

HT23-394

NEMA 23 High Torque Step Motor



Product Features

- 2-phase hybrid step motor
- High torque design
- Standard NEMA 23 dimensions
- Series or parallel wiring



Description

Product Description:

The HT23-394 stepper motor is no longer available. The recommended replacement motor is the [HT23-594](#).

The HT23-394 stepper motor is a two-phase hybrid step motor with a NEMA 23 frame size. It is terminated with 8 motor leads, meaning it can be connected in a few different ways including bipolar series and bipolar parallel.

Specifications

Part Number:	HT23-394
Frame Size:	NEMA 23
Motor Type:	High torque
Part Number w/Double Shaft:	HT23-394D
Part Number w/Encoder:	HT23-394D-ZAA
Motor Length:	1.61 inches
Number of Lead Wires:	8
Lead Wire Configuration:	flying leads, no connector
Lead Wire/Cable Length:	18 inches inches
Lead Wire Gauge:	22 AWG
Unipolar Holding Torque:	54.2 oz-in
Bipolar Holding Torque:	76.7 oz-in
Step Angle:	1.8 deg
Bipolar Series Current:	1.41 A/phase
Bipolar Series Resistance:	2.8 Ohms/phase
Bipolar Series Inductance:	5.6 mH/phase
Bipolar Parallel Current:	2.83 A/phase
Bipolar Parallel Resistance:	0.7 Ohms/phase
Bipolar Parallel Inductance:	1.4 mH/phase
Unipolar Current:	2 A/phase
Unipolar Resistance:	1.4 Ohms/phase
Unipolar Inductance:	1.4 mH/phase
Rotor Inertia:	1.70E-03 oz-in-sec ²
Integral Gearhead:	No
Weight:	1.0 lbs
Storage Temperature:	-40 to 70 °C

Operating Temperature:	-20 to 50 °C
Insulation Class:	Class B (130 °C)
Shaft Run Out:	0.002 inch T.I.R. max
Radial Play:	0.001 inch max w/ 0.1 lb load
End Play:	0.003 inch max w/ 2.2 lb load
Perpendicularity:	0.003 inches
Concentricity:	0.003 inches

Downloads

Datasheet:	http://s3.amazonaws.com/applied-motion-pdf/HT23-394.pdf
2D Drawing:	 HT23-394_RevE.pdf
	 HT23-394D-ZAA_RevA.pdf
3D Drawing:	 23HT39D.igs
	 HT23_39mm_w_ZAA_encoder.igs
Speed-Torque Curves:	 ST_speed-torque.pdf

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