

방폭 미세먼지 측정기 (SIDEPAK Personal Aerosol Monitor)

용 도(Applications)

- 폭발 위험 지역의 미세먼지 측정
- 대기 및 실내 PM10, PM5, PM4, PM2.5, PM1, PM0.8 모니터링
- 미세먼지 발생 현장의 작업자 먼지 노출량 평가
- 실리카, 디젤엔진 사용 공정 등의 미세먼지 모니터링
- China Respirable(PM5), Diesel Particulate Matter(PM0.8) 측정

특 징(Features)

- 방폭형 타입으로 위험지역에서 사용 가능
- 국제방폭인증(IECEX), 유럽방폭인증(ATEX) 제품
- 20시간 이상의 고 용량 배터리
- 컬러 OLED 디스플레이로 선명한 측정화면
- 소형 경량화로 작업 중 휴대가 간편함
- 95 dBA의 알람 및 경고 화면



Model : AM520i

SPECIFICATIONS

Sensor Type	90° light scattering, 650nm laser diode
Calibration	Calibrated against a gravimetric reference using the respirable fraction of standard ISO 12103-1, A1 Test Dust
Aerosol Concentration Range	0.001 to 100 mg/m ³
Particle Size Range	0.1 to 10 µm
Minimum Resolution	0.001 mg/m ³
Zero Stability	±0.001 mg/m ³ over 24 hours using 10 second time constant
Temperature Coefficient	Approximately +0.0005 mg/m ³ per °C
Flow Rate Range	User-adjustable, 0 to 1.8 liters/min Note: Upper range is dependent on impactor or cyclone attached to the SidePak AM520 Monitor
Temperature Operating Range	0° C to 50° C
Temperature Storage Range	-20° C to 60° C
Operational Humidity	0 to 95% RH, non-condensing
Time Constant Range	User-adjustable, from 1 to 60 seconds
Built-in Inlets	Standard inlet - Not size-specific PM1.0 impactor - 50% cut-off at 1.0 µm PM2.5 impactor - 50% cut-off at 2.5 µm PM5.0 impactor - 50% cut-off at 5.0 µm PM10 impactor - 50% cut-off at 10.0 µm
Attachable Cyclones	4 µm Dorr-Oliver - 50% cut-off at 4.0 µm 0.8 µm DPM - 50% cut-off at 0.8 µm
Alarm Types	General, STEL
Default Settings	0.5, 1, 3, 5, 15 [mg/m ³], off Programmable from 0.001 to 999 mg/m ³ through TrakPro Software
Alarm Indicator	95 dBA audible horn, blinking red LED, flashing red OLED display

Ringback Delay	30 sec, 1 min, 3 min, 5 min, 10 min, off
Data Logging Data Points	Approx. 80,000 (55 days logging once per minute)
Logging Interval	User-adjustable, from 1 second to 60 minutes
Factory Setting	1.0 (non-adjustable)
Ambient Setting	0.38 (non-adjustable)
User-Defined Settings	5, with user-defined labels via TrakPro Software
Range	0.1 to 10.0, user-adjustable
External Dimensions	12.95 x 9.4 x 7.84 cm (with battery)
Weight	620 g (with battery)
Display	160 x 128 resolution color OLED display
Tripod Mounting Nut	¼-20 female thread
Battery Rating	5400 mA·H Li-Ion Pack
Battery Run Time	Greater than 20 hours at 1.7Lpm with a PM2.5 impactor
Battery Charge Time	4.0 hours (typical with a fully depleted battery)
Input Voltage Range	100 to 240 VAC, 50 to 60 Hz
Output Voltage	12 VDC @ 3.0A
Factory Clean/Calibrate	Recommended annually
User Zero Calibration	Before each use
User Flow Calibration	As needed with use of inlet conditioner
Connector, Instrument	USB Micro-B (socket)
Communications Port	Universal Serial Bus (USB) v2.0 or higher
IECEX	IECEX SIR 18,0043X
ATEX	Sira 18ATEX2150X

CONFIGURATIONS

SIDEPAK Personal Aerosol Monitor	1 ea
Soft single-unit carrying case	1 ea
100 to 240 VAC power supply	1 ea
Impactor kit	1 kit
Dorr-Oliver Cyclone kit	1 kit
DPM cyclone kit	1 kit
Screwdriver	1 ea
TrakPro Data Analysis Software CD	1 ea
Micro USB cable	1 ea
Zero filter	1 ea
Sample tube	1 ea
User guide, Quick reference card	1 ea