

## FAST MOBILITY PARTICLE SIZER SPECTROMETER 3091

SKU: 3091

The Fast Mobility Particle Sizer (FMPS) spectrometer Model 3091 measures particles in the range from 5.6 to 560 nm with 1 Hz time resolution. This allows users to gather full size distributions of quickly-changing aerosols. This combination of two-decade size distribution and 1 Hz time resolution makes the FMPS spectrometer a very valuable tool for monitoring particle exposures in rapidly changing environments, such as street canyons, airports, or mines. The FMPS spectrometer 3091 is also valuable for characterizing emissions from rapidly changing sources, such as incineration, cigarettes, or printers.



## PRODUCT DETAILS

The FMPS spectrometer 3091 offers a total of 32 channels of resolution (16 channels per decade). It uses an electrical mobility measurement technique similar to that used in our SMPS™ spectrometer. However, instead of a CPC, the FMPS spectrometer uses multiple, low-noise electrometers for particle detection. This enables

particle-size-distribution measurements in real time, providing the unique ability to visualize particle events and dynamic changes in particle size distribution.

The FMPS spectrometer operates at a high flow rate (10 L/min) to minimize diffusion losses of ultrafine and nanoparticles. It operates at ambient pressure to prevent evaporation of volatile particles, and it requires no consumables.

The FMPS spectrometer is easy to transport, set up, and operate. Equipment be configured to measure single or multiple runs continuously for up to 12 hours in length. Its large, color VGA display and built-in control knob provide easy access to instrument features, set-up menus, and data displays.

## APPLICATIONS

- Particle formation and growth studies
- Indoor air-quality measurements
- Environmental research
- Inhalation toxicology studies
- Urban canyon studies
- Transient emission studies from stacks, boilers, and wood burners

## INCLUDED ITEMS

- Fast Mobility Particle Sizer™ software

## FEATURES & BENEFITS

- Measures particles in the range from 5.6 to 560 nm
- Measures particle events and size distributions in real time
- Offers 32 channels of resolution
- Comprehensive software for data collection and analysis
- Single-box design for easy transport, set up, and operation