

HEALTH FIT & SPORT

A VOTRE SERVICE DEPUIS 1995

CATALOGUE PRODUITS

ÉCLAIRAGE OPÉRATOIRE LED

Lampes et systèmes pour blocs opératoires.

Éclairage et configurations de salle.

Route de Taillepied 44

1095 Lutry, Suisse

direction@healthsport.ch

+41 21 903 57 67

healthsport.ch

MICARE MED ICAL

Since 2005

"Light" is one of the most important elements in an operating theater.
It has a great influence on the course of an operation and is essential for every successful procedure.
But every situation, every tissue and every user is differen
Light that is versatile enough to illuminate every situation and everything that you use is essential.







LAMINAR AIR FLOW COMPLIANCY 18.5 %
"MICARE Galaxy Surgical Light"

According to DIN standard 1946-4 Laminar air flow ceilings are essential
in operating theatres to limit the levels of contaminants in the air and thus the risks of post-operative infections for patients. The vertical outflows are generated by ceiling outlets recovering the zone to be protected, and it is crucialthat surgical lights do not disturb the air flow. MCARE Galaxy surgical lights were sent to a centre of expertise in air filtration systems, in order to determine its impact on laminar flows in actual operating theatre conditions.

Furthermore, the turbulence degree is exceptionally far below the 37.5% limit of the DIN standard. Its unique design, its smooth surface and its low heat dissipation ensure an optimum
operating environment for both patients and surgeons.

Simplicity redefined



Most advanced LED technology Active Shadow Management light right

where you need it Warm white/cool white LEDs and unique high-tech lenses provide bright, even illumination. (Automatically Illumination Management) decreases the need to adjust the luminaire.

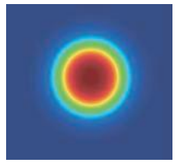
MICARE Galaxy-LED offers user-friendly simplicity and robust reliability for a wide range of surgical applications and clinical settings such as ambulatory surgery centers. It is designed to align with evolving standards for riskmanagement.

With GALAXY-LED you are prepared for any situation in the OR , regardless of the light intensity, light field size or colour temperature required for perfect illumination. Its 72 LEDs can be controlled individually.

Effective and constant illumination No matter where you stand underneath the lighthead, the rounded, symmetrical shape of the lighthead and the large number of light sources ensure that you always have the same quality and quantity of illumination

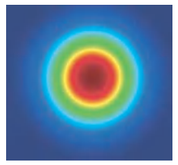


Smart Sensor
Smart sensor will detect the obstacle and increase the intensity automatically. So GALAXY LED can deliver more stabilized illumination with shadowless management



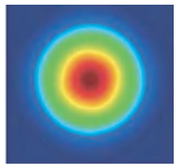
High Intensity

Focal Size 140MM



Normal Intensity

Focal Size 180-280MM



Wide Focus

Focal Size 350MM

MICARE TOUCH PRO



Allows for more advanced customization.
Settings can be saved for both users and specific specialties for 5pcs each surgery setting interface.
If necessary, they can be activated immediately.
As a result, you will save time and further increase safety. The advanced function allows you to modify important features.

Specialty- and user-specific settings already has the essential surgical specialties preset. For more individual settings, the surgeon concerned can save the specific values. These can be changed and supplemented at any time.

Allows you to select between several operating languages customized. Another advantage: in the hospital, surgeons are sometimes from different backgrounds, and can navigate more easily through the menu in their native language.



Adjust the lighting properties exactly to your preferences

Fundamental Lighting Technology for Medical Field
Exceptionally safe color reproduction – Ra 98

Color Rendering Index

(RA: 98, R9: 98, R13: 98)

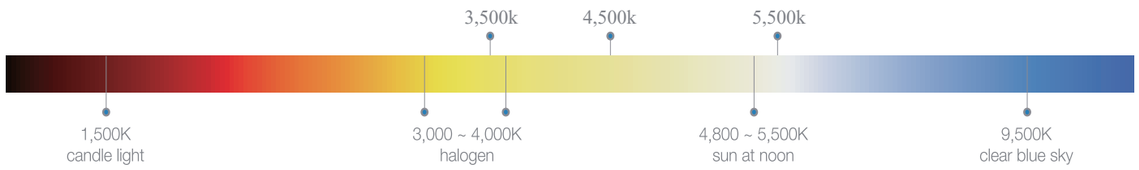
A measuring value, the color rendering index Ra, is used in order to describe the color rendering properties of light sources. This index indicates show the colors will be reflected under the respective light source in comparison with the color reproduction in natural daylight. The highest Ra value is identified with the number 100-Ra,100 means that all the colors so fan objects are perceived as in natural daylight. These then appear to the viewer as "natural". The more the colorreproduction index Radeviates from 100, the worse the color on the illuminated objects are rendered. Especially R9 (Red Test color) plays a especially important role in medicine,since the differentiation of various shades of red with tissues and blood is extremely difficult



Color Temperature

(3,500K - 5,500K)

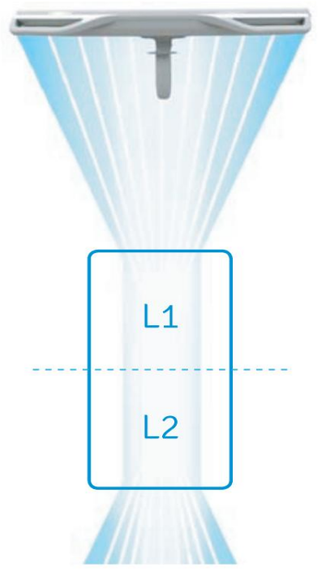
The color of a lamp is characterised by its color temperature. The object of comparison is the "black body" (made of platinum) which, when it is heated, takes very precise colors at determined temperatures. At the beginning it is dark red, then red, after that orange, then yellow, finally white, and at very hot temperatures light blue. A specific color is thus defined with an indication of the temperature in K (Kelvin) of the “black body”. The Kelvin temperature scale begins at the absolute zero point (-459,67 °F / -273 ºC).



Depth of Illumination

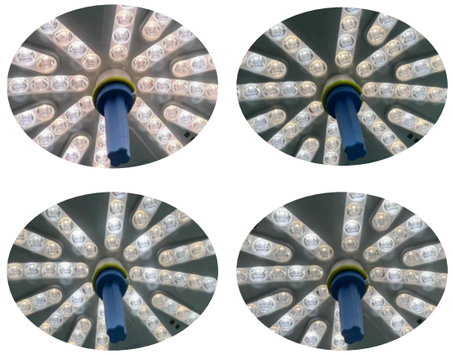
The distance between the point of maximum intensity of illumination at the center of the illuminated field (1 meter from the surface emission of light) and the detection of the value of 20% of the maximum intensity of illminazione, measuring in the direction of the emission surface (L1) that in the opposite direction (L2). These values, added together (L1 + L2), gives the depth of illumination without the need to refocus. A higher level of illumination depth is very important especially in cases of narrow and deep wound channels

MICARE GALAX-LED delivers excellent depth of illumination Ec x 60% : 85cm
Ec x 20% : 160cm



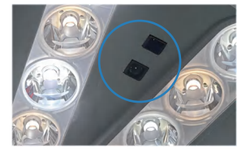
Focus Adjustment

Adjust the focus size to suit your working area to eliminate peripheral distraction.
1) Max.35cm/Min.14cm
2) 10 Stepsadjustment



Smart Sensor

Smart sensor will detect the obstacle and crack the intensity automatically. So Galaxy-LED can deliver more stabilized illumination.





Synchronized Intuitive Control

GALAXY-LED adopt touch sensor control panel which surgeon can control the light intensity, focus size and color temperature with only finger touch. The control panel is synchronized with sub-handle for the user to approach the control panel easily during the surgery. Also quick controller on central grip will help surgeons to concentrate on surgery.



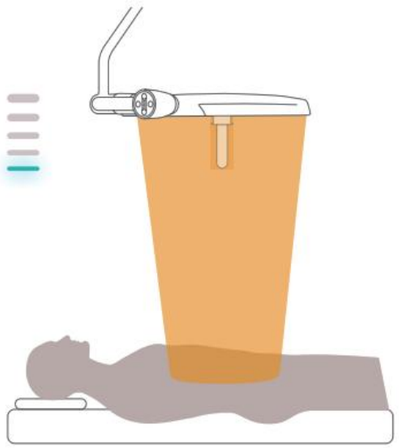


Enhance visibility and
diagnostic capabilities
by selecting your preferred lighting option.

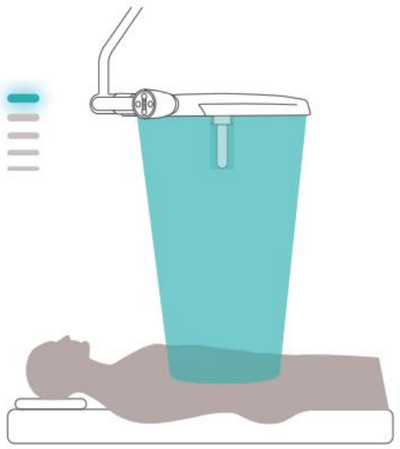
MICARE Galaxy Surgical Light
Risk management

Enhance visibility and diagnostic capabilities by selecting your preferred lighting option.
You have the flexibility to choose between fixed or adjustable color temperatures,
offering two distinct choices of warm and cool white light to suit your preferences.

MICARE Galaxy-LED is outfitted with a sterilizable handle capable of enduring up to 350 cleanings, creating a consistently hygienic and secure surgical environment. MICARE Galaxy's sleek and smoothly contoured surfaces, devoid of visible screws, facilitate effortless cleaning and disinfection.



Warm color temperature



Cold color temperature



The future of OR lighting is here.

Medical professionals know it’s vital to create the optimal environment for today’s complex procedures — and the foundation of that environment is brilliant lighting and the tools that help OR and critical care teams see more.

TECHNICAL DATA SHEET



Model Number	E700/700	E700	E700L
Working Voltage	95V - 245V, 50/60HZ	95V - 245V, 50/60HZ	95V - 245V, 50/60HZ
Light Intensity At EC (1M)	40,000 - 160,000 / 40,000 - 160,000 Lux	40,000 - 160,000	40,000 - 160,000
Light Intensity Control	0 - 100%	0 - 100%	0 - 100%
Color Temperature (5Steps)	3,500 / 4,000 / 4,500 / 5,000 / 5,500K	3,500 / 4,000 / 4,500 / 5,000 / 5,500K	3,500 / 4,000 / 4,500 / 5,000 / 5,500K
Color Rendering Index RA / R9 / R13	98 / 98 / 98	98 / 98 / 98	98 / 98 / 98
Lamp Head Diameter	740 / 740MM	740 / 740MM	740 / 740MM
LED Quantity	72 / 72PCS	72 / 72PCS	72 / 72PCS
Adjustable light field size	140 - 350 / 140 - 350 MM	140 - 350MM	140 - 350MM
LED Life Span	80,000Hrs	80,000Hrs	80,000Hrs
Total Rediant Flux Density	364 - 500W/㎡	364 - 500W/㎡	364 - 500W/㎡
Endoscopy Ambiants LEDs	White + Yellow Remix (8pcs) / White + Yellow Remix (8pcs)	White + Yellow Remix (8pcs)	White + Yellow Remix (8pcs)
Light Intensity For Endo Mode	10% / 10%	10%	10%
Temperature At Surgeon's Head	≤1℃	≤1℃	≤1℃
Illumination Depth For L1+L2 at 20%	1600MM	1600MM	1600MM
Illumination Depth For L1+L2 at 60%	850MM	850MM	850MM
Protection Rating	IP54X	IP54X	IP54X
Operating Element	9” LCD Touch Screen	9” LCD Touch Screen	9” LCD Touch Screen
Rotating Angle Height Adjustment	360°, +45°/-50°, 1100MM	360°, +45°/-50°, 1100MM	360°, +45°/-50°, 1100MM
User-specific settings	5 Surgeons For Each Surgery	5 Surgeons For Each Surgery	5 Surgeons For Each Surgery
AIM (Automatically Illumination and shadowless managent system)	Standard	Standard	Standard
Synchronize Control	Optional	Optional	Optional
Battery Back Up Optional	4-6 HRS	4-6 HRS	4-6 HRS
UPS Uninterruptible Power Supply Optional	4 HRS	4 HRS	4 HRS
Sony Internal Camera 20X	Optional	Optional	Optional
22" / 27" / 32" Medical Monitor with record system	Optional	Optional	Optional

INTELLIGENT LIGHTING+CAMERA

Communication and information nowadays play a vital role in many surgical, endoscopic and other imaging interventions and procedures. Specifically, digital image documentation of surgical procedures and live operations are increasingly gaining importance.

SONY Cam from MICARE gets you directly in touch with what’s happening in the OR – live. In conjunction with our MICARE operating light generation, the digital camera system offers you everything you need for visualization and image transmission of entire surgical procedures.
You have the choice.

Why the MICARE Surgical Light is the right choice:

- Zoom 20X Optical X 10X Digital
- Image rotation (“light head” version only)
- Manual focus and auto-focus
- Manual and automatic shutter
- Servomotorized image erection function, remote-controllable (only in the light head)
- White balance
- On separate arm or integrated into light head



Image sensor	1/3" CMOS
Number of pixels	1920 x 1080 / 3840 x 2160
Effective pixel number approx.	2,000,000 / 8,300,000
Signal system Standard:	1080P / 2160P / 50 Hz
Aspect (height-to-width) ratio	16 : 9
Signal-to-noise ratio (SNR)	> 50 dB
Zoom	20x optical / 12x digital
Focal length (zoom lens)	f = 5.1 mm to 51 mm
Shutter	1/2 bis 1/10.000 s
White balance automatic	
Power requirements: control unit / camera	100–240 V, 50/60 Hz / 6–12 V DC
Wall socket connector standard 3 x BNC socket for video signal	
1 x multiple DIN socket for control signals	
Resolution	1920 x 1080 pixels excellent
Contrast	16:9

Technical data TFT monitors (3840 x 2160P 4K Solution Optional)

Product	Features	Signals/Interfaces Outputs	Signals/Interfaces Inputs
Radiance 22“ （w/o fiber-optic input)	Resolution 1920 x 1080, response time 5–12 ms Types of voltage 24 VDC High-quality endoscopy display with HD-SDI interface PIP (picture-in-picture) mode and other features	1x DVI-D loop (DVI socket) 1x S-video loop (mini DIN) 1x HD-SDI loop (BNC)	1x DVI-I (DVI socket) 1x DVI-D (DVI socket) 1x VGA (D-sub, 15-pole) 1x S-video (mini DIN) 1x S-video (2x BNC) 1x composite color video signal (BNC) 1x YPbPr (3x BNC) 1x RGBS (3x BNC) 2x HD-SDI (BNC) 1x RS232 (D-sub, 9-pole)

Product	Features	Signals/Interfaces Outputs	Signals/Interfaces Inputs
Radiance 24“ (with fiber-optic input)	Resolution 1920 x 1080, response time 5–12 ms Types of voltage 24 VDC High-quality endoscopy display with HD-SDI interface PIP (picture-in-picture) mode and other features with LWL interface	1x DVI-D loop (DVI socket) 1x S-video loop (mini DIN) 1x HD-SDI loop (BNC)	1x DVI-I (DVI socket) 1x DVI-D (DVI socket) 1 x DVI via fiber optic 1x VGA (D-sub, 15-pole) 1x S-video (mini DIN) 1x S-video (2x BNC) 1x composite color video signal (BNC) 1x YPbPr (3x BNC) 1x RGBS (3x BNC) 2x HD-SDI (BNC) 1x RS232 (D-sub, 9-pole)



GALAXY-LED
Performance that doesn’t cost the earth



GALAXY-LED embodies MICARE’s environmental policy, which aims to minimise the environmental impact of its products by using sustainable resources for product development and manufacturing processes.

MICARE is actively committed to a sustainable development policy that will respect and preserve our environment. Our aim is to implement processes and use technologies that have a low impact on the environment and ecosystems. A number of tangible actions in the design, development and manufacturing of GALAXY-LED reflect this approach. Ninety percent of GALAXY-LED is made from aluminium, a material that can be recycled indefinitely, reducing the usage of raw materials. The compact packaging reduces the amount of materials and waste, and optimised transport keeps CO2 emissions to a minimum. The use of LED light sources cuts energy consumption considerably, and makes further savings through their long service life and minimal maintenance costs.

QUALITY CERTIFICATES & STANDARD

IEC 60601-1:2005 + A1:2012 + A2:2020& EN 60601-1:2006 + A1:2013 + A2:2021
IEC 60601-1 Clause 14 PEMS + Software Evaluation
IEC 60601-2-41:2021 EN IEC 60601-2-41:2021+CSA C22.2 NO. 60601-2-41:23
IEC 62471:2006 EN 62471:2008
IEC 60601-1-6:2010 + A1:2013 + A2:2020
IEC 62366-1:2015 + A1:2020
EN 60601-1-6:2010 +A1:2015 + A2:2021
EN 62366-1:2015 + A1:2020+CAN/CSA C22.2No. 60601-1-6
ISO13485:2016 / ISO9001:2015
Anexo II + III del reglamento (UE) 2017/745 the requirements of the European Directive

**THE
BRILLIANT SIDE
OF MEDICAL LIGHTING**

MULTI-COLOR PLUS LED OPERATING LIGHT

FLEXIBLE IN COLOR OPTIONAL



EXCELLENT SHADOW CONTROL

Dynamic Obstacle Compensation offers a unique Auto Shadow Management function (ASM) which automatically detects and corrects the shadow and light intensity above the surgeon's head.

FULL HD SONY CAMERA CONTROL

Camera offers multimedia and interactive communication (option)
With Greater Zoom , 30X for Optical zoom and 12X for digital zoom

STREAM LINE DESIGN

Suitable for laminar flow ceiling, Laminar Air Flow Compliance 19.7%



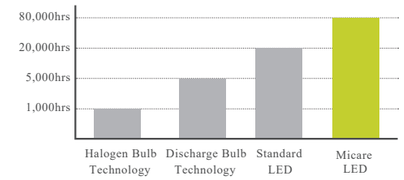
Flexible Choice For Surgeries

Multiple LCD Touch Screen In One Button Quickly Control For General Practice,
Orthopedics Surgery, Heart Surgery, Urological surgery, Surficial surgery and Deep Surgery

360°Rotating Arm

The horizontal rotation of 360°makes this process easier and offers even greater mobility

LONG SERVICE LIFE



Ambients Endo Lighting

Endo Light Mode offers both of desired minimum illumination in a dark OR environment and viewing screen-image comfort in all kinds of practical MIS surgical needs for surgical teams.

MODULAR LAMP

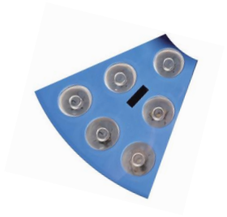
Low maintenance requirement due to modular lamp inside

Sterilization Handles With Manual Focusing

Users can easily control the light at any position and focusable

Optional Accessories Parts

Smart Sensor For Shadow Control



Emergency Batteries Back Up (8-10hrs)



Medical Uninterruptible Power Supply (UPS)



Sony Full HD Camera 1920*1080P



Control Mode

4.3" Key Board Panel



4.3"LCD Touch Screen

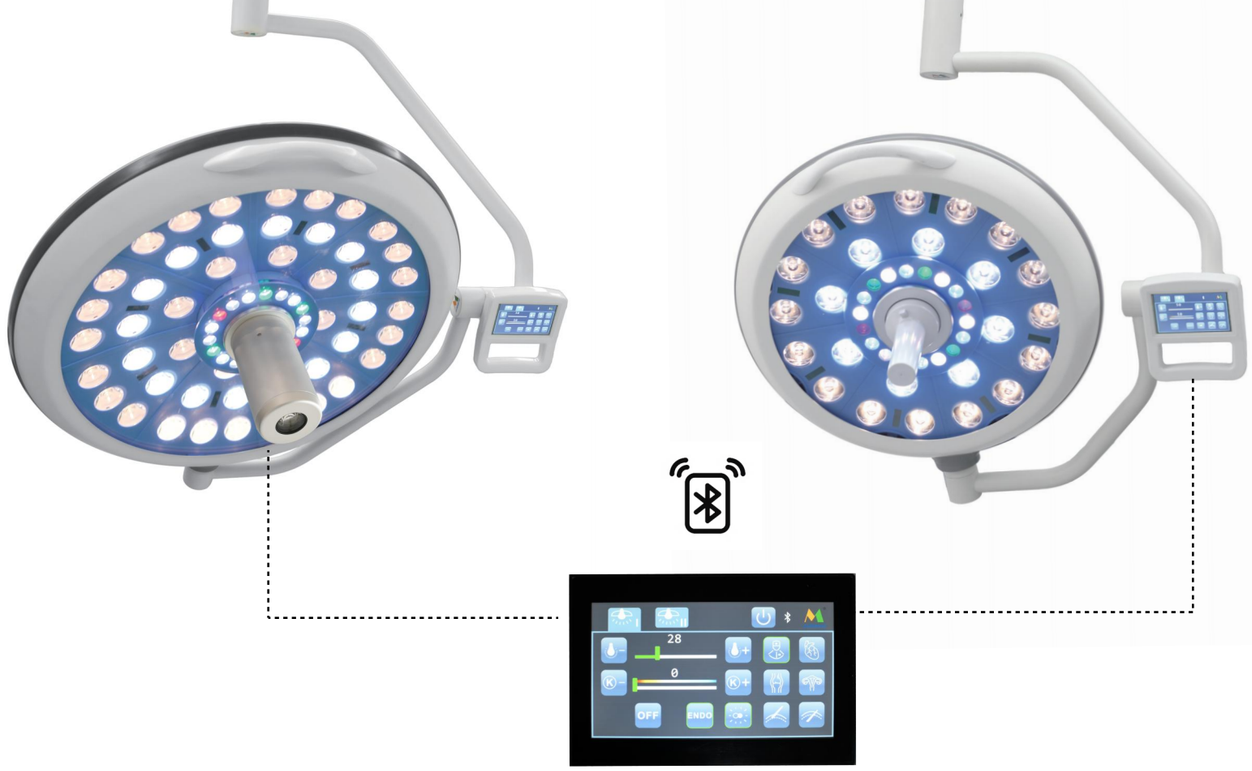


10" Wall Mounted Control



Wireless Remote Control





Connect By Bluetooth, Synchronize
Control For 2Domes

Quickly Choice For Difference Surgery



SYN — Synchronized Control (One controller can control the other at the same time)

Illumination Intensity
(Stepless Adjustment 0-100%)

Color Rendering Index: RA: 96, R9: 98

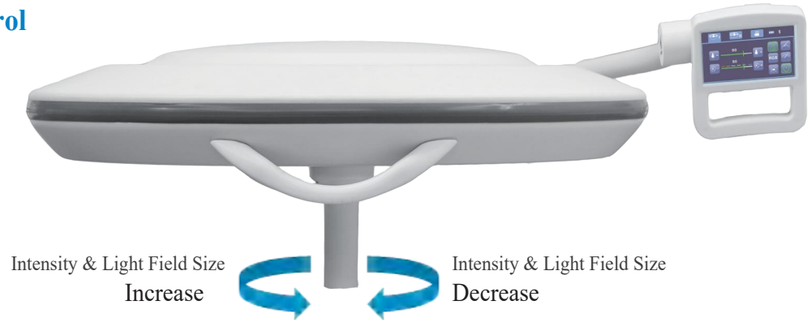
Color Temperature
(Stepless Control 3,500 - 5,700K, 0-100%)

THERMAL MANAGEMENT:
Temperature at the rear surface of the light head <1°C

ENDO — Endo Mode: Suitable For Endo-Surgery
by one click, Green + Red Ambient LEDS

Sterilization Handles Available For Focusable

Handle Control

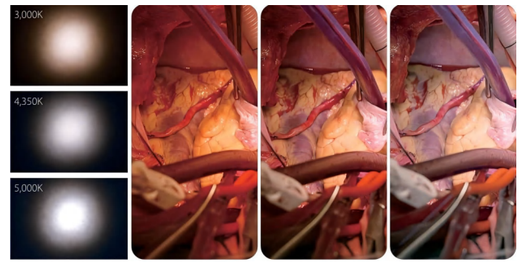


Intensity & Light Field Size
Increase

Intensity & Light Field Size
Decrease

ARM Control Panel

- Surgical Light Control (Sync)
  Light ON/OFF
  Intensity, Color Temp.
  Endo Mode, Surgery Mode,
- Camera Control:
  Optical Zoom Change 0-30X
- Setting Mode:
  Program Maintenance





TECHNICAL DATA SHEET



Model No	E700/700	E700/500	E500/500
Voltage	95V - 245V，50/60HZ	95V - 245V，50/60HZ	95V - 245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000 - 180,000Lux/60,000 - 180,000Lux	60,000 - 180,000Lux/40,000 - 160,000Lux	40,000 - 160,000Lux/40,000 - 160,000Lux
Control Of Light Intensity	0 - 100% Stepless Control	0 - 100% Stepless Control	0 - 100% Stepless Control
Lamp Head Diameter	700MM / 700MM	700MM / 500MM	500MM / 500MM
Quantity Of LEDS	66pcs / 66 Pcs	66pcs / 42 Pcs	42pcs / 42 Pcs
Color Temperature Adjustable	3,500K - 5,700K(Stepless Control)	3,500K - 5,700K(Stepless Control)	3,500K - 5,700K(Stepless Control)
Color rendering index RA	96	96	96
Color rendering index R9	98	98	98
Color rendering index R13	99	99	99
Focusable light field size	16-28CM / 16-28CM	16-28CM / 18-26CM	18-26CM / 18-26CM
Total rediant flux density	364W/m2-500W/m2	364W/m2-500W/m2	364W/m2-500W/m2
Endoscopy Mode Ambients LEDS	Green + Red	Green + Red	Green + Red
Endoscopy Mode LEDS	18pcs / 18pcs	18pcs / 18pcs	18pcs / 18pcs
LED service life	80,000Hrs	80,000Hrs	80,000Hrs
Main Material & Protection	Aluminum, IP54	Aluminum, IP54	Aluminum, IP54
Depth of illumination L1+L2 at 20%	1600	1500	1400
Depth of illumination L1+L2 at 60%	850	800	750
Temperature increase in head area	1℃		
Arm adjustment & Rotating Angle	UP +45°, Down -50° 1100MM 360°		
Surgery Mode Choice In One Button	General Practice, Cardiac surgery, orthopedic surgery, urological surgery, Suficial Surgery, Deep Surgery		
Operating Element	Touch Panel (Standard)		
Dynamic Obstacle Compensation	Optional		
Synchronization Control	Optional		
4.3" LCD Touch Screen	Optional		
10" Wall Mounted Control	Optional		
Remote Wireless Control	Optional		
Back Up Battery (8-10hrs)	Optional		
Medical Uninterruptible Power Supply	Optional		
Internal/External Sony Camera (30X)	Optional		
Medical Monitor With Extra Arm	22" / 27" / 32"		

TECHNICAL DATA SHEET



Model No	E700	E700L	E500	E500L
Voltage	95V - 245V，50/60HZ	95V - 245V，50/60HZ	95V - 245V，50/60HZ	95V - 245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000 - 180,000Lux	60,000 - 180,000Lux	40,000 - 160,000Lux	40,000 - 160,000Lux
Control Of Light Intensity	0 - 100% Stepless Control	0 - 100% Stepless Control	0 - 100% Stepless Control	0 - 100% Stepless Control
Lamp Head Diameter	700MM	700MM	500MM	500MM
Quantity Of LEDS	66 Pcs	66 Pcs	42 Pcs	42 Pcs
Color Temperature Adjustable	3,500K - 5,700K(Stepless Control)	3,500K - 5,700K(Stepless Control)	3,500K - 5,700K(Stepless Control)	3,500K - 5,700K(Stepless Control)
Color rendering index RA	96	96	96	96
Color rendering index R9	98	98	98	98
Color rendering index R13	99	99	99	99
Focusable light field size	16-28CM	16-28CM	18-26CM	18-26CM
Total rediant flux density	364W/m2-500W/m^2	364W/m2-500W/m^2	364W/m2-500W/m^2	364W/m2-500W/m^2
Endoscopy Mode Ambients LEDS	Green + Red	Green + Red	Green + Red	Green + Red
Endoscopy Mode LEDS	18pcs	18pcs	18pcs	18pcs
LED service life	80,000Hrs	80,000Hrs	80,000Hrs	80,000Hrs
Main Material & Protection	Aluminum, IP54	Aluminum, IP54	Aluminum, IP54	Aluminum, IP54
Depth of illumination L1+L2 at 20%	1600	1600	1500	1500
Depth of illumination L1+L2 at 60%	850	850	800	800
Temperature increase in head area	1℃			
Arm adjustment & Rotating Angle	UP +45°, Down -50° 1100MM 360°			
Surgery Mode Choice In One Button	General Practice, Cardiac surgery, orthopedic surgery, urological surgery, Suficial Surgery, Deep Surgery			
Operating Element	Touch Panel (Standard)			
Dynamic Obstacle Compensation	Optional			
Synchronization Control	Optional			
4.3" LCD Touch Screen	Optional			
10" Wall Mounted Control	Optional			
Remote Wireless Control	Optional			
Back Up Battery (8-10hrs)	Optional			
Medical Uninterruptible Power Supply	Optional			
Internal/External Sony Camera (30X)	Optional			
Medical Monitor With Extra Arm	22" / 27" / 32"			

FULL WHITE LEDS OPTIONAL



State-of-the-art lighting technology combined with profound know-how

MICARE employs advanced LED technology in both the lens and reflector systems. This creates a broad, pure, and homogeneous color spectrum, resulting in brilliant and shadow-free light at the same time.

Adjustable color temperature for a comfortable working environment

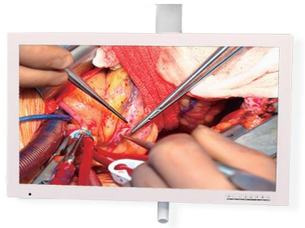
Our MICARE Light lens system allows the color temperature to be adjusted to create optimal contrast and an ideal display of color-sensitive tissue areas. In addition, the high light quality of both systems ensures that eye fatigue is noticeably reduced and lets the user concentrate for a prolonged period of time.

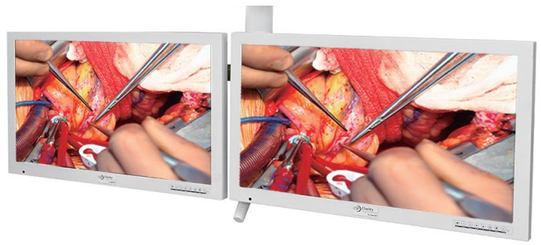
Practical handling

The unique MICARE Light design provides an unbeatable operating concept that is appreciated by surgeons around the globe. The central handle can be sterilized, making it easy to operate and adjust essential functions during surgery. In addition, the surgical light can be easily connected to a wall terminal.

OPTIMAL ILLUMINATION OF YOUR SURGICAL SITUATION

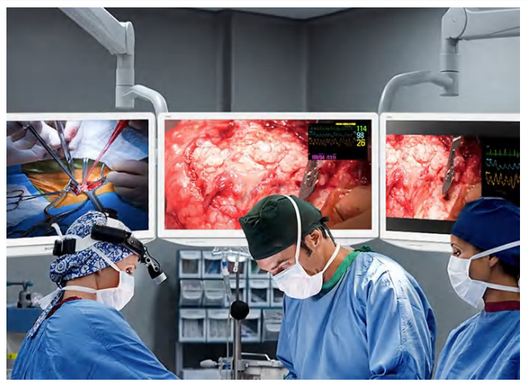
Advanced documentation is modern medicine





Technical data TFT monitors
Integrated Recording And Storage System

Product	Features	Signals/Interfaces Outputs	Signals/Interfaces Inputs
Radiance 22“ (w/o fiber-optic input)	Resolution 1920 x 1080, response time 5–12 ms Types of voltage 24 VDC High-quality endoscopy display with HD-SDI interface PIP (picture-in-picture) mode and other features	1x DVI-D loop (DVI socket) 1x S-video loop (mini DIN) 1x HD-SDI loop (BNC)	1x DVI-I (DVI socket) 1x DVI-D (DVI socket) 1x VGA (D-sub, 15-pole) 1x S-video (mini DIN) 1x S-video (2x BNC) 1x composite color video signal (BNC) 1x YPbPr (3x BNC) 1x RGBS (3x BNC) 2x HD-SDI (BNC) 1x RS232 (D-sub, 9-pole)
Radiance 27“ (w/o fiber-optic input)	Resolution 1920 x 1080, response time 5–12 ms Types of voltage 24 VDC High-quality endoscopy display with HD-SDI interface PIP (picture-in-picture) mode and other features	1x DVI-D loop (DVI socket) 1x S-video loop (mini DIN) 1x HD-SDI loop (BNC)	1x DVI-I (DVI socket) 1x DVI-D (DVI socket) 1x VGA (D-sub, 15-pole) 1x S-video (mini DIN) 1x S-video (2x BNC) 1x composite color video signal (BNC) 1x YPbPr (3x BNC) 1x RGBS (3x BNC) 2x HD-SDI (BNC) 1x RS232 (D-sub, 9-pole)







Compatible with the Latest Generation of Cameras

The MICARE MULTI-COLOR LED PLUS Surgical Light can be directly connected to the innovative and delay-free SONY Internal Camera System via the handle unit interface, providing brilliant recordings in full HD. Individual images for documentation purposes are possible using the snapshot function. Benefits of wireless technology: ability to install and/or upgrade this system at no additional cost or the need for complex video cabling. In addition, it can be controlled from the mobile tablet or wallmounted operating panel.



The SONY 20X/30X Internal Camera provides excellent image quality and encrypted transfer provides maximum data security

TruConnect OR Integration System: Intelligently Linked

The MICARE Surgical Light is compatible with the innovative OR Integration System by MICARE Medical. The management and training system enables you to operate different MICARE Medical OR devices. This comprises lights, tables and cameras – even under sterile conditions. With MICARE OR Integration System Wall Control, you do not need any other remote control devices.

Instead, intuitive, mobile control of the integrated components is possible via the user interface on the tablet, including graphical feedback. The flexible app concept enables the MICARE OR Integration System to be individually extended with the addition of devices and functionalities and combined with other MICARE Medical solutions.



MICARE LIGHTING

PUSHING TECHNOLOGY TO EXCELLENCE

MAX-LED Hybrid Room OR Light

—

UNIQUE DESIGN FOR IDEAL LIGHTING

Demanding tasks require special solutions. With the innovative MAX-LED surgical lights we give you all the benefits of cutting-edge LED technology, in an uniquely effective way. MICARE offers trendsetting light and system solutions that can be retrofitted easily and without special preparation. This includes, for example, the wireless equipping of your surgical lights with cameras.

MAX INNOVATIVE & DIFFERENT







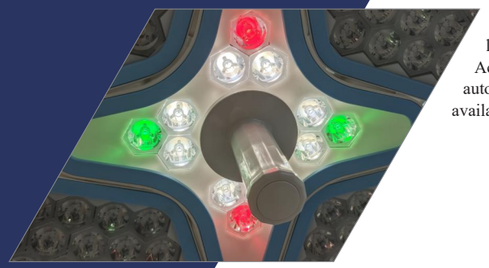






High quality LEDs

with the lowest infrared or ultraviolet emissions, protects the patient from drying out of the tissue and provides a high quality working condition with the constant high-class lighting temperature to the operator.



Active Shadow Management

light precisely where you need it with MAX-LED Active Shadow Optional Management is a fully automatic system for ensuring that light is always available exactly where it is needed.



Perfect and even illumination

can be adjusted for any situation 112PCS powerful LEDs ensure that the surgical site always appears in the best light, literally. The conditions for a successful procedure are always ideal.

MAX-beam path for maximum variability

And that particularly applies to the surgical field and how it is illuminated. With its innovative beam path concept the MAX-LED offers you a previously unattainable light field size from 15 cm to 35 cm.



Your benefits at a glance:

- Warm white/cold white LEDs for brilliant, homogenous light
- Variable light field geometry and matrix light function
- Active Shadow Management for shadow-free illumination
- combined with excellent color rendering
- Maximum light field variability with innovative beam path concept
- SYNC Mode Control optional to provide easy working for 2lamps
- Wireless infrared remote control optional

MAX-TREMELY FUNCTIONAL

You have options for operating MAX-LED. The control panel on the light for setting the main functions.You can use the touch-sensitive MAX-LED controller to adjust every parameter for your specific requirements during the operation. And even better: you can set your own "personal light",the precise light settings that you prefer. You can also control all the functions of the MAX-LED camera systems without difficulty. All completely intuitive with the self-explanatory, icon-based operation of the touch screen.

Flexible Manage

4.3Inches TFT LCD Touch Screen With Functional: Light Intensity , Light Beam , Color Temperature, EndoLight Control



Ambiant Lights Balance

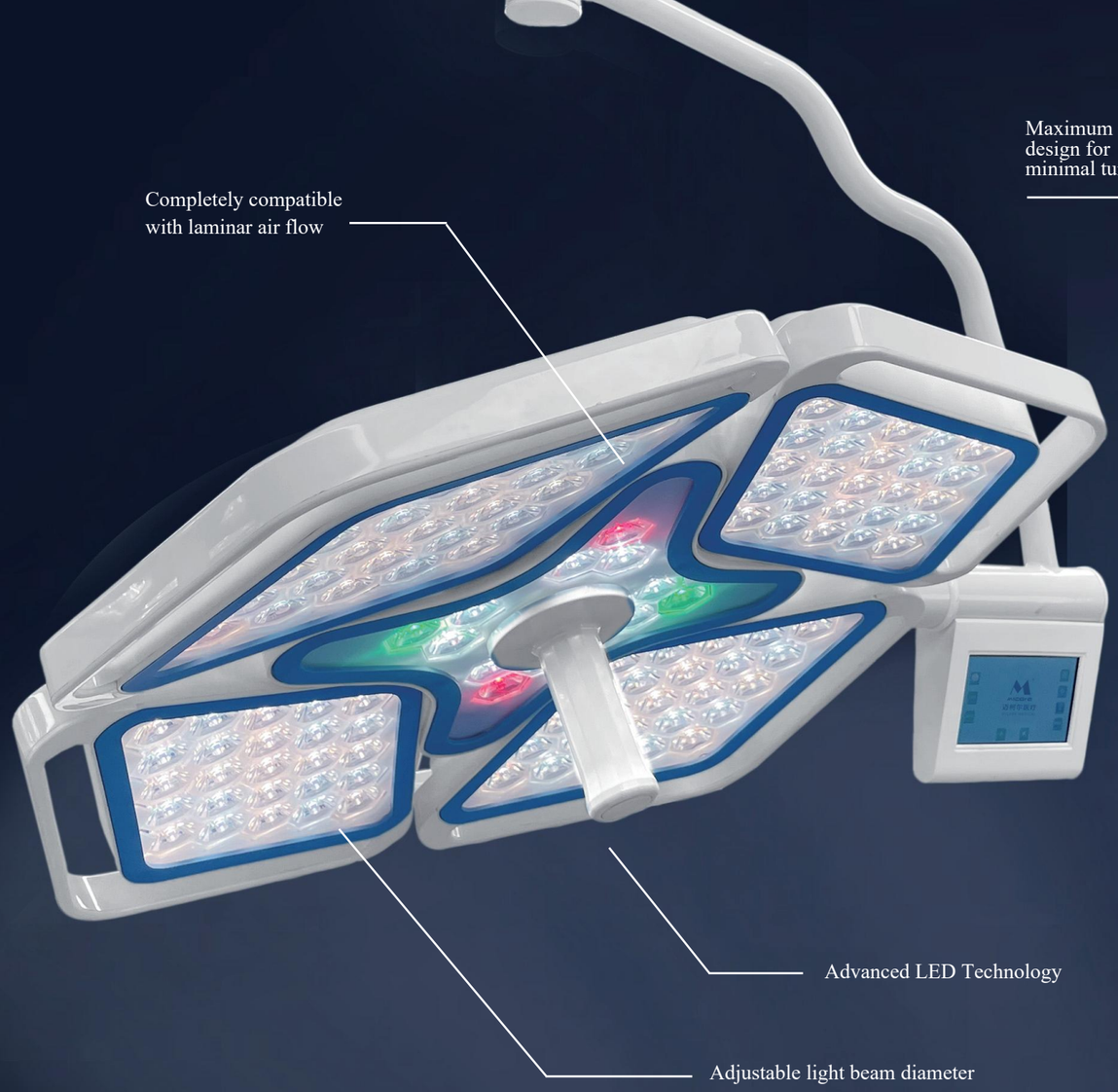
Green Ambiant in Endolight less stressful on the eyes during surgeryRed Ambiant In Endolight provides optimum visualisation of red tissues. Red balance enhancement compensates for our naturalweakness in distinguishing shades of red and is user adjustable to fine-tune the light to match our own red vision and the surgical conditions.

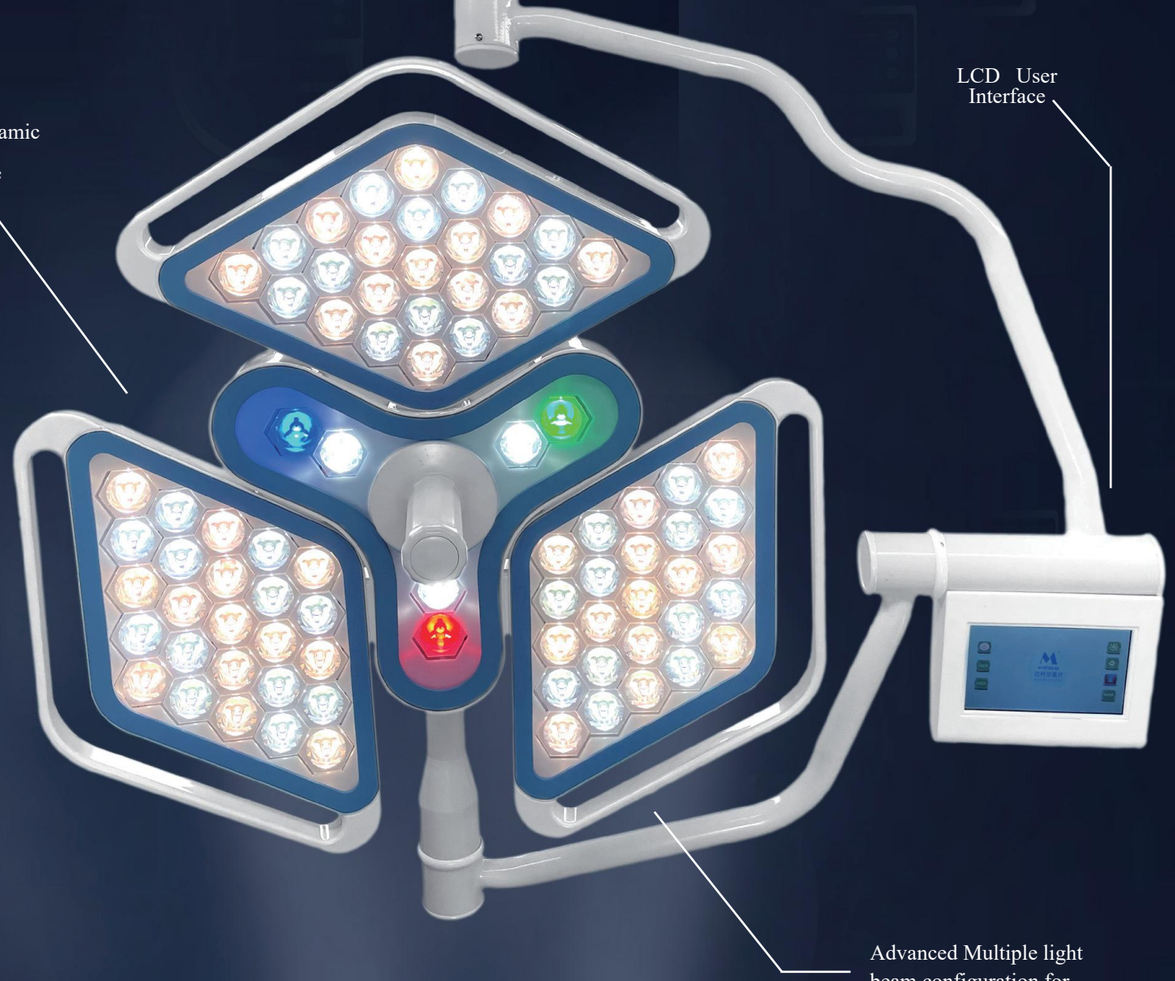


Language Customization

MAX LED support different languages customization: Spanish, French, Russian, Portuguese, Arabic, German, Italian, Japanese, Korean etc.





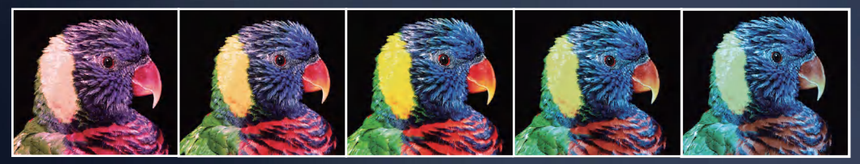


Clear Visualization For Better Results

Improved Beam Technology Quick and Comfortable Usage Special lens technology designed for surgical lighting fully compatible with LED, provides homogeneous light field; when the light field is changed, the light intensity does not change.

Multi Colours

Adjustable color control



3,000 K | 4,000 K | 4,500 K | 5,000 K | 5,800 K

MAX-LED provides adjustable color temperature to optimize visualization of red tissues.
Color temperature is variable from 3000K – 5800K.

- Multiple Light Beam Configuration for Shadowless Illumination
- Improved Beam Technology
- No flicker effect
- Quality Light
- Super Optical Performance
- 4.3” TFT LCD Touch Screen Panel
- Memory function
- Easy to clean
- Endo Mode
- Ergonomic and practical design
- Laminar Air Flow
- Quick and comfortable usage
- Extra Protection

MAX-LED TECHNICAL SHEET







Model	E700/700	E700/500	E500/500
Voltage	95-245V, 50/60HZ	95-245V, 50/60HZ	95-245V, 50/60HZ
Light Intensity at 1m (EC)	60,000-180,000/ 60,000 -180,000	60,000-180,000 / 40,000 -160,000	40,000-160,000/ 40,000 -160,000
Light Intensity Ajustable	0%-100%	0%-100%	0%-100%
Lamp Head Diameter(MM)	650/650	650/650	650/650
LED Bulb Quantity	112 + 112 PCS	112 + 82 PCS	82 + 82 PCS
Color temperature(Kelvin)	3,000 -5,800	3,000 -5,800	3,000 -5,800
Color rendering index Ra	96	96	96
Color rendering index R9	98	98	98
Spot Size Beam	150-350 / 150-350	150-350 / 120-280	120-280 / 120-280
Total Radiant Flux Density	364W/㎡	364W/㎡	364W/㎡
Endo Ambiant Lights	Green + Red	Green + Red + Blue	Green + Red + Blue
Endo Lights Quantity (PCS)	12 + 12	12 + 6	6 + 6
Light Intensity For Endo Lights	15%	12%	10%
Control Box	4.3” TFT LCD Touch Screen	4.3” TFT LCD Touch Screen	4.3” TFT LCD Touch Screen
Depth of illumination (L1+L2) @ 60 %	750MM	700MM	650MM
Depth of illumination (L1+L2) @ 20 %	1400MM	1300MM	1200MM
Class Of Protective	IP54	IP54	IP54
Main Material	Plastic	Plastic	Plastic
Rotation	540°	540°	540°
5” TFT LCD Touch Screen	Optional	Optional	Optional
Dynamic Obstacle Compensation	Optional	Optional	Optional
Back Up Rechargeable Battery	Optional	Optional	Optional
Internal Sony Camera 20X	Optional	Optional	Optional
Remote Control	Optional	Optional	Optional
LED Brand	OSRAM	OSRAM	OSRAM

MAX-LED TECHNICAL SHEET









Model	E700	E500	E700L	500L
Voltage	95-245V, 50/60HZ	95-245V, 50/60HZ	95-245V, 50/60HZ	95-245V, 50/60HZ
Light Intensity at 1m (EC)	60,000-180,000	40,000 -160,000	60,000-180,000	40,000 -160,000
Light Intensity Ajustable	0%-100%	0%-100%	0%-100%	0%-100%
Lamp Head Diameter(MM)	650	650	650	650
LED Bulb Quantity	112 PCS	82 PCS	112 PCS	82 PCS
Color temperature(Kelvin)	3,000 -5,800K	3,000 -5,800K	3,000 -5,800K	3,000 -5,800K
Color rendering index Ra	96	96	96	96
Color rendering index R9	98	98	98	98
Spot Size Beam	150-350	120-280	150-350	120-280
Total Radiant Flux Density	364W/ ㎡	364W/ ㎡	364W/ ㎡	364W/ ㎡
Endo Ambiant Lights	Green + Red	Green + Red + Blue	Green + Red	Green + Red + Blue
Endo Lights Quantity (PCS)	12	6	12	6
Light Intensity For Endo Lights	15%	12%	15%	12%
Control Box	4.3” TFT LCD Touch Screen		4.3” TFT LCD Touch Screen	
Depth of illumination (L1+L2) @ 60 %	750MM	700MM	750MM	700MM
Depth of illumination (L1+L2) @ 20 %	1400MM	1300MM	1400MM	1300MM
Class Of Protective	IP54	IP54	IP54	IP54
Main Material	Plastic	Plastic	Plastic	Plastic
Rotation	540°	540°	540°	540°
5” TFT LCD Touch Screen	Optional	Optional	Optional	Optional
Dynamic Obstacle Compensation	Optional	Optional	Optional	Optional
Back Up Rechargeable Battery	Optional	Optional	Optional	Optional
Internal Sony Camera 20X	Optional	Optional	Optional	Optional
Remote Control	Optional	Optional	Optional	Optional
LED Brand	OSRAM	OSRAM	OSRAM	OSRAM

MAX-LED-S TECHNICAL SHEET



Model	E700/700	E700/500	E500/500
Voltage	95-245V, 50/60HZ	95-245V, 50/60HZ	95-245V, 50/60HZ
Light Intensity at 1m (EC)	60,000-160,000/ 60,000 -160,000	60,000-160,000 / 40,000 -140,000	40,000-140,000/ 40,000 -140,000
Light Intensity Ajustable	0%-100%	0%-100%	0%-100%
Lamp Head Diameter(MM)	650/650	650/650	650/650
LED Bulb Quantity	82 + 82 PCS	82 + 54 PCS	54+ 54 PCS
Color temperature(Kelvin)	3,500 -5,500K	3,500 -5,500K	3,500 -5,500K
Color rendering index Ra	96	96	96
Color rendering index R9	98	98	98
Spot Size Beam	150-350 / 150-350	150-350 / 120-280	120-280 / 120-280
Total Radiant Flux Density	364W/㎡	364W/㎡	364W/㎡
Endo Ambiant Lights	Green + Red + Blue	Green + Red + Blue	Green + Red + Blue
Endo Lights Quantity (PCS)	20 + 20	20 + 6	6 + 6
Light Intensity For Endo Lights	15%	12%	10%
Control Box	4.3” TFT LCD Touch Screen	4.3” TFT LCD Touch Screen	4.3” TFT LCD Touch Screen
Depth of illumination (L1+L2) @ 60 %	750MM	700MM	650MM
Depth of illumination (L1+L2) @ 20 %	1400MM	1300MM	1200MM
Class Of Protective	IP54	IP54	IP54
Main Material	Plastic	Plastic	Plastic
Rotation	540°	540°	540°
4.3” TFT LCD Touch Screen	Optional	Optional	Optional
Dynamic Obstacle Compensation	Optional	Optional	Optional
Back Up Rechargeable Battery	Optional	Optional	Optional
Internal Sony Camera 20X	Optional	Optional	Optional
Remote Control	Optional	Optional	Optional
LED Brand	OSRAM	OSRAM	OSRAM

MAX-LED-S TECHNICAL SHEET



Model	E700	E500	E700L	500L
Voltage	95-245V, 50/60HZ	95-245V, 50/60HZ	95-245V, 50/60HZ	95-245V, 50/60HZ
Light Intensity at 1m (EC)	60,000-160,000	40,000 -140,000	60,000-160,000	40,000 -140,000
Light Intensity Ajustable	0%-100%	0%-100%	0%-100%	0%-100%
Lamp Head Diameter(MM)	650	650	650	650
LED Bulb Quantity	82 PCS	54 PCS	82 PCS	54 PCS
Color temperature(Kelvin)	3,500 -5,500K	3,500 -5,500K	3,500 -5,500K	3,500 -5,500K
Color rendering index Ra	96	96	96	96
Color rendering index R9	98	98	98	98
Spot Size Beam	150-350	120-280	150-350	120-280
Total Radiant Flux Density	364W/ ㎡	364W/ ㎡	364W/ ㎡	364W/ ㎡
Endo Ambiant Lights	Green + Red + Blue	Green + Red + Blue	Green + Red + Blue	Green + Red + Blue
Endo Lights Quantity (PCS)	20	6	20	6
Light Intensity For Endo Lights	15%	12%	15%	12%
Control Box	4.3” TFT LCD Touch Screen		4.3” TFT LCD Touch Screen	
Depth of illumination (L1+L2) @ 60 %	750MM	700MM	750MM	700MM
Depth of illumination (L1+L2) @ 20 %	1400MM	1300MM	1400MM	1300MM
Class Of Protective	IP54	IP54	IP54	IP54
Main Material				
Rotation	540°	540°	540°	540°
4.3” TFT LCD Touch Screen	Optional	Optional	Optional	Optional
Dynamic Obstacle Compensation	Optional	Optional	Optional	Optional
Back Up Rechargeable Battery	Optional	Optional	Optional	Optional
Internal Sony Camera 20X	Optional	Optional	Optional	Optional
Remote Control	Optional	Optional	Optional	Optional
LED Brand	OSRAM	OSRAM	OSRAM	OSRAM

Maximum consistent

Adaptive color temperature combined with excellent color rendering – for a very natural view

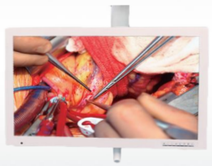
The illuminance and the color temperature can be set precisely and retained in order to create and maintain a consistent ideal light situation and mood. The color rendering index is at the top level, as impressively confirmed by the outstanding quality of the MAX-LED system

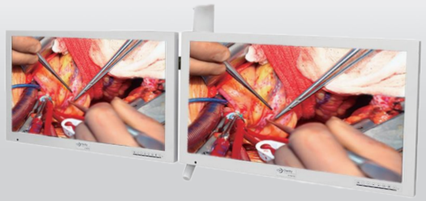
Your benefits at a glance:

- Functional slimline design of the light housing
- Light-emitting area from genuine glass
- Easy-to-clean closed housing shape – therefore extremely hygienic
- Shape optimized for flow to prevent air turbulence
- Suitable for laminar air flow systems
- IP55: complete protection from dust deposits and moisture inside

Additional Equipment and Functions







Integrated video system

Operating lights Max-LED can be equipped with video camera, fixed in the center of the light. Optionally the lights can be delivered with standard sterile, plastic handle, to be exchanged into handle with camera in the future.
Sony camera, Full 1920 x 1080/30p High Definition, adjustable from keyboard.

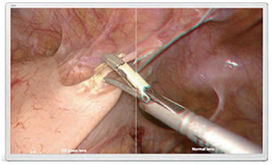
Camera Specifications	Details
Image Device	1/2.8 type Exmor™ CMOS sensor (SONY Brand)
Effective Pixels	Approx. 2 million
Digital Zoom	20X Optical Zoom, 12X Digital Zoom
Horizontal Viewing Angle	54.1° (wide end) to 2.9° (tele end)
Sync System	Internal
Electronic Shutter	1/2 to 1/10,000 s
White Balance	Auto
Focus System	Auto
Exposure Control	AE Control: Auto, Manual, Priority (shutter priority and iris priority)
Video Output	**Details**
Lens Value	20x Optical Zoom, f=4.7 mm (wide) ~ 94.0 mm (tele), f1.6 to f3.5
S/N Ratio More	More than 50 dB
Signal System	Signal System HD: 1080p/29.97, 1080p/25, 1080i/59.94, 1080i/50, 720p/50, 720p/29.97, 720p/25 SD: NTSC/PAL

High Image Quality
- Camera With 20X Optical Zoom With 1920*1080P HD Soluton
- Finely Textured Images With Clear, Sharp Cplors
- Remarkably Better Colors For Better Attention To Detail And A Brilliant Rendition

Ultra High Definition
- Exmor R Sensor - Clearer Images In Every Condition
- Twice As Sensitive As Coneventional Sensors
- Higher Image Quality In Low Light Conditions

Easy Handling
- Easy Installation And Modification Or Retrofitting Of
- Existing OR Light Sustems
- Mechanical And Electronical Image Rotation
- Fl;exible And Indepent Operation Via Remote Control
- Optional Operation Via Wall Control Unit











CONSISTENTLY TOP-NOTCH PRODUCT QUALITY

In recent years, we have developed to become one of the world‘s leading producers of hospital solutions. We operate and produce according to our philosophy “Pushing Technology to Excellence” at all times. Our work is based on three pillars: innovation, global footprint

Innovative solutions

For MICARE, innovation means adding value to the customer. MICARE prod ucts provide agreat deal of flexibility, and our numerous patents are testament to their exceptional level of technical innovation; these qualities have helped MICARE become a key company in med ical technology.

Diversification

MICARE has continuously been develop ing new and innovative products since its foundation, always in line with MICARE’s philosophy as a solution provider for the hospital with focus on the OR.

Global

As an internationally operating company, we sell in more than 90 countries-world wide.

Cooporation

Being a reliable business partner

MICARE MEDICAL WE OFFER EXCELLENCE FOR YOUR HOSPITAL



MICARE POWERLED

- Aluminum Lamp Housing
- Uniform And Round Focus
- Safety Explosion-Proof
- High Color Rendering Index
- Life Time: ≥80,000hrs

BRILLIANT BY DESIGN

The MICARE PowerLED Surgical Lighting System Provides Meaningful, Clinician-Inspired Advances To Keep Up With Life In Today's OR.

Through Thoughtful Innovation, This Future-Ready System Offers Superior Optical Performance, Laminar Airflow Design

Full Intergration To The OR Environment From Conventional To Theatre Rooms

MICARE PowerLED ensures the clearest and brightest light for surgeons, without distractions from glare.

Allows equipment to be positioned within reach of the surgeon, concealing wires and cables to improve safety and hygiene. Equip-ment can be easily added, removed and upgraded to meet future requirements.

Thanks to MICARE Power LED High-quality illumination helps to relieve strain, Comfort Light feature, improves visual performance, reduces the sensation of glare and increases the feeling of wakefulness leading to a better working environment

Micare PowerLED 700/500
Evolving Design,
Revolutionary Features

Near Perfect Colour Rendition with
white and yellow LEDS mix
For the best visualisation of tissue during surgery.

Widely Beam Technology From 15CM-35CM
The largest light beams of any current product
with high intensity across the full beam width.

Unique Comfort
A soft illumination of light to reduce eye strain
from high contrasts of light intensity.





Designed to Minimise Infections
Easy to clean, sealed light head, remote controls
and anti-microbial coatings.

HDI-SDI Camera Optional, Integrated cameras are fully
enclosed inside the light head, records for risk,
management, and optimize understanding and learning.

Maximum illumination up to 160,000 lux
Stable and constant illumination
Enhanced visibility, diagnosis and treatment



Endoscopy Mode In Deep Illumination
For Various Operation Enviromental



Astro Space Design, Working seamlessly
with laminar airflow solutions



Removable Sterilizaer Handle Can Be
Easily For Internal Camera



4.3INCHES LCD Touch Panel Optional
(OEM With LOGO Print Available)

TECHNICAL SHEET







MICARE PowerLED Model	E700/700	E700/500	E500/500
Voltage	95~245V，50/60HZ	95~245V，50/60HZ	95~245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000-160,000/60,000-160,000	60,000-160,000/40,000-140,000	40,000-140,000/40,000-140,000
Brightness Adjustable	0-100%	0-100%	0-100%
Lamp Head Diameter	700MM/700MM	700MM/500MM	500MM/500MM
Quantity Of LEDS	80PCS/80PCS	80PCS/48PCS	48PCS/48PCS
Color Temperature Adjustable	3800-5500K	3800-5500K	3800-5500K
Color rendering index Ra	96	96	96
Color rendering index R9(Red)	98	98	98
Light Field Size Adjustable	150-350MM/150-350MM	150-350MM/120-280MM	120-280MM/120-280MM
Total rediant flux density	364W/m2	364W/m2	364W/m2
Endoscopy Mode	YES	YES	YES
Endoscopy Mode LEDS	8PCS/8PCS	8PCS/8PCS	8PCS/8PCS
Illumination For Endo-Mode	10%	15%	18%
LED service life	80,000hrs	80,000hrs	80,000hrs
Main Material	Aluminum	Aluminum	Aluminum
Rotating Angle Of Arm	>540°	>540°	>540°
LED Bulb Power	1w Each Pc	1w Each Pc	1w Each Pc
Input Power	400w	400w	400w
Operating element	Touch Control	Touch Control	Touch Control
Light head protection rating	IP54+FireProof	IP54+FireProof	IP54+FireProof
Depth of illumination L1+12	1400MM	1200MM	1100MM
Lamp weight	700+700=52KGS	700+500=49KGS	500+500=46KGS
Packing	3 Wooden Cartons	3 Wooden Cartons	3 Wooden Cartons
LCD Touch Screen	Optional	Optional	Optional
Back Up Battery (4-6hrs)	Optional	Optional	Optional
Shadow Compensation Function	Optional	Optional	Optional
Internal/External Sony Camera(20X)	Optional	Optional	Optional
Monitor With Extra Arm(22 Inches)	Optional	Optional	Optional
LED Bulb Diameter	20MM	20MM	20MM

TECHNICAL SHEET





MICARE PowerLED Model	E700	E500
Voltage	95~245V，50/60HZ	95~245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000-160,000	40,000-140,000
Brightness Adjustable	0-100%	0-100%
Lamp Head Diameter	700MM	500MM
Quantity Of LEDS	80PCS	48PCS
Color Temperature Adjustable	3800-5500K	3800-5500K
Color rendering index Ra	96	96
Color rendering index R9(Red)	98	98
Light Field Size Adjustable	150-350MM	120-280MM
Total rediant flux density	364W/m2	364W/m2
Endoscopy Mode	YES	YES
Endoscopy Mode LEDS	8PCS	8PCS
Illumination For Endo-Mode	10%	18%
LED service life	80,000hrs	80,000hrs
Main Material	Aluminum	Aluminum
Rotating Angle Of Arm	>540°	>540°
LED Bulb Power	1w Each Pc	1w Each Pc
Input Power	400w	400w
Operating element	Touch Control	Touch Control
Light head protection rating	IP54+FireProof	IP54+FireProof
Depth of illumination L1+12	1400MM	1100MM
Lamp weight	700+700=52KGS	500+500=46KGS
Packing	3 Wooden Cartons	3 Wooden Cartons
LCD Touch Screen	Optional	Optional
Back Up Battery (4-6hrs)	Optional	Optional
Shadow Compensation Function	Optional	Optional
Internal/External Sony Camera(10X)	Optional	Optional
Monitor With Extra Arm(21 Inches)	Optional	Optional
LED Bulb Diameter	20MM	20MM









TECHNICAL SHEET



MICARE PowerLED Model	E700L(Battery Optional)	E500L(Battery Optional)
Voltage	95~245V，50/60HZ	95~245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000-160,000	40,000-140,000
Brightness Adjustable	0-100%	0-100%
Lamp Head Diameter	700MM	500MM
Quantity Of LEDS	80PCS	48PCS
Color Temperature Adjustable	3,800-5,500K	3,800-5,500K
Color rendering index Ra	96	96
Color rendering index R9(Red)	98	98
Light Field Size Adjustable	150-350MM	90-260MM
Total rediant flux density	364W/m2	364W/m2
Endoscopy Mode	YES	YES
Endoscopy Mode LEDS	8PCS	8PCS
Illumination For Endo-Mode	10%	18%
LED service life	80,000hrs	80,000hrs
Main Material	Aluminum	Aluminum
Rotating Angle Of Arm	>540°	>540°
LED Bulb Power	1w Each Pc	1w Each Pc
Input Power	400w	400w
Operating element	Touch Control	Touch Control
Light head protection rating	IP54+FireProof	IP54+FireProof
Depth of illumination L1+12	1400MM	1100MM
Lamp weight	700+700=52KGS	500+500=46KGS
Packing	3 Wooden Cartons	3 Wooden Cartons
LCD Touch Screen	Optional	Optional
Back Up Battery (4-6hrs)	Optional	Optional
Shadow Compensation Function	Optional	Optional
Internal/External Sony Camera (20X)	Optional	Optional
Monitor With Extra Arm (22 Inches)	Optional	Optional
LED Bulb Diameter	20MM	20MM



Redefine optical performance
Aerospace-based design

How can you deliver more clean airflow to your patient during a surgical procedure? The Osram Power LED allows unobstructed flow of clean air through the lighthead to dissipate accumulated heat and surgical smoke. Working seamlessly with laminar airflow solutions , it decreases air turbulence through its unique airfoil design. Aerospace-based design, We've learned from the best in the aerospace industry for a design that mitigates airflow turbulence while delivering clean air to the patient.

Lightweight aluminum construction
The suspension weights approximately
30% less than previous generations of steel arms.

Micare Power LED E700/500
CAMERA AND VIDEO SYSTEM

THE NEW DIMENTSION IN VIDEO IMAGES



CAMERA (INTERNAL & EXTERNAL)

More Details, Bettery Visualization

Fascinating Images-With Clear, Sharp Contrours

High Image Quality
- Camera With 10X Optical Zoom With 1950*1080P HD Soluton
- Finely Textured Images With Clear, Sharp Cplors
- Remarkably Better Colors For Better Attention To Detail And A Brilliant Rendition

Ultra High Definition
- Exmor R Sensor - Clearer Images In Every Condition
- Twice As Sensitive As Coneventional Sensors
- Higher Image Quality In Low Light Conditions

Easy Handling
- Easy Installation And Modification Or Retrofitting Of
- Existing OR Light Sustems
- Mechanical And Electronical Image Rotation
- Fl;exible And Indepent Operation Via Remote Control
- Optional Operation Via Wall Control Unit

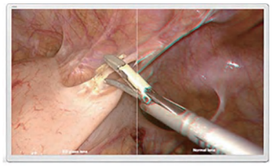





IMAGE SENSOR	SONY 1/2 8TYPE “EXMOR” CMOS, SUPPORT PROGRESSIVE MODE
IMAGE SOLUTION	1920*1080P, APPROX, 2,140,000 PIXELS
VIDEO OUTPUTS	20X OPTICAL ZOOM, 12X DIGITAL ZOOM
ASPECT VIDEO	SDI
FOCUS OPERATING	16:9
WHITE BALANCE	MANUAL & AUTO
REMOTE CONTROL	AUTO, ATW, INDOOR, OUTDOOR, ONE, PUSH WB, MANUAL WB
WIRELESS REMOTE CONTROL	STANDARD ACCESSORIES
HARD DISK FOR STORE	1T
POWER	6.8W
VOLTAGE	DC12-30W, 1.5A
INSTALLATION	INTERNAL & EXTERNAL OPTIONAL
MONITOR	22INCHES HANGING WITH ARM
SOUND COLLECTION	STANDARD







E700/700
Internal Camera

E700/500
Internal Camera

E500/500
Internal Camera




E700
Internal Camera

E500
Internal Camera




E700
Internal Camera

E500
Internal Camera





E700/700
External Camera

E700/500
External Camera

E500/500
External Camera




E700
External Camera

E500
External Camera



Future-ready to evolve with you

What if you had a lighting system that was modular, upgradeable, and expandable so that it could meet your ongoing needs with ease? You've found it. There are ways to customize this system today and in the future.

All of us here at MICARE are committed to you



SIMPLY INGENIOUS

What if you had illumination in the OR that simply supported you throughout each surgical procedure?
The MICARE PowerLED does this, delivering excellent color, contrast, clarity, and control.
A unique peninsula design provides optimal illumination at the surgical site, including deep cavity procedures. Advances in LED technology mean that the MICARE Powerled is able to optimize illumination through fewer LEDs than in the past.

You focus on patients. We focus on you.
MICARE Lighting solutions bring together people and technology so that you have exactly what you need, when you need it, for the intelligent OR of today and tomorrow. From project design to implementation to service support, your success is our highest priority.

LIGHTING
EXPERIENCE

Surgical Solutions

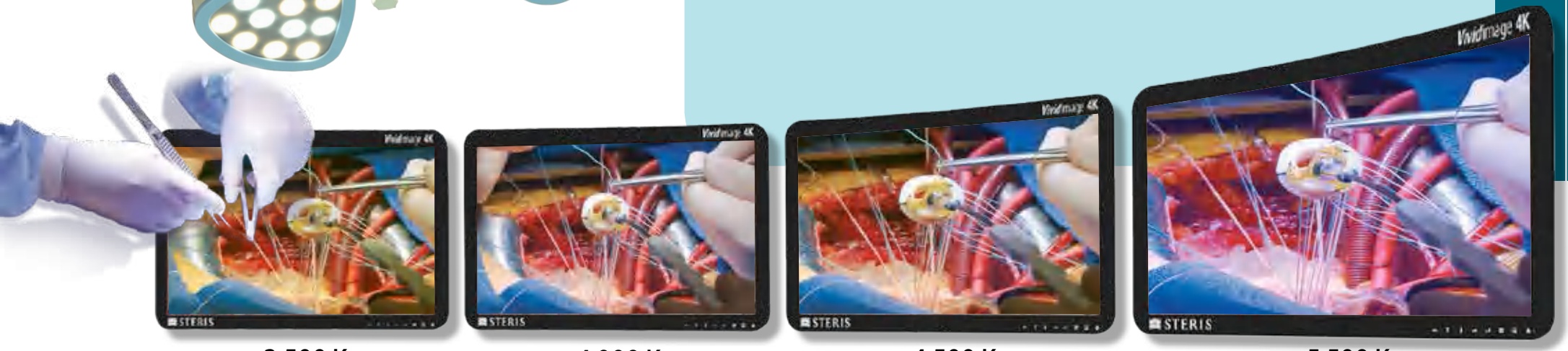


One Integrated Approach to Healthcare



Adjustable colour temperature: For Your Visual Comfort

FLOWER LED surgical lighting with adjustable colour temperatures retains all the benefits of white LEDs while offering additional functions.
Selecting from 4 calibrated colour temperatures, the user can choose a light adapted to their visual sensitivity and preferences - warmer colours aiming towards orange, or cooler tones, aiming towards warm white.
Depending on the type of surgery, the surgical team can easily adapt the color



3 500 K
Ra=95 / R9=91

4 000 K
Ra=95 / R9=97

4 500 K
Ra=95 / R9=97

5 500 K
Ra=95 / R9=97

Homogeneous and constant quality of light across the different colour temperatures and over time.

How Does that Work? Optimal Duo of White&Yellow LEDs

Contrary to the light generated by a combination of coloured LEDs (green, red, blue...) which have a tendency to decline over time and need regular recalibration to conserve its properties, FLOWER LED surgical lights with adjustable colour temperature option is obtained by combining white LEDs and yellow LEDS with different colour temperatures.

PRACTICAL ASPECTS CUSTOMER-ORIENTED

Flexible system

The light, camera and monitor arm with considerable swiveling and tilting range for all commercially available screens can be attached to an individual ceiling suspension and are lightweight and safe to position. 4 arms can be used per ceiling support unit.

*Performance + 10% according to IEC60601-2-41 / **Performance 0/-10% according to IEC60601-2-41 / ***Performance + 6% according to IEC60601-2-41

TECHNICAL SHEET

FLOWER LED



FLOWER LED
E700/700



FLOWER LED
E500/500



FLOWER LED
E700/500



FLOWER LED
E700



FLOWER LED
E500

FLOWER LED Model	E700/700	E700/500	E500/500	E700	E500
Voltage	95~245V，50/60HZ	95~245V，50/60HZ	95~245V，50/60HZ	95~245V，50/60HZ	95~245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000-160,000/60,000-160,000	60,000-160,000/40,000-140,000	60,000-160,000/40,000-140,000	60,000-160,000	40,000-140,000
Brightness Adjustable	0-100%	0-100%	0-100%	0-100%	0-100%
Lamp Head Diameter	650MM/650MM	650MM/650MM	650MM/650MM	650MM	650MM
Quantity Of LEDS	61PCS/61PCS	61PCS/39PCS	39PCS/39PCS	61PCS	39PCS
Color Temperature Adjustable	3800-5500K	3800-5500K	3800-5500K	3800-5500K	3800-5500K
Color rendering index Ra	96	96	96	96	96
Color rendering index R9(Red)	98	98	98	98	98
Light Field Size Adjustable	150-350MM/150-350MM	150-350MM/120-280MM	120-280MM/120-280MM	150-350MM	120-280MM
Total rediant flux density	364W/m2	364W/m2	364W/m2	364W/m2	364W/m2
Endoscopy Mode	YES	YES	YES	YES	YES
Endoscopy Mode LEDS	6PCS/6PCS	6PCS/6PCS	6PCS/6PCS	6PCS	6PCS
Illumination For Endo-Mode	10%	12%	15%	10%	15%
LED service life	80,000hrs	80,000hrs	80,000hrs	80,000hrs	80,000hrs
Main Material	Aluminum	Aluminum	Aluminum	Aluminum	Aluminum
Rotating Angle Of Arm	>540°	>540°	>540°	>540°	>540°
LED Bulb Power	1w Each Pc	1w Each Pc	1w Each Pc	1w Each Pc	1w Each Pc
Input Power	400w	400w	400w	400w	400w
Operating element	Touch Control	Touch Control	Touch Control	Touch Control	Touch Control
Light head protection rating	IP54+FireProof	IP54+FireProof	IP54+FireProof	IP54+FireProof	IP54+FireProof
Depth of illumination L1+12	1400MM	1200MM	1100MM	1400MM	1100MM
Lamp weight	700+700=52KGS	700+500=49KGS	500+500=46KGS	700+700=52KGS	500+500=46KGS
Packing	3 Wooden Cartons	3 Wooden Cartons	3 Wooden Cartons	3 Wooden Cartons	3 Wooden Cartons
LCD Touch Screen 4.3Inches	Optional	Optional	Optional	Optional	Optional
Back Up Battery (4-6hrs)	Optional	Optional	Optional	Optional	Optional
LED Bulb Size	20MM	20MM	20MM	20MM	20MM
Internal/External Sony Camera(20X)	Optional	Optional	Optional	Optional	Optional
Monitor With Extra Arm(22 Inches)	Optional	Optional	Optional	Optional	Optional
LCD Touch Screen 5Inches	Optional	Optional	Optional	Optional	Optional









TECHNICAL SHEET

FLOWER LED



FLOWER LED
E700L



FLOWER LED
E700L+BATTERY



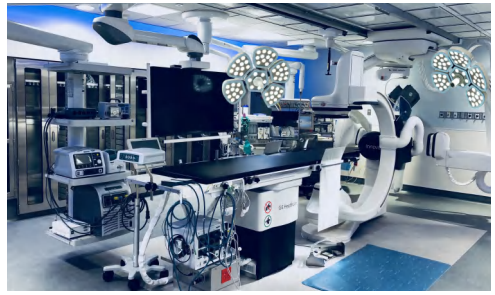
FLOWER LED
E500L



FLOWER LED
E500L+BATTERY

FLOWER LED Model	E700	E500
Voltage	95~245V，50/60HZ	95~245V，50/60HZ
Illuminance at distance of 1 m(LUX)	60,000-160,000	40,000-140,000
Brightness Adjustable	10-100%	10-100%
Lamp Head Diameter	650MM	650MM
Quantity Of LEDS	61PCS	39PCS
Color Temperature Adjustable	3800-5500K	3800-5500K
Color rendering index Ra	96	96
Color rendering index R9(Red)	98	98
Light Field Size Adjustable	150-350MM	90-260MM
Total rediant flux density	364W/m2	364W/m2
Endoscopy Mode	YES	YES
Endoscopy Mode LEDS	6PCS	6PCS
Illumination For Endo-Mode	10%	15%
LED service life	80,000hrs	80,000hrs
Main Material	Aluminum	Aluminum
Rotating Angle Of Arm	>540°	>540°
LED Bulb Power	1w Each Pc	1w Each Pc
Input Power	400w	400w
Operating element	Touch Control	Touch Control
Light head protection rating	IP54+FireProof	IP54+FireProof
Depth of illumination L1+12	1400MM	1100MM
Lamp weight	700+700=52KGS	500+500=46KGS
Packing	3 Wooden Cartons	3 Wooden Cartons
LCD Touch Screen 4.3inches	Optional	Optional
Back Up Battery (4-6hrs)	Optional	Optional
LED Bulb Size	20MM	20MM
Internal/External Sony Camera(20X)	Optional	Optional
Monitor With Extra Arm(22 Inches)	Optional	Optional
LCD Touch Screen 5Inches	Optional	Optional





Energy Efficiency

Operating costs for ventilation ceilings and air-conditioning systems are reduced due to low surface temperature of <2°C

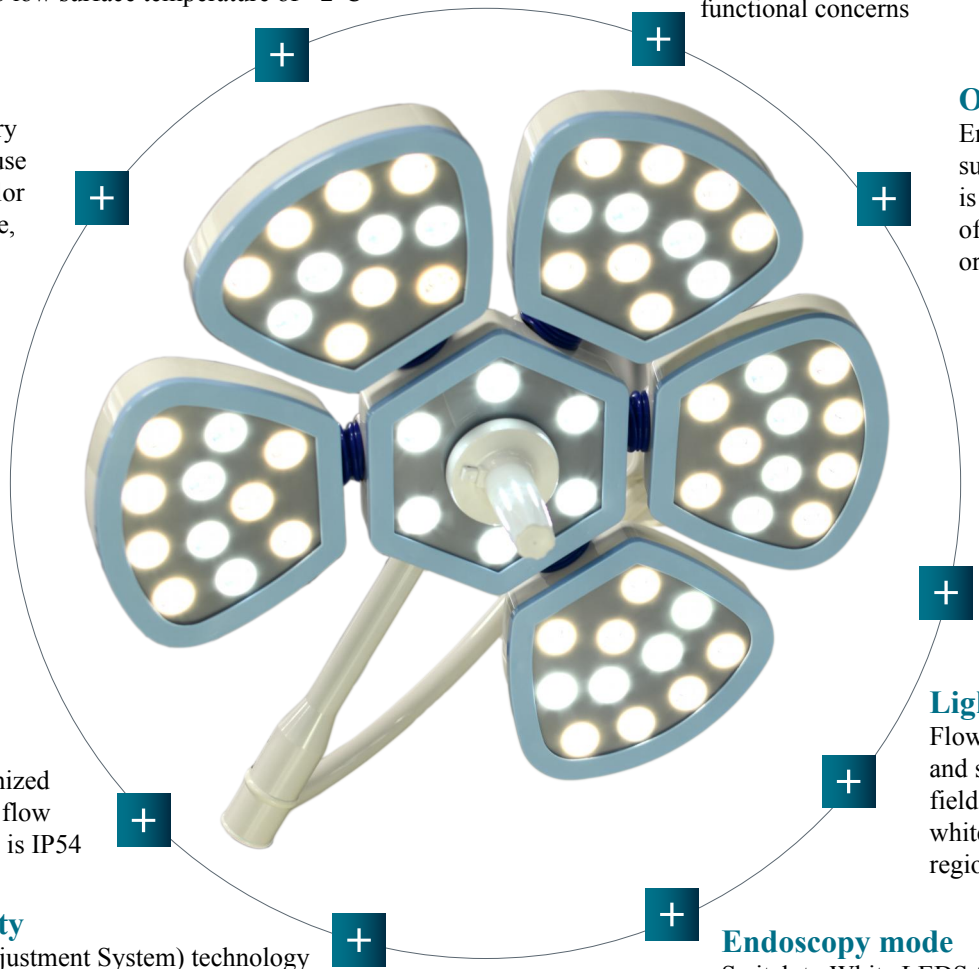
Service / Maintenance

Service and maintenance are aided by the D-A-S (Data Analysis System), for determining operating hours and other functional concerns



Technology

Lens combination was developed with primary and secondary optics for light bundling. We use high-performance LEDs with a maximum color rendering index. Color temperature is variable, and the illumination intensity is dimmable



Optimized View

Endoscopy mode provides improved contrast for surgeons using imaging procedures. Monitor reflection is reduced during endoscopic procedures while offering adequate background lighting to support the orientation of the entire surgical team

Color Temperature Selection

Color temperature selection can be set individually for Flower LED. There are three levels from 3,800 K to 5,500 K, yielding high-contrast light for different types of tissue

Hygiene

Flower LED include a flow-optimized luminaire housing for laminar air flow ceilings. The degree of protection is IP54

Light

Flower LED Illumination in both area and depth is optimal and shadow-free, with the ideal ratio of luminaire to light field diameter. Provides a natural color-rendering index with white light (Ra of 96 at all light levels, R9 of 98 in the red region). It can be regulated to 160,000 lx

Sustainability

LAS (Light Adjustment System) technology creates 100% lighting power, even after many years of use

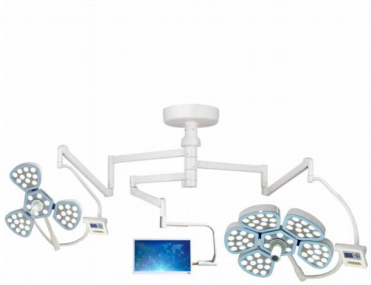
Endoscopy mode

Switch to White LEDS for optimum endoscopic intervention conditions

CAMERA (INTERNAL & EXTERNAL)

More Details, Bettery Visualization

Fascinating Images-With Clear, Sharp Contrours



High Image Quality

- Camera With 20X Optical Zoom With 1950*1080P HD Soluton
- Finely Textured Images With Clear, Sharp Cplors
- Remarkably Better Colors For Better Attention To Detail And A Brilliant Rendition

Ultra High Definition

- Exmor R Sensor - Clearer Images In Every Condition
- Twice As Sensitive As Coneventional Sensors
- Higher Image Quality In Low Light Conditions

Easy Handling

- Easy Installation And Modification Or Retrofitting Of
- Existing OR Light Sustems
- Mechanical And Electronical Image Rotation
- Fl;exible And Indepent Operation Via Remote Control
- Optional Operation Via Wall Control Unit

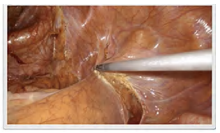





IMAGE SENSOR	SONY 1/2 8TYPE “EXMOR” CMOS, SUPPORT PROGRESSIVE MODE
IMAGE SOLUTION	1920*1080P, APPROX, 2,140,000 PIXELS
VIDEO OUTPUTS	20X OPTICAL ZOOM, 12X DIGITAL ZOOM
ASPECT VIDEO	SDI
FOCUS OPERATING	16:9
WHITE BALANCE	MANUAL & AUTO
REMOTE CONTROL	AUTO, ATW, INDOOR, OUTDOOR, ONE, PUSH WB, MANUAL WB
WIRELESS REMOTE CONTROL	STANDARD ACCESSORIES
HARD DISK FOR STORE	1T
POWER	6.8W
VOLTAGE	DC12-30W, 1.5A
INSTALLATION	INTERNAL & EXTERNAL OPTIONAL
MONITOR	22INCHES HANGING WITH ARM
SOUND COLLECTION	STANDARD





E700/700 Internal Camera | **E700/500 Internal Camera** | **E500/500 Internal Camera**



E700 Internal Camera | **E500 Internal Camera**



E700 Internal Camera | **E500 Internal Camera**



E700/700 External Camera | **E700/500 External Camera** | **E500/500 External Camera**



E700 External Camera | **E500 External Camera**



FLOWER LED

PERFORMANCE
INNOVATIVE TECHNOLOGY

FLOWER LED is a new generation of surgical lights. The latest LED technology with user-relevant features can be configured to suit individual requirements and offers the perfect lighting solution.

ICE COLD AND EFFICIENT
A NEW GENERATION OF
SURGICAL LIGHTS.

In the operating room, shadow-free lighting that does not change the surrounding climatic conditions and minimally affects air flow is essential. The wide variety of performed procedures calls for extreme flexibility, and equipment must be adaptable to individual requirements at all times. Time for the new Flower LED technology