

# 1.8° Size 28mm High Torque Hybrid Stepping Motor

Item	Specifications
Step Angle	1.8°
Step Angle Accuracy	±5% (full step, no load)
Resistance Accuracy	±10% @20°C
Inductance Accuracy	±20% @1kHz
Temperature Rise	80° C Max.(rated current,2 phase on)
Ambient Temperature	-20° C~+50° C
Insulation Resistance	100M Ω Min. ,500VDC
Dielectric Strength	500VAC for one minute
Shaft Radial Play	0.02Max. (450 g-load)
Shaft Axial Play	0.08Max. (450 g-load)
Max. radial force	28N (20mm from the flange)
Max. axial force	10N

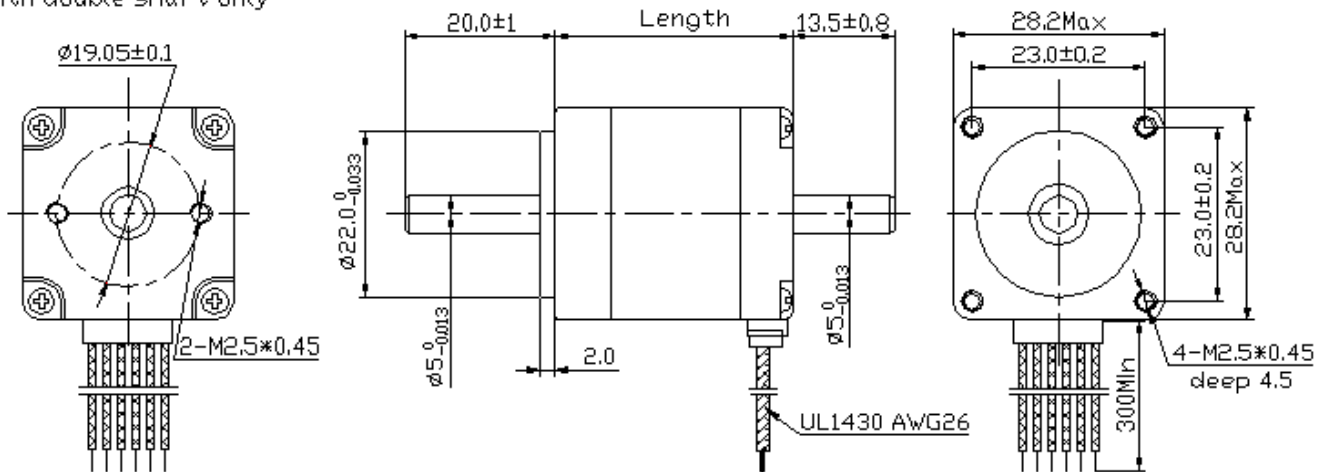


## ● Size 28mm High Torque Hybrid Stepping Motor Specifications

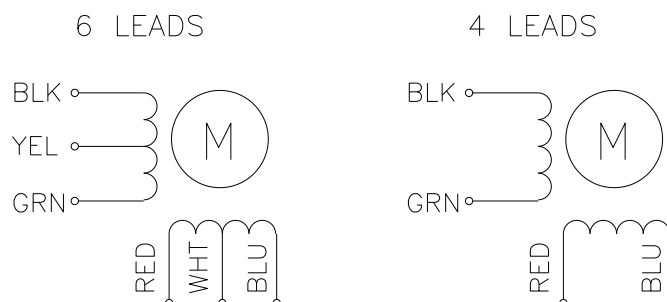
Model No.		Rated Voltage	Current /Phase	Resistance /Phase	Inductance /Phase	Holding Torque	# of Leads	Rotor Inertia	Weight	Length (Max)
Single Shaft	Double Shaft	V	A	Ω	mH	g. cm		kg-m <sup>2</sup>	kg	mm
MST110A163L6AA1.0	MST110A313L6AA1.0	2.66	0.95	2.8	0.8	430	6	9x10 <sup>-7</sup>	0.11	32
MST110A163L3AA0.7	MST110A313L3AA0.7	3.8	0.67	5.6	3.4	600	4			
MST111A163L6AA1.0	MST111A313L6AA1.0	3.4	0.95	3.4	1.2	750	6	12x10 <sup>-7</sup>	0.14	45
MST111A163L3AA0.7	MST111A313L3AA0.7	4.56	0.67	6.8	4.9	950	4			
MST114A163L6AA1.0	MST114A313L6AA1.0	4.4	0.95	4.6	1.8	900	6	18x10 <sup>-7</sup>	0.2	51
MST114A163L3AA0.7	MST114A313L3AA0.7	6.2	0.67	9.2	7.2	1200	4			

## ● Dimension

with double shaft only



## ● Wiring Diagram:

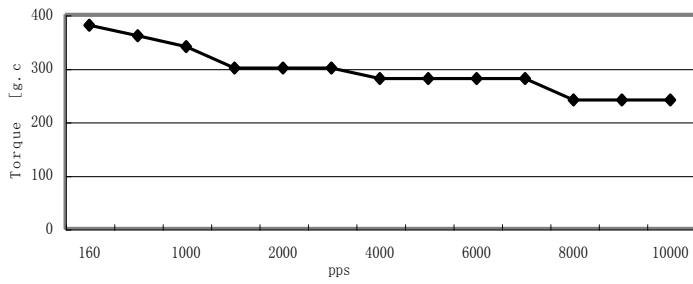


# Pull out torque:

# A5

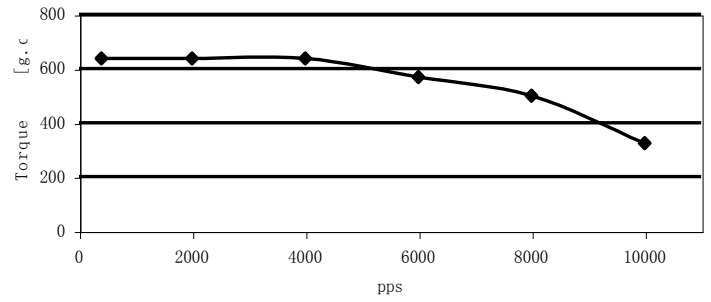
### MST110A163L6AA1.0

VM:24VDC;0.95A/Phase() Driver:M415B, half step



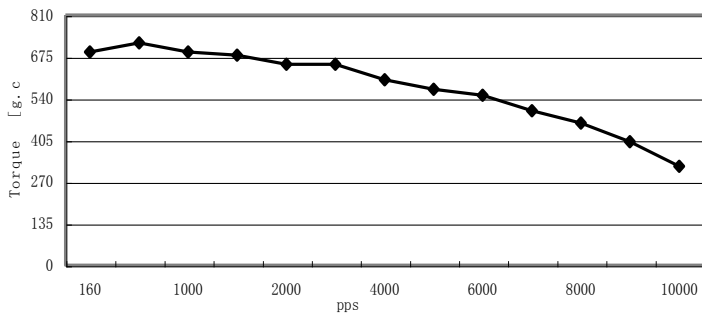
### MST110A163L3AA0.7

VM: 24VDC; 0.74A /Phase () Driver: M415B, half step



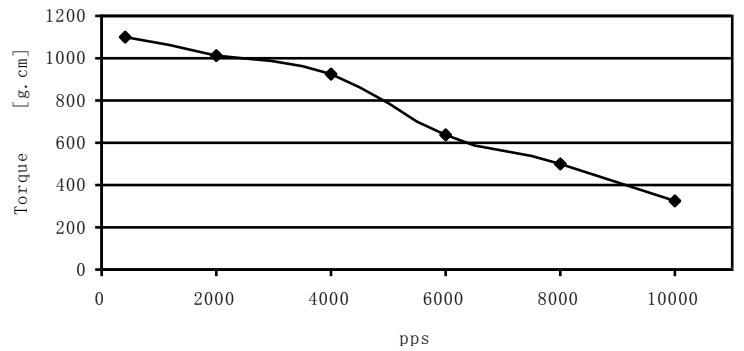
### MST111A163L6AA1.0

VM:24VDC;0.95A/Phase() Driver:M415B, half step



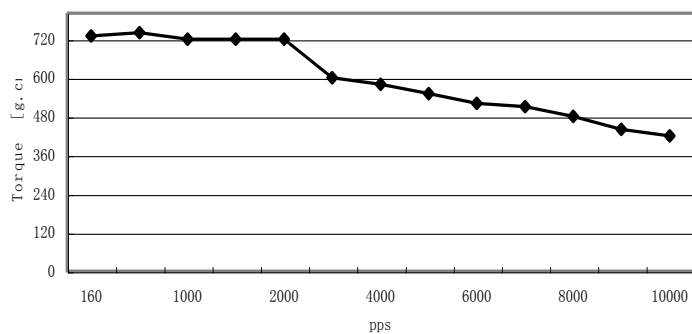
### MST111A163L3AA0.7

VM: 24VDC; 0.74A /Phase () Driver: M415B, half step



### MST114A163L6AA1.0

VM:24V;0.95A/Phase() Driver:M415B, half step



### MST114A163L3AA0.7

VM: 24V; 0.74A /Phase () Driver: M415B, half step

