

**mindray**

**WATO EX-20**  
Anesthesia Machine



[www.mindray.com](http://www.mindray.com)

P/N:ENG-WATO EX-20-210285X8P-20180601  
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healthcare within reach





Based on deep understanding of clinical needs, WATO EX-20 presents stable performance to meet the routine anesthesia requirements from every day clinical work. mindray, with 20 years' experience of medical equipment manufacturing, makes better anesthesia solutions more accessible to healthcare.



## Stability

Based on the latest anesthesia architecture from our high-end anesthesia machine, WATO EX-20 presents the valuable stability features similar to WATO EX-65. High quality components and state-of-the-art technology improves the machine's performance. With dynamic gas compensation the machine can deliver precise tidal volumes and the patented three flow sensor design provides more accurate monitoring and increases the flow sensor's life span.

## Completeness

Mindray always focus on high quality and reliable products for clinical use, WATO EX-20 is equipped with complete configurations including  $O_2$ ,  $N_2O$ , Air supply, two vaporizer positions, ACGO (Auxiliary Common Gas Outlet) and oxygen sensor. In addition other choices of accessories and functions provide maximum flexibility to different customers.

## Simplicity

The main principle of WATO EX-20 is to simplify the training and operating process. with 7.4" color TFT screen, compact design breathing circuit , WATO EX-20 provides a concise working circumstance to support clinicians.



## Full Configuration

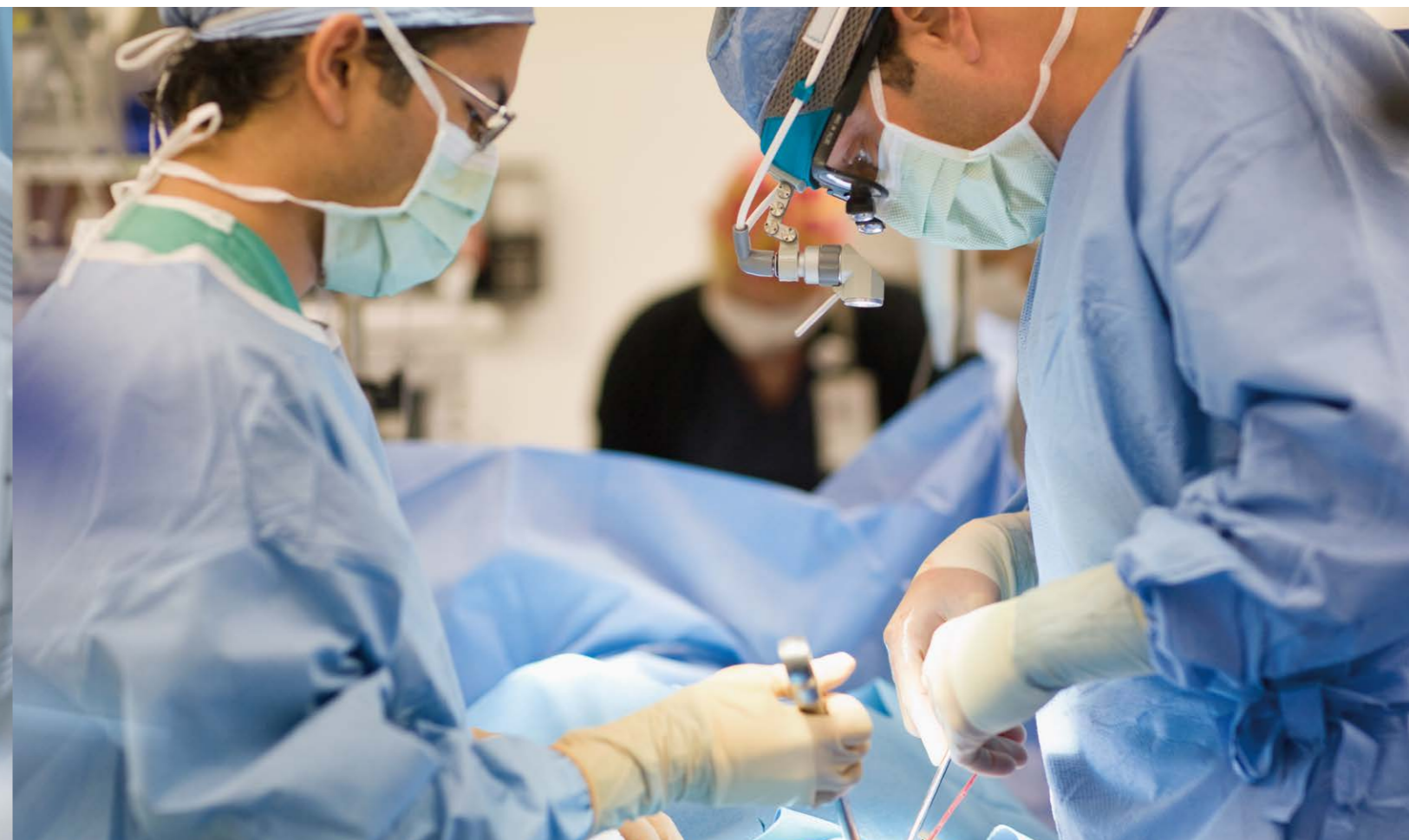
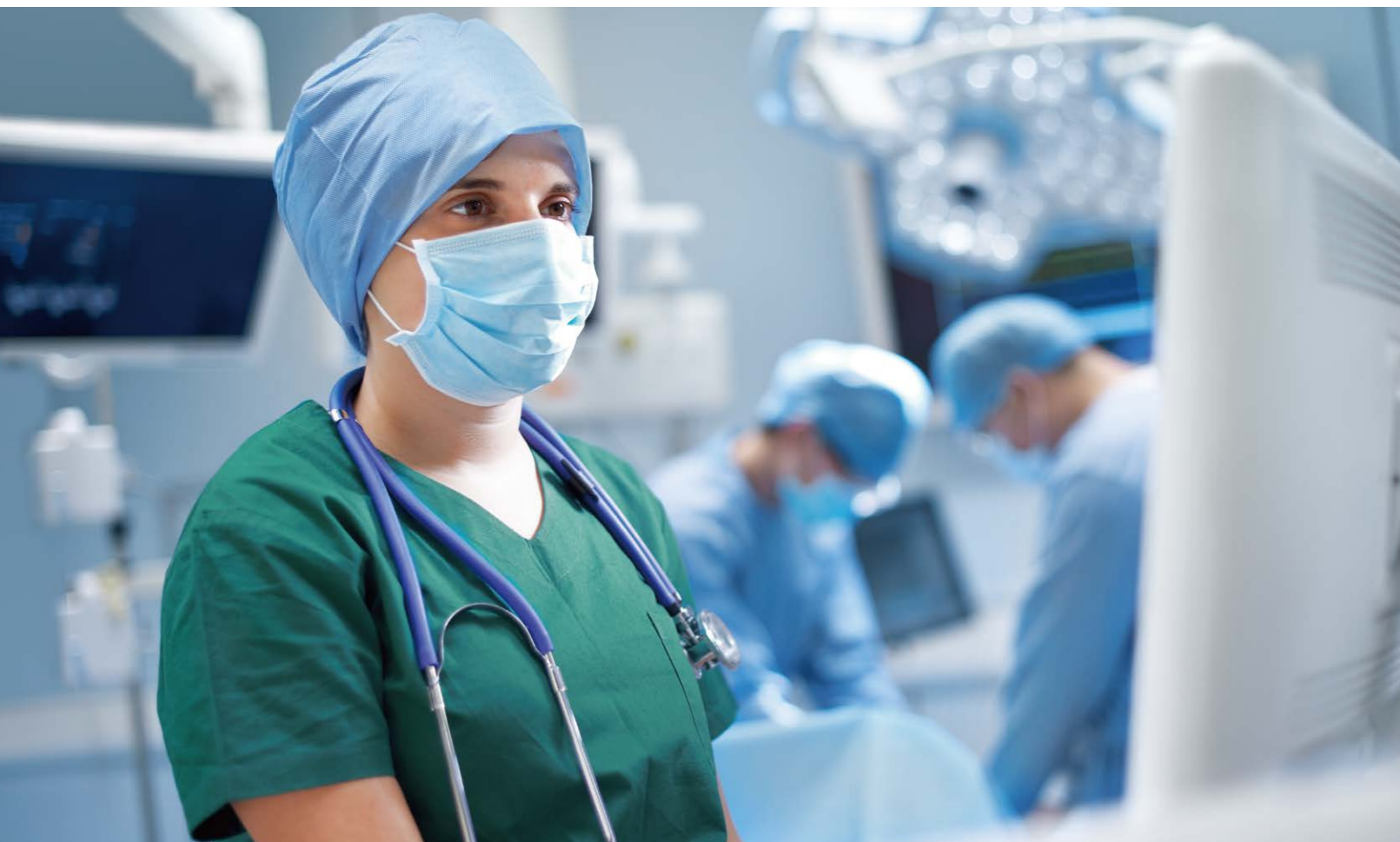
WATO EX-20's ventilation mode from volume mode to pressure mode suits for various patients ranging from pediatric to adult. Besides the stable performance ventilator, the tri-flow sensor design significantly improves the accuracy of tidal volume measurement. The full configuration features includes:

- Automatically fresh gas compensation
- Electronic PEEP adjustment
- Patient type with recommended setting
- ACGO outlet for non-rebreathing circuit
- Auxiliary O<sub>2</sub> outlet for local and regional anesthesia
- Oxygen sensor
- Maximum 4 yokes for back-up cylinder
- Suction unit
- C3 Air compressor

## Innovative Design

The compact breathing circuit is suitable for low flow anesthesia. Low circuit volume improves the gas exchange efficiency and is also suitable for pediatric ventilation. The stand-alone breathing circuit can be disassembled and assembled by one key only, which cuts the maintenance time and reduces the workload. WATO EX-20 even provides other features:

- Lower ventilation resistance
- Total autoclavable Breathing circuit (134 °C)
- Integrated heating system
- Auxillary power outlet
- Up to 240mins back-up battery
- Passive / Active AGSS
- O<sub>2</sub>/Air driven



Mindray's global powerful service network and qualified partner provide reliable and economical maintenance service.

- Amply spare parts supply
- Fast service guarantee
- Thorough quality control
- Global service network



## Technical specification

Weight(without vaporizer and cylinder)	120kg
Dimensions	1375mm(H) X 880mm(W) X 620mm(D)
Power supply	100 ~ 240 V
Back-up battery	Up to 240 min
Ventilator	Pneumatic driven and electronic control
Ventilation mode	Spontaneous/Manual/VCV/PCV(optional)
Tidal volume	40 ~1500 mL (VCV) 5 ~1500 mL (PCV)
Inspiratory flow range	1~100 L/min
Oxygen flush	25~75 L/min
ACGO	Independent ACGO
Oxygen sensor	optional
CO <sub>2</sub> canister	1.5L
Gas supply	O <sub>2</sub> , O <sub>2</sub> +N <sub>2</sub> O, O <sub>2</sub> +Air, O <sub>2</sub> +N <sub>2</sub> O+Air
Back-up cylinder yokes	2 or 4 yokes
Position for vaporizer	1 or 2
Vaporizer mounting system	Selectatec, interlock
Monitor parameters	Tidal volume, O <sub>2</sub> concentration, airway pressure, breathing frequency, minute volume, PEEP
Alarm	Low airway pressure, High airway pressure, Oxygen failure alarm, Apnea alarm, Breathing rate alarm, O <sub>2</sub> concentration
AGSS	Passive, Active
Drawer	2

For more information, please contact Mindray sales representatives