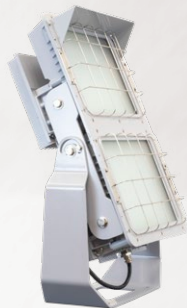


Hazardous area LED lighting
Champ® FMVA LED floodlights

CROUSE-HINDS
SERIES

Champ® FMVA

High lumen LED floodlights



EAT•N

Powering Business Worldwide



Champ FMVA LED floodlights

Safe. Reliable. Efficient.

Featuring the industry's broadest range of LED luminaires for harsh, hazardous and industrial environments, Eaton's Crouse-Hinds can deliver a lighting solution that performs reliably in even the worst operating conditions. All the while reducing your energy, maintenance and manpower costs.

Why LED?

Energy efficiency

LED average energy consumption is significantly less than traditional fluorescent and HID fixtures

Start/restart time

Instant illumination vs. 10 minute restrike time for HID

Light quality

Higher color rendering compared to fluorescent and HID

Environmental benefits

Mercury-free LED eliminates disposal costs and lowers energy consumption for a smaller carbon footprint

Why Crouse-Hinds?

Industry-best reliability

Built to withstand a wide array of applications

Thermal management

Effective heat sinking ensures longer life

Quality of light

Custom optics designed to maximize light distribution and intensity

Globally certified

Designed to global specifications for IEC and NEC applications

Serviceable drivers

Easy access to drivers for service or replacement

Design features



FMVA20L & 25L

Smaller and lighter

- 25% smaller footprint than previous model
- 20 lbs. less weight than previous model



Full frame yoke

- Designed to utilize the SFA6 slipfitter and SWB6 wall mount bracket, making it ideal for retrofit or new installation



FMVA40L & 50L

Versatile design

- Can be used for outdoor or indoor applications, and for a wide range of mounting heights depending on model and light level requirement

High lumen output:

- Up to 120 lumens per watt
- Up to 78% energy savings over traditional HID fixtures (compared to 400W MH)

Multiple lens options:

- Tempered clear glass lens standard
- Diffused glass lens optional

Rugged heat sink

- Heat sink designed to perform and provide maximum light levels in high ambient temperatures up to +55°C and as low as -40°C
- Thick walled castings make for a tough, rugged housing that keeps the internal driver and LED temperature down



Why choose Champ FMVA floodlights?

Reliable floodlights. FMVA LED luminaires are engineered to deliver high lumen output and maintenance-free long life in the toughest conditions.

FMVA25L vs. 1000 watt HID



78%
ENERGY
EFFICIENCY



77%
TOTAL COST
OF OWNERSHIP



100%
MAINTENANCE
REDUCTION

Assumptions: Calculations based on overall life of the LED system. Energy cost of \$.09 per kilowatt; 24 hour per day operation; labor rate of \$75 each for 2 workers; average time for fixture maintenance of 1 hour.

Features & specifications

39% lighter than the previous design with a small footprint

Champ FMVA high lumen LED floodlights are designed to provide full-spectrum, crisp, white light. Four versions of the FMVA are available, providing ideal solutions for a wide range of applications.

Model	Nominal lumens	Wattage*	Equivalent MH luminaire	Typical energy savings/lifetime
FMVA20L	20,500	175	600W-750W	Up to 78% reduction in energy costs and 120,000 hours of continuous operation!
FMVA25L	25,500	216	750W-1000W	
FMVA40L	40,500	340	1500W +	
FMVA50L	50,500	411		

*UNV1 at 120 VAC.

Applications:

- Locations requiring continuous and consistent light levels in extreme ambient temperatures
- Areas requiring frequent on-and-off of lights
- Where extremely corrosive, wet, dusty, hot and/or cold conditions exist
- Oil and gas refineries, drilling rigs, petrochemical facilities, food and beverage facilities, platforms, loading docks, tunnels, outdoor wall and stanchion mounted general area lighting, and where flammable vapors, gases, ignitable dusts, fibers or flyings are present

Design features:

- Rugged design – engineered to perform in ambient temperatures from -40°C to 55°C
- High efficiency – engineered to deliver 117 lumens per watt
- Full frame yoke – designed to utilize the SFA6 slipfitter and SWB6 wall mount bracket, making it ideal for retrofit or new installations
- Custom optics – standard 7x6 pattern provides maximum light distribution
- 5 year fixture warranty†

*SFA6 slipfitter and SWB6 wall mount bracket sold separately (20L/25L only).

†Refer to page 2 of the authorized distributor price book for Crouse-Hinds standard Terms and Conditions.

Fixture life:

- Rated life of 60,000 hours at 55°C operating ambient and 24/7 continuous operation for 365 days

Standard materials:

- Lamp housing and adapter – die cast aluminum with Corro-free™ epoxy powder coat
- Lens – heat- and impact-resistant glass (standard)
- Gaskets – silicone and neoprene
- External hardware – stainless steel

Electrical ratings – NEC model:

Model	120-277 VAC at 50/60 Hz		347-480 VAC at 50/60 Hz	
	Input power	Input amps	Input power	Input amps
FMVA20L	160-158W	1.35-0.64A	163-162W	0.48-0.36A
FMVA25L	200-197W	1.67-0.75A	201-200W	0.59-0.44A
FMVA40L	330-323W	2.74-1.26A	326-322W	0.99-0.72A
FMVA50L	403-393W	3.37-1.50A	393-392W	1.15-0.86A

All models (UNV1 only)	
Voltage range, VDC	127-300V at 50/60 Hz

All models	
Power factor	>0.90



T-ratings – NEC models:

Ambient temp.	Class I, Div. 2	Class II, Div. 1	Min. supply wire temp.
+40°C	T4A	T3C	105°C
+55°C	T4A	T3C	

Ambient temp.	Class I, Div. 2	Class II, Div. 1	Min. supply wire temp.
+40°C	T4A	T4A	105°C
+55°C	T4A	T4A	

Electrical ratings – IEC/ATEX model:

Model	120-277 VAC at 50/60 Hz		347-440 VAC at 50/60 Hz	
	Input power	Input amps	Input power	Input amps
nFMVA20L	160-158W	1.35-0.64A	163-162W	0.48-0.36A
nFMVA25L	200-197W	1.67-0.75A	201-200W	0.59-0.44A
nFMVA40L	330-323W	2.74-1.26A	326-322W	0.99-0.72A
nFMVA50L	403-393W	3.37-1.50A	393-392W	1.15-0.86A

All models (UNV1 only)	
Voltage range, VDC	127-300V at 50/60 Hz

All models	
Power factor	>0.90



T-ratings – IEC/ATEX version:

Ambient temp.	IEC Zone 2	IEC Zone 22	Min. supply wire temp.
+40°C	T4	T4	105°C
+55°C	T4	T4	

Ambient temp.	IEC Zone 2	IEC Zone 22	Min. supply wire temp.
+40°C	T81°C	T81°C	105°C
+55°C	T94°C	T94°C	

Ordering information

Part number example

FMVA20LCY/UNV34 76 M20 S891 BZ

Champ FMVA floodlight, 20,500 lumens, cool white, yoke mount, 347-440 VAC driver, M20 entry, diffused glass lens, bronze paint

FMVA

Model

FMVA

NEC

nFMVA

IEC/ATEX

Light source/intensity

20L

20,500 nominal lumens

25L

25,500 nominal lumens

40L

40,500 nominal lumens

50L

50,500 nominal lumens

Color temperature

C

5000K, 70 CRI (cool white)

W

3000K, 80 CRI (warm white)

Accessories (ordered separately)

BLHN2

Bull horn, 2 tenon, gray

BLHN-BZ2

Bull horn, 2 tenon, bronze

BLHN-WH2

Bull horn, 2 tenon, white

20L

C

Y

/UNV34

Voltage

/UNV1

100-277 VAC, 50/60 Hz;
127-300 VDC

/UNV34

347-440 VAC, 50/60 Hz

Optical distribution

76

7x6 floodlight pattern optics

33

3x3 floodlight pattern optics

Mount

Y

Yoke mount

76

M20

Entries

BLANK

¾" NPT

M20

20mm

M25

25mm

M20

S891

Paint

BLANK

Gray

BZ

Bronze

WH

White

Lens material

BLANK

Clear glass lens

S891

Diffused glass lens

S891

BZ

BZ

WH

S891

S891

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*20L and 25L models only.

Certifications and compliances – NEC model:

NEC and CEC:

- Class I, Division 2, Groups A, B, C, D
- Class I, Zone 2
- Class II, Division 1, Groups E, F, G
- Type 4X, IP66

UL Standards:

- UL844; UL1598; UL1598A; UL1850

CSA Standard:

- CSA C22.2 No. 137

Qualifications and compliances:

- DesignLights Consortium® Qualified (pending)*



*Refer to www.designlights.org Qualified Products List under family models for full listing details. Not all models are approved for all application categories.

Certifications and compliances – IEC/ATEX model:

IEC:

- IEC 60079-0:2011+ Corr.1(2012-01) + Corr. 2 (2013-12) + I-SH 01 (2013-11) + I-SH 02 (2014-10) / EN 60079-0:2012 + A11:2013
- IEC 60079-7:2017/ EN 60079-7:2015
- IEC 60079-31:2013/ EN 60079-31:2014
- IEC 60598-1:2008/EN60598-1:2008
- IEC 60598-2:2008/EN60598-2:2008
- IP66



IECEx/ATEX:

- IECEx UL 15.0029X
- DEMKO 15 ATEX 1377X
- DEMKO 15 ATEX1383
- Ex ec IIC T4 Gc Tamb -40°C to +40°C
- Ex ec IIC T4 Gc Tamb -40°C to +55°C
- Ex tb IIIC T81C Db Tamb -40°C to +40°C
- Ex tb IIIC T65°C Db Tamb -40°C to +40°C
- Ex tb IIIC T65°C Db Tamb -40°C to +55°C
- Ex II 3 G Ex ec IIC T4 Gc -40°C to +55°C
- Ex II 2 D Ex tb IIIC T81C Db IP66 -40°C to +40°C

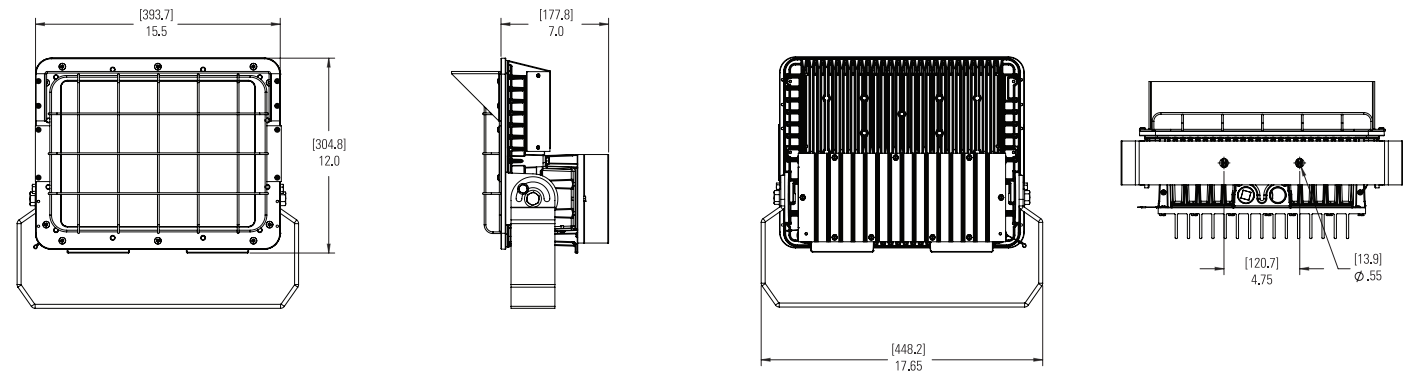
Weights and dimensions

FMVA20 & 25L

	Width		Height		Depth		Weight	
	in.	mm.	in.	mm.	in.	mm.	lb.	kg.
FMVA20L	15.5	393.7	12.0	304.8	7.0	177.8	34.0	15.4
FMVA25L	15.5	393.7	12.0	304.8	7.0	177.8	24.0	10.9

Effective projected area 20L & 25L

Position (tilt)	ft.-sq.
at 0°	1.5
at 45° backwards	1.1
at 60° forward	0.8

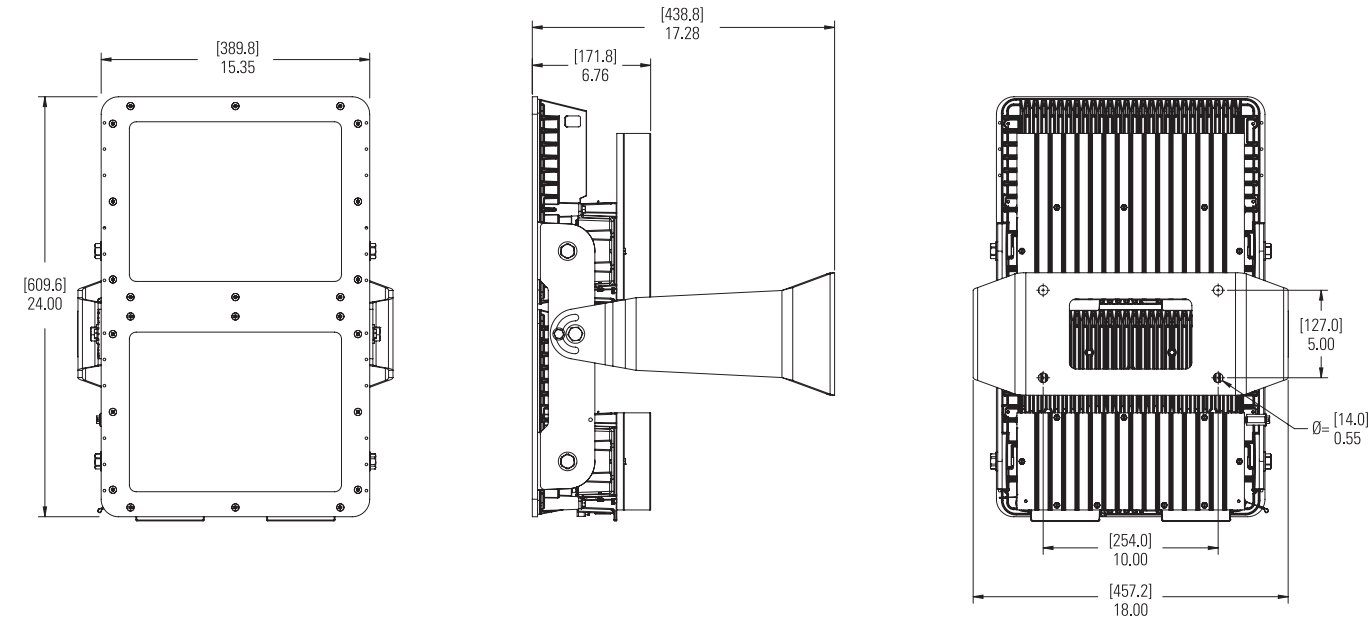


FVMA40L & 50L

	Width		Height		Depth		Weight	
	In.	mm.	In.	mm.	in.	mm.	lb.	kg.
FVMA40L & 50L	18.0	457.2	24.0	609.6	17.28	438.8	77.0	34.9

Effective projected area 40L & 50L

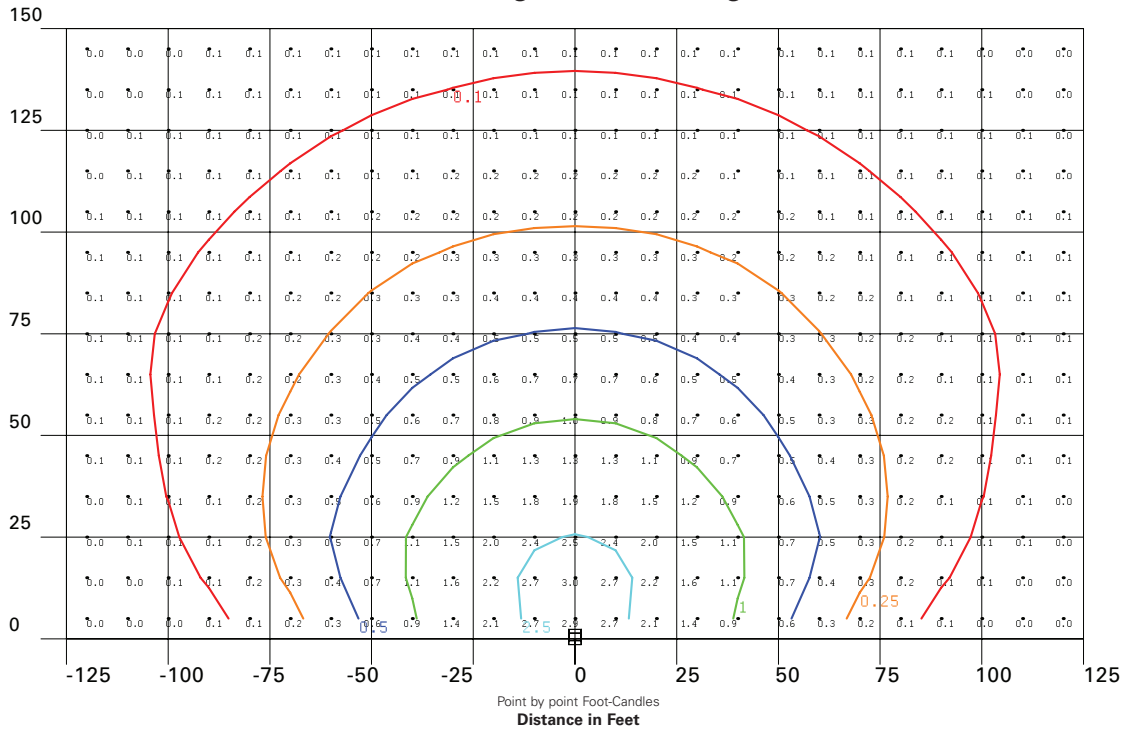
Position (tilt)	ft.-sq.
at 0°	3.20
at 45° backwards	3.25
at 60° forward	3.62



Photometric data

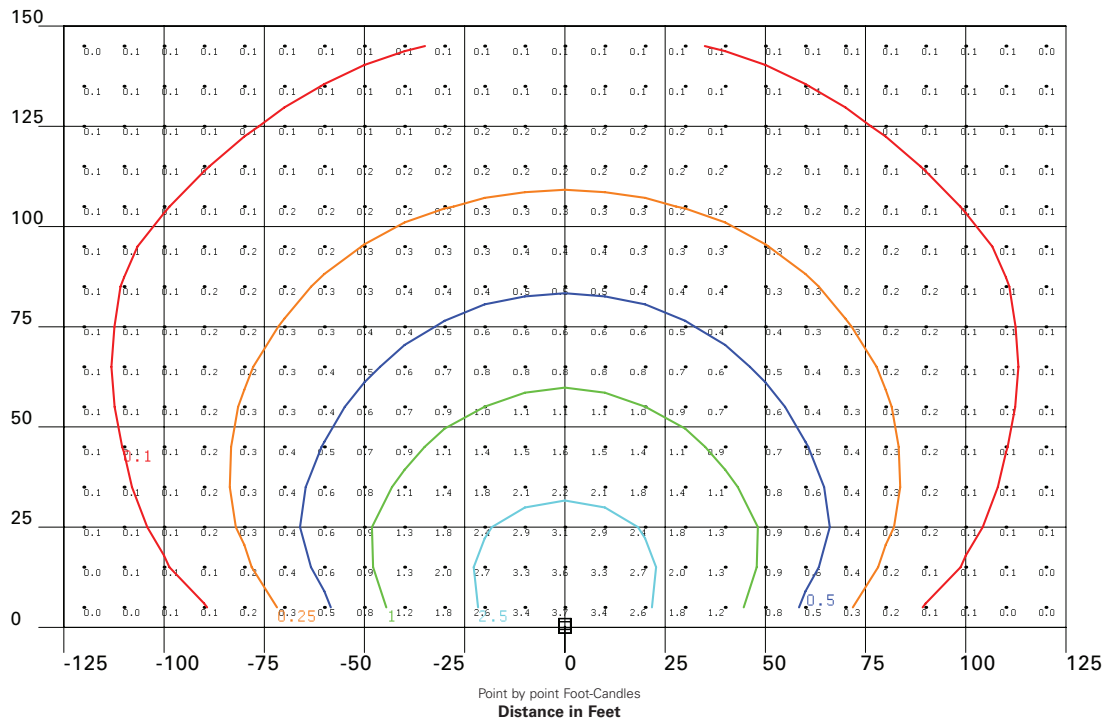
7x6 optics

FMVA20L Height: 45 ft.; Tilt angle: 45°



7x6 optics

FMVA25L Height: 45 ft.; Tilt angle: 45°



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