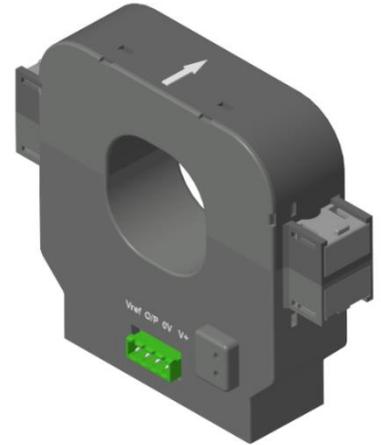


$I_{pn} = 1500A$



**Features**

- Split core type
- Open loop current sensor
- Voltage output

**Advantage**

- Good linearity
- No insertion losses
- Low power consumption

**Applications**

- Used for measurement of electric DC current
- Pulsed in electric & electronic equipment

**Application domain**

- Commercial
- Industrial

**Standards**

- EN 50178
- UL508

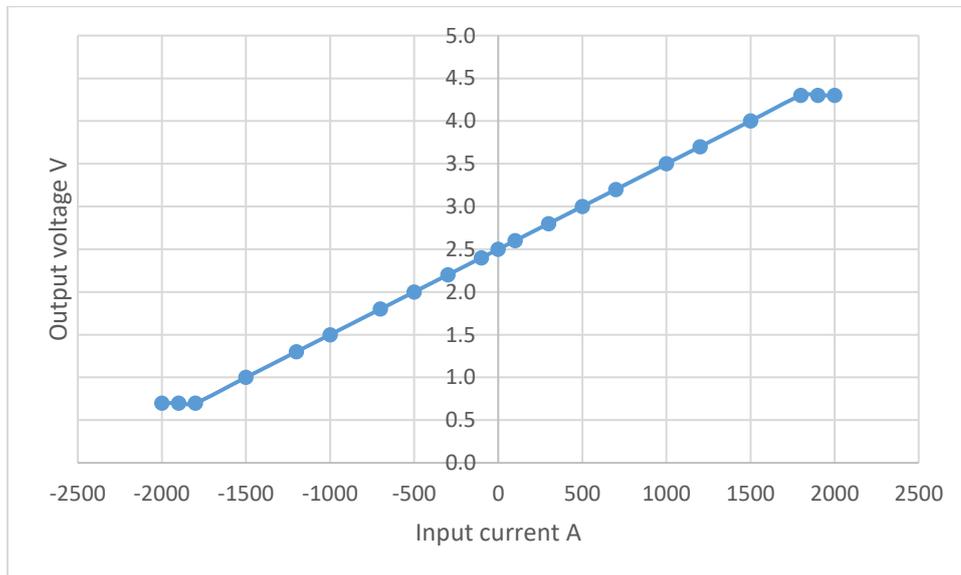
**Insulation Characteristics**

Parameters	Symbol	Value	Units
Dielectric strength between primary and secondary terminals,50Hz, 60 seconds	$V_d$	5.5	kV
Comparative tracking index	CTI	250	V
Insulation resistance at 500 VDC	$R_{15}$	>100	MΩ
Creepage distance		61.50	mm
Clearance distance		40.00	mm

Specifications (Unless otherwise specified temperature is 25°C)

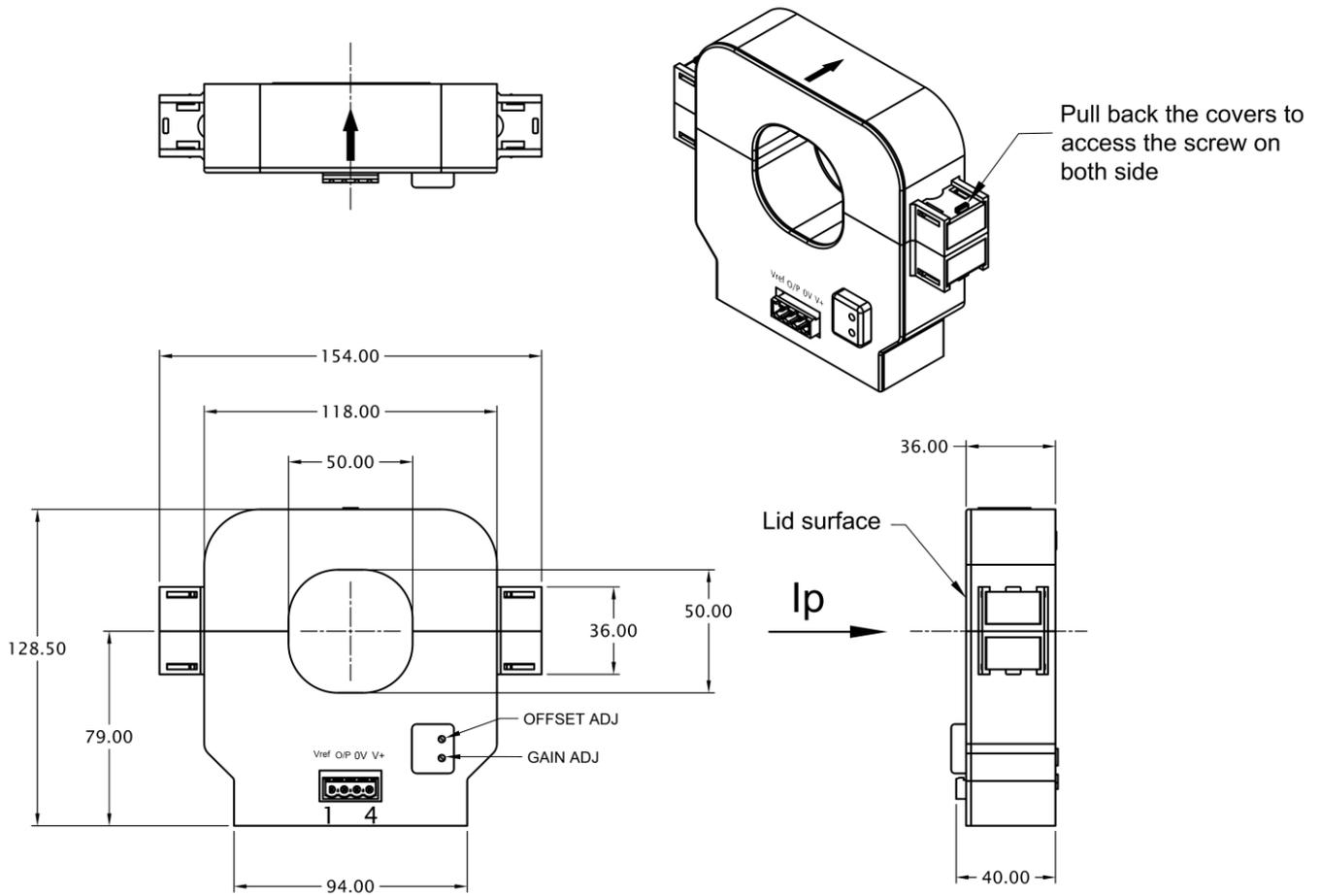
Parameters	Symbol	Condition	Min	Typ	Max	Units
Input current nominal	$I_{pn}$			1500		A
Input current measuring range	$I_p$		-1800		+1800	A
Burden resistance	$R_b$		10			k $\Omega$
Output offset voltage	$V_{off}$	at $I_p = 0$		$2.5 \pm 0.025$		V
Reference voltage	$V_{ref}$			$2.5 \pm 0.025$		V
Output voltage	$V_{out}$	at $\pm I_{pn}$ , $R_b = 10k\Omega$ ,		$2.5 \pm 1.5$		V
Output sensitivity	$V_{sens}$			1.0		mV/A
Supply voltage ( $\pm 5\%$ )	$V_s$		+9.0		+18.0	V
Current consumption	$I_c$	at +9.0 ....18.0V		18		mA
Accuracy at $I_{pn}$ (Excluding offset)	$X_G$			$\pm 1$		%
Linearity error	$\Sigma_L$	-25 to +85 °C		0.5		%
Temperature coefficient of $V_{out}$	$TV_{out}$	-25 to +85 °C		500		ppm/k
Reaction time at 90% Of $I_{pn}$	$t_{ra}$			---		
Frequency bandwidth at -3db	BW			DC		
Output lowpass filter cut-off frequency	$f_c$			1.4		Hz
AC attenuation at 1500A $di/dt$ accurately followed	$di/dt$	at 50Hz		-24		dB
Ambient operating temperature	$T_A$			-25 to +85		°C
Ambient storage temperature	$T_S$			-40 to +100		°C
Mass	$m$			1.0		kg

Input & Output Characteristics

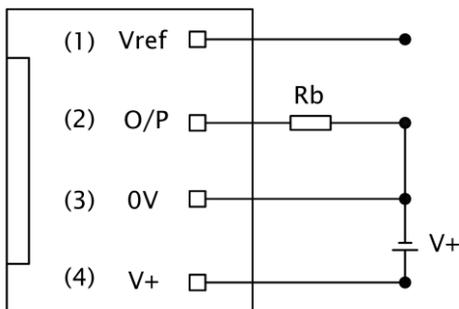


**Mechanical dimensions**

General Tolerance ± 1.0 mm	
All dimensions are in mm.	Scale - NTS



**Connection Diagram**



- Connector on the product: Connector header, part no- 1755752, Phoenix Contact
- Suggested mating connector: Connector housing, part no-1757035, Phoenix Contact
- It is recommended to centrally locate the current carrying conductor or completely fill the central opening for optimum performance
- Output increases when current ( $I_p$ ) flows in the direction of arrow
- Ensure proper connection of power supply to avoid damage to the sensor

### Safety



- This Sensor must be used in electric/electronic equipment with respect to applicable standards and safety requirements in accordance with the manufacturer's operating instructions.



- Caution, risk of electrical shock
- When operating the Sensor, certain parts of the module can carry hazardous voltage (eg. primary busbar, power supply).
- Ignoring this warning can lead to injury and/or cause serious damage.
- A protective housing or additional shield could be used.
- Disconnecting the main power must be possible
- Over currents ( $\gg I_{PN}$ ) can cause an additional voltage offset due to magnetic remanence.
- The temperature of the primary conductor shall not exceed 100 °C.
- This Sensors may only be used in electrical or electronic systems which fulfil the relevant regulations (Standards, EMC Requirements)
- Pay attention to protect non-isolated high-voltage current carrying parts against direct contact (e.g. with a protective housing)
- When installing the sensor, ensure that the safe separation (between primary circuit and secondary circuit) is maintained over the whole circuits and their connections.

### General information:

Electrohms reserves the right to make modifications on products for improvements without prior notice.