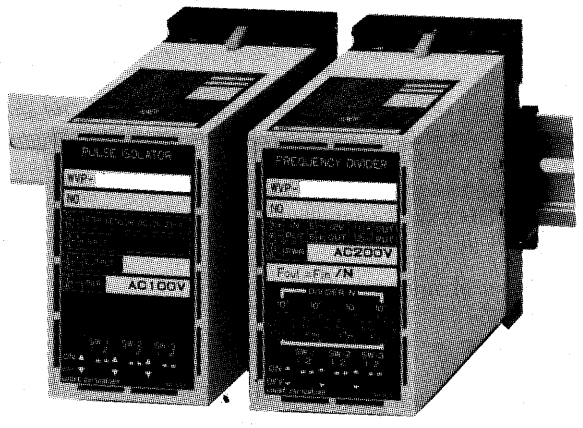
PULSE ISOLATOR AND FREQUENCY DIVIDER
DIELECTRIC STRENGTH 1,500 VAC WVP-FZC /FRC



Pulse Isolator Pulse Frequency Demultiplier

50 (W) x 96 (H) x 125.5 (D) mm Approx. 400 g

The pulse isolator is a pulse repeater that receives pulse-train signals, and outputs signals in pulses that are shaped into a waveform and opto-isolated.
On the other hand, the pulse frequency demultiplier applies the desired scaling to input pulse-train signals by demultiplying them, and delivers pulses that are shaped into a waveform and opto-isolated. Models using two different frequency demultiplication methods are available.

Features

- The input and the output are isolated using the highly reliable photocoupler method.
- Capable of supplying power to sensors (when connected to an AC power supply).
- The demultiplying coefficient can be changed freely from the front panel (FDC and FRC models).
- Plug-in design enables mounting on DIN rails or direct installation.
- Various output modes can be selected via DIP switches.

Model WVP-□□□-□□-□

FZC	Pulse isolator	Isolated	Dielectric strength 1,500 VAC (1 min.)
FRC	Pulse rate divider	Isolated	Dielectric strength 1,500 VAC (1 min.)

	Power Supply
1	AC 100 V ± 10%, 50/60 Hz
2	AC 200 V ± 10%, 50/60 Hz
4	AC 110 V ± 10%, 50/60 Hz
5	AC 220 V ± 10%, 50/60 Hz

	Input Signal	
12	Voltage pulse input impedance: 100 KΩ or more (peak-to-Peak voltage detection type) 200 mVp-p to 50 Vp-p with center at 0 V	
14	Selected via DIP Switches	Voltage pulse input impedance: 20 KΩ or more (compatible with proximity switches and opto-electric switches) [1]: 5 V or more [0]: 1.5 V or less
		ON-OFF pulses (compatible with non-voltage contacts and open collector) 12 V at OFF 1 mA at ON

	Output Signal	
E	One-shot non-contact output For driving AC/DC electromagnetic counters ON-time 100 msec	ON-voltage 2 V (max.) ON-current 500 mA or less Operating circuit voltage 200 VDC, 130 VAC or less.
F	* Open-collector output	30 VDC, 30 mA or less ON-voltage 0.4 V or less
	* One-shot open-collector output ON-time width 100 msec	
	* Voltage pulse output	[1]: 5 V / 12 V (selectable via DIP switches) Internal resistance 620 Ω [0]: 0.4 V or less
	* One-shot voltage pulse output ON-time width 100 msec	
G	* Non-voltage dry-contact output	Rated control capacity 24 VDC, 2 A (max.) 10 mVDC, 10 μA (min.)
	* One-shot output (max. 5 Hz) ON-time 100 msec	

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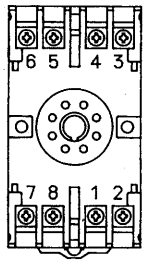
Specification

Input signal:	Pulse frequency
Input frequency:	DC–100 KHz (any frequency). Frequencies of 10 Hz or less are not applicable to input signal 12.
Input waveform:	Sine wave or rectangular wave (duty 25–75%)
Sensor power supply:	12 VDC, 25 mA, stabilized power supply
Output frequency:	DC–100 KHz
Output waveform:	– Type E: One-shot output for driving electromagnetic counter, with ON-time of 100 msec – Type F: Voltage pulse output and open-collector output, and their respective one-shot outputs (selectable via DIP switches) – Type G: Non-voltage dry-contact output Normal and one-shot output (selectable via DIP switches) – The output of the FRC model contain jitter in the pulse spacing.
Frequency dividing setting device:	DIP rotary switch, 4-digit
Frequency dividing range (changeable):	– FDC model (number of input pulses) x 1/2–9999 – FRC model (number of input pulses) x 1–9999/10000
Operating temperature and humidity:	-5 to +55°C, 90% RH or less (without condensation)
Insulation resistance:	100 MΩ or more with a 500 VDC megger between the input/output terminal and power supply terminal, and between the input and output terminals.
Dielectric strength:	1,500 VAC for 1 minute between the input, output and power supply terminal.
Power consumption:	Approx. 4 VA (AC), approx. 120 mA (DC)
Reset:	Automatically reset within 0.5 sec of power-on

Explanation of Terminals



No.	Symbol		Description
1	OUTPUT	+	Output signal
2		-	
3	INPUT	+	Input signal
4		-	
5	SENSOR	-	Sensor power supply
6		+	
7	POWER	U (+)	Power supply
8		V (-)	