

LEM Closed/Open Transducers

LTS 6-NP, LTS 15-NP and LTS 25-NP: Closed loop (compensated) multi-range current transducer using the Hall effect, unipolar voltage supply, compact design for PCB mounting, insulated plastic case recognized according to UL94-V0, incorporated measuring resistance, and extended measuring range.
LA 20-PB: Closed loop (compensation) current transducer using the Hall effect, voltage output, and printed circuit board mounting.
LAH 25-NP, LAH 50-P, LAH 100-P, LA 55-P and LA 100-P: Closed loop (compensated) multi-range current transducer using the Hall effect, printed circuit board mounting, insulated plastic case recognized according to UL94-V0.
LA 150-P: Closed loop (compensated) current transducer using the Hall effect, and printed circuit board mounting.
LV 25-P and LV 20-P: Closed loop (compensated) voltage transducer using the Hall effect, and insulated plastic case recognized according to UL94-V0.
HXS xx-NP: Small packaged O/L, ASIC based with +5V supply. Four primary bus bars can be connected in parallel or series for flexibility.
HAS xx-P: PCB mount with aperture. O/L ASIC based with +5V supply. Range

is from 50A thru 400A. Programmable offset and gain. Wide temperature range of -40°C to 125°C.
HAS xx-TP: PCB mount with primary bus bar. O/L ASIC based with +5V supply. Range is from 50A, 75A and 100A. Programmable offset and gain. Wide temperature range of -40°C to 125°C.
HX xx-P: Small, cost effective PCB mount package that ranges from 3A thru 50A. Isolated with DC/AC/Pulse measurements.
HTB xx-P: PCB mount with aperture. Small package O/L with range from 50A thru 400A. Isolated with DC/AC/Pulse measurements.
HTB xx-TP: PCB mount with primary bus bar. Small package O/L with range of 50A, 75A and 100A. Isolated DC/AC/Pulse measurements.
HAS xx-S: Panel mount O/L. Isolated and can measure DC/AC currents at range of 50A thru 600A. Measuring range to 3 times nominal.
HAS xx-P: PCB mount with aperture. Isolated and can measure DC/AC currents at range of 50A thru 600A. Measuring range to 3 times nominal.
HASS xx-S: Panel mount O/L ASIC based device that can measure DC/AC current

at 50A thru 600A. Unipolar +5V supply with accuracy of 1%.
HMS xx-NP: Surface mount O/L ASIC device with +5V supply. Measuring range from 5A thru 25A.
TT xx-SD: Split core transducer for the electronic measurement of AC waveform currents, with galvanic isolation between the primary circuit (power) and the secondary circuit (measurement).
AT xxx B10: Split core transducer for the electronic measurement of AC waveform currents, with galvanic isolation between the primary circuit (power) and the secondary circuit (measurement). 0-10VDC voltage output proportional to the RMS value of the primary current.
APR xxx B10: Split core transducer for the electronic measurement of AC currents (all waveforms). Switch selectable measuring ranges and true RMS 0-5V and 0-10V switch selectable voltage output.
DHR 100 C10: The transducer for the electronic measurement of DC and distorted AC waveform currents. True RMS 0-10V voltage output.

Dim. in mm

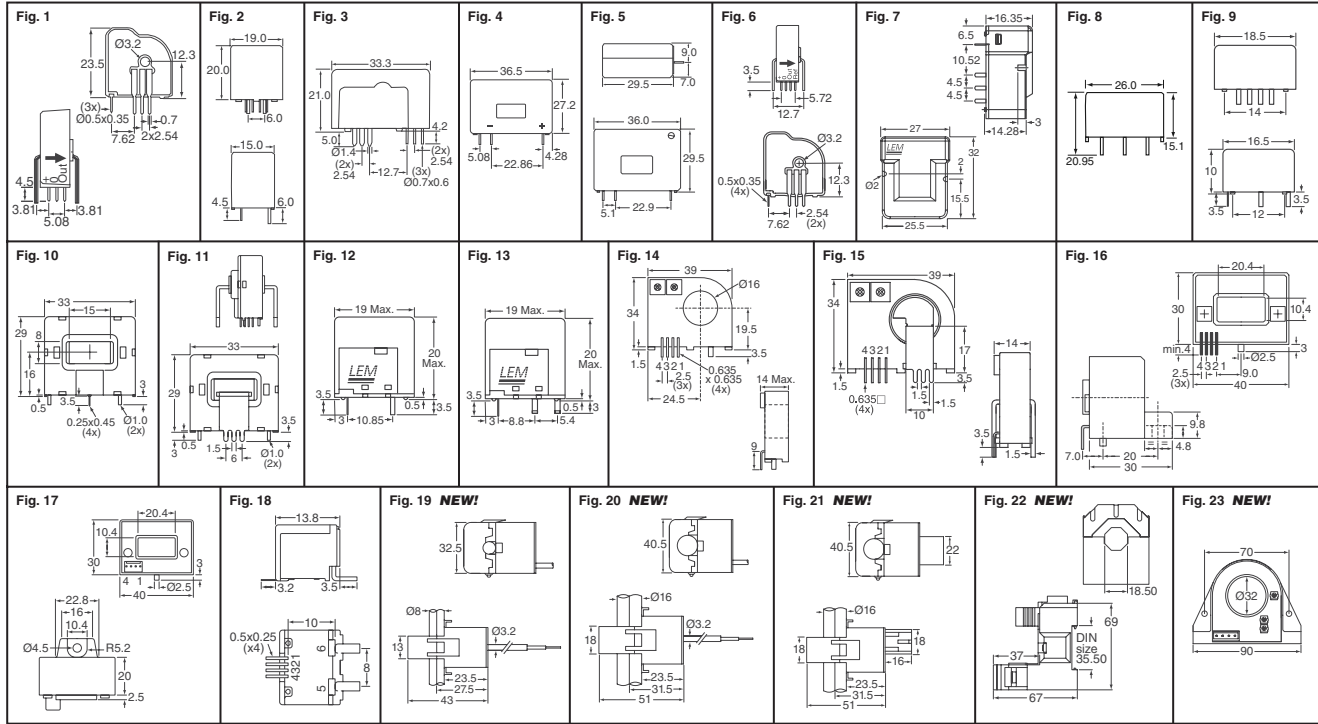


Fig.	Supply Voltage	Prim. Nom. r.m.s. Current	Sec. Nom. r.m.s. Current/Out. Volt.	Frequency Range (kHz)	Digi-Key Part No.	Price Each	1	10	25	LEM USA Inc. Part No.
Closed Loop Current Transducers										
1	5V	6A	±2.5V	200	398-1000-ND	20.20	16.16	12.93	LTS 6-NP	
	5V	15A	±2.5V	200	398-1001-ND	20.20	16.16	12.93	LTS 15-NP	
	5V	25A	±2.5V	200	398-1002-ND	20.20	16.16	12.93	LTS 25-NP	
2	±15V	20A	±4V	150	398-1006-ND	44.38	35.50	28.40	LA 20-PB	
	±12-15V	25A	25mA	200	398-1007-ND	28.25	22.60	18.08	LAH 25-NP	
3	±12-15V	50A	25mA	200	398-1008-ND	30.25	24.20	19.36	LAH 50-P	
	±12-15V	100A	50mA	200	398-1009-ND	33.00	26.40	21.12	LAH 100-P	
	±12-15V	50A	50mA	200	398-1010-ND	25.75	20.60	16.48	LA 55-P	
4	±12-15V	100A	50mA	200	398-1011-ND	32.25	25.80	20.64	LA 100-P	
	±15V	150A	75mA	150	398-1012-ND	38.00	30.40	24.32	LA 150-P	
6	5V	6A	2.5V	200	398-1021-5-ND	22.25	17.80	14.24	LTSR 6-NP	
	5V	15A	2.5V	200	398-1022-5-ND	22.25	17.80	14.24	LTSR 15-NP	
	5V	25A	2.5V	200	398-1023-5-ND	22.25	17.80	14.24	LTSR 25-NP	
7	±13.58V	100A	50mA	300	398-1024-5-ND	20.25	16.20	12.96	LAX 100-NP	
Closed Loop Voltage Transducers — RoHS Compliant										
8	±12-15V	10mA	25mA	25	398-1019-ND	63.20	50.56	40.45	LV 25-P	
	±12-15V	10mA	25mA	25	398-1020-ND	36.60	29.28	23.43	LV 20-P	
Open Loop Current Transducers — RoHS Compliant										
9	5V	20A	±2.5V	50	398-1025-5-ND	14.00	11.20	8.96	HXS 20-NP	
	5V	50A	±2.5V	50	398-1026-5-ND	14.00	11.20	8.96	HXS 50-NP	
10	5V	50A	±2.5V	50	398-1029-ND	25.50	20.40	16.32	HAS 50-P	
	5V	100A	±2.5V	50	398-1030-ND	25.50	20.40	16.32	HAS 100-P	
	5V	150A	±2.5V	50	398-1031-ND	25.50	20.40	16.32	HAS 150-P	

Fig.	Supply Voltage	Prim. Nom. r.m.s. Current	Sec. Nom. r.m.s. Current/Out. Volt.	Frequency Range (kHz)	Digi-Key Part No.	Price Each	1	10	25	LEM USA Inc. Part No.
10	5V	200A	±2.5V	50	398-1032-ND	25.50	20.40	16.32	HAS 200-P	
11	5V	50A	±2.5V	50	398-1027-ND	26.50	21.20	16.96	HAS 50-TP	
	5V	100A	±2.5V	50	398-1028-ND	26.50	21.20	16.96	HAS 100-TP	
12	15V	3A	±4V	50	398-1034-ND	14.50	11.60	9.28	HX 03-P	
	15V	5A	±4V	50	398-1035-ND	14.50	11.60	9.28	HX 05-P	
	15V	10A	±4V	50	398-1036-ND	14.50	11.60	9.28	HX 10-P	
	15V	15A	±4V	50	398-1037-ND	14.50	11.60	9.28	HX 15-P	
13	15V	20A	±4V	50	398-1038-ND	14.50	11.60	9.28	HX 20-P	
	15V	50A	±4V	50	398-1039-ND	18.00	14.40	11.52	HX 50-P	
14	±12-15V	200A	±4V	50	398-1041-ND	25.00	20.00	16.00	HTB 200-P	
	±12-15V	50A	±4V	50	398-1075-ND	25.88	20.70	16.56	HTB 50-TP	
15	±12-15V	100A	±4V	50	398-1077-ND	25.88	20.70	16.56	HTB 100-TP	
	15V	50A	±4V	50	398-1049-ND	25.00	20.00	16.00	HAS 50-S	
	15V	100A	±4V	50	398-1050-ND	25.00	20.00	16.00	HAS 100-S	
	15V	200A	±4V	50	398-1051-ND	25.00	20.00	16.00	HAS 200-S	
	15V	300A	±4V	50	398-1052-ND	26.50	21.20	16.96	HAS 300-S	
	15V	400A	±4V	50	398-1053-ND	26.50	21.20	16.96	HAS 400-S	
	15V	500A	±4V	50	398-1054-ND	26.50	21.20	16.96	HAS 500-S	
	15V	600A	±4V	50	398-1055-ND	26.50	21.20	16.96	HAS 600-S	
	15V	300A	±4V	25	398-1045-ND	26.50	21.20	16.96	HAS 300-P	
	15V	50A	5V	50	398-1062-ND	26.00	20.80	16.64	HASS 50-S	
17	5V	100A	5V	50	398-1063-ND	26.00	20.80	16.64	HASS 100-S	
	5V	200A	5V	50	398-1064-ND	26.00	20.80	16.64	HASS 200-S	

† Cut Tape ‡ Tape and Reel ◆ RoHS Compliant

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Closed/Open Transducers (Cont.)

Fig.	Supply Voltage	Prim. Nom. r.m.s. Current	Sec. Nom. r.m.s. Current/Out. Volt.	Frequency Range (kHz)	Digi-Key Part No.	Price Each			LEM USA Inc. Part No.
						1	10	25	
17	5V	300A	5V	50	398-1065-ND	27.50	22.00	17.60	HASS 300-S
	5V	400A	5V	50	398-1066-ND	27.50	22.00	17.60	HASS 400-S
	5V	500A	5V	50	398-1067-ND	27.50	22.00	17.60	HASS 500-S
18	5V	5A	5V	50	398-1058-1-ND†	16.98	14.15	11.32	HMS 05-P
					398-1058-2-ND‡	2547.00/300			HMS 05-P
	5V	10A	5V	50	398-1059-1-ND†	16.98	14.15	11.32	HMS 10-P
					398-1059-2-ND‡	2547.00/300			HMS 10-P
	5V	15A	5V	50	398-1060-1-ND†	16.98	14.15	11.32	HMS 15-P
					398-1060-2-ND‡	2547.00/300			HMS 15-P
	5V	20A	5V	50	398-1061-1-ND†	16.98	14.15	11.32	HMS 20-P
					398-1061-2-ND‡	2547.00/300			HMS 20-P

Fig.	Supply Voltage	Prim. Nom. r.m.s. Current	Sec. Nom. r.m.s. Current/Out. Volt.	Frequency Range (kHz)	Digi-Key Part No.	Price Each			LEM USA Inc. Part No.
						1	10	25	
NEW! AC Split Core Current Transducers — RoHS Compliant NEW!									
19	—	50A	16.66mA	50/60 Hz	398-1078-ND	39.88	31.90	21.54	TT 50-SD
20	—	100A	33.33mA	50/60 Hz	398-1079-ND	45.25	36.20	24.44	TT 100-SD
21	Self-Powered	5A	0-10V	50/60 Hz	398-1080-ND	63.38	50.70	34.23	AT 5 B10
	Self-Powered	20A	0-10V	50/60 Hz	398-1081-ND	81.50	65.20	44.01	AT 20 B10
	Self-Powered	50A	0-10V	50/60 Hz	398-1082-ND	97.88	78.30	52.86	AT 50 B10
	Self-Powered	100A	0-10V	50/60 Hz	398-1083-ND	87.00	69.60	46.98	AT 100 B10
22	24 ± 5%VDC	50A	0-5V/0-10V	30-6000Hz	398-1084-ND	201.50	161.20	108.81	APR 50 B10
	24 ± 5%VDC	200A	0-5V/0-10V	30-6000Hz	398-1085-ND	221.63	177.30	119.68	APR 200 B10
NEW! AC/DC Current Transducers — RoHS Compliant NEW!									
23	20-50VDC	100A	0-10V	20-6000Hz	398-1086-ND	239.38	191.50	129.27	DHR 100 C10

† Cut Tape ‡ Tape and Reel ◆ RoHS Compliant

SMD Current Transducer

The Minisens transducer is an ultra flat SMD open loop integrated circuit current transducer based on the Hall effect principle. The IC is calibrated to minimize offset and temperature drifts. **Advantages:** • Low cost • Excellent Linearity

Max. Curr. Range (A)	Supp. Volt.	Package	Digi-Key Part No.	Cut Tape Price Each	T&R Pricing	LEM USA Inc. Part No.
±100	5V	8-SOIC	398-1057-1-ND	5.28 4.40 3.52	6864.00/M	FHS 40-P/SP600

Evaluation Kits for FHS 40-P/SP600

398-1069-ND	Evaluation Kit with PCB for 0 - 30A range, 78A maximum	\$37.20
398-1070-ND	Evaluation Kit with PCB for 0 - 5A range, 16A maximum	\$37.20
398-1071-ND	Evaluation Kit with PCB for 0 - 5A range, 11A maximum	\$37.20
398-1072-ND	Evaluation Kit with PCB for 0 - 10A range, 10A maximum	\$37.20
398-1073-ND	Evaluation Kit with PCB for 0 - 15A range, 55A maximum	\$37.20
398-1074-ND	Evaluation Kit with PCB for 0 - 16A range, 30A maximum	\$37.20



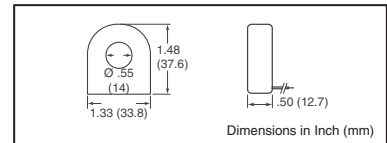
Current Sensors

Remote Current Indicators — Model 18-600

CR Magnetics Remote Electrical Current Indicators provides an effective method for remote monitoring of electrical current. When the current exceeds the turn-on point of the sensing transformer, the LED illuminates to indicate the presence of current.

Specifications: • Indicating Range: 2.5 - 100 Amps (1-Wire Pass) • Minimum turn-on point: 2.5 Amps • Maximum Cont. Current: 100 Amps

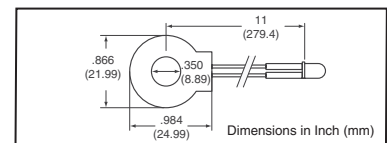
Digi-Key Part No.	1	Price Each	25	CR Magnetics Part No.
582-1036-ND	34.29	29.15	27.43	MODEL 18-600



Current Indicators — CR2550 Series

The CR2550 series remote current indicators are designed as a low cost method for providing a visual indication of electrical current flow. **Specifications:** • 20 AAC Maximum, 600 VAC Maximum Rating • 50 - 1kHz Bandwidth

LED Color	Turn On Point (1 pass) AAC	Digi-Key Part No.	1	Price Each	25	CR Magnetics Part No.
Red	0.75	582-1003-ND◆	11.50	8.90	8.37	CR2550-R



NEW! Transducers/Transmitters

CR4100 Series: Designed for applications where AC current waveforms are not purely sinusoidal. These devices are ideal in chopped wave and phase fired control systems.

CR4210 Series: Calibrated to provide a 0-5VDC and 0-10VDC signal that is proportional to the average RMS input AC current.

CR4200 Series: Produces a calibrated 4-20mADC signal that is proportional to the average RMS input AC current. The output signal is generated from a user supplied 24VDC power supply within the output current loop.

CR4400 Series: Designed to provide a DC output proportional to the AC current input.

CR5200 Series: Designed to provide a DC signal which is proportional to a DC sensed current. The ranges 2-10 Amp utilize an advanced Magnetic Modulator technology and the ranges 20 Amps and above utilize Hall Effect technology.

CR4500 Series: Designed for applications where AC voltage waveforms are not purely sinusoidal

CR5300 Series: Designed to provide an output DC signal that is proportional to the input DC voltage.

CR6600 Series: Designed to give a DC output that is proportional to an input frequency value.

Fig.	Output Range	Input Range	Digi-Key Part No.	1	Price Each	25	CR Magnetics Part No.
True RMS AC Current Transducers							
1	0-5 VDC	0-10 AAC	582-1046-ND	270.97	232.26	216.78	CR4110-10
	0-5 VDC	0-15 AAC	582-1047-ND	270.97	232.26	216.78	CR4110-15
	0-5 VDC	0-20 AAC	582-1048-ND	270.97	232.26	216.78	CR4110-20
	0-5 VDC	0-25 AAC	582-1049-ND	270.97	232.26	216.78	CR4110-25
	4-20 mADC	0-30 AAC	582-1050-ND	299.76	256.94	239.81	CR4120-30
	4-20 mADC	0-40 AAC	582-1051-ND	299.76	256.94	239.81	CR4120-40
4-20 mADC	0-75 AAC	582-1052-ND	299.76	256.94	239.81	CR4120-75	
Self-Powered AC Current Transducer							
1	0-5 VDC	0-50 AAC	582-1053-ND	151.18	129.59	120.95	CR4210-50
Loop-Powered AC Current Transmitters							
1	4-20 mADC	0-5 AAC	582-1056-ND	134.70	115.46	107.76	CR4220-5
	4-20 mADC	0-10 AAC	582-1054-ND	134.70	115.46	107.76	CR4220-10
	4-20 mADC	0-20 AAC	582-1055-ND	134.70	115.46	107.76	CR4220-20
Average RMS AC Current Transducers							
1	0-5 VDC	0-50 AAC	582-1057-ND	129.59	111.08	103.67	CR4410-50
	4-20 mADC	0-30 AAC	582-1058-ND	145.79	124.97	116.64	CR4420-30

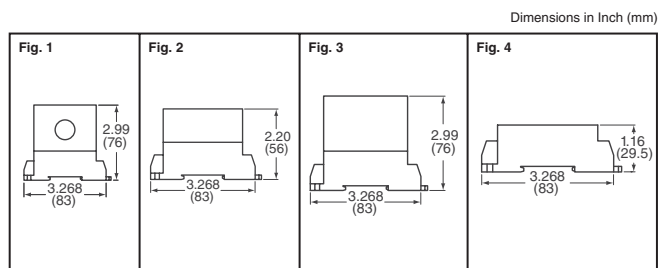


Fig.	Output Range	Input Range	Digi-Key Part No.	1	Price Each	25	CR Magnetics Part No.
DC Current Transducers							
1	0-5 VDC	0-2 ADC	582-1060-ND	149.73	128.34	119.79	CR5210-2
	0-5 VDC	0-5 ADC	582-1061-ND	149.73	128.34	119.79	CR5210-5
	0-5 VDC	0-10 ADC	582-1059-ND	149.73	128.34	119.79	CR5210-10
	4-20 mADC	0-2 ADC	582-1063-ND	178.26	152.79	142.61	CR5220-2
4-20 mADC	0-10 ADC	582-1062-ND	178.26	152.79	142.61	CR5220-10	
4-20 mADC	0-20 ADC	582-1064-ND	178.26	152.79	142.61	CR5220-20	
True RMS AC Voltage Transducers (Single Phase)							
2	0-5 VDC	0-250 ADC	582-1065-ND	270.97	232.26	216.78	CR4510-250
	4-20 mADC	0-150 ADC	582-1066-ND	299.46	256.68	239.57	CR4520-150
True RMS AC Voltage Transducer (3-Phase, 3-Wire)							
3	0-5 VDC	0-150 VAC	582-1067-ND	477.79	409.53	382.23	CR4550-150
Frequency Transducers							
3	0-5 VDC	0-100 Hz	582-1072-ND	154.89	132.77	123.92	CR6610-100
	4-20 mADC	0-100 Hz	582-1073-ND	171.75	147.21	137.40	CR6620-100
DC Voltage Transducers							
4	0-5 VDC	0-50 VDC	582-1069-ND	222.53	190.74	178.03	CR5310-50
	0-5 VDC	0-200 VDC	582-1068-ND	222.53	190.74	178.03	CR5310-200
	4-20 mADC	0-50 VDC	582-1071-ND	239.23	205.05	191.38	CR5320-50
	4-20 mADC	0-100 VDC	582-1070-ND	239.23	205.05	191.38	CR5320-100

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