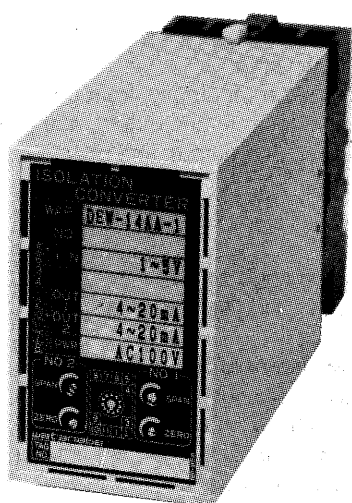


# HIGH-RESPONSE ISOLATOR (WITH 2 ISOLATED OUTPUTS)

WAP-DEW



50 (W) x 84 (H) x 135.5 (D) mm Approx. 400 g

This is a plug-in type isolator with 2 isolated outputs that works with high speed response. It not only isolates signals of diverse levels from other circuits, but also amplifies and converts them into standardized signals that can be handled in measurement control systems in a standardized manner. It provides an effective means for noise immunity.

## Features

- Implements the step response of 500  $\mu$ sec (0 - 90%).
- Can deliver signals both to the loop installed for it and to a computer.
- The four ports of input, 1st output, 2nd output, and power supply are isolated from one another with a dielectric strength of 2 kVAC.
- Plug-in type that can be mounted on DIN rails by a one-touch action.

Model WAP - **DEW** - ☐ ☐ ☐ ☐ ☐

**DEW** Isolation (2,000 VAC for 1 min. between input, outputs and power supply)  
Response time (500  $\mu$ sec/0 - 90%)

## Power Supply

- 1 AC 100 V  $\pm$  10%, 50/60 Hz
- 2 AC 200 V  $\pm$  10%, 50/60 Hz
- 3 DC 24 V  $\pm$  10%
- 4 AC 110 V  $\pm$  10%, 50/60 Hz
- 5 AC 220 V  $\pm$  10%, 50/60 Hz

## Input Signal

		Input Resistance
10	DC 0-10 mV	1 M $\Omega$
11	DC 0-100 mV	1 M $\Omega$
12	DC 0-1 V	1 M $\Omega$
13	DC 0-5 V	1 M $\Omega$
14	DC 1-5 V	1 M $\Omega$
15	DC 0-10 V	1 M $\Omega$
16	DC 0-50 mV	1 M $\Omega$
17	DC 0-60 mV	1 M $\Omega$
23	DC $\pm$ 1 V	1 M $\Omega$
24	DC $\pm$ 5 V	1 M $\Omega$
25	DC $\pm$ 10 V	1 M $\Omega$
31	DC 0-100 $\mu$ A	100 $\Omega$
32	DC 0-1 mA	100 $\Omega$
33	DC 0-10 mA	50 $\Omega$
34	DC 0-16 mA	50 $\Omega$
35	DC 0-20 mA	50 $\Omega$
36	DC 4-20 mA	50 $\Omega$
56	DC 4-20 mA	250 $\Omega$
57	DC 10-50 mA	100 $\Omega$
99	Other than the above (Please consult with us.): Over 10 mV $\cdot$ fs up to 300 V $\cdot$ fs Over 10 $\mu$ A $\cdot$ fs up to 50 mA $\cdot$ fs	

## 1st Output Signal

		Allowable Load Resistance
A	DC 4-20 mA	750 $\Omega$ or less
B	DC 1-5 mA	3 K $\Omega$ or less
C	DC 2-10 mA	1.5 K $\Omega$ or less
D	DC 0-1 mA	15 K $\Omega$ or less
E	DC 0-10 mA	1.5 K $\Omega$ or less
F	DC 0-16 mA	937 $\Omega$ or less
G	DC 0-20 mA	750 $\Omega$ or less
H	DC 1-5 V	2.5 K $\Omega$ or more
J	DC 0-10 mA	10 K $\Omega$ or more
K	DC 0-100 mA	100 K $\Omega$ or more
L	DC 0-1 V	500 $\Omega$ or more
N	DC 0-5 V	2.5 K $\Omega$ or more
P	DC 0-10 V	5 K $\Omega$ or more
R	DC $\pm$ 10 V	5 K $\Omega$ or more
S	Other than the above (Please consult with us.): Voltage output 10 V or less Current output 20 mA or less	

## 2nd Output Signal

		Allowable Load Resistance
A	DC 4-20 mA	300 $\Omega$ or less
H	DC 1-5 V	2.5 K $\Omega$ or more
N	DC 0-5 V	2.5 K $\Omega$ or more
P	DC 0-10 V	5 K $\Omega$ or more
AR	DC 20-4 mA	300 $\Omega$ or less
HR	DC 5-1 V	2.5 K $\Omega$ or more
NR	DC 5-0 V	2.5 K $\Omega$ or more
PR	DC 10-0 V	5 K $\Omega$ or more
S	Other than the above (Please consult with us.): Voltage output 10 V or less Current output 20 mA or less	

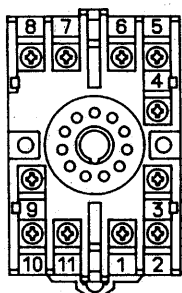
## Specifications

Input signal:	DC voltage, DC current
Output signal:	DC current or DC voltage, respectively, for the 1st and the 2nd output
Allowable load resistance:	Within the range specified in the part of Model, respectively, for the 1st and the 2nd output
Accuracy:	$\pm 0.1\% \cdot fs$ (at 23°C)
Response time:	500 $\mu$ sec (time to reach 90% of the final value)
Isolation:	Among input, 1st output, 2nd output, and power supply, from one another
Dielectric strength:	2,000 VAC for 1 minute among input, 1st output, 2nd output, and power supply
Insulation resistance:	100 M $\Omega$ or more among input, 1st output, 2nd output, and power supply
Zero & span adjustment:	$\pm 20\% \cdot fs$ each (multi-turn trimmer)
Output limitation:	Approx. 120% $\cdot fs$ (fixed)
Influence of ambient temperature:	Influence on accuracy: $\pm 0.015\% \cdot fs/^{\circ}C$
Influence of supply voltage:	Influence on accuracy: $\pm 0.1\% \cdot fs/\text{rated voltage} \pm 10\%$
Power supply:	100 V, 110 V, 200 V, or 220 VAC $\pm 10\%$ each, 24 VDC $\pm 10\%$
Power consumption:	Approx. 5 VA (AC)
Operating ambient temperature and humidity:	-5 to +60°C, 90% RH or less (without condensation or icing)
Material of case:	ABS resin (outer covering), Noryl resin (base socket)
Dimensions and weight:	50 wide x 84 high x 135.5 deep (mm), approx. 400 g
Construction and mounting:	Plug-in type. Directly installed or mounted on DIN rails
Connection method:	Coupled to M3.5 x 7 SEMS screws of base socket

## Major Applications

- Safe and accurate measurement of high-potential circuits (Electrolytic baths, electric furnaces, etc.).
- Prevention of induction noise infiltration from high-frequency circuits.

## Pin and Terminal Assignment



No.	Symbol		Description
1	OUT	+	Output signal
2	No. 1	-	
3			N.C.
4			N.C.
5	IN	+	Input signal
6		-	
7	POWER	U	Power supply
8		V	
9			N.C.
10	OUT	+	Output signal
11	No. 2	-	