



Lighting for Style and Sustainability

LED Lamps





The environment is rich with natural color.
Color that defines our world and makes it extraordinary.
Color that fuels expression and inspires brilliance.

Bring the appeal of true color inside—into your own space,
with Cree innovation and true craftsmanship.

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Where Artistry & Engineering Blend to Reveal Natural, Beautiful Color



LRP-38™



HIGH-GRADE
Materials & LEDs

Inside each lamp are high-grade Cree LEDs, made from the finest materials and grown by experts in our own labs, giving our lamps their unsurpassed 92+ CRI and up to 74 LPW.

LRP38-10L-12D



INTELLIGENT
Electronics

An electronic feedback system is integrated into every lamp to enable active color management. High efficiency drivers are also incorporated to help maximize energy savings.

LRP38-10L-25D



ADVANCED
Optics

Individually optimized optics are designed for both visual appeal and precise control in order to maximize photometric performance, aesthetics, and color rendering all at once.

LBR-30™



INTEGRAL
Thermal Control

Advanced heat sink and heat piping technologies are integrated to maximize the cooling effectiveness of each lamp, making their high performance and longevity possible.



Proven Performance, Revolutionary Technology

Powered by **Cree TrueWhite® Technology**, only Cree LED lamps can deliver our exclusive combination of 92+ CRI light, industry-leading efficacy, and consistent, warm halogen-like color characteristics.

Since the introduction of our very first downlight, the **Cree TrueWhite® Technology** advantage has come from mixing the light from red and Cree unsaturated yellow LEDs—among the highest-performing LEDs on the market. With the introduction of our LED lamp collection, we've now advanced this patented approach further with a revolutionary multi-chip LED that miniaturizes the technology into a single, compact component.

With this reinvention of **Cree TrueWhite® Technology**, our LED lamps can achieve the same precision tuning as our fixtures, but with fewer components needed to deliver their high-quality light—promising you the same lifelong lamp-to-lamp color consistency with no compromise in efficacy.

CREE 
TRUE WHITE
TECHNOLOGY



The Result:

Unmatched Color Rendering



Color is a powerful element in every space. It establishes the tone and personality of our homes and businesses. It not only shapes our moods, it can influence our buying decisions and enhance our ability to learn and interact.

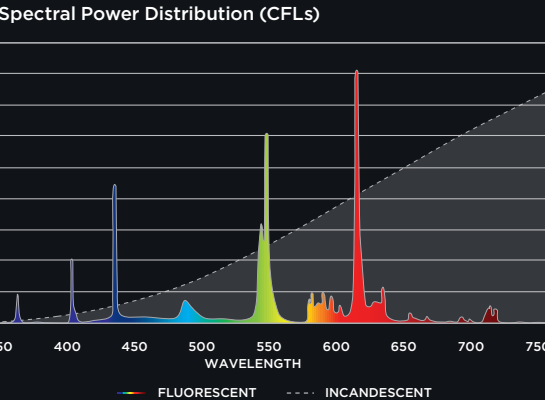
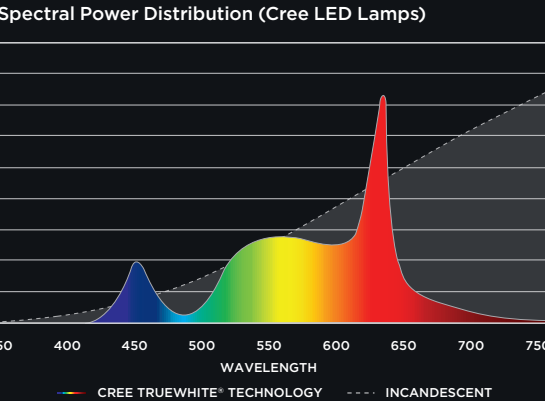
People are naturally drawn to rich colors. Vibrant shades of fruit and produce reveal their freshness. Our own natural skin tones reveal our health and facilitate better human interaction. Colorful settings appeal to our senses, engaging students, shoppers, and employees alike.

In these ways, the color rendering property of light plays a critical role in creating spaces that appeal, inspire, and inform. With 92+ CRI, our entire collection of LED lamps beautifully render the true colors of everything from flowers to apparel, delivering value far beyond their energy savings.



LIKE HALOGEN, BUT BETTER
The Spectral Power Distribution (SPD) curves shown here provide a great way to compare the color characteristics of Cree TrueWhite® Technology with traditional technologies. At each point across the visible color spectrum, the height of the SPD curve correlates with how accurately that color is rendered by the light source.

The fuller, more continuous curve of Cree TrueWhite® Technology enables our LED lamps to precisely render a much larger color set than CFLs. The similarities in the Cree TrueWhite® Technology and incandescent SPD curves also give our lamps their signature halogen-like light, while still using a fraction of the energy of even CFLs.



The Result:

Sustainable Return on Investment

Now is the time to lead by example with sustainable building practices that improve not only your business, but our world as well. Cree LED lamps offer significant energy and maintenance savings compared to traditional lighting, helping you create both environmentally and economically sustainable spaces.

Improve Your Business.



OPERATIONAL SAVINGS

Installing energy-efficient, long-lasting Cree LED lamps not only shows that your business is environmentally conscious, it also offers valuable financial benefits in the form of lower utility bills and maintenance costs. Unlike with CFLs, which contain toxic mercury, you can feel good that the savings you'll see do not come at the expense of the environment.



UTILITY REBATES

Cree LED lamps that have earned the ENERGY STAR® label are often eligible for utility rebates across the country. Instant rebates lower the initial cost to upgrade while others offer longer-term discount energy rates, making it even easier for you to begin saving.

Visit CreeLighting.com/Rebates to find rebates in your area.

While Improving Our World.



ENERGY STAR®

Every lamp type in our collection features ENERGY STAR rated efficiency with color consistency that exceeds EPA requirements. Besides reducing your energy load, installing ENERGY STAR Cree LED lamps can contribute points toward coveted LEED certifications and help you meet rapidly approaching federal energy reduction mandates.



MERCURY-FREE

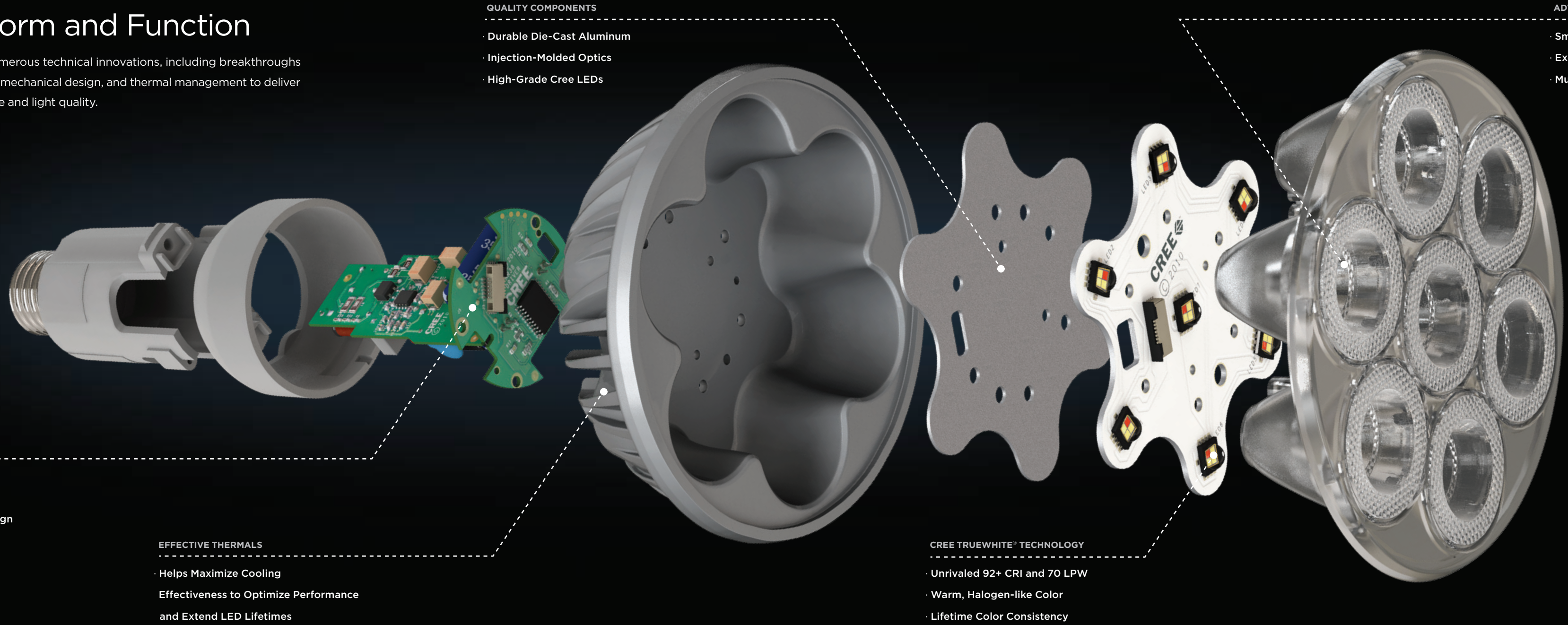
With mercury-free components, Cree LED lamps offer a more environmentally safe alternative to other high-efficiency light sources, like CFLs and HIDs, which contain toxic mercury vapor. Our lamps are also housed in aluminum materials, which are readily recyclable, further eliminating the potentially hazardous effects of disposal.



The Result:

Seamless Form and Function

Cree LED lamps combine numerous technical innovations, including breakthroughs in optical design, electronics, mechanical design, and thermal management to deliver industry-leading performance and light quality.



INTELLIGENT ELECTRONICS

- Integral, High-Efficiency Driver
- Enables Continuous Dimming
- Optimized, Lamp-Specific Design

EFFECTIVE THERMALS

- Helps Maximize Cooling Effectiveness to Optimize Performance and Extend LED Lifetimes

QUALITY COMPONENTS

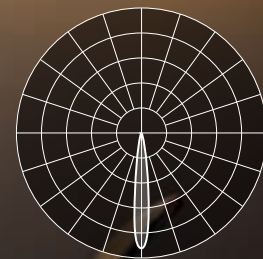
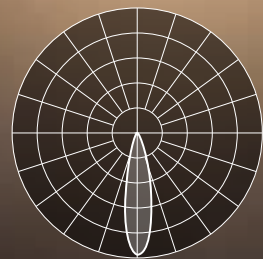
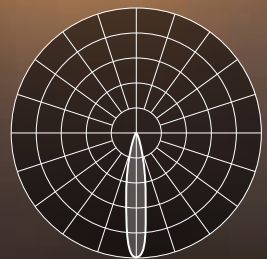
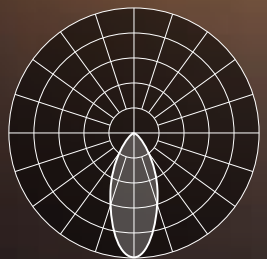
- Durable Die-Cast Aluminum
- Injection-Molded Optics
- High-Grade Cree LEDs

CREE TRUEWHITE® TECHNOLOGY

- Unrivaled 92+ CRI and 70 LPW
- Warm, Halogen-like Color
- Lifetime Color Consistency

ADVANCED TIR OPTICS

- Smooth Light Patterns
- Exceptional Optical Control
- Multiple Beam Angles



LBR-30™

- 600 Lumens
- Warm White (2700K)
- 50° Beam Angle
- 785 CBCP

LRP-38™

- 600 Lumens
- Warm White (2700K)
- 20° Beam Angle
- 4800 CBCP

LRP38-10L-25D

- 1000 Lumens
- Cool White (3000K)
- 25° Beam Angle
- 4000 CBCP

LRP38-10L-12D

- 950 Lumens
- Warm White (2700K)
- 12° Beam Angle
- 13220 CBCP

Inspired by Your Needs

Soft Accents or Dramatic Highlights

The Cree philosophy of customer-driven innovation has resulted in new ground-breaking LED optics that offer beautiful, high-impact illumination for every lamp application. With a wide variety of beams to choose from, Cree LED lamps open up the possibilities for creative lighting expression, providing the perfect amount of visual interest with varying degrees of dramatic effect.

LBR-30™



Beneath a semi-transparent diffusing lens, the LBR-30 lamp has two integral design elements—a single multi-chip LED and a conical beam enhancer. When in operation, the concentrated high-CRI light from the LED is gradually refracted as it passes through the enhancer, forming a precise beam with exceptional photometric performance and minimal light wasted outside the beam.

LRP-38™



A precisely-formed specular reflector redirects the high-CRI light from an indirect multi-chip LED to achieve a uniform, comfortable appearance. The LRP-38 lamp's design is elegant, yet incredibly effective, ensuring smooth light patterns are projected with no pixelation. Made from polished aluminum, the reflector offers a beautiful aesthetic even when the lamp is off.

LRP38-10L



Injection molded total internal reflection (TIR) optics utilize intricate honey-comb patterns to maximize the light extracted from seven high-CRI LEDs. Each LRP38-10L model features a unique lens design and pattern, optimizing the light distribution for its beam angle. This ensures a low brightness appearance when viewed from off-axis outside of the beam.

Inspired by Your Needs

Beautiful Color in Every Setting

At Cree, we understand the importance of quality lighting and operational savings in every business. From a dramatic retail display to a softly lit art gallery, our LED lamps are designed to meet the unique needs of each lighting application. With this, Cree is committed to delivering the high-quality light that our customers' spaces deserve and the payback they demand.



MUSEUM



Preserve Your Artistic Intentions.

With industry-leading color rendering and longevity, Cree LED lamps help you capture the true artistic intentions of every exhibit while virtually eliminating maintenance.



RETAIL



Exceed Customer Expectations.

Beam options give you the flexibility to stage merchandise with soft accents or dramatic highlights. Warm light characteristics invite shoppers to stay longer, helping to improve sales.



GROCERY



Reveal Your Freshest Colors.

Unlike halogens, Cree LED lamps are UV-free, so their light won't contribute to food spoilage. They also use 85% less energy, saving you money with lower power bills—a win-win.



RESTAURANT



Enhance Dining Experiences.

Dimmability and color temperature options help you establish the right amount of ambience while optimized light distributions can help you achieve the same great look with less lamps.





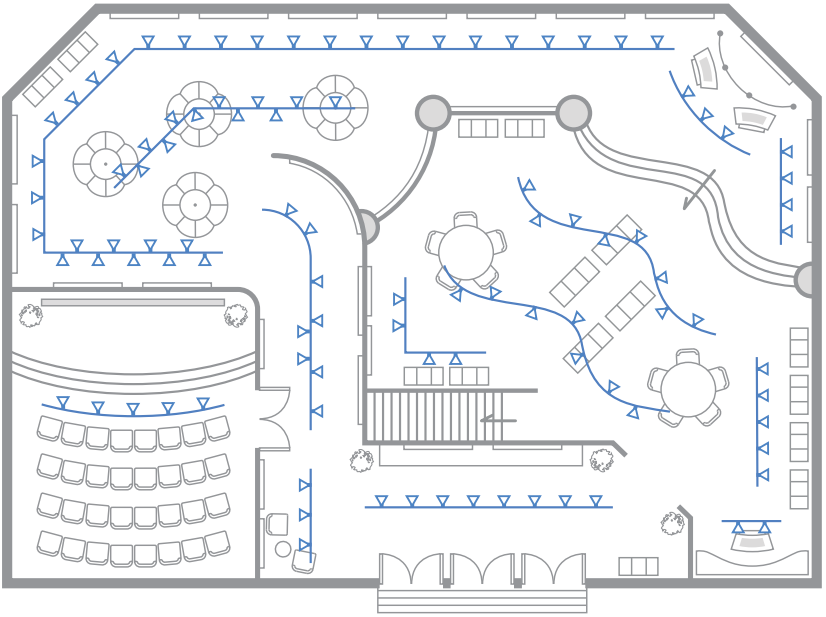
No Compromise

Create Better Looking Exhibits and Lower Your Operating Costs.

Cree LED lamps deliver an impressive mix of performance, aesthetics, and savings to museum settings. Exceptional color rendering and visually-pleasing designs help focus attention on displays while blending in with exhibit elements. With improved efficacy and longevity, our lamps can also significantly lower monthly energy and maintenance costs compared to traditional light sources.

Application Example:
Permanent Museum Exhibit

In the example to the right, replacing the existing 100 65W BR30 halogens with 12W LBR-30™ LED lamps can immediately lower operating costs from \$247 to just \$37 per month. These drastic savings are accompanied by beautiful, 94 CRI light, so you won't have to compromise artistic integrity in order to see operational savings.*



Estimated Total Savings and Payback*

	Cree 12W LBR-30™	65W Halogen
Number of Lamps	100	100
Total Watts	1,200	6,500
Lifetime in Years	13.7	0.7
Total Cost Per Month	\$37	\$247
Monthly Energy Cost	\$18	\$198
Monthly Add'l HVAC Cost	-	\$18
Monthly Relamping Cost	-	\$30
Estimated Total Savings		
Lifetime Savings	\$26,326	
Kilowatt-Hours Saved	265,000 kWh	
Lamp Waste Saved	2,000 Halogen Bulbs	
CO ₂ Emissions Saved	172 Tons	
Time to Payback	3 Years, 3 Months	

*To see how these savings were achieved and to calculate your own, please visit: CreeLighting.com/Payback





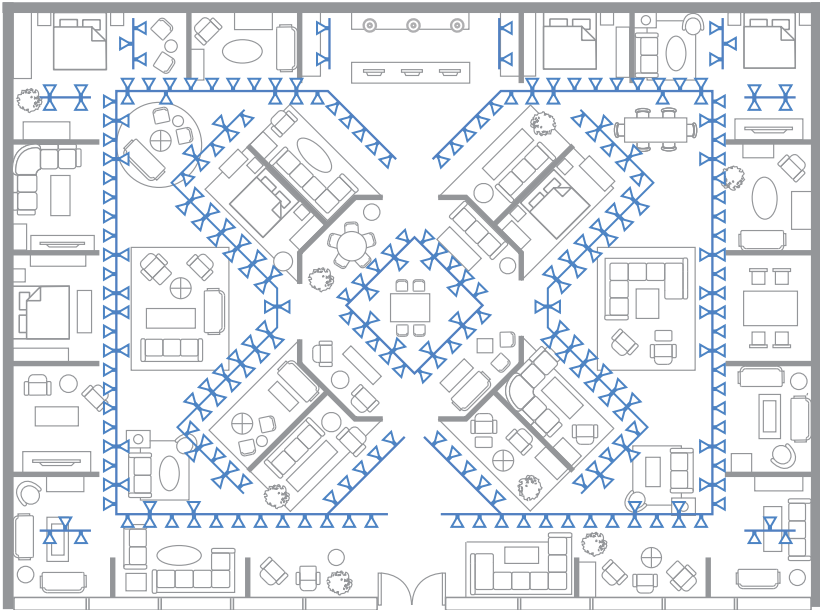
No Compromise

Help Improve Sales with Virtually No Maintenance.

Next to a dedicated sales team, nothing helps attract shoppers to merchandise more effectively than beautiful, high-impact lighting. Cree LED lamps help accentuate goods with several beam varieties of high-CRI light, providing flexibility as you reveal truer colors, form, and texture. With no pesky bulbs to replace, our lamps also free team members to focus on what matters—their customers.

Application Example:
Retail Furniture Store

In this example, replacing every 75W halogen with a 12W LRP-38™ LED lamp, designed to last 50,000 hours, will recoup the initial upgrade cost in less than three years. In the meantime, our lamps will deliver the same quality, halogen-like light while saving the store nearly 1,700 hours in relamping.*



Estimated Total Savings and Payback*

	Cree 12W LRP-38™	75W Halogen
Number of Lamps	267	267
Total Watts	3,204	20,025
Lifetime in Years	11.4	0.6
Total Cost Per Month	\$117	\$998
Monthly Energy Cost	\$117	\$733
Monthly Add'l HVAC Cost	-	\$70
Monthly Relamping Cost	-	\$195
Estimated Total Savings		
Lifetime Savings	\$95,239	
Kilowatt-Hours Saved	841,050 kWh	
Lamp Waste Saved	5,340 Halogen Bulbs	
CO ₂ Emissions Saved	545 Tons	
Time to Payback	2 Years, 5 Months	

*To see how these savings were achieved and to calculate your own, please visit: CreeLighting.com/Payback





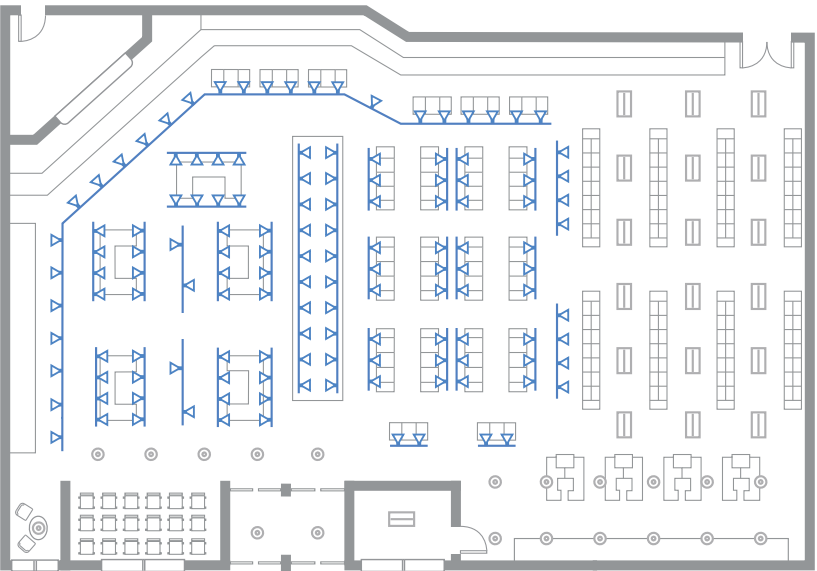
No Compromise

Reveal Fresh, Glowing Produce and Save Energy

Given their relative size and wide variety of consumer areas, grocery stores in particular must pay equal attention to efficiency and light quality. Cree LED lamps deliver bright, UV-free light to attract consumers to goods while helping keep produce and other foods fresher for longer. Using a fraction of the energy of ceramic metal halide (CMH) lamps, our lamps also provide monthly savings that add up quickly.

Application Example:
Neighborhood Super Market

In the example to the right, building with 13.5W LRP38-10L LED lamps, instead of 39W CMH lamps, offers comparable light output and quality while reducing your energy use by more than half. The over \$400 you could save each month helps recoup the initial upgrade cost in just over one year and contributes to the nearly \$33,000 you could save over the entire life of the lamps.*



Estimated Total Savings and Payback*

	Cree 13.5W LRP38-10L	39W CMH
Number of Lamps	136	136
Total Watts	1,836	5,304
Lifetime in Years	7.6	1.5
Total Cost Per Month	\$101	\$536
Monthly Energy Cost	\$101	\$291
Monthly Add'l HVAC Cost	-	\$21
Monthly Relamping Cost	-	\$231
Estimated Total Savings		
Lifetime Savings	\$32,949	
Kilowatt-Hours Saved	173,400 kWh	
Lamp Waste Saved	680 CMH Bulbs	
CO ₂ Emissions Saved	112 Tons	
Time to Payback	1 Year, 3.5 Months	

*To see how these savings were achieved and to calculate your own, please visit: CreeLighting.com/Payback



Inspired by Brilliance

A Collection of Well-Crafted Solutions

With an uncompromising focus on quality, we've chosen only the best technologies and materials for our LED lamps—inspired by your lighting needs and perfected by the expertise of our engineers.

Powered by Cree TrueWhite® Technology, our well-craft-ed solutions combine bright, beautiful light with ENERGY STAR® rated performance, proving that no-compromise lighting is possible in every application.



CREE TRUEWHITE® TECHNOLOGY

A revolutionary way to generate white light with red and unsaturated yellow LEDs. This unique approach delivers high efficiency with beautiful light characteristics and high color consistency over the life of the lamp.



ENERGY STAR® QUALIFIED

With ENERGY STAR rated efficiency, our LED lamps can help you achieve both environmental and economical sustainability. Every lamp type is qualified to last at least 25,000 hours with color consistency ratings that exceed the EPA's quality requirements.

LRP38-10L

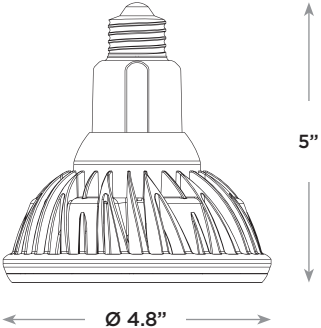
High Output PAR38 LED Lamp



25-DEGREE



12-DEGREE



PERFORMANCE SUMMARY

Utilizes Cree TrueWhite® Technology

Active Color Management

Energy Star® Qualified on Select Models*

DELIVERED LIGHT OUTPUT: 1000 lumens (3000K), 950 lumens (2700K)

INPUT POWER: 13.5 watts

CRI: 92

CCT: 3000K, 2700K

BEAM ANGLE: 12°, 25°

CBCP: 13220 (12°), 4000 (25°)

WARRANTY: 3 years

LIFETIME: Designed to last 50,000 hours in open fixtures

NON-IC LIFETIME: Designed to last 35,000 hours in non-IC recessed downlights

DIMMING: Dimmable to 20% with ELV dimmers

PRODUCT DESCRIPTION

The LRP38-10L LED high output PAR38 lamp delivers up to 1000 lumens of exceptional 92 CRI light while achieving over 70 lumens per watt. It is available in warm or neutral color temperatures with 12- or 25-degree beam angles, and Edison or GU24 bases.

CONSTRUCTION & MATERIALS

Durable die-cast aluminum housing with lens protects LEDs and optical system. Thermal management system uses integral heat sink to conduct heat away from LEDs and transfer it to the surrounding environment for optimal performance. Housing conforms to ANSI standards for PAR38 lamp envelopes. Available with Edison or GU24 base. Compatible with Cree TL lamp holder and TG38 gimbal ring.

OPTICAL SYSTEM

Injection molded total internal reflection (TIR) optics redirects light to achieve a uniform, comfortable appearance that eliminates pixelation and direct view of unshielded LEDs. This ensures smooth light patterns are projected with no hot spots and minimal striations. TIR optical patterns and stair-step design (25°) are precisely designed for exceptional optical control, enabling 12° or 25° beam angles with almost no light wasted outside of the beam. This ensures low brightness appearance when viewed from off-axis and outside of the beam.

ELECTRICAL SYSTEM

Integral, high-efficiency driver and power supply. Power Factor > 0.9 nominal. Input Voltage: 120V, 60Hz. Dimmable to 20% with ELV dimmers.

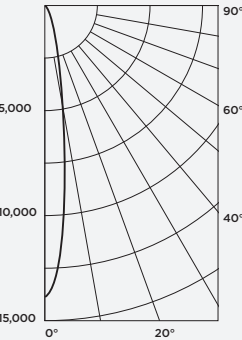
QUALIFICATIONS

- Energy Star® Qualified on Select Models.*
- cULus Listed®
- California Title-24 compliant (GU24 only).
- Suitable for damp locations.

* Consult CreeLighting.com for availability.

PHOTOMETRY

LRP38-10L-12D Based on OnSpex #: 2472807



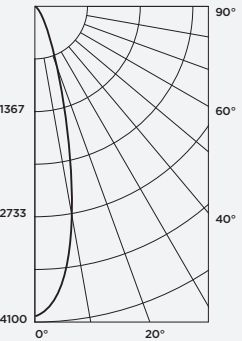
Intensity (Candlepower) Summary

Angle	Mean CP
0°	13220
5°	9064
15°	910
25°	163
35°	127
45°	64
55°	14
65°	9
75°	7
85°	6
90°	5

Zonal Lumen Summary

Zone	Lumens	% Lamp
0-30	1067	87.1%
0-40	1150	93.9%
0-60	1214	99.2%
60-90	10	0.8%

LRP38-10L-25D Based on OnSpex #: 30017011



Intensity (Candlepower) Summary

Angle	Mean CP
0°	4034
5°	3631
15°	1285
25°	241
35°	95
45°	55
55°	35
65°	24
75°	15
85°	6
90°	2

Zonal Lumen Summary

Zone	Lumens	% Lamp
0-30	789	81.3%
0-40	850	87.6%
0-60	925	95.2%
0-90	971	100%

LRP-38™
PAR38 LED Lamp



PERFORMANCE SUMMARY
Utilizes Cree TrueWhite® Technology
Active Color Management
ENERGY STAR® qualified to last at least 25,000 hours
DELIVERED LIGHT OUTPUT: 600 lumens
INPUT POWER: 12 watts
CRI: 94
CCT: 2700K
BEAM ANGLE: 20°
CBCP: 4800
WARRANTY: 3 years
LIFETIME: Designed to last 50,000 hours in open fixtures
NON-IC LIFETIME: Designed to last 35,000 hours in non-IC recessed downlights
DIMMING: Dimmable to 20% with ELV dimmers

PRODUCT DESCRIPTION

The LRP-38 LED PAR38 lamp delivers 600 lumens of exceptional 94 CRI light while achieving 50 lumens per watt. It is available in a warm color temperature with a 20-degree beam angle, and Edison or GU24 bases.

CONSTRUCTION & MATERIALS

Durable die-cast aluminum housing with lens protects LEDs and optical system. Thermal management system uses a combination of heat pipe technology and integral heat sink to conduct heat away from LEDs and transfer it to the surrounding environment for optimal performance. Housing conforms to ANSI standards for PAR38 lamp envelopes. Available with Edison or GU24 base. Compatible with Cree TL lamp holder and TG38 gimbal ring.

Dimensions: Ø 4.812” x 5.187”

OPTICAL SYSTEM

Specular reflector redirects light from an indirect LED to achieve a uniform, comfortable appearance that eliminates pixelation and direct view of unshielded LED. This ensures smooth light patterns are projected with no hot spots and minimal striations. Specular reflector is precisely formed for exceptional optical control, enabling 20° beam angle with almost no light wasted outside of the beam. This ensures low brightness appearance when viewed from off-axis and outside of the beam.

ELECTRICAL SYSTEM

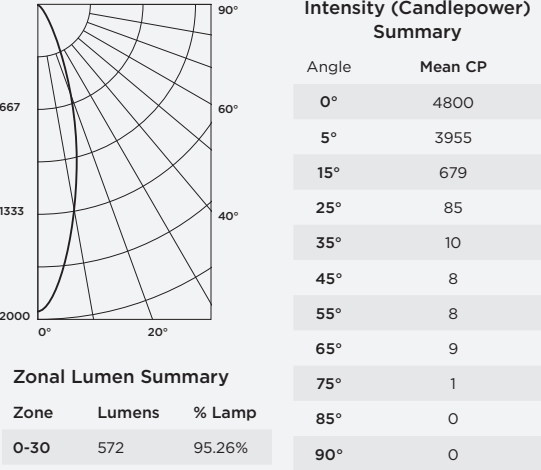
Integral, high-efficiency driver and power supply. Power Factor > 0.9 nominal. Input Voltage: 120V, 60Hz. Dimmable to 20% with ELV dimmers.

QUALIFICATIONS

- ENERGY STAR® qualified.
- cULus Listed®
- NSF certified.
- California Title-24 compliant (GU24 only).
- Suitable for damp locations.

PHOTOMETRY

LRP38A92-20D40 Based on OnSpex #: 30014165



LBR-30™
BR30 LED Lamp



PERFORMANCE SUMMARY
Utilizes Cree TrueWhite® Technology
Active Color Management
ENERGY STAR® qualified to last at least 25,000 hours
DELIVERED LIGHT OUTPUT: 600 lumens
INPUT POWER: 12 watts
CRI: 94
CCT: 2700K
BEAM ANGLE: 25°, 50°
CBCP: 1940 (25°), 785 (50°)
WARRANTY: 3 years
LIFETIME: Designed to last 50,000 hours in open fixtures
NON-IC LIFETIME: Designed to last 35,000 hours in non-IC recessed downlights
DIMMING: Dimmable to 20% with ELV dimmers

PRODUCT DESCRIPTION

The LBR-30 LED BR30 lamp delivers up to 600 lumens of exceptional 94 CRI light while achieving 50 lumens per watt. It is available in a warm color temperature with 25- or 50-degree beam angles, and Edison or GU24 bases.

CONSTRUCTION & MATERIALS

Durable die-cast aluminum housing with lens protects LEDs and optical system. Thermal management system uses integral heat sink to conduct heat away from LEDs and transfer it to the surrounding environment for optimal performance. Housing conforms to ANSI standards for BR30 lamp envelopes. Available with Edison or GU24 base. Compatible with Cree TL lamp holder.

Dimensions: Ø 4.25” x 5.5”

OPTICAL SYSTEM

Combination of diffusing lens and internal beam enhancer redirects light to achieve a uniform, comfortable appearance that eliminates pixelation and direct view of unshielded LEDs. This ensures smooth light patterns are projected with no hot spots and minimal striations. Innovative beam enhancer is precisely designed for exceptional optical control, enabling 25° or 50° beam angles with almost no light wasted outside of the beam. This ensures low brightness appearance when viewed from off-axis and outside of the beam.

ELECTRICAL SYSTEM

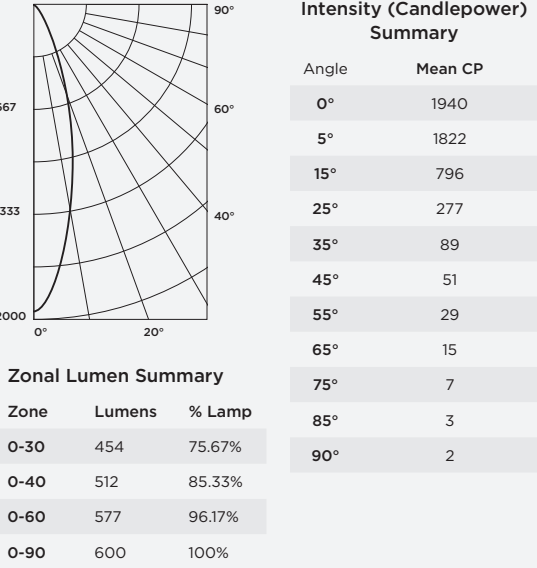
Integral, high-efficiency driver and power supply. Power Factor > 0.9 nominal. Input Voltage: 120V, 60Hz. Dimmable to 20% with ELV dimmers.

QUALIFICATIONS

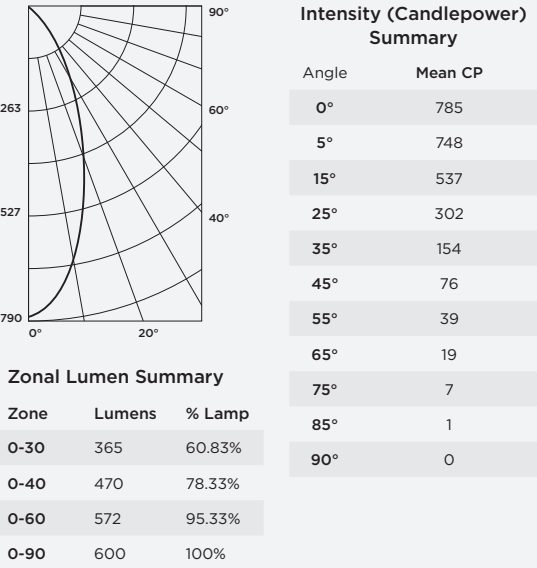
- ENERGY STAR® qualified.
- cULus Listed®
- California Title-24 compliant (GU24 only).
- Suitable for damp locations.

PHOTOMETRY

LBR30A92-25D Based on OnSpex #: 30015498-1



LBR30A92-50D Based on OnSpex #: 30015498-2



Join the LED Lighting Revolution.

Visit **CreeLighting.com** or contact a Cree lighting representative to learn more.

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