PULSAR

LuxEOS Beam 40 VIVID COLOUR

ULTRA NARROW LED BEAM FOR ARCHITECTURAL LIGHTING

PHOTOMETRIC DATA

LuxEOS BEAM 40 TW (1700-5700K) 3° 3x60°

Tested By
DW Windsor Group Laboratory
Hoddesdon
UK

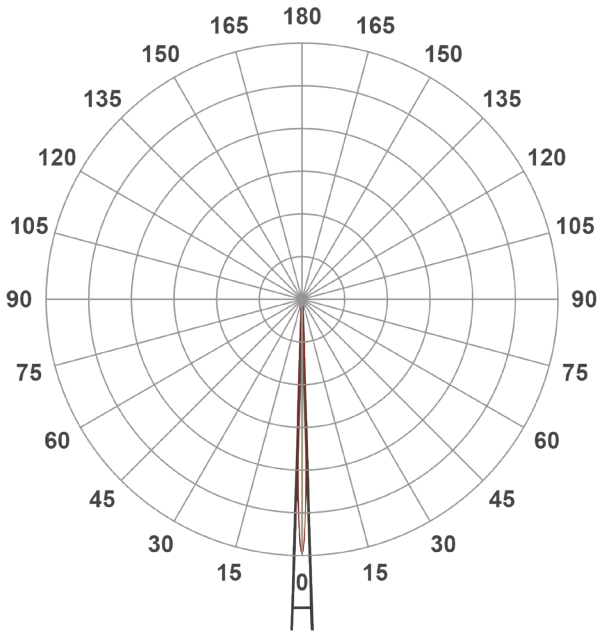
Date
Nov 2020

Dimensions
350mm (H) x 420mm (W) x 150mm (D) (including yoke)

Weight
12 kgs (26.9lbs)

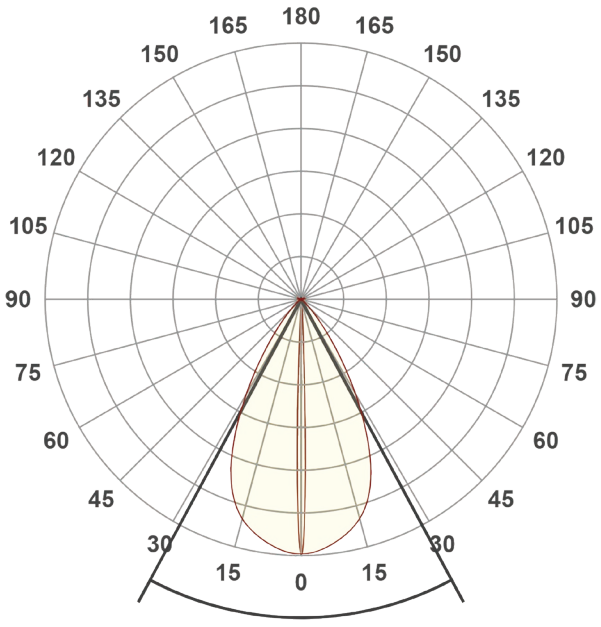
Polar Distribution

3° Conical Beam (Native)



3°

3x60° Elliptical Beam (With HBS)

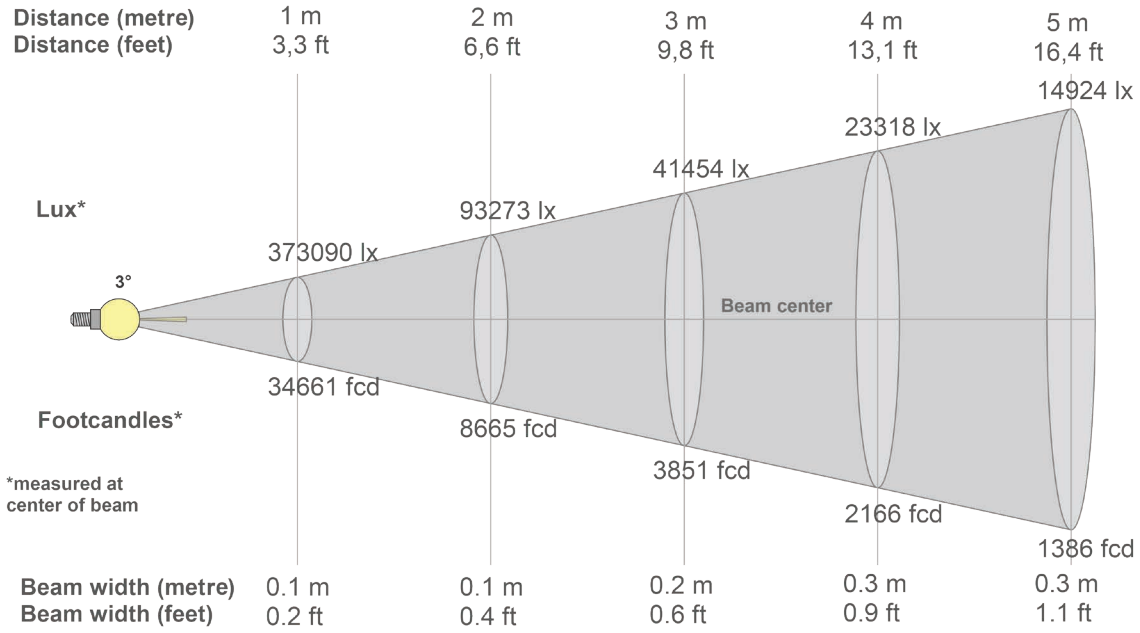


3x60°

PHOTOMETRIC DATA

LuxEOS BEAM 40 - TW (1700-5700K)

Intensities at Distance with native 3° Optics



Beam intensities from 1-20m

1m	2m	3m	4m	5m	6m	7m	8m	9m	10m	11m	12m	13m	14m	15m	16m	17m	18m	19m	20m
3.3ft	6.6ft	9.8ft	13.1ft	16.4ft	19.7ft	23ft	26.2ft	29.5ft	32.8ft	36.1ft	39.4ft	42.7ft	45.9ft	49.2ft	52.5ft	55.8ft	59.1ft	62.3ft	65.6ft
373090lx	93273lx	41454lx	23318lx	14924lx	10364lx	7614lx	5830lx	4606lx	3731lx	3083lx	2591lx	2208lx	1904lx	1658lx	1457lx	1291lx	1152lx	1033lx	933lx
34661.2fc	8665.3fc	3851.2fc	2166.3fc	1386.4fc	962.8fc	707.4fc	541.6fc	427.9fc	346.6fc	286.5fc	240.7fc	205.1fc	176.8fc	154fc	135.4fc	119.9fc	107fc	96fc	86.7fc

Intensities in 0° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
373K	307K	168K	65K	23K	11K	7K	5K	4K	3K	2K	2K	1K	1K	1K	1K	1K	1K	1K	1K
100%	82%	45%	17%	6%	3%	2%	1%	1%	1%	1%	0%	0%	0%	0%	0%	0%	0%	0%	0%

Intensities in 90° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
373K	307K	168K	65K	23K	11K	7K	5K	4K	3K	2K	2K	1K	1K	1K	1K	1K	1K	1K	1K
100%	82%	45%	17%	6%	3%	2%	1%	1%	1%	1%	0%	0%	0%	0%	0%	0%	0%	0%	0%

Intensities in 180° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
373K	307K	168K	65K	23K	11K	7K	5K	4K	3K	2K	2K	1K	1K	1K	1K	1K	1K	1K	1K
100%	82%	45%	17%	6%	3%	2%	1%	1%	1%	1%	0%	0%	0%	0%	0%	0%	0%	0%	0%

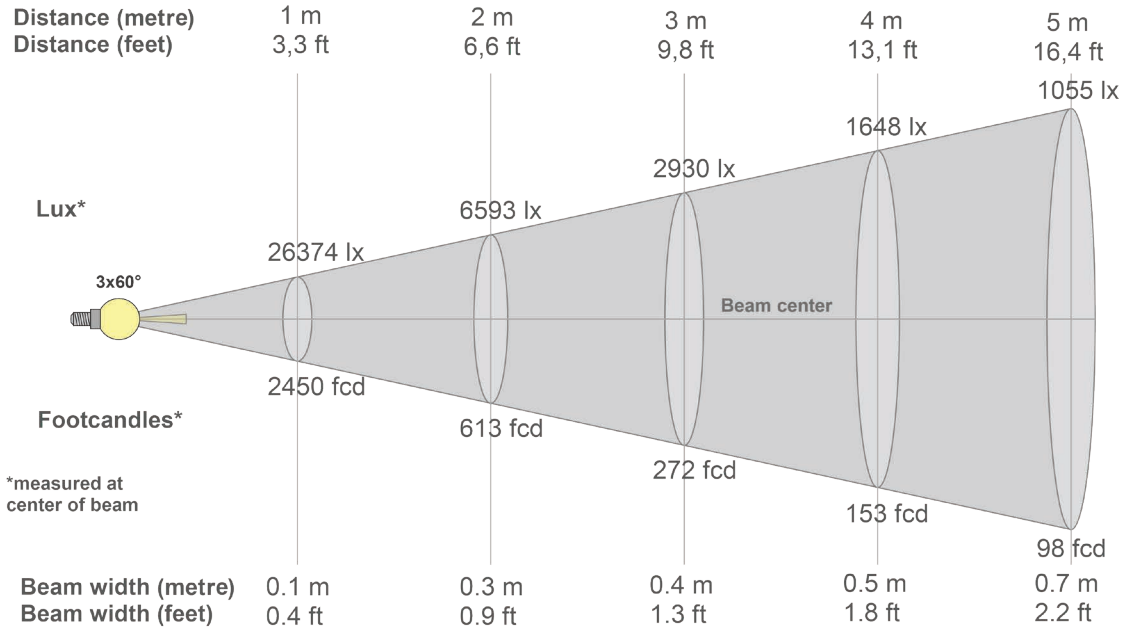
Intensities in 270° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
373K	307K	168K	65K	23K	11K	7K	5K	4K	3K	2K	2K	1K	1K	1K	1K	1K	1K	1K	1K
100%	82%	45%	17%	6%	3%	2%	1%	1%	1%	1%	0%	0%	0%	0%	0%	0%	0%	0%	0%

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%	Intensity ratio in 120° cone	Intensity ratio in 90° cone
3.7°	7°	10.5°	94.0%	92.2%

LuxEOS BEAM 40 - TW (1700-5700K

Intensities at Distance with 3x60° Optics



Beam intensities from 1-20m

1m	2m	3m	4m	5m	6m	7m	8m	9m	10m	11m	12m	13m	14m	15m	16m	17m	18m	19m	20m
3.3ft	6.6ft	9.8ft	13.1ft	16.4ft	19.7ft	23ft	26.2ft	29.5ft	32.8ft	36.1ft	39.4ft	42.7ft	45.9ft	49.2ft	52.5ft	55.8ft	59.1ft	62.3ft	65.6ft
26374lx	6593lx	2930lx	1648lx	1055lx	733lx	538lx	412lx	326lx	264lx	218lx	183lx	156lx	135lx	117lx	103lx	91lx	81lx	73lx	66lx
2450.2fc	612.5fc	272.2fc	153.1fc	98fc	68.1fc	50fc	38.3fc	30.2fc	24.5fc	20.2fc	17fc	14.5fc	12.5fc	10.9fc	9.6fc	8.5fc	7.6fc	6.8fc	6.1fc

Intensities in 0° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
26.4K	23.6K	15.6K	8.4K	4.3K	2.5K	1.8K	1.4K	1.2K	1.0K	0.8K	0.7K	0.6K	0.5K	0.4K	0.4K	0.4K	0.3K	0.3K	0.3K
100%	90%	59%	32%	16%	10%	7%	5%	4%	4%	3%	3%	2%	2%	2%	2%	1%	1%	1%	1%

Intensities in 90° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
26.4K	26.6K	26.5K	26.3K	26.0K	25.8K	25.5K	25.1K	24.8K	24.3K	23.9K	23.3K	22.8K	22.1K	21.5K	20.7K	20.0K	19.2K	18.4K	17.5K
100%	101%	100%	100%	99%	98%	97%	95%	94%	92%	90%	88%	86%	84%	81%	79%	76%	73%	70%	66%

Intensities in 180° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
26.4K	23.6K	15.6K	8.4K	4.3K	2.5K	1.8K	1.4K	1.2K	1.0K	0.8K	0.7K	0.6K	0.5K	0.4K	0.4K	0.4K	0.3K	0.3K	0.3K
100%	90%	59%	32%	16%	10%	7%	5%	4%	4%	3%	3%	2%	2%	2%	2%	1%	1%	1%	1%

Intensities in 270° c-plane

0°	1°	2°	3°	4°	5°	6°	7°	8°	9°	10°	11°	12°	13°	14°	15°	16°	17°	18°	19°
26.4K	26.6K	26.5K	26.3K	26.0K	25.8K	25.5K	25.1K	24.8K	24.3K	23.9K	23.3K	22.8K	22.1K	21.5K	20.7K	20.0K	19.2K	18.4K	17.5K
100%	101%	100%	100%	99%	98%	97%	95%	94%	92%	90%	88%	86%	84%	81%	79%	76%	73%	70%	66%

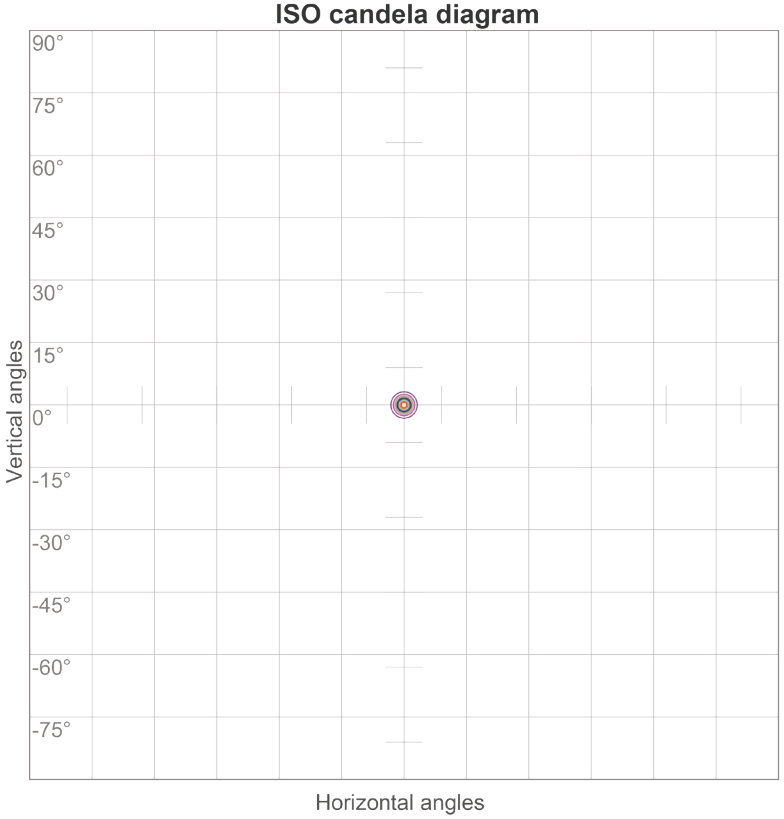
Beam angle 50%	Field angle 10%	Cutoff angle 2,5%	Intensity ratio in 120° cone	Intensity ratio in 90° cone
7.8°	15.1°	28.5°	97.4%	93.7%

PHOTOMETRIC DATA

LuxEOS BEAM 40 - TW (1700-5700K)

ISO Candela & ISO Lux diagrams with native 3° Optics

ISO candela diagram



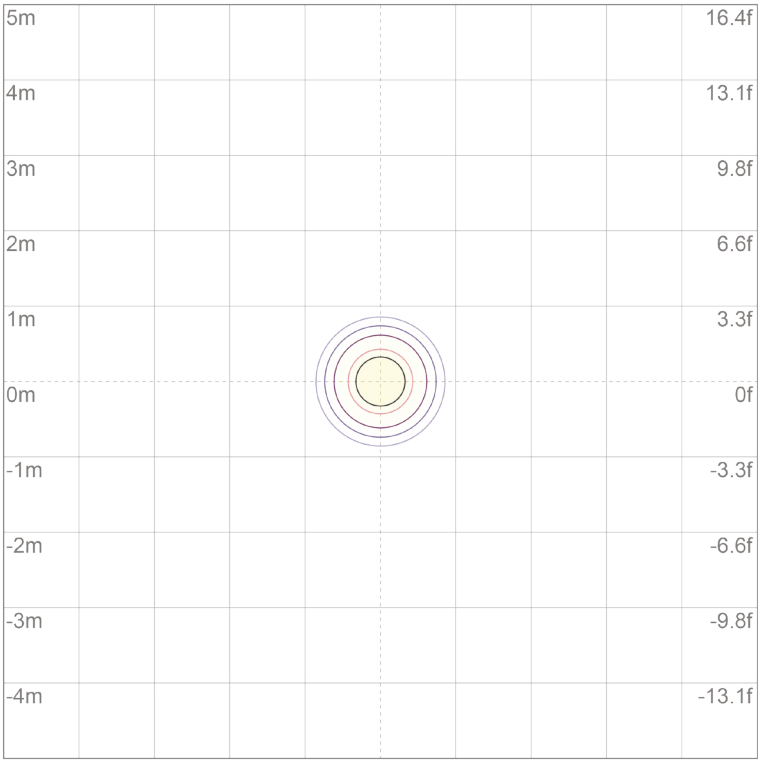
10%	37309 cd
20%	74618 cd
30%	111927 cd
40%	149236 cd
50%	186545 cd
60%	223854 cd
70%	261163 cd
80%	298472 cd
90%	335781 cd

Conditions:

Number of c-planes: 72

Candela at center: 373090 cd

ISO lux diagram



3%	112 lx
5%	187 lx
10%	373 lx
30%	1119 lx
50%	1865 lx

Conditions:

Number of c-planes: 72

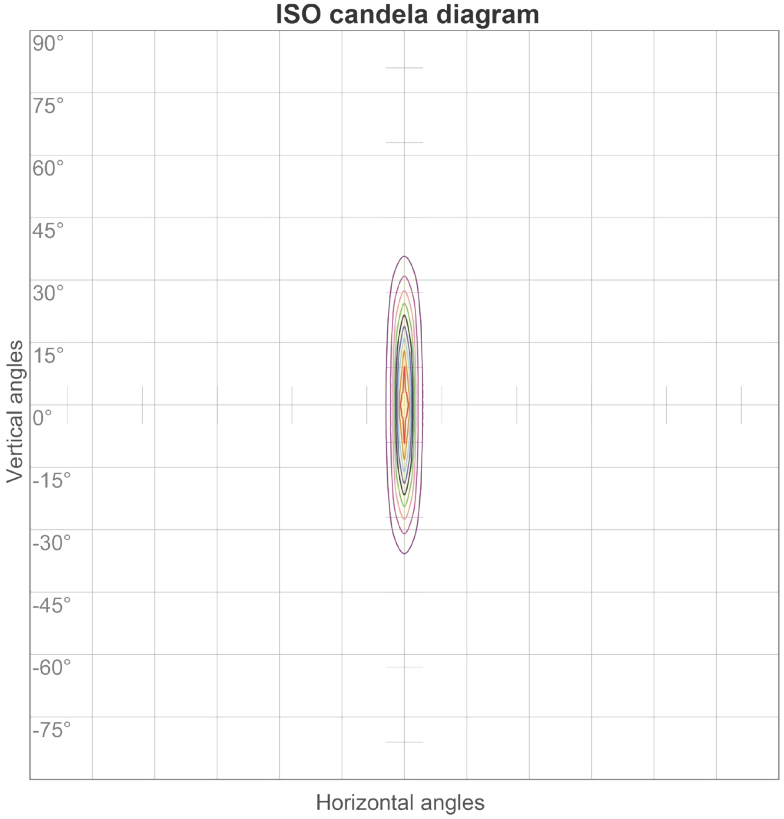
Lux at center: 3731 lx

Lux distribution on a surface when lamp is mounted at 10 meters from the surface.

LuxEOS BEAM 40 - TW (1700-5700K)

ISO Candela & ISO Lux diagrams with 3x60° Optics

ISO candela diagram



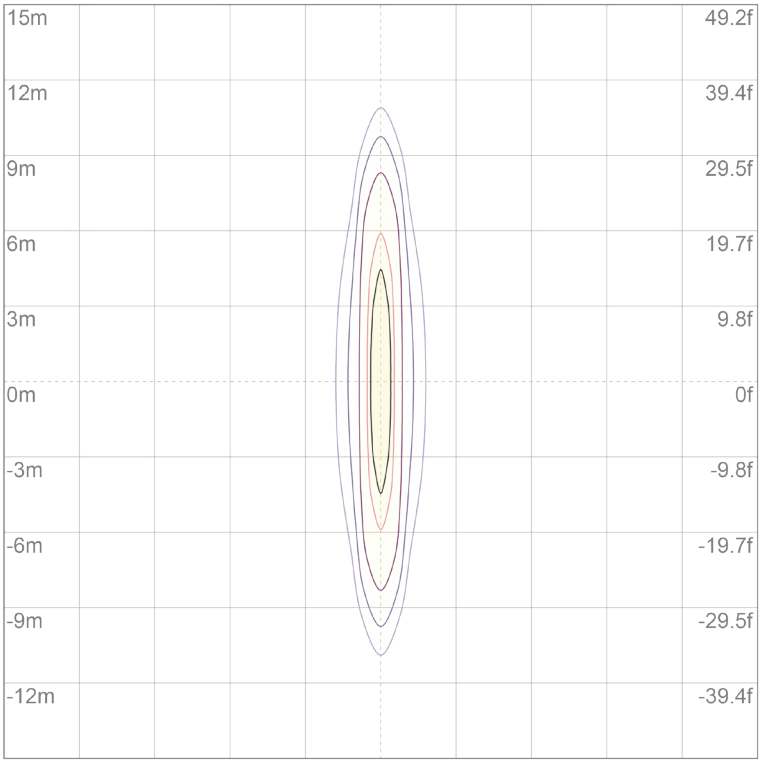
10%	2637 cd
20%	5275 cd
30%	7912 cd
40%	10549 cd
50%	13187 cd
60%	15824 cd
70%	18461 cd
80%	21099 cd
90%	23736 cd

Conditions:

Number of c-planes: 72

Candela at center: 26374 cd

ISO lux diagram



3%	7.91 lx
5%	13.2 lx
10%	26.4 lx
30%	79.1 lx
50%	132 lx

Conditions:

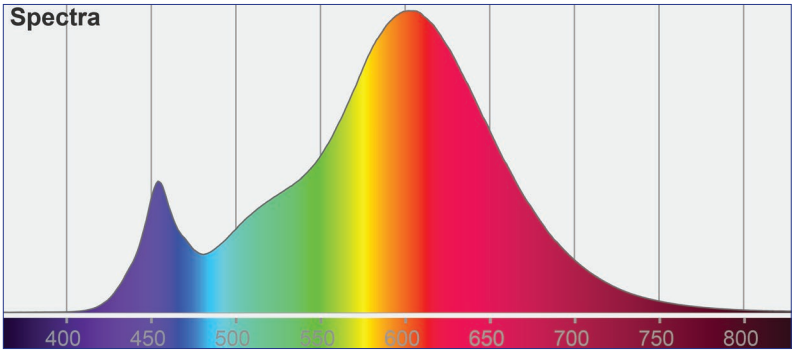
Number of c-planes: 72

Lux at center: 264 lx

Lux distribution on a surface when lamp is mounted at 10 meters from the surface.

LuxEOS BEAM 40 - TW (1700-5700K)

Colormetrics **1700K, 2700K, 5700K (All channels on)**



Total Lumen Output (Native) : 4212 lm

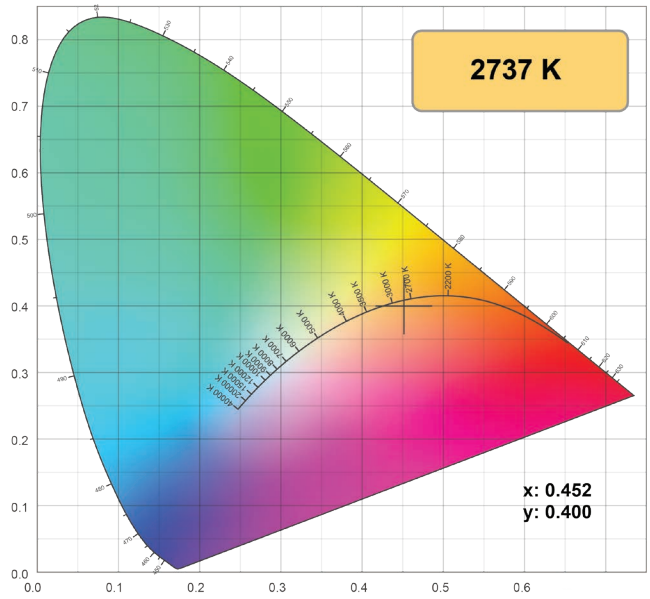
Efficacy : 47 lm/W

Voltage : 240V

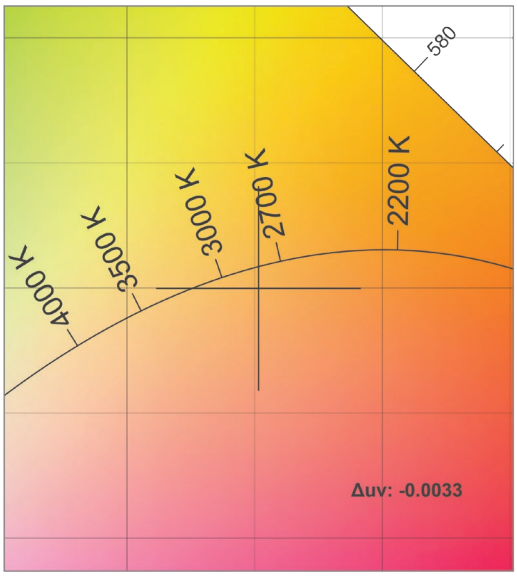
Supply Power : 90W

Supply Power Factor : 0.97

CIE 1931

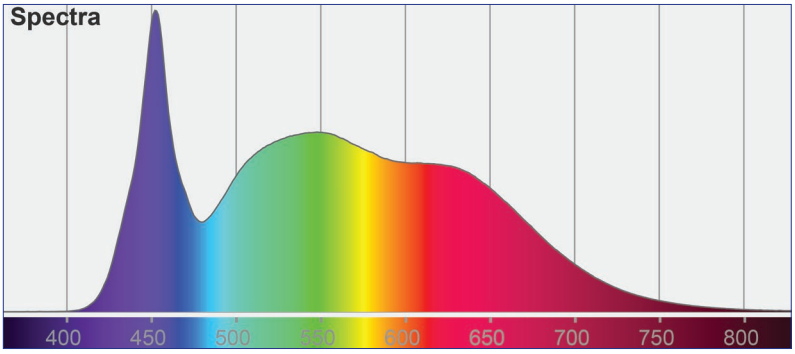


CIE 1931 Zoom



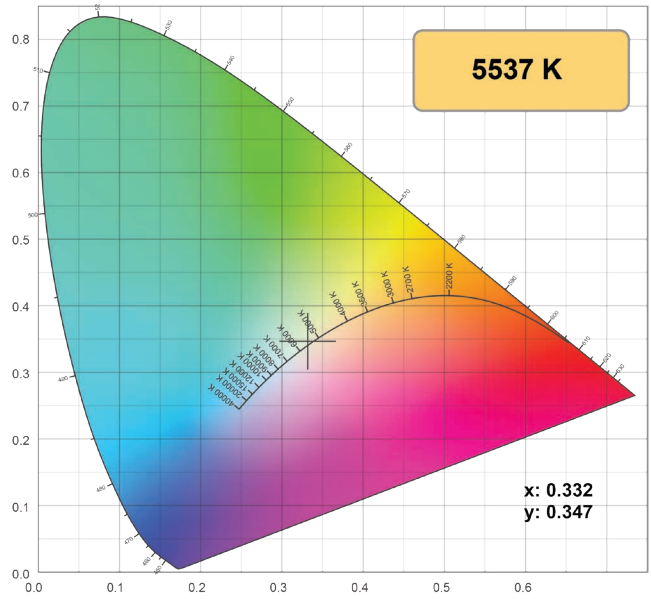
LuxEOS BEAM 40 - TW (1700-5700K)

Colormetrics **5700K**

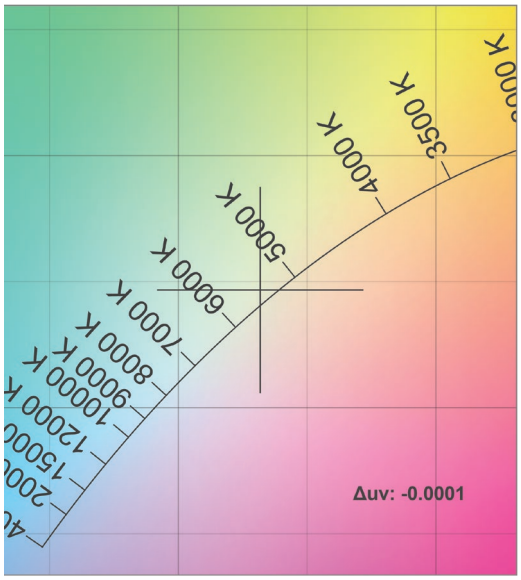


White 5700K Lumen Output : 1384 lm
CRI: 90

CIE 1931

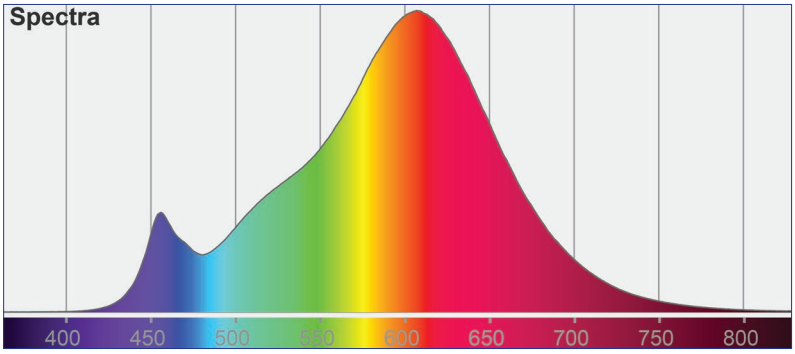


CIE 1931 Zoom



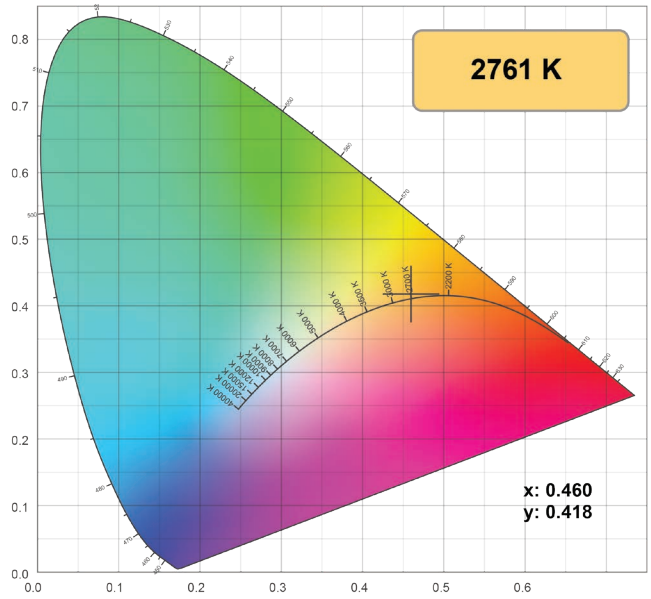
LuxEOS BEAM 40 - TW (1700-5700K)

Colormetrics **2700K**

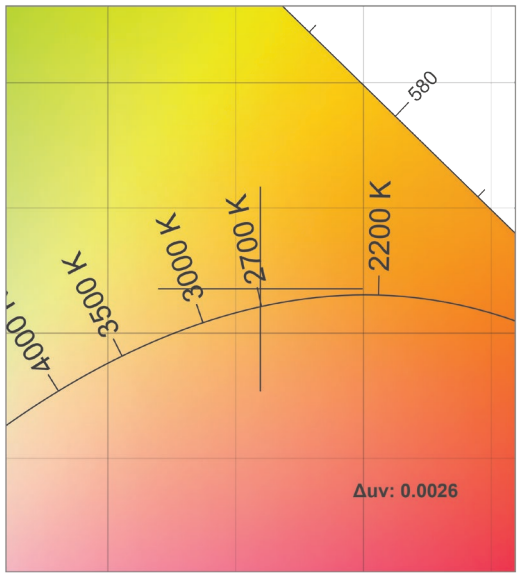


White 2700K Lumen Output : 1588 lm
CRI: 90

CIE 1931

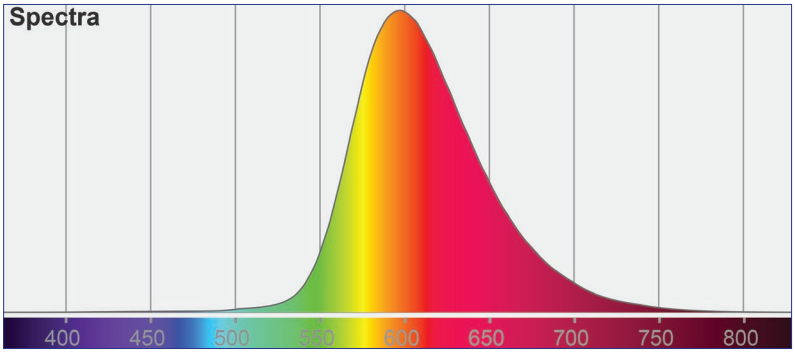


CIE 1931 Zoom



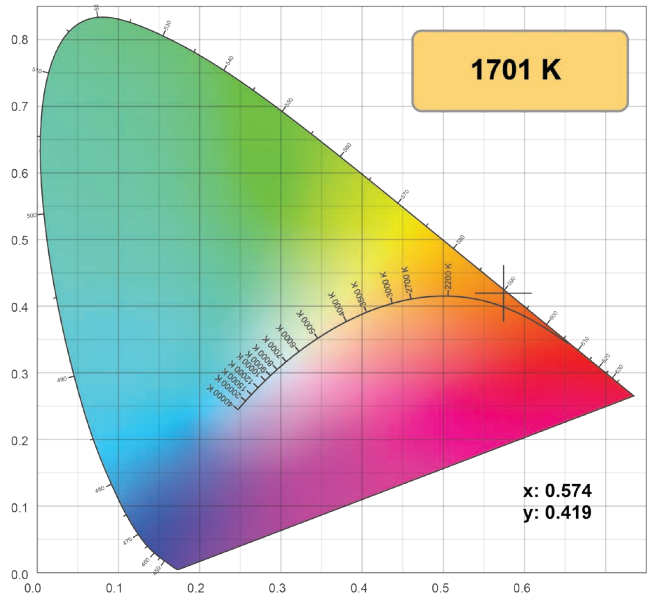
LuxEOS BEAM 40 - TW (1700-5700K)

Colormetrics **1700K**

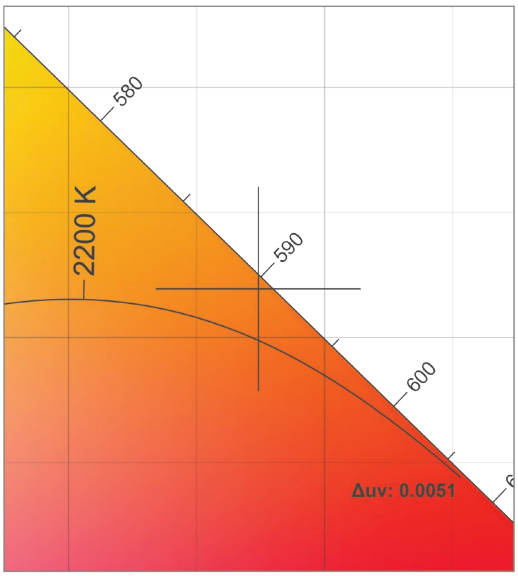


Amber 1700K Lumen Output : 1218 lm

CIE 1931



CIE 1931 Zoom



Should further photometric variations be required, please contact our Head Office.

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All descriptions, illustrations, drawings and specifications in this publication present only general particulars and shall not form part of any contract.

PULSAR
1 Pembroke Avenue, Waterbeach, Cambridge, CB25 9QP
www.pulsarlight.com | sales@pulsarlight.com | +44 (0) 1223 403 500