

## Data sheet



Support arm system  
ACROBAT SWING



Support arm system  
with height stop



Support arm system  
with height stop and  
full cardanic  
suspension

### Features

- User-friendly display keypad
- Electronic focussing (F)
- Light intensity control
- Sterilisable handle - 200 sterilisation cycles
- Endolight 5%

### Optional features

- Central spring arm



**Technical data**

Type of device	Operating light
Class (according to MDR)	I
Protection class/-type (SC, MC)	I
IP protection class (IEC 60529)	IP 42
Temperature (for transport and storage) <sup>1</sup>	-25 °C to +70 °C
Ambient temperature for operation	+10°C to +30°C
Relative humidity (for transport and storage) <sup>1</sup>	5 % RH to 95 % RH
Relative humidity for operation	30 % bis 75 % RH
Air pressure (for transport and storage) <sup>1</sup>	700 hPa to 1060 hPa
Air pressure for operation	700 hPa to 1060 hPa
Input voltage (SC, MC)	24 V DC
Power consumption (SC)	24 W
Current consumption (SC)	1,0 A max.
Power consumption (MC)	24 W
Current consumption (MC)	1,0 A max.
Power consumption (MC P)	29 W
Current consumption (MC P)	1,2 A max.
Operating time	Continuous operation possible
Weight of light body incl. accessories	max. 3.5 kg
Expected life <sup>2</sup>	10 years

<sup>1</sup> Transport and storage conditions for lamp body and power supply unit.

<sup>2</sup> At the end of the expected (designed) service life, the lamp must be serviced more frequently for safe operation.

**Mechanical data**

Joints on cardanic bows rotatable by 430° (± 215°), on spring arm > 360° without stop
Rotatability on ceiling tube/flange tube of single suspension: > 360° without stop
Rotatability on 2-fold standard axis: <ul style="list-style-type: none"> <li>- Lower mounting pin : &gt; 360° without stop</li> <li>- Upper mounting pin : 300° (± 150°)</li> </ul>
Rotatability on stand tube of mobile stand: 60° (± 30°)
Height adjustment: <ul style="list-style-type: none"> <li>- Spring arm Swing: 1220 mm</li> <li>- Spring arm Acrobat 2000: 1180 mm</li> </ul>

## Lighting technical data

	Mach LED 150F	Mach LED 150	Mach LED 150FP	Mach LED 150MC	Mach LED 150MC P
Central light strength (distance 1 m)	110.000 Lux	110.000 Lux	130.000 Lux	110.000 Lux	130.000 Lux
Light field diameter d10	163 mm	187 mm	157 mm	206 mm	205 mm
Light field diameter d50	85 mm	104 mm	83 mm	113 mm	112 mm
Residual light intensity with one shadower	0 %	0 %	0 %	0 %	0 %
Residual light intensity with two shadowers	52 %	46 %	53 %	46 %	45 %
Residual light intensity on the ground from a standardised lens barrel	100 %	100 %	100 %	100 %	100 %
Residual light intensity on the ground from a standardised lens barrel and a shadower	0 %	0 %	0 %	0 %	0 %
Residual light intensity on the ground of a standardised lens barrel and two shadowers	52%	46 %	53 %	47%	46 %
Illumination depth 20%	1800 mm	1544mm	1800 mm	1755 mm	1740mm
Illumination depth 60%	822 mm	803 mm	814 mm	855 mm	870 mm
Colour rendering index Ra (type)	97	97	97	97	97
Colour rendering index R9 (type)	97	96	97	90	93
Colour rendering index R913 (type)	99	99	99	97	98
Max. radiation strength in the field (distance 1 m)	439 W/m <sup>2</sup>	406 W/m <sup>2</sup>	489 W/m <sup>2</sup>	393 W/m <sup>2</sup>	471 W/m <sup>2</sup>
Max. radiation strength in the field (distance 0.78 m)	572 W/m <sup>2</sup>	-	-	-	-
Max. Bestrahlungsstärke im Feld (distance 0.77 m)	-	551 W/m <sup>2</sup>	-	-	-
Max. Bestrahlungsstärke im Feld (distance 0.81 m)	-	-	591 W/m <sup>2</sup>	-	-
Max. radiation strength in the field (distance 0.73 m)	-	-	-	583 W/m <sup>2</sup>	-
Max. radiation strength in the field (distance 0.72 m)	-	-	-	-	695 W/m <sup>2</sup>
Relation E <sub>e</sub> /E <sub>c</sub>	3.75 (mW/m <sup>2</sup> )/lx	3.69 (mW/m <sup>2</sup> )/lx	3.73 (mW/m <sup>2</sup> )/lx	3.6 (mW/m <sup>2</sup> )/lx	3.54 (mW/m <sup>2</sup> )/lx
Focusable light field size	16 - 24 cm	19 cm (fixed focus)	16 - 23 cm	21 cm (fixed focus)	21 cm (fixed focus)
Colour temperature (Kelvin)	4500	4500	4500	3750, 4000, 4250, 4500, 4750	3750, 4000, 4250, 4500, 4750
Temperature increase in the head range	0.5°C	0.5°C	0.5°C	0.5 °C	0.5 °C
Luminous efficacy (efficiency)	267 lm/W	271 lm/W	268 lm/W	277 lm/W	282 lm/W
Number of LEDs	26	26	26	26	26
Working distance	70 - 140 cm	70 - 140 cm	70 - 140 cm	70 - 150 cm	70 - 150 cm
Dimming range (%)	50 - 100	50 - 100	50 - 100	50 - 100	50 - 100
Dimming levels	5	5	5	5	5
Diameter of light body	40 cm	40 cm	40 cm	40 cm	40 cm
LED life (hours)	60,000	60,000	60,000	60.000	60.000
Height adjustment	118 cm	118 cm	118 cm	118 cm	118 cm

All technical data are subject to certain fluctuations. For production reasons, the actual values have a tolerance of ± 10%.

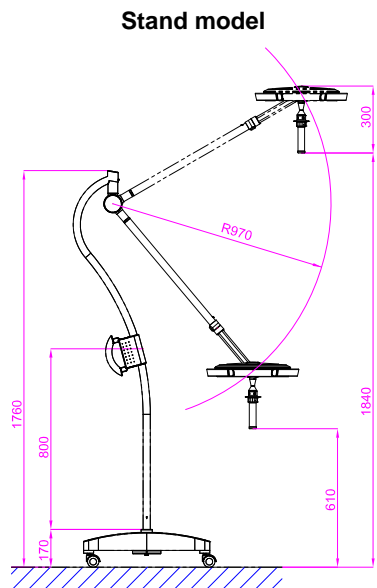
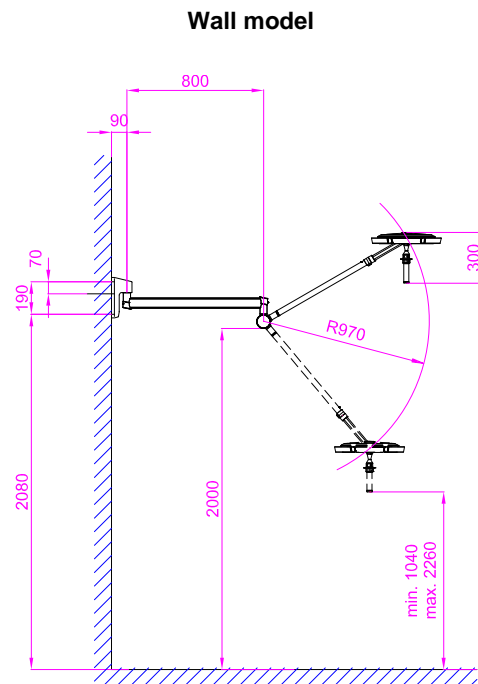
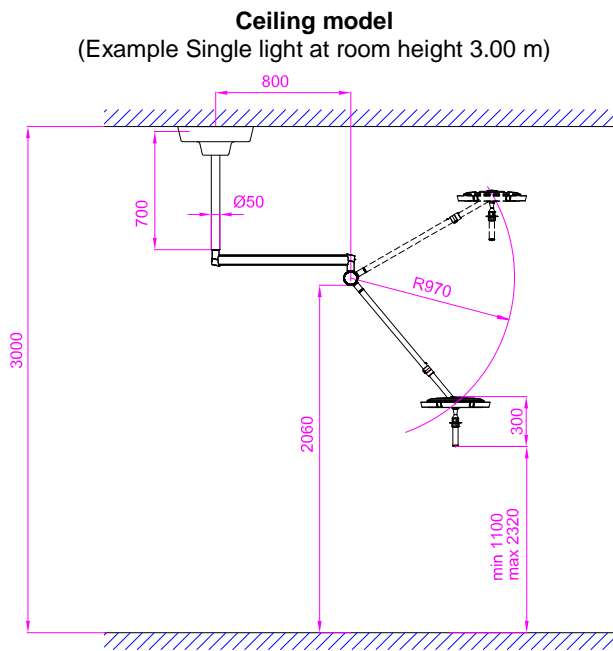
The values for the colour temperature can have deviations of ± 200 K

## Support arm system ACROBAT SWING

### Minimum clear room height for single light

Light body	Ceiling version	Wall version
Mach LED 150 / 150F / 150 Plus / 150MC / 150MC P	2450 mm	2320 mm

### Technical drawings

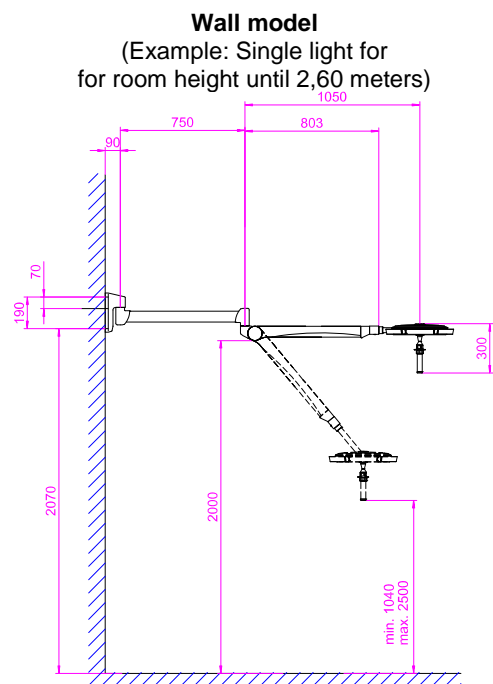
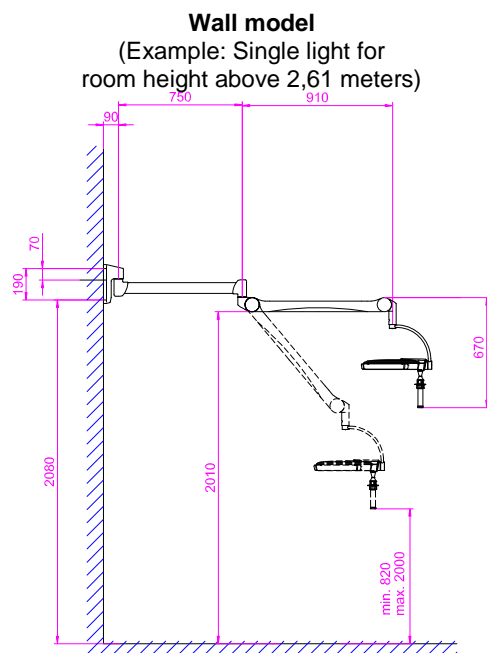
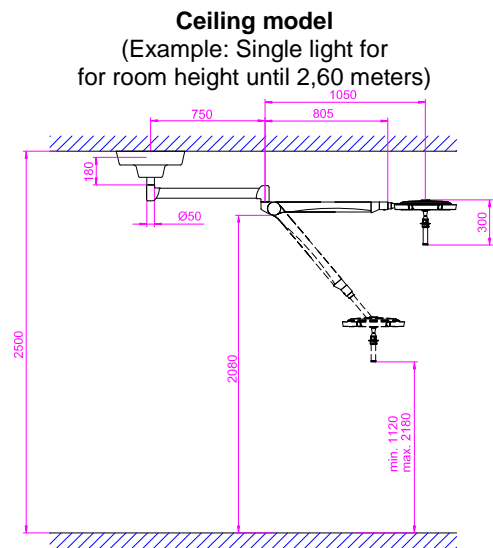
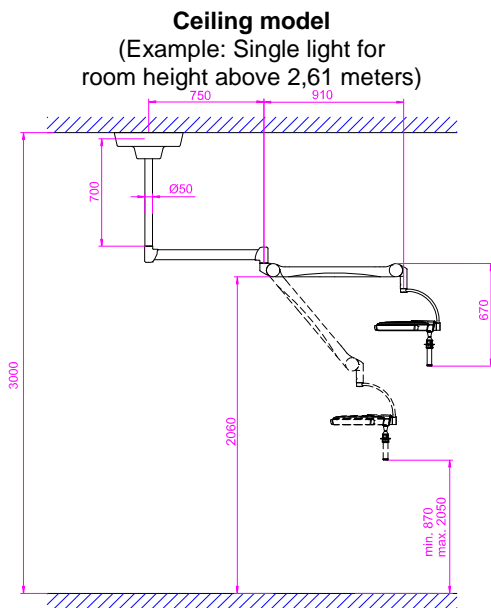


## Support arm system with height stop and option for full cardanic suspension

### Minimum clear room height for single light

Light body	Deckenmodell	Wandmodell
Mach LED 150 / 150F / 150 Plus / 150MC / 150MC P with standard spring arm	2690 mm	2690 mm
Mach LED 150 / 150F / 150 Plus / 150MC / 150MC P with central spring arm	2440 mm	2320 mm

### Technical drawings

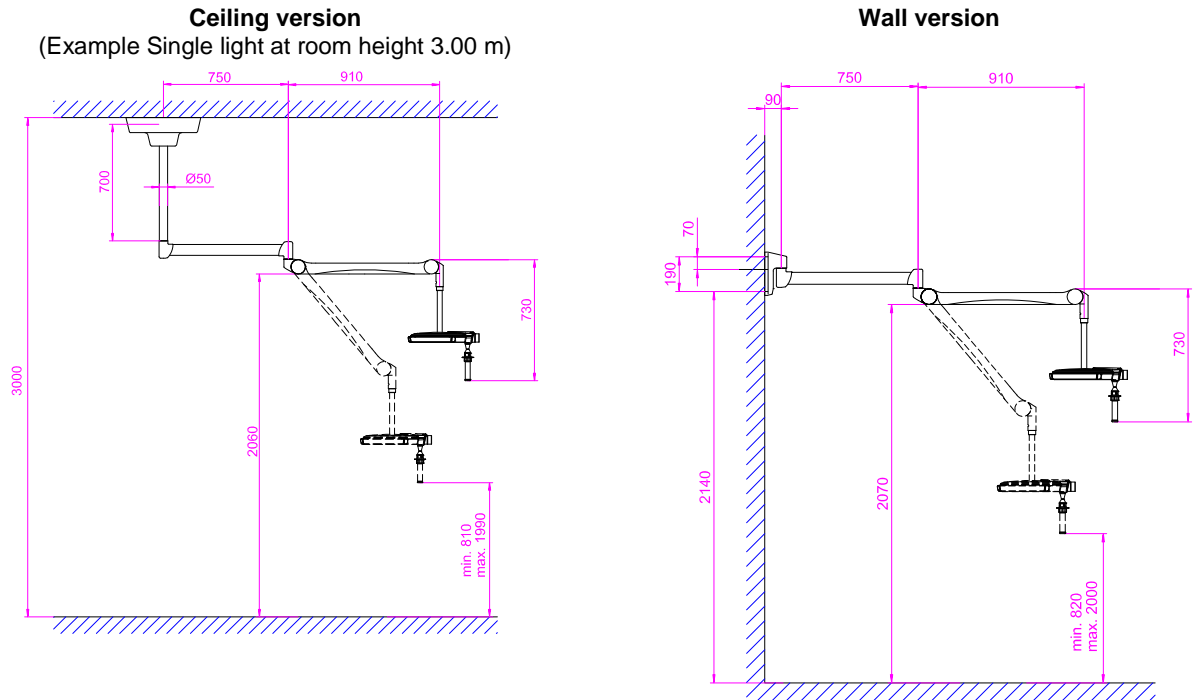


## Support arm system with height stop and full cardanic suspension

### Minimum clear room height for single light

Light body	Ceiling version	Wall version
Mach LED 150 / 150F / 150 Plus / 150MC / 150MC P	2750 mm	2750 mm

### Technical drawings



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Subject to technical modification

