

# eColor Cove QLX Powercore Performance linear interior LED cove and accent fixture with solid color light



# eColor Cove QLX Powercore

# Performance linear interior LED cove and accent fixture with solid color light

eColor Cove QLX Powercore represents the next generation of high-quality linear LED cove lighting from Philips Color Kinetics. This elegant, low-profile fixture delivers high-quality solid color light at an affordable price. eColor Cove QLX Powercore is designed to replace traditional cove lighting sources for wall and ceiling glow effects, wall washing, and indirect lighting from a single cove. Multiple colors, beam angles, and lengths afford an abundance of design options.

- Multiple options for design flexibility Available in red, green, blue, and amber, 12 in (305 mm) and 6 in (152 mm) lengths, and wide and medium beam angles.
- Support for multiple voltages eColor Cove QLX
   Powercore accepts power input of 100, 120, or 220
   240 VAC for consistent installation and operation
   from line voltage in many locations.
- Compact and flexible eColor Cove QLX
   Powercore low-profile fixtures fit in narrow alcoves,
   display cases, light boxes, and other tight spaces
   where fixtures requiring ballasts, external power
   supplies, and other auxiliary equipment cannot.
- Integrates patented Powercore technology —
   Powercore rapidly, efficiently, and accurately
   controls power output to fixtures directly from line
   voltage, eliminating the need for external power
   supplies and lowering total system cost.
- Superior color consistency and accuracy —
   Optibin, an advanced binning algorithm, exceeds the recognized standards for color quality to guarantee uniformity and consistency of hue across LEDs, fixtures and manufacturing runs.

- Smooth dimming capability Patented DIMand technology offers smooth dimming capability with selected commercially available reverse-phase ELVtype dimmers.
- Simple installation Powercore delivers line voltage directly to the fixtures, simplifying installation and allowing long product runs. Easyto-install 4 ft (1.2 m) mounting tracks allow quick project setup in linear applications.
- Easy mounting and positioning With end-to-end locking power connectors that can make turns of up to 180°, fixtures are easy to position even in challenging mounting circumstances. Fixtures rotate in 10° increments through a full 180° for precise aiming and mixing. Optional mounting tracks support vertical and overhead positioning. 1 ft (305 mm) and 5 ft (1.5 m) jumper cables can add extra space between fixtures.



#### Smooth dimming capability

Patented DIMand technology offers smooth dimming capability with selected commercially available reverse-phase (ELV-type) dimmers.

# Specifications

Due to continuous improvements and innovations, specifications may change without notice.

Item	Specification	6 in (152 mm)	12 in (305 mm)			
Output	Beam Angle	110° x 110° (wide) / 60° x 115° (medium)				
	Input Voltage	100 / 120 / 220 – 240 VAC, 50 / 60 Hz				
Electrical	Power Consumption	4.0 W maximum at full output, steady state	6.0 W maximum at full output, steady state			
Control	Dimming	Compatible with selected commercially available reverse-phase ELV-type dimmers*				
Physical	Dimensions (Height x Width x Depth)	1.25 x 6 x 1.4 in (32 x 152 x 35 mm)	1.25 x 12 x 1.4 in (32 x 305 x 35 mm)			
	Weight	0.19 lbs (85 g)	0.31 lbs (142 g)			
	Housing	Injection-molded plastic, white finish				
	Lens	Polycarbonate				
	Fixture Connections	Integral male / female connectors				
	Temperature Ranges	-4° - 122° F (-20° - 50° C) Operating -4° - 122° F (-20° - 50° C) Startup -40° - 176° F (-40° - 80° C) Storage				
	Humidity	0 – 95%, non-condensing				
	Maximum Fixture Run Lengths†	115 @ 120 VAC	85 @ 100 VAC 93 @ 120 VAC 134 @ 240 VAC			
Certification and Safety	Certification	UL / cUL, FCC Class B, CE, SAA, C-Tick, CCC				
	Environment	Dry Location, IP20				

Environment \* Refer to www.philipscolorkinetics.com/support/



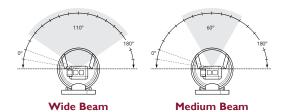






To calculate the number of fixtures your specific installation can support, download the Configuration Calculator from www.philipscolorkinetics.com/support/ install\_tool/

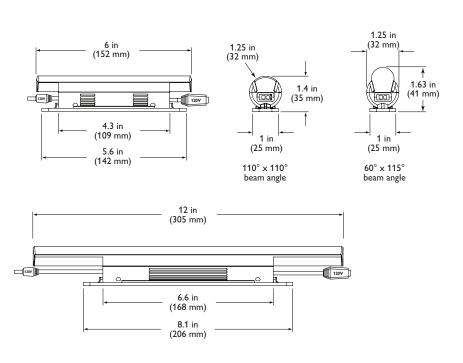
 For help estimating the light output and distribution of eColor lighting fixtures, please contact Philips Color Kinetics Applications Engineering Services at support@colorkinetics.com.



appnotes/ for specific details

† Assumes fixtures installed end-to-end on a 20 A circuit using the standard 10 ft (3 m) Leader Cable. These figures, provided as a guideline, are accurate for this configuration only. Changing the configuration can affect the fixture run lengths.

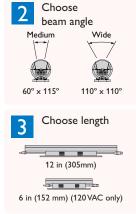
DIMAND OPTIBING POWERCORE\*

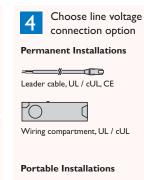


# **Product Selection**

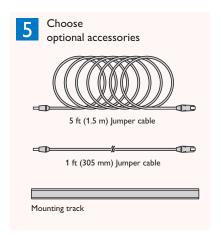
To order eColor Cove QLX Powercore, select a color, a beam angle, and a length (120 VAC only). Then select a line voltage connection option and any additional accessories you might need.







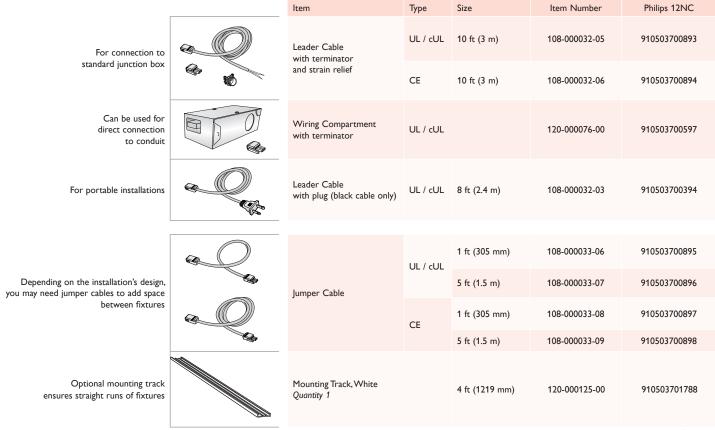
Leader cable, UL / cUL



eColor Cove QLX Powercore		Wide Beam Angle (110° x 110°)				Medium Beam Angle (60° × 115°)			
Fixtures		12 in (305 mm)		6 in (152 mm)		12 in (305 mm)		6 in (152 mm)	
		Item Number	Philips 12NC	Item Number	Philips 12NC	Item Number	Philips 12NC	Item Number	Philips 12NC
100 VAC	Red	223-000004-08	910503701033			223-000004-16	910503701134		
	Green	223-000004-09	910503701034			223-000004-17	910503701135		
	Blue	223-000004-10	910503701035			223-000004-18	910503701136		
	Amber	223-000004-11	910503701036			223-000004-19	910503701137		
120 VAC	Red	223-000004-00	910503701025	223-000005-00	910503701037	223-000004-12	910503701130	223-000005-04	910503701205
	Green	223-000004-01	910503701026	223-000005-01	910503701038	223-000004-13	910503701131	223-000005-05	910503701206
	Blue	223-000004-02	910503701027	223-000005-02	910503701039	223-000004-14	910503701132	223-000005-06	910503701207
	Amber	223-000004-03	910503701028	223-000005-03	910503701040	223-000004-15	910503701133	223-000005-07	910503701208
220 – 240 VAC Fixture only	Red	223-000004-04	910503701029			223-000004-20	910503701138		
	Green	223-000004-05	910503701030			223-000004-21	910503701139		
	Blue	223-000004-06	910503701031			223-000004-22	910503701140		
	Amber	223-000004-07	910503701032			223-000004-23	910503701141		

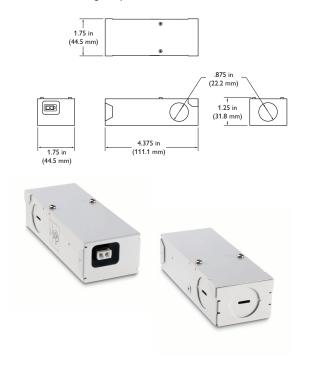
Use Item Number when ordering in North America.

# Accessories



Use Item Number when ordering in North America.

#### UL / cUL Wiring Compartment



## Installation

eColor Cove QLX Powercore offers high-output, energy-efficient solid color alcove lighting with Powercore technology. Powercore, which delivers line voltage directly to the fixture, eases installation by eliminating the need for external power supplies or special wiring.

#### **Owner / User Responsibilities**

It is the responsibility of the contractor, installer, purchaser, owner, and user to install, maintain, and operate eColor Cove QLX Powercore fixtures in such a manner as to comply with all applicable codes, state and local laws, ordinances, and regulations. Consult with the appropriate electrical inspector to ensure compliance.

# Create a Layout Plan

Regardless of the size and complexity of your installation, the time you spend planning can help minimize installation and configuration issues later. Keep these suggestions in mind as you plan your installation:

- On an architectural diagram or other diagram that shows the physical layout of
  the installation, create a layout map that specifies the appropriate location of the
  light fixtures in relation to each other, and to any dimmer switches, wall switches,
  and line power sources. Identify any obstacles or physical features requiring flexible
  jumper cables between fixtures.
- Using the fixture's power consumption and efficiency ratings, the lighting designer
  or architect should calculate the cove dimensions to ensure that operating
  temperatures remain within safe levels. The designer or architect should also
  determine the cove's fascia design and fixture setback based on the cove
  dimensions and room width. We strongly recommend creating dimensional models
  and mockups prior to installation.
- eColor Cove QLX Powercore fixtures are installed in series. The in-line connectors allow end-to-end fixture connections for the best visual effects. Joined directly together, the connectors allow for up to 1 in (25 mm) spacing without a jumper cable. When you need more spacing between fixtures, use the 1 ft (305 mm) or 5 ft (1.5 m) jumper cables.
- You can install a run of eColor Cove QLX Powercore fixtures using the 10 ft
  (3 m) Leader Cable with flying leads. This option is preferable when connecting
  to a third-party junction box, or when retrofitting an existing incandescent or
  fluorescent cove lighting installation.
- In North America, you can use the Wiring Compartment when you want to run branch conduit all the way to the first fixture in a series, or where local codes require it. You can also create a portable installation by using the 8 ft (2.4 m) Leader Cable with plug.
- If fixtures are installed end-to-end on a 20 A circuit using the standard 10 ft (3 m) Leader Cable, each run can accommodate up 134 12 in (305 mm) fixtures, or up to 165 6 in (152 mm) fixtures. Using the optional jumper cables can decrease the number of fixtures that you can connect in a single run.

# Install Wall and Dimmer Switches (Optional)

eColor Cove QLX Powercore fixtures can be controlled either with a standard wall switch (on / off) or a compatible, commercially available reverse-phase ELV-type dimmer.

For information on selecting the appropriate dimmer for your lighting installation, visit www.philipscolorkinetics.com/support/appnotes, or consult Applications Engineering services at support@colorkinetics.com.

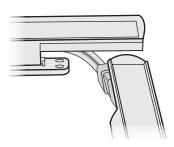
#### Included in the box

eColor Cove QLX Powercore fixture Installation Instructions

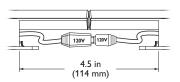
Refer to the eW / eColor QLX Cove Powercore Installation Instructions for specific warning and caution statements.

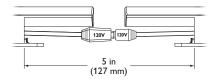
#### Easy turns

End-to-end locking power connectors can make turns of up to 180° without jumper cables.



#### Distance between fixtures





❸ To calculate the number of fixtures your specific installation can support, download the Configuration Calculator from www.philipscolorkinetics.com/support/ install\_tooll, or consult Philips Color Kinetics Application Engineering Services at support@colorkinetics.com.

Refer to the installation instructions included with the wall or dimmer switch for installation and wiring information.

# Prepare for the Installation

- 1. Verify that all supporting equipment (switches, line power sources) is in place.
- If your installation calls for jumper cables to add space between fixtures, make sure they are available.
- 3. Ensure that all additional parts (optional mounting tracks, mounting hardware, terminators) and tools are available.

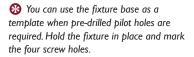
### Install the Fixtures

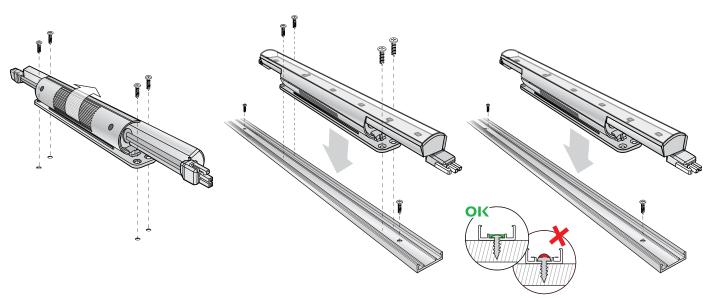
You can mount eColor QLX Powercore fixtures directly to a wall, ceiling, cabinet, or other secure surface. You can install several eColor Cove QLX Powercore fixtures in optional 4 ft (1.2 m) lengths of mounting track to ensure a straight run.

#### **Install Mounting Tracks (Optional)**

- 1. Field-cut the mounting tracks to the desired length with a hacksaw or tin snips.
- 2. Install the mounting tracks using hardware suitable for the mounting surface.

To ensure proper fixture fit, hardware must not extend above the track standoffs after installation. The recommended maximum spacing between screws is 12 in (305 mm).





#### **Mount and Connect the Fixtures**

Make sure the power is OFF before mounting and connecting eColor Cove QLX Powercore fixtures.

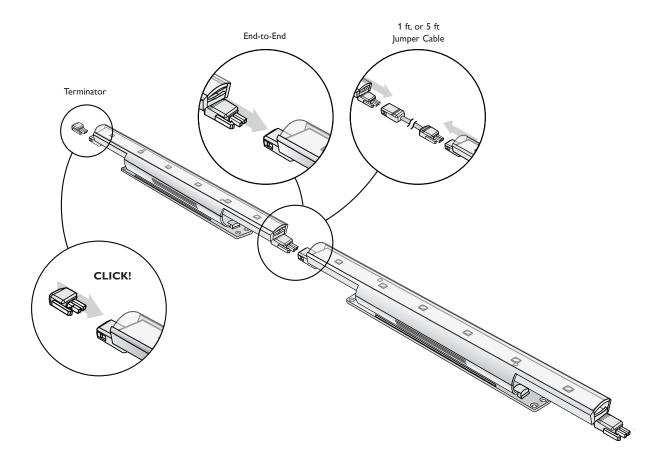
- 1. Rotate an eColor Cove QLX Powercore fixture as necessary to provide unobstructed access to the mounting holes.
- 2. Position the first fixture in a series.

If using mounting tracks on a horizontal surface, snap the fixture into the track.

If using mounting tracks on vertical or overhead surfaces, or if not using mounting tracks, attach the fixture with four #6 (3.5 mm) mounting screws (not included) suitable for the mounting surface.

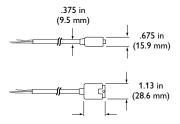
Ensure that the male connector is in position to receive power from the female connector on the Leader Cable or Wiring Compartment.

3. Position the next fixture in the series, matching the male connector end to the female connector of the previously mounted fixture. Attach the fixture to the surface or snap it into the track.



- 4. Continue mounting the fixtures, making power connections as you go, until all lights in the series are mounted.
- 5. Insert the provided terminator into the last fixture in the series.

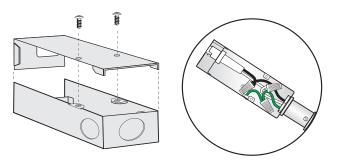
#### Leader Cable connector dimensions



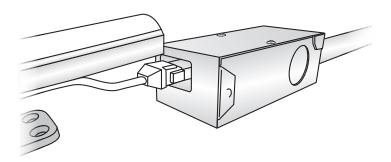
#### **Make Power Connections**

To run power to conduit to the first fixture in a series (permanent UL / cUL installations):

- 1. Remove the cover from the eColor Cove Powercore Wiring Compartment.
- 2. Using wire nuts, connect ground, neutral, and line inside the Wiring Compartment housing, then replace the cover.
- 3. Connect the eColor Cove Powercore Wiring Compartment to the first fixture in the series.

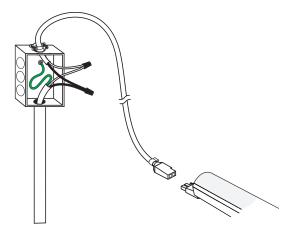


To connect the first fixture in a series to a third-party junction box



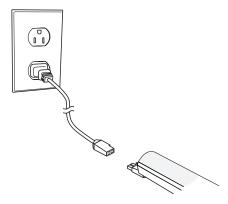
#### using the 10 ft (3 m) Leader Cable (permanent installation):

- 1. Remove the cover of the third-party junction box.
- 2. Connect ground, neutral, and line inside the junction box housing, then replace the junction box cover.
- 3. Connect the 10 ft (3 m) Leader Cable to the first fixture in the series.



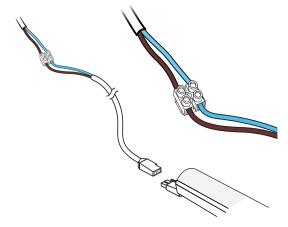
#### For portable installations (UL / cUL):

- 1. Plug the 8 ft (2.4 m) Leader Cable into a suitable switched outlet.
- 2. Connect the Leader Cable to the first fixture in the series.



#### For CE installations:

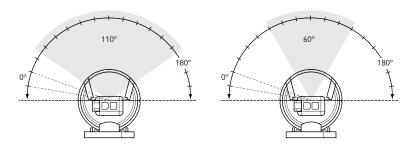
- 1. Connect the Leader Cable to the terminal block. The terminal block must conform to EN 60998-2-1 or EN 60998-2-2, rated 220–240 VAC.
- 2. Connect ground, neutral, and line to a power source.
- 3. Connect the Leader Cable to the first fixture in the series.



# Aim the Fixtures

Make sure the power is ON before aiming fixtures.

Aim the fixtures by rotating each fixture to the correct angle. There are detents every  $10^{\circ}$  in the bracket that hold the fixture in position.



**&** Do not look directly into beam when aiming fixtures.

