



The Contec SP10 is a handheld infrared spirometer for pulmonary function testing in hospital and clinic settings. It measures FVC, FEV1, PEF, and six additional parameters, displays flow-volume and volume-time curves on a 1.8" colour LCD, and connects to PC via USB for data upload and analysis ? all in a 150g pocket-sized unit.

Clinical Spirometry Parameters in a Handheld Format

The SP10 measures Forced Vital Capacity (FVC), Forced Expired Volume in one second (FEV1),

FEV1/FVC ratio, Peak Expiratory Flow (PEF), FEF25, FEF75, and FEF25-75 – the core parameter set for diagnosing and monitoring obstructive and restrictive lung conditions including asthma and COPD. Measured values are compared against age- and gender-matched predicted values, giving clinicians an immediate reference for interpreting test results at the point of care. Real-time flow-volume loops and volume-time curves are rendered directly on the device's 1.8" colour LCD, supporting pattern recognition without requiring a connected workstation.

Infrared Sensor with Data Memory and PC Connectivity

The SP10 uses an infrared signal acquisition mode for accurate, repeatable flow measurement across a 0-16 L/s flow range with volume measurement up to 10 L. Patient test data is stored in device memory for recall, review, and deletion – useful in follow-up consultations and serial monitoring. USB connectivity and included PC software allow session data to be uploaded and reviewed on screen, with trend chart display to track lung function changes over time. Automatic power-off after one minute of inactivity conserves battery life.

Ultra-Portable with Rechargeable Battery and Out-of-Range Alerts

At 97 × 89 × 36 mm and 150g, the SP10 is among the most compact clinical spirometers available – pocketable for ward rounds, home visits, and occupational health assessments. A DC 3.7V rechargeable lithium battery with charge indicator eliminates disposable battery replacement. The device displays a real-time prompt when measured volume or flow exceeds measurement limits, and supports a calibration (scaling) function to maintain accuracy over time. Safety classification is internally powered equipment with type BF applied part.

Technical Specifications: