Who Benefits

The B Series desktop XRF is best suited to customers who have:

- Relatively low sample testing volumes
- Larger samples that require only one test location per part
- Large PCBs that require simple spot checks per lot of new material
- Budget restrictions with desire to upgrade components at a later date
- The need to meet the requirements of IPC-4552A

Key Features

The B Series is Bowman’s most basic top-down measurement configuration. The sample stage is a fixed base plate; operators place parts into the chamber and use a video image to align the desired location within the guides on the screen.

Configuration

The standard configuration includes a single fixed collimator; a camera with a fixed focal distance, solid-state PIN detector, and a long-life micro-focus x-ray tube. As with all Bowman models, components can be upgraded to include multiple collimators, a variable focal camera, or an SDD detector.
**Bowman B Series XRF**

Superior technically.
Supported locally.

### Specifications

**X-ray Excitation**
50 W (50kV and 1mA) micro-focused W anode tube

**Detector**
Silicon solid state detector with 190eV resolution or better

**Focal Depth**
Fixed focal depths with laser (optional multi focal)

**Video Magnification**
30x: Standard
45x: Optional

**Working Environment:**
50°F (10°C) to 104°F (40°C) and up to 98% RH, non-condensing

**Weight**
34kg

**Programmable XY:**
Table size: Not Available
Travel: Not Available

**Element Range**
Aluminum 13 to Uranium 92

**Analysis layers and elements**
5 layers (4 layers + base) and 10 elements in each layer.
Composition analysis of up to 25 elements simultaneously

**Filters/Collimators**
4 primary filters / single fixed collimator

**Digital Pulse Processing**
4096 CH digital multi-channel analyser with flexible shaping time. Automatic signal processing including dead time correction and escape peak correction

**Processor:**
Intel, CORE i5 3470 (3.2GHz), 8GB DDR3 Memory, Microsoft Windows 10 Prof, 64bit equivalent

**Camera optics:**
1/4” CMOS-1280x720 VGA resolution

**Power Supply:**
150W, 100~240 volts; frequency range 47Hz to 63Hz

**Dimensions (HxWxD):**
Internal: 140mm (5.5”), 310mm (12”), 335mm (13”)
External: 450mm (18”), 450mm (18”), 600mm (24”)

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**The Bowman Partner Network**

Bowman’s Partner Service Network was established to facilitate large multi-national projects in the PCB industry. Today, it has become the model for XRF technical service worldwide, serving board shops, electronics manufacturers, automotive and aerospace OEMs, jewelry manufacturers, and contract metal finishers in all sectors.

The Bowman Partner Network enables XRF technical service experts worldwide to provide same-day response to every service, repair and upgrade requirement.

Bowman global partners are certified annually, and maintain the highest standards of excellence and best practices.