



# Air Velocity / Flow / Differential Manometer

## VF-5200 series (1)

IP65  CE  RoHS

Pitot Tube measures Air Velocity/Flow

- VF-5204** Low Range Manometer ( ±70mbar )
- VF-5205** High Range Manometer ( ±1000mbar )
- VF-5204<sup>+</sup>** (Low Air Velocity/Air Flow/ Differential Manometer)
- VF-5205<sup>+</sup>** (High Air Velocity/Air Flow/ Differential Manometer)

### Features

- Anemometer measurements for Air Velocity, Air Flow and Wind Pressure (VF-5200<sup>+</sup> series)
- Manometer (Differential Pressure) Measurements
- 8 selectable units of pressure measurement
- ±0.25% F.S High accurate
- Fine ZERO & SPAN adjustments and ZERO setting
- USB / RS-232 Output
- Large LCD display with backlighting
- Data hold and Auto power off functions
- IP65,CE and RoHS approved

### Applications :

Clean room, Compression cooling systems,  
Air filter monitoring, Pumps, Fan control, Pneumatic controls,  
Hospital, Duct airflow, Differential pressure monitoring, HVAC...etc.



### Measurement Range

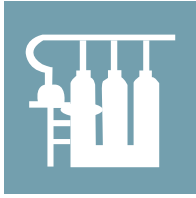
Model No.	Air Velocity(via Pitot tube)					Air Flow		Temperature	
	m/s	FPM/(ft/min)	Km/h	Knots	MPH	CFM	CMM	°C	°F
<b>VF-5204<sup>+</sup></b>	105	20,670	378	204.10	234.90	2,066,793	58,525	0~+60	+32~140
<b>VF-5205<sup>+</sup></b>	400	78,730	1,440	777.60	894.80	3,276,000	227,300		
Model No.	Pressure (Differential Pressure)								
	mbar	Pa	PSI	Bar	mmH <sub>2</sub> O	inH <sub>2</sub> O	mmHg	inHg	Max.Pressure
<b>VF-5204</b>	70	7,000	1.00	0.07	714	28.07	52.50	2.07	12.60PSI
<b>VF-5205</b>	1,000	100,000	14.50	1.00	10,200	401.50	750.00	29.53	21.75PSI

\*\*Max. pressure " is the VF-5200 can withstand maximum pressure, entering the over pressure, the meter will be damaged.

### Units Conversion Tables

	Pa	Kpa	mbar	mmH <sub>2</sub> O	mmHg	inH <sub>2</sub> O	PSI
Pa	1	0.001	0.01	0.10197	0.007501	0.004016	0.000145
Kpa	1000	1	10	101.9716	7.501	4.016	0.145
mbar	100	0.1	1	10.1972	0.7501	0.4016	0.0145
mmH <sub>2</sub> O	9.807	0.009807	0.09807	1	0.0734	0.0394	0.001422
mmHg	133.3	0.1333	1.333	13.62	1	0.5362	0.0193
inH <sub>2</sub> O	249.1	0.2491	2.491	25.4	1.865	1	0.0361
PSI	6895	6.895	68.948	704.3	51.71	27.73	1

\*Specifications are subject to change without notice.  
Specifications of VF-5200, please see page02.



# Air Velocity / Flow / Differential Manometer

## VF-5200 series (2) Pitot Tube measures Air Velocity/Flow

### Specifications of VF-5200 series ※Area : Pipeline Cross - sectional area.

Model No.	VF-5204 / VF-5204 <sup>+</sup>	VF-5205 / VF-5205 <sup>+</sup>
Measuring Range	Please refer the previous page1.	
Resolution	Area : 00.01ft <sup>2</sup> /0.001m <sup>2</sup> * Air Flow : 1CFM/1CMM Temperature : 0.1°C (0.1°F) Air Velocity : 0.1m/s, 1FPM, 0.01Km/h, 0.01Knots, 0.01MPH Differential Pressure : 1Pa, ±0.0001PSI, ±0.01mbar, 0.0001bar, 0.01mmH <sub>2</sub> O, 0.001inH <sub>2</sub> O, 0.001mmHg, 0.0001inHg	Area : 00.01ft <sup>2</sup> /0.001m <sup>2</sup> * Air Flow : 1CFM/1CMM Temperature : 0.1°C (0.1°F) Air Velocity : 0.1m/s, 1FPM, 0.1Km/h, 0.1Knots, 0.1MPH Differential Pressure : 10Pa, ±0.001PSI, ±0.1mbar, 0.001bar, 1mmH <sub>2</sub> O, 0.1inH <sub>2</sub> O, 0.1mmHg, 0.001inHg
Accuracy (at 25°C)	±0.25% F.S, TEB<1% *TEB : Total Error Band	
Area Setting *	Max. 9.289m <sup>2</sup> / 99.99ft <sup>2</sup> (For Air Flow measurement) *Area : Pipeline Cross - sectional area.	
Measurement Unit	Pipeline Cross - sectional area : ft <sup>2</sup> , m <sup>2</sup> Temperature : °C, °F Air Flow : CFM, CMM (VF-5204 <sup>+</sup> / VF-5205 <sup>+</sup> ) Air Velocity : m/s, FPM(ft/min), Km/h, Knots, MPH (VF-5204 <sup>+</sup> / VF-5205 <sup>+</sup> ) Differential Pressure : Pa, PSI, mbar, bar, mmH <sub>2</sub> O, inH <sub>2</sub> O, mmHg, inHg	
Media Compatibility	Dry air or non-corrosive gases and liquids	
Display Functions	Digital LCD display : Differential Pressure, Air Velocity, Air Flow, Temp., Measurement Unit	
Sampling Rate	Approx. 0.5 sec.	
Output Signal	Digital Output : RS-232 / Modbus RTU protocol (Differential Pressure, Air Flow, Air Velocity, Temp., Max., Min., Avg. simultaneously)	
Temp. compensation	0~+60°C (+32°F ~ +140°F) Auto.	
Main Functions	IP65 water and dust proof, Air Flow/Air Velocity/Wind Pressure measurements, Fine ZERO & SPAN adjustments, ZERO setting, Max./Min./Avg. values, Data hold, Switchable°C/°F, USB/RS-232 output, LED back-light, Auto/Manual shutdown, Fine Area adjustment	
Baud Rate	57600	
Operating Environment	-10 ~ +60°C (+14 ~ 140°F), 0~95%RH non-condensing	
Power Supply	One 9 V battery or AC Adaptor (option)	
Dimensions / Weight	150(L) × 75(W) × 28(D)mm (5.91 × 2.96 × 1.11 inches), Not including the pressure hose connector Approx. 250g (battery included)	
Approvals	RoHS, CE, IP65	
Standard Accessories	Instrument (VF-5204 or VF-5205), Battery, Pouch case, Operation manual	
*Plus Accessories	Instrument (VF-5204 <sup>+</sup> or VF-5205 <sup>+</sup> ), Pitot tube (160-12), Silicon tube (1M), Battery, Plastic carrying case, Operation manual	

\*Specifications are subject to change without notice.

### Option Accessories

- ① VF-P0808 Pitot Tube (for air velocity/flow), ø8 x 300mm  
\*Specifications can be customized.
- ② VF-S0552 Silicon Tube (red/blue), standard 1M  
\*The length can be specified.
- ③ VF-C0553 Plastic carrying case
- ④ RS-232 Interface cable
- ⑤ AC Adaptor TU-6019 (AC100V±10%) / TU-6029 (AC220V±10%)

