

COMPLETE RTF AIRPLANE

HOBBICO®

FLYZONE
by Hobbico

SKYSAILER



- Quiet Electric Flight
- Radio-Controlled Model
- Requires 8 (AA) Alkaline Batteries (not included)

Radio-controlled!
READY-TO-FLY

ASSEMBLE ONLY WITH ADULT SUPERVISION

Please read through this instruction booklet to THOROUGHLY familiarize yourself with the assembly and flight characteristics of this airplane before beginning to assemble the kit.

Please inspect all parts carefully before starting assembly! If any parts are missing, broken or defective, or if you have any questions about the assembly or flying of this airplane, please call us at **(217) 398-8970** and we'll be glad to help.

WARRANTY

Hobbico, Inc. guarantees this kit to be free from defects in both material and workmanship at the date of purchase. This warranty does not cover any component parts damaged by use or modification. In no case shall Hobbico's liability exceed the original cost of the purchased kit. Further, Hobbico reserves the right to change or modify this warranty without notice.

In that Hobbico has no control over the final assembly, no liability shall be assumed nor accepted for any damage resulting from the use by the user of the final user-assembled product. By the act of using the user-assembled product, the user accepts all resulting liability.

If the buyers are not prepared to accept the liability associated with the use of this product, they are advised to return this kit immediately in new and unused condition to the place of purchase.

**PROTECT YOUR MODEL, YOURSELF
AND OTHERS.
FOLLOW THIS IMPORTANT SAFETY
PRECAUTION**

Your Flyzone™ Skysailer is not a toy, but rather a sophisticated, working model that functions very much like an actual powered hang glider. Because of its realistic performance, the model, if not assembled and operated correctly, could possibly cause injury to yourself and spectators or damage property.

We highly recommend that you get experienced, knowledgeable help with assembly and during your first flights, to make your R/C modeling experience totally enjoyable. You'll learn faster and avoid risking your model before you're truly ready to solo. Your local hobby shop has information about flying clubs in your area whose membership includes qualified instructors. You can also contact the national **Academy of Model Aeronautics** (AMA), which has more than 2,500 chartered clubs across the country. Instructor training programs and insured newcomer training are available through any one of these clubs.

Contact the AMA at the address or toll-free phone number below.

Academy of Model Aeronautics

5151 East Memorial Drive

Muncie, IN 47302

(800) 435-9262

Fax: (765) 741-0057

or via the internet at: <http://www.modelaircraft.org>

PRECAUTIONS

1. Assemble the Skysailer **according to the instructions**. **Do not** alter or modify the model. If you make any modifications, you will void your warranty.
2. **Test** the operation of the model **before each flight** to insure that all equipment is operating properly, and that the model remains structurally sound.
3. Fly only on calm days (with wind speeds less than 7mph) and in large open areas free of trees, people, buildings or any other obstacles.

Remember: Take your time and follow the instructions to end up with a well-built model that is straight, durable and easy to fly.

The R/C model hobby becomes more and more enjoyable as your experience grows. Your chances for success and graduation to higher levels are very good if you take your time and follow the assembly and flying instructions carefully and completely. We hope you enjoy flying your Flyzone Skysailer.

GLOSSARY

Electronic Speed Control with Auto Cut-off: This unit controls the motor. Also, it monitors the battery voltage and turns off the motor when the voltage gets low. That way there will be enough battery power remaining to operate the steering control for landing.

Motor: The motor rotates the prop to provide thrust.

NiMH Battery: Rechargeable batteries which are used as power for the hang glider's motor .

Sail: The wing part of the hang glider is called the sail.

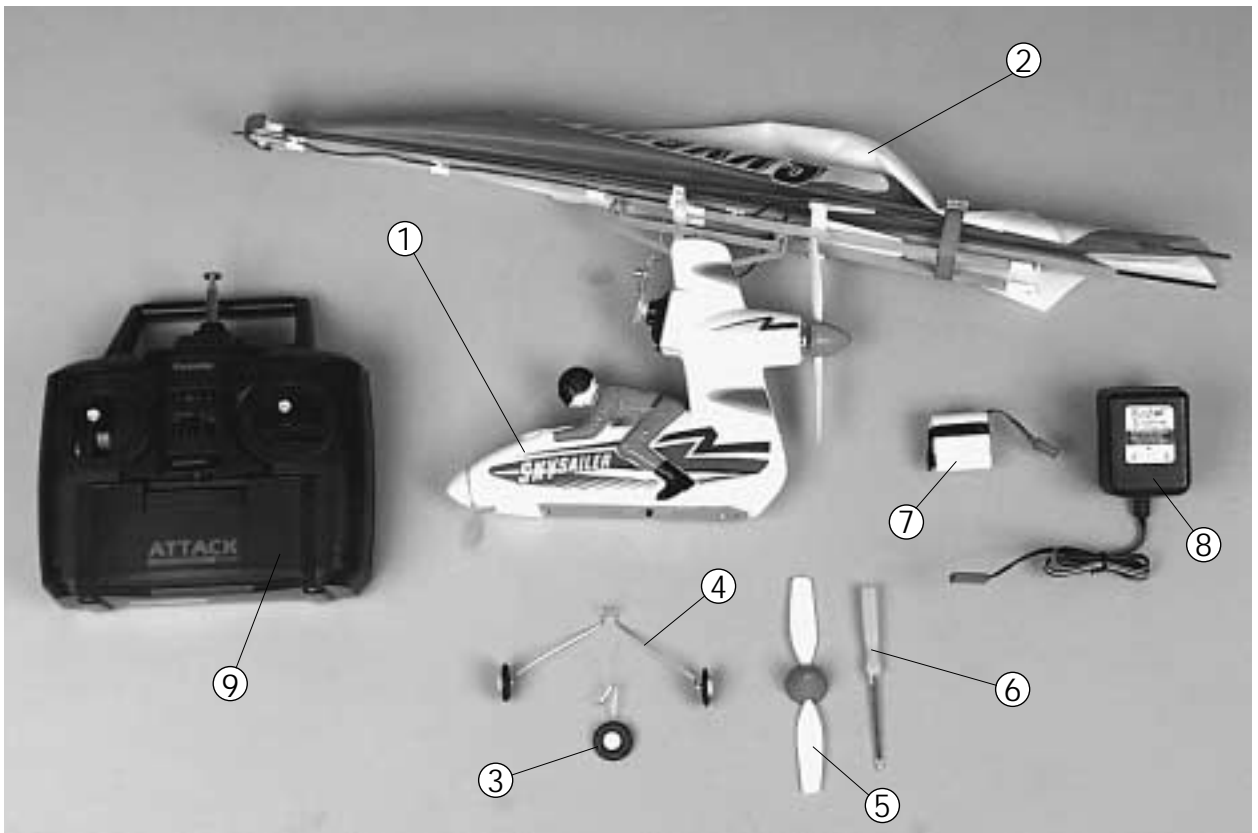
Undercarriage: The battery and radio system are installed in the undercarriage and hang under the sail.

Transmitter (TX): This is the hand-held unit that sends the signal to the receiver. As you move the sticks on the transmitter, the motor and sail will react accordingly.

UNPACKING THE BOX

Check the parts against the list on the next page. If any parts are damaged or missing, give us a call at:

(217) 398-8970.



Part Name	Qty.	Part Name	Qty.
<input type="checkbox"/> 1. Undercarriage	1	<input type="checkbox"/> 6. Screwdriver	1
<input type="checkbox"/> 2. Sail	1	<input type="checkbox"/> 7. 6.0 volt 300mAh motor battery	1
<input type="checkbox"/> 3. Forward landing gear	1	<input type="checkbox"/> 8. Wall charger	1
<input type="checkbox"/> 4. Aft landing gear	1	<input type="checkbox"/> 9. Transmitter	1
<input type="checkbox"/> 5. Propeller	2	<input type="checkbox"/> 10. Extra wing spars (not pictured)	

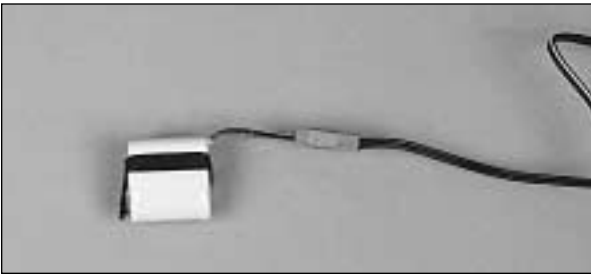
CHARGE THE MOTOR BATTERY

To operate the Skysailer the motor battery will need to be charged.

Charging the motor battery is safe and easy when you follow these instructions. Before charging, make sure that all wires and connectors are in good shape and properly insulated.



1. Plug the wall charger into a 110 volt A/C wall outlet.



2. Remove the battery pack from the box. Plug the battery pack into the charger connector. Be careful - the battery pack will plug in only one way.
3. Allow the battery to charge for 3 hours using the wall charger. A completely discharged battery may require a longer charge time.
4. **IMPORTANT! NEVER LEAVE A CHARGING BATTERY UNATTENDED.**
5. During charging, feel the battery to see if it is starting to warm up. A warmed up (but not hot) battery pack is a sign that it is fully charged. Once the pack is warm, disconnect it from the charger. Depending on how much charge was already in the pack, you may have to disconnect the battery early.
6. After each flight, remove the battery pack from the Skysailer and allow it to cool completely before recharging.

SAFETY PRECAUTIONS FOR CHARGING BATTERIES

1. Never leave a charging battery unattended.
2. Never let the battery charge until it feels **hot**. A hot battery is an overcharged battery. Only let the battery get warm to the touch.
3. If you ever use a different battery charger, charge this battery pack only at a maximum charge rate of $\frac{1}{2}$ amp. A higher charge rate will charge the battery pack too quickly and heat up the wires.
4. A properly cared for battery pack will last a long time. If the battery pack is continually overcharged or charged at too high of a rate, the life of the battery pack will be shortened.

BATTERY RECYCLING



ATTENTION: The product you have purchased is powered by a rechargeable battery. At the end of its useful life, under various state and local laws, it may be illegal to dispose of this battery into the municipal waste system. Check with your local solid waste officials for details in your area for recycling options or proper disposal.

This product contains a chemical known to the State of California to cause cancer and birth defects or other reproductive harm.

INSTALL THE TRANSMITTER BATTERIES



The transmitter that controls your airplane requires power, in the form of eight "AA" batteries. To install the batteries, remove the battery hatch on the front of the transmitter and install the batteries following the diagram inside the battery compartment. Switch on the transmitter and check the LED's on the front of the transmitter. If both the red and green lights are on, it is safe to fly. If only the red light is on, you need to install fresh batteries.

While the battery hatch is removed, check that the two servo reversing switches are set to REV.

INSTALL THE LANDING GEAR



Turn the hang glider upside-down. Slide the forward and aft landing gear into the slots in the bottom of the undercarriage. If the landing gear feels loose, gently spread the U section of the landing gear wire apart slightly and reinstall it.

SAIL PREPARATION

❑ 1. Remove the sail retaining strap and set it aside. When transporting the Skysailer, fold the sail back and retain it with the strap.



❑ 2. Carefully open one side of the sail and rotate the “cross spar” out. Attach the end of the cross spar to the outer sail spar. Repeat the process for the other side.



❑ 3. Carefully rotate and lock the sail guard 90 degrees to the centerline of the sail.

INSTALL THE MOTOR BATTERY



❑ 1. Hold the Skysailer upside down. Push the battery hatch cover latch toward the rear of the undercarriage to unlock it and then lift it out.



❑ 2. Gently pull the battery plug outside the undercarriage. Check that the power switch, on the bottom of the undercarriage is in the “off” position.



❑ 3. Connect the motor battery to the battery plug in the undercarriage. It will only plug in one way.

Carefully insert the connectors into the hole at the bottom aft part of the battery compartment. Insert the motor battery in the battery compartment with the single cell toward the front.

❑ 4. Replace the battery hatch cover, making sure it locks in place securely.

ADJUST THE TRANSMITTER



❑ 1. The left stick on the transmitter (throttle stick) controls the motor. The right stick controls the left/right direction. The small lever at the right of the throttle stick and below the right stick are the trims. The trims are used to make small adjustments to the throttle and direction without moving the sticks.



❑ 2. Center both trims on the transmitter and switch it on. **Caution:** Always switch the transmitter on first and off last.

❑ 3. Have an assistant hold the Skysailer upside-down in one hand and switch it on with the other. The reason it should be held upside-down is so that the sail does not touch the propeller. Make sure that both hands are clear of the propeller in case it should start rotating. If the motor does start, adjust the trim lever next to the throttle one click at a time until the motor stops. Add another click of trim to be safe.



❑ 4. Move the throttle stick up or away from you. The motor should start to run. The farther the stick is moved, the faster the motor will run.



❑ 4. Have your assistant hold the Skysailer so that you are facing the aft end (the propeller). Move the right stick to the left. The sail should tip to the left. Moving the right stick to the right, the sail should tip to the right.

Once the controls are set, switch off the transmitter and then the Skysailer. If the transmitter is switched off first, the motor and controls could operate on their own and damage the Skysailer or cause injury.

HOW DOES THE SKYSAILER WORK

The sail on the Skysailer is angled up slightly. When the motor turns the propeller, thrust is created and the Skysailer will climb. When the motor is shut off, the Skysailer will start to glide and descend gradually.

Moving the right stick to the right will tip the sail to the right, causing the hang glider to turn to the right. Moving the right stick to the left will tip the sail to the left, causing the hang glider to turn to the left.

CHOOSE A GOOD FLYING SITE

It is best to fly on calm days, at least for your first few flights, when there's little or no wind. Also, find an area clear of trees, power lines and other structures. A flying field for R/C planes is best. Don't fly around groups of people, especially children, or within 6 miles of existing R/C flying fields.

PREPARE FOR TAKEOFF

1. Find an open area free of buildings, trees, power lines and people.

2. For your first few flights, fly only when the wind is calm. After you are comfortable with the hang glider, you can fly in winds that are no more than 10 miles per hour. If flown in stronger winds, the hang glider may be blown downwind and not have enough power to get back to you.

3. Make sure the battery pack is fully charged and that the transmitter has fresh "AA" batteries installed.

4. If others are flying in the same area, make sure that they are not using the same channel radio system you are. Inside the battery hatch of your transmitter there is a crystal with a number on it (for example CH. 16 72.110). This is the channel and frequency you are using. If someone is on the same frequency, **DO NOT** switch on your transmitter until they are done flying.

5. Range check your radio before each flight. Switch on the transmitter, plug the motor battery into the Skysailer and then switch it on. Have a helper hold the hang glider. With the antenna collapsed, walk 50

feet away from the Skysailer. Move both control sticks, checking that the motor runs and turns off and the sail tips following the control stick movement. If you still have control over the Skysailer, it is safe to extend the antenna and fly the hang glider. If you do not have control of the Skysailer, make sure the batteries in the transmitter are fresh and the battery in the Skysailer is charged. Also, make sure the wire antenna is extending out along the center of the sail.

6. Recheck that when the right stick is moved to the right, the sail tips to the right. When the stick is moved to the left, the sail must tip to the left.

FLYING THE SKYSAILER

If you have never flown an R/C airplane before, we recommend that you get help from an experienced R/C pilot. Most R/C clubs have training programs that will help you learn to fly quickly. If you cannot find an experienced pilot to help you learn, the following will help you get your hang glider into the air.

1. Always make small control movements. The hang glider is very stable. By making small control movements, if you make the wrong control input, you will have time to apply the correct movement.

2. Always take-off and land into the wing. This will help slow the hang glider down and make it easier to land.

3. When the Skysailer is coming toward you, moving the right stick left still causes the plane to turn left, but it appears to turn to **your right**. In short, you have to reverse the way you control the right stick. A good way to familiarize yourself with the controls when the Skysailer is coming toward you, is to turn your body so that you are facing the same direction the hang glider is going, looking over your shoulder at it. Now when you move the right stick left the Skysailer will go to your left.

4. If you get confused while flying, release the sticks and the Skysailer will straighten out if it has enough altitude. This will allow you to regain control.

FIRST FLIGHT

1. First, turn your transmitter power switch "ON." Install the motor battery in the Skysailer and switch it on.



2. Hold the Skysailer, by the undercarriage, above your head. Hold the transmitter in the other hand with your thumb on the throttle stick.

3. Move the throttle stick to full power, take a few steps into the wind and release the Skysailer letting it fly out of your hand. **DO NOT THROW IT!**

4. The Skysailer will leave your hand and climb away. Allow the Skysailer to fly out straight at full throttle until it reaches an altitude of 75' to 100'. Then, reduce the throttle to 75%. The Skysailer will stop climbing and fly level.

5. Now try to turn left by moving the right stick to the left a small amount and releasing it. Notice what the Skysailer does. By holding the stick to the left a small amount, the Skysailer will start to turn to the left. After releasing the stick the Skysailer will continue to turn to the left. To stop the turn, move the right stick to the right until the Skysailer levels off.

6. In the turn the Skysailer will lose some altitude. You will need to add some power in the turn to maintain altitude. Try left and right turns, flying in a figure eight until you are comfortable with the controls.

IT'S NOW TIME TO LAND

It's a known fact among fellow R/C pilots that your airplane **will** land. It is up to you as to where and how it lands.

1. During your first flight, while at a high altitude, point the Skysailer into the wind and reduce the power. Notice how it descends. Apply power and try it again.

2. To land the Skysailer, fly downwind, past the landing area, a few hundred feet. Gently turn into the wind and turn the motors off. The Skysailer will start to come down. Apply power so that the Skysailer descends gradually and lands gently.

3. The Skysailer uses an auto cut-off system to power the motor, steering servo and receiver from the motor battery. When the voltage of the motor battery drops to a preset voltage, the auto cut-off system stops the motor while providing enough power to the steering servo and receiver to land.

If the motor stops during flight, don't panic. Gently turn the Skysailer into the wind and land.

AFTER THE FLIGHT

Switch off the Skysailer and then the transmitter. Unplug the battery from the Skysailer and remove it from the undercarriage. Allow the motor battery to cool before recharging. Check the Skysailer over to make sure nothing has come loose.

----- Replacement parts for your Skysailer

HCAA3425	SAIL W/ SPARS	\$ 24.99
HCAA3427	BODY	\$ 9.99
HCAA3429	NIMH BATTERY	\$ 24.99
HCAA3431	PLASTIC PINS (4)	
HCAA3433	CROSS SPARS (2)	
HCAA3435	BATTERY COVER (2)	
HCAA3437	DECAL SHEET	
HCAG1050	MOTOR	
HCAM7040	SPEED CONTROL	
HCAP0121	AC WALL CHARGER	
HCAQ3315	PROPELLER (2)	
HCAQ3317	LANDING GEAR SET	