

JQ1-C52 series

1 Phase Reactive power Transmitter (DIN)



1. Brief introduction

JQ1-C52 series 1 phase reactive power transmitter use CT and PT principle to measure the reactive power. The output signal could be standard DC signals that can be accepted by electronic circuit e.g. PLC. The primary input current and the output signal is highly electric isolated. It can be used in Power Utility, Telecom, Oil & Gas, and New energy fields.

- ★ Reactive power measurement ★ DIN rail mounting
- ★ Good linearity ★ Galvanic isolation between primary and secondary circuit ★ Low power consumption
- ★ Compact size ★ Standard RMS signal output

2. Order information (see right chart)

Nominal Input:

1 5 Arms
100 220 270 400 500Vac

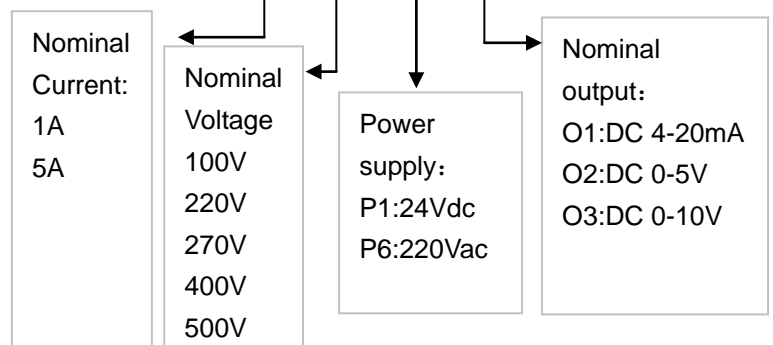
Nominal output:

O1:DC 4-20mA O2:DC 0-5V O3:DC 0-10V

Power supply:

P1:24Vdc P6:220Vac

JQ1-C52-x-xxxPx Ox



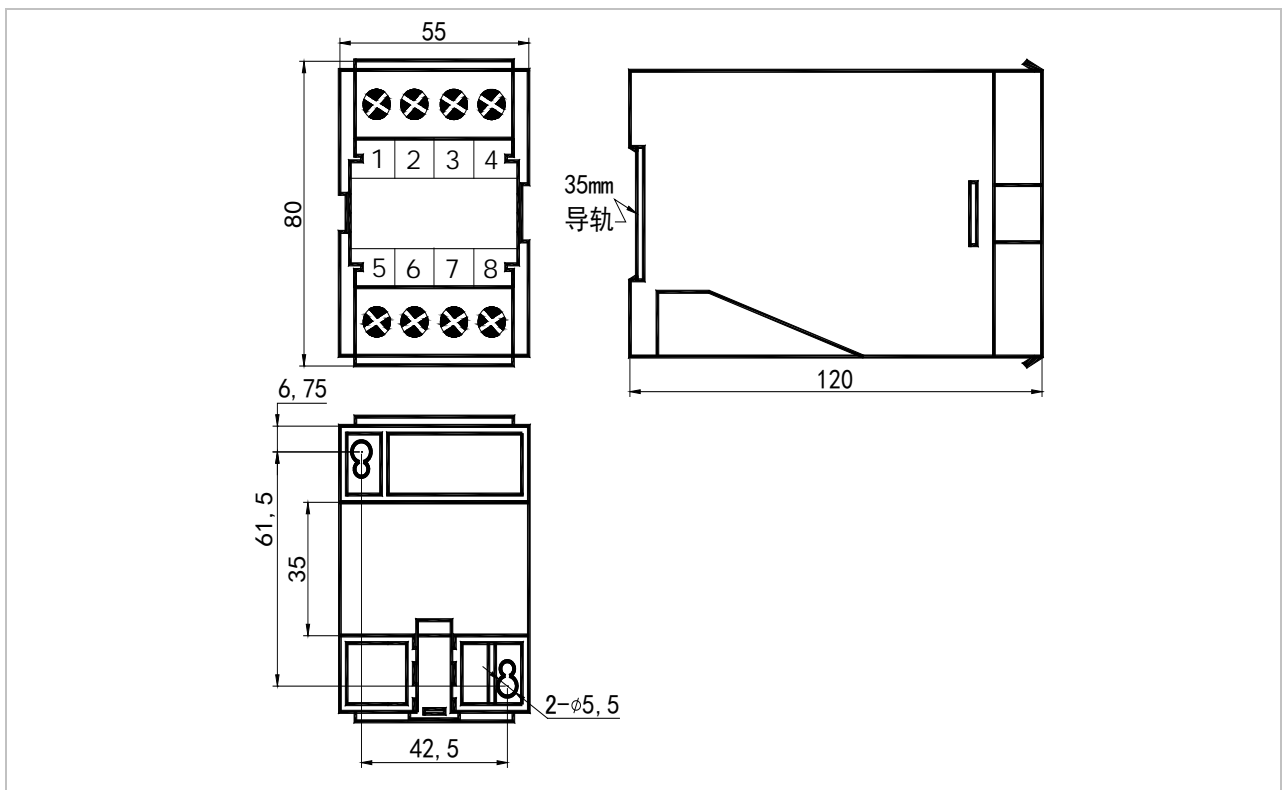
3. Electrical data

I_{pn}	Primary nominal current (Arms)	1 5
I_p	Primary Current measuring range(Arms)	120% x I_{pn}
V_{pn}	Primary nominal voltage (Vrms)	100 220 270 400 500V
V_p	Primary voltage measuring range (Vrms)	120% * V_{pn}
V_{sn} (for voltage output)	Secondary Voltage output	DC0-5V, DC0-10V etc
I_{sn} (for current output)	Secondary Current output	DC 4-20mA,DC 0-20mA etc
X	Accuracy ($T_a = +25^{\circ}C$)	$\leq 0.5\%$
EL	Linearity error	$\leq 0.2\%$
V_c	Power supply voltage	$P_n(\pm 5\%)$
T_r	Response time	$\leq 300mS$
f	Frequency bandwidth	40-65HZ
I_c	Current consumption	20mA (for current output : + I_s)
R_L	Load resistance	>5K Ω (for voltage output)/ $\leq 450\Omega$ (for current output)
V_d	Isolation test(50HZ,1min)	2.5KV

4. General data :

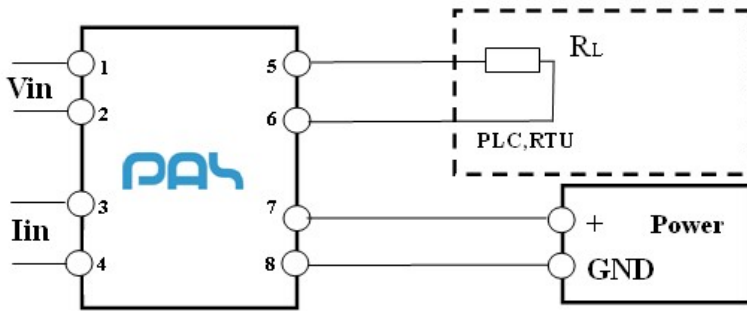
Ta	Ambient operating temperature	-10 - +70 °C
Ts	Ambient storage temperature	-45 - +85 °C
W	Mass	200g
St	Standards	IEC688:1992;EN61326
Ha	Ambient operating humidity	20-90% RH
	Case material	According to UL94-V0

5. Dimensions



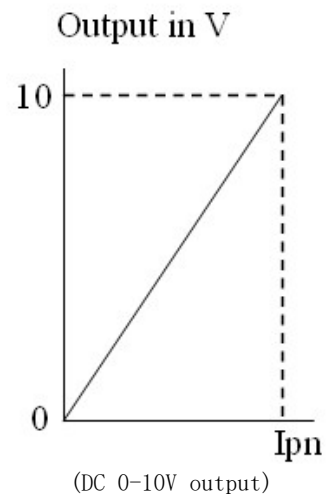
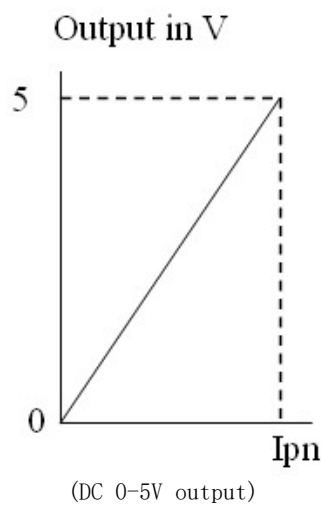
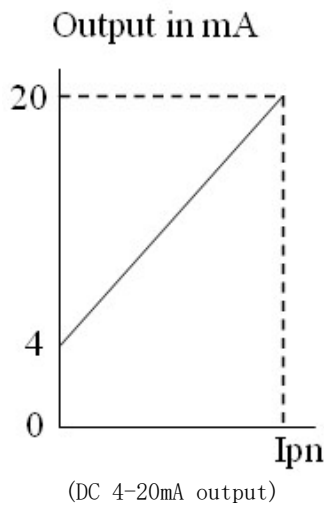
General tolerance	± 1mm
Primary hole size	No holes
Fastening	Bottom: 2 x Φ5.5mm

6. Connection



PIN	Defines	PIN	Defines
1	Voltage in	5	Output signal +
2	Voltage in	6	Output signal -
3	Current in	7	Supply voltage +
4	Current in	8	Supply GND

7. Output figure



8. Safety items



1. Only qualified people can operate with such electrical products.
2. Wrong connection may destroy the products.
3. ESD protection is necessary, please follow the correct process.
4. Do not use in the environment with conductive dust and corrosive gas.
5. The Potentiometers on the product are used by PAS internal, the user can not calibrate.
6. Strong vibration and very high temperature may damage the products.



1. After the installation, the bus bar may be connected to the high voltage equipment, please do not touch the exposed parts of the transducers to avoid electric shock!

Note: 1.Passion technology company reserves the right to modify the datasheets at any time without previous notifications.
2.Any question about the datasheet, please contact our TCS.