



Rodent Circuit Controller Plus Anesthesia System – RC2+

Compatible with all *in vivo* imaging instrumentation



The RC2+ advantage:

“Traditional” anesthesia machines require the operator to calculate a needed flowrate based on the circuit load, then carefully adjust a flowmeter to meter oxygen through a vaporizer that delivers a specific concentration of anesthetic vapor. Each time a circuit is added or removed from the system, the operator must recalculate the flowrate and re-adjust the flowmeter.

The **RC2⁺ – Rodent Circuit Controller Plus** completely eliminates the need to calculate flowrates and flowmeter adjustments by incorporating advanced pneumatic components to deliver preset flows of anesthetic gas to 3 independent patient circuits. Because each circuit is controlled simply by an ON/OFF switch, the **RC2⁺ – Rodent Circuit Controller Plus** allows the operator to quickly and conveniently add (activate) or remove (deactivate) circuits without the cumbersome need to recalculate the flowmeter setting; regardless of how many circuits are on or off, the flowrate in each active circuit is automatically controlled and adjusted by internal pneumatic components to consistently and accurately deliver the preset flowrate to the remaining active circuits.

Benefits of “preset circuits”:

1. Activating or deactivating one circuit will not affect the other circuits’ flow or operation,
2. Accurate, known volumes of metabolic oxygen are delivered to each patient,
3. Waste anesthetic gases can be reduced or eliminated by precluding the tendency to leave flow meters at high levels,
4. Elimination of cumbersome flow calculations and flow meter adjustments;
5. Increased accuracy of delivered anesthetic gases.

Item Name: Rodent Circuit Controller Plus Anesthesia System - RC2⁺

Catalog ID: 12

Product Features:

- Circuit Control Panel: 3 simultaneous, independent circuits
- Automatic control: preset flow of 500cc or 1000cc
- Isoflurane Vaporizer
- Mouse and Rat Nose Cones
- Induction Chamber
- Table Top or Mobile Cart System

Product Description:

The RC2⁺ System meets the demands of the high throughput gas anesthesia needs for In Vivo Imaging and conventional lab animal anesthesia.

The RC2⁺ is compatible with all instruments and modalities for In Vivo Imaging.

The RC2⁺ has up to 3 circuits for simultaneous, interchangeable use of e.g. induction boxes, imaging chambers and surgery stations.

The RC2⁺ Independent circuits maintain accurate flow rate to any circuit, regardless of number of circuits in use or length of tubing. **SAFEST, EASIEST TO USE!**

The RC2⁺ is simple to use: easy protocol, automatic control, no calculations, preset flow (500cc or 1000cc), easy protocol, quick connect, button flush, low waste.

The RC2⁺: Lower preset flows mean less waste gases created, resulting in lower trace exposure to investigator.

The RC2⁺ can be table top or mobile.

The RC2⁺: All waste gases are scavenged for easy evacuation. Can be connected to in-house evacuation, a fume hood or a disposable charcoal filter for complete mobility.

The RC2⁺ is suitable for mouse, rat, hamster, gerbil, guinea pig, ferret and rabbit.

The RC2⁺ breathing circuits allow flat, prone or supine positions with head access.

The RC2⁺ comes with a basic operation protocol, accepted by most IACUCs.

The RC2⁺ comes with a 1 year money-back guarantee and a 7 year replacement guarantee (see below).

Product Components:

Circuit Control Panel – precision Isoflurane vaporizer – 1 induction chamber – 1 Mapleson-E circuit, 1 Rodent Bain non-rebreathing circuit and nose cones – 3 charcoal filters – O₂ supply hose.

You need to add oxygen (carrier gas), isoflurane (anesthetic agent).

You may upgrade to a [vented induction chamber](#)

You may also need the following [accessories](#):

[1/4" ID PVC Tubing](#)

[Regulator, Oxygen, H-tank](#)

[Regulator, Oxygen, E-cylinder](#)

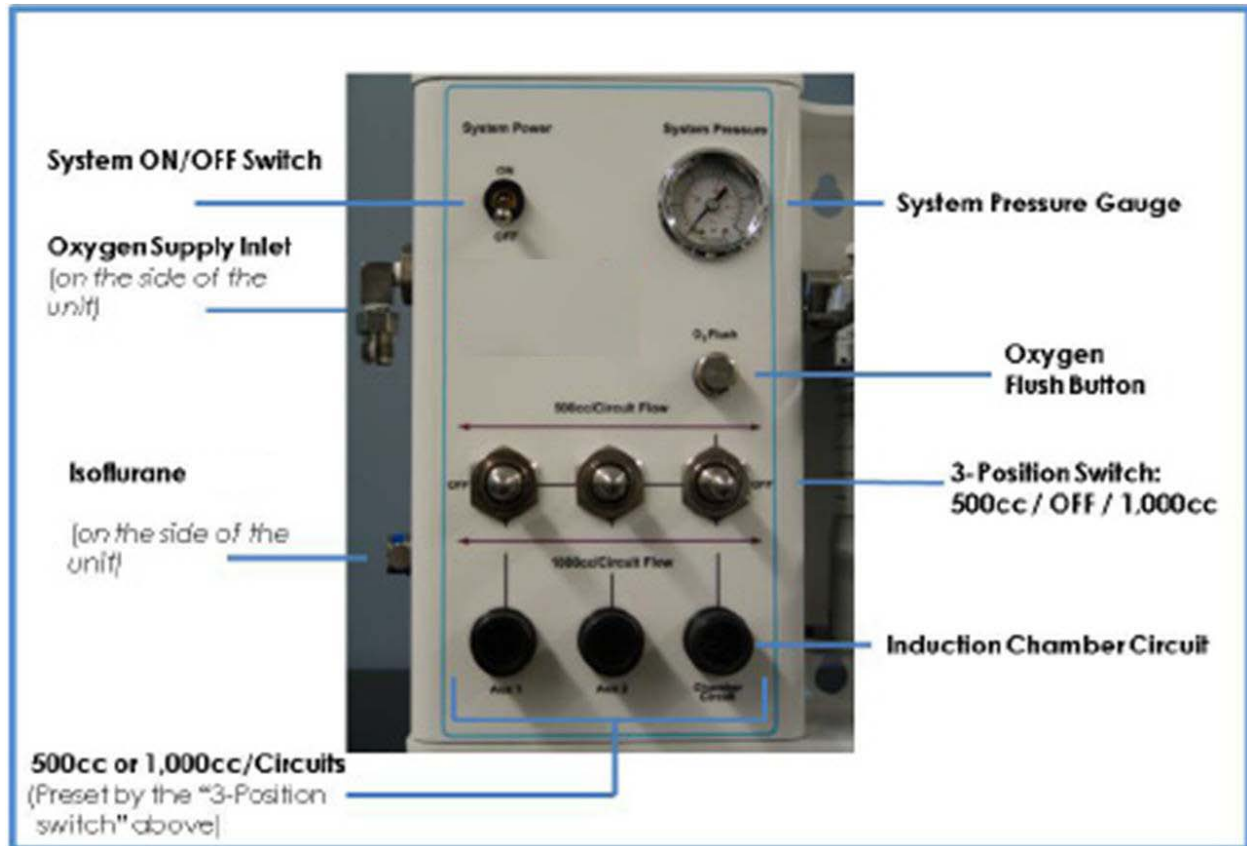
[Stand, for mobility](#)

[Dual yoke/regulator assembly, oxygen](#) (Order only if RC2+ is to be mounted on a stand)

[VaporGuard Charcoal filters](#)

[Imaging Manifold](#)

Circuit Control Panel:



Standard Specifications: LAAS versus RC2+ system comparison.

Operational Characteristics	LAAS	RC2+
Inlet Gas Supply	Oxygen male DISS connector	Oxygen male DISS connector
O2 Flush Volume	15-35 liters per minute @ 55 psi.	15-35 liters per minute @ 55 psi.
O2 Flowmeter Volume	0-4 liters per minute @ 55 psi.	
Circuit Delivery Volume		three-way switch to deliver 500cc/min ± 10% or 1000cc/min ± 10%, dependent on position
Gas Pressure Requirements	50 -55 psi.	50 -55 psi.
Isoflurane Vaporizer	Precision, variable by-pass; Temperature and flow rate compensated	Precision, variable by-pass; Temperature and flow rate compensated
Controls		
Flowmeter	Single turn metering valve	
O2 flush	Plunger-activated, spring-return valve	Momentary switch delivers 100% O2 to chamber circuit outlet.
System master controller		ON/OFF Toggle Switch - allows piped-in gas to charge system
System Pressure Gauge		Indicates system pressure (normal: 6 psi)
Circuit Controllers		Three way Toggle Switch - allows pre-set flow of O2 and anesthetic gas to individual circuits 1 thru 3.
patient circuit outlets		Standard 15mm patient circuit ports used to connect to non-rebreathing system. One labeled "chamber".

Physical Properties		
dimensions	11"w x 8"d x 14"h	11.75"w x 12.50"h x 6.25" d
weight	32 lbs. (14.5 kg)	22.5 lbs (10kg)
finish	Heat-treated enamel	Heat-treated enamel
material	Aluminum Frame; steel handle, bolts and screws; brass valves and tubing; acrylic flowmeter cover.	Aluminum Chassis & Vaporizer Stainless Steel Hardware

VetEquip's 100% Total Satisfaction Guarantee

1-year money-back guarantee: If you are not fully satisfied and delighted with the VetEquip product or service furnished to you, just call 1-800-466-6463 within one year of delivery and we will make arrangements to issue a full and prompt refund to you.

7-year replacement guarantee: If for any reason you become dissatisfied with your VetEquip product, at your request we will replace it without charge with an identical item or an item with comparable features and capabilities.

Ordering Information:

- Easy, fast ordering at the www.invivoimagingolutions.com website.
- The LAAS and RC2⁺ anesthesia systems are "sole source" products. VetEquip systems are designed specifically for "assembly line" laboratory procedures while maintaining the highest quality medical safety and falling within all OSHA standards.
- Delivery is FOB Pleasanton, CA, via Fed Ex Ground, unless otherwise specified.
- Shipping is prepaid and added to your invoice.
- Credit Cards accepted.

Prices, terms and product specifications are subject to change without notice.