

## Precision Spectral Analysis, Built for the Classroom



The SE100 introduces students to the principles and practice of spectrophotometry on an instrument that is both genuinely capable and easy to use. Its holographic grating optical system delivers low stray light and stable wavelength accuracy across the full 320 to 1050 nm range, giving students reliable, real-world results from day one.

Straightforward enough for introductory courses, yet precise enough for advanced undergraduate and postgraduate work, the SE100 supports a broad range of teaching applications: from food safety and environmental analysis to chemical characterisation and quantitative experiments. A dependable, no-fuss platform that lets students focus on learning, not troubleshooting.

### Key Features

<p><b>Full-Spectrum Coverage</b> 320–1050 nm wavelength range enables a wide variety of analytical applications in a single instrument.</p>	<p><b>High-Precision Optics</b> 1200 lines/mm holographic grating delivers exceptional wavelength accuracy with minimal stray light.</p>
<p><b>Rugged, Reliable Construction</b> Integrated die-cast aluminum optical unit with a fully enclosed light path resists interference and vibration.</p>	<p><b>Effortless Operation</b> Large touchscreen interface, one-key calibration, and direct data readout reduce setup time and user error.</p>
<p><b>Versatile Sample Handling</b> Interchangeable cuvette and test tube holders accommodate a broad range of sample types and formats.</p>	<p><b>Tool-Free Maintenance</b> Bottom-access lamp replacement — plug-and-play, no optical realignment required.</p>

### Specifications

<b>Optical system</b>	Single beam, 1200/mm grating	<b>Photometric Range</b>	-0.3–3 A, 0–200 %T, 0–1999 C
<b>Detector</b>	Tungsten lamp	<b>Photometric Accuracy</b>	±0.5 %T (0–100 %T)
<b>Spectral Bandwidth</b>	4 nm	<b>Photometric Repeatability</b>	±0.2 %T (0–100 %T)
<b>Wavelength Range</b>	325–1050 nm	<b>Stray Light</b>	≤0.2 %T (360 nm)
<b>Wavelength Accuracy</b>	±1.5 nm	<b>Noise</b>	≤0.001 A @ 500 nm
<b>Wavelength Repeatability</b>	≤0.5 nm	<b>Sample Holder</b>	10 mm cuvette/13 mm test tube combination sample holder
<b>Wavelength Resolution</b>	1 nm	<b>Display</b>	3.5 inch TFT color LCD screen (Resolution: 480×320)
<b>Wavelength Selection</b>	Automatic	<b>Interface</b>	USB-B×1 (PC)
<b>Wavelength Calibration</b>	Automatic calibration after power on	<b>Power Supply</b>	100–240V AC, 50–60Hz, 55W