

# WORLD'S FIRST "<u>C.T</u>." POWERED LOOP <u>T</u>RANSMITTER NO POWER SUPPLY REQUIRED!



#### **FEATURES:**

- Powered By Your C.T., P.T. or Ext. Powered
- A/V/W/Hz A.C. Signal Powered
- •30-150VAC/0.5-5A Input
- 4-20mA Out/Isolated (See Note #2)
- < 500 Ohm Load (C.T. Powered)
- $\leq 1$ K Ohm Load (Ext. Powered)
- Nuclear, Mil-Spec & Industrial Grades
- Panel or Din Rail Mount
- Optional Display (CTT-3)

## Model CTT-2 DIN-RAIL MOUNT

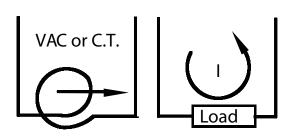


## Model CTT-1 & 3 NEMA 4X WALL/PIPE MOUNT



#### **SPECIFICATIONS**

- •Input Range (C.T. Power): 0.5-5AAC
- •Input Range V, W or Hz: 30-150VAC
- •Accuracy & Linearity: ± 0.5% F.S.
- •Isolation: >2KV, See Note #2
- •Conversion: True RMS
- •Min.-Max. Load: 0-1K Ohms
- •Min-Max V Loop Ext. Power: 7-30V
- •Max. V Out: 24VDC or Ext. Powered
- •Min/Max. I Out: 3-26mA
- •Op/St Temperature:  $-20 + 70/-30 + 80^{\circ}$ C
- •CMBTF: > 100K Hours
- Environmental: NEMA 4X (CTT1 & 3)
- •Warranty: Lifetime (LTD)



-See Our New **DRT/DPT** 

Din Rail and Panel Mount Transmitter with Control and Display

**OTEK's** new "<u>CTT</u>" is a variation of the company's recently introduced <u>ACS</u> Series that brought you the World's First Truly C.T. (<u>Current Transformer</u>) powered instruments to monitor or control A.C. variables (V, A, W & Hz).

Now **OTEK** brings you complete freedom and savings. The "<u>CTT</u>" is 100% powered by your on site 5 Amp <u>C.T.</u>. Just connect your <u>C.T.</u> output to the <u>CTT</u>, your current loop load and eliminate the conduit power supply & wires. The convenient plug-in screw terminal connectors (26-16 Ga), allows for quick installation.

**POWER:** The <u>CTT</u> is powered by your <u>C.T.</u> and just like analog meters, if the <u>C.T.</u> is dead or has below minimum current output, the <u>CTT</u> won't display or transmit. For applications requiring display and transmission, even at no input, order <u>CTT</u> externally (24VDC) powered (Digit 3, Option 1).

The optional <u>display</u> (Option 3) displays the loop value in bright red 4 1/2 LED digits, 0.25" high. Standard calibration is 4-20mA=0-10000 counts. The optional <u>isolator</u> (Option 1, 3<sup>rd</sup> digit) give you >2K V isolation between inputs and loop output and requires >7<32 VDC, plus your load burden.

#### **PACKAGES:**

The DIN Rail (Option 1) is only 1.1" wide x 3.1 H x 3" deep. The Nema 4X (Options 2 & 3) can be wall, panel or pipe (NPT 1/2") mounted, ideal for outdoor installation.

Standard Calibration is 0-0.4A no display, 0.5A = 5.6mA = 625 counts, 5A = 20mA = 10000 counts. Zero and Span pots are included. 4 & 20mA output adjustments are also included. You can mount the <u>CTT</u> next to, or remotely from your 5A C.T. Just consider the wire resistance (0.0040 Ohms/Foot x 2 for 16 Ga.) and the <u>CTT's</u> internal resistance (0.05 Ohm). It works best if you mount the <u>CTT</u> closest to your C.T.

**Note:** The <u>C.T.</u> A inputs are internally fused with a <u>10A</u> fuse. You should fuse your C.T. output at 8A or less. The V, W & Hz are fused internally with a 2A fuse. Use a 1A fuse externally.

If You Don't See It Ask For It!





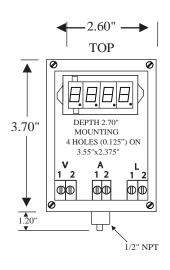
FAX: 520-790-2808 E-MAIL:sales@otekcorp.com http://www.otekcorp.com

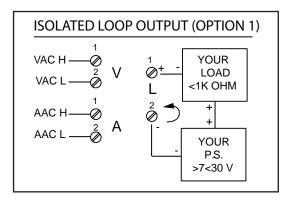


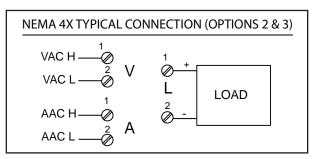


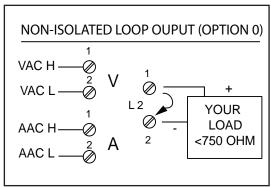
#### CTT MECHANICAL INFORMATION

#### OPTIONS 2 & 3 NEMA 4X

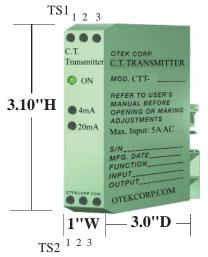


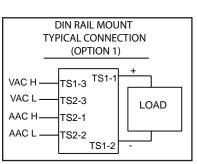


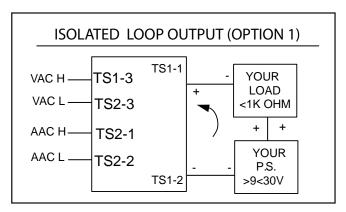


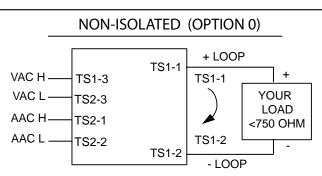


## **OPTION 1 DIN Rail Mount**









http://www.otekcorp.com



#### **CTT ORDERING INFORMATION 2-28-13**

NOTE: Please READ NOTES BEFORE building part number.

#### SIGNAL POWERED TRANSMITTER

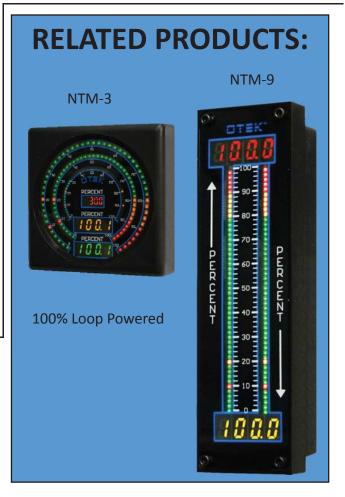
Model: CTT - $\begin{array}{c} 1 \\ \end{array}$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$
HOUSING TYPE & DISPLAY (1, 4)  1	GRADE (5)  -IIndustrial  -MMil-Spec (Contact OTEK)  -NNuclear (Contact OTEK)  -9Custom (Contact OTEK)
INPUT TYPE (2)  AAmps A.C.—  HHertz A. C.—  VVolts A.C.—  WWatts A.C.—  9Custom (Contact OTEK)—	POWER INPUT & ISOLATION LOOP (2, 3)  -0Signal Powered & None  -1Signal Powered & Externally Powered. Isolated Loop  -9Custom (Contact OTEK)

#### **NOTES**:

- 1. Display (NEMA 4X case only) assigned to internal (non-isolated) current loop. See Notes 2 and 3 and text. Use #9 for custom display scale and offset if other than standard (0-FS=0=10000 counts). Decimal points are internally jumper selectable.
- 2. V, W and HZ options (digit 2) are **NOT** isolated from outputs. If choosing no external power on the isolation loop (option 0, digit 3), the customer **MUST** use a potential transformer. Otherwise, choose option 1 for digit 3 and provide external power to the output transmitter (7-32VDC).
- 3. An inherent output dead band of 4mA will be seen for the following inputs: A: < 0.5A; V, Hz and W: <30V.
- 4. Std. Calibration: Loop: A: .5-5A=5.6-20mA; V: 30V-120V=8-20mA; W: (AxV): 15-600W=4.4-20mA; HZ: 30-60=12-20mA; Display: 4-20mA=0-100.00 counts (%) for all. 5. OTEK will build to certain nuclear or MIL-Standards, but testing and confirmation of compliance, if required, will need to be done by a third party and at customer's expense.

### **DOWNLOADS**:

For manuals, user-software or drivers: otekcorp.com/content/support-downloads



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520-748-7900

FAX: 520-790-2808 E-MAIL:sales@otekcorp.com http://www.otekcorp.com



4016 E. TENNESSEE ST. TUCSON, AZ. 85714 U.S.A.

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