL (SPT, MFL optional) **SRR-06120** SRR-06115 SRR-06125 6" Open Appearance Downlight 6" Open Appearance Adjustable 6" Lensed Wall Wash 1500L 1500L 1500L 11<sup>7</sup>/<sub>8</sub>" [300mm] -11%" sq [302mm]-11<sup>7</sup>⁄<sub>8</sub>" sq [302mm]· 61/2 5<sup>5</sup>⁄8" [143mm] 5<sup>5</sup>/8" [143mm] 156mm] 5/8" [16mm] 5⁄8" 5⁄8" 6" [152mm] -6" [152mm]--7<sup>1</sup>/<sub>8</sub>" [181mm]-6" [151mm]-[16mm] [16mm] - 71/8" [181mm]--7½" [181mm]-MFL (SPT, NFL optional) NFL (SPT, MFL optional)



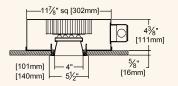


# Recessed Round Luminaires 2500L+ High Output

## **Downlight**



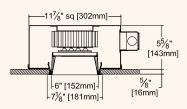
SRR-04600 4" Open Appearance Downlight 2500L



MFL (SPT, NFL optional)

## SRR-06602

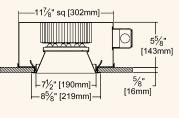
6" Open Appearance Downlight 2500L, 4000L, 5000L



MFL (SPT, NFL optional)

## SRR-07604

7" Open Appearance Downlight **2500L, 4000L, 5000L, 6500L** 



MFL (SPT, NFL optional)

## **The Kirlin Difference**

Each luminaire in the Symphony series has been engineered to meet the Kirlin standard of quality, which has been the company's hallmark since 1895.

All aluminum rust-proof and corrosion-resistant housings ensure optimal thermal management for system safety and longevity. Numerous trim finishes, optical distributions, lumen packages, and color temperatures enable even the most discerning lighting designer to achieve their desired aesthetic.







# **Recessed Square Luminaires 1500L Low Output**

### **Downlight Adjustable** Wall Wash **SRS-04160** SRS-04150 SRS-04155 4" Lensed Wall Wash 4" Open Appearance Downlight 4" Open Appearance Adjustable 1500L 1500L 1500L -111//8" sq [302mm]--117⁄/8" sq [302mm]--11<sup>7</sup>/<sub>8</sub>" sq [302mm]— 55%' $\bigcirc$ 5<sup>5</sup>⁄8" [143mm] [143mm] 5⁄8" [16mm] 45/8"- [117mm] 5⁄8" 45%"-[117mm] [16mm] \_ 5<sup>7</sup>/<sub>8</sub>"\_\_\_\_ [149mm] 57/8"-[149mm] MFL (SPT, NFL optional) NFL (SPT, MFL optional) ₹ 20-29

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# Recessed Square Luminaires 2500L+ High Output

### **Downlight Adjustable** Wall Wash SRS-04652 **SRS-04640** SRS-04646 4" Lensed Wall Wash 4" Open Appearance Downlight 4" Open Appearance Adjustable 2500L 2500L 2500L -11<sup>7</sup>⁄<sub>8</sub>" sq [302mm]--11<sup>7</sup>⁄<sub>8</sub>" sq [302mm]– -11<sup>7</sup>⁄<sub>8</sub>" sq [302mm]-5<sup>5</sup>/8" [143mm] 4<sup>3</sup>⁄8" [111mm] 9<sup>1</sup>/2" [241mm] $\bigcirc$ $\bigcirc$ 5⁄8" [16mm] [117mm] 4%" <sup>5</sup>⁄8" [16mm] [117mm] -4<sup>5</sup>/8" -5<sup>7</sup>/8" [149mm] - 51/8 [117mm] 5/8" [140mm] [16mm] -4%"-[149mm] -5%"-[149mm] MFL (SPT, NFL optional) NFL (SPT, MFL optional) PPPPP



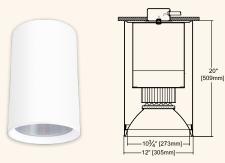
# Surface Round Luminaires 2500L+ High Output

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MFL (SPT, NFL optional)

### SSR-12624

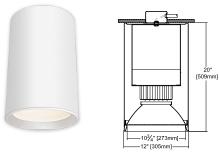
12" x 20" Open Appearance Cylinder Downlight **2500L, 4000L, 5000L, 6500L** 



MFL (SPT, NFL optional)

## SSR-12628

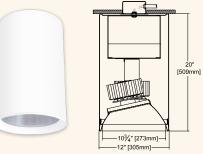
12" x 20" Lensed Cylinder Downlight **2500L, 4000L, 5000L, 6500L** 





## SSR-12626

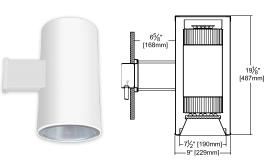




NFL (SPT, MFL optional)

## SWR-09630

9" x 19" Open Appearance Direct-Indirect Cylinder 2500L



MFL

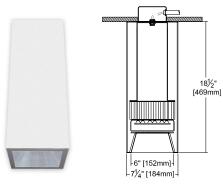




# Surface Square Luminaires 2500L+ High Output

### **SSS-07656**

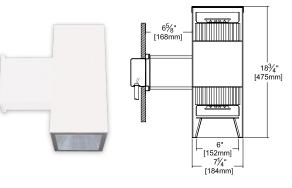
7" x 18" Open Appearance Surface Square Downlight 2500L, 4000L, 5000L, 6500L



MFL (SPT, NFL optional)

### SWS-07660

7" x 19" Open Appearance Wall-Mounted Direct-Indirect **2500L** 



MFL



## **Surface Sconces**







DMX Power Supply System

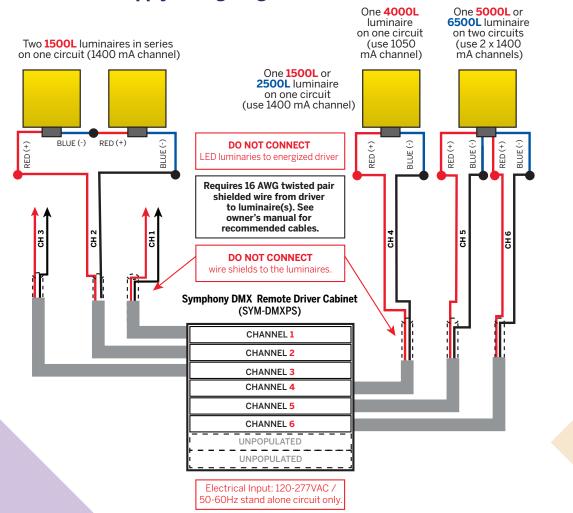
## SYM-DMXPS

The Symphony DMX Power Supply supports up to 16 luminaires from the 1500L series, 8 luminaires from the 2500L or 4000L series, and 4 luminaires from the 5000L or 6500L series, with:

- · Best in class dim to black theatrical dimming
- System configuration via RDM
- Specifiable capacity (from 1 to 8 channels) for maximum flexibility
- Simple mounting in any convenient, serviceable location (within 250 feet of all connected luminaires)
- Five year Kirlin warranty

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### DMX Power Supply Wiring Diagram



# 0-10V Driver Cabinet System

## **SYM-CABNT**

The Symphony 0-10V driver cabinet supports up to 16 luminaires from the 1500L series, 8 luminaires from the 2500L or 4000L series, and 4 luminaires from the 5000L or 6500L series, with:

- · Best in class dim to black theatrical dimming
- Modular capacity for maximum flexibility, with DVR-1400A and DVR-1050A ordered individually
- Simple mounting in any convenient, serviceable location (within 250 feet of all connected luminaires)
- Five year Kirlin warranty



One 4000L

luminaire

on one circuit

One 5000L or

6500L luminaire

on two circuits



#### Driver modules mounted inside cabinet

#### (use DVR-1050A) (use 2 x DVR-1400A) on one circuit (use DVR-1400A) One **1500L** or 2500L luminaire on one circuit (use DVR-1400A) RED (+) BLUE (-) RFD (+) DO NOT CONNECT BLUE (-) RED (+) BLUE (-) BLUE (-) BLUE (-) RED (+) RED (+) LED luminaries to energized driver For Symphony Installations, use of Symphony 0-10V Driver Modules are REQUIRED or Kirlin warranty is null and void. Requires 16 AWG twisted pair shielded wire from driver module to luminaire(s). See owner's manual for recommended cables Ч 풍 E DO NOT CONNECT wire shields to the luminaires Symphony 0-10V Remote Driver Cabinet (SYM-CABNT) 1 DVR-1400A/DVR-1050A 2 DVR-1400A/DVR-1050A DVR-1400A/DVR-1050A 3 4 DVR-1400A/DVR-1050A DVR-1400A/DVR-1050A 5 6 DVR-1400A/DVR-1050A 17 SPACE FOR FUTURE USE SPACE FOR FUTURE USE Electrical Input: 120-277VAC / 50-60Hz stand alone circuit only

## 0-10V Driver Wiring Diagram

Two 1500L luminaires in series

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# Options and System Accessories

## **Luminaire Options**

### **Lenses and Trims**

- -13 Clear flat polycarbonate below with prismatic flat lens above
- -23 Frosted microprismatic lens instead
- -30F White enamel (flange only)
- -30T White enamel (complete trim)
- -32 White oversize trim extender
- -33 Tempered glass Glow Ring suspended beneath trim; shape matches reflector
- -35F Silver enamel (flange only)
- -35T Silver enamel (complete trim)
- -37F Dark bronze enamel (flange only)
- -37T Dark bronze enamel (complete trim)
- -38F Black enamel (flange only)
- -38T Black enamel (complete trim)
- -45 Gasket between trim and ceiling
- -46 Gasket between lens and trim
- -62T Clear specular self-flanged reflector
- -70T Clear semi-specular SofTex<sup>™</sup> (complete trim)
- -94 Custom color/finish; specify; consult factory
- -CF Custom color filter (Rosco); specify
- -DF Electrically isolated "dead front" gasketed trim (LED)
- -WA White acrylic (flat) diffuser instead

### **Recessed Housings**

- -79 Extension collar for ceilings up to 2" thick
- -AT Air tight version; Meets ASTM E283 restricted airflow of 2 CFM maximum (for Type IC)
- -RH Residential mounting hardware instead; suitable for wood joist spacings 14 1/8" 25 7/8"
- -SH Sealed housing/CCEA approved; (non IC)

### System Accessories - Emergency Backup

- Two models available:
  - EMI-21220 operates one fully loaded
    - SYM-DMXPS or SYM-CABNT
  - EMI-03120 operates 3 DMX channels or 3 DVR modules
- High efficiency pure sine wave inverter
- 100% light output for up to 2 hours
- 120/277V, 60Hz input
- May be mounted up to 1000 feet from load
- Less than 0.05 seconds transfer time
- UL 924 Listed, Meets or exceeds NEC and Life Safety Code Emergency Lighting Requirements
- Three year Kirlin warranty

### Surface Housing Finishes (White standard)

- -35 Silver enamel finish
- -37 Dark bronze enamel finish
- -38 Black enamel finish
- -94 Custom color/finish; specify; consult factory

### Surface/Pendant/Wall Bracket Mounting

- -80 2" collar for mounting beneath surface outlet box; ½" T.S. KO's; must add Option -89 for wet label listing
- -87 Custom pendant/wall bracket length; specify length; must add Option -PM or -WB to surface mounts
- -88 Swivel canopy for sloped ceilings up to 40°; use with Option -PM
- -89 Sealed top WeatherCap<sup>™</sup> for surface, pendant or wall bracket mounts; required for wet label (Direct/Indirects are standard with gasketed tempered prismatic glass WeatherCap<sup>™</sup> and are UL Listed Wet Label)
- -PM Pendant mount. 48" stem plus 4" offset; also see Option -87; must add Option -89 for wet label listing
- -WB Wall bracket mount; must add Option -89 for wet label listing; also see -87

### Other

- -99 Special modification; consult factory
- -FS Single in-line fuse
- -FD Dual in-line fusing











### "What does Kirlin supply?"

Kirlin supplies the light fixtures (less the internal driver) and a remote cabinet, capable of housing up to (8) driver modules. Symphony can be used with any DMX512 certified controller or an RS232 controller with a DMX converter. A Symphony 0-10V system is utilized with just about any 0-10V control system.

#### "How many Symphony drivers are supported by one DMX512 universe?"

Up to 64 Symphony remote power supplies, (each with 8 addresses) can be supported on one universe.

## "How many luminaires does each Symphony remote driver support?"

Kirlin remote power supplies can have up to (8) driver modules for up to (8) output channels, each 2-wire, Class II, low voltage DC. Each power supply can operate up to (4) 6500 lumen, or (4) 5000 lumen, (8) 4000 lumen, (8) 2500 lumen fixtures, with individual fixture control. (16) 1500 lumen fixtures can be operated on a single remote power supply with (8) driver modules (2 wired in series).

#### "Can I access each individual fixture for use in presets or scene lighting schemes?"

Certainly. Each Symphony driver module receives an address (RDM Programmable). The Symphony remote panel can contain up to (8) driver modules, so a total of (8) addresses per remote panel or, simply program all the driver modules the same address for simple group operation.

### "What input voltage and wiring is needed for Symphony remote drivers?"

Each power supply requires 120 thru 277V input. At 120V, 5 power supply cabinets can be connected on a 20 amp circuit (2.7 amps each). At 277V, 15 power supply cabinets can be operated on the same circuit (1.0 amp each). The DMX512 signal from the DMX controller requires RS485 shielded twisted pair, CAT 5 (or higher) cable with RJ45 connector.

## "Just how good is the low-end dimming range with Symphony?"

As good as you can get in the market today. True, 100% down to 0.1% (or dim to black), standard in 8 bit protocol, available in 16 bit.

## "What wiring is required from the remote driver to the luminaire?"

16 gauge, plenum-rated, shielded twisted pair. For sconces, 1500L, 2500L, and 4000L fixtures, we recommend two-conductor Belden #83702 (plenum) or #8719 (open air). For 5000L and 6500L fixtures, we recommend four-conductor Belden #83704.

## "How far can the luminaires be located from the remote driver?"

Luminaires are limited to 250 feet (each) for all lumen outputs.

### "What happens if we lose the DMX signal?"

All Symphony lighting goes to 100% level. Upon return of the signal, lighting will go to preset level as communicated by the controller. This function can be specified upon ordering to "fail to off," if desired.

### "Does Symphony offer an emergency lighting option or backup system?"

Yes. Optional Symphony SmartPower™ EMI-21220 mini-inverter powers up to 375 watts (one fully loaded remote power supply, either DMX or 0-10V). All luminaires on that power supply will operate at 100% output for over 2 hours with less than 0.05 seconds of transfer time. U.L. 924 Listed.

## "What happens during a power outage without an emergency backup system?"

You would be in the dark! In a power outage, you have lost both input power and your DMX signal. As soon as power is restored, Symphony will turn the lights on at 100% level. As soon as the DMX signal is back on line, the lighting will return to the preset level.





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