

CATALOG #: \_\_\_\_\_

TYPE: \_\_\_\_\_

PROJECT: \_\_\_\_\_

## FEATURES

- Williams turn-key Power over Ethernet (PoE) solution provides plug-and-play networked lighting and control.
- Wide, medium, and narrow distributions tailor performance to the application
- Contemporary design provides glare-free illumination for a soft ceiling appearance
- 2" aperture is unobtrusive in small scale spaces
- Fixed or adjustable aim with 0° - 25° tilt and 360° rotation
- Open reflector with 5 finishes compliment interior style

## SYSTEM REQUIREMENTS

- Lighting system (site software)
- Gateway or alternate server (runs software)
- PoE switches or Ethernet switches and mid-span power injectors
- See [hew.com/poe](http://hew.com/poe) for details

## SPECIFICATIONS

- HOUSING** – 20-gauge galvanized steel pan/plaster frame. LED assembly accepts ceiling thicknesses from 1/2" to 5/8" thick. Extruded aluminum heat sink.
- REFLECTOR** – Injection molded vacuum metalized upper optic and ceiling trim. Clear semi-specular (CS) trim standard.
- ELECTRICAL** – High quality C.O.B. LED array. Reported L70 >50,000 hours. Top access required for node maintenance. Low-voltage DC fixture, to be fed by Class 2 power supply.
- MOUNTING** – Recessed.
- LISTINGS** –
  - cCSAus certified as luminaire suitable for dry or damp locations.
  - cCSAus certified as luminaire suitable for wet location under covered ceiling when specified with DL option.
  - NC housing for use in non-fire rated installations only.
  - RoHS compliant
  - IC-rated for direct contact with insulation when specified with IC housing type.
- WARRANTY** – 5-year limited warranty, see [hew.com/warranty](http://hew.com/warranty).

ORDERING EXAMPLE: 2DR - F - D - P12C/835 - M - CS - NC - OPTIONS - HB - POE N

## ORDERING INFO

SERIES	TRIM TYPE	ADJUSTMENT	LUMENS <sup>[1]</sup>	CRI	CCT	DISTRIBUTION
2DR	F Flanged reflector	D Fixed downlight	P8C 800lm	8 80	27 2700K	N 30° Narrow
2DS		A Adjustable	P12C 1200lm	9 90 <sup>[2]</sup>	30 3000K	M 35° Medium
					35 3500K	W 40° Wide
					40 4000K	

REFLECTOR FINISH	HOUSING TYPE <sup>[3]</sup>	OPTIONS <sup>[4]</sup>
CS Clear semi-specular	NC New construction mounting pan	DL Diffuse polycarbonate regressed lens
SG Satin-glow	IC IC-rated mounting pan <sup>[5]</sup>	ATH Airtight housing <sup>[6]</sup>
SPC Clear specular		SFA Square flush flange adapter <sup>[7]</sup>
WH Matte white		RFA Round flush flange adapter <sup>[8]</sup>
BL Black		

## MOUNTING

- HB (2) Hanger brackets with (2) bar hangers <sup>[10]</sup>
- NB (2) Nailer bars <sup>[11]</sup>
- TB (2) T-bar hangers <sup>[12]</sup>

## CONTROL <sup>[9]</sup>

- POE N Power over Ethernet network node
- POE D Power over Ethernet device node

## NOTES

- Lumens based on downlight with CS reflector color and W distribution. See page 2 for FIXTURE PERFORMANCE DATA.
- Extended lead times may apply. Consult factory for availability
- See [hew.com/poe](http://hew.com/poe) for compatible sensors & switches.
- See page 4 for HOUSING TYPE DETAILS..
- P8C only
- IC-rated only; P8C only
- For mud-in applications, shipped separately. See page 4 for FLUSH FLANGE ADAPTER DETAILS.
- For mud-in applications, shipped separately. See page 4 for FLUSH FLANGE ADAPTER DETAILS.
- For mud-in applications, shipped separately. See page 4 for FLUSH FLANGE ADAPTER DETAILS.
- For additional PoE info, see [hew.com/poe](http://hew.com/poe).
- Rigid bar mounting
- Wood joist mounting
- Grid ceiling mounting



## FIXTURE PERFORMANCE DATA

### ROUND

	LED PACKAGE	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (LM/W)
DOWNLIGHT	P8C	W	988	14	71
		M	971		69
		N	922		66
	P12C	W	1239	17	73
		M	1218		72
		N	1157		68
ADJUSTABLE	P8C	W	474	14	34
		M	514		37
		N	433		31
	P12C	W	594	17	35
		M	645		38
		N	543		32

### SQUARE

	LED PACKAGE	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (LM/W)
DOWNLIGHT	P8C	W	937	14	67
		M	927		667
		N	841		60
	P12C	W	1175	17	69
		M	1162		68
		N	1055		62
ADJUSTABLE	P8C	W	665	14	48
		M	556		40
		N	403		29
	P12C	W	834	17	49
		M	697		41
		N	506		30

### MULTIPLIER TABLES

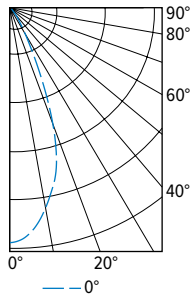
	COLOR TEMPERATURE	
	CCT	CONVERSION FACTOR
	80 CRI	2700K
3000K		1.05
3500K		1.07
4000K		1.08
90 CRI	2700K	0.83
	3000K	0.86
	3500K	0.90
	4000K	0.93

REFLECTOR FINISH		
CATALOG NUMBER	REFLECTOR FINISH	CONVERSION FACTOR
CS	Clear semi-specular	1.00
SG	Satin-glow	0.97
SPC	Specular	1.07
WH	Matte white	1.00
BL	Black	0.80

- Photometrics tested in accordance with IESNA LM-79. Results shown are based on 25°C ambient temperature.
- Results based on 2700K, 80 CRI.
- Use multiplier tables to calculate additional options.

### PHOTOMETRY

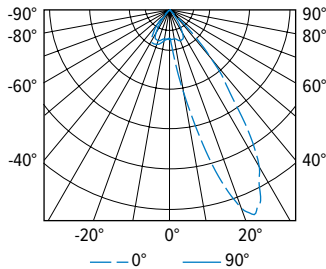
**2DR-F-D-P12C/827-W-CS-NC** Total Luminaire Output: 1239 lumens; 17 Watts | Efficacy: 73 lm/W | 82 CRI; 2418K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE	ZONAL LUMENS
		0°	
	0	2731	
	5	2624	241
	15	1974	530
	25	657	316
	35	146	96
	45	29	25
	55	15	14
	65	9	9
	75	5	5
	85	2	2
	90	2	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 40	1183	96
	0 - 60	1222	99
	0 - 90	1239	100

**2DR-F-D-P12C/827-M-CS-NC** Total Luminaire Output: 1218 lumens; 17 Watts | Efficacy: 72 lm/W | 83 CRI; 2776K CCT

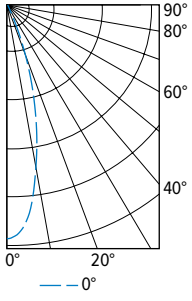


CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE	ZONAL LUMENS
		0°	
	0	3514	
	5	3356	306
	15	2196	584
	25	444	231
	35	70	47
	45	27	21
	55	14	13
	65	9	9
	75	5	5
	85	1	2
	90	2	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 40	1168	96
	0 - 60	1202	99
	0 - 90	1218	100



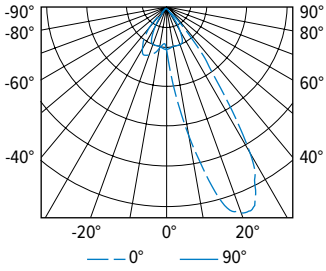
**ZDR-F-D-P12C/827-N-CS-NC** Total Luminaire Output: 1157 lumens; 17 Watts | Efficacy: 68 lm/W | 82 CRI; 2809K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE	
		0°	ZONAL LUMENS
	0	4765	
	5	4428	386
	15	2132	572
	25	227	144
	35	38	25
	45	19	14
	55	7	7
	65	4	4
	75	2	3
	85	1	2
	90	3	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 40	1128	98
	0 - 60	1149	99
	0 - 90	1157	100

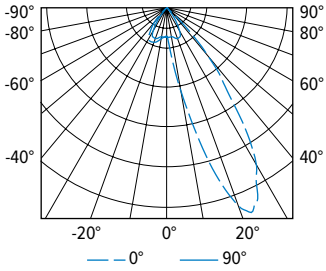
**ZDR-F-A-P12C/827-W-CS-NC** Total Luminaire Output: 594 lumens; 17 Watts | Efficacy: 35 lm/W | 82 CRI; 2845K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE					ZONAL LUMENS
		0°	45°	90°	135°	180°	
	0	279	279	279	279	279	
	5	511	426	269	244	243	35
	15	1319	766	259	299	313	151
	25	1383	542	238	325	346	221
	35	515	92	94	222	260	131
	45	70	9	21	59	77	36
	55	4	5	10	17	19	10
	65	3	4	6	9	9	6
	75	2	2	3	4	4	3
	85	1	1	1	1	1	1
	90	1	21	0	1	0	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 40	537	90
	0 - 60	583	98
	0 - 90	594	100

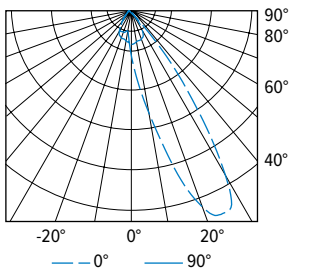
**ZDR-F-A-P12C/827-M-CS-NC** Total Luminaire Output: 645 lumens; 17 Watts | Efficacy: 38 lm/W | 83 CRI; 2788K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE					ZONAL LUMENS
		0°	45°	90°	135°	180°	
	0	240	240	240	240	240	
	5	388	327	240	239	239	30
	15	1308	678	254	280	283	144
	25	1726	587	259	296	301	244
	35	875	53	127	204	211	157
	45	169	9	25	68	75	43
	55	5	5	12	22	24	12
	65	3	4	7	12	13	8
	75	2	2	4	6	6	4
	85	1	1	1	1	1	2
	90	0	3	0	0	0	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 40	576	89
	0 - 60	631	98
	0 - 90	645	100

**ZDR-F-A-P12C/827-N-CS-NC** Total Luminaire Output: 543 lumens; 17 Watts | Efficacy: 32 lm/W | 82 CRI; 2832K CCT

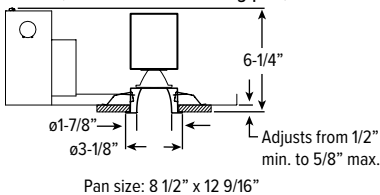


CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE					ZONAL LUMENS
		0°	45°	90°	135°	180°	
	0	262	262	262	262	262	
	5	483	408	250	182	164	30
	15	1286	709	233	196	181	133
	25	1825	545	205	206	181	213
	35	825	117	93	119	107	120
	45	61	9	21	37	41	26
	55	4	5	10	14	15	9
	65	3	3	6	8	8	6
	75	2	2	3	4	4	3
	85	1	1	1	1	1	2
	90	0	18	1	0	0	

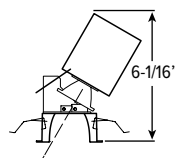
LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 40	496	91
	0 - 60	531	98
	0 - 90	542	100

## CROSS SECTIONS

**FIXED (shown with mounting pan)**

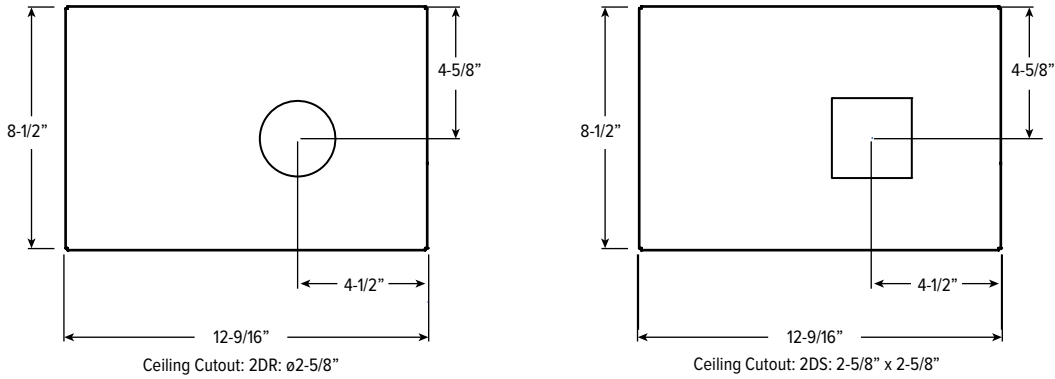


**ADJUSTABLE**

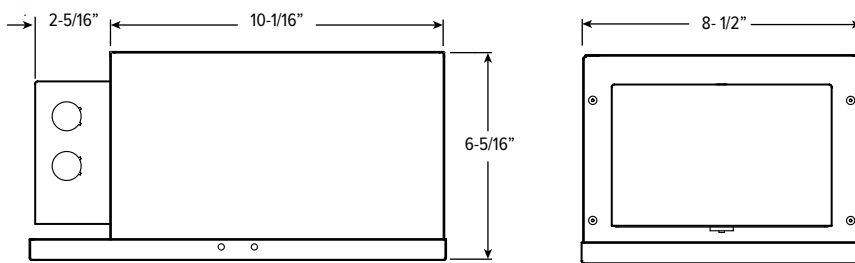


## HOUSING TYPE DETAILS

### NEW CONSTRUCTION

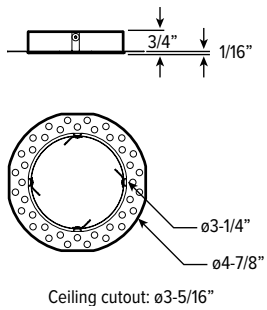


### IC-RATED

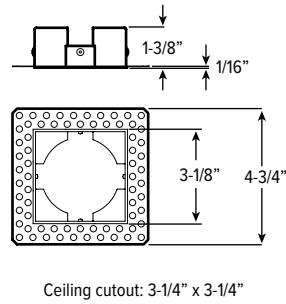


### FLUSH FLANGE ADAPTER DETAILS

#### ROUND



#### SQUARE



### TRIM FINISH DETAILS

