Particulate Matter Monitor



model PM-711

PM-711 is a continuous monitor that measures suspended particulate matter (SPM) in ambient air by a beta ray attenuation method complying with JIS B 7954.



High accuracy monitoring using PTFE filter has a very small effect for gas components or moisture.

Simple operation on a large color LCD touch panel offers a lot of information.

Easy to replacement of filter roll and maintenance by adopting a fold type slide front panel. Large capacity memory to save measured data for over a year.

USB memory for general-purpose is available to data extraction.

Ethernet interface is available as standard equipment for digital telemetering.

General Specifications			
Measuring object	SPM in the ambient air	Stability of flow rate	±5%/10days of setting flow rate
Measuring method	Beta ray attenuation method	Sampling filter	PTFE filter roll, L=30m (up to 60 days)
Measuring range *	0 - 5 mg/ m ³	Beta source *	¹⁴ C, less than 10 MBq.
Analog output range *	0 - 0.5/ 1/ 2/ 5 mg/m ³ 4-ranges auto/manual switching (optional) *Starting range is selectable *Fixed range is also available	Detector	Plastic scintillation detector
		Classifier *	US EPA type TSP, PM_{10} , $PM_{2.5}$ or PM_1
		LCD display	Measuring data, Output range, performance and control information, Messages, Alert
Repeatability	±2% of equivalent film number		and control mormation, messages, Alert
Zero drift	±5μg/ m³/ day	Internal data memory	Measuring data (1min, 1h data), Operation history, Messages, Alert
Span drift	±3%/day of equivalent film number	Digital IN/OUT	Ethernet, USB1.1, RS232C
Linearity	±5% of equivalent film number	Output for serial	Measuring data (1min, 1h data), Operation
Instrument reading for standard air sample	±10% of mass concentration	recorder (optional) *	history, Messages, Alert
		Analog output for telemeter (optional) *	DC 0 - 1V : Continuous data, 1h mean value Contact signal : Output range, external reset, adjusting, power discontinuity, disconnecting,
Instrument reading for filtered air (blank test)	±5μg/m ³ /day (as mean value)		
Stability to voltage fluctuation for detection	$\pm 3\%/100\pm 10V$ of equivalent film number		system failure, etc.
		Power requirement	AC100V 50/ 60Hz approx. 400VA
Stability to voltage fluctuation for flow control	±5%/100±10V of setting flow rate	Withstand voltage test	AC1000V 50/ 60Hz during 1 min.
		Insulation resistance	more than 5 MEG
Sampling flow rate	16.7 LPM (20°C, 1atm)*		*For further information, please contact us.
Optional			
Rack mount	A17: H875mm rollaway rack A22: H1100mm rollaway rack	Analog I/O unit for a telemeter	TU07 : terminal block (Rear connection with rack mount)
Recorder	μRP1800 serial recorder Chart width:180mm	PM ₁₀ classifier	US EPA PM ₁₀ inlet
		PM _{2.5} classifier	PM _{2.5} very sharp cut cyclone (VSCC)
		PM ₁ classifier	PM ₁ charp cut cyclone

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Dimensions

Unit: mm



Desktop type (weight : approx. 15kg)



Rack case type (weight : approx. 40kg)





Outdoor case type (weight : approx. 80kg)

*) Operation manual should be read before measuring.

*) To avoid fire, break down and electric shock, do not use this analyzer at the place where beside water, high moisture, dust or oily smoke.

ΚΙΜΟΤΟ

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