Tactic logo

TTX440 2.4GHz 4-Channel Spread Spectrum Radio

**insert pic of radio with Tactic graphics on all labels

INSTRUCTION MANUAL

The Tactic TTX440 radio system uses 2.4GHz spread spectrum technology, and automatically selects and shifts between frequencies in the 2.4GHz band very rapidly. This prevents unwanted outside interference from interrupting control of the model, ensuring error-free flying and eliminates the need to pull frequency pins before every flight. Tactic 2.4GHz transmitters and receivers are not compatible with other brand 2.4GHz equipment.



For safe operation and best results, it's strongly recommended to completely read this manual before use! Also read and understand the instructions included with the model. Damage resulting from misuse or modification will void your warranty.

FEATURES

- * 2.4GHz Spread Spectrum Technology
- * Transmitter can bind to multiple Tactic receivers
- * Tiny, lightweight receiver with internal antenna
- * Built-in failsafe
- * Trims and servo reversing for all four channels
- * Power LEDs with low battery warning indication

TRANSMITTER (Tx)

Four "AA" batteries are required to power the transmitter. Non-rechargeable alkaline or rechargeable nickel-cadmium (NiCd) or nickel-metal hydride (NiMH) cells can be used. Do not mix old and new cells, or mix non-rechargeable alkaline cells with rechargeable NiCd or NiMH cells, etc. See the SERVOS AND ACCESSORIES section at the end of this manual for battery options available at local hobby retailers. The TTX440 transmitter does **not** include a charge jack for rechargeable cells. A separate cell charger will be necessary to use rechargeable batteries.

*** insert pic of rear of Tx, battery door open, label as Figure 1

To install the batteries, slide open the battery door on the rear of the Tx (see figure 1). Install the batteries in the holder as shown in the diagram (see marks molded inside the case). Make sure to note the proper polarities on each cell. Close the battery door.

** insert diagram with callouts and identify as "Figure 2" throttle control and trim rudder control and trim aileron control and trim elevator control and trim neck strap eyelet power switch antenna reversing switches LED power indicators

POWER SWITCH AND LED INDICATORS: When the power switch is turned on, three color-coded LEDs should indicate the power status of the internal batteries. If the red, yellow, and green LEDs turn on, the transmitter has good power for flight. Never start a flight if the green LED is not illuminated. If only the red and yellow LEDs illuminate, internal battery power is dropping and it's recommended to land the aircraft soon. If only the red LED is illuminated, the transmitter's power is dangerously low and the model should be landed immediately to avoid a total loss of control.



IMPORTANT: Do not operate an R/C model with weak batteries as it could result in reduced range and/or possible loss of control! Make sure alkaline batteries have ample charge remaining before every flight! Rechargeable batteries should be fully recharged prior to each flight!

AILERON (CH1, left/right): Controls the moveable surfaces at the end of both main wings. With the aileron reversing switch in the NORMAL position, moving the aileron stick to the right will cause the airplane's right wing to drop and the airplane will bank to the right. Moving the aileron stick to the left will cause the airplane's left wing to drop and the airplane will bank to the left. This is one important function for turning the aircraft.

ELEVATOR (CH2, up/down): Controls the moveable surfaces on the horizontal section of the airplane's tail. With the elevator reversing switch in the NORMAL position, pulling the elevator stick back (towards you) will cause the nose of the airplane to rise. Pushing the elevator stick forwards (towards the antenna) will cause the nose of the airplane to drop. When using the ailerons to bank the airplane's wings, pulling the elevator stick back will help to turn the aircraft more quickly.

THOTTLE (CH3, up/down): Controls the speed (R.P.M.) at which the engine or electric motor operates. With the throttle reversing switch in the NORMAL position, pulling the throttle stick back (towards you) will cause the engine's speed to be at minimum. Pushing the throttle stick forward (towards the antenna) will cause the engine's speed to be maximum.

RUDDER (CH4, left/right): Controls the direction of the tail of the airplane. With the rudder reversing switch in the NORMAL position, moving the rudder stick to the right will cause the airplane's tail to move right. Moving the rudder stick to the left will cause the airplane's tail to move left.

TRIMS: Each channel also includes a "trim" lever, located adjacent to the respective stick. Trim levers for the aileron, elevator, and rudder channels are used to finely tune the radio's controls with the moveable surfaces in the aircraft. Ideally, when the sticks are released during a flight and allowed to spring back to center position, the aircraft should not veer in any direction on its own. If the aircraft does veer, slightly move the trim lever for the respective control surface until the aircraft no longer veers in any unwanted direction.

The trim lever for the throttle channel is mostly used to finely control the engine or motor at low speeds. For safety reasons, it's a good idea to use throttle trim when controlling engine/motor speed when the aircraft is on the ground. For aircraft with glow engines, the precise position of the trim lever is helpful when determining the engine's preferred idle point.

REVERSING SWITCHES: Four reversing switches are built into the Tx, one for each channel. Each switch can reverse the rotational direction of the servo that is connected to the respective channel. This is often a much easier method for changing the direction of a servo's movement as opposed to altering the mechanical connections between the model's surface and the servo.

*** insert diagram of adjustable sticks, marking it as "Figure 3", marking the tip as "A" and the base as "B"...can be found in many Futaba manuals

ADJUSTABLE STICKS:

Both stick lengths can be adjusted to match different preferences as shown in the figure here. Turn the stick head (A) counterclockwise and stick head (B) clockwise to unlock. Adjust the length to your preference and lock in reverse order.



ANTENNA

When operating the model, always carefully rotate the Tx antenna so that it's locked in the full upright position. Failure to properly adjust the antenna could result in poor signal between the transmitter and receiver. It is not possible to remove the antenna from the transmitter.

RECEIVER OPERATION AND INSTALLATION

*** insert line drawing of receiver with Tactic art with the following callouts, and label as "Figure 4"

CH4 Rudder servo

CH3 Throttle (electronic speed control or servo)

CH2 Elevator servo

CH1 Aileron servo

"Bind" button

RECEIVER (Rx): Mount the receiver as specified in your model's instructions. It's important to keep the Rx as far away from the engine/motor, servos, and ESC and other electronic items as possible. To prevent the receiver from becoming damaged, it might be acceptable to attach it inside certain models using Velcro®. In certain cases, wrapping the receiver with foam rubber can help to prevent damage from occurring due to vibration, but foam rubber can prevent adequate airflow from passing over the receiver in warm environments which might not be recommended. Additional Tactic receivers can be purchased from your local retailer (part number TACL0245) that will also work with the transmitter included with this system.

^{***} insert line drawing of servo mounting method, label as "Figure 5"

SERVOS: CENTER THE TRIM LEVERS on the Tx. Mount the servos inside the model, and connect the linkages to the servo using an appropriate length servo arm.

All servos should be mounted as shown in the model's instructions. Use rubber grommets, screws and brass eyelets supplied when mounting your servos (see figure 5). Do NOT over-tighten the mounting screws. The servos should be able to move slightly to compensate for engine vibration. Use a servo horn long enough to accommodate the entire range of movement for that particular control. When mounting the servos, make sure the pushrods are not too loose or bind in anyway. Pushrods should be capable of operating the full range of the servo. This can be tested by moving the Tx sticks to maximum positions several times while observing the movement of the control services. If a servo is binding or sticks in flight, it should be re-adjusted so not to drain excessive current from the battery and thus shorten flight time.

Connect the servos to the receiver as shown in Figure 4. Route the wires so they do not interfere with any moving parts. Slide the transmitter's trim levers to finely adjust the servo's center point as needed to match the installation. See the SERVOS AND ACCESSORIES section at the end of this manual for a full list of optional servos.

ELECTRONIC SPEED CONTROL (ESC): If the model is electric powered, an optional electronic speed control will be necessary to control speed of the electric motor. Connect the receiver plug on the ESC to the slot marked CH3 (throttle) on the receiver. Center the transmitter's throttle trim and follow the ESC instructions for proper operation and connection of the power battery.

GLOW POWERED AIRCRAFT: If the model is powered by a glow engine, a switch harness, 4-cell battery, and y-harness will be necessary to power the receiver and servos. See the SERVOS AND ACCESSORIES section for suggested options.

** insert graphic showing battery and servo connected to switch harness, and switch harness connected to CH3, label as Figure 6

Connect the base-lead of the y-harness to CH3 (throttle) on the receiver. Connect one of the opposite ends of the y-harness to the throttle servo, and the remaining lead of the y-harness to the switch-harness. Connect the 4-cell battery to the opposite end of the switch harness.

Turning "on" the switch harness should supply power to the receiver and all servos.

ON/OFF POWER SWITCHES AND BATTERIES: Refer to the model's instructions for the preferred way to mount the on/off power switch and battery. It's often necessary to locate the battery in a specific position to optimize the model's center of gravity.

To mount an on/off power switch inside an airplane, cut a hole in the side of the fuselage large enough to allow the switch's lever to move freely from end-to-end. If the switch harness includes mounting screws, be sure not to cut the hole so long that would prevent the mounting screws from being installed firmly.

For glow models, locate the switch away from the engine's exhaust. Always locate a model's on/off switch in a location well away from the model's propeller.

BIND THE RECEIVER TO THE TRANSMITTER

For proper operation of the 2.4GHz transmitter and receiver system, it is necessary to "bind" them together electronically. This ensures sole communication between the two, and prevents other transmitters from being able to control the receiver. To bind the Tx and Rx:

- 1. Turn on the transmitter.
- 2. Apply power to the receiver.
- 3. If the receiver's LED flashes once and then stays on, the Rx is already bound to the Tx and you can skip to the next section. Otherwise, insert a small diameter screwdriver through the hole marked "BIND" and press the pushbutton until the LED glows red and then turns off after about one second.
- 4. Release the "BIND" button.
- 5. If the binding is successful, the Rx LED will flash once and then remain ON.
- 6. Test for proper Tx / Rx functionality in the next section. If the radio doesn't appear to have become properly binded, repeat steps 1-6 above.

SYSTEM CHECK AND OPERATION



IMPORTANT! During all pre-flight preparations with the aircraft on the ground, make sure the throttle stick remains at the minimum position and do not stand the transmitter upright on the ground. Make sure to carefully place the Tx on its back on the ground! This will prevent the transmitter from falling over and possibly dislodging the throttle stick from the low position and causing a safety hazard. Make sure all devices are properly mounted inside the model, and all wiring connections are solid to prevent them from easily becoming dislodged during normal flight. It's best to check the system with the propeller removed from the aircraft.

- 1. Once all connections are made, it's time to check the general operation of the radio and all other components before attempting a flight.
- 2. Move the transmitter's throttle stick to the minimum position.
- 3. Turn on the transmitter and then the receiver.
- 4. Make sure all servos are rotating in the proper direction. If any servo is turning in the wrong direction, change the position of the reversing switch for that particular channel (refer to the model's instructions if necessary).
- 5. With both sticks at neutral position, move the Tx trim levers for the aileron, elevator, and rudder channels so each respective control surface is perfectly aligned with the main surface. For example: When the aileron trim lever is in the center position, it's best that the trailing edge of the aileron is aligned with the trailing edge of the wing itself (not above or below the wing's trailing edge).
- 6. It's important to determine that when the transmitter's throttle stick is at maximum position the same command will be delivered to the model, and vise-versa for minimum throttle. Depending on whether the model is electric powered or uses a glow engine:
 - a. Electric aircraft: confirm that when the throttle stick is at maximum position the electronic speed control gives the appropriate indications (LED and/or audible indicators) for full forward flight. And, when the throttle stick is at minimum position the electronic speed control gives the appropriate indications for "off" or no motor rotation.
 - b. Glow engines: confirm that when the throttle stick is at maximum position the mechanical linkage to the engine allows the engine to be at full throttle. And, when the throttle stick is at minimum position and the throttle trim lever is moved to minimum position, the engine stops completely.
- 7. Perform a "range check". The "range" is the safe operating distance from the Tx to the Rx, and should be as far as you can clearly see the model. With the assistance of another person, place the aircraft on the ground and walk away from the model. Operate the transmitter's controls, and ensure the movement of all surfaces is according to the movement of the transmitter.
- 8. Anytime power is to be removed from the radio system, it's important to shut down power in the aircraft **first**. Otherwise, the aircraft could become out of control and cause a safety hazard!
 - a. For a glow engine, move the throttle stick and throttle trim lever to minimum position to stop the engine. Once the engine has stopped, turn off power to the receiver. Only afterwards should power to the transmitter be shut off.
 - b. For an electric flight model, reduce the throttle stick to minimum and turn off the ESC's power switch. Then turn off the power switch for the receiver. Only afterwards should power to the transmitter be shut off.

FLYING THE AIRCRAFT

1. Once all setup procedures have been confirmed, re-attach the propeller to the model.



IMPORTANT: Be very careful to avoid moving propellers!!

- 2. Start the engine, or arm the electronic speed control.
- 3. During the first flight, it might be necessary to re-trim the aileron, elevator, and rudder channels to allow the airplane to sustain smooth, even flight. If further adjustments are required on the ground, make sure to turn off the engine or ESC/motor before making such adjustments.

4. When the flight is completed, remove power from the system as described before. Shut down power to the electronic speed control or glow engine first, then the receiver, and finally the transmitter.

FAILSAFE FUNCTION

This radio system includes a "failsafe" function, which will automatically center (bring to neutral) all servos if the receiver loses signal communications from the transmitter. When the receiver regains signal it will automatically resume normal function. It's a good idea to test this function on the ground. With the engine or electric motor turned off, power the transmitter and receiver and make sure all controls work properly. Turn off power to the transmitter and observe if the airplanes controls move to the pre-set neutral point. Re-apply power to the transmitter and confirm that total control of all aircraft surfaces is regained. If it does not appear the failsafe system is functioning properly, see the Troubleshooting Guide at the end of this manual.

SAFETY GUIDE

The Academy of Model Aeronautics (AMA) has established an Official Safety Code. Model flying **MUST** be in accordance with this Code in order for AMA Liability Protection to apply. All questions relating to the AMA Safety Code, liability insurance program, and other official AMA information can be attained from the AMA:

Academy of Model Aeronautics 5161 East Memorial Drive Muncie, Indiana 47302 (765) 287-1256 – Business (765) 289-4248 – Fax (800) 435-9262 – Membership Services http://www.modelaircraft.org http://www.modelaircraft.org/files/Memanual.PDF

The AMA's Official 2009 Safety Code includes the following regarding the use of model aircraft:

2009 Official Academy of Model Aeronautics National Model Aircraft Safety Code Effective January 1, 2006 GENERAL

- 1. A model aircraft shall be defined as a non-human-carrying device capable of sustained flight in the atmosphere. It shall not exceed limitations established in this code and is intended to be used exclusively for recreational or competition activity.
- 2. The maximum takeoff weight of a model aircraft, including fuel, is 55 pounds, except for those flown under the AMA Experimental Aircraft Rules.
- 3. I will abide by this Safety Code and all rules established for the flying site I use. I will not willfully fly my model aircraft in a reckless and/or dangerous manner
- 4. I will not fly my model aircraft in sanctioned events, air shows, or model demonstrations until it has been proven airworthy.
- 5. I will not fly my model aircraft higher than approximately 400 feet above ground level, when within three (3) miles of an airport without notifying the airport operator. I will yield the right-of-way and avoid flying in the proximity of full-scale aircraft, utilizing a spotter when appropriate.
- 6. I will not fly my model aircraft unless it is identified with my name and address, or AMA number, inside or affixed to the outside of the model aircraft. This does not apply to model aircraft flown indoors.
- 7. I will not operate model aircraft with metal-blade propellers or with gaseous boosts (other than air), nor will I operate model aircraft with fuels containing tetranitromethane or hydrazine.
- 8. I will not operate model aircraft carrying pyrotechnic devices which explode or burn, or any device, which propels a projectile of any kind. Exceptions include Free Flight fuses or devices that burn producing smoke and are securely attached to the model aircraft during flight. Rocket motors up to a G-series size may be used, provided they remain firmly attached to the model aircraft during flight. Model rockets may be flown in accordance with the National Model Rocketry Safety Code; however, they may not be launched from model aircraft. Officially designated AMAAir Show Teams (AST) are authorized to use devices and practices as defined within the Air Show Advisory Committee Document.
- 9. I will not operate my model aircraft while under the influence of alcohol or within eight (8) hours of having consumed alcohol.
- 10. I will not operate my model aircraft while using any drug which could adversely affect my ability to safely control my model aircraft.
- 11. Children under six (6) years old are only allowed on a flight line or in a flight area as a pilot or while under flight instruction.
- 12. When and where required by rule, helmets must be properly worn and fastened. They must be OSHA, DOT, ANSI, SNELL or NOCSAE approved or comply with comparable standards.

RADIO CONTROL

- 1. All model flying shall be conducted in a manner to avoid overflight of unprotected people.
- 2. I will have completed a successful radio equipment ground-range check before the first flight of a new or repaired model aircraft.
- 3. I will not fly my model aircraft in the presence of spectators until I become a proficient flier, unless I am assisted by an experienced pilot.
- 4. At all flying sites a safety line or lines must be established, in front of which all flying takes place. Only personnel associated with flying the model aircraft are allowed at or in front of the safety line. In the case of airshows or demonstrations a straight safety line must be established. An area away from the safety line must be maintained for spectators. Intentional flying behind the safety line is prohibited.
- 5. I will operate my model aircraft using only radio-control frequencies currently allowed by the Federal Communications Commission (FCC). Only individuals properly licensed by the FCC are authorized to operate equipment on Amateur Band frequencies.
- 6. I will not knowingly operate my model aircraft within three (3) miles of any preexisting flying site without a frequency-management agreement. A frequency-management agreement may be an allocation of frequencies for each site, a day-use agreement between sites, or testing which determines that no interference exists. A frequency-management agreement may exist between two or more AMA chartered clubs, AMA clubs and individual AMA members, or individual AMA members. Frequency-management agreements, including an interference test report if the agreement indicates no interference exists, will be signed by all parties and copies provided to AMA Headquarters.
- 7. With the exception of events flown under official AMA rules, excluding takeoff and landing, no powered model may be flown outdoors closer than 25 feet to any individual, except for the pilot and the pilot's helper(s) located at the flight line.
- 8. Under no circumstances may a pilot or other person touch a model aircraft in flight while it is still under power, except to divert it from striking an individual.

- 9. Radio-controlled night flying is limited to low-performance model aircraft (less than 100 mph). The model aircraft must be equipped with a lighting system which clearly defines the aircraft's attitude and direction at all times.
- 10. The operator of a radio-controlled model aircraft shall control it during the entire flight, maintaining visual contact without enhancement other than by corrective lenses that are prescribed for the pilot. No model aircraft shall be equipped with devices which allow it to be flown to a selected location which is beyond the visual range of the pilot.

FREE FLIGHT

- 1. I will not launch my model aircraft unless I am at least 100 feet downwind of spectators and automobile parking.
- 2. I will not fly my model aircraft unless the launch area is clear of all individuals except my mechanic, officials, and other fliers.
- 3. I will use an effective device to extinguish any fuse on the model aircraft after the fuse has completed its function.

SERVOS AND ACCESSORIES

Stock #	Description
HCAM0110	CS-12 High Speed Micro Servo
HCAM0120	CS-35 High Power Mini BB Servo
HCAM0165	CS-64 Standard High Torque 2BB Servo
HCAM0191	CS-70MG Super Torque 2BB Servo
HCAM0290	CS110 Digital Micro High Speed BB MG Servo
HCAM0295	CS115 Digital Micro High Torque BB MG Servo
HCAM0300	CS126 Digital Std 2BB Servo
HCAM0304	CS140 Digital Std High Speed 2BB MG Servo
HCAM0308	CS150 Digital Std High Torque 2BB MG Servo
HCAM0312	CS160 Digital Std High Torque/Speed 2BB MG Servo
HCAM0316	CS170 Digital Std Ultra Torque 2BB Titanium Gear Servo
GPMM1210	ElectriFly™ ES50 Nano Servo
GPMM1220	ElectriFly ES80 Micro Servo
GPMM1230	ElectriFly ES100 Standard Servo
HCAM6301	HydriMax™ Ultra NiMH 4.8V 750 Flat Rx AAA
HCAM6308	HydriMax Ultra NiMH 4.8V 1600 Flat 2/3A
HCAM6321	HydriMax Ultra NiMH 4.8V 2000 Flat Rx AA
HCAM2400	Switch Harness w/Charge Plug – Futaba J
HCAM2430	Switch Harness w/Charge Plug – JR/Hitec/Spektrum
HCAM2500	Y-Harness Futaba J
GPMM1800	ElectriFly Silver Series SS-8 Brushless 8 Amp ESC
GPMM1810	ElectriFly Silver Series SS-12 Brushless 12A ESC
GPMM1820	ElectriFly Silver Series SS-25 Brushless 25A ESC
FUGP6688	4 AA Rechargeable Cells w/1 Hr Wall Charger
SANP3500	Sanyo AA Alkaline Batteries (4)
SANP3501	Sanyo AA Alkaline Batteries (8)
SANP1100	N-700AAC 1.2V AA NiCd Rechargeable Cells
TACL0445	Tactic TTX440 2.4GHz 4 Channel Receiver Only

SPECIFICATIONS

TTX440 4-Channel Transmitter

Channels: 4

Frequencies: 2.403 – 2.480GHz

Input power: four "AA" alkaline, NiCd, or NiMH cells (3.8 - 8.0V)

Output power: < 0.1W

Power indicators: red, yellow, green LEDs slide switches all channels

Mechanical trims: all channels

4 Channel Receiver

Channels: 4

Receiving frequencies: 2.403 – 2.480GHz

Input power: four "AA" alkaline, NiCd or NiMH cells (4.0 - 6.0V)

Dimensions: 1.77 x 0.98 x 0.5" (45 x 25 x 13mm)

Weight: 0.25 oz (7g)

IMPORTANT WARNINGS AND PRECAUTIONS



* **NEVER** allow water or moisture to make contact with the electronic components inside the transmitter, receiver, servos, switch harness, etc.! This could lead to failure or improper functionality of components and poor control of aircraft which could pose a safety hazard.

- * **NEVER** operate R/C model aircraft near power lines, radio or cell phone towers, roads or automobiles, buildings, or pedestrians. Be very careful in locations where many R/C aircraft are being used simultaneously.
- * **NEVER** operate R/C equipment if you are physically impaired as it could pose a safety hazard to yourself or others in the are
- * **NEVER** allow small children to operate/control model R/C equipment without the supervision of an adult.
- * **NEVER** allow the transmitter's throttle stick to accidently be moved away from the "off" or minimum position while the model's engine/motor is moving.
- * **ALWAYS** range check the radio system before use.
- * **ALWAYS** make sure that all transmitter stick movements operate all servos properly in the model. Check the proper operation of control surfaces before- and after starting the engine/motor.
- * **ALWAYS** make sure the transmitter antenna is unfolded entirely so that it's pointing upright to ensure max. range and control of the aircraft.
- * Do not store your radio equipment in extremely hot or cold locations, in direct sunlight, in locations with high humidity. Store R/C equipment in cool and dry locations.
- * Do not allow chemicals to come in contact with any parts of the radio system. Substances such as glow fuel, gasoline, CA glue, etc. could permanently damage plastic parts of the radio system.
- * If NiCd batteries were installed in the transmitter, remove the batteries before placing the radio in long-term storage.

TROUBLESHOOTING

RANGE IS SHORT: Interference – check Rx installation and servo connections. Low Tx or Rx battery – replace the batteries or recharge if applicable. Transmitter antenna not unfolded properly. Rx may need to be located to a different position in the model for better reception. Crash damage – send the radio to Hobby Services for repair.

RUN TIME IS SHORT: Low Tx or Rx batteries – replace or recharge the batteries. Obstructed servo linkages causing excess battery drain – free the linkages / pushrods.

Tx POWER SWITCH ON BUT SERVOS DO NOT FUNCTION: Tx or Rx batteries are low – replace or recharge the batteries. Rx switch is in the off position – turn on the ESC or switch harness. Switch harness or ESC is connected incorrectly – check all connections and the ESC instruction manual. Rx is not binded to the Tx properly – perform binding process again.

INTERFERENCE OR SERVOS GLITCHING: Out of range – operate the model more closely to the transmitter. Outside radio interference from pagers, strong industrial or other commercial transmitters in the area - check your local R/C club regarding local operation. Rx located too closely to engine, motor, or servos or other moving mechanical parts which might be creating unwanted electrical noise – relocate Rx inside the mode.

CONTROL SURFACE MOVES IN THE WRONG DIRECTION: Reverse the position of the reversing switch for the appropriate channel.

ONLY ONE SERVO GLITCHES: Servo is bad – replace the servo or send to Hobby Services for repair.

FAILSAFE NOT WORKING CORRECTLY: Receiver is not properly binded to the transmitter – bind the Rx to the Tx and re-try. Contact Hobby Services for further details.

FCC STATEMENT

This device complies with part 15 of the FCC rules. Operation is subject to the following two conditions.

- (1) This device may not cause harmful interference.
- (2) This device must accept any interference received, including interference that may cause undesired operation.

FCC Rf Radiated Exposure Statement: The equipment complies with FCC Rf radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with a minimum distance of 20 centimeters between the radiator and your body.

NOTE: THE MANUFACTURER IS NOT RESPONSIBLE FOR ANY RADIO OR TV INTERFERENCE CAUSED BY UNAUTHORIZED MODIFICATIONS TO THIS EQUIPMENT. SUCH MODIFICATIONS COULD VOID THE USER'S AUTHORITY TO OPERATE THE EQUIPMENT.

1-YEAR LIMITED WARRANTY - *U.S.A. and Canada Only

Tactic warrants this product to be free from defects in materials and workmanship for a period of one (1) year from the date of purchase. During that period, Tactic will, at its option, repair or replace without service charge any product deemed

defective due to those causes. You will be required to provide proof of purchase (invoice or receipt). This warranty does not cover damage caused by abuse, misuse, alteration or accident. If there is damage stemming from these causes within the stated warranty period, Tactic will, at its option, repair or replace it for a service charge not greater than 50% of its then currant retail list price. Be sure to include your daytime telephone number in case we need to contact you about your repair. This warranty gives you specific rights. You may have other rights, which vary from state to state.

For service on your Tactic product, send it post paid and insured to:

HOBBY SERVICES

3002 N. Apollo Dr., Suite 1
Champaign, IL 61822
Tel: (217) 398-0007 (9:00am - 5:00pm CST, M-F)
E-mail: hobbyservices@hobbico.com

CE logo RoHS logo

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- * This product is suitable only for people of 14 years and older. This is not a toy!
- * WARNING: CHOKING HAZARD May contain small parts. Keep away from children under 3 years. Please retain packaging for future reference.
- * No part of this manual may be reproduced in any form without prior permission.
- * The contents of this manual are subject to change without prior notice.
- * Tactic is not responsible for the use of this product.