

Technical Specifications for SimSlim SL-8

Physical Dimensions								
Size	7" x 1.25" x 0.8" (17cm X 3.2cm X 2.0cm)							
Weight	4 oz (0.1kg)							
Power	Internal Lithium Thionyl Chloride with 5 to 10 year continuous usage battery life, depending on usage**							
ECG/Resp Connection	10 ECG snaps with 4mm and 1/8" banana plug grooves							
IBP Connection	4 X 6 pin Mini-DIN							
YSI Temp Connection	2 X 3.5mm mini stereo jack							
C.O. Connection	Standard 3 pin catheter connection							
User Interface								
Single Button Operation	Double Click = Change Mode							
	Single Click = Show Mode/Zero IBP/Advance Waveform							
	Hold (2s) = Start C.O.							
Operating Modes								
MODE	ECG	HR	RR	IBP1	IBP2	IBP3	IBP4	C.O.
ADULT	NSR	60	30	120/80	30/10	125/15	8/2	OFF
NEO	NSR	140	70	60/30	20/10	60/5	4/0	3 l/m
HR STEPS	NSR	STEPS	STEPS	STEPS	STEPS	STEPS	STEPS	5 l/m
ARR MODE 1	VARIOUS	VARIOUS	OFF	100mmHg	100mmHg	100mmHg	100mmHg	7 l/m
ARR MODE 2	VARIOUS	VARIOUS	OFF	200mmHg	200mmHg	200mmHg	200mmHg	OFF
HR Steps	30, 60, 90, 120, 160, 200, 240 (BPM)							
Resp Steps	15, 30, 45, 60, 80, 100, 120 (RPM)							
IBP Steps	0, 25, 50, 100, 150, 200, 250 (mmHg)							
ARR MODE 1	NSR with PVCs, VTACH, VFIB, ASYSTOLIE							
ARR MODE 2	BIGEMINY, PACER, TRIGEMINY, ST+, 2 nd DEGREE BLOCK, SQUARE WAVE							
ECG Simulation								
Isolated	Yes							
R Wave Size	1mV (lead II) +/- 10%							
R Wave Width	35 ms							
Wave Shape	QRS wave							
Connection	10 Snaps, plus 4mm and 1/8" banana plug grooves							
Rates	60, 140, 30, 60, 90, 120, 160, 200, 240 (BPM)							
Pacer Simulation								
Isolated	Yes							
Synchronized with ECG	Yes							
Pacer Size	3 mV							
Pacer Width	1.2 ms							

Respiration Simulation	
Isolated	Yes
Size	4 Ohm
Rates	30, 70, 15, 30, 45, 60, 80, 100, 120 (RPM)
Invasive Blood Pressure Simulation	
Isolated	Yes
Synchronized with ECG	Yes
Excitation Voltage	DC range = 3.3 to 5.7 AC range = 6.65 to 11.4p-p
Pressure range	0-250 mmHg
Simulated Pressure accuracy	+/- 0.2%
Wiring	+ Excit = pin 1, - Excit = pin 4, + Sig = pin 3, -Sig = pin 6
Simulation rates	Dynamic = 120/80, 30/10, 125/15, 8/2, 60/30, 20/10, 60/5, 4/0 Static =100, 200. Step = 0,25,50,100,150,200, 250
Temperature Simulation	
YSI 400 Simulation Values	25, 37, 40 (degrees C)
YSI 700 Simulation Values	25, 37, 40 (degrees C)
Simulation Accuracy	+/- 0.03 C
CO Simulation	
Baseline Blood Temp	37.0 C
Simulation Values	3, 5, and 7 (l/m)
Adapter Cable / Box	None Required
Simulated Blood Temp Accuracy	+/- 0.1 C
Mechanical	
Case Material	Molded from Lexan. 0.1" wall thickness.
Case Construction	Clamshell, with 10 #4-40 fasteners all the way through both case parts and 4 plastite corner fasteners
Attachments	Rugged key chain attachment for securing to belt, lanyard, reel, case, workbench, cart, etc.
Internal Electrical Connections	All connections via soldered flexstip; no crimps or internal removable connectors.
Labeling	All necessary instructions and data are printed on the case of the simulator, as well as in the operators manual.

**Battery life can approximated at 10 years less 1 minute per button press (the mode indicating LEDs are lit after a button press, decreasing battery life). Every 500,000 button presses will decrease the total battery life about 1 year.