

# 450

## **LED MODULAR LIGHT MARINE SERIES**

- ▶ **DESIGN** LED MODULAR AREA LIGHT MARINE SERIES is designed to meet UL 1598A, special protection for marine grade fixture. Salt water resistant die-cast aluminum housing for use in harsh locations. It is designed to operate on 120- 277V or 200-480 V circuits with a 1-10V dimmable driver.
- ▶ Up to 30° angle adjustment for each lighting module is available.
- ▶ Surge protection 10kV protects the fixture from voltage spikes and current surges.
- ▶ APPLICATION Perfect commercial or industrial solution for high mast lighting, stadium lighting, area lighting, wharfs, train stations, and boat lights, and many other applications. It is also Wet Locations rated.
- ▶ ADVANTAGES With calculated lifespan up to 155,000 hours, these fixtures are made to last decades under normal operation! ASD provides a 5-year limited warranty along with UL 1598A and DLC Premium certifications to guarantee top quality products and safety!
- UL 1598A Standard for Supplemental Requirements for Luminaires for Installation on Marine Vessels.

Catalog number	
Notes	
Туре	



Model	Watts	Voltage	Dimmable	Lumens	CCT	Finish	Dimensions (LxWxH)		
ASD-LMAL-250D50-MRN	250W	120-277 V	1-10 V	33,764 lm	5,000 K	Black	11-5/8" x 19" x 5-3/8"		
ASD-LMAL-500D50-MRN	500W	120-277 V	1-10 V	66,281 lm	5,000 K	Black	22-1/4" x 20" x 5-3/8"		
ASD-LMAL-750D50-MRN	750W	120-277 V	1-10 V	99,973 lm	5,000 K	Black	30-1/8" x 20" x 5-3/8"		
ASD-LMAL-1000D50-MRN	1,000W	120-277 V	1-10 V	132,982 lm	5,000 K	Black	38" x 20" x 5-3/8"		
ASD-LMAL-1250D50-MRN	1,250W	120-277 V	1-10 V	166,303 lm	5,000 K	Black	45-1/8" x 20" x 5-3/8"		
LMAL-HV HIGH VOLTAGE									
ASD-LMAL-HV-250D50-MRN	250W	200-480 V	0-10 V	33,167 lm	5,000 K	Black	11-5/8" x 19" x 5-3/8"		
ASD-LMAL-HV-500D50-MRN	500W	200-480 V	0-10 V	65,893 lm	5,000 K	Black	22-1/4" x 20" x 5-3/8"		
ASD-LMAL-HV-750D50-MRN	750W	200-480 V	0-10 V	99,025 lm	5,000 K	Black	30-1/8" x 20" x 5-3/8"		
ASD-LMAL-HV-1000D50-MRN	1,000W	200-480 V	0-10 V	132,285 lm	5,000 K	Black	38" x 20" x 5-3/8"		
ASD-LMAL-HV-1250D50-MRN	1,250W	200-480 V	0-10 V	164,523 lm	5,000 K	Black	45-1/8" x 20" x 5-3/8"		

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#### **PRODUCT SPECIFICATIONS:**

Construction & Materials									
	ADC12 alumainum								
Housing	ADC12 aluminum								
Lens		PC .							
nstallation kit, mounting bracket	Iron								
Reflector	Iron								
inish	Black								
	ASD-LMAL-250D50-MF		14.55 lbs (			/-250D50-MRN	14.55 lbs (		
	ASD-LMAL-500D50-MF			18.7 kg)		/-500D50-MRN			
Weight	ASD-LMAL-750D50-MF		56 lbs (25.4 kg)			/-750D50-MRN	56 lbs (25.4 kg)		
	ASD-LMAL-1000D50-M	RN	70.55 lbs (	70.55 lbs (32 kg)		/-1000D50-MRN	70.55 lbs (32 kg)		
	ASD-LMAL-1250D50-M	ASD-LMAL-1250D50-MRN			ASD-LMAL-H	/-1250D50-MRN	87.3 lbs (39.6 kg)		
Environmental system									
Work environment	Marine Luminaires, We	Locations, IP6	6						
Operating temperature	-40°F to 122°F (-40°C to	50°C)							
L-70 Life	R > 54,000 hrs; C > 155	,000 hrs							
Optical system									
	ASD-LMAL-250D50-MR	N	33,764 lm		ASD-LMAL-H	/-250D50-MRN	33,167 lm		
	ASD-LMAL-500D50-MR	N	66,281 lm		ASD-LMAL-H	/-500D50-MRN	65,893 lm		
Luminous flux	ASD-LMAL-750D50-MR	N	99,973 lm		ASD-LMAL-H	/-750D50-MRN	99,025 lm		
	ASD-LMAL-1000D50-M			n		/-1000D50-MRN	132,285 lm	า	
	ASD-LMAL-1250D50-M		166,303 ln			/-1250D50-MRN	164,523 lm		
Color temperature	5,000 K		.,				, ,, 01		
CRI	>70								
Electrical system	7,0								
,	Regular voltage: 120-27	7 V							
Input voltage	High voltage: 200-480 V								
			2.77 A	277 Λ		ASD-LMAL-HV-250D50-MRN		1.4 A	
	ASD-LMAL-500D50-MRN		5.55 A			ASD-LMAL-HV-500D50-MRN		2.8 A	
Max input current	ASD-LMAL-750D50-MR			8.33 A		ASD-LMAL-HV-750D50-MRN		4.2 A	
viax iriput current	ASD-LMAL-1000D50-M		11.11 A			ASD-LMAL-HV-1000D50-MRN		5.6 A	
						ASD-LMAL-HV-1250D50-MRN		7 A	
In mark a command (A alicenticae a)	ASD-LMAL-1250D50-M		13.8 A				1 / A		
Inrush current (Action time)	Regular voltage: 75 A (0	.57 5)		High voltage: 50 A (0.53 S)					
Off state power	0W		3E0M		100 11411 10	ACD LAMAL LIN SECRED MEN			
	ASD-LMAL-250D50-MRN		250W			ASD-LMAL-HV-250D50-MRN			
_		ASD-LMAL-500D50-MRN		500W		ASD-LMAL-HV-500D50-MRN			
Power consumption	ASD-LMAL-750D50-MR		750W			ASD-LMAL-HV-750D50-MRN		750W	
	ASD-LMAL-1000D50-M		1000W			ASD-LMAL-HV-1000D50-MRN		1000W	
		ASD-LMAL-1250D50-MRN		1250W		ASD-LMAL-HV-1250D50-MRN		1250W	
Power factor	> 0.9								
Output voltage	24-48 V								
	ASD-LMAL-250D50-MR		4.8 A			/-250D50-MRN	5 A 10 A		
	ASD-LMAL-500D50-MR			9.65 A		ASD-LMAL-HV-500D50-MRN			
Max output current	ASD-LMAL-750D50-MR	N	14.5 A		ASD-LMAL-H	ASD-LMAL-HV-750D50-MRN			
	ASD-LMAL-1000D50-M	RN	19.5 A		ASD-LMAL-H	ASD-LMAL-HV-1000D50-MRN			
	ASD-LMAL-1250D50-MRN		24 A		ASD-LMAL-H	ASD-LMAL-HV-1250D50-MRN			
Surge protection DM/CM	10 kV / 10 kV								
Effective projected area (EPA) ratings	9 1			SFK mounting		LTM brad			
	250W	1.08 ft <sup>2</sup>		-	-	1* 250W		3.7 ft <sup>2</sup>	
	500W	2.5 ft <sup>2</sup>		500W	2.5 ft <sup>2</sup>	2* 250W		4.8 ft <sup>2</sup>	
Models	750W	3.86 ft <sup>2</sup>		750W	3.86 ft <sup>2</sup>	3* 250W		5.9 ft <sup>2</sup>	
	1,000W	5.2 ft <sup>2</sup>		-	-	4* 250W		7 ft <sup>2</sup>	
	1,250W	6.5 ft <sup>2</sup>		-	-			-	
Dimming compatible controls	1,20011	0.0 It		Regular and volunt	tary certifications				
Brand	Leviton	Lutron		5-year limited warn	•				
orana	ZS057-D0Z	Lutron MC 7101		Marine luminaires	III cortific	III cortified E510257			
		MS-Z101				UL certified E510357			
Models	DD710	NTSTV		DesignLights Consortium (DLC) listed (Classification: Prer Main: Outdoor luminaires; General application: Very high					
	DS710	DVSTV		Primany use. Archit	uon: very mgn output; iminaires				
	IP710	DVTV		riiiiary use: AICIIII	y use: Architectural flood and spot luminaires.				

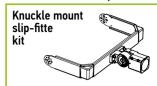
For most up-to-date spec sheets please refer to asd-lighting.com

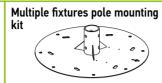


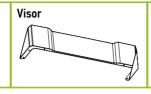




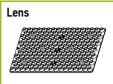
#### ACCESSORIES (sold separately):











## INSTALLATION GUIDE

#### IMPORTANT SAFETY INFORMATION:

Please read all the instructions below before installation.

- Make sure that the supply voltage corresponds to the rated product voltage. The product must be installed by a qualified electrician in accordance with the National Electrical Code and corresponding local codes.
- If the product is damaged, do not use it.

**AWARNING**RISK OF PERSONAL INJURY – READ and follow all WARNINGS and

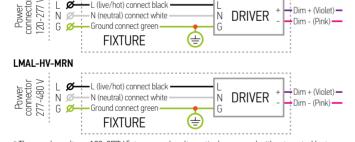
RISK OF PERSUNAL INJURY — READ and follow all WARNINGS and installation instructions. Keep or give to the owner for future reference. Risk of cuts: Wear gloves to prevent cuts or abrasions when removing from carton, handling, installing, and maintaining this product. Risk of electric shock: This product must be installed in accordance with the applicable installation code by a person familiar with the construction and operation of the product and the hazards involved.

Risk of Fire: Minimum 194°F supply conductors. Consult a qualified electrician to ensure correct branch circuit conductor.

ASD® assumes no responsibility for claims arising out of improper or careless Installation or handling of this product.

#### **ELECTRICAL SCHEMATIC DIAGRAM:**

#### LMAL-MRN



\* The regular voltage 120-277V fixtures can be alternatively powered without neutral by two-phase circuit with phase-to-phase voltage of 208V (L1-120V & L2-120V). **WARNING:** Phase-to-phase voltage should be less than 277V (160V per each phase) and more than 120V (70V per each phase)! Do not confuse Regular Voltage fixtures of 120-277V with High Voltage ones of 200-480V!

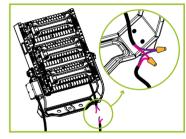
#### FIXTURE ASSEMBLY:

- 1. Remove wing-nut and spring assembly from each side of the bracket.
- Install module(s). Secure at desired angle with wing-nut and spring
- Plug female leads from module(s) into male lead from the bracket junction box



#### DIMMING WIRES:

- 1. Remove the 4 Philips head screws in the blue end covers on either side of the driver housing.
- 2. Using a hex key remove the 2 bolts holding the driver housing to the body of the fixture (hex key is customer supplied). Take the dimming wires out.
- 3. Complete low voltage wiring following electrical diagram on page 3. Reattach the driver with the 2 hex bolts and secure blue end covers with Philips head screws.



#### **INSTALLATION 250W MODULE:**

- 1. Remove the circular brackets from either side of the unit.
- Attach the U-mount lock into place at desired angle.



For most up-to-date spec sheets please refer to asd-lighting.com



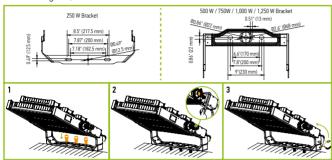






#### INSTALLATION STEPS:

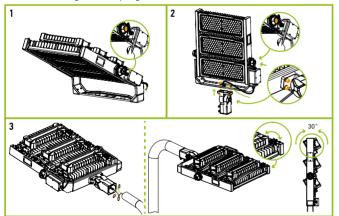
- 1. Drill holes on the mounting surface corresponding to the holes on the bracket; Fix the fixture with screws (2 M12 screws for 250W fixture, 3 M20 screws for higher wattages, (customer supplied).
- 2. To adjust mounting angle, remove rubber caps from adjustable knuckles on each side of the bracket, adjust knuckles to desired angle with a 14mm hex key (customer supplied). Tighten hex bolts and reinsert rubber caps.
- 3. Complete wiring following electrical diagram (can be found at the beginning of installation guide).



#### KNUCKLE MOUNT SLIP FITTER KIT

## ASD-LMAL-SFK sold separately:

- 1. Remove rubber caps from adjustable knuckles on each side of the bracket, remove hex bolts securing outer bracket to inner bracket assembly.
- 2. Replace stock outer bracket with slip fitter/trunnion kit. Adjust knuckles to desired angle, tighten. Pass wires from j-box through hole in trunnion bracket and through slip fitter. Attach slip fitter to trunnion with 4 bolts (included).
- 3. Complete wiring following electrical diagram (can be found at the beginning of installation guide). Mount fixture on pole, adjust module/-s to desired angle and secure it with wing-nut and spring.

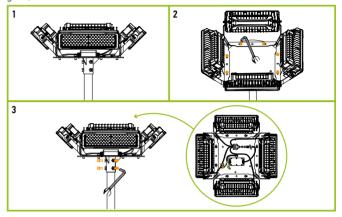


\* Compatible with 500-750W models only.

#### MULTIPLE FIXTURES POLE MOUNTING KIT

#### ASD-LMAL-LTM sold separately:

- 1. Attach up to (4) 250W fixtures to the mounting kit with M12 screws (included).
- 2. Tighten each bracket to mounting plate.
- 3. Tighten plate slip fitter to pole with 6 screws M12 (customer supplied). Complete wiring following electrical diagram (can be found at the beginning of installation quide)



\* Compatible with 1-4 250W fixtures only.

#### LENS INSTALLATION:

- 1. Get to the back of the module and remove 12 screws holding front frame.
- 2. Remove the module front frame, tempered glass, waterproof rubber ring and 2 original lenses.
- 3. Attach 2 new lenses, screw them with 6 screws, put back the waterproof rubber ring, tempered glass and the module front frame, make sure they are aligned. Tighten 12 screws on the back of the module to complete the install.

#### VISOR INSTALLATION:

- 1. Get to the back of the module and remove 12 screws holding front frame.
- 2. Replace the module front frame with the one coming as part of visor kit (has 6 screw holes in it).
- 3. Screw the new front frame to the module with 12 screws. Attach the visor to the front of the module with 6 screws (included).

#### LASER INSTALLATION:

- 1. Insert the laser into the round laser holder with 3 screws, locate the holder in the middle of the laser handle and tighten the screws.
- 2. Insert the L-shape flat mounting bracket into the corresponding hole at the bottom of the round holder till it fits securely.
- 3. Screw the second end of the L-shape flat mounting bracket to the top of the first







## **ORDERING INFORMATION**

Model	UPC	Description	Components	Pcs	UPC	Carton size	Carton weight
ASD-LMAL-250D50-MRN	819201024155	Bracket	ASD-IK250-LMAL-MRN	1	819201024056	20.08" x 9.96" x 3.52"	4.41 lbs
	819201024133	Module	ASD-MODULE-LMAL-250D50-MRN	1	819201024032	20.2" x 8.9" x 7.5"	13.67 lbs
ASD-LMAL-500D50-MRN	819201024162	Bracket	ASD-IK500-LMAL-MRN	1	819201024063	24.49" x 24.29" x 8.31"	18.74 lbs
	017201024102	Module	ASD-MODULE-LMAL-250D50-MRN	2	819201024032	20.2" x 8.9" x 7.5"	13.67 lbs
ASD-LMAL-750D50-MRN	819201024179	Bracket	ASD-IK750-LMAL-MRN	1	819201024070	32.36" x 24.29" x 8.31"	22.49 lbs
	017201024177	Module	ASD-MODULE-LMAL-250D50-MRN	3	819201024032	20.2" x 8.9" x 7.5"	13.67 lbs
ASD-LMAL-1000D50-MRN	819201024186	Bracket	ASD-IK1000-LMAL-MRN	1	819201024087	40.24" x 24.29" x 8.31"	25.13 lbs
	017201024100	Module	ASD-MODULE-LMAL-250D50-MRN	4	819201024032	20.2" x 8.9" x 7.5"	13.67 lbs
ASD-LMAL-1250D50-MRN	819201024193	Bracket	ASD-IK1250-LMAL-MRN	1	819201024094	47.52" x 24.29" x 9.25"	30.86 lbs
	017201024173	Module	ASD-MODULE-LMAL-250D50-MRN	5	819201024032	20.2" x 8.9" x 7.5"	13.67 lbs
			LMAL-HV HIGH VOLTAGE				
ASD-LMAL-HV-250D50-MRN	819201024216	Bracket	ASD-IK250HV-LMAL-MRN	1	819201025404	20.08" x 9.96" x 3.52"	4.41 lbs
	017201024210	Module	ASD-MODULE-LMAL-HV-250D50-MRN	1	819201024049	20.2" x 8.9" x 7.5"	13.69 lbs
ASD-LMAL-HV-500D50-MRN	819201024223	Bracket	ASD-IK500HV-LMAL-MRN	1	819201025411	24.49" x 24.29" x 8.31"	18.74 lbs
		Module	ASD-MODULE-LMAL-HV-250D50-MRN	2	819201024049	20.2" x 8.9" x 7.5"	13.69 lbs
ASD-LMAL-HV-750D50-MRN	819201024230	Bracket	ASD-IK750HV-LMAL-MRN	1	819201025428	32.36" x 24.29" x 8.31"	22.49 lbs
	819201024230	Module	ASD-MODULE-LMAL-HV-250D50-MRN	3	819201024049	20.2" x 8.9" x 7.5"	13.69 lbs
ASD-LMAL-HV-1000D50-MRN	01020102/2/7	Bracket	ASD-IK1000HV-LMAL-MRN	1	819201025435	40.24" x 24.29" x 8.31"	25.13 lbs
	819201024247	Module	ASD-MODULE-LMAL-HV-250D50-MRN	4	819201024049	20.2" x 8.9" x 7.5"	13.69 lbs
ASD-I MAI -HV-1250D50-MRN	819201024254	Bracket	ASD-IK1250HV-LMAL-MRN	1	819201025442	47.52" x 24.29" x 9.25"	30.86 lbs
ASD-LIMAL-LIV-1200D00-MIKIN	017201024234	Module	ASD-MODULE-LMAL-HV-250D50-MRN	5	819201024049	20.2" x 8.9" x 7.5"	13.69 lbs

## **ACCESSORIES:**

Model	Description	UPC	Pcs. per carton	Carton size	Carton weight	GTIN 14
ASD-SFK-LMAL	Knuckle mount slip-fitter kit	819201024124	1	26.26" x 13.66" x 4.53"	15.21 lbs	-
ASD-LTM-LMAL	Multiple fixtures pole mounting kit	819201024209	1	24.72" x 24.72" x 5.43"	15.43 lbs	-
ASD-LS-LMAL	Laser for modular area light	819201024100	10	12.20" x 12.20" x 7.48"	13.67 lbs	10819201024107
ASD-VS-LMAL	Visor for modular area light	819201024117	10	19.69" x 19.69" x 7.87"	11.02 lbs	10819201024114
ASD-L30-LMAL	Clear lens for LED modular light 30° (kit for one module)	819201024131	10	12.20" x 12.20" x 7.48"	10.14 lbs	10819201024138
ASD-L60-LMAL	Clear lens for LED modular light 60° (kit for one module)	819201024148	10	12.20" x 12.20" x 7.48"	10.14 lbs	10819201024145
ASD-L120-LMAL	Clear lens for LED modular light 120° (kit for one module)	819201025398	10	12.20" x 12.20" x 7.48"	10.14 lbs	10819201025395

