

For
you

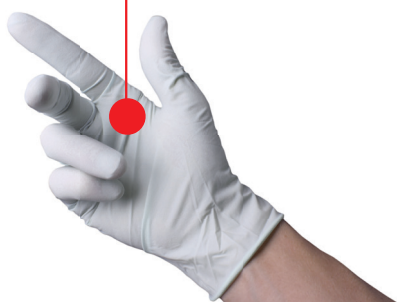


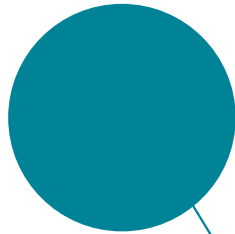
For your
patient

INTUITIVE
CONNECTION



EQUIPMENT





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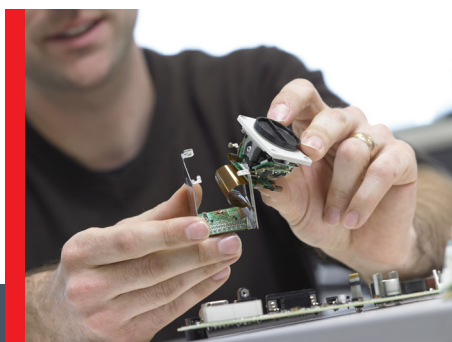


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ABOUT US

ABOUT US

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1. ABOUT US

MERGE & ACQUISITION

SOPRO

1977

SOPRO™ was founded

1986

Introduction of microcameras for endoscopy field

2001

SOPRO™ joins the ACTEON® GROUP

2003

SOPRO™ moves into a bigger, brand new building in La Ciotat (South of France)

2004

Acquisition of Geyser company and development of a range of insufflators and pumps

COMEG

1975

COMEG was founded

1977

Introduction of medical endoscopes

1993

Introduction of autoclavable endoscopes

1994

Introduction of urology product line

2001

New optical generation of medical endoscopes



SOPRO COMEG

2006

COMEG joins SOPRO™
Creation of the trademark SOPRO-COMEG

2007

Introduction of a Spine surgery product line

2009

Introduction of SOPRO™ 397 3CCD Full HD camera
Introduction of SOPRO™ Medical Imaging Software
Introduction of a range of bipolar forceps & scissors

2010

Introduction of Full HD laparoscopes
Introduction of HEOS, the Hysteroscopic Endo Operative System
Introduction of UBIPACK®, the complete solution for gynecology and ENT for consulting room

2011

Introduction of ULYSS, 4,3mm autoclavable ENT endoscope with variable direction of view

2012

New range of uretero-renoscopes
Introduction of M+ range

2013

Introduction of a bipolar resectoscopy range

2014

Introduction of SYMBIOZ and ISYME concept

NEW COMMUNICATION



medical technologies

2016

The trademark SOPRO-COMEG becomes COMEG Medical technologies
Introduction of SYMBIOZ +

1. ABOUT US

PRODUCTS RANGE AT A GLANCE

COMEG offers a complete range ranking from capital equipment to re-usable, high quality, durable instruments. Whatever your application is: Urology, Laparoscopy, Arthroscopy, Gynecology, Spine, ENT, CMF, Plastic surgery, COMEG will offer you the best solution and fulfill your needs.

EQUIPMENT



Equipment

COMEG meets the needs of international surgeons and dealers by supplying complete solutions for video endoscopy. Our range includes equipment for both consulting and operating rooms, using latest technologies available in the market. Full HD video cameras, Xenon and LED light sources, insufflators, pumps, medical grade monitors and visualization/archiving systems. These products have already proven their worldwide reliability and are considered today as a standard in the mini invasive surgery field.

OPERATING ROOM SYSTEM



- SYMBIOZ Cam+
FULL HD CAMERA CONTROL UNIT & CAMERA HEAD
- SYMBIOZ Led
LED LIGHT SOURCE
- SYMBIOZ Flow
INSUFFLATOR
- SYMBIOZ Master
ARCHIVING SYSTEM
- FULL HD MONITOR

CONSULTING ROOM SYSTEM



INSTRUMENTATION



Cranio-Maxillo-Facial surgery and Rhinoplasty

COMEG offers a complete range of piezoelectric ultrasonic devices together with a wide range of tips to match every surgeon and surgery needs. Our powerful devices allow for more safety during surgery, enhance healing and reduce post-operative pain.



Gynecology

Hysteroscopy, resectoscopy, laparoscopy and other procedures are made easier with the COMEG products. Clarity and efficiency are ideals we strive for with our range of gynecology.



Laparoscopy

COMEG proposes a complete range of instruments for entry into the pneumoperitoneum, the first and most crucial step in successful laparoscopic surgery. A complete range of hand instruments in both monopolar and bipolar electrocautery versions is also available. The Full HD 5,5mm and 10mm laparoscopes will provide you the quality you need for High Definition procedures.



Urology

COMEG, a company with over 25 years of experience in the urology field, offers endoscopes with exceptional optical quality and a complement of instruments which will ease even the most demanding urological procedures including: cystoscopy, resectoscopy and urethrotomy. These products are an integral part of recent technological advancements which improve the diagnosis-treatment process and the level of care that urologists can now offer to their patients.



ENT

Our field of activities also includes all areas of the ENT disciplines, whether it is diagnosis or therapy, practice or clinic. We propose rigid endoscopes and accessories necessary for sinuscopy, otoscopy and laryngoscopy. All our instruments are manufactured with the highest quality materials.



Arthroscopy

Sharp images and precision in visualization are possible through the use of our range for arthroscopy from 4.0mm telescopes to the small-joint arthroscopic lines.



Spine

Our spinal endoscopy system allows to treat disc-diseases. All types of hernias can be removed in a minimal invasive interlamiar approach, by means of the endoscopic technique. The technique also qualifies for the effective treatment of chronic back-ailments caused by disc-prolaps or tears. Furthermore, endoscopic treatment of spinal stenosis has increased.

1. ABOUT US

REGULATORY

Our business practices and processes are designed to achieve quality results that exceed the expectations of patients, customers, surgeons. We are dedicated to the delivery of quality healthcare products around the world.

From the start of development of a new device through manufacturing to the final quality control check before delivery, Quality is built into all our products, as our commitment and dedication are to our customers throughout the world.

Our plants are certified to the highest international quality standard, ISO 13485 for Design, Manufacturing and Sales. Our products comply with the various regulations established across the world, specifically those required by the Food and Drugs Administration and the European Union.

COMEG manufactures equipment and endoscopes in accordance with the following directives or standards:

- Medical device directive 93/42 EEC (and 2007/47 EEC)
- EN ISO 13485: 2003 AC: 2007 certified Quality management system
- EN ISO 13485: 2003 AC: 2007 certified Quality management system (issued according to CMDCAS program requirements)
- Series of standards IEC 60601
- Series of standards ISO 8600
- FDA regulations* (FDA Quality system Regulation 21 CFR Part 820)
- EC attestations issued for all our class II devices

**the newest ones may be 510(k) pending.*



RESEARCH & DEVELOPMENT

Innovation being the key to improve health, COMEG invests a significant part of its revenue in R&D and patents filing. Our world-renowned know-how is medical imaging, relying on senior engineers with strong expertise in electronics, software, optics and mechanics.

Also, we in COMEG, have access to the very wide R&D department and connections of our mother company, Acteon® group, adding to the previous know-how: ultrasounds, chemicals, motors, X-Ray and Cone Beam Computed Tomography systems (CBCT).

This very rare combination of know-how allows us to join the extremely limited group of the companies mastering the design & the manufacturing of a complete endoscopic solution.

Moreover, COMEG is working closely with surgeons and is looking every day such collaborations in order to well answer surgeons and patients needs.

SERVICE & ASSISTANCE

In our main plants, our on-site specialists are dedicated to servicing and providing expertises to your COMEG products:

- Express repairs of all our products under warranty
- Free quotations if accepted for all repairs out of warranty
- Qualified repairs with original spare parts
- Technical trainings

• COMEG in France

[Equipment]
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Tel +33[0]442 98 01 09
info@comegmedical.com

• COMEG in Germany

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Serviceabteilung
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78532 Tuttlingen - Germany
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info.de@comegmedical.com

• ACTEON® in France

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BP 30216
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info@comegmedical.com

COMEG REPRESENTATIVE OFFICES

Our local staff will support you, wherever you are in the world.

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VIDEO CAMERAS

VIDEO CAMERAS

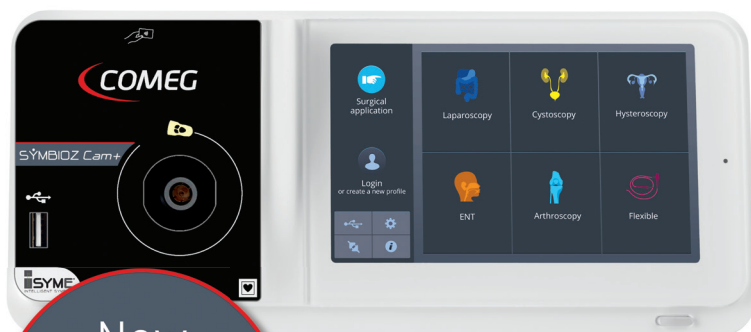
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2. VIDEO CAMERAS

FULL HD CAMERA

SYMBIOZ *Cam+*



New
Full HD
generation

Art.N°	Description
S_198_9000	SYMBIOZ Cam+ Full HD CCU - EU
S_198_9001	SYMBIOZ Cam+ Full HD CCU - US



Art.N°	Description
S_198_8000	SYMBIOZ Cam+ Full HD camera head with integrated HD 15-35mm zoom coupler

Exmor R™
CMOS Sensor

Twice as sensitive
as conventional FULL HD
sensors, for great image
quality even in low light
conditions.

With Sony Exmor R™
and ISYME technologies,
SYMBIOZ+ expands
the boundaries of your
vision.

ISYME
INTELLIGENT SYMBIOZ

ISYME is designed to provide real time
synchronization and optimize component
settings.

SPECIFICATION OF THE CAMERA CONTROL UNIT (CCU) *S_198_9000 & S_198_9001*

- Digital zoom up to 2.5x
- Application and user MENUS
- 6 optimized preset applications
- All functions available from the camera head (NAV mode)
- Instant and contactless access to preset applications and personal profiles with the SCards*
- Unlimited number of users with personal profiles up to 5
- Connected to SYMBIOZ Led, SYMBIOZ Flow, SYMBIOZ Master & monitor
- Full HD Images and Videos recorder integrated (USB)
- Automatic compensation function for defective pixels
- Automatic white balance
- Freeze, mirror and gain functions
- Brightness, details, red and blue gains, gamma, color adjustments
- Noise reducer: OFF / LOW / HIGH
- Electronic anti-moiré filter for flexible endoscopes
- On screen displayed adjustments
- Reset to manufacturer settings
- RF transmitter:
 - Type: RFID
 - Frequency: 13,56 MHz
 - Modulation feature: OOK
 - Transmitter power: 70 mW (+18 dBm)
- Video outputs:
 - CVBS: 1.0 V [P-P] / 75 ohms, Negative Sync
 - Y/C: Y: 1.0 V [P-P] / 75 ohms, C: 0.286 V [P-P] (NTSC), C: 0.3 V [P-P] V [P-P] (PAL) / 75 ohms, Negative Sync
 - RGB: 3 x 0.7 V [P-P] & 0.3 V [P-P] / 75 ohms
 - HD-SDI, 3G-SDI: 0.8 V [P-P] / 75 ohms SMPTE292M, SMPTE425M-A
 - DVI-D: 3x0.7Vcc & 0.3Vcc/75Ω
- 2 peripheral outputs
- 7" 16/9 touch screen with intuitive interface
- Dimensions (W x H x D): 310 x 136 x 385mm
- Weight: 4200 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 240 VAC / 50 - 60 Hz
- Power consumption: 50 VA
- Two T1AL - 250 V fuses (Marked UL/CSA only)
- 14 languages
- Continuous service

SPECIFICATION OF THE CAMERA HEAD *S_198_8000*

- 1CMOS Exmor R™ technology 1/2" Full HD sensor
- HD 15-35mm zoom coupler integrated
- 3 fully programmable buttons
- Free scope rotation and locking system
- Automatic or adjustable electronic shutter (1/50 to 1/100000)
- Resolution: HDTV 1080p format: 1920 x 1080 pixels
- Definition: 1080 lines
- Active pixels area: 1920 x 1080 pixels
- Progressive Scan Technology
- Acquisition in native 16:9 format
- Sensitivity: 0.1 lux
- Signal / Noise ratio: 57dB
- Cable length: 3 meters
- Dimensions (D x H): 149 x 53mm
- Weight: 260 g
- Protection type: IPX7 (waterproof)

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, CF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

2. VIDEO CAMERAS

FULL HD CAMERA

SYMBIOZ *Cam*



Native
Full HD
1080p

Art.N°	Description
S_398_9000	SYMBIOZ Cam Full HD CCU - EU
S_398_9001	SYMBIOZ Cam Full HD CCU - US



Art.N°	Description
S_398_9002	SYMBIOZ Cam Full HD CCU with Full HD integrated recorder - EU
S_398_9003	SYMBIOZ Cam Full HD CCU with Full HD integrated recorder - US



Art.N°	Description
S_398_8000	SYMBIOZ Cam Full HD camera head with integrated HD 15-35mm zoom coupler

SPECIFICATION OF THE CAMERA CONTROL UNIT (CCU)

S_398_9000 & S_398_9001 / S_398_9002 & S_398_9003

- Digital zoom up to 2.5x
 - Application and user MENUS
 - 6 optimized preset applications
 - All functions available from the camera head (NAV mode)
 - Instant and contactless access to preset applications and personal profiles with the SCards*
 - Unlimited number of users with personal profiles up to 5
 - Connected to SYMBIOZ Led, SYMBIOZ Flow, SYMBIOZ Master & monitor
 - Automatic compensation function for defective pixels
 - Automatic white balance
 - Freeze, mirror and gain functions
 - Brightness, details, red and blue gains, gamma, color adjustments
 - Noise reducer: OFF/ LOW / HIGH
 - Electronic anti-moiré filter for flexible endoscopes
 - On screen displayed adjustments
 - Reset to manufacturer settings
 - RF transmitter:
 - Type: RFID
 - Frequency: 13,56 MHz
 - Modulation feature: OOK
 - Transmitter power: 70 mW (+18 dBm)
 - Video outputs:
 - CVBS: 1.0 V [P-P] / 75 ohms, Negative Sync
 - Y/C: Y: 1.0 V [P-P] / 75 ohms, C: 0.286 V [P-P] (NTSC), C: 300 Vp-p V [P-P] (PAL) / 75 ohms, Negative Sync
 - RGB: 3x0.7 V [P-P] & 0.3V [P-P] / 75 ohms
 - HD-SDI: 0.8 V [P-P] / 75 ohms SMPTE292M
 - DVI-D: 3x0.7Vcc & 0.3Vcc/75Ω
 - 2 peripheral outputs
 - 7" 16/9 touch screen with intuitive interface
 - Dimensions (W x H x D): 310 x 136 x 385mm
 - Weight: 4300 g
 - Protection type: IPX0 (not drip-proof)
 - Power supply: 100 - 230 VAC / 50 - 60Hz
 - Power consumption: 38-50VA
 - Two T2,5AL - 250V fuses (Marked UL/CSA only)
 - 14 languages
 - Continuous service
- Option *S_398_9002 & S_398_9003***
- Full HD Images and Videos recorder integrated (USB)

SPECIFICATION OF THE CAMERA HEAD

S_398_8000

- 3CMOS technology 1/3" Full HD sensors
- HD 15-35mm zoom coupler integrated
- 3 fully programmable buttons
- Free scope rotation and locking system
- Automatic or adjustable electronic shutter (1/50 to 1/100000)
- Resolution: HDTV 1080p format: 1920 x 1080 pixels
- Definition: 1080 lines
- Active pixels area: 1920 x 1080 pixels
- Progressive Scan Technology
- Acquisition in native 16:9 format
- Sensitivity: 5 lux
- Signal / Noise ratio: 54 dB
- Cable length: 3 meters
- Dimensions (D x H): 149 x 53mm
- Weight: 270 g
- Protection type: IPX7 (waterproof)

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, CF type applied parts
- Operating temperature: +10°C/+40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

* For SCARD, see after SYMBIOZ cameras

2. VIDEO CAMERAS

SCARDS

FOR SYMBIOZ CAM+ & SYMBIOZ CAM

PERSONALIZED TOWER SETTINGS FOR EACH PHYSICIAN.

Optimized components programming.

Programmable and stored tower settings by procedure for each physician.

Customized settings are programmed, stored and retrieved with contactless NFC technology. Physicians choose and program tower settings by procedure, storing them on a personalized SCard. Using proprietary SCard technology prior to the procedure, the tower recognizes each physician, and programs the tower to their personalized settings for a particular surgery.



- Hysteroscopy
- Laparoscopy
- Cystoscopy
- Arthroscopy
- ENT
- Flexible



Art.N°	Description
990245	SCard x7 [Laparoscopy, Hysteroscopy, Cystoscopy, ENT, Arthroscopy, Flexible + 1 Admin]



Art.N°	Description
990246	Admin SCard x1



Art.N°	Description
905021	Blank SCard x1

2. VIDEO CAMERAS

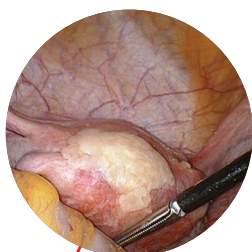
FULL HD CAMERA

SOPRO
397



Native
Full HD
1080p

Art.N°	Description
S_397_9000	Digital FULL HD 16/9 3CCD CCU - EU
S_397_9001	Digital FULL HD 16/9 3CCD CCU - US



icons



Art.N°	Description
S_097_0001	24mm HD coupler

Art.N°	Description
S_397_8000	Digital FULL HD 16/9 3CCD camera head, C-mount, without coupler

For more options, see accessories at the end of this chapter

SPECIFICATION OF THE CAMERA CONTROL UNIT (CCU)

S_397_9000 & S_397_9001

- Digital zoom Up to 2.5x
- Menu by Application
- Automatic saving of the adjusted parameters
- Text generator with keyboard connection
- Automatic adjustment of sensitivity to low light (auto exposure control)
- Automatic compensation function for defective pixels
- Automatic white balance
- Freeze, mirror and gain functions
- Details, red and blue gains, gamma, color adjustments
- Noise Reducer: OFF / LOW / HIGH
- Electronic anti-moiré filter for flexible endoscopes
- On screen displayed adjustments
- Reset to manufacturer settings
- Video outputs:
 - 1 DVI-D: 3x0.7Vcc & 0.3Vcc/75Ω
 - 2 HD-SDI: 0.8 V [P-P] / 75 ohms SMPTE292M
 - 1 RGB: 3x0.7 V [P-P] & 0.3V [P-P] / 75 ohms
 - 1 Y/C: Y: 1.0 V [P-P] / 75 ohms, C: 0.286 V [P-P] (NTSC), C:300 Vp-p V [P-P] (PAL) / 75 ohms Sync Negative
 - 1 VBS: 1.0 V [P-P] / 75 ohms Sync Negative
- 2 peripheral outputs
- Dimensions (W x H x D): 300 x 125 x 311mm
- Weight: 2500 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60Hz
- Power consumption: 45 VA
- Two T 2,5A - 250 V fuses (Marked UR only)
- 5 languages (EN, FR, DEU, ES, IT)
- Continuous service

SPECIFICATION OF THE CAMERA HEAD

S_397_8000

- Ultra small camera head with its micro prism technology
- 3 CCD technology 1/3" Full HD sensors
- 3 fully programmable buttons
- Free scope rotation and locking system
- Automatic or adjustable electronic shutter (1/50 to 1/100 000)
- Resolution: HDTV 1080p format: 1920 x 1080 pixels
- Definition: 1080 lines
- Active pixels area: 1920 x 1080 pixels
- Progressive Scan Technology
- Acquisition in native 16:9 format
- Sensitivity: 1,5 lux
- Signal / Noise ratio: 70dB
- 14 bits processing
- Cable length: 3 meters
- Dimensions (W x H x D): 37 x 50 x 95mm
- Weight: 250 g
- Protection type: IPX7 (waterproof)

SPECIFICATION OF THE COUPLER

S_097_0001

- 24mm HD coupler
- C-mount, scope holder with locking capacity
- Weight: 60g
- Protection type: IPX7 (waterproof)

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage Temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating and storage transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

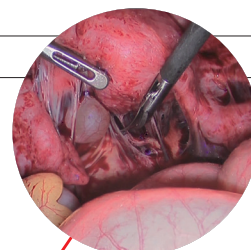
2. VIDEO CAMERAS

SD CAMERA

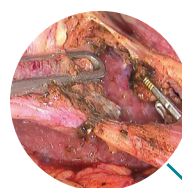
SOPRO
184



Art.N°	Description
S_184_9100	Digital 1CCD CCU, PAL/NTSC, USB2 output, SIM software (trial version) - EU
S_184_9101	Digital 1CCD CCU, PAL/NTSC, USB2 output, SIM software (trial version) - US
S_184_9102	Digital 1CCD CCU, PAL/NTSC, USB2 output, SIM software (trial version), 2 SDI outputs - EU
S_184_9103	Digital 1CCD CCU, PAL/NTSC, USB2 output, SIM software (trial version), 2 SDI outputs - US
Option	SOPRO™ Imaging Software - chap.8



Art.N°	Description
S_084_0001	18,5mm coupler



Art.N°	Description
S_184_8100	Digital 1CCD camera head, C-mount, PAL - without coupler
S_184_8101	Digital 1CCD camera head, C-mount, NTSC - without coupler

SPECIFICATION OF THE CAMERA CONTROL UNIT (CCU)

S_184_9100 & S_184_9101 / S_184_9102 & S_184_9103

- Application and user MENUS
 - Intuitive menu with navigation wheel
 - Automatic video settings detection mode
 - Automatic saving of the adjusted parameters
 - Automatic white balance with iCe technology
 - Red and blue gains, gamma adjustments
 - Electronic anti-moiré filter for flexible endoscopes
 - Reset to manufacturer settings
 - Video outputs:
 - 1 RGBS: 3 x 0,7 Vcc / 0,3 Vcc / 75Ω
 - 1 Y/C: 1 Vcc / 0,3 Vcc / 75Ωv
 - 1 composite: 1 Vcc / 75Ω
 - 1 USB 2.0
 - 1 peripheral output
 - 2.7" OLED screen
 - Dimensions (W x H x D): 300 x 300 x 66mm
 - Weight: 1500 g
 - Protection type: IPX0 (not drip-proof)
 - Powersupply: 100 - 240 VAC / 50 - 60 Hz
 - Powerconsumption: 20 VA
 - Two T 800 mA - 250V fuses (Marked UL/CSA only)
 - 5 languages (EN, FR, DEU, ES, IT)
 - Continuous service
- Option S_184_9102 & S_184_9103**
- 2 digital SDI outputs

SPECIFICATION OF THE CAMERA HEAD

S_184_8100 & S_184_8101

- 1CCD technology 1/4" sensor
- 2 fully programmable buttons
- Automatic or adjustable electronic shutter (1/50 to 1/100 000)
- Resolution: 752 x 582 PAL; 768 x 494 NTSC
- Definition: > 500 lines
- Active pixels area: 752 x 582 PAL; 768 x 494 NTSC
- Sensitivity: > 1 lux
- Signal/Noise Ratio: 52dB
- Cable length: 3 meters
- Dimensions (D x H): 80 x 30mm
- Weight: 210 g
- Protection type: IPX7 (waterproof)

SPECIFICATION OF THE COUPLER

S_084_0001

- 18,5mm coupler
- C-mount, scope holder with locking capacity
- Weight: 20g
- Protection type: IPX7 (waterproof)

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 20% to 85%
- Transport and storage temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

2. VIDEO CAMERAS

USB CAMERA

UBICAM[®]
digital diagnosis set



Art.N°	Description
S_084_0001	18,5mm coupler



Art.N°	Description
S_181_0011	UBICAM [®] , USB2 stand alone solution, C-mount, PAL, SIM software (test version) - without coupler
S_181_0015	UBICAM [®] , USB2 stand alone solution, C-mount, NTSC, SIM software (test version) - without coupler
Option	SOPRO [™] Imaging Software - chap.8

SPECIFICATION OF THE USB CAMERA HEAD

S_181_0011 & S_181_0015

- 1CCD technology 1/4" sensor
- 2 programmable buttons allowing: Freeze, record, white balance, anti-moiré filter activation
- Automatic video settings detection mode
- Automatic saving of the adjusted parameters
- Automatic white balance
- Automatic detection of the colour temperature according to the used light source
- Virtual Camera Control Unit: (Automatic white balance, video parameters, flexible or rigid applications, shortcuts)
- Modification of the video parameters
- Electronic anti-moiré filter for flexible endoscopes
- Immersible USB connector (when covered)
- Automatic or adjustable electronic shutter (1/50 to 1/100 000)
- Resolution: 752 x 582 PAL; 768 x 494 NTSC
- Definition: 470 lines
- Active pixels area: 752 x 582 PAL; 768 x 494 NTSC
- Sensitivity: 2 lux
- Signal/Noise Ratio: 52 dB
- Cable length: 3 meters
- Dimensions (D x H): 87 x 30mm
- Weight: 210 g
- Protection type: IPX7 (waterproof)
- Power supply: 5 V DC
- Power consumption: 2,5 VA
- 1 USB 2.0 video output
- Continuous service

SPECIFICATION OF THE COUPLER

S_084_0001

- 18,5mm coupler
- C-mount, scope holder with locking capacity
- Weight: 20g
- Protection type: IPX7 (waterproof)

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, BF type applied parts
- Operating temperature: +10°C / +35°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

2. VIDEO CAMERAS

SD CAMERA

WITH 120W* LED LIGHT SOURCE

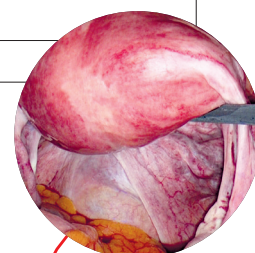
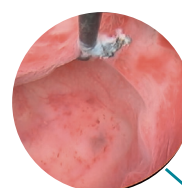
DUO by SOPRO



Art.N°	Description
S_165_0100	S 165 DUO CCU - EU
S_165_0101	S 165 DUO CCU - US



Art.N°	Description
S_084_0001	18,5mm coupler



Art.N°	Description
S_165_2000	S 165 DUO Camera head PAL - without coupler
S_165_2001	S 165 DUO Camera head NTSC - without coupler

* Light intensity equivalent to 120 Watts Xenon light source with less power consumption
For more options, see accessories at the end of this chapter

SPECIFICATION OF THE CONTROL UNIT

S_165_0100 & S_165_0101

- Automatic video settings detection mode
- Automatic white balance with **iCe** technology
- Electronic anti-moiré filter for flexible endoscopes
- Video outputs:
 - 1 Y/C: 1 Vcc & 0.3 Vcc / 75Ω
 - 1 composite: 1 Vcc / 75Ω
- Compatible light cable types: Storz (standard) and Olympus (option)
- Electronic iris shutter
- Automatic thermal protection system
- Nominal power: 30W (light intensity equivalent to 120 Watts Xenon light source)
- LED technology
- LED lifetime: up to 50 000 hours
- Color temperature: 4 500° K
- Dimensions (W x H x D): 300 x 300 x 66mm
- Weight: 2400 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60 Hz
- Power consumption: 86 VA
- Two T 800 mA - 250 V fuses (Marked UL/CSA only)
- Continuous service

SPECIFICATION OF THE CAMERA HEAD

S_165_2000 & S_165_2001

- 1CCD technology 1/4" sensor
- Pre-programmed buttons function
- Automatic electronic shutter (1/50 to 1/100 000)
- Resolution: 752 x 582 PAL; 768 x 494 NTSC
- Definition: 500 lines
- Active pixels area: 752 x 582 PAL; 768 x 494 NTSC
- Sensitivity: 2 lux
- Signal / noise ratio: 52 dB
- Cable length: 3 meters
- Dimensions (D x H): 87 x 30mm
- Weight: 210 g
- Protection type: IPX7 (waterproof)

SPECIFICATION OF THE COUPLER

S_084_0001

- 18,5mm coupler
- C-mount, scope holder with locking capacity
- Weight: 20g
- Protection type: IPX7 (waterproof)

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +40°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 800 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- IEC 62471: risk group 1
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

2. VIDEO CAMERAS

ACCESSORIES FOR VIDEO CAMERAS



Art.N°	Description
S_097_0001	24mm HD coupler C-mount, scope holder with locking capacity for S_397 camera head Weight: 60 g Protection type: IPX7 (waterproof)
S_097_0002	24mm HD coupler C-mount, scope holder with locking capacity for S_397 camera head With high torque focus ring for Arthroscopy Weight: 60 g Protection type: IPX7 (waterproof)



Art.N°	Description
S_701004	18mm Beamsplitter 90° C-mount, 360° rotatable head with locking capacity, without eyepiece, for S_397 camera head Protection type: IPX7 (waterproof)



Art.N°	Description
S_413024	16-34mm HD Zoom coupler C-mount, scope holder Protection type: IPX7 (waterproof) Compatible with all C-mount cameras



Art.N°	Description
S_084_0001	18,5mm coupler C-mount, scope holder with locking capacity Weight: 20 g Protection type: IPX7 [waterproof] Compatible with all C-mount cameras Designed for S_181, S_165 & S_184
S_084_0007	13mm coupler C-mount, scope holder with locking capacity Weight: 20 g Protection type: IPX7 [waterproof] Compatible with all C-mount cameras Designed for S_181, S_165 & S_184



Art.N°	Description
S_067_0004	22mm coupler C-mount, scope holder with locking capacity Weight: 44 g Protection type: IPX7 [waterproof] Compatible with all C-mount cameras
S_067_0002	22mm coupler C-mount, scope holder with locking capacity With high torque focus ring for Arthroscopy Weight: 44 g Protection type: IPX7 [waterproof] Compatible with all C-mount cameras



Art.N°	Description
S_367_0002	18mm HD coupler C-mount, scope holder with locking capacity Weight: 54 g Protection type: IPX7 [waterproof] Compatible with all C-mount cameras
S_367_0003	18mm HD coupler C-mount, scope holder with locking capacity, With high torque focus ring for Arthroscopy Weight: 54 g Protection type: IPX7 [waterproof] Compatible with all C-mount cameras



Art.N°	Description
700337	Jack to USB adapter for S_184 Camera & SIM software [trial version]

2. VIDEO CAMERAS

ACCESSORIES FOR VIDEO CAMERAS



Art.N°	Description
302027	Storz®/Olympus® Adapter for Flexible Scopes



Art.N°	Description
302030	Fujinon® Adapter for Flexible Scopes



Art.N°	Description
302032	Pentax® Adapter for Flexible Scopes



Art.N°	Description
700381	USB2 Amplifier 5 meter long for S_181 camera



Art.N°	Description
009002	Footswitch with jack connector

Art.N°	Description
009009	USB footswitch for SOPRO™ Imaging Medical



Art.N°	Description
002158	Small USB extension [0.8m] for UBICAM® S181



Art.N°	Description
S_397_1000	Communication kit for S 397 & S 640 (45L & 30L)



Art.N°	Description
700206	Medical Keyboard Soakable, QWERTY, PS2, for S_397 camera



3

LIGHT SOURCES

LIGHT SOURCES

SYMBIOZ Led	p34
SOPRO™ 230 & SOPRO™ 218	p36
SOPRO™ 284	p38
Ubilight®	p40
Accessories for light sources	p42
Light cables	p42
Accessories for light cables	p43



3. LIGHT SOURCES

300W* LED Light Source

SYMBIOZ *Led*



Art.N°	Description
S_298_0001	SYMBIOZ LED light source - EU
S_298_0002	SYMBIOZ LED light source - US



* Light intensity equivalent to 300 Watts Xenon Light Source with less power consumption

SPECIFICATION

S_298_0001 & S_298_0002

- LED technology
- LED lifetime: up to 50.000 hours
- Light intensity equivalent to 300W Xenon light source
- Automatic or manual adjustment of the light intensity
- Color temperature > 6500°K
- Automatic thermal protection system
- Anti-blinding feature with light cable detection
- Standby mode
- Electronic iris
- Power level memory
- Service menu with key information

- 7" 16/9 touchscreen with intuitive interface
- External control from SYMBIOZ camera head thanks to ISYME concept
- Compatible with Storz® and Olympus® light adapter cables
- Dimensions (W x H x D): 310 x 136 x 385mm
- Weight: 5000 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60Hz
- Power consumption: 160 VA
- 14 languages
- Continuous service

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, CF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +40°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 800 hPa to 1060 hPa

- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- IEC 62471: risk group 1
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

3. LIGHT SOURCES

XENON LIGHT SOURCES



SOPRO
230

Art.N°	Description
S_230_0002	XENON 300W Light source, Storz® Adapter - EU
S_230_0007	XENON 300W Light source, Olympus® Adapter -EU
S_230_0005	XENON 300W Light source, Storz® Adapter - US
S_230_0009	XENON 300W Light source, Olympus® Adapter - US
Contact us	Wolf® adapter



SOPRO
218

Art.N°	Description
S_218_0007	XENON 180W Light source, Storz® Adapter - EU
S_218_0010	XENON 180W Light source, Olympus® Adapter - EU
S_218_0006	XENON 180W Light source, Storz® Adapter - US
S_218_0011	XENON 180W Light source, Olympus® Adapter - US
Contact us	Wolf® adapter

COMMON SPECIFICATION

S230: S_230_0002, S_230_0007, S_230_0005, S_230_0009

S218: S_218_0007, S_218_0010, S_218_0006, S_218_0011

- Xenon technology
- Bulb lifetime: 500 hours
- Light intensity adjustment with touch buttons
- Infrared filter: the light cable can stay in the light source without any risk of over-heating
- Anti-blinding feature with light cable detection
- Standby button closing mechanical iris to 10% of light intensity
- Light intensity and bulb age displayed on LCD screen
- Easy access to the bulb
- Dimensions (W x H x D): 300 x 311 x 125mm
- Weight: 5000 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60 Hz
- Two Fuses T 4A (Marked UL/CSA only)
- Continuous service

DEDICATED SPECIFICATION

	S 230 <i>S_230_0002</i> <i>S_230_0007</i> <i>S_230_0005</i> <i>S_230_0009</i>	S 218 <i>S_218_0007</i> <i>S_218_0010</i> <i>S_218_0006</i> <i>S_218_0011</i>
Nominal operating power	300 W	180 W
Color T°	6200°K	5800°K
Power consumption	485VA	450VA

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, CF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 85%
- Transport and storage temperature: -20°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

3. LIGHT SOURCES

180W* LED LIGHT SOURCE

SOPRO
284



Art.N°	Description
S_284_0001	LED light source EU power cord - Storz® Adapter
S_284_0002	LED light source US power cord - Storz® Adapter
S_284_0003	LED light source EU power cord - Olympus® Adapter
S_284_0004	LED light source US power cord - Olympus® Adapter
Contact us	Adapters



* Light intensity equivalent to 180 Watts Xenon light source with less power consumption

SPECIFICATION

S_284_0001 & S_284_0002 / S_284_0003 & S_284_0004

- LED technology
- LED lifetime: up to 50.000 hours
- Light intensity equivalent to 180W Xenon light source
- Intuitive adjustment of light intensity
- Color temperature: 6 500°K
- Automatic thermal protection system
- Anti-blinding feature with light cable detection
- Standby mode
- Electronic iris
- Power level memory
- 2.7" OLED screen
- Compatible with Storz® type light cables (Olympus® in option)
- Dimensions (W x H x D): 300 x 300 x 66mm
- Weight: 2400 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60 Hz
- Power consumption: 140 VA
- T800mA - 250V fuses (Marked UL only)
- Continuous service

REGULATORY & ENVIRONMENT

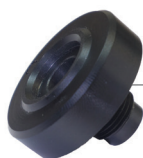
- Electrical safety: Class 1 device, CF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +40°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 800 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- IEC 62471: risk group 1
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

3. LIGHT SOURCES

100 W* LED LIGHT SOURCE



Art.N°	Description
S_281_0002	LED light source with external transformer Storz® connector by default



Option:

Art.N°	Description
402046	Olympus® connector for S_281 LED light source

* Light intensity equivalent to 100 Watts Xenon light source with less power consumption

SPECIFICATION *S_281_0002*

- LED technology
- LED lifetime: up to 50.000 hours
- Light intensity equivalent to 100W Xenon light source
- Intuitive adjustment of light intensity
- Color temperature: > 4500°K
- Automatic thermal protection system
- Anti-blinding feature with light cable detection
- Standby mode
- Power level memory
- Low heat generation
- Compatible with Storz® type light cables (Olympus® optional)
- Dimensions (W x H x D): 180 x 95 x 35mm
- Weight: 320 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 240 VAC / 50 - 60 Hz
- Power consumption: 30 VA
- Transformer: 12V DC
- Continuous service

REGULATORY & ENVIRONMENT

- Electrical safety: Class 2 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1; IEC 60601-2-18; IEC 60417 and EN 980
- IEC 62471: risk group 2
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

3. LIGHT SOURCES

ACCESSORIES FOR LIGHT SOURCES Replacement Bulbs



Art.N°	Description
006003	300W Xenon bulb
006005	180W Xenon bulb

LIGHT CABLES



- **Compatible with all light sources and autoclavable at 134°C (273,2°F)**
- Reinforced sheath
- Universal model delivered without connectors

Ø	L.	Art.N°
4.8mm	3m	S_700382
	2.3m	S_700384
3.5mm*	3m	S_700216
	2.3m	S_700215

*For scope diameter < 4mm



Art.N°	Description
700602	90° connector for rigid endoscope

ACCESSORIES FOR LIGHT CABLES

Endoscope side connectors



Art.N°	Description
700051	Connector for universal light cable, endoscope side type Storz®/Olympus®



Art.N°	Description
700043	Connector for universal light cable, endoscope side type Wolf®/S&N



Art.N°	Description
700048	Connector for universal light cable, endoscope side type Acmi/Stryker®

Light source side connectors



Art.N°	Description
700044	Connector for universal light cable, light source side type Storz®



Art.N°	Description
700045	Connector for universal light cable, light source side type Olympus®



Art.N°	Description
700046	Connector for universal light cable, light source side type Wolf®/S&N



Art.N°	Description
700047	Connector for universal light cable, light source side type Acmi/Stryker®



4

INSUFFLATORS

INSUFFLATORS

SYMBIOZ Flow	p46
SOPRO™ 640	p48
Accessories	p50
CO2 connection	p51
CO2 cylinder connection	p51

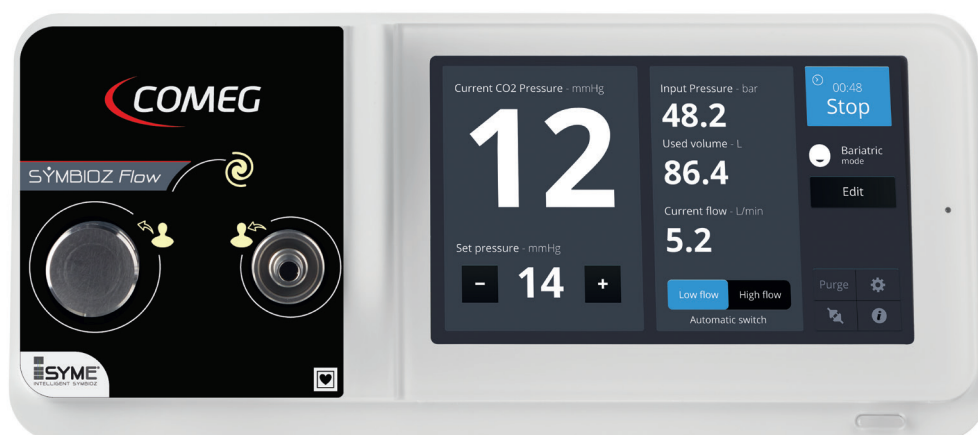


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4. INSUFFLATORS

45L/min insufflator

SYMBIOZ *Flow*



Art.N°	Description
S_698_0001	SYMBIOZ Flow 45L/min insufflator - EU
S_698_0002	SYMBIOZ Flow 45L/min insufflator - US

SPECIFICATION

S_698_0001 & S_698_0002

- Maximum flow: 45L/min in high flow mode - 2L/min in low flow mode
- Automatic flow rate management according to leakages
- Manual or automatic low flow/high flow switching
- Set cavity pressure: From 0 to 25mmHg (accuracy of 1mmHg)
- 7" 16/9 touchscreen with intuitive interface displaying: immediate flow, intra-cavity pressure, low cylinder levels, total volume of CO2 used, chronometer
- Clear messages displayed both on touchscreen and main monitor with sound alarms
- External control from SYMBIOZ camera head thanks to ISYME concept
- External exsufflation valve for over pressure to avoid cross contamination
- Purge feature
- Smooth design for easy disinfection
- Specific setting for Bariatric surgery
- Automatic calibration of the device
- Real time display of CO2 cylinder pressure or central CO2 supply pressure
- Patented autonomy feature: Displays in minutes the remaining time of insufflation
- Internal pre heating system
- CO2 gas supply system: US 7/16" connector
- CO2 gas cylinder compatible (10 to 60 bars)
- CO2 central gas supply compatible (3 to 5 bars)
- Open-ended spanner intended for CO2 high-pressure hose connector
- Disposable or reusable tubings
- Dimensions (W x H x D): 310 x 136 x 385mm
- Weight: 8000 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60Hz
- Power consumption: 75 VA
- Two T2.5 AL - 250V delayed action fuses (Marked UR only)
- 14 languages
- Continuous service

INSUFFLATORS

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, CF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +45°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class IIa
- Compliant with international standards IEC 60601-1; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

4. INSUFFLATORS

From 20L/min to 45L/min insufflators

SOPRO
640
icons



Art.N°	Description
S_640_4002	45 L - EU Power Cord - with autonomy feature
S_640_4004	45 L - US Power Cord - with autonomy feature
S_640_3005	30 L - EU Power Cord - with autonomy feature
S_640_3008	30 L - US Power Cord - with autonomy feature
S_640_2002	20 L - EU Power Cord
S_640_2004	20 L - US Power Cord

COMMON SPECIFICATION

45L: S_640_4002 & S_640_4004

30L: S_640_3005 & S_640_3008

20L: S_640_2002 & S_640_2004

- Maximum flow rate in low flow mode: 2L/min
- Automatic flow rate management according to leakages
- Manual or automatic low flow/high flow switching
- Set cavity pressure: From 0 to 25mmHg (accuracy of 1mmHg)
- 5.7-inch LCD screen displaying: immediate flow, intra-cavity pressure, low cylinder levels, total volume of CO2 used, chronometer
- Clear messages displayed with sound alarms
- Preventive maintenance message
- External exsufflation valve for over pressure to avoid cross contamination
- Purge feature
- Automatic calibration of the device
- Real time display of CO2 cylinder pressure
- Thumbwheel navigation and validation system
- Internal pre heating system
- CO2 gas supply system: US 7/16" connector
- CO2 gas cylinder compatible (10 to 60 bars)
- Open-ended spanner intended for CO2 high-pressure hose connector
- Disposable or reusable tubings
- Dimensions (W x H x D): 300 x 340 x 145mm
- Weight: 5000 g
- Protection type: IPX0 (not drip-proof)
- Power supply: 100 - 230 VAC / 50 - 60 Hz
- Power consumption: 75VA
- Two 2,5 AT - 250V time-lag fuses (Marked UR only)
- 5 languages (FR, IT, ES, EN, DEU)
- Continuous service

Option 45L: S_640_4002 & S_640_4004

30L: S_640_3005 & S_640_3008

- Patented autonomy function: display in real time the remaining time of insufflation
- CO2 central gas supply compatible (3,5 to 4 bars)
- Real time display of central CO2 supply pressure

DEDICATED SPECIFICATION

Ref EU Ref US	S 640 45L device S_640_4002 S_640_4004	S 640 30L device S_640_3005 S_640_3008	S 640 20L device S_640_2002 S_640_2004
Maximum flow	45L/min	30L/min	20L/min
Bottle & wall supply	✓	✓	Bottle only
Autonomy feature	✓	✓	
External control via S 397 camera head with S_397_1000 (icons technology)	✓	✓	

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -10°C / +40°C
- Transport and storage relative humidity: 20% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class IIa
- Compliant with international standards IEC 60601-1; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

4. INSUFFLATORS

ACCESSORIES



Art.N°	Description
607103L	Sterile single use insufflation tubing made of PVC With CO2 viral filter Delivered by pack of 20 pieces



Art.N°	Description
607043L	Reusable insufflation tubing, autoclavable Without filter Delivered by 1 piece



Art.N°	Description
016006L	Sterile viral CO2 filter, single use, 0,027µ For 607043L Delivered by pack of 50 pieces



Art.N°	Description
S_397_1000	Communication kit for S 397 & S 640 (45L & 30L)

CO2 CONNECTION



Art.N°	Description
017036L	Flexible hose for high pressure CO2 cylinder (60bars) US-DIN 477-1, n°6, 1 meter FOR EUROPE
017037L	Flexible hose for high pressure CO2 cylinder (60bars) US-UNF 7/16" US, 1 meter FOR USA
S391000023	Flexible hose for high pressure CO2 cylinder (60bars) US-IT (ISO5145), 1 meter FOR ITALY
Art.N°	Description
Contact us	Central gas supply hoses (Max. 7 bars)

INSUFFLATORS

CO2 CYLINDER CONNECTION



Art.N°	Description
017023	Pin Index connection for DIN 477-1 n°6
017034	Pin Index connection for UNF 7/16" US



5

FLUID MANAGEMENT

FLUID MANAGEMENT

SOPRO™ 672*p54

SOPRO™ 673*p56



* Not for sale in the USA
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5. FLUID MANAGEMENT

HYSTEROSCOPY IRRIGATION PUMP

SOPRO
672



Art.N°	Description
S_672_0001*	Irrigation pump for Hysteroscopy

SPECIFICATION *S_672_0001*

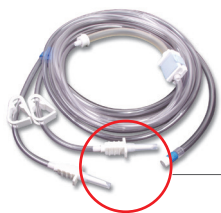
- Pressure range: 15-150mmHg
- Flow range: 30-500 ml/min
- High pressure safety: 200mmHg
- Dimensions (W x H x D): 265 x 137 x 390mm
- Weight: 4000 g
- Protection type: IP41
- Power supply: 100 - 240 VAC / 50 - 60Hz
- Power consumption: 45 VA
- Max. sound level: < 80dB
- Two T 3.15 AH, 250V fuses (Marked UL only)
- Continuous service

REGULATORY & ENVIRONMENT

- Electrical safety: class 1 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -20°C / +70°C
- Transport and storage relative humidity: 10% to 90%
- Operating, storage and transport atmospheric pressure range: 700 hPa to 1 060 hPa
- Compliant with European directive 93/42/EEC - Class IIb
- Compliant with international standards IEC 60601-1; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous

* Not for sale in the USA

ACCESSORIES



Art.N°	Description
700401L	Sterile tube set with Luer Lock connection Delivered by pack of 10 pieces



Art.N°	Description
700402	Reusable tube set (20 uses) Delivered by 1 piece



Art.N°	Description
700403L	Sterile tube set with Safe Lock connection Delivered by pack of 10 pieces



Art.N°	Description
700404L	Tube set for outflow, disposable Delivered by pack of 10 pieces



Art.N°	Description
700268	Suction regulator, 0 to -200mbar (0 to -150mmHg), maximum flow 20L/min, NF connection, autoclavable bocal at 134°C
700269	Bacteriological filters Delivered by pack of 100 pieces



Art.N°	Description
700425	Bemis container - Single use Delivered by pack of 2 pieces
Art.N°	Description
700405	Scale (for fluid balance)

5. FLUID MANAGEMENT

LAPAROSCOPY IRRIGATION AND SUCTION PUMP

SOPRO
673



Art.N°	Description
S_673_0001*	Irrigation and suction pump for Laparoscopy

SPECIFICATION *S_673_0001*

- Max. flow rate irrigation: 1.8L/min
- Max. flow rate suction: 1.8L/min
- Max. pump capacity: 400mmHg
- Suction: Between -50 kpa and -60 kpa
- Dimensions (W x H x D): 280 x 137 x 408mm
- Weight: 5900 g
- Protection type: IP40
- Power supply: 100 - 240V / 50 - 60Hz
- Power consumption: 55 VA
- Max. sound level: < 80 dB
- Two T 500 mA, 250V fuses (Marked UL only)
- Continuous service

REGULATORY & ENVIRONMENT

- Electrical safety: class 1 device, BF type applied parts
- Operating temperature: +10°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -40°C / +70°C
- Transport and storage relative humidity range: 10% to 85%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class IIa
- Compliant with international standards IEC 60601-1; IEC 60417 and EN 980
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

* Not for sale in the USA

ACCESSORIES



Art.N°	Description
700401L	Sterile tube set with Luer Lock connection Delivered by pack of 10 pieces
Contact us	Reusable tube



Art.N°	Description
700403L	Sterile tube set with Safe Lock connection Delivered by pack of 10 pieces



Art.N°	Description
700421	Tube set suction, reusable (20 uses) Delivered by 1 piece
700422	Tube set vacuum, reusable (20 uses) Delivered by 1 piece



Art.N°	Description
700423L	Hydrophobic filter



Art.N°	Description
700425	Bemis container - Single use Delivered by pack of 2 pieces



Art.N°	Description
700424	Coil of wire for Bemis container - Reusable Diameter: 142mm



6

MONITORS

MONITORS

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Panasonic® 26" Full HD	p61
Barco® 19" HD	p62
AG Neovo® 21,5" Full HD.....	p63
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6. MONITORS

OPERATING ROOM

SONY® 27"
FULL HD



Art.N°	Description
S_700696	SONY® Medical monitor with COMEG logo LCD 2D Full HD 27" Model: LMD-2735MD

SPECIFICATION *S_700696*

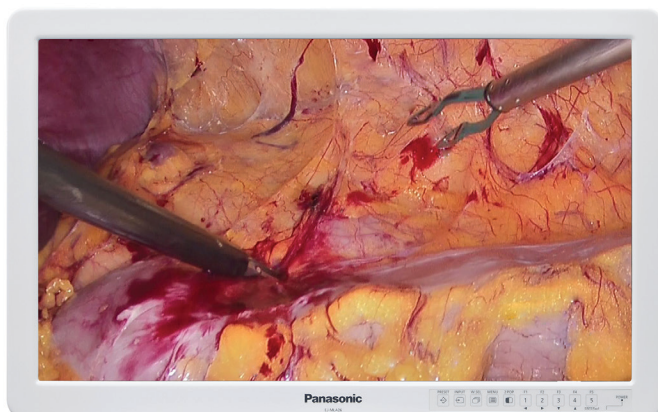
- Panel: 27" - a-Si TFT AM LCD technology
- Resolution: 1920 x 1080 pixels
- Luminance: 300 cd/m²
- Contrast ratio: 1000:1
- Aspect ratio: 16:9
- Colors: approx. 16,7 millions
- Video inputs: 1 x DVI-D, 1 x HD-SDI, 1 x RGB, 1 x S-video, 1 x Comp, 1 x RS-232, 1 x RJ45
- Video outputs: 1 x DVI-D
- OSD languages: EN / CH / ES / IT / DEU / FR / JA / RUS
- Mounting: VESA 100mm
- Dimensions [W x H x D]: 660 x 427 x 78mm
- Weight: 8700 g
- Protection type: IPX1
- Power supply: 100 - 240 VAC / 50 - 60 Hz
- Power consumption: 57 VA

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, no applied parts
- Operating temperature: +0°C / +35°C
- Operating relative humidity: 30% to 85%
- Transport and storage temperature: -20°C / +60°C
- Transport and storage relative humidity: 20% to 90%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1-1; 60601-1-2; CCC; FCC-B P CAN/CSA, ICES-001; VCCI Class B
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

OPERATING ROOM

PANASONIC® 26'' FULL HD



MONITORS

Art.N°	Description
S_700427	PANASONIC® Medical grade surgical display, Full HD 26'' Model: EJ-MLA26Z2

SPECIFICATION *S_700427*

- Panel: 26" - TFT AM LCD technology
- Resolution: 1920 x 1080 pixels
- Luminance: 500 cd/m2
- Contrast ratio: 1400:1
- Aspect ratio: 16:9
- Colors: 1,07 billions
- Response speed: 8ms
- Video inputs: 2 x DVI-D, 1 x HD-SDI, 1 x RGB, 1 x S-video, 1 x Comp.
- Video outputs: 1 x DVI-D, 1 x HD-SDI, 1 x RGB, 1 x S-video, 1 x Comp
- OSD languages: EN / ES / IT / GE / FR / JA
- Mounting: VESA 100mm
- Dimensions (W x H x D): 396 x 643 x 87mm
- Weight: 7700 g
- Protection type: IPX2
- Power supply: 100 - 240 VAC / 50 - 60 Hz
- Power consumption: 69 VA

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device, no applied parts
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards IEC 60601-1-1; 60601-1-2; CCC; CE (MDD)
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

6. MONITORS

OPERATING ROOM



BARCO® 19''
HD

Art.N°	Description
S_700653	BARCO® Medical grade surgical display, HD 19'' Model: E192HC

SPECIFICATION *S_700653*

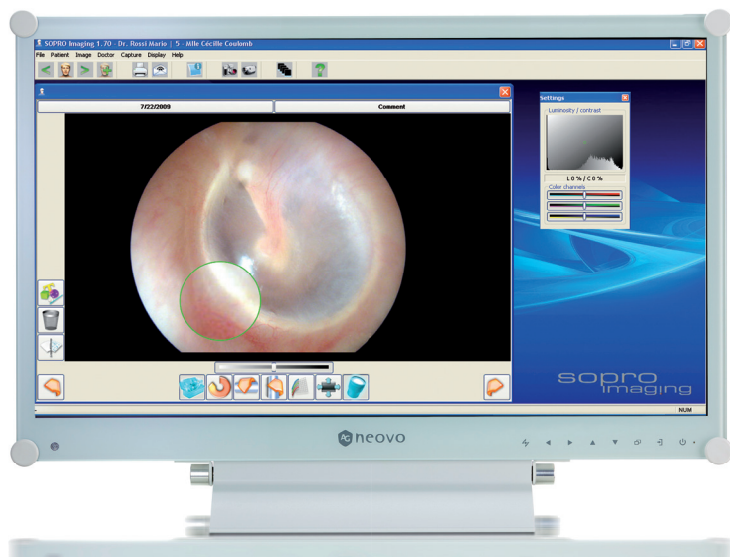
- Panel: 19" - TFT AM LCD technology
- Resolution: 1280 x 1024 pixels
- Luminance: 330 cd/m²
- Contrast ratio: 900:1
- Aspect ratio: 5:4
- Colors: 16,7 millions
- Response speed: 18 ms
- Video inputs: 1x DVI-I, 1x S-Video, 1 Comp
- Video outputs: 1x DVI-D, 1x S-Video, 1x Comp
- OSD languages: EN / ES / IT / DEU / FR
- Mounting: VESA 100mm
- Dimensions (W x H x D): 425 x 375 x 97mm
- Weight: 5800 g
- Power supply: 100 - 250 VAC / 47 - 63 Hz
- Power consumption: 35 VA

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device - no applied parts
- Operating temperature: +0°C / +40°C
- Operating relative humidity: 20% to 90%
- Transport and storage temperature: -20°C / +60°C
- Transport and storage relative humidity: 5% to 90%
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standard:
 - IEC 60601-1: 2005 + CORR. 1 [2006] + CORR. 2 [2007]
 - ANSI/AAMI ES 60601-1 [2005 + C1:09 + A2:10]
 - CSA-C22.2 nr 601-1-M90 CAN/CSA-C22.2 No. 60601-1 [2008]
 - EN 60601-1:2006/A11:2011, EN 60601-1:2006/A12:2014, EN 60601-1:2006
 - Electromagnetic Compatibility: EMC Medical EMC Standards: IEC60601-1-2 [2007], EN60601-1-2 [2007], FCC CFR47 part 15 Subpart B, Class B
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

CONSULTING ROOM

AG NEOVO® 21,5" Full HD



MONITORS

Art.N°	Description
S_700545	AG NEOVO® Diagnostic display, Full HD 21,5" Model: X22-W

SPECIFICATION *S_700545*

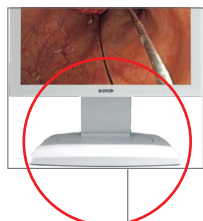
- Panel: 21,5" - TFT LCD technology
- Resolution: 1920 x 1080 pixels
- Luminance: 250cd/m2
- Contrast Ratio: 2 000 000:1
- Aspect ratio: 16:9
- Colors: approx. 16,7 millions
- Response speed: 5 ms
- Video inputs: 1x HDMI, 1x VGA, 1x DVI, 1x CVBS, 1x S-Video
- OSD languages: EN / ES / IT / PY / DEU / FR / RO / PL / CS / NL / JA / CH
- Mounting: VESA 75/100mm
- Dimensions [W x H x D]: 513 x 369 x 155mm
- Weight: 6900 g
- Connector Power: 3-Pin AC Plug
- Power supply: 100 - 240 VAC / DC 12V / 50 - 60Hz
- Power consumption: < 28VA
- Delivered with desktop stand

REGULATORY & ENVIRONMENT

- Electrical safety: Class 1 device - no applied parts
- Operating temperature: +0°C / +40°C
- Operating relative humidity: 10% to 90%
- Transport and storage temperature: -20°C / +60°C
- Transport and storage relative humidity: 5% to 95%
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standard: FCC; CB; RoHS; WEEE; REACH; GOST-R
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

6. MONITORS

ACCESSORIES



Art.N°	Description
700057	Desktop stand for monitor with VESA mounting



Art.N°	Description
700311	Protection glass for BARCO® 19" monitor

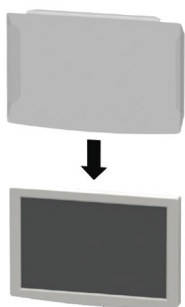


Art.N°	Description
700320	Extension cable for BARCO® 19" monitor (to be used with long arm medical cart)

ACCESSORIES



Art.N°	Description
700376	Extension power cable for PANASONIC® 26" monitor (to be used with long arm medical cart)



Art.N°	Description
700577	Protection glass for PANASONIC® 26" monitor

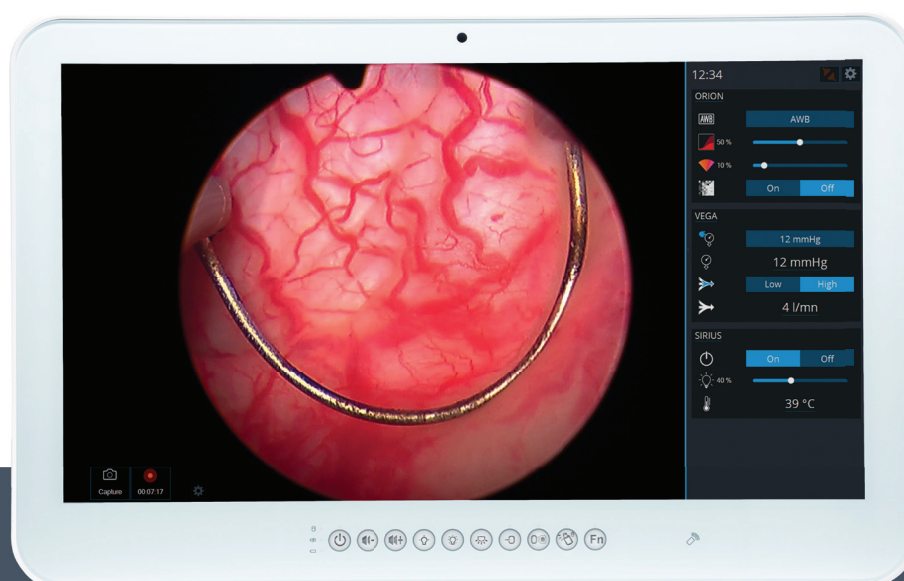


7

COMMUNICATION & ARCHIVING SYSTEMS

COMMUNICATION & ARCHIVING SYSTEMS

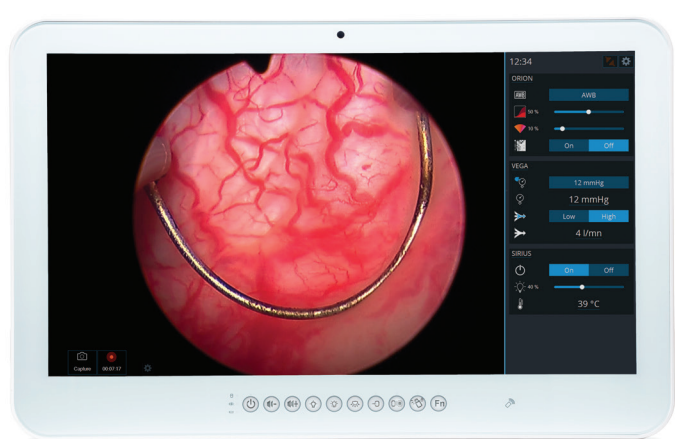
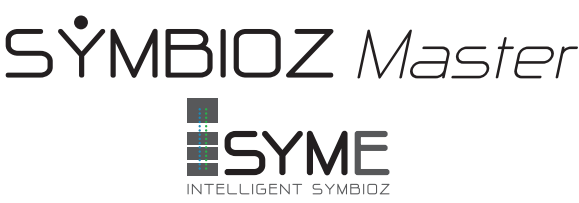
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USB medical recorder - USB 300*	p71
Medical grade DVD recorder	p72
Medical printer - SONY® printer	p74
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* Not for sale in the USA

7. COMMUNICATION & ARCHIVING SYSTEMS

COMMUNICATION SYSTEM



Art.N°	Description
S_098_0002	SYMBIOZ Master - Intuitive communication system with REMOTE, IMAGING and ISYMORE features

**ISYMORE**
IMAGE ENHANCEMENT

ISYMORE is a chromatic image enhancement technology developed to improve anatomical vascularization visualization.

Options:	
Contact us	DICOM option for SYMBIOZ Master
Contact us	STREAMING option for SYMBIOZ Master

SPECIFICATION

S_098_0002

- Panel: 22" TFT LCD touch screen technology
- Resolution: 1920 x 1080 pixels
- Luminance: 250 cd/m²
- Contrast ratio: 3000:1
- Intel Core i5/i3 processors
- 8GB RAM
- 320GB HDD
- Chromatic image enhancement (ISYMORE)
- Remote software included to remote control and get feedback from SYMBIOZ Cam, SYMBIOZ Led and SYMBIOZ Flow
- Imaging software to record Full HD images and video and manage a patient database
- Negatoscope function
- Reports edition and personalization
- Video inputs/outputs: 4x USB 3.0, 2x USB 2.0, 1x RS232, 1x RS232/422/485, 2x RJ45, 2x 3.5mm jack connectors, 2x DP video outputs, 1x DVI-D video input, 1x DC-in jack, 2x 5W speaker
- Mounting: VESA 75/100mm
- Dimensions (W x H x D): 606 x 398 x 65.6mm
- Weight: 9000 g
- Protection: IPX1
- Power supply: 100 - 240 VAC / DC 12V / 47 - 63 Hz
- Power consumption: 106 VA

REGULATORY & ENVIRONMENT

- Operating temperature: +0°C / +40°C
- Operating relative humidity: 10% to 90%
- Transport and storage temperature: -20°C / +60°C
- Transport and storage relative humidity: 10% to 90%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive 93/42/EEC - Class I
- Compliant with international standards: FCC; CE / VCCI Class B; cULus Mark / UL60601-1; EN 60601-1 approved / ISO 14971 / IEC 62133; Energy star 6.1 compliance
- Not suitable for use in the presence of a flammable anaesthetic with air or oxygen or nitrous oxide

7. COMMUNICATION & ARCHIVING SYSTEMS

MEDICAL RECORDERS

USB medical recorders



USB 200

Art.N°	Description
S_700091*	M-USB 200 for videos and still images recording

Art.N°	Description
009002	Footswitch with jack connector

SPECIFICATION *S_700091*

- LCD monitor: 2x 1/2" full color
- Recording resolution: from 1280 x 1024 to 640 x 480 pixels
- Buttons: Sealed membrane, fluid resistant
- Video/Audio inputs/outputs: 1x S-video, 1x Comp for both input & output, 2x 3.5mm stereo phone jack
- USB support: USB 2.0 high speed (1 front, 3 rear)
- Medias: USB flash drives or external USB hard drive
- Footswitch: Hands-free capture - standard 3.5mm mini jack
- Image formats: JPEG, TIFF, PNG, DICOM
- Images sizes: 1024 x 768; 800 x 600; 640 x 480 pixels
- Video formats: MPEG2 [DVD quality] (PAL/NTSC format)
- Dimensions (W x H x D): 240 x 200 x 63mm
- Weight: 1700 g
- Power supply: 100 - 240 VAC / 50 - 60Hz

REGULATORY & ENVIRONMENT

- Operating temperature: -20°C / +40°C
- Transport and storage temperature: -40°C / +85°C
- Compliant with European directive: 93/42/EEC, Class I
- Compliant with international standards: IEC 60601-1; E361228; PSE; GOST-R; FCC Rules part 15; RoHS compliant

* Not for sale in the USA

MEDICAL RECORDERS

USB medical recorders



USB 300

Art.N°	Description
S_700211*	M-USB 300 for Full HD videos and still images recording

Art.N°	Description
009002	Footswitch with jack connector

SPECIFICATION

S_700211

- LCD monitor: 2x 1/2" full color
- Recording resolution: from 1920 x 1080 to 640 x 480 pixels
- Buttons: Sealed membrane, fluid resistant
- Video outputs: 1x DVI, VGA via adapter
- Video inputs: 1x DVI, 1x HD-SDI, 1x S-video, 1x comp, 1x RJ45, RGB via adapter
- Storage: internal 1TB hard drive, external USB 3.0 drives, network drives
- Footswitch: Hands-free capture - standard 3.5mm mini jack
- Image formats: JPEG, TIFF, BMP, DICOM
- Video formats: H.264 / MPEG4 (PAL/NTSC format)
- Dimensions (W x H x D): 240 x 211 x 63mm
- Weight: 1800 g
- Power supply: 100 - 240 VAC / 50 - 60Hz
- 1 A - 250 V fuses

REGULATORY & ENVIRONMENT

- Operating temperature: -20°C / +40°C
- Operating relative humidity: 30% to 75%
- Transport and storage temperature: -40°C / +85°C
- Transport and storage relative humidity: 0% to 93%
- Operating, storage and transport atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive: 93/42/EEC - Class I
- Compliant with international standards: IEC 60601-1; E361228; PSE; GOST-R; FCC Rules part 15; RoHS compliant

* Not for sale in the USA

7. COMMUNICATION & ARCHIVING SYSTEMS

MEDICAL RECORDERS

Medical grade DVD recorder



Art.N°	Description
S_700651	SONY® DVD recorder HD

SPECIFICATION *S_700651*

- Recording resolution: 1280 x 720 pixels, 720 x 480i
- Recording Format: AVCHD, MPEG4
- Simultaneous recording internal HDD and external media
- Storage: USB drives, network drives, internal 500GB hard drive
- Video inputs: 1x DVI-D, 1x HDMI, 1x S-Video, 1x comp + audio
- Video outputs: 1x DVI-D, 1x HDMI, 1x S-Video, 1x comp + audio
- Dimensions (W x H x D): 212.0 × 105.5 × 290mm
- Weight: 3200 g
- Power supply: 100 - 240 VAC / 50 - 60Hz
- Power Consumption: 42 VA / 12 - 24 VDC

REGULATORY & ENVIRONMENT

- Operating temperature: +5°C / +40°C
- Operating relative humidity: 20% to 80%
- Transport and storage temperature: -20°C / +60°C
- Transport and storage relative humidity: 20% to 90%
- Operating, transport and storage atmospheric pressure: 700 hPa to 1060 hPa
- Compliant with European directive: 93/42/EEC - Class I
- Compliant with international standards: EN55022 : 2010 Class B, EN 55024 : 2010; EN 60601-1-2: 2007; EN 60601-1: 2006 RoHS
- Product safety standards for United States, Canada and Europe

7. COMMUNICATION & ARCHIVING SYSTEMS

MEDICAL PRINTER



Art.N°	Description
S_700262	SONY® printer UP 25 MD HD

SPECIFICATION *S_700262*

- Printing method: Transfer by thermal sublimation
- Resolution: 2 132 x 1 600 pixels - 423 dpi
- Print speed: 29 seconds
- TV coding system: PAL / NTSC
- HDTV IN/OUT: 1080i/59.94i, 1080/50i (2:1 interlaced) 720/59.94p, 720/50p (progressive)
- Paper tray size: Max.. 50 sheets
- Interface: RGB/U/Pb/Pr (BNC) (x3): 0.7 Vc-c, Sync.
- On green: 0.3 Vc-c, Sync. Negative, SYNC (BNC) (x1): 0.3 to 4 Vc-c, sync. Negative, S Video (4 pin mini DIN) (x1): Y: 1 Vc-c. Sync. Negative, C: 0.286 Vc-c (NTSC), 0.3 Vc-c (PAL), Video (BNC) (x1): 1 Vc-c, sync. Negative
- Dimensions (W x H x D): 212 x 98 x 398mm
- Weight: 5700 g
- Power supply: 100-240 VAC / 50 -60Hz

REGULATORY & ENVIRONMENT

- Operating temperature: 5°C to 35°C
- Operating humidity: 20% to 80%
- Transport and storage temperature: -20°C to 60°C
- Transport and storage relative humidity: 20% to 80%
- Compliant with international standards: (US/CA) UL 60601-1; UL 60950-1; CSA C22.2 No.601.1; CSA C22.2 No.60950-1; (EU) EN 60601-1-1; EN 55022 (Classe B); EN 55024; EN 61000-3-2; EN 61000-3-3; (AU) EN55022 Class B; (JP) VCCI Class A; JIS C 61000-3-2; CE: MDD; EMC; LVD

MEDICAL PRINTER



Art.N°	Description
700076	A6 large size color print pack [200 sheets & 4 color ink ribbons] for S_700262 Delivered by 6 pieces Model: UPC-21L

SPECIFICATION

700076

- Format: A6

- Consumable Format: 144 x 100mm



8

IMAGING SOFTWARE

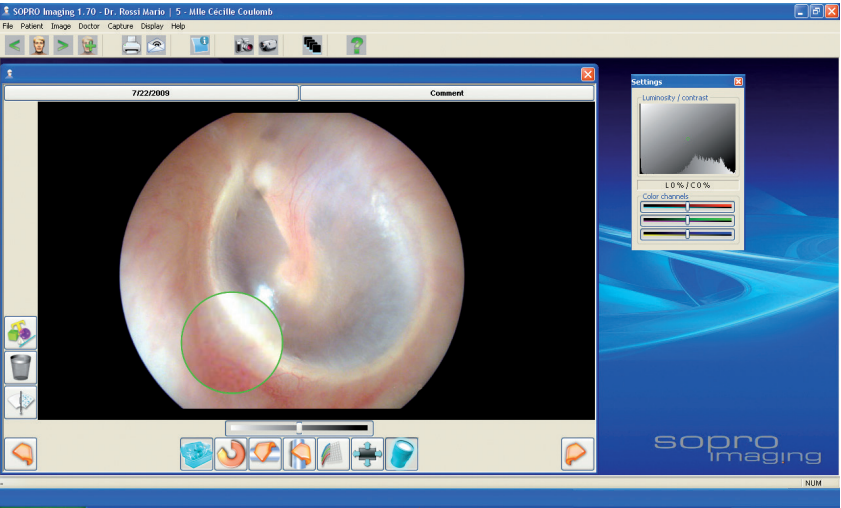
IMAGING SOFTWARE

SOPRO™ imagingp78



8. IMAGING SOFTWARE

MEDICAL IMAGING SOFTWARE



Art.N°	Description
505026	SOPRO™ Medical Imaging (SIM) license
990145	CD-ROM: SOPRO™ Medical Imaging software

SPECIFICATION

505026 & 990145

SOPRO™ Medical Imaging software constitutes a complete database of all your patients. A wide range of ergonomic and high-performance tools:

- Capture of images or video sequences,
- Photo/video annotation,
- Editing and personalization of medical reports,
- Simple and intuitive video editing,
- Audio recording,
- Data security.

CONFIGURATION

WINDOWS® MINIMUM CONFIGURATION REQUIRED

- Operating system: Windows® 7 Pro SP1
- Processor: Intel® core i5
- RAM: 4GB or more
- Hard disk: 1TB or more / 7200 tpm
- USB ports: 4 USB 2.0 Hi-Speed ports
- Graphic card: Chipset Nvidia® or ATI®
- 512MB unshared memory compatible DirectX 9
- USB Chipset: Intel® or NEC® / RENESAS®
- Screen resolution: 1280 x 1024 or more

WINDOWS® RECOMMENDED CONFIGURATION

- Operating system: Windows® 10 Pro SP1
- Processor: Intel® Core 2
- RAM: 2GB or more
- Hard disk: 1TB or more
- USB ports: 4 USB 2.0 Hi-Speed ports
- Graphic card: Chipset Nvidia® or ATI®
- 512MB unshared memory compatible DirectX 9
- USB Chipset: Intel® or NEC® / RENESAS®
- Screen resolution: 1280 x 1024 or more

ACCESSORIES



Art.N°	Description
700694	Medical Keyboard QWERTY Protection type: IPX7 (waterproof)
700695	Medical Keyboard AZERTY Protection type: IPX7 (waterproof)



Art.N°	Description
S_098_0001	Touch screen* - Delivered with SOPRO™ Medical Imaging software and license



9

MEDICAL CARTS

MEDICAL CARTS

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Basic carts	p83
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Ubicart +	p86
Ubicart	p87



9. MEDICAL CARTS

OPERATING ROOM



Premium carts

Premium & short arm

- 3x Adjustable shelves
- 1x Camera head holder
- 1x CO2 cylinder holder
- 1x Drawer
- 1x Long arm on central pivot
- 1x Short arm on central pivot
- 1x 5m Careflex Power Cord
- 7x 60cm connection power cables

Art.N°	Description
700598	Premium cart with long and short arms - EU
700624	Premium cart with long and short arms + transformer - EU
700678	Premium cart with long and short arms - US
700682	Premium cart with long and short arms + transformer - US
700686	Premium cart with long and short arms - UK
700690	Premium cart with long and short arms + transformer - UK

Premium

- 3x Adjustable shelves
- 1x Camera holder
- 1x CO2 cylinder holder
- 1x Drawer
- 1x Long arm on central pivot
- 1x 5m Careflex Power Cord
- 7x 60cm connection power cables



Art.N°	Description
700597	Premium cart with long arm - EU
700625	Premium cart with long arm + transformer - EU
700679	Premium cart with long arm - US
700683	Premium cart with long arm + transformer - US
700687	Premium cart with long arm - UK
700691	Premium cart with long arm + transformer - UK

Basic carts

Basic & short arm

- 3x Adjustable shelves
- 1x Camera head holder
- 1x CO2 cylinder holder
- 1x Drawer
- 1 x articulated Short arm
- 1x Fixed mount for flat panel
- 1x 5m Careflex Power Cord
- 7x 60cm connection power cables



Art.N°	Description
700596	Basic cart with fixed screen and short arm - EU
700627	Basic cart with fixed screen and short arm + transformer - EU
700680	Basic cart with fixed screen and short arm - US
700684	Basic cart with fixed screen and short arm + transformer - US
700688	Basic cart with fixed screen and short arm - UK
700692	Basic cart with fixed screen and short arm + transformer - UK

Basic

- 3x Adjustable shelves
- 1x Camera head holder
- 1x CO2 cylinder holder
- 1x Drawer
- 1x Fixed mount for flat panel
- 1x 5m Careflex Power Cord
- 7x 60cm connection power cables



Art.N°	Description
700595	Basic medical cart with fixed screen - EU
700628	Basic medical cart with fixed screen + transformer - EU
700681	Basic medical cart with fixed screen - US
700685	Basic medical cart with fixed screen + transformer - US
700689	Basic medical cart with fixed screen - UK
700693	Basic medical cart with fixed screen + transformer - UK

9. MEDICAL CARTS

ACCESSORIES



Art.N°	Description
700359	Pull-out shelf 320 x 450mm for keyboard



Art.N°	Description
700621	Camera holder (stainless steel)



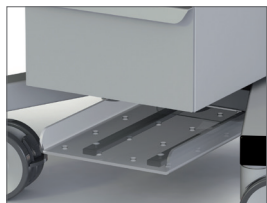
Art.N°	Description
700622	Cable hook (stainless steel)



Art.N°	Description
700619	CO2 cylinder holder 140mm (rear side cart)



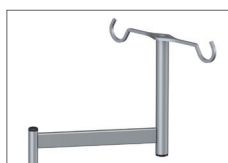
Art.N°	Description
700317	Shelf 320 x 450mm



Art.N°	Description
700361	Foot switch panel for undercarriage



Art.N°	Description
700618	Flexible scope holder



Art.N°	Description
700617	Serum holder



Art.N°	Description
700309	Power cord C13-C14 (60cm)



Art.N°	Description
700616	EQP connection lead (60cm)

9. MEDICAL CARTS

CONSULTING ROOM

Ubicart +



Ubicart +

- Adjustable height
- Camera holder
- Standard mount (VESA 75/100mm)
- Durable, easy to clean
- Large, smooth worksurface
- Cable storage
- Screen orientation

Art.N°	Description
990242	UBICART+ including storage compartment, mouse and keyboard holder



Ubicart

Ubicart

- 1 x 4 way Power strips
- 1 x Serum holder
- 1 x Camera holder
- 1 x Light cable holder

Art.N°	Description
700362	UBICART including power strips, serum, camera and light cable holders
700418	UBICART including power strips, serum, camera, light cable holders and isolation transformer
707039	Extra shelf (450 x 320mm) for UBICART



10

PACKS



PACKS

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10. PACKS

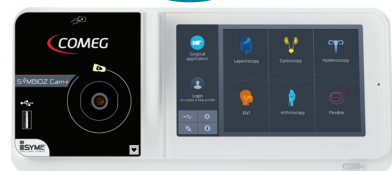
SYMBIOZ+ PACKS



SYMBIOZ *Flow*

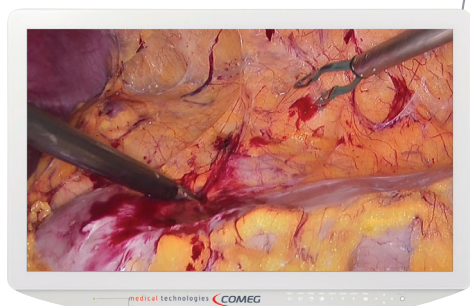


CAMERA
HEAD



SYMBIOZ *Cam+*

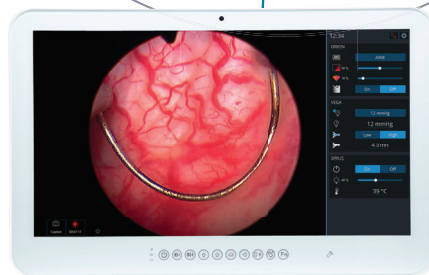
SYMBIOZ+



SONY 27" FULL HD
MONITOR



SYMBIOZ *Led*



SYMBIOZ *Master*

SYMBIOZ+ PACKS

	SYMBIOZ+ 500	SYMBIOZ+ 300	SYMBIOZ+ 100
Ref EU	S_K30_1016	S_K30_1014	S_K30_1012
Ref US	S_K30_1017	S_K30_1015	S_K30_1013
SONY 27" FULL HD MONITOR Ref S_700696	✓	✓	✓
SYMBIOZ <i>Cam+</i> WITH RECORDER Ref EU: S_198_9000 Ref US: S_198_9001	✓	✓	✓
 SYMBIOZ <i>Led</i> Ref EU: S_298_0001 Ref US: S_298_0002	✓	✓	✓
SYMBIOZ <i>Flow</i> Ref EU: S_698_0001 Ref US: S_698_0002	✓	✓	
 SYMBIOZ <i>Master</i> Ref: S_098_0002	✓		

PACKS

10. PACKS

SYMBIOZ PACKS



SYMBIOZ PACKS

	SYMBIOZ LUXE WITH INSUFFLATOR	SYMBIOZ LUXE	SYMBIOZ PREMIUM WITH INSUFFLATOR	SYMBIOZ PREMIUM
Ref EU	S_K30_1004	S_K30_1006	S_K30_1000	S_K30_1002
Ref US	S_K30_1005	S_K30_1007	S_K30_1001	S_K30_1003
PANASONIC 26" FULL HD MONITOR Ref S_700427	✓	✓	✓	✓
SYMBIOZ <i>Led</i> Ref EU: S_298_0001 Ref US: S_298_0002	✓	✓	✓	✓
SYMBIOZ <i>Cam</i> WITH RECORDER Ref EU: S_398_9002 Ref US: S_398_9003	✓	✓		
SYMBIOZ <i>Cam</i> Ref EU: S_398_9000 Ref US: S_398_9001			✓	✓
SYMBIOZ <i>Flow</i> Ref EU: S_698_0001 Ref US: S_698_0002	✓		✓	

PACKS

10. PACKS

DUO PACKS



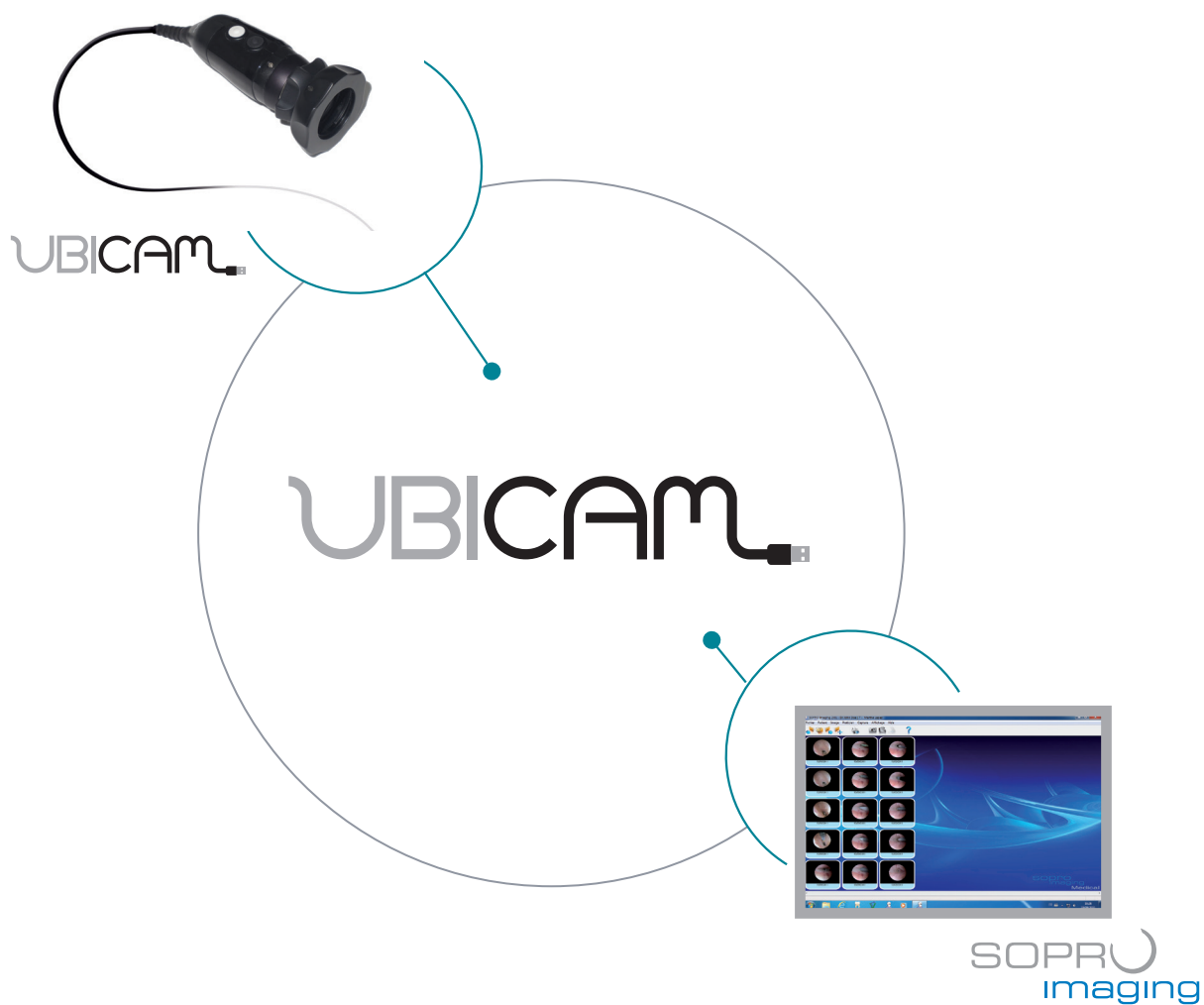
DUO PACKS

Ref	S_K16_1000	S_K16_1001	S_K16_1009
DUO by SOPRO Ref EU: S_165_0100 Ref US: S_165_0101	✓	✓	✓
PAL sensor Ref: S_165_2000	✓		✓
NTCS sensor Ref: S_165_2001		✓	
18.5mm coupler Ref: S_084_0001	✓	✓	
13mm coupler Ref: S_084_0007			✓

PACKS

10. PACKS

● UBICAM® PLUS



UBICAM® PLUS

Ref	S_K10_2006	S_K10_2007
 without coupler PAL Ref: S_181_0011	✓	
 without coupler NTSC Ref: S_181_0015		✓
 Ref: 505026	✓	✓
18.5mm coupler Ref: S_084_0001	✓	✓

PACKS

10. PACKS

UBIPACK®



Ref	S_K10_1015	S_K10_1016
 without coupler PAL Ref: S_181_0011	✓	
 without coupler NTSC Ref: S_181_0015		✓
 Ref: 505026	✓	✓
 Ref: S_281_0001	✓	✓
18.5mm coupler Ref: S_084_0001	✓	✓
Light cable With Storz® adapters (700044/700051) Ref: S_700215	✓	✓

10. PACKS

UBIPACK® GYN



Ref	S_K10_2001	S_K10_2003
 without coupler PAL Ref: S_181_0011	✓	
 without coupler NTSC Ref: S_181_0015		✓
 Ref: 505026	✓	✓
 Ref: S_281_0001	✓	✓
18.5mm coupler Ref: S_084_0001	✓	✓
Light cable <i>With Storz® adapters [700044/700051]</i> Ref: S_700215	✓	✓
Hysteroscope 2,7mm 30° Ref: S_700299	✓	✓
10,5Fr diagnostic sheath Ref: S_700300	✓	✓

10. PACKS

UBIPACK® ENT SINUSCOPE



UBIPACK® ENT SINUSCOPE

Ref	S_K10_1000	S_K10_1001	S_K10_1002	S_K10_1003	S_K10_1004	S_K10_1005	S_K10_1006	S_K10_1007
UBICAM [™] without coupler PAL Ref: S_181_0011	✓		✓		✓		✓	
UBICAM [™] without coupler NTSC Ref: S_181_0015		✓		✓		✓		✓
SOPRO [®] imaging Ref: 505026	✓	✓	✓	✓	✓	✓	✓	✓
UBilight [®] Ref: S_281_0001	✓	✓	✓	✓	✓	✓	✓	✓
18.5mm coupler Ref: S_084_0001	✓	✓	✓	✓	✓	✓	✓	✓
Light cable With Storz [®] adapters (700044/700051) Ref: S_700215	✓	✓	✓	✓	✓	✓	✓	✓
Sinuscope 4.0mm 0° Ref: S_700294	✓	✓						
Sinuscope 4.0mm 30° Ref: S_700295			✓	✓				
Sinuscope 4.0mm 45° Ref: S_700296					✓	✓		
Sinuscope 4.0mm 70° Ref: S_700297							✓	✓

PACKS

10. PACKS

UBIPACK® ENT OTOSCOPE



UBIPACK® ENT OTOSCOPE

Ref	S_K10_1008	S_K10_1009	S_K10_1010	S_K10_1011
UBICAM without coupler PAL Ref: S_181_0011	✓		✓	
UBICAM without coupler NTSC Ref: S_181_0015		✓		✓
SOPRO imaging Ref: 505026	✓	✓	✓	✓
UBIlight Ref: S_281_0001	✓	✓	✓	✓
18.5mm coupler Ref: S_084_0001	✓	✓	✓	✓
Light cable With Storz® adapters [700044/700051] Ref: S_700215	✓	✓	✓	✓
Otoscope 4,0mm 0° Ref: S_700332	✓	✓		
Otoscope 3,0mm 0° Ref: S_700298			✓	✓

PACKS

10. PACKS

UBIPACK® ENT ULYSS



UBIPACK® ENT ULYSS

Ref	S_K10_1013	S_K10_1014
 without coupler PAL Ref: S_181_0011	✓	
 without coupler NTSC Ref: S_181_0015		✓
 Ref: 505026	✓	✓
 Ref: S_281_0001	✓	✓
18.5mm coupler Ref: S_084_0001	✓	✓
Light cable <i>With Storz® adapters (700044/700051)</i> Ref: S_700215	✓	✓
ULYSS Ref: S_700400	✓	✓

PACKS



11

ULTRASONIC BONE SURGERY

ULTRASONIC BONE SURGERY

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**OPERATING ROOM
CERTIFIED**

Piezotome® is registered trademark of SATELEC
ImplantCenter™ is unregistered trademark of SATELEC
I-Surge™ is unregistered trademark of SATELEC

11. ULTRASONIC BONE SURGERY

● PIEZOTOME® SOLO M+



Art.N°	Description
F57850	Piezotome® Solo M+ CEE
F57853	Piezotome® Solo M+ AUS
F57854	Piezotome® Solo M+ CHINE
F57855	Piezotome® Solo M+ INDIA
F57856	Piezotome® Solo M+ US
F57859	Piezotome® Solo M+ UK

SPECIFICATION OF THE DEVICE

F57850 / F57853 / F57854 / F57855 / F57856 / F57859

- Dimensions (W x H x D): 378 x 136 x 306mm
 - With brackets: 378 x 460 x 306mm
- Weight: 3700 g
- 4 power modes
- 4 programmable buttons
- Irrigation flow rate: 0 to 120 ml/min
- Reset to manufacturer settings
- Supply voltage: 100 - 230 VAC
- Power supply frequency: 50 Hz / 60 Hz
- Power consumption: 150 VA to 230 VAC
- No-load voltage: 250 V
- Minimum output frequency: 28 kHz
- Amplitude: 20 to 200 μ m
- Internal fuse not accessible to the user: 1 fuse - F1: 5mm x 20mm - 10 AT / 250 VAC
- Fuse (mains connector): 2 fuses - 5mm x 20mm - 2 AT for 100 to 230 VA

SPECIFICATION OF THE SCREEN

- LCD black & white screen
- Dimensions (W x H): 115 x 86 mm

REGULATORY & ENVIRONMENT

- Manufacturer: SATELEC® - CE 0459
- Operating room certified
- Compliant with European directive 93/42/EEC - Class IIb
- Operating temperature: 10 to 30°C
- Storage temperature: 0 to 50°C
- Operating humidity: 30 to 75%
- Maximum storage humidity: 100%, including condensation
- Atmospheric pressure: 500 hPa to 1060 hPa
- Altitude: 2000 meters maximum
- Electrical safety class, leakage current types: LF
- Electrical rating: 1
- The medical device is designed to be used in an operating theatre or in premises suitable for the procedure involved
- The medical device is not designed to be used in an AP or APG gas-filled atmosphere
- The medical device must not be immersed
- Compliant with the electrical safety standard IEC60601-1
- Designed and manufactured in accordance with an ISO 13485 - certified quality assurance system
- Documentation compliant with European regulatory No.207/2012

11. ULTRASONIC BONE SURGERY

PIEZOTOME® M+



Art.N°	Description
F57800	Piezotome® M+ CEE
F57812	Piezotome® M+ UK
F57813	Piezotome® M+ AUS
F57814	Piezotome® M+ CHINA
F57815	Piezotome® M+ INDIA
F57816	Piezotome® M+ US
F57820	Piezotome® M+ Korea package

SPECIFICATION OF THE DEVICE

F57800 / F57812 / F57813 / F57814 / F57815 / F57816 / F57820

- Dimensions (W x H x D): 472,9 x 149,5 x 339,9mm
 - With brackets: 472,9 x 471,1 x 339,9mm
- Weight: 5000 g
- 4 power modes
- 4 programmable buttons
- Irrigation flow rate: 10 to 120 ml/min
- Reset to manufacturer settings
- Supply voltage : 100 - 230 VAC
- Power supply frequency: 50 Hz / 60 Hz
- Power consumption: 150 VA to 230 VAC
- No-load voltage: 250 V
- Minimum output frequency: 28 kHz
- Amplitude: 20 to 200 μ m
- Internal fuse not accessible to the user: 1 fuse - F1: 5mm x 20mm - 10 AT / 250 VAC
- Fuse (mains connector): 2 fuses - 5mm x 20mm - 2 AT for 100 to 230 VA

SPECIFICATION OF THE SCREEN

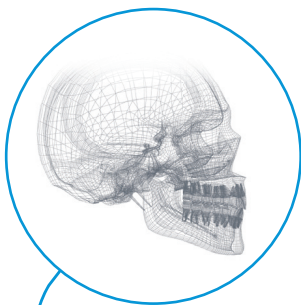
- Touch sensitive screen
- Dimensions (W x H): 115 x 86 mm

REGULATORY & ENVIRONMENT

- Manufacturer: SATELEC® - CE 0459
- Operating room certified
- Compliant with European directive 93/42/EEC - Class IIb
- Operating temperature: 10 to 30°C
- Storage temperature: 0 to 50°C
- Operating humidity: 30 to 75%
- Maximum storage humidity: 100%, including condensation
- Atmospheric pressure: 500 hPa to 1060 hPa
- Altitude: 2000 meters maximum
- Electrical safety class, leakage current types: LF
- Electrical rating: 1
- The medical device is designed to be used in an operating theatre or in premises suitable for the procedure involved
- The medical device is not designed to be used in an AP or APG gas-filled atmosphere
- The medical device must not be immersed
- Compliant with the electrical safety standard IEC60601-1
- Designed and manufactured in accordance with an ISO 13485 - certified quality assurance system
- Documentation compliant with European regulatory No.207/2012

11. ULTRASONIC BONE SURGERY

● IMPLANTCENTER™ M+



Art.N°	Description
F27250	ImplantCenter™ M+ CEE
F27252	ImplantCenter™ M+ UK
F27253	ImplantCenter™ M+ AUS
F27254	ImplantCenter™ M+ CHINA
F27255	ImplantCenter™ M+ INDIA
F27256	ImplantCenter™ M+ US

SPECIFICATION OF THE DEVICE

F27250 / F27252 / F27253 / F27254 / F27255 / F27256

- Dimensions (W x H x D): 472,9 x 149,5 x 339,9mm
 - With brackets: 472,9 x 471,1 x 339,9mm
- Weight: 5000 g
- 4 power modes
- 4 programmable buttons
- Irrigation flow rate: 10 to 120 ml/min
- Reset to manufacturer settings
- Supply voltage: 100 - 230 VAC
- Power supply frequency: 50 Hz / 60 Hz
- Power consumption: 150 VA to 230 VAC
- No-load voltage: 250 V
- Minimum output frequency: 28 kHz
- Amplitude: 20 to 200 μ m
- Internal fuse not accessible to the user: 1 fuse - F1: 5 mm x 20 mm - 10 AT / 250 VAC
- Fuse (mains connector): 2 fuses - 5 mm x 20 mm - 2 AT for 100 to 230 VA

SPECIFICATION OF THE SCREEN

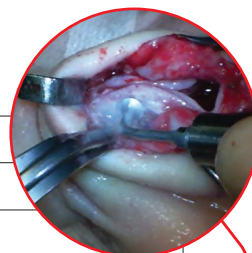
- Touch sensitive screen
- Dimensions (W x H): 115 x 86 mm

REGULATORY & ENVIRONMENT

- Manufacturer: SATELEC® - CE 0459
- Operating room certified
- Compliant with European directive 93/42/EEC - Class IIb
- Operating temperature: 10 to 30°C
- Storage temperature: 0 to 50°C
- Operating humidity: 30 to 75%
- Maximum storage humidity: 100%, including condensation
- Atmospheric pressure: 500 hPa to 1060 hPa
- Altitude: 2000 meters maximum
- Electrical safety class, leakage current types: LF
- Electrical rating: 1
- The medical device is designed to be used in an operating theatre or in premises suitable for the procedure involved
- The medical device is not designed to be used in an AP or APG gas-filled atmosphere
- The medical device must not be immersed
- Compliant with the electrical safety standard IEC60601-1
- Designed and manufactured in accordance with an ISO 13485 - certified quality assurance system
- Documentation compliant with European regulatory No.207/2012

11. ULTRASONIC BONE SURGERY

ACCESSORIE: PIEZOTOME® M+ HANDPIECE



Art.N°	Description
F12860	Piezotome® M+ handpiece
F57802	Pack M+



Art.N°	Description
F57378	Set of 1 disposable sterile line With clips and perforators
F57379	Set of 5 disposable sterile lines With clips and perforators

SPECIFICATION OF THE PIEZOTOME M+ HANDPIECE *F12860 / F57802*

- Manufacturer: SATELEC®
- Dimensions (L): 130 mm
- Weight: 100 g
 - With cord: 265 g
- Cord length: 2900mm
- 6 ceramic rings
- Cold LED light (power): 100 000 LUX

REGULATORY & ENVIRONMENT

- Class IIb according to 93/42/EEC directive
- Operating temperature: 10 to 30°C
- Storage temperature: -20°C to 70°C
- Operating humidity: 30 to 75%
- Maximum storage humidity: 10 to 100%, including condensation
- Atmospheric pressure: 500 hPa to 1060 hPa
- Altitude: 2000 meters maximum
- The medical device is designed to be used in an operating theatre or in premises suitable for the procedure involved
- The medical device is not designed to be used in an AP or APG gas-filled atmosphere
- The medical device must not be immersed

ACCESSORIE: I-SURGE™ MOTOR



Art.N°	Description
F34452	I-Surge™ motor
F27250	ImplantCenter™ M+ CEE Delivered with the ImplantCenter M+ only



Art.N°	Description
F57378	Set of 1 disposable sterile line With clips and perforators
F57379	Set of 5 disposable sterile lines With clips and perforators

SPECIFICATION OF THE I-SURGE™

F34452 / F27250

- Nose in accordance with ISO 3964 (E-type connection), external spray, with light
- Motor must not be lubricated
- Direct current electric brushless micromotor, self-ventilated, sterilizable
- This motor must only be used with SATELEC® cord and electronic controls
- Dimensions:
 - With the nose: Ø 23.2 x 90.6mm
 - Without the nose: Ø 23.2 x 67.9mm
- Weight: 119 g (without cable)
- Rphase: 300mOhm (one phase) Y-connection
- Lphase: 25 µH (one phase)
- Torque constant: 0.62 N.cm / Arms.
- Rotation speed: from 100 to 40.000 rpm
- Mechanical power: Max. 140 W at 25.000 rpm
- Torque: Max. 6.0 Ncm between 200 and 18.000 rpm / Max. 2.0 Ncm at 40.000 rpm
- Idle current: 0.26 A.
- Max. admissible current: 8 A (at peak)
- Nose level: less than 60 dBA at 45 cm.
- Luminous intensity: greater than 12 klux with CA 20:1 L.

REGULATORY & ENVIRONMENT

- Class IIa according to 93/42/EEC directive
- Electromagnetic compatibility: complies with the ISO 11498
- The device must be classed as a class II and BF type unit - the corresponding terminology is defined in the IEC 60601-1
- Transportation and storage conditions: temperature between -40°C and 70°C
- Relative humidity: between 10 and 100%
- Atmospheric pressure: 50 kPa to 106 kPa (7.3 to 15.3 psi)

I-Surge™ is unregistered trademark of SATELEC
 ImplantCenter™ is unregistered trademark of SATELEC
 SATELEC® is registered trademark of SATELEC

11. ULTRASONIC BONE SURGERY

ACCESSORIES:

PIEZOTOME® SOLO M+ FOOTSWITCH



Art.N°	Description
F57851	Piezotome® Solo M+ footswitch

PIEZOTOME® M+ FOOTSWITCH



Art.N°	Description
F57801	Piezotome® M+ footswitch

IMPLANTCENTER™ M+ FOOTSWITCH



Art.N°	Description
F27251	ImplantCenter™ M+ footswitch

SPECIFICATION OF PIEZOTOME® SOLO M+ FOOTSWITCH

F57851

- Cord length: 2900mm
- Dimensions (W x H x D): 173 x 140 x 176mm
- Weight: 1000 g
- Light: remains active approx. 9 secs after the footswitch is released
- Multifunction footswitch:
 - Power modes
 - ON/OFF ultrasound
- Protection rating: IPX6

SPECIFICATION OF PIEZOTOME® M+ FOOTSWITCH

F57801

- Cord length: 2900mm
- Dimensions (W x H x D): 311 x 181 x 209mm
- Weight: 3500 g
- Light: remains active approx. 9 secs after the footswitch is released
- Multifunction footswitch:
 - Power modes
 - Instrument switch
 - ON/OFF or progressive ultrasound
- Protection rating: IPX8

SPECIFICATION OF IMPLANTCENTER™ M+ FOOTSWITCH

F27251

- Cord length: 2900mm
- Dimensions (W x H x D): 311 x 181 x 209mm
- Weight: 3500 g
- Light: remains active approx. 9 secs after the footswitch is released
- Multifunction footswitch:
 - Instrument switch
 - Direction of rotation
 - ON/OFF or progressive ultrasound / motor
- Protection rating: IPX8

REGULATORY & ENVIRONMENT

- Operating temperature: 10 to 30°C
- Storage temperature: 0 to 50°C
- Operating humidity: 30 to 75%
- Maximum storage humidity: 100%, including condensation
- Atmospheric pressure: 500 hPa to 1060 hPa
- Altitude: 2000 meters maximum

11. ULTRASONIC BONE SURGERY

CONSUMABLES: CMF TIPS

Art.N°	Description
F57804	CMF kit sterile
F57803	CMF kit non-sterile



Art.N°	Description
F87982	BS1L sterile
F87612	BS1L non-sterile

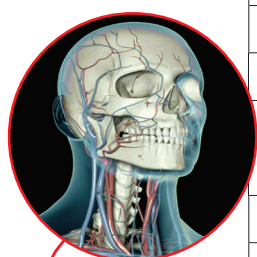
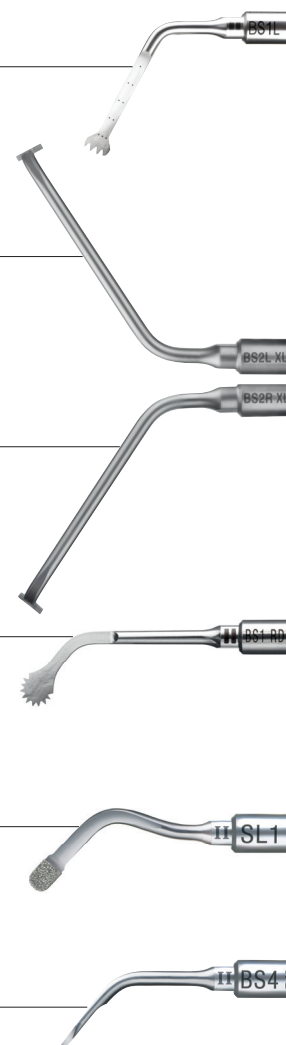
Art.N°	Description
F87983	BS2L XL sterile
F87605	BS2L XL non-sterile

Art.N°	Description
F87984	BS2R XL sterile
F87606	BS2R XL non-sterile

Art.N°	Description
F87985	BS1RD sterile
F87608	BS1RD non-sterile

Art.N°	Description
F87974	SL1 sterile
F87618	SL1 non-sterile

Art.N°	Description
F87978	BS4 sterile
F87615	BS4 non-sterile



CONSUMABLES: RHINOPLASTY TIPS

Art.N°	Description
F87681	Rhinoplasty kit



Art.N°	Description
F87676	RHS2H



Art.N°	Description
F87675	RHS2F



Art.N°	Description
F87679	RHS5



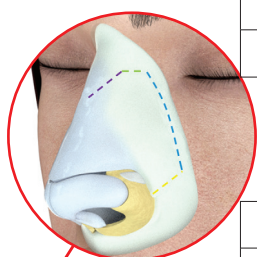
Art.N°	Description
F87677	RHS3L



Art.N°	Description
F87678	RHS3R



Art.N°	Description
F87680	RHS6



ULTRASONIC BONE SURGERY

11. ULTRASONIC BONE SURGERY

CONSUMABLES: OTHER M+ KITS



OSTEOTOMY / OSTEOPLASTY

Art.N°	Description
F57805	Kit Pre Implant



LATERAL SINUS LIFT

Art.N°	Description
F57806	Kit Sinus Lift



CRESTAL SINUS LIFT

Art.N°	Description
F57807	Kit Intralift



CREST SPLITTING

Art.N°	Description
F57808	Kit Crest Splitting



SYNDESMOTOMY

Art.N°	Description
F57809	Kit Extraction



CROWN EXTENSION

Art.N°	Description
F57810	Kit Crown extension

INTENDED USE

M+ tips can be used for osteotomy, osteoplasty, decortication, drilling, shaping and smoothing of teeth and bone in various surgical procedures, including but not limited to general, orthopaedic, otolaryngological, maxillofacial, oral, hand and foot, neurosurgery, spinal and plastic/reconstructive surgeries.

SPECIFICATION OF SINGLE USE STERILE TIPS

- Sterile tips are single-use only
- They should be disposed of in suitable containers after use
- Single-use tips should never be resterilized or reused



Do not re-use

SPECIFICATION OF REUSABLE NON-STERILE TIPS

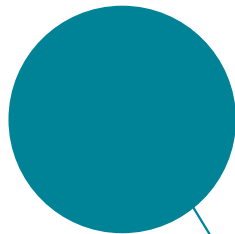
- Non-sterile tips can be used up to 5 times
- Refer to cleaning, disinfection and sterilization protocols for SATELEC® tips



5 uses max

REGULATORY & ENVIRONMENT

- Class IIb according to 93/42/EEC directive
- Compliant with the European Directive 93/42/EEC
- Compliant with Electrical Safety standards IEC60601-1 in force
- Designed and manufactured in accordance with an EN ISO 13485-certified quality assurance system
- Documentation complies with European regulation No.207/2012



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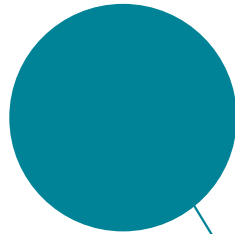
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NOTES

TABLE OF MEASURES

French (Fr.)			d/mm	French (Fr.)			d/mm
1	≈		0.3	16	≈		5.3
2	≈		0.7	17	≈		5.7
3	=		1.0	18	=		6.0
4	≈		1.3	19	≈		6.3
5	≈		1.7	20	≈		6.7
6	=		2.0	21	=		7.0
7	≈		2.3	22	≈		7.3
8	≈		2.7	23	≈		7.7
9	=		3.0	24	=		8.0
10	≈		3.3	25	≈		8.3
11	≈		3.7	26	≈		8.7
12	=		4.0	27	=		9.0
13	≈		4.3	28	≈		9.3
14	≈		4.7	29	≈		9.7
15	=		5.0	30	=		10.0

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