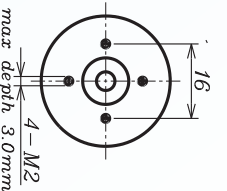
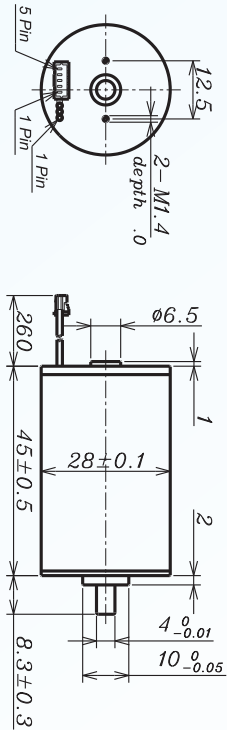




DC Brushless Motor AM-BL2845A/B-4P Series

ASSUN MOTOR

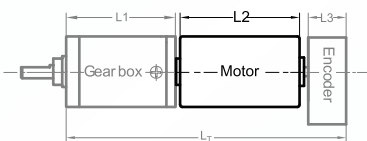
2015 edition. Specifications are subject to change without notice.



BRUSHLESS MOTOR		BALL BEARING					
MOTOR MODEL		1210	1208	1810	1808	2410	2408
NOMINAL VOLTAGE	V	12	12	18	18	24	24
NO LOAD SPEED ±12%	rpm	10370	7930	10111	7995	10370	8171
NO LOAD CURRENT Max 150%	mA	417	333	278	222	208	167
Recommend Limit for Continuous Operating	mN.m	61.69	61.66	59.87	64.03	59.49	65.44
	rpm	9126	6684	8916	6801	9217	6996
	A	6.00	4.60	3.80	3.2	2.90	2.5
	W	58.96	43.16	55.90	45.60	57.43	47.94
	STARTING CURRENT	mA	50000	29268	32143	21429	26087
STALL TORQUE	mN.m	553	423	546	461	577	488
MAXIMUM POWER OUTPUT	W	150.0	87.8	144.6	96.4	156.5	104.3
MAXIMUM EFFICIENCY	%	83	80	82	81	83	81
TERMINAL RESISTANCE PHASE TO PHASE ±12%	Ω	0.24	0.41	0.56	0.84	0.92	1.38
MECHANICAL TIME CONSTANT	ms	2.28	2.28	2.25	2.11	2.19	2.03
MOMENT OF INERTIA	gcm ²	11.6	11.6	11.6	11.6	11.6	11.6
TORQUE CONSTANT	mN.m/A	11.06	14.45	17.00	21.50	22.10	28.05
SPEED CONSTANT	rpm/V	864	661	562	444	432	340
SPEED/TORQUE GRADIENT	rpm/mN.m	18.8	18.8	18.5	17.4	18.0	16.7
WEIGHT	g	210	210	210	210	210	210

ADDITIONAL INFORMATION			
MAXIMUM ROLLING BEARING LOADS			
AXIAL (DYNAMIX)	4.0 N	RADIAL (5MM FROM HEAD FACE)	16.0 N
PRESS-FIT FORCE	50N	L: MAX ALLOWABLE SCREW DEPTH INTO FLANGE	3.0 mm
MAXIMUM RADIAL PLAY	≤0.02mm	AXIAL PLAY:	0 (<4.0N)
MAXIMUM WINDING TEMPERATURE	155°C	AMBIENT TEMPERATURE RANGE:	-30 to 65°C

AM-BL2845A/B COMBINATION SCHEME



Recommend Gearbox:
Planetary Gearbox:
AM-28P
AM-32P

Recommend Encoder:
Encoder S: AM-EN16-S***
2~3 Channels
Encoder T: AM-EN24-T***
2~3 Channels

For more gearbox specs, see Assun Motor website.

CONNECTION (AWG22#)	TOTAL LENGTH (GEARBOX AND MOTOR): L _T =L ₁ +L ₂ + L ₃				
	L1:28P	L1:32P	L2:BL16	L3:EN16-S	L3:EN24-T
CABLE 1: WINDING A					
CABLE 2: WINDING B	28.4	31.2	45.0	10.7	10.0
CABLE 3: WINDING C	34.7	38.6			12.0
PLUG DEFINATION MOLEX: 51021 - 0500	41.0	46.2			
	47.3	53.6			
PLUG 1 HALL V _{CC}					
PLUG 2 HALL GND					
PLUG 3 HALL A					
PLUG 4 HALL B					
PLUG 5 HALL C					

REMARKS

Clients can choose gearbox and encoder to match with this motor. Some combinations are listed here for reference.

Motor Data Tested at 25°. Motor Operation exceeds continuous limits of operating range will compromise the life of the device.