

HBA—TPM系列霍尔电流传感器

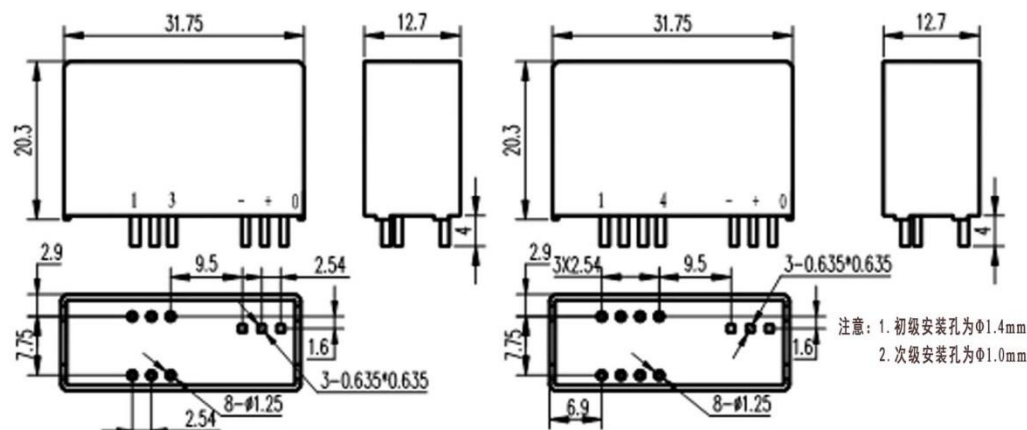
(HBA-TPM Hall-effect Current Sensor Series)

HBA-TPM 系列霍尔电流传感器的初、次级之间是绝缘的，可用于测量直流、交流和脉冲电流。
(HBA-TPM Series Hall-effect Current Sensor between primary and secondary is insulated, can be used for the measurement of DC, AC and pulse current)

电气参数 (Electrical characteristics)				
	型号 Type	HBA25-TPM	HBA50-TPM	A
I _{pn}	额定输入电流 Rated input	25	50	A
I _{pm}	测量电流范围 Measuring range	55	90	A
R _m	测量电阻 Measuring resistance	200 ~730 (±15V)	54~250 (±15V)	Ω
K _N	匝比 Turns ratio	1-2-3: 2000	1-2-3-4: 2000	
I _{out}	输出电流 Rated output current	12.5	25	mA
R _s	次级线圈内阻 Secondary coil resistance	200	180	Ω
I _o	零电流失调 Zero offset current	<0.2		mA
V _c	供电电源 Supply voltage	±15±5%		V
I _c	静态功耗 Current consumption	≤15+I _{out}		mA
I _{ot}	零点温漂 Thermal drift of I _o	-40~+85℃	±0.5	mA
F	带宽 Frequency bandwidth(-3dB)	DC~100		KHz
ε _G	精度 Accuracy	±0.5		%
ε _L	线性度 Linearity	±0.1		%

di/dt	跟随精度 Accurately followed	>50	A/μS
Tr	响应时间 Response time	≤1	μS
Vd	绝缘电压 Insulation voltage	2.5	KV
Ta	工作温度 Ambient operating temperature	-40~+85	°C
Ts	储存温度 Ambient storage temperature	-40~+125	°C
M	重量 mass	16	g
	标准 Standards	EN50178\IEC61010-1\UL94-Vo\ROHS	

机械参数 Dimensions (mm)



接线图

初 级	初级接法 IPN (A)	峰值电流 IP (A)	输出电流 Is (mA)	初级引脚连接	
				HBA25-TPM	HBA50-TPM
1	25, 50	55, 90	12.5, 25		
2	12, 24	27, 45	12, 24		
3	8, 16	18, 30	12, 24		
4	12	13, 22	12, 24		

使用说明 Remarks

- 应用：通讯电源、不间断电源UPS、斩波器、电化学、整流、电源监测、电焊机、变频、开关电源、电池监测、电动机监测等领域。Application: communication power supply, uninterruptible power supply UPS chopper, electrochemical, rectifier, power monitoring, welding machines, inverter, switching power supply, battery monitoring, motor monitoring fields.
- 传感器的输出幅度可根据用户需要进行适当调节。The amplitude of the output of the sensor can be appropriately adjusted according to user 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。Custom different rated input current and the output voltage of the sensor.