

FS200BT系列霍尔电流传感器

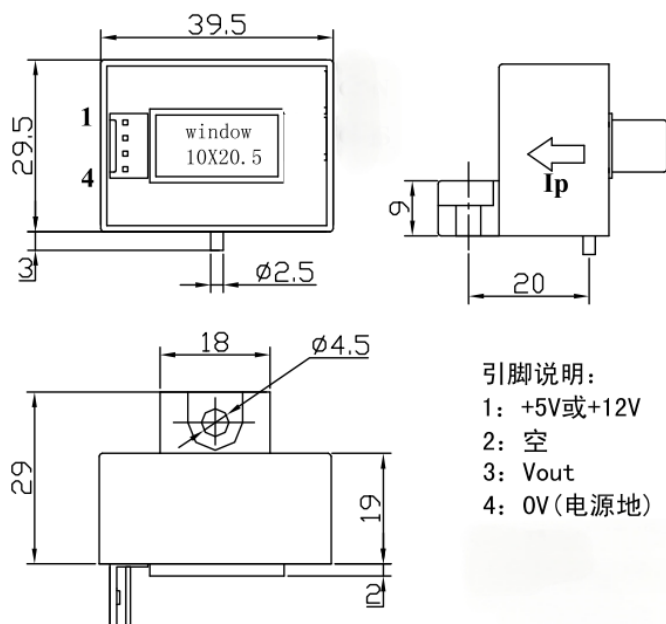
应用霍尔效应开环原理的电流传感器，能在电隔离条件下测量直流、交流、脉冲以及各种不规则波形的电流。此产品可定制5V-36V宽电压/高精度产品。

Open loop current sensor based on the principle of Hall-effect. It can be used for measuring AC, DC, pulsed and mixed current.

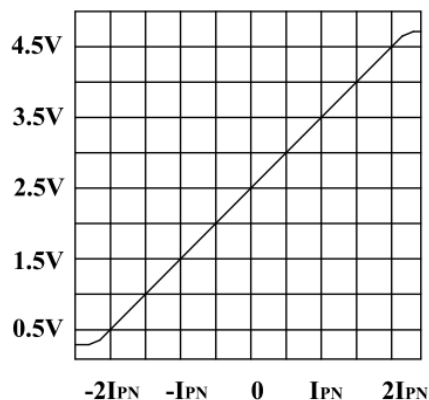


电参数/Electrical characteristics									
	型号 Type	FS050BT	FS100BT	FS200BT	FS300BT	FS400BT	FS500BT	FS600BT	
I_{PN}	原边额定输入电流 Primary nominal input current	50	100	200	300	400	500	600	A
I_p	原边电流测量范围 Measuring range of primary current	0~±100	0~±200	0~±400	0~±600	0~±800	0~±900	0~±900	A
V_{OUT}	副边额定输出电压 Nominal output voltage	±1(±1%)或±2(±1%)							V
V_c	电源电压 Supply voltage	+5V/+12V							V
I_c	电流消耗 Current consumption	20							mA
V_a	绝缘电压 Insulation voltage	在原边与副边电路之间2.5KV有效值/50Hz/1分钟							
ε_L	线性度 Linearity	±1							%FS
V_O	零点失调电压 Offset voltage	$T_A=25^{\circ}\text{C}$ 2.5V±1%/(输出为VCC 1/2)							V
V_{OM}	磁失调电压 Residual voltage	$I_{PN} \rightarrow 0$ <±20							mV
V_{OT}	失调电压温漂 Thermal drift of V_O	$I_p=0$ $T_A=-25 \sim +85^{\circ}\text{C}$ <±1							mV/°C
T_r	响应时间 Response time	≤3							μs
f	频带宽度(-3dB) Frequency bandwidth(-3dB)	DC~20							kHz
T_A	工作环境温度 Ambient operating temperature	-40~+85							°C
T_s	贮存环境温度 Ambient storage temperature	-40~+125							°C
R_L	负载电阻 Load resistance	≥10K							Ω
	标准 Standard	GI/FS-0105							

外形尺寸(mm)/Dimensions of drawing(mm)



输入电流—输出电压



使用说明/Instructions

- 错误的接线可能导致传感器损坏。传感器通电后，当被测电流从传感器箭头方向穿过，即可在输出端测得同相电压值。
Incorrect wiring may cause damage to the sensor. After the sensor is powered on, when the measured current passes through the arrow direction of the sensor, the in-phase voltage value can be measured at the output end..
- 传感器的输出幅度可根据用户需求进行适当的调节。
The output amplitude of the sensor can be adjusted according to the user's needs.
- 可按用户需求定制不同额定输入电流和输出电压的传感器。
Sensors with different rated input current and output voltage can be customized according to user requirements.
- 原边电流测量范围是在额定输出电压1V状态下。
The measuring range of the primary current is at the rated output voltage of 1V.