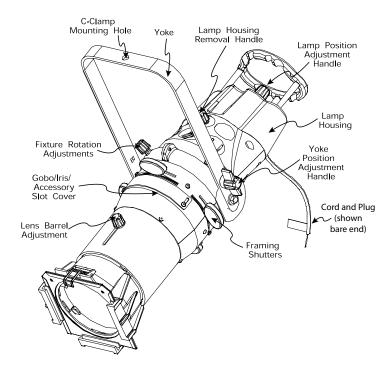


LEO Ellipsoidal Fixture



Leviton's Enhanced Optics ellipsoidal spotlight breaks through the barriers and pitfalls commonly associated with new generation ellipsoidal reflector spotlights. LEO offers exceptional performance with a highly engineered optical system resulting in increased efficiency and more light where you need it - on the talent. LEO is by far the most versatile ellipsoidal spotlight on the market, working well with any of the recommended lamps at any published field angle in both a textbook peak and cosine focus. LEO features outstanding soft focus capability – allowing peak focus, appropriate beam uniformity, and a consistent falloff at the edge for both single—fixture and multi-fixture/zone overlap applications. Additionally, the LEO features an industry exclusive repositionable lens, enabling the user to change field angles, in the field, in the same barrel.

Application

- Theaters
- Studios
- Concerts
- Front-of-House Positions
- On-Stage Positions
- Side Booms

Features

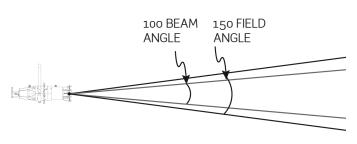
- 15°, 19°, 26°, 36°, & 50° field angles
- Continuous body & barrel on-axis rotation (greater than 360°)
- Up to 750W lamp
- 115-240V
- Cosine (Flat) & Peak focus with all recommend lamps & beam angles
- 30-second lamp replacement, lamp housing separates from body
- Field adjustable lenses to change field angle

Features, cont'd

- Insulated Cool Grip handles for all common adjustments
- Cast Aluminum (or extruded) housing
- Durable textured powder-coat finish
- All parts user replaceable
- Heavy stainless steel shutters in a quad-plane assembly
- EasyGlide lens tube no metal to metal contact for ease of movement
- Two industry standard size accessory slots
- Two locking gel/media/accessory slots
- Steel yoke
- Supports motorized gobo rotators
- Supports glass or steel gobos, Size A or B (3" gate)
- Toolless design, no tools required for everyday activities



LEO Ellipsoidal Fixture 15 Degree

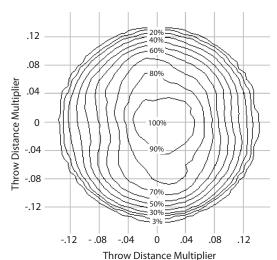


Calculation Information						
Peak Field Diameter	= 0.17 * Throw Distance					
Peak Beam Diameter	= 0.17 * Throw Distance					
Illumination (FC)	= Candlepower / Distance ²					
Cosine Field Diameter	= 0.26 Throw Distance					
Cosine Beam Diameter	= 0.21 * Throw Distance					
Peak Candlepower	260893 candela					
Cosine Candlepower	215367 candela					
Cutoff Angle	15°					
Efficacy Cosine / Peak	9.3lpw / 7.7lpw					
Efficiency Cosine / Peak	36% / 30%					

Beam Diameter & Performance Table

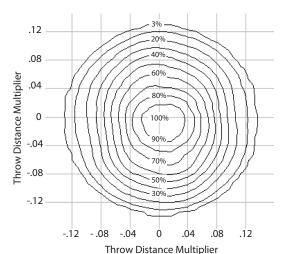
Peak Diameter (ft)	2	3	5	7	9	10	12	14	16
Peak Illumination (FC)	2609	652	290	163	104	72	53	41	32
Distance (ft)	10	20	30	40	50	60	70	80	90
Cosine Illumination (FC)	2154	538	239	135	86	60	44	34	27
Cosine Diameter (ft)	3	5	8	11	13	16	18	21	24

Iso-Footcandle Plot Cosine



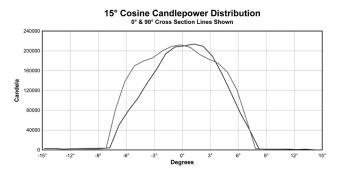
100% = 344 Foot Candles at 25 feet
Distance from Origin = Throw Distance Multiplier X Throw Distance

Iso-Footcandle Plot Peak

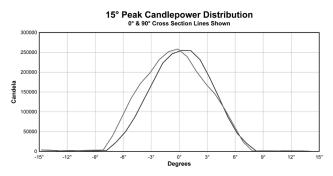


100% = 419 Foot Candles at 25 feet Distance from Origin = Throw Distance Multiplier X Throw Distance

Candle Plot Cosine

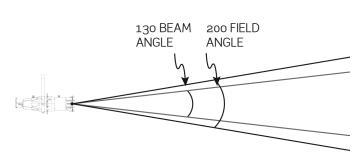


Candela Plot Peak





LEO Ellipsoidal Fixture 19 Degree

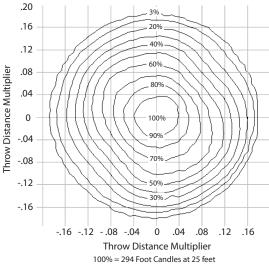


Calculation Information						
Peak Field Diameter	= 0.32 * Throw Distance					
Peak Beam Diameter	= 0.19 * Throw Distance					
Illumination (FC)	= Candlepower / Distance ²					
Cosine Field Diameter	= 0.35 Throw Distance					
Cosine Beam Diameter	= 0.23 * Throw Distance					
Peak Candlepower	196799 candela					
Cosine Candlepower	183000 candela					
Cutoff Angle	20°					
Efficacy Cosine / Peak	10.8lpw / 9.2lpw					
Efficiency Cosine / Peak	42% / 36%					

Beam Diameter & Performance Table

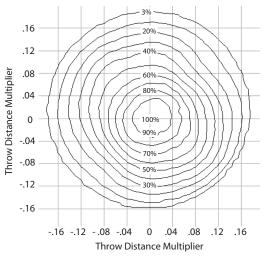
Peak Diameter (ft)	3	5	6	8	10	11	13	14	16
Peak Illumination (FC)	1968	875	492	315	219	161	123	97	79
Distance (ft)	10	15	20	25	30	35	40	45	50
Cosine Illumination (FC)	1830	813	458	293	203	149	114	90	73
Cosine Diameter (ft)	4	5	7	9	11	12	14	16	18

Iso-Footcandle Plot Cosine



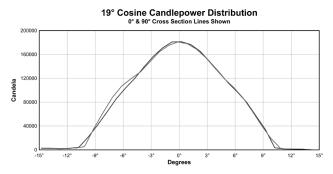
 $100\% = 294 \, Foot \, Candles \, at \, 25 \, feet$ Distance from Origin = Throw Distance Multiplier X Throw Distance

Iso-Footcandle Plot Peak

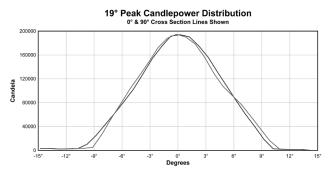


 $100\% = 313 \ Foot \ Candles \ at \ 25 \ feet$ Distance from Origin = Throw Distance Multiplier X Throw Distance

Candle Plot Cosine

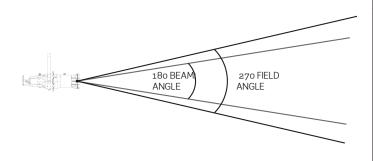


Candela Plot Peak





LEO Ellipsoidal Fixture 26 Degree

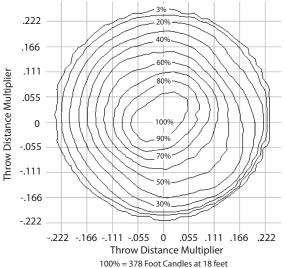


Calculation Information					
Peak Field Diameter	= 0.41 * Throw Distance				
Peak Beam Diameter	= 0.21 * Throw Distance				
Illumination (FC)	= Candlepower / Distance ²				
Cosine Field Diameter	= 0.44 Throw Distance				
Cosine Beam Diameter	= 0.3 * Throw Distance				
Peak Candlepower	173061 candela				
Cosine Candlepower	121605 candela				
Cutoff Angle	27°				
Efficacy Cosine / Peak	12.4lpw / 11.9lpw				
Efficiency Cosine / Peak	48% / 46%				

Beam Diameter & Performance Table

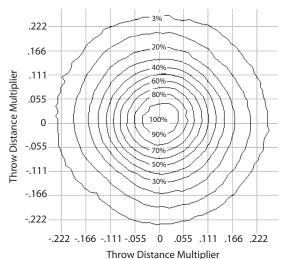
Peak Diameter (ft)	4	6	89	10	12	14	16	18	20
Peak Illumination (FC)	1731	769	433	277	192	141	108	85	69
Distance (ft)	10	15	20	25	30	35	40	45	50
Cosine Illumination (FC)	1261	540	304	195	135	99	76	60	49
Cosine Diameter (ft)	4	7	9	11	13	16	18	20	22

Iso-Footcandle Plot Cosine



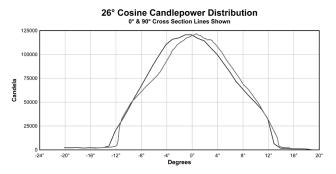
100% = 378 Foot Candles at 18 feet
Distance from Origin = Throw Distance Multiplier X Throw Distance

Iso-Footcandle Plot Peak

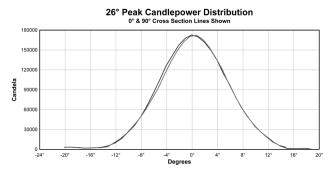


100% = 535 Foot Candles at 18 feet
Distance from Origin = Throw Distance Multiplier X Throw Distance

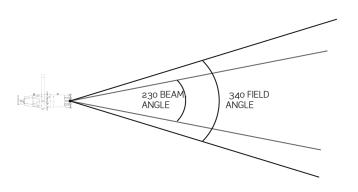
Candle Plot Cosine



Candela Plot Peak





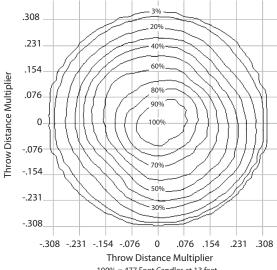


Calculation Information					
Peak Field Diameter	= 0.43 * Throw Distance				
Peak Beam Diameter	= 0.23 * Throw Distance				
Illumination (FC)	= Candlepower / Distance2				
Cosine Field Diameter	= 0.63 Throw Distance				
Cosine Beam Diameter	= 0.41 * Throw Distance				
Peak Candlepower	15104 candela				
Cosine Candlepower	81583 candela				
Cutoff Angle	36°				
Efficacy Cosine / Peak	14.9lpw / 12.0lpw				
Efficiency Cosine / Peak	58% / 47%				

Beam Diameter & Performance Table

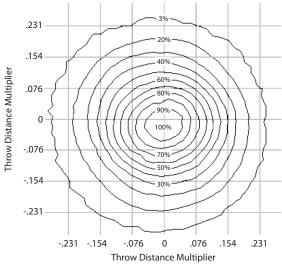
Peak Diameter (ft)	4	6	9	11	13	15	17	19	21
Peak Illumination (FC)	1512	672	378	242	168	123	95	75	60
Distance (ft)	10	15	20	25	30	35	40	45	50
Cosine Illumination (FC)	816	363	204	131	91	67	51	40	33
Cosine Diameter (ft)	6	9	13	16	19	22	25	28	32

Iso-Footcandle Plot Cosine



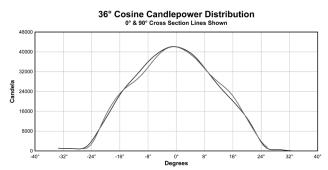
 $100\% = 477 \ Foot \ Candles \ at \ 13 \ feet$ Distance from Origin = Throw Distance Multiplier X Throw Distance

Iso-Footcandle Plot Peak

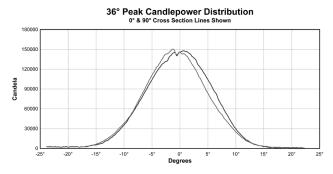


100% = 891 Foot Candles at 13 feet Distance from Origin = Throw Distance Multiplier X Throw Distance

Candle Plot Cosine

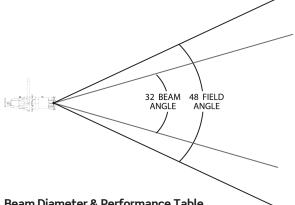


Candela Plot Peak





LEO Ellipsoidal Fixture 50 Degree

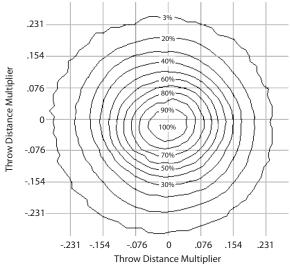


Calculation Information						
Peak Field Diameter	= 0.61 * Throw Distance					
Peak Beam Diameter	= 0.28 * Throw Distance					
Illumination (FC)	= Candlepower / Distance ²					
Cosine Field Diameter	= 0.89 Throw Distance					
Cosine Beam Diameter	= 0.57 * Throw Distance					
Peak Candlepower	113448 candela					
Cosine Candlepower	42955 candela					
Cutoff Angle	50°					
Efficacy Cosine / Peak	14.6lpw / 14.6lpw					
Efficiency Cosine / Peak	57% / 57%					

Beam Diameter & Performance Table

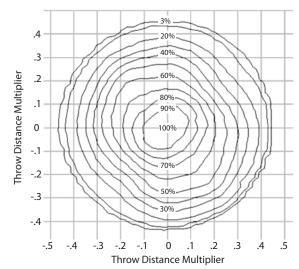
Peak Diameter (ft)	6	9	12	15	18	21	24	28	31
Peak Illumination (FC)	1134	504	284	182	126	93	71	56	45
Distance (ft)	10	15	20	25	30	35	40	45	50
Cosine Illumination (FC)	430	191	107	69	48	35	27	21	17
Cosine Diameter (ft)	9	13	18	22	27	31	36	40	45

Iso-Footcandle Plot Cosine



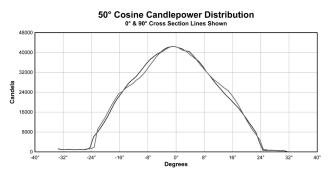
100% = 425 Foot Candles at 10 feet Distance from Origin = Throw Distance Multiplier X Throw Distance

Iso-Footcandle Plot Peak

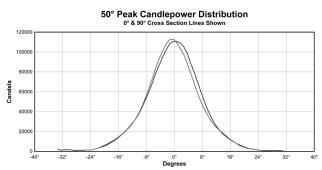


100% = 1122 Foot Candles at 10 feet $Distance\ from\ Origin = Throw\ Distance\ Multiplier\ X\ Throw\ Distance$

Candle Plot Cosine

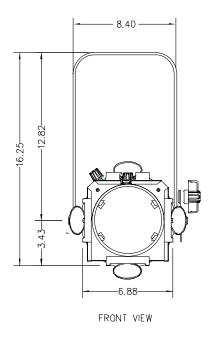


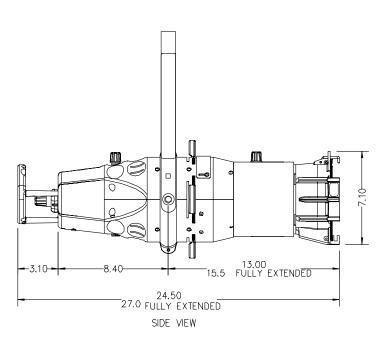
Candela Plot Peak



LEVITON

LEO Ellipsoidal Fixture Dimensional Drawing





Weight: 17lbs. (7.7kg) Shipping Weight: 21.5lbs (9.8kg)

Lamps

Wattage	Voltage	Lamp Life Multiplier	Lumens	Color Temperature	ANSI Designation	Leviton Part #
575W	115V	300hrs	14,500	3200K	GLC	LoGLC-ooo
575W	115V	1500hrs	13,000	3050K	GLA	LoGLA-000
750W	115V	300hrs	19,000	3200K	GLD	LoGLD-000
750W	115V	1500hrs	17,400	3050K	GLE	LoGLE-ooo
6ooW	230V	250hrs	14,000	3250K	GKV	LOGKV-000
6ooW	240V	25ohrs	14,000	3200K	GKV	LoGKV-ooo
600W	230V	1500hrs	11,000	3250K	GKV/LL	LOGKV-LLo
6ooW	240V	1500hrs	11,000	3000K	GKV/LL	LoGKV-LLo

Photometric performance testing was performed using the Prometric photometric measuring system by Radiant Imaging, Inc. All testing was performed using a Thorn HX754 lamp running at 115V and using 736 watts. The procedure used for testing was as recommended and documented by the equipment manufacturer. The information contained herein as presented conforms to ANSI standard E1.9-2001. The following terms as used within this document have equivalents in the standard as follows: Cosine = Flat Distribution, Peak = Peak Distribution, Field Angle = One-Tenth Peak Illuminance Angle, Beam Angle = Half Peak Illuminance Angle.



LEO Ellipsoidal Fixture

Electrical

- Up to 750W lamp
- 115-240V
- UL listed
- 3 Wire 36" sleeved leads
- Supports popular HX series of lamps (see inside for ANSI codes)

Optical

- Faceted glass reflector with dichroic coating
- Lenses & reflector insulated from housing
- Quick-Center, locking lamp centering technology
- Peak/Cosine adjustment separate from lamp centering
- Removable & interchangeable lens barrels
- User changeable field angle, standard for each lens barrel
- 91% of heat absorbed by reflector

SPARE PART NUMBERS

Part #	Description
LELSP-001	LEO Ellipsoidal Yoke, Black
LELSP-002	LEO Ellipsoidal Yoke Hardware Kit, Black
LELSP-003	LEO Ellipsoidal Knob Kit, Black
LELSP-004	LEO Ellipsoidal Lens Kit A, (RED MARK) ox68216-89-00-00 and associated hardware
LELSP-005	LEO Ellipsoidal Lens Kit B, (BLUE MARK) ox68217-89-00-00 and associated hardware
LELSP-006	LEO Ellipsoidal Lens Kit C, (NO MARK) ox68218-89-00-00 and associated hardware
LELSP-007	LEO Ellipsoidal Lens Kit D, (5.2" diameter) ox68219-89-00-00 and associated hardware
LELSP-008	LEO Ellipsoidal Gel Frame Spring Kit
LELSP-009	LEO Ellipsoidal Lamp Focus Position Hardware
LELSP-010	LEO Ellipsoidal Lamp Socket Kit
LELSP-011	LEO Ellipsoidal Shutter Blades, (4) Per Pack
LELSP-012	LEO Ellipsoidal Shutter Spacers
LELSP-014	LEO Ellipsoidal Reflector Kit
LELSP-015	LEO Ellipsoidal Lamp Housing Handle (with screws), Black
LELSP-016	LEO Ellipsoidal Lamp Housing Complete, Black

ORDERING INFORMATION

Part Number Key Fixture includes LEL - o c-clamp, color frame, cord, and plug. Field Angle 15° 19 26° 36° 59° Plug Type Parallel Blade (Edison) 15A, NEMA 5-15P Stage Pin, 20A Twistlock, 20A, NEMA L5-20 Bare Leads Example: Iel26-osb, 26 degree Black ellipsoidal with 20A Stage Pin Plug

LENS TUBE PART NUMBERS

Part #	Description
LEL15-LTB	LEO Tube, Black, 15°
LEL19-LTB	LEO Lens Tube, Black 19°
LEL26-LTB	LEO Lens Tube, Black 26°
LEL36-LTB	LEO Lens Tube, Black, 36°
LEL50-LTB	LEO Lens Tube, Black 50°
TAoSC-ooo	30" Safety Cable
LELAC-PTN	Pattern Holder
LELAC-IRS	Iris
5266-CB	5-15 Grounded Black Plug ("Edison or PBG")
2311-B	L5-020 Black Plug ("Twistlock")
20MP-E	20A Grounded Stage Pin Plug (2P&G)
LELAC-CFB	Color Frame for 15°-50° Fixtures
TAoCC-ooo	C-Clamp
TAoCS-000	Combo Stud
TA6XN-oog	6-1/4" x g Snoot/Gel Extender

^{*}Consult factory for availability and lead times
For spare parts lists, please see product users guide.
Information is believed to be accurate at time of printing but is subject to change without notice.
Contact Leviton Manufacturing, Inc. for the latest information.