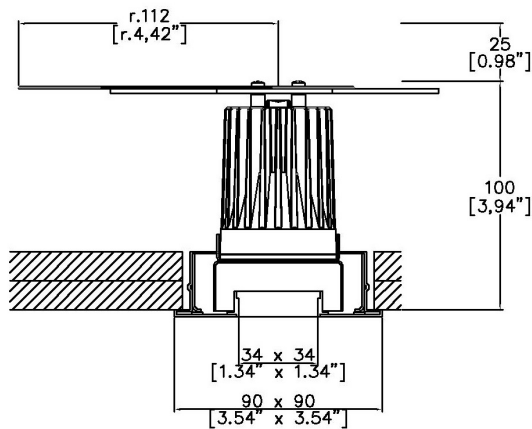


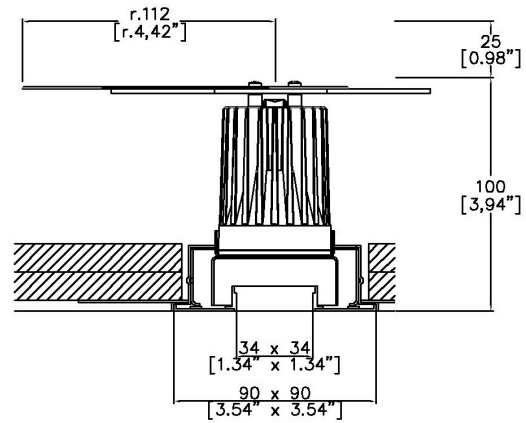
# ProSpex Square Edge90 Fixed Fire Rated



90 x 90mm (3.54 x 3.54") overall dimension. Edge baffle to ensure aperture is glare free and for a professional look. Available with standard trim kit or plaster-in kit for flush appearance. Family of matching products also available. Required depth height + 25mm^



81433-F-FR-XX-PB  
Cut-out 83mm Ø



81433-F-FR-XX-PC  
Cut-out 83mm Ø

LED Source	LED51/2	LED51/2	LED51/2	LED51/U	LED51/U	LED51/U
CCT	3000K	3000K	3000K	3000K	3000K	3000K
Drive Current	350mA	350mA	350mA	350mA	350mA	350mA
Power inc Driver	13.6W	13.6W	13.6W	13.6W	13.6W	13.6W
Beam Angle	12°	24°	38°	12°	24°	38°
Delivered Lumens	659	761	853	670	697	820
Delivered Intensisty cd	8244	4091	2397	9808	3983	1950
Efficacy lm/w	48	56	63	49	51	60
Forward Volt	36V	36V	36V	33V	33V	33V
CRI	≥90 CRI	≥90 CRI	≥90 CRI	≥98 CRI	≥98 CRI	≥98 CRI

Project Ref: \_\_\_\_\_

Location Ref: \_\_\_\_\_

Fixture Order Code:

81433-F-FR -  -  -  -  -  -  -  -  -

Fixture  
81433-F-FR

Square Edge90 Fixed  
Fire Rated

Finish

WH  
BK  
RAL

White  
Black  
Custom RAL Colour\*

Installation

PB  
PC

8000-PBZ-SQ Trim  
8000-PCZ-SQ Trimless

IP Rating

54

IP54

LED Type

2  
U

LED50 ONE GEN2 (90 CRI)  
LED50 ONE ULTRA (98 CRI)

CCT

27  
30  
40

2700K  
3000K  
4000K (90 CRI ONLY)

Beam

12  
24  
38

12°  
24°  
38°

Protocol

S  
A  
P  
D  
B

Non-Dim  
Analogue (0-10v)  
Phase  
DALI  
Bluetooth\*\*

Emergency

E  
ED  
ES

Maintained 3hr Emergency  
Maintained 3hr DALI Self Test  
Maintained 3hr Self Test

*IP Rating: If you do not require an IP rating please leave the box blank  
Emergency: If you do not require Emergency please leave the box blank*

Technical Details - 60 Minutes Fire Rated Luminaires

This Fire Rated Product has been tested to the following standards:

EN1365-2:2014; Part 2

EN1363-1:2012; Part 1

EN1363-1: 60MINS.

Test certification included in the luminaire specification pack.

The downlight is designed to maintain the integrity of the ceiling/floor construction. It is the responsibility of others to ensure the ceiling and floor construction conforms to the correct standard with regards to fire.

Fire Rated Downlights cannot be adapted for recess depth or installation methodology.



**Honeycomb Louvre**



**Diffusing Lens**



**Frosted Lens**



**Heavy Spread Lens**



**Linear Spread Lens**



**Warm Tone**

Accessories Order Code:

**Louvre/Lens**

- LL45 Honeycomb Louvre
- LLCC Warm Tone Lens
- LLUV UV Lens
- LLDF Diffusing Lens
- LLFR Frosted Lens
- LLLS Linear Spread Lens
- LLHS Heavy Spread Lens

**Technical Details**

\*Custom RAL code must be specified. Custom RAL colours can increase prices and lead times

Fire Rated luminaire will accept ONE accessory.

Dimming. Whilst Lucent can offer the majority of its luminaires with various dimming options, it remains the responsibility of the specifier/installer to check and ensure compatibility of any control equipment used. Additional cabling may be required depending on the dimming protocol specified.

\*\*Bluetooth (wireless) is the communication method. The exact dimming protocol must be confirmed to allow the selection of suitable drivers or bluetooth devices.

^ Depth indicated is the minimum recess depth for the luminaire with a remote mounted LED driver. Installing a driver through either the luminaire cut-out or installation kit may require additional recess depth, please refer to the relevant luminaire installation instructions for further details. Data correct at time of publishing

First Fix Requirement. Luminaire comprised of fixture body with ceiling trim and installation kit, which is to be fitted into the ceiling once finished. Ensure correct alignment of the installation kit before final assembly (see luminaire installation instructions for details)

IP Rating. Tested from underside of the ceiling

It is the policy of Lucent Lighting to continually review and improve its products and therefore reserve the right to change any details of product or withdraw specifications without prior notice.

Luminaires designed to comply with EN60598 and all other standards.

This specification sheet supersedes all previous versions.

All intellectual property rights pertaining to the product described above and to this document are owned by or licensed to Lucent Lighting Ltd.

We reserve the right to take whatever action is necessary to protect those intellectual property rights.

Please notify Lucent Lighting Ltd of any inaccuracies immediately. E&OE

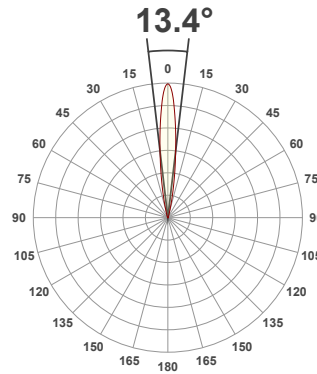
**Light efficiency:**



**Light quality:**



**Color temperature:**



**Product name:**

**Square 90 Edge Fixed\_Accent - LED50 ONE GEN2, 3000K, 12°, 350mA**

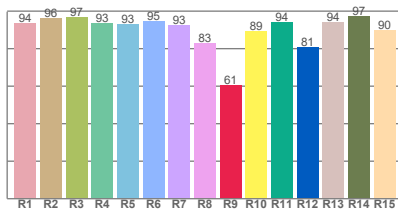
**Item number:**

**81433-F/A - LED51/2-30-12-350mA**

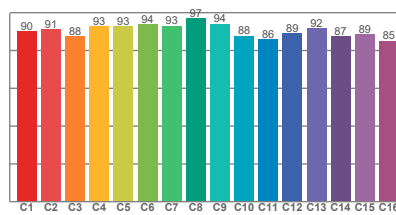
**Delivered information for above fixture and LED combination.**

**Output: 659 Lumen Peak intensity: 8244 cd Power consumption: 13.6**

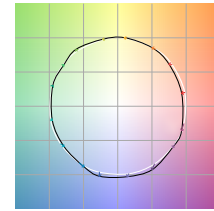
**CRI R values**



**TM30 C Values**

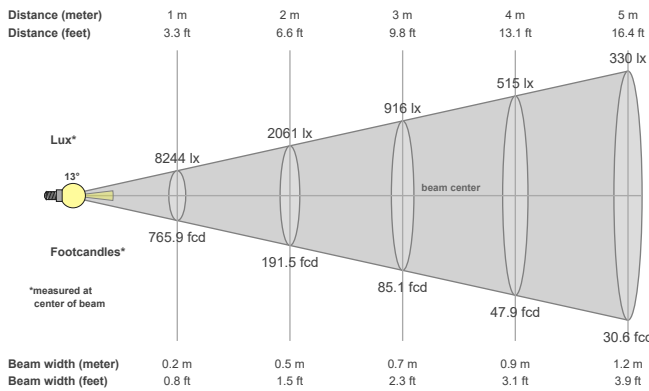


**Color vector graphics**



Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color deviation from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
3000 K	92.8	60.5	90.5	100.4	90.4	0.437	0.404	0.248	0.345	-0.0013

**Beam details**



**Beam angles**

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%
13.4°	26.8°	39.7°

**Beam intensities**

Peak intensity	Int. ratio in 120° cone	Int. ratio in 90° cone
8244 cd	99.6%	99.0%

**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
8244lx	2061lx	916lx	515lx	330lx	229lx	168lx	129lx	102lx	82lx	68lx	57lx	49lx	42lx	37lx	32lx	29lx	25lx	23lx	21lx
765.9fcd	191.5fcd	85.1fcd	47.9fcd	30.6fcd	21.3fcd	15.6fcd	12fcd	9.5fcd	7.7fcd	6.3fcd	5.3fcd	4.5fcd	3.9fcd	3.4fcd	3fcd	2.7fcd	2.4fcd	2.1fcd	1.9fcd

The above information is for 3000K colour temperature, for specific module information please see LED spec located on our website

For information regarding other colour temperatures please use the following factors for lumen output and candelas:

2700K = 1  
4000K = 1.084

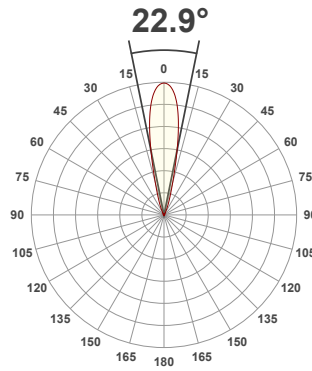
**Light efficiency:**



**Light quality:**



**Color temperature:**



**Product name:**

**Square 90 Edge Fixed\_Accent - LED50 ONE GEN2, 3000K, 24°, 350mA**

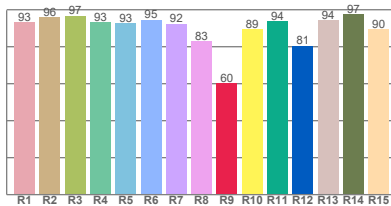
**Item number:**

**81433-F/A - LED51/2-30-24-350mA**

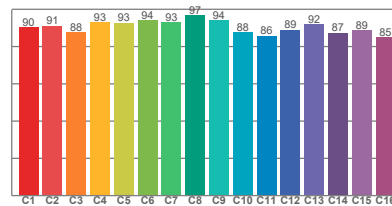
**Delivered information for above fixture and LED combination.**

**Output: 761 Lumen Peak intensity: 4091 cd Power consumption: 13.6**

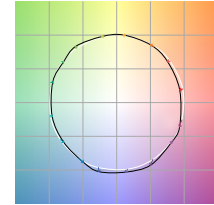
**CRI R values**



**TM30 C Values**

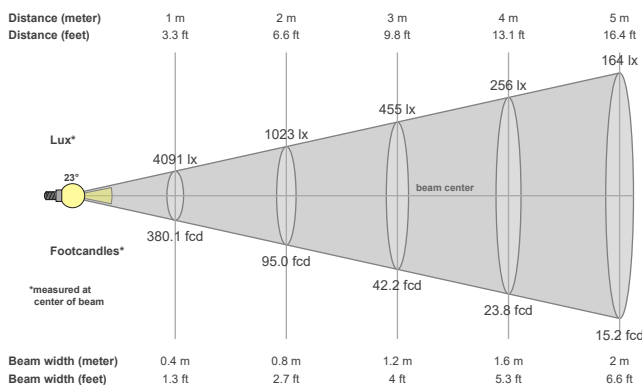


**Color vector graphics**



Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color division from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
3000 K	92.8	60.4	90.5	100.4	90.4	0.437	0.404	0.248	0.345	-0.0013

**Beam details**



**Beam angels**

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%
22.9°	41°	56.2°

**Beam intensities**

Peak intensity	Int. ratio in 120° cone	Int. ratio in 90° cone
4091 cd	99.3%	98.6%

**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
4091lx	1023lx	455lx	256lx	164lx	114lx	83lx	64lx	51lx	41lx	34lx	28lx	24lx	21lx	18lx	16lx	14lx	13lx	11lx	10lx
380.1fcd	95fcd	42.2fcd	23.8fcd	15.2fcd	10.6fcd	7.8fcd	5.9fcd	4.7fcd	3.8fcd	3.1fcd	2.6fcd	2.2fcd	1.9fcd	1.7fcd	1.5fcd	1.3fcd	1.2fcd	1.1fcd	1fcd

The above information is for 3000K colour temperature, for specific module information please see LED spec located on our website

For information regarding other colour temperatures please use the following factors for lumen output and candelas:

2700K = 1  
4000K = 1.084

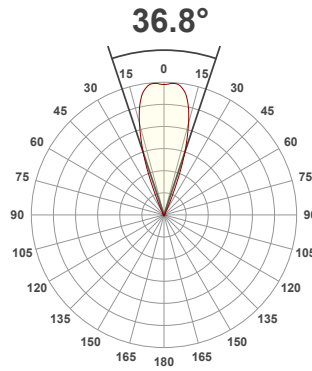
**Light efficiency:**



**Light quality:**



**Color temperature:**



**Product name:**

**Square 90 Edge Fixed\_Accent - LED50 ONE GEN2, 3000K, 38°, 350mA**

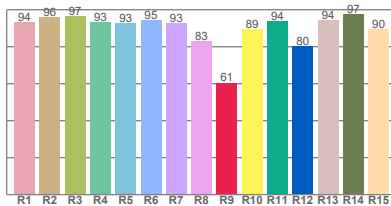
**Item number:**

**81433-F/A - LED51/2-30-38-350mA**

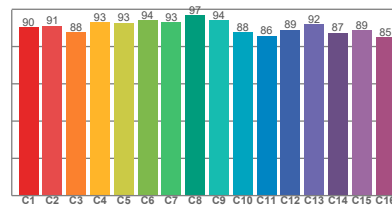
**Delivered information for above fixture and LED combination.**

**Output: 853 Lumen Peak intensity: 2397 cd Power consumption: 13.6**

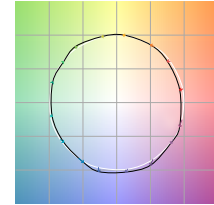
**CRI R values**



**TM30 C Values**

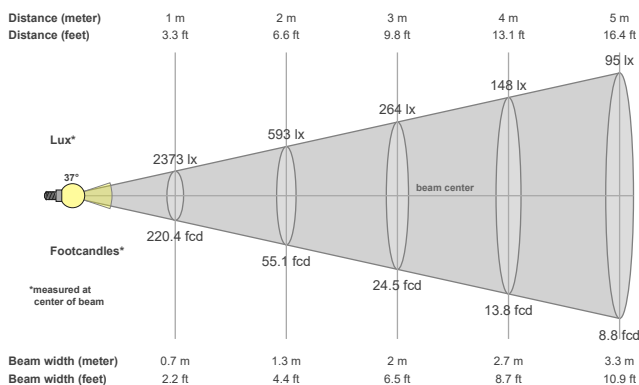


**Color vector graphics**



Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color deviation from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
3000 K	92.8	60.6	90.5	100.4	90.5	0.437	0.404	0.248	0.345	-0.0013

**Beam details**



**Beam angels**

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%
36.8°	50°	62°

**Beam intensities**

Peak intensity	Int. ratio in 120° cone	Int. ratio in 90° cone
2397 cd	99.8%	99.3%

**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
2373lx	593lx	264lx	148lx	95lx	66lx	48lx	37lx	29lx	24lx	20lx	16lx	14lx	12lx	11lx	9lx	8lx	7lx	7lx	6lx
220.4fcd	55.1fcd	24.5fcd	13.8fcd	8.8fcd	6.1fcd	4.5fcd	3.4fcd	2.7fcd	2.2fcd	1.8fcd	1.5fcd	1.3fcd	1.1fcd	1fcd	0.9fcd	0.8fcd	0.7fcd	0.6fcd	0.6fcd

The above information is for 3000K colour temperature, for specific module information please see LED spec located on our website

For information regarding other colour temperatures please use the following factors for lumen output and candelas:

2700K = 1  
4000K = 1.084

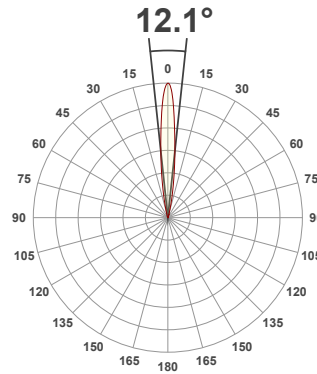
**Light efficiency:**



**Light quality:**



**Color temperature:**



**Product name:**

81433-F\_A-LED - LED51\_U-30-12-350mA

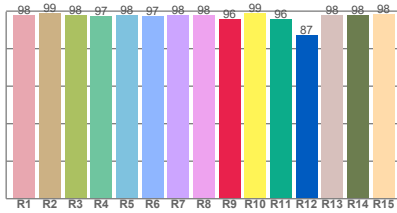
**Item number:**

Square Edge90 Fixed\_Accent - LED51\_U-30-12-350mA

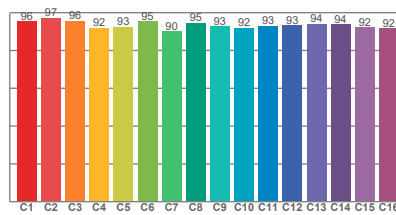
Delivered information for above fixture and LED combination.

Output: 670 Lumen Peak intensity: 9808 cd Power consumption: 13.6

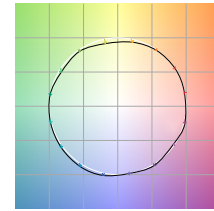
**CRI R values**



**TM30 C Values**

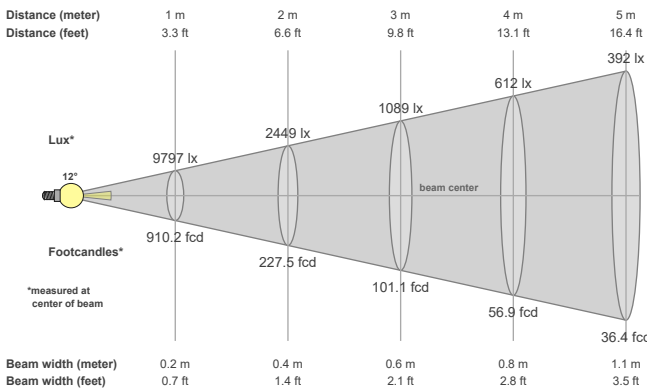


**Color vector graphics**



Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color deviation from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
3000 K	97.8	95.9	93.7	98.8	94.8	0.437	0.404	0.250	0.349	0.0015

**Beam details**



**Beam angels**

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%
12.1°	25.3°	35°

**Beam intensities**

Peak intensity	Int. ratio in 120° cone	Int. ratio in 90° cone
9808 cd	99.8%	99.3%

**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
9797lx	2449lx	1089lx	612lx	392lx	272lx	200lx	153lx	121lx	98lx	81lx	68lx	58lx	50lx	44lx	38lx	34lx	30lx	27lx	24lx
910.2fcd	227.5fcd	101.1fcd	56.9fcd	36.4fcd	25.3fcd	18.6fcd	14.2fcd	11.2fcd	9.1fcd	7.5fcd	6.3fcd	5.4fcd	4.6fcd	4fcd	3.6fcd	3.1fcd	2.8fcd	2.5fcd	2.3fcd

The above information is for 3000K colour temperature, for specific module information please see LED spec located on our website

For information regarding other colour temperatures please use the following factors for lumen output and candelas:

2700K = 1

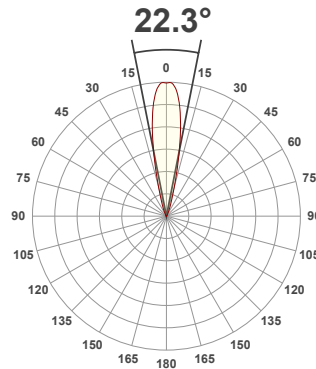
**Light efficiency:**



**Light quality:**



**Color temperature:**



**Product name:**

**81433-F\_A-LED - LED51\_U-30-24-350mA**

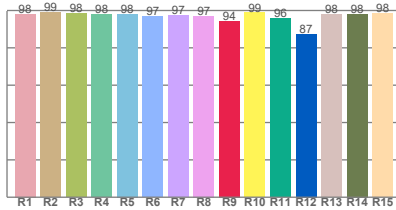
**Item number:**

**Square Edge90 Fixed\_Accent - LED51\_U-30-24-350mA**

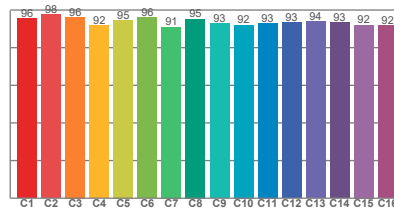
**Delivered information for above fixture and LED combination.**

**Output: 697 Lumen    Peak intensity: 3983 cd    Power consumption: 13.6**

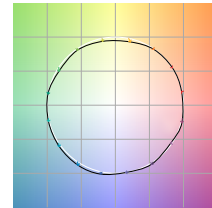
**CRI R values**



**TM30 C Values**

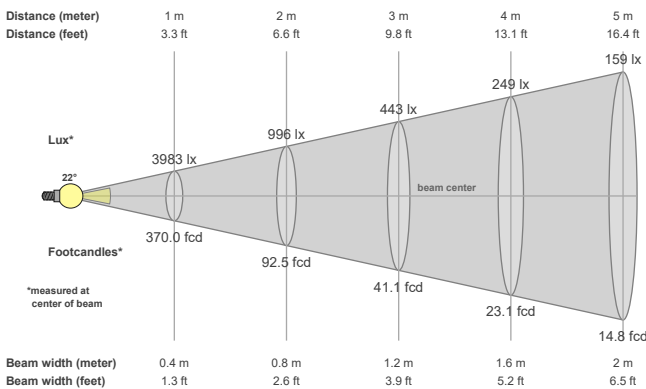


**Color vector graphics**



Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color deviation from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
3000 K	97.8	94.3	93.9	99.1	95.3	0.437	0.404	0.251	0.349	0.0009

**Beam details**



**Beam angles**

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%
22.3°	38.7°	54.9°

**Beam intensities**

Peak intensity	Int. ratio in 120° cone	Int. ratio in 90° cone
3983 cd	99.3%	98.6%

**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
3983lx	996lx	443lx	249lx	159lx	111lx	81lx	62lx	49lx	40lx	33lx	28lx	24lx	20lx	18lx	16lx	14lx	12lx	11lx	10lx
370fcd	92.5fcd	41.1fcd	23.1fcd	14.8fcd	10.3fcd	7.6fcd	5.8fcd	4.6fcd	3.7fcd	3.1fcd	2.6fcd	2.2fcd	1.9fcd	1.6fcd	1.4fcd	1.3fcd	1.1fcd	1fcd	0.9fcd

The above information is for 3000K colour temperature, for specific module information please see LED spec located on our website

For information regarding other colour temperatures please use the following factors for lumen output and candelas:

2700K = 1



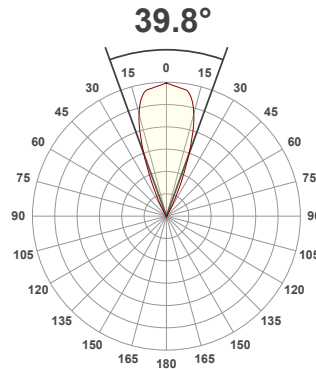
**Light efficiency:**



**Light quality:**



**Color temperature:**



**Product name:**

**81433-F\_A-LED - LED51\_U-30-38-350mA**

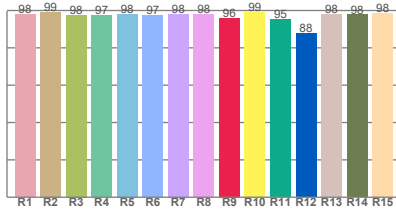
**Item number:**

**Square Edge90 Fixed\_Accent - LED51\_U-30-38-350mA**

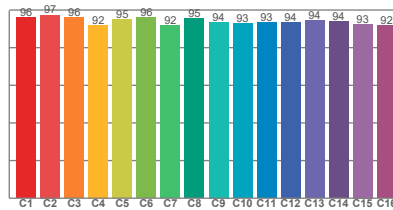
**Delivered information for above fixture and LED combination.**

**Output: 820 Lumen    Peak intensity: 1950 cd    Power consumption: 13.6**

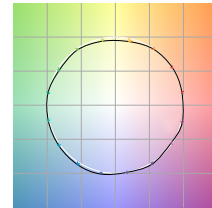
**CRI R values**



**TM30 C Values**

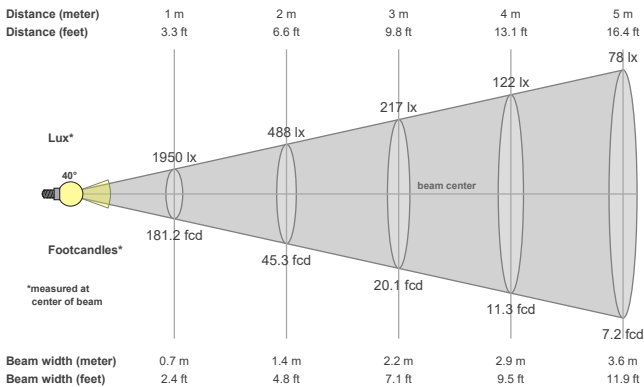


**Color vector graphics**



Color temperature	Color rendering index	Red component	Color fidelity	Color gamut	Color quality scale	Color coordinate cie 1931	Color coordinate cie 1931	Color coordinate	Color coordinate	Color deviation from black body
CCT	CRI	CRI R9	TM30 Rf	TM30 Rg	CQS	x	y	u	v	Δuv
3000 K	97.9	96.1	94.3	99.4	95.3	0.437	0.404	0.250	0.349	0.0012

**Beam details**



**Beam angles**

Beam angle 50%	Field angle 10%	Cutoff angle 2,5%
39.8°	56.1°	65.8°

**Beam intensities**

Peak intensity	Int. ratio in 120° cone	Int. ratio in 90° cone
1950 cd	99.7%	99.1%

**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
1950lx	488lx	217lx	122lx	78lx	54lx	40lx	30lx	24lx	20lx	16lx	14lx	12lx	10lx	9lx	8lx	7lx	6lx	5lx	5lx
181.2fcd	45.3fcd	20.1fcd	11.3fcd	7.2fcd	5fcd	3.7fcd	2.8fcd	2.2fcd	1.8fcd	1.5fcd	1.3fcd	1.1fcd	0.9fcd	0.8fcd	0.7fcd	0.6fcd	0.6fcd	0.5fcd	0.5fcd

The above information is for 3000K colour temperature, for specific module information please see LED spec located on our website

For information regarding other colour temperatures please use the following factors for lumen output and candelas:

2700K = 1