

ProMetric® Specification Comparisons



MODEL	IP-PM10	IP-PMY16	IP-PMY29	IC-PMG2	IC-PMG3	IC-PMI2	IC-PMI8	IC-PMI16
Primary Application	Production Line Test, Lighting	Production Line Test	Production Line Test	Low Light Testing, Source Testing	R&D, Mura Detection	Uniformity testing, NFMS, ProMetric in R&D setting	Production Line Testing	Production Line Testing
CCD Resolution (Pixels)	1392x1040	4896 x 3264	6576 x 4384	1536 x 1024	3072 x 2048	1600 x 1200	3296 x 2472	4896 x 3264
Total Megapixels	1.4	16.0	28.8	1.6	6.3	1.9	8.1	16.0
CCD Type	Uncooled, Interline	Cooled, Interline		Cooled, Full Frame		Cooled, Interline		
CCD A/D Dynamic Range	10 bits = 1024 gray scale levels	12 bits = 4096 gray scale levels		14 bits = 16384 gray scale levels		12 bits = 4096 gray scale levels		
Luminance Range	0.5 cd/m ² minimum	0.01 cd/m ² minimum 10 ¹⁰ cd/m ² maximum with external ND filters		0.001 cd/m ² minimum 10 ¹⁰ cd/m ² maximum with optional ND filters		0.01 cd/m ² minimum 10 ¹⁰ cd/m ² maximum with optional ND filters		
System Accuracy	Illuminance ± 3%; Luminance (Y) ± 3%			Illuminance ± 3%; Luminance (Y) ± 3%; Color Coordinates (x,y) ± 0.003				
Short-term Repeatability	Illuminance ± 1% Luminance (Y) ± 1%	Illuminance ± 0.5% Luminance (Y) ± 0.5%		Illuminance ± 0.5% Luminance (Y) ± 0.5%; Color Coordinates (x,y) ± 0.0006				
Lens Type / Focal Distances Available	Manually controlled focus and aperture; Ten lenses, 8 to 180 mm	Electronically controlled focus and aperture; 35, 50, 100 mm		Electronically controlled focus and aperture; 20, 50, 100 mm	Electronically controlled focus and aperture; 35, 50, 100 mm	Electronically controlled focus and aperture; 20, 35, 50, 100 mm		Electronically controlled focus and aperture; 35, 50, 100 mm
Field of View (Full Angle, H x V Degrees)	45° x 34° to 1.8° x 1.4°	35 mm 41° x 28° 50 mm 29° x 19° 100 mm 15° x 10°	35 mm 54° x 37° 50 mm 40° x 27° 100 mm 20° x 14°	20 mm 38° x 26° 50 mm 15° x 10° 100 mm macro 7° x 5°	35 mm 42° x 28° 50 mm 30° x 20° 100 mm macro 15° x 10°	20 mm 24° x 18° 35 mm 14° x 10° 50 mm 10° x 7° 100 mm macro 5° x 4°	20 mm 47° x 36° 35 mm 28° x 21° 50 mm 20° x 15° 100 mm macro 10° x 7°	35 mm 41° x 28° 50 mm 29° x 19° 100 mm macro 15° x 10°
Minimum Measurement Time (for 100 cd/m ²)	1.3 seconds - photopic	1.3 seconds - photopic	2.0 seconds - photopic	2.3 sec - photopic 8 sec - color	6 sec - photopic 19 sec - color	0.5 sec - photopic 1.5 sec - color	1.6 sec - photopic 4.6 sec - color	2.9 sec - photopic 8.7 sec - color
Spatial Measurement Capabilities	Luminance, Radiance, Illuminance, Irradiance Luminous Intensity, Radiant Intensity			Luminance, Radiance, Illuminance, Irradiance, Luminous Intensity, Radiant Intensity, CIE Chromaticity Coordinates, L*a*b* Color Scale, Correlated Color Temperature (CCT), Dominant Wavelength				
Units	foot-lambert, cd/m ² , nit, W/sr/m ² , foot-candles, lux, lux-s, W/m ² , W-s/m ² , candela, W/sr			foot-lambert, cd/m ² , nit, W/sr/m ² , foot-candles, lux, lux-s, W/m ² , W-s/m ² , candela, W/sr, CIE (x,y) and (u', v'), Kelvin (CCT)				
Communication Interface	USB 2.0	USB 2.0, 3.0 Ethernet 100/1000						
LCD Touch Panel	None			Resolution: 800 x 600, Diagonal: 125 mm				
Dimensions (H x W x D)	100 mm x 63 mm x 58 mm	86 mm x 86 mm x 154 mm		238 mm x 181 mm x 230 mm				
Weight	0.5 kg	1.4 kg		4.9 kg				
Operating Temperature	0 - 30° C							
Operating Humidity	20 - 70% non-condensing							