# Single phase DC voltage transducer

CE-VZ01A-\*\*MS2-0.2

#### 1 Overview

This device is a kind of single phase DC voltage isolation transducer, can realize the electrical isolation between input and output, input and auxiliary power supply, auxiliary power supply and output. It adopts photoelectric isolation method to make the linear relationship between the output signal and the input signal, with advantages of high precision, rapid response, strong anti-interference capability, easy for installation. Can widely used in a variety of serious electromagnetic interference industrial scene, such as data collection of electroplating industry, regard as front-collection parts of a variety of automatic measurement and control system.

### 2 Case style

MS2 style:

 $Length \times Width \times Height = 83mm \times 36mcm \times 56mm$ 

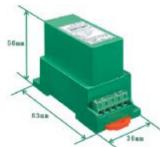


Figure 1, MS2 style outline drawing

## 3 Part number

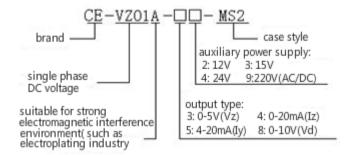


Figure 2 product model selection table

### 4 Specifications

- \* Input DC voltage range: 0~500V DC;
- \* Accuracy: class 0.2;
- \* Load capacity:

Voltage output:  $RL \ge 2 \text{ k}\Omega$ Current output:  $RL \le 250\Omega$ 

- \* Temperature drift: 300ppm/°C
- \* Isolation voltage: 2500 V DC
- \* Response time: ≤ 400 mS
- \* Rated power consumption: <1.0W(+12V) \( <1.2W(+24V) \)
- \* Output ripple: ≤10mV \* Frequency range: none
- \* Surge impact immunity:
- Power port three–level 2000V

 $(L-N/2\Omega/ integrated wave)$ 

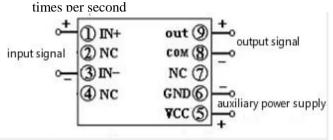
Analog I/O port three-level 2000V

(L-N/40 $\Omega$ /integrated wave);

\* Impulse immunity:: none

Unit 501,BLDG C, BAOFU Jewelry Garden, 33 BULAN Road, Longgang district Shenzhen City, China Post code: 518114

\* Input overload capacity: 2 times rated input value, 10



Pin 1: input signal positive terminal;

Pin 3: input signal negative terminal;

Pin 5: auxiliary power supply positive terminal;

Pin 6: auxiliary power supply ground terminal;

Pin 9: output signal positive terminal;

Pin 8: output signal ground terminal;

Note: output signal and auxiliary power supply are not

common-ground

Other undefined pins can not be used for other purposes.

## **6 Mounting Diagram**

DIN35rail mounting size: card slot width 35.5mm;

Screw mounting size: 83 mm×26.8mm;

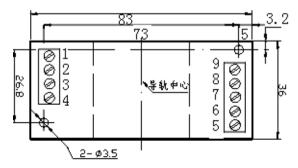


Figure 4, DIN rail or screw installation plan

#### 7 Notes

- 7.1 The voltage of the power supply must accord with the nominal value, especially +12V and +15V product can not connect +24V power supply, otherwise the product will be burned out.
- 7.2 When measuring the voltage or current with the multi meter pen, please screw the terminal screw in the end, otherwise it will influence the voltage or current output measuring value. The terminal block wiring wire diameter
- $\leq$  1.4mm, otherwise it may cause terminal screw slipped.
- 7.3 Must connect the signal input, output and auxiliary power supply correctly according to corresponding connections diagram of the product model. Confirm there is no mistake then apply power to the transducer.
- 7.4 The operating condition should without dew, conductive dust and damaged insulation, metal corrosive gases.
- 7.5 If a group of transducers are mounted together, keep a space more than 10mm between adjacent units.
- 7.6 The transducer's zero point and accuracy have been calibrated before delivery, please do not calibrate casually. If indeed to calibrate, please contact with our company.
- 7.7 Integrated structure of the transducer, non-removable, and should avoid collision and fall, don't modify or tear off any labels of the product.

7.8 There is no lightning protection circuit inside the transducers. Please adopts lightning protection when the input and output feeders of the transducers are exposed to adverse weather conditions.