

SERVO MOTOR

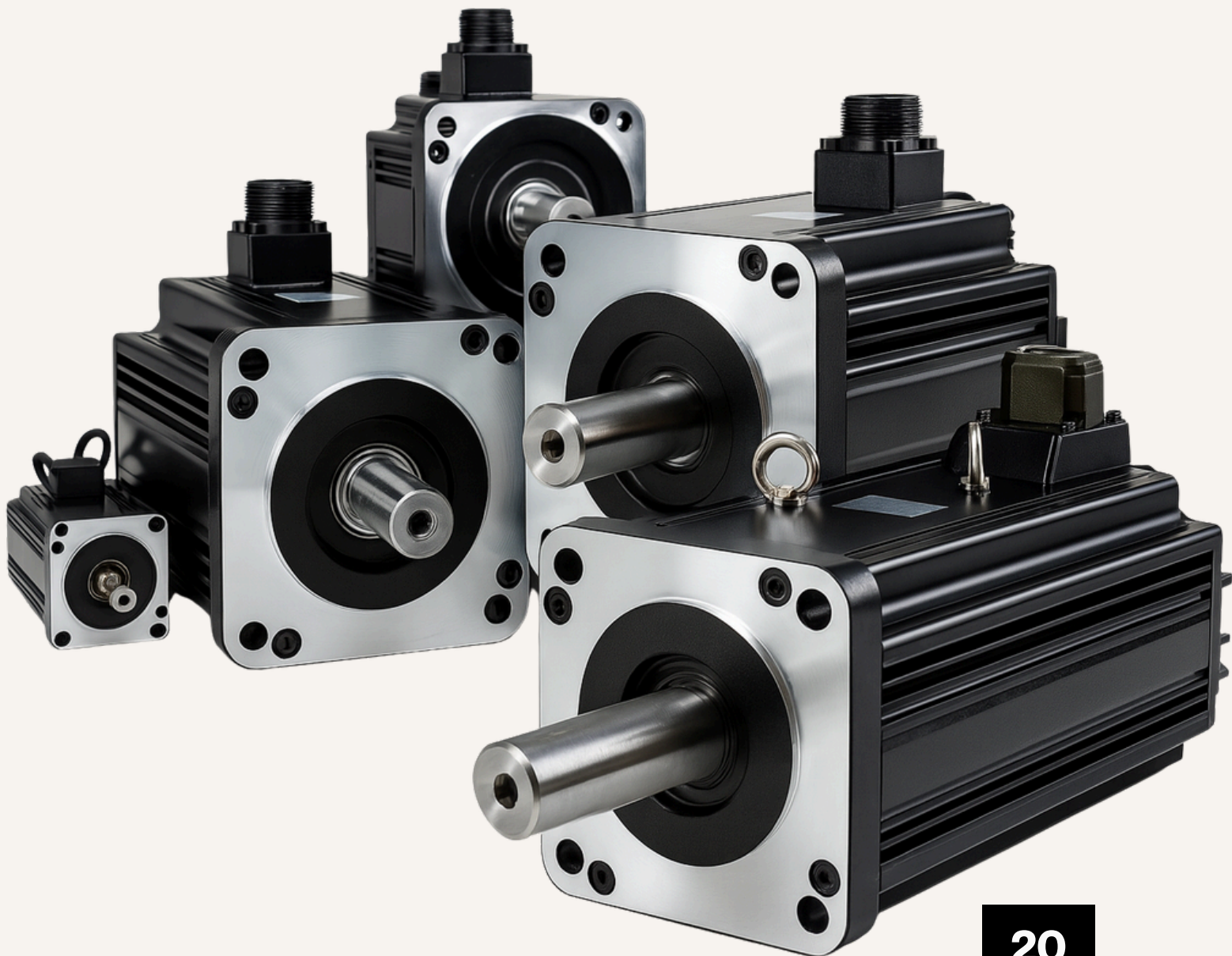


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Servo Application

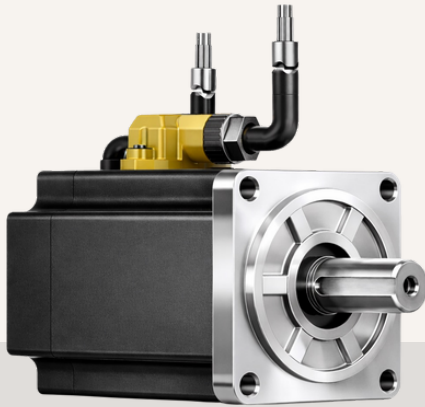
Our advanced servo motors are built to power a wide range of defense applications, from gimbals and two-axis positioners to auto-levelling jacks, remote-controlled weapon systems, and radars. Every motor is fully customizable to meet mission-critical needs — whether it's motor voltage, torque, pole pairs, shafts, connectors, or integration with specialized encoders. With precision-engineered gearboxes and complete design flexibility, we deliver servo solutions that ensure reliability, accuracy, and performance in the most demanding environments.



100 W Servo



200 W Servo



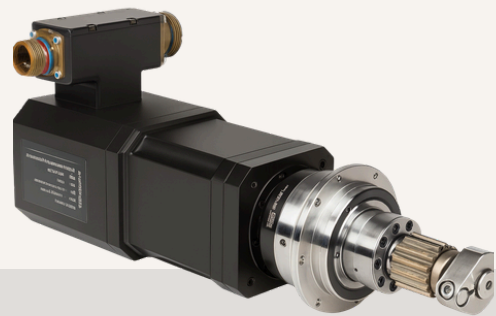
400 W servo



750 W servo

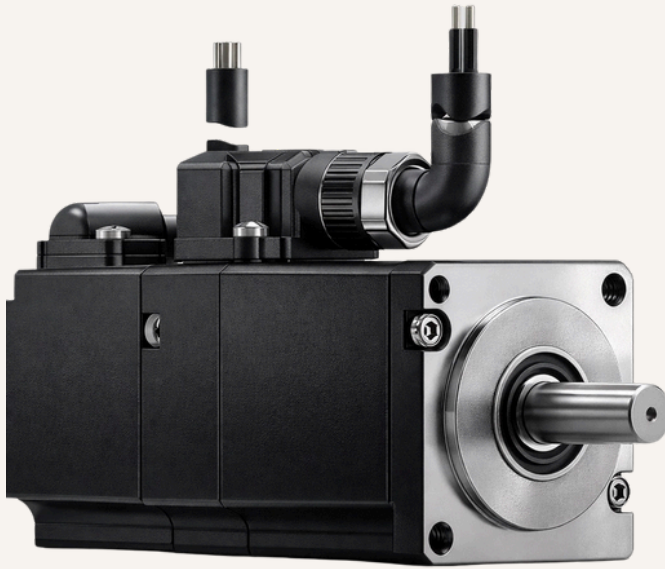


1000 W Servo



Custom design

Servo Motor 100 W



Rated voltage	48V DC
Rated Current	3.5 Arms
Rated Power	100 W
Rated Torque	0.32 Nm
Rated Speed	3000 rpm
Peak current	7 Arms
Peak Torque	0.64 Nm
Max speed	3200 rpm
Poles Pair	5

Torque Constant	0.09 Nm/Arms
EMF	5.7 V/Krpm
L-L resistance	1.2 Ohm
L-L inductance	1.0 mH
Inertia	0.06 Kg.sq. m x 1e-4

Encoder Type	Incremental
Resolution	2500 ppr
Hall Sensor	Yes

IP Level	IP 54
Insulation	Class F
Weight	530 gram
Environmental temp	-40 to 85 deg. Cel
U, V, W, PE	RED, BLU, BLK, G/Y

Encoder Signal

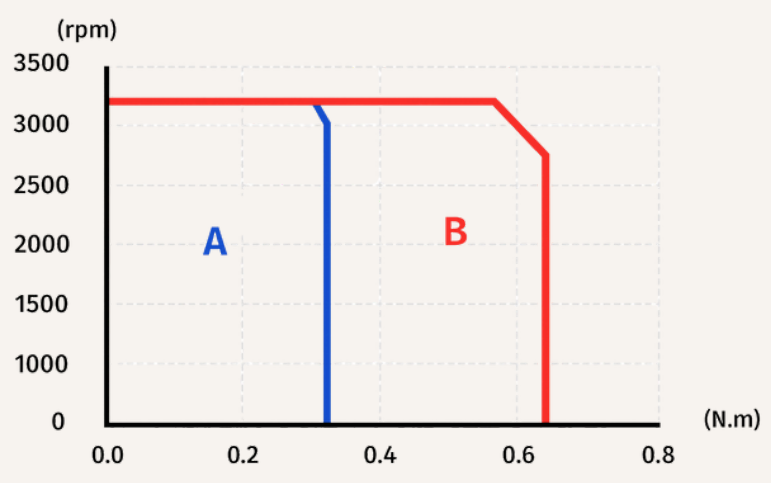
Pin No	Colour	Signal
2	Red	5V
3	Black	0V
9	Blue	A+
13	Blue/Black	A-
4	Green	B+
14	Green/Black	B-
7	Yellow	Z+
5	Yellow/Black	Z-
1	Silver	Shield

Hall Sensor

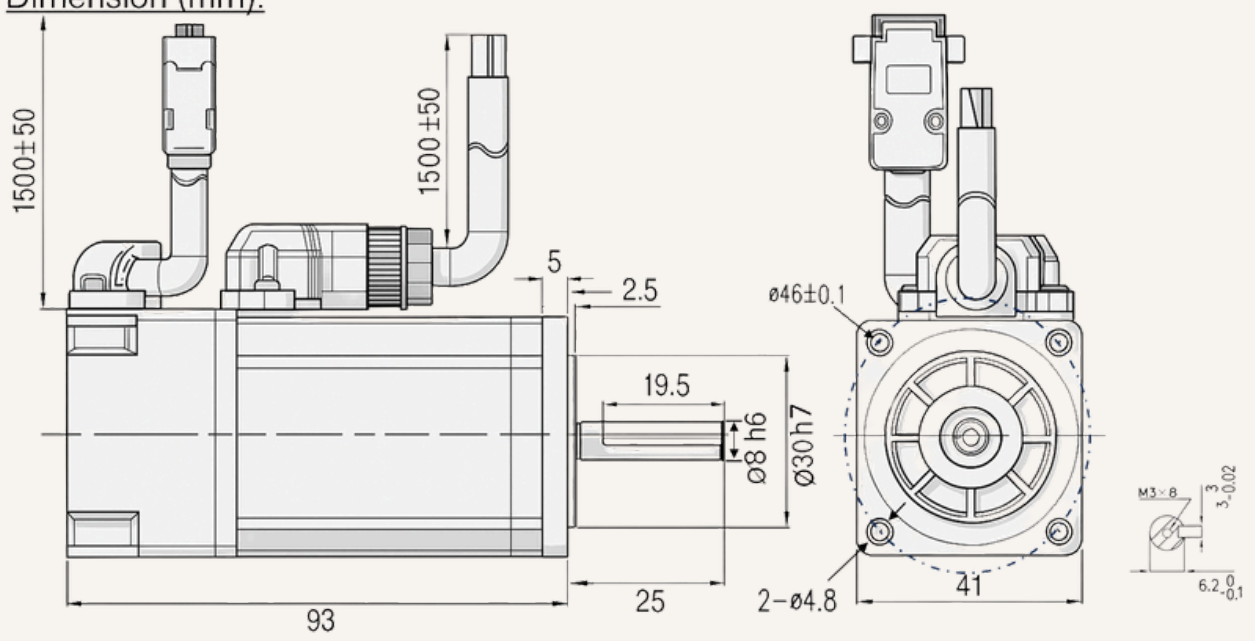
Pin No	Colour	Signal
6	Brown	U+
8	Br/Blk	U-
10	Grey	V+
12	Gr/Blk	V-
11	White	W+
15	W/Blk	W-

Servo Motor 100 W

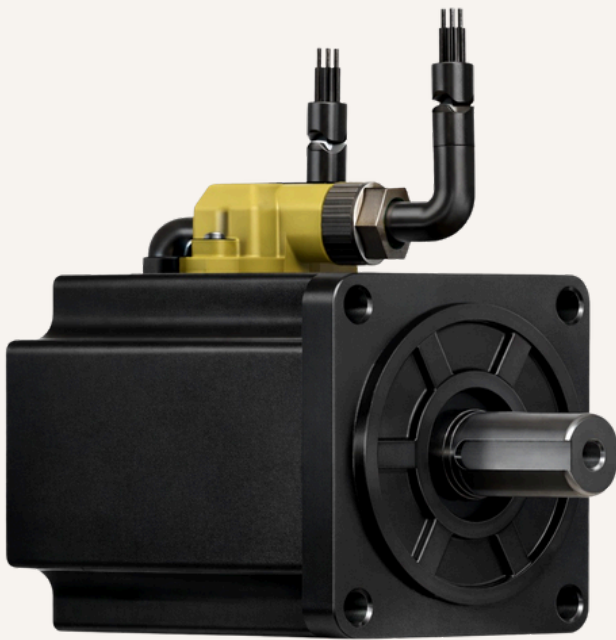
Speed VS Torque graph



Dimension (mm):



Servo Motor 200 W



Rated voltage	48 V DC
Rated Current	6.5 Arms
Rated Power	200 W
Rated Torque	0.64 Nm
Rated Speed	3000 Rpm
Peak current	13 Arms
Peak Torque	1.28 Nm
Max speed	3200 Rpm
Poles Pair	5

Torque Constant	0.1 Nm/Arms
Back EMF	7.6 V/Krpm
L-L resistance	0.44 Ohm
L-L inductance	0.55 mH
Inertia	0.32 Kg.sq. m x 1e-4

Encoder Type	Incremental
Resolution	2500 ppr
Hall Sensor	Yes

IP Level	IP 54
Insulation	Class F
Weight	900 gram
Environmental temp	-40 to 85 deg. Cel.
U, V, W, PE	RED, BLU, BLK, G/Y

Encoder Signal

Pin No	Colour	Signal
2	Red	5V
3	Black	0V
9	Blue	A+
13	Blue/Black	A-
4	Green	B+
14	Green/Black	B-
7	Yellow	Z+
5	Yellow/Black	Z-
1	Silver	Shield

Hall Sensor

Pin No	Colour	Signal
6	Brown	U+
8	Brown/Black	U-
10	Gray	V+
12	Gray/Black	V-
11	White	W+
15	White/Black	W-

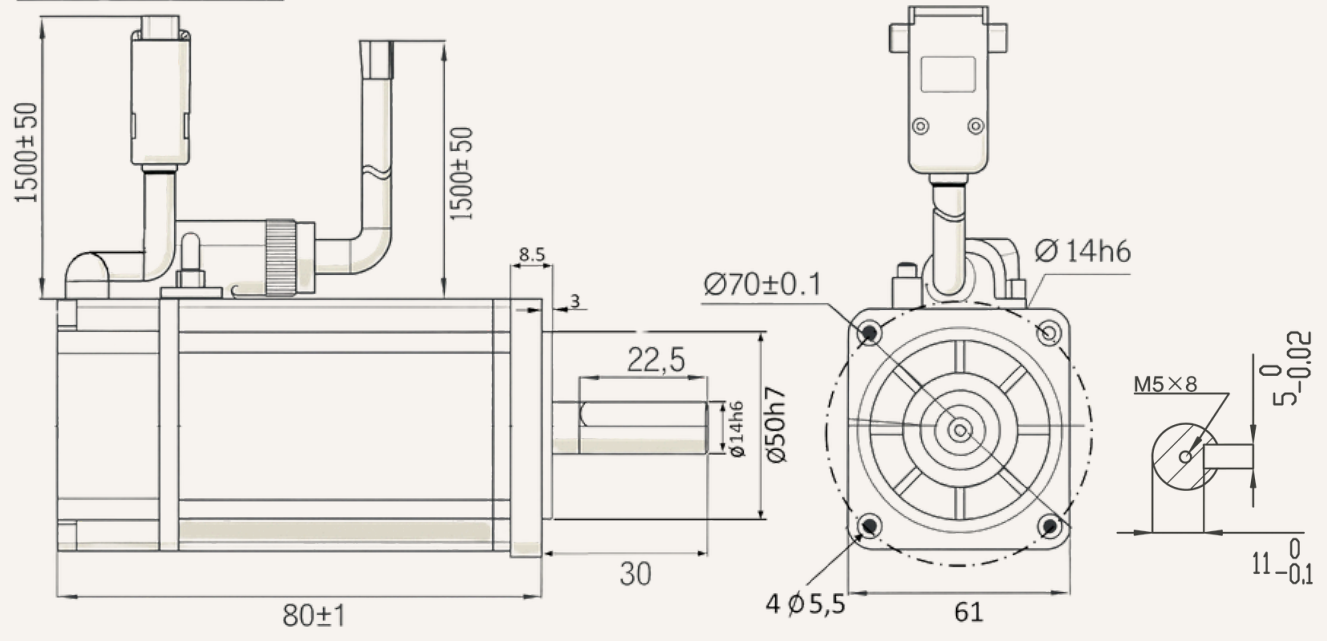
Resolver feedback and
brake is an optional

Servo Motor 200 W

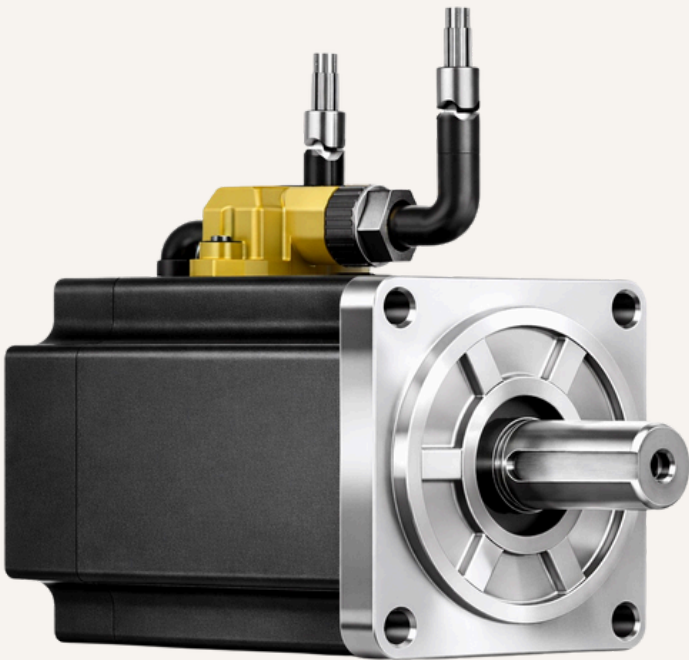
Speed VS Torque graph



Dimension (mm):



Servo Motor 400 W



Rated voltage	48V DC
Rated Current	11 Arms
Rated Power	400 W
Rated Torque	1.27 Nm
Rated Speed	3000 Rpm
Peak current	22 Arms
Peak Torque	2.54 Nm
Max speed	3200 Rpm
Poles Pair	5

Torque Constant	0.12 Nm/Arms
EMF	7.0 V/Krpm
L-L resistance	0.27 Ohm
L-L inductance	0.56 mH
Inertia	0.58 Kg.sq. m x 1e-4

Encoder Type	Incremental
Resolution	2500 ppr
Hall Sensor	Yes

IP Level	IP 54
Insulation	Class F
Weight	1350 gram
Environmental temp	-40 to 85 deg. Cel.
U, V, W, PE	RED, BLU, BLK, G/Y

Encoder Signal

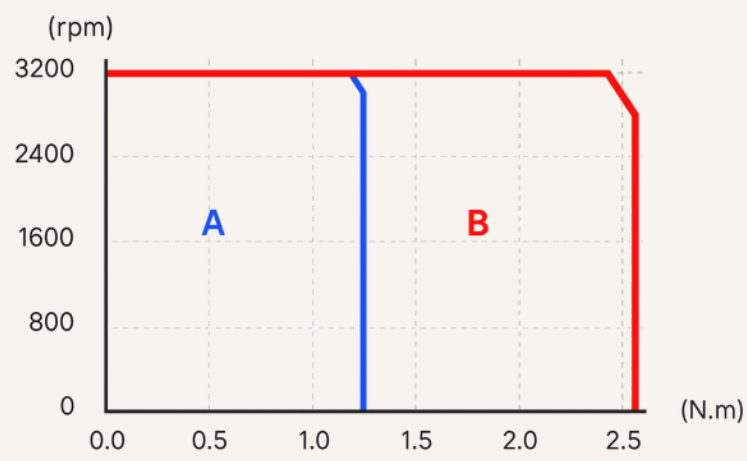
Pin No	Colour	Signal
2	Red	5V
3	Black	0V
9	Blue	A+
13	Blue/Black	A-
4	Green	B+
14	Green/Black	B-
7	Yellow	Z+
5	Yellow/Black	Z-
1	Silver	Shield

Hall Sensor

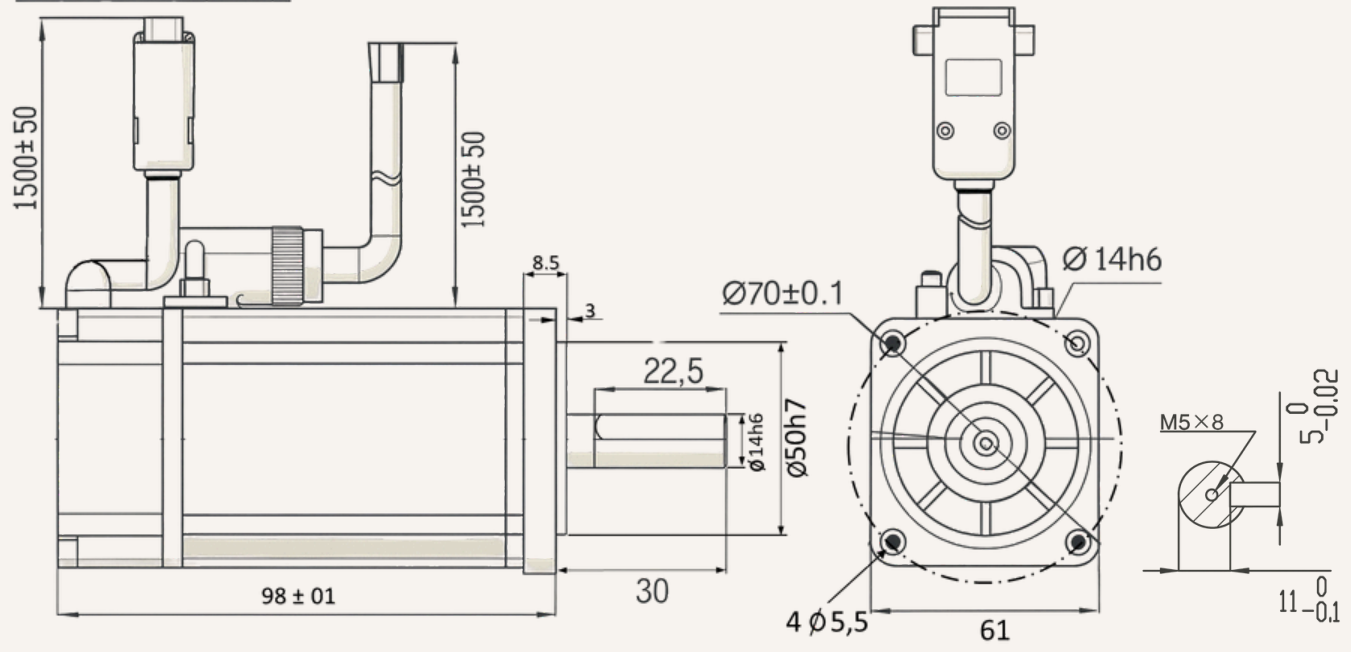
Pin No	Colour	Signal
6	Brown	U+
8	Brown/Black	U-
10	Gray	V+
12	Gray/Black	V-
11	White	W+
15	White/Black	W-

Servo Motor 400 W

Speed VS Torque graph



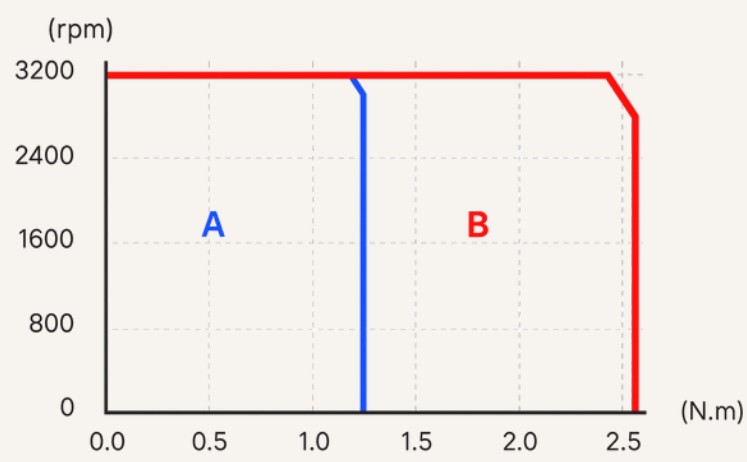
Dimension (mm):



Servo Motor 400W with brake

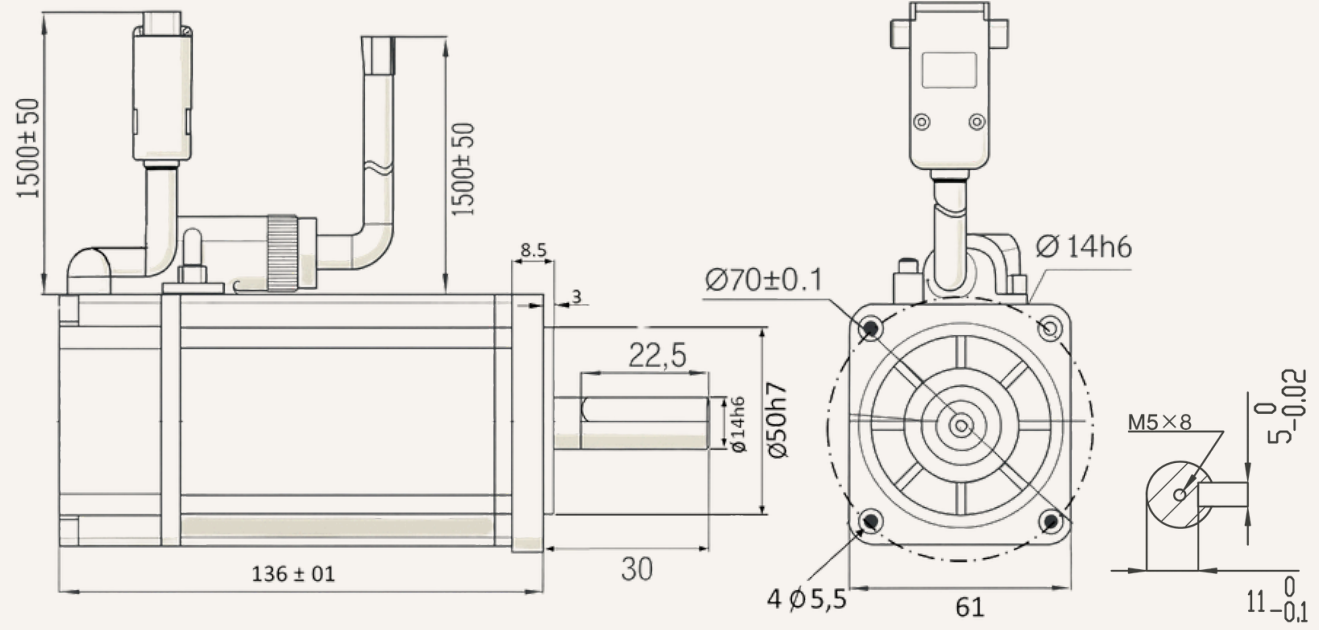
Note: Brake and Resolver are optional that comes with change in dimensions and specification

Speed VS Torque graph



Brake	colour code
24 V	Red
0 V	Black

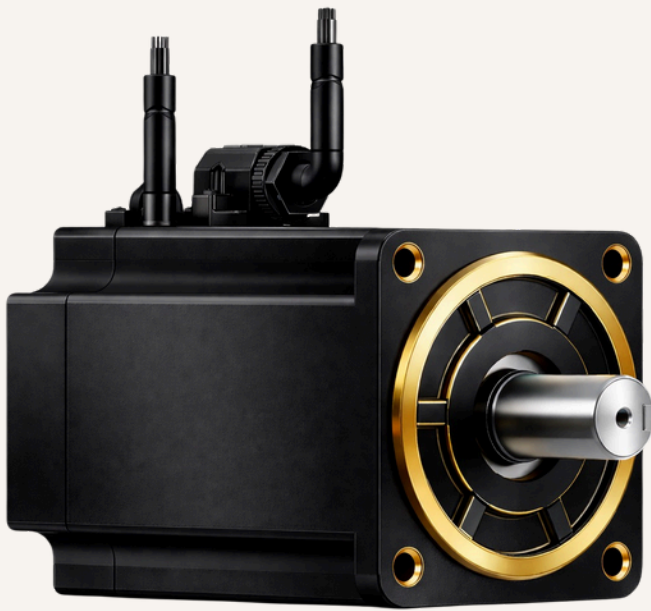
Dimension (mm):



Motor with brake

Servo Motor

750W with brake



Rated voltage	48V DC
Rated Current	19.5 Arms
Rated Power	750 W
Rated Torque	2.4 Nm
Rated Speed	3000 rpm
Peak current	39 Arms
Peak Torque	4.8 Nm
Max speed	3200 rpm
Poles Pair	5

Torque Constant	0.12 Nm/Arms
EMF	7.5 V/Krpm
L-L resistance	0.08 Ohm
L-L inductance	0.24 mH
Inertia	1.74 Kg.sq. m x 1e-4

Encoder Type	incremental
Resolution	2500 ppr
Hall Sensor	Yes

IP Level	IP 54
Insulation	Class F
Weight	2900 gram
Environmental temp	-40 to 85 deg. Cel
U, V, W, PE	RED, BLU, BLK, G/Y

Encoder Signal

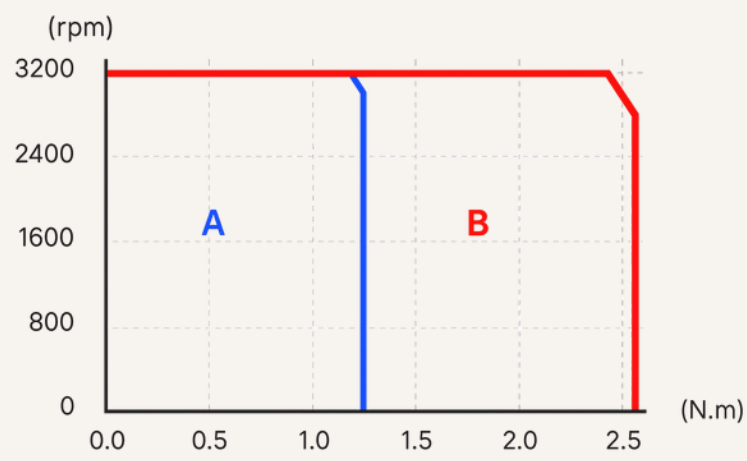
Pin No	Colour	Signal
2	Red	5V
3	Black	0V
9	Blue	A+
13	Blue/Black	A-
4	Green	B+
14	Green/Black	B-
7	Yellow	Z+
5	Yellow/Black	Z-
1	Silver	Shield

Hall Sensor

Pin No	Colour	Signal
6	Brown	U+
8	Brown/Black	U-
10	Gray	V+
12	Gray/Black	V-
11	White	W+
15	White/Black	W-

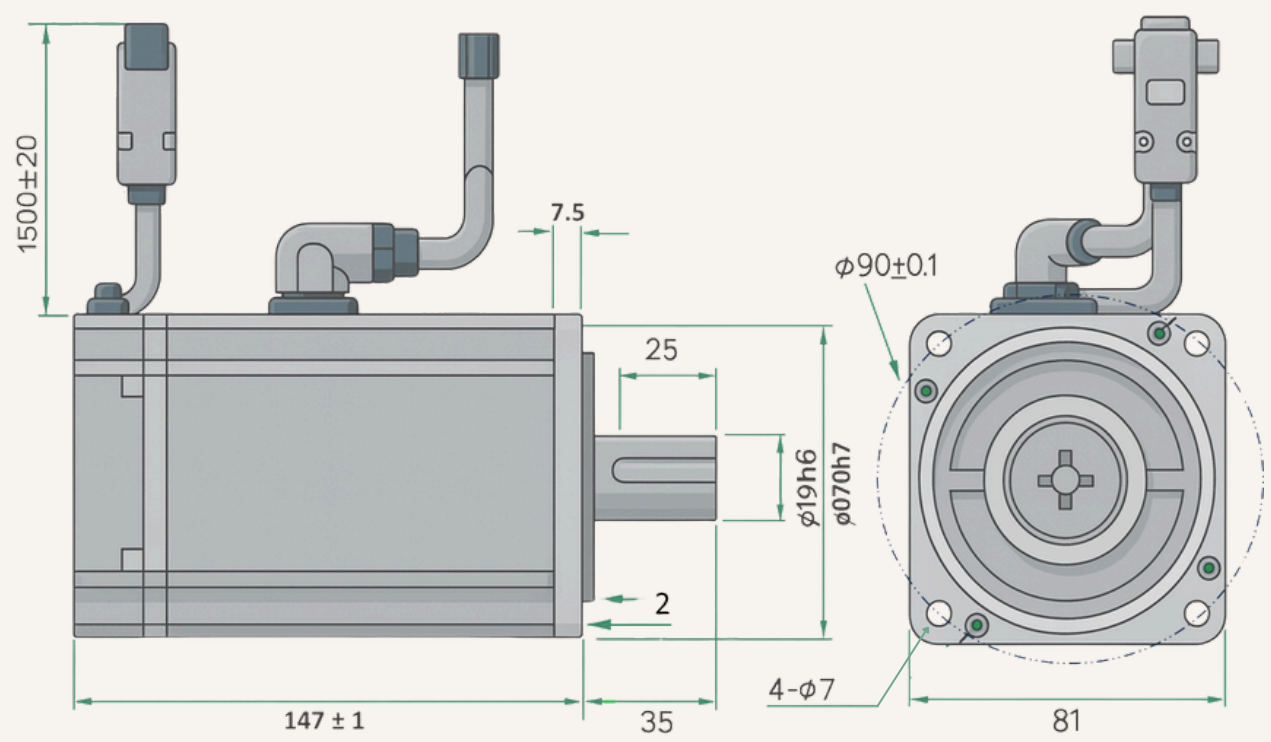
Servo Motor 750W with brake

Speed VS Torque graph



Brake	colour code
24 V	Red
0 V	Black

Dimension (mm):



Motor with brake

Servo Motor

1000 W



Rated voltage	48vdc
Rated Current	25 Arms
Rated Power	1000 W
Rated Torque	3.2 Nm
Rated Speed	3000 Rpm
Peak current	50 Arms
Peak Torque	6.4 Nm
Max speed	3200 Rpm
Pole Pair	5

Torque Constant	0.13 Nm/Arms
Back EMF	7.9 V/Krpm
L-L resistance	0.05 Ohm
L-L inductance	0.2 mH
Inertia	2.15 Kg.sq. m x 1e-4

Encoder Type	Incremental
Resolution	2500 PPR
Hall Sensor	Yes

IP Level	IP 54
Insulation	Class F
Weight	2950 gram
Environmental temp	-40 to 85 deg. Cel
U, V, W, PE	RED, BLU, BLK, G/Y

Encoder Signal

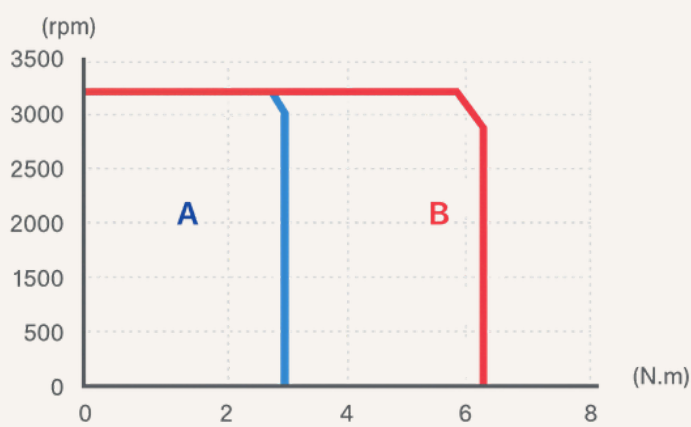
Pin No	Colour	Signal
2	Red	5V
3	Black	0V
9	Blue	A+
13	Blue/Black	A-
4	Green	B+
14	Green/Black	B-
7	Yellow	Z+
5	Yellow/Black	Z-
1	Silver	Shield

Hall Sensor

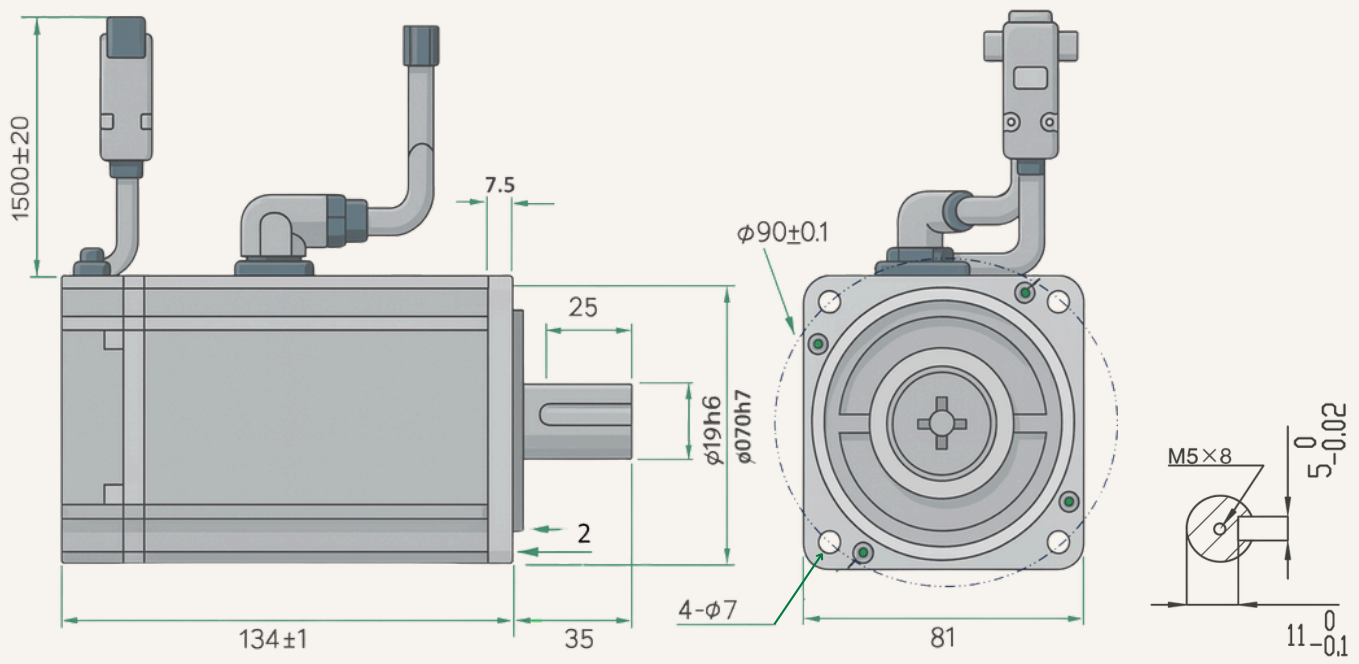
Pin No	Colour	Signal
6	Brown	U+
8	Brown/Black	U-
10	Gray	V+
12	Gray/Black	V-
11	White	W+
15	White/Black	W-

Servo Motor 1000 W

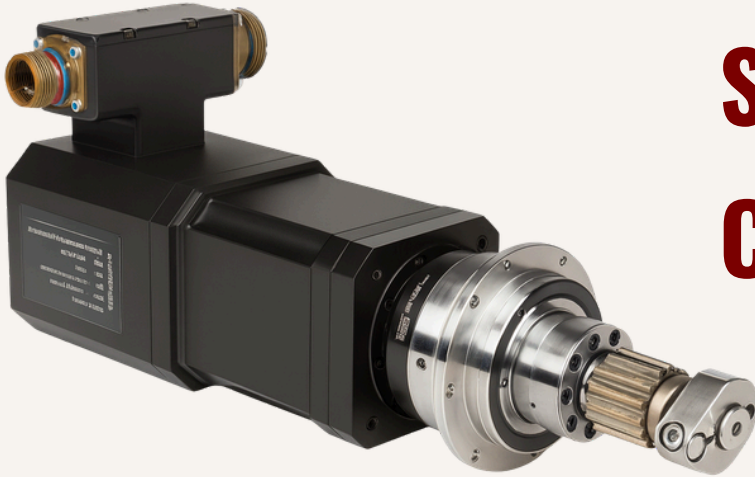
Speed VS Torque graph



Dimension (mm):



Servo Motor Custom Design



At the forefront of precision engineering, we specialize in custom-built electric motors ranging from 100 W to 2000 W, designed to deliver uncompromising performance and exceptional reliability.

Each motor is engineered with tailor-made gearbox solutions – including worm, harmonic, and cycloidal gear systems – to ensure optimal torque transmission, smooth motion, and superior mechanical efficiency.

Our custom motor windings are precisely crafted to achieve the perfect balance of speed, torque, and power density, enabling seamless integration into even the most demanding applications.

To complement every motion system, we offer high-resolution encoder options, from incremental to SSI, with resolutions up to 23 bits, ensuring ultra-accurate feedback and control.

Every detail is engineered for resilience – with industrial-grade connectors, custom IP protection levels up to IP68, and robust environmental sealing for uncompromised operation under extreme conditions.

Redefining motion engineering – where precision meets innovation

Thank you



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