

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

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

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

**NEW CONSTRUCTION AND REMODEL**

**FEATURES**

- Williams turn-key Power over Ethernet (PoE) solution provides plug-and-play networked lighting and control.
- Industry-leading efficacies as high as 108 lm/W.

**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** – Die-cast aluminum trim housing with forged aluminum heat sink. Galvanized steel splice compartment with driver mounting plate/enclosure. Swing-out mounting arms adjust for ceiling thickness from 1/2" - 1-7/16" (see options for additional ceiling thicknesses).
- OPEN REFLECTOR** – Low-iridescent anodized aluminum.
- LENSED TRIM** – Die-cast aluminum frame with micro-prismatic, tempered glass lens.
- ELECTRICAL** – High-performance Class 2 LED array. Modular quick-connect plug for easy field-connection of LED light assembly to driver. Reported L70>50,000 hours. Low-voltage DC fixture, to be fed by Class 2 power supply. Tunable White products use LEDs of multiple CCTs and may produce a perceptibly different shade of white from single-CCT products at the same CCT. All CCTs are within 3 MacAdam ellipses.
- MOUNTING** – Recessed. 20 ga. galvanized steel mounting pan for new construction or IC-rated enclosure. Remodel kit option includes receiver bracket hardware.
- LISTINGS** –
  - cCSAus conforms to UL STD 1598; Certified to CAN/CSA STD C22.2 No. 250.0 for damp locations. LED light assembly conforms to UL 2108 for remote installation.
  - Suitable for wet location under covered ceiling when specified with WET/CC option.
  - IC-rated for direct contact with insulation when specified with I Mounting Type.
  - City of Chicago Environmental Air approved when specified with CP option.
  - Complies with ASTM-E283 when specified with ATH option.
  - RoHS compliant.
- WARRANTY** – 5-year limited warranty, see [hew.com/warranty](http://hew.com/warranty).

**ORDERING EXAMPLE:** 6DS - P25/835 - OPTIONS - POE N - LW - OF - WH - TRIM OPTIONS - N - F1

**HOUSING**

SERIES	LUMENS <sup>[1]</sup>	CRI	CCT	OPTIONS <sup>[2]</sup>	CONTROL <sup>[3]</sup>
6DS	P13 1,300lm	8 80	27 2700K	ATH Airtight construction	POE N Power over Ethernet network node
	P25 2,500lm	9 90 <sup>[5]</sup>	30 3000K	CP Chicago plenum (CCEA) <sup>[6]</sup>	
	P40 4,000lm		35 3500K	TC Adjustable mounting arms for 1-1/2" – 2-1/4" thick ceilings	POE D Power over Ethernet device node
	P54 5,400lm <sup>[4]</sup>		40 4000K		
				50 5000K	
			TW Tunable white (80 CRI, 2700K–5000K)		

**TRIM <sup>[7]</sup>**

TRIM TYPE	DISTRIBUTION <sup>[8]</sup>	FLANGE TYPE	REFLECTOR FINISH	TRIM OPTIONS
O Open reflector	W Wide	OF 1/2" standard flange	<b>Open trim types</b>	MWT Textured white trim flange <sup>[14]</sup>
L Flush lens	55° Open	SF 1/4" mud-in flange <sup>[13]</sup>	CS Clear semi-specular anodize	IP IP65 rated trim <sup>[15]</sup>
R Regressed lens	65° Flush		SG Satin-glow anodize	AD Diffuse acrylic lens <sup>[16]</sup>
A Angled lens <sup>[9]</sup>	65° Regressed		GD Gold anodize	PD Diffuse 1/8" polycarbonate lens <sup>[17]</sup>
	M Medium <sup>[10]</sup>		CG Champagne gold anodize	WET/CC Wet location, covered ceiling listed <sup>[18]</sup>
	50° Open		PW Pewter anodize	AM Anti-microbial <sup>[19]</sup>
	35° Flush		SPC Clear specular anodize	
	35° Regressed		RG Rose gold anodize	
	N Narrow <sup>[11]</sup>		<b>Lens trim types</b>	
	45° Open		CS Clear semi-specular powder coat	
	25° Flush		WH White texture powder coat	
	25° Regressed		BL Black texture powder coat	
	WW Wall wash <sup>[12]</sup>		MB Black texture splay with white flange <sup>[20]</sup>	

**MOUNTING**

**MOUNTING TYPE <sup>[21]</sup>**

- N Open pan for new construction
- I IC-rated enclosure for new construction <sup>[23]</sup>
- R Remodel kit <sup>[24]</sup>

**MOUNTING HARDWARE <sup>[22]</sup>**

- F1 Integral 2-position fixed pan bracket, universal bar hanger included <sup>[25]</sup>
- BA1 Adjustable butterfly pan bracket, bar hanger not included <sup>[26]</sup>
- CA1 Adjustable caterpillar pan bracket, universal bar hanger included <sup>[27]</sup>

**NOTES**

- Static white lumen output based on L trim type, W distribution and WH finish, 3500K/80CRI. Actual lumens may vary +/-5%. See page 2 for FIXTURE PERFORMANCE DATA.
- See [hew.com/poe](http://hew.com/poe) for compatible sensors & switches.
- For additional PoE info, see [hew.com/poe](http://hew.com/poe)
- N Mounting Type only. W distribution only.
- Extended lead times may apply. Consult factory for availability.
- Not available with Tunable White.
- I Mounting Type required.
- Trim ships separately.
- Beam angle based on CS or WH reflector finish.
- Available with WW Distribution only.
- Not available with P54 or tunable white P40, P54 lumen stops.
- Not available with P54 or tunable white P40, P54 lumen stops.
- O and A Trim Types only.
- For use with mud-in plaster construction only, supplied with mud flange installation kit. See page 4 for FLANGE TYPE DETAILS. Not available with ATH or IP options.
- Not available with WH Reflector Finish or L Trim Type.
- L and R trim types only.
- Not available with O trim type. W distribution only.
- Not available with O trim type. W distribution only.
- Not available with O Trim Type.
- WH and BL Reflector Finishes only.
- R Trim Type only. Not available with MWT.
- Mounting hardware required (N and I only), ordered separately, see MOUNTING HARDWARE ordering info. See page 5 for MOUNTING TYPE DETAILS.
- Additional mounting hardware options available. See page 5 for MOUNTING HARDWARE DETAILS.
- P25 lumen package max.
- Also used in new construction sheetrock ceilings. P25 lumen package max.
- N and I Mounting Types only.
- N Mounting Type only.
- N Mounting Type only.

## FIXTURE PERFORMANCE DATA

### STANDARD

#### OPEN REFLECTOR TRIM TYPE

	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
P13	W	1238	12.3	101.0
	M	1006	12.3	82.2
	N	992	12.3	81.0
P25	W	2306	25.0	92.2
	M	1875	25.0	75.0
	N	1849	25.0	74.0
P40	W	3725	37.5	99.3
	M	3026	37.5	80.7
	N	2909	37.5	77.6
P54	W	5029	50.0	100.6

#### FLUSH LENS TRIM TYPE

	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
P13	W	1317	12.3	107.5
	M	1349	12.3	110.1
	N	1314	12.3	107.3
P25	W	2454	25.0	98.2
	M	2515	25.0	100.6
	N	2449	25.0	98.0
P40	W	3965	37.5	105.7
	M	4057	37.5	108.2
	N	3851	37.5	102.7
P54	W	5353	50.0	107.1

#### REGRESSED LENS TRIM TYPE

	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
P13	W	1266	12.3	103.3
	M	1313	12.3	107.2
	N	1307	12.3	106.7
P25	W	2358	25.0	94.3
	M	2447	25.0	97.9
	N	2436	25.0	97.4
P40	W	3809	37.5	101.6
	M	3949	37.5	105.3
	N	3831	37.5	102.2
P54	W	5143	50.0	102.9

### TUNABLE WHITE

#### OPEN REFLECTOR TRIM TYPE

	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
P13	W	1088	12.3	88.8
	M	881	12.3	71.9
	N	869	12.3	70.9
P25	W	2157	22.0	98.0
	M	1752	22.0	79.6
	N	1684	22.0	76.5
P40	W	3285	37.5	87.6
P54	W	3810	43.5	87.6

#### FLUSH LENS TRIM TYPE

	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
P13	W	1153	12.3	94.1
	M	1181	12.3	96.4
	N	1150	12.3	93.9
P25	W	2295	22.0	104.3
	M	2349	22.0	106.8
	N	2230	22.0	101.4
P40	W	3496	37.5	93.2
P54	W	4056	43.5	93.2

#### REGRESSED LENS TRIM TYPE

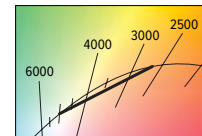
	DISTRIBUTION	DELIVERED LUMENS	WATTAGE	EFFICACY (lm/W)
P13	W	1108	12.3	90.4
	M	1150	12.3	93.8
	N	1144	12.3	93.4
P25	W	2205	22.0	100.2
	M	2287	22.0	103.9
	N	2218	22.0	100.8
P40	W	3359	37.5	89.6
P54	W	3897	43.5	89.6

### MULTIPLIER TABLES

COLOR TEMPERATURE			
	CCT	LUMENS	
		STANDARD	TUNABLE WHITE
80 CRI	2700K	0.92	0.83
	3000K	0.98	1.00
	3500K	1.00	0.99
	4000K	1.01	1.00
	5000K	1.02	0.98
90 CRI	2700K	0.76	-
	3000K	0.79	-
	3500K	0.82	-
	4000K	0.84	-
	5000K	0.88	-

OPEN REFLECTOR FINISH		
CATALOG NUMBER	REFLECTOR FINISH	CONVERSION FACTOR
CS	Clear semi-specular	1.00
SG	Satin-glow	0.92
GD	Gold	0.93
CG	Champagne Gold	0.96
PW	Pewter	0.86
SPC	Specular	1.02
RG	Rose Gold	0.88
WH	White, textured	0.89
BL	Black, textured	0.79

TRIM	
CATALOG NUMBER	CONVERSION FACTOR
AD	0.85
PD	0.85

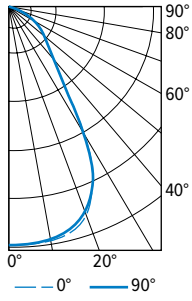


- Photometrics tested in accordance with IESNA LM-79. Results shown are based on 25°C ambient temperature.
- Standard results based on 3500K/80 CRI, actual lumens may vary +/-5%
- Tunable white results based on 4000K/80 CRI, actual lumens may vary +/-5%
- Use multiplier tables to calculate additional options.



## PHOTOMETRY

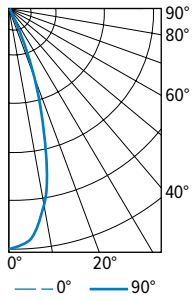
**6DS-P25/835-DIM-POE-LW-OF-WH** Total Luminaire Output: 2454 lumens; 25.0 Watts | Efficacy: 98.2 lm/W | 83.5 CRI; 3456K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE			ZONAL LUMENS
		0°	45°	90°	
	0	1658	1658	1658	
	5	1662	1654	1656	157
	15	1624	1603	1603	453
	25	1353	1492	1359	633
	35	619	998	621	498
	45	376	434	367	317
	55	237	243	235	215
	65	122	122	118	122
	75	47	46	45	51
	85	4	2	5	8
	90	0	0	0	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	1244	51
	0 - 40	1742	71
	0 - 60	2274	93
	0 - 90	2454	100
	0 - 180	2454	100

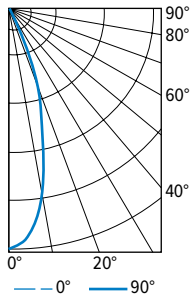
**6DS-P25/835-DIM-POE-LM-OF-WH** Total Luminaire Output: 2515 lumens; 25.0 Watts | Efficacy: 100.6 lm/W | 83.5 CRI; 3456K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE			ZONAL LUMENS
		0°	45°	90°	
	0	6881	6881	6881	
	5	6551	6564	6607	595
	15	3944	3901	3877	1062
	25	1109	1097	949	540
	35	251	284	202	176
	45	64	92	73	68
	55	42	42	39	39
	65	25	23	24	24
	75	11	8	10	11
	85	0	0	0	1
	90	0	0	0	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	2197	87
	0 - 40	2372	94
	0 - 60	2479	99
	0 - 90	2515	100
	0 - 180	2515	100

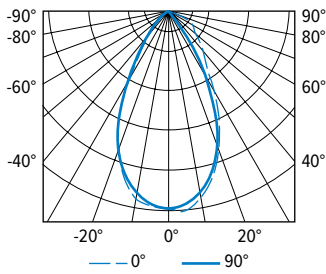
**6DS-P25/835-DIM-POE-LN-OF-WH** Total Luminaire Output: 2449 lumens; 25.0 Watts | Efficacy: 98.0 lm/W | 83.5 CRI; 3456K CCT



CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE			ZONAL LUMENS
		0°	45°	90°	
	0	9693	9693	9693	
	5	8651	8779	8645	757
	15	3722	3650	3471	1025
	25	820	827	692	411
	35	194	198	152	127
	45	71	82	68	60
	55	40	43	39	37
	65	24	24	21	22
	75	8	9	8	10
	85	1	0	0	1
	90	0	0	0	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	2193	90
	0 - 40	2319	95
	0 - 60	2415	99
	0 - 90	2449	100
	0 - 180	2449	100

**6DS-P25/835-DIM-POE-OWW-OF-CS** Total Luminaire Output: 2198 lumens; 25.0 Watts | Efficacy: 87.9 lm/W | 83.5 CRI; 3456K CCT



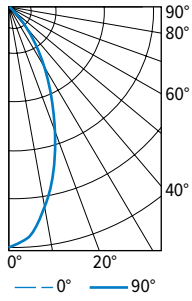
CANDLEPOWER DISTRIBUTION	VERTICAL ANGLE	HORIZONTAL ANGLE					ZONAL LUMENS
		0°	45°	90°	135°	180°	
	0	2299	2299	2299	2299	2299	
	5	2327	2302	2257	2251	2274	214
	15	2011	1994	1958	1999	2006	553
	25	1418	1437	1342	1433	1272	632
	35	809	778	523	700	529	424
	45	561	327	170	227	215	218
	55	384	90	21	34	38	93
	65	309	17	0	0	2	47
	75	122	1	0	0	0	17
	85	0	0	0	0	0	1
	90	0	0	0	0	0	

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	1399	64
	0 - 40	1823	83
	0 - 60	2134	97
	0 - 90	2198	100
	0 - 180	2198	100



# 6DS PoE | tunable **WHITE** 6" Downlight – Square

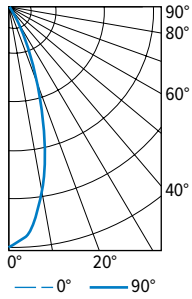
6DS-P25/835-DIM-POE-OM-OF-CS Total Luminaire Output: 1875 lumens; 25.0 Watts | Efficacy: 75.0 lm/W | 83.5 CRI; 3456K CCT



VERTICAL ANGLE	HORIZONTAL ANGLE			ZONAL LUMENS
	0°	45°	90°	
0	2880	2880	2880	
5	2752	2750	2761	253
15	2022	2008	2026	562
25	1202	1184	1196	549
35	519	610	508	351
45	109	252	109	140
55	7	23	7	19
65	0	0	0	1
75	0	0	0	0
85	0	0	0	0
90	0	0	0	0

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	1364	73
	0 - 40	1715	92
	0 - 60	1874	100
	0 - 90	1875	100
	0 - 180	1875	100

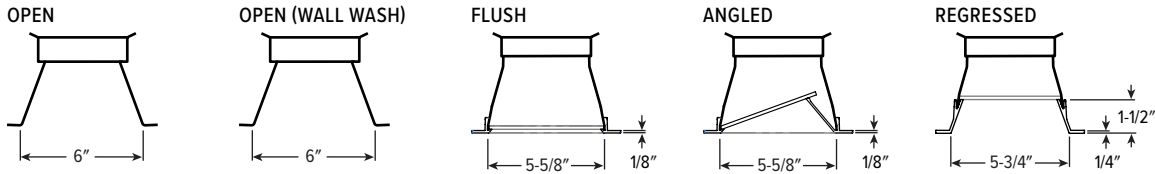
6DS-P25/835-DIM-POE-RM-OF-WH Total Luminaire Output: 2447 lumens; 25.0 Watts | Efficacy: 97.9 lm/W | 83.5 CRI; 3456K CCT



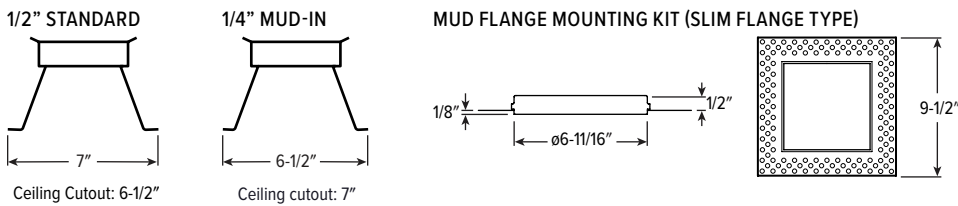
VERTICAL ANGLE	HORIZONTAL ANGLE			ZONAL LUMENS
	0°	45°	90°	
0	6247	6247	6247	
5	5922	5897	5946	534
15	3621	3574	3560	979
25	1212	1150	1070	568
35	331	353	271	219
45	94	111	76	81
55	40	44	38	39
65	20	17	17	19
75	5	6	6	7
85	0	0	0	1
90	0	0	0	0

LUMEN SUMMARY	ZONE	LUMENS	% FIXTURE
	0 - 30	2081	85
	0 - 40	2300	94
	0 - 60	2420	99
	0 - 90	2447	100
	0 - 180	2447	100

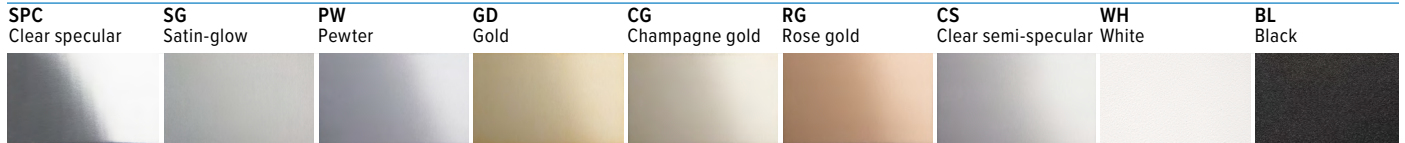
## TRIM TYPE DETAILS



## FLANGE TYPE DETAILS

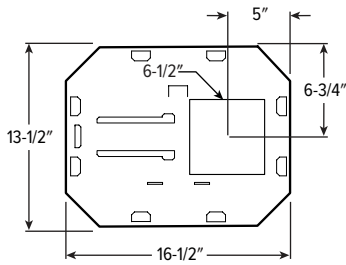


## REFLECTOR FINISH DETAILS

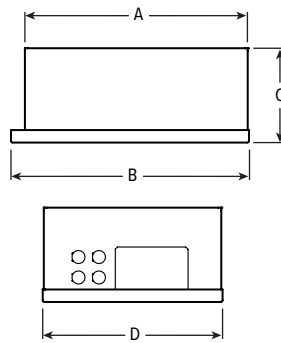


## MOUNTING TYPE DETAILS

### NEW CONSTRUCTION

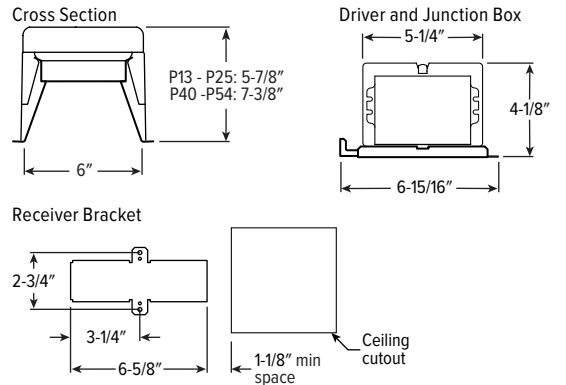


### IC-RATED



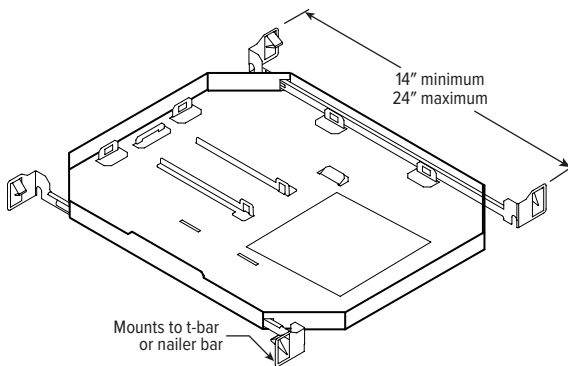
LUMENS	LENGTH			
	A	B	C	D
P13	15-3/16"	16"	6-3/8"	12-1/8"
P25	16-5/8"	17-1/2"	7-7/8"	14"

### REMODEL

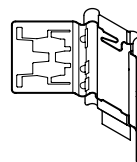


## MOUNTING HARDWARE DETAILS

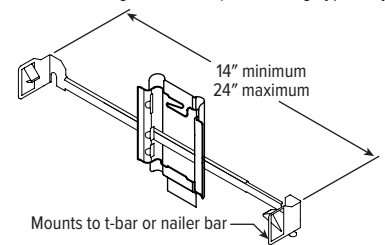
**F1** Integral 2-position fixed pan bracket, universal bar hanger included



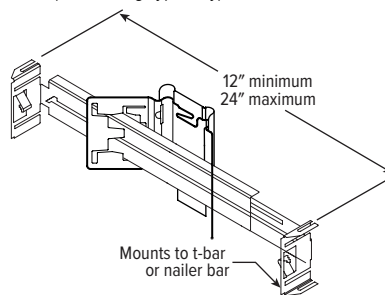
**BA1** Adjustable butterfly pan bracket, bar hanger not included (N Mounting Type only)



**CA1** Adjustable caterpillar pan bracket, universal bar hanger included (N Mounting Type only)



**BA2** Adjustable butterfly pan bracket, heavy-duty universal bar hanger included (N Mounting Type only)



**CA2** Adjustable caterpillar pan bracket, t-bar hanger included (N Mounting Type only)

