

BD series: Microbiological incubators with natural convection

BD series incubators are specially designed for long-term and stable continuous operation. Ideal for gentle incubation of organisms, such as on agar plates, and also for conditioning of heat sensitive media.



► Performance features and equipment:

- Electronically controlled APT.line™ preheating chamber technology
- Temperature range of 5 °C (9 °F) above ambient temperature up to 100 °C (212 °F)
- DS controller with integrated timer 0 to 99 hours
- Digital temperature setting with an accuracy of a tenth of a degree
- Independent adjustable temperature safety device, Class 3.1 (DIN 12880), with visual alarm
- Adjustable ventilation by means of rear exhaust duct, 50 mm (2 inch) diameter with ventilation flap and front ventilation slide
- Inner glass door
- RS 422 interface for communication software APT-COM™ DataControlSystem
- Units up to 115 liters (4.1 cu.ft.) are stackable
- 2 chrome-plated racks
- BINDER test certificate

► **Only at BINDER: Precision regardless of size – the 20-liter (0.7 cu.ft) bench-top units.**





	BD 23	BD 53	BD 115	BD 240	BD 400	BD 720
▶ Exterior dimensions						
Width (mm/inch)	433 / 17.1	634 / 25.0	834 / 32.8	1034 / 40.7	1234 / 48.6	1234 / 48.6
Height (inclusive feet/casters) (mm/inch)	492 / 19.4	617 / 24.3	702 / 27.6	822 / 32.4	1022 / 40.2	1528 / 60.2
Depth (mm/inch)	516 / 20.3	575 / 22.6	645 / 25.4	745 / 29.3	765 / 30.1	865 / 34.1
Plus door handle, l-panel and exhaust duct (mm/in.)	85 / 3.4	85 / 3.4	85 / 3.4	85 / 3.4	85 / 3.4	85 / 3.4
Wall clearance rear (mm/inch)	100 / 3.9	100 / 3.9	100 / 3.9	100 / 3.9	100 / 3.9	100 / 3.9
Wall clearance side (mm/inch)	100 / 3.9	160 / 6.3	160 / 6.3	160 / 6.3	160 / 6.3	160 / 6.3
Steam space volume (l/cu.ft.)	36 / 1.3	70 / 2.5	142 / 5.0	283 / 10.0	457 / 16.2	808 / 28.6
Number of doors	1	1	1	2	2	2
Number of inner glass doors	1	1	1	2	2	2
▶ Interior dimensions						
Width (mm/inch)	222 / 8.7	400 / 15.8	600 / 23.6	800 / 31.5	1000 / 39.4	1000 / 39.4
Height (mm/inch)	330 / 13.0	400 / 15.8	480 / 18.9	600 / 23.6	800 / 31.5	1200 / 47.2
Depth (mm/inch)	277 / 10.9	330 / 13.0	400 / 15.8	500 / 19.7	500 / 19.7	600 / 23.6
Interior volume (l/cu.ft.)	20 / 0.7	53 / 1.9	115 / 4.1	240 / 8.6	400 / 14.3	720 / 25.7
Racks (number standard/max.)	2 / 3	2 / 4	2 / 5	2 / 7	2 / 10	2 / 16
Load per rack (kg/lbs.)	12 / 26	15 / 33	20 / 44	30 / 66	35 / 77	45 / 99
Permitted total load (kg/lbs.)	25 / 55	40 / 88	50 / 110	70 / 155	90 / 199	120 / 265
Weight (empty) (kg/lbs.)	26 / 57	43 / 95	61 / 135	93 / 205	135 / 298	191 / 422
▶ Temperature data						
Temperature range						
5 °C (9 °F) above ambient up to (°C/°F)	100 / 212	100 / 212	100 / 212	100 / 212	100 / 212	100 / 212
Temperature variation						
at 37 °C (98.6 °F) (± °C)	0.5	0.5	0.4	0.5	0.5	0.5
at 50 °C (122 °F) (± °C)	1.8	1.1	0.8	0.9	0.9	0.8
Temperature fluctuation						
at 37 °C (98.6 °F) (± °C)	0.2	0.1	0.1	0.1	0.1	0.1
at 50 °C (122 °F) (± °C)	0.3	0.1	0.1	0.1	0.1	0.1
Heating up time ¹⁾						
to 37 °C (98.6 °F) (Min.)	49	38	62	70	105	84
to 50 °C (122 °F) (Min.)	32	59	91	115	132	90
Recovery time after door was opened 30 sec. ¹⁾						
at 37 °C (98.6 °F) (Min.)	3	5	5	5	6	4
at 50 °C (122 °F) (Min.)	4	7	7	6	29	24
▶ Electrical data						
Housing protection acc. to EN 60529	IP 20	IP 20	IP 20	IP 20	IP 20	IP 20
Nominal voltage (±10 %) 50 / 60 Hz (V)	230 / 115	230 / 115	230 / 115	230 / 115	230 / 115	230 / 115
Nominal power (W)	200	400	400	680	850	1250
Energy consumption at 37 °C (98.6 °F) (W)	11	11	20	33	56	80

¹⁾ up to 98 % of the set value

All technical specification are specified for units with standard equipment at an ambient temperature of + 25°C (77 °F) and a voltage fluctuation of ±10 %. The temperature data are determined in accordance to factory standard following DIN 12880, part 2 respecting the recommended wall clearances of 10 % of the height, width and depth of the inner chamber. All indications are average values, typical for units produced in series. We reserve the right to alter technical specifications at all times.