

VerifEye[™] Mini Meter[™] OEM Modules Sub-Metering Solutions for Accurate Measurement & Verification



DEFINITION

The Leviton VerifEye[™] Mini Meter[™] OEM Modules line of revenue-grade meters meets the requirements for all single phase, tenant billing applications. Designed to provide a simple and effective process for accurately capturing measurements of power consumption, Mini Meters are easy to specify and install for new construction and retrofits.

- 1- or 2-Phase applications
- Revenue grade accuracy: 0.5%, ANSI C12.20
- Compact footprint; fits almost anywhere
- Cost effective solution
- Isolated pulse output channel for AMR compatibility

Leviton meters utilize highly accurate current transformers for revenue-grade performance. Competing products use current sensors that do not provide the same level of performance. Leviton offers CTs in solid and split core styles to accommodate all phases of installation and construction.

Solid core CTs are ideal for new construction, when power is not live and wires can easily be threaded through the core. Split core CTs can be installed at any time without having to disconnect wire terminations, making them the optimal choice for retrofitting an existing structure. Split core CTs close securely for fast, precise installation with no need for timeconsuming tie wraps and no worries about improper seating or core half separation. Both solid and split core CTs offer high quality, long term accuracy and reliability.

Every OEM Mini Meter has an installer-friendly feedback feature. The user friendly reverse phase indictors on the meter's LCD display act as an installation diagnostics tool and illuminates if a meter is improperly installed. After installation, the green load light shows that the meter is collecting electric consumption data at the appropriate rate. All 100 and 200 Amp solid core CTs have color-coded labels to easily identify and correctly land the wires at the meter.

APPLICATIONS

Use Mini Meters in all single phase commercial applications for:

- Load profiling and benchmarking
- Measurement and verification
- Green building initiatives
- Utility usage benchmarking

Note: the Mini Meter is not be used in industrial applications

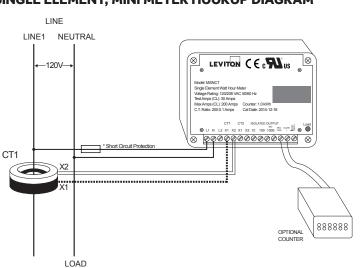
Leviton Manufacturing Co., Inc. Energy Management, Controls and Automation

20497 SW Teton Avenue, Tualatin, OR 97062 **tech line** (6:00AM-4:00PM PT Mon-Fri) 800-959-6004 **fax** 503-404-5594 ©2017 Leviton Manufacturing Co., Inc. All rights reserved. Subject to change without notice.

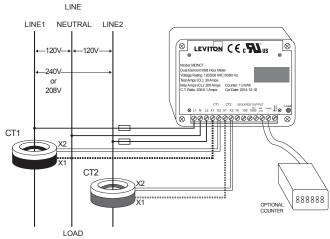
PRODUCT DATA

FEATURES

- Measures kWh
- Conforms to all applicable standards of ANSI C12.1 and C12.20
- Equipped with an isolated pulse output for automated meter reading
- Available in indoor flush mount enclosure
- Available in NEMA 4X indoor/outdoor enclosure packages and Multiple Meter Units (MMUs) from 2-19 meters
- Utilizes revenue-grade 0.5% accuracy class 0.1A secondary solid core current transformers (CTs) and is ANSI C12.20, system accuracy is .5%
- UL/cUL Listed
- California Weights and Measures approved
- Five year warranty



DUAL ELEMENT, MINI METER HOOKUP DIAGRAM



Leviton recommends solid core transformers (CTs) for revenue-grade accuracy. Our 100A and 200A color coded CTs assist with correct installation by indicating phase monitored. Split core CTs are also available upon request for applications where power cannot be interrupted during installation. Our 100-200 Amp Split Core CTs offer +/-1.0% accuracy.

CONFIGURATIONS

AMPERAGES*	PHASE/VOLTAGES
100 and 200A	1Ø/2W - 120V
100 and 200A	1Ø/3W-120/208/240V

* Contact factory for non-US voltage configurations.

* Short circuit protection per NEC and local codes by others

SINGLE ELEMENT, MINI METER HOOKUP DIAGRAM

SPECIFICATIONS

	60 Hz	50 Hz	
Input Configurations*	1PH2W 120VAC 1PH3W 120/240VAC (Split-Phase) 2PH3W 120/208VAC	1PH2W 240VAC	
Supply Voltage Range ¹ (Line to Neutral)	108-132VAC 216-264VAC		
Maximum Input Power	5VA Max	16VA Max	
Line Frequency	60 Hz	50 Hz	
Maximum Rated Current (100A/200A Meters)	Primary: Max rated current +10%, Secondary: 110mA (0.11A)		
Power Factor Range	0.5 lagging to 1.0; 0.866 leading to 1.0		
Accuracy ² From -4 to 122° F (-20 to 50° C)	Meets ANSI C12.20 (class 0.5%) with calibrated Solid Core CTs with a 100mA max output. Meter input burden resistance at 3Ω.		
Meter Operating and Storage Temperature	-4 to 122° F (-20 to 50° C)		
Isolated Outputs	10Wh/pulse, 100Wh/pulse, 1kWh/pulse, reference to isolated common (ISOL COM) terminal, open collector outputs		
Mechanical Counter Output	12V DC mechanical counter, 10 mA max (not isolated, for pre-wiring only) optional		
12V DC Output	Used to power AMR solutions		
Terminal Connections for Mini Meter OEM Module	The rated torque for these terminal blocks is 3.5 lb/in of torque maximum for AMR solutions, solid or stranded 14 to 18 AWG copper wire can be used		
Fixed	18 AWG pre-wired voltage leads and fixed screw terminals for CTs and pulse outputs		

* Neutral must be connected for all configurations

¹ Controlled Environment: normally only non-conductive pollution occurs. Occasionally, however, a temporary conductivity caused by condensation must be expected.

² Accuracy based on Leviton solid core current transformers with 100 mA max output. Meter input burden resistance at 3 Ohms.

ORDERING KEY



SERIES

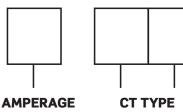
SINGLE/DUAL M - OEM Module ELEMENT S - Single D - Dual

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OUTPUT NC - Counter resolution 0.1 kWh TC - Counter resolution 1 kWh

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OPTION OF RATING **TERMINAL 1** - 100A T - Normal terminal **2** - 200A



SC - Solid Core SP - Split Core NC - No CTs

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LEVITO



ORDERING INFORMATION

CAT. NO.	DESCRIPTION
OEM MODULE S	INGLE PHASE MINI METERS, 0.1kWh, 2W, 120V
MSNCT-1SP	100A LCD Module with 1 Split Core CT included
MSNCT-2SP	200A LCD Module with 1 Split Core CT included
MSNCT-1SC	100A LCD Module with 1 Solid Core CT included
MSNCT-2SC	200A LCD Module with 1 Solid Core CT included
MSNCT-1NC	100A LCD Module without CT
MSNCT-2NC	200A LCD Module without CT
OEM MODULE S	INGLE PHASE MINI METERS 1kWh, 2W, 120V
MSTCT-1SP	100A LCD Module with 1 Split Core CT included
MSTCT-2SP	200A LCD Module with 1 Split Core CT included
MSTCT-1SC	100A LCD Module with 1 Solid Core CT included
MSTCT-2SC	200A LCD Module with 1 Solid Core CT included
MSTCT-1NC	100A LCD Module without CT
MSTCT-2NC	200A LCD Module without CT
OEM MODULE D	UAL ELEMENT MINI METERS 0.1kWh, 3W, 120V
MDNCT-1SP	100A LCD Module with 2 Split Core CTs included
MDNCT-2SP	200A LCD Module with 2 Split Core CTs included
MDNCT-1SC	100A LCD Module with 2 Solid Core CTs included
MDNCT-2SC	200A LCD Module with 2 Solid Core CTs included
MDNCT-1NC	100A LCD Module without CT
MDNCT-2NC	200A LCD Module without CT
OEM MODULE D	UAL ELEMENT MINI METERS 1kWh, 3W, 120V
MDTCT-1SP	100A LCD Module with 2 Split Core CTs included
MDTCT-2SP	200A LCD Module with 2 Split Core CTs included
MDTCT-1SC	100A LCD Module with 2 Solid Core CTs included
MDTCT-2SC	200A LCD Module with 2 Solid Core CTs included
MDTCT-1NC	100A LCD Module without CT
MDTCT-2NC	200A LCD Module without CT

The following products are also part of the Leviton VerifEye line of integrated submetering solutions:

Series 1000 Meters Series 2000 Meters Series 3500 Meters Series 4000/4100 Meters Series 8000 Multi-Point Meters EMH+ Integrated Meter & Hub 0.5% Mini Meters Mini Meters Multiple Meter Units (MMUs) Current Transformers (CTs) BillSuite Building Manager Online (BMO) 3.0

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