DATA SHEET
DC AC Leakage Current Sensor

PN: CHD_SCAC12D5 | **IPN=10~300mA**

Feature

- AC Leakage Current Sensor develops on base of magnetic modulation closed loop principle
- Apply unique patented technology for measure tiny current (mA level)
- Supply voltage: DC ±12 V

Advantages

- High accuracy
- Easy installation
- Wide current measuring range
- Optimized response time
- Low power consumption
- High immunity to external interference
- Very good linearity
- Can be customized

Applications

- The current detection of the lift
- DC panel detection
- The signal system
- Current differential detection
- AC variable-speed drive/ Servo drive
- UPS and Inverter applications

CE RoHS

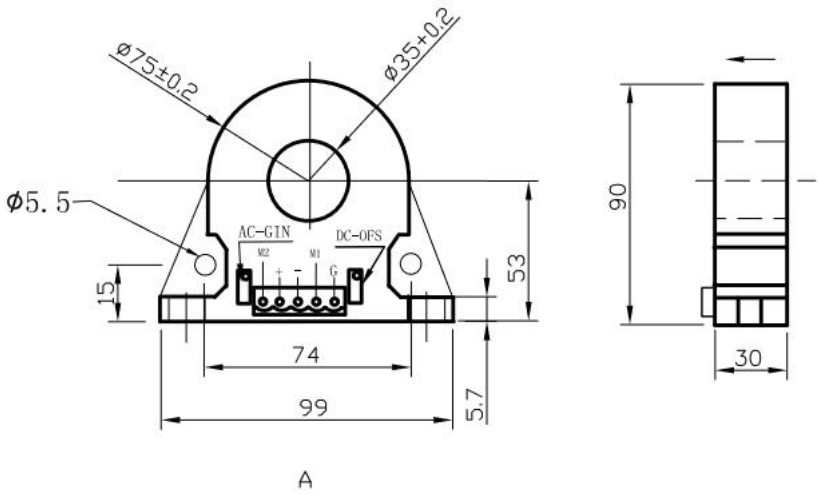
Electrical data:

	CHD10 SCAC12D5-B	CHD20 SCAC12D5-B	CHD50 SCAC12D5-B	CHD100 SCAC12D5-B	CHD300 SCAC12D5-B
Rated input Ipn (DC/AC)	±10mA	±20mA	±50mA	±100mA	±300mA
Measuring range Ip (DC/AC)	0～±20mA	0～±40mA	0～±100mA	0～±200mA	0～±350mA
Load impedance (at rated current)	≥10K Ω				
Output voltage Vo(V)	DC terminal M1：0~±5.0V AC terminal M2: 0~5V				
Supply voltage VC(V)	DC ±12V (±5%)				
Accuracy XG(%)	@IPN,T=25°C ±1%				
Linearity	±1%				
Offset voltage VOE(mV)	<±100mV				
Temperature variation of VOE VOT(mV/°C)	<±3				
Resolution	10uA				
Anti-interference characteristics	@H=50A DC/m < ±5mV				
Power consumption IC(mA)	<20mA				
Insulation voltage	@50/60Hz, 1min 3kV rms				

General data：

Parameter	Value
Operating temperature TA(°C)	-25 ~ +85
Storage temperature TS(°C)	-25~ +85
Mass	135g
Plastic material	PBT G30/G15, UL94- V0;
Standards	IEC60950-1:2001
	EN50178:1998
	SJ20790-2000

Dimensions(mm):



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General tolerance:< ±0.5mm

Primary through-hole：D35+0.2mm

Instructions:

1. CHD_SCAC12D5 series leakage current sensors are used for isolation and thru-hole measurement of DC and AC mA micro-currents in a non-contact way. M1 is the output of DC measurements and M2 is the output of AC measurements.
2. The output and zero position of the sensor can be adjusted appropriately according to the user's needs.
3. AC-GIN is used to adjust AC output value and DC-OFS is used to adjust DC zero.
4. The measured AC frequency is 50 Hz.

Remarks：

- When the current goes through the primary pin of a sensor, the voltage will be measured at the output end.
- Custom design is available for the different rated input current and the output voltage.
- The dynamic performance is the best when the primary hole if fully filled with.
- The primary conductor should be <100°C.

WARNING : Incorrect wiring may cause damage to the sensor.