FlameWheel550
User Manual

V 1.4



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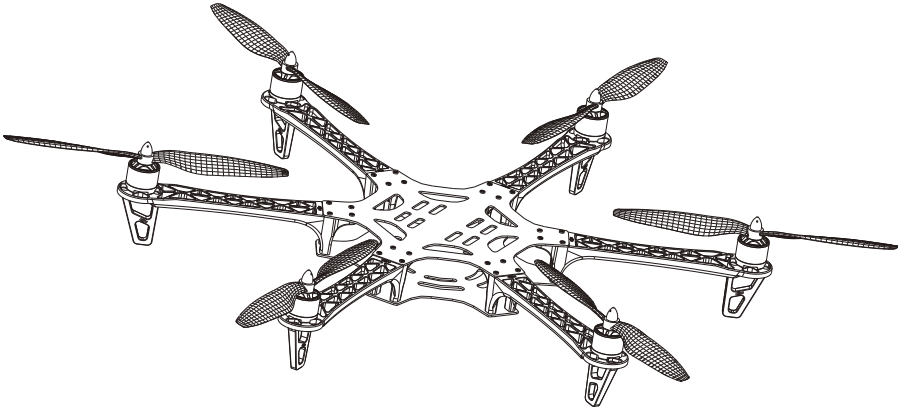
Disclaimer

Read this disclaimer carefully before using FlameWheel550. By using this product, you hereby agree to this disclaimer and signify that you have read them fully. FlameWheel550 is an excellent multi-rotor. With a good autopilot, it will even offer tremendous flight features for low altitude flight working in restricted space. Despite the controller of autopilot operate in the safest manner when the main power battery is connected, we strongly recommend customers to remove all propellers, use power supply from R/C system or flight pack battery, and keep children away during system calibration and parameter setup. Please respect the AMA's National Model Aircraft Safety Code. DJI Innovations assumes no liability for damage(s) or injuries incurred directly or indirectly from the use of this product.

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F550 Profile

FlameWheel550 (F550) is a multi-rotor designed for all pilots for fun or AP. With DJI WKM or NAZA autopilot system, it can achieve hovering, cruising, even rolling and other flight elements. It can be applied for entertainment, aerial photography, FPV and other aero-modeling activities.



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Product Usage Cautions

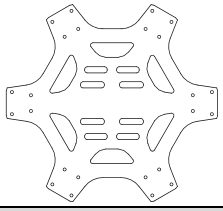
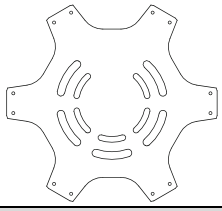
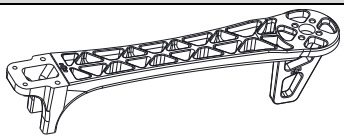
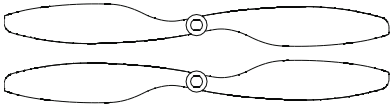
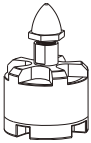
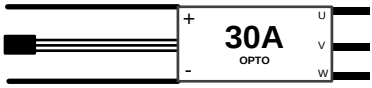
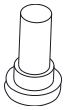
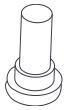
When flying, the fast rotating propellers of FlameWheel550 will cause serious damage and injury. Therefore, please fly with a high safety consciousness.

1. **Keep flying multi-rotor away from objects, such as obstacles, children, human beings, high-voltage lines and so on.**
2. **Do not get close to or even touch the working motors and propellers, which will cause serious injury.**
3. **Do not over load the multi-rotor.**
4. **Check whether the propellers and the motors are installed correctly and firmly before flight.**
5. **Make sure the rotation direction of each propeller is correct**
6. **Check whether all parts of multi-rotor are in good condition before flight. Do not fly with old or broken parts.**
7. **Use DJI parts as much as possible.**

If you have any problem you cannot solve during installation, please contact our customer service.

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In Box

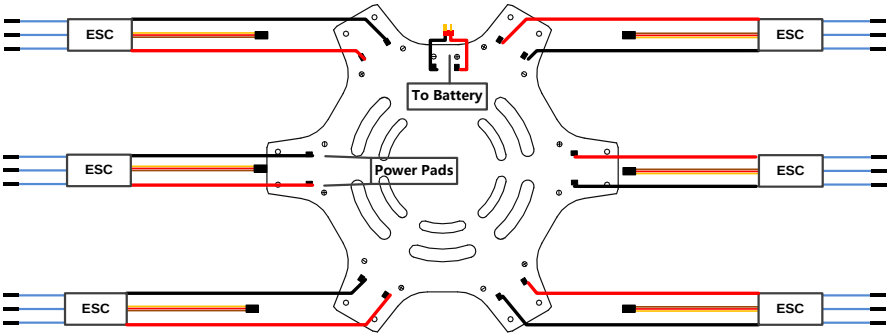
Top Board 550FBT ×1	Bottom Board 550FBB ×1
	
Arms 550FAC ×4 550FAW ×2	**10in Propeller Pairs 550P10×4**
	
Motors 550MOT ×6	**ESC 550ESC ×6**
	
Screws 550-M3×8 ×24	**Screws 550-M2.5×5 ×36**
	
Magic Strap 550MSX ×1, Battery Band 550BBX ×1， Power Line Pair 550PLP ×1	

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Tools Needed

2.0mm Hex Wrench	For frame and motors installation.
Screw Glue	For fastening screws.
Nylon Cable Tie	
Scissors	For binding devices and wires.
Diagonal Cutting Pliers	
Foam Double Sided Adhesive Tape	For fixing receiver, controller and other modules.
Soldering-iron & Wires	For connecting ESCs' power cables to bottom board.

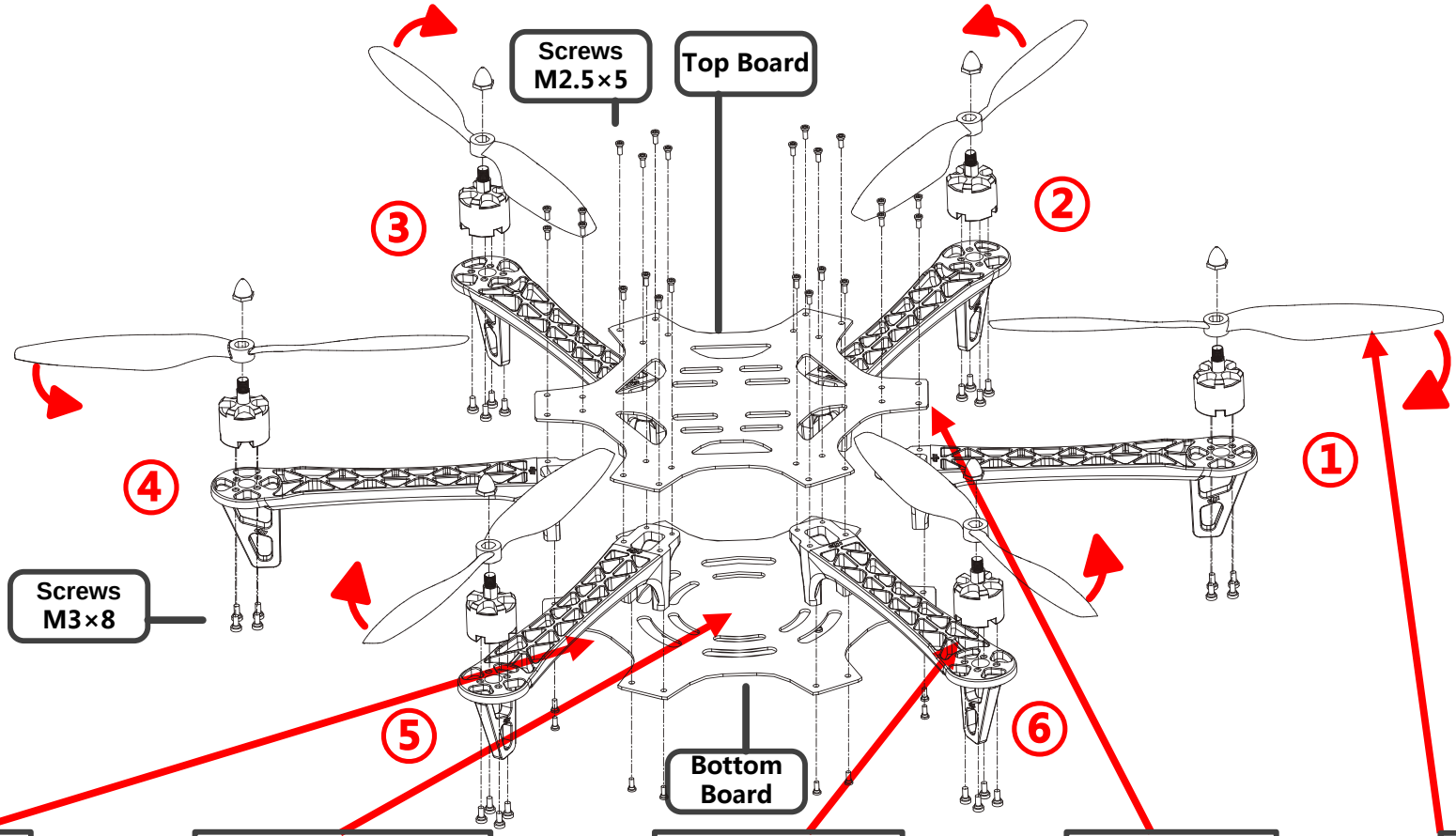
ESC Wiring



- **Please solder ESCs to bottom board as the up figure shows. Use any insulating method at all soldering spots.**
- **Make sure there is no short or open circuit.**
- **Make sure the side with bonding pads is upward.**

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Assembly



Step 1
Install bottom board

Step 2
Install autopilot system

Step 3
Install motors, ESCs

Step 4
Install top board

Step 5
Install propellers

- Install screws by appropriate force to prevent breaking threads.
- Use adequate screw glue for installing screws.

- Please wire neatly. Make sure wires will not be cut by frame boards and propellers.
- Smooth out the boards edge if necessary.

- Please install propellers after autopilot system configuration procedure.
- Make sure the rotation direction of propellers are the same as the figure shows.

In up figure, arms ①② front of craft, arms ④⑤ are back of craft. See from top, motors on arms ①③⑤ rotate counter-clock wise, use propellers 1045; motors on arms ②④⑥ rotate clock wise, use propellers 1045R.

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ESC Sound Introduction

ESC State	Sound
Ready	♪1234567
Throttle stick is not at bottom	BBBBBB…
Input signal abnormal	B--------B--------B…
Input voltage abnormal	BB---BB---BB---BB…

Tips:

DJI ESCs are specially designed for multi-rotors. When use with DJI autopilot systems, you do not have to setup any parameters or calibrate travel range.

Specifications

Frame	
Diagonal Wheelbase	550mm
Frame Weight	478g
Takeoff Weight	1200g ~ 2400g
ESC	
Current	30A OPTO
Signal Frequency	30Hz ~ 450Hz
Battery	3S ~ 4S LiPo
Motor	
Stator size	22×12mm
KV	920rpm/V
Propeller	10 × 4.5in (@3S); (Optional 8 × 4.5in (@4S))

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