

# BL679 Benchtop Blackbody Calibration Source



The BL679 is a benchtop blackbody calibration source utilizing a digital indicating temperature ambient 500°C to 1500°C. A precision thermocouple N temperature sensor is embedded in the blackbody emitter, providing high accuracy and repeatability. The temperature controller uses the industry standard PID algorithms to control the emitter temperature to within 0.1°C of the set points.

The black body emitter mechanism uses a resistive heating device that provides a long life, short stabilization times, and stable temperature control.

## FEATURE

- Temperature range 500°C to 1500
- Emissivity is better than 0.995
- Temperature uniformity is up to 0.15°C
- 50 mm aperture diameter is compliance with most of D:S
- Build-in temperature correction function

## TYPICAL APPLICATION

- Infrared temperature sensors
- Infrared thermal imaging systems
- Spectrographic analyzers
- Radio meters
- Flux meter

## SPECIFICATION

Temperature range	500°C to 1500°C
Aperture Diameter	50 mm (1.97 inch)
Heated Emitter Shape	Closed end tube
Emissivity	better than 0.995
Display Resolution	0.1°C
Control stability (10min)	0.1°C or 0.1%rdg (whichever is great)
Uniformity	0.15°C or 0.15%rd(whichever is great)
Tube depth	370mm
Control method	PID
Temperature Sensor	Thermocouple
Power Supply	220V AC / 4000WA
Interface	RS232
Heat up time	1 hour from ambient to 500°C, 2 hours from 500°C to 1500°C
Calibration Method	Pyrometric
Dimension w/o holder	520mm(W) x 900mm(H) x 720mm(D)
Net Weight	120 kg approx.

## SCOPE OF DELIVERY

- BL679 Benchtop Blackbody calibration source
- Power cord
- Spare fuse
- User manual
- Factory calibration report

## OPTIONAL ACCESSORIES

- Accredited calibration certificate (P/N: 9000-679)
- USB2.0 into RS232 adapter (P/N: 1621)

## ORDERING MODEL NUMBER

- Model BL679-110V-PLUG TYPE (CN, UK, US, EU)
- Model BL679-220V-PLUG TYPE (CN, UK, US, EU)