

FPV CM 5320 Brushless DC Motor First-Person **View**

Basic Information

. Place of Origin: Guangdong, China

GS . Brand Name:

CM 5320 235KV Model Number: • Price: Negotiable



Product Specification

CINE CM5320 V1.0 Motor Model: Motor Size: D:61.1 X 56.5 Mm • Propeller Mounting Holes: M8 Nut D:12 M3x2

IN: 8 Mm • Shaft Diameter: 688 *4 . Bearing: • Number Of Pole Pairs: • Varnished Wire Degree: 180°C 150°C Motor Balance:

• Cable Length: 750 Mm 14# Awg Silicone D:44 M4x4, D:30 M4x4 • Motor Mounting Holes:

500 V • Disruptive Test:

Highlight: FPV CM 5320 Brushless DC Motor,

First-Person View Brushless DC Motor



More Images







FPV CM 5320 Brushless DC Motor First-Person View

CM motor is optimized for the X8 coaxial twin propeller installation.

1.Two ultra-thin stainless steel dust filters are added inside the stator.

2.The split exhaust blade is added inside the rotor.

| RPMNV | 235KV | Nominal Voltage | 12s lipo battery |
|-----------------|-----------------------------------|------------------------|-------------------------|
| No Load Current | 2.84A/20V | Internal resistance | 37.5mΩ |
| Motor Weight | 481 g | Product Boxed Weight | 777g(118 x 118 x107 mm) |
| Maximum Current | 69.7 A | Maximum Power | 3198W |
| Maximum thrust | 9.1 kg | Maximum Torque | 2.47 Nm |
| Recommended Esc | MAD AMPX 60A(5- 14S)80A(5-14S) | Recommended Propellers | 15x7x3 16x8x3 17x8x3 |



MAD CINE CM5320 235KV 17x8x3 Carbon Fiber AMPX 80A (5-14S)

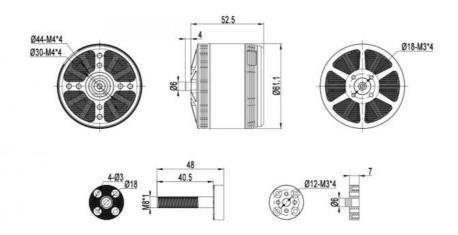
12S MAX 82°C

Analytical Graph of Motor Operation

I - Current, P - Input Power, η - Electrical Efficiency, T - Thrust. N - Rotational Speed
The data above was measured with an input voltage of 48 V. at a temperature of 25°C and sea level. The rotational speed was adjusted by the throttle.

| Motor Data | | | |
|------------------------------|-------------------------------------------------------|-------------------------------------|-----------------------------------------|
| Motor Model | MAD CINE CM5320 V1.0 | Number of pole pairs | 7 |
| Stator | Anticorrosive | Varnished wire Degree | 180°C |
| Motor Size | D:61.1 × 56.5 mm | Magnet Degree | 150°C |
| Degree of Protection | IP45 | Cable Length | 750 mm 14# Awg(Black/Red) silicone |
| Centrifugal Heat Dissipation | YES | Rotor Balance | ≤5 mg |
| Propeller Mounting Holes | M8 Nut D:12 M3×2 | Motor Balance | ≤10 mg |
| Shaft Diameter | IN: 8 mm | Motor Mounting Holes | D:44 M4×4, D:30 M4×4 |
| Bearing | 688 *4 | Disruptive test | 500 V |
| Additional Accessories | M8 Nut*1 , Propeller Plate *2 , Prop MAD Sticker*6 | Adapter *1 , M4*12mm *4 Motor Screw | s , M3*8mm *4 Prop Adapter Fixing Screv |

| Specifications | | | |
|---------------------|----------------------------------------------------------|------------------------------|---------------------------|
| RPM/V | 235KV | Nominal Voltage | 125 lipo battery |
| No Load Current | 2.84A / 20V | Internal resistance | 37.5mΩ |
| Motor Weight | 481 g | Product Boxed Weight | 777g (118 x 118 x 107 mm) |
| Maximum Current | 69.7 A | Maximum Power | 3198W |
| Maximum thrust | 9.1 kg | Maximum Torque | 2.47 Nm |
| Recommended ESC | MAD AMPX 60A (5-14S) 80A (5-14S) | Recommended Propellers | 15x7x3 16x8x3 17x8x3 |
| UAV take-off weight | 12S-17"/ 22kgQuadcopter 33kgHexacopter 44kgOctocopter | Single rotor take-off weight | 5.0kg - 6.0kg |



MAD CINE CM5320 235KV 15x7x3 Carbon Fiber AMPX 60A (5-14S)

12S MAX

| Throttle [%] | Voltage [V] | Current [A] | Input Power [W] | Output Power [W] | Torque [N×m] | RPM/ | Thrust [gf] | Efficiency [%] | Efficiency [gf/W] |
|-----------------|----------------|----------------|-----------------------|---------------------|-----------------|------|----------------|-------------------|----------------------|
| 30 | 48.08 | 1.62 | 77.9 | 52.1 | 0.166 | 2996 | 742 | 66.9 | 9,5 |
| 35 | 48.05 | 2.44 | 117.2 | 85.1 | 0.230 | 3534 | 1029 | 72.6 | 8.8 |
| 40 | 48.00 | 3.38 | 162.2 | 122.7 | 0.294 | 3985 | 1296 | 75.6 | 8.0 |
| 45 | 47.95 | 4.51 | 216.3 | 169.7 | 0.366 | 4428 | 1598 | 78,5 | 7.4 |
| 50 | 47.88 | 6.11 | 292.5 | 236.2 | 0.454 | 4969 | 2063 | 80.8 | 7,1 |
| 55 | 47.80 | 8.13 | 388.6 | 319.9 | 0.556 | 5495 | 2522 | 82.3 | 6.5 |
| 60 | 47.71 | 10.18 | 485.7 | 403.3 | 0.647 | 5952 | 2949 | 83 | 6.1 |
| 65 | 47,62 | 12.69 | 604.3 | 505.2 | 0.754 | 6398 | 3458 | 83.6 | 5.7 |
| 70 | 47.55 | 15.55 | 739.4 | 620.3 | 0.870 | 6808 | 4001 | 83.9 | 5.4 |
| 75 | 47.45 | 18.75 | 889.7 | 745.9 | 0.981 | 7261 | 4502 | 83.8 | 5.1 |
| 80 | 47.33 | 22.01 | 1041.7 | 870.0 | 1.084 | 7664 | 4925 | 83.5 | 4.7 |
| 85 | 47.18 | 26.37 | 1244.1 | 1031.0 | 1.215 | 8103 | 5609 | 82.9 | 4.5 |
| 90 | 47.03 | 31.2 | 1467.3 | 1206.5 | 1.353 | 8515 | 6211 | 82.2 | 4.2 |
| 95 | 46.86 | 36.8 | 1724,4 | 1400.7 | 1,501 | 8911 | 6911 | 81.2 | 4.0 |
| 100 | 46.61 | 44.7 | 2083.5 | 1662.0 | 1,696 | 9358 | 7730 | 79.8 | 3,7 |

MAD CINE CM5320 235KV 16x8x3 Carbon Fiber AMPX 80A (5-14S)

12S MAX 76°C

| Throttle [%] | Voltage [V] | Current [A] | Input Power [W] | Output Power [W] | Torque [N×m] | RPM | Thrust [gf] | Efficiency [%] | Efficiency [gf/W] |
|-----------------|----------------|----------------|-----------------------|---------------------|-----------------|------|----------------|-------------------|----------------------|
| 30 | 48.02 | 2.14 | 102.8 | 74.8 | 0.243 | 2939 | 985 | 72.8 | 9.6 |
| 35 | 47.98 | 3.33 | 159.8 | 122.9 | 0.338 | 3472 | 1360 | 76.9 | 8.5 |
| 40 | 47.95 | 4.69 | 224.9 | 177.9 | 0.434 | 3914 | 1784 | 79.1 | 7.9 |
| 45 | 47.89 | 6.3 | 301.7 | 241.9 | 0.532 | 4342 | 2201 | 80.2 | 7.3 |
| 50 | 47.78 | 8.6 | 410.9 | 336.1 | 0.665 | 4827 | 2701 | 81.8 | 6.6 |
| 55 | 47.65 | 11.48 | 547.0 | 450.1 | 0.809 | 5313 | 3278 | 82.3 | 6.0 |
| 60 | 47.56 | 14.48 | 688.7 | 567.8 | 0.945 | 5738 | 3849 | 82.4 | 5.6 |
| 65 | 47.43 | 18.22 | 864.2 | 714.4 | 1.113 | 6129 | 4512 | 82.7 | 5.2 |
| 70 | 47.30 | 22.29 | 1054.3 | 863.0 | 1.267 | 6504 | 5163 | 81.9 | 4.9 |
| 75 | 47.12 | 27.2 | 1281.7 | 1041.3 | 1.443 | 6891 | 5798 | 81.2 | 4.5 |
| 80 | 46.95 | 32.71 | 1535.7 | 1225.0 | 1.609 | 7270 | 6384 | 79.8 | 4.2 |
| 85 | 46.79 | 38.02 | 1779.0 | 1402.1 | 1.758 | 7616 | 6917 | 78.8 | 3.9 |
| 90 | 46.55 | 45.49 | 2117.6 | 1625.8 | 1.948 | 7970 | 7580 | 76.8 | 3.6 |
| 95 | 46.29 | 53.95 | 2497.3 | 1837.9 | 2.125 | 8259 | 8225 | 73.6 | 3.3 |
| 100 | 45.88 | 66.38 | 3045.5 | 2086.6 | 2.331 | 8548 | 8988 | 68.5 | 3.0 |

MAD CINE CM5320 235KV 17x8x3 Carbon Fiber AMPX 80A (5-14S)

12S MAX 82℃

| Throttle [%] | Voltage [V] | Current [A] | Input Power [W] | Output Power [W] | Torque [N×m] | RPM | Thrust (gf) | Efficiency [%] | Efficiency [gf/W] |
|-----------------|----------------|----------------|-----------------------|---------------------|-----------------|------|----------------|-------------------|----------------------|
| 30 | 48.01 | 2.56 | 122.9 | 91,6 | 0.304 | 2878 | 1149 | 74.5 | 9.4 |
| 35 | 47.96 | 3.97 | 190.4 | 147.5 | 0.411 | 3428 | 1577 | 77.5 | 8.3 |
| 40 | 47.92 | 5.4 | 258.8 | 201.0 | 0.499 | 3847 | 1967 | 77.7 | 7.6 |
| 45 | 47.86 | 7.46 | 357.0 | 284.2 | 0.637 | 4260 | 2403 | 79.6 | 6.7 |
| 50 | 47,77 | 10.12 | 483.4 | 394,4 | 0.789 | 4773 | 3067 | 81.6 | 6.3 |
| 55 | 47.68 | 13.28 | 633.2 | 518.0 | 0.943 | 5246 | 3674 | 81.8 | 5.8 |
| 60 | 47.56 | 17.08 | 812.3 | 664.0 | 1,126 | 5631 | 4352 | 81,7 | 5.4 |
| 65 | 47.42 | 21.29 | 1009.6 | 819.0 | 1.297 | 6030 | 5046 | 81.1 | 5.0 |
| 70 | 47.28 | 25.62 | 1211.3 | 974.1 | 1,455 | 6393 | 5530 | 80.4 | 4.6 |
| 75 | 47,12 | 30.65 | 1444.2 | 1146.1 | 1.619 | 6760 | 6190 | 79,4 | 4.3 |
| 80 | 46.94 | 36.45 | 1711.0 | 1330.9 | 1.776 | 7156 | 6725 | 77.8 | 3.9 |
| 85 | 46.71 | 43.62 | 2037.5 | 1539.0 | 1.979 | 7426 | 7484 | 75,5 | 3.7 |
| 90 | 46.48 | 51,18 | 2378.8 | 1740.2 | 2.136 | 7780 | 8065 | 73.2 | 3,4 |
| 95 | 46.16 | 61.02 | 2816.7 | 1930.5 | 2.294 | 8036 | 8609 | 68.5 | 3.1 |
| 100 | 45.90 | 69.67 | 3197.9 | 2120.8 | 2.468 | 8206 | 9130 | 66.3 | 2.9 |

Use the power system properly according to the following performance parameters. It is recommended to fly under the recommended take-off weight for best performance. Do not fly overweight. Take-off weight exceeding 1.2 times the maximum recommended value can seriously affect performance and safety.

Our Services

1. We provide 1 Year Warranty. Buy with confidence.

- 2. If you are not satisfied when you receive your item, please return it within 14 days for a replacement or money back. Please contact me before you return it.
- 3. If item is defective in 3 months, We will send you a replacement without extra charger, or offer refund after we receive the defective item.
- 4. If item is defective after 3 months, you can still send it back to us. We will send you a new one after receiving the defective item. But you have to pay the extra shipping fee.



FAQ

Q1: Do you support OEM/ODM?

A1: Yes. We can print your logo on the product.

Q2: About samples.

A2: Under normal circumstances, samples will be ready within 7 days, and 10-20 days for OEM/ODM orders. Sample fee and shipping will be charged.

Q3: What is the delivery time?

A3: For regular orders, we can ship within 15 days, for OEM/ODM, we can ship within 25-45 days (depending on the quantity). In the event of delays, we will notify you in advance of the status and resolution.

Q4: What is the minimum order quantity?

A4: There is no MOQ for wholesale (1 piece accepted), including OEM/ODM.

Q5: What are your payment terms?

A5: L/C.TT100%.

Q6: Can you reduce the shipping cost?

A6: When calculating the shipping cost for you, we always choose the cheapest and safest express. Although we have partnerships with shipping companies, we can't keep costs down because it's not us who get paid. If you think it's expensive for you. You can always make your own choice.

Q7: Return policy.
A7: If you want to replace the received item, you must contact us within 7 days after receiving the item. Returned items should be in their original condition and you should pay for additional shipping.



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