

Model	Matching Drivers
35HS01	M422
39HS02	M422
42HS03	M422
57HS09	M542
57HS13	M542
57HS22	M542
86HS35	MA860H/M880A/M542
86HS45	MA860H/M880A
86HS85	MA860H/M880A
86HS120	MA860H/M880A
110HS12	DM1182/DM2282
110HS20	DM1182/DM2282
110HS28	DM1182/DM2282
130HS27	DM1182/DM2282
130HS33	DM1182/DM2282
130HS40	DM1182/DM2282
130HS45	DM1182/DM2282
573S09	3DM580/3DM683
573S15	3DM580/3DM683
863S22	3DM683/3DM580
863S42	3DM683/3DM580
863S68H	3DM683/3DM580



## 57 Series 3-phase Stepping Motors



### General Specifications

Step Angle Degree	+5%(full step, no load)
Temperature Rise	80°CMax
Ambient Temperature	-10°C -- +50°C
Insulation Resistance	100MΩmin.500VDC
Dielectric Strength	500VAC for one minute
Shaft Radial Play	0.06 Max.(450g-load)
Shaft Axial Play	0.08 max.(450g-load)

### Electrical Specifications

Model No.	Step Angle (°)	Holding Torque N.m	Current /phase A	Inductance /phase mH	Resistance /phase Ohm	# of leads	Rotor Inertia g.cm <sup>2</sup>	Detent Torque N.cm	Motor Weight Kg	Motor Length L mm
573S05	1.2	0.45	5.2	1.4	1.3	6	110	2.1	0.45	42
573S09	1.2	0.9	3.5	1.7	1.3	6	200	4.0	0.6	50
573S15	1.2	1.3	5.8	1.35	0.7	6	400	6.8	1.0	76

\* Above motors are our typical models, and if you need a customization motor, please contact us.

### Mechanical Specifications

Dimensions are in millimeters and 1 inch=25.4mm.

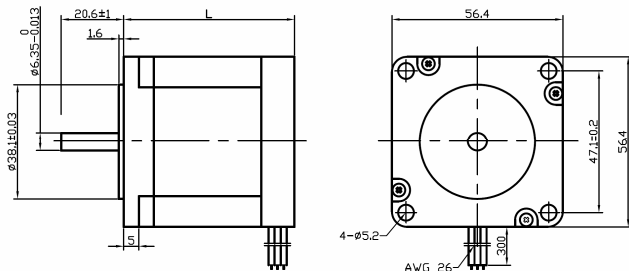


Figure 1: Mechanical specifications of 573S05

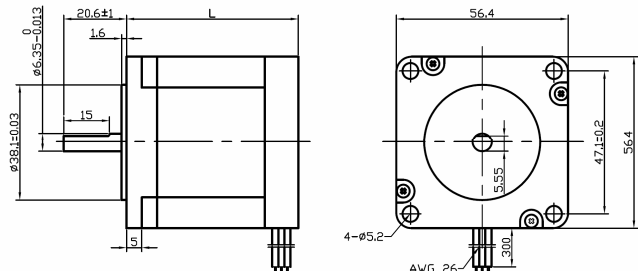


Figure 2: Mechanical specifications of 573S09

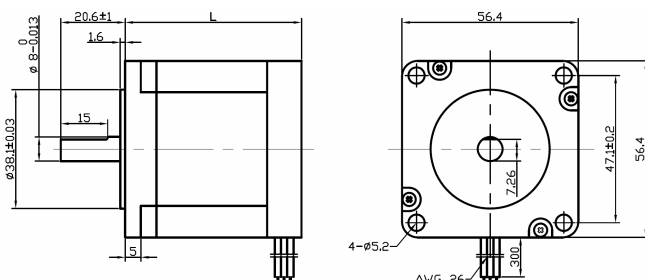


Figure 3: Mechanical specifications of 573S15



## Wiring Diagrams

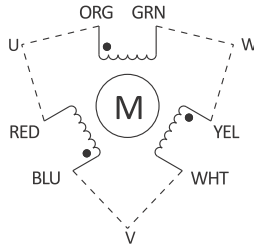


Figure 4: Wiring diagram of the 573S05

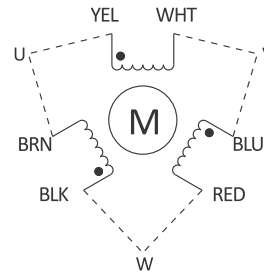


Figure 5: Wiring diagram of the 573Sxx

## Speed-Torque Characteristics

Speed-torque curves show the maximum torques that can be output at a given speed. When selecting a motor, make sure the required torque falls within the particular curve.

### • 573S05

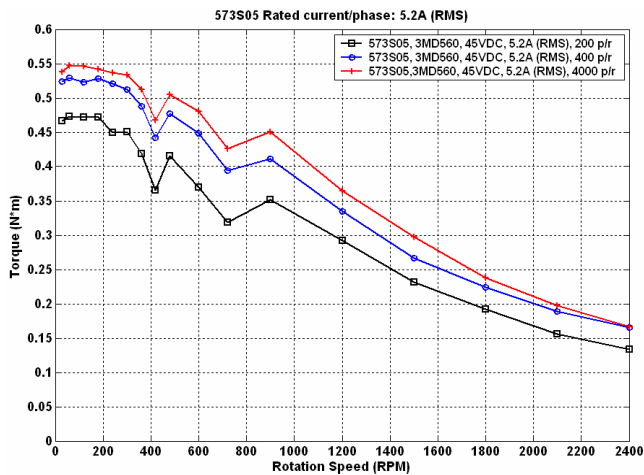


Figure 6: Speed-torque curves of the 573S05

### • 573S09

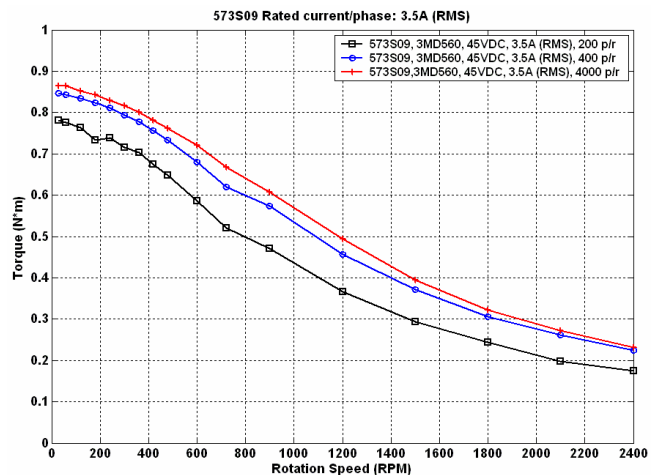


Figure 7: Speed-torque curves of the 573S09

### • 573S15

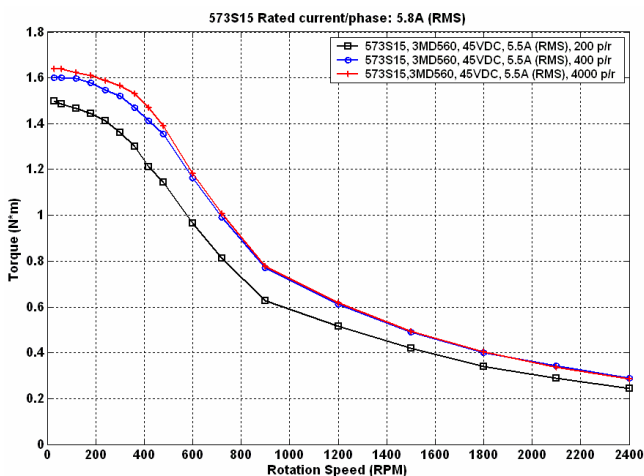


Figure 8: Speed-torque curves of the 573S15

### Remarks:

1. Title "573S05 Rated current/phase: 5.2A (RMS)" means "The rated current/phase of the 573S05 is 5.2A (RMS)".
2. Legend "573S05, 3MD560, 45VDC, 5.2A (RMS), 200p/r" means "This speed-torque curve of the 573S05 was done with the 3MD560 driver. The settings of the 3MD560 are 5.2A (RMS), resolution is 200 pulses per revolution and use 45VDC power supply".
3. The actual characteristics will vary depending on the driver used. Please use these curves only for reference purposes when selecting a motor. You must also conduct a thorough evaluation with the actual driver to be used. Please consult Leadshine Motor and Driver Packages for more information about this issue.

