Welcome to the Future of Medium Prime Centrifuges

In the past, manufacturers have offered limited rotor availability to Medium Centrifuges.

Not anymore.

Centurion Scientific Ltd are evolving the marketplace and have introduced ***Medium Centrifuge Prime***.

A medium Centrifuge that offers.

1	Micro rotors. 0.2, 0.4, 0.5, 1.5, 2.0, 2.2ml & PCR 15,000Rpm and 22,000 Rcf (G) max	Capacity
2	Haematocrit rotor Capillary and 2.0ml tubes 12,000Rpm and 13,500 Rcf(G) max	Capacity
3	Fixed angle rotors 15 & 50ml tube (reducers available) 6,000Rpm and 4,800 Rcf (G) max	Capacity
4	Swing out rotor 0.5 to 250ml tube (adaptors available) 4,000Rpm and 2,200 Rcf (G) max	Capacity
5	Cytology rotor. 3 types 4, 8 or 12 place (Double holder) 2,000Rpm and 550 Rcf (G) max	Capacity

Display indicative only

CR4000 Medium Prime Centrifuge (1L)

CR4000. (230V 50/60Hz). 1.CR4000. (110V 60Hz)

Speed	500-15,000 Rpm (10 Rpm steps)
Rcf Max	22,000 G
Timer	0-99 Mins & Hold (30 sec steps)
Dims HWD.	310 x 400 x 500mm
Weight	32 Kg (without rotor)
Power	310 Watts
Memory	10 programs
Accel rates	10 programs
Decel rates	10 programs

Welcome to the Future of Medium Prime Refrigerated Centrifuges

In the past, manufacturers have offered limited rotor availability to Medium Centrifuges.

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1	Micro rotors. 0.2, 0.4, 0.5, 1.5, 2.0, 2.2ml & PCR 15,000Rpm and 22,000 Rcf (G) max	Capacity
2	Haematocrit rotor Capillary and 2.0ml tubes 12,000Rpm and 13,500 Rcf(G) max	Capacity
3	Fixed angle rotors 15 & 50ml tube (reducers available) 6,000Rpm and 4,800 Rcf (G) max	Capacity
4	Swing out rotor 0.5 to 250ml tube (adaptors available) 4,000Rpm and 2,200 Rcf (G) max	Capacity
5	Cytology rotor. 3 types 4, 8 or 12 place (Double holder) 2,000Rpm and 550 Rcf (G) max	Capacity

CR4000R Medium Prime Centrifuge (1L) Refrigerated

CR4000R. (230V 50Hz). 1.CR4000R. (110V 60Hz) 2.CR4000R. (230V 60Hz)

Display indicative only

The following pages show available rotors.

Speed	500-15,000 Rpm (10 Rpm steps)
Rcf Max	22,000 G
Timer	0-99 Mins & Hold (30 sec steps)
Dims HWD	315 x 450 x 635mm
Weight	62 Kg (without rotor)
Power	690 Watts
Memory	10 programs
Accel rates	10 programs
Decel rates	10 programs
Temp	-9°C to + 40°C PID Controlled to + / -1°C

Microtube Rotors 15,000 Rpm

With NEW high Domed polycarbonate lid

Rotor	BRK5424	BRK5436	BRK5448	BRK5494
Rotor type	24 x 2ml	36 x 0.5ml	48 x 0.2ml	4 x PCR Strips
Tube size max	11 x 50mm	8 x 30mm	6 x 40mm	6 x 40mm
Minimum Speed Rpm	500	500	500	500
Maximum Speed Rpm	15,000	15,000	15,000	15,000
Maximum Rcf (G)	22,000	22,000	22,000	22,000
Radius max cms	8.5	8.5	8.5	8.5
Sample tube angle (°)	45	45	45	45
Acceleration time (secs)	25	25	25	25
Deceleration time (secs)	25	25	25	25
Autoclavable (frequency)	121°C (10)	121°C (10)	121°C (10)	121°C (10)

Refrigerated Centrifuges Only

Minimum Temperature	4°C	4°C	4°C	4°C

At maximum speed (relative to room temperature at 23°C)

Reducers

(Pack of 24)

Rotor	BRK5424
Part number	RS04 (0.2 -0.4ml)
Tube size max	6 x 30mm
Part number	RS05 (0.5ml)
Tube size max	8 x 30mm

Haematocrit Rotor 12,000 Rpm

Rotor	BRK5401
Rotor type	24 x capillary & 12 x 2ml
Tube size max	2 x 75mm & 11 x 40mm
Minimum Speed Rpm	500
Maximum Speed Rpm	12,000
Maximum Rcf (G)	13,500
Radius max cms	8.5
Sample tube angle (°)	0 &60
Acceleration time (secs)	30
Deceleration time (secs)	30
Autoclavable (frequency)	121°C (10)

High Speed Fixed Angle Rotors 10,000 Rpm

Rotor	BRK5212	BRK5206
Rotor type	12 x 15ml	6 x 50ml
Tube size max	17 x 120mm	30 x 120mm
Minimum speed Rpm	500	500
Maximum speed Rpm	10,000	10,000
Maximum Rcf (G)	10,600	10,600
Radius max cms	9.5	9.5
Sample tube angle °	30	30
Acceleration time (secs)	35	35
Deceleration time (secs)	35	35
Autoclavable (frequency)	121°C (20)	121°C (20)

Refrigerated Centrifuges Only

Minimum Temperature	4°C	4°C

At maximum speed (relative to room temperature at 23°C)

Reducers

(Pack of 4)

Rotor	BRK5212	BRK5206
Part number	RM05 (5ml)	RM15(15ml)
Tube size max	13 x 80mm	17 x 120mm
Part number	RM10 (10ml)	RM25 (25ml)
Tube size max	13 x 100mm	25 x 100mm

Large Fixed Angle Rotors 6,000 Rpm



Rotor	BRK5324	BRK5308	BRK5100
Rotor type	24 x 15ml	8 x 50ml	6 x 100ml
Size max	17 x 120mm	30 x 120mm	45 x 125mm
Minimum speed Rpm	500	500	500
Maximum speed Rpm	6,000	6,000	6,000
Maximum Rcf (G)	4,800	4,800	4,800
Radius max cms	12	12	12
Sample tube angle °	30	30	30
Acceleration time (secs)	35	35	35
Deceleration time (secs)	35	35	35
Autoclavable (frequency)	121°C (20)	121°C (20)	121°C (20)

Refrigerated Centrifuges Only

Minimum Temperature	4°C	4°C	4°C

At maximum speed (relative to room temperature at 23°C)

Reducers


Pack of 4


Pack of 4


Pack of 6

Rotor	BRK5324	BRK5308	BRK5100
Part number	RM05 (5ml)	RM15 (15ml)	RL10 (10ml)
Tube size max	13 x 80mm	17 x 120mm	16 x 100mm
Part number	RM10 (10ml)	RM25 (25ml)	RL25 (25ml)
Tube size max	13 x 100mm	25 x 100mm	25 x 100mm
			RL50 (50ml)
			35 x 110mm
			RL85 (85ml)
			39 x 110mm

Swing Out Rotor
1 Litre Max

BRK1000 Swing out Rotor

Shown with B5250 Buckets and sealed lids B5419

Rotor / buckets	BRK1025
Tube size max	62 x 100mm
Minimum speed	500Rpm
Maximum speed	4000Rpm
Maximum Rcf(G)	2650
Radius max	14cm
Tube angle	0 degree
Acceleration time	25 seconds
Deceleration time	25 seconds
Autoclavable (times)	121C (20)
Minimum Temperature	4C (at 23C ambient)

B5250 bucket (set 4) REQUIRED
250ml max per Bucket

Set of 4

Adaptors for Swing out rotors

	Capacity	Size	To fit buckets B5250 Part No.	Tubes per rotor
	Tube type: **Micro with cap** Shape: **point**			
	0.5m	8x20	AM605	40
	1.5ml	11x38	AM620	28
	2.0ml	11x38	AM620	28
	0.2ml	6x20	AM602	48
	0.4ml	6x30	AM604	48
	Tube type: **Plain no cap** Shape: **round**			
	1ml	6x45	AR601	36
	3ml	10x60	AR603	28
	5ml	12x75	AR605	28
	6ml	12x82	AR605	28
	7ml	12x100	AR607	28
	9/10ml	14x100	AR609*	24
	15ml	17x100	AR615*	28
	25ml	24x100	AR625	8
	50ml	34x100	AR650	4
	100ml	45x100	AR6100	4
	150ml	52x100	AR601	
	250ml	62x100	BUCKET 4	
	Tube type: **Falcon with cap** Shape: **point**			
	15ml	17x120	AF615*	16
	50ml	29x115	AF650*	4
	175ml	61x118	AF6175*	4
	15ml	17x120	N/A	4
	Tube type: **Corning with cap*** Shape: **point**			
	250ml	60x172	See K242/R	
	500ml	98x148	See K242/R	
	Tube type: **Falcon with cap** Shape: **square**			
	12ml	17x100	AFS612*	16
	25ml	25x90	AFS625*	8
	30ml	25x110	AFS630	8
	50ml	29x115	AFS650	4
	15ml	17x120	AFS614	4
	Tube type: **Nalgene/Oakridge** Shape: **round**			
	10ml	16x80	ANO610	16
	30ml	26x95	ANO630	4
	50ml	29x107	ANO650	4
	100ml	38x106	ANO685	4
	Tube type: **Nalgene/Oakridge*** Shape: **flat**			
	250ml	62x130	Buckets 5250	4
	750ml	98x153	See K243/R	
	Tube type: **Monovette** Shape: **square**			
	1.1-1.4ml	8x82	AM6014	40
	2.7-3ml	11x82	AM603	40
	2.6-2.9ml	13x81	AM629	40
	4.5-5ml	11x108	AM603*	40
	7.5-8.2ml	13x106	AM679*	40
	4.5-5ml	15x92	AM650	28
	9-10ml	16x108	AM690*	28
	Tube type: **Vacutainer** Shape: **round**			
	1.6-5ml	13x75	AV616	40
	4-7ml	13x100	AV650	40
	8.5-10ml	16x100	AV680	28

Note: - We can not be held responsible if the tube manufacturers change the design and/or size of the tube.* Limited capacity with sealed bucket lids (B5419 and B5319)

Microtitor Plate Rotor 4 x Standard or 2 x High Plates

Rotor	BRK5540
Buckets	Complete with buckets
Sealed Lids	Available with
Rotor type	4 x STD Plates
Tube size max	85mm x 128mm
Minimum Speed Rpm	500 Rpm
Maximum Speed Rpm	3500 Rpm
Maximum Rcf (G)	2500
Radius max cms	14
Sample tube angle (°)	0 °C (10)
Acceleration time (secs)	30
Deceleration time (secs)	30
Autoclavable (frequency)	121°C (20)

Swing out Rotor - 8 x 15ml Max

Including 8 buckets

Rotor	BRK5508L
Buckets	Complete with buckets
Sealed Lids	N/A
Rotor type	8 x 15ml
Tube size max	17 x 125mm
Minimum Speed Rpm	500 Rpm
Maximum Speed Rpm	4,000 Rpm
Maximum Rcf (G)	2,600
Radius max cms	14.6
Sample tube angle (°)	0
Acceleration time (secs)	20
Deceleration time (secs)	20
Autoclavable (frequency)	121°C (20)

Cytology Rotor's available

Using centrifugal force to seperate and deposit a monolayer of cells onto slides whilst maintaining integrity within a clearly defined area FROM ANY FLUID MATRIX. Cyto centrifugation also constructively flattens cells for excellent nuclear presentation.

Applications include Cytology, Histolgy, Haematology, Oncology, Immunochemistry, Serology and Microbiology.

Offering samples from 0.1ml to 6ml and an extensive range of accessories we have your Cytolgogy needs covered.



Rotor	4420	4430	4460
Rotor type	4 x 0.2 to 6ml	8 x 0.2 to 6ml	12 x 0.2 to 6ml
Tube size max	Single or double	Single or double	Single or double
Minimum speed Rpm	200	200	200
Maximum speed Rpm	2,000	2,000	2,000
Maximum Rcf (G)	550	550	550
Radius max cms	12	12	12
Sample tube angle °	0	0	0
Acceleration time (secs)	25	25	25
Deceleration time (secs)	25	25	25
Autoclavable (frequency)	121°C (20)	121°C (20)	121°C (20)

Cytology rotor includes Rotor, Sealed Lid, Clips, 24 holders with filter card & 100 slides


Pack of 24

4446

Double sample holder with card (up to 1ml)


Pack of 24

4444

Single sample holder with card (up to 1ml)


Pack of 24

4600

Double sample holder with card (up to 6ml)


Each

4462

Stainless steel clips

2016 Refrigerated Centrifuge temperature control

At Centurion, we have taken temperature control seriously. We keep the refrigeration unit and the refrigerated centrifuge running constantly, as this not only gives the compressor a longer and more reliable life, but stops the constant surges of start up power. Due to the fact that the refrigeration unit is running constantly, it is quite usual to see ice in the chamber even at above freezing temperatures.

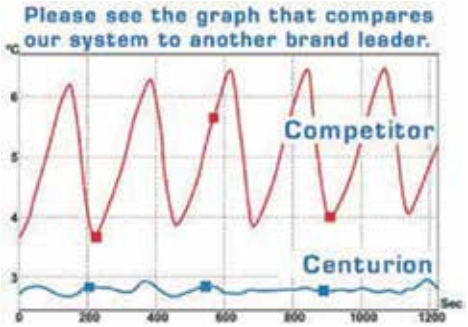
For 2016, a new larger, yet more efficient CFC free compressor has been used which gives lower power needs. To maintain the temperature, we have a highly efficient compressor gas bypass solenoid valve, where we pulse heat via a highly accurate controller system (PID controller, which calculates and manages the temperature).

By running both in conjunction, you get better overall temperature control, achieving the desired set temperature. Imagine using a shower; you turn on both cold and hot water, adjusting to suit your desired temperature. You would not want to use one where you had to stand under the cold water, then the hot, then the cold in order to regulate the temperature.

Centurion has a set temperature of 3°C, and the competitor of 4°C

This allows us to separate the target areas, to show how each machine regulates the temperature. Both refrigeration units use the same air probes, temperature units, and have the probes set at the same distance from the rotor, and finally, the correct vertical distance to the optimum tube area. But as you can see, we control to 0.5°C, whereas our competitor controls it to 3.5°C, the control of our centrifuge is unsurpassed, and our competitors', which all use the same method of turning the compressor on and off, is shown to have very poor control. Having the temperature being so controlled means that the Centurion's power usage is less, and the compressor lasts longer.

This system has been in use for over 20 years, so we do know the longevity of our products. Require complete accuracy with your samples? Purchase a Centurion Centrifuge for total peace of mind. Tried, tested and proven as one of the most accurate systems in the market place.



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Use the above details to contact us if this literature doesn't answer all your questions.

Pricing on any accessories shown can be found by keying the part number into the search box on our website.

The specifications listed in this brochure are subject to change by the manufacturer and therefore cannot be guaranteed to be correct. If there are aspects of the specification that must be guaranteed, please provide these to our sales team so that details can be confirmed.