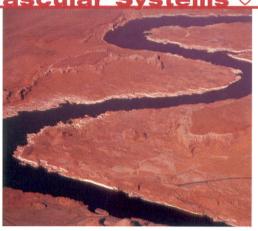
Cardiovascular Systems





Hollow Fiber Oxygenator for Neonates and Infants





Perfectly balanced for your smallest patients

Oxygenator priming volume



Maximum blood flow

1.5L/min.

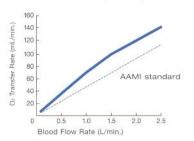






# Performance data

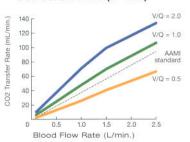
#### O2 transfer rate (in vitro)



Conditions
Blood = Bovine blood
Hb = 12g/dL
Temp.= 37°C
pH = 7.4

SvO2 = 65% PCO2 = 45mmHg B.E. = 0mEq/L V/Q = 1.0

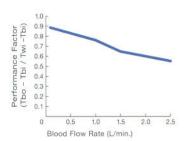
#### CO2 transfer rate (in vitro)



Conditions
Blood = Bovine blood
Hb = 12g/dL
Temp.= 37°C
pH = 7.4

SvO2 = 65% PCO2 = 45mmHg B.E. = 0mEq/L

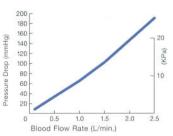
### Heat exchange performance factor (in vitro)



Conditions Blood = Bovine blood Ht = 35% Tbi = 30°C

Twi = 40°C Water Flow Rate = 15L/min.

#### Blood side pressure drop (in vitro)



Conditions Blood = Bovine blood Ht = 35% Temp. = 37°C

# CAPIOX® features in an oxygenator specially designed for neonates and infants



The BABY-RX oxygenator is the newest addition to the CAPIOX family, incorporating many familiar features into a new design. It offers Terumo's well-earned reputation for consistent, reliable, high-quality oxygenators; its exclusive hollow fiber; and well-known features like rotating ports and separate filters in the venous reservoir. In addition, BABY-RX offers the benefits of X Coating, Terumo's biocompatible, hydrophilic polymer surface coating (see below). All this is packaged into a design where everything from the reservoir, to the holders, to the orientation of the ports, has been thoughtfully designed for pediatric perfusionists and their smallest patients. And most importantly, BABY-RX offers high flow rates with the lowest priming volume in the industry\*1.

\*1: Per manufacturers\_ specifications, May 2002.

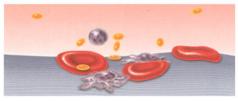




The BABY-RX oxygenator is treated with Terumo's X Coating, a biopassive polymer surface coating that reduces platelet adhesion and protein denaturation.



X Coating reduces platelet adhesion and minimizes activation.



Non coating increases platelet adhesion, causing platelet denaturation and blood reaction.

# Oxygenator

### **Perfectly Balanced Performance**

# High flow with very low priming volume

BABY-RX has the lowest priming volume in the industry,\*1 43mL, and blood flows as high as 1.5L/min. -- a benefit of Terumo's fiber weaving process.

\*1: Per manufacturers\_ specifications, May 2002.

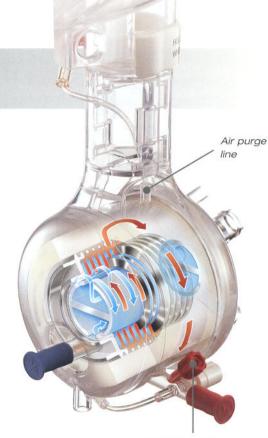


#### Optimized air handling

Blood flows from top to bottom, reducing the risk of air entering the arterial line. In addition, an integrated air purge line removes air bubbles that may be present in the blood.

#### Extra luer port

An extra luer port on the arterial outlet can be used for recirculation or blood cardioplegia.



Extra luer port

# **Hardshell Reservoir**



#### Fast breakthrough time, minimal hold-up volume and stable blood level

The hardshell reservoir has independent venous and cardiotomy filters, a short breakthrough time, and low dynamic priming volume—features that help ensure easy priming and a highly stable blood level, even at minimal volumes.



#### Optimal visibility

The reservoir is designed for fast, precise identification of reservoir levels especially below 100mL. The level sensor for Terumo Perfusion Systems can be attached on the flat front surface of the reservoir even at low levels.



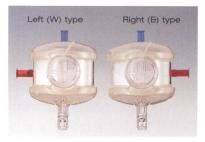
## Holder System



#### Versatility

The holder for the BABY-RX oxygenator has been thoughtfully designed for fast, easy setup and includes a slot to hold the sampling system.

## Outlet Port



#### Versatility

The BABY-RX oxygenator is available with two outlet port configurations to optimize setup and accommodate a variety of circuit configurations.

Reorder number		Description Re		eorder number	
CX*RX05RW		xygenator with		CX*RX05RE	
CX*RX05W		genator without		CX*RX05E	



# Terumo's exclusive hollow fiber

Terumo is the only oxygenator manufacturer that produces its own fiber—one of the key reasons CAPIOX oxygenators have earned such a strong reputation for consistent performance. Using microphase separation technology, manufacturing technicians carefully control every aspect of the process, from raw material to finished product.



# Flexibility

#### Versatility in setup

The reservoir easily accommodates differing requirements to minimize tubing lengths: in addition to a multiposition holder, the oxygenator rotates at the connection ring; the blood inlet port swivels 360°; and the suction/vent ports rotate.



#### Accessories included

- Recirculation line
- Four 3/16" port adapters
- One 3/8" port adapter
- Integrated sampling system



#### Oxygenator module

Component		Specifications	
Housing	Material	Polycarbonate	
Fibers	Material Surface area	Microporous polypropylene Approx. 0.5m2	
Heat exchangerMaterial	Material Surface area	Stainless steel Approx. 0.035m2	
Blood flow range		Min. 0.1L/min./ Max. 1.5L/min.	
Reference blood flow (AAMI standard)		2.5L/min.	
Priming volume (static)		43mL	
Blood inlet port (from pump)		1/4" (6.4mm)	
Blood outlet port		1/4" (6.4mm)	
Luer port (for recirculation or blood cardioplegia)		One luer lock on blood outlet port	
Gas inlet port		1/4" (6.4mm)	
Gas outlet port		5/16" (7.9mm)	
Water ports		1/2" (12.7mm) Hansen quick connect fittings	
Maximum pressure		Blood inlet: 1,000mmHg (133kPa) Water inlet: 2 kgf/cm2 (196kPa) (28.5psi)	

#### Hardshell reservoir section

Component		Specifications
Housing	Material	Polycarbonate
Blood flow range		Min. 0.1L/min./ Max. 1.5L/min.
Blood storage capacity		1,000mL
Minimum operating volume		15mL
Venous filter	Material	Polyester screen type Pore size: 47µm
Cardiotomy filter	Material	Polyester depth type
Defoamer	Material	Polyurethane foam
Venous blood inlet port		1/4" (6.4mm) rotatable
Blood outlet port (to pump)		1/4" (6.4mm)
Suction ports		Five 3/16"-1/4" (4.8mm-6.4mm) rotatable
Quick prime port		1/4" (6.4mm)
Vent port		1/4" (6.4mm)
Auxiliary port		1/4"-3/8" (6.4mm-9.5mm)
Luer ports		<ul> <li>Three filtered luer locks to cardiotomy filter</li> </ul>
		One non-filtered luer lock
		<ul> <li>Two luer locks on venous inlet</li> </ul>
Maximum sustainable negative pressure in reservoir		-150 mmHg (-20.0 kPa)

Note: The oxygenator module of the oxygenator/hardshell reservoir system is rotatable and detachable.

## **Product description**

Reorder number	Description
CX*RX05RW	Hollow Fiber Oxygenator with Hardshell Reservoir
CX*RX05RE	Hollow Fiber Oxygenator with Hardshell Reservoir
CX*RX05W	Hollow Fiber Oxygenator
CX*RX05E	Hollow Fiber Oxygenator

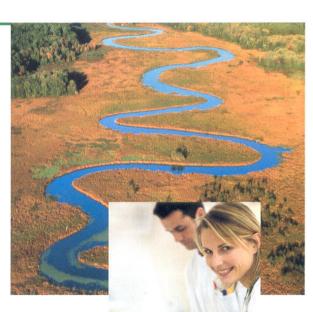
(CX\*RX05RW, CX\*RX05W, CX\*RX05RE and CX\*RX05E differ in the positioning of the arterial blood port of the oxygenator.)

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Every day, as healthcare professionals, you are working to ensure life and to contribute to the well-being of your patients. Every day,

Terumo Europe

provides you with the clinical systems, means and solutions to keep life flowing.







Holder system for oxygenator/reservoir system and reservoir module (Reorder number: XX\*CXH05R)



Holder system for oxygenator module (Reorder number: XX\*CXH05)



Adapter for SX holder (Reorder number: XX\*CXH05AD)

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