

10748-01 and 10748-03 4-20mA Analog Signal Conditioner

ZERO and SPAN adjustments make it easy to calibrate to almost any measurement range, with little interaction between the adjustments. The converter will accept frequency input from any mag pickup or digital pickup (digital mag, RF, Hall effect, zero speed, "smart" etc..."

SPECIFICATIONS

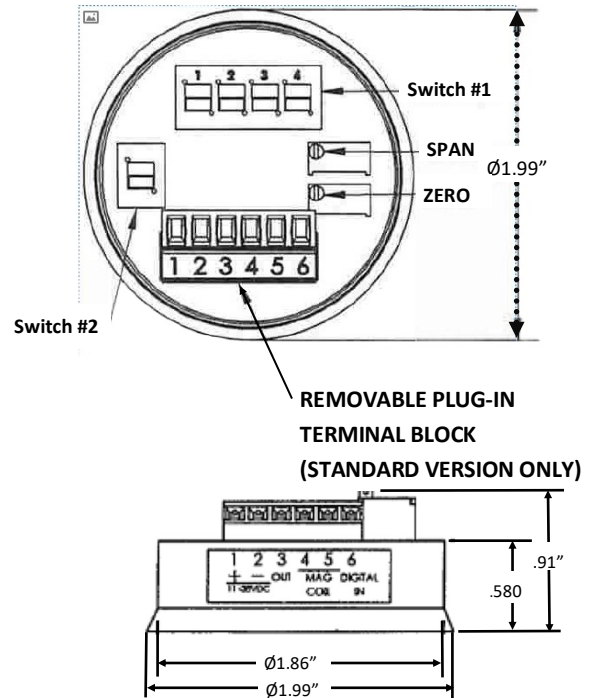
- Vs. Supply Voltage:** 9.0 VDC Min. 0-5V Out, FTV
11.0 VDC Min. 0-10V Out,
9-38.0 VDC Max 4-20mA
- Input Protection:** 50 VAC, reversed leads
- Output Protection:** Short to + VDC, Common or
Signal out Continuous
- Frequency Input Range:** FHI: 1100 Hz to 10 kHz
FLO: 75 Hz to 1100 Hz
- Input Sensitivity:** Mag: See Variants
Digital: CMOS/TTL (30Vpp Max)
- Output Setting Time:** Full Scale Change to 95%
of final value 180ms
- Output Ripple & Noise:** 5mVp-p, <2 mvms, 5% of FS
- Temperature Coefficient:** 0.13% / °C, On 10V range(25°-40°)
- Operating Temp. Range:** -40-70°C (-40-160°F)
- Zero/Span Adjustment Interaction:** <1%
- Terminal Connections:**
 1. Input VDC
 2. Common
 3. Signal Out
 4. Mag Pick-Up
 5. Mag Pick-Up
 6. Digital Signal Input
- CE Compliance:** EN55011, EN50022-2



PART NUMBERS

- M2 5mVpp [Mag] & Digital Input
- M3 50mVpp [Mag] & Digital Input

Explosion Proof: 90010-03: Y3, CL1, DIV1, Enclosure

Junction Boxes: 90012-03: ELBY 100, CL1, DIV1, Enclosure



SWITCH #1					SWITCH #2
	Position #1	Position #2	Position #3	Position #4	Position #1
	Current Mode	10-50 mA	0-5V	F High	Digital
	Voltage Mode	4-20 mA	0-10 V	F Low	Mag. Coil

*NOTE: Black Box indicates position switch high side

VOLTAGE MEASUREMENT SPECIFICATIONS		
	0-5V Range	0-10V Range
Vout min. (Freq. input = 0Hz) @ full scale max freq. cal.	5.1 mV	10.5 mV
Vout min. @ full scale min freq. cal.	21 mV	43 mV
Vout max @ volt supply = +12VDC	21mV	43mV
Vout max @ volt supply = +12VDC	6.8V	11.3V
Minimum Load Resistance	50Ω, 1/2W	100Ω, 1W
Maximum Load Resistance	Open	Open

CURRENT MEASUREMENT SPECIFICATIONS		
3-WIRE OUTPUT VERSION	4-20 mA	10-50 mA
Minimum Output Current	0.07 mA	0.19 mA
Maximum Output Current	24.1 mA	61.2 mA
Load Resistance if: V+ =24V if V+ = 12V	<300Ω <900Ω	<120Ω <360Ω