

Hall Current Sensor

EHM Series

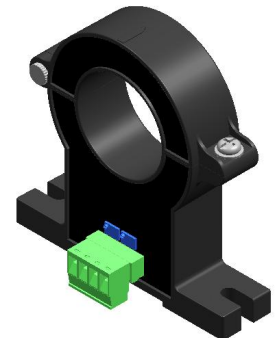
The EHM100~500A series are For the electronic measurement of currents:DC,AC,pulsed, with a galvanic isolation between the primary(high power) circuit and the secondary(electronic) circuit.

Features:

- 1/Hall effect measuring principle.
- 2/Using a programmable high-speed Hall integrated circuit current sensor.
- 3/The perfect combination of digital circuit and analog circuit is realized; the accuracy, offset and other indicators are optimized.

Application domain:

- 1/Industrial.
- 2/DC AC Electric motor.
- 3/Battery,Electroplating,UPS,electrolytic and other industries.
- 4/DC AC Power supply current metering and measurement etc.



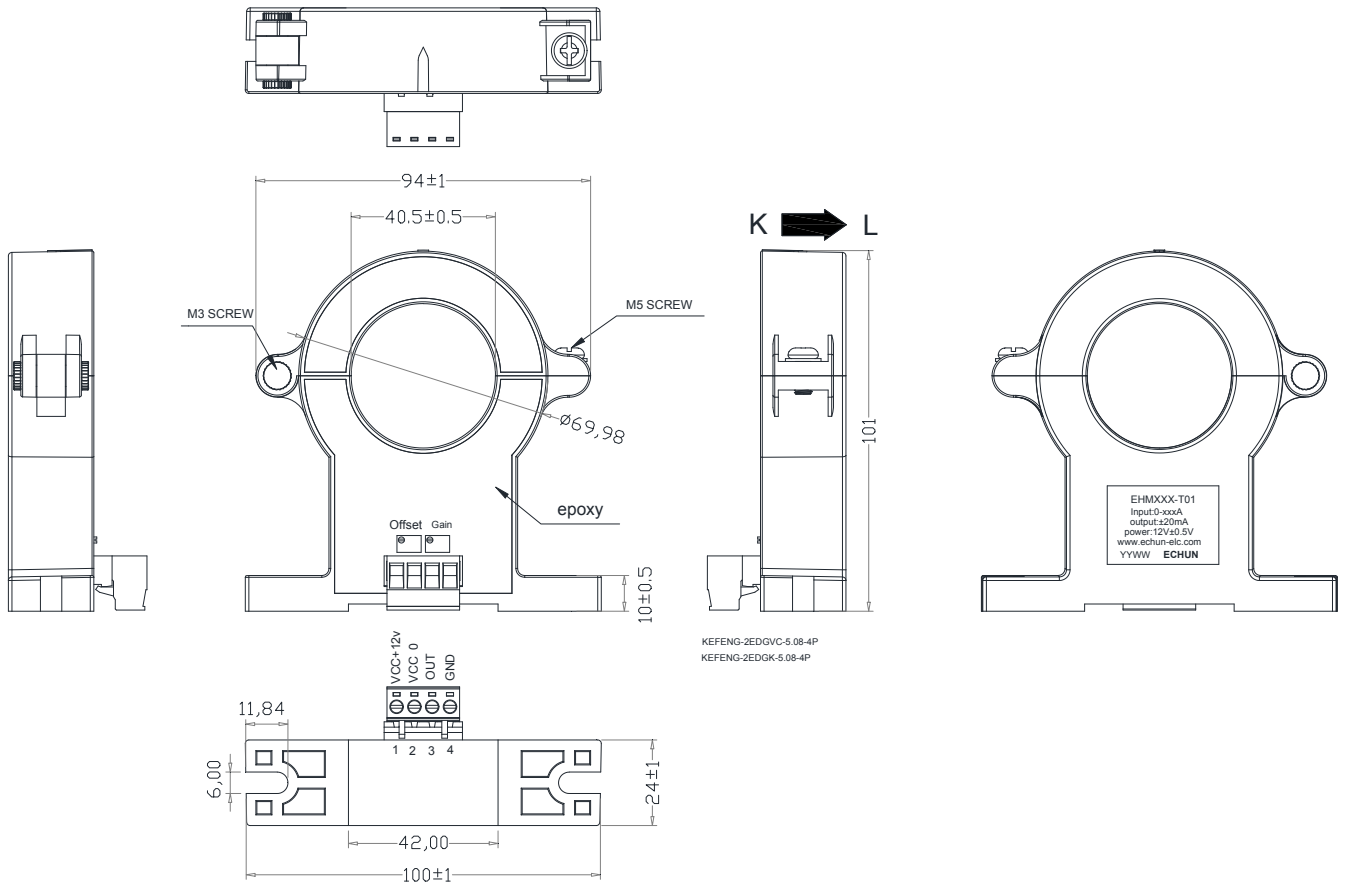
Electrical Specifications

Type		EHM101-T01	EHM301-T01	EHM 501-T01
Primary nominal DC. current	I_{pn} (A)	100	300	500
Primary current measuring range	I_p (A)	DC≤120 AC≤120	DC≤360 AC≤360	DC≤600 AC≤600
Accuracy TA = 25 °C (excluding offset)	X	±0.5 % of I_{PN}		
Linearity (exclude the electrical offset)	L	±0.2 % of I_{PN}		
Overload capability (Imax)	I_p	6000A (The 6000A does not guarantee the accuracy)		
Output current	I_{out}	±0.02 A		
Offset current @ TA = 25 °C	I_o	< ±0.1mA		
Hysteresis offset current @ IP = 0, after an excursion of 1 × IPN	I_{oh}	< ± 0.1 mA		
Power Consumption	I_c	0.15 A		
Supply voltage	Vcc	12V		
Temperature coefficient of I_{out} (% of reading)		< ±0.1 %/K		
Isolation voltage	Vd	4.4 KV RMS/50Hz/min,		
Impulse withstand voltage 1.2/50 μs	Uw	8.3 kV		
Isolation resistance	RIs	DC500V / 1000MΩ min		
Step response time to 90 % of IPN	Tr	< 5 μs		
Frequency bandwidth (0 ... -3 dB)	f	DC ... 25 kHz		
Operating temperature	To	-35 ~ +80°C		
Storage temperature	Ts	-40C ~ +85°C		

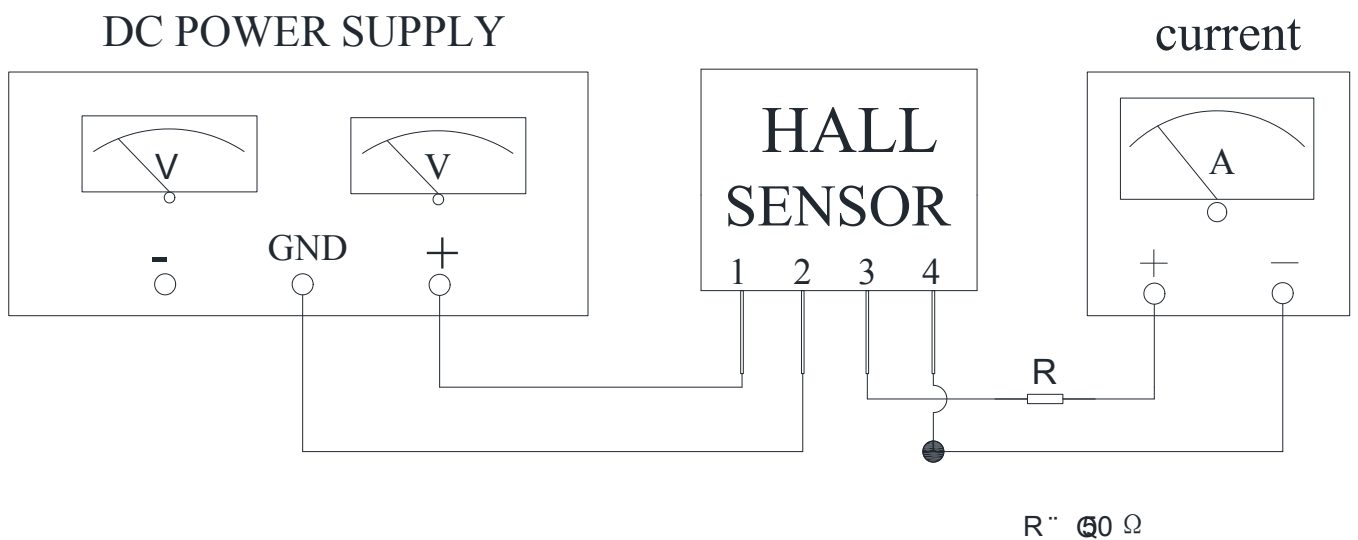
Mechanical Specifications

Output Type	Current Terminal (2EDG 5.08-4P)
Approx. Weight	160g

Dimensions (unit: mm):



Connection:



Notes:

1. Adjust the offset potentiometer to power it on for 3 minutes.

2. Two potentiometers can be adjusted, only if necessary, by turning slowly to the required accuracy with a small screwdriver.
3. Connect the terminals of power source, output respectively and correctly, never make wrong connection.
4. The best accuracy can be achieved when the window is fully filled with BUSBAR (current carrying conductor).
5. The in-phase output can be obtained when the direction of current of current carrying conductor is the same as the direction of arrow marked on the transducer case.
6. The BUSBAR must be installed in the center of the window!
7. The OFFSET Used to adjust the zero point ($I_p = 0$), usually the output value < 0.03mA.
8. The GAIN Adjust the output current value (accuracy adjustment).