

# OEM Series: Cable-Extension Position Transducer

## Incremental Encoder Output

Ranges: 0-1000 to 0-1250 mm

Compact Size • OEM Applications

# A125

### Specification Summary:

#### GENERAL

Full Stroke Ranges.....	0-1000 & 0-1250 mm
Spool Circumference.....	.125 mm
Output Signal.....	incremental (quadrature) encoder
Accuracy.....	+0.04% of F.S.
Repeatability.....	+0.02% of F.S.
Resolution.....	.0.8 to 20 pulses per mm*
Measuring Cable.....	0.034-in dia. nylon-coated stainless steel
Optional Measuring Cable.....	0.040-in. dia. thermoplastic
Sensor.....	incremental optical encoder
Frame Material.....	zinc-plated steel
Weight, max.....	1 lb.

#### ELECTRICAL

Encoder Output Driver Options.....	TTL-CMOS, open collector and line-driver
Output Channels.....	A, B and index (with and without compliments)*
Input Voltage.....	4.5 to 26.4 VDC*
Current Consumption.....	80 mA max.*
Sink Current.....	20 mA max.*

#### ENVIRONMENTAL

Operating Temperature.....	-10°C to +70°C
Storage Temperature.....	-30°C to +80°C
Humidity.....	RH 85%, no condensation
Vibration.....	10 ~ 55 Hz / 1.5 mm 2 hr.
Shock.....	30 G 11ms (X,Y, Z each 3 times)

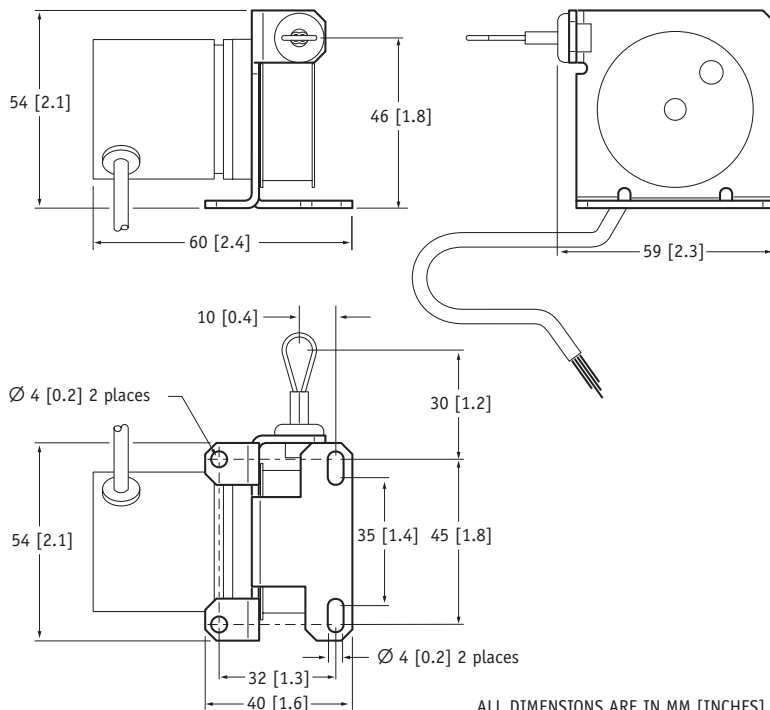
\*specifications may vary with configuration, please consult factory



The A125 Cable-Extension Transducer is an optical encoder-based compact, flexible and highly accurate position feedback transducer.

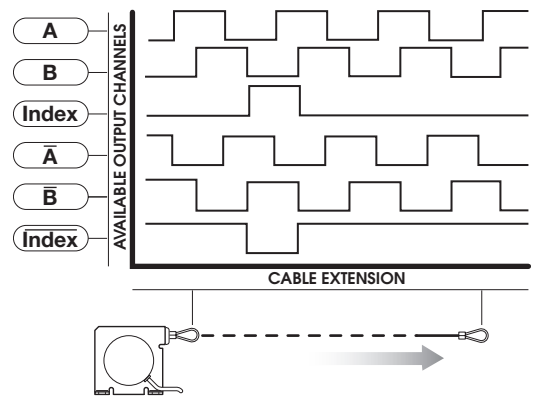
The standard A125 can be simply modified to meet specific OEM requirements. Just about any encoder type can be used for your specific requirement. Designs are available for new applications or as drop-in replacements of current assemblies. You can specify custom mounting, custom electrical connections and even customer-specified life testing. Quantities are available as small as 100 units.

### Outline Drawing



ALL DIMENSIONS ARE IN MM [INCHES]

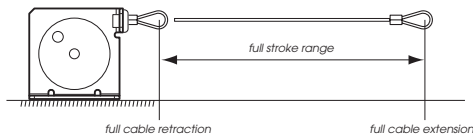
### Output Signal



**Order Form • Application Worksheet**

**Application** please provide a brief description of application. include exact stroke range, velocity of stroke and estimated number of cycles per year.

**Full Stroke Range** select available range or specify complete requirements



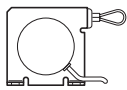
- 1000 mm
- 1250 mm
- other:

**Measuring Cable**

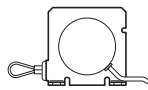


- 0.034" dia. nylon-coated stainless steel
- 0.040" dia. thermoplastic

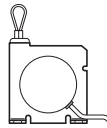
**Measuring Cable Exit**



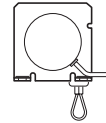
front



rear



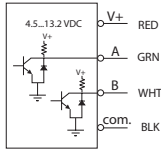
up



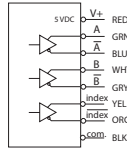
down

**Encoder**

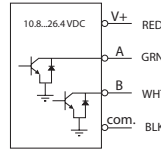
TTL - CMOS compatible



line driver



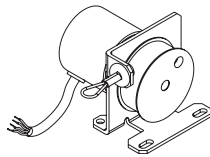
open collector



**Resolution**

- 0.8 pulses per mm
- 8 pulses per mm
- 16 pulses per mm
- 20 pulses per mm

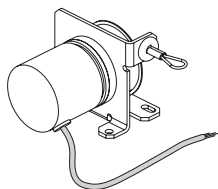
**Enclosure** select no cover or specify custom enclosure requirements



no cover

custom enclosure:

**Electrical Connection**



without connector

with connector

cable length:

connector

manufacturer:

manufacturer's part no.:

version: 1.0 last updated: April 14, 2005