F949

LIKE A REAL THREE-CHANNEL FIXED-WING AIRCRAFT 三通道固定翼像真机

INSTRUCTIONS 使用说明书



- This product may ignite under certain conditions
 Use specific Lithium Polymer charger only
 Do not use Ni-Od or Ni-MH charger may cause fire
 Never exceed 1C (1x Capacity) charge rate
- Never leave batteries unattended while charging
- Do not short circuit
 May explode if damaged or disposed of in fire







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Thank you for buying WLTOYS products. The F949 is the latest technology in Rotary RC models. Please read this manual carefully before assembling and flying the new F949 helicopter. We recommend that you keep this manual for future reference regarding tuning and maintenance.

承蒙阁下选用 伟力遥控世界系列产品,谨表谢意。进入遥控世界之前必须告诉 承蒙阁下选用 伟力遥控世界系列产品,谨表谢意。进入遥控世界之前必须告诉 您许多相关的知识与注意事项,以确保您能够在学习的过程中较得心应手。在开 始操作之前,请务必详阅本说明书,相信一定能够给您带来相当大的帮助,也请 您妥善保管这本说明书,以作为日后参考。

1.INTRODUCTION 前言

Thank you for choosing Weili product! F949 is a world's first in a smaller space, and outdoor sport flying remove control fixed-wing aircraft, in order to make it easier and easier Use F949, please read the complete instruction after operating this model airplanes, while you properly save this manual for future reference adjustment as

感谢您选购伟力产品!F949是一台世界首创能在较小空间以及室外飞行的遥控运动型固定翼飞机,为了让您更方便、更容》 使用F949,请您仔细阅读完成说明书后,在操作这台模型飞机,同时请您妥善的保存这本说明书,作为日后调整及维修的参

WARNING LABEL LEGEND 标志代表涵义

WARNING WAKNING 警告

Mishandling due to failure to follow these instructions may result in damage or injury. 因为疏忽这些操作说明,而使用错误可能造成财产损失或严重伤害。

CAUTION

Mishandling due to failure to follow these instructions may result in danger. 因为疏忽这些操作说明, 而使用错误可能造成危险。

FORBIDDEN 禁止

Do not attempt under any circumstances. 在任何禁止的环境下, 请勿尝试操作。

IMPORTANT NOTES重要声明

F949 is a sophisticated hobby product and not a toy. Although small, it still poses certain risk factors that should not be over looked. Please follow safety and operation recommednsations to ensure correct operation this helicopter. The use of this airplane beyond its intended purposes and disassembly may cause unforese danger, and should be avoided.

F949并非玩具,是微型 模型飞机 但是仍然有一定的危险性,请您依安全注意事项与操作说明来正确的使用该模型,任意的改装拆解或使 用不当以及对产品的不熟悉,都可能造成不可预期的危险或意外,请勿轻忽。

Manufacturer and dealer assume no liability for accidental damages by abnormal wear of parts, improp assembly, or operation in unsafe manners. This product is intended for use by age 14 years or older.

Please ensure the product is operated under safe environment. 注意!任何選控飞机的使用,制造商或经销商是无法对使用者於零件使用的损耗异常,组装不当或不安全的环境操作所发生之意外负任何责任,本产品适用年龄14岁以上,请确保在安全无虞的环境下操作,产品售出后本公司将不负责因不当操作/拆卸/改装所引起 的财产损失与人身伤害.

We recommend that you seek the assistance or an experienced pilot before attempting to fly our products for the first time. A local expert is the best way to properly assemble, setup, and fly your model for the first time. The requires a certain degree of skill to operate, and is an item subject to normal wear and tear. Any

damage or dissatisfaction as a result of accidents or modifications are not covered by any warrantee and cannot be returned for repair orreplacement. Please contact our distributors are not covered by any warrantee and cannot discounted rates when you experience problems during operation or maintenance.

模型商品属于需高操作技术且为消耗性商品,如经拆装使用后,会造成不等到情况零件损耗,任何使用情况所造成商品不良或不满意,将无法 於保固条件内更换新品或退货,如遇有使用操作维修问题,本公司全省分公司或代理将提供技术指导,特价零件供应服务。

2. SAFETY NOTES 安全注意事项

↑ CAUTION 注意

Fly only in safe areas, away from other people. Do not operate R/C aircraft within the vicinity of crowds or people. R/C aircraft are prone to accidents, failures, and responsible for their actions and damage or injury occurred during pilot error, and radio interference. pilots are responsible for their actions and damage or injury occurred during the operation or as of a result of R/C aircraft models.

通控模型飞机,属于危险性商品,飞行时务必远离人群,人为组装不当或机件损坏,电子控制设备不良,以及操控上的不熟悉,都有可能导致飞行失控损签伤等到不可预期的意外,请飞行者务必注意飞行安全,并需了解自负疏忽所造成任何意外之责任。

Special despecial design for indoor & outdoor, please keep it away from obstacle Special despecial design in Special despecial design in Special despecial design in Special despecial design in Special despecial despe

工作、是月间的,即使阿姆斯特 This product is suitable for indoor and outdoor(the wind grade should be no more than 4), please choose a place without obstacle, and keep distance from crowd and pets, don't play it under unsafty, for instance, heat source, wire or electonic power source, in order not to be damaged by collision landing, entanglement and lead to a fire, electric shock and cause losses of lives and property

losses of lives and property 本产品适合室内、室外(包括室外风力不要大于4级) 环境飞行模型飞机飞行时请妥善选择无障碍物的室内、 室外场地、并与人群政业物等到保持适当距离,切勿於不安全的环境下操作,如热源、电线、电源等等, 以免直升机碰撞、迫降、纠缠而引发火灾、电击等危险,造成生命财产损失。

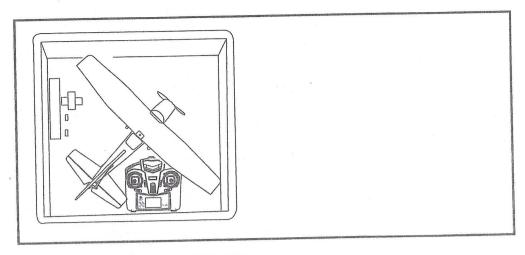


● FORBIDDEN 禁止 PREVENT MOISTURE 远离潮湿环境 R/C models are composed of many precision electrical components. It is critical to keep the model and associated equipment away from moisture and other contaminants. The introduction or exposure to water or moisture in any form can cause the model to malfunction resulting in melfunction, or a crash. Do not operate or expose To rain or moisture. 飞机内部也是由许多精密的电子零组件组成,所以必须绝对的防止潮湿或水汽,使用,防止水汽进人机身内部而导致机件及电子零件故障而引发不可预期的意外! 避免在浴室或雨天时 PROPER OPERATION 勿不当使用本产品 To avoid potential fire hazard from batteries, please do not short, reverse polarity, or puncture batteries. Battery charging must be done under supervision at all times, and at location out of reach by children. Double check the four AA batteries are rechargeable Ni-CD/MH batteries before charging. The manufacturer or this product will not be liable for accidental damages before charging. The manutacturer or this product will not be liable for accidental damage incurred by charging non-rechargeable batteries. 请勿任意拆卸或任意改造加工,任何的升级改装或维修,请使用伟力产品目录中的零件,以确保结构的安全。 请确认於产品限界内操作,请勿过载使用,并勿用於安全、法令外其它非法用途。 **○**FORBIDDEN SAFETY NOTE FOR NI-MH BATTERIES 镍氢电池使用安全 Make sure the batteries are installed based on polarity indicated in the case and do not mix batteries of different chemistry/spec. Please take out the batteries if you are not going to use for a long time to avoid potential leakage which may damage the transmitter. Please dispose depleted batteries according to local laws and ordinances. Do not dispose improperly. 安装时请确认正负极位置,新旧电池请勿同时混用以免影响电池寿命。若长时间不使用本产品,请取出电池, 以免造成电池漏液、故障。若电池有漏液状况请勿再使用。废弃的电池,请依照该使用国家或地区的废弃物 清理法令回收,切勿任意丢弃以免污染环境。 0 SAFETY NOTE ON LI-POLYMER BATTERIES 锂聚电池使用安全 SAFETY NOTE ON LI-POLYMER BATTERIES 锂聚电池使用安全 Li-Polymer batteries poses higher operational risks compared to other battery chemistry, thus it is imperative to follow its usage instructions. Manufacturer and dealer assume no thus it is imperative to follow its usage instructions. Manufacturer and dealer assume no liability for accidental damages caused by improper usage. Do not use charger other than the factory supplied unit to avoid potential fire and explosion. Do not crush, disassemble, burn, and reverse polarity. Avoid metallic materials to come into contact with battery"s polarity and cause it short and never puncture batteries to avoid fire Battery charging must be done under supervision at all times, and at location out of reach by children. Please stop the use or charge of the battery should there be an unusual increase in battery temperature after use. Continue use of this battery may cause it to expand, deform, explode, or even result in fire hazards. Please dispose depleted batteries according to local laws and ordinances. Do not dispose Please dispose depleted batteries according to local laws and orumances. Deflot dispressing the property. 「國家电池校其他电池有更高的危险性,使用前请务必详读并遵照下列注意事项使用本电池,本公司将不对 任何不当使用所造成的损害负责。 严禁使用原厂以外的充电器进行充电,以免发生爆炸起火的危险。 严禁撞击、拆解、正负极反接、焚烧电池,避免金属物品碰触电池正负极造成短路。并请防止尖锐的物品刺穿电池,以避免电池起火的危险。 充电时请董慎小心,确保在您的视线范围内进行充电。并远离幼童可以接触到的地方,以免发生危险。 电池使用后如有发热情况,严禁充电。否则会造成电池膨胀、变型、爆炸甚至起火燃烧,危害生命财产的安全。 废弃的电池,请严格依照该使用国家或地区的废弃物清理法令回收,以免污染环境。 ▲ CAUTION KEEP AWAY FROM HEAT 远离热源 R/C models are made of various forms or plastic. Plastic is very susceptible to damage or deformation due to extreme heat and cold climate. Make sure not to store the model near any source of heat such as an oven, or heater. It is best to store the model indoors, in a climate-controlled, room temperature environment. 遥控飞机多半是EPO泡沫、电子商品为主要材料质,因此要尽量远离热源、日晒、以避免因高 温而变形甚至熔毁损坏的可能。

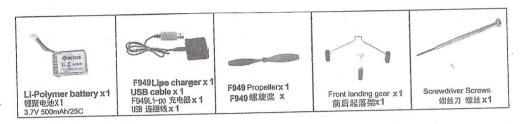
The products are suitable for more than 14 years old age, at the beginning it will have some certain difficulty in learing, suggestion guidance by exprienced when playing. 本产品适用年龄14岁以上, 遥控模型飞机在学习初期有着一定难度,需要熟练操控模拟器上面的模型飞机可飞行。

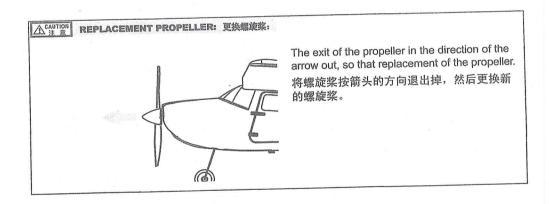


3.PACKAGE ILLUSTRATION 包装说明

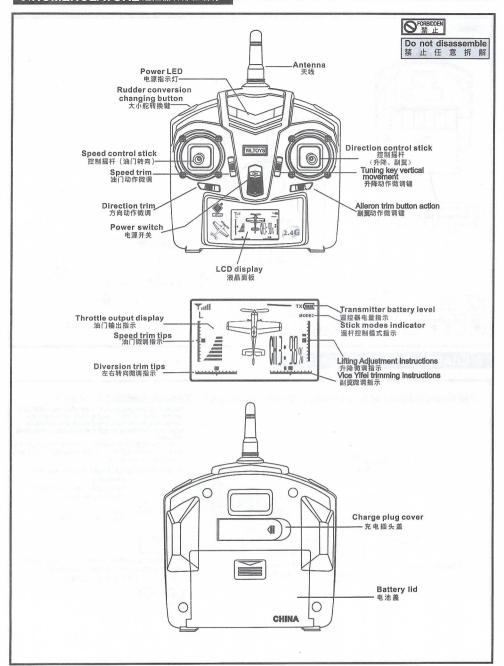


4.STANDARD EQUIPMENT 标准配件

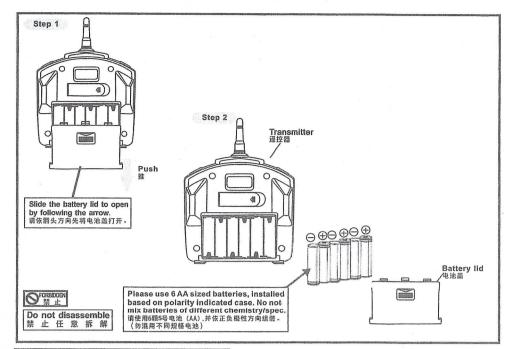




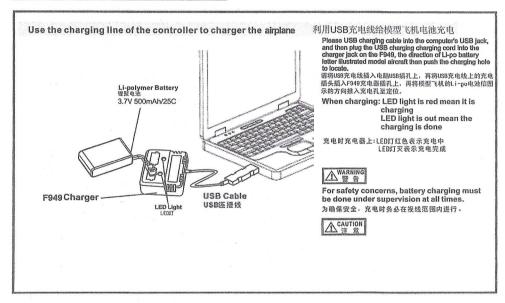
5.NOMENCLATURE 遥控器各部位名称

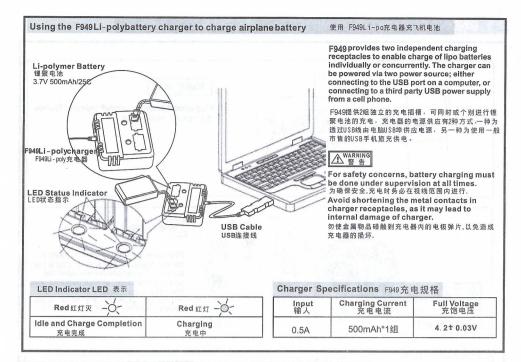


6.TRANSMITTER BATTERY INSTALLATION 運控器电池安装



7. CHARGING BATTERIES 电池的充电

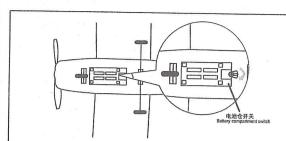




8 .BATTERY AND CHARGER SPECIFICATION 电池与充电器相关规格

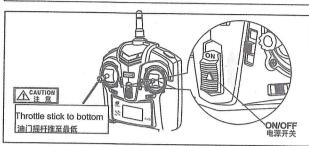
Battery type	Battery Specification	Usage Duration		Charge Time	
电池种类	电池规格	可使用时间		充电所需时间	
_i-poly battery 锂聚合物电池	3.7V 500mAh/25C	airplane flight time 模型飞机飞行时间	Approx. 25 Minutes 约 25 分钟	Approx. 60 Minutes (Charging current approx. 0.5A) 约60分钟(充电电流约0.5A)	

9. BINDING OF RADIO TRANSMITTER AND RECEIVER 運控器与接收器的对频



Step 1 步骤1

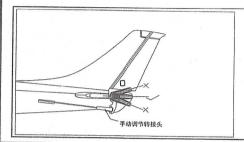
Plug aircraft batteries, aircraft indicator flashes 插上飞机电池,飞机指示灯闪烁。



Step 2 步骤2

First open the remote control, remote First open the remote control, remote control, issued a "bit" sound. after a few seconds the remote control After the sound of the code, aircraft indicator light the code is complete.

《福开播发器、通控器发出"海海"的响声。几秒钟后通控器对码声响完、飞机指示灯常亮,对码完成。



Step 3 步骤3

After the completion of the code, each rudder should gyrus, gyrus if not it can be manually rotating joint gyrus.

对码完成后,各舱面应回中, 如不回中 可以手动旋转接头使其回中。

10 FLIGHT AND LANDING 飞行与降落

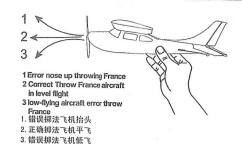


Take off the ground 地面起飞

Good code according to the above steps, each rudder reconfirm whether gyrus. The aircraft on a flat surface and to windward, the aircraft quickly push the throttle Forward reach a certain speed, gently pull one o'clock elevator joystick (do not pull too much)

Aircraft can leave the ground.

按上面步骤对好码,再次确认各个舵面有无回中。把飞机放在平 坦的路面且要迎风,推油门使飞机快速前进达到一定速度后,轻 拉一点升降舵捆杆(不要拉太多)飞机便可离开地面。



Hand throwing off 手撐起飞

Good code according to the above steps, each rudder reconfirm whether gyrus.

Push the throttle to about 60%, while the windward forward horizontal throw light pull Next elevator (do not pull too much)

按上面步驟对好码,再次确认各个舱面有无回中。 油门推到60%左右,迎风向前方水平掷出同时轻拉 下次升降舱(不要拉太多)



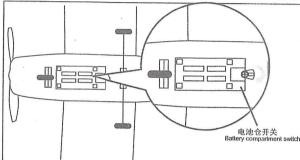
Landing 降落

When the aircraft is immediately feels underpowered when landing, the aircraft first flew Head upwind downwind landing zone adjustment, reduce the throttle low flight speed, the aircraft Then slowly glide down, knowing that the aircraft touches the ground, and then the throttle to the bottom, Taxiing to the appropriate pull the elevator.

当飞机飞行时感觉动力不足时请立即降落,首先把飞机飞到下风区调整机 头迎风降落,把油门拉低降低飞行速度,飞机便慢慢向下滑行。直到飞机 接触地面,然后油门拉到最低,滑行过程中要适当拉一下升降舵。

▲ CAUTION 注意

Falling off if routes can play alleron or rudder correction. 下滑过程中如果航线偏离可打方向能修正。



Ending flight 结束飞行

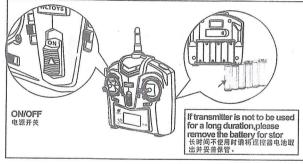
Remove the helicopter battery safely at the conclusion of flight. This should be made into a post flight habit to avoid unforeseeable problems.

结束飞行时, 请将模型飞机电池安全取下。请养成良好习惯, 以免造成遗憾。

▲ WARNING 警告

Warning: If left connected in the helicopter for long duration, the battery may be damaged due to over-discharge, or even become fire

hazards。 电池未取下,将导致电池过放电而损坏,甚至造成 起火燃烧的危险。



Turn off the transmitter. If transmitter is not to be used for a long duration, please remove the battlery for storage. 长时间不使用时请将避控器电池取出并妥善保管。

▲ WARNING 警告

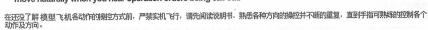
Warning: If the AA batteries are left in the transmitter, potential leakage could occur which may damage the transmitter, and create fire hazards. 电池未取下、将导致电池漏液而损坏遥控器、甚至遗成起火燃烧的危险。

11 .FLIGHT ADJUSTMENT AND SETTING 飞行动作调整与设定

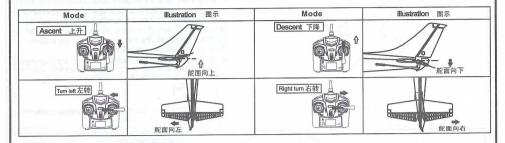
PLEASE PRACTICE SIMULATION FLIGHT BEFORE ACTUAL FLYING 飞行前请先熟练模拟飞行

Before you are familiar with the air plane , pleasure don't set it fly, read the instruction carefully. Get familiar with all kinds of direction control and keep repeating until you can play it as you perform your wishes

- 1.Place the airplane in a clear open field and the tail of air plane point to yourself.
- 2.Practice to operate the throttle stick(as below illustration)and repeat practicing "Throttle high/low", "Aileron left/right", "Rudder left/right",and "Elevator up/dowm".
- 3.The simulation flight practice is very important, please keep practicing until the fingers move naturally when you hear operation orders being call out.



- 3. 模拟飞行的练习相当重要,请重复练习直到不需要思索,手指能自然随着喊出的指令移动控制。 3. 模拟飞行的练习相当重要,请重复练习直到不需要思索,手指能自然随着喊出的指令移动控制。



FLIGHT ADJUSTMENT AND NOTICE FOR BEGINNERS 初学飞行调整与注意

↑CAUTION 注意

OCheck if the screws are firmly tightened.

OCheck if the transmitter and receivers are fully charged.

◎再次确认螺丝是否锁固?

◎发射器和接收器电池是否足够。

STEP 1 THROTTLE CONTROL PRACTICE油门控制练习





When arriving at the flying field. 请在没有人及障碍物的空旷室内、室外飞行





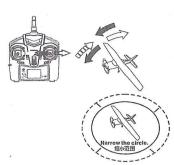
When the model aircraft from the ground, slowly throttle control the level of Uniform flying the aircraft can not be fierce fuel door. 当模型飞机离地后,慢慢控制好油门高低 使飞机匀速飞行,不可猛加油门。

STEP 3 RUDDER CONTROL PRACTICING 方向舵操作练习

When the model aircraft from the ground, if the aircraft taxling on the road to play the rudder offset correction direction after takeoff Rudder to change course.
当根型飞机高地时,如果飞机在路面滞行偏移可打方向舱修正,起飞后可打方向舱於变船线。

Beginners must practice good pre-flight simulator or an experienced person guidance to fly.

初学者飞行前一定要练习好模拟器或者有经验的人士指导方可飞行。



ADJUSTMENT OF EACH TRIM 飞行动作微调

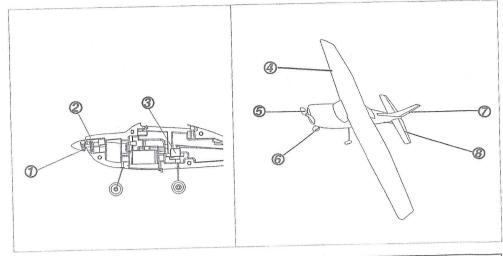
When the model aircraft leaves the ground, if the aircraft tend to use different fine-tuning 当模型飞机离开地面时,若飞机倾方向不方同可使用微调修正

1.Adjustment of rudder trim 调整方向舵锁调 Just before the helicopter lift-off, the nose lean left/right... When leans right, adjust the trim to left side. When leans left, adjust the trim to right side. 当模型飞机飞高地面时,机头朝左/右方向偏移... 向右偏移时,微调向左调整。

2.Adjustment of elevator trim 调整升降舵微调 When the model aircraft off the ground, the nose up / down shift. ura Insa up / uown Snift.
When the alcraft looked up, fine-tuning adjustment upward.
Alcraft light bow, trimming downward adjustment.
当校理·机飞高地面时,机头向上/向下偏移。
飞机飞行移头时,谈询向上调整。
飞机飞行低头时,谈询向下调整。

12.TROUBLE SHOOTING DURING FLIGHT 如何排除飞行中的状况

	Situation 状况	Cause 原因	Way to deal 对策	
1	Receiver status LED blinks continuously for more than 4 seconds after airplane battery inserted. No response to control input. 接上 模型飞机电池接收器指示灯持续风烁,操作	Unable to bind to transmitter. 遥控器与接收器未对频成功	Repeat the power up initializing process. (Refer to P.11:Binding of radio transmutter and receiver) 请重新执行通控器与接收机板的对频动作 (请参阅2.7 遥控器与接收器的对频)	
2	无反应 No response after battery is connected to airplane .接上模型飞机 电池后飞机没有任何反应	1.power to transmitter and receiver. 2.Check transmitter and receiver voltage. 3.Poor contact on battery terminals. 1.检查通控器和接收器全接通电源 2.检查通控器和接收电池的电压 3.电池极片接触不良	1.Turn on transmutter and ensure airplane battery is inserted properly. 2.Use fully charged batteries. 3.Re-seat the battery and ensure good contact between battery contacts. 1.打开发射器与确实指人飞机电池至定位 2.使用完全充电充饱的电池 3.重新插入电池、确认电池和电池极片的接触是否正常	
3	Motor does not respond to throttle stick, receiver LED flashes. 推动油门提杆时马达不转,且接收器指示灯开始闪烁。	Airplane battery depleted. 飞机锂聚电池电量不足	Fully charge the battery, or replace with a fully charged battery. 将电池充电或更换另一个充饱的电池	
4	Main rotor continue to spin after landing 降落之后,主旋翼仍在旋转未停止	Throttle trim accidentally increased during flight. 飞行中误将油门微调调高	Confirm throttle trim is in center or slightly below. 确认油门微调在中间位置或是稍微向下调	
5	Motor fails to run,but servo moves. 马达不转,但何股器仍有动作	1.Throttle trim is too high, triggering safety protection function. 2.Throttle was not all the way down during power up. 3.Loose motor connection or damaged motor 1.油门酸调谱高,启动安全保护功能 2.开机时,油门播杆末置于最低点 3.马达接头轮脱氧马达损坏	1.Lower throttle trim and restart throttle. 2.Lower throttle stick all the way down and restart throttle. 3.Re-seat the motor plug or replace the motor. 1.调低油门微调后重新启动油门 2.将油门提杆推至最低点后. 重新启动油门 3.将接头插至定位或更换场不换马达	
6	Main rotor spins but unable to takeoff. 模型飞机主旋翼有持续转动但不能起飞	1.Deformed main blades. 2. Airplane battery depleted 1.主旋翼变形 2.飞机电池电量不足	1.Replace main blades 2.Charge or replace with a fully charged battery. 1.更换旋翼 2.将电池充电或是更换另一个充饱的电池	
7	Strong vibration of airplane 模型飞机震动的很厉害	1.Deformed main blades 2.Bent main shaft 1.旋翼变形 2.主轴弯曲	1.Replace main blades 2.Replace main shaft 1.更换旋翼 2.更换主轴	
8	B Model aircraft can not fly straight yaw 模型飞机偏航飞不直	Does not return the rudder surface 方向舵面没有归中	1.Fine tune the direction to go in the rudder 2.Adjust the rudder surface of the wire to the rudder return 1. 调方向微调至舱面归中 2. 调整方向舱面钢丝至舱面归中	
-	9 Model Aircraft rise or down 模型飞机抬头或低头	The elevator did not go in the face 升降舵面没有归中	1 Tone elevator rudder trim to go in 2 Adjust the elevator surface of the wire to the rudder return 1. 调升降稅徵调至於面归中 2. 调整升降稅面钢丝至於面归中	



No.	Code No.	Name	Specification	Quantity	Remarks
110.		PROPELLOR	WLF949-		009
2		BATTERY	WLV931-		015.
3		2.49 RECEIVER	WLF949-		007
4		HAIN WING	WLF949-		003
5		RUSELAGE	WUF949-		100
6		LANDING GEAR	WUF949-		005
7	7	TAIL PECESSORIES	WLF949-	-	002
8	1				

MOTOR WLF949-006.

Specifications ,c for inadvertert ∈ 本说明书内的材 主动通知消费者

WITTO 8

Specifications & Equipment/ 规格配备:

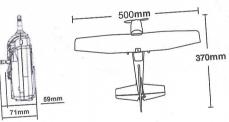
F949

Length/机身长:370mm Main Blade Length/ Flying weight 58G/

翼展: 500mm 飞行重量: 58G



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