

VM-21 SERIES

SPECIFICATIONS

VM-21K  
DISPLACEMENT INPUT  
VIBRATION SIGNAL CONDITIONER



Model Code

VM-21K  -  B 1  -

Power supply		Measuring range		Input transducer		Frequency response		Output		Conditioner socket	
1	24VDC	21	0 to 100µm pk-pk	B	FK-202F VK-202A (787mV/100µm)	1	5Hz to 4kHz(-3dB)	1	1 to 5VDC	0	Without
2	100 to 240VAC/DC	22	0 to 125µm pk-pk					2	4 to 20mADC	1	Include
		23	0 to 200µm pk-pk					Standard			

SPECIFICATIONS

Input Transducer	FK-202F, VK-202A
Input Sensitivity	787mV/100µm
Input Resistance	50kΩ
Measuring Range	See Model Code above
Output (isolated)	1 to 5VDC (output resistance: 250Ω) or 4 to 20mADC (permissible load resistance: 600Ω or less)
I/O Conversion Accuracy	±1% of F.S. at 25°C, ±2% of F.S. at 0 to 50°C
Response Speed	τ=500ms, 63% response
Frequency Response	5Hz to 4kHz (-3dB)
Burn-down Function	Detects transducer failure and causes the 4 to 20mADC (1 to 5VDC) output to go to less than 0.8mADC (0.2VDC).
Buffered Output	Input signal is outputted via a buffer amplifier. Signal level : -2 to -22VDC Output impedance: 100Ω
Power Supply Output	-24VDC (30mA with short-circuit protection)
Supply Permissible Voltage	24VDC±10% or 85 to 264VAC/DC (50/60Hz)
Power Consumption	24VDC: 3.5W, 100-240VDC: 3.5W, 100-240VAC: 10VA
Insulation Resistance	100 MΩ minimum at 500VDC between input-output-power-GND mutually.
Withstanding Voltage	2000VAC for one minute between input-output-power-GND mutually. (With VM-21H: 1,000VAC between output-GND.)
Operating Temperature	0 to 50°C (32 to 122°F REF.)
Relative Humidity	10 to 90%RH (no condensation)
Casing Material (color)	Modified polyphenylene oxide (black)
Weight	Approx. 110g (0.24lb)
CE Marking	Only as for 24VDC power supply specifications.