

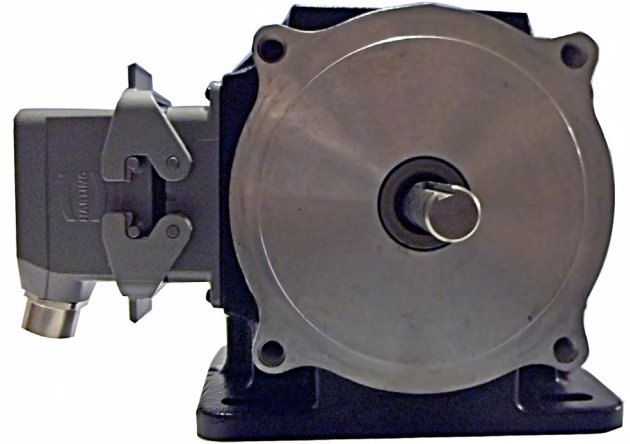
SERIES R56

NorthStar™ brand

Heavy Duty Resolver

Key Features

- Harowe Resolver in NorthStar Housing
- Large Outer Bearings Isolate Shaft Loads
- Foot Mount or 56C Face Mount
- Excellent Zero-Speed Output
- Suitable Replacement for the Reliance Automax Resolvers 800123-R, 800123-S, 800123-1R and 800123-1S



SPECIFICATIONS

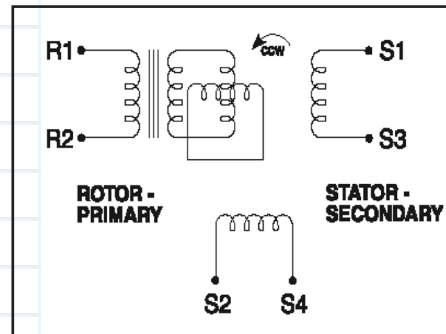
STANDARD OPERATING CHARACTERISTICS

ELECTRICAL	One Speed Winding	Two Speed Winding
Sensing Method	Sine/Cosine	Sine/Cosine
Electrical Cycles	1	2
Excitation	26 ±5% Vrms 2.4 kHz	26 ±5% Vrms 2.4 kHz
Input Current	22 Max mA Arms	45 Max mA Arms
Null Voltage	25 Max mVrms	25 Max mVrms
Position Error	±10 ArcMin	10 ArcMin Max
DC Resistance (R1-R2)	255 Ohms ±15%	190 Ohms ±15%
DC Resistance (S1-S3 and S2-S4)	176 Ohms ±15%	322 Ohms ±15%
Transformation Ratio	0.454 ±10%	0.454 ±10%
Phase Shift	6 degrees	18 degrees
Dielectric Strength to Case	500 VAC w/2 Max mA Arms	500 VAC w/2 Max mA Arms
Dielectric Strength to Phase to Phase	250 VAC w/2 Max mA Arms	250 VAC w/2 Max mA Arms

ELECTRICAL CONNECTIONS

Signal	Pin
R1 – Rotor Hi	1
R2 – Rotor Lo	2
S1 – Cos Hi	3
S3 – Cos Lo	4
S2 – Sin Hi	5
S4 – Sin Lo	6

SCHEMATIC



MECHANICAL

Shaft Size: 5/8" stainless steel, 56C NEMA style; single or dual shaft
Shaft Loading: 100 lbs. radial, 50 lbs. axial
Shaft Speed: 3600 RPM max.
Mounting: Foot mount; NEMA 56C face mount
Connector: Industrial 10pin latching connector
Weight: 11 lbs. max.

ENVIRONMENTAL

Operating Temperature: –40 to +120°C
Storage Temperature: –40 to +130°C
Shock: 50 G's for 11 milliseconds duration
Vibration: 5 to 2000 Hz at 10 G's
Humidity: to 98% without condensation
Enclosure Rating: IP65 (dust proof, washdown)

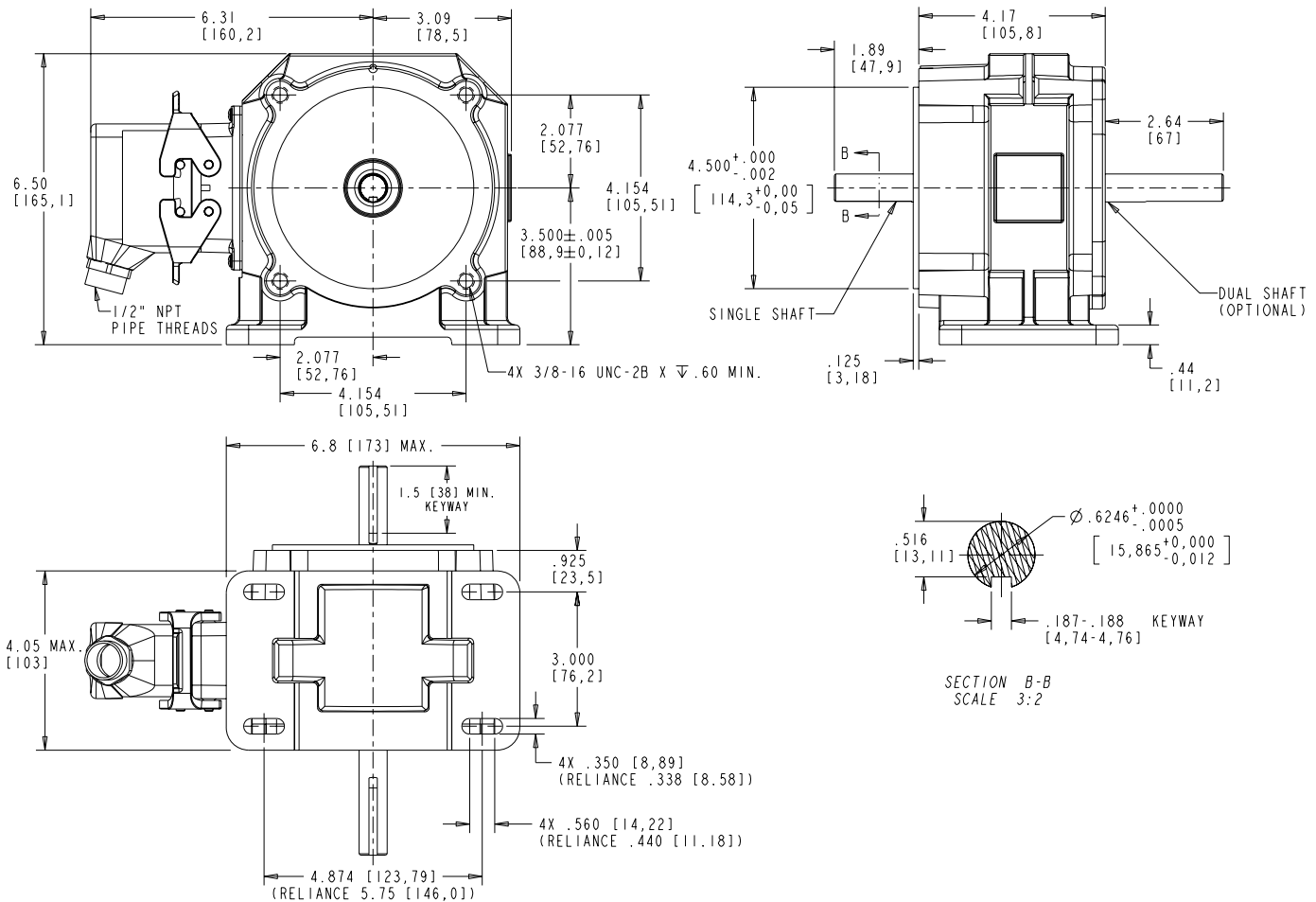
Ordering Information

To order, complete the model number with code numbers from the table below:

Code 1: Model	Code 2: Resolver Speed	Code 3: Shaft	Code 4: Termination
R56	—	□	□
Ordering Information			
R56 Foot Mount or NEMA 56C Face Mount Resolver	1	S Single	L Latching Industrial Connector
	2	D Dual Shaft	

DIMENSIONS inches [mm]

Tolerances: XXX ±0.010; XX ±0.02



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