

# Abbe 60 ED & LR Refractometers

ULTIMATE PRECISION FOR RESEARCH AND ACADEMIA ACROSS THE VISIBLE SPECTRUM



The high accuracy models are designed for use with monochromatic light sources such as the sodium and spectral range available from Bellingham+Stanley. A PC program for conversion of scale readings to refractive index (RI) or Brix (Sugar%) is available as FREEWARE from the B+S website. With good temperature control and use of the micrometer Vernier Scale, an average accuracy of  $\pm 0.00004$  RI can be achieved across the specified measuring range. Temperature can be controlled by use of a water bath and circulator; prism temperature can be read from the digital display on the instrument.

High Accuracy Abbe 60 Refractometers are ideal for use in academic, research and development, quality control and other industrial laboratories where the highest accuracy and precision is often sought. The Abbe 60/ED Refractometer conforms to the requirements of ASTM D1218 and is used widely throughout the petroleum industry.

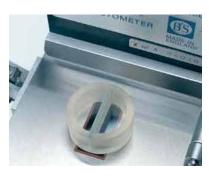
Instruments come complete with external power supply, digital thermometer, traceable standardisation plate and contact liquid, sodium D line calibration tables, and instructions for use. Limited warranty of 24 months.

- Abbe No. and dispersion measurement
- Conforms to ASTM D1218 and D1747



# **High Precision Abbe 60 Refractometer**











Specifications	60ED	60LR
Range (equivalent to)	1.30 - 1.74 RI	1.20-1.70 RI
Precision (mean @ 589nm)	±0.00004	
Operating temperature	5-75 °C	
Temperature resolution	0.1°C	
Ambient temperature	5-40°C	
Power supply	110-230V~, 50/60Hz	

## **Order Codes**

Oluci	60403
Code	Description
10-04	Abbe 60ED Refractometer supplied with calibration plate, contact liquid, power supply and instruction manual
10-06	Abbe 60LR Refractometer supplied with calibration plate, contact liquid, power supply and instruction manual
59-01	Free standing sodium lamp outfit with bulb (35w, approx. 3000 hours ) - 230V $\sim$ , 50Hz
59-06	Free standing sodium lamp outfit with bulb (35w, approx. 3000 hours)- $110V\sim$ , $60Hz$
59-20	Free standing spectral lamp outfit (without spectral bulb) - 230V~, 50Hz
59-25	Free standing spectral lamp outfit (without spectral bulb) - 110V~, 60Hz
59-50	Spare sodium bulb (35w, approx. 3000 hours)
59-33	Mercury bulb (approx. 200 hours)
59-37	Cadmium bulb (approx. 200 hours)
59-39	Helium bulb (approx. 200 hours)
10-42	Volatile liquid cell
10-58	Divided cell for differential measurement
10-43	Contact liquid (monobromonaphalene) for test plates and solid samples with RI up to 1.65 Quantity 6ml
10-61	Contact liquid (methylene iodide) for test plates and solid samples with RI up to 1.74 Quantity 3 ml
10-62	Contact liquid (SMI) for solid samples with RI to 1.79 Quantity 10 ml
10-69	Abbe filter eye cap for use with spectral sources using appropriate interference filter. Manufactured to order - wavelngth defined at point of order
10-44	Glass test plate - approx. 1.5222 RI
10-46	Silica test plate - 1.45839 RI. Certificate of Verification showing traceabiltty available at extra cost
10-49	Polarising eyepiece for bi-refringent samples
10-59	Glass substrate for set resin samples (requires use of contact liquid code 10-43)
10-660	Abbe utility software (also available from www.bellinghamandstanley.com at no cost)
13-395	Spare desiccator
55-104	Spare power supply for Abbe refractometer (110-230V~, 50/60Hz)

Note: Abbe 60ED & 60LR must be used in conjunction with a monochromatic light soure such as those listed above. Adequate care must be taken when laser or other high intensity light is used. Aways read the health & safety instructions before use.

### International

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