SORAA® VIVID 2
LED MR16 3000K 12VAC 10-12W

Narrow Flood and Flood

Narrow Spot and Spot

POWERED BY GaN on GaN™ TECHNOLOGY

2012 PROGRESS Report SELECTION

reddot design award winner 2013

OUTPUT	1440-6500 CBCP, 380-440 Lumens
BEAM	10°, 20°, 25°, 36°
COLOR	CCT: 2700K CRI>95, R9>95
APPLICATION	Halogen replacement for enclosed indoor and outdoor applications

PERFORMANCE

CBCP matches standard halogen lamps

Single light source

Single crisp shadow

Dimmable to 20%

Power Factor: 0.93

12V (10.8 min, 13.2 max)

COLOR

CCT: 3000K

CRI>95, R9>95

White point accuracy within 3 SDCM

Rich saturated color rendering

Excellent color stability

OPTIMIZED FORM

ANSI standard MR16 form factor: 1.96" (50mm) W x 1.86" (47.6mm) H

Compatible with standard fixtures

Weight: 40g

Proprietary fanless aluminum design provides superior thermal dissipation

HIGHLY COMPATIBLE

Works with magnetic and electronic transformers and dimmers (see complete list at www.soraa.com)

UL and CUL listed for use with 12VAC NEC Class 1 and Class 2 systems

LONG LIFE, LOW MAINTENANCE

Lifetime of 25,000 hours, L70

Three year warranty

ENERGY EFFICIENT

Saves over 75-80% of energy compared to standard halogen lamps

Typical payback of one year or less

INTENDED USE AND APPLICATIONS

LED retrofit lamp to replace 12VAC halogen MR16 lamps in recessed downlights, track lighting, and other indoor applications

Not for use with glass lenses or fully sealed fixtures

Not for use in non-ventilated fixtures less than 3"L x 3"W x 3"H.

Not for use in Emergency Fixtures or Exit Signs

Operating Temperature: -40°C - 25°C ambient, 80-100°C (125°C max) base

Soraa lamps are designed to safely shut down due to conditions in any thermal environment not conducive to minimum airflow or proper ventilation

CERTIFICATIONS

UL, CUL for 12VAC NEC Class 1 and Class 2 systems, FCC 47 CFR Part 15 and Part 18 (EMI), RoHS, CE, C-tick

12VAC

GU-5.3

3000K

CRI >95

R9 >95

DIM

IR

UV

SPECIFICATIONS*

Reference Number	Product Code	Beam	Field	CBCP	Watts	Halogen Equivalent**	Lumens
MR16-50-B01-12-930-10	00269	10°	20°	6500	10	50w	380 (38.6 lm/W)
MR16-50-B01-12-930-20	00237	20°	38°	2850	11.5	65w	440 (38.6 lm/W)
MR16-65-B01-12-930-25	00245	25°	42°	2620	11.5	65w	440 (38.6 lm/W)
MR16-65-B01-12-930-36	00253	36°	60°	1440	11.5	65w	440 (38.6 lm/W)

*at stable warm operating conditions (25°C ambient) **Energy Star Minimum

Form Factor — Base — Voltage — CRI — CCT — Beam

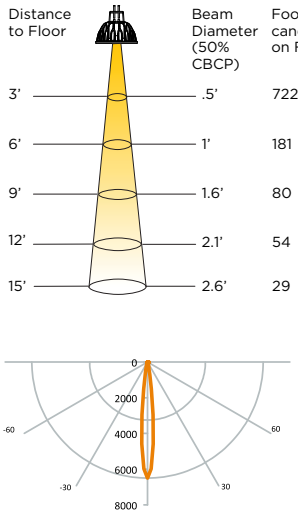
MR16 - 65 - B01 - 12 - 9 30 - 25

The diagram at left shows how to read the different components of the reference number. Base type B01 refers to the GU 5.3 base.

SORAA VIVID 2 MR16 LED 3000K 12VAC 10-12W

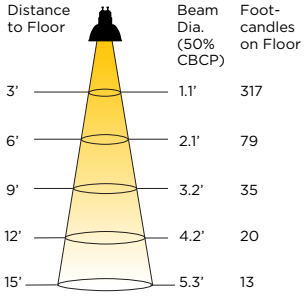
PHOTOMETRICS

Narrow Spot - 10°

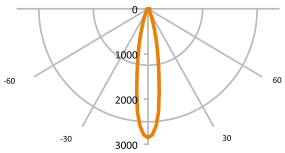


Distance to Floor	Beam Diameter (50% CBCP)	Foot-candles on Floor
3'	.5'	722
6'	1'	181
9'	1.6'	80
12'	2.1'	54
15'	2.6'	29

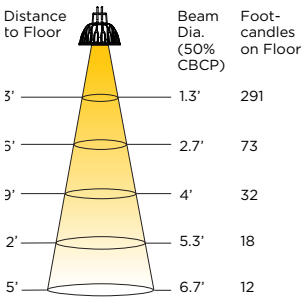
Narrow Flood - 20°



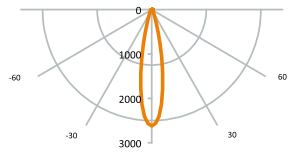
Distance to Floor	Beam Dia. (50% CBCP)	Foot-candles on Floor
3'	1.1'	317
6'	2.1'	79
9'	3.2'	35
12'	4.2'	20
15'	5.3'	13



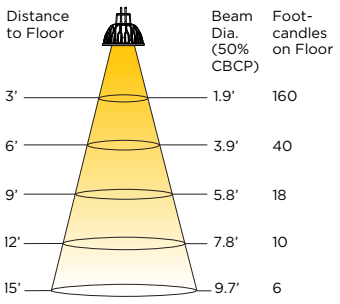
Narrow Flood -25°



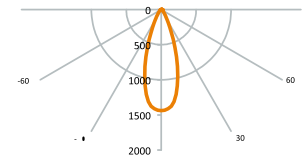
Distance to Floor	Beam Dia. (50% CBCP)	Foot-candles on Floor
3'	1.3'	291
5'	2.7'	73
3'	4'	32
2'	5.3'	18
5'	6.7'	12



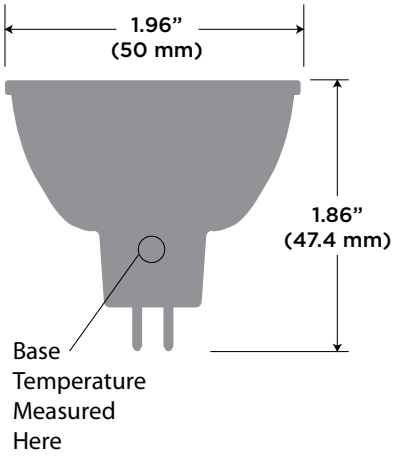
Flood -36° Degree



Distance to Floor	Beam Dia. (50% CBCP)	Foot-candles on Floor
3'	1.9'	160
6'	3.9'	40
9'	5.8'	18
12'	7.8'	10
15'	9.7'	6

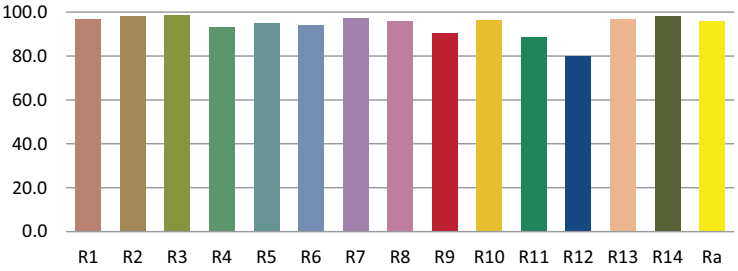


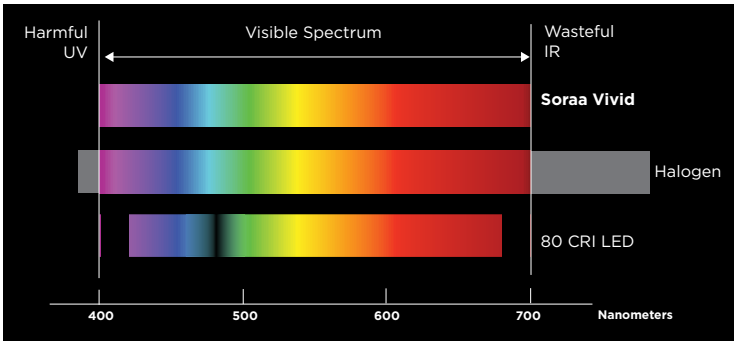
DIMENSIONS



COLOR RENDERING

CRI- Relative R Values





SORAA HIGHLY CONFIDENTIAL

As consideration for receiving the initial release of the SORAA Data Sheet, Company acknowledges and agrees not to use any confidential information associated with the SORAA Data Sheet provided to Company by SORAA for its own use or for any purpose other than to evaluate, carry out discussions concerning, and the undertaking of, a mutually beneficial relationship ("Relationship") between SORAA and Company. Company shall not disclose or permit disclosure of any Confidential Information of SORAA to third parties or to employees of the Company, other than directors, officers, employees, or consultants, of the Company who are strictly required to have the confidential information in order to carry out the discussions regarding and the evaluation of the Relationship. Company strictly agrees that it shall take reasonable measures to protect the secrecy of and avoid disclosure or use of confidential information of SORAA in order to prevent it from falling into the public domain or the possession of persons other than those persons authorized under this Agreement to have any such information.

SAFETY NOTE ON HEAT

Soraa's unique LED technology allows its lamps to operate effectively and efficiently at higher temperatures than other LED lamps, resulting in more light output per diode. Although Soraa's lamps operate at cooler temperatures than halogen lamps, it is recommended that gloves be worn when handling bare lamps that have been energized.

TRANSFORMER/DIMMER COMPATIBILITY

Dimmable to 20% or lower, depending on dimmer. Complete transformer and dimmer compatibility information at www.soraa.com.