

CM Series Stepper Motor

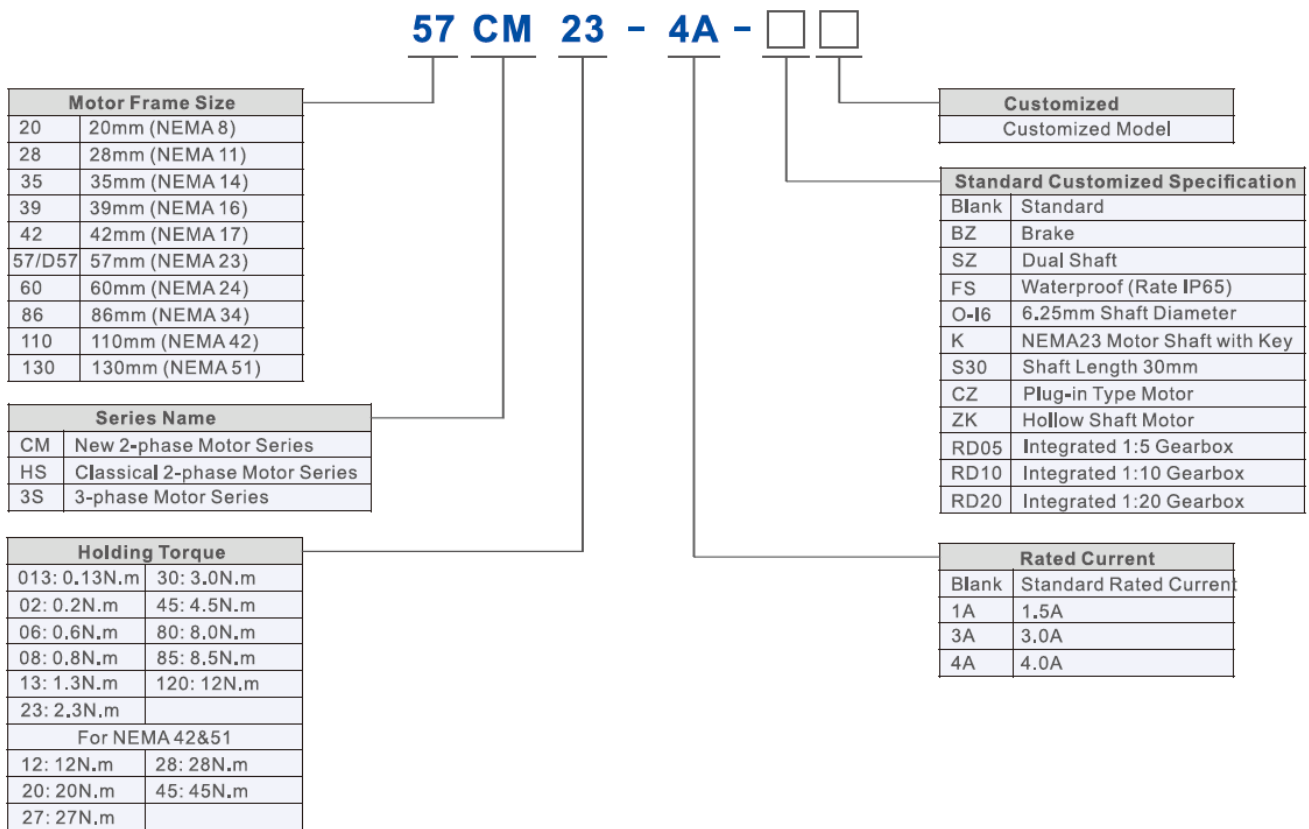
By implementing latest design and advanced manufacturing technologies, Leadshine offers hybrid stepper motors in wide frame sizes NEMA 8, 11, 14, 16, 17, 23, 24, 34 and 42. Those stepper motors outperforms in many aspects such as high torque in all speed ranges, high precision, lower heating, and lower vibration. Due to the implementation of highly automated manufacturing process and rigid quality assurance control, Leadshine CM series stepper motors are highly reliable with high product consistency.



Feature

- Full frame range of NEMA 8 ~ NEMA 42
- Abundant motor type including standard type, brake type, waterproof type, dual shaft type, etc.
- Max torque can reach up to 45N.m
- High torque in all speed ranges
- Lower heating
- Lower vibration
- Reliable and stable

Model Designation



Technical Specification

Item	Frame Size	Rate Current (A)	Holding Torque (N.m)	Type
Specific	<ul style="list-style-type: none"> ● NEMA 8 ● NEMA 11 ● NEMA 14 ● NEMA 17 ● NEMA 23 ● NEMA 24 ● NEMA 34 ● NEMA 42 ● NEMA 51 	0.6~7	0.03~45	<ul style="list-style-type: none"> ● Standard motor ● Motor with brake ● Motor with IP65 ● Motor with dual shaft ● Motor with hollow shaft ● Motor with gearbox

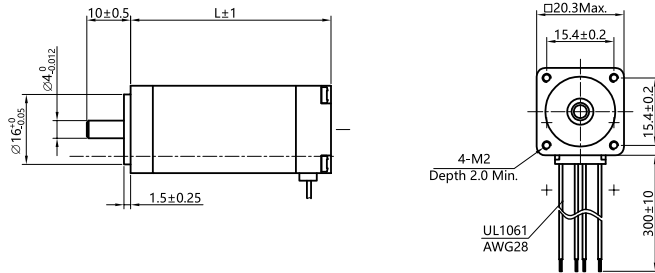
Comprehensive Specification

NEMA 8 (20mm)



Standard Model:

Model	Length (mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Inertia (Kg.cm ²)	Matched Drives
20CM003	33	0.03	0.6	5.7	2.6	0.003	EM415S
20CM005	45	0.05	0.6	7	3.4	0.004	EM415S



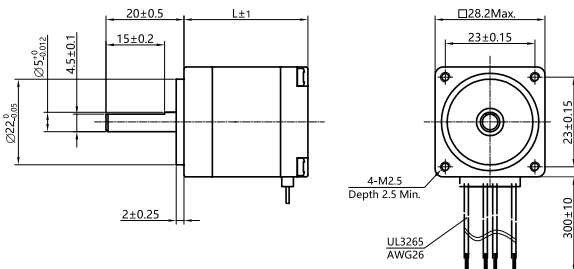
NEMA 11 (28mm)



Standard Models:

Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Inertia (Kg.cm ²)	Matched Drives
28CM006	32	0.06	1.2	1.4	1.0	0.009	EM415S
28CM010	41	0.1	1.2	1.8	1.6	0.013	EM415S
28CM013	51	0.13	1.2	2.2	2.3	0.018	EM415S

Unit: mm 1inch=25.4mm



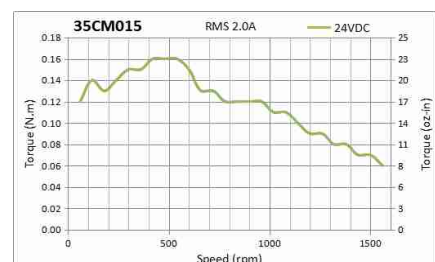
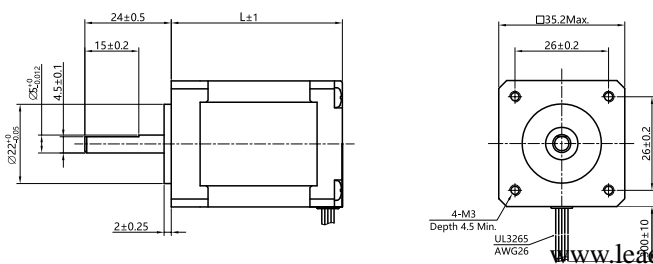
NEMA 14 (35mm)



Standard Models:

Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Inertia (Kg.cm ²)	Matching Drives
35CM015	31	0.15	2	0.8	1.3	0.019	EM422S
35CM04	47	0.36	2	1.2	1.9	0.026	EM422S

Unit: mm 1inch=25.4mm



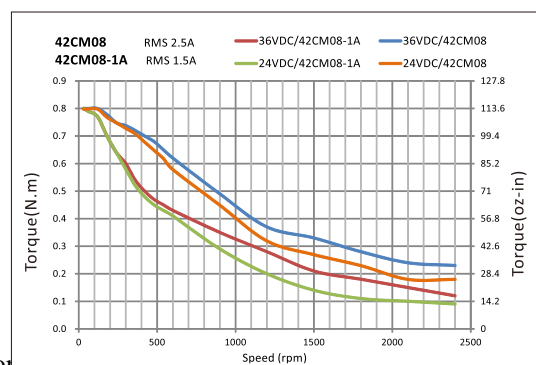
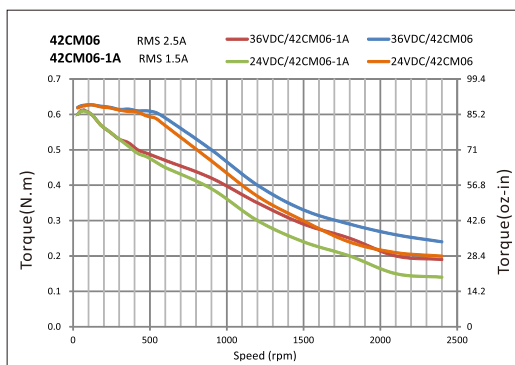
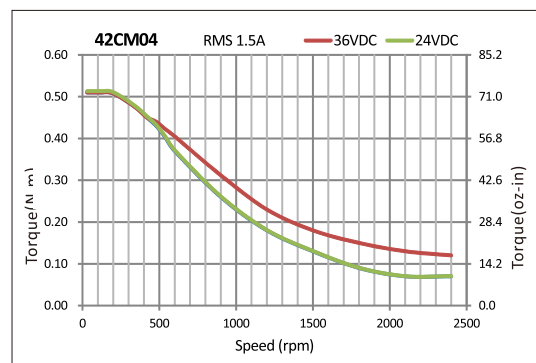
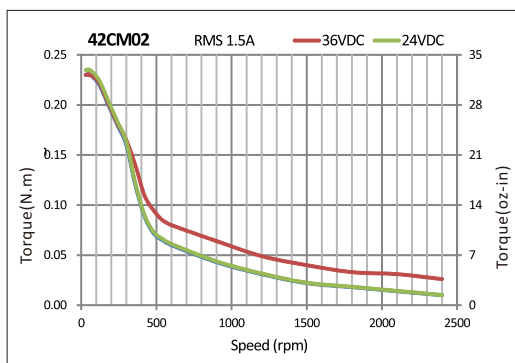
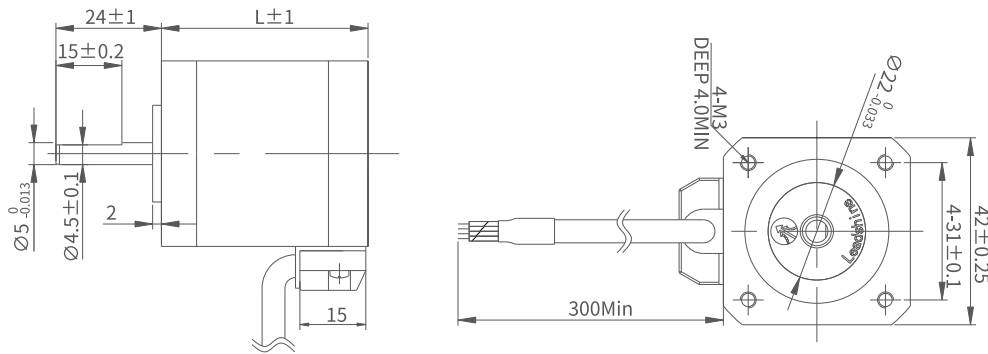
NEMA 17 (42mm)



Standard Models:

Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Inertia (Kg.cm ²)	Matching Drives
42CM02-1A	33	0.21	1	4.5	6.5	0.035	EM415S
42CM02		0.21	1.5	1.4	1.4	0.035	EM422S
42CM04-1A	40	0.4	1	4.0	7.9	0.054	EM415S
42CM04		0.4	1.5	2.3	4.3	0.054	EM422S
42CM06-1A	47	0.6	1.5	2.2	4.5	0.072	EM422S
42CM06		0.6	2.5	0.9	1.6	0.072	EM532MINI
42CM08-1A	60	0.8	1.5	3.0	6.9	0.110	EM422S
42CM08		0.8	2.5	1.0	2.4	0.110	EM532MINI

Unit: mm 1inch=25.4mm



NEMA 23 (57mm)

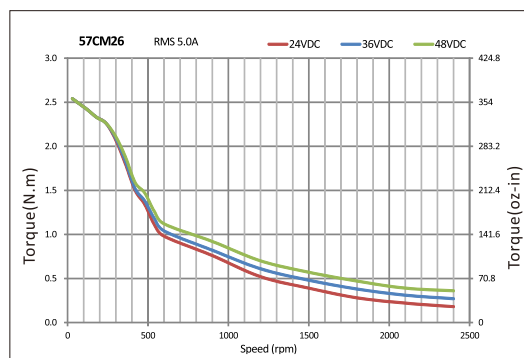
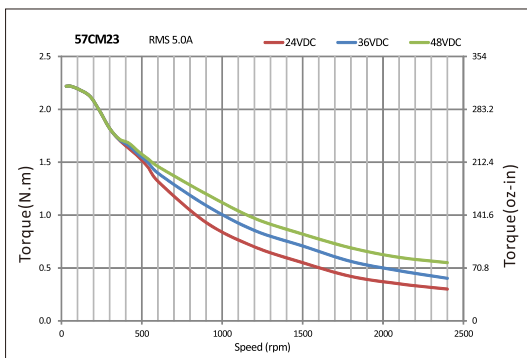
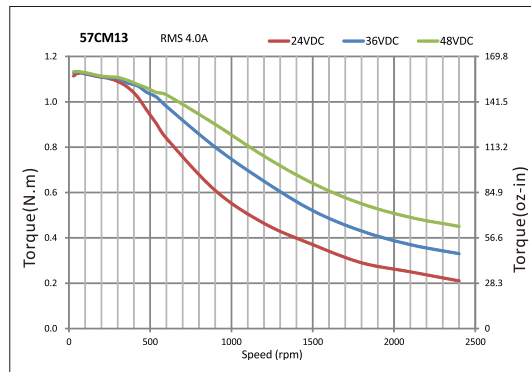
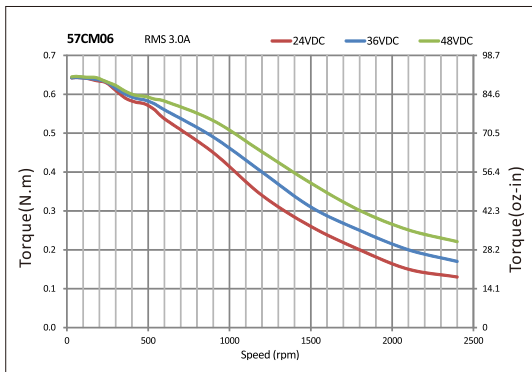
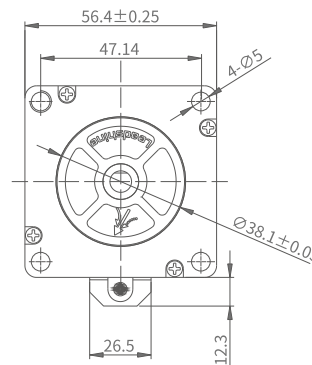
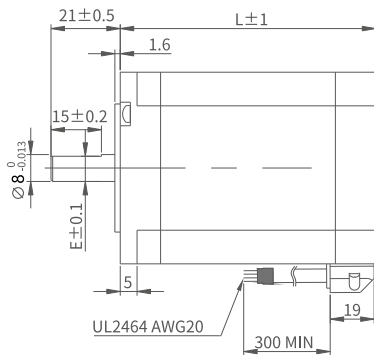


Standard Models:

Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Detent Torque	Inertia (Kg.cm ²)	Matching Drives
57CM06	41	0.6	3	0.7	1.4	0.02	0.12	EM542S
57CM13-3A	55	1.3	3	0.8	2.8	0.04	0.3	EM542S
57CM13		1.3	4	0.42	1.6			EM542S/EM556S
57CM12X		1.2	4	0.6	1.4			EM542S/EM556S
57CM21X	76	2.1	4	0.6	2.4	0.07	0.48	EM542S/EM556S
57CM23-3A		2.1	3	1.1	4.2			EM542S
57CM23-4A	76	2.3	4	0.5	2			EM542S/EM556S
57CM23		2.3	5	0.38	1.75			EM556S
57CM22X	80	2.2	5	0.34	1.74	0.07	0.5	EM556S/EM870S
57CM26-4A	85	2.6	4	0.8	3.2	0.08	0.52	EM542S/EM556S
57CM26		2.6	5	0.44	2			EM556S/EM870S

Note: Motors with 1/4 in(6.35mm) shaft diameter are available.

Unit: mm 1inch=25.4mm



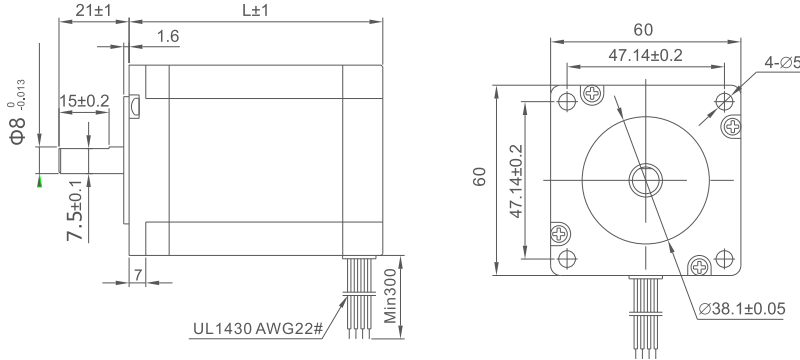
NEMA 23 (57mm)



Standard Models:

Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Detent Torque(N.m)	Inertia (Kg.cm ²)	Matching Drives
D57CM21-4A	67	2.1	4	0.5	1.77	0.09	0.57	EM556S
D57CM21		2.1	5	0.21	0.75			EM556S/EM870S
D57CM31-4A	88	3.1	4	0.62	2.8	0.10	0.84	EM556S
D57CM31		3.1	5	0.26	1.18			EM556S/EM870S

Unit: mm 1inch=25.4mm



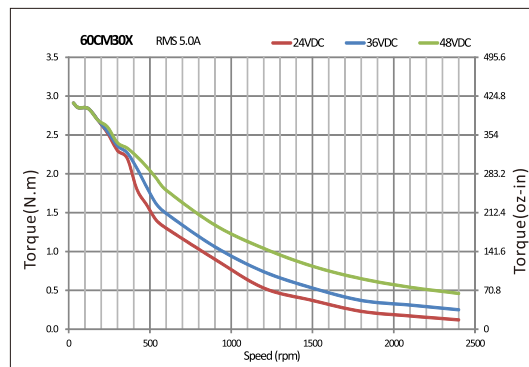
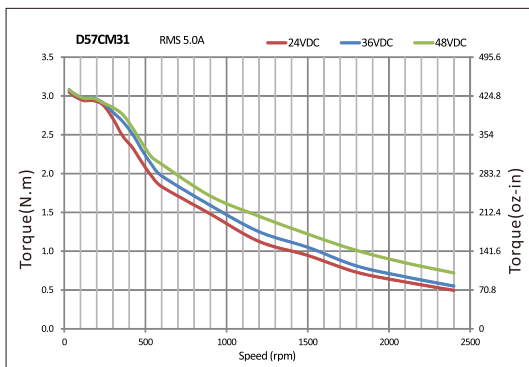
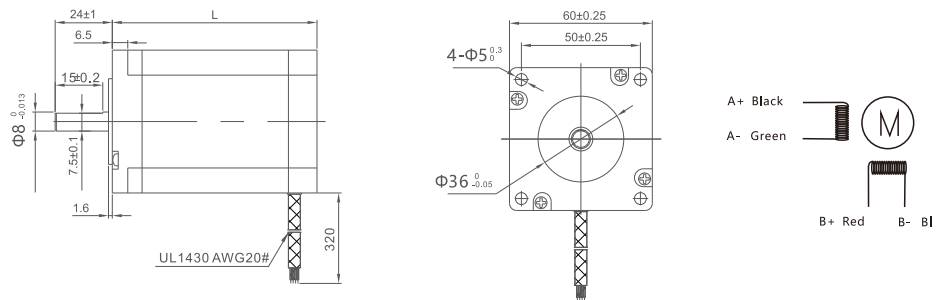
NEMA 24 (60mm)



Standard Models:

Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Detent Torque(N.m)	Inertia (Kg.cm ²)	Matching Drives
60CM22X	67	2.2	5	0.33	1.05	0.07	0.49	EM556S/EM870S
60CM30X	85	3.0	5	0.46	2.0	0.08	0.69	EM556S/EM870S

Unit: mm 1inch=25.4mm



NEMA 34 (86mm)

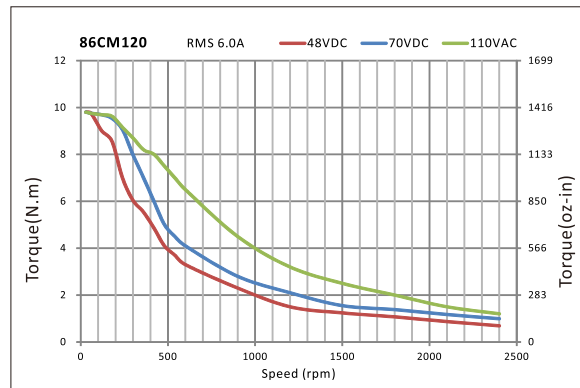
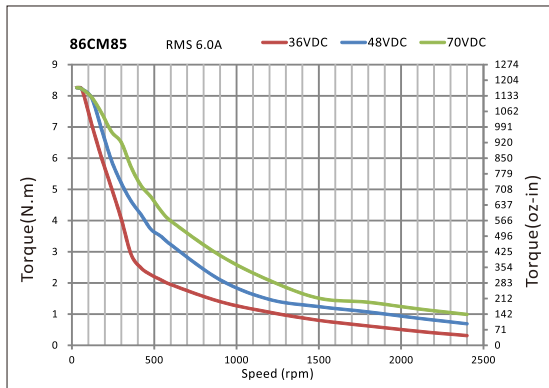
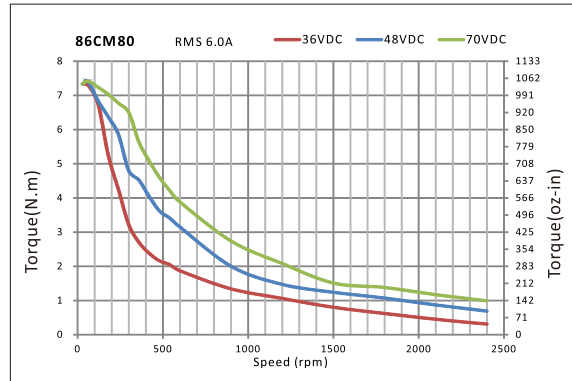
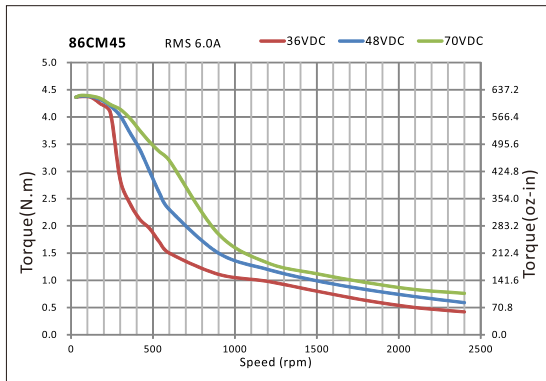
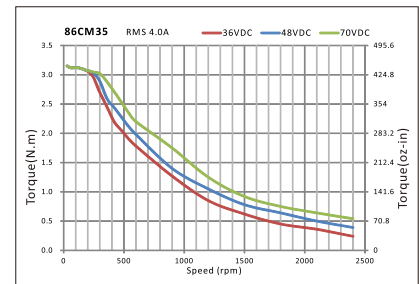
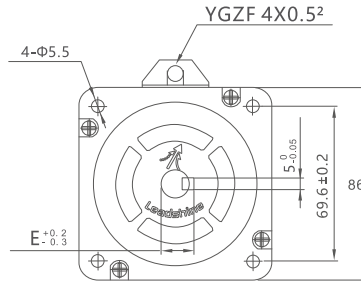
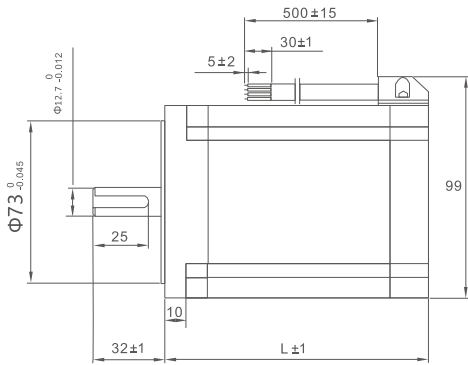
Standard Models:



Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Inertia (Kg.cm ²)	Matching Drives
86CM35	65	3.5	4	0.42	2.67	1.00	EM556S/EM870S
86CM45	80	4.5	6	0.43	2.95	1.40	EM882S
86CM80	98	8.0	6	0.63	4.0	2.50	EM882S
86CM85	118	8.5	6	0.53	4.25	2.70	EM882S
86CM120	129	12.0	6	0.75	5.30	2.94	EM882S/DMA882S

Note: Motors with 14mm shaft diameter are available.

Unit: mm 1inch=25.4mm



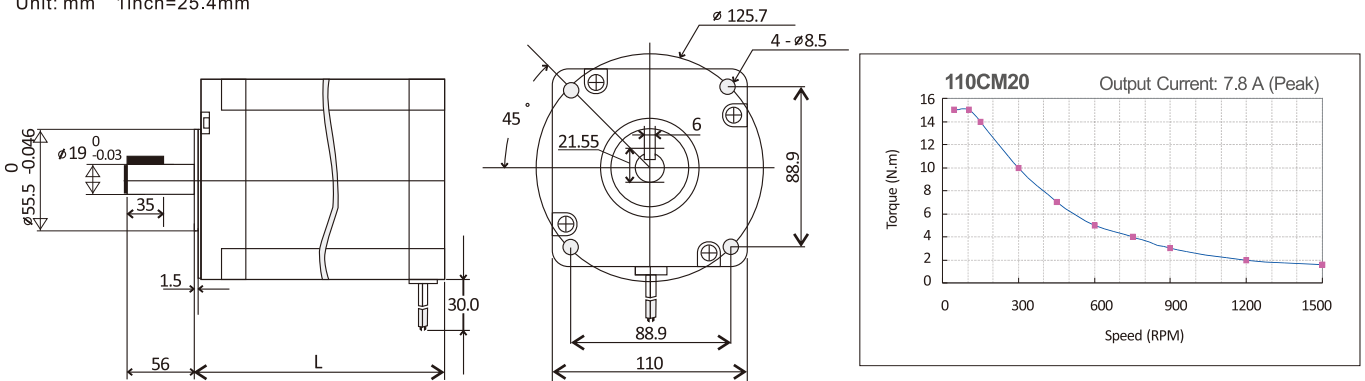
NEMA 42 & 51 (110mm & 130mm)

Standard Models:



Model	Length L(mm)	Holding Torque(N.m)	Rate Current (A)	Resistance/Phase(Ω)	Inductance/Phase(mH)	Inertia (Kg.cm ²)	Matching Drives
110CM12	115	12	6	0.53	6.5	7.2	DM2282
110CM20	150	20	6	0.8	15	10.9	DM2282
110CM28	201	28	6.5	1.2	22	16.2	DM2282
130HS27	227	27	6	0.86	12.5	15.7	DM2282
130HS45	283	45	7	0.66	9.0	22.9	DM2282

Unit: mm 1inch=25.4mm



Unit: mm 1inch=25.4mm

