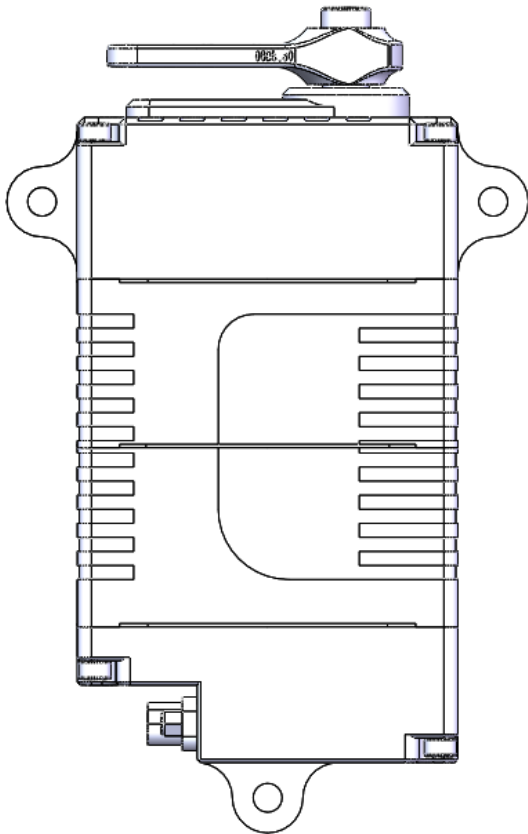
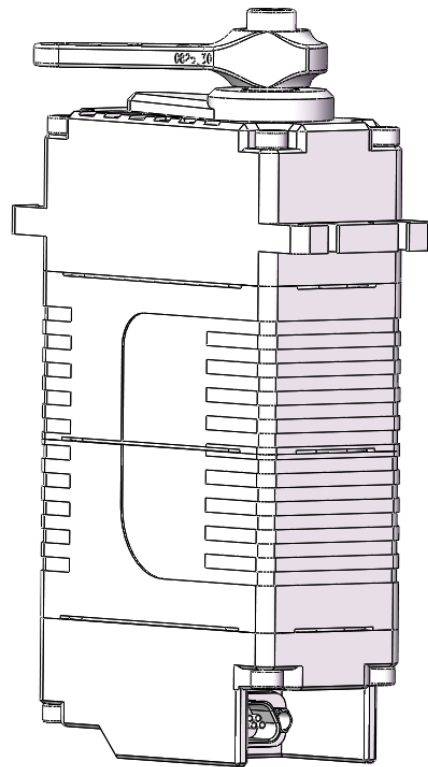
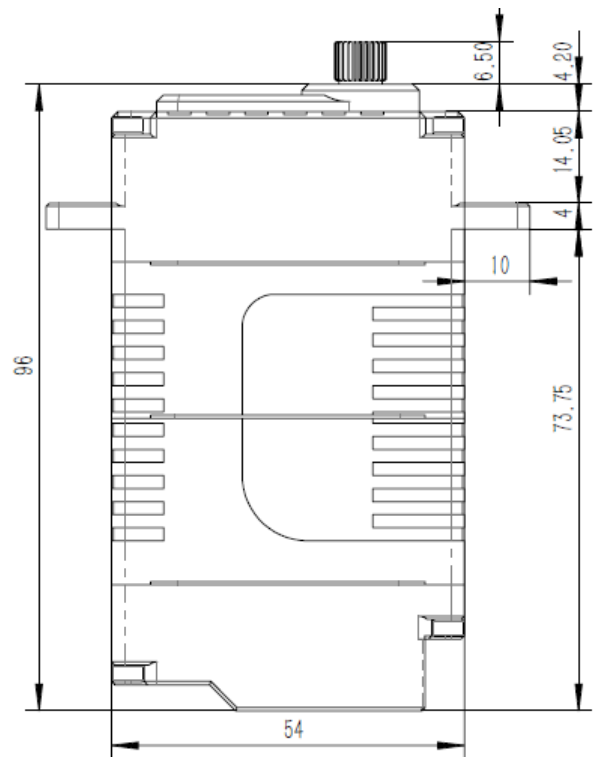
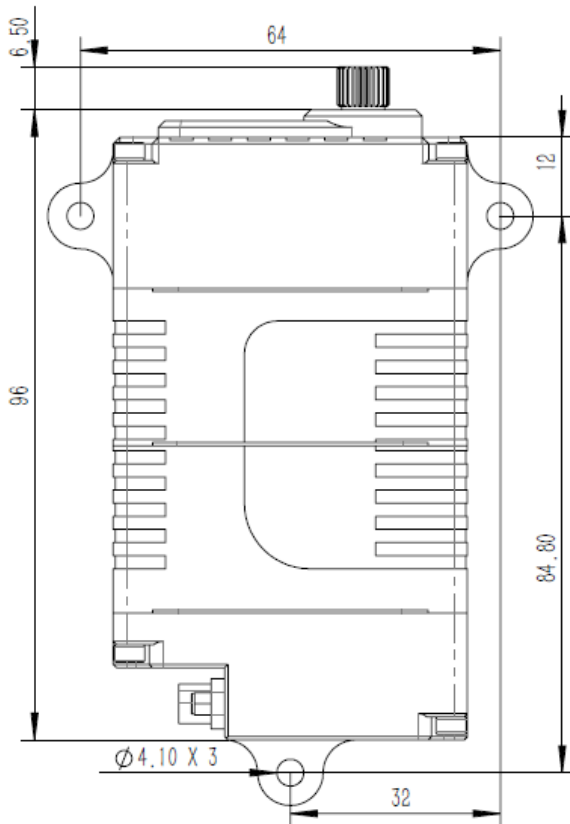
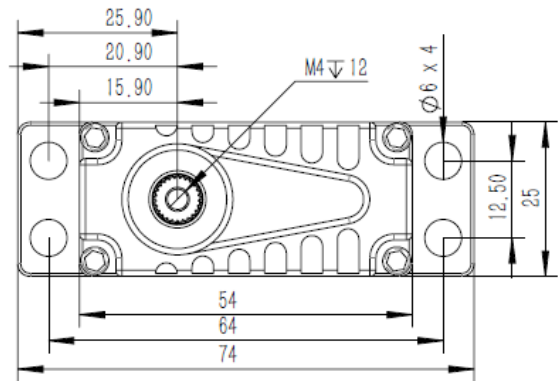
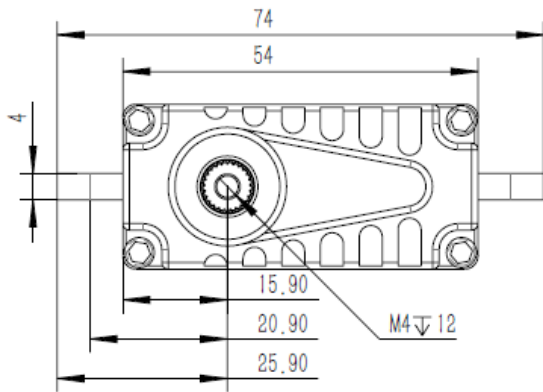


HS25

Technical Specification

**Ver A****Ver B****HS25-30-M-5545-1****HS25-30-M-5545-2**

1. Installation Dimensions



Ver A

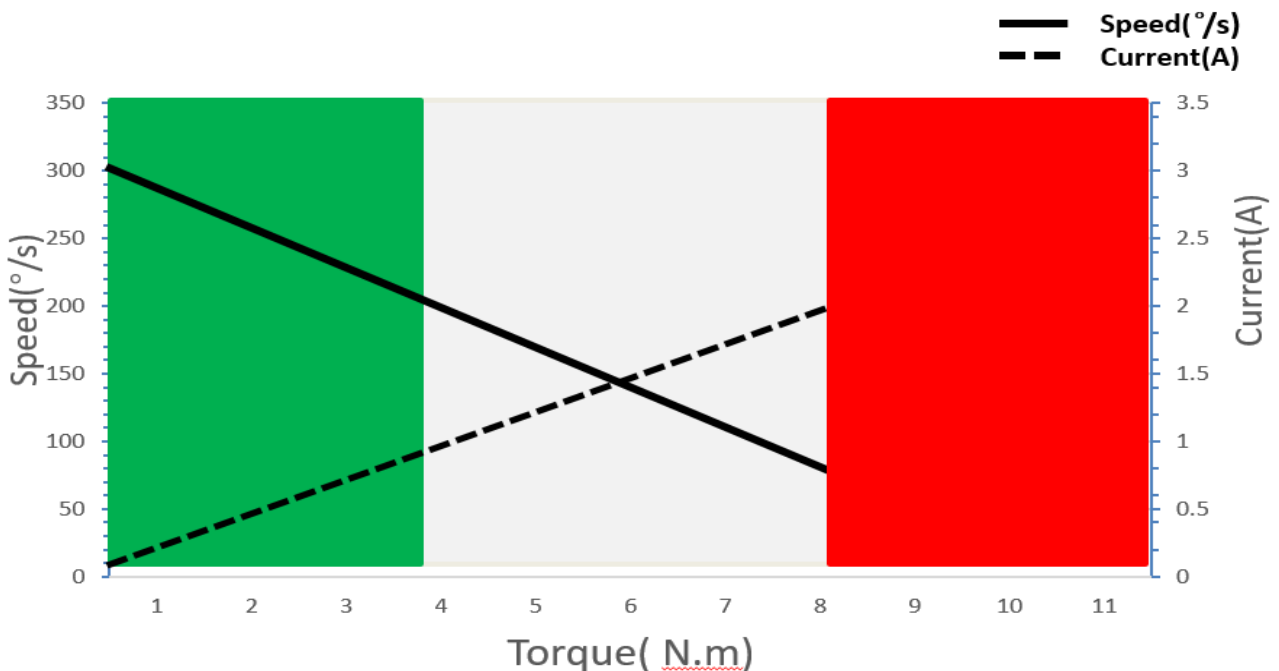
Ver B

	Ver A	Ver B
Case Dimensions	54mm*25mm*96mm	54mm*25mm*96mm
Weight	300g	300g

2. Operating Data

Rated Voltage	DC30V
Voltage Range	DC24V-30V
Stall Torque	8.0N.m@30V
Rated Torque	3.8N.m@30V
Stall Current	2.0A
Rated Current	0.95A
No-load Speed	300°/s @25°C
Rated Speed	200°/s @25°C
Default Travel Angle	±50° = 100° total travel
Max. Standard Travel Angle	±100° = 200° total travel
Extended Travel Angle (optional)	±165° = 330° total travel
Operating Temperature Range	-30°C.....+65°C
Backlash (mechanical)	≅ 0.5°

3. Performance



Operation Model:

■ Continuous
 ■ Short Time<10s Repeat
 ■ <1s,60s Cool

4. Command Signal

4.1 PWM Command Interface

Signal Voltage	TTL-Level: HIGH:min.3.3V,max.5.0V TTL-Level: Low:min.0.0V,max.1.5V
Pulse Lengths	500us-2500us
Pulse Lengths for Position-50°/0°/+50°	1000us/1500us/2000us

4.2 RS 485 Command Interface

Baud-Rate	115200 ±1.5% bits/s
Protocol (Documentation available)	10 Byte (incl. 1 byte Check Sum)

4.3 RS 485 Protocol Specifications

Number of Data Bits	8
Number of Stop Bits	1
Parity	None

Command / Response Frame

Byte #	Description	Byte #	Description
1	Frame Head(0xFE)	6	Data
2	Version(0xCA)	7	Data
3	Address	8	Data
4	Command code	9	Check Sum
5	Data	10	Frame End

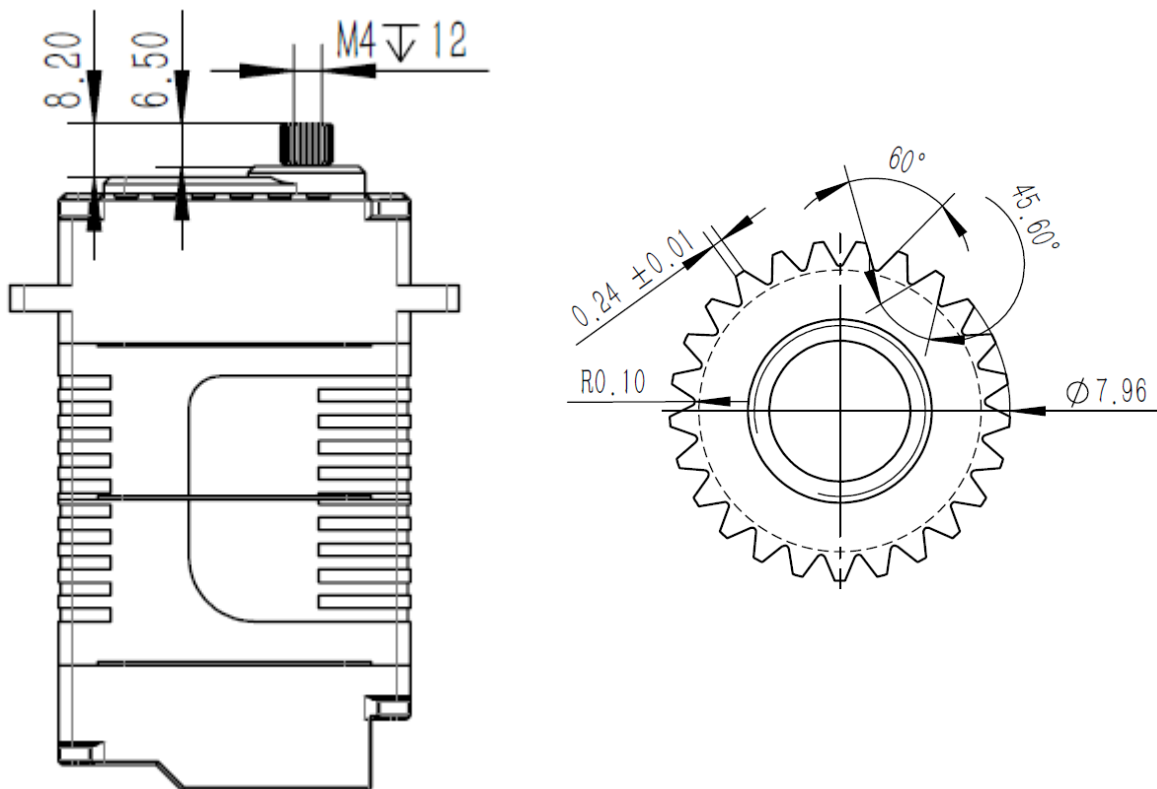
4.4. Position Feedback Value (RS 485 Versions)

Integrated in the RS 485 protocol a Position Feedback Value is available, representing the output shaft's angular position. Value readout by sending a request command. Detailed information is provided in the RS 485 documentation.

5. Materials and Features

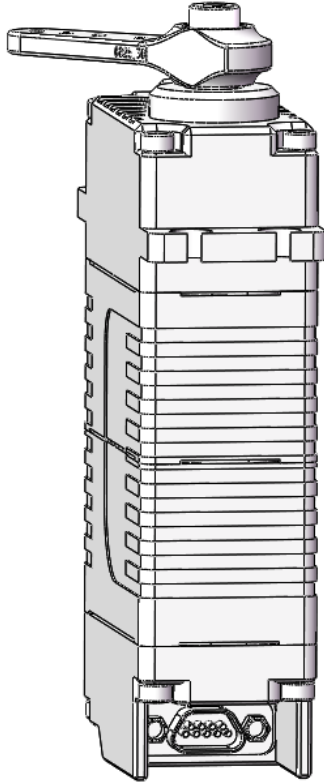
Case Material	Aluminum Alloy 7075
Waterproof Resistance	IP 67, waterproof to 1m depth
Motor Type	Brushless DC Motor
Gear Set Material	Hardened Steel
Position Sensor	Contactless
Shielded Connecting Cable	Optional
RS 485 Communication Interface	Optional


6. Output Shaft Spline




7. Electrical Connection Options

Industrial Standard J30J-9ZKP electrical Connector



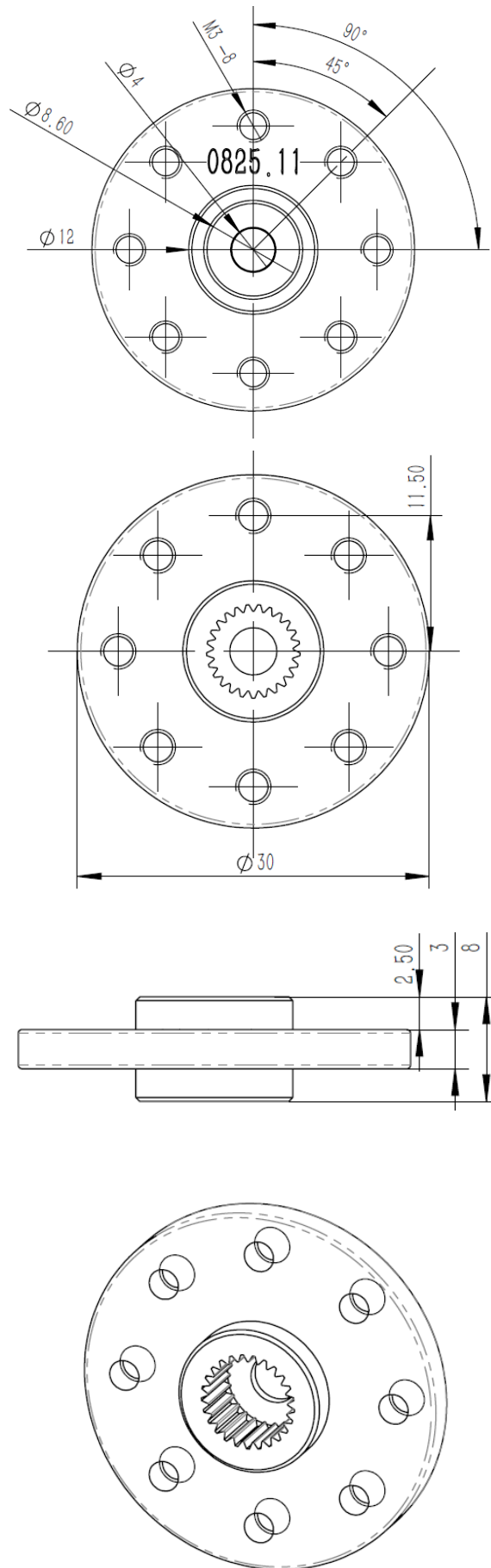
	Standard Connector	
	Type	J30J-9ZKP
	Mating	J30J-9TJL
Pin Assignment (PWM)		
1	□	DC + (Supply Voltage)
2		
3		NC (Do not connect)
4	□	GND (Supply Ground)
5		
6		NC (Do not connect)
7	□	PWM (Command Signal)
8		
9		NC (Do not connect)

	Standard Connector	
	Type	J30J-9ZKP
	Mating	J30J-9TJL
Pin Assignment (RS485)		
1	□	DC +(Supply Voltage)
2		
3		NC (Do not connect)
4	□	GND(Supply Ground)
5		
6	□	RS485A
7		
8	□	RS485B
9		

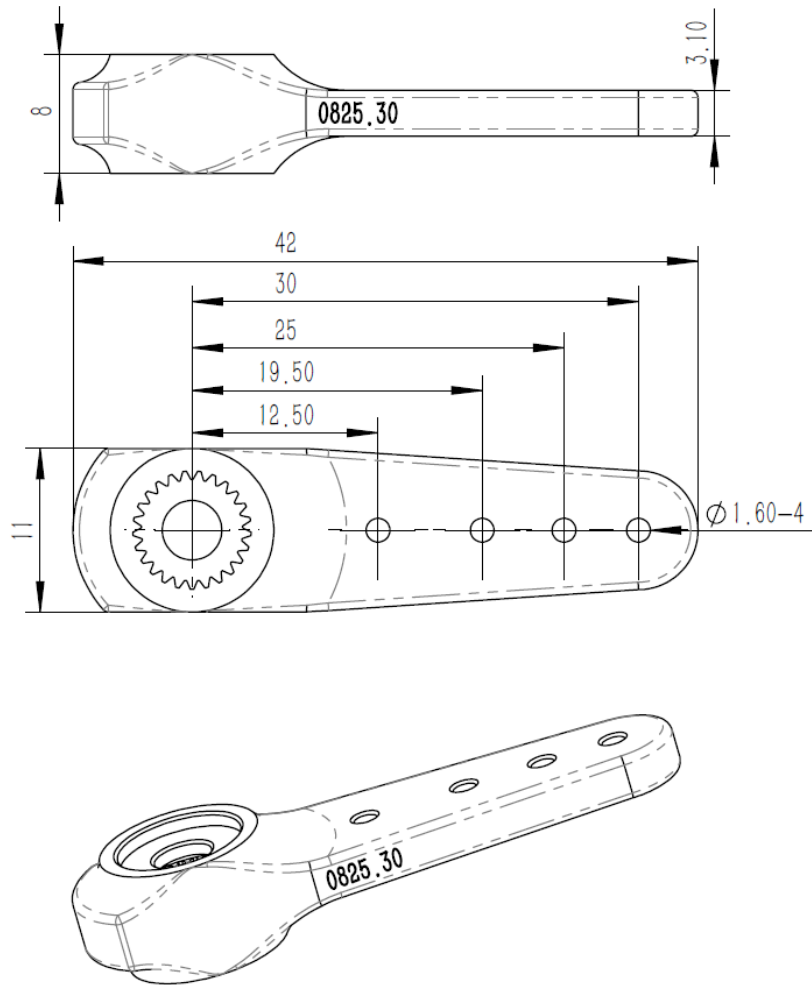
8. Accessories (Optionals)

Item	Item-No.
Aluminum Servo Arm (Single side)	0825.11
Aluminum Servo Disc	0825.30

Item# 0825.11



Item# 0825.30



09. Item Number System

