



ADTECH

95 Mt. Read Blvd # 149
Rochester, New York 14611 USA

www.adtech-inst.com

NON-ISOLATED SIGNAL CONVERTER- MODEL NO. SCT 00

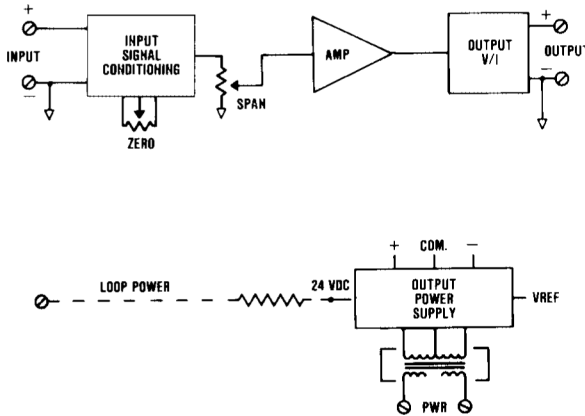
THE ADTECH MODEL SCT 00 NON-ISOLATED SIGNAL CONVERTER PROVIDES ACCURATE AND ECONOMICAL SIGNAL OR IMPEDANCE CONVERSION FROM A CURRENT OR VOLTAGE SOURCE TO ANY STANDARD PROCESS SIGNALS SUCH AS 4-20 MA DC, 1-5 VDC, OR ZERO-BASED OUTPUT WHEN INPUT-TO-OUTPUT ISOLATION IS NOT REQUIRED.

THE SCT 00 PROVIDES STANDARD PROCESS CURRENT OR VOLTAGE SIGNALS ON THE OUTPUT WITH A MAXIMUM OF 110 mV P/P OUTPUT RIPPLE. IT OFFERS A PRACTICAL AND CONVENIENT WAY TO INTERFACE SIGNALS TO A COMPUTER SYSTEM OR OTHER PROCESS INSTRUMENTATION FOR IMPROVED RESOLUTION.

A COMMON APPLICATION IS TO PROVIDE ADDITIONAL AMPLIFICATION OR DRIVE TO A PROCESS SIGNAL LOOP.

ZERO AND SPAN CONTROLS ARE PROVIDED BY TWO SEPARATE INFINITE RESOLUTION POTENTIOMETERS. RECALIBRATION TO OTHER RANGES IS CONVENIENT.

THE SCT 00 EMPLOYS THE LATEST DESIGN AND COMPONENTS UTILIZING PROVEN TECHNIQUES FOR THE UTMOST IN RELIABILITY, ACCURACY, AND SERVICEABILITY.



TYPICAL APPLICATIONS

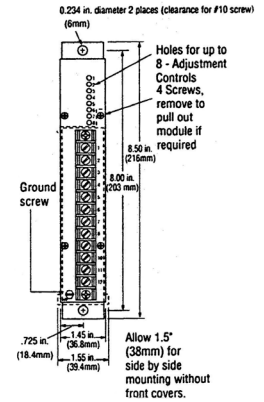
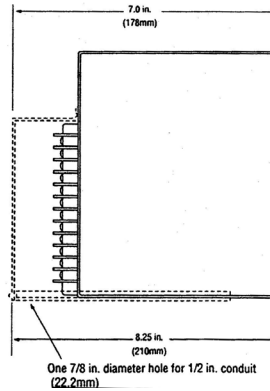
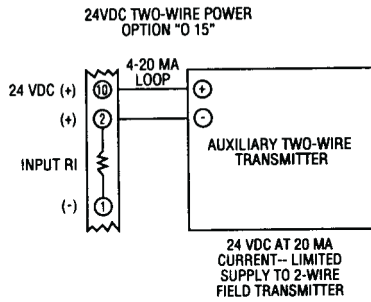
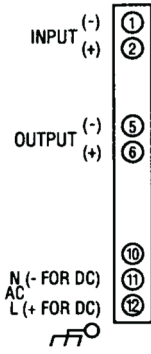
- SIGNAL CONVERSION
- SIGNAL REPEATER
- IMPEDANCE CONVERSION
- REVERSE CALIBRATION LINEAR INVERTER

FEATURES

- DC CURRENT INPUTS: 4-20 MA, ETC.
- DC VOLTAGE INPUTS: 1-5 VDC, ETC.
- HIGH INPUT IMPEDANCE: 10 MEGOHMS MINIMUM
- ZERO-BASED INPUTS: CURRENT AND VOLTAGE
- LOW IMPEDANCE CURRENT INPUTS: 1/10-OPTIONAL
- DC PROCESS SIGNAL OUTPUTS: CURRENT AND VOLTAGE
- REPEATABILITY: $\pm 0.02\%$ OF SPAN -TYPICAL
- HIGH ACCURACY: $\pm 0.1\%$ OF SPAN
- REVERSE CALIBRATION LINEAR INVERTER: OPTIONAL



CONNECTIONS / DIMENSIONS



INPUT/OUTPUT

INPUT SIGNALS (ANY MIX. 2 SIGNALS)
 4-20 MA DC (Z IN 250 OHMS)
 10-50 MA DC (Z IN 100 OHMS)
 0-1 MA DC (Z IN 5K OHMS)
 0-10 MA DC (Z IN 500 OHMS)
 1-5 VDC (Z IN 10 MEGOHMS)
 0-5 VDC (Z IN 10 MEGOHMS)
 0-10 VDC (Z IN 1 MEGOHM)
 OTHER ZERO-BASED CURRENT AND VOLTAGES ARE AVAILABLE.

	OUTPUT SIGNALS/ OUTPUT DRIVE (RL)	
	SIGNAL	AC POWER (RL) DC POWER (RL)
	4-20 MA DC	0-1,000 OHMS MAX. 0-900 OHMS MAX.
	10-50 MA DC	0-400 OHMS MAX. 0-350 OHMS. MAX.
	0-1 MA DC	0-20,000 OHMS MAX. 0-18,000 OHMS MAX.
	1-5 VDC	100K OHMS MIN. 100K OHMS MIN.
	0-10 VDC	200K OHMS MIN. 200K OHMS MIN.

PERFORMANCE

CALIBRATED ACCURACY: $\pm 0.1\%$
 LINEARITY: $\pm 0.1\%$ MAXIMUM. $\pm 0.04\%$ TYPICAL
 REPEATABILITY: $\pm 0.05\%$ MAXIMUM
 TEMPERATURE STABILITY: $\pm 0.01\%$ / °F MAXIMUM, $\pm 0.004\%$ / °F TYPICAL
 LOAD EFFECT: $\pm 0.01\%$ ZERO TO FULL LOAD
 OUTPUT RIPPLE: 10 MV P/P MAXIMUM
 RESPONSE TIME: 150 MILLISECONDS
 TEMPERATURE RANGE: 0° TO 140 °F (-18° TO 60 °C) OPERATING; -40° TO 185 °F (-40° TO 85 °C) STORAGE
 POWER SUPPLY EFFECT: $\pm 0.05\%$ FOR A $\pm 10\%$ POWER VARIATION
 NOTE: ALL ACCURACIES ARE GIVEN AS A PERCENTAGE OF SPAN.

POWER

115 VAC: 50/60 HZ, 0.7 PF (STANDARD)	48 VDC: ISOLATED	(OPTION P3)
12 VDC: ISOLATED (OPTION P8)	125 VDC: ISOLATED (105-140 VDC)	(OPTION P4)
24 VDC: NON-ISOLATED (OPTION P1)	230 VAC: 50/60 HZ, 0.7 PF	(OPTION P5)
24 VDC: ISOLATED (OPTION P2)		

NOTE: ALL UNITS 3 WATTS MAXIMUM. AND $\pm 10\%$ POWER VARIATION UNLESS NOTED.

MECHANICAL

ELECTRICAL CLASSIFICATION: GENERAL PURPOSE	MOUNTING: SURFACE MOUNTING STANDARD. SEE HOUSINGS SECTION FOR OPTIONS.
CONNECTION: BARRIER TERMINAL STRIP (3/8" SPACING, NO. 6 SCREWS)	WEIGHT: NET UNIT: 2.6 POUNDS (1.18 KILOGRAMS); SHIPPING: 3.0 POUNDS (1.36 KILOGRAMS)
CONTROLS: MULTITURN ZERO AND SPAN CONTROLS	

OPTIONS

OPTION NUMBER	DESCRIPTION
I 14	VOLTAGE INPUTS TO 200 VDC, 1 MEGOHM MIN. IMPEDANCE; CURRENT INPUTS OF 100 MA MAX.
I 18	LOW IMPEDANCE DC CURRENT INPUT [1/10 OF STANDARD (Z)]
O 12	REVERSE CALIBRATION
O 15	TWO-WIRE TRANSMITTER EXCITATION
H 10	THIN-LINE CONDUIT MOUNTING PLATE AND TERMINAL COVER
H 13B, H 14B, H 15B	NEMA 4.7, AND 12 ENCLOSURES
H 16	PFA 12 HIGH-DENSITY, PLUG-IN ENCLOSURES

Ordering Information

- Model number
- Input signal
- Output signal
- Prime power with option no.
- Input/output options
- Housing and miscellaneous options

Please refer to the Housing and/or Option Section for more specific and detailed information.