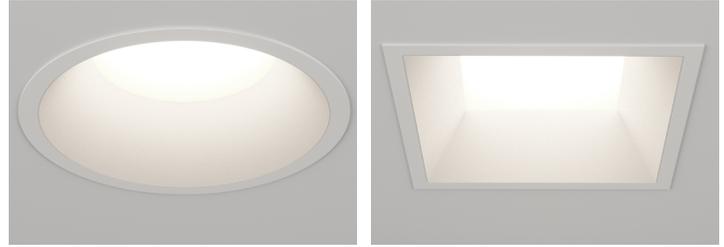


# FRAXION® 4 SLIM LVS

## FIXED

Fraxion4 Slim incorporates an LED, optic, and housing into a single complete unit featuring a removable baffle and trim. Conversely, Fraxion4 standard offers a traditional housing and separate trim assembly.

PROJECT NAME:	TYPE:
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### ORDERING INFORMATION - DOWNLIGHT / HOUSING

SHAPE	TRIM	RATING	FLANGE FINISH	BAFFLE FINISH	CRI / WATTAGE PACKAGE	CCT	OPTIC (UGR)	INSTALL TYPE	CEILING THICKNESS	DRIVER	MEDIA
										<b>LVS</b>	
F4R Round	FFS Standard Flange MFS Microflange TFS Trimless	1 Dry/Damp 2 Wet* *(Suction cup provided for aim and focus)	WH White AG Satin Silver AU Cashmere Gold	WH White AG Satin Silver AU Cashmere Gold	 <b>STATIC WHITE 2.10" TALL HOUSING</b> 80S11A 80+ CRI, 11W, Lumens Dlvld. - 1351 80S15A 80+ CRI, 15W, Lumens Dlvld. - 1681 80S21A 80+ CRI, 21W, Lumens Dlvld. - 2271 80S30B 80+ CRI, 30W, Lumens Dlvld. - 3059* *(Not available for IC housing applications) 80S36B 80+ CRI, 36W, Lumens Dlvld. - 3614* *(Not available for IC housing applications) 90S11A 90+ CRI, 11W, Lumens Dlvld. - 1161 90S15A 90+ CRI, 15W, Lumens Dlvld. - 1444 90S21A 90+ CRI, 21W, Lumens Dlvld. - 1951 90S30B 80+ CRI, 30W, Lumens Dlvld. - 2628* *(Not available for IC housing applications) 90S36B 90+ CRI, 36W, Lumens Dlvld. - 3105* *(Not available for IC housing applications) 97S11A 97+ CRI, 11W, Lumens Dlvld. - 1019 97S15A 97+ CRI, 15W, Lumens Dlvld. - 1268 97S21A 97+ CRI, 21W, Lumens Dlvld. - 1713 97S30B 90+ CRI, 30W, Lumens Dlvld. - 2307* *(Not available for IC housing applications) 97S36B 90+ CRI, 36W, Lumens Dlvld. - 2726* *(Not available for IC housing applications)	24 2400K* *(90+ CRI only. Not available for 30W or 36W packages) 27 2700K 30 3000K 35 3500K* *(Not available with 97S30B or 97S36B) 40 4000K	10 10° (<13) *(15W packages only) 15 15° (<16) 20 20° (<13) 25 25° (<13) 40 40° (<13) 60 60° (<13) 85 85° (<19) *(Requires -14 WDL effects device)	<b>REMOTE POWER SUPPLY</b> V IC, Remote W NIC, Remote D IC, Airtight, Remote* *(CCEA & Airtight compliant housing)	1 0.50" - 1.00" T TG 0.50" - 1.00"* *(Includes adjustable housing height bracket)	LVS Low Voltage System	<b>STANDARD MEDIA</b> 04 Soft Focus Lens NL No Lens* *(Standard with 10° optic. Not available for Wet Location, or Airtight Housings) <b>ALTERNATE MEDIA</b> 02 Honeycomb Louver* *(Not available for Wet location, Warm Dim, or Airtight Housings) 03 Clear Glass Lens* *(Not available for Warm Dim) 05 Frosted Glass Lens 08 Frosted Soft Focus Lens 14 Wide Distribution Lens* *(Required and only available for 85° beam spread) 26 Frosted Linear Spread Lens
F4S Square	FFS Standard Flange MFS Microflange TFS Trimless FFT Standard Flange Transitional Baffle MFT Microflange Transitional Baffle TFT Trimless Transitional Baffle		BB Burnt Bronze BK Black PR Primer 00 Trimless* *(Required for trimless) CF Custom Finish* *(Consult Factory)	BB Burnt Bronze BK Black PR Primer CF Custom Finish* *(Consult Factory)	 <b>WARM DIM 2.10" TALL HOUSING</b> 90W15A 90+ CRI, 15W Incandescent Profile: 2700K - 1800K Lumens Dlvld. - 1022 Halogen Profile: 3000K - 1800K Lumens Dlvld. - 1023 SEE PAGE 4 FOR DETAILED WARM DIM PROFILE COMPARISON. LUMEN DELIVERED OUTPUTS REFLECT 3000K PAIRED WITH 25° OPTIC AND SOFT FOCUS LENS	WL 2700K - 1800K WD 3000K - 1800K	20 20° (<10) 25 25° (<10) 40 40° (<10) 60 60° (<10) 85 85° (>19) *(Requires -14 WDL effects device)				



### PART NUMBER NOTES

- Housing and trim ship as e.g., F4RMFS1-WHWH-90S15A2-3W1-LVS



# FRAXION4 SLIM LVS FIXED

## APPLICATION NOTES

- Customers must ensure voltage range of the proposed POE node encompasses the fixtures complete Vf range, both maximum and minimum, and can be set to the required mA drive current. If assistance is required contact LLC rep or factory.
- Customers are responsible for ensuring POE node drive current is set to correct values shown below.
- Lucifer Lighting will not supply a fixture with a POE node or power supply inside the fixture. This allows for easier site install with nodes of 2 or more outputs.
- Consult node manufacturer for maximum remote wiring distances.
- Housing and Fixture feature 18 Gauge wiring.
- Wiring connections are made in the splicing compartment using customer supplied connectors, ex. wire nuts, push-in connectors, or terminal blocks.
- Confirm node compatibility with factory if it is not listed.

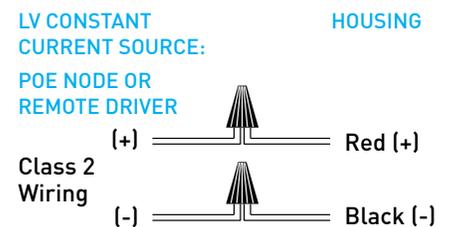
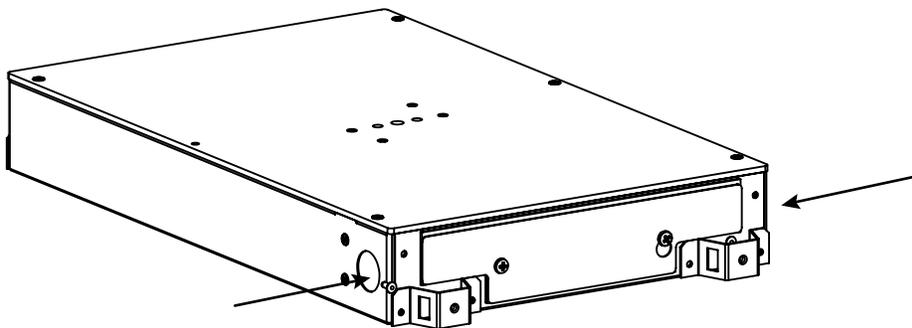
## NODE COMPATIBILITY

Manufacturer	Model Number
 Igor Enabling Smart Buildings™	NP50-60-C-F-5
 molex	180996-5107 180996-5101 180996-5102 180996-5103 180996-5106 180996-5104
 PLATFORMATICS	1 Channel Node, POE-LN2-1U-E 2 Channel Node, POE-LN2-2U-E 4 Channel Node, POE-LN2-4U-E

## DRIVE CURRENT SPECIFICS

	80S					90S					97S					90W
	11A	15A	21A	30B	36B	11A	15A	21A	30B	36B	11A	15A	21A	30B	36B	15A
Minimum Vf	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5	30.5
Maximum Vf	39	39	39	39	39	39	39	39	39	39	39	39	39	39	39	39
Current mA	250	350	500	700	850	250	350	500	700	850	250	350	500	700	850	350
Wattage W	8.2	11.8	17.4	25.4	29.1	8.2	11.8	17.4	25.4	29.1	8.2	11.8	17.4	25.4	29.1	11.8

## WIRING DIAGRAM AND HOUSING ENTRY/ EXIT POINTS



# FRAXION4 SLIM LVS FIXED

## ACCESSORIES

### ROUND ALTERNATE MEDIA

Dry/Damp location only.

Wet location requires alternate baffle.

- HCL-F4R** Honeycomb Louver w/ Diffusion Film\*  
\*(Not available for Warm Dim, or Airtight housings)
- CGL-F4R** Clear Glass Lens\*  
\*(Not available for Warm Dim)
- FGL-F4R** Frosted Glass Lens
- SFL-F4R** Soft Focus Lens
- FSFL-F4R** Frosted Soft Focus Lens
- WDL-F4R** Wide Distribution Lens\*  
\*(Required and only available for 85° beam spread)
- FLSL-F4R** Frosted Linear Spread Lens

### SQUARE ALTERNATE MEDIA

Dry/Damp location only.

Wet location requires alternate baffle.

- HCL-F4S** Honeycomb Louver w/ Diffusion Film\*  
\*(Not available for Warm Dim, or Airtight housings)
- CGL-F4S** Clear Glass Lens\*  
\*(Not available for Warm Dim)
- FGL-F4S** Frosted Glass Lens
- SFL-F4S** Soft Focus Lens
- FSFL-F4S** Frosted Soft Focus Lens
- WDL-F4S** Wide Distribution Lens\*  
\*(Required and only available for 85° beam spread)
- FLSL-F4S** Frosted Linear Spread Lens

## REPLACEMENT BAFFLE ASSEMBLY (INCLUDES MEDIA)

ASSEMBLY	SHAPE	TRIM	RATING	FLANGE FINISH	MEDIA
<b>RBA</b>				<b>1</b>	
REPLACEMENT BAFFLE ASSEMBLY	<b>F4R</b> Round	FFS Standard Flange MFS Microflange TFS Trimless	1 Dry / Damp 2 Wet* *(Requires provided suction cup to service or aim & focus)	WH White BK Black PR Primer AU Cashmere Gold AG Satin Silver BB Burnt Bronze CF Custom Finish* *(Consult Factory)	Leave blank for standard Soft Focus Lens
	<b>F4S</b> Square	FFS Standard Flange MFS Microflange TFS Trimless FFT Standard Flange Transitional Baffle MFT Microflange Transitional Baffle TFT Trimless Transitional Baffle			HCL Honeycomb Louver w/ Diffusion Film* *(Not available for Warm Dim or Wet locations) CGL Clear Glass Lens* *(Not available for Warm Dim) FGL Frosted Glass Lens FSFL Frosted Soft Focus Lens WDL Wide Distribution Lens* *(Required and only available for 85° beam spread) FLSL Frosted Linear Spread Lens

## REPLACEMENT OPTICS

Interchangeable optics accessible through fixture aperture.

### STATIC WHITE

- RO-70-15-S** 15° optic
- RO-70-20-S** 20° optic
- RO-70-25-S** 25° optic
- RO-70-40-S** 40° optic
- RO-70-60-S** 60° optic

### WARM DIM

- RO-70-20-W** 20° optic
- RO-70-25-W** 25° optic
- RO-70-40-W** 40° optic
- RO-70-60-W** 60° optic

## REPLACEMENT SUCTION TOOL

One included with every six fixtures designated Wet location.

- F4-TOOL-SUCTION** Allows for removal of baffle with Wet location

## T-GRID ACCESSORY KIT

Supplied with ceiling thickness "T" and recommended for installations in T-Grid up to 1.5" tall. Available for ceiling thicknesses from 0.5" - 1.0".

- DHA-TG-KIT**

## FURRING CHANNEL ACCESSORY KIT

Recommended for installations in furring channel. Available for ceiling thicknesses from 0.5" - 1.0".

- DHA-FC-KIT**

## HANGER BAR EXTENDER KIT

Extends hanger bars from 24.0" to 46.0" maximum.

- FRX-HBE-46** Extender, Hanger Bar

# FRAXION4 SLIM LVS FIXED

## PERFORMANCE - 3000K

LUMEN PACKAGE	WATTS	10° OPTIC NO LENS		15° OPTIC SOFT FOCUS LENS		20° OPTIC SOFT FOCUS LENS		25° OPTIC SOFT FOCUS LENS		40° OPTIC SOFT FOCUS LENS		60° OPTIC SOFT FOCUS LENS		85° OPTIC WIDE DISTRIBUTION	
		DLVD.	LPW	DLVD.	LPW	DLVD.	LPW	DLVD.	LPW	DLVD.	LPW	DLVD.	LPW	DLVD.	LPW
80S11A	11	-	-	1194	109	1255	114	1351	123	1244	113	1122	102	961	87
80S15A	15	1389	126	1609	107	1689	113	1681	112	1612	107	1495	100	1296	86
80S21A	21	-	-	2228	106	2264	108	2271	108	2179	104	2020	96	1762	84
80S30B	30	-	-	2928	139	3104	148	3059	146	2917	139	2739	130	2419	115
80S36B	36	-	-	3453	164	3657	174	3614	172	3439	164	3212	153	2851	136
90S11A	11	-	-	1026	93	1078	98	1161	106	1070	97	964	88	826	75
90S15A	15	1197	109	1382	92	1451	97	1444	96	1385	92	1284	86	1113	74
90S21A	21	-	-	1914	91	1945	93	1951	93	1872	89	1735	83	1514	72
90S30B	30	-	-	2515	84	2667	89	2628	88	2506	84	2353	78	2078	69
90S36B	36	-	-	2966	82	3142	87	3105	86	2954	82	2759	77	2449	68
97S11A	11	-	-	901	82	946	86	1019	93	939	85	846	77	725	66
97S15A	15	1033	94	1213	81	1274	85	1268	85	1216	81	1127	75	977	65
97S21A	21	-	-	1680	80	1708	81	1713	82	1644	78	1523	73	1329	63
97S30B	30	-	-	2208	74	2342	78	2307	77	2200	73	2066	69	1824	61
97S36B	36	-	-	2604	72	2759	77	2726	76	2594	72	2422	67	2150	60
90W15A (WL 27K-18K)	15	-	-	-	-	1055	70	1022	68	1001	67	949	63	851	57
90W15A (WD 30K-18K)	15	-	-	-	-	1056	70	1023	68	1007	67	957	64	858	57

### OUTPUT MULTIPLIER

CCT	CCT SCALE
2700K	0.97
3000K	1.00
3500K	1.03
4000K	1.08

### MEDIA LIGHT LOSS FACTOR

MEDIA	LIGHT LOSS FACTOR
NO LENS	1.06
CGL	1.00
SFL	1.00
FGL	0.89
FSFL	0.81
FLSL	0.82
HCL	0.73

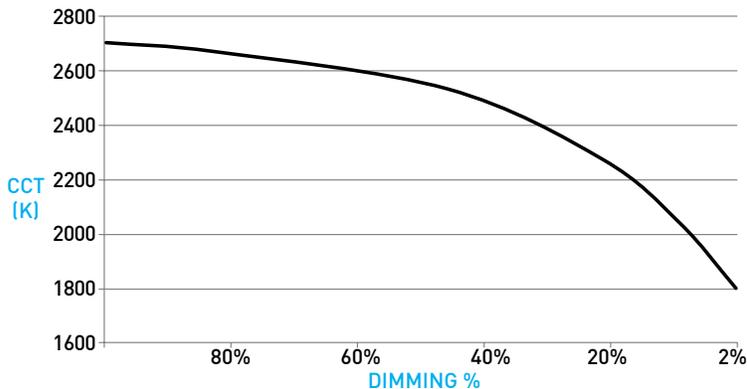
### UNIFIED GLARE RATING

10° OPTIC NO LENS	15° OPTIC SOFT FOCUS LENS	20° OPTIC SOFT FOCUS LENS	25° OPTIC SOFT FOCUS LENS	40° OPTIC SOFT FOCUS LENS	60° OPTIC SOFT FOCUS LENS	85° OPTIC WIDE DISTRIBUTION
<13	<16	<13	<13	<13	<13	>19

## WARM DIM PERFORMANCE - 25° OPTIC - SOFT FOCUS LENS

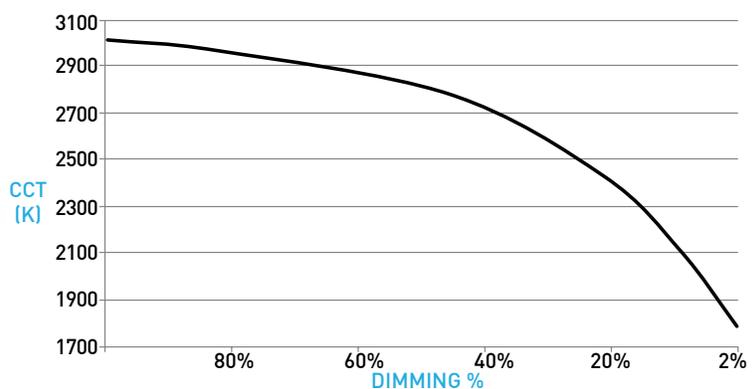
### WARM DIM TO MIRROR INCANDESCENT DIMMING PROFILE

WL 2700K - 1800K	Full on 100%	Dimmed to 80%	Dimmed to 70%	Dimmed to 50%	Dimmed to 20%	Dimmed to 10%	Dimmed to 2%
CCT (K)	2700	2650	2620	2520	2180	1950	1800
Light Output (Lm)	1022	817	715	511	204	102	20
Power (W)	15	12	10.5	7.5	3	1.5	.3
Efficacy (LPW)	68	68	68	68	68	68	68



### HALOGEN DIMMING PROFILE

WD 3000K - 1800K	Full on 100%	Dimmed to 80%	Dimmed to 70%	Dimmed to 50%	Dimmed to 20%	Dimmed to 10%	Dimmed to 2%
CCT (K)	3000	2950	2920	2775	2375	2000	1800
Light Output (Lm)	1023	818	716	511	204	102	20
Power (W)	15	12	10.5	7.5	3	1.5	.3
Efficacy (LPW)	68	68	68	68	68	68	68

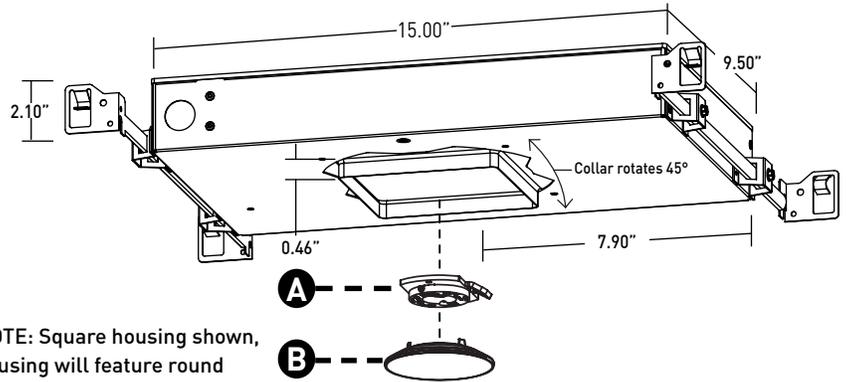


# FRAXION4 SLIM LVS FIXED

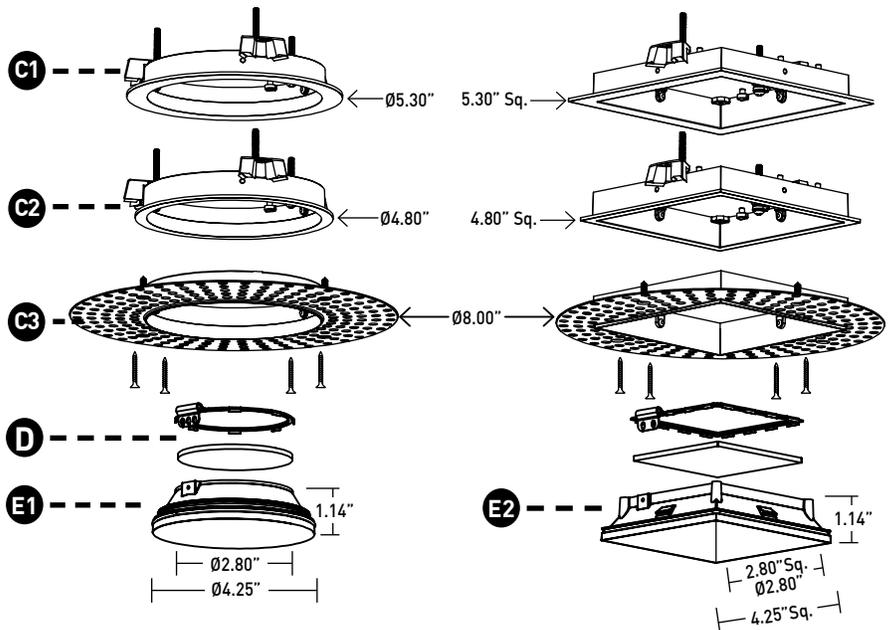
## DOWNLIGHT / HOUSING

- A LED**  
Integral LED module design enables field service / replacement through housing aperture.
- B OPTIC**  
Robust light engine with optimized optic pairing integrates Reflection, Refraction and TIR offering 10°, 15°, 20°, 25°, 40° & 60° beams.
- C1 STANDARD FLANGE PROFILE**  
Installed after ceiling is complete. Requires 4.625" (117mm) diameter cutout. Provides 0.86" (22mm) total contractor (goof) allowance with 0.50" (13mm) flange. Thickness measures 0.06" (1.5mm). Wet location features integral silicone gasket.
- C2 MICROFLANGE PROFILE**  
Installed after ceiling is complete. Requires 4.625" (117mm) diameter cutout. Provides 0.42" (11mm) total contractor (goof) allowance with 0.28" (7mm) flange. Thickness measures 0.06" (1.5mm). Wet location features integral silicone gasket.
- C3 TRIMLESS PROFILE**  
Installs totally flush with the ceiling with no visible trim. Appliqué includes screws for mounting and has 0.06" (1.5mm) plaster stop. Not recommended for stucco applications.
- D MEDIA**  
Soft focus lens included and sealed in Wet location option. Fixture is limited to 1 media. Suction tool provided for removal of wet location baffles.
- E1 ROUND BAFFLE**  
Die-cast removable baffle features 72° cutoff. Minimizes aperture glare and conceals view into housing; includes silicone gasket.
- E2 SQUARE / TRANSITIONAL BAFFLE**  
Die-cast removable baffle features 72° cutoff. Minimizes aperture glare and conceals view into housing; includes silicone gasket. Transitional baffle transitions from square aperture at ceiling plane to round aperture at light source.

## DIMENSIONS / DRAWINGS



NOTE: Square housing shown, housing will feature round aperture for round fixtures.



# FRAXION4 SLIM LVS FIXED

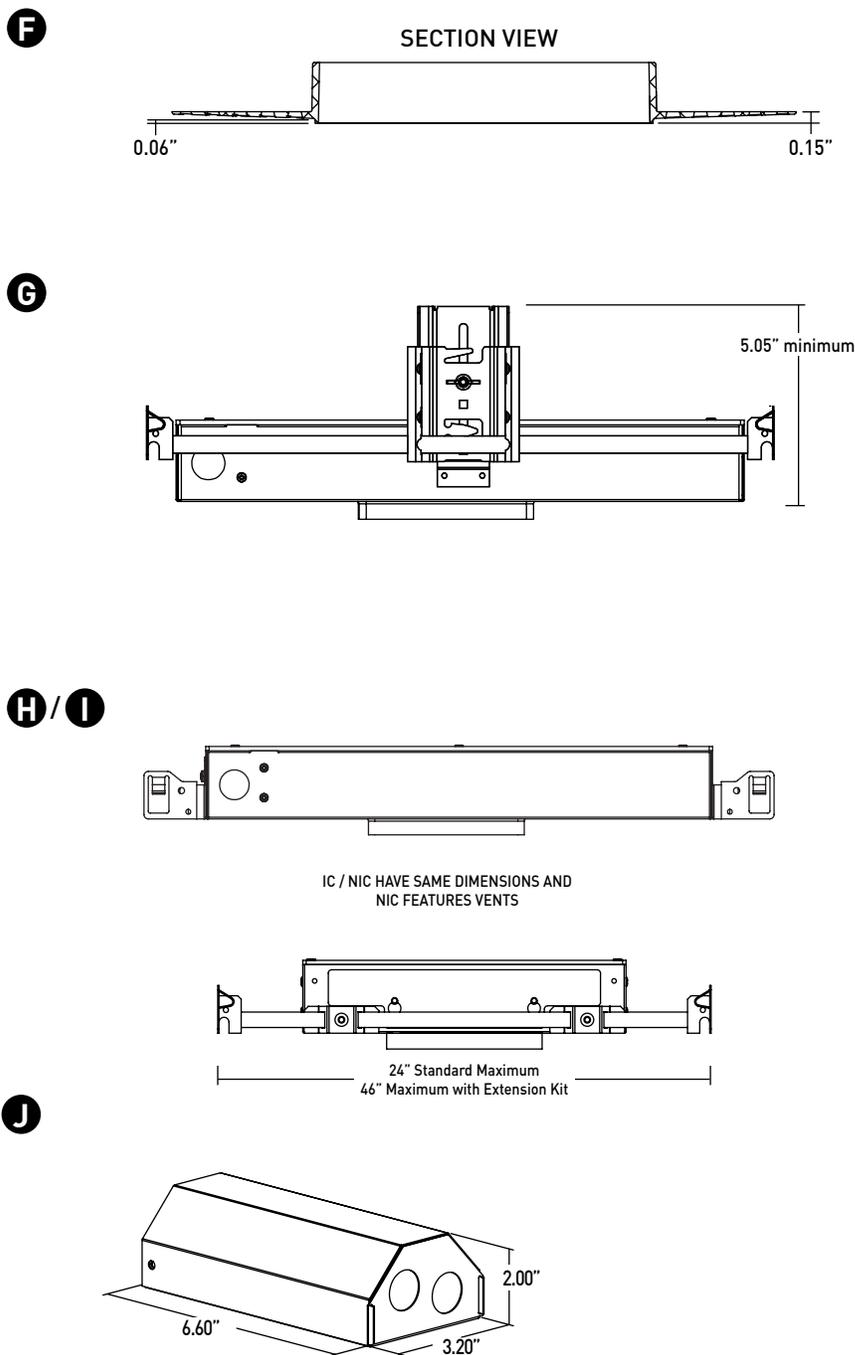
## DOWNLIGHT / HOUSING

- F TRIMLESS APPLIQUÉ DETAIL**  
Integrated appliqué for plaster floating directly to baffle.
- G TG BRACKET ASSEMBLY**  
Adjustable height bracket assembly provided with ceiling thickness "T" and recommended for installations in T-Grid and with furring channel. Hanger bars are installed to adjustable bracket. Allows housing to be raised and lowered; ceiling thickness remains 0.5" to 1.0" max.
- H IC HOUSING**
  - For IC ceilings.
  - CCEA and Airtight listed.
  - Accommodates max 2271 delivered lumens.
  - No setback from polycell spray foam insulation having max R-Value of 60 on all sides and top of housing.
- I NIC HOUSING**
  - Minimum 0.50" setback from combustible and non-combustible materials on all sides and top of housing.
  - Minimum 3.00" setback from insulation material having max R-Value 30 on all sides and top of housing.
  - Minimum 6.00" setback from polycell spray foam insulation having max R-Value 60.

## HOUSING NOTES

- Do not install in environments where ambient temperatures exceed 40°C (104°F).
- All splice connections may be serviced from room side.
- Consult factory for spacing requirements for any installations exceeding R-Value 60.
- Hanger bars fitted to short side of housing; extend from 14.0" to 24.0", but may be field cut to accommodate narrow stud spacing. Can be extended up to 46" maximum with FRX-HBE-46 kit.
- Hanger bars and brackets add 4.00" to the overall dimension, but are exclusive of the setback requirements.
- Housings for round trims feature a round aperture housing collar, and for square trims, a square housing collar, accommodating ceiling thicknesses between 0.50" and 1.00".

## DIMENSIONS / DRAWINGS



# FRAXION4 SLIM LVS FIXED

## TECHNICAL

### CONSTRUCTION

**Downlight:** Painted finishes are granulated powder coat.

**Housing:** Aluminum and 22 Gauge galvanized steel. Extruded aluminum housing panel to act as heat-sink.

**Appliqué:** Zinc Alloy

### STATIC WHITE LED

2-step MacAdam ellipse LED module available in 80+, 90+ and 97+ CRI configurations in color temperatures of 2700K, 3000K, 3500K and 4000K.

3-step MacAdam ellipse LED module available in 90+ CRI configuration in color temperature of 2400K. Average rated lamp life of 50,000 hours.

LED and driver assemblies are field-replaceable.

### WARM DIM LED

3-step MacAdam ellipse warm dim LED module available in 90+ CRI configuration. 3000K or 2700K at full brightness, warming to 1800K at full dim. Average rated lamp life of 50,000 hours. LED assemblies are field-replaceable.

### LISTING

cTUVus listed to UL2108 standard for Dry / Damp and Wet locations.

CCEA and Airtight Listed.

U.S. Patent: 10,317,066

### DECLARE

LBC Red List Approved.

### WEIGHT

Fixture - 5.8 lbs max

### LIMITED WARRANTY

Manufacturer's Limited Warranty guarantees product(s) listed to be free from defects in material and workmanship under normal use and service. 5-year warranty on LED to operate with 70% of the original flux and remain within a range of 3 duv. Warranty period begins from the date of shipment by Seller. [Consult website for full warranty terms and conditions.](#)

### CHANGE LOG

1. 10/17/2022: REMOVED 90W13A 3200K-1800K WARM DIM AND ADDED 90W12A 3000K-1800K WARM DIM.

2. 04/26/2023: ADDED DECLARE LBC RED LIST APPROVED.

3. 08/08/2023: UPDATED WITH NEW LED AND OPTIC SYSTEM.

4. 02/08/2024: ADDED 2400K.



**Declare.** 