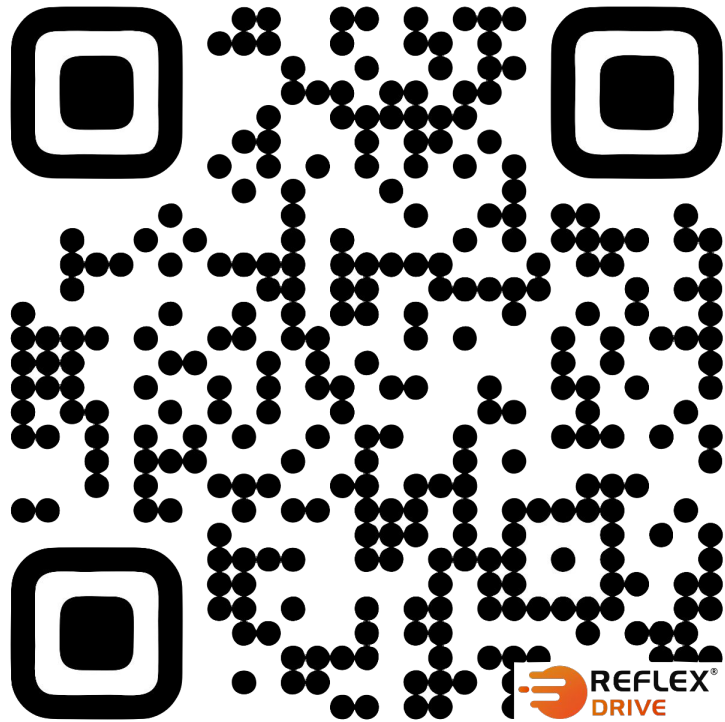




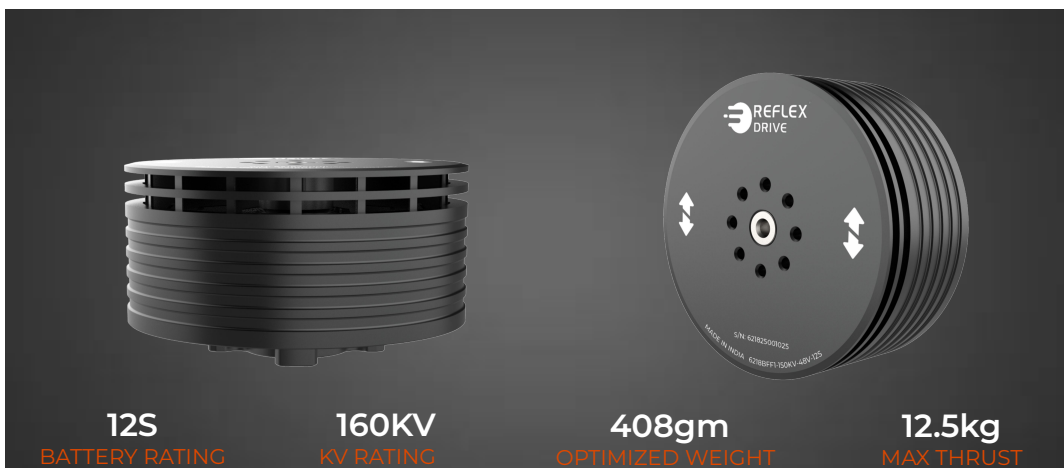
MADE IN INDIA 



RD 6218

UAV BLDC MOTOR





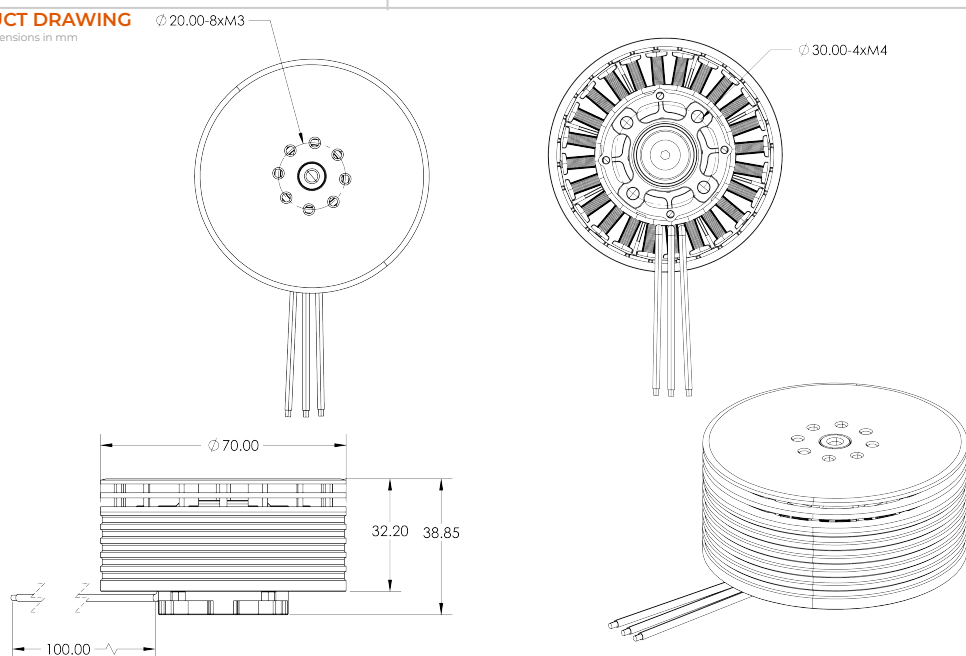
RD 6218

UAV BLDC MOTOR

- RD 6218 is a brushless outrunner motor with a KV rating of 160KV, Made in India. It operates within a 12S voltage range and features advanced cooling for reliable performance and durability under high-thrust conditions.
- The motor can handle a continuous current of 25A and is capable of generating a peak power output of 2.4 kW. It is designed for seamless compatibility with 22-inch to 24-inch propellers.

PRODUCT DRAWING

Note: All dimensions in mm



Specifications

Product name	RD 6218 UAV BLDC MOTOR
Country of Origin	India
Motor Type	Outrunner
KV Rating	160 KV
Maximum Thrust	12.5 KG
Stator Poles / Magnet Poles	24/28
No load Current	1.7 A
Motor Efficiency	93.57 %
Weight (Incl. Wire)	408 grams
Voltage Range	48V SMPS
Peak Current	25 A
Motor Size	Ø70 mm x 38.85 mm
Stator Size	Ø62 mm x 18 mm
Cable Length	100 mm
Cable Type	14 AWG
Magnet Temperature Rating	150 °C
Shaft Diameter	Ø8 mm
Winding Material	100% Copper
IP Rating	Ip34
Maximum Operating Temperature	60 °C
Recommended Propeller	RD 2480
Production Status	Production

Note : MAXIMUM THRUST MAY DEPEND ON BATTERY LEVEL , PROPELLER TYPE , AIR PRESSURE AND OTHER CONDITIONS.

MOTOR : RD 6218 160KV
 ESC : RD FOC 80
 Propeller : RD 2480
 Power Source : 48V SMPS

Throttle %	Servo (1050-1950)	Current (A)	Power (W)	RPM	Thrust (g)	Efficiency (g/w)	Heat sink Temperature	Motor Coil Temperature	Max temperature (°C)
	1050	0.0	0.0	0	0	0.00	33.5°C	33.6°C	Max temperature after turn off the power supply Heat sink : 39°C Motor : 85.5°C
0.0%	1100	0.0	0.0	501	64	0.00	33.7°C	33.4°C	
6.3%	1150	0.0	0.0	501	68	0.00	33.7°C	33.4°C	
12.5%	1200	0.1	5.3	621	113	21.32	33.7°C	33.3°C	
18.8%	1250	0.2	10.8	971	326	30.19	33.7°C	33.1°C	
25.0%	1300	0.7	35.8	1333	686	19.16	33.7°C	33.1°C	
31.3%	1350	1.3	70.0	1672	1137	16.24	33.6°C	33.0°C	
37.5%	1400	2.3	120.0	2021	1692	14.10	33.5°C	33.0°C	
43.8%	1450	3.7	194.0	2371	2396	12.35	33.5°C	33.0°C	
50.0%	1500	5.8	301.0	2709	3155	10.48	33.4°C	33.2°C	
56.3%	1550	8.3	429.0	3058	3964	9.24	33.4°C	33.6°C	
62.5%	1600	11.2	578.0	3415	4967	8.59	33.3°C	34.1°C	
68.8%	1650	15.3	784.0	3763	6051	7.72	33.3°C	34.5°C	
75.0%	1700	19.9	1016.0	4116	7227	7.11	33.4°C	35.6°C	
81.3%	1750	26.2	1321.0	4459	8473	6.41	33.5°C	37.8°C	
87.5%	1800	33.0	1657.0	4817	9775	5.90	33.7°C	38.9°C	
93.8%	1850	41.9	2081.0	5169	11089	5.33	33.9°C	41.4°C	
100.0%	1900	54.0	2651.0	5556	12592	4.75	34.1°C	44.3°C	
	1950	53.2	2610.0	5546	12574	4.82	34.7°C	53.0°C	

NOTE : Performance data tested at approximately 35°C and 123 m above sea level in Lucknow, India.

Test Condition Notes :

- Ambient Temperature : Approximately 35°C.
- Altitude: 123 meters above sea level (Lucknow, India)

