

# ENDO

ecatalogue

Reliance Cepat Cara Tepat



Lembaga Kebijakan  
Pengadaan Barang/Jasa Pemerintah



Ver. 3

## PRODUCT CATALOG

PT ENDO Indonesia





## PT ENDO Indonesia

PT ENDO Indonesia was founded in 2006 as a company engaged in importation and distribution of Medical Devices. Today, among many others, our product portfolio consists of Electromedical Devices, Instruments, Disposables, Orthopaedic Implants, and accessories. Since 2012 we established a subsidiary company named PT. Meditronik Hospilab Indonesia specializing in manufacturing. The products made at the moment are Medical Chart Paper and Electromedics.

### Our Vision

"Improving health care of Indonesian society by providing good quality products at affordable prices."

### Our Mision

"Consistent development and continuously increasing employee's well-being while maintaining integrity in daily routines."



**Improving Healthcare**  
Providing high quality products at affordable prices



**Qualified Personnels**  
Experienced staffs in their respective fields



**Networking**  
Through doctors, hospitals, distributors, and resellers



**Fast Delivery**  
Most products are ready in stock

## PARTNERS

**TONTARRA**  
MEDIZINTECHNIK GMBH

*Romsons*

**SonoScape**

**SBM**  
Science & Bio Materials

**ZERONE**

**MIR**  
MEDICAL INTERNATIONAL RESEARCH

**MARQUARDT**  
Medizintechnik

**SEESHEEN**  
see the endo-sheen

**Potent<sup>®</sup>** *Sinolinks*

**elmiko**

**SEPLOU<sup>®</sup>**  
MEDICAL

**endoVISION**  
infinite vision of the medical device

**PTICAL SWAN** MALAYSIA

**AYGUN<sup>®</sup>**  
SURGICAL INSTRUMENTS CO., INC.

**Corentec**

**ENGINE**  
Medical Equipment Manufacturing

**APEX**  
MediTech

**inventis**  
Audiology Equipment

**Trulife**

**TECRES<sup>®</sup>**  
Advancing High Technology

**oxmed**

**KANG JIAN<sup>®</sup>**

**e blue endo**  
international

**STERIX**

**WASTON**  
MEDICAL

**DURICO**

**ZKSK**  
Medical

**AMED**  
FIBERS

**BFIX**

**SSS**  
SHENFENG ENTERPRISES

**GERUI**

**CALEB**  
INNOVATIVE MEDICAL DEVICE

**TROPIAN TECH**

**AGS EZLIG**

**ELMED**

*Medipia*

**hypnus**

**NELIS**

**Duk-In**

**aselsan**

**GUARDIAN**

**IMEDICOM**  
Intended for Veterinary

**SHANGXIAN**

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# ELECTROMEDIC PRODUCT LIST



- AED
- Anesthesia Machine
- Audiometer
- Autoclave
- Blood Pressure Monitor
- ECG Bulb, Limb Clamp, Cable
- Electrocardiograph
- Electroencephalography
- Electrosurgical Unit
- Fetal Doppler & Vascular Doppler
- Holter ECG Monitor
- Infrared Thermometer
- Micropipette
- Operating Headlamp
- Operating Lamp
- Oxygen Concentrator
- Patient Monitor
- PC ECG
- Positive Airway Pressure Device
- Power Wheelchair
- Pulse Oximeter
- Semi Auto Chemistry Analyzer
- Spirometer
- Suction Pump
- Syringe Pump & Infusion Pump
- Treadmill Stress Test
- USG 4D dan B/W
- Ventilator
- Video Colposcope
- Vital Sign Monitor



## Spirobank II Advanced Spirometer



### Features

- Accurate, Complete and Easy to use Spirometer with Oximetry option
- 4 versions available : Smart, Basic, Advanced, and Advanced plus
- On screen results and curves preview for immediate data assessment
- Wireless Real Time test on PC via Bluetooth
- Memory up to 10.000 Spirometry tests or 900 hours of Oximetry recording
- Long-life Rechargeable Battery
- Available with both Disposable or Reusable turbine flow meter

## Spirolab Spirometer



### Features

- Each function can be activated by a simple touch on the intuitive bar menu, always present on the screen.
- 7 inch Touchscreen.
- All in one portable Desktop Spirometer, with Oximetry option
- Wireless Real Time test on PC via Bluetooth
- Database up to 10,000 Spirometry tests or 900 hours of Oximetry recording coupled with power and flexible search services.
- Fast and silent built-in printer with customizable
- Long-life Rechargeable Battery
- Optional function available : Oximeter with adult or pediatric finger probe

## Smart One FEV1 and Peak Flow Meter



### Features

- Simple and lightweight to carry on the go
- MIR Smart One App includes an exclusive Incentive for adults and children based on both exhaled
- Flow and Volume that is helpful in improving subject's compliance
- Ideal for monitoring respiratory illnesses and in the self management of Asthma, COPD, Lung Transplant care, Cystic Fibrosis and for use in Clinical Trials
- Disposable turbine flowmeter  
Unrivaled in breath measurement. High accuracy and hygiene are 100% guaranteed.



## EEG DigiTrack

Electroencephalography



### Features

- A new, touch screen-adapted, exceptionally user-friendly user interface.
- Completely new networked, dispersed, multi-station EEG DigiTrack Manager database automatically synchronises examinations, descriptions and other data with any computer, eliminating the need for a data server.
- Ability to conduct EEG analysis on mobile devices (tablets, smartphones) with Windows OS.
- Optional multi-camera videometry with optical and digital zoom to monitor your patient on several feeds at once.
- Ability to turn video recording on and off independently from EEG
- Extensive, user-editable, medical events manager, with a database of over 400 pre-defined options
- Ability to create interactive notes and inserting markers during EEG recording.
- Multi-dimensional FFT analysis.
- Advanced electrocorticographic mapping to automatically recognize and register signals from all types of reference electrodes.
- Ability to connect with a corticographic stimulator.
- Automatic artefact detection.
- Independent component analysis (ICA).
- A new module for Visual Evoked Potentials (VEP).
- Extraordinary configuration flexibility and easy way to translate the software to any language with a specially designed application.

## Bell Plus Audiometer



### The Display

- The key feature of the Bell audiometer is its large, bright graphic colour display, on which you can view the complete audiogram during the examination.

### Portable System

- Bell is the ideal choice of audiometer for users who need a portable instrument. Despite its practical keyboard and generous display. Bell is extremely compact and lightweight and easy to carry in its dedicated case.

### Noah & Daisy Integration

- Simply connect Bell to a USB port on your computer (no driver needed), and you can transfer exam results into Daisy or Noah database. And with the live view feature, you can have a wide view of the examination in progress on the computer display.

### "Basic" Model : The Screener

- The Basic model is designed for use in occupational medicine and allows users to perform manual and automatic air conduction audiometry examinations at frequencies from 125 Hz up to 12.5 kHz (with a Sennheiser HDA-280 headset) with masking.

### "Plus" Model : The Basic Diagnostics

- The Plus model can perform bone conduction audiometric examinations in addition to air conduction exams.

### Technical Data

- Intensity AC : -10 to 120 dB HL, BC : -10 to 80 dB HL
- Frequency range : 125 - 8000 Hz (12.5 kHz available with HDA-280 headsets).
- Input : tone, warble tone.
- Masking : WN (Plus), NBN
- Output : AC L+R, BC (Plus), insert masking
- Talk over : built-in or external microphone
- Display : colour display, 95 x 54 mm, 482 x 272 px
- Test Battery : pure tone audiometry, Autothreshold
- Data storage : internal memory for 100 patients
- PC interface : USB
- Compatible SW : inventis Daisy or Noah with dedicated module
- Dimensions : 32 x 32 x 9 cm / 12.6 x 12.6 x 3.5 in (LxWxH)
- Weight : 1.8 kg / 4.0 lbs
- Classification : Class IIa (MDD 93/42)



## Harp Plus Audiometer



### The Display

- Harp features a large, bright graphic colour display, on which you can view the complete audiogram during the examination.

### Portable System

- Despite its top-level features, Harp is ultra-compact and easily transportable. It even comes with a dedicated carrying case (optional).

### The Models

- Harp is available in two configuration to suit different user needs : Basic and Plus.

### The Tests

- Besides standard audiometry exams Harp also performs Hughson - Westlake automated audiometry, speech audiometry and ABLB exams. The "Plus" model also performs SISI, Stenger (pure tone and speech), DLL and Tone Decay tests and includes a 2 channels Master Hearing Aid.

### Embedded Speech Material

- No more CD Player headaches! Harp Plus features an integrated 2GB flash memory for storing your speech material. Dedicated buttons allow you to access word lists with ease. The screen also displays the word currently being pronounced.

### Technical Data

- Intensity AC : -10 to 120 dB HL, BC : -10 to 80 dB HL
- Frequency range : 125 - 8000 Hz
- Input : tone, warble tone, external source (tape, CD) 1-2, mic, flash memory (only in Plus Model)
- Masking : NBN, WN, SN
- Output : AC L+R, BC, FF L+R, insert masking
- Talk over : built-in or external microphone
- Monitor : built-in speaker or ext. headset or speaker
- Display : colour graphical display, 95 x 54 mm, 480 x 272 px
- Test Battery : speech audiometry, Autothreshold, ABLB. Only in Plus model : SISI, DLI, tone decay, stenger, Master Hearing Aid
- Data storage : internal memory for 100 patients
- PC interface : USB
- Compatible SW : inventis Daisy or Noah with dedicated module
- Dimensions : 32 x 32 x 9 cm / 12.6 x 12.6 x 3.5 in (LxWxH)
- Weight : 1.8 kg / 4.0 lbs
- Classification : Class IIa (MDD 93 /42)

### Embedded Speech Material

- Simply connect Harp to a USB port on your computer (no driver needed), and you can transfer exam results into Daisy or Noah database. And with the live view feature, you can have a wide view of the examination in progress on the computer display.

## Piano Plus VRA Audiometer



### The Audiometer

- Piano is the top-level audiometer in our portfolio, Besides the pediatric audiometry. Piano Plus VRA features a complete test battery, including the High Frequency audiometry. Big color display with touch screen, internal memory for the speech material, great flexibility, extreme simplicity, all this makes Piano a super high-end audiometer, perfect for the most demanding users.

### Traditional VRA

- You can turn Piano into a traditional VRA System by adding up to three toy cabinets, connected directly to the audiometer. Toy cabinets are powered and controlled directly from Piano.

### Noah & Daisy Integration

- Piano Plus VRA lets you build a video-VRA system with unlimited possibilities for customizing the images and videos used as reinforces, and enables you to create an advanced VRA system that can capture a baby's attention for a longer time. All you need to do is connect Piano Plus VRA to a standard computer and install the Daisy VRA module. Up to three displays can be controlled to provide reinforces.

### Technical Data

- Channel : two separate and identical channel
- Intensity : AC : -10 to 120 dB HL. BC : -10 to 80 dB HL. AC HF : -20 to 90 dB HL
- Frequency range : 125-8000 Hz, 8-20 kHz
- Frequency resolution : multi frequency with programmable steps
- Input : tone, warble tone, external source 1 and 2, mic, internal flash memory
- Masking : NBN, WN, SN
- Output : AC L+R, insert L+R, BC, FF, L+R, insert masking, HF L+R
- Talk Over : built-in or external microphone
- Monitor : built-in speaker or ext. earphone or speaker
- Display : colour display with touch screen, 150 x 90mm, 800 x 480 px  
Test battery : Autothreshold, ABLB, tone decay, SISI, DLI, MLB, Stenger, Master Hearing Aid Multo Frequency, High Frequency, Bekesy, MLD, Pediatric audiometry (VRA and CPA tests)
- Printer : optional integrated thermal paper
- PC interface : USB
- Compatible SW : inventis Daisy or Noah with dedicated module
- Dimensions : 32 x 32 x 15cm / 12.6 x 12.6 x 5.9 in (LxWxH)
- Weight : 2 kg / 4.4 lbs
- Classification : Class IIa (MDD 93 /42)



## Zeus-400 Upgraded Version Electrosurgical Unit



### Features

- 10 storage are available by using user storagefunction.
- 2 (two) monopolar handpiece can be connected to the device
- Bipolar cut function is available.
- A display window allows you to easily check output value, indicated as digits.
- Unit provides various functions that are required to perform an operation as functional cut mode (Pure cut, Blend1, Blend2, Blend3)
- Coagulation Mode (Spray coagulation and Contact coagulation).
- Bipolar coagulation mode by hand or foot.
- Bipolar cut (only available in ZEUS upgraded version).
- Each working condition can be checked by sound and indication lamp.
- Hand bipolar (Auto bipolar) can be checked only by contacting forceps.
- Unit output strong and stable power by Microprocessor.
- Input power frequency is automatically detected.
- A fuse which is built in a power circuit board prevents over current from flowing through the equipment
- REM (Return Electrode Monitoring) function monitors the size of contacting area between a patient and the pad.
- If size is inappropriate, it automatically blocks the high-frequency current to minimize the danger of burning incident.
- To protect a patient, the case is fully grounded so that leakage current can flow into the earth

### Application

- General Surgery
- Urology
- Dermatology
- Orthopedics
- Vascular Surgery
- Oral Surgery
- Gynecology
- Plastic Surgery
- ORL/ENT
- Endoscopy
- Pediatric Surgery

### Application

- Main Frequency : 400, 500KHz
- Power Source : AC120V or AC230V, 50Hz / 60Hz
- Protection class : Class 1, Type CF
- Dimension(WxDxH mm) 330x455x150
- Weight : 13.0Kg

## Zeus Vision

### Electrosurgical Unit



#### Features

- Color Graphic User Interface: Wide TFT LCD mount, clean and sharper image quality, unlike the existing electricity and the innovative new UI configuration operation.
- Best Safety with Feedback System: REM (Return Electrode Monitoring) function monitors the size of contact area between a patient and the pad. If the size is inappropriate, it automatically blocks the high-frequency current to minimize the danger of burning incidents.
- All Touch Screen System & Key: Touch screen system through the implementation easier and faster with a parameter setting, external key management can be the same as a touch screen.
- Diversity of Feature Bipolar Bipolar Cut, Bipolar Blend,
- Bipolar Forced to add features to implement more up-grade the optimal system.
- 10 storage are available by using user storage function.
- 2 (two) monopolar handpiece can be connected to the device.
- Bipolar cut function is available.
- A display window allows you to easily check output value, indicated as digits.
- Each working condition can be checked by sound and indication lamp.
- Hand bipolar (Auto bipolar) can be checked only by contacting forceps.
- Unit output strong and stable power by Micro processor.
- Input power frequency is automatically detected.
- A fuse which is built in a power circuit board prevents over current from flowing through the equipment.
- When the plate attached to the patient is disconnected, red alarm light begins flickering.

#### Application

- General Surgery
- Urology
- Dermatology
- Orthopedics
- Vascular Surgery
- Oral Surgery
- Gynecology
- Plastic Surgery
- ORL/ENT
- Endoscopy
- Pediatric Surgery

#### Application

- Main Frequency : 400, 500KHz
- Power Source : AC120V or AC230V, 50Hz / 60Hz
- Protection class : Class 1, Type CF
- Dimension(WxDxH mm) 388x410x160
- Weight : 12.5Kg



## Zeus Prime Electrosurgical Unit



### Features

- Vessel Sealing technology uses pressure and energy to seal vessels and offers major advantages in the field of endoscopic surgery.
- Electrosurgery technology for sealing blood vessels of up to 7mm in diameter. Technology of Vessel Sealing enables permanent sealing of large blood vessels.
- Bundle of tissues during open & laparoscopic surgery. Based on Technology of Tissue Impedance, as soon as sealing in the tissue has been completed.
- The AUTO STOP function blocks the current flow. The tissue is now denatured and sealed, and the collagen fibers are linked without damage.
- Transurethral Resection of the Prostate (commonly known as a T.U.R.P., plural TURPs, and rarely as a transurethral prostatic resection, TUPR) is a urological operation.
- It is used to treat benign prostatic hyperplasia (BPH). As the name indicates, it is performed by visualising the prostate through the urethra and removing tissue by electrosurgical unit or sharp dissection.
- Technology of Tissue Impedance provides doctors with improved result at lower power settings, minimizing the risk of tissue damage and neuromuscular stimulation. It has feedback system that recognize changing impedance of tissue and adjusts voltage and current accordingly to maintain appropriate power.

### Special Function

- 400W Electrosurgical Unit for Special function :
- T.U.R.P. and Vessel Sealing
- Option3 : Basic + Vessel Sealing + T.U.R.P.
- Option2 : Basic + Vessel Sealing
- Option1 : Basic + T.U.R.P.
- Basic : Technology of Tissue impedance + Endo cut + general function of 400W



# aselsan

## AED

Automated External Defibrillator



### Features

- A rhythm analysis algorithm to detect shockable cardiac rhythms with high accuracy.
- Full-Automated and Semi-automated operating modes.
- Motion detection for robust ECG rhythm analysis.
- Differentiating performance by charging fast.
- CPR support by audio and visual instructions.
- Pacemaker detection ability

### Technical Specifications

- Device Classification (93/42/EEC) Class II B.
- Design Standards IEC 60601-1:2005+A1:2012, EN60601-1-2:2015, IEC 60601-2-4:2010, ERC, ILCOR 2015
- Operating Temperature 0°C - 50°C.
- Storage Temperature -30 to +70 °C.
- Humidity 10 to 95% relative humidity.
- Particle and Water Ingress IP-55.
- Operating Mode Semi / Full Automated.
- Waveform Truncated Biphasic
- Energy Selection 150J-200J-200J for Adult mode, 50J-50J-50J for child mode 24 VDC(19-57 V)

# STERIX

## Sterix 24 Autoclave



### Features

- Redefines the states of the art in the sterilization sector.
- Committed to quality and innovations.
- Highly innovative heating system with very low environmental impact.
- Double steam generator.
- Smart drying mode for standard loads with energy saving and excellent results.
- Hand pieces sterilization without risk of deterioration.
- Easy to use means safety.
- The simpler the use the rarer the errors.
- The perfect balance between power and consumption.
- Excellent performance and energy saving.
- Eco-sustainability.
- Stainless steel chamber : safety, maximum capacity, duration, and modular trays system (MTS).
- Technology in the name of simplicity and security with light color code.

### Duration

- The special chamber design of the rooms allow us tooffer a 20 year/100,000 cycle warranty on the chamber in regular use and maintenance conditions

### Modular Trays System (MTS)

- The new MTS support system is very innovative not only because it expands the load capacity but because it allows a more flexible use.

### Safety

- The innovative design of the chamber, the absence of welding and a certified testing system guarantee maximum safety.

### Highly Innovative Heating

- Integrated adaptive heat with three independent resistors to heat lower and upper part of the chamber ensuring more precise temperature control.
- Double steam generator powered by the same heating system of the chamber.
- Air warm-up it allows to heat up the air during the ventilation.

### Smart Drying

- Cycle times are optimized for standard loads with benefits in terms of energy savings and excellent drying results

### Power and Consumption

- Excellent performance, sterix has been designed for professional offices that work intensively and need to make make numerous cycles during the day.
- Energy saving, the power of the heating system and the pump enable to work below the limit even in critical conditions and this means less consumption.

### Eco-Sustainability

- Thermal energy recovery technologies (for steam generator and preheating), chamber thermal insulation in ceramic fibre and energy saving programs contribute to the eco-sustainability.

### Maximum Capacity

- A larger diameter (260 mm) and a special basket (Modular Tray System) a greater load capacity

## ENDO

## ENDO LFY-I-5A-01

Oxygen Concentrator



## Features

- Instrument classification : Class II, Type B.
- Flow rate 10L/minute, float flowmeter, two outlets.
- Oxygen concentration  $\geq 93 \pm 3\%$  all flow rates
- Noise  $\leq 55$  dB (A).
- Voltage / Frequency : 220V/50Hz, 110V/50Hz, 230V/50Hz.
- Power consumption 580W.
- Working Time 24 hours non stop.
- Outlet pressure 0.03-0.07 Mpa.
- Working temperature 5°C-40°C.
- Machine size 410 x 410 x 620 mm.
- Packing size 495 x 475 x 730 mm.
- Net weight 27 kg, Gross weight 31 kg
- Supply to 2 (two) patients with triple filtrations.
- Molecular sieves.
- High and low pressure alarm.
- Power failure alarm.

## ENDO LFY-I-5F-11

Oxygen Concentrator



## Features

- Instrument Classification : Class II, Type B
- Flow Rate : 5L/Minute, Float Flowmeter
- Oxygen concentration  $\geq 93 \pm 3\%$  all flow rates
- Noise :  $\leq 50$  dB (A)
- Voltage / Frequency : 220V/50Hz, 110V/50Hz, 230V/50Hz
- Power Consumption : 400W
- Working Time : 24 hours non stop
- Outlet Pressure : 0.03-0.07 Mpa
- Working Temperature : 5°C-40°C
- Machine Size : 520 x 550 x 200mm
- Packing Size : 585 x 635 x 275mm
- Net Weight : 21 Kg
- Gross Weight : 22.5 Kg
- Atomizing Nozzle with triple filtration
- Low and high pressure alarm
- Power failure alarm



## Hypnus CA720 and ST730 Positive Airway Pressure Device



### Features

- Intelligent i-sense technology identifies various respiratory events accurately and outputs optimal treatment pressure dynamically.
- FOC motor driving algorithm with the performance of stepless pressure regulating and rapid acceleration / deceleration, immediately following the respiration rhythm.
- Excellent blower and air duct ensuring stable pressure and curative effect, the conducted and radiation noises are both suppressed efficiently.
- Upgraded heating tubing eliminates condensation and guarantees user comfort even in cold environment.
- Preheated humidification makes sure that every breath is warm and comfortable.
- High precision flow and pressure sensors accurately capture subtle airflow changes and instantaneously responds within 0.004 second.

### Noise Control

- Patented multi mean noise control and pressure regulating technologies promise high performance ultra quiet operation, creating a quiet sleep and treatment environment for the user with affirmatory efficacy

### Considerate & Comfortable Care

- More comfortable treatment independently developed high performance blower, combined with unique respiration synchronized airflow delivery algorithm provides a more comfortable treatment experience while preventing the user from strong impact of airflow
- Much warmer humidification high efficiency humidification system with preheating ensures continuous warmed and moisturized air throughout the treatment, making every breath feel like a spring breeze, warm and cozy
- More sensitive response real time high precision sensors working with the i-sense algorithms can capture every subtle respiration airflow change accurately and deliver the optimal treatment pressure dynamically to ensure a more natural and comfortable breathing

## ENDO

## ENDO JRWD6012

Power Wheelchair



## Features

- Foldable directly
- Removable battery box for recharging
- Controller can be exchanged from right side to the left
- Long driving distance, up to 25 km

## Parameters

- Driving range > 20 km
- Motor 250W \* 2 pcs (Jerry)
- Battery 24V 12Ah/20Ah (Lithium Battery)
- Parking brake electromagnetic brake
- Max speed 6 km/h
- Frame material aluminium alloy
- Frame color silver, gray
- Cushion color black
- Control Jerry

## ENDO

## ENDO ANM1

Anesthesia Machine



### Features

- More accurate, Safer and More Convenient.
- CE marked, meet EU clinical requirements.
- ISO quality guarantee.
- Suitable for adult and pediatric.
- Pin-Index for N2O/O2 Cylinder.
- Integrated high temperature sterilization and CO2 absorber system.
- Newly-developed reliable gas system

### Vaporizer

- One or Dual positions
- Mounting: Fixed or tool-free installation Selectatec manifold interlocks and isolates vaporizers
- Agent type: Sevoflurane, Halothane, isoflurane and Enflurane
- Filling type: Pour-fill, Easy-fill, Quick-fill or Key-fill
- Compensation Flow, pressure, temperature compensation

### Ventilator

- Type and Drive mode: Integrated Electronically controlled pneumatically-driven ventilator
- Patient: Pediatric and adult
- Ventilation mode: IPPV, IPPB, SIGH, MAMUAL/Spontaneous
- Tidal Volume: 50~1500ml, Frequency: 0~100bpm
- Pmax: 8Kpa, Pmin:0~2Kpa
- PEEP(optional): Mechanical type

## ENDO ANM2

Anesthesia Machine



### Features

- Multifunction, More Accurate.
- Internal8' TFT Screen, Flexible Monitoring Angle.
- Integrated CO2 Absorber system,easy to disassemble and Assemble components, clean and Maintain.
- Two station Selectatec Back bar vaporizer. The highest quality and reliability vaporizer with Temperatures, Pressure and flowing compensa.
- Advanced electcomagneyic valve ensures accurate tidal volume and compensated.
- Languages:English,Chinese,Russia,Turkish,Portuguese, Spanish, France.
- Production Standard EN, GB, BSW ANSI/ASME

### Specification

- Patient type : Adult, Pediatric.
- Gas Supply Oxygen, N2O, Air.
- Ventilation mode VCV, PCV, SIMV, Standby, Manual.
- Monitoring Pressure, Tidal volume, Respiratory, Frequency, Minutes volume PEEP, FiO2, EtCO2(0Option).
- Loop : P-V loop, F-V loop.
- Alarms, Air way pressure limit, O2 concentration, Apnea, Tidal volume, Minute volume, respiratory rate, power supply failure, battery low

## ENDO

ENDO ANM3  
Anesthesia Machine

## Features

- CE marked, meet EU clinical requirements.
- Contemporary & ergonomic designed for ease of use
- Pull handle.
- DIN rail at both side of machine allows for flexibility and ease of mounting patient monitor other expansion medical devices.
- Optional integrated auxiliary O2 flowmeter and suction control.
- AGSS (Anesthesia Gas Scavenging System) is optional.
- Electronic displayed flowmeter.
- Applicable to infant, pediatric and adult.
- Driven gas can be oxygen or air. Save running cost of oxygen

## Vaporizer

- Dual positions.
- Mounting: Tool-free installation Selectatec compatible with interlock.
- Agent type: Sevoflurane, Halothane, Isoflurane and Enflurane.
- Filling type: Pour-fill, Easy-fill and Quick-fill.

## Ventilator Parameter

- Patient type: Infant, pediatric and adult.
- Driven mode: Pneumatically driven electronically controlled.
- Ventilation mode: VCV, PCV, SIMV-V, SIMV-P, PSV, STANDBY, Manual/Spontaneous.
- Tidal volume (VT): 20ml1500ml.
- Pressure (Pinspired) range: 570 cmH2O.
- Pressure (limit): 5 - 100cmH2O.
- Pressure support: 560 cmH2O.
- Electronic PEEP: OFF, 3 39 cmH2O.
- Trigger: Flow and pressure trigger.
- Frequency (f): 0100bpm, SIMV frequency: 460bpm.
- EE ratio: 10:11.10.
- Inspiratory pause: 0 60% of inspiratory time.
- Inspiratory time: 0.555.

**AYGUN®**  
SURGICAL INSTRUMENTS CO., INC.

## Surgical Illumination System LD54 Operating Lamp



### Features

- Completely compatible with laminar flow.
- Advanced LED technology.
- Adjustable light beam diameter.
- Maximum aerodynamic design for minimal turbulence.
- LED user interface

### Multiple Light Beam

- Multiple Light Beam Configuration for Shadowless Illumination, I-LIGHT boasts the ideal design for shadowless illumination

### Improved Beam Technology

- 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.

### 5" TFT LCD Touch Screen Panel

- All functions used in the surgical light system are adjusted via the touch screen. Light intensity, focus and endo mode are set on the touch panel with animated feedback.

### Quality Light

- Special alloy body design and LED driving technology minimize the heating of the light head. 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 highclass lighting temperature

### No Flicker Effect

- Smooth LED driving technology no flicker effect is generated. Flicker effect can cause eye strain, headaches, blurred vision. Also light flicker causes corruption in photos or videos

### Super Optical Performance

- Lighting functions are governed by microcontroller based electronic systems. By ensuring perfect LED and Lens compatibility, light quality is improved. By designed protected LED module, safer lighting is provided in case of failure of any LEDs the other LEDs are not effected. Each LED module can be replaced independently of the others and also they can be reached easily thanks to the independent Glass cover design of the Light head



## ENDO

## ENDO 2000E

Surgical Table Electro Hydraulic



## Features

- ENDO Surgical Table Electro Hydraulic ENDO 2000E is designed to accommodate different patient positions required for demanding surgical procedures, with an ultimate focus on patient and user safety.
- ENDO 2000E Surgical Table is constructed with stainless steel and high quality materials to provide durability and long operating life.
- Surgical positions of ENDO 2000E are adjusted by an electrohydraulic system.
- Positions are adjusted with remote control, in a quiet and nonvibrating manner at constant speed.
- ENDO 2000E Surgical Table is equipped with battery recharge system. Movements of the table are fed from battery circuit. Battery power of the table has a 30 minutes operating time in cases of mains failure providing approximately 30 complete position changes.
- The tabletop consists of four sections: head, backrest, seat and leg, each with removable, easy to clean, anti-bacterial, and waterproof 80 mm mattress for patient comfort.
- Sliding motion of the tabletop enables ENDO 2000E.
- Surgical Table ENDO 2000E compatible for use with C-Arm radiological equipment.

## ENDO 550S

Surgical Table Hydraulic



## Features

- ENDO Surgical Table Hydraulic ENDO 550S are designed to accommodate various type of patient positioning required for demanding surgical procedures with ultimate care to the patient's and user's safety.
- Surgical Tables are constructed with stainless steel and high quality materials to provide durability and long operating life.
- The tabletop consists of four HPL-Compact Laminant sections: head, backrest, seat and leg; each with removable, easy to clean, antibacterial, and waterproof polyurethane pads for patient comfort.
- The radiographic tabletop\* made of HPL - Compact Laminant can be easily installed and removed for X-ray procedures.
- The durable cast iron table base is covered with a stainless steel.
- The "T" shape design of the ENDO 550S allows easy access to the tabletop in any position.
- Special brakes and antistatic casters allow ease of mobility.
- Stainless steel side rails accept a variety of available accessories.

## ENDO

## ENDO D1

## Defibrillator Monitor



## Features

- Comprehensive function With Defibrillation, Pacing, Monitoring and AED mode, S5 is not only suitable for pre-hospital first aid, but also applicable in in-hospital usage.
- Manual defibrillation modes include synchronous cardioversion and asynchronous defibrillation.
- Having on-demand pacing and fixed pacing mode, for patients with cardiac arrest and acute severe slow arrhythmia, in vitro non-invasive pacing mode is rapid, easy to master, time-saving and improve recovery success rate.
- The model applies patented analysis algorithm and automated analysis as well as convenient setting to guide clinical emergency personnel in providing defibrillation and basic life support.
- 5-lead ECG monitoring as standard, optional monitoring functions : SpO2, NIBP, PR and EtCO2 are also available for continuous monitoring of patient vital signs.
- As the most important part of CPR, time is the key for defibrillator monitor. Therefore, S5 abandons complex operation and improve convenience and efficiency for rescue.
- Provides a comprehensive networking solution, allowing users to access patient's information and improve work efficiency when needed.

## Technical Data

- Standard Configuration : Manual defibrillation, AED, 3/5-lead ECG, RESP, Thermal Recorder.
- Waveform Biphasic truncated exponential waveform, with impedance compensation
- Defibrillation pathway External defibrillation
- Electrode type External defibrillation paddles, multifunctional electrode
- Charge Time (Battery power) : Less than 3 seconds to 200 Joules with a new, fully charged battery  
Less than 7 seconds to 360 Joules with a new, fully charged battery
- Charge Time (AC power) : Less than 4 seconds to 200 Joules; Less than 8 seconds to 360 Joules
- Energy accuracy :  $\pm 1.5J$  or  $\pm 10\%$  of setting, whichever is greater, while 50 $\Omega$  impedance  $\pm 2J$  or 15% of setting, whichever is greater, while 25 $\Omega$ , 75 $\Omega$ , 100 $\Omega$ , 125 $\Omega$ , 150 $\Omega$ , 175 $\Omega$  impedance
- Patient Impedance Range : 20–300 $\Omega$  (External defibrillation).
- Defibrillation proof : Type CF: ECG, RESP, SpO2, NIBP, PR; Type BF: EtCO2
- Size : 295mm×252mm×316mm
- Weight : 5.6kg (Including 1 battery), 5.384 (Main unit)
- Screen Size : 7" TFT screen
- Resolution : 800 × 480
- Waveforms : Max 4 waveforms

## ENDO

## ENDO D2

## Defibrillator Monitor



## Features

- Comprehensive function With Defibrillation, Pacing, Monitoring and AED mode, S5 is not only suitable for pre-hospital first aid, but also applicable in in-hospital usage.
- Manual defibrillation modes include synchronous cardioversion and asynchronous defibrillation.
- Having on-demand pacing and fixed pacing mode, for patients with cardiac arrest and acute severe slow arrhythmia, in vitro non-invasive pacing mode is rapid, easy to master, time-saving and improve recovery success rate.
- The model applies patented analysis algorithm and automated analysis as well as convenient setting to guide clinical emergency personnel in providing defibrillation and basic life support.
- 5-lead ECG monitoring as standard, optional monitoring functions : SpO<sub>2</sub>, NIBP, PR and EtCO<sub>2</sub> are also available for continuous monitoring of patient vital signs.
- As the most important part of CPR, time is the key for defibrillator monitor. Therefore, S5 abandons complex operation and improve convenience and efficiency for rescue.
- Provides a comprehensive networking solution, allowing users to access patient's information and improve work efficiency when needed.

## Technical Data

- Standard Configuration : Manual defibrillation, AED, 3/5-lead ECG, RESP, Thermal Recorder.
- Waveform Biphasic truncated exponential waveform, with impedance compensation
- Application : For use in the ICU, surgical rooms, emergency area or during emergency life threatening situations. For adults and pediatrics.
- Defibrillation pathway External defibrillation Electrode type External defibrillation paddles, multifunctional electrode (Adult and Pediatric)
- Charge Time (Battery power) : Less than 3 seconds to 200 Joules with a new, fully charged battery  
Less than 7 seconds to 360 Joules with a new, fully charged battery
- Charge Time (AC power) : Less than 4 seconds to 200 Joules; Less than 8 seconds to 360 Joules
- Energy accuracy :  $\pm 1.5J$  or  $\pm 10\%$  of setting, whichever is greater, while 50 $\Omega$  impedance  $\pm 2J$  or 15% of setting, whichever is greater, while 25 $\Omega$ , 75 $\Omega$ , 100 $\Omega$ , 125 $\Omega$ , 150 $\Omega$ , 175 $\Omega$  impedance
- Patient Impedance Range : 20~300 $\Omega$  (External defibrillation) 15~300 $\Omega$  (Internal defibrillation)
- Defibrillation proof : Type CF: ECG, RESP, SpO<sub>2</sub>, NIBP, PR; Type BF: EtCO<sub>2</sub>
- Size : 323mm×277mm×338mm
- Weight : 7.2 kg (without battery)
- Screen Size : 8,4" TFT screen
- Resolution : 800 × 600
- Waveforms : 5 waveforms 6 waveforms for 12-lead ECG

## ENDO

### ENDO Ventilator V1

Portable Emergency Ventilator



#### Physical

- Display : 5.6" TFT color Screen.
- Dimension: 480mm (H) \* 260mm (W) \* 420mm (D).
- Weight : 7kg (Gross Weight).
- Weight : 3.5 Kg.

#### Ventilation

- Ventilation Mode : VCV, PCV, SIMV, SPONT, SIGH, MAN
- VT 50-1500 ml
- Frequency 480 bpm
- Inspiratory time 0.2-1 Os
- Pressure trigger sensitivity
- Flow trigger sensitivity 1 -20 L/min
- PEEP 0-20 cmH2O PInsp 5-80 cmH2O FiO2 45-100%

#### Alarm

- Frequency Upper & Low
- Continuous airway pressure high
- Apnea, O2 failure
- AC Power Source failure ,Low battery
- Battery exhausted
- Alarm silence time: is less than or equal to s120 S

### ENDO Ventilator V2.2

ICU Ventilator



#### Physical

- Dimensions(L\*W\*H) : 310mm\*327mm\* 493mm (main unit 664mm \* 600mm \* 1520mm (with trolley)
- Weight : Approximately 12.0kg (main unit), Approximately 33.0kg (with trolley)

#### Display

- Display Size : 18.5 inch-TFT Touch Screen Display
- Resolution (H) x (V) : 1080 \* 1920 pixels
- Brightness : Adjustable

#### Ventilation

- Patient Type
- Invasive Ventilation Mode
- Non-invasive Ventilation Mode

#### Gas Supply

- Gas Supply: Medical-grade Oxygen
- Pipe Connector: NIST or DISS
- Gas Supply Pressure: 280-600kPa

#### Power & Battery Backup

- Number of Batteries: One or Two (Optional)
- Battery Type: Build-in Lithium-ion Battery, 14.4VDC, 6900mAh
- Battery Running Time: 3 hours (1 Qty Battery) & 6 hours (2 Qty Battery)

## ENDO

### ENDO Ventilator V3

ICU Ventilator



#### Features

- 10.4" TFT color screen
- Easy setting by navigator wheel knob and touch key
- Wide choice of ventilation modes including CPAP, APRV, BIPAP
- Flow and pressure trigger
- Static compliance and resistance monitor
- PEEP, P-V loop, V-F loop
- Three-level visual and audible alarm, with concise words describing problems
- Advanced built-in electronic air oxygen mixing device
- Durable and accurate built-in flow sensor
- Integrated expiration valve, easy to be sterilized
- Backup apnea ventilation
- Auto nebulizer
- Built-in battery

#### Expiratory Valve

- With heating function, the expiratory valve protects the device from condensed water, accuracy of the flow sensor is ensure.

#### Humidifier

- Warm and humidify airflow with protection function, nine steps to control temperature.

### ENDO Ventilator V5

ICU Ventilator



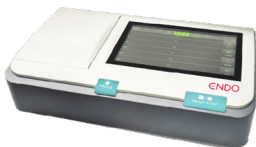
#### Features

- Sleek, stable and highly mobile, this trolley is an all-in-one, comprehensive solution
- Easy to assemble and disassemble components on the trolley
- Hold a full range of compatible accessories
- Provide great convenience and ease-of-use when ventilating and moving patients
- Easy to install. The trolley is designed to easily hold or remove ventilator and accessories, including oxygen cylinders, a humidifier, a circuit support arm and breathing circuits.
- Ergonomic and Intuitive User Interface. Allow easy and precise control of waveforms, loops, and parameter settings
- Advanced Functions. HFNC, CPR, lung recruitment, dynamic lung, P-V tool, and PO.1
- Innovative and Safe Treatment. The system is completed with a medical device AC power supply and internal high-capacity rechargeable battery. It also allows operation and rapid charging with the power source of a ground vehicle
- High-pressure and low-pressure oxygen sources
- Excellent After Sales Support. Detachable breathing valve to prevent cross-infection after autoclave sterilization
- Medical flow sensor allows to be disinfected many times
- Bedside hook supports for easy transfer

## ENDO

### ENDO ECG EI.TC.ECG3

Electrocardiograph 3 Channel



### ENDO ECG EI-ECG3Ch

Electrocardiograph 3 Channel



#### Convenient Information Communication

- **Powerful External Device Support**  
SE-301 arms with two USB ports and one microSD card slot, which extends its capability by supporting various external devices such as barcode scanner, external printer, USB Memory Drive as well as microSD card.
- **Bi-directional Communication with Data Management**  
Via the LAN, built-in Wi-Fi or built-in GSM/GPRS cellular modem, SE-301 is able to receive orders from SE-1515 Data Management System and transmit ECG reports back to have further analysis, editing, saving or printing.
- **Multi-format Report**  
SE-301 is able to export ECG reports in standard PDF format and optional SCP, XML and DICOM format, which offers you greater capability in integrating the ECGs into different data management systems.

#### All For A Reliable Result

- **A high Common Mode Rejection Ratio up to 140dB** restrains signal noises to the greatest extent, thus offers you traces with excellent quality.
- **A wide bandwidth from 0.01 to 300 Hz** guarantees the accuracy of the ECG signal as well as the interpretation especially for pediatric patients.
- **Sampling Rate** The leading sampling rate as high as 16,000 Hz aims at capturing all the details to generate precise result.
- **Signal Quality Detection** By showing different colors to indicate normal, poor or missing signals, this function helps you to identify the signal quality even at a glance.

#### Physical

- **Foldable LCD screen with waveform display and parameters configurable**
- **High resolution thermal printer**
- **Built-in rechargeable lithium battery, AC/DC power supply**
- **Well designed membrane keyboard**
- **Multi-languages selectable**
- **Data transmission to PC via RS232/Ethernet port**
- **USB Interface for patient data transportation**
- **Compatible with external printer for twelve leads simultaneous printing**
- **Complete digital filter, avoiding baseline drift, AC, EMG interference**
- **Automatic baseline adjustment to optimize printing position**
- **Copy mode for additional copies of the latest auto-tested ECG / Electrocardiograph**
- **3/6/12 leads display simultaneous**
- **Lead-Off detection and alert**
- **Selectable report options : auto, manual, rhythm and HRV analysis**

## ENDO

**ENDO ECG EI-ECG12Ch**  
 Electrocardiograph 12 Channel


## Features

- User friendly design.
- 7" high resolution color touch screen.
- Streamlined workflow
- One touch operation
- Support barcode scanner to simplify workflow
- Accurate clinical performances
- Weak signal detection with the advanced 24-bit A/D converter technology
- Anti noise technology with comprehensive filters and high CMRR over 121dB
- 120s real time ECG waveform freezing and review to assist diagnosis
- Automatic measurements and interpretation tested with CSE/AHA/MIT databases
- Extend printing once arrhythmia is detected for further rhythm analysis
- Built in high resolution thermal recorder
- Support external USB printer
- Internal storage up to 500 ECGs and can be enlarged by USB flash disk and SD card
- Data transmission to PC via series port/LAN/internal WIFI
- Report formats PDF and optional SCP/FDA-XML/DI-COM data export

**ENDO EI.PC.ECG**  
 PC Electrocardiograph


## Features

- Dimensions 148 x 100 x 40 mm
- Weight approx. 210 grams
- Lead mode : 12 standard leads / Cabrera leads
- Acquisition mode 12 leads simultaneously
- Rate sampling 1000 / sec channel 24 bits A/D resolution
- Time constant 3.2s
- Frequency response 0.05Hz-150Hz (-3dB)
- Gain 2.5mm/mV, 5mm/mV, 10mm/mV, 20mm/mV
- Impedance 50M $\Omega$  (10Hz)
- Circuit current 0.05uA
- Voltage range  $\leq \pm 5\text{mVpp}$
- Calibration voltage 1mV $\pm 2\%$
- Oset voltage  $\pm 600\text{mV}$  Noise 12.5uVp-p
- AC Filter Filter : ON/OFF DFT Filter: Weak / Strong
- LOWPASS Filter :  
25Hz/35Hz/45Hz/75Hz/100Hz/150Hz CMRR 115dB

# ENDO

## ENDO EI.PC.ECG+Treadmill PC ECG + Treadmill Stress Test



### Features

- ENDO Exercise ECG Test + Treadmill system providing comprehensive solutions for both stress ECG and resting ECG. Compatible with leading Treadmills (Trackmaster,h/p/cosmos and Lode), Bicycles (Ergoline and Ergosana) and Blood pressure monitor (Suntech).
- Compatible with Windows Vista operation system
- Automatic baseline correction for stable ECG trace
- 3/6/12 leads real-time waveforms and ST segment /trend graphs display
- ST average complex analysis , trend analysis and full disclosure waveform analysis
- Standard arrhythmia detection
- Classical and customized exercise Protocols
- Control treadmill, bicycle and exercise blood pressure devices support
- Pre-configured set of report formats
- Powerful memory allowing ease to access to original test data

### Specification

- Dimension :  
Wired : 148mmx 100mm ><40mm, (5.8inx3.9in<1.6in)  
Wireless : Transmitter: 63mmx107mm><23mm, ( 2.5inx4.2inx0.9in), Receiver: 155mmx100mmx30mm, (6.1inx3.9inx1.2in)
- Weight:  
Wired : Approx.210g  
Wireless : Transmitter: Approx.113g (not including battery), Receiver: Approx.173g
- Leads Mode : 12 standard leads/Cabrera leads
- Acquisition Mode : Simultaneous 12 leads acquisition
- Sampling Rate : ( Wired : 1,000/sec/channel), (Wireless :10,000/sec/channel sampling, 500/Sec/channel analsis)
- AID Resolution : (Wired : 24 bits) (Wireless : 18 bits)
- Time Constant :  $\geq 3.2s$
- Frequency Response : 0.05Hz-150Hz (-3dB)
- Gain : 2.5mm/mV, 5mm/mV, 10mm/mV, 20mm/mV
- Input Impedance :  $\geq 20M\Omega(10Hz)$
- Input Circuit Current :  $\leq 0.05\mu A$



## ENDO

## ENDO EI.PO

Pulse Oxymeter



## ENDO EI.PO3

Pulse Oxymeter



## Classification

- Type of protection against electric shock : II (Internal powered equipment)
- Degree of protection against electric shock : Type BF
- Operation Mode : On-site inspection
- Level of protection against explosion hazard :
- Common equipment: not protected
- Equipment type: Fingertip Oximeter

## Measurement

- SpO2 represents accuracy  
Range : 70% – 99% + 2 digits  
0%–69%; not specified  
Resolution : 1%
- PR represents accuracy  
Range : 725 – 250 +- 3 digits  
Resolution : 1 bpm
- Power Requirements  
Battery specifications: Two, 1.5V (AAA)  
Operating Voltage: DC 2.3-3 V
- Environment  
Operating system : +41°F to +104° F / 5°C to +40°C  
Storage / Transportation : +41°F to +140°F /  
-40°C to +60°C
- Humidity  
Operating system : 10–95%, condensation mark  
Storage / Transport : 10–95%, no condensation  
Operating system : 70–106 kpa  
Storage/Transport : 50–107.4 kpa

## Physical

- Measured Parameters : SpO2 + PR
- LCD display with backlight control
- Dual work modes : monitoring and spot check
- Numeric display with plethysmogram display
- Trend review
- Pulse-tone modulation (Pitch Tone)
- Adjustable audio and visual alarms
- Powerful data storage capacity of up to 300 hours
- PatientCare Viewer software for PC data mangement
- 4x AA batteries for up to 48 hours of work
- Rechargeable battery for up to 30 hours of work
- Optional battery charger stand
- Automatic power-off function for power saving

## ENDO

ENDO EI-SP  
Syringe PumpENDO EI.SP3  
Syringe Pump

## Features

- Self-testing - Every time the unit is turns on, self testing is proceeded.
- Auto-syringe detection size automatically.
- Shortcut key - Syringe brand set, Occlusion set, Buzzer level set.
- K.V.O.(Keep Vein Open) - When the delivery volume has been reached, flow rate turns into K.V.O. rate (adjustable from 1ml/h to 10ml/h) automatically.
- Keypad lock function - Keypad can be locked with or without password.
- Infusion Setup - Flow rate/ Delivery volume/ Infusing time.
- Retain Memory - Last setting value will be retained.
- Remaining Time Display.
- Alarm Repeat Function.
- Open system - Up to 10 syringe brands can be calibrated in single unit.
- Buzzer level - 3 steps.
- Occlusion level - 9 steps (3.8 ~ 19.3 psi).
- Purge rate - Adjustable (0.1 ~ 1200 mL/hr).

## Features

- The display is a 3.5" touch screen with a resolution of 480x320 and a brightness level that can be adjusted from 1-10 levels.
- Infusion mode: rate mode, time mode, VTBI, BW mode with 5, 10, 20, 30, 50 (ml) needle selection which has been configured to enable automatic recognition of syringe size.

## Specification

- Dimensions 352 x 194 x 142 mm
- Weight < 2.2 Kg (with clamp)
- Display 3.5" touch screen
- Resolution 480\*320
- Brightness Adjustable, level 1-10
- Power Input 100 - 240 V; 50/60 Hz ; 35VA
- Rated Battery Voltage 7.4 V
- Battery capacity 2600 mAh
- Battery Runtime > 360 min @ 5 ml/hour
- Battery Charging Time < 240 min for 100% capacity

## Infusion Specifications

- Infusion Rate mode; Time mode, VTBI, BW mode
- Needle Selection 5, 10, 20, 30, 50 ml
- 5 brands of syringes are preconfigured
- Supports user defined syringes
- Automatic recognition of syringe size

## ENDO

ENDO EI.IP  
Infusion PumpENDO EI.IP3  
Infusion Pump

## Features

- Numerical keypad Easy and fast way to setup.
- Various displays FND displays numerical data clearly and Color LCD displays detail information.
- User friendly Simple setup process makes user feels comfortable and variety display gives complete information.
- Self-testing - Every time the unit is turned on, self testing is executed.
- K.V.O.(Keep Vein Open) - When the delivery volume has been reached, flow rate turns into K.V.O. rate (adjustable from 1ml/h to 10ml/h) automatically.
- Keypad lock function - Keypad can be locked with or without password.
- Infusion setup - Flow rate/ Delivery volume/ Infusing time.
- Retain memory - Last setting value will be saved.
- Remaining time display.
- Alarm repeat function.
- Open system - Up to 10 IV set brands can be calibrated in single unit.
- Buzzer level - 3steps.
- Occlusion level - 9 steps (4.5 ~ 14.5 psi).
- Purge rate - Adjustable (1 ~ 1000 mL/hr)
- Bolus rate - ON/OFF, Adjustable (1 ~ 1000 mL/hr, 1 ~ 9999mL)
- History call back - Call back last 10 infusion data.

## Features

- Supported by a 5.0" touchscreen display screen, resolution 480x320.
- Adjustable brightness levels from 1-10.
- Infusion mode:  
rate, time, VTBI, BW, intermittent, loading dose, sequence, trapezia, drip with a flow rate of 0.10-1600 ml/hour and preset volume (VTBI) 0.9999.99 ml.

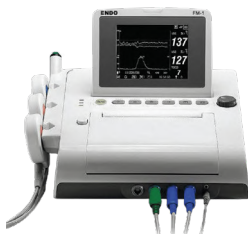
## Specification

- Dimensions 415 x 245 x 215 mm
- Weight 1.7 Kg
- 5.0" Display Screen; Touchscreen
- Resolution 480\*320
- Brightness Adjustable, level 1-10
- Standard Drop Sensor

## Infusion Specifications

- Infusion Mode Mode Rate, Time, VTBI, BW, Intermittent, Loading Dose, Sequence Trapezia, Drip
- Flow Rate (Flow Rate) 0.10 - 1600 ml/hour
- Increase (Increment) 0.10 - 99.99 ml/hour: 0.01  
100.0 - 999.9 ml/hour : 0.1  
1000 - 1600 ml/hour: 1
- Preset Volume (VTBI) 0 - 9999.99 ml  
Preset Time 00:00:01 - 99:59:59 (hour:minute:second)
- KVO 0.10 - 5.00 ml/hour

## ENDO

ENDO EI.FM  
Fetal Monitor

## Features

- Convenient to Carry or Transport
- Compact, portable and lightweight
- Long life Li-ion battery for outpatient service
- Easy to Read & Operate
- 5.6" foldable screen
- Large numeric and waveform display
- Simple workflow with silicone buttons for operations
- Advanced FHR Detection Technology
- Signals Overlap Verification to differentiate twins FHR
- FHR signal quality indicator helps to optimize the probe position
- Flexible Printing Options
- Built-in thermal printer
- Print on 150/152 mm width recording paper
- 1/2/3 cm/min real-time printing speed
- 15 mm/sec fast printing speed for history traces
- Powerful Data Management
- 60 hours built-up memory for seamless monitoring
- MFM-CNS network for remote monitoring
- MFM-CNS Lite for data management on PC
- USB port to enlarge storage capacity

## Multi Display Modes

- Switching among three display modes, user may choose the most suitable one for clinical use.

## Simple Workflow

- 1 Knob Operation:  
Using the knob, you may carry out every configuration to customize the machine according to actual clinical needs.
- 1 Button Operation:  
Start button could be configured to integrate patient info and printing. This could help the doctor to simplify the workflow and work with 1 button only.

## FHR Probe

- The use of 1MHz probe enlarges the penetration and deepens the range of detection, which is significant and positive in fetal monitoring, especially for big pregnant women. Furthermore, it is also proved that the lower the detection frequency of the probe, the better protection to the tissues of fetus.

## ENDO

## ENDO EI.VSM

Vital Sign Monitor



### Specifications

- Standard Parameters
- SpO2, NIBP, and PR
- Nellcor SpO2, SunTech NIBP, Quick Temp, Infrared Ear Temp, Covidien Quick Temp
- Spot Mode
- 16,000,000 measurements
- Loop Mode
- 800,000 sets of recording loops
- Monitoring Mode
- 200 Alarms, 1200 NIBP measurements, 240 h Trend

### Features

- **Loop Mode**  
Special working mode designed for daily cycle creation applications. Worklists can be easily inserted on a USB Disk or downloaded from the EMR system. In addition, the color-coded patient list is equipped with a window display design box, you can know the patient's status and information at a glance.
- **Monitoring Mode**  
Continuous patient monitoring with real time data, alarms and current condition history.
- **Spot Mode**  
Live examination applications, such as outpatient, emergency, etc. Real time vital signs obtained and displayed, most alarms will be in silent mode.



# ENDO

## ENDO EI.HM

Holter ECG Monitor



### Features

- Easy to clean and prevents damage when exposed to water.
- Practical and Lightweight Design
- Convenient markers or reminders are provided to make it easy to create custom schedules on recorded signals.
- Color coded system for easy classification of markings. Multilevel QRS as sub-template. Shortcut keys for quick marking. Entering Batch to mark undetected heartbeats.
- Dynamic Learning and Search System  
Categorize QRS by type according to the data we have input or confirmed. Filtering artifacts according to the categories we have selected or entered.
- Waveform Superposition Mapping In Superposition mapping, the waveforms show overlapping positions and show sparse segments. Its function is to provide a quick reference in finding different waveforms. Help conduct more efficient reviews,
- Histogram  
ENDO ECG Holter Monitoring EI.HM  
Histogram intervals provide easy access to analyze all heart rates with different intervals. It can also help locate sparse segments quickly, as well as provide a brief understanding of the patient's heart rate condition.

### Compact, Light & Waterproof

- The Holter Recorder reaches protection grade up to IP27, intending to prevent unexpected damages from water or dust, which maximizes patients' freedom in their daily life and facilitates the cleaning & sterilization procedure in the hospital

### Low Power Consumption

- ENDO EI.HM Holter Recorder is designed with low power consumption, which enables it to record as long as 8 days with a single piece of Li-ion battery.

### Quick Switch

- The top toolbar brings access to different function modules. It can be customized by users based on their preference, bringing a user-defined workflow

## ENDO

## ENDO EI.HM12CH

Holter ECG Monitor 12 Channel



## Features

- **Waterproof Design** Easy to clean and prevents damage when exposed to water.
- **Practical and Lightweight Design.** Supported by Micro SD Card storage memory, ENDO EI.HM12Ch weighs 50 grams which is easy to carry anywhere without disturbing the patient's daily activities.
- **Event Marker.** There are practical event markers available, just by pressing the M button it will be saved in the signal recording.
- **Efficiency in Template Classification.** Color coding system for easy classification of markings. Multilevel QRS as sub-template. Shortcut keys for quick marking. Enter Batch to mark undetected heartbeats.
- **Dynamic Learning System and Search System** Categorize QRS based on type according to the data we have entered or confirmed. Filtering artifacts according to the categories we have selected or entered.
- **Waveform Superposition Mapping.** In Superposition mapping, the waveform shows overlapping positions and shows sparse segments. Its function is to provide a quick reference in finding different waveforms. Helps carry out more efficient reviews.
- **Histograms.** Interval histogram provides easy access to analyze all heartbeats with different intervals. Apart from that, it can also help find rare segments quickly, as well as provide a brief understanding of the condition of the patient's heartbeat.

## Standard Function

- Dynamic Learning and Search Function
- Histograms
- Lorenz Plot
- Waveform Superposition Mapping
- ST and QT analysis
- Atrial Fibrillation Analysis
- Heart Rate Variability Analysis
- Page Scan
- Pacemaker Analysis

## Optional Function

- Waterfall Plot
- T Wave Alternative Analysis
- Vector ECG Function
- Ventricular Final Potential Analysis

## ENDO

ENDO EI-PM  
Patient MonitorENDO EI.PM2  
Patient Monitor

## Features

- Pacemaker detection and resist electrosurgical interference
- Defibrillation protection, defibrillation synchronization
- The screen with touch screen feature allows intuitive operation by clicking on specific parameters waveforms in real time, standard configuration includes navigation buttons
- OxyCRG is available to assess respiratory & circulatory function for neonates
- Large font display
- Analysis of arrhythmias and S-T segment
- Built-in rechargeable Li-ion battery
- Nurse call function and two-way communication with MFM-CMS central station and SD card slot in addition to large data storage memory
- USB port and serial port for future upgrades galore
- VGA output and analog output
- A complete and flexible installation solution for a wide variety of scenarios

## Features

- High resolution color TFT-LCD display
- Pacemaker detection
- Protection against defibrillation and electrosurgery
- Pitch tone (Pulse-tone modulation)
- Unique iSEAP algorithm specially optimized for arrhythmia patients
- Dual mode anti-interference oxygen saturation
- Clinically validated NIBP
- Nurse call function VGA output (optional)
- Suitable for adult, pediatric and neonatal patients
- Spacious storage space
- 500 NIBP measurement review, 96 hour trend review, 60 alarm review, 720 second freeze waveform.
- Display mode range 3/5-lead ECG analysis, OxyCRG for neonates, large font and trend screen.
- CO2 Re respiratory  
Proven toughness. Solid state design, suitable for neonatal patients. No need to calibrate regularly. Sidestream sampling rate 50 ml/min/



## ENDO

## ENDO EI.PM3

Patient Monitor



## Features

- ENDO Patient Monitor EI.PM3.
- Fulfills key clinical requirements in a variety of settings in the hospital's Emergency Room, Inpatient, Rehabilitation, Cardiac and Transfer Units.
- Standard parameters: 3/5-lead ECG, RESP, SpO<sub>2</sub>, NIBP and Temperature

## Technical Data

- Screen : Color TFT, 8 inch, touch screen available
- Resolution: 800 x 600
- Waveform: max 13 waveforms
- Dimensions: 236± 2mm(W) x 236±2mm(H) x 147±2mm(D)
- Maximum weight: < 2,4 kg \*without battery / accessories
- Line voltage : 100 V to 240 V ~
- Frequency: 50 Hz / 60 Hz

## NIBP

- Oscillometric Method
- Manual, automatic and continuous modes
- Cuff pressure measurement range 0 - 300 mmHg
- Measurement types SYS, DIA, MAP, PR
- Max Average Error. ±5 mmHg

## ENDO EI.PM7

Patient Monitor



## Features

- ENDO Patient Monitor EI.PM7,
- Fulfills key clinical requirements in a variety of settings in the hospital's Emergency Room, Inpatient, Rehabilitation, Cardiac and Transfer Units.
- Standard parameters: 3/5-lead ECG, RESP, SpO<sub>2</sub>, NIBP and 2-channel Temperature.

## Technical Data

- Screen : Color TFT, 10.1 inch, touch screen available
- Resolution: : 800 x 480
- Waveform: max 13 waveforms
- Dimensions: 261± 2mm(W) x 246±2mm(H) x 146±2mm(D)
- Maximum weight: < 2,8 kg \*without battery / accessories
- Line voltage : 100 V to 240 V ~
- Frequency: 50 Hz / 60 Hz

## NIBP

- Oscillometric Method
- Manual, automatic and continuous modes
- Cuff pressure measurement range 0 - 300 mmHg
- Measurement types SYS, DIA, MAP, PR
- Max Average Error. ±5 mmHg

## ENDO

## ENDO EI.PM8

Patient Monitor



## Features

- ENDO Patient Monitor EI.PM8.
- Fulfills key clinical requirements in a variety of settings in the hospital's Emergency Room, Inpatient, Rehabilitation, Cardiac and Transfer Units.
- Standard parameters: 3/5-lead ECG, RESP, SpO<sub>2</sub>, NIBP and Temperature

## Technical Data

- Screen : Color TFT, 12.1 inch, touch screen available
- Resolution: 800 x 600
- Waveform: max 13 waveforms
- Dimensions: 306± 2mm(W) x 309±2mm(H) x 151±2mm(D)
- Maximum weight: < 3.5 kg \*without battery / accessories
- Line voltage : 100 V to 240 V –
- Frequency: 50 Hz / 60 Hz

## NIBP

- Oscillometric Method
- Manual, automatic and continuous modes
- Cuff pressure measurement range 0 - 300 mmHg
- Measurement types SYS, DIA, MAP, PR
- Max Average Error. ±5 mmHg

## ENDO EI.PWS

Patient Warming System



## Specification

- Power supply : Alternating current 220V-240V, 50Hz/60Hz; 117.7VA
- Control unit temperature setting range : 33.0 °C to 39.0 °C
- Alarm : Power failure alarm, Over temperature alarm, sensor failure alarm, temperature variation alarm, system failure alarm. All alarm signals are medium priority. Sound pressure level of auditory alarm signal not less than 65 dB(A) while the distance is 3 meters from the device
- Ambient temperature range : +10°C - +40°C
- Ambient humidity range : 10% - 80%
- Pressure limit approx : 86.0 kPa - 106.0 kPa
- Safety performance : The product is BF class I type equipment

## ENDO

ENDO EI.FD  
Fetal Doppler

## Features

- Ultrasonic Pocket Doppler can meet the routine examination requirements of obstetricians and midwives.
- Easy-to-use fetal doppler
- Fetal doppler with compact design
- Interchangeable fetal doppler probe
- Built-in audio recorder
- Large backlight LCD display
- Accurate FHR detection with clear sound
- Support 2MHz, 3MHz, 4MHz, 8MHz waterproof probes
- Automatic and manual FHR counting
- Long time continuously use (4 hours)
- Automatic power-off

## Specifications

- Display 45 x 25 mm LCD display
- Heart rate range 50-210 bpm
- Resolution 1 bpm
- Recording time 240s
- Audio output power 1W
- Auto power-off 1 minute with no signal or operation
- Size 34 (D) x 89 (W) x 141 (H) mm
- Weight about 300 gr (including the battery)

ENDO EI.VD  
Vascular Doppler

## Features

- Vascular Doppler has been widely used as standard equipment for peripheral vascular diagnosis. Versatile, modern and portable design allows for quick and simple yet effective arterial diagnosis
- Easy to use
- Supports 1.5V AA . battery
- Modern and trendy design
- Accurate blood flow detection with good sound
- Waterproof probe with 4MHz frequency
- Audio power out 0.5W
- Automatic system off 1 minute
- Size 32 (thickness) x 85 (width) x 138 (height) mm
- Heavy 290 +/-5g (including one battery)

# ENDO

## ENDO EI.TM

Non-contact Infrared Thermometer



### Features

- Safe and hygienic no touch (1-3 cm distance)  
Multifunctional, can be used to measure body temperature and objects / objects
- Can store up to 20 data
- Screen : HD LCD
- Measuring range & accuracy
- Forehead mode & object mode
- Forehead mode:  $35-42.2^{\circ}\text{C} \pm 0.2^{\circ}\text{C} / 95-108.0^{\circ}\text{F} \pm 0.4^{\circ}\text{F}$
- Object mode:  $0-100.0^{\circ}\text{C} \pm 1.0^{\circ}\text{C} / 32-212.0^{\circ}\text{F} \pm 2.0^{\circ}\text{F}$
- Temperature unit: C/F
- Auto power off function: 10 seconds
- Battery : AAAx2



### Fitur Termometer

1S Pembacaan hasil dalam 1 detik



Hasil akurat



Penggunaan tanpa sentuh



Alarm peringatan



Mode Senyap

## ENDO

## ENDO EI.BPM

## Blood Pressure Monitor



## Features

- Insert your arm into the cuff and press the Start button. All the measurements are automatically carried out and the measurement data is printed out at once.
- The oscillometric method is used along with a micro controller and the stable tightening of the automatic cuff to provide precise pressure detection and reliable blood pressure values.
- The cuff angle is designed to allow users to maintain comfortable posture when they insert an arm into the cuff.
- The instructions for use, cautions, the condition of the blood pressure monitor, and the blood pressure value are given by voice.
- There are handles on both sides which are convenient for moving the blood pressure monitor.
- The display lamps at top of the blood pressure monitor can be seen from the back and from a distance.

## Specifications

- Measuring method Oscillometric method
- Ventilation method Automatic ventilation by a micro controller
- Pressure detection Semiconductor strain gauge
- Display LCD or FND
- Measurement Range Input: 30 to 300 mmHg
- Minimum Measurement Unit
- Pressure : 1 mmHg Pulse : 30 to 200 / min
- Accuracy Pressure:  $\pm 2$  mmHg Pulse :  $\pm 3\%$
- Cuff driving method
- Belt driving by a micro controller
- Pressurizing time Approx. 10 sec.
- Measuring time Approx. 30 sec
- Power supply AC 110/220V to 230V
- Frequency 50/60 Hz
- Emergency stop Stop by microprocessor
- Voice support
- Guiding voice messages are given when measuring blood pressure. Blood pressure value after measuring blood pressure and error messages are given by voice.
- Power consumption 30VA
- Operation range Temperature: +10 to +40, Humidity: 95% or lower
- Storage range temperature: +5 to +50, Humidity: 95% or lower
- Size 460 (W) x 310 (D) 296 (H)

# ENDO

## ENDO EI.VC Video Colposcope



### Specifications

- Voltage 100 V - 240 V
- Frequency 50 Hz / 60 Hz
- Configuration standard
- Digital CCD camera, stand light module
- Single loop group LED light source
- White LED Light
- Resolution system 500 TVL
- Magnification 1~28X
- Operation distance 200mm - 300mm
- Focus mode
- Electronic control manual and auto focus
- Electronic filters
- Green filter (3 grades)
- Magnification & timing
- Display freeze function
- Stand type vertical, swing arm
- Video output S-Video

### Description

- Cold lighting system of LEDs produces true-to-life network images
- Fast and advanced auto focus system ensures clear images
- Remote capture control and keyboard layout/design for easy operation
- Electronic green filter enhances the image of blood vessels without compromise of light
- Acetic acid and iodine reaction test timer to capture precise & correct images
- Real-time magnification display
- Powerful image display and data management software
- Capturing the right and true pictures
- Analyzing colposcopy findings
- Export report in PDF format

## ENDO

## ENDO EI.USGBW

Ultrasound Diagnostic System



## Specifications

- Applications : Abdomen,OB/GYN,Vascular, Small parts (breast, testicles, thyroid),Musculoskeletal Conventional & Superficial, Pediatric, Basic Cardiac.
- Image,SRA,Compound imaging,THI
- Display Modes B, B/B, 4B, M, B/M,PW
- Gray Scale 256 Levels
- Scanning Depth 240mm Max (depend probe type)
- Probe Frequency 2.5 MHz - 11.0 MHz
- Cine Loop 256 frames
- Zoom 4 steps
- Software Packages Dedicated measurement package General ,OB/GYN, URO, Cardiac,vascular,small parts
- Archives Patient information management, images record, exam report.
- Power Supply AC 100V-240V, 50Hz- 60Hz
- Standard Configuration  
1 probe connectors, 3 USB ports,VGA port ,Video port, LAN port, Full Screen Display Mode,i-Image,Chroma, SRA,Compound imaging,THI, 8G memory card,PW Mode,Built-in Battery

## Advanced Imaging Technologies

- Ergonomics  
Rotatable LED ('-30') : tailor to different viewing angles Ultra-compact & Ultra-light  
Easy to carry  
Keyboard : For easy and quick access  
Dedicated cart TR 9000  
Streamlined workflow
- Economic  
The latest platform & more advanced chip-set:brings you better image quality and features at less cost in a more compact box  
Support PC printer, reduce investment & day to day paper cost  
8G memory card  
320G harddisk (option)  
Vehicular Charging
- ECHO  
Advanced technologies : i-image (Intelligent image optimization), THI (Tissue Harmonic Image), SRA (Speck-le Reduction Algorithm), Compound imaging  
Full digital beam-former  
Trapezoid  
Automatic PW trace  
Chroma  
Full screen display mode  
AIO (Automatic image optimization)
- ECO-friendly  
Less radiation  
Less power consumption  
Longer usage life:LED  
Longer battery standby time: >2 hours

# ENDO

## ENDO EI.USGBW.1

Ultrasound Diagnostic System



### Application

- Stomach, OB / Gynecology, Cardiology, Peripheral blood vessels, Musculoskeletal, Transvaginal, Lungs, Transrectal

### Specifications

- Size :  $\pm 378 \times 352 \times 114$  mm
- Weight: 6.5 kg (with normal battery)
- 15.6 inch medical high resolution monitor
- Resolution : 1920 x 1080
- Viewing angle : 178° (horizontal), 178° (vertical)
- Up/down angle: 0° to 45°
- User-oriented design
- Panel button backlight design
- Multiple keys defined
- TGC 8 segment slider control
- Trackball sensitivity adjustable
- Probe Port: 1 (2 for optional)
- Probe holder : 3
- Power Supply : 100-240V~, 1.5-0.75A
- Frequency : 50/60 Hz
- Output Power: 180VA
- B, M, PW
- Hi-Fi Speaker

### Wide Scan

- Mode off, on
- Linear array probe, convex array

### Trolley

- ST-200 . models
- Width  $\pm 455$  mm
- Depth  $\pm 610$  mm
- Height  $\pm 780$  mm
- Lifting height 0-100 mm, 3 levels
- Cast him. 5" independent lockable
- Front handle, cable hanger, document basket, printer

### Function and Configuration

- Fundamental & harmonic waves with adjustable 5 band frequency
- Uscan, compound image, LGC
- Network specific index
- Image rotation, widescan, HPRF
- Simultaneous mode (Triplex)
- Auto trace, auto BMI, scr-zoom
- Automatic optimization
- B . mode panoramic view
- Biopsy and vis-needle guide, ECG
- Gallery view and standby mode
- Pleura line and automatic B line
- Lung mode

### Image Parameters

- System boot: approx.32 seconds
- System shut down: approx. 17 seconds
- Standby: approx.5 seconds
- Grayscale: 256 levels
- Transducer element: up to 128
- Volume: 0 - 100%, 10 levels



## ENDO

## ENDO EI.USGCD.2

USG Color Doppler



## Application

- Stomach, OB / Gynecology, Cardiology, Peripheral blood vessels, Musculoskeletal, Transvaginal, Lungs, Transrectal

## Specifications

- B, M, Anatomy and color M, CFM, PW,
- PDI/DPDI, CW, TDI (with PW/M)
- Hi-Fi Speaker
- Size :  $\pm 378 \times 352 \times 114$  mm
- Weight: 6.5 kg (with normal battery),
- 7 kg (with large capacity battery)
- 15.6 inch medical high resolution monitor
- Resolution : 1920 x 1080
- Viewing angle : 178° (horizontal), 178° (vertical)
- Up/down angle: 0° to 45°
- Panel button backlight design
- User-oriented design
- Multiple keys defined
- TGC 8 segment slider control
- Trackball sensitivity can be adjusted
- Keyboard in control panel

## Electricity

- Power Supply : 100-240V~, 1.5-0.75A
- Frequency : 50/60 Hz
- Output Power: 180VA

## Trolley

- Width  $\pm 455$  mm
- ST-200 . models
- Depth  $\pm 610$  mm
- Height  $\pm 780$  mm
- Lifting height 0-100 mm, 3 levels
- Cast him. 5" independent lockable
- Front handle, cable hanger, document basket, printer

## Annotation and Body Mark

- Annotations are added to the library and includes a check application
- Text annotations and arrows can be set
- User defined annotations
- Body mark 165 selectable
- Classification by type and position can be customized

## Image Parameters

- System consumed: approx. 17 sec
- Boot system: approx. 32 sec
- Standby: approx. 5 sec
- Grayscale: 256 levels
- Transducer element: up to 128
- Volume: 0 - 100%, 10 levels, 10% each step

# ENDO

## ENDO EI.USG4D.v2

4D Digital Color Ultrasound Diagnostic System



### Specifications

- Main Unit Dimensions:  $\pm 620 \times 1020 \times 1400$  mm
- Unit Net Weight:  $\pm 95$  kg (excluding probe)

### Mode

- Ovary, 2B Mode (Ovarium, Mode 2B)
- Fetal Face, Virtual HD (Wajah Janin, Virtual HD)
- Hepatic Vein, PIP Zoom
- Fetus, B/BC Mode
- Early Preagnancy, C Mode
- Lymph Node Enlargement, B Mode
- Testicle, CPA Mode
- Carotid Vessel, C Mode

### Touchscreen

- Select settings
- Image adjustment
- Measure and comment and bodymark
- Report results
- Image review

### Powerful 4D

- Curved Panoramic Imaging uses pattern recognition and image synthesis to produce a wide, flexible display to display anatomical information for diagnosis.

### Feature

- 9 inch LED monitor, 10.4 inch touchscreen
- CDs/DVDs
- Flat light keyboard
- Probe Connector
- Multi Follicle Measurement up to 16 follicles each time.
- Continuous Wave (CW) Doppler Blood flow detection.

### Quadplex

- Quadplex combines B, color, and PW with automatic tracking and measurement to help users make a diagnosis. Additionally, three modes and measurements are updated in realtime.

### Awesome Workflow

- Easy to read display.
- User-defined functions to suit your own work style.
- Multiple outputs for data transfer (DICOM, DVI, VIDEO, VGA).

## ENDO

## ENDO EI.USG4D.v3

4D Digital Ultrasound Diagnostic System



## Specifications

- Dimensions (depth x width x height) : 806 mm x 518 mm x 1462 mm
- Heavy : 51kg (without probe)
- Power supply voltage : Can be automatically adjusted for AC100-240V
- Power supply frequency : 50-60 Hz
- Power consumption : 600 VA
- Standard Configuration : 4 active transducer ports
- Appearance:
  - 10.1 inch touch screen
  - High resolution color LED; 19inch
  - Brightness and contrast adjustment
  - Alphanumeric keyboard
- Storage :
  - 500G integrated hard disk
  - DVD-R/W
  - USB ports:6
  - Image storage format: IMAG
  - Image export formats: BMP, JPG, DCM, PNG, TIFF
  - Cine loop storage format: CINE
  - Cine loop export format: AVI
- Image Mode: Modes B, B/M, M, 2B, 4B, CFM, 2D Steer, PD, DPD, PW, B/BC, Triplex, Quadplex, CW, Free Steering M, TDI, Color M, Curved Panoramic Imaging, Trapezoidal imaging, Compound, SRA, Elastography, ECG, Super needle, 4D, Virtual HD, FHI, AIO
- Scanning Method : Electronic convex, Linear, Micro convex, phased array, Volume convex

## ENDO EI.USG4D.v7

4D Digital Color Ultrasound Diagnostic System



## Specifications

- Dimensions (depth x width x height) : 764 mm x 630 mm x 1440 mm
- Heavy : 75kg (without probe)
- Power supply voltage : Can be automatically adjusted for AC100-240V
- Power supply frequency : 50-60 Hz
- Power consumption : 600 VA
- Appearance:
  - 13.3 inch touch screen
  - High resolution color LED; 23.8inch
  - Resolution: 1920x1080; Image area: 800x600
  - Brightness and contrast adjustment
- Control panel :
  - Adjustable height: 15 cm
  - Can be rotated 100° left and right
  - Alphanumeric keyboard
  - 8 TGC Slides
- Storage :
  - 500G integrated hard disk, DVD-R/W
  - USB Ports:8, Image storage format: IMAG
- Image export formats: BMP, JPG, DCM, PNG, TIFF
- Image Mode: Mode B, B/M, M, 2B, 4B, CFM, 2D Steer, PD, DPD, PW, B/BC, Triplex, Quadplex, CW, Free Steering M, TDI, Color M, Curved Panoramic Imaging, Trapezoidal imaging, Compound, SRA, Elastography, Stress Echo, ECG, Super needle, 4D, Virtual HD, FHI, AIO
- Scanning Method : Electronic convex, Linear, phased array, Volume convex

# ENDO

## ENDO EI.USG4D+EC.20

4D Ultrasound and Echocardiography



### Application

- Abdominal and pelvic OB / Gynecology Cardiology and peripheral vessels Musculoskeletal Transvaginal and transrectal Lungs

### Speaker

- Hi-Fi speakers
- Frequency response 200Hz - 12kHz

### Picture Mode

- B, THI/PHI, M, anatomy and color M, CFM, PDI/DPDI, PW, CW, 3D/4D, TDI (with PW/M)

### Control Panel

- Panel button backlight design
- User-oriented design
- Multiple keys defined
- TGC 8 segment slider control
- Trackball sensitivity can be adjusted
- The difference between promotion and drop rank: 0 -230 mm
- Control panel rotated & lifted
- Rotating angle:  $\pm 40^\circ$

### Monitor

- 15.6 inch medical high resolution monitor
- Resolution : 1920 x 1080
- Viewing angle : 178° (horizontal), 178° (vertical)
- Up/down angle: 0° to 45°
- Up and down angle: 25° up, 90° down
- Contrast and brightness adjustable
- Frequency 60 Hz
- Rotating angle monitor arm:  $\pm 53^\circ$ , upper and lower arm swivel angle, left right  $\pm 112^\circ$ ; height 0 -100 mm

### Touch Screen

- Resolution medical height 13.3 inch
- 1920 x 1080 . resolution
- Viewing angle: 160° (left and right), 160° (up and down)
- Parameter layout setting
- Tilt angle 10°
- Brightness and contrast adjustable
- Protective film anti glare

### Port Probe & Holder

- Probe ports: 5, 4 active, 1 passive
- Pencil port, holder, gel and heater clutch, cable hanger

## ENDO

## ENDO EI.SC3

Suction Pump



## Features

- Single piston cylinder that does not require daily lubrication/maintenance, does not produce pollution to the environment.
- Good flow, vacuum & performance. The vacuum can be adjusted by the regulator as needed and displayed by the vacuum gauge.
- Safe and efficient filters prevent fluid from entering the pump.
- The body is made of light plastic material, practical and comfortable to carry and operate.
- Autoclavable transparent plastic bottles, more durable and more convenient to clean.

## Technical Data

- Maximum Vacuum :  $\geq 0.08$  Mpa (600 mmHg)
- Vacuum Range : 0.02 Mpa (150 mmHg) ~ Maximum Vacuum
- Flow Rate :  $\geq 20$  L/min
- Bottle Capacity: 1000 ml (1 pcs)
- Noise :  $\geq 60$  dB(A)
- Power Supply: AC 220V; 50Hz
- Working Time: Maximum 30 minutes
- Weight: 4 kg
- Dimensions : 210 x 140 x 300 mm

## ENDO EI.SC7

Suction Pump



## Features

- Maintenance free, oilless pump and high flow rate.
- Large diameter storage bottle, stopper with sealing ring, easy to open, tighten and clean
- The overflow protection device prevents liquid from entering the inner pipe.
- Transparent non-toxic PVC hose, easy to use observation.
- The air filter protects the pump from pollution.
- Hand switch and foot switch are installed in parallel, can be selected according to needs.
- Work stably and durable, low noise.

## Technical Data

- Maximum Vacuum :  $\geq 0.09$  Mpa (680 mmHg)
- Vacuum Range : 0.02 ~ 0.09 MPa (150 ~ 680 mmHg)
- Flow Rate :  $\geq 40$  L/min
- Bottle Capacity: 3000 mL x 2; (maximum usage capacity for 2500 mL)
- Noise :  $\geq 60$  dB(A)
- Power Supply: AC 220V; 50Hz
- Weight: 22.5 kg
- Dimensions : 360 x 320 x 830 mm

## ENDO

**ENDO EI.SC8**  
 Suction Pump

**Technical Data**

- Dimensions : 345 x 250 x 305 mm
- Net weight : 6 kg
- Motor speed : 1400 rpm
- Vacuum range : 0-600/620 mmHg
- Outputs : 20 L/mt
- Bottle capacity : 1Liter
- Power consumption : 60W
- Voltage : 230V, 50/60Hz

**ENDO EI.SC10**  
 Suction Pump

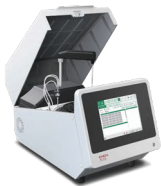
**Technical Data**

- Dimensions : 485 x 650 x 985 mm
- Net weight : 30 kg
- Motor speed : 1400 rpm
- Vacuum range : 0-680/710 mmHg
- Bottle capacity : 2 ltr, 3 ltr, 5 ltr
- Power consumption : 0.145 kW
- Voltage : 230V, 50/60Hz

## ENDO

### ENDO EI.CA

Chemistry Analyzer



#### Specifications

- Power : 100-240 VAC, 50/60 Hz
- Power or current rating : Max power 113.85 VA
- Power supply voltage fluctuations : Rated voltage  $\pm$  10%
- Dimensions : 384 x 640 x 410 mm (Width x Depth x Height)
- Net weight : 30 kg
- Computer : Linux
- Data storage : 100,000 results and more depending on PC
- Other : Compatible with keyboard, mouse, Ethernet, USB etc.
- Wavelength : 8 wavelengths : 340, 405, 450, 510, 546, 578, 630, 660 nm (precision  $\pm$  2nm)
- Photometer : Maintenance free photometer back spectrophotometry with filter
- Absorption : 0 to 4.5 Abs
- Reagent volume : 10-300  $\mu$ l, step by 1  $\mu$ l
- Sample volume : 1-40  $\mu$ l, step by 0.1  $\mu$ l

### ENDO EI.CA2

Chemistry Analyzer



#### Specifications

- Wavelength (Wavelength) : 340, 380, 405, 505, 546, 578, 620 (nm) and one free position
- Light sources : Halogen lamp, 6V 10W
- Appearance : 5 inch touchscreen
- Memory : 15,000 storage results
- Aspiration volume : 100-5000  $\mu$ l
- Test method : End Point, Fixed time, Kinetics, SUB, DIV, ABS
- Reagent : Open the reagent system
- Absorbance range : 0-3.000 Abs
- Absorbance variation (340 nm) :  $\leq$ 0.005 Abs
- Size : 355 x 330 x 175 mm
- Power supplies : AC 100-240V 50/60HZ
- Power :  $\leq$ 180 VA
- Net weight : 5.6 kg

## ENDO

### ENDO EI.HA

Hematology Analyzer



### ECG Bulb Electrode & ECG Limb Clamp Electrode



#### Specifications

- Test Principles : Impedance for cell counting and cyanide-free methods for HGB
- Inputs : 8inch touch screen, keyboard, mouse
- Outputs : Internal printer, can be connected to an external printer
- Paper Printers : 80 x 35 (mm)
- Storage : 100.000 hasil dengan histogram
- Dimensions : 410 x 435 x 472 (mm)
- Heavy : 21 kg
- Voltage : 100~240AC, 50/60Hz
- Results : 60 samples/hour
- Calibration mode : Auto, manual and fresh blood calibration
- Sample mode : Venous, capillary and predilution blood
- Sample volume: Normal: 10 $\mu$ l | Predilute: 20 $\mu$ l
- HGB lamp : 540nm LEDs
- Parameter : 3 WBC differentiation sections, 24 parameters + 3 histograms

#### Features

- Reusable praecordial electrode for ECG
- Metallic Part Diameter : 15mm / 20mm / 24mm / 30mm
- Ball Diameter : 25mm / 33mm
- Electrode Material Coating : Silver / Silverchloride
- Ball Material : Plastic (Medical Grade PVC)
- Connection : Universal screw (4 mm) and clip
- Reusable peripheral clamp electrodes for ECG
- Electrode Material Coating :  
Argento Clorurato (Ag/AgCl) / SSC
- Connection : Universal screw (4 mm) and clip
- Compliance to Standards : Directive 93/42/EEC.  
Class 1 device



## ENDO

### Micropipette Tip Accessories



#### Features

- Micropipette is a device used to move liquids in small quantities accurately.  
Compatible : Eppendorf blue, white and yellows tips.

### Patient Cable Compatible



#### Compatible

- Burdick : EK-10 and Elite, E350, E350i, E550, E560
- Cardioline : AR-600, AR-1200, AR-2100
- Fukuda Denshi : FX101, FX102F, FX328U, FCP2201
- GE-Marquette : MAC 500, MAC 1100, MAC 1200
- Mortara : ELI-200, ELI-50, Kenz : 103, 106
- Nihon Kohden : ECG-1150, 1250, 1350, 1550, 2350, 2550 Cardiofax 6151, 6851, 6353, 8110 Cardiofax Q
- ECG-9110K, 9130K
- Philips / HP : M1770A, M1771A, M1772A Pagewriter 100 / 200 / 200i
- Quinton : Eclipse™ 4, 8, 400, 800, 850, 850i Eclipse LE II and ATRIA PLUS
- Schiller : AT-1, AT-2, AT-2 Plus, AT-4 Resistor 10K Long Screw AT-3, AT-6, CS-6, AT-5, AT-10, AT-60

# ENDO

## ENDO EI.MP

Micropipette



### Specifications

- Smooth pipetting.
- Grip (in-hand grip).
- Accurate and precise.
- Minimum size and maximum accuracy.
- Two stop plunger.
- Can be completely autoclaved.
- Beautiful color coding for easy identification of volumes.

### Description

- A micropipette is a laboratory tool used to collect and/or transfer small (micro) amounts of liquid accurately. Usually used to move fluids with volumes < 1000 microliters. Micropipettes (micropipettes) are also often called automatic pipettes.

### Grip Colour



#### VARIABLE

0.1 - 2.5  $\mu$ l  
0.5 - 10  $\mu$ l  
2 - 20  $\mu$ l

**FIXED**  
2.5, 5, 10  $\mu$ l

**MULTI**  
0.5 - 10  $\mu$ l



#### VARIABLE

5 - 50  $\mu$ l

**FIXED**  
20, 25  $\mu$ l

**MULTI**  
5 - 50  $\mu$ l



#### VARIABLE

10 - 100  $\mu$ l

**FIXED**  
50  $\mu$ l

**MULTI**  
10 - 100  $\mu$ l



#### VARIABLE

20 - 200  $\mu$ l  
50 - 200  $\mu$ l

**FIXED**  
100, 200  $\mu$ l

**MULTI**  
20 - 200  $\mu$ l



#### VARIABLE

100 - 1000  $\mu$ l  
200 - 1000  $\mu$ l

**FIXED**  
250, 500  $\mu$ l

**MULTI**  
30 - 300  $\mu$ l



#### VARIABLE

0.5 - 5 ml, 1 - 5 ml  
0.5 - 10 ml, 1 - 10 ml

**FIXED**  
1000, 2000

**MULTI**  
5000, 1000  $\mu$ l

## ENDO

ENDO EI.Smart  
Micropipette

## Specifications

- Light and smooth plunger action.
- Locking mechanism prevents accidental volume changes during pipeting.
- Bigger digits.
- The slim design allows the pipette to operate even with the narrow tubes used in Soft touch tip ejection laboratories.
- Light, easy operation and high performance.
- The pipette handle has a Thermoplastic Elastomer coating to prevent heat transfer from the body to the inside for high accuracy even during continuous use.
- Color coded for easy identification.

## Variable

Kode Warna	●	●	●	●	●	●	●	●	●	●
Rentang Volume (μl)	0.1 - 2.5	0.5 - 10	5 - 50	10 - 100	100 - 1000	2 - 20	20 - 200	500 - 5000	1000 - 10000	
Kenaikan (μl)	0.002	0.02	0.1	0.1	0.1	0.02	0.02	10	20	

## Fix

Kode Warna	●	●	●	●	●	●	●	●	●	●	●	●	●	●	●
Rentang Volume (μl)	25	5	10	20	25	50	100	200	250	500	1000	2000	5000	10000	
Kenaikan (μl)	2.5	5	10	20	25	50	100	200	250	500	1000	2000	5000	10000	

# ENDOSCOPY PRODUCT LIST



- Arthroscopic Shaver
- Arthroscopy Instrument
- Bite Block & Multi Band Ligator
- Disinfectant & Enzymatic
- Disposable Endoscopy Instrument
- Stapler & Trocar
- Electrosurgical Unit
- Endoscopy Washer
- ENT Instrument
- ESWL
- Flexible Video Endoscopy
- Full HD Camera & Video Endoscopy
- Hand & Skin Antiseptic
- High Speed Motor
- Holmium Laser Fibers
- Holmium Laser Therapeutic
- Hysteroscopy Instrument
- Insufflator & Pump
- Laparoscopy Instrument
- Ligating Clips
- Lithotripter
- Morcellator
- Open Surgery Instrument Set
- Pneumatic & Ultrasound Lithotripter
- Portable Camera & Video Endoscopy
- RF Console & Fluid Pump
- Single Port Laparoscopy
- Skin Graft Mesher & Dermotome
- Ultrasonic Scalpel
- Urology Consumable & Instrument
- USB Portable Camera
- Video Laryngoscope

# ENDO

## CAMERA SYSTEM & LIGHT SOURCE

### ENDO EI.EC7

Full HD Camera System



### ENDO EI.LS2

Light Source



#### Features

- Full HD Display Resolution
- High Speed Shutter
- Multi-language Menu
- Remote camera remote

#### General Data

- Main Voltage 100-240 VAC
- Power Consumption 20 VA
- Current Consumption 0.3 A
- Frequency 50/60 Hz
- Electric Fuse 5x20mm, 3.15AH, 250V
- Dimensions (WxHxD)  
Control : 353 x 103 x 252mm  
Camera Head : 34 x 73mm
- Heavy  
Control Unit : 4.5 kg  
Camera Head : 105 g
- Image Sensor 1/3" MOS
- TV system Progressive scanning at 50/60 Hz
- TV Resolution 1920 x 1080 Px (Full HD)
- Image Resolution >1000TV-Lines; Horizontal
- Index Ratio 54 db
- S/N < 3lx
- Min. Sensitivity JPG (1920 x 1080)
- Image Format Full HD 1920 x 1080; Mpeg-4

#### General Data

- Main Voltage 100-240 VAC
- Power Consumption 130 VA
- Current Consumption 1.1 A
- Frequency 50/60 Hz
- Tool Dimensions (WxHxD) 360 x 125 x 251 mm
- Accessories cyber optic cable, power cable, manual book

#### Connection

- Video-In Terminal 1x video, BNC
- Light Guide storz, wolf
- Service / Network 1 x RJ 45
- Remote IN, connection control

#### Classification

- Protector Class 1 (EN 60601-1)
- Application Section type BF
- Protection Level IP20
- Classification (MDD) I

## ENDO

## CAMERA SYSTEM &amp; LIGHT SOURCE

## ENDO EI.EC8

Endoscopy Camera



## ENDO EI.LS8

Light Source



## Specifications

- White balance: automatic
- AGC (Automatic Gain Control): On / Off
- Brightness adjustment: level 0 - level 9
- Edge enhancement: level 0 - level 9
- Contrast enhancement: low, medium, high
- Photometry modes: full, wide, circular
- Image enlargement factor: level 1 - level 3
- Max. video resolution  $\geq 1920 \times 1080$
- VIST : on / off
- Image freeze : on / off
- Max horizontal resolution : 700 lines, allowance -20%, not considering the upper limit Max signal to noise ratio : 43 dB, allowance -5%, not considering the upper limit
- Optical lens  
By simply using the endoscope connector  
32 mm, allowance  $\pm 0.1\text{mm}$   
Min. Focal length : 16mm, 20% allowance no considering the lower limit  
Max. Focal length : 32mm, allowance -20% no considering the lower limit
- Power supply  
Rated voltage: 100 - 240 V AC  
Frequency: 50 Hz / 60 Hz  
Input power: 160 VA  
Fuse : T2.5 AH 250V

## Specifications

- Uniformity of illumination : Termiur value: less than 1.05 times the nominal value
- Points outside the illumination threshold:  $\leq 2$
- Maximum noise:  $\leq 55\text{dB}$
- Light intensity level : 1-19
- Total length : 3000 mm, allowance:  $\pm 5\%$
- Light input surface dimensions:  
Diameter: 5.4 mm  
Length: 62.0 mm
- Light output surface dimensions:  
Diameter: 5.3 mm  
Length: 16.0 mm
- Light output angle:  $40^\circ$
- Spectral transmittance :  $\leq 35\%$
- Light Transmittance : 20%
- Power supply  
Rated voltage: AC 100-240v  
Frequency: 50Hz/60Hz  
Input power: 300VA  
Fuse : 5AH 250V

# ENDO

## CAMERA SYSTEM & LIGHT SOURCE

### ENDO EI.EC9

Endoscopy Rigid Camera



### ENDO EI.LS9

Light Source



#### Specifications

- White balance: automatic
- AGC (Automatic Gain Control): On / Off
- Brightness adjustment: level 0 - level 9
- Edge enhancement : level 0 - level 9
- Contrast enhancement: low, medium, high
- Photometry modes: full, wide, circular
- Image enlargement factor: level 1 - level 3
- Video resolution:
  - ultra high definition video signal (HDMI, Quad SDI) : 3840 x 2160 high definition video signal (DVI, HD-SDI) : 1920 x 1080
- VIST : on / off
- Image freeze : on / off
- Color rendition: good
- Signal to noise ratio : 40dB; allowance -20%, not considering the upper limit
- Brightness response features  $R2 \geq 0.98$
- Static image tolerance: 110, -20% allowance, does not consider the upper limit
- Inner diameter of endoscope connector : 32mm, allowance  $\pm 0.1\text{mm}$
- Power supply voltage: 100-240 V AC
- Frequency: 50Hz / 60Hz
- Input power: 160VA
- Fuse T1.6 AH 250 V 50CT

#### Specifications

- Endoscope port: Apply to video endoscope with 059.5 mm connector or connector
- White Light mode (WL Mode) :
  - Infrared ray cutting performance: In the wavelength range between 300 nm and 1700 nm, the ratio of radiation flux to light flux should not be greater than 6 mW/lm.
- Max. output light flux :  $\geq 1400 \text{ lm}$ , allowance : - 10%
- Feeding Water: Air feeding pressure levels: L, M and H
  - Pressure range: 45 - 65 Kpa
  - Max. Genre :
    - H rate: 3.7 - 5.5 L / min
    - M rate: 3.0 - 4.7 L / min
    - L rate: 2.0 - 3.7 L / min
- Power Supply
  - Rated voltage: AC 100-240 V
  - Frequency: 50 Hz / 60 Hz
  - Power Input: 300 VA
  - Fuse: T5AH 250 V

# ENDO

## ENDO EI.EC11

Camera System All-In-One



### Highly Integrated

- Portable laptop size unit instead of the traditional heavy endoscope tower
- Convenient for mobile medical treatment and clinical examination, e.g. in doctors office, outpatient setting and day clinics

### Usability

- Button for easy and intuitive handling
- Pre-installed specialty settings
- Possibility to store individual specialty settings
- USB ports to connect external devices
- Connections for light guide cable and camera head

### Camera Head

- Full HD camera head for use with rigid and flexible fiber endoscopes
- Two buttons on camera head
- Buttons can be customized according to user needs
- Long and short press configuration for different settings
- IPX7 waterproof

### Specifications

- Art. No. : NSEO / EV45H
- Screen Size : 17.3" 4K quality display
- Resolution : 1920x1080; 60 frames
- Ports for External Monitor : HDMI & VGA
- Camera Head : f=15-25mm; IPX7 waterproof
- Capturing : Photos and Videos
- Light Source : Integrated LED
- Color Rendering Index : RA > 92
- Color Temperature : 5.700 K
- Directive Compliance : CE mark
- Supply Voltage : 100-240 V, 5V 12A
- Power Supply : 80W, 5V 12A
- Product Size : 413 x291 x40 mm (LxWxH)
- Weight : 4 kg



## ENDO

### ENDO EC-1

Portable Camera System



#### Product Parameter

- Camera 1/3 inch CCD waterproof camera
- Scanning standard DVI output 600 lines
- Output Video
- Light source LED lamp
- Light source color temperature 6000K
- Storage SD card dynamic / static storage
- Display screen 15 inch TFT color screen

#### Easy and Practical Operation

- Simple panel adjustment can get a nice image effects
- White balance support manual/ automatic adjustmen

#### Application

- General Surgery
- Respiratory Medicine
- Gynecology
- Urology
- ENT
- Orthopedics
- Gastroenterology
- Thoracic Surgery
- All departments using the endoscope

### ENDO EC-3

Medical Camera System

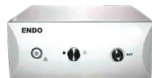


#### Technical Data

- Video System PAL / NTSC
- Image Sensor CMOS
- Resolution 1~9999m
- Minimum Lighting 1920 x 1080P
- Aspect Ratio 0.017 Lux
- SNR 16 : 9
- white balance >= 48dB
- Income Automatic
- Shutter Speed Auto / Off
- Video Output 1/60S - 1/10,000 S
- Minimum Power Videos x 1 HD-SDI x 1
- Temperature -20 C~60 C
- Humidity <= 80%

### ENDO EI-LS

Cold Light Source



#### Technical Data

- Instrument Classification Class I
- Security Type BF
- Lamp LED light
- Color Temperature 6500 K
- Light Power Can be customized
- Lamp Life Up to 20000 hours
- Maximum Exposure Results 1500lm
- Power Input 180V
- Power Supply 220V/50Hz

## ENDO

**EI. USBPC1**

CCD USB Portable Camera

**EI.USBPC2**

Full HD USB Portable Camera

**Features**

- Product weight 4000 g
- Waterproof camera head
- Product size 18.3 x 4.8 x 11.6 cm
- Frequency 50/60 Hz
- Input 110 - 230 VAC 35 VA
- Analog video output
- Minimum lighting 3 Lux
- Automatic white balance
- Image sensor is 1/3 CCD sensor
- High quality videos
- Can be connected with reporting system software, via PC / laptop

**Features**

- Product weight 4000 g
- Waterproof camera head
- Product size 18.3 x 4.8 x 11.6 cm
- Frequency 50/60 Hz
- Input 110 - 230 VAC 35 VA
- Analog video output
- Minimum lighting 3 Lux
- Automatic white balance
- Image sensor is 1/3 CCD sensor
- High quality videos
- Can be connected with reporting system software, via PC / laptop

## ENDO

### ENDO EI.Lap.INS2 Insufflator with Heater



### ENDO EI.Lap.INS3 CO2 Insufflator with Heater



#### Technical Data

- Insufflation Media Gas Media Co2
- Appearance LCD
- Gas Flow Max = 30Lpm, Min Flow Display 0.5 l/min
- Pressure Range 5-300 Hg
- Minimum Pressure Display 0.5mmHg
- Resource 100-240 VAC
- Frequency 50 Hz
- Maximum Source 100 VA
- Gas Supply Pressure Min. 5kg/cm2
- Gas Supply Pressure Max. 80 bar (1200psi)
- Storage and Transport Environment -40 degrees to +70 degrees centigrade ambient temperature
- Operating Environment ambient temperature 10 degrees - 40 degrees and 30%-70% relative humidity
- Miniature Fuse 3 Amp
- Power Consumption 60 VA
- Dimension 300 x 138 x 320 mm
- Heavy 12 kg

#### Electrical Specifications

- Main Voltage : 100-240 V/AC
- Electrical Frequency : 50-60 Hz
- Current consumption : max. 1.4 A
- Electrical Fuse (2pcs): T 3.15 A/H

#### Insufflation Specifications

- Inflation Pressure : 1-30 (max 65) mmHg
- Pressure Measurement Accuracy : +/- 5%
- Gas Flow : 1-xx liter.min
- Gas Flow Display Accuracy : +/- 10%
- Insufflation Gas : Medical carbon dioxide gas CO2 /max 80 bar
- Gas Connection : UNF 7/16
- Dimensions (WxHxD): 355 x 105 x 285 mm
- Mass: about 6.7 kg

## ENDO

## CO2 Insufflator &amp; Pump

## Insufflator &amp; Multi-Indication Pump



## CO2 Insufflator

- Safe technology that adapts to the patient
- Reliable base unit
- Highest safety
- Mature technology
- Easy to use, universal, efficient
- The maximum flow capacity is 30 liters per minute
- The start settings for flow and pressure are customized individually
- The insufflator has a reliable venting system that safety reduces excess pressure in patients
- A replaceable gas filter protects the device from gas supply contamination

## Technical Data

- Insufflation medium Med. CO2
- Max. gasflow 30 l/min
- Pressure range 1-30 mmHg
- Power supply 100-240 V~
- Frequency 50-60 Hz
- Power consumption 50 VA
- Current consumption 100 V: 0.5 A; 240 V: 0.2 A
- Classifications Protection Class I, Type BF, IP 41
- Dimensions (w x h x d) 381 x 149 x 379 mm
- Weight 7.5 kg

## Multi-Indication Pump

- Four devices in one : Laparoscopy, Arthroscopy, Hysteroscopy, Urology
- Resource saving, simple, innovative
- The ingenious device combines a streamlined design, easy operation and maximum safety
- Key parameters are seen at a glance, allowing for quick and correct actions by personnel
- Innovative, the pump head is integrated in the housing and allows for easy insertion of the tube

## Technical Data

- Pressure range Laparoscopy: not adjustable
- Pressure range Arthroscopy: 15-150 mmHg
- Pressure range Hysteroscopy: 15-150 mmHg
- Pressure range Urology: 15-150 mmHg
- Flow range Laparoscopy: 1.0-2.0 l/min
- Arthroscopy: 0.1-2.0 l/min
- Hysteroscopy: 50-500 ml/min
- Urology: 100-500 ml/min
- Suction capacity Max. 2 l/min
- Power supply 100-240 V~
- Frequency 50-60 Hz
- Power consumption 80 VA
- Current consumption 100 V: 0.8 A; 240 V: 0.3 A
- Classifications Protection Class I, Type BF, IP 41
- Dimensions (w x h x d) 381 x 149 x 379 mm
- Weight 6.3 kg

## Arthross Plasma RF System RF Console



## Medical Fluid Pump Fluid Pump



### Features

- RF Plasma generator is applicable to all surgery as well ; as all area like Spine, Sports Medicine and ENT
- It shows sophisticated signals and diversified levels 1-9 to meet the needs required from each indication
- ENDOVISION RF Plasma is able to quickly & efficiently ablate, coagulate, and hemostasis the target tissue at a relatively low temperature of 40-70 degree celcius, unlike high-temperature operations.
- Depending on the target area, level 1 to 9 steps can be a sophisticated operation.

### Pro Probe

- Comprehensive probe series for every indication
- All fit in spinal, arthroscopy, ENT
- Compact design for user convenience
- World first higher power level 1-9
- Free voltage for global version

### Stable Generation of Plasma

- Controllers with state-of-the-art technology create a superior plasma layer with a fast response. You can precisely adjust the size of the plasma area at levels 1 to 9 by supplying the correct amount of power.
- Accurate and stable temperature minimizes thermal energy damage to normal tissue. Surgical ablation and coagulation can be performed smoothly

### Features

- Intended use Arthroscopy, Urology, Hysteroscopy
- Pressure range 10 - 150 mmHg  $\pm$ 10%
- Flow range 0,1 - 1,5 l/min  $\pm$ 10%
- Power draw 65VA
- Supply voltage 100-240 V AC
- Power frequency 50/60 Hz
- Protection class Class I, type BF
- Weight (kg) 7,6kg
- External dimensions D: 306 x W: 330 x H: 120 mm
- Fuses As per Table 7
- Ambient temperature Operating: +10°C do +40°C  
Storage and transport: -20°C do +45°C
- Maximum relative humidity Operating: 70% Storage and transportation: 70%
- Protection against harmful ingress of water particulate IP X1 Protected against dripping water

\*Provides all the three working modes

MODEL	5201-20	5201-30	5201-40
Specialty	Arthroscopy	Urology	Hysteroscopy
Pressure	10-150 mmHg	10-150 mmHg	10-150 mmHg
Flow	0,1-2,0 l/min	0,1-1,0 l/min	0,1-0,5 l/min

**endovision**  
infinite vision of the medical device

## Arthroscopic Shaver System

### Shaver



#### Features

- Wide range of rotational speeds
- Window calibration feature
- Available direction modes: forward, oscillation, reverse
- Nine oscillation modes
- Automatic handpiece detection
- Controlled directly via buttons on the handpiece or via footswitch
- Fully autoclavable, light and ergonomic handpiece
- Dedicated shaver blades

#### Handpiece

- Length: 164mm
- Weight: 325g
- Shaver blade chuck: Automatic / Barracuda type
- Speed range: FWD, REV: 500 - 8000 RPM (+/- 10%)
- OSC: 500 - 3500 RPM (+/- 10%)
- Oscillation modes: 9 different modes
- Cable length: 3.2m
- Sterilization method: Steam sterilization 134° C
- Max. relative humidity: During operation: 100% / During storage and transport: 90%
- Class of protection: Applied part - type BF

#### Control Unit

- Power supply: 100-240 VAC; 50/60 Hz
- Power consumption: 65 VA
- External dimension: D: 250 x W: 330 x H: 96 mm
- Weight: 4.8kg
- Ambient temperature: During operation: +10°C to +40°C During operation and transport: -20°C to +45°C
- Max. relative humidity: During operation: 70% During storage and transport: 70%
- Class of protection: Class I

#### Shaver Handpiece

- Length: 164mm
- Weight: 325g
- Shaver blade chuck: Automatic / Barracuda type
- Speed range: FWD, REV: 500 - 8000 RPM (+/- 10%)
- OSC: 500 - 3500 RPM (+/- 10%)
- Oscillation modes: 9 different modes
- Cable length: 3.2m
- Sterilization method: Steam sterilization 134° C
- Max. relative humidity: During operation: 100% / During storage and transport: 90%
- Class of protection: Applied part - type BF

## ENDO

### ENDO EI.Lap.Pump Pump



### Morcellator Morcellator



#### Features

- Intelligent leak compensation for optimal display of fluid balance
- Non-contact pressure measurement
- Easy to operate. Permanent patient monitoring
- Quick start time and easy loading tube sets
- Precise pressure control and regulation
- Small learning curve for surgeons and nurses
- LCD screen

#### Technical Data

- Insufflation Media : Saline / Glycine
- Pressure Range: 5 to 500mmhg
- Flow Range : 0.1 to 1.2 LPM
- Power Supply : 100 to 240
- Frequency : 50/60 Hz
- Maximum power: 200W
- Dimension Classification (WxHxD): 300 x 320 x 138 mm
- Weight: 12 kg

#### Unit Specifications

- Speed: 100-800 RPM
- Maximum torque: 1,5 Nm
- Cutter diameters: 12,5, 15 and 20 mm

#### Storage and Transport Conditions

- Temperature: 10 to 60 °C
- Relative humidity: max. 90%
- Air pressure: 700 to 1060 hPa

#### Dimensions

- Operating and control unit
- Weight: 6.5 kg
- W x H x D: 308 x 177 x 257 mm

#### Power Supply

- Voltage: 100 V to 230 V  $\pm$  10 %
- Frequency: 50 to 60 Hz
- Power consumption: max. 250 W
- Fuse: 100-240 V ~ 4 AT / 250 V AC
- Fuse: 200-240 V ~ 2 AT / 250 V AC

#### Foot Switch / Handpiece Module

- Waterproof: IP68
- Degree of protection against flammable gases: The device is not suited for use in Ex zones

# ENDO

## ENDO EI.VL

Portable Video Laryngoscope



### Features

- Slim Blade**  
 The super slim blade profile improves access in smaller mouth gaps and reduces tooth decay making it safer for patient use.
- Portable or USB Rechargeable**  
 Universal, cord-free device whenever you need it.
- Video Angle**  
 It has a monitor screen that can be rotated at an angle of 120 degrees which is a very convenient feature because you can view the procedure from these various angles.
- Type of operation**  
 Can be used when performing anesthesia on patients. It can also be used when examining the vocal cords or larynx, as well as being used to remove foreign bodies from the throat or collect tissue samples (biopsy).
- Camera or Memory**  
 The camera provides video imaging during the laryngoscopy procedure. The device has 8GB of memory, which will allow you to record the procedure being performed and take pictures that can be stored in individual patient charts for future reference.

### Machine Parameters

- Screen : 3" (LCD)
- Viewing Angle: more than 60 degree
- Charging Time: more than 300 times
- Resolution : 1280\*720p
- Power Consumption: More than 2W
- Monitor Angle Rotation: 0~130 degree
- Weight: 220g
- Picture / Video Function : USB Output
- Memory Type: 8GB

### Charging

- Charging Input : 110V~220V 50Hz
- Charging Output : 5V 1000mA
- Charging Time : Less than 4 (hours)

### Work Environment

- Temperature : -5 ~ 50 C
- Humidity: 10 - 90%
- Atmospheric Pressure: 860~1060hpa





## Laparoscopy Instruments

### Optic



HD Telescope; Autoclavable Ø 10.0 mm; 340 mm; 0

## Laparoscopy Instruments

### General Hand Instruments



Veress Needle; Ø 2.7 mm; FL 120 mm



Trocar Sleeve; Smooth Metal Tube Å 11.0 mm; FL 100 mm



Trocar Tip; Pyramidal Tip; Å 11.0 mm; for FL 100 mm



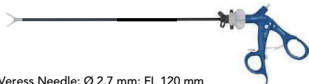
Trocar Sleeve; Smooth Metal; Ø 5.5 mm; FL 95 mm



Trocar Tip; Pyramidal Tip; Ø 5.5 mm; for FL 95 mm



Reducer for Trocar Sleeves Å 11.0 - 5.5 mm



Veress Needle; Ø 2.7 mm; FL 120 mm



Dissecting Grasper; Maryland Dilip Dissecting and grasping forceps (FL 330 mm)



Atraumatic Grasper; Babcock Non Traumatic FL 330



Atraumatic Grasper; Johan Fenestrated; Blade 38 mm; FL 330 mm



Traumatic Grasper; Claw Forceps Straight; Blade 22 mm; FL 330 mm



Scissors; Metzenbaum Standard Scissors Curved; Serrated; Blade 14 mm; FL 330 mm



## Laparoscopy Instruments

### General Hand Instrument, Bipolar Grasper



T - Style Handle for Bipolar Coagulation Forceps;  
Inclusive Shaft  $\varnothing$  5.0 mm; F L 340 mm



Outer Shaft  $\varnothing$  5.0 mm; F L 340 mm



T - Style Turnable for Bipolar Coagulation Forceps;  
Inclusive Shaft  $\varnothing$  5.0 mm; F L 340 mm



Bipolar Cable; Banana Plugs Cable  
with 2 x  $\varnothing$  4 mm; 3 m



Adapter for Bipolar  
Cable with Flat Plug



Insert Bipolar Power T - Style; Grasping Forceps; Bipolar;  
Curved Insert for  $\varnothing$  5.0 mm



Handle for Bipolar Coagulation Forceps;  
Inclusive Shaft  $\varnothing$  5.0 mm; F L 340 mm



Maryland; Bipolar Insert; Curved; for  $\varnothing$  5.0 mm



Tong Type; Bipolar Insert; Wide 3.0 mm for  $\varnothing$  5.0 mm



## Laparoscopy Instruments

### General Hand Instruments, Suction Irrigation Tube Set



Adapter for HF - Electrode  
Suction Irrigation Pistol Handle Style; Premium Version;  
tube connectors; with maximum suction flow  $\varnothing$  5.2 mm



Monopolar L-Hook Electrode  
 $\varnothing$  3.5 mm; F L 330 mm  
 $\varnothing$  5.0 mm; F L 330 mm



Monopolar Spatula Electrode  
 $\varnothing$  3.5 mm; F L 330 mm  
 $\varnothing$  5.0 mm; F L 330 mm



Monopolar Cable;  $\varnothing$  4.0 mm ; 3 m



Needle Holder Curve Left  
 $\varnothing$  3.0 mm; F L 330 mm  
 $\varnothing$  5.0 mm; F L 330 mm



Suction Irrigation Tube  
 $\varnothing$  3.0 mm; F L 330 mm  
 $\varnothing$  5.0 mm; F L 330 mm

## Laparoscopy Instruments

### Digestive Hand Instruments, Stone Removal Forceps

Handle without ratchet



Spoon Forceps;  
Single action jaw  
 $\varnothing$  10.0 mm; F L 330 mm



Tube Shaft Insulated with Cup Nut  
 $\varnothing$  10.0 mm; F L 330 mm

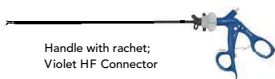


with open eye    with closed eye



## Laparoscopy Instruments

Digestive Hand Instruments, Gall Bladder Extractor



Handle with ratchet;  
Violet HF Connector



Tube Shaft Insulated with Cup Nut  
Ø 10.0 mm; F L 330 mm



Claw Forceps;  
Single action jaw  
Ø 10.0 mm; F L 330 mm

## Laparoscopy Instruments

Digestive Hand Instruments, Stone Removal Forcep



Liver Fan Retractor; Bendable; 3 Fingers  
Ø 5.0 mm; F L 340 mm



Clip Applicator; Rotatable; Detachable;  
Ø 10.0 mm; F L 320 mm



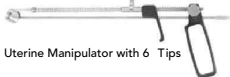
Medium Large for Ethicon Clips  
Ø 5.0 mm; F L 320 mm

## Laparoscopy Instruments

Obgyn Hand Instruments



Aspiration Needle; Puncture-Injection-Needles  
Ø 5.0 mm; Ø 1.4 mm needle; F L 330 mm



Uterine Manipulator with 6 Tips

## Laparoscopy Instruments

Obgyn Hand Instruments, Ring Applicator & Trocar



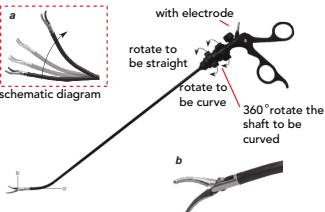
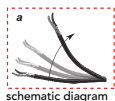
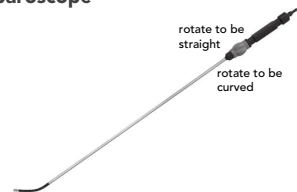
Multifunctional Trocar Sleeve; Ø 7.0 mm;  
Working Length 101 mm; Trocar Pyramidal Tip Ø 7.0 mm;  
Length 101 mm; Ring Applicator for Tube Sterilization;  
Ø 7.0 mm + 15 Ring



Myoma Screw

# ENDO

## Laparoscope



Needle-holding Forceps  
V-Needle Holder Forceps Ø 5 x 330mm

Head 360 rotation  
Can be detachable in 3 parts  
(handle, shaft, and inserts)

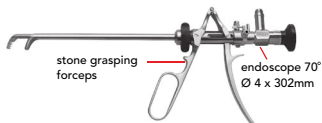


JLG Finger



Disposable Instruments, Endobag

## Urology Instruments



Stone Crushing Forceps



Stone Grasping Forceps



Evacuator (Ellik )



Adaptor with Tube



## Single Port Laparoscopy Glove Port



### Features

- Can be opened during operation
- Can be used in robotic surgery
- Each port can move independently
- Rolling the sheet helps to open incision easily
- Soft movement can make surgery easy
- Only 2-2.5 cm incision makes small scar dependently
- Polyurethane wound retractor-not torn easily and softer than silicone
- Separation gas inlet and outlet
- High elastic port cap  
Various size of port 3mm-15mm reduction of collision between instruments
- Insertion can be seen through transparent port part

### Characteristics

- Minimum incision allows minimal scar surgery as well as decreased post operative pain, fast recovery and return to everyday activity
- Polyurethane is sturdier and more elastic so our glove port is very resistant to tears
- Convenient removal
- Separate inlet and outlet CO<sub>2</sub> can easily be pumped in to remove smoke during operation
- Post caps high elasticity a variety of instrument sizes can be inserted into the caps (3mm-12mm)
- Weight: 12 kg



## Disposable Trocar



### Disposable Trocar

- TROPIAN is designed to enhance surgeons and assistants of health.
- The key features of this product including the filter
- A distinctive aspect of our product is Triple filter system.
- During the laproscopic operation, triple purify smoke and burning smell in the operation room.
- We can provide a better operating room environment with TROPIAN. This is our ultimate goal.

### Disposable Trocar Features

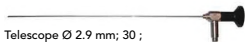
- Good Grip, ergonomic designed trocar palm.
- Stable position hold, ribbed Cannula can be firmly on the surgical part on the Abdominal wall
- Responsible for the health of surgeons and assistants, equipped with filter for smoke evacuation (2 model, ZT-12F, ZT-22F)
- Fully sterilized with plasma sterilization equipment.
- Integrated Converter Tropician (ZT-30, ZT-40) is possible to use 5-12mm diameter instrument without change converter.

**Hysteroscopy Instruments**

Hysteroscopy Set



Outer Sheath; 16 Fr; Quick Lock System



Telescope Ø 2.9 mm; 30 ;  
HD Autoclavable; 300 mm



Working Sheath with 1 Working Channel 5 Fr  
Quick Lock System for Endoscope 2.9 mm



Scissor Ø 1.6 mm; Scissors; Pointed; Ø 1.6 mm;  
5 Fr; 34 cm; Semi Rigid; SingleAction



Grasper Ø 1.6 mm; Biopsy Grasping Forceps  
Ø 1.6 mm; 5 Fr; 34 cm; Semi rigid; Oval;  
DoubleAction

**Hysteroscopy Instruments**

Resectoscopy Set



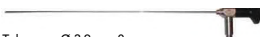
Outer Sheath; 16 Fr; Quick Lock System  
Inner Sheath Rotatable; 16 Fr; Quick Lock System



HF Electrodes; Ball Angled; Bipolar;  
for 16 Fr System



HF Electrodes; Loop; Large 90° Angled;  
for 16 Fr System; Bipolar



Telescope Ø 2.9 mm ;  
HD Autoclavable; 300 mm



Hybrid System (Monopolar or Bipolar)  
Working Element Titanium; Bipolar;  
Passive Cutting; Closed Handle; Quick Lock  
System for Ø Telescope



Monopolar Cable for Electrode & Loops  
Ø 4.0 mm; 3.0 m



Bipolar HF Connection Cable International  
Model; 2 Pins 3 m



## Urology Instruments

Urology Hand Instruments; Resectoscope



Hybrid System (Monopolar or Bipolar)  
Working Element Passive Cutting; Closed Handle for Ø 4.0  
mm Telescope; HF-Connection Down



Resectoscope Sheath; Continuous Flow 26 Fr; 2  
Stopcock; Turnable Tube without Obturator; All  
Round Perforation



Obturator for Resectoscope; 24 / 26 Fr



Loop Electrode Angled; 24 / 26 Fr;  
Yellow for 30° Telescope



Knife Electrode Angled; 24 / 26 Fr; Yellow



Ball Electrode; Ø 3.0 mm; 24 / 26 Fr; Yellow



Ellik Evacuator  
Glass



Sheath Connection  
for Ellik Evacuator

## Urology Instruments

Urology Hand Instruments; Sachse Optical Urethrotome



Urethrotome Sheath Visual 21 Fr; 2 Fixed  
Stopcocks; Graduated Guide Wire Port 5 Fr



Obturator for Urethrotome 21 Fr



Supplementary Sheath  
for Urethrotome Lateral Open; 21 Fr



Stricture Knife Straight; 21 Fr



Stricture Knife Round Shaped; 21 Fr



## Urology Instruments

### Urology Hand Instruments; Lithotrite & Stone Crushing Forceps



Lithotripsy Sheath Central Valve 24 Fr



Working Element for Punch Lithotripsy; Optical; 24 Fr



Telescope Bridge; 1 Instrument Channel



Obturator for Lithotripsy 24 Fr



Stone Crushing Forceps; for Sheath 25 Fr

## Urology Instruments

### Urology Hand Instruments; Accessories



Urethral Bougie	
8 Charr	27.5 cm
10 Charr	27.5 cm
12 Charr	27.5 cm
14 Charr	27.5 cm
16 Charr	27.5 cm
18 Charr	27.5 cm

Urethral Bougie	
20 Charr	27.5 cm
22 Charr	27.5 cm
24 Charr	27.5 cm
26 Charr	27.5 cm
28 Charr	27.5 cm
30 Charr	27.5 cm



Insertion Mandrin



Stockmann;  
Penis Clamp; 8 cm



Strauss; Penis Clamp  
11 cm



## Urology Instruments

Urology Hand Instruments; Uretero - Renoscope



Uretero - Renoscope; 12 , 1 Instrument  
Channel 5 Fr; 7.5 Distal; 430 mm



Flexible Stone Basket; Complete Instrument;  
Handle & Basket; 5 Fr; 600 mm



Grasping Forceps; Flexible Alligator Jaw;  
Double Action; 5 Fr; 600 mm

## Urology Instruments

Urology Hand Instruments; Percutaneous Nephroscopes



Nephroscope 15 ; 1 Working Channel Ø 5.0  
mm; 2 Fixed Stopcocks 26 Fr; 200 mm



Nephroscope Sheath without Obturator 1  
Turnable Stopcock; 26 Fr; 175 mm



Dilatation Set for Nephroscope Content; 1 Guide Wire  
Rigid + Flexible 1 Each Dilatator Ø 9, 12, 15, 18, 20,  
21, 24, 27, 30 Fr



Obturator Nephroscope; 26 Fr



Instrument Bridge for Nephroscope



Grasping Forceps;  
Fenestrated Jaws



Grasping Forceps;  
Serrated



Grasping Forceps; 3 Expanding Jaws



## Urology Instruments

### MINI PCN



Nephroscope; 45 degree angled; working channel (diameter) 2.2 mm 601-145-00



Nephroscope sheath 21/24 Fr colour 630-435-25



Dilatator 2 channels for introduction of guide wire; for 21/24 Fr sheath; length 300mm 630-435-45



Dilatator; 2 channel for introduction of guide wire; for 16.5/ 19.5 Fr sheath; length 300mm 630-435-40



PE Forceps cup; sharp; single action; dia 1.8mm; FL 400mm; with irrigation adapter 630-455-18



Alligator forceps; dia 1.8mm; FL 400mm; with irrigation adapter 630-454-18



Laparoscopy Urology Instrument, Spring Cap 601-150-07



Nephroscope sheath 16,5/19,5 Fr 630-435-20



Nephroscope sheath; 15/18 Fr 630-435-15



Dilatator for guide wire; for 15/18 Fr; sheath; length 300mm 630-435-35



Grasping forceps cup; serrated; dia 1.8mm; FL 400mm; with irrigation adapter 630- 453-18



3 Prongs retriever; semi-rigid; dia 1.8mm; FL 400mm; with firmly welded spring grip 630-471-18



Laparoscopy Urology Instrument, Stopcock; (diameter) 3,5mm, black 601-150-06



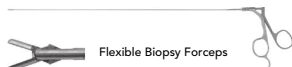
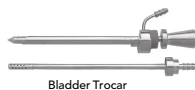
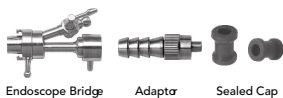
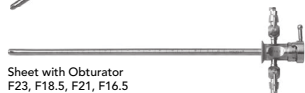
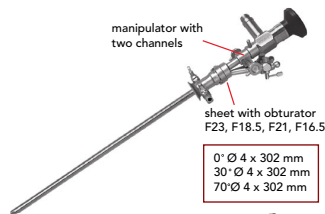
Laparoscopy Urology Instrument, Dome Valve 052; Silicone transparent; material : ML151VMQ 601-160-02



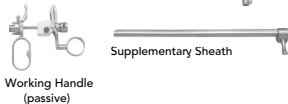
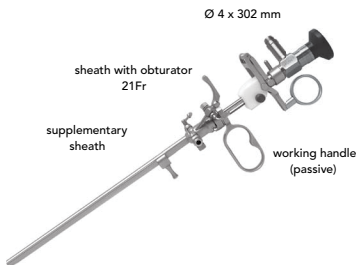
Laparoscopy Urology Instrument, Backup Seal 052, Silicone transparent, material : ML151VMQ 601-160-03



## Urology Instruments Cystoscope (Lockable)



## Urology Instruments Urethrotomy Set (Lockable)





## ENT Instruments

### ENT Telescopes, Sinuscopes



Description	Size	
Sinuscope HD	Ø 4.0 mm; 0°; F L 185 mm	0°
Sinuscope HD	Ø 4.0 mm; 30°; F L 185 mm	30°
Sinuscope HD	Ø 4.0 mm; 70°; F L 185 mm	45°
		70°



Description	Size
Sinuscope HD	Ø 2.7 mm; 30° ; F L 187.5 mm
Sinuscope HD	Ø 2.7 mm; 30° ; F L 140.0 mm



Description	Size
Sinuscope HD	Ø 2.7 mm; 30° ; F L 175 mm
Sinuscope HD	Ø 2.7 mm; 30° ; F L 110 mm

## ENT Instruments

### ENT Telescopes, Otoscope



Description	Size
Otoscope HD	Ø 1.9 mm; 0° ; F L 60 mm
Otoscope HD	Ø 1.9 mm; 30° ; F L 60 mm

# ENDO

## ENT Instruments

### Endoscope



#### Otoscope

0° Ø 4 x 50 mm    0° Ø 2.7 x 100 mm  
 30° Ø 4 x 50 mm    30° Ø 2.7 x 100 mm



#### Sinoscope

0° Ø 4 x 175 mm    0° Ø 2.7 x 175 mm  
 30° Ø 4 x 175 mm    30° Ø 2.7 x 175 mm  
 70° Ø 4 x 175 mm



#### Laryngoscope

70° Ø 8 x 178 mm    70° Ø 6 x 178 mm  
 90° Ø 8 x 178 mm

## ENT Instruments

### ERK Ear Surgical Instruments Set



Middle Ear Forceps



Short Triticeous Forceps



Upward Forceps



Forceps



Fixed Stapes Forceps



Stapes Head Forceps



Suction for Ear Operating (Straight)



Suction for Ear Operating (Curved)

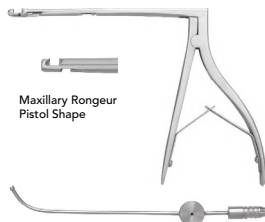
# ENDO

## ENT Instruments

### Sinoscope Set



Optical Forceps Ø 4.3 mm

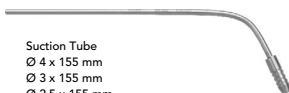


Maxillary Rongeur  
Pistol Shape

Suction Tube Ø 3 x 125 mm



Trocar Needle



Suction Tube  
Ø 4 x 155 mm  
Ø 3 x 155 mm  
Ø 2.5 x 155 mm



Nasal Sinuses Curette



Elevator



with hole



without hole



Sickle Knife



Sharp Head



Blunt Head



Nasal Tissue, Straight Type



Front Biting



Back Biting



Nasal Tissue, Left Curved



Nasal Tissue, Right Curved



## Arthroscopy Instruments

Arthroscopy Hand Instrument,  
Sheath with Fixed Stopcocks



Outer : Ø 6.5 mm; F L 140 mm

For direction of view; Ø 4.0 mm; FL 175 mm	Number of fixed stopcocks
0° / 30° / 45° / 70°	2

## Arthroscopy Instruments

Arthroscopy Hand Instrument, Trocar



Colour Code : Yellow

Pyramidal	
Conical Blunt	
Conical	

## Arthroscopy Instruments

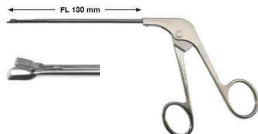
Arthroscopy Hand Instrument,  
Telescope Arthroscopy



<i>HD - Telescope Arthroscopy; Autoclavable</i>	
Ø 4.0 mm; 175 mm	30°

## Arthroscopy Instruments

Arthroscopy Hand Instrument,  
Stella Punches



Wide Punch Low Profile :  
Straight

Description	Sheath Version	Tip Profile	Bite Wide	Jaw Wide
Straight; Small		1.90 mm	2.50 mm	4.10 mm
Straight; Medium		1.90 mm	3.20 mm	5.00 mm
Straight; Large		1.90 mm	4.50 mm	6.10 mm
Curved Left 12° ; Medium		1.90 mm	3.20 mm	5.00 mm
Curved Right 12° ; Medium		1.90 mm	3.20 mm	5.00 mm
Curved Up 15° ; Medium		1.90 mm	3.20 mm	5.00 mm





## Arthroscopy Instruments

### Arthroscopy Hand Instrument, Stella Punches



Wide Punch Low Profile :  
Up Biter

Description	Sheath Version	Tip Profile	Bite Wide	Jaw Wide
Upbiter Straight; Small		1.90 mm	2.50 mm	4.10 mm
Upbiter Straight; Medium		1.90 mm	3.20 mm	5.00 mm
Upbiter Straight; Large		1.90 mm	4.50 mm	6.10 mm
Upbiter Curved Left 12° ; Medium		1.90 mm	3.20 mm	5.00 mm
Upbiter Curved Right 12° ; Medium		1.90 mm	3.20 mm	5.00 mm
Upbiter Curved Up 15° ; Medium		1.90 mm	3.20 mm	5.00 mm



Wide Punch Standard Profile :  
Up Biter

Description	Sheath Version	Tip Profile	Bite Wide	Jaw Wide
Upbiter Straight; Small		2.50 mm	2.50 mm	4.10 mm
Upbiter Straight; Medium		2.50 mm	3.20 mm	5.00 mm
Upbiter Straight; Large		2.50 mm	4.50 mm	6.10 mm
Upbiter Curved Left 12° ; Medium		2.50 mm	3.20 mm	5.00 mm
Upbiter Curved Right 12° ; Medium		2.50 mm	3.20 mm	5.00 mm
Upbiter Curved Up 15° ; Medium		2.50 mm	3.20 mm	5.00 mm



Rongeur

Description	Sheath Version	Tip Profile	Jaw Wide
Straight		3.00 mm	3.20 mm



## Arthroscopy Instruments

### Arthroscopy Hand Instrument, Stella Punches



Basket Punch : Scoop Style

<i>Description</i>	<i>Sheath Version</i>	<i>Tip Profile</i>	<i>Bite Wide</i>	<i>Jaw Wide</i>
Straight; Small		2.10 mm	1.60 mm	3.30 mm
Straight; Medium		2.30 mm	1.80 mm	3.60 mm
Straight; Large		2.90 mm	2.00 mm	3.80 mm
Curved Left 12° ; Small		2.10 mm	1.60 mm	3.30 mm
Curved Right 12° ; Small		2.10 mm	1.60 mm	3.30 mm
Curved Up 15° ; Small		2.10 mm	1.60 mm	3.30 mm
Curved Down 15° ; Small		2.10 mm	1.60 mm	3.30 mm
Straight; Medium		2.30 mm	1.60 mm	3.30 mm



Oval Punch : Straight

<i>Description</i>	<i>Sheath Version</i>	<i>Tip Profile</i>	<i>Bite Wide</i>	<i>Jaw Wide</i>
Straight		1.65 mm	4.40 mm	6.60 mm
Curved Left 12°		1.65 mm	4.40 mm	6.60 mm
Curved Right 12°		1.65 mm	4.40 mm	6.60 mm
Curved Up 15°		1.65 mm	4.40 mm	6.60 mm

## Arthroscopy Instruments

Arthroscopy Hand Instrument,  
Stella Graspers



### Grasper Alligator; Maximum; Locking Handle

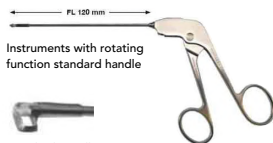
Description	Sheath Version	Tip Profile	Jaw Wide
Straight		3.20 mm	3.50 mm
Curved Up 15°		3.20 mm	3.50 mm

### Meniscus Grasping Forceps

Description	Spez
Meniscus Grasping Forceps; Straight; 1 x 2 teeth	
Meniscus Grasping Forceps; Curved Left 30°; 1 x 2 teeth	
Meniscus Grasping Forceps; Curved Right 30°; 1 x 2 teeth	

## Arthroscopy Instruments

Arthroscopy Hand Instrument, Stella



Instruments with rotating  
function standard handle

Standard Handle :  
Basket Punch 90

Description	Sheath Version	Bite Wide
90° Jaw Left		2.20 mm
90° Jaw Right		2.20 mm
90° Jaw Left		3.40 mm
90° Jaw Right		3.40 mm



Instruments with triangular handles

Description	Spez
Meniscus Hook Probe; Pointed; Handle	
Meniscus Hook Probe; Graduated; Handle	
Meniscus Hook Probe; Graduated; Handle	
Bayonet Knife; Handle	



## Arthroscopy Instruments

### Arthroscopy Hand Instrument, Stella

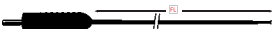


Description	Size	Spez
Spoon; 30° ; Curved; Handle	3.00 mm	
Banana Knife; Smooth; Handle		
Banana Knife; Serrated; Handle	3.00 mm	
Hook Knife; Handle;		
Knife 45° ; Retrograde; Toothed; Handle	3.00 mm	
Sickle Knife; Handle		
Rosette Knife; Handle	3.00 mm	
Cartilage File; Fine; Handle		
Cartilage File; Rough; Handle		



Arthroscopic Knife Electrodes; Monopolar  
 Ø 4.0 mm; 45° angled; Umax : 4 Kvp

Description	Size	Spez
Knife electrode 45° with handle; reusable; autoclavable 134°	4.0 mm	FL 170 mm



Arthroscopic Ball Electrodes; Monopolar  
 Ø 4.0 mm; Umax : 4 Kvp

Description	Size	Spez
Ball electrode with handle; reusable; autoclavable 134°	Ø 3.0 mm	FL 170 mm

## Hemoclip

Disposable Endoscopy Instruments



### Indication

- The hemoclip with conveyor is a newly developed hemostasis device by AGS, applying in the mechanical hemostasis of non-variceal bleeding in the stomach and intestine. The unique design of repeated opening and closing makes the hemoclip qualified to open and close repeatedly for many times, enables the operator to perform several times pre-clamping on the target tissues. The hemoclip will not be reused until the operators confirm that the pre-clamping is precise and effective, ensuring the effectiveness of the clamping.
- The non-reposition hemoclip is used in conjunction with endoscope, applying in the mechanical hemostasis of non-variceal bleeding and wound suturing in digestive tract.

## Sphincterotome (Rotatable)

Disposable Endoscopy Instruments



### Application Scope

- The swing sphincterotome is mainly intended for resection and coagulation to the duodenal papilla sphincter in the ERCP procedures. It is usually used in conjunction with the guide wire devices.

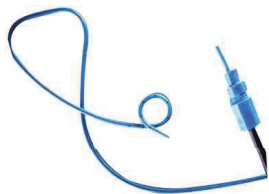
### Features

- The success rate of intubation can be improved significantly through swinging tip make a proper direction.
- Leading processing technology; ensuring limited cutting and avoiding excessive deformation.
- The unique design of applying power from outside of handle can effectively avoid wire wound and repeatedly plugging in.

## AGS

### Nasal Biliary Drainage Catheter

Disposable Endoscopy Instruments



#### Application Scope

- Nasal biliary drainage catheter is used for endoscopic gall - stone operation or bile drainage after cholecystectomy.

#### Features

- Superior radiopaque
- Conform to ergonomics
- Good fluidity

### Sclerotherapy Needle

Disposable Endoscopy Instruments



#### Indication

- Clinically, disposable endoscopy injection needle is a medical device that pass the endoscope channel into the alimentary canal or gastrointestinal tract to perform injection to the gastrointestinal mucosa, injects sclerosing or hemostatic drugs to the selected area by using endoscope to control the present haemorrhage or potential haemorrhage spot in the digestive system, and operates the injection of physiological saline after endoscopic mucosal biopsy and polypectomy.

### Sphincterotome

Disposable Endoscopy Instruments



#### Indication

- The sphincterotome knife is mainly intended for resection and coagulation to the duodenal papilla sphincter in the ERCP procedures. It is usually used in conjunction with the guide wire devices.

## Stone Extraction Basket (Security Wire)

Disposable Endoscopy Instruments



### Application Scope

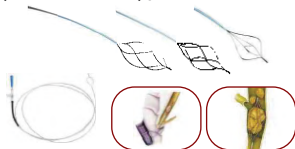
- Disposable stone extraction basket (security wire) is used for the endoscopic removal of biliary stones and foreign bodies.

### Features

- Super smooth sheath tube; protecting working channel; simple operation
- Strong basket; excellent shape keeping
- The unique design of tip will effectively help to solve stone incarceration

## Stone Extraction Basket

Disposable Endoscopy Instruments



### Indication

- Disposable stone extraction basket is used for the endoscopic removal of biliary stones and foreign bodies.

## Polypectomy Snare

Disposable Endoscopy Instruments

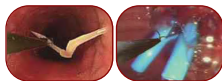


### Indication

- The polypectomy snare is a monopolar electrosurgical device used with an electrosurgical unit for endoscopic polypectomy

## Cold Polypectomy Snare

Disposable Endoscopy Instruments



### Indication

- Cold polypectomy snare is used with endoscope to remove the foreign bodies in digestive tract.

## AGS

## Grasping Forceps

Disposable Endoscopy Instruments



## Indication

- The disposable grasping forceps is used in conjunction with the soft endoscopes, entering into the human body cavity such as respiratory tract, esophagus, stomach, intestine and so forth through the endoscope channel, to grasp tissues, stones and foreign matters as well as to take the stents out.

## Biopsy Forceps

Disposable Endoscopy Instruments



## Indication

- The disposable biopsy forceps works with flexible endoscopes, passing through the endoscope channel into the human body cavity to take the living tissues for pathology analysis

## Stone Retrieval Balloon (Platoid)

Disposable Endoscopy Instruments



## Indication

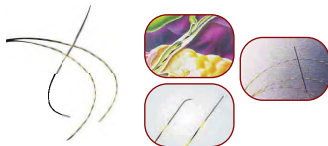
- The stone retrieval balloon (platoid) is used in conjunction with flexible endoscope to extract the stones on bile duct, which can also provide lumen for inserting guide wire and injecting contrast agent.

## Features

- Low resistance; low friction; comfortable handfeel
- Excellent shape keeping; prevent side leakage when retrieving stones.
- Optimizing tip shaping design; achieving great intubation features; increasing stone retrieval success

## Guide Wire

Disposable Endoscopy Instruments



## Indication

- The guide wire is intended for ERCP diagnosis or therapy when there seems to be various diseases of the digestive system in the pancreatic and biliary duct.



## Lscope Single-Use

Digital Flexible Ureteroscope 7.5 Fr



## DIS Image Processor



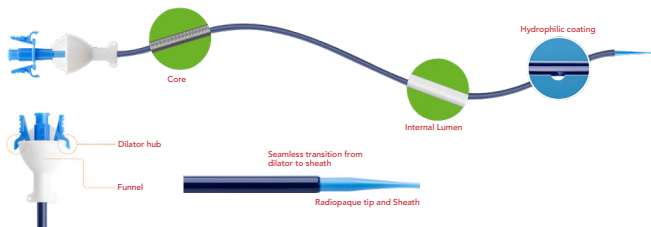
### Features

- Ergonomic handle with easily accessible control elements. Lightweight handle for reduced operating fatigue
- Safety atraumatic tapered tip
- Extremely smooth, slim and continuously cylindrical sheath for precise working operating comfort
- Disposable and sterile
- No repairs, no sterilization, no reprocessing
- No cross contamination risk with reusable scopes are eliminated
- The scope allows easier access to the kidneys and provides high resolution digital images
- Greater illumination high intensity optical fiber for homogeneous illumination
- Perfect control greater sheath stiffness allows easier introduction and control of movement

### Impressive View

- Support endoscope during minimal invasive, provides power and processes the images for endoscope.
- Synchronous multi interface output support.
- The digital imager working distance of 3mm-50mm to offer a deep field of view.
- Large 3.6F ID working and irrigation channel for high irrigation performance and continuous unrestricted view

## Bendable Ureteral Access Sheath



### Features

- The sheath provides ureteral dilation and a continuous working channel for the introduction of endoscopes and instruments during ureteral access procedures. Use the sheath to reduce the potential for trauma to the ureter during repeated instrument exchanges. The continuous working channel also protects delicate instruments and flexible endoscopes from damage, which can reduce the need for costly repairs.

### Dilator hub & Funnel

- The sheath's innovative locking mechanism on the dilator hub secures the dilator to the sheath for simultaneous advancement of the sheath and dilator.
- The ergonomic funnel acts as a handle during insertion. The large trough facilitates instrument introduction.

### Hydrophilic Coating, Internal Lumen & Core

- Allows for ease of insertion. Improved coating is designed for durability in bilateral cases
- Internal lumen is PTFE lined to facilitate smooth device delivery and removal. Thin wall construction provides the largest possible internal lumen while minimizing the outer diameter
- The core consists of a patented coil construction to provide optimal flexibility and maximum resistance

## Percutaneous Nephrostomy Set

Set with PTFE Guidewire



### Features

- Convenient removal, dual knobs allow the sheath to be easily peeled away after insertion is completed
- Dilators constructed with firm, kink resistant material
- Smooth surface reduces patients trauma
- Gradual taper of the distal tip designed for atraumatic placement and maneuverability
- Ultrasonical puncture needle is clearly depicted by highly sensitive "air balloon" and honing processing
- Increased stiffness of the wire designed to provide stability within the urinary tract without compromising tip flexibility
- Short tip provides effective drainage with minimum residual urine

## Ureteral Stent Set

Set with PTFE Guidewire (Open End)

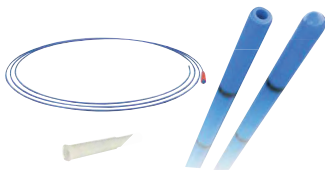


### Features

- Biocompatible medical material softens up to 50% at body temperature, promoting enhanced comfort and minimal friction
- Graduated circumferential markings every 5cm along the body of the stent to confirm advancement and placement
- High retention coil strength to help maintain pigtail shape and prevent stent migration
- High radiopacity enhances visualisation under the fluoroscopy
- Available in variable length coils, variable length coils on distal and proximal ends allow for one stent to fit various ureteral lengths

## Standard Double J Stent

Standard Double J (Open End)



### Features

- Tapered tip design for ease of access through the ureteral orifice
- Hydrophilic coating to facilitate advancement up the ureter

### Ureteral Catheter

- Graduated markers and radiopaque to facilitate visualization and placement
- Various sizes and tip configurations for a variety of procedures
- Straight tip closed and open, enclosed luer adapter
- Tapered tip to provide atraumatic access for delivery of contrast or a guidewire

## Zebra Guidewire

Hydrophilic Coated



### Features

- Tungsten-filled radiopaque tip enhances fluoroscopic visualization
- Multiple tip options designed to provide the additional tip flexibility for negotiation of narrowed ureters and access beyond obstructions.
- Nitinol core offers a kink resistant shaft for enhanced control
- Hydrophilic coating on distal 65mm designed to reduce surface friction for smooth entry, advancement and withdrawal with precise proximal handling
- Yellow and black striped pattern is designed to provide clear endoscopic visualization of wire movement

### Disposable Circular Stapler III III Rows Series, Circular Stapler



#### Features

- Stronger penetrability
- Specification can be known at a glance
- Fool-firing position
- Special design of the outer ring prevent anastomotic tissue from excessive squeezing.
- If there's no edema of the tissue, the red pointer in the safety window must be aligned with the center line of the green zone before firing.
- 36 three-row titanium staples around can effectively close the tissue. The sharp circular knife can effectively cut.
- B-type staple with slightly incurved feet make the anastomotic a higher tensile strength.

### Disposable PPH Stapler III III Rows Series, PPH Stapler



#### Ureteral Catheter

- Anastomotic wound is dry and has no bleeding after firing. No longer need to manually suture absence of special circumstances.
- The PPH stapler cartridge arrangement is more compact and its outermost surface has a special design.
- With 48 three-row titanium screws, the tissue can be closed with effect.
- A greater lumen of the staple cartridge can hold more diseased tissue.
- The anvil and guide shaft, both of which are made of stainless steel, make the closing and firing more stable. Under the help of the two symmetrical sutures, the tissue can enter into the equipment.
- The sharp circular knife is highly effective when used for cutting.
- The 0.75mm suture clearance compresses the mucosa that has the best hemostatic effect.
- Fool-firing position is adopted. The stapler can be fired once it has been adjusted to the position shown in the picture.

### Disposable Endoscopic Cutter Stapler & Cartridge



#### Features

- Applied to tissue transection, resection & anastomosis in thoracic surgery, abdominal surgery and gynecologic endoscopy
- Adaptive joint head can swing within 90°. The joint moves flexible and can be operated by single hand conveniently.
- 3+1 firing model, manual firing back after 3 step of firing, safer and more stable
- Operation is safer by resetting the button manually.
- Indicate the direction of the blade walking to ensure safe operation without accident.

# ENDO

## ENDO Endoscope Washer Endoscope Washer



### Features

- **Double Tank System:** ENDO Endoscope washer and Disinfectant Machine makes the contamination risk lower and the usage of the disinfectants longer
- **Double Scope Property:** ENDO Endoscope washer and Disinfectant Machine saves up the time and solution by disinfecting two endoscopes at the same time
- **Multi Typescope Property:** ENDO Endoscope washer and Disinfectant Machine carries out the disinfection and washing of every type and model of endoscopes
- **Self Disinfection Programme**
- **Double Filter Property**
- **LCD Screen, Touch keypad.**
- **3 Different Dosage Pumps:** Different dosage pumps for disinfectant, enzymatic and alcohol makes the easier adjustment of intended ratios for the program of the machine
- **Double Leakage Control System:** ENDO Endoscope washer and Disinfectant Machine has double control system by manometer and in solution.
- **Bacteriostatic Protection by U.V. Lamp (Optional)**
- **Electronic Counter:** This makes you to control the Washing Number of the Machine.
- **Encryption System:** It prevents the changes in program settings by other people but authorized users
- **Waste Filtration System:** The used disinfectant is transferred to the waste tank and can be sent to the waste by neutralizing with the addition of necessary chemicals.
- **Heating System (Optional)**
- **Printer (Optional)**

# ENDO

## ENDO OPA Disinfectant



### Features

- Ready-to-use
- Based on Orthophthalaldehyde (0,55%)
- Odorless and do not forms harmful gases
- Thanks to low toxicity it makes a safe usage on staff
- Can be used up to 14 days.
- Can be controlled by test strips
- Be used manually
- Thanks to not foaming Formula. Detro OPA is suitable for use in Fully Automated Endoscopy Washer and Disinfecter Machine
- 5 mins and Cold Sterilization in 5 mins
- Do not cause corrosion

### Range of Application

- Endoscopic instruments
- Surgery instruments
- Glass, plastic, microsurgery instruments
- Aspirator hoses, etc.

## ENDO Forte Disinfectant



### Features

- Based on Glutaraldehyde (2%)
- Can be used upto 28 days
- Can be used manually
- Thanks to not foaming Formula, Detro Forte is suitable for use in Fully Automated Endoscopy Washer and Disinfecter Machine
- Disinfection in 5 mins and Cold Sterilization in 15 mins
- Do not cause corrosion

### Range of Application

- Endoscopic Instruments
- Surgery Instruments
- Glass, plastic, microsurgery instruments
- Aspirator Hoses, etc.

## ENDO

## ENDO Enzym

Enzymatic



### Product Properties

- Concentrated product
- Effective in 15 minutes at manual usage
- Effective cleaning property
- Decrease microbic agents by decontaminating organic contaminations
- Decrease corrosion risk by decontaminating inorganic contaminations
- Effective in 5 minutes at ultrasonic cleaner

### Range of Application

- Endoscopic instruments
- Surgery instruments
- Glass, plastic, microsurgery instruments
- Aspirator hoses, etc.

### Composition

- 5% enzymes (amylase, protease, lipase), 30% glycol, 8% nonionic surfactant, 1% quaternary ammonium compounds, anticorrosive agents

### Product Description

- ENDO Enzym is used for enzymatic cleaning of micro surgical, flexible and rigid instruments, endoscopies and anesthesia equipments, dental instruments, drills. It is compatible with instruments that made from metal, glass, porcelain, rubber etc.

### Dosage

- Product needs to be diluted before using since it is concentrated. It can be diluted at 0,5% concentration (Add 5 ml product into 1 lt water)
- Immerse the instruments into diluted solution
- Manual usage: effects in 15 mins.
- Ultrasonic usage: effects in 5 mins.
- Product shows maximum activity at 35 - 45 °C
- Rinse instruments thoroughly and make ready to next process
- Solution life is max. 24 hours. It can be changed earlier according to contamination level





## ENDO CLEAN 1000 Endoscope Washer



### Technical Data

- Application scopes : flexible endoscopes
- Visual leakage detection : bubble detection during immersion
- Number of reprocessor endoscope : for 1 scope
- Washing method exterior surfaces multi channel jetting system rotated in a 360 degree arc
- Washing method channel interiors and accessories fluid flushing cleaning
- Disinfection method exterior surfaces and accessories disinfectant solution immersion
- Disinfection method channel interiors disinfectant solution flushing and filing
- Washing time 10 sec ~ 3 min
- Detergent time : 5 sec
- Disinfection time : 1 min ~ 1 hr
- Alcohol flushing time ; 5 sec
- Tank capacity : disinfectant 15L detergent 1L and alcohol 1L
- Dimension (mm) : 550(W) x 585(D) x 950(H) Weight :
- Weight: 75 kg
- Power : 220-240VAC 50/60Hz

### Features

- Maintaining concentration of sterilization liquid for certain period by minimizing dilution rate
- A function to prevent draining of sterilization liquid
- Easy to determine sterilization liquid replacement cycle with counter display of sterilization liquid
- Using parts with strong chemical resistance against Peracetic Acid and PAA
- Automatic alcohol injection at inside channel
- Providing effective sterilization capability with washing liquid and alcohol added
- Strong multiple 3 channel 360 degree rotating nozzle type
- Program mode selection type which is easy to be operated
- Equipped with strong air gun
- Providing Olympus, Pentax, Fujinon leak jack adaptor It's also possible to set time freely taking average 7 to 15 minutes
- Sterilization is available for all types of endoscope and 1 set endoscope is possible for sterilization
- Material for Basin is chemical-resistance indicating making it possible to install endoscope without a mounting device



## ENDOCLEAN 2000

Disinfectant



### Technical Data

- Application scopes : flexible endoscopes
- Visual leakage detection : bubble detection during immersion
- Number of reprocessor endoscope : for 2 scope
- Washing method exterior surfaces multi channel jetting system rotated in a 360 degree arc
- Washing method channel interiors and accessories fluid flushing cleaning
- Disinfection method exterior surfaces and accessories disinfectant solution immersion
- Disinfection method channel interiors disinfectant solution flushing
- Washing (1,2,3) time : 10sec ~ 3min. Max (0 sec - skip)
- Detergent time : 5sec max (0 sec - skip)
- Disinfection time : 1 min ~ 1 hr max
- Alcohol flushing time ; 5 sec
- Air (1,2,3) force time : 10sec ~ 30sec max (0 sec - skip)
- Air shower time : 10sec ~ 30sec max (0sec - skip)
- Water filtration and disinfectant filtration : built in (pre liter)
- Tank capacity : disinfectant 15L detergent 1L and alcohol 1L
- Dimension (mm) : 550(W) x 585(D) x 950(H) Weight :
- Weight: 75 kg
- Power : 220-240VAC 50/60Hz

### Features

- Setting alarm to notify cycle use of sterilization liquid depending on its characteristics
- User-centric various program configuration
- A function to wash sterilization tank
- Setting alarm for automatic door opening
- Use of chemical-resistance substances against peracetic acid and PAA
- Automatic alcohol injection into internal channel
- Strong multiple 3 channel 360 degree rotating nozzle type
- Dual scope processing
- Rapid drying basin and surface of endoscope by strong air shower
- Equipped with strong air gun
- Equipped with filter
- Blocking foreign substance entering endoscope by
- Preventing inundating of basin with dual full sensor
- Providing Olympus, Pentax, Fujinon leak jack adaptor. Free time setting and program configuration makes it possible to operate the system under best conditions. Number of endoscopes which is possible for sterilization is 2 sets while sterilization is available for all kinds of endoscope and special endoscopes
- This provides best endoscope reprocessing service equipped



## Pneumatic Lithotripsy, Lithosplit 4.1 Digital Lithotriptor



Lithosplit Super Hand Piece

Lithosplit Probes

### Frequencies of impacts

- There are total thirteen choices. Twelve repeat frequency starting 1 per second up to 12 per second. In addition Mono mode is provided to control the trigger precisely.

### Energy Control

- Easy to use Electronic control is provided to set a desired energy level from 1 to 10. This wide range of control allows a Surgeon to disintegrate stone of any hardness and size easily.

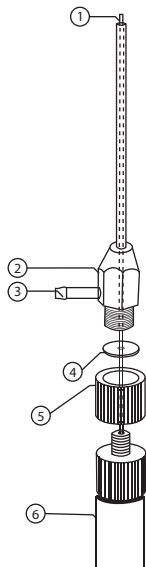
### Lithosplit Super Hand Piece

- High precision LITHOSPLIT Hand Pieces use matched piston and cylinder to give a long and reliable service life. It is very easy to assemble. There are various choices of sterilisation. Its efficacy is proved for disintegrating hard and large stones

### Lithosplit Probes

- Probes are available in various sizes to treat stones in bladder, urethra or kidney. 0.8mm and 1.0mm probes are used for URS. 1.5mm is designed for locations in bladder and kidney. A strong 2.0mm probe works very well on large and hard stones in kidney.

## Suction Assembly for PCNL Lithotriptor



1. Probe
2. Suction assembly
3. Suction connection
4. Silicone washer
5. Coupler
6. Assembled Handpiece

APEX  
MediTech

## digiFLOW - ST2

Lithotripter

## digiFLOW - 4

Lithotripter



### Salient Features

- Fully automatic or manual operation
- User friendly system
- Uses in-built thermal technology printer
- The printer requires no maintenance, no ink refilling
- Prints crisp and clear high resolution printouts
- Test duration up to 2 minutes
- Infinite stand by time in auto mode
- Multiple tests can be conducted successively without emptying the jar every time
- Auto or manual start and stop
- Patient data with test results is stored in the memory and can be retrieved any time for printing before starting the next test.
- Maintenance free
- Printout contains graph and tabular text data
- Flow measurement range : 0-50 ml/sec
- Volume measurement range : 0-750 ml
- Removes artefact automatically
- Reusables urine collection jar
- High precision sensor for flow and volume
- Upgradation to Urodynamics possible
- Compact and portable system

### Salient Features

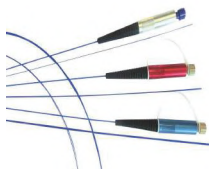
- Fully automatic
- User friendly system
- Uses PC's USB port for communication with the hardware
- Prints crisp and clear colourful or greyscale printouts on any color deskjet or laser printer installed on the PC.
- Real-time coloured display
- Long test duration, up to 30 minutes
- Multiple tests can be conducted successively without emptying the jar every time
- Auto or manual start and auto stop
- Patient data with test results is stored in the PC and can be retrieved any time for reference or for reprinting
- Maintenance free
- Printout contains graph and tabular text data
- Flow measurement range : 0-50 ml/sec
- Volume measurement range : 0-2000 ml
- Facility to remove artefact manually
- Reusable urine container and funnel
- High precision sensor for flow and volume
- Selectable scaling (zooming) for both display as well as print
- Upgradation to Urodynamics possible
- Packed with full on line help

## Potent<sup>®</sup>

### Holmium Laser Therapeutic Laser Therapeutic



### Holmium Laser Fibers Fiber



#### Features

- **High Quality Laser Output** Professional designed high stability anti-interference laser power device guarantees strongly for high quality laser output and continuous
- **Enhanced Targeting** The laser is equipped with a green aiming beam which aids in targeting and is easily seen during procedures.
- **Accurate CLPC System** The output power is monitored automatically, any change caused by water temperature and/or optical components is compensated timely, then steadily and accurately the output power on the settings.
- **Environmentally friendly forced cooling system** Environmentally friendly forced cooling system of international standard not only shorts the preheat time but also avoids pollution to the operating room.

#### Specifications

- 200/240 blue jacket fiber, OD 400 micron, Single use and reusable
- 272/300 blue jacket fiber, OD 450 micron, Single use and reusable
- 365/400 blue jacket fiber, OD 580 micron, Single use and reusable
- 550/605 blue jacket fiber, OD 780 or 880 micron, Single use and reusable
- 600/660 blue jacket fiber, OD 920 micron, Single use and reusable
- 800/880 blue jacket fiber, OD 1180 micron Single use and reusable
- 1000/1100 blue jacket fiber, OD 1500 micron, Single use and reusable

# ENDO

## Pneumatic and Ultrasound Lithotripter

### Pneumatic Lithotripter



#### Ultrasonic Handpiece

- Cutting edge multi microcompressor design that controls the ultrasonic energy for maximum power and performance
- This intelligent design provides real time feedback that prevents overheating of the ultrasonic handpiece and probe that is common with other lithotripters

#### Wide Range of Probes

- A large variety of both pneumatic and ultrasound probes are available for use with rigid, semi rigid, and flexible endoscopes

#### Multi Mode Coupling Device

- Unique coupling devices that Combines both ultrasonic and pneumatic hand pieces for use in 3 distinct operating mode
- Special designed coupler eliminates the need to adjust the length of the pneumatic probe prior to use in combination mode

#### Easy to Use

- Easy to use soft keys and display
- User friendly device that incorporates a hi-tech graphical LCD interface and soft keys instead of bulky switches and knobs that can be difficult to use and clean after a procedure

## GERUI

**Disposable Bite Block**  
with rubber headband



### Features

- Function open the mouth and throat inspection
- Material PP
- Size L26.5 \* W21 \* H24.5 mm
- Strip 550\*20 mm

## EZLIG

**Multi Band Ligator**  
Multi Band Ligator



### Features

- Post installation of the bands makes the field clear
- Precise ligation, obvious release resistance, easy to operate
- Multi-bands design achieves to treat several points in one operation
- Medical rubber material with good biocompatibility and physical property
- Humanized handle design make operation more easy and comfortable
- Bands release reminds by feeling and sound
- Color ring for quick identification of the last shot
- Square shape cross section design make ligation very stronger and safer

# SonoScape

## Video Endoscopy System HD-350

Flexible Endoscopy



### Features

- CMOS, with the CMOS image sensor, HD-350 gives high quality images with low noise levels, which leads to improved clarity and optimized vision in not only routine procedures but also in complex interventions.
- Smart workflow, to increase efficiency, patient data management is accessible with the press of a button. The smart workflow of the built-in workstation of HD-350 helps doctors to edit reports, record videos and manage patient files with ease
- Clean and clear, the waterjet function of the scopes help to maintain a clear endoscopic view by washing away blood or mucous.

### Advanced Technologies

- High-definition video and imaging
- Image noise reduction and image enhancement
- CHb enhancement
- Automatic equalization of brightness
- Hot plugging of endoscope
- Capacitor touch control
- Intelligent medical record management
- Endoscope identification

### HD-350 Video Processor

- HD video outputs : DVI, SDI, VGA Standard video outputs: S-Video, CVBS
- HD video recording: Built-in workstation, timely record and review
- Dimension (L x W x H / weight) 455mm x 370mm x 124mm / 9.5 kg

### HD-35E Light Source

- Main lamp: 50W LED
- Transparency function: 7 seconds maximum brightness flicker
- Lifetime indicator
- Hot plugging : Endoscope switch without powering off
- Dimension (L x W x H / weight) 460mm x 370mm x 154mm / 15 kg



## SonoScape

### Video Endoscopy System HD-500

Flexible Endoscopy



#### Features

- Integrated Patient Database Management
- Multi Spectral Imaging
- Water Jet Function
- Built-in Workstation - Smart Work Flow and Easy Operation

#### Full Function Trolley

- Fully height adjustable design to accommodate different clinical settings
- 24 inch LCD display with articulating arm for viewing from any angle
- Main power button for easy activation of the whole system Transformer guarantees stable power current

#### HD-500 Image Processor

- (ChB) Concentration Hemoglobin Imaging By quantitatively measuring the mucosal hemoglobin volume, ChB is useful for endoscopists to differentiate vein patterns and diagnosing the intramucosal digestive carcinoma, diffuse-type carcinoma or the intestinal-type carcinoma.
- Structure and Edge Enhancement Structure enhancement can provide a better image for the doctor during observations by enhancing the outline of large mucosal while the edge enhancement improves the contrast resolution of smaller tissue structures.
- Multi-buttons for Remote Control Four buttons on the control section of the endoscope handle can be customized to preset functions making the operation easier and more convenient for gastroenterologists during a diagnostic exam.
- Smart short-cut buttons Short-cut buttons on the keyboard, control panel and the endoscopes delivers a faster operation and makes the examination more efficient.
- Flexible Image and Video Management Solutions. Still image capture, video recording and replay functions endows the HD-500 system with flexible image and video management solutions.
- Large Storage Capacity. Installed with a 500GB hard drive, the HD-500 system is convenient for storing patient files and large video files.
- Flexible Switching Working Mode Keyboard operation allows access to the report editing mode or to the patient file management mode facilitating a smooth examination.

# SonoScape

## Video Endoscopy System HD-550

Flexible Endoscopy



### Features

- More versatile with the new multi-mode VIST (Variable Intelligent Staining Technology) VIST multi-mode is interchangeable at the touch of a button, without any delay you can notice.
- Maximized optical effect, minimal light loss. HD-550 employs a 2-LED light source with a lifespan of 10,000 hours. Its Variable Spectrum Control offers highly intensive, purified and all-round light options. You will obtain a noticeable brighter, high quality image, and impressive staining effects.
- A clear vision with Full HD output. Armed with a 2-megapixel CMOS sensor, HD-550 supports 1080p resolution.
- Brilliant workflow HD-550 inherits the built-in workstation with 500GB of hard disk. It allows you to access patient data, to capture and record images and videos, to create and edit reports in one spot without the need of any extra software.

### Image Processor

- One step connection, hot plugging. Zero cable involved, switching scopes has never been this convenient. Plug and play without interrupting the processor, the system guarantees a seamless procedure at any time.
- Even more comfortable to hold, the 550 series scope handle adopts an ergonomic design and a more intuitive layout, helps to reduce the fatigue in longer interventions.
- Outstanding Manoeuvrability. Sort bending radius and gradual stiffness allows to intubate, reach and observe efficiently. The large instrument channel facilitates the therapeutic procedures.
- Water Jet. All the scopes are equipped with water jet function, handily aligned with the direction of the instrument channel. It washes off any mucus or blood and assures a clear view at all time.
- Real waterproof. The 550 series scopes can be submerged under water or solution without a waterproof cap. They can now be cleaned and disinfected with ease, at a minimal risk of water damage by mismanipulation.

## ENDO

ENDO EI.Pump  
Pump

## Specifications

- Water flow Maximum 4.0 Lpm
- Resource 220V - 230V AC
- Power 55VA
- Pressure Maximum 0.6 Mpa
- Frequency 50/60 Hz
- Classification Class I, IP 20
- Dimensions (LxWxH) 21.5 x 30.5 x 12.5 cm
- Weight 4 kg

**SEESHEEN**  
see the endo-sheen

## Intubation Laryngoscope

Flexible Video



### Flexible Video Intubation Laryngoscope

Complete tracheal flexible intubation solutions

- Slim, standard and therapy type for optimized usability
- Chip in tip video technology
- Portable design is applicable to intubation in anywhere
- Photograph and video recording Standard configure 3inch attachable display

### Anesthesiology

Occurrences, safe and fast intubation

- Seesheen intubation scope standard attaches removable 3 inch display which offers open vision and brilliant user experience. The product line offers ideal and completed intubation solutions by the features of versatile, efficient, and scatheless. They can be used for the situations:
  - Difficult airway intubation
  - Special patient postures
  - Awakening intubation
  - DLT / BB position checking
  - Nasotracheal intubation
  - Teaching and practice

## Bronchoscope

Flexible Video



### Flexible Bronchoscopy Solutions

- Slimmest 3.2mm outer diameter
- Chip on tip video technology
- Left & right 120° insertion rotation
- Photograph and video recording
- Portable design offers more convenience for routine examination and therapy

### Pulmonary

Occurrences, make bronchoscopy become more accessible

- Nowadays, bronchoscopy is becoming a crucial tool of lung disease interventional therapy. Seesheen flexible video bronchoscopes including 3 types which offer more accessible bronchoscopy therapy solutions.
  - Interventional laser / cryo-therapy
  - Remove of mucus / foreign bodies
  - Placing airway stent / bronchial dilatation
  - Lavage such as BAL / WLL
  - Dose purpose for instance fistula blocking orEBTB

## Ureterorenoscope and Cystonephroscope



## Choledochoscope Flexible Video



### Flexible Video Ureterorenoscope and Cystonephroscope

*RIRS & PCNL, flexible endoscopy solutions*

- Better vision and durability than traditional fiber scopes.
- Video chip in tip technology
- 275° bending to reach lower calyx
- Left and right 120° insertion rotation
- Photograph and video recording Video signal output ability to medical grade display

### Urology

*Occurrences, RIRS (Retrograde Intra Renal Surgery)*

- RIRS is an effective surgery which is using flexible uretero-renaloscope to enter kidney retrogradely. Seesheen UR-332 flexible uretero-renaloscope combines chip on tip technology which gives better vision and durability than the fiber scopes

*Occurrences, PCNL (Percutaneous Nephrolithotomy)*

- Compared with rigid cysto-scope, Seesheen CN-355 offers soft and flexible cystoscopy for examination and therapy, it also can be used for PCNL when the rigid scopes meet blind area during the operation

### Flexible Video Choledochoscope

*LTCBDEC Choledochoscopy Solutions*

- Video chip on tip technology
- Photograph and video recording
- Left & right 120° insertion rotation
- Video signal output ability to medical grade display

### General Surgery Occurrences, LTCBDEC

*Laparoscopic Transcystic Common Bile Duct Exploration with Choledochoscope*

- LTCBDEC, coordinate with laparoscope, Seesheen choledochoscope can be used for LTCBDEC which is an ideal solution for lithotripsy. CV-332 with 3.2mm outer diameter and 1.2mm instrument channel can support doctor to search and break stones in smaller biliary duct.

**SEESHEEN**  
see the endo-sheen

## Rhinolaryngoscope

Flexible Video



### E.N.T.

#### *Flexible Rhinolaryngoscopy Solutions*

- Portable design for OPD daily using
- Wide 120° viewing angle
- Chip on tip video technology
- Integrated LED light source
- 130° up and down bending angles
- Less stimulus and more accurate for examination and therapy
- Photograph and video recording

### E.N.T.

#### *Occurrences, softer and safer*

- Flexible rhinolaryngoscopy is currently one of the most commonly used techniques for visualizing the nasal cavity, the sinuses, the pharynx and the larynx. Seesheen flexible video rhinolaryngoscope EV-349 which has 2.2mm working channel can be widely used for :
  - Polypectomy of nasal and vocal core
  - Adenoids removal
  - Rhinopharyngocele checking and removal
  - Accurate dosing
  - Checking bleeding points



## Polymer Ligating Clips

Ligating Clips



### Features

- Used for human body blood vessels and coelom organization ligation and closing during operation
- Safe polymer materials, good biological compatibility
- No affecting on X-ray, CT, MRI, and other imaging studies
- Safety lock, arc, elasticity, and prevent slippery designs. Rapid ligation in operation, safe, and reliable results
- Protuberance ensure clip is stable at the jaws of clip applicator
- Anti slip teeth prevent clip sliding in any direction
- Bow design effective to remove clips
- Flexible hinge provide expansion space for closing and removing of the clip

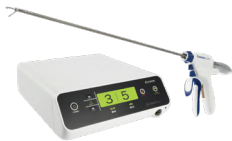
## Polymer Ligating Clips

Ligating Clips



## Ultrasonic Scalpel System

Scalpel System



### Features

- Protection pad effectively extend the using time of the scalpel
- Precise dissection lateral thermal tissue damage only 1 mm
- Multifunction grasping, dissection, cutting, and coagulation, all in one single instrument
- Integrated knob equipped with torque wrench function
- Easy to connect the scalpel to transducer

### Precising Pinch

- Non nod version, enhanced material for applicator
- Rounded corners of the applicators head reduce the risk of broken clips and misalignment

# ELMED

## Electro Magnetic Shock Wave Lithotripsy Lithotripsy System



### Features

- Two types of focusing method of Electro Magnetic System
- All modern devices are EM system
- Noise level is less
- Powerful and high success rate
- User friendly
- Multimed EM is flat coil system
- Movable shock wave head to four position (under table and over table and their oblique positions)
- Both X-ray and ultrasound automatic localization
- Water treatment (water degassing and heating)
- Modular design, mobile and portable
- Lower servicing requirements, lower operating and initial cost, more economical

### X-ray Localization

- Bi-plane localization is necessary
- In perpendicular view, the patient is moved in longitudinal and transverse directions by means of electrical motors in the plane which is parallel to horizontal plane of earth. So patient is localized in 2 dimension
- In oblique view, the patient is moved up or down in vertical direction. So the patient is localized also in 3rd

### Ultrasound Localization

- In ESWL devices, it is necessary to use localization by ultrasound scanner to treat the non-opaque stones and to treat child patients
- Ultrasound localization systems used in ESWL devices are structurally divided into two different method In line (in the shock wave reflector) ultrasound system Off line (outside) ultrasound system
- Ultrasound localization systems used in ESWL devices are also divided into two different systems in operation method. Manual and automatically localization



# ENDO

## ENDO Shaver System Arthroscopic Shaver



## Blades and Burrs



### Features

- Full touch LCD screen
- Easy-to-use interface, switch work mode effortlessly
- Two handpiece ports
- Working efficiency
- Blades: oscillation speed range 500-3000RPM, forward or reverse speed range 500-5000RPM
- Burrs: forward or reverse speed range 6000-12000RPM

### Features

- Single-use
- Blades and burrs available
- Different sizes and shapes
- Compatible with handpiece from Dyonics® & Livatec®

Blade / Bur	Compare to Smith & Nephew Dyonics®
Teardrop Blade 4.2	7205310
Full Radius Blade 3.0	72201509
Full Radius Blade 4.2	7205306
Inner serrated blade tooth blade 4.2	7210499
Double serrated tooth blade 3.0	72201513
Double serrated tooth blade 4.2	7205345
Double serrated tooth plus blade 4.2	7210976
Oval bur 5.9	7205327/72200725
Round bur 5.9	7205325/72200723

Blade / Bur	Compare to Livatec®
Teardrop Blade 4.2	C9242
Full Radius Blade 3.0	C9941
Full Radius Blade 4.2	9247A/M9247A
Inner serrated blade tooth blade 4.2	9263A/M9263A
Double serrated tooth blade 3.0	C9951
Double serrated tooth blade 4.2	C9254/MC9254
Double serrated tooth plus blade 4.2	M9299A
Oval bur 5.9	H9102/MH9102
Round bur 5.9	H9112/MH9112

## Skin Graft Mesher

Surgical Instrument



### Features

- Skin Graft Mesher is a surgical instrument used for skin transplantation
- Single cutter cuts skin graft into geometrical shaped mesh & enlarge skin surface
- Graft expansion predetermined by graft carrying plates, eliminating need to change cutter during operation
- Continuous feed design prevents graft carrying plate from being loaded incorrectly and allow multiple platesto be used without interruption
- Graft thickness adjustment feature allow expansion on thin and thick grafts
- Easy availability of replacement parts

## Dermatome

Skin Transplantation



### Features

- Dermatome is a device used for skin transplantation.
- It can be used with three possible technologies: battery, electro-motor and pneumatic
- User friendly, battery powered high torque motor design.
- No need to connect electric supply or compressed air.
- Removable special batteries make steam sterilization possible.
- Ergonomic and weight balanced design make it easy to handle.
- 8 flaps give the ability to adjust cutting width from 9.75 mm to 78 mm.
- Easy blade change mechanism designed to insert the blade only one side thus uncorrect blade isertion is avoided.
- Cutting speed can be adjusted by only one finger.
- Safe lock mechanism prevents from unwanted operation of the motor.

## Dermatome ST-5 Skin Transplantation



### Features

- Special designed hand pieces for different operation variations
- Small, medium and large head designs provides precise cutting results in different areas
- Light weight and cordless, battery operated ergonomic system offers mobility
- Quick, easy and safe blade replacement mechanism
- 10 level for cutting thickness adjustment with 5 main and 5 intermediate level for sensitive results
- High quality dermatome blades for precise and smooth consequences

### Features

- Dermatome Handpiece (M10 - 500)  
Autoclavable, 13,000 cpm  
Dimensions / Weight : 290 x 105 x 50 mm / 980 gr
- Power Box (M10-502)  
Powerful DC motor technology, Not Autoclavable  
Battery capacity : 3100 mAh  
Voltage : 8.4 Volts  
Dimensions / Weight : Ø 30 x 195 mm / 320 g
- Charger Unit for 1 battery (M10-505)  
Mains voltage 100-240 Volts, 50-60 Hz  
Charging current 2.7 A  
Charging voltage 8.4 volts  
Protection : Short circuit / Overload / Over voltage  
Dimensions : 175 x 120 x 100 mm  
Weight : 850 gr
- Autoclavable sterile funnel for aseptic battery loading (M10 - 504)  
Dimensions / Weight : Ø 45 x 35 mm / 35 g
- Blades (M7 - 105)  
One side cutting only.  
Stainless Steel  
Dimensions : 81 x 18.5 x 0.40 mm
- Width Reducing Clamp (30mm) (M10-500A)
- Width Reducing Clamp (45mm) (M10-500B)
- Width Reducing Clamp (60mm) (M10-500C)

## Unilateral Bi-Portal Endoscopy Instrument Set

EN-DI115A (15mm)



EN-DI113A (13mm)



EN-DI111A (11mm)



EN-DI109A (9mm)



EN-DI107A (7mm)



EN-DI105A (5mm)



### 01~06. EN-UBE Dilator

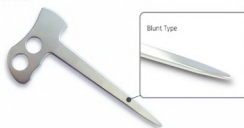


### 08~09. EN-UBE Double Ended Retractor



### 12.EN-UBE Suction Tip 13.Intradiscal Irrigator

EN-ME100A



### 07. EN-UBE Muscle Detacher

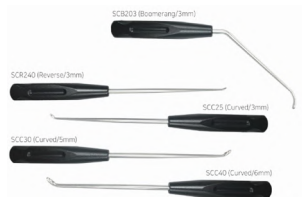


### 10~11. EN-UBE Root Retractor

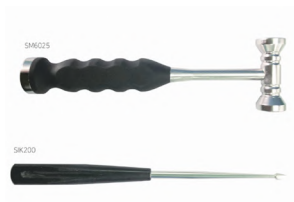


### 14~17. SPINUSS Chisel

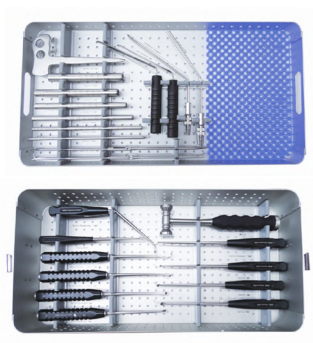
## Unilateral Bi-Portal Endoscopy Instrument Set



18~22. SPINUSS Curette



23. SPINUSS Mallet  
24. SPINUSS Indian Knife



# ENDO

## ENDO Bandage Instrument Set

Open Surgery



ENDO Bandage Instrument Set is a set of instruments used for cleaning wounds, debriding, and changing wound dressings.

### Instrument Set

- |       |   |
|-------|---|
| 1 pcs | Forceps Narrow Dress 14.5 cm                        |
| 1 pcs | Standard Forceps 1x2 T. 14.5 cm                     |
| 1 pcs | Standard Scissors 14.5 cm, BL/BL, STR               |
| 1 pcs | Lister Bandage Scissor 14 cm TC                     |
| 1 pcs | Standard Scissor 11.5 cm, BL/BL, STR                |
| 1 pcs | Metzenbaum Scissor 18 cm, BL/BL, STR                |
| 1 pcs | Esmarch Bandage Scissor 20 cm                       |
| 1 pcs | Gross-Maier Forcep 20 cm, STR                       |
| 1 pcs | Sterilization Container Aluminium 350 x 180 x 85 mm |

# ENDO

## ENDO Embryotomy Instrument Set Open Surgery



### Instrument Set

- 1 pcs Smellie Perforator 27 cm
- 1 pcs Teale Tenaculum Forcep 23 cm
- 1 pcs Gauss 26 cm, Scalp Flap Forceps
- 1 pcs Braun Decapitating Hook 32.5 cm
- 1 pcs Braun Cranioclast 42 cm, 1 Jaw
- 1 pcs Nagele Obstetrical Forcep 35.5 cm
- 1 pcs Kielland Obstetrical 42 cm
- 1 pcs Kelly Uterine Polypus Forcep 32 cm
- 1 pcs Sterilization Container Alumunium 400 x 200 x 130 mm

## ENDO

## ENDO Hecting Set

Open Surgery



The hecting set is a minor surgical instrument used to suture a wound.

### Instrument Set

- |       |   |
|-------|---|
| 1 pcs | Spencer Scissor 9 cm, Normal                        |
| 1 pcs | Forceps Narrow Dress 14.5 cm                        |
| 1 pcs | Standard Forceps 1x2 T. 14.5 cm                     |
| 1 pcs | Gross-Maier Forcep 25 cm, STR                       |
| 1 pcs | Mathieu Needle Holder 17 cm                         |
| 1 pcs | Standard Scissors 14.5 cm, BL/BL, CVD               |
| 1 pcs | Halsted-Mosquito Forceps, CVD 12.5 cm               |
| 1 pcs | Halsted-Mosquito Forceps, 12.5 cm, STR              |
| 1 pcs | Fine Scissor 9 cm, SH/SH, Flat, STR                 |
| 1 pcs | Sterilization Container Alumunium 350 x 180 x 85 mm |



## ENDO Partus Set

Open Surgery



Partus set is one of the medical instruments to assist in childbirth and to suture wounds or tears in the perineum due to childbirth.

### Instrument Set

- 1 pcs Syandard Scissors, BL/SH STR. 14.5 cm
- 1 pcs Lister Bandage Scissor 18 cm TC
- 1 pcs Forceps Narrow Dress 14.5 cm
- 1 pcs Standard Forceps 1x2 T. 14.5 cm
- 1 pcs Foerster Forcep Serrated 18 cm
- 1 pcs Halsted-Mosquito Forceps 10 cm, STR
- 1 pcs Crile Forcep 14 cm 1:2, STR
- 1 pcs Halsted-Mosquito Forceps, 12.5 cm
- 1 pcs Grave Vaginal Speculum 75 x 20 mm
- 1 pcs Sims Specula 65 x 25 mm, 75 x 30 mm
- 1 pcs Sims Specula 70 x 30 mm, 70 x 35 mm
- 1 pcs Bozemann-Douglas 26 cm
- 1 pcs Braun Stadler Scissor 14.5 cm
- 1 pcs Sterilization Container Alumunium 350 x 180 x 85 mm

## ENDO

**ENDO IUD Kit**  
 Open Surgery


ENDO IUD Kit is a set of obstetric instruments used to insert / remove IUD contraceptives, the item products as below :

**Instrument Set**

- |       |  |
|-------|--|
| 1 pcs | Round Bowl, 83 mm, Height 41 mm, Width 54 mm, 160 ml                             |
| 1 pcs | Bozemann Uterine Dressing Forceps, Curved, 250 mm (10"), S-Shaped                |
| 1 pcs | Braun Uterine Dressing Forceps, Straight, 250 mm (10"), Slender Pattern          |
| 1 pcs | Kristeller Vaginal Specula, 75 x 30 mm, 175 mm, 7", Set of Upper and Lower Blade |
| 1 pcs | Sims Vaginal Specula, Double Ended, 70 x 26 mm / 75 x 30 mm, 125 mm, 5"          |
| 1 pcs | Sims Uterine Probe, Curved, 330 mm (13 1/8") Dia. 4 mm                           |
| 1 pcs | Mathieu Foreign Body Removal Forceps, Straight, 190 mm (7 1/2")                  |
| 1 pcs | Sterilization Container Aluminium 350 x 180 x 85 mm                              |

# ENDO

## ENDO Venous Section Set

Open Surgery



ENDO Venous Section Set is a set of set instruments to open access to the veins, the item products as below :

### Instrument Set

- 1 pcs Operating Scissors Standard Fig 2 SH/BL STR 14.5 cm 5 1/2"
- 1 pcs Ligature Scissors Ligaturschere STR 11.5 cm, 4 1/2"
- 1 pcs Dissecting Scissors Metzenbaum fig 1 BL/BL CVD 14.5 cm 5 1/2"
- 1 pcs Dressing Forceps Adson STR 12 cm, 4 3/4"
- 1 pcs Tissue Forceps Adson 1.2 mm 1x2 T 12 cm, 4 1/2"
- 1 pcs Hemostatic Forceps Halstead Mosquito STR 12.5 cm, 5"
- 1 pcs Hemostatic Forceps Halstead Mosquito CVD 12.5 cm, 5"
- 1 pcs Hemostatic Forceps Crile CVD 14.5 cm, 5 1/2"
- 1 pcs Towel Forceps Backhaus 9 cm, 3 1/2"
- 1 pcs Needle Holders Mayo Hegar STR 16 cm, 6 1/4"
- 1 pcs Scalpel Handle Standard No. 3 Solid
- 1 pcs Sponge Holding Forceps Rampley STR 25 cm, 10"
- 1 pcs Directors Grooved 14.5 cm, 5 1/2"
- 1 pcs Retractor Weitlaner Loktite BL 10.5 cm, 4 1/4"
- 1 pcs Sterilization Container Alumunium 310 x 190 x 40 mm include 2 permanent textile filters

## ENDO

**ENDO Hysterectomy Set**  
Open Surgery

# ENDO

## ENDO Hysterectomy Set

### Open Surgery

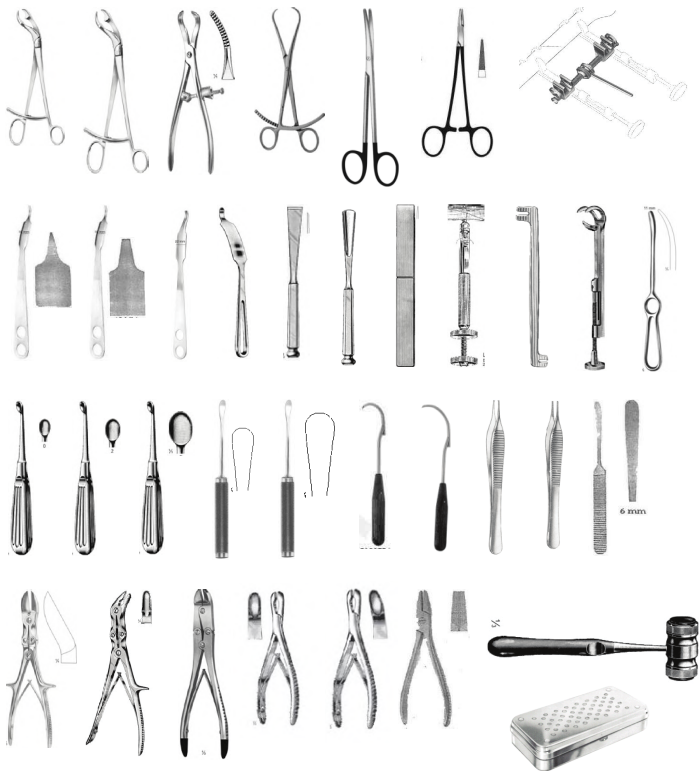
Hysterectomy instrument set is an emergency surgical procedure tool for surgical removal of the uterus.

#### Instrument Set

1 pcs	Scalpel Handle Standard, Fig 3	1 pcs	Heaney Vaginal Clamp 21 cm, CVD
1 pcs	Scalpel Handle No. 4	1 pcs	Werthem Vaginal Forcep 25 cm
1 pcs	Metzenbaum Scissor 23 cm, BL/BL	1 pcs	Mayo Hegar Needle Holder 20 cm
1 pcs	Mayo Scissor 14 cm, BL/BL, STR	1 pcs	Masson Needle Holder 27 cm
1 pcs	Mayo Scissor 17 cm, BL/BL, CVD	1 pcs	Doyen Retractor 28 cm, 48 x 90 mm
1 pcs	Metzenbaum Scissor 25 cm, BL/BL, CVD	1 pcs	Doyen Retractor 28 cm, 48 x 105 mm
1 pcs	Sims Scissor 20 cm, CVD	1 pcs	Haberer General Instrument 30cm,37/45
1 pcs	Forcep Narrow Dress 14.5 cm	1 pcs	Balfour Retractor 100 mm
1 pcs	Standard Dressing Forcep 25 cm	1 pcs	Allis Forceps 15 cm 5x6
1 pcs	Standard Forceps 1x2 T. 14.5 cm	1 pcs	Collin Duval Forceps 20 cm, 14 mm
1 pcs	Standard Tissue Forcep 20 cm, 1:2	1 pcs	Doyen Intestinal Forceps 23 cm, CVD
1 pcs	Ramplcy Forcep 25 cm, S/J	1 pcs	Doyen Vaginal Specula 85x45 mm, Fig 2
1 pcs	Backhaus Towel Forcep 9 cm	1 pcs	Doyen Vaginal Specula 115 x 45 mm
1 pcs	Halsted Mosquito Forcep, 12 cm STR	1 pcs	Simon Retractor 28 cm, 115 x 27 mm
1 pcs	Halsted Mosquito Forcep 12 cm, CVD	1 pcs	Bozemann Forcep 26 cm, STR
1 pcs	Crile Forcep 14 cm 1:2, CVD	1 pcs	Schroeder Tenaculum Forcep 25 cm
1 pcs	Spencerwells Forcep 15 cm, CVD	1 pcs	Pozzi Tenaculum Forcep 25.5 cm
1 pcs	Rochester Ochsner Forcep 20 cm, STR	1 pcs	Doyen Myoma Instrument 17 cm
1 pcs	Heaney Vaginal Clamp 19 cm CVD	1 pcs	Sterilization Container Aluminium

# ENDO

## ENDO Basic Orthopedic Set Open Surgery



## ENDO

## ENDO Basic Orthopedic Set

Open Surgery

## Instrument Set

2 pcs	Verbrugge Bone Holding Forceps Small	1 pcs	Bone Rongeur Forceps 155mm CVD Luer
2 pcs	Verbrugge Bone Holding Forceps Large	1 pcs	Respatories Langenbeck 11mm 23cm
2 pcs	Reduction Forceps w/Thread Lock 24mm	1 pcs	Raspatries Willinger 6mm 16cm
2 pcs	Reduction Forceps with Point 205mm	1 pcs	Bone File 28cm
2 pcs	Lowmann Bone Clamp 210mm large	1 pcs	Elevators Cobb 13mm 28cm
1 pcs	Bone Hammer Weight Approx 230 gram	1 pcs	Elevators Cobb 19mm 28cm
2 pcs	Howmann Bone Levers 18mm short	1 pcs	Wire Holding Forcep 17cm
2 pcs	Howmann Bone Levers 18mm short	1 pcs	Wire Cutting Pliers 17cm (TC)
2 pcs	Lange Homann 22mm Wide 255mm	1 pcs	Scissor TC Metzzenbaum 14cm
1 pcs	Lange Homann 30mm Wide 265mm	1 pcs	Needle Holder TC Crile Wood 20cm
1 pcs	Bone Chisell Still 12mm STR 205mm	1 pcs	Loute Wire Tightner
1 pcs	Bone Still Gauges 12mm STR 205mm	1 pcs	Gerster
1 pcs	Bone Chisell Lambote 15mm STR 240mm	2 pcs	Lane (Plate Bender)
1 pcs	Bone Currete Fig 0 170mm Volkmann	1 pcs	Wire Passer Small 45mm
1 pcs	Bone Currete Fig 2 170mm Volkmann	1 pcs	Wire Passer Large 70mm
1 pcs	Bone Currete Fig 5 170mm Volkmann	1 pcs	Micro Adson 4 3/4" (1:2)
1 pcs	Bone Cutting Forceps Liston 27cm	1 pcs	Micro Adson 4 3/4" (Serr)
1 pcs	Bone Rongeur Stille Angular 230mm	1 pcs	Stainless Steel Sterilizing Box 39cm
1 pcs	Bone Rongeur Forceps 155mm STR Luer	1 pcs	Screw Driver with Sleeve 4.5mm

## ENDO

**ENDO Tonsillectomy Instrument Set**  
Open Surgery



## ENDO Tonsillectomy Instrument Set

Open Surgery

### Instrument Set

1 pcs	Mouth Gags Davis Boyle 21 x 30 mm, Fig 1 Tongue Dep Only
1 pcs	Mouth Gags Davis Boyle 23 x 65 mm, Fig 2, Tongue Dep Only
1 pcs	Mouth Gags Davis Boyle 24 x 80 mm, Fig 3, Tongue Dep Only
1 pcs	Mouth Gags Davis Boyle 25 x 93 mm, Fig 4, Tongue Dep Only
1 pcs	Mouth Gags Davis Boyle 26 x 108 mm, Fig 5, Tongue Dep Only
1 pcs	Mouth Gags Davis Boyle Handle Only for Adults
1 pcs	Tonsillectomes Sluder Ballenger with Tip Fig 1, Fig 2, Fig 3
1 pcs	Tonsil Seizing Forceps Schnidt Fig 1, 19 cm, 7 1/2"
1 pcs	Hemostatic Forceps Negus Fig. 2 CVD 19 cm 7 1/2"
1 pcs	Tonsil Dissector Henke Fig 1 23 cm, 9"
1 pcs	Tonsil Knives and Enucleators Carpenter 25 cm, 10"
1 pcs	Dissecting Scissors Metzenbaum Fig 1 BL/BL CVD 18 cm, 7"
1 pcs	Tonsil Seizing Forceps White 18 cm, 7"
1 pcs	Tonsil Seizing Forceps Blohmke 20 cm, 8"
1 pcs	Tonsil Snares Eves 28 cm, 11"
1 pcs	Nasal Polypus Snares Steel Wire F/ Nasal Snares 0.3 mm, dia 0.3 mm / 100 mm
1 pcs	Tongue Depressor Tobold Solid 17 cm, 6 3/4"
1 pcs	Suction Tube Yankauer 6.5 mm
1 pcs	Tonsil Dissector and Retractor Hurd 22.5 cm, 9"
1 pcs	Mouth Gags Jennings 9 cm, 3 1/2"
1 pcs	Mouth Gags Jennings 11 cm, 4 1.2"
1 pcs	Tonsil Snares Bruenings 28 cm, 11"
1 pcs	Adenoid Currettes Beckmann Fig 1, 22 cm, 8 3/4"
1 pcs	Adenoid Currettes Beckmann Fig 3, 22 cm, 8 3/4"
1 pcs	Adenoid Currettes Beckmann Fig 4, 22 cm, 8 3/4"
1 pcs	Sterilization Container Alumunium 310 x 190 x 130 mm

## ENDO

**ENDO Mastoidectomy Set**  
Open Surgery

**ENDO Mastoidectomy Set**

## Open Surgery

Mastoidectomy is an instrument for a procedure performed to remove mastoid air cells. This can be done as part of the treatment of mastoiditis, chronic suppurative otitis media or cholesteatoma.

**Instrument Set**

1 pcs	Scalpel Handle, 160 mm (6 1/4"), No. 7
1 pcs	Delicate Scissors, Straight, 110 mm (4 1/4"), Sharp / Sharp
1 pcs	Delicate Scissors, Straight, 120 mm (4 3/4"), Sharp / Sharp
1 pcs	Mayo-Stille Dissecting Scissors, Curved, 140 mm (5 1/2"), Chamfered Blades, Blunt / Blunt
1 pcs	MC Indoe Dressing Forceps (Tweezers), Straight, 150 mm (6"), Delicate, Serrated
1 pcs	Gillies Tissue Forceps, Straight, 155 mm (6"), Delicate, Toothed (1x2)
1 pcs	Troeltsch Micro Forceps, Nerve Root Retractor, Straight, 115 mm (4 1/2"), Knee bent, Serrated, Width 1.80 mm
1 pcs	Ramsey Sponge Forceps, Straight, 180 mm (7") Serrated, Fenestrated, Box Lock, w/Ratchet
1 pcs	Towel Clamp, Straight, 85 mm (3 3/8"), English Pattern, Sharp
1 pcs	Providence Hospital Hemostatic Forceps, Curved, 140 mm (5 1/2") Delicate, Blunt
1 pcs	Halsey Needleholder, Straight, 130 mm (5 1/8")
1 pcs	Volkman Wound Retractor (w/ Prong), 220 mm (8 3/4"), 4 Prong, Sharp, 9 mm x 19 mm
1 pcs	Weitlaner Retractor (Self Retaining), 130 mm (5 1/8"), 3x4 Prongs, Blunt
1 pcs	Weitlaner Retractor (Self Retaining), 165 mm (6 1/2"), 3x4 Prongs, Blunt
1 pcs	Jansen Bone Curette, 160 mm (6 1/4"), Double Ended
1 pcs	Mallet, 185 mm (7 1/4"), Dia. 25 mm, Stainless Steel, 210 G, 135 G
1 pcs	Gouge, 4 mm, 140 mm, 5 1/2"
1 pcs	Gouge, 6 mm, 140 mm, 5 1/2"
1 pcs	Gouge, 8 mm, 140 mm, 5 1/2"
1 pcs	Gouge, 10 mm, 140 mm, 5 1/2"
1 pcs	Gouge, 12 mm, 140 mm, 5 1/2"
1 pcs	Tilley Ear Tampon Forceps, Straight, 140 mm (5 1/2"), Knee Bent, Very Delicate
1 pcs	Hartmann Grasping Forceps (Small), Straight, 80 mm (3 1/4"), Serrated, 1x8 mm
1 pcs	Thudichum Nasal Speculum #2
1 pcs	Hartmann Nasal Speculum Medium 160 mm
1 pcs	Howarth Elecator, Curved, 215 mm (8 1/2"), Double Ended, Sharp / Blunt
1 pcs	Gillies Skin Hook, 180 mm (7"), Small, 1 Prong, Sharp
1 pcs	Sterilization Container Aluminium

# ENDO

## ENDO Appendectomy Instrument Set Open Surgery



## ENDO

## ENDO Appendectomy Instrument Set

### Open Surgery

The set has all necessary instruments to perform Appendectomy Surgery. An appendectomy (appendisectomy or appendicectomy) is the surgical removal of the vermiform appendix.

#### Instrument Set

1 pcs	Scalpel Handle Standard, Fig 3
1 pcs	Scalpel Handle No. 4
1 pcs	Metzenbaum Scissor 28 cm BL/BL, CVD
1 pcs	Mayo Stille Scissor 15 cm BL/BL STR
1 pcs	Mayo Stille Scissor 15 cm BL/BL CVD
6 pcs	Standard Dressing Forcep 13 cm
6 pcs	Standard Dressing Forcep 25 cm
6 pcs	Standard Forceps 1x2 T. 14.5 cm
2 pcs	Lahey Seizing Forcep 20 cm / 8"
6 pcs	Backhaus Towel Forcep 13 cm
6 pcs	Crile Forcep 14 cm 1:2, STR
6 pcs	Crile Forcep 14 cm 1:2, CVD
6 pcs	Wertheim Cullen Forcep, 21.5 cm
2 pcs	Mayo Hegar Needle Holder 16 cm
2 pcs	Langenbeck Retractor 21 cm 30 x 11 mm
2 pcs	Middeldorpf Retractor 22 cm, 20x22 mm
1 pcs	Schroeder Tenaculum Forcep 25 cm
1 pcs	Czerny Tenaculum Forcep 20.5 cm
2 pcs	Heywood Smith Biopsy Forcep 20 cm
1 pcs	Yankauer Suction tube 27 cm
1 pcs	Sterilization Container Aluminium 350 x 180 x 85 mm

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**ENDO ENT Surgical Set**  
Open Surgery



## ENDO

## ENDO ENT Surgical Set

## Open Surgery

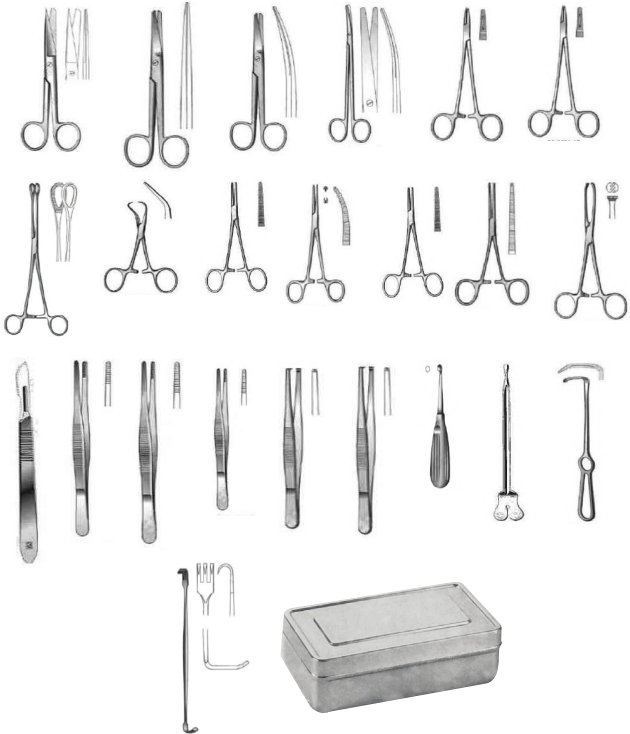
ENDO ENT Surgical set is an instrument set used for standard ENT / ENT procedures performed by ENT specialist.

## Instrument Set

3 pcs	Standard Scissors 14.5 cm. BL/BL, CVD	2 pcs	Billeau Curette 16.5 cm, Tip = 3.75 mm
2 pcs	Scalpel Handle Standard, Fig 3	2 pcs	Wagener Ear Hooklet 14 cm, Fig = 1
2 pcs	Bandage Scissor 18 cm, Yellow	2 pcs	Troeltsch Wild Ear Dressing FCP 12 cm
2 pcs	Forceps Narrow Dress 14.5 cm	3 pcs	Hartmann Ear Polypus Forcep 14 cm
3 pcs	Standard Dressing Forcep 20 cm	1 pcs	Hartmann Nasal Specula 16.5 cm, Fig=3
2 pcs	Standard Tissue Forcep 25 cm, 2:3	1 pcs	Tieck Halle Nasal Specula 13.5 cm, Fig=1
1 pcs	Gross Maier Forcep 25 cm, CVD	4 pcs	Bruening Tongue Depressor 19 cm
2 pcs	Gross Maier Forcep 20 cm, STR	1 pcs	Heister Mouth Gag 13 cm
2 pcs	Tobold Cotton Applicator 25 cm, CVD	1 pcs	Laryngeal Mirror 12 mm, Fig 1
2 pcs	Hartmann Ear Specula-Set of 4	1 pcs	Laryngeal Mirror 16 mm, Fig 3
1 pcs	Boucheron Ear Specula Set of 4, Round	1 pcs	Laryngeal Mirror 18 mm, Fig 4
1 pcs	Alloy Tuning Fork C1=256	1 pcs	Laryngeal Mirror 22 mm, Fig 6
1 pcs	Alloy Tuning Fork C2=512	1 pcs	Laryngeal Mirror 26 mm, Fig 8
1 pcs	Hartmann Tuning Fork C2=512	1 pcs	Laryngeal Mirror 28 mm, Fig 9
1 pcs	Hartmann Tuning Fork C3=1024	4 pcs	Laryngeal Mirror 10 cm / 4"
2 pcs	Hartmann Catheter Eustachian Fig = 3	2 pcs	Eicken Killian Curette 14 cm, D = 3 mm
2 pcs	Politzer Paracentesis Needle 16.5 cm	1 pcs	Sterilization Container Aluminium

# ENDO

## ENDO Minor Surgery Set Open Surgery





## ENDO

## ENDO Minor Surgery Set

Open Surgery

### Instrument Set

2 pcs	Scalpel Handle Standard, Fig 3
2 pcs	Standard Scissors, BL/SH STR. 14.5 cm
2 pcs	Mayo Scissor 15 cm STR
2 pcs	Mayo Scissor 15 cm, BL/BL, CVD
2 pcs	Metzenbaum Scissor 18 cm BL/BL, CVD
2 pcs	Forceps Narrow Dress 14.5 cm
2 pcs	Standard Narrow Forcep 14.5 cm
2 pcs	Standard Narrow Forcep 18 cm
2 pcs	Standard Forceps 1x2 T. 14.5 cm
2 pcs	Standard Tissue Forcep 18 cm, 1:2
2 pcs	Foerster Forcep Serrated 18 cm
4 pcs	Backhaus Towel Forcep 9 cm
4 pcs	Halsted Mosquito Forcep, 12 cm STR
2 pcs	Crile Forcep 14 cm 1:2, CVD
6 pcs	Spencerwells Artery Forcep 18 cm, STR
2 pcs	Kocher Forcep 16 cm, 1:2 STR
1 pcs	Crile Wood Needle Holder 15 cm
1 pcs	Crile Wood Needle Holder 18 cm
2 pcs	Butterfly Grooved Director 14 cm
2 pcs	Senn Mueller Retract 16 cm, 7x8.5 mm
2 pcs	Langenbeck Retractor 21 cm, 30x11 mm
2 pcs	Allis Baby Forcep 15cm, 4:5
1 pcs	Volkman Bone Curette 17 cm, Fig = 0000
1 pcs	Sterilization Container Aluminium 350 x 180 x 85 mm

# ENDO

## ENDO Tracheostomy Set Open Surgery



**ENDO Tracheostomy Set**

Open Surgery

**Instrument Set**

1 pcs	Scalpel Handle Standard, Fig 3
1 pcs	Standard Scissors, BL/SH STR. 14.5 cm
1 pcs	Mayo Scissor 17 cm, BL/BL, CVD
1 pcs	Metzenbaum Scissors 15 cm TC, CVD
1 pcs	Metzenbaum Scissor 18 cm TC CVD
1 pcs	Halsted Mosquito Forceps 12.5 cm, STR
1 pcs	Halsted Mosquito Forceps, CVD 12.5 cm
1 pcs	Crile Forcep 14 cm 1:2, CVD
1 pcs	Backhaus Towel Forcep 13 cm
1 pcs	Foerster Forceps 25 cm, STR
1 pcs	Mayo Hegar Needle Holder TC 18 cm
1 pcs	Forceps Narrow Dress. 14.5 cm
1 pcs	Standard Forceps 1x2 T. 14.5 cm
1 pcs	Adson Forceps, 12 cm, Serrated
pcs	Adson Forceps 1x2 Teeth 12 cm
1 pcs	Allis Forceps 15 cm 5x6
1 pcs	Senn Mueller Retract 16 cm, 7x8.5 mm, SH
1 pcs	Yankauer ASP Tube 23 cm, Complete
1 pcs	Trachea Trocar & Dilator 18 cm
1 pcs	Frazier Suction Tube, 19 cm, Angled
1 pcs	Jackson Trachea Retractor 15 cm
1 pcs	Trousseau Trachea Trocar, Dilator 14 cm
1 pcs	Chevalier Jackson Trachea Tube 50 mm, D 5 mm, Fig 1
1 pcs	Chevalier Jackson Trachea Tube 55 mm, D 6 mm, Fig 2
1 pcs	Chevalier Jackson Trachea Tube 75 mm, D 10 mm, Fig 6
1 pcs	Chevalier Jackson Trachea Tube 80 mm, D 11 mm, Fig 7
1 pcs	Sterilization Container Aluminium 350 x 180 x 85 mm

# ENDO

## ENDO Herniotomy Set Open Surgery



## ENDO

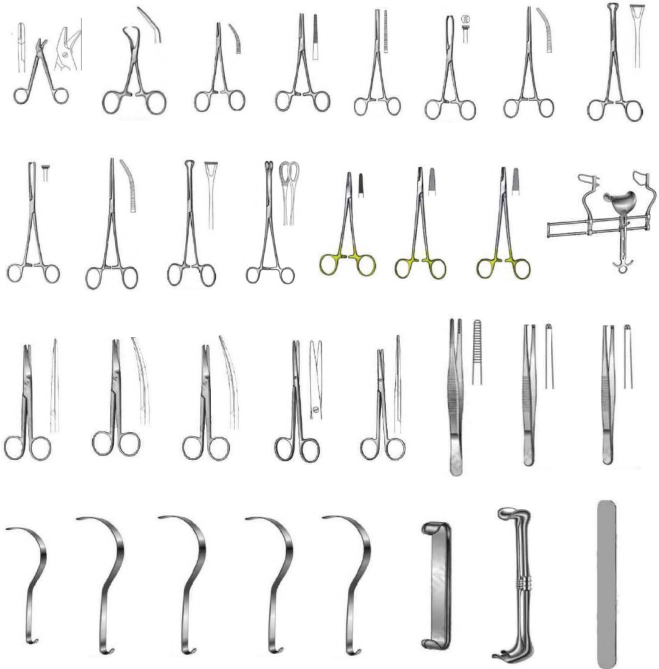
## ENDO Herniotomy Set

Open Surgery

### Instrument Set

1 pcs	Forceps Narrow Dress 14.5 cm
1 pcs	Standard Forceps 1x2 T. 14.5 cm
1 pcs	Collin Duval Forceps 20 cm, 14 mm
1 pcs	Butterfly Grooved Director 14 cm
1 pcs	Farabeuf Retractor 12 cm
1 pcs	Parker Langenbeck 21 cm (set of 2)
2 pcs	Collin Tongue Holding Forcep 17 cm
2 pcs	Crafoord Sellors Ligature Forcep 24.5 cm
6 pcs	Backhaus Towel Forcep 13 cm
4 pcs	Kocher Nippon Forcep 14.5 cm, 1:2, CVD
4 pcs	Rochester Ochsner Forcep 16 cm, CVD
4 pcs	Crile Forcep Delicate 14 cm, STR
2 pcs	Foerster Forcep 25 cm, STR
4 pcs	Potts Smith Tissue Forcep 21 cm, 1:2
2 pcs	Allis Baby Tissue & Holding FCP 13 cm, 3:4
1 pcs	Standard Scissors 14.5 cm, BL/BL, CVD
1 pcs	Standard Scissors, BL/SH STR, 14.5 cm
1 pcs	Scalpel Handle No. 4
1 pcs	Mayo Hegar Needle Holder 20 cm
1 pcs	Reverdin Needle 19.5 cm
2 pcs	Retractor Depressor 250 x 25 mm
1 pcs	Sterilization Container Aluminium 350 x 180 x 85 mm

## ENDO

**ENDO Mayor Basic Surgery Set**  
Open Surgery

# ENDO

## ENDO Mayor Basic Surgery Set

Open Surgery



## ENDO

## ENDO Mayor Basic Surgery Set

### Open Surgery

#### Instrument Set

1 pcs Poole Aspiration Tube 10 mm/ 30Fr 23 cm	1 pcs Richardson Retractor 24 cm, 36 x 28 mm
1 pcs Poole Aspiration Tube 8 mm / 23 Fr 23 cm	1 pcs Kelly Retractor 26 cm, 65 x 50 mm
1 pcs Scalpel Handle Standard Fig 3	1 pcs Haberer General Instrument 33 cm, 40 mm
1 pcs Scalpel Handle No. 4	1 pcs Deaver Retractor 18 cm, 19 mm
1 pcs Mayo Scissor 17 cm BL/BL, STR	1 pcs Deaver Retractor 30 cm, 25 mm
1 pcs Mayo Scissor 14 cm BL/BL, CVD	1 pcs Deaver Retractor 33 cm, 25 mm
1 pcs Mayo Scissor 17 cm, BL/BL, CVD	1 pcs Deaver Retractor 36 cm, 25 mm
1 pcs Metzenbaum Scissors 14.5 cm, BL/BL, STR	1 pcs Deaver Retractor 31 cm, 50 mm
1 pcs Metzenbaum Fino Scissor 18 cm, STR	1 pcs Volkmann Retractor 23 cm, SH 4 Prong
1 pcs Universal Wire Cutter Scissor 12 cm	1 pcs Balfour Retract 70 x 85 mm, 35 x 100 mm
1 pcs Standard Narrow Forcep 14.5 cm	1 pcs Ochsner Trocar 14 cm, D = 4 mm
1 pcs Standard Forceps 1x2 T. 14.5 cm	1 pcs Crile Wood Needle Holder 15 cm TC
1 pcs Standard Tissue Forcep 20 cm, 1:2	1 pcs Mayo Hegar Needle Holder TC 18 cm TC
1 pcs Halsted Mosquito Forcep 12 cm, CVD	1 pcs Mayo Hegar Needle Hldr 20 cm, 0.5mm TC
1 pcs Kelly Forcep Delicate 14 cm, STR	1 pcs Deschamps Ligature 20 cm BL, CVD (R)
1 pcs Rochester Pean Forceps 16 cm, CVD	1 pcs Deschamps Ligature 20 cm BL, CVD (L)
1 pcs Rochester Pean Forcep 18 cm, CVD	1 pcs Allis Baby Forcep 15 cm, 4:5
1 pcs Rochester Ochsner Forcep 16 cm, STR	1 pcs Thoms Allis Forcep 6:7
1 pcs Backhaus Towel Forcep 13 cm	1 pcs Babcock Seizing Forceps 16 cm
1 pcs Foerster Forceps 25 cm, STR	1 pcs Babcock Forcep 20 cm, STR
1 pcs Parker Retractor 13.5 cm	1 pcs Probe & Seeker Fig 1 16 cm, 2 mm
1 pcs Richardson Eastman Retractor Set of 2	1 pcs Sterilization Container Aluminium



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## ENDO Abdominal Operation Set

Open Surgery



## ENDO

## ENDO Abdominal Operation Set

## Open Surgery

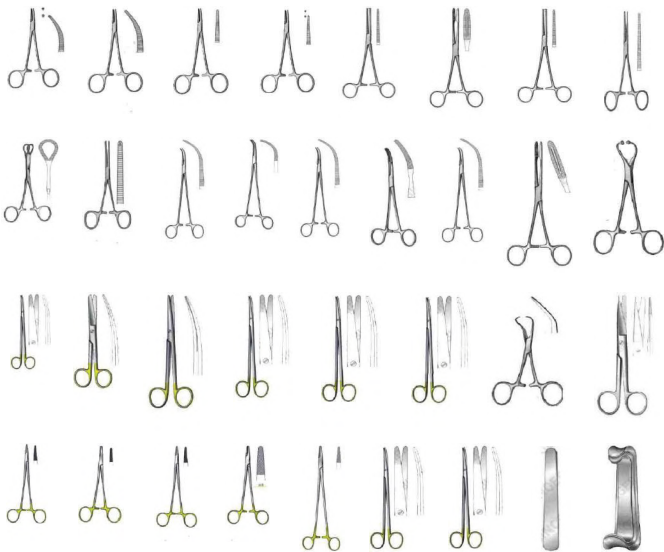
Surgical instruments used in the operation of the abdomen, the item products as below :

## Instrument Set

1 pcs Scalpel Handle No. 4	1 pcs Volkmann Retractor 23 cm, SH, 4 Prong
1 pcs Metzenbaum Scissor 23 cm, BL/BL	1 pcs Israel Retractor 25 cm, 50 x 60 mm
1 pcs Metzenbaum Fino Scissor 25 cm CV TC	1 pcs Richardson Eastman Retractor set of 2
1 pcs Standard Tissue Forcep 11.5 cm 2:3	1 pcs Deaver Retractor 21.5 cm, 22 mm
1 pcs Cushing Forcep 17.5 cm STR	1 pcs Deaver Retractor 30 cm, 38 mm
1 pcs Standard Tissue Forcep 25 cm, 1:2	1 pcs Deaver Retractor 30 cm, 25 mm
1 pcs Waugh Forcep 20 cm, 1:2	1 pcs Deaver Retractor 31 cm, 75 mm
1 pcs Russ Model Forcep 20 cm	1 pcs Deaver Retractor 31 cm, 50 mm
1 pcs Backhaus Towel Forcep 13 cm	1 pcs Mikulicz Retractor 26cm, 90 x 50 mm
1 pcs Crile Forceps 14 cm, CVD	1 pcs Mikulicz Retractor 26 cm, 95 x 35 mm
1 pcs Halsted Mosquito Forcep 18 cm, STR	1 pcs Kelly Retractor 27 cm, 190 x 38 mm
1 pcs Spencerwells Forcep 18 cm STR	1 pcs Haberer General Instrument 30 cm, 37/45
1 pcs Rochester Pean Forcep 24 cm	1 pcs Gosset Abdominal Retractor 63 mm, 160 mm
1 pcs Moynihan Hysterect Forcep 23 cm	1 pcs Balfour Retractor 70 x 85 mm, 35 x 100 mm
1 pcs Mixer Forcep 23 cm	1 pcs Thoms Allis Forcep 6:7
1 pcs Mikulicz Peritoneal Forcep 20 cm	1 pcs Probe Fig 1 20 cm, 8
1 pcs Faure Vaginal Forcep 20 cm 1:2	1 pcs Metzenbaum Fino Scissor 25 cm CV TC
1 pcs Mayo Hegar Needle Holder 20 cm	1 pcs Sterilization Container Aluminium
1 pcs Parker Langenbeck 21 cm (set of 2)	

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## ENDO Laparotomy Set Open Surgery



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**ENDO Laparotomy Set**  
Open Surgery

## ENDO Laparotomy Set

### Open Surgery

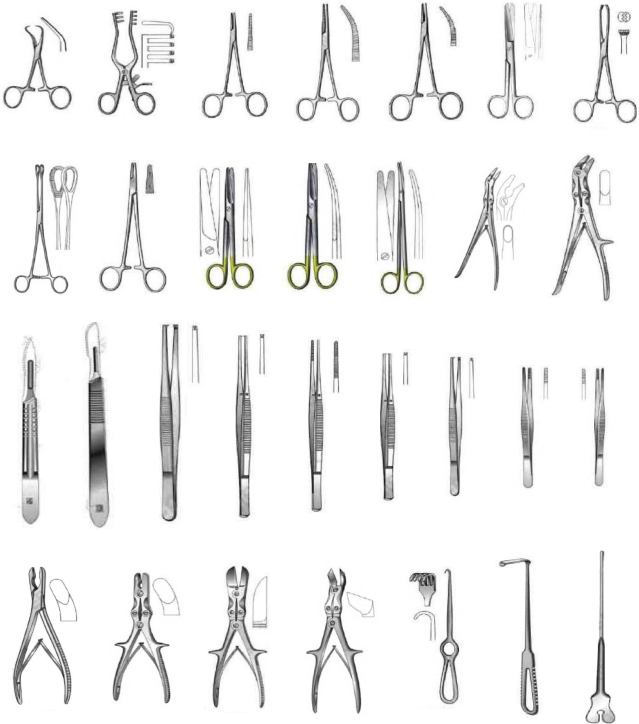
ENDO Laparotomy set is a set of instruments used in open surgery.

#### Instrument Set

1 pcs Gross Maier Forcep 25 cm, CVD	1 pcs Gross Maier Forcep 25 cm, STR
1 pcs Backhaus Towel Forcep 11 cm	1 pcs Mikulicz Peritoneal Forcep 20 cm
1 pcs Ball Socket Forcep 11 cm for paper cloths	1 pcs Overholt Feissendoerfer Forcep 21 cm
1 pcs Scalpel Handle No. 4	1 pcs Overholt Ligature Forcep 29.5 cm
1 pcs Scalpel Handle No. 4L Solid STR	1 pcs Overholt Geissendoerfer Forcep 27 cm
1 pcs Scalpel Handle Standard, Fig 3	1 pcs Mixer Forcep 23 cm
1 pcs Metzenbaum Scissors 15 cm TC, CVD	1 pcs Deschamps Needle 21 cm BL CVD to L for R
1 pcs Metzenbaum Scissors 18 cm TC, CVD	1 pcs Koenig Needle 19.5 cm, 4.5 mm
1 pcs Metzenbaum Scissors 20 cm BL/BL, CVD TC	1 pcs Crile Wood Needle Holder 15 cm TC
1 pcs Metzenbaum Sciss, CVD TC 23cm, BL/BL TC	1 pcs Mayo Hegar Needle Hldr 20 cm, 0.5 mm TC
1 pcs Metzenbaum Scissors 25cm, BL/BL, CVD TC	1 pcs Wangersteen Needle Holder 27 cm TC
1 pcs Metzenbaum Scissor 28 cm, BL/BL, CVD TC	1 pcs De Bakey Needle Holder 18 cm, 0.4 mm TC
1 pcs Standard Scissor 18 cm, BL/BL, CVD, TC	1 pcs De Bakey Needle Holder 26 cm, 0.4 mm TC
1 pcs Mayo Lexer Scissor 16 cm, BL/BL, CVD, TC	1 pcs Roux Retractor Set
1 pcs Standard Scissors, BL/SH STR. 14.5 cm	1 pcs Langenbeck Retractor 21 cm, 30x14 mm
1 pcs Standard Narrow Forcep 14.5 cm	1 pcs Langenbeck Retractor 21 cm, 40x11 mm
1 pcs Standard Forceps 1x2 T. 14.5 cm	1 pcs Kocher Lengenbeck Retrac 21.5 cm, 55x11
1 pcs Standard Tissue Forcep 20 cm, 1:2	1 pcs Volkman Retract, 21.5 cm, BL, 4 PR
1 pcs Standard Tissue Forcep 25 cm, 1:2	1 pcs Fritsch Retractor 24 cm, 45x75 mm
1 pcs De Bakey Tissue Forcep 16 cm, 2 mm	1 pcs Mikulicz Retractor 26 cm, 120x50 mm
1 pcs De Bakey Forcep 20 cm, W = 2 mm	1 pcs Haberer General Instrument 30 cm, 37/45
1 pcs De Bakey Forcep 24 cm, W = 2 mm	1 pcs Kirschner Square (Complete Set)
1 pcs Gerald Forcep 17 cm, 1:2 STR	1 pcs Coeur Organ Holding Forcep 22 cm
1 pcs Kocher Forcep 14 cm, 1:2 STR	1 pcs Volkman Bone Curette Fig = 0
1 pcs Pean Artery Forcep 13.5 cm, STR	1 pcs Butterfly Grooved Director 14 cm
1 pcs Halsted Mosquito FCP 12.5 cm, 1:2 CVD	1 pcs Probe Fig. 1 20 cm, 8
1 pcs Halsted Mosquito Forceps, CVD 12.5 cm	1 pcs Probe & Seeker Fig. 1 25 cm, 2 mm
1 pcs Halsted Mosquito Forceps 18 cm STR	1 pcs Redon Needle 19.5 cm, 12 Charr
1 pcs Halsted Mosquito Forcep 18 cm, 1:2 STR	1 pcs Redon Needle 19.5 cm, 14 Charr
1 pcs Rochester Ochsner Forcep 20 cm, STR	1 pcs Sterilization Container Aluminium
1 pcs Rochester Ochsner Forcep 24 cm, STR	400 x 200 x 130 mm

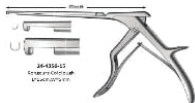
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## ENDO Laminectomy Set Open Surgery



# ENDO

## ENDO Laminectomy Set Open Surgery



## ENDO

## ENDO Laminectomy Set

### Open Surgery

Laminectomy instruments set for back surgeries used for lumbar spinal stenosis. Instruments are organised in general order of use.

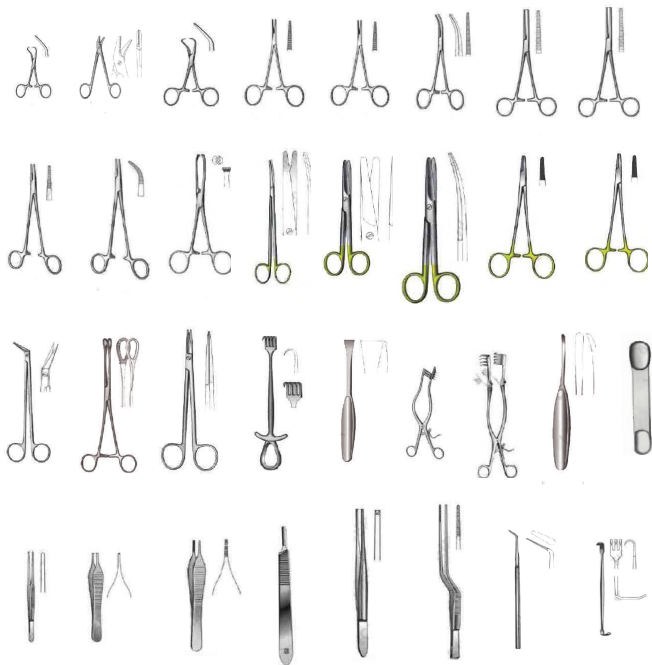
#### Instrument Set

1 pcs Scalpel Handle Standard Fig 3	1 pcs Mayo Hegar Needle Holder 16 cm
1 pcs Scalpel Handle No. 4	1 pcs Luer Rongeur Forcep 17 cm, CVD
1 pcs Scalpel Handle No. 7 16 cm	1 pcs Stille Luer Rongeur 22 cm, Bite 4 mm, CVD
1 pcs Standard Scissors 14.5 cm, BL/BL, STR	1 pcs Stille Bone Rongeur Forcep 23 cm
1 pcs Mayo Scissors Curved 17.0 cm TC	1 pcs Lexsell Bone Rongeur FCP 23 cm, 8x13 mm 50 degree
1 pcs Mayo Scissor, Strt TC 17 cm BL/BL TC	1 pcs Stille Liston Bone Cut FCP 27 cm, STR
1 pcs Metzenbaum Scissors 18 cm TC CV	1 pcs Liston Key Bone Cut FCP 27 cm
1 pcs Forceps Narrow Dress 14.5 cm	1 pcs Williger Mallet L=24cm,W=340G,D=28mm
1 pcs Standard Dressing Forcep 20 cm	1 pcs Langenbeck Elevators 19cm , 16mm, Fig 1
1 pcs Standard Forceps 1x2 T. 14.5 cm	1 pcs Langenbeck Elevators L=20cm, W=8mm
1 pcs Standard Tissue Forcep 20 cm, 1:2	1 pcs Dandy Nerve Hook 20 cm
1 pcs Taylor Tissue Forcep 17 cm, T = 1:2	1 pcs Sachs Dissector 21 cm
1 pcs Taylor Dressing Forcep 17 cm	1 pcs Penfield Dissector 17.5 cm
1 pcs Taylor Tissue Forcep 17 cm, T = 1:2	1 pcs Penfield Dissector 21.5 cm
1 pcs Halsted Mosquito Forceps 12.5 cm, STR	1 pcs Penfield Dissector 29 cm
1 pcs Halsted Mosquito Forceps, CVD 12.5 cm	1 pcs Frazier Suction Tube D=3.5mm, FR=10
1 pcs Crile Rankin Forceps 16 cm, CVD	1 pcs Frazier Suction Tube D=4.6mm, FR=14
1 pcs Backhaus Towel Forcep 13 cm	1 pcs Rongeurs Colclough L=15cm, W=5mm
1 pcs Foerster Forceps 25 cm, STR	1 pcs Rongeurs Colclough L=15cm, W=5mm
1 pcs Langenbeck Retractor Blade 22 x 6 mm	1 pcs Rongeurs Colclough L=15cm, W=5mm
1 pcs Volkman Retractor, 21.5 cm, BL, 4 PR	1 pcs Allis Forceps 15 cm 5 x 6
1 pcs Weitlaner Retractor 20 cm, T = 3 : 4 SH	1 pcs Sterilization Container Aluminium
1 pcs Larry Groove Diractor 18 cm	

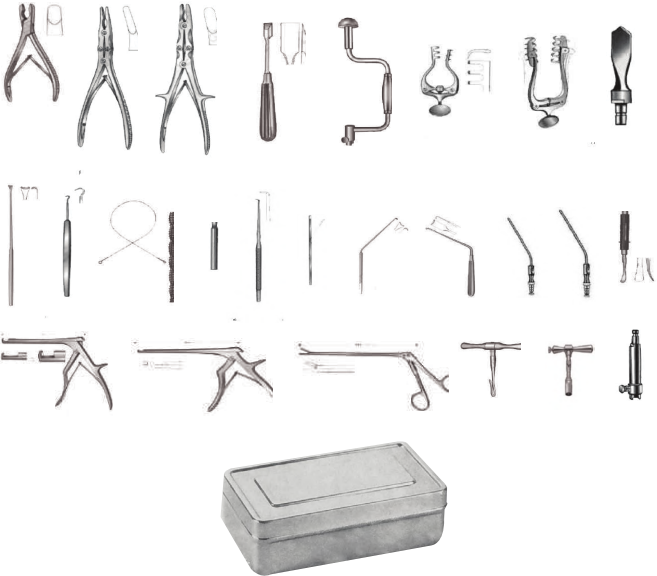


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## ENDO Craniotomy Set Open Surgery



## ENDO

**ENDO Craniotomy Set**  
Open Surgery

## ENDO

## ENDO Craniotomy Set

### Open Surgery

#### Instrument Set

1 pcs Frazier Suction Tube 19 cm, Angled	1 pcs Love Nerve Root Retr 19 cm Straight
1 pcs Frazier Suction Tube 19 cm, CVD CH	1 pcs Cushing Brain Spoon 17 cm
1 pcs Scalpel Handle Standard, Fig 3	1 pcs Dandy Nerve Hook 20 cm
1 pcs Adson Forceps 12 cm, Serrated	1 pcs Frazier Dura Dissector
1 pcs Adson Forceps 1x2 Teeth 12 cm	1 pcs Frazier Hooklet (Dura) Sharp 13 cm
1 pcs Semken Forceps 15 cm, 1:2	1 pcs Colclough Rongeur, 3 mm, 15 cm
1 pcs Cushing Forceps 17 cm, STR 1:2	1 pcs Ferris Smith Kerrison Rongeur 18 cm
1 pcs Taylor Dressing Forcep 18.5 cm	1 pcs Cushing Forceps 2x10, 18.0 cm
1 pcs Micro Mosquito Forcep 12 cm, STR	1 pcs Adson Dura Hook 20 cm, 5 mm, SH
1 pcs Micro Mosquito Forceps 12 cm 1:2 STR	1 pcs Freer Septum Elevat, 16 cm, Doub-End
1 pcs Dandy Artery Forcep 14 cm	1 pcs Allis Baby Forcep 15 cm, 4:5
1 pcs Roch Ochsner Forceps 16 cm, 2x1	1 pcs Gigli Wire Saw 50 cm
1 pcs Rochester Ochsner FCP 18 cm, STR 1:2	1 pcs Gigli Saw Handle (Pair)
1 pcs Adson Forcep 18 cm, STR	1 pcs Hudson Hand Drill Brace Only 27 cm
1 pcs Adson Forcep 18 cm, Half CVD	1 pcs Hudson Drill Bur Onlu (Extension Piece)
1 pcs Backhaus Towel Forcep 9 cm	1 pcs Adson Elevator 17 cm
1 pcs Backhaus Towel Forcep 13 cm	1 pcs Hudson Drill Burr 14 cm
1 pcs Senn Mueller Retract 16cm, 7x8.5mm, SH	1 pcs Cushing Periosteal Elevators 17 cm, 4 mm
1 pcs Murphy Retractor 19cm, 4 PR, SH	1 pcs Langenbeck Elevators 19cm, 16mm, Fig 1
1 pcs Jansen Wagner Wound Spread 10 cm	1 pcs Luer Rongeur Forcep 17 cm STR
1 pcs Jansen Wound Spreaders 10 cm, BL	1 pcs Zaufal Jansen Bone Rongeur 18 cm, CVD
1 pcs Adson Baby Wound 20 cm, SH 3:4	1 pcs Still Bone Rongeur Forcep 23 cm
1 pcs Beckmann Spread 31cm, SH, 4x4T	1 pcs Mayo Scissor 14.5 cm, BL/BL, STR TC
1 pcs Foerster Forceps 25 cm, STR	1 pcs Mayo Scissor 14.5 cm, BL/BL, CVD TC
1 pcs Kelly Scissor 16 cm, STR	1 pcs Metzenbaum Scissor 18 cm TC CVD
1 pcs Potts Smith Scissor 19cm, STR, SH/SH 25°	1 pcs Crile Wood Needle Holder 15 cm TC
1 pcs Universal Wire Cutter Scissor 12 cm	1 pcs Crile Wood Needle Holder 18 cm TC
1 pcs Love Nerve Root Retr 19 cm Ang 45°	1 pcs Martel Conductor 33 cm, Saw Guide
1 pcs Scoville Brain Spatula 20 cm	1 pcs Sterilization Container Aluminium 400 x 200 x 130 mm
1 pcs Hudson Trephine 10 cm, 19 mm	





## ENDO

## ENDO Amputation Set

Open Surgery

## Instrument Set

1 pcs Frazier Suction Tube 19 cm, CVD, CH	1 pcs Key Osteotome 21 cm
1 pcs Frazier Suction Tube D=3 mm, FR=9	1 pcs Combination Mallet 19cm, 26mm, 90Z
1 pcs Scalpel Handle Standard, Fig 3	1 pcs Adson Elevator 17 cm
1 pcs Scalpel Handle No. 4	1 pcs Ruskin Bone Rongeur FCP 15 cm, STR 2mm
1 pcs Standard Forcep 16 cm, 1:2	1 pcs Ruskin Liston Bone Cutting FCP, 18 cm, STR
1 pcs Standard Forcep, 16 cm, 4:5	1 pcs Mayo Scissor 14.5 cm, BL/BL, STR TC
1 pcs Adson Forceps 12 cm, Serrated	1 pcs Mayo Scissor 14.5 cm, BL/BL CVD TC
4 pcs Halsted Mosquito Forceps 12.5 cm, STR	1 pcs Metzenbaum Scissor 18 cm TC CV TC
4 pcs Halsted Mosquito Forceps, CVD 12.5 cm	1 pcs Webster Needle Holder 13 cm, TC
6 pcs Kelly Forceps 14 cm, CVD	1 pcs Crile Wood Needle Holder 15 cm TC
4 pcs Rochester Ochsner Forcep 14 cm, STR	1 pcs K-Wire Ruler 15 cm, mm / inch
6 pcs Backhaus Towel Forcep 13 cm	1 pcs Liston Amputating Knife, 20 cm
1 pcs Parker Langenbeck 21 cm (set of 2)	1 pcs Martel Conductor 33 cm, Saw Guide
1 pcs Hibbs Retractors 22 cm, 25 x 75 mm	1 pcs Putti Bone File 27 cm
1 pcs Senn Mueller Retract 16 cm, 7 x 8.5mm, SH	1 pcs Gigli Wire Saw 50 cm
1 pcs Senn Mueller Retract 16cm, 7x8 5mm, BL	2 pcs Gigli Saw Handle (Pair)
1 pcs Volkmann Retract 21.5 cm, 2 PR, SH	1 pcs Satterlee Amputating Saw, 30 cm, 23 cm
1 pcs Volkmann Retract 21.5 cm, 3 PR, SH	1 pcs Hibbs Osteotome 24 cm, 6 mm STR
1 pcs Langenbeck Retract 22 cm, 30x11 mm	1 pcs Hibbs Osteotome 24 cm, 13 mm STR
1 pcs Langenbeck Retract 22 cm, 30x14 mm	1 pcs Hibbs Osteotome 24 cm, 19 mm STR
1 pcs Weitlaner Retract SH 14 cm	1 pcs Hibbs Osteotome 24 cm, 25 mm STR
1 pcs Weitlaner Retract Blunt 14 cm	1 pcs Hibbs Osteotome 24 cm, 32 mm STR
1 pcs Freer Septum Elevat 16 cm, Doub-End	1 pcs Langenbeck Elevator 19 cm, 16 mm, Fig 2
2 pcs Joseph Single Skin Hook 15 cm, SH	1 pcs Luer Rongeur Forcep 17 cm STR
4 pcs Allis Baby Forcep 15 cm, 4:5	1 pcs Liston Bone Cutting Forceps 19 cm, STR
1 pcs Lister Bandage Scissor 14 cm	2 pcs Joseph Double Hook 16cm, W=7 mm, SH
1 pcs Key Osteotome 19 cm	1 pcs Sterilization Container Aluminium

## ENDO Circumcision Set

Open Surgery



a set of instruments used for circumcision.

### Instrument Set

- |       |  |
|-------|--|
| 2 pcs | Sponge Holding Forceps Foerster Serrated STR 25 cm, 10"                                      |
| 1 pcs | Scalpel Handle Standard No. 3 Solid  |
| 1 pcs | Scissors TC Mayo Stille CVD 15 cm, 6"  |
| 1 pcs | Scissors TC Metzenbaum CVD 18 cm, 7"   |
| 1 pcs | Operating Scissors Standard Fig 2 SH/BL STR 14.5 cm, 5 1/2"                                  |
| 1 pcs | Dressing Forceps Standard STR 14.5 cm, 5 1/2"  |
| 1 pcs | Tissue Forceps 1x2 T STR 14.5 cm, 5 1/2"   |
| 1 pcs | Dressing Forceps Adson STR 12 cm, 4 3/4"   |
| 1 pcs | Tissue Forceps Adson 1.2 mm, 1x2 T 12 cm 4 1/2"  |
| 4 pcs | Intestinal and Tissue Grasping Forceps Allis 5x6 T 15 cm, 6"                                 |
| 6 pcs | Hemostatic Forceps Halstead Mosquito STR 12.5 cm, 5"   |
| 6 pcs | Hemostatic Forceps Halstead Mosquito CVD 12.5 cm, 5"   |
| 1 pcs | Directors Grooved 14.5 cm, 5 1/2"  |
| 1 pcs | Probes with Eye Diameter 2.0 mm 14.5 cm, 5 1/2"  |
| 1 pcs | Needle Holder TC Crile Wood 15 cm, 6"  |
| 1 pcs | Sterilization Container Aluminium 310 x 190 x 65 mm.<br>Include 2 permanent textile filters. |



## Pulsar MB350

Electrosurgical Unit (ESU)



### Pulsar MB350

- Pulsar MB350 provided with all the performance needed for the monopolar or bipolar use in open or laparoscopic surgery  
Pulsar MB350 also allows the users to memorize up to 33 programs for all surgical needs and 6 specific programs for the use in saline with mini resectoscopes and bipolar instruments 5 Fr.

### E.N.T.

- Electronic generator : Complying with IEC 60601-1 and IEC 601-2-2 Standards. (Class I - Type CF).
- EC Approval: CE 0051 - Certificate 1665/MDD.
- Monopolar and Bipolar working frequency: 440kHz±10%.
- Output circuit: "Floating out", insulated from earth at the high and low frequencies, protected against the use of the defibrillator.
- Foot-switch: Twin water-proof foot-switch (IPN8).
- Monopolar use: By 1 or 2 pencils / instruments with hand or foot switched activation.
- Bipolar use : By 1 instrument with foot switched activation.
- Auto-check system : By twin microprocessor with auto-check at the switching on, continuous control during the functioning and block of the power delivery with information of users by Error codes in case of problems or faults.
- Neutral dising sential for the wor cousie and visual alarm signal.
- Mains and Absorption: 230V ~ 50 Hz- 828 VA.
- Fusibili di rete: T 2x5 A.
- Dimensions and weight: 38x35x17cm - 15Kg



## High Speed Motor Micro System

High Speed Motor



## HSM Neuro System

High Speed Motor



### Micro System

- Graphical LCD on the power console shows adjusted motor speed, rotation direction, irrigation pump flow rate, pedal motor connection failure indicator.
- Barled display shows speed demandFoot pedal for speed, direction and irrigation control
- Autoclavable swiss made powerful brushless DC motor
- Adjustable speed range up to 40.000 RPM  
Under load motor start-up technology preventing the failures related to motor obstruction during operation
- Low cost of consumable irrigation pump

### Power Console

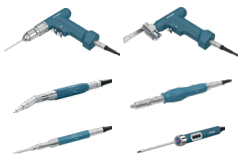
- Operating speed : 40.000 pm (Adjustable Maximum Speed)
- Operating voltage: 200-240 VPower: 260 W
- Irrigation flow rate: 100 ml/min (AdjustableMaximum Flow Rate)Frequency: 50-60 HzDimension: 350 x 280 x 110 mmWeight: 5.060 kg

### Features

- Adjustable speed range up to 90.000 RPM!Comfortable operation possibility thanks to ergo dynamic positioning of the center of gravity
- Under load motor start-up technology preventing the failures related to burr obstruction during craniotomy!Opportunity of pediatric-adult craniotomy and laminectomy with single attachment
- The design allowing to minimize the costs of service on Dura protector feet deformations
- Color-protecting technology against discoloration of attachments connected to all sterilization techniques such as autoclave, EO
- Burr, attachment, motor change in a few seconds thanks to easy/connect technology for starting-up the system fast and easily.
- Motor and motor cable wears and socket failures are minimized thanks to special locking system. Low cost of consumable irrigation pump

## Scoren Surgical Power System

### Surgical Power System



#### Features

- 10.1 inch large wide view colourful display with capacitive touch screen
- The ability to instantly display the Speed, Pedal and Torque values of the handpieces
- Special for each handpiece; Torque, Pedal, Oscillation, Irrigation setting menus
- Automatic activation/deactivation of menus based on handpieces properties
- Precise speed, torque and oscillation adjustment
- Ability to change settings during operation
- Menu with LED status indicator and power button
- Quick opening feature
- High performance operation, real-time response and fast switching between screens
- High user experience, visually enriched interface
- Possibility to use cables up to 5 m long
- Speed regulation function
- Advanced motor error management
- Control can be done with buttons and triggers on the handpieces
- A single console can be used in various operations, meeting different needs and providing ease of use to the operator.

#### Handpiece Speed and Direction

- The motor can be adjusted at the desired speed
- Instant display of speed values
- Ability to adjust motor rotation direction via touch screen and pedal
- Ability to see the motor direction on the screen

#### Torque Properties

- Automatic torque adjustment according to the recognized handpiece
- Manual and precise torque adjustment
- Predefined torque settings; Cranial mode, Spinal mode, Metal cutter and Light mode

#### Oscillation Properties

- Automatic oscillation adjustment according to recognized handpiece
- Special oscillation setting for screwing and tapping operations
- Configuring the oscillation setting Light, Medium, Aggressive modes for Shaver handpiece

# ORTHOPAEDICS PRODUCT LIST



- ACL / PCL Recontruction
- Arthroplasty Hip System
- Arthroplasty Knee System
- Arthroplasty Revision Knee
- System Balloon Kyphoplasty
- Bi-Fix & Loopix
- Bone Cement
- Bone Injection Needle
- Click Off & Twin
- Elastic Intramedullary Nail External
- Fixator
- Fiberglass Casting Tape
- Fixit
- Interlocking Nails
- Maxillofacial Implant Set
- Mendec Spine
- Pedicle Screw
- PEEK Cage
- Plaster of Bandage
- Preformed Spacer
- Pulse Lavage
- Surgical Motor System
- Synthetic Splint
- Trauma Implants



## Trauma Implant

Titanium, Mini Fragment



Mini T-Plate Ø 1.5 mm

Article No.	Holes
02.11121.003	3/9
02.11121.004	4/9



L-Plate 90° Ø 2.7 mm

Article No.	Holes
03.11090.003	2/2 (Right)
03.11090.103	2/2 (Left)



Mini T-Plate Ø 2.0 mm

Article No.	Holes
02.11151.003	3/9
02.11151.004	4/9



Mini L-Plate 110° Ø 2.0 mm

Article No.	Holes
02.11110.002	2/2 (Right)
02.11110.102	2/2 (Left)



Mini T-Plate Ø 2.0 mm

Article No.	Holes
02.11111.002	2/2



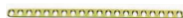
L-Plate 110° Ø 2.7 mm

Article No.	Holes
03.11110.003	2/3 (Right)
03.11110.103	2/3 (Left)



T-Plate Ø 2.7 mm

Article No.	Holes
03.11131.003	2/3



Mini Plate Ø 1.5 mm, Straight

Article No.	Holes
02.11041.020	20



Mini L-Plate 90° Ø 2.0 mm

Article No.	Holes
02.11090.002	2/2 (Right)
02.11090.102	2/2 (Left)

## Trauma Implant Titanium, Mini Fragment



Mini Plate Ø 2.0 mm, Straight

Article No.	Holes
02.11051.020	20



Mini Compression Plate Ø 2.0 mm

Article No.	Holes
02.11515.004 - 02.11515.008 (interval : 1)	4 - 8



Mini Plate Ø 2.0 mm, Straight

Article No.	Holes
02.11510.003 - 02.11510.006 (interval : 1)	3 - 6



1/4 Tubular Plate

Article No.	Holes
03.11140.003 - 03.11140.008 (interval : 1)	3 - 8



Washer Ø 7.0 mm, for screw Ø 2.7 to 4.0 mm

Article No.	Outside Diameter
03.11090.003	2/2 (Right)
03.11090.103	2/2 (Left)



Cortical screw Ø 1.5 mm, Self Tapping

Article No.	Screw Length (mm)
02.03315.006 - 02.03315.012 (interval : 1)	6 - 12 mm
02.03315.014 - 02.03315.022 (interval : 2)	14 - 22 mm



Cortical Screw Ø 2.0 mm, Self Tapping

Article No.	Screw Length (mm)
02.03420.006 - 02.03420.022 (interval : 2)	6 - 22 mm



Cortical Screw Ø 2.7 mm, Self Tapping

Article No.	Screw Length (mm)
03.03527.006 - 03.03527.024 (interval : 2)	6 - 24 mm



## Trauma Implant

Titanium, Small Fragment



Locking T-Plate Ø 3.5 mm

Article No.	Holes
03.15101.003	3/3
03.15101.004	4/4
03.15101.005	3/5



Locking T-Plate Oblique Ø 3.5 mm

Article No.	Holes
03.15102.003 - 03.15102.005 (interval : 1)	3 - 5



Locking Compression Plate Ø 3.5 mm, Undercut  
(Locking Plate, Straight)

Article No.	Holes
03.15114.004 - 03.15.114.012 (interval : 1)	4 - 10, 12



Locking Clavicle Plate

Article No.	Holes
14.15100.006 - 008 (interval : 2)	6 - 8 Minimum Bend (Right)
14.15100.106 -108 (interval : 2)	6 - 8 Minimum Bend (Left)
14.15101.006 - 008 (interval : 2)	6 - 8 Minimum Bend (Right)
14.15101.106 - 108 (interval : 2)	6 - 8 Minimum Bend (Left)
14.15102.006 - 008 (interval : 2)	6 - 8 Minimum Bend (Right)
14.15102.106 - 108 (interval : 2)	6 - 8 Minimum Bend (Left)



Locking 1/3 Tubular Plate Ø 3.5 mm

Article No.	Holes
03.15130.004 - 03.15130.012 (interval : 1)	4 - 10, 12



Locking Cloverleaf Plate Ø 3.5 mm

Article No.	Holes
03.15402.003 - 03.15402.004 (interval : 1)	3 - 4



Winstar - R Locking Distal Radius Plate, 3 Holes

Article No.	Holes
10.11915.102 - 10.11915.104 (interval : 2)	2 - 4 (Right)
10.11915.202 - 10.11915.204 (interval : 2)	2 - 4 (Left)



Locking Reconstruction Plate Ø 3.5 mm

Article No.	Holes
06.15103.004 - 06.15103.014 (interval : 1)	6 - 10, 12, 14



winstar - R Locking Distal Radius Plate, 5 Holes

Article No.	Holes
10.11915.502 - 504 (interval : 2)	2 - 4 (Right)
10.11915.602 - 604 (interval : 2)	2 - 4 (Left)

## Trauma Implant Titanium, Small Fragment



Washer  $\varnothing$  7.0 mm, for screw  $\varnothing$  2.7 to 4.0 mm

Article No.	Outside Diameter
03.91000.070	7.0 mm



Cortical Screw  $\varnothing$  2.7 mm, Self Tapping

Article No.	Screw Length (mm)
0303527.006 - 060 (interval : 2)	6 - 60 mm



Cortical Screw  $\varnothing$  3.5 mm, Self Tapping

Article No.	Screw Length (mm)
03.03612.010 - 050 (interval : 2)	10 - 50 mm
03.03612.055 - 080 (interval : 5)	55 - 80 mm



Cancellous Screw  $\varnothing$  3.5 mm,  
Full Threaded, Self Tapping

Article No.	Screw Length (mm)
03.01635.010 - 050 (interval : 2)	10 - 50 mm
03.01635.055	55 mm



Cancellous Screw  $\varnothing$  4.0 mm, Full Thread

Article No.	Screw Length (mm)
03.01640.010 - 050 (interval : 2)	10 - 50 mm
03.01640.055 - 060 (interval : 5)	55 - 60 mm



Cancellous Screw  $\varnothing$  4.0 mm, Partial Thread

Article No.	Screw Length (mm)
03.01624.010 - 050 (interval : 2)	10 - 50 mm
03.01624.055 - 060 (interval : 5)	55 - 60 mm



Locking cortical Screw  $\varnothing$  3.5 mm, Self Tapping

Article No.	Screw Length (mm)
03.05612.010 - 040 (interval : 2)	10 - 40 mm
03.05612.045 - 080 (interval : 5)	45 - 80 mm



Locking Cortical Screw  $\varnothing$  2.7 mm, Self Tapping

Article No.	Screw Length (mm)
03.05527.010 - 040 (interval : 2)	10 - 40 mm
03.05527.045 - 060 (interval : 5)	45 - 60 mm



## Trauma Implant

### Titanium, Large Fragment



Locking Compression Plate Ø 4.5 / 5.0 mm  
Broad, undercut

Article No.	Holes
04.15170.006 - 018 (interval : 1)	6 - 18



Locking Compression Plate Ø 4.5 / 5.0 mm  
Narrow, Undercut

Article No.	Holes
04.15135.002 - 016 (interval : 1)	2 - 16



Locking T-Buttress Plate Ø 4.5 / 5.0 mm

Article No.	Holes
04.15172.004 - 006 (interval 1)	4 - 6
04.15172.008 - 010 (interval : 2)	8 - 10



Locking T-Plate Ø 4.5 / 5.0 mm

Article No.	Holes
04.15171.003 - 008 (interval : 1)	3 - 8
04.15171.010 - 012 (interval : 2)	10 - 12



Locking L-Buttress Plate Ø 4.5 / 5.0 mm

Article No.	Holes
04.15173.003 - 006 (interval : 1)	3 - 6 (Right)
04.15173.008	8 (Right)
04.15174.003 - 006 (interval : 1)	3 - 6 (Left)
04.15174.003	8 (Left)



Locking Proximal Tibial Plate Ø 4.5 / 5.0 mm, Lateral

Article No.	Holes
04.15310.005 - 013 (interval : 2)	5 - 13 (Right)
04.015311.005 - 013 (interval : 2)	5 - 13 (Left)



Locking Distal Femoral Plate Ø 4.5 / 5.0 mm

Article No.	Holes
04.15320.005 - 013 (interval : 2)	5 - 13 (Right)
04.15321.005 - 013 (interval : 2)	5 - 13 (Left)



Locking Cortical Screw Ø 5.0 mm, Self Tapping

Article No.	Screw Length (mm)
04.05755.016 - 060 (interval : 2)	16 - 60 mm
04.05755.065 - 100 (interval : 5)	65 - 100 mm



## Trauma Implant Titanium, Large Fragment



Cortical Screw  $\varnothing$  4.5 mm, Self Tapping

Article No.	Screw Length (mm)
04.03745.014 - 070 (interval : 2)	14 - 70 mm
04.03745.075 - 100 (interval : 5)	75 - 100 mm



Cancellous Bone Screw  $\varnothing$  6.5 mm, Full Thread

Article No.	Screw Length (mm)
04.03700.020 - 100 (interval : 5)	2 - 100 mm



Cancellous Bone Screw  $\varnothing$  6.5 mm, 16 mm Thread

Article No.	Screw Length (mm)
04.03716.025 - 100 (interval : 5)	25 - 100 mm



Cancellous Bone Screw  $\varnothing$  6.5 mm, 32 mm Thread

Article No.	Screw Length (mm)
04.03732.040 - 100 (interval : 5)	40 - 100 mm



Locking Cancellous Bone Screw  $\varnothing$  6.5 mm, Full Thread

Article No.	Screw Length (mm)
04.05800.020 - 100 (interval : 5)	20 - 100 mm

## Trauma Implant Titanium, Shoulder Fragment



Winsta - PH Humerus Locking Plate

Article No.	Holes
14.11133.003 - 007 (interval : 2)	3 - 7 (Right)
1411133.010 - 1012 (interval : 2)	10 - 12 (Right)
14.11133.103 - 107 (interval : 2)	3 - 7 (Left)
1411133.110 - 112 (interval : 2)	10 - 12 (Left)



Cortical Screw  $\varnothing$  3.5 mm, Self Tapping

Article No.	Screw Length (mm)
03.03612.010 - 050 (interval : 2)	10 - 50 mm
03.03612.055 - 080 (interval : 5)	55 - 80 mm



Winsta - PH Locking Cortical Screw  $\varnothing$  3.5 mm, Self Tapping

Article No.	Screw Length (mm)
14.03355.020 - 060 (interval : 2)	20 - 60 mm

# ENDO

## Interlocking Nail

### KTO Femoral Intramedullary Nail



Diameter (mm)	Length (mm)	Article No.
9,4	180 - 240 (interval : 20)	T82094180 - T82094240
	320 R/L - 440 R/L (interval : 20)	T82094320 - T82094440 R/L
10	180 - 240 (interval : 20)	T82010180 - T82010240
	320 R/L - 440 R/L (interval : 20)	T82010320 R/L - T82010440 R/L
11	180 - 240 (interval : 20)	T82011180 - T82011240
	320 R/L - 440 R/L (interval : 20)	T82011320 R/L - T8201140 R/L



Anti Rotation Screws

Diameter (mm)	Length (mm)	Article No.
6,5	60 - 115 (interval : 5)	8566460 - 85664115

## Interlocking Nail

### KTO Tibial Intramedullary Nail (Cannulated)



Diameter (mm)	Length (mm)	Article No.
8,4	255 - 375 (interval : 15)	T8684255 - T8684375
9,0	255 - 375 (interval : 15)	T8690255 - T8690375
10	255 - 375 (interval : 15)	T8610255 - T8610375



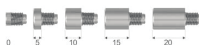
Ø4,5 Full Threaded Locking Screws

Diameter (mm)	Length (mm)	Article No.
4,5	30 - 85 (interval : 5)	8524030 - 8524085



Ø4.5 Full Threaded Locking Screws

Diameter (mm)	Length (mm)	Article No.
4,5	30 - 85 (interval : 5)	8524030 - 8524085



Main End Cap

Length (mm)	Article No.
0 - 20 (interval : 5)	8201001 - 8201005



Ø5.0 Full Threaded Locking Screws

Diameter (mm)	Length (mm)	Article No.
5,0	40 - 80 (interval : 5)	8515040 - 8515080



Normal End Cap

Article No.
8600001



Locking End Cap

Article No.
8600002

# ENDO

## Interlocking Nail

### KTO Humerus Intramedullary Nail



Diameter (mm)	Length (mm)	Article No.
7,0	120 - 280 (interval : 40)	T8870120 - T8870280
7,5	120 - 280 (interval : 40)	T8875120 - T8875280
8,0	120 - 280 (interval : 40)	T8880120 - T8880280



Ø3.5 Full Threaded Locking Screws

Diameter (mm)	Length (mm)	Article No.
3,5	20 - 46 (interval : 2)	T8920020 - T8920046

## Interlocking Nail

### KTO PFNA Gamma Nail



Diameter (mm)	Length (mm)	Article No.
9,4	180 - 240 (interval : 20)	T8794180 - T8794240
10	180 - 240 (interval : 20)	T8710180 - T8710240
11	180 - 240 (interval : 20)	T8711180 - T711240
12	180 - 240 (interval : 20)	T8712180 - T8712240



Full Threaded Locking Screws

Diameter (mm)	Length (mm)	Article No.
4,5	30 - 85 (interval : 5)	T8524030 - T8524085



KTO Humerus Rotation Blade

Length (mm)	Article No.
28 - 48 (interval : 2)	T89010028 - T8910048



Main End Cap

Length (mm)	Article No.
0 - 15 (interval : 5)	T8800001 - T8800015



Blade End Cap

Length (mm)	Article No.
0 - 15 (interval : 5)	T8900001 - T8900015



KTO PFNA Blade Screw

Diameter (mm)	Length (mm)	Article No.
10,5	70 - 120 (interval : 5)	T8553070 - T8553120



Locking End Cap

Length (mm)	Article No.
0 - 15 (interval : 5)	T8570000 - T8570015



Normal End Cap

Length (mm)	Article No.
0 - 15 (interval : 5)	T8580000 - T8580015

## ENDO

## Trauma Implant

## Stainless Steel, Locking Fragment



Distal Radius Buttress Locking Plates Ø 2.7 mm

Article No.	Holes
4320004 - 4320005 (interval : 1)	4 - 5 (Right / Left)
4320007 - 4320009 (interval : 2)	7 - 9 (Right / Left)



Distal Radius Joint Locking Plates

Article No.	Holes
4360008 - 4360010 (interval : 2)	8 - 10 (Right / Left)



Clavicle Hook Locking Plates

Article No.	Holes
4390006 - 4390010 (interval : 1)	6 - 10 (Right / Left)



Distal Lateral Humerus Locking Plate

Article No.	Holes
T4270005 - T4270011 (interval : 2)	5 - 11 (Right / Left)



Distal Medial Humerus Locking Plates

Article No.	Holes
T4280004 - T4280005 (interval : 1)	4 - 5 (Right / Left)
T4280007 - T4280009 (interval : 2)	7 - 9 (Right / Left)



Humerus Compression Locking Plates

Article No.	Holes
4050006 - 4050008 (interval : 1)	6 - 8 (Right / Left)
4050010 - 4050012 (interval : 2)	10 - 12 (Right / Left)



Oblique T Radius Reconstruction Locking Plates

Article No.	Holes
4340006 - 4340009 (interval : 1)	6 - 9 (Right / Left)



Olecranon Hook Reconstruction Locking Plates

Article No.	Holes
4310004 - 4310005 (interval : 1)	4 - 5 (Right / Left)



One Third Tubular Locking Plates

Article No.	Holes
4100005 - 4100008 (interval : 1)	5 - 8
S4100010	10



Proximal Humerus Locking Plates III

Article No.	Holes
4230004 - 4230008 (interval : 1)	4 - 8 (Right / Left)
4230010 - 4230012 (interval : 2)	10 - 12 (Right / Left)

# ENDO

## Trauma Implant

### Stainless Steel, Locking Fragment



Reconstruction Locking Plates

Article No.	Holes
S4040005 - S4040010 (interval : 1)	5 - 10
S4040012	12



S Clavicle Locking Plates  $\varnothing$  3.0 mm

Article No.	Holes
S4382006	6
4382007 - 4382010 (interval : 1)	7 - 10 (Right / Left)
4382012	12 (Right / Left)



Ulna Radius Locking Plates

Article No.	Holes
4090005 - 4090010 (interval : 1)	5 - 10



Mini T-Reconstruction Locking Plates

Article No.	Holes
4330006 - 4330009 (interval : 1)	6 - 9



L-Reconstruction Locking Plates (Lower Limb)

Article No.	Holes
4740007 - 4740010 (interval : 1)	7 - 10 (Right / Left)



Calcaneus Locking Plates II (Max)

Article No.	Holes
4402012	12 (Right / Left)



Distal Lateral Femoral Locking Plates

Article No.	Holes
4411005 - 4411015 (interval : 2)	5 - 15 (Right / Left)



Distal Lateral Tibia Reconstruction Locking Plates

Article No.	Holes
T4600005 - T4600013 (interval : 2)	5 - 13 (Right / Left)



Femur Locking Plates

Article No.	Holes
4083008 - 4083016 (interval : 2)	8 - 16



KUS-Proximal Lateral Femoral Locking Plates

Article No.	Holes
4424004 - 4424006 (interval : 1)	4 - 6 (Right / Left)
4424008 - 4424014 (interval : 2)	8 - 14 (Right / Left)

# ENDO

## Trauma Implant Stainless Steel, Locking Fragment



Proximal Lateral Tibial Locking Plates IV

Article No.	Holes
4700005 - 4700013 (interval : 2)	5 - 13 (Right / Left)



T-Reconstruction Locking Plates (Lower Limb)

Article No.	Holes
4730007 - 4730010 (interval : 1)	7 - 10 (Right / Left)



Tibial Locking Plates

Article No.	Holes
4071006 - 4071008 (interval : 1)	6 - 8
4071010 - 4071016 (interval : 2)	10 - 16



Hexa Locking Screw Cortical  $\varnothing$  2.7 mm

Article No.	Screw Length (mm)
DS7502708 - DS7502730 (interval : 2)	8 - 30 mm
DS7502735 - DS7502760 (interval : 5)	35 - 60 mm



Hexa Locking Cortical Screw  $\varnothing$  3.5mm

Article No.	Screw Length (mm)
4833512 / DS7503512 - 4833534 / DS7503534 (interval : 2)	12 - 34 mm
DS7503536 - DS7503550 DS7503555	36 - 50 mm 55 mm



Hexa Locking Screw Cortical  $\varnothing$  5.0 mm

Article No.	Screw Length (mm)
S4845016 / DS7505016 - S4845038 / DS7505038 (interval : 2)	16 - 38 mm
DS7505040 - DS7505050 (interval : 2)	40 - 50 mm
DS7505055 - DS7505090 (interval : 5)	55 - 90 mm



Torx Hollow Locking Screw  $\varnothing$  6.5 mm

Article No.	Screw Length (mm)
S48765060 - S48765110 (interval : 5)	60 - 110 mm

Trauma Implant

Stainless Steel, Non-Locking Fragment



Clavicle Hook Plates (Height : 14mm)

Article No.	Holes
2510005 - 2510009 (interval : 1)	5 - 9 (Right / Left)



Distal Radius / Fibula Plates

Article No.	Holes
3120003 - 3120010 (interval : 1)	3 - 10



Eaglebeak Plates (Reconstruction)

Article No.	Holes
S2110003 - S2110008 (interval : 1)	3 - 8 (Right / Left)



LC-DCP Humerus Plates

Article No.	Holes
S1230005 - S1230010 (interval : 1)	5 - 10



LC-DCP Ulna Radius Plates

Article No.	Holes
S1220004 - S1220010 (interval : 1)	4 - 10



Oblique T-shaped Radius Reconstruction Plates

Article No.	Holes
2020006 - 2020009 (interval : 1)	6 - 9 (Right / Left)



1/3 Tubular Plates

Article No.	Holes
S1410005 - S1410010 (interval : 1)	5 - 10



Proximal Humerus Plates III

Article No.	Holes
2321004 - 2321006 (interval : 1)	4 - 6 (Right / Left)
2321008 - 2321012 (interval : 2)	8 - 12 (Right / Left)



Reconstruction Plates

Article No.	Holes
S1310005 - S1310010 (interval : 1)	5 - 10
S1310012	12



Restricted Compression Plates (Upper Limb)

Article No.	Holes
S1110004 - S1110010 (interval : 1)	4 - 10
S1110012	12

## ENDO

## Trauma Implant

Stainless Steel, Non-Locking Fragment



S Clavicle Plates

Article No.	Holes
2450006	6
2450007 - 2450010	7 - 10 (Right / Left)
2450012	12 (Right / Left)



Small T Reconstruction Plates

Article No.	Holes
2010006 - 2010009 (interval : 1)	6 - 9



130 DHS Compression Hip Plates

Article No.	Holes
S3611004 - S3611008	4 - 8
S3611010	10



Lag Screw / DHS Screw

Article No.	Screw Length (mm)
S36312065 - S36312095 (interval : 5)	65 - 95 mm



Fibula Reconstruction Plates II

Article No.	Holes
3110004 - 3110007 (interval : 1)	4 - 7 (Right / Left)



L-Reconstruction Plates

Article No.	Holes
3410006 - 3410011 (interval : 1)	6 - 11 (Right / Left)



Proximal Femoral Condyle Long Plates

Article No.	Holes
3560005 - 3560007 (interval : 10)	5 - 7 (Right / Left)
3560009 - 3560011 (interval : 2)	9 - 11 (Right / Left)



Restricted Compression Plates (Femur Curve)

Article No.	Holes
S1131008 - S1131010 (interval : 1)	8 - 10
S1131012 - S1131016 (interval : 2)	12 - 16



Restricted Compression Plates (Tibia)

Article No.	Holes
S1120006 - S1120010 S1120012	6 - 10 12



T-Reconstruction Plates

Article No.	Holes
3420006 - 3420011 (interval : 1)	6 - 11 (Right / Left)



## Trauma Implant

### Stainless Steel, Non-Locking Fragment



Calcaneus Plates II (short)

Article No.	Holes
S3030011 - S3030013 (interval : 2)	11 - 13



Calcaneus Plates II (long)

Article No.	Holes
S3040013 - S3040015 (interval : 2)	13 - 15



Hexa Bone Screw Cortical Ø 2.7 mm

Article No.	Screw Length (mm)
DS7602706 - DS7602730 (interval : 2)	6 - 30 mm



Hexa Bone Screw Cortical Ø 3.5 mm Full Thread

Article No.	Screw Length (mm)
DS7603512	12 mm
S5043514 - S5043540 (interval : 2)	14 - 40 mm
DS7603542 - DS7603550 (interval : 2)	42 - 50 mm



Hexa Bone Screw Cancellous Ø 4.0 mm Full Thread

Article No.	Screw Length (mm)
S5364012 - S5364048 (interval : 2)	12 - 48 mm



Hexa Bone Screw Cortical Ø 4.5 mm Full Thread

Article No.	Screw Length (mm)
S5064520 - S5064550 (interval : 2)	20 - 50 mm
DS7614555	55 mm
S5064560	60 mm



Hexa Bone Screw Ø 6.5 mm Full Thread

Article No.	Screw Length (mm)
S5376530 - S5376590 (interval : 5)	30 - 90 mm



Hexa Bone Screw Ø 6.5 mm Half Thread

Article No.	Screw Length (mm)
S5346550 - S5346595 (interval : 5)	50 - 95 mm



Cannulated Compression Screw Ø 4.0 mm

Article No.	Screw Length (mm)
T5524026 - T5524050 (interval : 2)	26 - 50 mm



Femoris Cannulated Compression Screws Ø 6.5 mm

Article No.	Screw Length (mm)
T56265060 - T56265105 (interval : 5)	60 - 105 mm



## Arthroplasty

### Hip System, Bencox ID Cemented Stem



#### Specifications

Size	Length (mm)	Offset (mm)	CCD (degree)	Rasp
3	129	39.1		3
5	137	40.4		5
7	145	41.9	132°	7
9	153	44.3		9
11	161	46.7		11



Cementless Stem Rasp Cemented Stem

#### Unified Instrumentation

- Cementless and cemented stem of ID system use same instrumentation.
- This instrumentation maximizes efficiency in the operating room, while still providing intraoperative flexibility.

#### Polished Double Tapered Distal Geometry - Collarless Type

- Generates the radial compressive load in distal body
- "Taper slip principle" allows the subsidence of the stem.
- Cement mantle longevity is related to the ability to convert the shear and tension to the compression.
- Cement is 3 times stronger in compression than in shear or tension.

#### Normalized Proximal Stress

- Proximally tapered & grooved stem geometry converts the shear forces to the compressive load.

#### Self Centering Distal Centralizer

- Uniform cement thickness is constructed by four deformable wings of centralizer, which protects the stress concentration due to the thin cement mantle
- Allows the cemented stem to move distally within the cement applying the compression to the cement.



#### Enhanced Neck Shape

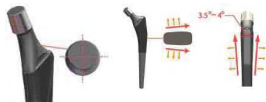
- Patented trapezoidal neck design allows wide angulation and protects impingement and dislocation.
- Same neck design with Bencox stem is applied.

#### Compatible Tapered 12/14 Trunnion

- Adoption of Bencox forte & delta, and Meta heads
- Provides 3 optional offset (Short, Medium, Long) Extra long offset provided for Metal heads

## Arthroplasty

### Hip System, Bencox ID Cementless Stem



#### Specifications



Size	Offset (mm)	Length (mm)	Offset (mm)	Offset (deg/100mm)	Notes
1	137	374			1
2	141	383			2
3	145	393			3
4	149	403			4
5	153	412			5
6	157	424	133°		6
7	161	433			7
8	165	442			8
9	169	452			9
10	173	462			10
11	177	469			11



Cementless Stem Rasp Cemented Stem

#### Unified Instrumentation

- Cementless and cemented stem of ID system use same instrumentation.
- This instrumentation maximizes efficiency in the operating room, while still providing intraoperative flexibility.

#### Proven Ti-Plasma Spray Porous Coating

- Provides the primary and secondary stability
- Protects osteolysis from the wear debris.

#### Compatible Tapered 12/14 Trunnion

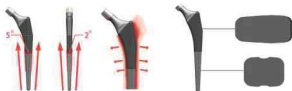
- Adoption of Bencox forte & delta, and Metal heads
- Provides 3 optional offset (Short, Medium, Long)
- Extra long offset provided for Metal heads

#### Wide Range of Prosthetic ROM (P-ROM)

- Patented trapezoidal neck design allows wide angulation and protects impingement and dislocation.
- Same neck design with Bencox stem is applied.

#### Normalized Proximal Stress

- Proximally tapered stem geometry converts the shear forces to compressive load.
- This helps the stem to resist subsidence and medial migration.



#### Extensive Stress Distribution

- Low elastic modulus of Ti alloy and the double tapered stem reduce stiffness which avoids distal load transfer and prevents proximal stress shielding.

#### Enhanced Rotational Stability

- Rectangular cross-section.
- Longitudinal grooves are designed to resist rotational motion.



## Arthroplasty

### Hip System, Bencox Bipolar Cup



#### Optimal Fit

- A large array of component allows precise patient matching for optimal patient fit.
- Outer diameters from 38 to 60mm allow the surgeon to meet the unique challenges posed in a revision and extended situations.
- The bipolar cup offers use with 22, 28mm femoral heads.



#### Simple Locking Mechanism

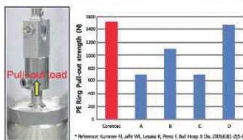
- Ring mechanism allows for easy assembly of the femoral head.

#### Wide Range of Motion

- Enhanced 68° ROM resists the impingement to the UHMWPE locking ring.

#### Proportional Eccentricity

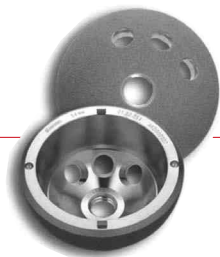
- Multipolarity is achieved via multiple offsets within the system as cup sizes increase, the amount of eccentricity increases.
- Provides eccentricity that is proportional to the patient's anatomy.



#### Enhanced Stability

- Superior pull-out strength resists the dislocation of the femoral head.

## Arthroplasty Hip System, Bencox Cup System



### Acetabular Component

- Acetabular Component is hemisphere-shaped, maximizing the peripheral and polar contact at once. Three screw holes are anatomically designed and located for more effective fixation; and enough insertion angles are allowed to simplify the surgery.

### Surface Treatment Plasma Sprayed Ti Coating

- The surface treatment on an artificial joint is an essential factor for success; at the same time, it's the precise indication of a manufacturer's technique.
- Acetabular Component of Bencox Hip System is coated using plasma spray method.
- The microporous pure titanium coating with more than 30% porosity leads to direct bone apposition for secondary stability. Rough surface supports a more stable primary fixation.



### Two in One Bearing Cup System

- Unique locking design allows for ceramic and PE liner in one cup.

### Secure Locking Mechanism

- Cup and ceramic insert provides a secure locking mechanism while providing a self-locating feature to ease insert placement.
- The locking mechanism between cup and PE liner allows for secure fixation with superior congruency for the push-out, rotation and tilting.

MOTION	28MM	30MM	32MM	34MM	36MM	37MM	38MM
Flexion	122°	112°	96°	124°	118°	106°	108°
Extension	63°	54°	38°	65°	58°	46°	50°
Total (Flexion + Extension)	185°	166°	134°	189°	176°	152°	158°
Abduction	63°	64°	52°	63°	61°	58°	66°
Adduction	58°	57°	39°	58°	54°	49°	61°
Total (Abduction + Adduction)	121°	121°	91°	121°	121°	107°	127°
Internal Rotation	128°	128°	108°	129°	133°	118°	133°
External Rotation	64°	64°	43°	63°	69°	54°	70°
Total (Int. + Ext. Rot.)	192°	192°	151°	194°	202°	172°	203°



### Improved Range of Motion

- Optimal range of motion with the innovative stem neck design reduces the potential for impingement and dislocation.
- P-ROM following to the different head diameter and offset.

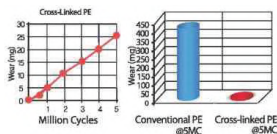


**POLYETHYLENE THICKNESS**

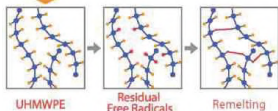
HEAD SIZE	OUTER DIAMETER	LOADING POINT	DOME	HEAD SIZE	OUTER DIAMETER	LOADING POINT	DOME
28mm	37mm	6.0mm	4.8mm	32mm	52mm	9.1mm	8.6mm
28mm	39mm	6.7mm	5.5mm	36mm	44mm	6.0mm	5.3mm
28mm	44mm	9.1mm	8.3mm	36mm	48mm	7.0mm	6.5mm
28mm	48mm	10.1mm	9.5mm	36mm	52mm	8.0mm	7.6mm
28mm	52mm	10.6mm	11.1mm	40mm	44mm	9.2mm	9.3mm
32mm	44mm	7.1mm	6.3mm	40mm	48mm	6.7mm	6.5mm
32mm	48mm	8.1mm	7.5mm	40mm	52mm	7.7mm	7.6mm

**Various Choice of PE Liners**

- Standard, extended, and elevated type allows for the use in extended indication situations.
- PE liner offers use with 28, 32, 36, 40mm CoCr Mo femoral heads.
- The wear resistance.



75kGy Gamma



**VCross-Linked UHMWPE for PE Liner**

- Compression molded GUR1020 rods are used - initial toughness and strength is higher than 1050 Gamma irradiated at room temperature to a 75kGy to facilitate cross-linking After irradiation, the rods are heated above the melting point to eliminate residual free radicals and form additional cross-links PE liners are machined and cleaned, packaged, and Eto sterilized Residual free radicals and form additional cross-links.

**Enhanced Wear Characteristics**

- Cross-linked PE liners exhibit 94% less wear in vitro tests than conventional PE liners.

**Bencox Data**

- Bencox Delta is a high performance ceramic biocomposite material with the potential to be used in applications which were not previously possible using ceramics. It combines the excellent material properties of alumina ceramics in terms of chemical and hydrothermal stability with extremely low wear, superior mechanical strength and improved fracture toughness. Bencox Delta is composed of approximately 75% aluminium oxide, which provides the basic hardness and wear resistance and approximately 25% zirconia, which together with other additives provides the improved mechanical properties compared with pure aluminium oxide ceramic Bencox Delta offers higher mechanical properties including higher fracture toughness.

## Arthroplasty

### Hip System, Ordering Information

**Bencox Hybrid Cup**

Article No.	Implant
01.02.054	Bencox Hybrid Cup 46 mm
01.02.056	Bencox Hybrid Cup 48 mm
01.02.058	Bencox Hybrid Cup 50 mm
01.02.060	Bencox Hybrid Cup 52 mm
01.02.062	Bencox Hybrid Cup 54 mm
01.02.064	Bencox Hybrid Cup 56 mm
01.02.066	Bencox Hybrid Cup 58 mm
01.02.068	Bencox Hybrid Cup 60 mm
01.02.070	Bencox Hybrid Cup 62 mm

**Bencox Bipolar Cup**

Article No.	Implant
01.03.038	Bencox Bipolar Cup #38
01.03.039	Bencox Bipolar Cup #39
01.03.040	Bencox Bipolar Cup #40
01.03.041	Bencox Bipolar Cup #41
01.03.042	Bencox Bipolar Cup #42
01.03.043	Bencox Bipolar Cup #43
01.03.044	Bencox Bipolar Cup #44
01.03.045	Bencox Bipolar Cup #45
01.03.046	Bencox Bipolar Cup #46
01.03.047	Bencox Bipolar Cup #47
01.03.048	Bencox Bipolar Cup #48
01.03.049	Bencox Bipolar Cup #49
01.03.050	Bencox Bipolar Cup #50
01.03.051	Bencox Bipolar Cup #51

**Bencox ID Cemented Stem**

Article No.	Implant
01.05.103	Bencox ID Cemented Stem 3
01.05.105	Bencox ID Cemented Stem 5
01.05.107	Bencox ID Cemented Stem 7
01.05.109	Bencox ID Cemented Stem 9

**Bencox ID Stem**

Article No.	Implant
01.05.021	Bencox ID Stem 1
01.05.022	Bencox ID Stem 2
01.05.023	Bencox ID Stem 3
01.05.024	Bencox ID Stem 4
01.05.025	Bencox ID Stem 5
01.05.026	Bencox ID Stem 6
01.05.027	Bencox ID Stem 7
01.05.028	Bencox ID Stem 8
01.05.029	Bencox ID Stem 9

**Benfix Long Stem**

Article No.	Implant
01.04.001	Benfix Long Stem 1
01.04.002	Benfix Long Stem 2
01.04.003	Benfix Long Stem 3
01.04.004	Benfix Long Stem 4
01.04.005	Benfix Long Stem 5



## Arthroplasty

### Hip System, Ordering Information

#### Metal Head

Article No.	Implant
01.02.415	Metal Head 28 mm / L (STD)
01.02.410	Metal Head 28 mm / M (STD)
01.02.405	Metal Head 28 mm / S (STD)
01.02.430	Metal Head 32 mm / L (STD)
01.02.425	Metal Head 32 mm / M (STD)
01.02.420	Metal Head 32 mm / S (STD)
01.02.450	Metal Head 36 mm / L (STD)
01.02.445	Metal Head 36 mm / M (STD)
01.02.440	Metal Head 36 mm / S (STD)

#### Bone Plug

Article No.	Implant
01.05.413	Bone Plug 13 mm
01.05.420	Bone Plug 20 mm
01.05.427	Bone Plug 27 mm

#### Bone Screw

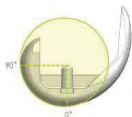
Article No.	Implant
01.01.202	Bone Screw 20 mm
01.01.203	Bone Screw 25 mm
01.01.204	Bone Screw 30 mm
01.01.205	Bone Screw 35 mm
01.01.206	Bone Screw 40 mm

#### PE Liner

Article No.	Implant
01.02.662	PE Liner 28 mm / 39G (Elevated)
01.02.673	PE Liner 32 mm / 44G (Elevated)
01.02.675	PE Liner 32 mm / 48G (Elevated)
01.02.683	PE Liner 36 mm / 44G (Elevated)
01.02.685	PE Liner 36 mm / 48G (Elevated)



## Arthroplasty Lospa Knee System



- Single axis concept for articular stability with flexion and improving range of motion.



- Anterior flange shape and dimension for the optimal patella tracking.



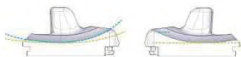
- Intercondylar cam design of PS type for reducing the risk of dislocation in deep flexion.



- Sphere-shaped articular surface for reducing contact stress and improving stability.



- High conformity at the frontal plane to improve contact area.



- Double radius at the sagittal plane for improved anterior stability and deep flexion.



- Rotated articular surface considering axial rotation for the femoral component.



- Rounded tibial post to reduce edge loading in the PS type (in the case of PS type)

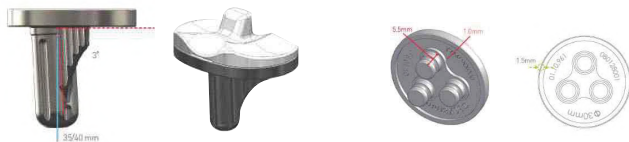


- Improved anterior relief for deep flexion.



## Arthroplasty

### Lospa Knee System



#### Lospa Tibial Baseplate

- Stem with keel for improving initial implant stability. Stem with posterior slope aiding in reducing the anterior cortex impingement.
- Commonality of tibial baseplate: CR/PS in fixed type

#### Lospa Patellar Component

- Cement pockets - provide optimal condition for cemented fixation. There is cement pocket which has 1.0mm depth, but which is not deep enough to compromise the strength of the component. There is reinforcement in the center of these pocket and the peripheral rim is maintained with 1.5mm thickness.

## Arthroplasty

### Lospa Knee System

#### Lospa Femoral Component (PS)

Article No.	Implant
01.10.043	Femoral Component No 3 PS Left
01.10.063	Femoral Component No 3 PS Right
01.10.044	Femoral Component No 4 PS Left
01.10.064	Femoral Component No 4 PS Right
01.10.045	Femoral Component No 5 PS Left
01.10.065	Femoral Component No 5 PS Right
01.10.047	Femoral Component No 7 PS Left
01.10.067	Femoral Component No 7 PS Right
01.10.049	Femoral Component No 9 PS Left
01.10.069	Femoral Component No 9 PS Right
01.10.048	Femoral Component No 11 PS Left
01.10.068	Femoral Component No 11PS Right

#### Lospa Patellar Component

Article No.	Implant
01.10.941	Patellar Component 28 mm
01.10.961	Patellar Component 30 mm
01.10.981	Patellar Component 32 mm
01.10.9A2	Patellar Component 34 mm

#### Lospa Tibial Baseplate

Article No.	Implant
01.10.50B	Tibial Base Plate No. 11
01.10.503	Tibial Base Plate No. 3
01.10.504	Tibial Base Plate No. 4
01.10.505	Tibial Base Plate No. 5
01.10.507	Tibial Base Plate No. 7
01.10.509	Tibial Base Plate No. 9

#### Lospa Tibial Insert

Article No.	Implant
01.10.232	Tibial Insert PS - 3 x 10 mm
01.10.234	Tibial Insert PS - 3 x 12 mm
01.10.236	Tibial Insert PS - 3 x 14 mm
01.10.238	Tibial Insert PS - 3 x 16 mm
01.10.23A	Tibial Insert PS - 3 x 18 mm
01.10.242	Tibial Insert PS - 4 x 10 mm
01.10.244	Tibial Insert PS - 4 x 12 mm
01.10.246	Tibial Insert PS - 4 x 14 mm
01.10.248	Tibial Insert PS - 4 x 16 mm
01.10.24A	Tibial Insert PS - 4 x 18 mm
01.10.252	Tibial Insert PS - 5 x 10 mm
01.10.254	Tibial Insert PS - 5 x 12 mm
01.10.254	Tibial Insert PS - 5 x 14 mm
01.10.258	Tibial Insert PS - 5 x 16 mm
01.10.25A	Tibial Insert PS - 5 x 18 mm
01.10.272	Tibial Insert PS - 7 x 10 mm
01.10.274	Tibial Insert PS - 7 x 12 mm
01.10.276	Tibial Insert PS - 7 x 14 mm
01.10.278	Tibial Insert PS - 7 x 16 mm
01.10.27A	Tibial Insert PS - 7 x 18 mm
01.10.292	Tibial Insert PS - 9 x 10 mm
01.10.294	Tibial Insert PS - 9 x 12 mm
01.10.296	Tibial Insert PS - 9 x 14 mm
01.10.298	Tibial Insert PS - 9 x 16 mm
01.10.29A	Tibial Insert PS - 9 x 18 mm
01.10.2B2	Tibial Insert PS - 11 x 10 mm
01.10.2B4	Tibial Insert PS - 11 x 12 mm
01.10.2B6	Tibial Insert PS - 11 x 14 mm
01.10.2B8	Tibial Insert PS - 11 x 16 mm



## Arthroplasty Revision Knee System



### Tibial Component, Concaved Post Design

- The posterior part of the post is concavely curved. After cam-post engagement at 75 degrees of flexion, the cam travels down the post. This reduces the risk of the dislocation and allows for deep flexion.

### Lospa Modular Knee System

- Maintains Lospa Primary Knee System's
- Anatomical Features :
  - Stability, constrained motion increased AP stability
  - Modularity, stem extension available
  - Augmentation
  - Longevity, stabilized concave tibial post, secure insert locking rod
  - Compatibility, modular femoral component, primary tibial PS/CR insert, modular tibial baseplate

### Femoral Component

- Stem housing angle 6° the modular femoral component has a stem housing that is tilted 6 laterally
- Stem housing position: 35% from anterior



	Varus-Valgus	I-E Rotation
Lospa Modular Knee System	±2°	±4°
Competitor 'S'	±2°	±10°
Competitor 'T'	±2°	±7°
Competitor 'N'	±1.25°	±2°
Competitor 'V'	±1°	±0.5°

Femoral Component		3	4	5	6	7	8	9	11	12	14	16
Stem APZL	Size											
	Height mm	26	28	28	28	28	28	28	30	30	30	30
	3	23										
	4	23										
	5	25										
	6	25										
	7	25										
	8	25										
	9	25										
	11	27										
	12	27										
	14	27										
	16	27										

### Heightened Post

- For better stability during the entire knee motion, the post height is designed higher than the Lospa Primary Knee System



#### Stem Length

Baseplate	Stem / Plug Length
#3-#9	30 mm
#11-#16	35 mm
Plug	10 mm

#### Stem housing position : 35% from anterior



Reference	Position from anterior (%)
Lospa Modular Knee System	35%
Competitor 'S'	40%
Competitor 'T'	34%
Competitor 'N'	30%
Competitor 'V'	37%
Competitor 'P'	43%



## Arthroplasty Revision Knee System



### Augment

- Augment, Lospa Modular Knee System has 2 types of the Augment (block & choren pad)



- Block, complementing bone deficits, thickness: 5, 10, 15mm Bolt / Cement fixation



- Choren Pad (Correct Height Orientation Renovation)  
Correcting unbalanced knee joint Thickness: 2,3 mm  
Cement Fixation

### Stem Extension

- Stem Extension The fluted design can enhance the resistance to rotation, cemented type.  
Diameter: 9, 10, 11, 12, 13, 14, 15, 16, 18mm Length: 30, 60, 90, 120, 150mm
- Offset Adaptor Offset: 2, 4, 6mm Screw nut locking, 360 positioning Length : 30mm

### Size Combination, Bearing Couple

Tibial inserts	Femoral components										
	F3	F4	F5	*F6	F7	*F8	F9	F11	*F12	*F14	*F16
T13	•										
40AP/61ML T14	•	•									
42AP/64ML T15		•	•								
44AP/67ML *T6			•	•							
45AP/70ML T17				•	•						
46AP/72ML *T8					•	•					
48AP/72ML T19						•	•				
48AP/74ML T11							•	•			
50AP/76ML *T12								•	•		
52AP/81ML *T14										•	
56AP/84ML *T16											•
58AP/86ML											

### Size Combination Chart





## Arthroplasty

### Revision Knee System, Ordering Information

#### Femoral Component

Part No.		Size	AP / ML (mm)
Left	Right		
K2.FBL.5159	K2.FBR.5159	3	51 / 59
K2.FBL.5462	K2.FBR.5462	4	54 / 62
K2.FBL.5765	K2.FBR.5765	5	57 / 65
K2.FBL.6065	K2.FBR.6065	6	60 / 65
K2.FBL.6068	K2.FBR.6068	7	60 / 68
K2.FBL.6368	K2.FBR.6368	8	63 / 68
K2.FBL.6371	K2.FBR.6371	9	63 / 71
K2.FBL.6674	K2.FBR.6674	11	66 / 74
K2.FBL.6974	K2.FBR.6974	12	69 / 74
K2.FBL.7277	K2.FBR.7277	14	72 / 77
K2.FBL.7580	K2.FBR.7580	16	75 / 80

#### Tibial Baseplate with hole cap

Part No.	Size	L (mm)	AP / ML (mm)
K2.BFN.4061-ASM	3	30	40 / 61
K2.BFN.4264-ASM	4	30	42 / 64
K2.BFN.4467-ASM	5	30	44 / 67
K2.BFN.4570-ASM	6	30	45 / 70
K2.BFN.4672-ASM	7	30	46 / 72
K2.BFN.4872-ASM	8	30	48 / 72
K2.BFN.4874-ASM	9	30	48 / 74
K2.BFN.5076-ASM	11	35	50 / 76
K2.BFN.5281-ASM	12	35	52 / 81
K2.BFN.5684-ASM	14	35	56 / 84
K2.BFN.5886-ASM	16	35	58 / 86

#### Stem Extension

Part No.	DxL (mm)
K2.C09.0030	9 x 30
K2.C09.0060	9 x 60
K2.C09.0090	9 x 90
K2.C09.0120	9 x 120
K2.C09.0150	9 x 150
K2.C09.0180	9 x 180
K2.C10.0030	10 x 30
K2.C10.0060	10 x 60
K2.C10.0090	10 x 90
K2.C10.0120	10 x 120
K2.C10.0150	10 x 150
K2.C10.0180	10 x 180
K2.C11.0030	11 x 30
K2.C11.0060	11 x 60
K2.C11.0090	11 x 90
K2.C11.0120	11 x 120

Part No.	DxL (mm)
K2.C11.0150	11 x 150
K2.C11.0180	11 x 180
K2.C12.0030	12 x 30
K2.C12.0060	12 x 60
K2.C12.0090	12 x 90
K2.C12.0120	12 x 120
K2.C12.0150	12 x 150
K2.C12.0180	12 x 180
K2.C13.0030	13 x 30
K2.C13.0060	13 x 60
K2.C13.0090	13 x 90
K2.C13.0120	13 x 120
K2.C13.0150	13 x 150
K2.C13.0180	13 x 180
K2.C14.0030	14 x 30
K2.C14.0060	14 x 60

Part No.	DxL (mm)
K2.C14.0090	14 x 90
K2.C14.0120	14 x 120
K2.C14.0150	14 x 150
K2.C14.0180	14 x 180
K2.C15.0010	15 x 10
K2.C15.0015	15 x 15
K2.C15.0020	15 x 20
K2.C15.0030	15 x 30
K2.C15.0060	15 x 60
K2.C15.0090	15 x 90
K2.C15.0120	15 x 120
K2.C15.0150	15 x 150
K2.C15.0180	15 x 180
K2.C16.0030	16 x 30
K2.C16.0060	16 x 60
K2.C16.0090	16 x 90

Part No.	DxL (mm)
K2.C16.0120	16 x 120
K2.C16.0150	16 x 150
K2.C16.0180	16 x 180
K2.C18.0030	18 x 30
K2.C18.0060	18 x 60
K2.C18.0090	18 x 90
K2.C18.0120	18 x 120
K2.C18.0150	18 x 150
K2.C18.0180	18 x 180
K2.C20.0030	20 x 30
K2.C20.0060	20 x 60
K2.C20.0090	20 x 90
K2.C20.0120	20 x 120
K2.C20.0150	20 x 150
K2.C20.0180	20 x 180

## Arthroplasty

### Revision Knee System, Ordering Information

**Tibial Insert**

Part No.	Size	AP/ML (mm)	Locking Rod L (mm)
K2.IBN.4061-10A	3-10	40 / 61	31
K2.IBN.4061-12A	3-12		33
K2.IBN.4061-14A	3-14		35
K2.IBN.4061-16A	3-16		37
K2.IBN.4061-18A	3-18		39
K2.IBN.4061-20A	3-20		41
K2.IBN.4061-22A	3-22		43
K2.IBN.4061-24A	3-24		45
K2.IBN.4061-26A	3-26		47
K2.IBN.4264-10A	4-10		42 / 64
K2.IBN.4264-12A	4-12	33	
K2.IBN.4264-14A	4-14	35	
K2.IBN.4264-16A	4-16	37	
K2.IBN.4264-18A	4-18	39	
K2.IBN.4264-20A	4-20	41	
K2.IBN.4264-22A	4-22	43	
K2.IBN.4264-24A	4-24	45	
K2.IBN.4264-26A	4-26	47	
K2.IBN.4467-10A	5-10	44 / 67	
K2.IBN.4467-12A	5-12		33
K2.IBN.4467-14A	5-14		35
K2.IBN.4467-16A	5-16		37
K2.IBN.4467-18A	5-18		39
K2.IBN.4467-20A	5-20		41
K2.IBN.4467-22A	5-22		43
K2.IBN.4467-24A	5-24		45
K2.IBN.4467-26A	5-26		47

Part No.	Size	AP/ML (mm)	Locking Rod L (mm)
K2.IBN.4570-10A	6-10	45 / 70	31
K2.IBN.4570-12A	6-12		33
K2.IBN.4570-14A	6-14		35
K2.IBN.4570-16A	6-16		37
K2.IBN.4570-18A	6-18		39
K2.IBN.4570-20A	6-20		41
K2.IBN.4570-22A	6-22		43
K2.IBN.4570-24A	6-24		45
K2.IBN.4570-26A	6-26		47
K2.IBN.4672-10A	7-10		46 / 72
K2.IBN.4672-12A	7-12	33	
K2.IBN.4672-14A	7-14	35	
K2.IBN.4672-16A	7-16	37	
K2.IBN.4672-18A	7-18	39	
K2.IBN.4672-20A	7-20	41	
K2.IBN.4672-22A	7-22	43	
K2.IBN.4672-24A	7-24	45	
K2.IBN.4672-26A	7-26	47	
K2.IBN.4872-10A	8-10	48 / 72	
K2.IBN.4872-12A	8-12		33
K2.IBN.4872-14A	8-14		35
K2.IBN.4872-16A	8-16		37
K2.IBN.4872-18A	8-18		39
K2.IBN.4872-20A	8-20		41
K2.IBN.4872-22A	8-22		43
K2.IBN.4872-24A	8-24		45
K2.IBN.4872-26A	8-26		47



## Arthroplasty

### Revision Knee System, Ordering Information

#### Tibial Insert

Part No.	Size	AP/ML (mm)	Locking Rod L (mm)
K2.IBN.4874-10A	9-10	48 / 74	31
K2.IBN.4874-12A	9-12		33
K2.IBN.4874-14A	9-14		35
K2.IBN.4874-16A	9-16		37
K2.IBN.4874-18A	9-18		39
K2.IBN.4874-20A	9-20		41
K2.IBN.4874-22A	9-22		43
K2.IBN.4874-24A	9-24		45
K2.IBN.4874-26A	9-26		47
K2.IBN.5076-10A	11-10		50 / 76
K2.IBN.5076-12A	11-12	33	
K2.IBN.5076-14A	11-14	35	
K2.IBN.5076-16A	11-16	37	
K2.IBN.5076-18A	11-18	39	
K2.IBN.5076-20A	11-20	41	
K2.IBN.5076-22A	11-22	43	
K2.IBN.5076-24A	11-24	45	
K2.IBN.5076-26A	11-26	47	
K2.IBN.5281-10A	12-10	52 / 81	
K2.IBN.5281-12A	12-12		33
K2.IBN.5281-14A	12-14		35
K2.IBN.5281-16A	12-16		37
K2.IBN.5281-18A	12-18		39
K2.IBN.5281-20A	12-20		41
K2.IBN.5281-22A	12-22		43
K2.IBN.5281-24A	12-24		45
K2.IBN.5281-26A	12-26		47

Part No.	Size	AP/ML (mm)	Locking Rod L (mm)
K2.IBN.5684-10A	14-10	56 / 84	31
K2.IBN.5684-12A	14-12		33
K2.IBN.5684-14A	14-14		35
K2.IBN.5684-16A	14-16		37
K2.IBN.5684-18A	14-18		39
K2.IBN.5684-20A	14-20		41
K2.IBN.5684-22A	14-22		43
K2.IBN.5684-24A	14-24		45
K2.IBN.5684-26A	14-26		47
K2.IBN.5886-10A	16-10		58 / 86
K2.IBN.5886-12A	16-12	33	
K2.IBN.5886-14A	16-14	35	
K2.IBN.5886-16A	16-16	37	
K2.IBN.5886-18A	16-18	39	
K2.IBN.5886-20A	16-20	41	
K2.IBN.5886-22A	16-22	43	
K2.IBN.5886-24A	16-24	45	
K2.IBN.5886-26A	16-26	47	

#### Offset Adaptor

Part No.	Offset (mm)
K2.OFT.15802-ASY	2
K2.OFT.15804-ASY	4
K2.OFT.15806-ASY	6
K2.OFT.15808-ASY	8

#### Stem Plug

Part No.	D (mm)
K2.BXP.1510	10



## Arthroplasty

### Revision Knee System, Ordering Information

**Augment - Choren Pad**
**Femoral Distal Choren Pad**

Part No.	Femur Size	T (mm)
K4.FDA.0302	3	2
K4.FDA.0402	4	2
K4.FDA.0502	5	2
K4.FDA.0602	6	2
K4.FDA.0702	7	2
K4.FDA.0802	8	2
K4.FDA.0902	9	2
K4.FDA.1102	11	2
K4.FDA.1202	12	2
K4.FDA.0303	3	3
K4.FDA.0403	4	3
K4.FDA.0503	5	3
K4.FDA.0603	6	3
K4.FDA.0703	7	3
K4.FDA.0803	8	3
K4.FDA.0903	9	3
K4.FDA.1103	11	3
K4.FDA.1203	12	3

**Femoral Posterior Choren Pad**

Part No.	Femur Size	T (mm)
K4.FPA.0302	3	2
K4.FPA.0402	4	2
K4.FPA.0502	5	2
K4.FPA.0602	6	2
K4.FPA.0702	7	2
K4.FPA.0802	8	2
K4.FPA.0902	9	2
K4.FPA.1102	11	2
K4.FPA.1202	12	2
K4.FPA.0303	3	3
K4.FPA.0403	4	3
K4.FPA.0503	5	3
K4.FPA.0603	6	3
K4.FPA.0703	7	3
K4.FPA.0803	8	3
K4.FPA.0903	9	3
K4.FPA.1103	11	3
K4.FPA.1203	12	3

**Tibial Half Choren Pad**

Part No.	Femur Size	T (mm)
K4.THA.0302	3	2
K4.THA.0402	4	2
K4.THA.0502	5	2
K4.THA.0602	6	2
K4.THA.0702	7	2
K4.THA.0802	8	2
K4.THA.0902	9	2
K4.THA.1102	11	2
K4.THA.1202	12	2
K4.THA.0303	3	3
K4.THA.0403	4	3
K4.THA.0503	5	3
K4.THA.0603	6	3
K4.THA.0703	7	3
K4.THA.0803	8	3
K4.THA.0903	9	3
K4.THA.1103	11	3
K4.THA.1203	12	3



## Arthroplasty

### Revision Knee System, Ordering Information

#### Augment - Block

##### Femoral Distal Block with fixation bolt

Part No.	Femur Size	T (mm)
K4.FD2.0305-ASY	3	5
K4.FD2.0405-ASY	4	5
K4.FD2.0505-ASY	5	5
K4.FD2.0605-ASY	6	5
K4.FD2.0705-ASY	7	5
K4.FD2.0805-ASY	8	5
K4.FD2.0905-ASY	9	5
K4.FD2.1105-ASY	11	5
K4.FD2.1205-ASY	12	5
K4.FD2.1405-ASY	14	5
K4.FD2.1605-ASY	16	5
K4.FD2.0310-ASY	3	10
K4.FD2.0410-ASY	4	10
K4.FD2.0510-ASY	5	10
K4.FD2.0610-ASY	6	10
K4.FD2.0710-ASY	7	10
K4.FD2.0810-ASY	8	10
K4.FD2.0910-ASY	9	10
K4.FD2.1110-ASY	11	10
K4.FD2.1210-ASY	12	10
K4.FD2.1410-ASY	14	10
K4.FD2.1610-ASY	16	10
K4.FD2.0315-ASY	3	15
K4.FD2.0415-ASY	4	15
K4.FD2.0515-ASY	5	15
K4.FD2.0615-ASY	6	15
K4.FD2.0715-ASY	7	15
K4.FD2.0815-ASY	8	15
K4.FD2.0915-ASY	9	15
K4.FD2.1115-ASY	11	15
K4.FD2.1215-ASY	12	15
K4.FD2.1415-ASY	14	15
K4.FD2.1615-ASY	16	15

##### Femoral Posterior Block with fixation bolt

Part No.	Femur Size	T (mm)
K4.FP2.0305-ASY	3	5
K4.FP2.0405-ASY	4	5
K4.FP2.0505-ASY	5	5
K4.FP2.0605-ASY	6	5
K4.FP2.0705-ASY	7	5
K4.FP2.0805-ASY	8	5
K4.FP2.0905-ASY	9	5
K4.FP2.1105-ASY	11	5
K4.FP2.1205-ASY	12	5
K4.FP2.1405-ASY	14	5
K4.FP2.1605-ASY	16	5
K4.FP2.0310-ASY	3	10
K4.FP2.0410-ASY	4	10
K4.FP2.0510-ASY	5	10
K4.FP2.0610-ASY	6	10
K4.FP2.0710-ASY	7	10
K4.FP2.0810-ASY	8	10
K4.FP2.0910-ASY	9	10
K4.FP2.1110-ASY	11	10
K4.FP2.1210-ASY	12	10
K4.FP2.1410-ASY	14	10
K4.FP2.1610-ASY	16	10
K4.FP2.0315-ASY	3	15
K4.FP2.0415-ASY	4	15
K4.FP2.0515-ASY	5	15
K4.FP2.0615-ASY	6	15
K4.FP2.0715-ASY	7	15
K4.FP2.0815-ASY	8	15
K4.FP2.0915-ASY	9	15
K4.FP2.1115-ASY	11	15
K4.FP2.1215-ASY	12	15
K4.FP2.1415-ASY	14	15
K4.FP2.1615-ASY	16	15

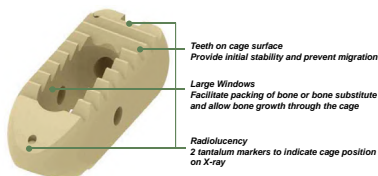
##### Tibial Half Block with fixation bolt

Part No.	Femur Size	T (mm)
K4.TH2.0305-ASY	3	5
K4.TH2.0405-ASY	4	5
K4.TH2.0505-ASY	5	5
K4.TH2.0605-ASY	6	5
K4.TH2.0705-ASY	7	5
K4.TH2.0805-ASY	8	5
K4.TH2.0905-ASY	9	5
K4.TH2.1105-ASY	11	5
K4.TH2.1205-ASY	12	5
K4.TH2.1405-ASY	14	5
K4.TH2.1605-ASY	16	5
K4.TH2.0310-ASY	3	10
K4.TH2.0410-ASY	4	10
K4.TH2.0510-ASY	5	10
K4.TH2.0610-ASY	6	10
K4.TH2.0710-ASY	7	10
K4.TH2.0810-ASY	8	10
K4.TH2.0910-ASY	9	10
K4.TH2.1110-ASY	11	10
K4.TH2.1210-ASY	12	10
K4.TH2.1410-ASY	14	10
K4.TH2.1610-ASY	16	10
K4.TH2.0315-ASY	3	15
K4.TH2.0415-ASY	4	15
K4.TH2.0515-ASY	5	15
K4.TH2.0615-ASY	6	15
K4.TH2.0715-ASY	7	15
K4.TH2.0815-ASY	8	15
K4.TH2.0915-ASY	9	15
K4.TH2.1115-ASY	11	15
K4.TH2.1215-ASY	12	15
K4.TH2.1415-ASY	14	15
K4.TH2.1615-ASY	16	15

## Spine System, Spinal Implant

PLIF / T-PLIF PEEK Cage System

### Anatomical Shape



- Lospa IS PLIF / T-PLIF cage system is a spinal interbody fusion system that was developed to solve the drawback of current spinal fusion systems in the market. The cage, which closely resembles human anatomy, is designed for implantation between the endplates of the lumbar vertebral bodies. The instruments with this system are simple and easy to use, which could lead to reduced operation time quick patient recovery.

### Indications

- Discogenic back pain
- Disc herniation with radicular pain and major back pain component
- Facet syndrome
- Spondylolysis
- Spondylolisthesis
- Failed posterior intertransverse fusion

### Application Levels

- L2 - S1

## Spine System, Spinal Implant

TLIF PEEK Cage System



- Transforaminal lumbar interbody fusion (TLIF) procedure of LOSPA IS TLIF compared with the PLIF procedure included a decrease in potential neurological injury, improvement in lordotic alignment given graft placement within the anterior column, and preservation of posterior column integrity through minimizing lamina, facet, and pars dissection.

### TLIF PEEK Cage System

- Provide resistance to spacer migration, 0,7 mm of teeth profile

### Anatomical Shape

- Convex (630R) implant meet better contact with body surface
- Posterior holding edge
- Help rotating via the axial plane
- Self-distracting bullet nose
- Easier and less damage while inserting.

### Material

- PEEK with tantalum x-ray markers
- Axial window
- Fully opened, accommodate bone graft to allow fusion 7 lordotic angle
- Accommodates the natural spine lordotic curve
- Large depth

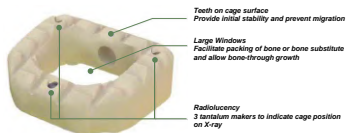
### TLIF Approach

- Open technique
- Minimally Invasive Technique



## Spine System, Spinal Implant ACIF PEEK Cage System

### Anatomical Shape



- Lospa IS ACIF cage system is a spinal interbody fusion system that was developed to solve the drawback of current spinal fusion systems in the market. The cage, which closely resembles human anatomy, is designed for implantation between the endplates of the cervical vertebral bodies. The instruments with this system are simple and easy to use, which could lead to reduces operation time quick patient recovery.

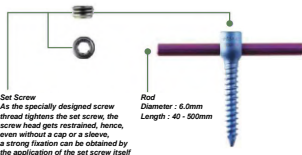
### Indications

- Degenerative disc disease
- Herniated disc
- Osteo arthritic foraminal stenosis
- Pseudarthrosis

### Application Levels

- C2 - T1

## Spine System, Spinal Implant Pedicle Screw



- Material : Ti-6Al-4V ELI (ASTM F 136-78)
- Having the low profile ( $\varnothing$  13mm x L 11mm) minimizes the post-surgical projection
- Available in standard and guided types to be selected to meet the surgeon's preference
- Anodized with various colors for distinguishing the different size
- The application of the double tapered thread has improved the screw's pullout strengthSelf tapered

### Advanced Polyaxial Pedicle Screw

- Possible rotation of approximately 25 (25 conical angle) from the axis of the housing of the rod
- Ability to stably place the rod even at a sudden rod bending

### Rod Link

- It is simple assembling and strong stable fixation (Oblique fixation design)



## Spine System, Spinal Implant Pedicle Screw, Ordering Information

### ACIF Cage System

Article No.	Implant
SC.250.2405	ACIF PEEK Cage (12 x 14 x 05mm)
SC.250.2406	ACIF PEEK Cage (12 x 14 x 06mm)
SC.250.2407	ACIF PEEK Cage (12 x 14 x 07mm)
SC.250.2408	ACIF PEEK Cage (12 x 14 x 08mm)
SC.250.2409	ACIF PEEK Cage (12 x 14 x 09mm)
SC.250.4605	ACIF PEEK Cage (14 x 16 x 05mm)
SC.250.4606	ACIF PEEK Cage (14 x 16 x 06mm)
SC.250.4607	ACIF PEEK Cage (14 x 16 x 07mm)
SC.250.4608	ACIF PEEK Cage (14 x 16 x 08mm)
SC.250.4609	ACIF PEEK Cage (14 x 16 x 09mm)

### PLIF / T-PLIF PEEK Cage System

Article No.	Implant
SC.B50.2508	PLIF PEEK Cage (25 x 0 x 10 x 8mm)
SC.B50.2509	PLIF PEEK Cage (25 x 0 x 10 x 9mm)
SC.B50.2510	PLIF PEEK Cage (25 x 0 x 10 x 10mm)
SC.B50.2511	PLIF PEEK Cage (25 x 0 x 10 x 11mm)
SC.B50.2512	PLIF PEEK Cage (25 x 0 x 10 x 12mm)
SC.B50.2513	PLIF PEEK Cage (25 x 0 x 10 x 13mm)
SC.B54.2509	PLIF PEEK Cage (25 x 4 x 10 x 9mm)
SC.B54.2510	PLIF PEEK Cage (25 x 4 x 10 x 10mm)
SC.B54.2511	PLIF PEEK Cage (25 x 4 x 10 x 11mm)
SC.B54.2512	PLIF PEEK Cage (25 x 4 x 10 x 12mm)
SC.B54.2513	PLIF PEEK Cage (25 x 4 x 10 x 13mm)
SC.B54.2514	PLIF PEEK Cage (25 x 4 x 10 x 14mm)
SC.B58.2510	PLIF PEEK Cage (25 x 8 x 10 x 8mm)
SC.B58.2511	PLIF PEEK Cage (25 x 8 x 10 x 10mm)
SC.B58.2512	PLIF PEEK Cage (25 x 8 x 10 x 12mm)
SC.B54.2809	T-PLIF PEEK Cage (28 x 4 x 10 x 9mm)
SC.B54.2810	T-PLIF PEEK Cage (28 x 4 x 10 x 10mm)
SC.B54.2811	T-PLIF PEEK Cage (28 x 4 x 10 x 11mm)
SC.B54.2812	T-PLIF PEEK Cage (28 x 4 x 10 x 12mm)
SC.B54.2813	T-PLIF PEEK Cage (28 x 4 x 10 x 13mm)
SC.B54.3109	T-PLIF PEEK Cage (31 x 4 x 10 x 9mm)
SC.B54.3110	T-PLIF PEEK Cage (31 x 4 x 10 x 10mm)
SC.B54.3111	T-PLIF PEEK Cage (31 x 4 x 10 x 11mm)
SC.B54.3112	T-PLIF PEEK Cage (31 x 4 x 10 x 12mm)
SC.B54.3113	T-PLIF PEEK Cage (31 x 4 x 10 x 13mm)

### Pedicle Screw

Article No.	Implant
01.26.565	Monoaxial Guided Pedicle Screw Ø 5.5 x 40mm
01.26.665	Monoaxial Guided Pedicle Screw Ø 6.5 x 40mm
01.26.453	Monoaxial Pedicle Screw Ø 4.5 x 30mm
01.26.454	Monoaxial Pedicle Screw Ø 4.5 x 35mm
01.26.455	Monoaxial Pedicle Screw Ø 4.5 x 40mm
01.26.553	Monoaxial Pedicle Screw Ø 5.5 x 30mm
01.26.554	Monoaxial Pedicle Screw Ø 5.5 x 35mm
01.26.555	Monoaxial Pedicle Screw Ø 5.5 x 40mm
01.26.556	Monoaxial Pedicle Screw Ø 5.5 x 45mm
01.26.654	Monoaxial Pedicle Screw Ø 6.5 x 35mm
01.26.655	Monoaxial Pedicle Screw Ø 6.5 x 40mm
01.26.656	Monoaxial Pedicle Screw Ø 6.5 x 45mm
01.26.755	Monoaxial Pedicle Screw Ø 7.5 x 40mm
01.26.756	Monoaxial Pedicle Screw Ø 7.5 x 45mm
01.28.565	Polyaxial Guided Pedicle Screw Ø 5.5 x 40mm
01.28.566	Polyaxial Guided Pedicle Screw Ø 5.5 x 45mm
01.28.567	Polyaxial Guided Pedicle Screw Ø 5.5 x 50mm
01.28.665	Polyaxial Guided Pedicle Screw Ø 6.5 x 40mm
01.28.666	Polyaxial Guided Pedicle Screw Ø 6.5 x 45mm
01.28.667	Polyaxial Guided Pedicle Screw Ø 6.5 x 50mm
01.28.453	Polyaxial Pedicle Screw Ø 4.5 x 30mm
01.28.454	Polyaxial Pedicle Screw Ø 4.5 x 35mm
01.28.455	Polyaxial Pedicle Screw Ø 4.5 x 40mm
01.28.553	Polyaxial Pedicle Screw Ø 5.5 x 30mm
01.28.554	Polyaxial Pedicle Screw Ø 5.5 x 35mm
01.28.555	Polyaxial Pedicle Screw Ø 5.5 x 40mm
01.28.556	Polyaxial Pedicle Screw Ø 5.5 x 45mm
01.28.654	Polyaxial Pedicle Screw Ø 6.5 x 35mm
01.28.655	Polyaxial Pedicle Screw Ø 6.5 x 40mm
01.28.656	Polyaxial Pedicle Screw Ø 6.5 x 45mm
01.28.657	Polyaxial Pedicle Screw Ø 6.5 x 50mm
01.28.754	Polyaxial Pedicle Screw Ø 7.5 x 35mm
01.28.755	Polyaxial Pedicle Screw Ø 7.5 x 40mm
01.28.756	Polyaxial Pedicle Screw Ø 7.5 x 45mm
01.22.920	Rod Link 35~40mm
01.22.921	Rod Link 40~50mm
01.22.922	Rod Link 48~63mm
01.22.923	Rod Link 60~78mm
01.21.067	Rod Ø 6.0 x 100mm
01.21.068	Rod Ø 6.0 x 110mm
01.21.069	Rod Ø 6.0 x 120mm
01.21.070	Rod Ø 6.0 x 130mm
01.21.072	Rod Ø 6.0 x 150mm
01.21.061	Rod Ø 6.0 x 40mm
01.21.361	Rod Ø 6.0 x 45mm
01.21.083	Rod Ø 6.0 x 500mm
01.21.062	Rod Ø 6.0 x 50mm
01.21.063	Rod Ø 6.0 x 60mm
01.21.064	Rod Ø 6.0 x 70mm
01.21.065	Rod Ø 6.0 x 80mm
01.21.066	Rod Ø 6.0 x 90mm
01.22.020	Set Screw Ø 10 x 5.0mm



## EZX Acetabular Cup Removal System



### Features

- **Technology.**  
EZX blades operating in rotational motion cut along the outer surface of the acetabular cup precisely and make accurate results. Patent Registered. New Excellent Technology.
- **Efficient.**  
EZX system offers 29 different sizes of disposable blades. Intended to remove hemisphere, cementless & cemented cups. Universal shaft powered by any hand pieces with a Zimmer Hudson attachment.  
A singular blade per a procedure.
- **Excellent Results.**  
EZX System helps quick and precise removal of acetabular cup and it gives excellent result for surgeons and patients. Super clean-cut. Reduces cutting time (Within 3 mins). Minimizes bone loss & additional fracture

### EZX instruments

- EZX Instrument Kit.  
EZX Assembly, Sizing Tool, Liners(Full size) and Sterilization Tray.
- EZX Assembly  
Assembly of Universal Shaft and Side Handle.
- Sizing Tool  
Sizing Tool to measure the I.D. & O.D. of an acetabular cup to determine the size of EZX Liner and EZX Blade to use.
- EZX 1st Liner  
37-65mm (1mm increment)
- EZX 2nd Liner  
37-65mm (1mm increment)
- Sterilization Tray  
Sterilization Tray for instruments

## Bone Substitute Preformed Spacer

**Reliability, Innovation, Versatility, Safety. in the hands of the surgeon.**

- Tecres has successfully produced pre-formed antibiotic loaded spacers for since 1996. Spacers are implantable devices indicated to temporarily replace a prosthesis in a septic revision procedure. Tecres has 33 different spacers:
- 17 devices in the Spacer line: with gentamicin
- 16 devices in the Vancogex line : with vancomycin and gentamicin
- Clinical studies published in peer reviewed journals by several international centers have demonstrated that the two stage technique combined with the use of a preformed undustrial spacer produces excellent results from functional and biological point of view (eradication of infection in combination with systemic therapy).



### Spacer for Knee

- The wide range of preformed spacer include 18 variants. Four typology of stem combinable with 3 sizes of head and 2 options of antibiotic (gentamicin or vancomycin + gentamicin)



### Spacer for Hip

- The wide range of preformed spacer includes 18 variants. Four typology of stem combinable with 3 sizes of head and 2 options of antibiotic (gentamicin or vancomycin + gentamicin).



### Spacer for Shoulder

- The Tecres spacer for Shoulder has a load-bearing structure in stainless steel coated with gentamicin bone cement and it resembles a shoulder prosthesis



## Cemex Genta System Bone Cement



### Features

- Greater safety: with less monomer than any other cement on the market, Cemex® is the acrylic resin with the lowest toxicity for anyone coming into contact with
- Less heat given off: every gram of monomer generates heat amounting to 130 Kcal. Cemex® requires less liquid, so the maximum temperature reached at the end of the chemical reaction is substantially lower, thus preserving surrounding tissues
- Reduced shrinkage: shrinkage is the reduction in volume of the cement following its polymerization. It is directly proportional to the amount of liquid present. As the amount of monomer required is reduced, shrinkage is also reduced, thus greatly improving implant fixation
- Release of antibiotic: some antibiotics are heat-labile, but as Cemex® only reaches quite a low temperature during polymerization, this reduces the risk of antibiotic degradation, thus ensuring effective release of the antibiotic

## Cemex Genta ID Green Bone Cement



### Features

- Greater safety: with less monomer than any other cement on the market, Cemex® is the acrylic resin with the lowest toxicity for anyone coming into contact with
- Less heat given off: every gram of monomer generates heat amounting to 130 Kcal. Cemex® requires less liquid, so the maximum temperature reached at the end of the chemical reaction is substantially lower, thus preserving surrounding tissues
- Reduced shrinkage: shrinkage is the reduction in volume of the cement following its polymerization. It is directly proportional to the amount of liquid present. As the amount of monomer required is reduced, shrinkage is also reduced, thus greatly improving implant fixation
- Release of antibiotic: some antibiotics are heat-labile, but as Cemex® only reaches quite a low temperature during polymerization, this reduces the risk of antibiotic degradation, thus ensuring effective release of the antibiotic

## Gun Cement Bone Cement



### Features

- Gun Cement (Gun 01) to be used with Cemex System for extrude bone cement.



## Mendec Spine Bone Cement



### Features

- Mendec spine is the user friendly low viscosity spine resin. The preparation process is easy and safe, and does not require an external mixer. Its optimal fluidity and its viscosity-allow an easy injection for an extended time and enough quantity for multilevel treatment

### Advantages

- Easy and user friendly
- Mixing system included

### Package Content

- 20g of powder
- 9.4g of liquid
- 22.6 cc of volume
- Mixing container

## Beveled Tip and Diamond Tip Bone Injection Needles



### Advantages

- Luer-Lock connection system
- Shock resistant metal head
- Ergonomic handle in radiotransparent plastic or steel
- Needle direction marker

### Diamond Tip

- 9 gauge x 150 mm - Code SP0915
- 11 gauge x 120 mm - Code SP1112
- 13 gauge x 120 mm - Code SP1312
- 15 gauge x 120 mm - Code SP1512

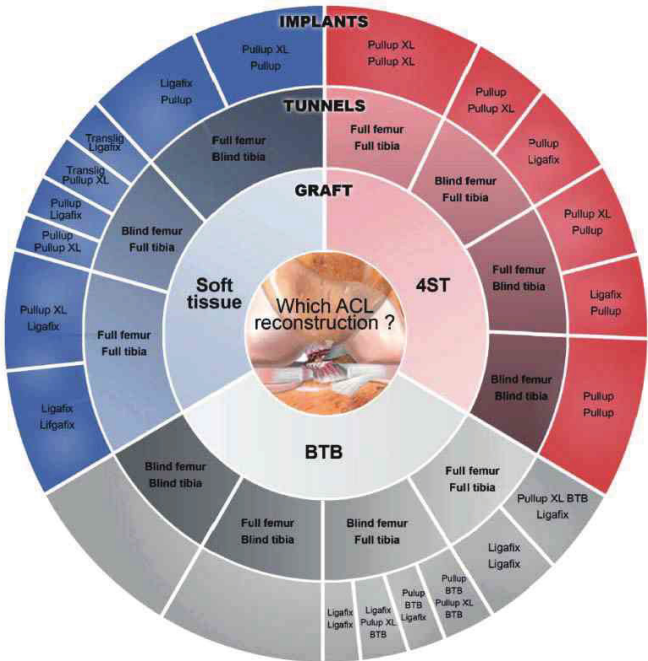
### Beveled Tip

- 9 gauge x 150 mm - Code ASB0000
- 11 gauge x 120 mm - Code ASB0010
- 13 gauge x 120 mm - Code ASB0020
- 15 gauge x 120 mm - Code ASB0120



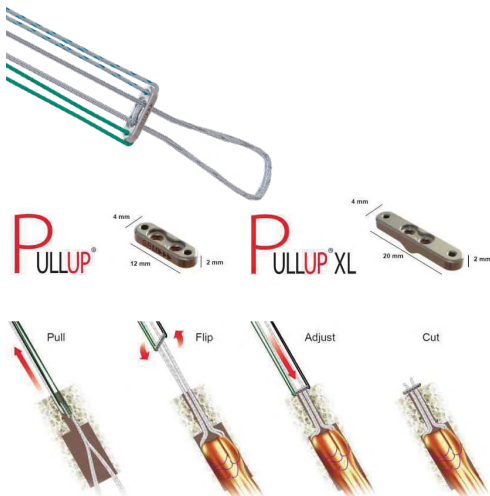
**Arthroscopic Reconstructive Surgery**  
ACL / PCL Reconstruction

We have the right option for your ACL / PCL Reconstruction  
Surgical Technique



## Arthroscopic Reconstructive Surgery

### ACL / PCL Reconstruction



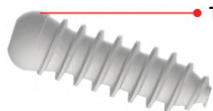
#### PULLUP adjustable juxtacortical fixation system Pull, Flip, Adjust

- Reproducible, controlled locking at blind tunnel endstop, conservation of bone stock.
- Simple, no pre-op planning of tunnel length, perioperative adjustment. Reliable, stable locking system, renowned materials.



## Arthroscopic Reconstructive Surgery

ACL / PCL Reconstruction



• Tricalcium Phosphate ( $\beta$ -TCP) + Poly DL Lactic Acid (PDLLA)

100% Osteoconductive  
100% Absorbable  
100% Bioactive

Mechanical strenght  
Elasticity

LIGAFIX<sup>®</sup> 30

30%  $\beta$ -TCP + 70% PDLLA

For all types of graft, ideal for the Kenneth Jones technique. Optimizes mechanical strength, the screw is in direct contact with the bone plug.

LIGAFIX<sup>®</sup> 60

60%  $\beta$ -TCP + 40% PDLLA

Only for soft tissue graft.  
Optimizes the kinetics of absorption.

### LIGAFIX interference screws

Bioabsorbable and osteoconductive fixation

- Bioabsorbable, made of duosorb material, the implant are absorbed progressively and do not compromise future interventions.
- Osteoconduction, the high level of TCP promotes bone ingrowth.
- Variety, Ligafix screws are available in numerous sizes, different compositions and various designs to match you technique.
- 2 heads for femoral and tibial fixation Length: from 20 to 35 mm, Diameters: from 7 to 11 mm
- Round head screws. Femoral level: preserves the graft during articular flexion Tibial level: ensures optimal locking
- Flat head screws, only for tibia, insertion facilitated at the end of screwing match you technique.

## Arthroscopic Reconstructive Surgery ACL / PCL Reconstruction, Ordering Information

### Ligafix 30 Round Head

Article No.	Implant
COM3007020	LIGAFIX 30 ROUND HEAD $\phi=7$ L=20
COM3007025	LIGAFIX 30 ROUND HEAD $\phi=7$ L=25
COM3007030	LIGAFIX 30 ROUND HEAD $\phi=7$ L=30
COM3008020	LIGAFIX 30 ROUND HEAD $\phi=8$ L=20
COM3008025	LIGAFIX 30 ROUND HEAD $\phi=8$ L=25
COM3008030	LIGAFIX 30 ROUND HEAD $\phi=8$ L=30
COM3008035	LIGAFIX 30 ROUND HEAD $\phi=8$ L=35
COM3009020	LIGAFIX 30 ROUND HEAD $\phi=9$ L=20
COM3009025	LIGAFIX 30 ROUND HEAD $\phi=9$ L=25
COM3009030	LIGAFIX 30 ROUND HEAD $\phi=9$ L=30
COM3009035	LIGAFIX 30 ROUND HEAD $\phi=9$ L=35
COM3010R25	LIGAFIX 30 ROUND HEAD $\phi=10$ L=25
COM3010R30	LIGAFIX 30 ROUND HEAD $\phi=10$ L=30
COM3010R33	LIGAFIX 30 ROUND HEAD $\phi=10$ L=33
COM3010R35	LIGAFIX 30 ROUND HEAD $\phi=10$ L=35

### Ligafix 60 Round Head

Article No.	Implant
COM6007020	LIGAFIX 60 ROUND HEAD $\phi=7$ L=20
COM6007025	LIGAFIX 60 ROUND HEAD $\phi=7$ L=25
COM6007030	LIGAFIX 60 ROUND HEAD $\phi=7$ L=30
COM6008020	LIGAFIX 60 ROUND HEAD $\phi=8$ L=20
COM6008025	LIGAFIX 60 ROUND HEAD $\phi=8$ L=25
COM6008030	LIGAFIX 60 ROUND HEAD $\phi=8$ L=30
COM6008035	LIGAFIX 60 ROUND HEAD $\phi=8$ L=35
COM6009020	LIGAFIX 60 ROUND HEAD $\phi=9$ L=20
COM6009025	LIGAFIX 60 ROUND HEAD $\phi=9$ L=25
COM6009030	LIGAFIX 60 ROUND HEAD $\phi=9$ L=30
COM6009035	LIGAFIX 60 ROUND HEAD $\phi=9$ L=35
COM6010R25	LIGAFIX 60 ROUND HEAD $\phi=10$ L=25
COM6010R30	LIGAFIX 60 ROUND HEAD $\phi=10$ L=30

### Ligafix 30 Flat Head

Article No.	Implant
COM3010030	LIGAFIX 30 FLAT HEAD $\phi=10$ L=30
COM3010035	LIGAFIX 30 FLAT HEAD $\phi=10$ L=30
COM3011030	LIGAFIX 30 FLAT HEAD $\phi=11$ L=30
COM3011035	LIGAFIX 30 FLAT HEAD $\phi=11$ L=35

### Ligafix 60 Flat Head

Article No.	Implant
COM6010030	LIGAFIX 60 FLAT HEAD $\phi=10$ L=30
COM6010035	LIGAFIX 60 FLAT HEAD $\phi=10$ L=35
COM6011030	LIGAFIX 60 FLAT HEAD $\phi=11$ L=30

### Pullup

Article No.	Implant
PULLU01201	PULLUP FIXATION $\phi=4.5$
PULXL01202	PULLUP XL FIXATION $\phi=5-10$



## Pre-loaded Absorbable Fixit



### Features

- Easy insertion, optimal tension maintained on the suture
- Available from size 4.5mm
- Absorbable threaded anchor
- Composed of a bioabsorbable anchor & 2 UHMWPE sutures, the system is pre-loaded on a disposable screwdriver which allows a quick and reproducible implantation
- FIXIT® size USP 2 sutures are incredibly strong latest-generation sutures, made of UHMWPE (Ultra High Molecular Weight PolyEthylene)

## Knotless Absorbable Fixit Knotless



### Features

- FIXIT® KNOTLESS is a bioabsorbable anchor which allows a quick and easy reproducible implantation while maintaining tension on the sutures
- Slots for tightly wedging the strands to maintain optimal tension when screwing in the anchor

## Menix Meniscal repair system



### Features

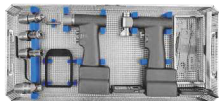
- On average, 53% of meniscectomies result in osteoarthritis in patients.
- The Menix® and Menix Duo® meniscal repair system offers a robust, reproducible and rapid meniscal repair technique.

### Specification

- Anchors: PEEK
- Sutures: UHMWPE (ultra high molecular weight polyethylene)
- Pins: Stainless steel (AISI 316 L)
- Tissue preservation:  
Reduced perforation due to the small size of the wires and anchors (anchor thickness of 0.6 mm). Less shearing due to the use of flat braids.
- Safety:  
The pins/spindles are protected in a cannula thus preserving the users from any risk of injury. Control of the insertion depth thanks to the markings on the wire No MRI artifact.
- Optimised accessibility :  
Possibility to bend the spindles to increase their range of action.
- Resistance: The pull-out strength is greater than 50 N1.
- Economical and Ecological: fully reusable, environmentally friendly instrumentation.
- Knotless system (for Menix Duo): Less risk of damage to joint surfaces.

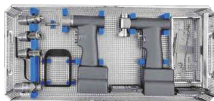
## Karinca Orthopedic Set

Surgical Motor System



## Karinca Drill Set

Surgical Motor System



### Features

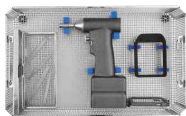
- Karinca Drill-Reamer Handpiece
- Power box (2 pcs)
- Autoclaveable sterile for aseptic battery loading
- Charger unit for 2 battery
- Drill attachment with keyed chuck
- Drill bit
- Chuck key for M206-309
- Karinca Sagittal saw Handpiece
- Sagittal saw blade
- Acetabular reamer attachment
- Reamer attachment for wire and pin
- Quick - action chuck (K-wire Driver)
- Spray oil
- Basket with silicone fixations 540 x 253 x 113 mm

### Features

- Karinca Drill-Reamer Handpiece
- Power box
- Autoclaveable sterile for aseptic battery loading
- Charger unit for 1 battery
- Drill attachment with keyed chuck
- Drill bit
- Chuck key for M206-309
- Spray oil
- Basket with silicone fixations 405 x 253 x 113 mm

## Karina Reciprocating Saw Set

Surgical Motor System

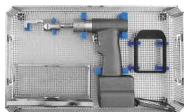


### Features

- Karina Reciprocating saw Handpiece
- Power box
- Autoclaveable sterile funnel for aseptic battery loading
- Charger unit for 1 battery Reciprocating saw blade
- Sprey oil
- Basket with silicone fixations 405 x 253 x 113 mm

## Karina Sternal Saw Set

Surgical Motor System

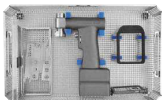


### Features

- Karina Sternum saw Handpiece
- Power box
- Autoclaveable sterile funnel for aseptic battery loading
- Charger unit for 1 battery
- Adult saw blade
- Sprey oil
- Basket with silicone fixations 405 x 253 x 113 mm

## Karina Sagittal Saw Set

Surgical Motor System



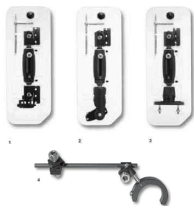
### Features

- Karina Sagittal saw Handpiece
- Power box
- Autoclaveable sterile for aseptic battery loading
- Charger unit for 1 battery
- Sagittal saw blade
- Sprey oil
- Basket with silicone fixations 405 x 253 x 113 mm





## External Fixator



### Peek Fixator

- 1 DA21D124-2 Metaphyseal Kit Sterile, Radiolucent
- 2 DA21 D123-2 Ankle Kit Sterile, Radiolucent
- 3 DA21 D126-2 Hybrid Kit Sterile, Radiolucent. Note: Used together with Rings
- 4 DA21D1022 Additional Screw Holder

### Micro Movement Fixator

- Together with Compression - Distraction Unit, 6mm Allen Key "O" means applicable
- 1 DA1 D101 Micro Movement Fixator (long) 27.6cm between outermost screws when fixator fully closed, extends by 8cm
- 2 DA1D102 Micro Movement Fixator (middle) 23.6cm between outermost screws when fixator fully closed, extends by 4cm
- 3 DA1D103 Micro Movement Fixator (short) 21.6cm between outermost screws when fixator fully closed, extends by 2cm



### Ball-Jointed Modules

- Optional Clamps
- 4 DA1 : D1001 Straight Clamp
- 5 DA2 : D1002 T Clamp
- 6 DA18 : D3001 Extended Range Clamp
- 7 ZA6 : H8001 Hybrid Coupling with Ball-Joint
- 8 DA5 : D1004PK Radiolucent Ankle Clamp



## External Fixator

### Micro Movement Fixator



### Ball-Jointed Modules

- 1 DA3 : D1021 Metaphyseal Clamp 2 (M1) GT Clamp
- 3 DA4 : D1020 B.G.T Clamp
- 4 DA6 : D1005 Angled Clamp
- 5 D1009 Double-Coupling Clamp



### Sterile Radiolucent Ankle Kit

- 6 G18003 Sterile Radiolucent Ankle Kit



### Non Ball-Jointed Modules

- 7 D1022 Additional Screw Holder

### Components / Replacements

- 1 D1010-12 Central Bodies
- 2 (M4) Central Body Components-A
- 3 (M5) Central Body Components-B
- 4 Compression-Distraction Unit
- D1016 Long, D1017 Middle, D1018 Short



### Paediatric Fixator

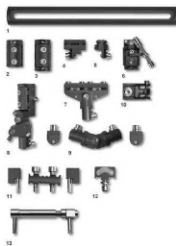
- 1 DA1, D104 Paediatric Fixator (middle)
- 2 DA1, D1007 Paediatric Straight Clamp
- 3 DA2, D1008 Paediatric T Clamp
- 4 D1105 Paediatric Double Coupling Clamp



### Ball-Joint Modules



## External Fixator



### Adult Limb Reconstruction System

- 1 DA8  
D201 L.R.S. Fixator (long)  
With 2L.R.S. Straight Outer Clamps and 1L.R.S. Straight Central Clamp
- 2 DA8  
D202 L.R.S. Fixator (middle) With 2L.R.S. Straight Outer Clamps and 1L.R.S. Straight Central Clamp
- 3 DA8  
D203 L.R.S. Fixator (short)  
With 2L.R.S. Straight Outer Clamps and 1L.R.S. Straight Central Clamp

### Components / Replacements

- 1 DA8001 L.R.S. Rails  
D2001 Long, D2002 Middle, D2003 Short
- 2 DA8  
D2013 L.R.S. Straight Outer Clamp
- 3 DA8  
D2014 L.R.S. Straight Central Clamp
- 4 DA10  
D2015 L.R.S. T-Clamp
- 5 ZS7  
D2016 L.R.S. Ball-Joint Coupling
- 6 DA11  
D2019 L.R.S. Micrometric Swivelling Clamp
- 7 (M12) L.R.S. Micrometric BGT Clamp 8 DA12001  
D2021 L.R.S. Multiplanar Clamp
- 9 D2029 L.R.S. Hinged Rail Coupling
- 10 (M13) L.R.S. T Clamp Coupling
- 11D2023 Sandwich Clamp (8mm)  
D2022 Sand wich Clamp (15mm)
- 12 D2017 Dynamic Unit
- 13 Compression-Distraction Unit D1016 Long, D1017 Middle, D1018 Short



## External Fixator



### Paediatric Limb Reconstruction System

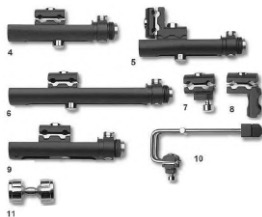
- 1 DA9  
D204 paediatric L.R.S. Fixator (250mm)  
With 3 Paediatric L.R.S. Straight Clamps
- 2 DA9  
D205 paediatric L.R.S. Fixator (200mm)  
With 2 Paediatric L.R.S. Straight Clamps
- 3 DA9  
D206 paediatric L.R.S. Fixator (150mm)  
With 2 Paediatric L.R.S. Straight Clamps

### Components / Replacements

- 1 DA9001 L.R.S. Rail  
D2004 Long, Length 25cm  
D2005 Middle, Length 20cm  
D2006 Short, Length 15cm
- 2 DA9 D2025 Paediatric L.R.S. Stright, Outer Clamp
- 3 DA9 D2047 Paediatric L.R.S. T-Clamp
- 4 DA9 D2028 Paediatric L.R.S. ball joining coupling
- 5 D2026 Paediatric L.R.S. Swivelling Clamp  
Enables an appropriate Ball-jointed  
Module to be attached to the rail.
- 6 D2048 Paediatric Dynamic Unit
- 7 D1019 Paediatric Compression - Distraction Units



## External Fixator



### Wrist Fixator

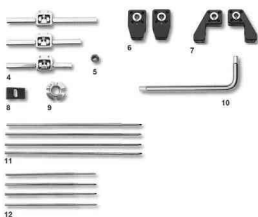
- 1 DA20 D401 Wrist Fixator 22m  
Consisting of: 1 Short Module with Straight Clamp, Cam dan Bush, 1 Long Module with Straight Clamp, Cam and Bush and 1 Double Ball-Joint
- 2 DA21 D402 Wrist Fixator (compression-distraction) 22mm Consisting of: 1 Long Module with Straight Clamp, Cam and Bush 1 Compression-Distraction Module with Straight Clamp, Cam and Bush, and 1 Double Ball-Joint
- 3 DA22 D403 Wrist Fixator (extra-articular) 20mm Consisting of: 1 Short Module with T-Clamp, Cam and Bush, 1 Compression-Distraction Module with Straight Clamp, Cam and Bush, and 1 Double Ball-Joint

### Components / Replacements

- 4 D4005 Wrist Fixator-Short Module With Straight Clamp, Cam and Bush
- 5 D4008 Wrist Fixator-Short Module With T-Clamp, Cam and Bush
- 6 D4007 Wrist Fixator-Long Module With Straight Clamp, Cam and Bush
- 7 D4008 Wrist Fixator-Straight Clamp
- 8 DA22002 D4001 Wrist Fixator-T-Clamp
- 9 D4006 Wrist Fixator-Compression - Distraction Module, with Straight Clamp, Cam and Bush
- 10 D4002 Wrist Fixator-Ulnar Outrigger Clamp
- 11 D4009 Wrist Fixator-Double Ball-Join



## External Fixator



### Mini Fixator

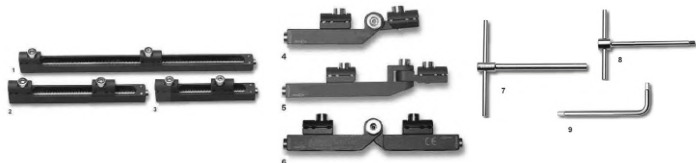
- 1 DA25 (D501 Long)  
Consisting of: 1 Minifixator Long Body  
(2 Minifixator Standard Clamps and 2 Minifixator Compression-Distraction Nuts)
- 2 DA25 (D502 Standard)  
Consisting of:  
(1 Minifixator Standard Body, 2 Minifixator Compression- Distraction Nuts.)
- 3 DA25 (D503 Short)  
Consisting of:  
(1 Minifixator Short Body, 2 Minifixator Standard Clamps and 2 Minifixator Compression-Distraction Nuts)

### Components / Replacements

- 4 DA25 Minifixator Bodies D5004 Long  
(1 Long Bar and 1 Standard Bar: total length 87mm)  
D5005 Standard (2 Standard Bars; total length 72mm)  
D5006 Short (1 Standard Bar and 1 Short Bar; total length 62mm)
- 5 DA25 (M35) Minifixator Clamp Locking Screw
- 6 DA25; D5003 Minifixator Standard Clamps (1 pair)
- 7 DA30; D5001 Minifixator L-Clamps (Left-Right)
- 8 Minifixator Spacer Used in association with Compression - Distraction Nut, Lengthening Bar and Standard Clamp.
- 9 D501-001 Minifixator Compression Distraction Nut
- 10 G10012 Allen Wrench 3mm
- 11 Threaded Wires \$ 2mm (pack of 4) Total length 100mm, Thread length 15mm
- 12 Threaded Wires \$ 1.6mm (pack of 4) Total length 70mm, Thread length 15mm



## External Fixator

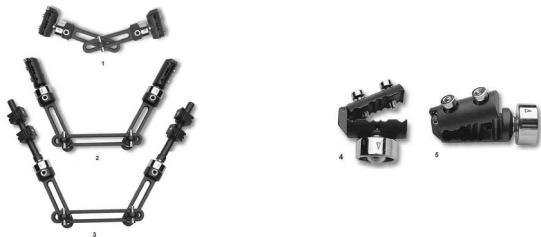


### Minirail Fixator

- 1 DA26  
D504 Minirail Fixator (170mm)
- 2 DA26  
D505 Minirail Fixator (95mm)
- 3 DA26  
D506 Minirail Fixator (70mm)
- 4 DA27  
D507 Minirail Fixator (horizontal axis)  
Allows articulation round an axis parallel to the bone screws
- 5 DA28  
D509 Minirail Fixator (vertical axis)  
Allows articulation round an axis at vertical to the bone screws
- 6 DA29  
D512 Minirail Fixator (horizontal I), Horizontal
- 7 G21000 T-Wrench For Bone Screws
- 8 (M29) T-Wrench For Clamp Screws
- 9 G10012 Allen Wrench 3mm



## External Fixator



### Pelvic Fixator

- 1 DA16  
D301 Pelvic Short-(235-305mm); T-Clamps  
Consisting of (2 Primary Links, 1 Pelvic Fixator  
Connecting Unit, 2 Cams, 2 Bushes, 2 T-Clamp and  
1 Allen Wrench 6 mm)
- 2 DA17  
D302 Pelvic Long-530mm (420-535mm)  
Straight Clamps  
Consisting of : (2 Primary Links, 1 Pelvic Fixator  
Supplementary Link, 1 Pelvic Fixator Connecting Unit,  
2 Cams, 2 Bushes, 2 Straight Clamps and 1 Allen  
Wrench 6 mm)
- 3 DA17  
D307 Pelvic long Carbon Clamp & Rod (510-620mm)  
Modules for independent Screw Placement  
Consisting of : (2 Primary Links, 1 Pelvic Fixator  
Supplementary Link, 1 Pelvic Fixator Connecting Unit,  
2 Cams, 2 Bushes, 2 Ball-Jointed Modules for  
independent Screw Placement and 1 Allen Wrench  
6 mm)

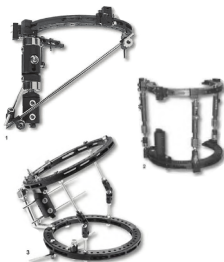
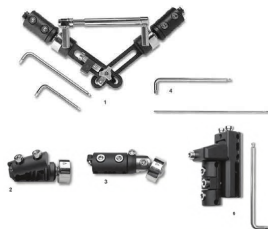
### Ball - Jointed Modules

- 4 DA2  
D1002 T-Clamp For anterior applications  
Acts as its own template for insertion of screw  
between the interior and superiorl spines
- 5 DA1  
D1001 Straight Clamp For iliac crest applications  
Acts as its own template for insertion of screws into  
the iliac crest.





## External Fixator



### Elbow Fixator

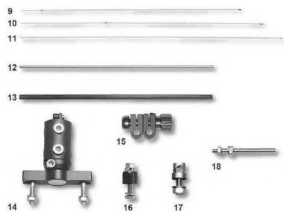
- 1 DA18; D305 Elbow Fixator With Straight Clamps Consisting of : (2 Primary Links, 1 Elbow Fixator Central Connecting Unit, 2 Cams, 2 Bushes, 1 Elbow Fixator Small Distractor, 2 Straight Clamps, 1 pair of Elbow Fixator Compression - Distraction Unit Spacers, 1 Long Compression-Distraction Unit, 1 Allen Wrench 6mm and 1 Allen Wrench 3 mm
- 2 DA1 (D1007 Straight Clamp) Acts as its own template for insertion of screws in the humerus and ulna
- 3 D3001 Elbow Extended Range Clamp Acts as its own template for screw insertion in the ulna. It is used when a wider choice of angle for screw placement is necessary
  - 4 Allen Wrench F10012 3mm, G10017 6mm
  - 5 K-Wire Without Olive 2mm, Length 150mm
  - 6 D120 Petrochanteric Fixator complete with Allen Wrench 5mm

### Hybrid Fixator System

- 1. ZA6 Hybrid Fixator Assembly Consisting of: 1 2/3 Ring, 2 Two-Hole, K-Wire Securing Pins, 2 Three-Hole Wire, Clamp Slider Units, 1 Micromovement Central body (Short or Standard), 1 Micromovement Straight Clamp, 1 Hybrid Coupling with Ball-Joint, 2 Posts, 2 Supplementary Screw Holder Clamps
- 2. HA5 Sheffield Ring Fixator Assembly For Reconstruction Consisting of : 2 2/3 Rings, 2 Two-Hole Securing Pins, 2 Three-Hole Wire Clamp Slider Units, 1 Sheffield Clamp, 3 Reduction Units
- 3. HA5 Sheffield Ring Fixator Assembly for Reconstruction Consisting of : 2 2/3 Rings, 2 1/3 Rings, 4 locking Screws, 1 Sheffield Clamp, 2 Hinge Clamps, 4 Threaded Bars and 8 Nuts and Washer, 1 Compression-Distraction Clicker Unit, 2 Extension Plates and 2 single Screw Clamps



## External Fixator



### Hybrid Fixator System, Component Replacement

- 1 ZA6005 2/3 Rings  
H7001 inner 150mm  
H7002 inner 175mm  
H7003 inner 190mm  
H7004 inner 220mm  
H7135 inner 120mm
- 2 ZA6005 1/3 Rings  
H7154 inner 120mm  
H7005 inner 150mm  
H7006 inner 175mm  
H7007 inner 190mm  
H7008 inner 220mm
- 3 Bolt  
M6X20 Bolts Length 16mm (set of 10)  
M6X21 Bolts Length 20mm (set of 10)  
M6X22 Bolts Length 24mm (set of 10)
- 4 ZA6002  
H7009 Three Hole Wire Clamp  
Should be used with 1 or 2 wires only
- 5 ZA6002 (H7010 Two Hole Pin Clamp)
- 6 (M31) Independent Wire Clamp
- 7 (M32) Large Washers
- 8 ZA6001 (H8001 Hybrid Coupling)
- 9 K-Wire With Lateral Olive
- 10 K-Wire With Central Olive
- 11 K-Wire Without Olive
- 12 D6010Cr 6mm Rod (300mm)  
D6011Cr 6mm Rod (200mm)  
D6012Cr 6mm Rod (100mm)
- 13 D6010Ts 6mm Rod (350mm) Carbon  
D6011Ts 6mm Rod (250mm) Carbon  
D6012Ts 6mm Rod (150mm) Carbon
- 14 DA1001 (H7013 Ring Clamp)
- 15 ZS2001 (M33) Supplementary Screw Holder Clamp
- 16 ZA6003 (H7012 Single Screw Clamp)
- 17 (M34) Half Pin Fixation Bolt
- 18 ZA6004 (H7011 Post)

## External Fixator



19



20

21



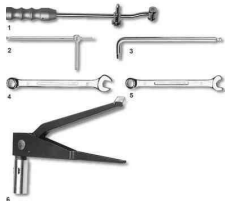
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### Hybrid Fixator System, Component Replacement

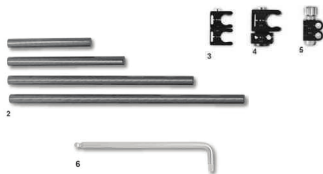
- 19 H7201 Self-Lengthen Rod Distractor - Double Ring
- 20 Revision Locking Screw Washers
- 21 Nuts and Washers

### Road to Pin

- 1 Rod to Pin Fixator



6



2

3

4

5

6

### Hybrid Fixator System, Instrumentation

- 1 G18002 Wire Guide
- 2 (M35) Universal Allen Wrench
- 3 G10017 Allen Wrench 6mm
- G30017 Allen Wrench 5mm
- G10013 Allen Wrench 4mm
- G10012 Allen Wrench 3mm
- 4 G81031 Speed Wrench
- 5 (M36) Speed Wrench
- 6 G18001 2.0mm Wire Tensioner

### Components / Replacements & Template

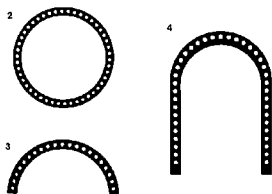
- 2 Rods
- 3 ZS2001 D6025 14mm Rod Clip Clamp
- 4 ZS1002D6029 14mm Pin Clip Clamp
- 5 D6028 6mm Rod to Pin / Rod Clamp

### Instrumentation

- 6 G30017 Allen Wrench 5mm



## External Fixator



### TK - Ring System

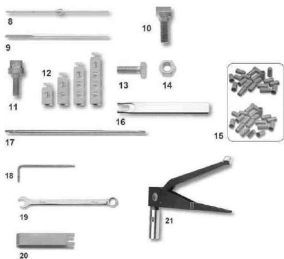
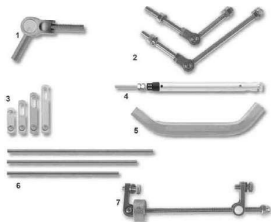
- 1 HA3
  - H715 Deformity Corrcetion Fixator (80mm)
  - H716 Deformity Corrcetion Fixator (100mm)
  - H717 Deformity Corrcetion Fixator (120mm)
  - H718 Deformity Corrcetion Fixator (130mm)
  - H719 Deformity Corrcetion Fixator (140mm)
  - H720 Deformity Corrcetion Fixator (150mm)
  - H721 Deformity Corrcetion Fixator (160mm)
  - H722 Deformity Corrcetion Fixator (170mm)
  - H723 Deformity Corrcetion Fixator (180mm)
  - H724 Deformity Corrcetion Fixator (200mm)
  - H725 Deformity Corrcetion Fixator (220mm)
  - H726 Deformity Corrcetion Fixator (240mm)

### External Supports

- 2
  - H7019 Ring 150mm
  - H7020 Ring 160mm
  - H7021 Ring 170mm
  - H7022 Ring 180mm
  - H7023 Ring 200mm
  - H7024 Ring 220mm
  - H7025 Ring 240mm
- 3
  - 1/2 Rings
  - HA2005 Half Ring 120mm
  - HA2005 Half Ring 150mm
  - HA2005 Half Ring 170mm
  - HA2005 Half Ring 200mm
- 4
  - H7040 Foot Ring 120mm
  - H7043 Foot Ring 150mm



## External Fixator



### TK - Ring System Hinges, Distractors, and Connections

- 1 (M38) Universal Hinge
- 2 HA2001  
H7122 Inline Hinge  
H7123 Outboard Hinge
- 3  
H7050-001 20mm Plate  
H7050-002 30mm Plate  
H7050-003 40mm Plate  
H7050-004 50mm Plate
- 4  
H7211 Self-Lengthen Rod Distractor-70mm  
H7212 Self-Lengthen Rod Distractor-100mm  
H7213 Self-Lengthen Rod Distractor-150mm  
H7214 Self-Lengthen Rod Distractor-200mm
- 5 H7231 Oblique Support Rod
- 6 HA1001  
H7140 Threaded Rod 60mm  
H7142 Threaded Rod 110mm  
H7144 Threaded Rod 150mm  
H7146 Threaded Rod 200mm  
H7148 Threaded Rod 300mm  
H7150 Threaded Rod 400mm
- 7 ha2002 Angular Distractors  
H7136 (Standard)  
H7137 (Long)

### Fixation Elements

- 8 Bayonet Wire With Stopper
- 9 K Wire 1.8mm x 400mm
- 10 H7124 Pin Bolt
- 11 (M40) Half Pin Fixation Bolt
- 12  
H7126 1 Hole Post  
H7127 2 Hole Post  
H7128 3 Hole Post  
H7129 4 Hole Post
- 13 Bolt  
M6X20 Bolts Length 16mm (set of 10)  
M6X21 Bolts Length 20mm (set of 10)  
M6X22 Bolts Length 24mm (set of 10)
- 14 T97.1 Nuts (set of 10)
- 15 Covers
- 16 (M41) Nut Applicator
- 17 Half Pin

### Instrumentation

- 18  
G10017 Allen Wrench 6mm  
G30017 Allen Wrench 5mm  
G10013 Allen Wrench 4mm  
G10012 Allen Wrench 3mm
- 19 G81031 Speed Wrench
- 20 G521061 Wrench With Double Open Ends
- 21 G18001 2.0mm Wire Tensioner



## External Fixator



### Transknee Fixator System

- 1  
308 Transknee Fixator (L.R.S.)  
Consisting of:  
1 2/3 ring, 1 ring clamp,  
1 L.R.S. Transknee body  
2/3 ring  
H7001 inner 150  
H7002 inner 175  
H7003 inner 190  
H7135 inner 120
- 2  
D309 Transknee Fixator (Rod to Pin)  
Consisting of:  
1 Rod to Pin Transknee body,  
5 14mm Pin Clip Clamp (Peek Rod)



## External Fixator

### Bone Screws, Self Tapping Screw



Screw Code	Shaft	Thread Length	Total Length	Thread
PLT6050220 (5060)	6 mm	50 mm	220 mm	50-60 mm
PLT6060220 (5060)	6 mm	60 mm	220 mm	50-60 mm
PLT6070220 (5060)	6 mm	70 mm	220 mm	50-60 mm
PLT6050200 (5060)	6 mm	50 mm	200 mm	50-60 mm
PLT6070200 (5060)	6 mm	70 mm	200 mm	50-60 mm
PLT6040200 (5060)	6 mm	40 mm	200 mm	50-60 mm
PLT6030200 (5060)	6 mm	30 mm	200 mm	50-60 mm
PLT6060200 (5060)	6 mm	60 mm	200 mm	50-60 mm
PLT6060190 (5060)	6 mm	60 mm	190 mm	50-60 mm
PLT6050190 (5060)	6 mm	50 mm	190 mm	50-60 mm
PLT6050180 (5060)	6 mm	50 mm	180 mm	50-60 mm
PLT6060180 (5060)	6 mm	60 mm	180 mm	50-60 mm
PLT6070180 (5060)	6 mm	70 mm	180 mm	50-60 mm
PLT6040180 (5060)	6 mm	40 mm	180 mm	50-60 mm
PLT6030180 (5060)	6 mm	30 mm	180 mm	50-60 mm
PLT6040170 (5060)	6 mm	40 mm	170 mm	50-60 mm
PLT6030150 (5060)	6 mm	30 mm	150 mm	50-60 mm
PLT6040150 (5060)	6 mm	40 mm	150 mm	50-60 mm
PLT6050150 (5060)	6 mm	50 mm	150 mm	50-60 mm
PLT6060150 (5060)	6 mm	60 mm	150 mm	50-60 mm
PLT6070150 (5060)	6 mm	70 mm	150 mm	50-60 mm
PLT6050130 (5060)	6 mm	50 mm	130 mm	50-60 mm
PLT6040130 (5060)	6 mm	40 mm	130 mm	50-60 mm
PLT6030120 (3545)	6 mm	30 mm	120 mm	35-45 mm
PLT6040120 (5060)	6 mm	40 mm	120 mm	50-60 mm
PLT6040120 (3545)	6 mm	40 mm	120 mm	35-45 mm
PLT6050120 (5060)	6 mm	50 mm	120 mm	50-60 mm
PLT6040110 (3545)	6 mm	40 mm	110 mm	35-45 mm
PLT6030110 (5060)	6 mm	30 mm	110 mm	50-60 mm
PLT6040110 (5060)	6 mm	40 mm	110 mm	50-60 mm
PLT6030100 (5060)	6 mm	30 mm	100 mm	50-60 mm
PLT6030100 (3545)	6 mm	30 mm	100 mm	35-45 mm
PLT6050100 (5060)	6 mm	50 mm	100 mm	50-60 mm
PLT6040100 (3545)	6 mm	40 mm	100 mm	35-45 mm
PLT6040100 (5060)	6 mm	40 mm	100 mm	50-60 mm
PLT6030100 (4045)	6 mm	30 mm	100 mm	40-45 mm
PLT6020100 (3540)	6 mm	20 mm	100 mm	35-40 mm
PLT6040100 (4045)	6 mm	40 mm	100 mm	40-45 mm
PLT603090 (5060)	6 mm	30 mm	90 mm	50-60 mm
PLT603580 (3235)	6 mm	35 mm	80 mm	32-35 mm
PLT603080 (3235)	6 mm	30 mm	80 mm	32-35 mm
PLT602080 (3540)	6 mm	20 mm	80 mm	35-40 mm
PLT403580 (2530)	4 mm	35 mm	80 mm	25-30 mm
PLT602070 (3235)	6 mm	20 mm	70 mm	32-35 mm
PLT402070 (2530)	4 mm	20 mm	70 mm	25-30 mm
PLT402070 (3033)	4 mm	20 mm	70 mm	30-33 mm


**External Fixator**
**Bone Screws, Hydroxyapatite Screw**

Screw Code	Shaft	Thread Length	Total Length	Thread
HA1-PLT6050180 (5060)	6 mm	50 mm	180 mm	50-60 mm
HA1-PLT6040170 (5060)	6 mm	40 mm	170 mm	50-60 mm
HA1-PLT6030150 (5060)	6 mm	30 mm	150 mm	50-60 mm
HA1-PLT6040150 (5060)	6 mm	40 mm	150 mm	50-60 mm
HA1-PLT6050130 (5060)	6 mm	50 mm	130 mm	50-60 mm
HA1-PLT6040130 (5060)	6 mm	40 mm	130 mm	50-60 mm
HA1-PLT6030120 (3545)	6 mm	30 mm	120 mm	35-40 mm
HA1-PLT6030110 (5060)	6 mm	30 mm	110 mm	50-60 mm
HA1-PLT403580 (2530)	4 mm	35 mm	80 mm	25-30 mm
HA1-PLT402070 (2530)	4 mm	20 mm	70 mm	25-30 mm


**Bone Screws, Self Drilling Screw**

Screw Code	Shaft	Thread Length	Total Length	Thread
ZLO6080250 (5060)	6 mm	80 mm	250 mm	50-60 mm
ZLO6060220 (5060)	6 mm	60 mm	220 mm	50-60 mm
ZLO6040220 (5060)	6 mm	40 mm	220 mm	50-60 mm
ZLO6050200 (5060)	6 mm	50 mm	200 mm	50-60 mm
ZLO6060150 (5660)	6 mm	60 mm	150 mm	56-60 mm
ZLO6050150 (5660)	6 mm	50 mm	150 mm	56-60 mm
ZLO6040150 (5660)	6 mm	40 mm	150 mm	56-60 mm
ZLO6040150 (5060)	6 mm	40 mm	150 mm	50-60 mm
ZLO6050150 (5060)	6 mm	50 mm	150 mm	50-60 mm
ZLO6050140 (5060)	6 mm	50 mm	140 mm	50-60 mm
ZLO6050130 (5060)	6 mm	50 mm	130 mm	50-60 mm
ZLO6040120 (3545)	6 mm	40 mm	120 mm	35-45 mm
ZLO6050120 (5060)	6 mm	50 mm	120 mm	50-60 mm
ZLO4030100 (3033)	4 mm	30 mm	100 mm	30-33 mm
ZLO3030100 (2530)	3 mm	30 mm	100 mm	25-30 mm
ZLO403580 (3033)	4 mm	35 mm	80 mm	30-33 mm
ZLO403070 (3033)	4 mm	30 mm	70 mm	30-33 mm
ZLO303070 (2530)	3 mm	50 mm	70 mm	25-30 mm
ZLO302070 (2530)	3 mm	20 mm	70 mm	25-30 mm
ZLO301570 (2530)	3 mm	15 mm	70 mm	25-30 mm
ZLO301850 (2530)	3 mm	18 mm	50 mm	25-30 mm
ZLO302045 (2025)	3 mm	20 mm	45 mm	20-25 mm

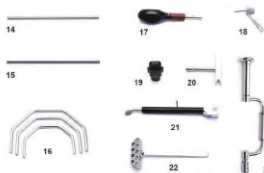




## External Fixator



### Upper Limbs: Rod & Instruments



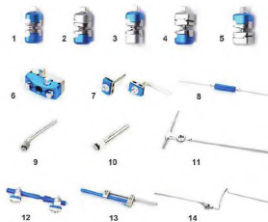
### ZS9 Upper Limbs

- 1 ZS92001 Rod to rod coupling
- 2 ZS92002 Pin to rod coupling
- 3 ZS92012 Inverted pin to rod coupling
- 4 ZS92003 Double pin to rod coupling
- 5 ZS92013 Inverted Double pin to rod coupling
- 6 ZS91004 5 hole pin clamp
- 7 ZS91002 Multi-pin clamp
- 8 ZS91003 Joint Clamp
- 9 ZS93003 30 angled post
- 10 ZS93001 Straight post
- 11 ZS99001 Connecting rod for elbow (short)
- 12 ZS99002 Connecting rod for elbow (long)
- 13 ZS99003 Connecting rod for wrist
- 14  
ZS95050 SS connecting rod 5x50  
ZS95100 SS connecting rod 5x100  
ZS95150 SS connecting rod 5x150  
ZS95200 SS connecting rod 5x200  
ZS95250 SS connecting rod 5x250
- 15  
ZS96050 Carbon connecting rod 5x50  
ZS96100 Carbon connecting rod 5x100  
ZS96150 Carbon connecting rod 5x150  
ZS96200 Carbon connecting rod 5x200  
ZS96250 Carbon connecting rod 5x250
- 16  
ZS97001 Semi-circular rod (S)  
ZS97002 Semi-circular rod (M)  
ZS97003 Semi-circular rod (L)
- 17 G20002 Hex pin driver
- 18 G20004 Guide for pin
- 19 G20006-01 Thumbwheel
- 20 G20010 T-wrench
- 21 G20008 Reduction wrench
- 22 G20012 Multi-pin insertion guide
- 23 G20014 Manual drill handle



**Bfix™**  
External Fixator

## External Fixator



### Lower Limbs: Rod & Instruments



### ZS8 Lower Limbs

- 1 ZS82001 Rod to rod coupling
- 2 ZS82002 Pin to rod coupling
- 3 ZS82012 Inverted pin to rod coupling
- 4 ZS82003 Double pin to rod coupling
- 5 ZS82013 Inverted double pin to rod coupling
- 6 ZS81001 5 hole pin clamp
- 7 ZS81002 Multi-pin clamp
- 8 ZS8001 Dynamization tube (single)
- 9 ZS83003 30 angled post
- 10 ZS83001 Straight post
- 11 ZS89003 Connecting rod for elbow (short)
- 12 ZS88004 Compression / distraction tube (M)  
ZS88014 Compression rod to pin coupling
- 13 ZS88021 Adjustable tube (short)  
ZS88022 Adjustable tube (long)
- 14 ZS89001 Connecting rod for knee (L)  
ZS89002 Connecting rod for knee (R)
- 15 ZS84150 AL Connecting rod 8x150  
ZS84200 AL Connecting rod 8x200  
ZS84250 AL Connecting rod 8x250  
ZS84300 AL Connecting rod 8x300  
ZS84350 AL Connecting rod 8x350  
ZS84400 AL Connecting rod 8x400
- 16 ZS86150 Carbon Connecting rod 8x150  
ZS86200 Carbon Connecting rod 8x200  
ZS86250 Carbon Connecting rod 8x250  
ZS86300 Carbon Connecting rod 8x300  
ZS86350 Carbon Connecting rod 8x350  
ZS86400 Carbon Connecting rod 8x400
- 17 ZS87001 Semi-circular rod (S)  
ZS87002 Semi-circular rod (M)  
ZS87003 Semi-circular rod (L)
- 18 G20001 Hex pin driver
- 19 G20005 Guide for pin
- 20 G20006-2 Thumbwheel
- 21 G20010 T-wrench
- 22 G20009 Reduction wrench
- 23 G20012 Multi-pin insertion guide
- 24 G20011 Torque limited wrench
- 25 G20014 Manual drill handle
- 26 G20017 Pin holder

## External Fixator



### SK-ZS Universal Set for Upper Limbs



### SK-ZS Universal Set for Lower Limbs



### Smart Mini System

- 1 ZS102001 Rod to rod coupling
- 2 ZS102002 Pin to rod coupling
- 3 ZS102012 Inverted pin to rod coupling
- 4 ZS102003 Double pin to rod coupling
- 5 ZS102013 Inverted double pin to rod coupling
- 6 ZS102002 Multi-pin clamp
- 7 ZS106050 Carbon connection rod 3x50  
ZS106100 Carbon connection rod 3x100  
ZS106150 Carbon connection rod 3x150
- 8 ZS92001 Rod to rod coupling x4  
ZS92002 Pin to rod coupling x2  
ZS92012 Inverted pin to rod coupling x2  
ZS92003 Double pin to rod coupling x2  
ZS92013 Inverted double pin to rod coupling x2  
ZS91004 4 hole pin clamp x2  
ZS93003 30 angled post x2  
ZS93001 Straight post x4  
ZS95050 SS connecting rod 5x50 x1  
ZS95100 SS connecting rod 5x100 x1  
ZS95150 SS connecting rod 5x150 x1  
ZS95200 SS connecting rod 5x200 x1  
ZS95250 SS connecting rod 5x250 x1  
ZS97001 Semi-circular rod (S) x1  
ZS97002 Semi-circular rod (M) x1  
ZS97003 Semi-circular rod (L) x1  
ZS99003 Connecting rod for wrist x1  
ZSA30-100 3.0x100mm pin x2  
ZSA40-120 4.0x120mm pin x2  
G20002 Hex pin driver (upper limbs) x1  
G20004 Guide for pin 5mm x1  
G20006-01 Thumbwheel x1
- 9 ZS82001 Rod to rod coupling x8  
ZS82002 Pin to rod coupling x2  
ZS82012 Inverted pin to rod coupling x2  
ZS82003 Double pin to rod coupling x2  
ZS82013 Inverted double pin to rod coupling x2  
ZS81001 5 hole pin clamp x3  
ZS83003 30 angled post x6  
ZS83001 Straight post x2  
ZS84200 AL connecting rod 8x200 x1  
ZS84250 AL connecting rod 8x250 x1  
ZS84300 AL connecting rod 8x300 x1  
ZS84350 AL connecting rod 8x350 x1  
ZS87001 Semi-circular rod (S) x1  
ZS87002 Semi-circular rod (M) x1  
ZS87003 Semi-circular rod (L) x1  
ZSA50-150 5.0x150mm pin x10  
ZSA40-120 4.0x120mm pin x6  
G20005 Guide for pin 8mm x1  
G20006-02 Thumbwheel  
G20009 Reduction wrench (lower limbs) x2  
G20010 T-wrench x1  
G20012 Multi-pin insertion guide x1  
G20014 Manual drill handle x1  
G20016 Pin holder 4mm x1  
G20017 Pin holder 5mm x1



## Cast

Plaster of Bandage



## S-Splint

Synthetic Splint



### Features

- Expertise  
The product of the only casting material specialized company in Korea
- Consistent quality  
It always maintains consistent quality, smooth feeling and high solidity in modeling
- Economical use  
Even though smaller volume is used than that of other companies, high strength is maintained saving the quality used

### Features

- Convenient use (pre-cut type)  
As various sizes are available, it can be immediately used only after selecting size
- Anti bacterial and deodorization treated  
Its inside is fiberglass which is water setting poly urethane resin coated and its surface is anti bacterial and deodorized felt
- Allow activity in short time  
In 20 minutes of application, patient can move
- Easy storage  
Each pack has the length of one time use. It does not require separate sealed storage (pre cut type). It can be easily sealed with sealing clip which prevents natural haedening (roll type)



## Lite-S

### Fiberglass Casting Tape



#### Features

- Economical use  
Use it the same way with plaster bandage. Its high strength saves the amount of use
- Excellent molding  
Patient can move after 30 minutes of application. Perfect penetration. Able to see through it using X-ray
- Great waterproof  
Due to porosity, it is well ventilated and not affected by water or moisture
- Various colors  
Major colors are white, green, blue. Other color can be ordered, depending on the order quality
- Cover the part to be treated with stockinette and put undercast padding (cotton bandage) around
- First wear glove (must) open Duk-In product, soak it in room temperature water for 5-10 seconds and brush off the water
- Put bandage around the affected part overlapping 1/2-2/3 of the bandage
- In general, put 3-4 layer but for the part that needs to support body weight put 5-6 layers
- After 3-15 minutes of application setting is ready and 20 minutes after setting, it can perfectly support the weight

# ENDO

## ENDO EI.PT.CD.v2

Cannulated Drill



### Handpiece

- Voltage 14V
- Power output 100W
- Temperature 25 degree celcius

### Charging

- Output power AC 110-220V, 50/60Hz
- Output voltage 14.4V, 700mA
- Charging time 3 hours
- Input power 30VA
- Battery voltage 14.4V

## ENDO Surgical Power Tools



### Features

- ENDO power tools handpieces which provide the surgeon with power for the most demanding acetabular reaming procedures. Dedicated saws include the rotary design that allows a 360° cutting range, which reduces the distance to the surgical site, a critical factor to ease osteotomy procedures.

### Power and Reliability

- High torque single function power tools. This has been achieved through continual engineering refinements.

## ENDO Surgical Power Tools

Power Tools



### Features

- ENDO power tools is the latest innovation in high performance large bone power tools. This modular handpiece provides outstanding torque for drilling and reaming. This new handpiece produces 10% more reaming torque.

### Versatility and Reliability

- Rotary attachment for quick and easy connection include : Bone drill (chuck), reamer with all the major connectors present on the market, wire / pin driver. Twin trigger handpiece with forward, reverse and oscillating modes.

**Karinca M206-300**  
Sagittal Saw System



**Features**

- Sagittal saw system ('Without saw blades and power box)
- High-Low speed options
- Steam sterilisable
- 11.000 - 14.000 cpm / 4 standart 50'
- 77 x 158 x 218 mm / 930 g

**Karinca M206-235**  
Reciprocating Saw System



**Procedures**

- Reciprocating saw system ('Without saw blades and power box)
- High-Low speed options
- Steam sterilisable
- 11.000 - 14.000 cpm / 4 mm
- 77 x 182 x 212 mm / 960 g

**Karinca M206-200**  
Hexa Function Drill System



**Features**

- Dual Trigger system for speed control and direction control
- Steam sterilisable
- Drill mode F&R (1200 rpm)
- Drill Oscillation Mode (1200 cpm)
- 77 x 137 x 212 mm / 920 g

**Karinca M206-240**  
Sternum Saw System



**Procedures**

- Sternum saw system ('Without saw blades, guide and power box)
- High-Low speed options
- Steam sterilisable
- 11.000 - 14.000 cpm / 4 mm
- 77 x 180 x 212 mm / 1040 g



## Click Off Screws

Click Off Screws



## Twin

Compression Screws



### Product Specifications

- Self drilling
- Self tapping
- Drill connection with predetermined breaking point

### Indications

- Fixation of small bone fragments and osteotomies in the forefoot. In particular for weil osteotomy, chevron osteotomy and scarf osteotomy on the metatarsal V

### Product Specifications Twin

- Compression due to different thread pitches at the screw head and at the screw tip
- Reverse cutting threads
- Color coding green for twin 2.4 and gold for twin 3.0

### Indication Twin 2.4

- Fixation of fractures of small bone fragments and arthrodeses of small joints in the hand and foot. In particular for scaphoid, metatarsal, metacarpal fractures, fractures of the processus styloideus radii and ulnae, fractures of the proximal radius head, arthrodesis of the distal interphalangeal joint

### Indication Twin 3.0

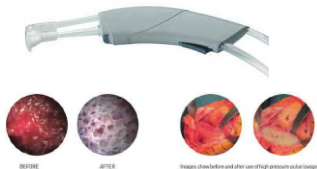
- Fixation of fractures of small bone fragments and osteotomies and arthrodeses of small joints in the hand and foot. In particular for scaphoid fractures, scarf, chevron and akin osteotomy, arthrodesis of the first metatarsal phalangeal joint



## CALEB

INNOVATIVE MEDICAL DEVICE

### Single Use Pulse Lavage Pulse Lavage



#### Clean Bone Bed

- Effective bone bed preparation is one of the corner stones in Modern Cementing Technique. According to the Swedish Hip Arthroplasty Register the use of Modern Cementing Technique can lead to a significant reduction in the risk of revision

#### High pressure pulse lavage

- High pressure pulse lavage is a vital step towards achieving proper cement penetration and fixation into the cancellous bone. High pressure pulse lavage has proven to be advantageous in removing debris and bone arrow from bone bed compared to syringes. It improves cement penetration and may also reduce the risk of embolic complications in joint replacement. Clinical studies have shown that the use of high pressure pulse lavage in total joint replacements may reduce the risk of revisions caused by aseptic loosening

#### Effective cleaning for optimal microinterlock

- A clean bone cavity, achieved with high pressure pulse lavage, ensures better cement penetration than with syringe lavage. This improves the quality of the bone cement interface, reduces the risk of blood lamination and enhances the mechanical strength of the cement.

#### Reduced risk of fat embolism

- The cleaning sequence may prevent micro embolisation of the marrow contents and significantly minimizes circulatory changes. The result of removing medullary content has been proven both experimentally and clinically to reduce risk of fat embolism. Not only the volume, but also the pressure of pulse lavage, and influences the risk of fat embolism.



### Disposable Pulse Lavage Pulse Lavage



#### Features

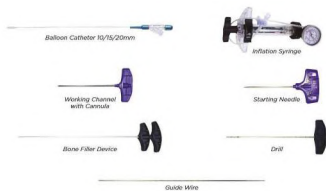
- Clearer field and easier to operate
- Ergonomic design, minimal set up, easy to use
- To increase permeability between bone cement and sclerotic
- To reduce the dosage of antibiotics and expenses
- Pressure up to 15 PSI
- Long operation life
- 600-1200ml/min
- To reduce the risk of fat embolism
- Reduce the inflammation of the wound after suturing is complete

#### Specifications

- Arthroplasty fan spary nozzle, femoral brush nozzle
- Spine fan spary nozzle, femoral nozzle (long)
- Trauma and wound care fan spary nozzle, shower spary nozzle, large splash shield

# GUARDIAN

## Balloon Kyphoplasty Kyphoplasty System

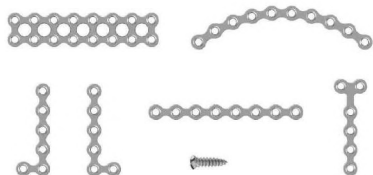


### Features

- Minimally Invasive Spine Surgery
- Fast Pain Relief
- Safe delivery of bone cement
- User friendly approach
- Local Anesthesia
- Fast recovery

# ENDO

## Maxillofacial Implant Set



## Special Trauma Implant



Ribs Plate



Patella Hook



Spinal Mesh

# ENDO

**ENDO Arthroplasty**



Total Knee Replacement



Hip, Arthroplasty  
Cemented & Cementless Stem



Acetabular Cup



Bipolar  
Head



Total  
Acetabular Cup



Cemented Acetabular Cup

# DISPOSABLES PRODUCT LIST



- Adult Diapers
- Anesthesia
- Colostomy Bag
- Disposable ESU Plate
- ECG Electrode
- Electrosurgical Pencil
- Gastroenterology
- Ileostomy Bag
- Laryngeal Mask
- Mucus Extractor
- Respirometer
- Surgery
- Transfusion
- Ultrasound Gel
- Umbilical Cord Clamp
- Underpads
- Urology
- Urostomy Bag
- Vacuum Tubes

# Romsons

## Suction Catheter With Thumb Control GS-2030TS Bronchial Suction Catheter



### ENDO Bronchial Suction Catheter

- Suction catheters are suitable for removal of secretion from mouth, trachea and bronchial tubes.
- Manufactured from non-toxic non-irritant medical grade PVC.
- Distal end is open with one lateral eye.
- Frozen surface tubing for smooth intubation.
- Colour coded for instant size identification.
- Straight packed in a peelable soft blister
- Sterile, ready to use
- Box of 100 / master box of 1000

### GS-2030

- Provided with universal funnel shaped connector for safe connection to the standard suction equipment.

### Suction Catheter (Thumb Control)

- Provided with "T" type vacuum control valve with thumb control for proper manoeuvring

## Guedel Airways GS-2012 Oropharyngeal Airway (OPA)



### Features

- Guedel Airways are designed to maintain an unobstructed oropharyngeal airway during or following general anaesthesia and also in patients who are unconscious for other reasons.
- Integral hard bite block avoids airway occlusion and biting of tongue.
- Stepless airway path for easy cleaning / suctioning.
- Bite blocks are colour for instant identification of sizes
- Manufactured from non toxic, non-irritant polymer PE.
- Individually packed in peelable soft blister pack.
- Sterile, ready for use.
- Box of 50/Master box of 400.

Sizes	Length	Colour Code
000	4 cm	Natural
00	5 cm	Blue
0	6 cm	Black
1	7 cm	White
2	9 cm	Yellow
3	10 cm	Red
4	11 cm	Orange
5	12 cm	Purple

# Romsons

## Oxy Lock GS-2038

Venturi Mask



### Features

- Variable venturi system to ensure accurate concentrations of oxygen with single unit.
- Transparent air entrainment mask with soft anatomical form with easily adjustable elastic strap.
- Wide, adjustable strap for proper positioning of mask on the nasal area.
- Rotating type connector for patient's comfort.
- Unique spring loaded mechanism locks prescribed concentration in place ensuring safety & accuracy.
- 210 cm (7 ft.) multichannel tube provided to ensure continuous flow of oxygen
- Master box of 50.

Sizes	Tube Length
Adult	210 cm (7 ft)

## Oxy Set GS-2016

Oxy Set



### Features

- Oxy-Set is suitable for easy application and efficient administration of oxygen for greater comfort of the patient.
- The system of attachment provides maximum freedom to the patient and leaves the patient's mouth free for nutritional and communication purposes.
- Twin prong / nasal tips are designed to ensure equal volume of oxygen to both the air passages.
- Soft funnel shaped connector facilitates easy connection to the oxygen source.
- Multichannel tube ensures continuous supply of oxygen, even if the tube is accidentally kinked.
- Manufactured from soft, light weight non toxic material.
- Available in sterile and non-sterile options.
- Sterile packed in peelable soft blister pack.
- Box of 20/Master box of 200 (Sterile).
- Non-sterile packed in polybag.
- Master box of 100 (Non-Sterile).

Prong Sizes	Tube Length
Adult	210 cm (7 ft)
Child	210 cm (7 ft)
Neonate	210 cm (7 ft)

# Romsons

## Aeromist GS-2074

Micro Mist Nebulizer Set



### Features

- Soft, clear Aerosol Mask with anatomical form is ideal for long term use.
- Gently rolled, feathered edges with integrated nose bridge for extra comfort.
- Swivel connector for convenience of nebulization in horizontal and vertical position.
- Larger surface area provided by unique convex cone design, ensures maximum capillary action and eliminates medicinal wastage.
- Nebulization rate : 3cc / 10 mins.
- Set consists of : Aerosol Mask, Nebulizer chamber & 210 cm. (7ft) Multichannel tube.
- Master box of 50 pcs.

Sizes	Tube Length
Adult	210 cm (7 ft)
Child	210 cm (7 ft)

## Hi Mask GS-2044

Oxygen Mask with Reservoir Bag



### Features

- High Concentration Oxygen Therapy.
- Equipped with soft, transparent and odour free Mask for greater patient comfort.
- Non return valves provided at inhale and exhale points, prevent carbon dioxide retention.
- Light weight reservoir improves the oxygen efficiency and patient comfort.
- Master box of 50

### Unit consists of

- Mask with Elastic Strap and Non Return Valve.
- Mask Connector with Non Return Valve.
- 600 ml Reservoir capacity.
- 210 cm. (7 ft.) long Multichannel Tube

Product Code	Reservoir	Tube Length
GS 2044	600 ml	210 cm

Sizes	Tube Length
Adult	210 cm (7 ft)
Child	210 cm (7 ft)



# Romsons

## Flexi Mask GS-2020

Oxygen Mask



### Features

- Flexi Mask is designed for convenient oxygen therapy.
- Moulded face mask is manufactured from non-toxic, non irritant medical grade PVC.
- Provided with adjustable elastic strap for proper positioning of mask on the nasal area.
- Swivel connector for convenience of attachment to the oxygen tube.
- 210 cm. (7ft) multichannel tube is provided to ensure continuous flow of oxygen
- Proximal end of tube is fitted with soft funnel shape connector for easy connection to oxygen source.
- Non-sterile, individually packed in poly bag.  
Master Box of 50

Sizes	Tube Length
Adult	210 cm (7 ft)
Child	210 cm (7 ft)

## Epidural Kit GS-2026

Epidural Anesthesia Kit



### Features

- EPIDURAL/TUOHY NEEDLE : Tuohy type needle is provided with clear depth marking for accurate insertion depth reading, polished inner bevel edge minimize the risk of catheter shearing.
- EPIDURAL CATHETER: Closed round soft tip with three lateral eyes.
- LOR SYRINGE : Specially designed syringe suitable for air & saline technique, provides clear identification of epidural space.
- THREADING ASSIST GUIDE: Fits securely into the needle & assists in easy advancement of catheter.
- DETACHABLE CONNECTOR: Separate twist lock connector.
- HYDROPHOBIC FILTER: Hydrophobic 0.2 micron filter provides additional safety & control against microbial infections.
- Box of 1/Master Box of 50.

Sizes
FG 16 & FG 18

# Romsons

## Resq Bag GS-2050, GS-2052 Silko Mask GS-2049

Manual Resuscitators & Spare Mask for  
Manual Resuscitators



## Catheter Mount GS-2040

"T" Connector



### Resq Bag GS-2050 (Reusable)

- Resq Bag kit consists of a Silicone Manual Resuscitator, Multichannel Kink Resistant Oxygen Tubing, Reservoir Bag & Silicone Mask.
- Silicone Resuscitator provides excellent bag re-expansion property.
- Pressure limiting valve ensures crucial adjustments for enhanced performance.
- Presence of 360° swivel joint between patient valve and face mask facilitates ease of maneuverability to interface with the patient's posture.
- Autoclavable.
- Box of 1/Master Box of 8.

### Resq Bag GS-2052 (Disposable)

- Resq Bag kit consists of a TPE Manual Resuscitator, Multichannel Kink Resistant Oxygen Tubing, Reservoir Bag and Inflatable Mask.
- The Resuscitator supports excellent bag re-expansion property.
- Pressure limiting valve ensures crucial adjustments for enhanced performance.
- Presence of 360° swivel joint between patient valve and face mask & facilitates ease of maneuverability to interface with the patient's posture.
- Box of 1/Master Box of 10.

### Silko Mask GS-2049

- 100% Silicone material.
- Spare mask.

Product	Sizes
Resq Bag	Adult Child Infant
Silko Mask	0, 1, 2 3, 4, 5

### Features

- Double swivel elbow connector with suction port and cap provides better flexibility, easy accessibility and provides comfort to the patient during suction.
- 15mm I.D./22mm O.D. connector, snugly fits to all tracheal tubes.
- 22mm standard female connector is compatible with all breathing & ventilator circuits.
- Specially designed port at the elbow facilitates suction & gas sampling without disconnecting the breathing circuit.
- Stepless airway path for easy cleaning.
- Collapsible corrugated tubing is inert to all anaesthetic gases & reagents.
- Individually packed in poly bag.
- Box of 20/Master box of 200

# Romsons

## Endotracheal Tube (Plain) GS-2002 Endotracheal Tubes



### Features

- Manufactured from thermosensitive material readily conforming to body contours at body temperature.
- Naso-oral tip Suitable for Nasal / Oral intubation.
- Kink resistant tube minimizes possibility of tube occlusion.
- Radio-opaque line throughout the tube length to facilitate exact location of the tube.
- Proximal end is fitted with standard 15mm connector conforming to ISO-5356-1.
- Single Use, no risk of cross infection.
- Sterile, individually packed in blister pack
- Box of 10/Master box of 100.

### Sizes

2.0 mm to 4.5 mm Bore with 0.5 mm stage

## Endotracheal Tube (Cuffed) GS-2004 Endotracheal Tubes



### Features

- Thermo sensitive tube softens at body temperature to conform to the anatomy of the respiratory tract.
- Kink resistant inflation tube ensures patient safety during cuff inflation and deflation.
- Murphy eye has a polished smoothness, assisted by lateral ventilation of airway.
- Low Pressure Cuff reduces the risk of creasing or inflation and minimizes pressure on trachea wall.
- Soft, high volume, low pressure cuff provides an air tight fit between tube and trachea.
- Radio opaque line throughout the length to facilitate exact location of the tube.
- Standard 15mm Connector conforming to ISO-5356-1.
- Conforms to F-29 standards.
- Sterile, individually packed in blister pack.
- Sterile, ready for use.
- Box of 10/Master box of 100.

### Sizes

5.0 mm to 10.0 mm Bore with 0.5 mm stage

# Romsons

## Romo Vac Set GS-5002F, GS-5002N

Close Wound Suction Unit



## Romo Seal GS-5020, GS-5031

Water Seal Drainage System



### Features

- Suitable to offer surgeons an effective device for close wound drainage under negative pressure postoperatively with the option to use one or two catheters simultaneously.
- Redon drain catheters are provided with size colour coded, radio opaque line and satin smooth eyes.
- Connecting tube is kink resistant and is provided with additional strength to withstand the suction.
- Available in different sizes with catheter matching size curved needle to meet minor, moderate to heavy drainage needs.
- Easy to depress chamber to activate the suction of bellow unit, single handedly..

### Features

- Bellow unit, Connecting tube with clamp and "Y" connector, Redon Needle (Curved needle) attached to matching size catheter and Spare catheter.
- Curved Needle Length 175 cm for all sizes except FG
- 8 where it is 90 cm and bellow capacity is 50 ml. Sterile, Box of 1.

Product Code	Size
GS-5002F (500 ml)	10,12,14,16
GS-5002N (50 ml)	08

### Features

- Available in different capacities.
- Easy to read graduation on the bottle helps to determine the drain volume precisely.
- Clearly marked initial level ensures the under water seal.
- Write on facility on the side of scale helps in monitoring of the drainage volume.
- Separate suction port is provided for connection with the suction unit.
- Kink resistant large bore tubing facilitates unrestricted flow.
- Extra large connector provided to facilitate easy connection to the catheter.
- Unit is provided with metal hangers and floor stand.
- Complete unit is sterile and packed in a box.
- Box of 1/Master box of 10.

Product Code	Capacity
GS 5020 (adult)	2000 ml
GS 5031 (mid)	1200 ml

# Romsons

## Chest Drainage Catheter GS-5010 Drainage Catheter



## Thoracic Trocar Catheter Catheter with Trocar



### Features

- Thoracic drainage catheters are most suitable for post operative drainage following cardio-thoracic surgeries.
- Distal end is open with super smooth large eyes to maximise the drainage from the chest.
- Proximal end is fitted with specially designed tapered tongue to provide excellent forceps grip and nontraumatic insertion.
- Catheters are marked at every 2 cm. from the last eye to ascertain the depth of placement.
- Packed with matching size spare connector which facilitates easy connection to drainage system.
- Sterile, ready for use.
- Box of 20/Master box of 200.

Sizes in FG	Length
16, 20, 24, 28, 32	450 mm

### Features

- Specially designed for quick non-operative pleural and chest drainage for the relief of chest conditions such as tension pneumothorax.
- Catheter manufactured from medical grade PVC fits snugly over the trocar.
- Blunt yet smooth tip.
- Flat handle facilitates easy manoeuvrability.
- Large, smooth drainage eyes for efficient drainage.
- Markings provided at 5, 10, 15 & 20 cm from the distal tip help ascertain depth of penetration.
- Proximal end is fitted with tapered connector for easy connection to drainage bottle.
- Sterile, individually double packed in peelable pouch.
- Box of 10/Master box of 100.

Sizes in FG	Length
10	160 mm
12	160 mm
20	350 mm
24	350 mm
28	350 mm
32	350 mm

# Romsons

## Yankaur Suction Set GS-5016 A

Yankaur Suction



## Yankaur Suction GS-5016

Yankaur Suction



### Features

- Yankaur Suction Set is suitable for removal of secretions, blood and debris etc peri operatively.
- Complete set is provided with Yankaur suction tip mounted on 2 mtr long ribbed tube, provided with universal connector at both ends.
- Universal connectors are moulded from soft PVC, so as to accommodate the suction tip on one end and all type of connectors of suction apparatus at the other end.
- Ribbed tube is kink resistant and has the strength to withstand the suction.
- Box of 10 / Master box of 100.
- Tube length 200 cm, OD 9.00 mm, ID 6.00 mm, Tip Midi VC.

### Yankaur Suction Tip GS-5014 (A1 – A6)

- Yankaur Suction Tips are available in different size variants as Fine/Mini/Midi/Maxi with an option of with or without vaccum control.
- Sterile, individually packed.
- Box of 25/ Master box of 500.

Tube Length	O.D/ I.D
200 cm	9.0/ 6.0 mm

### Features

- Moulded Yankaur suction handle attached with 2.5 mtr long tube.
- Specially designed flexible, kink resistant tube provides unobstructed suction during the prolonged use.
- Soft flexible adaptors at both ends of the tube provides safe grip to the handle as well as at the suction source.
- Vent port is permanently closed with tight fit sleeve which can be removed with small incision by blade to change over to vent control system.
- Box of 10/Master box of 100.

# Romsons

## Tracheostomy Tube Plain, GS-2008 Tracheal Tubes Plain



### Features

- Made of thermosensitive medical grade PVC which provides sufficient hardness during insertion.
- Being light in weight and non irritant, it avoids inflammation around tracheostomy tube.
- Soft flexible flange.
- 15mm connector can be rotated in 360 degree direction and facilitates safe connection to breathing system.

Product Code	Size in mm
GS 2008	4, 4.5, 5, 6, 7, 7.5, 8, 9, 10

## Tracheostomy Tube (Cuffed) GS-2010 Tracheal Tubes Cuffed



### Features

- Made of thermosensitive material.
- Soft low pressure cuff dynamically adjusts the pressure at the point of contact during the breathing cycle.
- Pilot balloon with non return valve facilitates cuff inflation and deflation.
- Radio opaque blue line.
- Soft and flexible flange provided with inner & outer diameter sizes.

Product Code	Size in mm
GS 2010	5, 6, 7, 7.5, 8, 9, 10

## Suction Connecting Tube GS-5017 Suction Tube



### Features

- Suction connecting tube with Molded Connectors.
- Flexible connectors ensure easy and secure
- Sterile, Individually packed.
- Box of 10/ Master Box of 100.

Tube Length	I.D. / O.D.
200, 250, 300 cm	Tube : 6.0 / 9.0 mm

# Romsons

## Urine Bag GS-1020 Urine Collecting Bag



### Features

- Closed urine drainage system for short and long term use.
- Manufactured from soft clinical grade PVC sheeting.
- Reinforced eyelets allow easy hanging and provide maximum protection against tearing.
- Push / Pull type bottom outlet allows convenient emptying.
- Kink resistant 90cm tube provided with universal tapered connector.
- Easy to read scale for quick determination of urine volume.
- Sterile individually packed, Pack of 25 / Master box of 250.
- Non sterile bulk pack, Box of 200 / Master box of 400.

Capacity	Tube length
2000 ml	90 cm

## Urine Leg Bag GS-1024 Urine Leg Bag



### Features

- Suitable for day and night use for incontinence.
- Manufactured from soft clinical grade PVC sheeting.
- Available with "T" type bottom outlet.
- Non-return valve to prevent the back flow of urine.
- Printed with easy to read scale.
- Convenient for tying on thigh with optional elastic straps.
- Supplied As: Sterile, individually packed. Box of 10 / Master box of 200.
- Non sterile bulk pack. Master box of 200.

Sizes	
Capacity : 750 ml	Tube Length 40 cm



# Romsons

## Male Catheter GS-1010 Kondom Catheter



### Features

- Male Cath is specially designed for urine incontinence for day and night use in male patients.
- Manufactured from 100% latex for soft and gentle feel.
- Provided with soft adhesive coated strip for proper fixation.
- Proximal end is tubular shaped, designed for safe and easy connection to the urine bag or leg bag.
- Individually packed in peelable soft blister pack.
- Sterile, ready for use.
- Box of 50/Master box of 500.

### Sizes

Sizes	
Small	20 mm
Medium	25 mm
Large	30 mm

## Urometer 250 GS-1018-250 Urine Bag (Measured Vol Chamber)



### Features

- Specially designed for measurement of hourly urine output.
- Clear and transparent measured volume chamber provides accurate measurement.
- Urine chamber directly attached to the urine bag with overflow facility.
- 150 cm long kink resistant tubing ensures unrestricted flow of urine.
- Completely closed system eliminates the risk of contamination.
- Screw type bottom outlet provided for easy and quick emptying of urine bag.
- Universal tapered connector with sampling port facilitates mid stream urine sampling.
- Sterile and individually packed in a box. Box of 1/Master box of 50.

Sizes	Chamber Capacity	Bag Capacity
GS-1018-250 : Standard		
Adult	250 ml	2000 ml

# Romsons

## Urometer 500 GS-1018-500

Urine Bag (Measured Vol Chamber)



### Features

- Closed urine drainage system with graduated chamber to measure the urine output on hourly basis in ICU & CCU's.
- 500 ml transparent chamber has four fine measuring sections to measure the accurate & precise volume of the urine.
- Collection chamber is provided with hydrophobic filter to minimize the risk of urinary tract infection.
- Single handed operation of the valve for emptying all chambers simultaneously.
- Bypass system is provided to prevent the overflow.
- Two ltr capacity urine collecting bag with clamp & "T" shaped bottom outlet.
- 120 cm long kink resistant tubing ensures unrestricted flow of urine.
- Tapered connector with sampling port facilitates easy & aseptic mid stream urine sampling.
- Flexible fastening strap for easy hanging to bed side.
- Sterile, individually packed in box.
- Box of 1/Master box of 20.

Chamber Capacity	500 ml
Length of Tube	120 cm

## Nelaton Catheter GS-1004

Urine Drainage Catheter



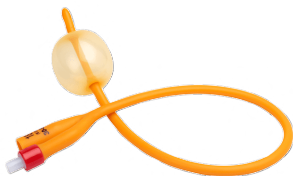
### Features

- Nelaton catheters are used for short term bladder catheterisation.
- Manufactured from non-toxic, non-irritant medical grade PVC compatible with catheter lubricants.
- Frozen surface tubing for super smooth intubation.
- Presence of radio opaque line throughout the catheter tube.
- Distal end is coned for non-traumatic introduction with two lateral eyes for efficient drainage.
- Proximal end is fitted with universal funnel shaped connector for extension.
- Funnel shape connectors are colour coded for instant identification of sizes.
- Straight packed in peelable soft blister pack.
- Sterile, ready for use.
- Available in male and female versions. Box of
- 100/Master box of 1000.

Sizes in FG	Colour Code
6	Sea Green
8	Blue
10	Black
12	White
14	Green
16	Orange
18	Red
20	Yellow
Male	Total Length : 40 cm

# Romsons

## Foley Balloon Catheter 2 Way GS-1072



### Features

- Symmetrical large capacity balloon ensuring a straight tip for proper flow and good sphincter action, thus preventing bladder leakage.
- Manufactured from natural rubber coated with silicone to eliminate the risk of encrustation.
- Coned distal end provided with burr free eyes for atraumatic intubation.
- Hard valve ensures easy inflation and deflation of balloon.
- Colour coded for instant size identification.
- Sterile, individually packed in peelable pack.
- Box of 50/Master box of 500.

Sizes in FG	Balloon Capacity
8	3-5 ml/cc
10	3-5 ml/cc
12	15-30 ml/cc
14	15-30 ml/cc
16	30-45 ml/cc
18	30-45 ml/cc

# Romsons

## I.V Cannula GS-3022, GS-3031 Intra Venous Cannula



### Features

- Kink resistant FEP-Teflon cannula has extremely smooth inner and outer surface to ensure minimum trauma and smooth flow.
- Double tapered moulded cannula tip ensures smooth and less traumatic cannulation.
- Super sharp triple facette bevelled needle is specially designed with two cutting edges for smooth penetration.
- Transparent flashback chamber allows immediate detection of blood.
- Sterile, individually packed in blister pack.

### I.V. Cannula, Intra Cath 2 GS-3022

- I.V. Cannula with Wing, Injection Port and Luer Lock.
- I.V. Cannula with Injection Port and non return valve is provided for additional medication.
- Injection Port Cap is size colour coded for instant size identifications.
- I.V. Cannula bears three radioopaque stripes for X-Ray detection.
- Sterile, individually packed in peel open blister pack.
- Sizes: 14, 16, 18, 20, 22 & 24 G
- Box of 100/Master box of 1000.

### Micron, Neonate I.V. Cannula

- Neonate I.V. Cannula with wing and luer lock.
- Sterile, Blister Pack, Tyvek Lid.
- Size: 26G, Length : 19 mm
- Box of 100/ Master box of 1000.

## RMS Vented Infusion Set SS-3060 Infusion Set



### Features

- Sharp piercing spike for easy insertion in I.V. Container
- Infusion set with built in air vent and bacteria barrier hydrophobic filter.
- Specially designed cylindrical collapsible drip chamber to visualize the flow rate.
- Provided with disc type fluid filter to filter any particulate matters in the I.V. fluid.
- Long super smooth kink resistant tubing with efficient roller controller for accurate and unrestricted flow.
- Flash ball type injection port for extra medication.
- Infusion set with drop rate of 20 drops / ml
- Polybag of 25 / Master box of 500.

### Mikroperf (SS 3064)

- Drop size reduces to 60 drops/ml.
- With built-in air vent.
- Available with or without vein needle.

Tube Length	Drop Rate
150 cm	20 drops / ml

# Romsons

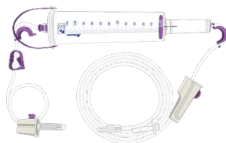
## Blood Administration Set Blood Transfusion Set



### Features

- Conforms to ISO 1135-4.
- Cylindrical drip chamber provided with 200 micron filter to prevent passage of any clot into the chamber.
- Sharp non-vented spike suitable for blood bags and all type of standard blood containers.
- Available with or without 19 G vein needle.
- Flash ball type injection port for extra medication.
- 150 cm. kink resistant tube.
- Efficient roller controller for accurate adjustment of infusion rate.
- Sterile and individually packed.
- Polybag of 25/Master box of 500.

## Pedia Drip SS-3057 Infusion Set with Burette



### Features

- Burette type measured volume chamber of 100ml with 10ml overflow limit.
- Micro drip with drop sizes 60 drops per ml.
- Burette chamber is made of biocompatible medical grade transparent polymer, suitable for infusion of all types of fluids.
- Specially designed hanger facilitates the hanging of complete device on the I.V. stand.
- Floating auto shut off valve acts as floating indicator and automatically shuts off the drain path when the chamber gets empty to prevent any air trapping into the fluid line or entering patient's venous system (air embolism).
- Roller controller provides accurate flow control.
- No-Kink device prevents the kinking of tube during transportation.
- Separate injection ports for extra medication and continuous change over.
- Sterile individually ribbon packed.
- Box of 10 / Master box of 100.

### Pedia Drip Plus SS-3057

- 100% latex free measured volume set provided with Y-injection site & luer slip connector
- All other features are as above

# Romsons

## Centro GS-3042

Central Venous Catheter Kit



## Bi-Valve GS-3040

Three Way Stop Cock



### Features

- Manufactured from specially formulated and biocompatible PU material.
- Specially designed soft tip catheter to make the insertion easy and non-traumatic.
- Based upon much preferred Seldinger technique.
- Specially designed Guidewire with soft J-tip prevents the perforation and provides good torque to ensure firm insertion.
- Radio-opaque catheter with clear marking, facilitates correct placement.
- Sterile, individually packed in hard blister pack.
- Box of 10/Master box of 20.

### Kit consists of

- Soft tip Polyurethane catheter „J“ tip Guide Wire with dispenser
- “Y” shaped Introducer Needle, Tissue dilator
- Suture wing and clamp fastener, Scalpel
- Extension Line clamp, Syringe 5ml
- Injection site, Hypodermic needle (20G x 25mm)
- Needle sponge

Optional	Sizes
Double Lumen	7 Fr x 16 cm
Triple Lumen	7 Fr x 16 cm

### Features

- Three Way Stop Cock is suitable for use during pressure infusion and invasive blood pressure monitoring.
- Comprises of one male luer lock with rotating nut and two female luer lock connectors.
- Clear transparent, polycarbonate lipid resistant body, facilitates easy visualisation of fluid flow.
- Rigid construction with circular flow channel prevents air entrapment.
- Smooth three arm handle is easy to operate and indicates fluid path.
- Universal 6% luer taper facilitates leak proof connection with corresponding devices.
- Male luer lock with rotating nut prevents accidental disconnection.
- Sterile, individually packed in blister pack. Box of 50/Master box of 1000.

Residual Vol.	Pressure
<= 0.20 ml	5 bar

# Romsons

## Vein O Line GS-3034 Three Way with Tube



### Features

- Male luer lock at one end and 3-way stop cock at other end and fits all standard equipment.
- Sterile, individually packed in peelable soft blister pack.
- Length: 10, 50, 100, 150, 200 cm.
- Box of 20/Master box of 200.

## PM-O-Line GS-3036 Perfusor Line



### Features

- Small bore high pressure extension line.
- Suitable for high pressure monitoring.
- Provided with male and female luer lock at either ends and fits all standard equipment.
- Luer lock provide secure fitment.
- Sterile, individually packed in peelable soft blister pack
- Lengths available on request.
- Box of 20/Master box of 200

#### Length

150cm & 200cm

# Romsons

## Romolene GS-4032 Nasogastric Tube (NGT)



### Features

- Suitable for nasogastric introduction, for nutritional purposes or aspiration of intestinal secretions.
- Manufactured from medical grade PVC.
- Super smooth, low friction surface facilitates easy intubation and reduces the incidence of nasal discharge.
- Radio opaque line is provided throughout the length
- Proximal end is provided with universal funnel shaped connector.
- Sterile, soft peelable blister pack.
- Marked at 50, 60 & 70 cm.
- Box of 50/Master box of 500

Sizes in FG	Colour Code
8	Blue
10	Black
12	White
14	Green
16	Orange
18	Red
20	Yellow
Effective Length : 102 cm	Total Length : 105 cm

## Infant Feeding Tube GS-4008 Infant Feeding Tube



### Features

- Manufactured from DEHP free PVC.
- Suitable in neonatal and paediatric enteral nutritional feeding.
- Distal end is coned with two lateral eyes.
- Proximal end with female luer mount for easy connection to enteral feeding bag connector or luer mount/luer slip syringe.
- Tube is marked at 20 cm from the tip.
- Low friction tubing and super smooth tip ensures trauma free intubation.
- Provided with radio opaque line to facilitate accurate location.
- Sterile, straight packed in peelable soft blister pack.
- Box of 100/Master box of 2000.

Sizes in FG	Colour Code
5	Grey
6	Green
7	Clear
8	Blue
9	Orange
10	Black
Effective Length : 50 cm	Total Length : 52 cm



# Romsons

## Feeding Bag GS-4028

Feeding Bag, Gravity Bag



### Features

- Specially designed 1.2 Lit. capacity bag for feeding purpose.
- An ice pouch is provided with the bag for preserving the food for longer period.
- A transfer set is directly connected to the bag for easy feeding.
- Roller controller is provided to control the flow at which food is going to the patient.
- A hanger is provided with bag for easy handling.
- Sterile, individually packed in peelable pouch
- Box of 5/Master Box of 50

## Mucus Extractor GS-5018

Infant Mucus Extracting Device



### Features

- Used for aspiration of secretion from oropharynx in newly born babies to ensure free respiration.
- Clear transparent container permits immediate visual examination of the aspirate.
- Also suitable for obtaining mucus specimen for microbiological examination.
- Spare plug cap is provided to seal the container for safe transportation of specimen to the laboratory for aseptic disposal of container.
- Low friction surface catheter is provided with open end silk smooth round tip, for trauma free insertion.
- Individually packed in peelable soft blister pack for aseptic handling.
- Sterile, ready for use.
- Box of 20/Master box of 400.

# Romsons

## Respirometer GS-6018 Breathing Exerciser



### Features

- Innovative system to exercise respiration through inspiration.
- Specially designed with three stage chambers to provide more efficient exercise to patient on a step up basis.
- Device is composed of base and central part divided into three chambers containing three small spheres of different size and colour.
- Three spheres rise proportionately to the inspiration exerted.
- It can be dismantled for cleaning and disinfection.
- Box of 1/Master box of 20.

## Umbilical Cord Clamp GS-508 Clamping Devices, Umbilical Clamp



### Features

- Suitable for clamping the umbilical cord of new born baby, immediately after birth.
- Provided with dual security lock with distinct "click" to indicate the correct locking.
- Finger grip ensures safe and convenient handling, particularly when gloves are wet.
- Provided with grooves all along the length to prevent the slipping of umbilical cord and retain it in the same position.
- Manufactured from non toxic medical grade polymer.
- Supplied in blue colour.
- Individually packed in blister pack.
- Sterile, ready for use.
- Box of 100/Master box of 4000.

# Romsons

## Umbilical Catheter

Umbilical Catheter



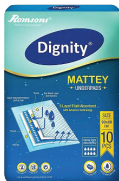
### Features

- Special designed catheter for intermittent access to the umbilical vessels of new born.
- Smooth round tip helps easy cannulation.
- Open distal end without lateral eyes, eliminates the chance of clot formation in the blind spaces.
- Radio opaque catheter is provided for X-ray.
- Clear scale markings at every cm helps to ascertain depth of insertion.
- Proximal end is fitted with female luer mount for convenient connection to I.V. therapy equipment

Size	Colour	Length
3.5, 4	Clear	35cm
5	Grey	
6	Green	
8	Blue	

# Romsons

## Dignity Mathey Underpads GS-8414 Underpads



### Features

- Clinically Proven
- Top sheet gives soft cloth like comfort
- PE back sheet prevents leakage
- Tissue with better core integrity
- Unique quilted pattern
- Side seal prevents leakage

#### Size

60 x 60 cm
60 x 90 cm

## Dignity Overnight Pull-Ups Adult Diapers



### Features

- Clinically proven
- Used for bladder control for both men and women
- Higher absorbency
- Advance leakage protection
- Provides full profile coverage
- Maintain dry feeling and no skin irritation
- Ease of usage and comfort fit with no slippage

#### Size

Size	Waist (mm)
Medium / Large	609 -1358 mm
Large / Extra Large	863 - 1500 mm

#### Waist (mm)

## Vacuum Tubes



## ENDO - KANG JIAN Vacuum Tubes

Nama Item	Spesifikasi	Volume	Additive	Qty / Box	Qty / Karton
K2.EDTA 3 mL - Glass	Ø 13x75 mm	3 ml	EDTA K2	100	1800
K2.EDTA 2 mL - Glass	Ø 13x75 mm	2 ml	EDTA K2	100	1800
K3EDTA 3 mL - Glass	Ø 13x75 mm	3 ml	EDTA K3	100	1800
K3EDTA 3 mL - Glass, for Soft Needle	Ø 13x75 mm	3 ml	EDTA K3	100	1800
K3EDTA 3 mL - Plastic	Ø 13x75 mm	3 ml	EDTA K3	100	1800
K3EDTA 2 mL - Glass	Ø 13x75 mm	2 ml	EDTA K3	100	1800
K3EDTA 0.5 mL - Glass		0.5 ml	EDTA K3	100	3000
Plain / Serum 3 mL - Glass	Ø 13x75 mm	3 ml	Plain / No Additive	100	1800
Plain / Serum 3 mL - Plastic	Ø 13x75 mm	3 ml	Plain / No Additive	100	1800
Plain / Serum 5 mL - Glass	Ø 13x75 mm	5 ml	Plain / No Additive	100	1800
Plain / Serum 5 mL - Plastic	Ø 13x75 mm	5 ml	Plain / No Additive	100	1800
Plain / Serum 10 mL - Glass	Ø 16x100mm	10 ml	Plain / No Additive	100	1200
Clot Activator 3 mL - Glass	Ø 13x75 mm	3 ml	Clot Activator	100	1800
Clot Activator 3 mL - Plastic	Ø 13x75 mm	3 ml	Clot Activator	100	1800
Clot Activator 5 mL - Glass	Ø 13x75 mm	5 ml	Clot Activator	100	1800
Clot Activator 5 mL - Glass, for Soft Needle	Ø 13x75 mm	5 ml	Clot Activator	100	1800
Clot Activator 5 mL - Plastic	Ø 13x75 mm	5 ml	Clot Activator	100	1800
Sodium Citrate 1.8 mL - Glass	Ø 13x75 mm	1.8 ml	Sodium Citrate	100	1800
Sodium Citrate 2.7 mL - Glass	Ø 13x75 mm	2.7 ml	Sodium Citrate	100	1800
Sodium Fluoride 3 mL - Glass	Ø 13x75 mm	3 ml	Sodium Fluoride	100	1800
Lithium Heparin 4 mL - Glass	Ø 13x75 mm	4 ml	Heparin Sodium	100	1800
Gel Clot Activator 3 mL - Glass	Ø 13x75 mm	3 ml	Gel & Clot Activator	100	1800
Gel Clot Activator 3 mL - Plastic	Ø 13x75 mm	3 ml	Gel & Clot Activator	100	1800
Gel Clot Activator 5 mL - Glass	Ø 13x75 mm	5 ml	Gel & Clot Activator	100	1800
ESRTube 1.28 mL	Ø 9x120 mm	1.28 ml	Sodium Citrate	100	1800

## ENDO

## ENDO Non-woven Adhesive Wound Dressing Strip without Pad Wound Dressing



### Benefits

- Provides light compression without causing constriction
- Strong medical adhesive holds dressing safely, even in the presence of moisture
- Easily cut to eliminate waste
- Latex-free

### Features

- Indicated for Fixation. Indicated for fixation and widely used in place of surgical tapes to secure and retain primary dressings on surgical or trauma wound sites
- Latex-free. These latex-free dressing roll provide light compression without causing constriction for joints and highly contoured parts of the body
- Convenient. Convenient and easily cut to size.
- Non-woven adhesive wound dressing strip without pad: Soft, stretchable non-woven adapts well to the body

### Size & Package

- 5cm / 5 cm : 1roll/box
- 10cm / 5 cm : 1roll/box

## ENDO Non-woven Adhesive Wound Dressing with Pad Wound Dressing



### Benefits

- High MVTR, waterproof PU film/ spun lace non woven fabric allows excess moisture to pass away, reduces the risk of maceration
- Bacterial barrier protects wounds against external contamination
- Absorbent pad absorbs exudates, non adherent to wound sites
- Hypoallergenic adhesive minimizes the risk of allergic response, provides gentle, secure fixation.

### Features

- Fit for low to moderate exuding, superficial and non-infected acute wounds, such as post operative wounds, bruise, minor cuts, abrasions and lacerations
- Sterilized self-adhesive island dressing is made of non-woven fabric or highly permeable polyurethane film coated with medical adhesive, fabric pad. It is absorbent and permeable.

### Size & Package

- Size : 6cm x 7cm
- Package : 1 pcs/pack, 50 pack/box

## ENDO

## ENDO Hydrocolloid Dressing Wound Dressing



### Benefits

- Keep the wound in a moist environment, promote wound healing, effectively release pain and reduce care frequency
- Water-proof, protect the wound from microbial invasion
- Excellent elasticity and self-adhesive, convenient and comfortable to wear
- Easy to peel off, no adherence to wound effectively reduce the potential damage
- Available in different size and shapes to meet the clinical needs

### Features

- Hydrocolloid dressing is intended for surgery, trauma wound; Category I and II pressure ulcers treatment and other lightly to moderate exuding wounds
- Hydrocolloid dressing are manufactured with PU film, release paper and hydrocolloid, which has good performance on water absorption, compliance and stickiness, and provide a warm and moist healing environment for promoting wound healing

### Size & Package

- Size : 10cm x 10cm
- Package : 1 pcs/pack, 20 pack/box

## ENDO IV Dressing with Notch Wound Dressing



### Features

- Function. I.V. dressing is a moisture permeable dressing specially designed to meet the needs of catheter fixation and to keep the catheter site dry
- Frame Style. Frame style transparent film I.V. dressing with notch. Paper frame design; Makes placement accurate and easy, minimizes potential to stick to gloves or to itself
- PU Film. Breathable and transparent, which is convenient to observe the injection wound site; provides a waterproof, sterile barrier to external contaminants
- U shape. "U" cut Convenient for fixing I.V. Cannula
- Label. Documentation label: Make records and convenient for doctors and nurse.

### Size & Package

- Size : 6cm x 7cm
- Package : 1 pcs/pack, 100 pack/box

# ENDO

## ENDO Film Island Dressing

Wound Dressing



### Benefits

- High MVTR and waterproof PU film/spun lace non-woven fabric allows excess moisture to pass away, reduces the risk of maceration
- Bacterial barrier protects wounds against external contamination
- Absorbent pad absorbs exudates and non-adherent to wound sites
- Hypoallergenic adhesive minimizes the risk of allergic response, provides gentle and secure fixation

### Size & Package

- Size : 10cm x 25cm
- Package : 1 pcs/pack, 25 pack/box

### Features

- Fit for low to moderate exuding, superficial and non-infected acute wounds, such as post-operative wounds, bruise, minor cuts, abrasions and lacerations
- Sterilized self-adhesive island dressing is made of non-woven fabric or highly permeable polyurethane film coated with medical adhesive, and fabric pad. It is absorbent and permeable



## ENDO

## ENDO ECG Electrode Disposable

### Disposable ECG Electrode



ENDO ECG Electrode SF11  
(Pediatric)

ENDO ECG Electrode SF40  
(Adult / Child)

ENDO ECG Electrode SF08  
(Adult)

## ENDO ECG Electrode

### ECG Electrode



#### Features

- Foam stainless steel snap
- Medical grade material is impervious to fluid
- High tack medical grade adhesive
- Ideal for EMS and long term monitoring
- Recommended usage for ICU/CCU, surgery, and emergency

Specification	ENDO Disposable ECG Electrode SF11
Description	Pediatric, Solid Gel, Round, Ø 30 mm
Packaging	50/pk, 40pk/cs
Case Dimension	40 x 36 x 28 cm

Specification	ENDO Disposable ECG Electrode SF40
Description	Child/Adult, Solid Gel, Oval, 43*46 mm
Packaging	50/pk, 40pk/cs
Case Dimension	40 x 36 x 28 cm

Specification	ENDO Disposable ECG Electrode SF08
Description	Adult, Solid Gel, Round Ø 50 mm
Packaging	50/pk, 40pk/cs
Case Dimension	48 x 36 x 28 cm

#### Features

- Used for various ECG Test
- It uses an Ag/AgCl sensing element and Hydro-gel for adhesion
- An Ag/AgCl sensing element has the best sensitivities and the solid adhesive hydro-gel has very low impedance
- Primary container : Plastic Pack/50 pcs
- Storage container : Carton/20 pack

# ENDO

## ENDO Monopolar Pencil Electrosurgical Pencil



### Features

- Ergonomic and lightweight
- Design is comfortable and minimizes fatigue
- Water resistant construction minimizes electrical shocks and inadvertent activations
- Ten-foot cord with 3-prong connector is flexible for easier handling of pencil, accept any standard 3/32 in. (0.236 cm) diameter electrode
- EO sterilization ultraclean blade or standard blade

### Tip Cleaner

- Cautery tip cleaner consists of SiO<sub>2</sub> coating, sponge and double-faced adhesive tape. Good assistant of cleaning operating, electric coagulation forceps and other medical

## ENDO Disposable Plate GP04 Electrosurgical Unit



### Features

- Designed for optimal conductivity and adhesive
- Optimal hydrogel of low impedance characteristics removal of the Hot spot area
- Applied biocompatible hydrogel and adhesive
- No side effects caused by backing and gel adhesive
- Do not need working direction.
- Used less space than the existing area, the surface of skin of patient maintain high current density distribution
- Provide a cost-effective

## ENDO

### ENDO Nasopharyngeal Airway

Disposable Nasopharyngeal Airway



#### Features

- ENDO Nasopharyngeal Airway, Blue Trumpet type made of medical soft PVC, non-toxic, latex free.
- Smooth surface permits easy insertion and withdrawal.
- Blue trumpet type with rounded tip for increased patient comfort.
- Suitable for neonate, infant, child and adult.

Size
5.0, 6.0, 6.5, 7.0, 8.0

### ENDO Laryngeal Mask

Disposable Laryngeal Mask Airway



#### Features

- Made of medical silicone or PVC, and have good biocompatibility
- Exclusive soft cuff can be insert comfortable and increasing sealing
- Kink free tube eliminates the risk of airway tube occlusion
- Reinforced designed for ENT, ophthalmic, dental and neck surgeries
- Size for neonate, infant, child, and adult
- Different color coded balloon and connector
- Size 3.0#, patient weight 30-50 kg, cuff volume <20ml

Size
1.0, 2.0, 2.5, 3.0, 4.0

### ENDO Reusable CPAP Mask



#### Features

- Made from medical standard silicone material and suitable for all face shapes
- The soft hood makes the user feel comfortable when worn.
- The design of the hood fits perfectly with the contour of the face so there is minimal leakage.
- Comfortable, durable and not foggy.
- The elbow section can be rotated 360 degrees.
- Size : small, medium, large

# ENDO

## USG Gel 5L and 250ml Ultrasound Gel



### Features

- No fragrance
- No color (transparent)
- Based on the same "can't be copied" formula of the world standard
- For diagnostic and therapeutic medical ultrasound procedures, like obstetrics, gynecology, digestion, urinary, and nervous systems
- Acoustically correct for the broad range of frequencies used
- No formaldehyde

## ENDO Rectal Tube



### Features

- Made from soft non-toxic and non-irritant medical grade PVC material. Equipped with color code for size identification. Distal end with 2-sided holes. Available in length 40 cm.

Sizes in	Colour Code
Fr 20	Yellow
Fr 22	Purple
Fr 24	Dark Blue
Fr 26	Grey
Fr 28	Green



## Ileostomy Bag

Ileostomy Bag



### Features

- Used to collect feces and gas from patients who cannot defecate normally
- One piece system
- Drainable, there is a discharge system to empty the bag
- Cut to fit type, adjusts stoma diameter, from 10-80 mm
- 500ml bag volume
- Consists of a layer of soft 2-sided tissue, does not cause allergies to the patient's skin, and is waterproof
- Equipped with a viewing window to see the conditions in the bag
- Equipped with an activated carbon filter to reduce unpleasant odors
- Equipped with locking bag

## Urostomy Bag

Urostomy Bag



### Features

- Used to accommodate the urine of patients who cannot urinate normally
- One piece system
- Drainable, there is a discharge system to empty the bag in the form of a flexible tap
- Cut to fit type, adjusts stoma diameter, from 10-60 mm
- 500ml bag volume
- Consists of a layer of soft 2-sided tissue, does not cause allergies to the patient's skin, and is waterproof
- Can be connected to a urine bag



## Colostomy Bag

Colostomy Bag



### Features

- The skin friendly and very flexible skin wafer is made of 100% hydrocolloid
- The very soft, breathable, and water resistant tissue is comfortable against the skin and prevents perspiration forming underneath the pouch
- Good activated carbon provides a very long odour neutralising pathway and can cleanse large amounts of gas
- The ostomy pouch includes a viewing window which makes it possible to inspect the stoma as well as the output from the stoma
- The integrated vent is a new and novel way to vent the pouch allowing air out or in, for instance in the case of vacuum occurring

### Adhesive Strength

- Comfortable skin wafer with excellent adhesion for secure and guaranteed adhesion
- Extra secure adhesion, even on the edges

### Filter and Air Vent

- Unique integrated vent to control the air
- Durable filter control of odours

# MEDICAL RECORDING CHART PAPER PRODUCT LIST

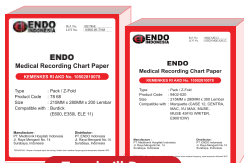


- ECG / EKG Paper
- Defibrillator Paper
- USG Paper
- Hematology Analyzer Paper
- Audiometer Paper
- Patient Monitor Paper
- Auto Refractometer Paper
- Spirometer
- CTG / NST Paper
- Treadmill Paper
- Urine Analyzer Paper

## ENDO



ECG Paper



Treadmill Paper



CTG / NST Paper



Thermal Paper

Tersedia lebih dari 90 tipe paper yang kompatibel dengan merk mesin ECG / CTG di pasaran :

- Biocare
- Bionet
- Biosys
- Bistos
- BTL
- Burdick
- Cardiette / Cardioline
- Corometrics
- Edan Instrument
- Esaote Biomedica
- Fukuda ME / Cardisuny
- Fukuda Denshi
- GE Medical (Mac-400, 600, 1200, 2000)
- Hellige Contrast / Marquette

- Huntleigh
- Innomed
- Kenz Suzuki
- Mediana
- Mortara
- Nihon Kohden
- Phillips / Hewlett Packard
- Quinton
- Schiller
- Sonicaid
- Toitu
- Well Allyn
- Zoll
- Zondan



# ENDO

**ECG Paper**

NO	MACHINE TYPE	SPECIFICATION	PART NUMBER
1	ECG ROLL - 1 CHANNEL	50MM X 20M	VARIOUS
2	ECG ROLL - 1 CHANNEL	50MM X 30M	VARIOUS
3	ECG ROLL - 1 CHANNEL	58MM X 20M	VARIOUS
4	ECG ROLL - 1 CHANNEL	58MM X 25M	VARIOUS
5	ECG ROLL - 1 CHANNEL	58MM X 30M	VARIOUS
6	ECG ROLL - 3 CHANNEL	63MM X 30M	VARIOUS
7	ECG ROLL - 3 CHANNEL	80MM X 20M	VARIOUS
8	ECG ROLL - 3 CHANNEL	80MM X 25M	VARIOUS
9	ECG ROLL - 3 CHANNEL	80MM X 30M	VARIOUS
10	ECG ROLL - 6 CHANNEL	106MM X 20M	VARIOUS
11	ECG ROLL - 6 CHANNEL	106MM X 30M	VARIOUS
12	ECG ROLL - 6 CHANNEL	110MM X 30M	VARIOUS
13	ECG ROLL - 6 CHANNEL	112MM X 25M	VARIOUS
14	ECG ROLL - 12 CHANNEL	210MM X 25M	VARIOUS
15	ECG ROLL - 12 CHANNEL	210MM X 30M	VARIOUS
16	ECG ROLL - 12 CHANNEL	215MM X 25M	VARIOUS
17	ECG BIOCARE IE6	112MM X 140MM X 160SH	-
18	ECG BIONET CARDIOCARE 2000/3000, CARDIOTOUCH 7	215MM X 25M	-
19	ECG BURDICK SERIES 8, E-800	210MM X 150MM X 300SH	79 82
20	ECG BURDICK E-PLUS ECG 92301	210MM X 300MM X 200SH	79 85
21	ECG BURDICK QUEST, ATRIA 3000	215MM X 280MM X 200SH	79 83 / 79 84
22	ECG BURDICK E600, E3501, ELE 11	215MM X 280MM X 200SH	78 68
23	ECG CARDIETTE CARDIOLINE AR-600	60MM X 15M X 16MM	BLUE ROLL
24	ECG CARDIETTE CARDIOLINE AR-1200	120MM X 110MM X 300SH	660 100 39
25	ECG CARDIETTE CARDIOLINE AR-2100 ADVVIEW	210MM X 140MM X 200SH	66010045
26	ECG CARDIETTE CARDIOLINE AR-2100 ADVVIEW	210MM X 280MM X 200SH	66010045
27	ECG EDAN INS. SE-1201	210MM X 140MM X 180SH	-
28	ECG ESAOTE BIOMEDICA P-80	90MM X 70MM X 400SH	96900 29000
29	ECG ESAOTE BIOMEDICA P-8000	80MM X 70MM X 300SH	97404 40041
30	ECG ESAOTE BIOMEDICA P-80 SIX / POWER	210MM X 280MM X 215SH	96900 29100
31	ECG ESAOTE BIOMEDICA ARCHIMED	210MM X 300MM X 200SH	96900 33000
32	ECG FUKUDA ME / CARDISUNY ALPHA-1000	63MM X 100MM X 300SH	063F30-H03
33	ECG FUKUDA ME / CARDISUNY C-320	145MM X 150MM X 400SH	145F60-H05
34	ECG FUKUDA DENSHI FX-101, FX-102	50MM X 75MM X 400SH	OP-115TE
35	ECG FUKUDA DENSHI FX2201X, FX2111	63MM X 75MM X 400SH	OP-122TE
36	ECG FUKUDA DENSHI	63MM X 100MM X 300SH	OP-114TE
37	ECG FUKUDA DENSHI FX7202	110MM X 140MM X 143SH	OP-222TE
38	ECG FUKUDA DENSHI FX3101, FCP131 / 140 / 145	145MM X 30M	OP-358TE
39	ECG HELLIGE CONTRAST / MARQUETTE MAC-400, MAC-600, MAC-1	80MM X 90MM X 280SH	2030887-001
40	ECG HELLIGE CONTRAST / MARQUETTE MAC-500	90MM X 90MM X 360SH	2261 6702
41	ECG HELLIGE CONTRAST / MARQUETTE MAC-800	110MM X 140MM X 200SH	2036970-001
42	ECG HELLIGE CONTRAST / MARQUETTE MAC-1200 ST	215MM X 280MM X 150SH	2261 6606
43	ECG HELLIGE CONTRAST / MARQUETTE MAC-1200	210MM X 295MM X 150SH	2261 6611
44	ECG HEWLETT PACKARD / PHILIPS PAGES WRITERS	210MM X 300MM X 200SH	M1709A

# ENDO

**ECG Paper**

NO	MACHINE TYPE	SPECIFICATION	PART NUMBER
45	ECG KENZ SUZUKEN 302	112MM X 30M	R112-27R
46	ECG KENZ SUZUKEN 302, 303	112MM X 90MM X 300SH	R112-27Z
47	ECG KENZ SUZUKEN CARDICO 601	112MM X 90MM X 300SH	R112-27Z-C2
48	ECG KENZ SUZUKEN CARDICO 1210	210MM X 150MM X 200SH	P210-48Z
49	ECG KENZ SUZUKEN CARDICO 1201	210MM X 300MM X 200SH	R210-60Z-D
50	ECG KENZ SUZUKEN CARDICO 1210	210MM X 300MM X 200SH	P210X60 Z-DM
51	ECG MARQUETTE, CASE 12, CENTRA, MAC, VU MAX, MUSE	215MM X 280MM X 300SH	9402-020
52	ECG MEDIANA YM812i	215MM X 280MM X 200SH	YS-M248
53	ECG MINDRAY BENEHEART R12	210MM X 295MM X 100SH	095-002775-00
54	ECG MORTARA ELI-50, ELI-50i	50MM X 70MM X 200SH	9100-001
55	ECG MORTARA ELI-150	108MM X 140MM X 200SH	9100-028-50
56	ECG MORTARA ELI-200	215MM X 280MM X 250SH	9100-07-01
57	ECG MORTARA ELI-250	210MM X 300MM X 250SH	9100-026-51
58	ECG MORTARA ELI-250	215MM X 280MM X 250SH	9100-026
59	ECG MORTARA ELI-250	215MM X 280MM X 250SH	9100-026-50
60	ECG NIHON KOHDEN BSM2300, BSM1100, BSM103	50MM X 100MM X 300SH	FQW50-3-100
61	ECG NIHON KOHDEN GEM, 9010, 9020, 9022	110MM X 140MM X 143SH	FQW110-2-140
62	ECG NIHON KOHDEN 9320	210MM X 295MM X 250SH	FQW210-10-295
63	ECG NIHON KOHDEN 9110, 9130, 9132	210MM X 140MM X 200SH	FQW210-3-140
64	ECG QUINTON Q-4500E	210MM X 300MM X 200SH	30146-001
65	ECG QUINTON Q-STRESS	210MM X 300MM X 200SH	36868-001
66	ECG QUINTON Q-3000, Q-4000	215MM X 280MM X 200SH	15022-001
67	ECG QUINTON Q-4500	215MM X 280MM X 218SH	18416-001
68	ECG SCHILLER AT-1	90MM X 90MM X 400SH	2157-014
69	ECG SCHILLER AT-101	80MM X 70MM X 300SH	2157-026
70	ECG SCHILLER AT-102	210MM X 280MM X 200SH	2157-025
71	ECG SCHILLER AT-2, CS200	210MM X 280MM X 215SH	2157-017
72	ECG SCHILLER AT-6	145MM X 100MM X 350SH	2157-005
73	ECG SCHILLER AT-10	210MM X 140MM X 250SH	2157-012
74	ECG WELCH ALLYN CP100 / CP200	210MM X 280MM X 200SH	94.01800
75	ECG ZOLL 8000-0300	90MM X 90MM X 200SH	M-SERIES

**Plain Paper**

NO	MACHINE TYPE	SPECIFICATION	PART NUMBER
76	PLAIN PAPER	50MM X 45MM X 16MM	-
77	PLAIN PAPER	50MM X 50MM X 16MM	-
78	PLAIN PAPER	57MM X 50MM X 12MM	-
79	PLAIN PAPER	110MM X 50MM X 16MM	-

**EEG Paper**

NO	MACHINE TYPE	SPECIFICATION	PART NUMBER
80	EEG NIHON KOHDEN	245MM X 300MM X 1000SH	FV245-30

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### CTG / NST Paper

NO	MACHINE TYPE	SPECIFICATION	PART NUMBER
81	CTG BIOCARE FM-801	112MM X 100MM x 160SH	BC 112100 / 160R
82	CTG BIONET FC-1400	151MM X 25M	-
83	CTG BIONET FC700	215MM X 25M	-
84	CTG BIONICS BFM-900	112MM X 25M	
85	CTG BIOSYS BFM-800	112MM X 120MM X 150SH	-
86	CTG BISTOS BT-350	150MM X 90MM X 150SH	FS151-90-80R-01
87	CTG BISTOS BT-300	130MM X 120MM X 250SH	FS130-120-30R-01
88	CTG BISTOS BT-330	130MM X 120MM X 250SH	FS130-120-30R-A
89	CTG COROMETRICS BAO4305 / DAO4305	152MM X 90MM X 150SH	118/120/145/170/2
90	CTG COROMETRICS AAO4305 / BAO4306	152MM X 90MM X 150SH	120is/150
91	CTG EDAN INS. CADENCE	112MM X 90MM X 150SH	-
92	CTG HUNTLEIGH ACC 15	152MM X 150MM X 200SH	BD3000, BD4000
93	CTG NIHON KOHDEN OFM8001K, 8300K	150MM X 90MM X 300SH	FQS150-2.7-90
94	CTG PHILIPS M1351A, M1353A, M2702A, M2703A	150MM X 100MM X 150SH	M1912A, M1913A
95	CTG SONICAID 8400-8003	142MM X 150MM X 300SH	MERIDIAN-800
96	CTG TOITU 0030-026	152MM X 150MM X 150SH	MT-516
97	CTG ZONDAN DS120B	112MM X 100MM X 160 SH	-

### Benefit

- Prioritizing Customer Satisfaction
- Made from Medical Grade quality paper.
- Precise and accurate grid and sensor location.
- Clear and apparent printouts.
- Neat and safe packaging.
- Well-maintained Quality Control system.
- Availability of stock for more than 90 types of machine.





## USG Video Printer Paper



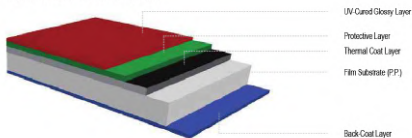
### Long Lasting Image Durability for High Storage Stability

- ▶ High Humidity and Heat Resistance for Long Storage
- ▶ Strong Resistance to Water, Finger Prints, and Ultrasound Gel Drops

Humidity resistance		Heat resistance	
40°C, 80%, 7Days		80°C, Dry, 7Days	
ULSTAR	Other Compatible	ULSTAR	Other Compatible



- ▶ Highly Protective UV-Cured Top Layer



- Durico Thermal Papers for printing Ultrasonic Video Images have become very popular worldwide, replacing Sony and Mitsubishi papers with Lower Cost and Consistent Quality. Durico is successfully exporting high image contrast thermal papers to world markets for medical recording applications.

Grade	Size	Durico	Sony	Mitsubishi
High Glossy	110 mm x 18m	ULSTAR-1100HG	UPP-110 HG	K91HG/KP91HG

# MEDICAL FACE MASK



# ENDO

## ENDO Medical Face Mask



### Comfortable Earloop

Innovative earloop made of fabric that is soft and wider in size provides comfort on the skin and reduce pressure to the ears for long-time use.



### 3 Layers of Protection

The 3-ply thicker layers will give a stronger filtering effect, but also breathable, soft, and gentle to the skin at the same time.



### The Wider Coverage

It can fully cover mouth, nose, and chin.

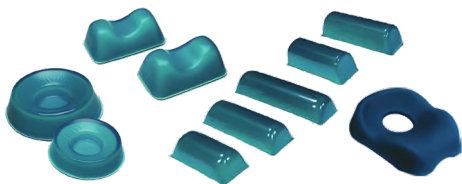


### Adjustable Nose Wire

Secure fit to shape easily the contoured over the nose for a better protection.



# ACCESSORIES PRODUCT LIST



- **Ankle, Heel and Foot Protection**
- **Body Protection**
- **Head and Neck Protection**
- **Leg Protection**
- **Table Pad Protection**



### Oasis Elite Closed Head Ring

Head and Neck Protection



#### Features

- Unique gel and foam combination conforms comfortably to the patient's head, this head ring is suitable for use in many surgical procedures.
- Available for adult with dimension 200 x 50 mm (EL012)

### Oasis Elite Prone Head Rest

Head and Neck Protection



#### Features

- Developed in conjunction with the operating staff at a leading hospital, the Oasis Elite Prone Head Rest is anatomically designed so that the patient's head can comfortably rest face down with respiratory tubes in place. The unique design provides excellent support, stability, comfort and protection during surgery in the prone position, with openings on both sides.
- Available for adult with dimension 280 x 240 x 140mm (EL141)

### Oasis + Head and Neck Support

Head and Neck Protection



#### Features

- The oasis + head and neck support is ergonomically designed to support the head and neck. The product has anti slip properties designed for additional safety.
- Available for adult with dimension 264 x 220 x 64mm (OP151)

### Clearview Prone Headrest



#### Features

- The Trulife Clearview Prone Headrest raises and supports the head while offering maximum pressure relief.
- A clear acrylic base and mirror to allow the patient's eyes to be monitored
- Chin and forehead silicone positioners that can be adjusted to suit the patient's head
- Swept cut-outs in the base allows room for tracheal intubation
- Dimensions 300x230x200 (mm)  
Code CVP01 : Clearview Prone Headrest  
Code CVF01 : Clearview Foam Face Pads





## Oasis Elite Heel Pads

Ankle, Heel and Foot Protection

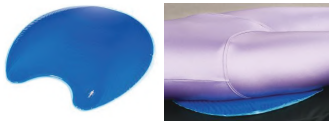


### Features

- The Oasis Elite Heel Pads provide support and maximum protection for the heels, even during the longest surgical procedures. They support the Achilles and effectively remove pressure from the heels.
- Available for adult with dimension 180 x 100 x 70mm (EL130)

## Azure Sacral Protector

Body Protection



### Features

- The Sacral area is an area of serious risk if left unprotected. The Azure Sacral protector has been designed to provide support in the supine and lithotomy positions by relieving pressure and focussing on peripheral support.
- Available for adult with dimension 450 x 445 x 30mm (AZ301)

## Oasis Elite Flat Bottom Chest Rolls

Body Protection

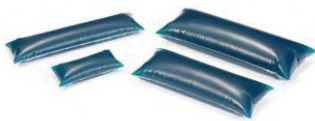


### Features

- Chest Rolls provide excellent support and stability. The unique gel and foam combination means they are up to 75% lighter than comparative gel products, allowing for easy manipulation and handling by OR staff.
- Available for adult, dimension 505 x 140 x 110mm (EL216)

## Oasis Universal Patient Positioners

Body Protection



### Features

- These 100% silicone positioners are suitable for safe and effective positioning during all surgical procedures.
- Available for adult with dimension 290 x 100 x 60mm (OA052)



### Oasis Elite Knee Pad Leg Protection



#### Features

- The Knee pad is used for various procedures in the prone position to protect the knees against pressure damage and the onset of pressure sores.
- Available for adult with dimension 510 x 150 x 40mm (EL401)

### Oasis Elite Table Pads Table Pad Protection



#### Features

- The oasis elite table pads can be used to protect the body in all surgical positions. The ultra light weight pad consist of a foam base and a gel top, allowing for easy carrying.
- Universal table pad dimension 520 x 520 x 30mm (EL030)  
3/4 length table pad dimension 1150 x 520 x 20mm (EL031)

### Oasis Elite Large Prone Positioner Head and Neck Protection



#### Features

- The large prone positioner eliminates pressure on the abdomen and facilitates easy ventilation and circulating during long cases in prone position, i.e surgeries to the backs of legs and laminectomy procedure.
- Available for adult, dimension 1115 x 520 x 140mm (EL904)

# ENDO

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