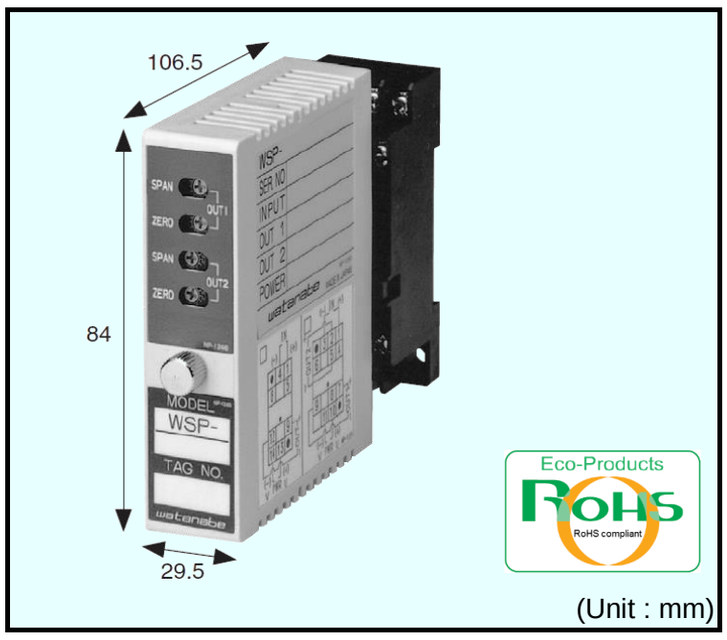
Dual-Output Pulse to DC Converter

WSP-FVW



This compact plug-in converter receives a pulse train signal
and converts into analog signal that is proportional to its frequency,
and provides two isolated outputs.
It converts measurement signals detected in the form
of pulses (e.g., those for flow rate, revolution, and speed)
into optimum DC signals for measuring and control systems.

Features

★ Generates low-ripple signals with excellent linearity and repeatability
★ Dielectric strength of 2000Vac between input, output and power supply
★ Both AC and DC power supply are available
★ Easy to maintain by plug-in structure
★ RoHS compliant

Ordering code

WSP- F V W - □□ □□ - □□ Measuring frequency : 0 to □□□□ Hz FS (Full scale)

⚠ Please specify measuring frequency in the range of 50Hz FS to 100kHz FS

Code	Input	
14	DIP Switch Selection	Voltage pulse Compatible with proximity switch and light switch [1]: 5 to 30V, [0]: -30 to 1.5V Input impedance: 20kΩ or more
		ON-OFF pulse Compatible with non-voltage contact and open collector 5V at OFF, 1mA at ON
99	Contact us for other than the above	

Code	Output 1	Allowable Load
A	4 to 20mAdc	750Ω or less
B	1 to 5mAdc	3kΩ or less
D	0 to 1mAdc	15kΩ or less
E	0 to 10mAdc	1.5kΩ or less
G	0 to 20mAdc	750Ω or less
H	1 to 5Vdc	1kΩ or more
J	0 to 10mVdc	10kΩ or more
K	0 to 100mVdc	100kΩ or more
L	0 to 1Vdc	200Ω or more
N	0 to 5Vdc	1kΩ or more
P	0 to 10Vdc	2kΩ or more
S	Contact us for other than the above Current output 20mA or less Voltage output 10V or less	

Code	Output 2	Allowable Load
A	4 to 20mAdc	350Ω or less
G	0 to 20mAdc	350Ω or less
H	1 to 5Vdc	1kΩ or more
N	0 to 5Vdc	1kΩ or more
P	0 to 10Vdc	2kΩ or more
S	Contact us for other than the above Current output 20mA or less Voltage output 10V or less	

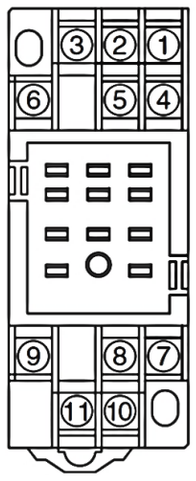
Code	Power Supply
A	90 to 264Vac 50/60Hz
D	10.8 to 26.4Vdc
8	90 to 121Vdc

Code	Test Report
X	None
T	With Test report

Specifications

Measuring frequency	50Hz FS to 100kHz FS (Duty 25 to 75%)
Accuracy	±0.1% FS (at 23°C)
Output ripple	±0.1% (p-p) FS
Allowable load resistance	Current output First output : 15V or less of voltage drop between output Second output : 7V or less of voltage drop between output Voltage output Load current 5mA or less For 1V FS or less of output the current is 1μA or less
Zero & span adjustment	±5% FS (1 turn trimmer)
Operating temperature	-5 to +55°C
Operating relative humidity	90% or less (non-condensing)
Temperature coefficient	±0.015% FS of span per °C
Isolation	Between input, output, and power supply
Insulation resistance	100MΩ or more with a 500Vdc megger Between input, output, and power supply terminal
Dielectric strength	2000Vac for 1 minute
Power consumption	Approx. 6.5VA (AC), Approx. 130mA (24Vdc)
Power supply variation	±0.1% FS (within the range of rated voltage)
Dimensions	84(H) X 29.5(W) X 106.5(D)mm
Weight	Approx. 150g
Shutdown frequency	When the input frequency is excessively low as compared to the full scale, it is hard to completely remove ripples from the output. This converter forcibly cuts off the output when the input falls below the shutdown frequency.
Structure	Plug-in
Connection	M3 SEMS screw part of the base socket
Material of terminal screw	Chromated iron
Case color and material	Ivory, heat-resistant ABS resin(94V-0)
Mounting	DIN rail or wall surface

Terminal connections



No	Signal	Description
1	INPUT(+)	Input
2	No.2 OUTPUT(+)	No.2 Output
3	INPUT(-)	Input
4	INPUT(+)	No connection
5	No.2 OUTPUT(-)	No.2 Output
6	NC	No connection
7	No.1 OUTPUT(+)	No.1 Output
8	NC	No connection
9	No.1 OUTPUT(-)	No.1 Output
10	POWER U(+)	Power Supply
11	POWER V(-)	

∗ **Specification is subject to change without notice**