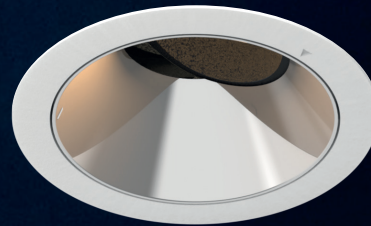
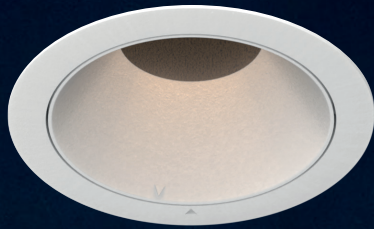


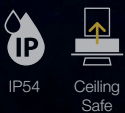
# CASTOR

## DOWNLIGHT SERIES

A series of pinhole downlights with reflector available in various sizes and finishing, designed with a deep aperture for optimum glare control. The Castor downlight is equipped with an off-set tilt mechanism that maximises light output for most demanding applications.



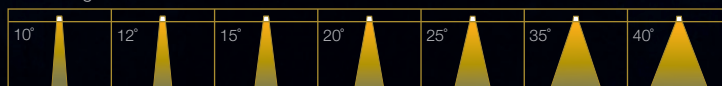
### Fixture Features



### Module Colour Temperature Variation



### Beam Angle

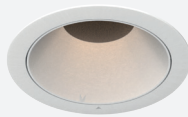


### Driver Dimming Variation

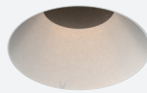


# CASTOR 2

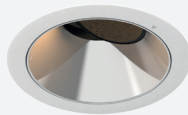
RECESSED ROUND FIX / TILT DOWNLIGHT LUMINAIRE



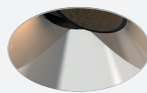
#ROUND  
#FIX  
#TRIM



#ROUND  
#FIX  
#TRIMLESS



#ROUND  
#TILT  
#TRIM



#ROUND  
#TILT  
#TRIMLESS

## TECHNOLOGY AND FEATURES



Advanced Thermal Protection System



Low Flicker, No Risk (IEEE 1789)



Converging Optical Lens Maximising LOR



Ceiling Safe

## Pinhole

### AVAILABLE OPTIONS

FIXTURE COLOUR OPTIONS	Trim Colour Options	Reflector Colour Options																							
	MATT WHITE RAL9003	MATT BLACK RAL9011	CHROME	CHROME BLACK	CHROME GOLD																				
MATT WHITE RAL9003																									
MATT BLACK RAL9011																									
ACCESSORIES	Honeycomb Anti-Glare Louvre Soft Lens Linear Spread Lens Comfort Pro IP54 <p><i>*IP54 seal accessory is valid for fix angle fixtures only.</i></p>																								
LED MODULE	20C/P <table border="1"> <thead> <tr> <th></th> <th>15°</th> <th>25°</th> <th>40°</th> </tr> </thead> <tbody> <tr> <td>           SINGLE CCT   2700K   3000K   3500K   4000K   5000K   ProART   ProART98         </td> <td>✓</td> <td>✓</td> <td>✓</td> </tr> <tr> <td>           WARM DIM  </td> <td></td> <td></td> <td></td> </tr> <tr> <td>           tuneWHITE  </td> <td></td> <td>✓</td> <td>✓</td> </tr> <tr> <td>           flexiK  </td> <td></td> <td></td> <td></td> </tr> </tbody> </table> <p><i>**tuneWHITE and flexiK are recommended to be paired with Soft Lens for better colour mixing effect.</i></p>						15°	25°	40°	SINGLE CCT 2700K 3000K 3500K 4000K 5000K ProART ProART98	✓	✓	✓	WARM DIM 				tuneWHITE 		✓	✓	flexiK 			
	15°	25°	40°																						
SINGLE CCT 2700K 3000K 3500K 4000K 5000K ProART ProART98	✓	✓	✓																						
WARM DIM 																									
tuneWHITE 		✓	✓																						
flexiK 																									
DRIVER DIMMING	(ND) (PH) (AN) (DA)																								

# CASTOR 2

- #ROUND
- #FIX
- #TILT
- #TRIM
- #TRIMLESS

## SPECIFICATIONS

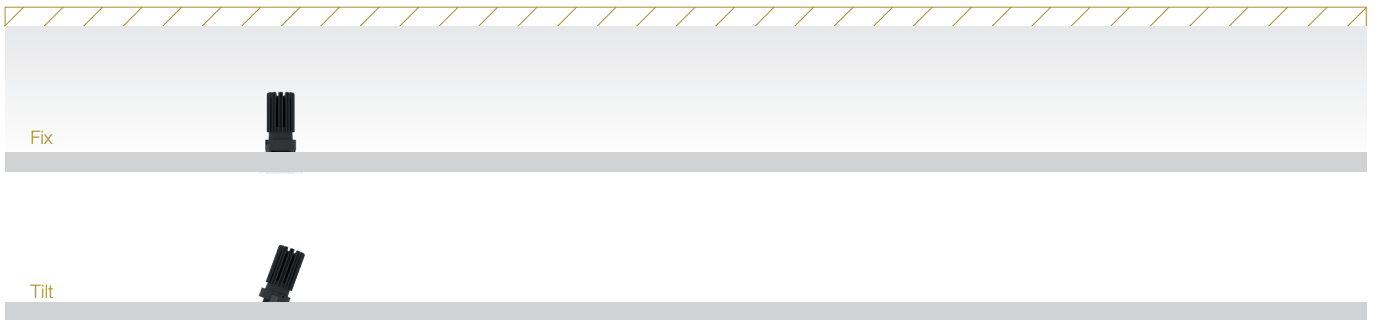
### FIXTURE

Family Type	Castor series
Fixture Colours	Matt white, matt black
Reflector Colours	Matt white, matt black, chrome, chrome black, chrome gold
Fixture Materials	Aluminium (and plastic for reflector)
Accessories	Honeycomb anti-glare louvre, soft lens, linear spread lens, Comfort Pro, IP54 seal
Ingress Protection	IP40, IP54

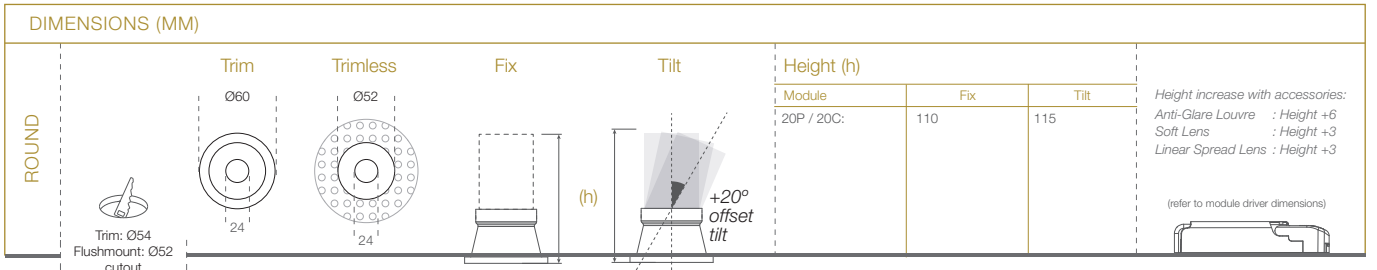
### LED MODULE & DRIVER

Compatible LED Modules	20 series LED modules
Lifetime	Up to 50,000 hours L80 lamp life with LM80 tested LED chip packages
Beam Angles	15°, 25°, 40°
Colour Temperatures	2700K, 3000K, 3500K, 4000K, 5000K, Warm Dim, tuneWHITE, flexiK
CRI	High Efficiency (CRI-85), ProART (CRI-95), ProART98 (CRI-98)
Driver (Dimming)	Non-dim, phase (leading & trailing edge), 0-10V, DALI

20 Pro /  
20 Classic



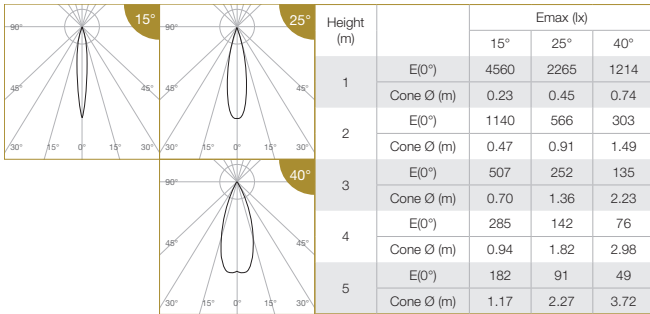
## DIMENSIONS (MM)



# CASTOR 2

## PHOTOMETRICS

### 20 PRO



Correction Factor:  
 20P - f = 1.00  
 20C - f = 0.81  
 20P-24CV - f = 0.78  
 20C-24CV - f = 0.64

ELR LED Module				20P	20C	
LED Power				8W	6.2W	
System Power				10.5W	8.3W	
Luminous Flux (lm)	Type	Beam Angle	CRI			
			High Efficiency Ra-85	ProART Ra-95		
	Single CCT (3000K)	15°	15°	High Efficiency Ra-85	713	581
				ProART Ra-95	606	494
				ProART98 Ra-98	499	407
		25°	25°	High Efficiency Ra-85	705	574
				ProART Ra-95	599	488
				ProART98 Ra-98	493	402
	40°	40°	High Efficiency Ra-85	697	568	
			ProART Ra-95	593	482	
			ProART98 Ra-98	488	397	
	Input Power (24CV)				8W	6.2W
Luminous Flux (lm)	Type	Beam Angle	CRI			
			High Efficiency Ra-85	ProART Ra-95	ProART98 Ra-98	
	24CV Single CCT (3000K)	15°	15°	High Efficiency Ra-85	554	458
				ProART Ra-95	472	389
				ProART98 Ra-98	388	320
		25°	25°	High Efficiency Ra-85	548	452
				ProART Ra-95	466	385
				ProART98 Ra-98	384	317
	40°	40°	High Efficiency Ra-85	542	447	
			ProART Ra-95	461	380	
			ProART98 Ra-98	379	313	

Data are based on 3000K (ProART CRI-95). Nominal data of 2700K and 3500K are shared with 3000K. Higher CCT of 4000K and 5000K will have a nominal data value of 5% higher than published. (f = 1.05) High Efficiency CRI-85 will have a nominal data value of 15% higher than published. (f = 1.17) ProART98 CRI-98 will have a nominal data value of 8% lower than published. (f = 0.92)

Nominal CRI-85, equals to Ra>80-87, R9>0  
 Nominal CRI-95, equals to Ra>90-97, R9>50  
 Nominal CRI-98, equals to Ra>97-99, R9>93

# CASTOR 2

## PHOTOMETRICS

### 20 PRO WARM DIM

Height (m)		E <sub>max</sub> (lx)		ELR LED Module			20P	20C
		25°	40°	LED Power				
1	E(0°)	2632	1410	System Power		8W	6.2W	
	Cone Ø (m)	0.45	0.74	System Power		10.5W	8.3W	
2	E(0°)	658	353	Luminous Flux (lm)	Type	Beam Angle	CRI	ProART Ra-95
	Cone Ø (m)	0.91	1.49		Warm Dim (3100K)	25°		
3	E(0°)	292	157				696	539
	Cone Ø (m)	1.36	2.23				688	533
4	E(0°)	165	88	<i>Data are based on maximum output at 3100K</i>				
	Cone Ø (m)	1.82	2.98	<i>Nominal CRI-95, equals to Ra&gt;90-97, R9&gt;50</i>				
5	E(0°)	105	56					
	Cone Ø (m)	2.27	3.72					

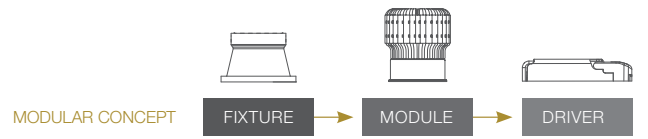
Correction Factor: 20P WD - f = 1.00  
20C WD - f = 0.78

### 20 PRO tuneWHITE / flexiK

Height (m)		E <sub>max</sub> (lx)		ELR LED Module			20P	20C
		25°	40°	LED Power				
1	E(0°)	2139	1146	System Power		8W	6.2W	
	Cone Ø (m)	0.45	0.74	System Power		10.5W	8.3W	
2	E(0°)	535	286	Luminous Flux (lm)	Type	Beam Angle	CRI	ProART Ra-95
	Cone Ø (m)	0.91	1.49		tuneWHITE / flexiK (4000K / 6500K)	25°		
3	E(0°)	238	127				566	439
	Cone Ø (m)	1.36	2.23				559	434
4	E(0°)	134	72	<i>Data are based on maximum output at highest CCT (4000K / 6500K)</i>				
	Cone Ø (m)	1.82	2.98	<i>2700K will have a nominal data value of 10% lower than published. (f = 0.90)</i>				
5	E(0°)	86	46	<i>1800K will have a nominal data value of 30% lower than published. (f = 0.70)</i>				
	Cone Ø (m)	2.27	3.72	<i>Nominal CRI-95, equals to Ra&gt;90-97, R9&gt;50</i>				

Correction Factor: 20P TW / FK - f = 1.00  
20C TW / FK - f = 0.78

# CASTOR 2



## ORDERING MATRIX CHART

Fixture																										
Type	Trim Options		Shape		Angle		Colour		Reflector Colour		Accessories															
<b>CASTOR-2</b>	T	Trim	<b>RD</b>	Round	<b>FX</b>	Fix	<b>WH</b>	Matt White	<b>WH</b>	Matt White	<b>N</b>	None														
	X	Trimless											<b>TL</b>	Tilt	<b>MB</b>	Matt Black	<b>MB</b>	Matt Black	<b>AGL</b>	Anti-Glare Louvre						
																					<b>CR</b>	Chrome	<b>CR</b>	Chrome	<b>SL</b>	Soft Lens
		<b>CG</b>	Chrome Gold	<b>CG</b>	Chrome Gold	<b>CP</b>	Comfort Pro	<b>IP</b>	IP54**																	

\*\*IP54 seal accessory is valid for fix angle fixtures only.

Single CCT LED Module					Driver				
LED Power	Beam Angle		Colour Temp		CRI		Dimming		
<b>ELR20P</b>	8W	15	15°	27	2700K	<b>HE</b>	Ra~85	<b>ND</b>	Non-Dim
<b>ELR20C</b>	6.2W	25	25°	30	3000K	<b>PA</b>	ProART	<b>PH</b>	Phase
				35	3500K	<b>PP</b>	ProART98	<b>AN</b>	0-10V
		40	4000K	<b>DA</b>	DALI				
		50	5000K						
<b>ELR20P-24CV</b>	8W	15	15°	27	2700K	<b>HE</b>	Ra~85		
<b>ELR20C-24CV</b>	6.2W	25	25°	30	3000K	<b>PA</b>	ProART		
				35	3500K	<b>PP</b>	ProART98		
		40	4000K						
		50	5000K						

\*Drivers for 24CV LED modules are sold separately.

Warm Dim LED Module					Driver				
LED Power	Beam Angle		Colour Temp		CRI		Dimming		
<b>ELR20P</b>	8W	25	25°	<b>WD</b>	Warm Dim	<b>PA</b>	ProART	<b>PH</b>	Phase
<b>ELR20C</b>	6.2W	40	40°					<b>AN</b>	0-10V
								<b>DA</b>	DALI

tuneWHITE LED Module					Driver				
LED Power	Beam Angle		Colour Temp		CRI		Dimming		
<b>ELR20P</b>	8W	25	25°	<b>TW1831</b>	tuneWHITE 1800K-3100K	<b>PA</b>	ProART	<b>DA</b>	DALI
<b>ELR20C</b>	6.2W	40	40°	<b>TW1840</b>	tuneWHITE 1800K-4000K				
				<b>TW2765</b>	tuneWHITE 2700K-6500K				

flexiK LED Module					Driver				
LED Power	Beam Angle		Colour Temp		CRI		Dimming		
<b>ELR20P</b>	8W	25	25°	<b>FK##</b>	flexiK	<b>PA</b>	ProART	<b>PH</b>	Phase
<b>ELR20C</b>	6.2W	40	40°					<b>AN</b>	0-10V
								<b>DA</b>	DALI

## denotes the first two digits of preferred CCT ranging from 1800K to 6500K by increment of 100K.

example: CASTOR-2.T.RD.FX.WH.WH.SL.ELR20P.15.27.PA.DA

\*Custom RAL colour options available.