



TECHNICAL DATA

series

SM158

STEP MOTOR 35S48B07
with 158 gearbox



- High Torque
- Low noise
- Small size

TECHNICAL DATA

Motor Step Angle	7,5°	full step	Nominal voltage	12V
Number of Phase	2	bipolar	Voltage driver	3,75 - 36V
Insulation resistance	100 M Ω	500Vdc	Max axial/radial shaft load	10N/50N
Insulation class	E		Max allow torque	100 Ncm
Coil Resistance/Induction	7,5 Ω/10mH		Max current (continuous)	250 mA
Max temp. (motor housing)	60 °C		Max current (non-contin.)	500 mA
Racc. temp (motor housing)	35-45 °C		Operating temp.	-20 °C/+65 °C

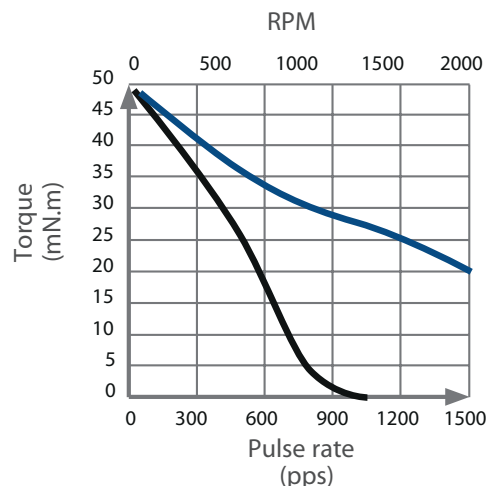
PART NUMBER	Ratio (x:1)	Length mm	Holding Torque mNm	Max Speed (ref.) RPM
SM158.35S.15	14,14	43,3	700	105
SM158.35S.30	29,75	43,3	1500	50
SM158.35S.75	76,84	45,8	1500	20
SM158.35S.100	94,37	45,8	1500	16
SM158.35S.200	198,5	48,3	1500	7
SM158.35S.250	243,8	48,3	1500	6
SM158.35S.510	512,85	51,3	1500	3
SM158.35S.630	629,82	51,3	1500	2

SM158

Motor Dynamic Torque Curves 24V/0,5A

Conditions: Bi-polar Constant Current Driver
Driver: AMIS 30522
Mode: Full Step

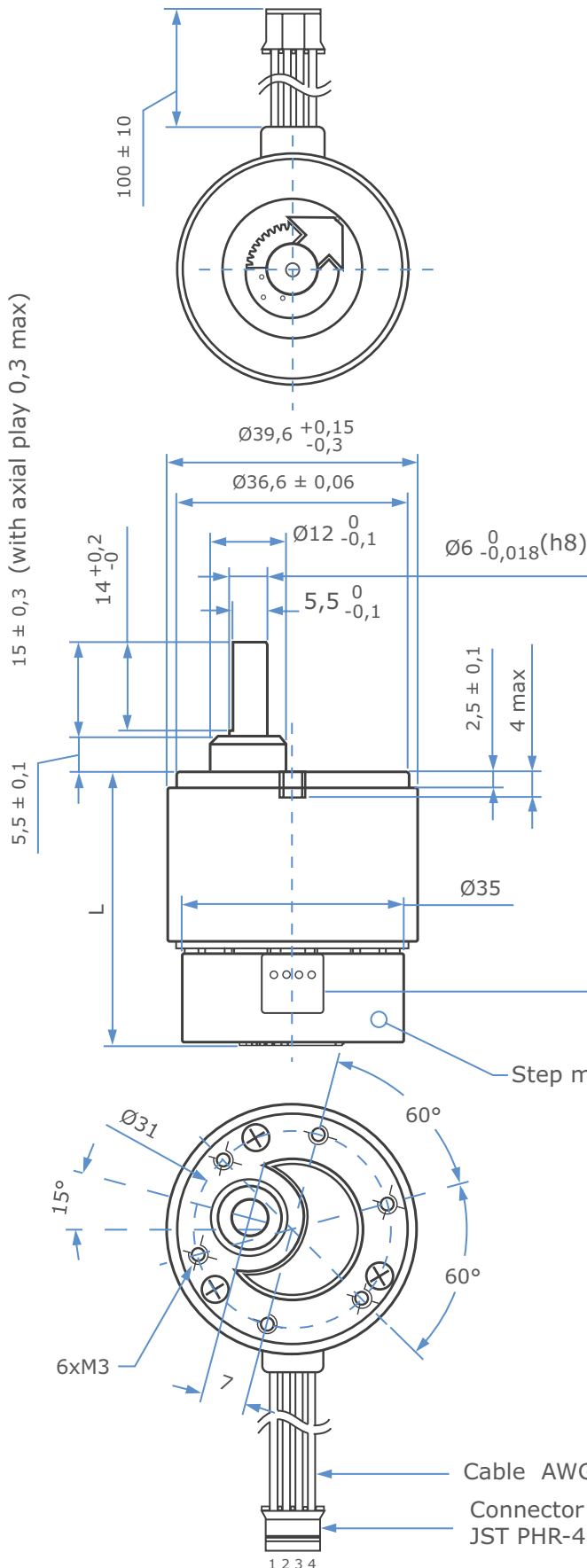
— Pull in torque — Pull out torque



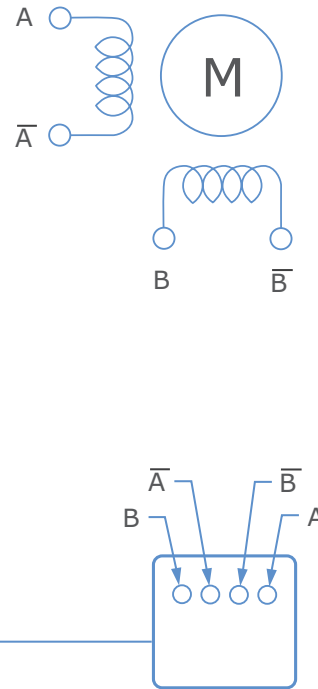


SM158

Mechanical dimensions



SEQUENCE EXCITATION						
PIN	COLOUR	CCW ← → CW (FROM OUTPUT SHAFT SIDE)				PHASE
1	YELLOW		+	+		A
2	ORANGE	+			+	\bar{A}
3	BROWN	+	+			\bar{B}
4	BLACK			+	+	B



Ratio	L (mm)
15:1 (14,14:1)	43,3
30:1 (29,75:1)	43,3
75:1 (76,85:1)	45,8
100:1 (94,37:1)	45,8
200:1 (198,52:1)	48,3
250:1 (243,80:1)	48,3
510:1 (512,85:1)	51,3
630:1 (629,82:1)	51,3