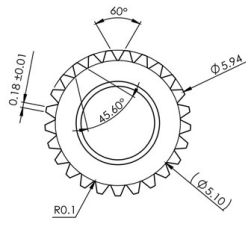
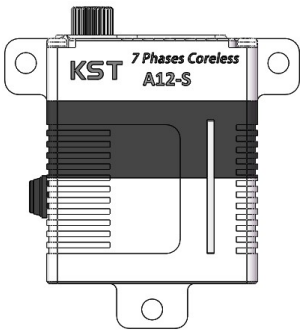
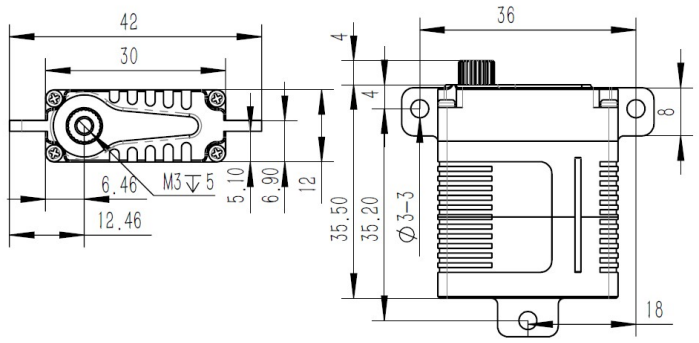


A12-S Technical Specification



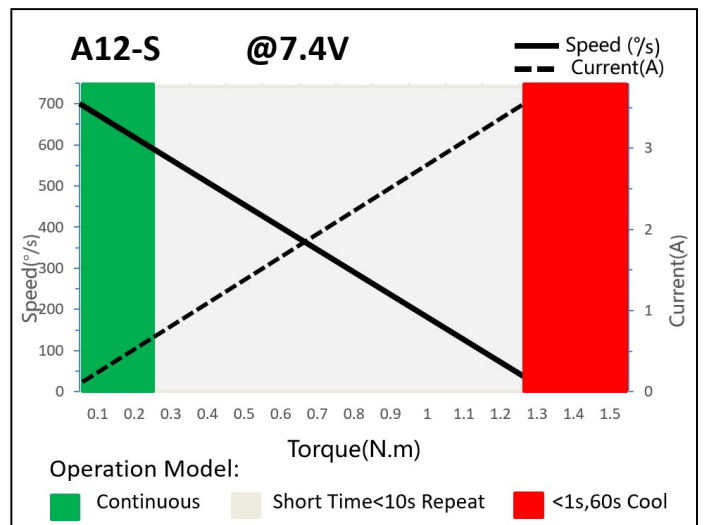
25T-6mm Output Shaft Spline



1. Operating Data

A12-S	
Rated Voltage	DC7.4V
Voltage Range	DC6.0V-8.4V
Torque	1.10N.m@6.0V
	1.28N.m@7.4V
	1.35N.m@8.4V
Speed	0.11sec/60°@6.0V
	0.09sec/60°@7.4V
	0.08sec/60°@8.4V
Working Frequency	1520us/333Hz
Default Travel Angle	±60° = 120° Total
Temperature Range	-10°C.....+60°C
Soft Start	Yes
Programmable	Yes
Case Material	Aluminum Alloy
Motor Type	7 Phases Coreless DC Motor
Gear Set Material	Hardened Steel
Position Sensor	Contactless(Magnetic sensor)
Ball Bearing	2BB
Case Dimensions	30mm*12mm*35.5mm±0.2mm
Weight	32g±10%

2. Performance



3. Command signal

PWM Command Interface

Signal Voltage	HIGH: min.3.3V, max.5.0V Low: min.0.0V, max.1.5V
Pulse Lengths	900us-2100us
Pulse Lengths for Position -50° 0°/+50°	1000us/1500us/2000us

4. Electrical Connection

	Pin Assignment			
	1	Orange	Signal	PWM Command
	2	Red	DC+	Supply Voltage
	3	Brown	DC-	Supply Ground