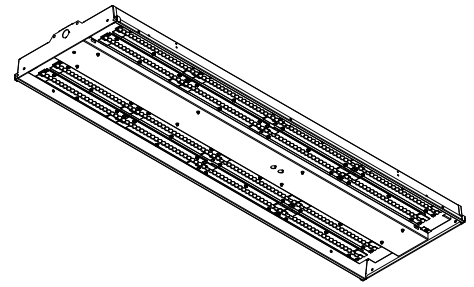


# Designed for efficiency & versatility in high bay applications

## FBL LED HIGH BAY



### PHILIPS DAY-BRITE / PHILIPS CFI FBL LED HIGH BAY

The Philips Day-Brite / Philips CFI FBL LED High Bay provides versatility in a single package. With a range of lumen packages, optical distributions, and accessories available, this luminaire can be used in many different applications ranging from warehouses to retail outlets.

Project: \_\_\_\_\_  
 Location: \_\_\_\_\_  
 Catalog No: \_\_\_\_\_  
 Fixture Type: \_\_\_\_\_  
 Mfg: \_\_\_\_\_ Qty: \_\_\_\_\_  
 Notes: \_\_\_\_\_

### Ordering guide

example: FBL24LL40-UNV

Family	Lumens	Lamp Source	CCT	Voltage	Optics	Options
<b>FBL</b>	<input type="text"/>	<b>L</b>	<input type="text"/> —	<input type="text"/> —	<input type="text"/> —	<input type="text"/>
<b>FBL</b>	<b>24L</b> 24,000 nominal delivered lumens <b>20L</b> 20,000 nominal delivered lumens <b>16L</b> 16,000 nominal delivered lumens <b>12L</b> 12,000 nominal delivered lumens <b>08L</b> 8,000 nominal delivered lumens	<b>L</b> LED	<b>35</b> 3500K (CRI=80) <b>40</b> 4000K (CRI=80) <b>50</b> 5000K (CRI=80)	<b>UNV</b> 120-277V <b>120</b> 120V <b>208</b> 208V <b>277</b> 277V <b>347</b> 347V <b>480</b> 480V	<b>Blank</b> General Distribution <b>N</b> Narrow <b>M</b> Medium <b>W</b> Wide <b>A</b> Aisle	<b>WP6</b> Wired 6' 16/3 Cord & NEMA Twist Lock Plug <sup>56</sup> <b>WC6</b> Wired 6' 16/3 Cord <b>MD360</b> 360° Motion Detector with circular coverage (e.g. open areas) <b>MD180</b> 180° Motion Detector with linear coverage (e.g. aisle) <b>MD360D</b> 360° Motion Detector (ON/DIM only) <b>MD180D</b> 180° Motion Detector (ON/DIM only) <b>EMLED</b> Emergency Battery (40°C max) <b>EMLEDC</b> Emergency Battery Cold Temp (40°C max) <b>HA</b> High Ambient (55°C)

Footnotes:

<sup>56</sup> Must specify voltage.

### Accessories (order separately)

**FBF/FBE CHAIN KIT** – 54" chains & V brackets

**FBF/FBE-GRIP5** – 5' cables & V brackets

**FBF/FBE-GRIP10** – 10' cables & V brackets

**WG-FBF4** – Wire Guard

**FBF-4E-1W** – Single gasketed door with clear acrylic lens

**FBF-4E-2W** – Double gasketed door with clear acrylic lens

**FBF-PENHGR** – Pendant Hanger

**FBF-JB** – Junction Box (used with FBF-PENHGR to conceal wiring)

**Note:** Add "DB21" to enclosure catalog number for prismatic lens.

### General Notes

All options factory installed.

All accessories are field installed.

### Wiring Notes

Standard cords have 3 wires. Consult factory for other cord options.

### Predicted L<sub>70</sub> Lifetime

25°C Ambient - > 100,000 hours

40°C Ambient - = 100,000 hours

(based upon LED manufacturer's supplied LM-80 data and in-situ laboratory testing)



**PHILIPS**  
**Day-Brite**

**PHILIPS**  
**CFI**

# FBL LED HIGH BAY

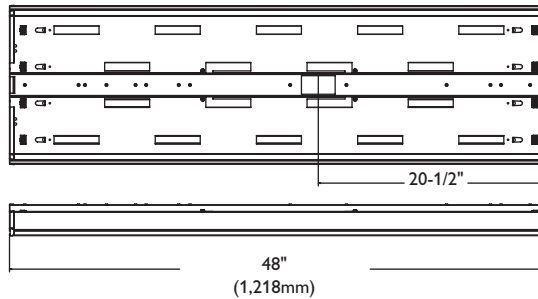
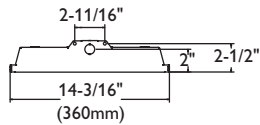
## Application

- This luminaire can be used to illuminate retail, cold storage, manufacturing, warehousing and many other large indoor spaces with control and precision.

## Construction & Features

- Optional heavy duty mounting chains and hangers or cables and hangers (ordered separately).
- Steel housing is multi-stage phosphate treated for maximum corrosion resistance and finish coat is high reflectance baked white enamel.
- End holes to attach V bracket hanger for chain or cable.
- Wiring access plate.
- 7/8" K.O. at each end of luminaire for wiring or motion detector.
- LED light engines and driver are field replaceable.
- 5 Year Limited Warranty
- Components are RoHS compliant.

## Dimensions



## Electrical

- Listed by ETL to meet UL 1598 standards for damp location. Operating temperature -20°C to 45°C open or 40°C with optional lens enclosure. High ambient 55°C operation is optional.
- Dimming drivers are standard. Control is 0-10V DC (See wiring notes).

## Photometry

### FBL LED High Bay, General Distribution, 24000 nominal delivered lumens

Catalog No.	FBL24LL40-UNV	Candlepower				Light Distribution			Average Luminance			
		Angle	End	45	Cross	Degrees	Lumens	% Luminaire	Angle	End	45°	Cross
Test No.	31709	0	8365	8365	8365	0-30	6584	27.7	45	20540	20575	20579
S/MH	1.3	5	8307	8331	8372	0-40	10876	45.7	55	20041	20047	20139
Lamp Type	LED	10	8220	8239	8273	0-60	19538	82.1	65	18902	19016	10859
Lumens	23784	15	8071	8093	8067	0-90	23784	100.0	75	15532	9382	8152
Input Watts	230	20	7857	7899	7882				85	7579	3934	3971
Efficacy	103	25	7569	7631	7632							
		30	7245	7297	7272							
		35	6833	6888	6816							
		40	6375	6408	6364							
		45	5853	5863	5865							
		50	5271	5277	5287							
		55	4633	4634	4655							
		60	3948	3973	3296							
		65	3219	3239	1850							
		70	2423	1594	1393							
		75	1620	979	850							
		80	865	502	313							
		85	266	138	140							

Comparative yearly lighting energy cost per 1000 lumens – **\$2.31** based on 3000 hrs. and \$.08 pwr KWH.

The photometric results were obtained in the Philips Day-Brite laboratory which is NVLAP accredited by the National Institute of Standards and Technology.

Photometric values based on test performed in compliance with LM-79.

EFFECTIVE FLOOR CAVITY REFLECTANCE 20 PER (pfc=0.20)									
pcc	80			70			50		
pw	70	50	30	70	50	30	50	30	
RCR									
0	119	119	119	116	116	116	111	111	
1	109	105	101	107	103	98	97	94	
2	100	92	84	96	90	83	85	81	
3	91	81	72	88	79	71	76	69	
4	82	70	63	81	69	61	68	60	
5	76	64	55	73	63	54	59	53	
6	70	56	47	68	56	47	55	46	
7	65	52	42	64	51	42	50	41	
8	60	46	39	58	46	39	45	38	
9	56	42	34	55	42	34	41	34	
10	53	40	32	52	39	32	38	30	

### FBL LED High Bay, Medium Distribution, 24000 nominal delivered lumens

Catalog No.	FBL24LL40-UNV-M	Candlepower				Light Distribution			Average Luminance			
		Angle	End	45	Cross	Degrees	Lumens	% Luminaire	Angle	End	45°	Cross
Test No.	31702	0	13929	13929	13929	0-30	11970	50.6	45	12080	20242	15607
S/MH	1.3	5	13954	14001	14075	0-40	18829	79.7	55	2766	2460	1522
Lamp Type	LED	10	14171	14224	14249	0-60	23311	98.6	65	2583	951	823
Lumens	23637	15	14323	14576	14499	0-90	23637	100.0	75	1911	828	767
Input Watts	225	20	13957	14902	14902				85	922	373	433
Efficacy	105	25	12702	14650	15129							
		30	11218	13441	14032							
		35	9605	11783	11347							
		40	7112	9159	7984							
		45	3443	5769	4448							
		50	983	2407	1620							
		55	640	569	352							
		60	538	218	181							
		65	440	162	140							
		70	356	113	114							
		75	199	86	80							
		80	110	45	37							
		85	32	13	15							

Comparative yearly lighting energy cost per 1000 lumens – **\$2.29** based on 3000 hrs. and \$.08 pwr KWH.

The photometric results were obtained in the Philips Day-Brite laboratory which is NVLAP accredited by the National Institute of Standards and Technology.

Photometric values based on test performed in compliance with LM-79.

EFFECTIVE FLOOR CAVITY REFLECTANCE 20 PER (pfc=0.20)									
pcc	80			70			50		
pw	70	50	30	70	50	30	50	30	
RCR									
0	118	118	118	115	115	115	111	111	
1	112	109	107	110	107	105	103	101	
2	106	100	95	104	98	93	94	92	
3	98	92	85	96	91	84	88	82	
4	93	83	78	91	82	77	81	76	
5	86	78	70	85	77	69	75	68	
6	81	71	65	80	70	64	68	63	
7	77	66	58	76	66	58	64	57	
8	71	60	55	70	60	54	59	54	
9	68	56	50	67	56	50	56	50	
10	64	53	46	63	53	46	52	46	

## Photometric Test List

Catalog No.	Test No.	Delivered Lumens	Input Watts	Efficacy
FBL08LL40-UNV	31772	9440	84	112
FBL08LL40-UNV FBF-4E-1W-DB21	31773	8445	84	101
FBL08LL40-UNV-N	31771	9323	84	111
FBL08LL40-UNV-N FBF-4E-1W-DB21	31770	8614	83	103
FBL08LL40-UNV-M	31768	9304	83	112
FBL08LL40-UNV-M FBF-4E-1W-DB21	31769	8648	83	104
FBL08LL40-UNV-W	31764	9284	84	111
FBL08LL40-UNV-W FBF-4E-1W-DB21	31765	8450	84	101
FBL08LL40-UNV-A	31763	9250	84	110
FBL08LL40-UNV-A FBF-4E-1W-DB21	31762	8550	84	102
FBL12LL40-UNV	31751	12307	116	106
FBL12LL40-UNV FBF-4E-1W-DB21	31750	11037	116	96
FBL12LL40-UNV-N	31752	12224	116	105
FBL12LL40-UNV-N FBF-4E-1W-DB21	31753	11193	116	97
FBL12LL40-UNV-M	31755	12132	116	104
FBL12LL40-UNV-M FBF-4E-1W-DB21	31754	11261	116	97
FBL12LL40-UNV-W	31759	12098	116	104
FBL12LL40-UNV-W FBF-4E-1W-DB21	31758	11005	116	95
FBL12LL40-UNV-A	31760	12070	116	104
FBL12LL40-UNV-A FBF-4E-1W-DB21	31761	11130	116	96
FBL16LL40-UNV	31724	16954	174	97
FBL16LL40-UNV FBF-4E-1W-DB21	31723	15024	173	87
FBL16LL40-UNV-N	31728	16649	174	96
FBL16LL40-UNV-N FBF-4E-1W-DB21	31727	15303	173	88
FBL16LL40-UNV-M	31729	16540	175	95
FBL16LL40-UNV-M FBF-4E-1W-DB21	31730	15328	173	89
FBL16LL40-UNV-W	31733	16583	174	95
FBL16LL40-UNV-W FBF-4E-1W-DB21	31734	14989	173	87
FBL16LL40-UNV-A	31725	16577	174	95
FBL16LL40-UNV-A FBF-4E-1W-DB21	31726	15191	173	88

Catalog No.	Test No.	Delivered Lumens	Input Watts	Efficacy
FBL20LL40-UNV	31713	20410	188	109
FBL20LL40-UNV FBF-4E-1W-DB21	31714	17912	185	97
FBL20LL40-UNV-N	31716	20288	187	109
FBL20LL40-UNV-N FBF-4E-1W-DB21	31715	18628	185	101
FBL20LL40-UNV-M	31717	20258	187	108
FBL20LL40-UNV-M FBF-4E-1W-DB21	31718	18491	186	99
FBL20LL40-UNV-W	31721	20114	188	107
FBL20LL40-UNV-W FBF-4E-1W-DB21	31722	17855	186	96
FBL20LL40-UNV-A	31748	20111	188	107
FBL20LL40-UNV-A FBF-4E-1W-DB21	31749	18297	186	98
FBL24LL40-UNV	31709	23784	230	103
FBL24LL40-UNV FBF-4E-1W-DB21	31711	20768	222	94
FBL24LL40-UNV-N	31697	23634	229	103
FBL24LL40-UNV-N FBF-4E-1W-DB21	31699	21616	222	97
FBL24LL40-UNV-M	31702	23637	225	105
FBL24LL40-UNV-M FBF-4E-1W-DB21	31700	21505	226	95
FBL24LL40-UNV-W	31708	23444	230	102
FBL24LL40-UNV-W FBF-4E-1W-DB21	31706	20738	222	93
FBL24LL40-UNV-A	31747	23409	224	105
FBL24LL40-UNV-A FBF-4E-1W-DB21	31746	21249	225	94



© 2013 Koninklijke Philips N.V. All rights reserved.  
Specifications are subject to change without notice.  
[www.philips.com/luminaires](http://www.philips.com/luminaires)

Philips Lighting Company  
200 Franklin Square Drive  
Somerset, NJ 08873  
Phone: 855-486-2216

Philips Lighting Company  
281 Hillmount Road  
Markham ON, Canada L6C 2S3  
Phone: 800-668-9008