



Table of Contents

| | |
|---|--------------------------------|
| 1 | Product Description |
| 1 | Technical Specifications |
| 2 | Requesting Samples & Pricing |
| 2 | Electrical Characteristics |
| 3 | Absolute Maximum Ratings |
| 3 | Derating |
| 4 | Mechanical Characteristics |
| 4 | Recommended Compatible Drivers |
| 5 | Optical Specifications |
| 6 | Color Binning Information |
| 8 | Ordering from LUXTECH |

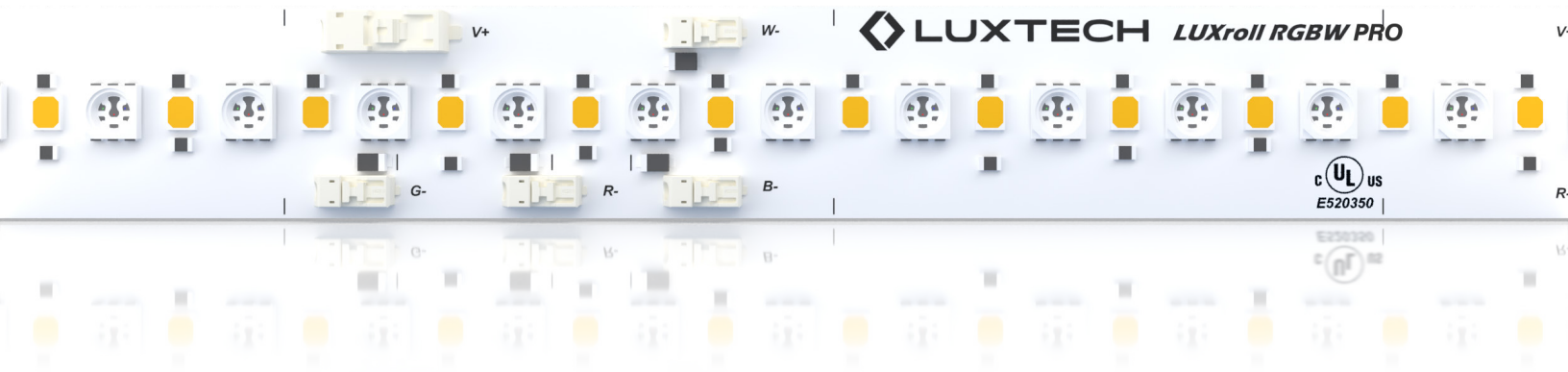
LUXroll™ Pro RGBW CV

FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

PRODUCT DESCRIPTION

LUXroll Pro RGBW CV uses 3 in 1 RGB LEDs, poke in connectors, and a cut length of 2 inches for easy installation in any application. Color uniformity is matched across each order and for any run length up to 4 feet.



TECHNICAL SPECIFICATIONS

Mechanical Information

- Flexible reeled form factor
- Cuttable Every 2 in
- Specification-Grade 3M 300LSE Adhesive Backing
- LED Pitch: 0.5 in
- Width: 0.787 in (20mm)
- Reel Length: 44'

Photometric Performance

- Nominal Lumen Output: 820 lm/ft (3500K, 90CRI)
- Beam Angle: 120°
- CCT Range: 2700K - 6500K
- 90+ CRI Standard
- 3-Step MacAdam Ellipse Color Binning

Electrical Information

- UL 2108 Listed: E520350
- Poke-In Connectors
- 24V Constant Voltage Input, Common Anode
- DMX Controllable in 4 channels
- On Board ESD Protection
- Max Recommended Run Length: 4 ft
- Wire Size: 18-24 AWG, solid or stranded

Lifetime Information

- LM-80 Tested LEDs by CREE
- L70 > 102,000 Hrs for Ts = 85°C, 60mA Per Section
- L70 > 102,000 Hrs for Ts = 105°C, 60mA Per Section
- 5-Year Warranty



LUXroll™ Pro RGBW CV

FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

REQUESTING SAMPLES & PRICING

| | | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |
| | | - | | - | | | | - |

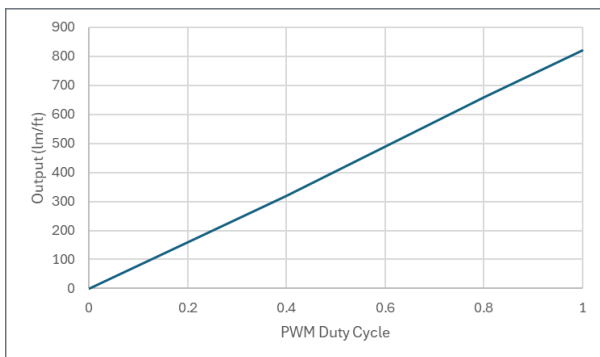
| 1: SERIES | 2: PRODUCT FAMILY | 3: PRODUCT LINE | 4: TAPE | 5: OPTICS |
|---------------|-------------------|-----------------|---|---|
| LT Luxtech | 08 LUXroll | 13 Pro RGBW CV | 1 Yes | A No |
| 6: PROTECTION | 7: RESERVED | 8: RESERVED | 9: COLOR | |
| 0 No | 0 blank | 0 blank | 2790 2700K 90 CRI 3090* 3000K 90 CRI 3590* 3500K 90 CRI 4090 4000K 90 CRI 5090 5000K 90 CRI 6590 6500K 90 CRI *normally stocked | *Normally Stocked Part Number: LT08-13-1A000-3590 Description: LUXroll, Pro RGBW CV, 3500K, 90CRI, Tape, 44 ft reel UOM: 44 ft reel |

ELECTRICAL CHARACTERISTICS

Assuming 35K, 90 CRI, 45 °C

| CHANNEL | CURRENT (mA/ft) | VOLTAGE (V) | LUMENS (lm/ft) | POWER (W/ft) |
|---------|-----------------|-------------|----------------|--------------|
| RED | 115 | 24 | 47 | 2.8 |
| GREEN | 139 | 24 | 178 | 3.3 |
| BLUE | 134 | 24 | 43 | 3.2 |
| WHITE | 267 | 24 | 821 | 6.5 |

WHITE OUTPUT VS. PWM CYCLE



*LUXTECH maintains a tolerance of ±7.5% on flux measurements.

*Performances will vary based on specific installation and thermal conditions.

*LEDs naturally exhibit slight variations in performance due to their material properties and manufacturing processes. These variations may affect performance parameters like brightness, voltage, and color.

*The product is sensitive to moisture. It's not good to use for outdoor application or damp environment.

LUXroll™ Pro RGBW CV

FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

ABSOLUTE MAXIMUM RATINGS

Assuming 35K, 90 CRI

| CHANNEL | CURRENT (mA/ft) | VOLTAGE (V) | LUMENS (lm/ft) | POWER (W/ft) |
|---------|-----------------|-------------|----------------|--------------|
| RED | 161 | 27 | 65 | 4.3 |
| GREEN | 167 | 27 | 201 | 4.5 |
| BLUE | 164 | 27 | 50 | 4.4 |
| WHITE | 373 | 27 | 1107 | 10.1 |

| COMPONENTS | |
|---------------------------------|---|
| Max Connector Current (A) | 9 |
| Max Recommended Run Length (ft) | 8 |

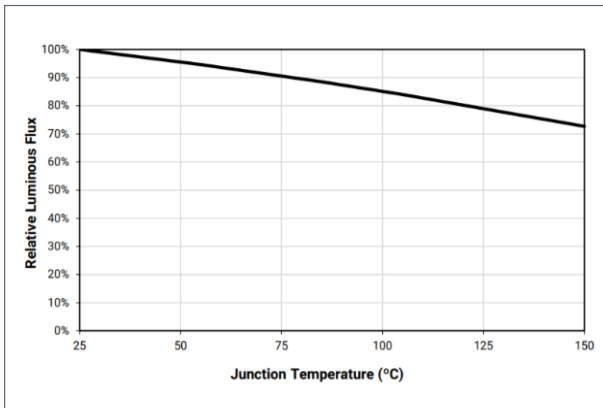
DERATING

| COLOR TEMPERATURE | LIGHT OUTPUT |
|-------------------|--------------|
| 2700K | 98% |
| 3000K | 100% |
| 3500K | 100% |
| 4000K | 103% |
| 5000K | 103% |
| 6500K | 103% |

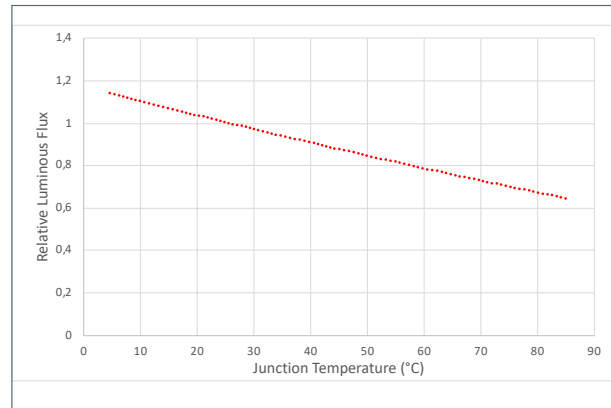
| CRI | LIGHT OUTPUT |
|--------|--------------|
| 90 CRI | 100% |

FLUX VS. TEMPERATURE

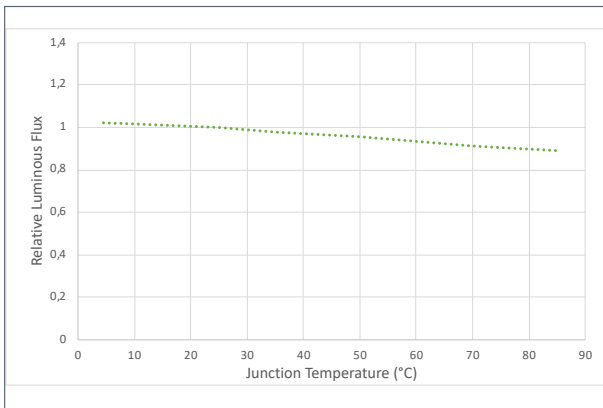
WHITE



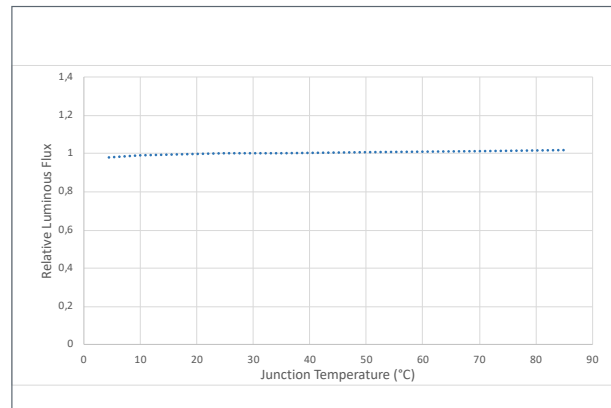
RED



GREEN



BLUE



LUXroll™ Pro RGBW CV

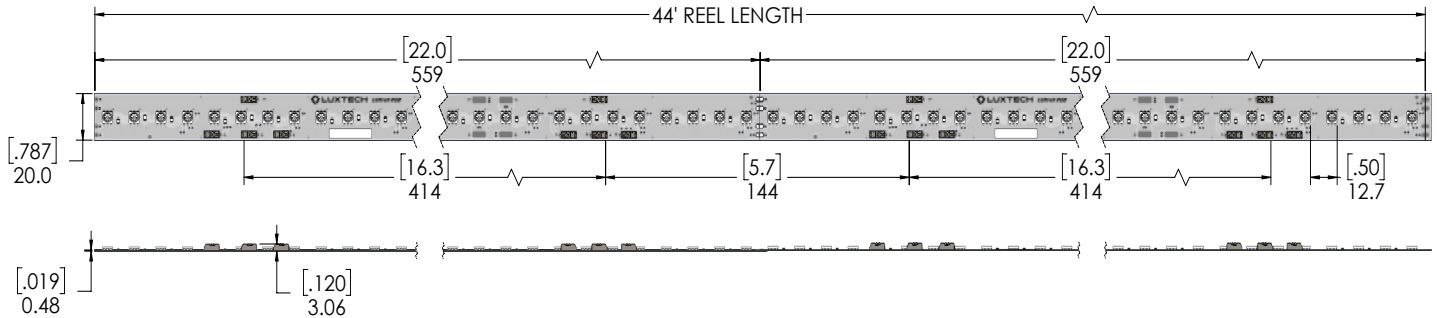
FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

MECHANICAL CHARACTERISTICS

Technical Drawing

Units: [inches] mm

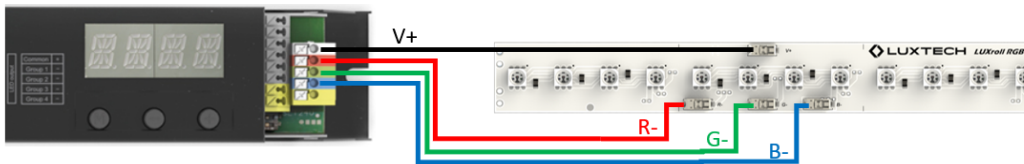


Product Dimensions

| PARAMETER | SPECIFICATION (IN) |
|---|---------------------|
| Width | 0.787 |
| Length | 44 ft (528 in) Reel |
| Cut Length | 2.0 |
| PCB Thickness | 0.009 |
| Module Thickness, to Connector Top | 0.12 |

Wiring

| PARAMETER | SPECIFICATION |
|------------------|---------------|
| Wire Size | 18-24 AWG |



RECOMMENDED COMPATIBLE DRIVERS

| BRAND | MODEL | PROGRAMMABLE DRIVE CURRENT (MA) | OUTPUT VOLTAGE (V) | DIMMING |
|----------------|-------------|---------------------------------|--------------------|------------|
| EldoLED | LINEARdrive | 1000 per output | 12-24 | DMX / DALI |

CONTROLLER SELECTION

| RECOMMENDED BRANDS | MODEL | CONTROL TYPE | NEEDED ACCESSORIES |
|--------------------|-----------------|--------------|---|
| Lunatone | DALI Touchpanel | DALI | Lunatone PS2 30mA DALI Bus Power supply |

Design resources: CAD files available at LUXTECH.com

LUXroll™ Pro RGBW CV

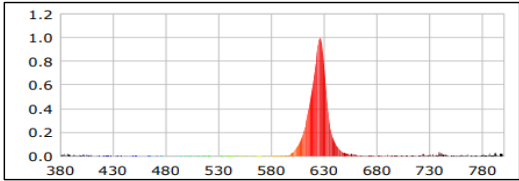
FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

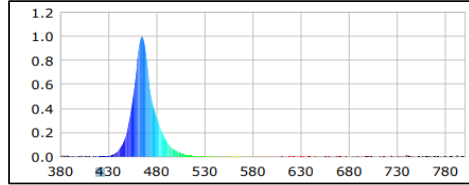
OPTICAL SPECIFICATIONS

Spectral Power Distribution

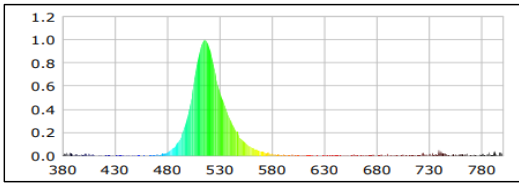
RED



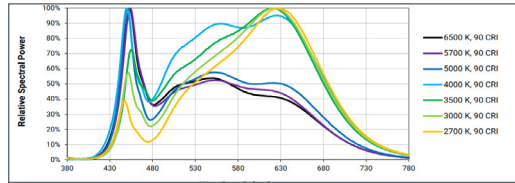
BLUE



GREEN

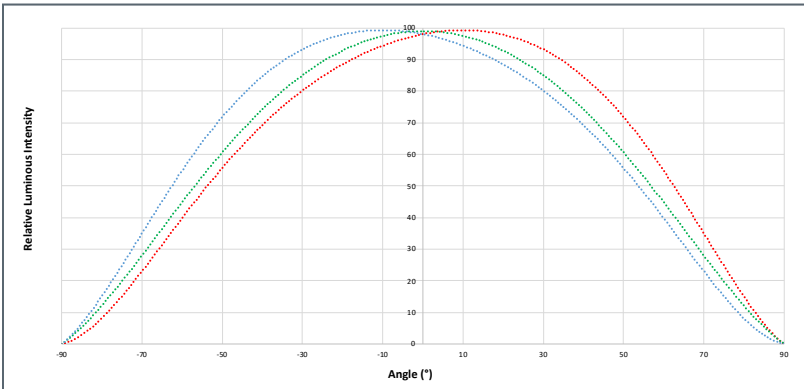


WHITE

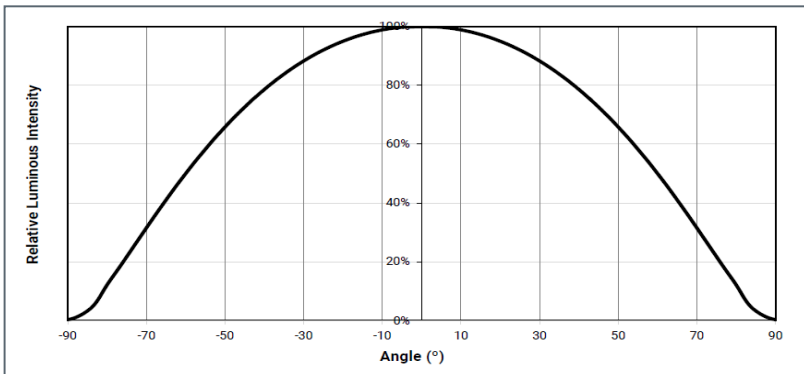


BEAM ANGLE

RGB



WHITE

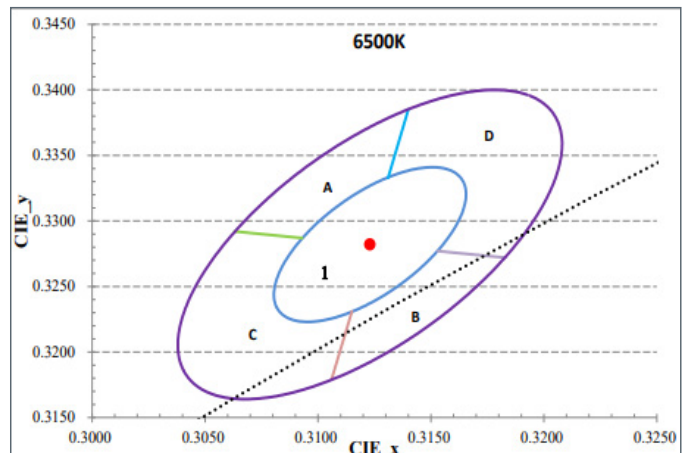
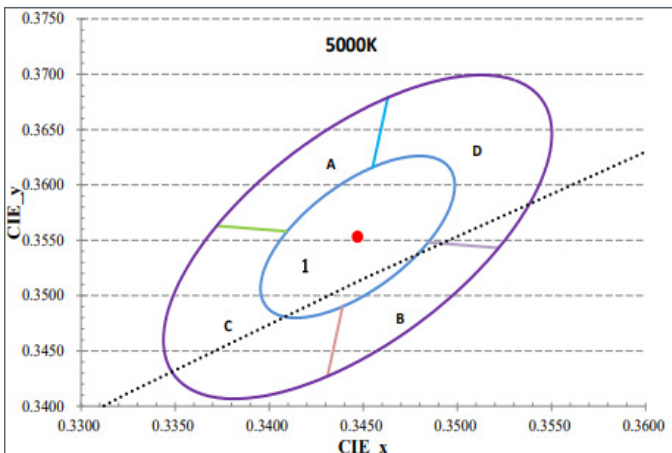
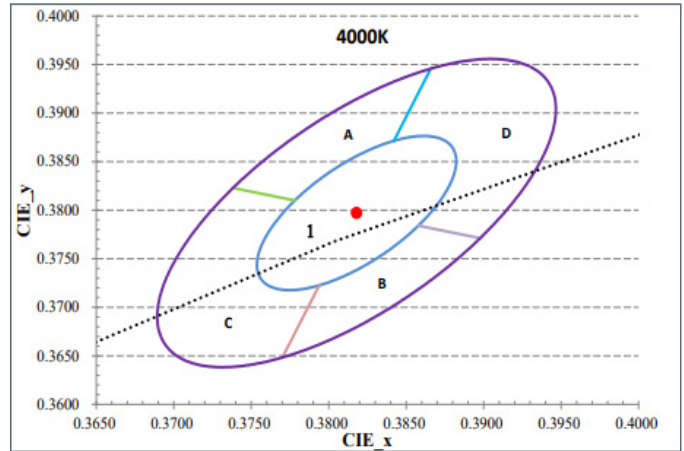
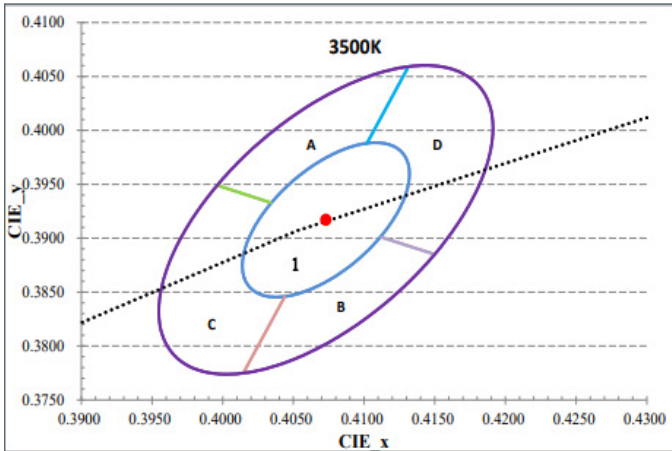
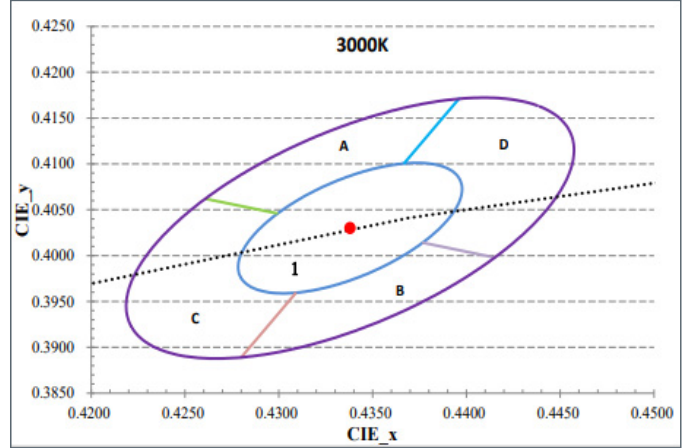
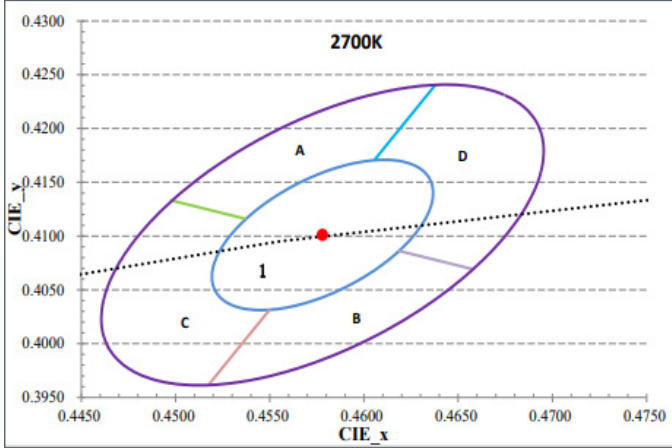


LUXroll™ Pro RGBW CV

FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

COLOR BINNING INFORMATION



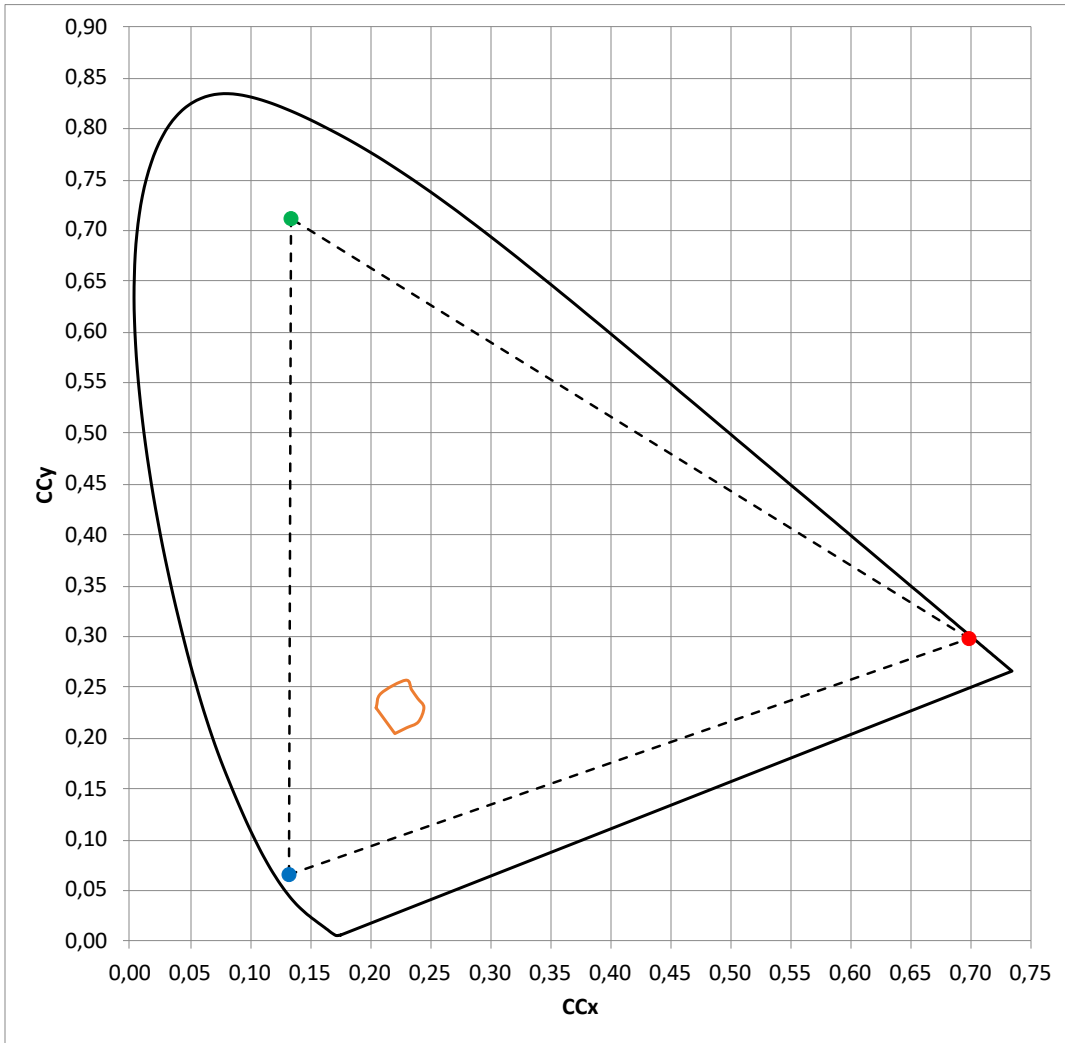
LUXroll™ Pro RGBW CV

FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

COLOR BINNING INFORMATION

RGB WHITE BIN



LUXroll™ Pro RGBW CV

FLEXIBLE LED MODULE DATA SHEET

Request Samples & Pricing [Here](#)

REQUESTING SAMPLES & PRICING

| | | | | | | | | |
|---|---|---|---|---|---|---|---|---|
| 1 | 2 | 3 | 4 | 5 | 6 | 7 | 8 | 9 |
| | | - | | | | | | |

| 1: SERIES | 2: PRODUCT FAMILY | 3: PRODUCT LINE | 4: TAPE | 5: OPTICS |
|---------------|-------------------|-----------------|---|---|
| LT Luxtech | 08 LUXroll | 13 Pro RGBW CV | 1 Yes | A No |
| 6: PROTECTION | 7: RESERVED | 8: RESERVED | 9: COLOR | |
| 0 No | 0 blank | 0 blank | 2790 2700K 90 CRI 3090* 3000K 90 CRI 3590* 3500K 90 CRI 4090 4000K 90 CRI 5090 5000K 90 CRI 6590 6500K 90 CRI *normally stocked | *Normally Stocked Part Number: LT08-13-1A000-3590 Description: LUXroll, Pro RGBW CV, 3500K, 90CRI, Tape, 44 ft reel UOM: 44 ft reel |

If customization is required, contact sales: sales@LUXTECH.COM

Prototyping

- 3.5 week lead time for new design prototypes

Single Order

- MOQ: 250 pieces per SKU
- Typical lead time: 6-8 weeks

Blanket Order

- MOQ: 1,000 pieces per SKU
 - Minimum release size: 250 pieces
 - Quantity per SKU must be specified
- 2.5 week lead time for blanket releases
 - 6-8 week set up time for first release
 - 6 month term for first release
 - Shipment of balance at end of term

Expedite Services

- Dedicated expedite facility can turn jobs in as little as 1 week