

0-45° accent – reflector

id®



Patent Pending

features

Trims available in Overlap flange or Flush mud-in for a seamless appearance.

Gloves Off™ hot aiming made simple with gear drive for both 45° vertical and 363° horizontal adjustment; Self locking.

Auto Memory remembers original lamp position after relamping. Lenses are independent of lamp, and remain undisturbed during relamping.

Adjustment mechanism provides for:

- easy relamping
- locking of both vertical and horizontal aiming
- lowers for easy lamp and lens access.

Perfect Fit™ installation process provides seamless integration in plaster, drywall and acoustical tiles, while maintaining optics in any ceiling thickness.

Smart Lock™ ring allows quick removal and re-assembly of trim components for field painting.

Standard white finish is field paintable.

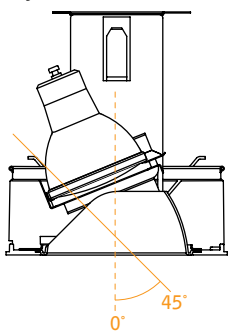
Interchangeable lamp and trim mechanisms allow for maximum flexibility, even after luminaire is installed.

reflector options

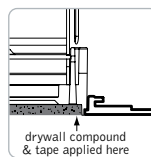
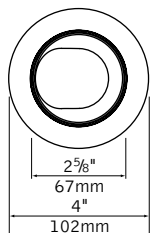


trim assembly

trim with adjustment mechanism

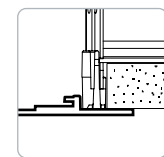
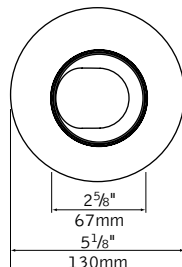


flush trim (drywall only)



ceiling cutout dimensions: 6 3/16"

overlap trim

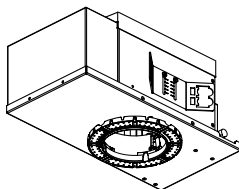


ceiling cutout dimensions: 4 11/16"

housing

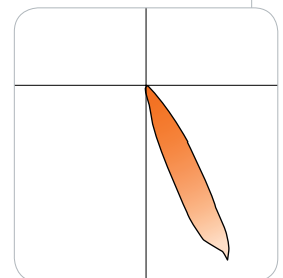
T/IC

14" x 7.625" x 6"h



performance

Accent Clear Specular Reflector
CMH20MR16/830/SP12
4557 cd @ 30° (30° tilt)



Visit focalpointlights.com for complete photometric data.

may 2010 C

fixture:

project:

housing specifications

lamp

Ceramic Metal Halide 20W MR16 Lamp provides a crisp white light source, 3000K and 80CRI, with UV stop. It is a protected lamp for use in open fixture designs.

construction

(IC) Thermally protected for Insulated Ceiling housing for new construction applications with direct insulation contact. Unit is enclosed in a 20ga black painted CRS housing, which eliminates stray light into the plenum, on a 20Ga CRS frame. IC housing ships standard with butterfly brackets which mount to ½ emt or channel, vertically adjusts 2 inches. Bar hangers are an option and must be specified when ordering thermally protected housing. Transformer is accessible from below ceiling. Unit may be relamped from above. Fixture will not exceed 7.5 lbs.

electrical

Ceramic Socket GX10 for Metal Halide lamp, with permanently joined socket wires. Lamp is held by twist and lock 5KVA socket, ensuring simple lamp insertion and removal.

Large junction box 2x4x5.5" with ½" and ¼" pryouts. UL listed for thru branch wiring, 4#12 90°C conductors.

Thermally isolated electronic ballast, replaceable from below, is mounted outside of the housing to ensure cool operation. Wiring compartment mounting provides additional thermal break from the lamp. 120 or 277V, M156 ANSI spec ballast consumes 26 watts and provides >90% PF, 20% THD and end of life shut down circuitry.

installation

Adjustable throat allows infinite adjustment for ½" to 1½" thick ceilings. Shipped in ½" ceiling position. For thicker ceilings consult factory.

Ceiling thickness adjustment sleeve locks with supplied ⅜" hex driver.

Sleeve allows fine tuning of the housing for a perfect fit. Comes with laser/string alignment guides.

Housing ships with dust cover.

trim specifications

aesthetics

Slotted reflector cones with parabolic profile ensures glare free optics. Reflector is .040 spun aluminum. Optional sloped-sided baffle, consists of ¼" steps. BS, BB and WB are painted finishes. Reflector sit flush with the front surface of the faceplate. Smart Lock™ ring allows disassembly of trim components for field painting of faceplate. Matte white finish may be used as a primer coat.

adjustment mechanism

Auto Memory for relamping, lamp returns to preset aiming position. Mechanism is matte black finish and holds lamp and lenses independently. Hot aiming with Philips screwdriver allows for 45° vertical tilt, and 363° rotation and locks into position.

Mechanism pulls down for quick and easy relamping.

Vertical angle and horizontal rotation indicators display positioning.

Tempered soft focus lens and spacer plate supplied as standard.

Lens tray can hold up to two accessories, up to ¼" thick. Lenses remain undisturbed during relamping.

optics

50° cutoff to the lamp and lamp image.

construction

Trim stays captive to housing during relamping via torsion springs.

Torsion springs pull trim tight to the ceiling.

No visible fasteners within the trims

Mechanical light traps eliminate light leaks

Warp free die-cast aluminum faceplate, .040" thick flange on overlap versions.

labels

UL listed, Damp label standard.

No visible labels when trim is installed.

housing ordering

housing series FM4
Metal Halide Housing FM4

lamp MR
20W CMH MR16 MR

ballast type M156U
M156 20W Electronic M156U
(120V and 277V)

faceplate type _____
Round Flush RF
Round Overlap RO

housing type IC
Combined T and IC Rated IC

factory options _____
Bar Hangers BH
Chicago Plenum CP
3000K Lamp 12' Spot LSP
3000K Lamp 25' Spot LFL
3000K Lamp 40' Wide Flood LWF

trim ordering

trim aperture D2
2½" Aperture D2

faceplate type _____
Round Flush RF
(drywall only)
Round Overlap RO

optic AA
Adjustable Accent AA

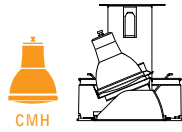
color _____
Clear Specular CS
Clear Diffuse CD
Black Specular BS
Warm Diffuse WD
Black Baffle BB
White Baffle WB

faceplate finish _____
White WH
Black BK
Titanium Silver TS
Aluminum Raw AL

lens accessories _____
(soft focus lens supplied as standard)
Hex Louver HL
Linear Spread Lens LSL
Prismatic Spread Lens PSL
Sand Blasted Lens SBL
Clear Lens CL
UV Lens UVL

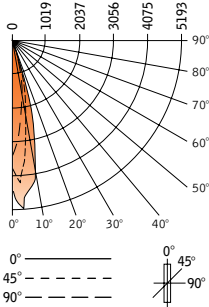
a complete unit consists of two line items, housing and trim
example: FM4-MR-M156U-RF-IC
D2-RF-DN-CD-WH

rnd accent – reflector
id®



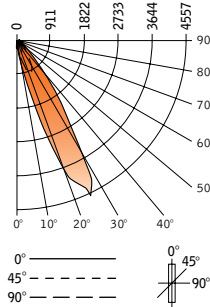
Luminaire: 20W CMH adjustable accent, spot distribution with soft focus lens
 Filename: D2RXAACSMH20SP12_0.ies and D2RXAACSMH20SP12_30.ies
 Catalog #: D2-RX-AA-CS-WH
 Efficiency: 91% (0° tilt), and 92% (30° tilt)
 Photometric Report #: 13557.0 and 13558.0

CANDLEPOWER DISTRIBUTION - 0° TILT



Vertical Angle	Horizontal Angle			
	0°	22.5°	45°	67.5° 90°
0°	3594	3594	3594	3594
5°	5193	4934	4318	3672 3078
15°	2527	2388	1942	1414 1014
25°	550	586	517	341 254
35°	114	120	112	97 89
45°	61	61	55	55 45
55°	1	2	1	0 0
65°	0	0	0	0 0
75°	0	0	0	0 0
85°	0	0	0	0 0
90°	0	0	0	0 0

CANDLEPOWER DISTRIBUTION - 30° TILT

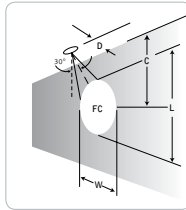
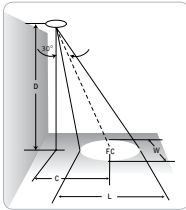


Vertical Angle	Horizontal Angle			
	0°	22.5°	45°	67.5° 90°
0°	364	364	364	364 364
5°	603	579	485	409 344
15°	2158	1665	837	413 277
25°	4557	2859	772	273 163
35°	1765	1379	296	111 86
45°	233	191	80	57 25
55°	58	57	47	14 0
65°	10	3	0	0 0
75°	0	0	0	0 0
85°	0	0	0	0 0
90°	0	0	0	0 0

FOOTCANDLE VALUES

0° aiming angle - horizontal surface

D	C	FC	L	W
6'	0	100	1.3'	1.3'
8'	0	56	1.7'	1.7'
10'	0	36	2.1'	2.1'
12'	0	25	2.5'	2.5'
14'	0	18	2.9'	2.9'



FOOTCANDLE VALUES

30° aiming angle - horizontal surface

D	C	FC	L	W
6'	3.5'	56	1.7'	1.5'
8'	4.6'	33	2.3'	1.9'
10'	5.8'	21	2.8'	2.4'
12'	6.9'	15	3.2'	2.9'
14'	8.1'	11	3.9'	3.4'

FOOTCANDLE VALUES

30° aiming angle - vertical surface

D	C	FC	L	W
2'	3.5'	176	1.7'	0.8'
3'	5.2'	78	1.6'	1.3'
4'	6.9'	44	3.5'	1.7'
5'	8.7'	28	4.3'	2.1'
6'	10.4'	19	5.2'	2.5'

Footcandle results based on AGI32; off the shelf lamp in fixture, with soft focus lens; Reflectances=0/0/0; LLF=1

Go to www.focalpointlights.com for additional photometric data.