

FATEK® SERVO MOTOR



Servo Motor FSMA Series

Motor Mode	Symbol	Unit	FSMA1-□□□□□□SK☆						
			001D302	004S302	007S302	010M202	015M202	020M202	030M202
Standard/Customization			Standard	Standard	Standard	Standard	Standard	Standard	Standard
Drive Mode			001-2/004-2	004-2/007-2	007-2/010-2	010-2	010-2/020-23	020-23	030-23
Rated Output	PR	kW	0.1	0.4	0.75	1.0	1.5	2.0	3.0
Rated Torque	TR	N・m	0.32	1.27	2.39	4.78	7.16	9.55	14.33
Max. Torque	Tmax	N・m	0.95	3.82	7.16	14.33	21.49	28.65	42.96
Rated Speed	NR	rpm	3000			2000			
Max. Speed	Nmax	rpm	4500		4200	2800			
Rated Current	IR	A	0.94	3.5	4.3	5.16	7.57	9.18	14.0
Max. Armature Current	I _{max}	A	2.82	10.5	12.9	15.5	22.71	27.5	42.0
Torque Constant	KT	N・m/A	0.380	0.39	0.610	1.019	1.060	1.140	1.130
Induced Voltage Constant	KE	V/k rpm	39.8	40.4	63.8	106.8	108.7	119.3	118.3
Rotor Moment of Inertia	JM	kg・cm ²	0.036	0.277	0.940	6.26	8.88	12.14	17.92
Armature Resistance	Ra	Ω	25.00	1.96	2.41	1.22	0.79	0.58	0.33
Armature Inductance	La	mH	35.0	3.8	8.0	6.70	4.74	3.78	2.12
Mechanical Time Constant	Tm	ms	0.59	0.34	0.58	0.70	0.61	0.52	0.45
Electrical Time Constant	Te	ms	1.40	1.94	3.30	5.49	6.00	6.52	6.38
Weight (standard)	W	kg	0.70	1.37	2.47	6.47	8.08	10.16	13.87
Insulation Grade	--	--	Class B (130℃)	Class F(155℃)		Class B(130℃)			
Operating Ambient Temp.	T	℃	0~40						
Operating Ambient Humidity	RH	%	< 80		< 90				
Storage Temp.	T	℃	-20~60						
Storage Humidity	RH	%	< 80		< 90				

☆: Blank—Without brake , -B—With brake (24VDC)

Accessories

	Part No.	L (Meter)	Description
Power Connectors	FSALM003	3	For FSMA-S series (50W~750W)
	FSAMLM003	3	For FSMA-M series without brake (550W~3kW)
Encoder Cables	FSAELP003	3	For FSMA-S and FSD-E2 series
	FSALP003	3	For FSMA-S and FSD-A2 series
	FSAEMLP003	3	For FSMA-M and FSD-E2 series
	FSAMLP003	3	For FSMA-M and FSD-A2 series
I/O Signal Connector	FSAECN25P	-	For FSD-E2 series (CN1)
	FSACN50P	-	For FSD-A2 series (CN1)