



TESTING & MEASUREMENT

SAFE. ACCURATE. RELIABLE. EXPECT NOTHING BUT THE BEST FROM GREENLEE ELECTRIC TEST AND MEASUREMENT EQUIPMENT. BACKED BY A LIMITED LIFETIME WARRANTY AND DESIGNED TO WITHSTAND RIGOROUS TASKS AND HARSH ELEMENTS, GREENLEE TEST AND MEASUREMENT TOOLS GET THE JOB DONE FASTER, SAFER, AND EASIER.

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Meeting today's stringent safety standards is essential.

Greenlee's certification of selected instruments to both the most recent IEC and UL requirements brings you assurance of the highest level of protection currently available.

What you should know about Measurement Category ratings.

IEC Category standards specify protection levels that are far above a system's rated capacity. Without this additional protection, transient overvoltages, which are becoming increasingly common, can lead to serious injury or death.

Measurement Category I is the signal level for telecommunications and electronic equipment or other circuits that are not directly connected to the utility mains.

Measurement Category II is the local level for fixed or nonfixed powered devices – everything from lighting to appliances to office equipment such as copiers; may also be used in Category I areas.

Measurement Category III is the distribution level – fixed primary feeders or branch circuits. These circuits are usually separated from Category IV (whether utility service or other high-voltage source) by a minimum of one level of transformer isolation; may also be used in Category II and Category I areas.

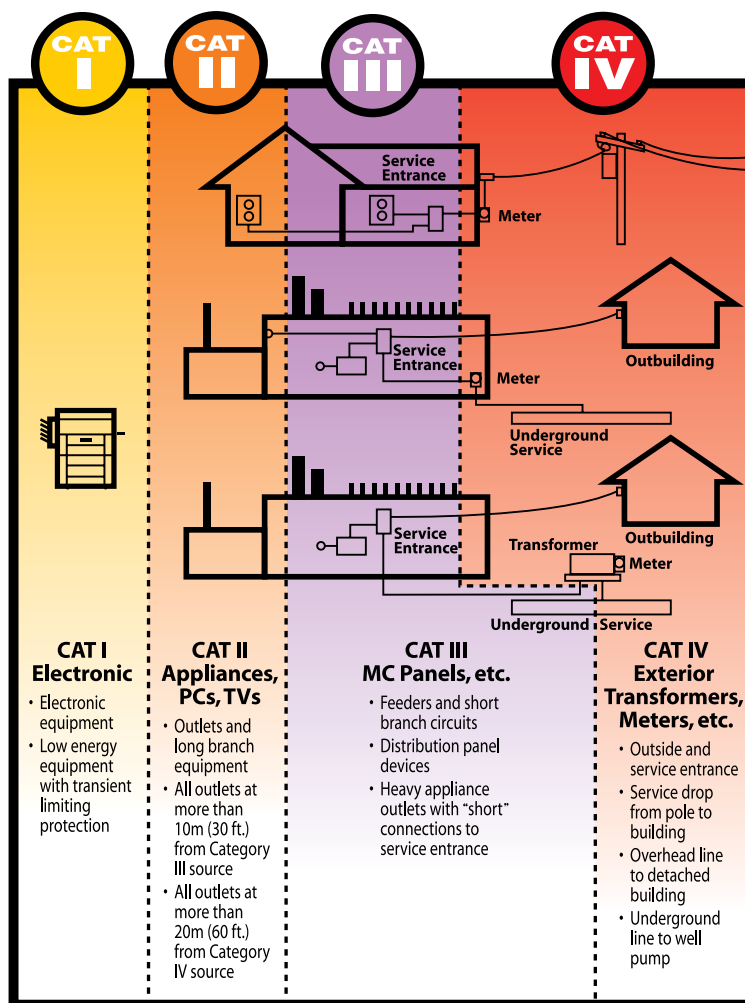
Measurement Category IV is the primary supply level. Greenlee is leading the way in offering protection certified to conform with the highest level of protection as specified by UL & IEC standards; may be used in all Category environments.

Greenlee Instruments – Independently tested and certified to meet the standards.

Throughout this catalog, you'll see Category designations for many Greenlee instruments indicating that they comply with UL & IEC Category II, III, IV. All of these designations reflect third-party testing by independent testing organizations such as UL and ETL – added assurance for you. While there is no requirement for independent verification, we believe you deserve it.

Get the right protection for the job.

Wherever you need overvoltage protection, choose at least the rating appropriate to the type of work you expect to be doing. If you have any questions on using Greenlee test instruments to help ensure user safety, please contact Greenlee.



ELECTRICAL TESTERS

Electrical Testers Comparison Guide

FEATURE	GT-95	GT-65	CSJ-100	CMT-90	CMT-80	2010	GT-16	GT-12A
VDC (V max)	1000	1000	1000	1000	600			
VAC (V max)	1000	1000	1000	1000	600	1000	1000	1000
AAC (A max)			200	600	400			
Continuity and beeper	•	•	•	•	•			
Resistance			•	•	•			
Data hold			•	•	•			
GFCI test	•							
Non-contact voltage detection	•	•	•			•	•	•
Adjustable sensitivity						•	•	
Display type	Digital/LED	LED	Digital	Digital	Digital	LED	LED	LED
Measurement Category	IV, 600V III, 1000V	IV, 600V III, 1000V	IV, 600V III, 1000V	IV, 600V III, 1000V	III, 600V	III, 1000V	IV, 1000V	IV, 1000V
UL/cUL	•	•	•	•	•	•	•	•
CE	•	•	•	•	•	•	•	•

GT-95 Voltage Tester



GT-95

- AC/DC voltage and polarity measurement
- LCD and dual color LEDs for convenience
- Selectable SHAKER feature when measuring AC voltage
- Overvoltage warning gives user visual notification that voltage levels have exceeded 1000V AC/ 380V DC
- Auto-hold automatically activates when tester is removed from voltage reading
- Continuity test and single probe detection of live conductors for added flexibility
- Safe, non-contact voltage detection
- GFCI test capability eliminates the need for additional testers
- Visual and audible continuity
- Accessories included: (2) 1.5V AAA batteries, test leads and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Detection	19 to 1000V AC, 5 to 1000V DC
Continuity Verification	0 to 50 kΩ
Frequency	DC, 45-65 Hz
GFCI	7.5 mA nominal at 120V AC
Measurement Category	CAT IV, 600V; CAT III, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
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GT-95	09027	Voltage Tester, LCD & GFCI
TSG-3	12034	Sure-Grip Test Leads
TC-5	07588	Carrying Case



GT-65 Voltage Tester



GT-65

- AC/DC voltage and polarity measurement
- Continuity test and single probe detection of live conductors for added flexibility
- Overvoltage warning gives user visual notification that voltage levels have exceeded 1000V AC/ 380V DC
- Safe, non-contact voltage detection
- Auto-hold automatically activates when tester is removed from voltage reading
- Visual and audible continuity
- Accessories included: (2) 1.5V AAA batteries and test leads
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Detection	19 to 1000V AC, 5 to 1000V DC
Continuity Verification	0 to 50 kΩ
Frequency	DC, 45-65 Hz
Measurement Category	CAT IV, 600V; CAT III, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
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GT-65	09025	Voltage Tester, LCD & GFCI
TSG-3	12034	Sure-Grip Test Leads



AC Open Jaw Clamp Meter



CSJ-100

- AC amperage, AC/DC voltage measurement
- Open jaw design eases AC current measurement
- Slim profile with built-in probe storage on back
- Measures resistance up to 20MΩ
- Audible continuity and diode test
- Bright LED and audible alarm for non-contact voltage detection
- Auto power off for longer battery life
- Data hold to capture measurements
- 2000 count LCD
- Accessories included: (2) 1.5V AAA batteries, test leads and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	200.0 AC
Voltage Measurement Range	200.0, 1000V
Resistance Measurement	200.0Ω; 2.000, 20.00, 200.0 kΩ; 2.000, 20.00 MΩ
Display	2000-count LCD
Jaw Opening	0.63" (16mm)
Measurement Category	CAT IV 600V, CAT III 1000V

CAT. NO.	UPC NO.	DESCRIPTION
CSJ-100	87136	Clamp, Open Jaw
11372	11372	Test Leads
TC-5	07588	Carrying Case



Automatic Electrical Tester



CMT-90

- Hassle-free, automatic measurement of amperage, voltage and resistance
- Low impedance eliminates stray or "ghost" voltage readings
- True RMS for the most accurate measurement when harmonics are present
- High resolution, auto-illuminating LCD backlit display
- Auto off for longer battery life
- Resistance measurement
- Audible continuity test
- Diode test
- Data hold to capture measurements
- Accessories included: (1) 9 V battery, test leads and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	ACA 0.9 to 600.0
Voltage Measurement	AC V: 1.3 to 999.9; DC V; 2.1 to 999.9; -0.7 to -999.9
Resistance	999Ω; 9.999kΩ
Display	10,000-count LCD
Jaw Opening	1.34" (34 mm)
Measurement Category	CAT IV, 600 V; CAT III, 1000 V

CAT. NO.	UPC NO.	DESCRIPTION
CMT-90	12123	Electrical Tester, 1000V, 600A
TSG-3	12034	Sure-Grip Test Leads
TC-10	07534	Carrying case



Automatic Electrical Tester



CMT-80

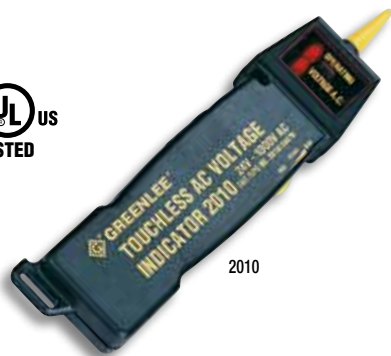
- Hassle-free, automatic measurement of amperage, voltage and resistance
- Low impedance eliminates stray or “ghost” voltage readings
- Compact design for measuring in tight spaces
- Resistance measurement
- Audible continuity test
- Diode test
- Data hold to capture important readings
- Auto off for longer battery life
- Accessories included: (1) 9 V battery, test leads and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	0.9 - 400.0A AC
Voltage Measurement	AC V: 1.3 to 600.0V; DC V: 2.1 to 600.0; -0.7 to -600.0V
Resistance	999Ω; 9.999kΩ
Display	10,00 count LCD
Jaw Opening	1.06" (27 mm)
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
CMT-80	07735	Electrical Tester
R 11372	11372	Test Leads
R TC-5	07588	Carrying case

Touchless AC Voltage Indicator



2010

- Bright LED and audible alarm if voltage is present
- Fast, easy, non-contact voltage detection
- Adjustable sensitivity
- Identifies hot and neutral conductors
- Checks individual breakers for power
- Accessories included: (1) 9V battery
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Measurement	AC V 24-1000
Frequency	50-500Hz
Measurement Category	CAT III, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
2010	34470	Touchless AC Voltage Indicator

Adjustable Non-Contact Voltage Detector



GT-16

- Adjustable to safely detect power and low voltage
- Safely detects AC voltage without touching the bare conductor
- Adjustable for use on power wiring plus lighting, thermostats and other low voltage circuits
- Use to detect voltage in outlets, lighting fixtures, wires and cables
- Finds breaks in wires
- Identifies hot and neutral conductors
- Low battery indication
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Detection:	AC V 5-1000
Frequency:	50-500Hz
Measurement Category:	CAT IV, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
GT-16	12727	Adjustable Non-Contact Voltage Detector

Non-Contact Voltage Detector



GT-12A

- Single button operation
- CAT IV 1000 V rated for maximum safety
- Patented automatic self-test runs every 2 seconds for accurate results every time
- Automatically shuts off after 5 minutes of inactivity to extend battery life
- Bright LEDs flash and audible alarm sounds if AC voltage is present
- Silent mode for use in quiet areas
- Safe, non-contact voltage detection
- Lifetime Limited Warranty
- Designed and assembled in USA

SPECIFICATIONS

Voltage Detection:	AC V 50-1000
Frequency:	50-500Hz
Measurement Category:	CAT IV, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
N GT-12A	00890	Non-Contact Voltage Detector

Self Testing Non-Contact Voltage Detector



TR-12A

- Detects voltage in tamper-resistant and conventional 15A and 20A, 120V outlets
- Patented automatic self-test verifies the integrity of the unit
- Bright LEDs flash and audible alarm sounds if voltage is present
- Silent-mode feature for use in quiet settings
- Safe, non-contact voltage detection
- Use to detect voltage in outlets, lighting fixtures, circuit breakers, wires, and cables or to find a break in a wire
- Automatically turns off after 5 minutes of non-use to conserve battery life
- Low battery indicator
- Designed and assembled in USA
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Detection:	50-1000 VAC
Frequency:	50-500 Hz
Measurement Category:	CAT IV, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
N TR-12A	02733	Self-Testing Non-Contact Voltage Detector

CABLE LENGTH METER

Standard Cable Length Meter

NEW PRODUCT



CLM-1000

- Measures length of cable without removing it from spool, counting turns or weighing spool
- Push button selections of copper or aluminum cable
- Measures cable length from 15 ft. to 100 ft.
- Measures resistant values down to 199.99Ω
- CLM-1000 measures the following pre-set AWG wire gages: 18, 16, 14, 12, 10, 8, 6, 4, 2, 1/0, 2/0, 3/0, 4/0
- CLM-1000 measures the following pre-set kcmil wire sizes: 250, 350, 400, 500, 600, 750, 1000
- CLM-1000E measures the following metric wire sizes: 0.75, 1, 1.5, 2.5, 4, 6, 10, 16, 25, 35, 50, 70, 95, 120, 150, 185, 240, 300, 400, 500 mm²
- Eight user-programmable settings for other gauges
- Powered by (6) 1.5V AA batteries
- Replacement calibration rods (pair) available as CLM-ROD, UPC 02721
- Replacement Kelvin clips (pair) available as CLM-CLIPS, UPC 02722
- Lifetime Limited Warranty

SPECIFICATIONS

Display:	4-1/2" LCD
Voltage Rating	Not intended for connection to live voltage
Resistance Range:	199.9 milliohms to 1999.9 ohms in 5 ranges

CAT. NO.	UPC NO.	DESCRIPTION
N CLM-1000	02719	Standard Cable Length Meter
N CLM-1000E	02720	Metric Cable Length Meter
A CLM-ROD	02721	Calibration Rods (Pair)
A CLM-CLIPS	02722	Kelvin Clips (Pair)

MULTIMETERS

DMM Comparison Guide

FEATURE	DM-860A	DML-430A	DM-830A	DM-820A	DM-810A	DM-510A	DM-210A	DM-200A
True RMS	AC+DC	AC+DC	AC+DC	•	•	•		
DCA (A max)	10	10	10	10	10	8	8	8
Maximum resolution (µA)	0.01	0.1	0.1	0.1	0.1	0.1	0.1	0.1
Best accuracy (%)	0.1	0.2	0.2	0.2	0.2	0.5	0.5	0.5
ACA (A max)	10	10	10	10	10	8	8	8
Maximum resolution (µA)	0.01	0.1	0.1	0.1	0.1	0.1	0.1	0.1
Best accuracy (%)	0.5	0.6	0.6	0.6	0.6	1.0	1.0	1.0
DCV (V max)	1000	1000	1000	1000	1000	1000	1000	1000
Maximum resolution (µV)	1	10	10	10	10	10	10	10
Best accuracy (%)	0.02	0.06	0.06	0.06	0.06	0.2	0.2	0.2
ACV (V max)	1000	1000	1000	1000	1000	1000	1000	1000
Maximum resolution (µV)	10	10	10	10	10	10	10	10
Best accuracy (%)	0.3	0.5	0.5	0.5	0.5	1.0	1.0	1.0
Resistance (MΩ)	50	60	60	60	60	60	60	60
Maximum resolution (mΩ)	10	100	100	100	100	100	100	100
Best accuracy (%)	0.07	0.1	0.1	0.1	0.1	0.5	0.5	0.5
Conductance	•	•	•	•				
Continuity and beeper	•	•	•	•	•	•	•	•
Diode Test	•	•	•	•	•	•	•	•
Capacitance	•	•	•	•	•	•	•	
Frequency	•	•	•	•	•	•	•	•
Frequency Response (Hz)	20-100k	40-500	40-500	40-500	40-500	50-400	50-400	50-400
Temperature Measurement	Dual	Dual	Dual	Single		Single	Single	
Display Type	Dual Digital	Dual Digital	Dual Digital	Dual Digital	Dual Digital	Digital	Digital	Digital
Display counts	50,000 500,000	10,000	10,000	10,000	10,000	6,000	6,000	6,000
Backlight	•	•	•	•	•	•	•	•
Display update X/sec	5	5	5	5	5	5	5	5
Analog bar graph segments	41	41	41	41	41	24	24	24
Analog update X/sec	60	60	60	60	60	40	40	40
Computer Interface	USB	USB	USB	USB	USB	USB, RS-232	USB, RS-232	USB, RS-232
Auto and manual ranging	•	•	•	•	•	•	•	•
Intelligent Auto Power Off	•	•	•	•	•			
Auto Power Off						•	•	•
Non-Contact Voltage Detection			•	•		•	•	•
Low Impedance AutoCheck™ mode		•	•			•		
Beep-Jack™ Input error warning	•	•	•	•	•	•	•	•
Peak (crest) Hold - Max, Min	•	•	•	•	•	•		
Data Hold	•	•	•	•	•	•	•	•
Max/Min/Avg	•	max, min	•	•		max, min		
Relative offset mode (Δ)	•	•	•	•	•	•	•	•
Process loop measurement	•							
Data logging (points stored, single channel)		87,000						
Data logging (points stored, dual channel)		43,000						
Duty cycle	•	•	•	•	•			
VFD (Variable Frequency Drive) ACV & Hz	•							
Measurement Category Rating	IV, 1000V	IV, 1000V	IV, 1000V	IV, 1000V	IV, 1000V	IV, 300V III, 600V II, 1000V	IV, 300V III, 600V II, 1000V	IV, 300V III, 600V II, 1000V
UL or ETL	•	•	•	•	•	•	•	•
cUL, cETL or CSA	•	•	•	•	•	•	•	•
CE	•	•	•	•	•	•	•	•

DMM Comparison Guide

FEATURE	DM-65	DM-45	DM-25	PDMM-20
True RMS				
DCA (A max)	10	10		
Maximum resolution (µA)	0.1	0.1		
Best accuracy (%)	1.0	1.0		
ACA (A max)	10	10		
Maximum resolution (µA)	0.1	0.1		
Best accuracy (%)	1.8	1.8		
DCV (V max)	1000	600	600	450
Maximum resolution (µV)	100	100	10 mV	1000
Best accuracy (%)	0.8	0.8	0.8	0.5
ACV (V max)	1000	600	600	450
Maximum resolution (µV)	1000	1000	0.1V	1000
Best accuracy (%)	0.8	0.8	1.2	1.5
Resistance (MΩ)	60	40	2	6
Maximum resolution (mΩ)	100	100	100	1000
Best accuracy (%)	1.0	1.0	1.0	1.0
Conductivity				
Continuity and beeper	•	•	•	•
Diode test	•	•	•	
Capacitance	•	•		•
Frequency	•	•		•
Frequency response (Hz)	40-400	40-400	40-400	50-60
Temperature measurement	Single	Single		
Display type	Digital	Digital	Digital	Digital
Display counts	6000	4000	2000	6000
Backlight	•	•		
Display update X/sec	3	3	2.5	5
Analog bar graph segments	61			
Analog update X/sec	3			
Computer interface				
Auto and manual ranging	•	•		
Intelligent Auto power off				•
Auto power off	•	•		
Non-contact voltage detection				•
Low Impedance AutoCheck™ mode				•
Beep-Jack™ Input error warning				
Peak (crest) Hold - Max, Min				
Data hold	•	•		
Min/Max/Avg				
Relative offset mode (Δ)	•	•		
Process loop measurement				
Data logging (points stored, single channel)				
Data logging (points stored, dual channel)				
Duty cycle	•	•		
VFD (variable frequency drive) ACV & Hz				
Measurement Category Rating	IV, 600V III, 1000V	III, 600V	III, 600V	III, 300V II, 450V
UL or ETL	•	•	•	•
cUL, cETL or CSA	•	•	•	•
CE	•	•	•	•

ESM™ Industrial 500,000-Count Digital Multimeter



DM-860A

SPECIFICATIONS

Voltage Measurement	500.00mV; 5.0000, 50.000, 500.00, 1000.0V
DC Voltage Measurement	500,000 counts mode: 500.00mV; 5.00000, 50.0000, 500.000, 1000.00V
Amperage Measurement	500.00, 5000.0µA; 50.000, 500.00mA; 5.0000, 10.000A
Resistance	500.00Ω; 5.0000, 50.000, 500.00kΩ; 5.0000, 50.000MΩ
Conductance	99.99 nS
Capacitance	50.00; 500.0nF; 5.000, 50.00, 500.0µF; 5.000, 25.00 mF
Frequency	5Hz-200kHz sine wave; 5Hz-2MHz logic level square wave
Temperature	K type, -58°F to 1832°F (-50°C to 1000°C)
Measurement Category	CAT IV, 1000V

- AC+DC True RMS, 50,000-count display for greater accuracy, 500,000 count available in DC voltage mode
- VFD (variable frequency drive) voltage and frequency functions for accurate readings on noisy drive waveforms
- Beep-Jack™ audible and visual input alert helps avoid blown fuses or damage to meter
- 41-segment analog bar graph makes it easy to view quick changes
- Record max, min, avg., and max-min and data hold
- Crest capture (peak hold) max and min readings
- Relative offset display mode makes monitoring relative measurement changes simple
- Performs resistance, conductance, frequency, duty cycle, temperature and capacitance measurements, plus diode and continuity tests
- Dual temperature measurement up to 1832°F/1000°C using type K thermocouples
- Bright backlit display is easy to read under any light condition
- Intelligent Auto Power Off conserves battery life but will not turn meter off during measurements
- Wide AC bandwidth – to 100 kHz for voltage and 20 kHz for current
- USB Interface using optional DMSC-9U cable and software allows connection to a PC for extended measurement capability
- Accessories included: (1) 9V battery, bead temperature probe (400°F/ 204°C max.), test leads, protective boot and carrying case
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION
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	DM-860A	12938	Industrial 500,000-Count Digital Multimeter
	DM-860A-C*	02069	Industrial 500,000-Count Digital Multimeter
	TC-20	07535	Carrying Case (included)
	TSG-3	12034	Sure-Grip Test Leads
	TPB	07592	Bead Temperature Probe
	DMSC-9U	35773	For DM-800A Series and DML-430A Multimeters

* Includes Certificate of Calibration

ESM™ Digital Logging Meter



FEATURING:



DML-430A

SPECIFICATIONS

Voltage Measurement	60.00, 600.0 mV; 9.999, 99.99, 999.9 V
Amperage Measurement	600.0, 6000µA; 60.00, 600.0mA; 6.000, 10.00A
Resistance	600.0Ω; 6.000, 60.00, 600.0 kΩ; 6.000, 60.00 MΩ
Conductance	99.99nS
Capacitance	60.00, 600.0nF; 6.000, 60.00, 600.0µF; 6.000, 25.00 mF
Frequency	15Hz-50kHz sine wave; 5Hz-1MHz logic level square wave
Temperature	K type, -58 to 1832 °F (-50 to 1000 °C)
Measurement Category	CAT IV, 1000V

- Datalogging capability – stores 87,000 single-channel or 43,000 dual-channel measurements, use optional USB interface DMSC-9U to transfer data to PC or for direct-to-PC logging
- AC+DC True RMS gives accurate readings on complex waveforms
- Low impedance AutoCheck™ mode – automatically selects AC or DC volts, resistance or continuity. Low impedance masks “ghost” voltage pickup
- Backlit LCD displays 2 readings with 10,000 count resolution
- BeepJack™ warns when test leads are incorrectly inserted in current measurement terminals
- Measures voltage, current, resistance, conductance, frequency and capacitance
- Checks continuity and tests diodes
- Two temperature measurements using type K thermocouples
- Accessories included: (1) 9V battery, bead temperature probe (400°F / 204°C max.), test leads, protective boot and carrying case
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION
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	DML-430A	08746	Digital Logging Meter (43,000 data points)
	DML-430A-C*	35771*	Digital Logging Meter (43,000 data points)
	TC-20	07535	Carrying Case (included)
	TSG-3	12034	Sure-Grip Test Leads
	TPB	07592	Bead Temperature Probe

* Includes Certificate of Calibration

ESM™ Series Digital Multimeters



FEATURING:



DM-810A



DM-820A



DM-830A

DM-810A features:

- True RMS for no-compromise accuracy
- Measures voltage, current, resistance, capacitance and frequency
- Tests continuity and diodes
- Backlit LCD with dual 10,000 count displays
- BeepJack™ warns when test leads are incorrectly inserted in current measurement terminals
- Automatic and manual range selection
- Relative offset mode to see changes in measurements
- Data hold
- Use optional USB interface DMSC-9U for direct-to-PC logging
- Lifetime Limited Warranty

DM-820A also features:

- Crest capture (peak hold) plus recording of max, min, max-min and average
- Two voltage detection modes – non-contact or using a single test lead
- One temperature measurement using a type K thermocouple
- Conductance measurement

DM-830A has all DM-810A features plus:

- AC+DC True RMS gives accurate readings on complex waveforms
- Low impedance AutoCheck™ mode – automatically selects AC or DC volts, resistance or continuity. Low impedance masks “ghost” voltage pickup
- dBm function with 20 selectable reference impedance values
- Crest capture (peak hold) plus recording of max, min, max-min and average
- Two voltage detection modes – non-contact or using a single test lead
- Two temperature measurements using type K thermocouples
- Conductance measurement

Accessories included:

(1) 9V battery, bead temperature probe (DM-820A, DM-830A only, 400°F/204°C max), test leads, protective boot and carrying case.

SPECIFICATIONS

Voltage Measurement	60.00, 600.0 mV; 9.999, 99.99, 999.9 V
Amperage Measurement	600.0, 6000µA; 60.00, 600.0mA; 6.000, 10.00A
Resistance	600.0Ω; 6.000, 60.00, 600.0 kΩ; 6.000, 60.00 MΩ
Conductance	99.99nS
Capacitance	60.00, 600.0nF; 6.000, 60.00, 600.0µF; 6.000, 25.00 mF
Frequency	15Hz-50kHz sine wave; 5Hz-1MHz logic level square wave
Temperature	K type, -58 to 1832 °F (-50 to 1000 °C)
Measurement Category	CAT IV, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
DM-830A	08745	Digital Multimeter
DM-830A-C*	35770*	Digital Multimeter
DM-820A	08744	Digital Multimeter
DM-820A-C*	35760*	Digital Multimeter
DM-810A	08743	Digital Multimeter
DM-810A-C*	35759*	Digital Multimeter
TC-20	07535	Carrying Case (included)
TSG-3	12034	Sure-Grip Test Leads
TPB	07592	Bead Temperature Probe (included with DM-820A, DM-830A)



* Includes Certificate of Calibration

ESM™ Series Digital Multimeters



DM-510A



DM-210A



DM-200A

DM-200A features:

- Measures voltage, current, resistance and frequency
- Tests continuity and diodes
- Backlit LCD with 6,000 count display
- Two voltage detection modes – non-contact or using a single test lead
- BeepJack™ warns when test leads are incorrectly inserted in current measurement terminals
- Automatic and manual range selection
- Relative offset mode to see changes in measurements
- Data hold
- Use optional USB / RS-232 interface DMSC-2U for direct-to-PC logging
- Lifetime Limited Warranty

DM-210A also features:

- Measures capacitance
- Measures temperature using a type K thermocouple

DM-510A has all DM-200A features plus:

- True RMS for no-compromise accuracy
- Crest capture (peak hold) plus recording of max, min, max-min and average
- Low impedance AutoCheck™ mode – automatically selects AC or DC volts, resistance or continuity and low impedance masks “ghost” voltage pickup
- Measures capacitance
- Measures temperature using a type K thermocouple

Accessories included:

(2) 1.5V AAA batteries, bead temperature probe (DM-210A, DM-510A only), 400°F/204°C max), test leads and protective boot.

SPECIFICATIONS

Voltage Measurement	60.00, 600.0 mV; 6.000, 60.00, 600.0, 1000V
Amperage Measurement	600.0, 6000µA; 60.00, 600.0mA; 6.000, 8.00A
Resistance	600.0Ω; 6.000, 60.00, 600.0 kΩ; 6.000, 60.00 MΩ
Capacitance	60.00, 600.0nF; 6.000, 60.00, 600.0, 3000µF
Frequency	10Hz-50kHz sine wave; 5Hz-999.9kHz logic level square wave
Temperature	K type, -58 to 1832 °F (-50 to 1000 °C)
Measurement Category	CAT IV 300V; CAT III 600V; CAT II 1000V

CAT. NO.	UPC NO.	DESCRIPTION
DM-510A	08742	Professional Plant Digital Multimeter
DM-510A-C*	35758*	Professional Plant Digital Multimeter
DM-210A	08741	Digital Multimeter
DM-210A-C*	35757*	Digital Multimeter
DM-200A	08740	Digital Multimeter
DM-200A-C*	35756*	Digital Multimeter
TSG-3	12034	Sure-Grip Test Leads



* Includes Certificate of Calibration

Digital Multimeter



DM-65

- Measures AC/DC voltage, AC/DC current, resistance, temperature, frequency, duty cycle and capacitance
- Diode and audible continuity tests
- Relative offset mode to see changes in measurements
- Data hold
- Backlit, 6000 count LCD with bar graph
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	600.0, 6000 μ A; 60.00, 600.0 mA; 6.000, 10.00 A
Voltage Measurement	AC V: 6.000, 60.00, 600.0, 1000 V; DC V: 600.0 mV; 6.000, 60.00, 600.0, 1000 V
Resistance Measurement	600.0 Ω ; 6.000, 60.00, 600.0 k Ω ; 6.000, 60.00 M Ω
Frequency Measurement	9.999 Hz to 999.9 kHz
Temperature Measurement	-4 to 1832 $^{\circ}$ F (-20 to 1000 $^{\circ}$ C)
Capacitance Measurement	40.00, 400.0 nF; 4.000, 40.00, 400.0, 4000 μ F
Measurement Category	CAT IV, 600V; CAT III, 1000V

CAT. NO.	UPC NO.	DESCRIPTION
DM-65	00339	CATIII, 1000V; CATIV 600V Auto-Ranging Digital Multimeter
TSG-3	12034	Test Leads



Digital Multimeter



DM-45

- Measures AC/DC voltage, AC/DC current, resistance, temperature, frequency, duty cycle and capacitance
- Diode and audible continuity tests
- Relative offset mode to see changes in measurements
- Data hold
- Backlit, 4000 count LCD
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	400.0, 4000 μ A; 40.00, 400.0 mA; 4.000, 10.00 A
Voltage Measurement	AC V: 4.000, 40.00, 400.0, 1000 V; DC V: 400.0 mV; 4.000, 40.00, 400.0, 1000 V
Resistance Measurement	400.0 Ω ; 4.000, 40.00, 400.0 k Ω ; 4.000, 40.00 M Ω
Frequency Measurement	9.999 Hz to 999.9 kHz
Temperature Measurement	-4 to 1832 $^{\circ}$ F (-20 to 1000 $^{\circ}$ C)
Capacitance Measurement	40.00, 400.0 nF; 4.000, 40.00, 200.0 μ F
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
DM-45	00337	CATIII, 600V Auto-Ranging Digital Multimeter
TSG-3	12034	Test Leads



Digital Multimeter



DM-25

- Measures AC/DC voltage and resistance
- Diode and audible continuity tests
- Tests 1.5V and 9V batteries
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Measurement	AC V: 200.0, 600 V; DC V: 20.00, 200.0, 600 V
Resistance Measurement	200.0, 2000 Ω ; 20.00, 200.0, 2000 k Ω
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
DM-25	00334	CATIII, 600V Manual Ranging Digital Multimeter

PDMM-20 Pocket Multimeter



PDMM-20

SPECIFICATIONS

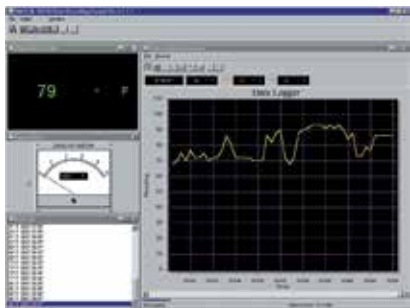
Voltage Measurement	6.000, 60.00, 450.0 V
Resistance Measurement	600.0Ω; 6.000, 60.00, 600.0 kΩ; 6.000 MΩ
Capacitance	100.0, 1000 nF; 10.00, 100.0 μF
Display	6000-count LCD
Measurement Category	CAT II, 450 V; CAT III, 300 V

- Auto-select mode for hassle-free use
- Low impedance eliminates stray or "ghost" voltage readings
- AC/DC voltage measurement
- Hassle-free, automatic measurement of voltage and resistance
- Autoranging for quick, convenient measurements
- Non-contact voltage detection for identifying live lines without contacting conductors
- Intelligent Auto-Off for longer battery life
- Low battery indicator
- Resistance measurement
- Audible continuity test
- Frequency measurement in voltage mode
- Capacitance measurement
- 6000-count LCD for high resolution
- Accessories included: (1) 3 V battery (CR2032) and carrying case
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION
PDMM-20	11689	Pocket Multimeter

MULTIMETER ACCESSORIES

Interface Kits



See both digital and analog meter readouts on-screen, plus a large, easy-to-read graph of logged values – in this case, a thermocouple monitoring air temperature in a forced-air furnace duct.



DMSC-9U



DMSC-2U

DMSC-9

- Connects to a PC for data storage and retrieval from Greenlee digital multimeters and clamp meters
- Allows retrieval of stored data and real-time logging and graphing
- Retrieve stored data log from DML-Series
- Export data to disk for analysis with any spreadsheet
- Lifetime Limited Warranty

SPECIFICATIONS

Software Requirements	Windows 7/Vista/XP/2000/NT4 or Windows ME/98/95
Hardware Requirements	CPU and memory – minimum Windows requirement Monitor – at least 640 x 480, 800 x 600 recommended. Hard disk – at least 500 megabytes free space. Connection – DMSC-9U: free USB port; DMSC-2U: free USB or 9-pin serial port; DMSC-9: free 9-pin serial port.

CAT. NO.	UPC NO.	DESCRIPTION
DMSC-2U	35772	For DM-200 and 200A Series and DM-510A Digital Multimeters
DMSC-9U	35773	For DM-800A Series and DML-430A Digital Multimeters
DMSC-9	07755	For DM-800 Series, DML-54 and DML-430 Digital Multimeters
CMSC-1U	02542	For CMI-2000 Clamp Meter

CLAMP-ON METERS

Clamp-on Meter Comparison Guide

FEATURE	CMGRT-100	CMI-2000	CMH-1000	CMI-1000	CM-1560	CM-1360
True RMS		•	•	•	•	•
DCA (A max)		2000	2500	1000	1000	
Maximum resolution (A)		0.1	0.1	0.1	0.1	
Best accuracy (%)		1.5	1.5	2.0	1.2	
ACA (A max)	30	2000	2100	1000	1000	1000
Maximum resolution (A)	1mA	0.1	0.1	0.1	0.1	0.1
Best accuracy (%)	2.5	1.5	1.5	2.0	1.9	1.9
DCV (V max)		600	600	600	1000	1000
Maximum resolution (V)		0.1	0.1mV	0.1mV	0.1	0.1
Best accuracy (%)		1.5	1.5	0.75	0.7	0.7
ACV (V max)		600	600	600	750	750
Maximum resolution (V)		0.1	0.1mV	0.1mV	0.1	0.1
Best accuracy (%)		1.5	1.5	1.2	1.0	1.0
Resistance (Ω)	1200		40M	40M	400	400
Maximum resolution (Ω)	0.01		0.1	0.1	0.1	0.1
Best accuracy (%)	1.5		1.5	1.0	1.0	1.0
Continuity and beeper			•	•	•	•
Diode test			•	•		
Capacitance		•	•	•	•	•
Frequency		•	•	•	•	•
Frequency response (Hz)	47-800	40-400	40-1k	40-450	50-500	50-500
Temperature (T1)		•	•	•		
Jaw opening	1.25" (32 mm)	2.17" (55 mm)	2.17" (55 mm)	1.81" (46 mm)	2.0" (51 mm)	1.85" (47 mm)
Display type	Digital	Dual Digital	Digital	Digital	Digital	Digital
Display update X/sec		2	2	2	2.5	2.5
Count	3000	4000	4000	4000	4000	4000
Analog bar graph segments			40	40	42	42
Analog update X/sec			20	20	13	13
Low battery indicator		•	•	•	•	•
Autoranging	•	•	•	•	•	•
Auto power off	•		•	•	•	•
Peak hold				•	•	•
Data hold	•	•	•	•	•	•
Min, max			•	•	•	•
Data logging		•				
Power factor		•				
True power (kW)		1200				
Apparent Power (kVA)		1200				
Measurement Category	III, 150V	III, 600V	III, 600V	III, 600V	IV, 600V III, 1000V	IV, 600V III, 1000V
UL		•	•	•	•	•
cUL or CSA		•	•	•	•	•
CE		•	•	•	•	•

Clamp-on Meter Comparison Guide

FEATURE	CM-960	CMH-600	CMI-600	CM-860	CM-660	CMT-90	CMT-80	CM-450	CM-410	CM-330
True RMS	•		•			•		•		
DCA (A max)	600	600								
Maximum resolution (A)	0.1	0.1								
Best accuracy (%)	1.2	1.2								
ACA (A max)	600	600	600	600	600	600	400	600	400	400
Maximum resolution (A)	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.01	0.1	0.01
Best accuracy (%)	1.9	1.9	1.9	1.9	1.9	1.9	1.8	1.5	1.9	2.0
DCV (V max)	600	600	600	600	600	1000	600	600	600	
Maximum resolution (V)	0.1	0.1	0.1	0.1	1	0.1	0.1	0.1mV	0.1	
Best accuracy (%)	0.7	0.7	0.7	0.7	0.8	1.0	1.0	0.3	1.0	
ACV (V max)	600	600	600	600	600	1000	600	600	600	
Maximum resolution (V)	0.1	0.1	0.1	0.1	1	0.1	0.1	1mV	0.1	
Best accuracy (%)	1.0	1.0	1.0	1.0	1.2	1.5	1.5	1.5	1.5	
Resistance (Ω)	400	400	400	400	2000	2000	2000	40M	20M	
Maximum resolution (Ω)	0.1	0.1	0.1	0.1	1	0.1	1	0.1	0.1	
Best accuracy (%)	1.0	1.0	1.0	1.0	1.5	2.0	2.0	0.6	0.7	
Continuity and beeper	•	•	•	•	•	•	•	•	•	
Diode test						•	•	•		
Capacitance	•	•	•	•						
Frequency	•	•	•	•				•		
Frequency response (Hz)	50-500	50-500	50-400	50-400	40-500	50-500	50-60	50-60	50-500	50-60
Temperature (T1)		•	•							
Jaw opening	1.38" (35 mm)	1.38" (35 mm)	1.34" (34 mm)	1.34" (34 mm)	1.38" (35 mm)	1.34" (34 mm)	1.06" (27 mm)	1.02" (26 mm)	1.06" (27 mm)	1.06" (27 mm)
Display type	Digital	Digital	Digital	Digital	Digital	Digital	Digital	Digital	Digital	Digital
Display update X/sec	2.5	2.5	2.5	2.5	4	1 to 4	1 to 4	3	1.5	2.5
Count	4000	4000	4000	4000	2000	10,000	10,000	4000	2000	2000
Analog bar graph	42 segments	42 segments	42 segments	42 segments						
Analog update X/sec	13	13	13	13						
Low battery indicator	•	•	•	•	•	•	•	•	•	•
Autoranging	•	•	•	•				•	•	
Auto power off	•	•	•	•	•	•	•	•	•	
Peak hold	•	•	•	•						
Data hold	•	•	•	•	•	•	•	•	•	•
Min, max	•	•	•	•						max only
Data logging										
Power factor										
True power (kW)										
Apparent Power (kVA)										
Measurement Category	III, 600V	III, 600V	III, 600V	III, 600V	III, 600V	IV, 600V III, 1000V	III, 600V	III, 600V	III, 600V	III, 600V
UL	•	•	•	•	•	•	•	•	•	•
cUL or CSA	•	•	•	•	•	•	•	•	•	•
CE	•	•	•	•	•					

Ground Resistance Tester



CMGRT-100

- Reads ground resistance down to 0.10Ω
- Fully autoranging with data hold to capture readings
- Convenient alarm and 99-point memory functions
- Measures up to 30A RMS ground or leakage current
- Measures currents down to 1mA
- Accessories included: (1) 9V battery, molded carrying case and test resistance loop
- Lifetime Limited Warranty

SPECIFICATIONS

Ground Resistance Measurement	0.10 to 1200Ω
Ground/Leakage Current Measurement	299mA; 2.999A, 29.99A
Display	3-3/4-digit LCD, 2999-count
Jaw Opening	1.25" (32 mm)
Measurement Category	CAT III, 150V

CAT. NO.	UPC NO.	DESCRIPTION
CMGRT-100	07653	Ground Resistance Tester
CMGRT-100-C*	07730*	Ground Resistance Tester

* Includes Certificate of Calibration

2000A Industrial Clamp Meter



CMI-2000

- Measures AC+DC current
- AC and AC+DC voltage measurements with selectable digital low pass filter for accurate voltage and frequency readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance, temperature and frequency
- Tests continuity and diodes
- Low impedance AutoCheck™ mode automatically selects AC or DC volts, resistance or continuity. Low impedance masks "ghost" voltage pickup
- Backlight & relative mode for added versatility
- Two voltage detection modes – non-contact or using a single test lead
- Computer interface capability using optional CMSC-1U cable and software
- Data hold
- Crest (peak hold) feature captures current or voltage peaks as short as 5 milliseconds
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	200, 2000A AC + DC
Voltage Measurement	6, 60, 600, 1000V AC + DC
Display	LCD with dual measurements
Frequency Rating	40 to 400 Hz
Resistance	600, 6k, 60k, 600k, 6M, 40M Ohms
Jaw Opening	2.1" (55 mm)
Measurement Category	CAT IV 1000V

CAT. NO.	UPC NO.	DESCRIPTION
N CMI-2000	02186	2000A Power Clamp
N CMI-2000C*	02207	2000A Power Clamp
R TSG-3	12034	Test Leads
R TC-30	07536	Carrying Case
R CMSC-1U	02542	Interface Kit

* Includes Certificate of Calibration

1000A Industrial Clamp Meter

NEW PRODUCT



CMI-1000

- Measures AC+DC current and DC microamps
- AC and AC+DC voltage measurements with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance, temperature and frequency
- Tests continuity and diodes
- Phase Sequence & Motor Rotation tests
- Peak-RMS measures motor inrush current
- Flashlight inside clamp jaw for easier work in dark locations
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Crest (peak hold) feature captures current or voltage peaks as short as 5 milliseconds
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600, 1000A, AC + DC
Voltage Measurement	600, 1000V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage: 50/60 Hz; Current: 40 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	2" (51 mm)
Measurement Category	CAT III 1000V, CAT IV 600V

CAT. NO.	UPC NO.	DESCRIPTION
CMI-1000	02187	2500A Industrial Clamp Meter
CMI-1000-C*	02212	2500A Industrial Clamp Meter
02714	02714	Test Leads
TC-30	07536	Carrying Case

*Includes Certificate of Calibration

600A Industrial Clamp Meter

NEW PRODUCT



CMI-600

- Measures AC+DC current and DC microamps
- AC and AC+DC voltage measurements with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance, temperature and frequency
- Tests continuity and diodes
- Phase Sequence & Motor Rotation tests
- Peak-RMS measures motor inrush current
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600A AC + DC
Voltage Measurement	600V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage & Amp Tip™ Current: 50/60 Hz; High Current: 50 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	1.18" (30 mm)
Measurement Category	CAT III 600V, CAT IV 300V

CAT. NO.	UPC NO.	DESCRIPTION
CMI-600	02191	Industrial Clamp Meter
CMI-600-C*	02229*	Industrial Clamp Meter
02714	02714	Test Leads
TC-10	07534	Carrying Case

*Includes Certificate of Calibration

1000A AC/DC True RMS Clamp Meter

NEW PRODUCT



CM-1560

- Measures AC+DC current
- AC and AC+DC voltage measurements with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance and frequency
- Tests continuity and diodes
- Flashlight inside clamp jaw for easier work in dark locations
- Backlight & relative mode for added versatility
- Peak-RMS measures motor inrush current
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Crest (peak hold) feature captures current or voltage peaks as short as 5 milliseconds
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600, 1000A AC + DC
Voltage Measurement	600, 1000V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage: 50/60 Hz; Current: 40 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	2" (51 mm)
Measurement Category	CAT III 1000V, CAT IV 600V

CAT. NO.	UPC NO.	DESCRIPTION
N CM-1560	02188	True RMS Clamp Meter
N CM-1560-C*	02219	True RMS Clamp Meter
R TSG-3	12034	Test Leads
R TC-30	07536	Carrying Case

* Includes Certificate of Calibration

1000A AC True RMS Clamp Meter

NEW PRODUCT



CM-1360

- Measures AC current
- AC voltage measurement with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance and frequency
- Tests continuity and diodes
- Flashlight inside clamp jaw for easier work in dark locations
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600, 1000A AC
Voltage Measurement	600, 1000V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage: 50/60 Hz; Current: 40 to 400 Hz
Resistance	60, 6k, 60k Ohms
Jaw Opening	2" (51 mm)
Measurement Category	CAT III 1000V, CAT IV 600V

CAT. NO.	UPC NO.	DESCRIPTION
N CM-1360	02190	True RMS Clamp Meter
N CM-1360-C*	02221	True RMS Clamp Meter
R TSG-3	12034	Test Leads
R TC-30	07536	Carrying Case

* Includes Certificate of Calibration

600A AC/DC True RMS Clamp Meter

NEW PRODUCT



CM-960

- Measures AC+DC current
- AC and AC+DC voltage measurements with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance and frequency
- Tests continuity and diodes
- Peak-RMS measures motor inrush current
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600A AC
Voltage Measurement	600V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage AmpTip™ Current: 50/60 Hz; High Current: 50 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	1.18" (30 mm)
Measurement Category	CAT III 600V, CAT IV 300V

CAT. NO.	UPC NO.	DESCRIPTION
CM-960	02210	AC/DC True RMS Clamp Meter
CM-960-C*	02230	AC/DC True RMS Clamp Meter
TSG-3	12034	Test Leads
TC-10	07534	Carrying Case

* Includes Certificate of Calibration

600A AC True RMS Clamp Meter

NEW PRODUCT



CM-860

- Measures AC current
- AC voltage measurement with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance and frequency
- Tests continuity and diodes
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600A AC+DC
Voltage Measurement	600V AC+DC
Display	LCD, 6000 Count
Frequency Rating	Voltage & AmpTip™ Current: 50/60 Hz; High Current: 50 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	1.18" (30 mm)
Measurement Category	CAT III 600V, CAT IV 300V

CAT. NO.	UPC NO.	DESCRIPTION
CM-860	02210	True RMS Clamp Meter
CM-860-C*	02233*	True RMS Clamp Meter
TSG-3	12034	Test Leads
TC-10	07534	Carrying Case

* Includes Certificate of Calibration

600A AC True RMS Clamp Meter

NEW PRODUCT



CM-660

- Measures AC current
- AC voltage measurement with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance and frequency
- Tests continuity and diodes
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600A AC
Voltage Measurement	600 Volts AC/DC
Resistance	600, 6k, 60k Ohms
Frequency	Voltage & AmpTip™ Current: 50/60 Hz; High Current: 50 to 400 Hz
Display	LCD, 6000 Count
Jaw Opening	1.18" (30 mm)
Measurement Category	CAT III 600V, CAT IV 300V

CAT. NO.	UPC NO.	DESCRIPTION
N CM-660	02211	Clamp Meter
N CM-660-C*	02233*	Clamp Meter
R TSG-3	12034	Test Leads
R TC-10	07534	Carrying Case

* Includes Certificate of Calibration

1000A HVAC True RMS Clamp Meter

NEW PRODUCT



CMH-1000

- Measures AC current and DC micro-amps
- AC voltage measurement with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance, temperature and frequency
- Tests continuity and diodes
- Phase Sequence & Motor Rotation tests
- Peak-RMS measures motor inrush current
- Flashlight inside clamp jaw for easier work in dark locations
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Crest (peak hold) feature captures current or voltage peaks as short as 5 milliseconds
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600, 1000A AC
Voltage Measurement	600, 1000V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage and AmpTip™ current: 50/60 Hz; High current: 50 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	2.0" (51 mm)
Measurement Category	CAT III 1000V, CAT IV 600V

CAT. NO.	UPC NO.	DESCRIPTION
N CMH-1000	02209	AC Clamp-on Meter
N CMH-1000-C*	02231*	AC Clamp-on Meter
R 02714	02714	Test Leads
R TC-30	07536	Carrying Case

* Includes Certificate of Calibration

600A HVAC True RMS Clamp Meter

NEW PRODUCT



CMH-600

- Measures AC current and DC micro-amps
- AC voltage measurement with digital low pass filter for accurate readings on variable frequency drives
- Also measures DC voltage, resistance, capacitance, temperature and frequency
- Tests continuity and diodes
- Phase Sequence & Motor Rotation tests
- Peak-RMS measures motor inrush current
- Backlight & relative mode for added versatility
- AmpTip™ increases accuracy on small wires and low current
- Two voltage detection modes – non-contact or using a single test lead
- Data hold
- Recording of Maximum, Minimum and Average readings
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	60, 600 A AC
Voltage Measurement	600V AC + DC
Display	LCD, 6000 Count
Frequency Rating	Voltage and AmpTip™ current: 50/60 Hz; High current: 50 to 400 Hz
Resistance	600, 6k, 60k Ohms
Jaw Opening	1.18" (30 mm)
Measurement Category	CAT III 600V, CAT IV 300V

CAT. NO.	UPC NO.	DESCRIPTION
CMH-600	02209	AC Clamp-on Meter, True RMS
CMH-600-C*	02231	AC Clamp-on Meter, True RMS (Calibrated)
02714	02714	Test Leads
TC-10	07534	Carrying Case

* Includes Certificate of Calibration

True RMS AC Clamp Meter



CM-450

- AC amperage, AC/DC voltage measurement
- True RMS for the most accurate measurement where harmonics are present
- Quick, easy operation
- Auto power off for longer battery life
- Resistance measurement
- Audible continuity and diode tests
- Frequency measurement
- Data hold to capture measurement
- 4000 count LCD
- Accessories included: Test leads, 3V Standard button battery (IEC-CR 2032; ANSI-NEDA 54004LC)
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	40, 400, 600 A AC
Voltage Measurement	4, 40, 400, 600 V AC + DC
Display	LCD, 4000 Count
Resistance	4, 40, 400, 400k, 4, 40M Ohms
Jaw Opening	1.02" (26 mm)
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
CM-450	12726	AC Clamp-on Meter, True RMS
TSG-3	12034	Sure-Grip Test Leads
TC-5	07588	Carrying Case

AC Clamp-on Meter



CM-410

- Measures to 600 volts AC and DC, and 400 amps AC
- Data hold to capture important readings
- Audible continuity test
- Auto power off for longer battery life
- Accessories included: (2) 1.5V AAA batteries, test leads and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	200, 400A AC
Voltage Measurement	200, 600V
Display	LCD, 2000 Count
Resistance	2, 20, 200, 200k, 2, 20M Ohms
Jaw Opening	1.06" (27 mm)
Measurement Category	CAT III 600V

CAT. NO.	UPC NO.	DESCRIPTION
CM-410	73420	AC Clamp-on Meter, 400A
R 00606	00606	Test Leads
R TC-5	07588	Carrying Case

Clamp-on Meter



CM-330

- AC current measuring capability up to 400 amps
- Compact size, fits easily into tool pouch
- Data hold and Max hold to capture important readings
- 2000-Count LCD
- Lifetime Limited Warranty
- Accessories included: (1) 9V battery and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Amperage Measurement	20, 200, 400A AC
Display	LCD, 2000 Count
Jaw Opening	1.18" (30 mm)
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
CM-330	11865	Clampmeter, 400A AC
R TC-5	07588	Carrying Case

CIRCUIT TRACING

Circuit Tracer Application Guide

FEATURE	CIRCUIT SEEKER CS-8000	CLOSED CIRCUIT 2007
Locate and identify breakers	•	•
Locate and identify fuses	•	•
Locate and identify blown fuses	•	
Trace concealed wiring in walls and floors	•	•
Locate junction box relays and transformers	•	•
Locate switch gear	•	•
Find shorts to ground	•	•
Trace wires in PVC (nonmetallic conduit)	•	•
Find opens in a circuit	•	
Localize power and lighting panels	•	•
Operate on energized circuits	•	•
Operate on low voltage circuits	•	•
Operate on high voltage circuits (600VAC)	•	
Operate on unenergized circuits	•	• ¹
Trace shielded cable	•	
Trace metal conduit	• ²	•
Sort wires and trace coax cable	•	
Auto gain circuitry for improved accuracy	•	
AC voltage range	0-750V	9-300V
DC voltage range	0-750V	9-300V
Distance – receiver from transmitter	300 ft.-4 mi. ³ (915 m-6.5 km)	3-4 miles (4.9 km-6.5 km)
Transmitter battery	(2) AA	—
Receiver battery	(2) AA	9V

1. For circuits without power, hook-up a 9V battery in series with the circuit and transmitter to power the line.

2. Closed circuit applications only.

3. Depends on application – shorter distances for open circuit tracing, longer distances for closed circuit tracing applications.

CS-8000 Circuit Seeker™ Circuit Tracer



Features:

- Advanced patented non-directional sensing technology
- Superior sensitivity and functionality providing for accurate tracing & locating
- Ergonomic receiver with information-rich full-color graphical LCD
- Graphics and audible signal provide quick and easy to understand tracing feedback
- Traces concealed wiring, locates junction boxes, and finds breakers for live or open circuits
- Locates and identifies blown fuses
- Finds shorts and breaks in conductors
- Low pitch, high volume audible indicator
- User-selectable automatic or manual gain capability for fast, convenient use
- Can be used on GFCI protected circuits
- Automatic backlight on receiver maximizes battery life
- Supports transmitter-to-receiver distances up to 4 miles for closed circuit tracing
- Lifetime Limited Warranty

SPECIFICATIONS

Capacity	0 to 750V AC/DC
Frequency	15.15 kHz
Receiver Range	up to 20' (6 m) Live Line Mode; up to 10' (3 m) Open Line with metallic connection to ground; 1-3' (.3-.9 m) with capacitive ground reference
Weight	4.3 lbs. (1950 g)



CS-8000

CAT. NO.	UPC NO.	DESCRIPTION
CS-8000	12126	Circuit Seeker
R 12849	12849	Transmitter
R 12850	12850	Receiver
R 10057	10057	Alligator Clips (2)
R 10054	10054	AC Blade
R 12852	12852	AC Plug Adapter
R 12853	12853	Extension Leads (2)
R 12851	12851	Carrying Case



CS-8000 (Kit)

Power Finder® Closed Circuit Tracer



2007

- Fast, simple energized circuit tracing
- Traces circuits in nonmetallic conduit
- Finds shorts to ground
- Supports transmitter-to-receiver distances up to 4 miles (6.5 km)
- Accessories included: transmitter plug, (2) receptacle blades, test leads, (1) 9V battery and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Capacity	2007 - 9 to 300V AC/DC
Case Size	12" x 8-3/4" x 2" (305 mm x 222 mm x 51 mm)
Weight	2.4 lbs. (1089 g)
Distance	3000 ft. - 4000 ft. (915m - 1220m)

CAT. NO.	UPC NO.	DESCRIPTION
2007	36924	Power Finder Closed Circuit Tracer
36925	36925	Receiver*
36926	36926	Transmitter*
36928	36928	Transmitter Plug*
36929	36929	Receptacle Blades (2), AC*
36930	36930	Test Lead*
36927	36927	Plastic Case*

* 2007 includes these items

LOCATORS

Locators Application Guide

FEATURE	BLL-200	501	PE2003	508S	521A
Trace concealed wiring in walls and floors		•		•	
Locate junction box relays and transformers	•				
Locate switch gear	•				
Find shorts to ground			• ²		• ¹
Trace wires in PVC (nonmetallic conduit)	•	•		•	
Find opens in a circuit			• ²		•
Localize power and lighting panels	•	•		•	
Operate on energized circuits	•	•		•	
Operate on low voltage circuits	•	•	•	•	
Operate on high voltage circuits (600VAC)	•				
Operate on unenergized circuits	•	•	•	•	•
Trace shielded cable	•	• ³		• ³	• ³
Trace buried metal conduit					
Trace coax cable	•	• ⁵		• ⁵	• ⁴
Auto gain circuitry for improved accuracy	•				
AC voltage range	0-600V	0-240V	0-240V	0-240V	0-120V
DC voltage range	0-300V	0-500V	0-400V	0-500V	0-250V
Distance—receiver from transmitter	5,000 ft.	• ⁷	5000 ft.	1000 ft.	• ⁶
Transmitter battery	(4) AA	(8) AA	12V rechargeable	(1) 9V	(8) D
Receiver battery	(4) AA	(1) 9V	(1) 9V	(1) 9V	(1) 9V

1. 10,000 ohms and less—both ends isolated from grounds.
2. Does not locate the path—has to be predetermined and only in direct burial applications; 5,000,000 and less.
3. Transmitter connected to metallic shield.
4. Will trace coax providing the bond is in place at the remote end—will disrupt service.
5. No sorting (high RF bleeds) can trace coax if transmitter connected to braid.
6. Low frequency locators need a "path to earth" (dirt), 5000 ft. on an open conductor and 2500 ft. on a metallic pipe at 3 ft. deep.
7. Direct Connection 4,000 ft at 7 ft deep
 Inductive Coupler 1,000 ft at 3 ft deep
 Inductive Antenna 700 ft at 3 ft deep

BURIED FACILITY LOCATION AND MARKING

Tracker II



501
HS-1 (08695)
Optional headset is available for use in high-traffic areas or other noisy environments.

- Traces the path and determines the depth of wires and metallic pipes on active or dead systems without having to deactivate the system
- Lightweight receiver provides audible and visual indications of signal strength
- Transmitter output and receiver sensitivity are fully adjustable for maximum accuracy
- Transmitter offers three methods of connection: direct, inductive coupler and inductive antenna
- Includes transmitter assembly, receiver assembly, inductive coupler (clamp), built-in inductive antenna, two 8' (2.4 m) test leads with heavy-duty alligator clips and durable polyethylene case
- High frequency transmitter provides range up to 4,000' (1,219 m) and depths up to 7' (2 m)
- Receiver is 32" long (813 mm)
- Battery operated (eight AA and one 9V battery is included)
- Molded carrying case included

CAT. NO.	UPC NO.	DESCRIPTION
501	08662	Tracker II
501T	60353	Transmitter
501R	60352	Receiver
IC1	60354	Inductive Clamp
CS16	60355	Transmitter Cord Set
500CA	60351	Case with Antenna

SPECIFICATIONS

Power Requirements	Transmitter – (8) AA batteries; Receiver – (1) 9V battery
Battery Life	Transmitter – 30 hours nominal; Receiver – 10 hours nominal
Transmitter Frequency	447.5kHz
Transmitter Power	40Vp-p (140mW) maximum
Voltage Protection	240VAC/500VDC
Automatic Shut Off	90 Min. Transmitter and Receiver
Construction	Transmitter/Receiver – powder coated aluminum Case – vacuum formed polyethylene
Dimensions	Transmitter – 4.25" x 3" x 3.25" (108 x 76.2 x 82.6 mm) Receiver – 32" x 2.75" x 4" (812.8 x 69.9 x 101.6 mm) Case – 33.5" x 8.25" x 3.75" (850.9 x 209.6 x 95.3 mm)
Weight	6.7 lbs. complete kit (3.04 kg)

Buried Line Locator



- LED and LCD signal strength indicators make it quick and easy to find exact line location
- Lightweight and ergonomically balanced
- Automatic signal boost makes it easy to trace lines, even those with very weak signals
- Receiver may be used in active or passive mode
- Receiver locates multiple passive frequencies with a single setting
- Receiver automatically locks out passive range when it detects a transmitter signal, reducing the chance of tracing other lines carrying weaker signals
- Microprocessor-based circuitry delivers increased accuracy and features auto-gain control in all environments
- Traces 20' (6 m) underground and provides depth readings up to 15' (4.57 m)
- Transmitter can be connected to live lines up to 600V
- Molded carrying case included
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION	SPECIFICATIONS	
BLL-200	07796	Buried Line Locator	Transmitter	Receiver
			Operating Voltage	Depth Range
			0-600VAC, 0-300 VDC	Measures: 0-15 ft Traces: 0-20 ft.
			Current	Depth Resolution
			13mA (open line) 150mA (live or shorted line)	0.1 ft. increments
			Frequency	Passive Trace Frequency
			33.3kHz	- 12Hz-24kHz
			Operating Temperature	Operating Temperature
			0°F to 120°F (-17°C to 50°C)	0°F to 120°F (-17°C to 50°C)
			Size	Size
			7.5" x 4" x 2.1" (190.5 mm x 101.6 mm x 53 mm)	4.1" x 8.5" x 38" (104.1 mm x 215.9 mm x 965.2 mm)
			Power	Power
			6 VDC (4 AA batteries)	6 VDC (4 AA batteries)
			Weight	Weight
			15 oz. (425 g) (with batteries and clamp)	1 lb. 12 oz. (794 g)

Pulser Fault Locator



- Identifies the exact location of even the smallest breaks in insulation by "pulsing" a high-voltage signal that radiates into the earth at the location of the faults
- With the A-frame mounted receiver, a visual analog meter points the way to the source of the voltage
- Multiple faults on a single wire can be identified indicating the need to replace instead of repair
- Extra-long test leads feature heavy-duty alligator clips for use on multiple cable types
- Includes a rechargeable transmitter, receiver, A-frame, ground stake, 120V charger and a 12V DC (cigarette lighter) adapter
- Battery operated (one 12V and one 9V battery are included)
- Molded carrying case included

SPECIFICATIONS

Power Requirements	Transmitter: (1) 12V rechargeable battery Receiver: (1) 9V battery
Battery Life	Transmitter: 23 hours per charge; Receiver: 200 hours
Transmitter Power	2400VDC peak
Voltage Protection	240VAC/400VDC
Construction	Transmitter – aluminum housing in polyethylene case Receiver – powder coated aluminum
Dimensions	Transmitter – 17" x 8.5" x 6.5" (421 mm x 215 mm x 160 mm) in case Receiver – 33.5" x 21.75" x 3.25" (840 mm x 550 mm x 8 mm) on A-Frame
Weight	12.5 lbs. (5.7 kg) complete

CAT. NO.	UPC NO.	DESCRIPTION
PE2003	08666	Pulser
R 2000H	60357	Transmitter (Includes CH1 & CH2)
R 2000R	60358	Receiver
R AF2	60482	A-Frame
R CH1	60360	AC Charger
R CH2	60361	DC Charger
R 59F0002	66216	Battery, Replacement (12V 2.5 Ah)

Wire Finder/Mini Locator



- Traces energized or non-energized wires in walls and drop ceilings
- Provides reliable results on buried cables to depths of 3' (1 m) and lengths up to 1000' (308 m)
- Determines the approximate depth of the wire before digging
- Compact design and easy-to-understand operations
- Fully adjustable transmitter and receiver for accurate locating
- Quick change test leads for use in any industry, even international power outlets
- Voltage protection to allow use on live AC circuits
- Automatic shut-off to prevent accidental battery discharge
- Housed in a durable, molded carrying case with a quick reference operation guide on the inside of the lid
- Battery-operated: (2) 9V batteries included

SPECIFICATIONS

Power Requirements	(1) 9V each (transmitter and receiver, included)
Battery Life	Transmitter 35 hours nominal; Receiver 20 hours nominal
Transmitter Frequency	447.5kHz
Transmitter Power	9Vp-p (11mW)
Voltage Protection	240VAC/500VDC
Construction	Transmitter/Receiver – high-impact ABS plastic, Case – vacuum-formed polyethylene
Dimensions	Transmitter – 4" x 2.3" x 1" (101.6 x 58.4 x 25.4 mm), Receiver – 6" x 2.35" x 1" (152.4 x 59.7 x 25.4 mm), Case – 9.5" x 8" x 3" (241.3 x 203.2 x 76.2 mm)
Weight	2.6 lbs. (1.2 kg)



CAT. NO.	UPC NO.	DESCRIPTION
508S	08678	Wire Finder/Mini Locator
R 508ST	60363	Transmitter
R 508SR	60364	Receiver
R CS14	60366	Alligator Clip Cord set
R CS15	60367	AC Outlet Cord set

Wire and Valve Locator



- Adjustable transmit power allows you to select the best signal for maximum performance
- Transmitter's high power output offers extended range and use on higher resistance wire paths that other locators can't touch
- Receiver provides both audible and visual indications of signal strength
- Lightweight receiver wand makes it easy for you to move along quickly to locate even the longest wire path
- Rugged headphones block ambient noise and improve "feel" for the signal
- Includes transmitter, receiver, headset, ground stake and complete instructions
- Battery-operated: (8) "D" Cells and (1) 9V

SPECIFICATIONS

CAT. NO.	UPC NO.	DESCRIPTION
521A	86788	Wire and Valve Locator
 521A-R	12623	Receiver
 HS-1	08695	Headset

Power Requirements	Transmitter: (8) "D" Cell; Receiver: (1) 9V battery
Battery Life	Transmitter: 50 hours nominal Receiver: 100 hours nominal
Transmitter Frequency	1748Hz
Transmitter Power	750Vp-p 285Vrms
Voltage Protection	120VAC/250VDC
Construction	Powder-coated aluminum housing in polyethylene case
Case Dimensions	33.5" x 8.25" x 3.75"
Weight	12 lbs. complete

Station Master™ Pro



24B

- Troubleshoot irrigation systems
- Activate and cycle solenoids
- Test solenoids for continuity
- Send tone to identify wires
- Measure clock voltage
- Low battery indication
- Easy-to-understand LEDs
- Test leads with "Bed-of-Nails" and piercing Pin Clips
- 1-year limited warranty

SPECIFICATIONS



24BK

Minimum Voltage for Clock LED	15 VAC (LED intensity increases as voltage increases)
Minimum Battery while Testing	10.5 VDC
Maximum Input Voltage between Test Leads	28 VAC
Solenoid Circuit Recharge Time	2.5 seconds
Maximum Distance Range to Activate one Solenoid	12 AWG Loop 3000-13000 feet 14 AWG Loop 2000-8500 feet 18 AWG Loop 500-3000 feet
Power Source	9V alkaline batteries
Battery Life	3 hours continuous
Operating/Storage Temp.	32°F - 122°F (0° - 50°C)

CAT. NO.	UPC NO.	DESCRIPTION
24B	86786	Station Master Pro
24BK	86787	Station Master Pro Kit
700C	08683	Carrying Case



BASIC ELECTRICAL KITS

Basic Electrical Kit



TK-30A



DM-25

- Use to measure voltage and check 1.5V and 9V batteries
- AC/DC voltage measurement
- Built-in test leads, no loose parts to lose
- Resistance measurement
- Audible continuity and diode tests
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Measurement	AC V: 200.0, 600V; DC V: 20.00, 200.0, 600V
Resistance Measurement	200.0, 2000 Ω; 20.00, 200.0, 2000 kΩ
Display Counts	2000
Measurement Category	CAT III, 600V



GT-11

- Safe, non-contact voltage detection
- Bright LED and audible alarm sound if voltage is present
- On/Off switch for longer battery life
- Convenient pen-size device easily fits into pockets or tool pouches
- Use to detect voltage in outlets, lighting fixtures, circuit breakers, wires and cables or to find a break in a wire
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Detection	50 - 1000 VAC
Frequency	50-500 HZ
Measurement Category	CAT IV, 1000 VAC



TK-30AGFI



GT-10 and GT-10GFI

- Use to trouble shoot 120V AC grounded outlets
- Light sequence indicates correct or incorrect
- GT-10GFI also tests GFCI receptacles
- Lifetime Limited Warranty

SPECIFICATIONS

Voltage Detection	120V AC
Listed	UL 1436

CAT. NO.	UPC NO.	DESCRIPTION
TK-30A	00880	Electrical Kit, Basic
TK-30AGFI	01575	Electrical Kit, GFCI

CIRCUIT VERIFYING

Polarity Cubes



GT-10

- Use to troubleshoot 120V AC grounded outlets
- Light sequence indicates correct/incorrect wiring
- Lifetime Limited Warranty

GT-10GFI

- Use to troubleshoot 120V AC grounded outlets and test GFCI receptacles
- Light sequence indicates correct/incorrect wiring
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION
GT-10	12124	Cube, Polarity
GT-10GFI	12125	Tester, Circuit GFI

GFCI and Circuit Tester



- Allows instant testing of GFCI receptacles or GFCI circuit breaker protected circuits
- Checks 120VAC grounded outlets for correct/incorrect wiring
- LED indicators signal correct wiring, open ground, open neutral, open hot, hot/ground reversed and hot/neutral reversed
- Lifetime Limited Warranty

SPECIFICATIONS

Capacity	120VAC, 3-wire systems
Time	4-second interval between mA test impulses; 200 ms pulse duration
Size	5-3/8" x 2-5/8" x 1-3/4" (137 mm x 67 mm x 44 mm)
Cord length	16" (406 mm)
Weight	0.5 lb. (227g)
Accuracy	Current: 10% at nominal voltage; Time: approx. 12%
Measurement Category	CAT II, 150V

CAT. NO.	UPC NO.	DESCRIPTION
5708	34523	GFCI and Circuit Tester
5708-C*	07640*	GFCI and Circuit Tester

* Includes Certificate of Calibration

INSULATION TESTING

Insulation Testing Comparison Chart

FEATURE		5990	5882	5880
Test voltage	250V		•	
	500V	•	•	•
	1000V	•	•	•
	2500V	•		
	5000V	•		
Range	250V		50k-2000MΩ	
	500V	500k-500GΩ	100k-2000MΩ	100k-2000MΩ
	1000V	700k-500GΩ	200k-2000MΩ	200k-2000MΩ
	2500V	5M-500GΩ		
	5000V	20M-500GΩ		
Continuity			0-20Ω	0-20Ω
Resistance			0-400kΩ	0-400kΩ
Display type		Analog	Digital	Digital
Backlit			•	•
Count			4000	4000
Analog bar graph			•	•
Measurement Category		III, 600V	II, 300V	II, 300V
UL			•	•
CE		•	•	•

5kV Megohmmeter



- Four test voltages: 500V, 1000V, 2500V, and 5000V
- Resistance measurement range up to 500GΩ
- Extra-large analog display for easy viewing
- Accessories included: (4) 1.5V D batteries, integrated carrying case, test leads, probes and snap-on test lead pouch
- Lifetime Limited Warranty

SPECIFICATIONS

Insulation Tests

Test Voltage	500, 1000, 2500, 5000V
Range	500k to 500GΩ
Voltage Test Range	600V AC/DC
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
5990	07665	5kV Megohmmeter
R 87121	87121	Probes
R 86999	86999	Leads

Digital/Analog Megohmmeter



5882



5883

5880 features:

- Auto-ranging AC/DC default voltmeter with test inhibitor and warnings for enhanced user safety
- Extra-large digital display with backlight and analog bar graph
- Weather resistant against dust and water to IP44
- Multiple test voltage ranges
- Measure up to 2000MΩ resistance
- Accessories included: (6) 1.5V AA batteries, test leads and case
- Lifetime Limited Warranty

5882 adds:

- Tests three voltage ranges: 250, 500 and 1000V
- Timer function for dielectric absorption and polarization index measurements

5883 (optional accessory):

- Remote probe, pushbutton and flashlight for added convenience

SPECIFICATIONS

Insulation Tests

Test Voltage 5882: 250, 500, 1000V
5880: 500, 1000V

Range 250V: 50k – 2000MΩ
500V: 100k – 2000MΩ
1000V: 200k – 2000MΩ

Automatic Discharge 1.5 sec/μF, 300 KΩ impedance

Continuity Range 0-20Ω

Resistance Range 0-400kΩ

Voltage Test Range 0-600V AC/DC

Display 4000-count, backlight 34-segment analog bar graph

Measurement Category CAT II, 300V

CAT. NO.	UPC NO.	DESCRIPTION
5882	07573	Digital/Analog Megohmmeter
5882-C*	07639*	Digital/Analog Megohmmeter
5880	07572	Digital/Analog Megohmmeter
5880-C*	07638*	Digital/Analog Megohmmeter
5883	07591	Remote Probe
87073	87073	Test Lead Kit

* Includes Certificate of Calibration

PHASE SEQUENCE

Phase Sequence Indicator



5702

- Identifies L1, L2, L3 phases and indicates phase rotation before installation
- Clockwise and counterclockwise indication via neon lamps
- Lifetime Limited Warranty

SPECIFICATIONS

Live Phase Indicators	Three neon lamps
Motor Rotation Indicators	Two neon lamps
Measurement Category	CAT III, 600V

CAT. NO.	UPC NO.	DESCRIPTION
5702	07574	Phase Sequence Indicator

INFRARED THERMOMETER

TG-1000 & TG-2000 Infrared Thermometers



TG-2000

TG-1000

Both TG-1000 and TG-2000 offer:

- Safe, non-contact temperature measurement
- Display temperatures in either Fahrenheit or Celsius
- Adjustable emissivity for optimum temperature reading accuracy on a wide range of materials and surfaces
- Min, Max, Difference and Average temperature functions
- Backlit display for easy readings in any environment

TG-1000 Features:

- Laser spot indicator showing approximate center of target measurement area

TG-2000 Features

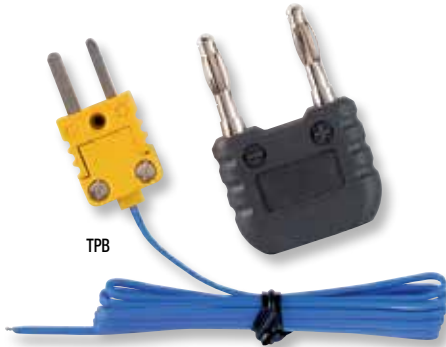
- Wider Temperature range
- Higher distance-to-spot (D:S) Ratio for measuring smaller targets or at greater distances
- Dual lasers indicate approximate diameter of target measurement area

SPECIFICATIONS	TG-1000	TG-2000
Range – °F	-76 ~ 1022	-76 ~ 1157
Range – °C	-60 ~ 500	-60 ~ 625
D:S Ratio	12:1	16:1
Laser	•	Dual
K-Type Contact		•
Emissivity	.10 ~ 1.00	.10 ~ 1.00
Backlight	•	•
Alarms	Hi/Low	Hi/Low



CAT. NO.	UPC NO.	DESCRIPTION
TG-1000	00103	Infrared Thermometer
TG-2000	00104	Dual Laser Infrared Thermometer

Bead Temperature Probe



- For surface and air/gas temperature measurement
- Not suitable for liquids
- Measurement range: -40°F to 399°F (-40°C to 204°C)
- Probe length: 39.4" ±0.2" (1 m ±5 mm)
- Type K thermocouple
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION
TPB	07592	Bead Temperature Probe

SPECIALTY TESTERS

Sound Level Meter



93-20

- Noise measurement adapted to dB(A) weighting
- Compact and light, easy to take to any site
- Accessories included: (1) 9V battery
- Lifetime Limited Warranty

SPECIFICATIONS

Capacity	Low – 35 to 80dB; High – 75 to 120dB
Audible Range	"A" Scale
Frequency	20-20,000Hz
Weight	8 oz. (227g)
Size	6-3/8" x 2-1/2" x 1-1/2" (162 mm x 64 mm x 38 mm)

CAT. NO.	UPC NO.	DESCRIPTION
93-20	34451	Sound Level Meter

Digital Light Meter



93-172

- Measures incandescent, fluorescent, metal halide, high-pressure sodium and halogen lamp output
- Color and cosine-corrected for enhanced accuracy
- Measures up to 50,000 lux
- Peak and data hold means no lost measurements
- Accessories included: (1) 9V battery and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Ranges	
Foot Candles	0.01-5,000Fc (20/200/2,000/5,000)
Lux	0.1-50,000 lux (200/2,000/20,000/50,000)
Accuracy	
Incandescent Light Source	± 4%
Other Light Sources	± 7%
Temperature Range	0° to 40° C (32° to 104° F)
Sampling Rate	2.5 times per second

CAT. NO.	UPC NO.	DESCRIPTION
93-172	06060	Digital Light Meter
93-172-C*	07084*	Digital Light Meter
R 06200	06200	Carrying Case
R 06061	06061	Sensor
R 06083	06083	Sensor Case

* includes Certificate of Calibration

Gas Lamp Tester



5715

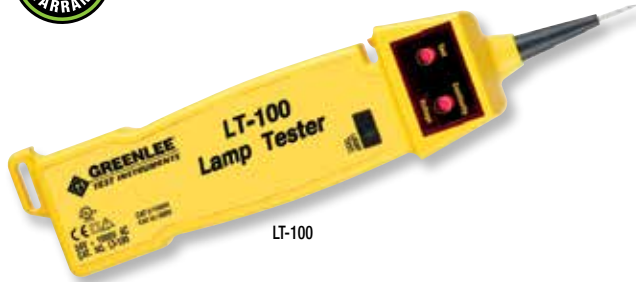
- Test most fluorescent lamps, low pressure sodium vapor, high pressure sodium discharge lamps, neon tubes, mercury vapor and metal halide lamps
- Checks starters, resistors, ignitors, capacitors and photo cells
- Indicates AC/DC voltage and continuity
- Includes detachable antenna, batteries, leads, probes, clamps and holster
- Lifetime Limited Warranty

SPECIFICATIONS

Capacity	Voltage – up to 500 VAC & VDC; Continuity – to 300kΩ
Size	6" x 2-3/4" x 1-3/4" (152 x 70 x 45 mm); Antenna – 27" (686 mm)
Weight	2.4 lbs. (1.1 kg)
Batteries	2-9V, included

CAT. NO.	UPC NO.	DESCRIPTION
5715	34529	Gas Lamp Tester
R 5713	34528	Holster
R 5710	34525	Antenna
R 5786	34574	Small Alligator Clamps (2)
R 5783	34556	Push-on Probes (2)

Lamp Tester



- Tests HID and fluorescent lamps
- Live conductor sensing
- Compact, rugged housing with carrying case (included)
- Accessories included: (1) 9V Battery and carrying case
- Lifetime Limited Warranty

SPECIFICATIONS

Live Conductor Indication	60-250VAC, 40-60Hz
Continuity Verification	0-5MΩ (test current: <7μA)
Lamp Tester Voltage	3kV/160kHz (test current:<200μA)
Measurement Category	CAT II, 250V

CAT. NO.	UPC NO.	DESCRIPTION
LT-100	07541	Lamp Tester
TC-10	07534	Deluxe Carrying Case (included)

ACCESSORIES

Sure-Grip Test Leads



- 39" (1 m) long flexible silicon insulated wire
- Right-angle meter plugs
- Comfort-grip overmolded probes
- Gold plated tips for low contact resistance
- Set of 2 leads, one black and one red
- Measurement Category IV, 1000V per UL-61010
- Maximum current 10 amps
- Lifetime Limited Warranty

CAT. NO.	UPC NO.	DESCRIPTION
TSG-3	12034	Sure-Grip Test Leads

93-30 Line Splitter (NEMA 5-15)



93-30

- For use with all models of clamp-on meters
- Splits lines for independent testing with clamp-on meter
- Lifetime Limited Warranty

SPECIFICATIONS

Size	4-5/8" x 1-3/4" (118 mm x 45 mm)
Weight	0.1 lb. (45g)

CAT. NO.	UPC NO.	DESCRIPTION
93-30	34452	93-30 Line Splitter (NEMA-5-15)

Deluxe Carrying Case



TC-5



- Durable nylon carrying case
- Inside pocket for test leads
- With carry strap and double-stitched belt loop
- Lifetime Limited Warranty

SPECIFICATIONS

Size 7-3/4" x 3" x 1-1/2" (196.9 mm x 76.2 mm x 38.1 mm)

CAT. NO.	UPC NO.	DESCRIPTION
TC-5	07588	Deluxe Carrying Case

Deluxe Carrying Case



TC-10



- Durable nylon carrying case
- Inside pocket for test leads
- With carry strap and double-stitched belt loop
- Lifetime Limited Warranty

SPECIFICATIONS

Size 9-3/8" x 3-1/2" x 2" (240 mm x 90 mm x 50 mm)

CAT. NO.	UPC NO.	DESCRIPTION
TC-10	07534	Deluxe Carrying Case

Deluxe Carrying Case



TC-15



- Durable nylon carrying case
- Inside pocket for test leads
- With carry strap and double-stitched belt loop
- Lifetime Limited Warranty

SPECIFICATIONS

Size 11-1/4" x 3" x 2" (285.8 mm x 76.2 mm x 50.8 mm)

CAT. NO.	UPC NO.	DESCRIPTION
TC-15	07595	Deluxe Carrying Case

Deluxe Carrying Case



TC-30



- Durable nylon carrying case
- Inside pocket for test leads
- With carry strap and double-stitched belt loop
- Lifetime Limited Warranty

SPECIFICATIONS

Size 11-1/4" x 4-1/2" x 2 1/8" (285 mm x 115 mm x 55 mm)

CAT. NO.	UPC NO.	DESCRIPTION
TC-30	07536	Deluxe Carrying Case

Deluxe Carrying Case



TC-20

- Durable nylon carrying case
- Inside pocket for test leads
- With carry strap and double-stitched belt loop
- Lifetime Limited Warranty

SPECIFICATIONS

Size 7-3/4" x 6-1/4" x 2" (196.9 mm x 158.8 x 50.8 mm)

CAT. NO.	UPC NO.	DESCRIPTION
TC-20	07535	Deluxe Carrying Case

Fuse Selection Guide

SUITABLE FUSES	Bussman GDA-160mA Littelfuse 216.160	Bussman GDA-315mA Littelfuse 216.315	Bussman KTK-4/10 Littelfuse BLS-4/10	Bussman DMW-B-44/100 Littelfuse FLU .44 Ferraz FSM44/100	Bussman GDA-500mA Littelfuse 216.500	Ferraz 500V FA 0.63A 6.3x32 Siba 189 020.0.630	Ferraz 660V FA 0.63A 6.3x32	Bussman AGC-10	Bussman KTK-10 Littelfuse KLK-10	Bussman DMW-B-11-A Littelfuse FLU011 Ferraz FSM11	Ferraz 500V FA 12.5A 6.3x32 Siba 189 020.12.5	Bussman KTK-15 Littelfuse KLK-15
AM-6												
DM-45			•		•				•			
DM-65				•						•		
DM-200						•					•	
DM-200A						•			•			
DM-210						•					•	
DM-210A						•			•			
DM-310												•
DM-330												•
DM-350												•
DM-500												•
DM-510	•											•
DM-510A						•			•			
DM-800				•						•		
DM-810				•						•		
DM-810A				•						•		
DM-820				•						•		
DM-820A				•						•		
DM-830A				•						•		
DM-860				•						•		
DM-860A				•						•		
DML-430				•						•		
DML-430A				•						•		
DML-54				•						•		
5878							•					
5880							•					
5882							•					
FUSE RATINGS												
AMPERAGE	160 mA	315 mA	400 mA	0.44A	500 mA	0.63 A	0.63 A	10A	10 A	11 A	12.5 A	15 A
VOLTAGE	250V	250V	600V	1000V	250V	500V	660V	250V	600V	1000V	500V	600V
INTERRUPTING RATING (AMPS)	1,500	1,500	10,000	10,000	1,500	150,000	30,000	200	100,000	10,000	20,000	100,000

SOFTWARE COMPATIBILITY				
	DMSC-2U	DMSC-9U	DMSC-9	CMSC-1U
DM-200	•			
DM-200A	•			
DM-210	•			
DM-210A	•			
DM-510A	•			
DM-800			•	
DM-810			•	
DM-810A		•		
DM-820			•	
DM-820A		•		
DM-830A		•		
DML-54			•	
DML-430			•	
DML-430A		•		
CMI-2000				•

Instrument Case Compatibility

CASE CATALOG NO. CASE UPC NO.	TC-5 07588	TC-10 07534	TC-20 07535	TC-28 07715	TC-30 07536	TC-40 19216	TC-50 07746	TC-55 07747
CM-330	•							
CM-410	•							
CM-450	•							
CM-600 Series		•						
CM-800 Series		•						
CM-900 Series		•						
CM-1300 Series					•			
CM-1500 Series					•			
CMA-40	•							
CMA-60		•						
CMAF Series			•	•				
CMI-100					•		•	
CMI-200					•			•
CMP-200					•			•
CMT-80	•							
CMT-90		•						
CSJ-100	•							
DM-25						•		
DM-45			•					
DM-65			•					
DM-200 Series			•			•		
DM-300 Series			•			•		
DM-500 Series			•			•		
DM-800 Series			•	•				
DML Series			•	•				
GT-65	•							
GT-95	•							
GT-220			•			•		
GT-540			•			•		
LT-100		•						
2010		•						
5702			•					
5708		•				•		
5779			•					