



FLYING MODEL ROCKET OUTFIT

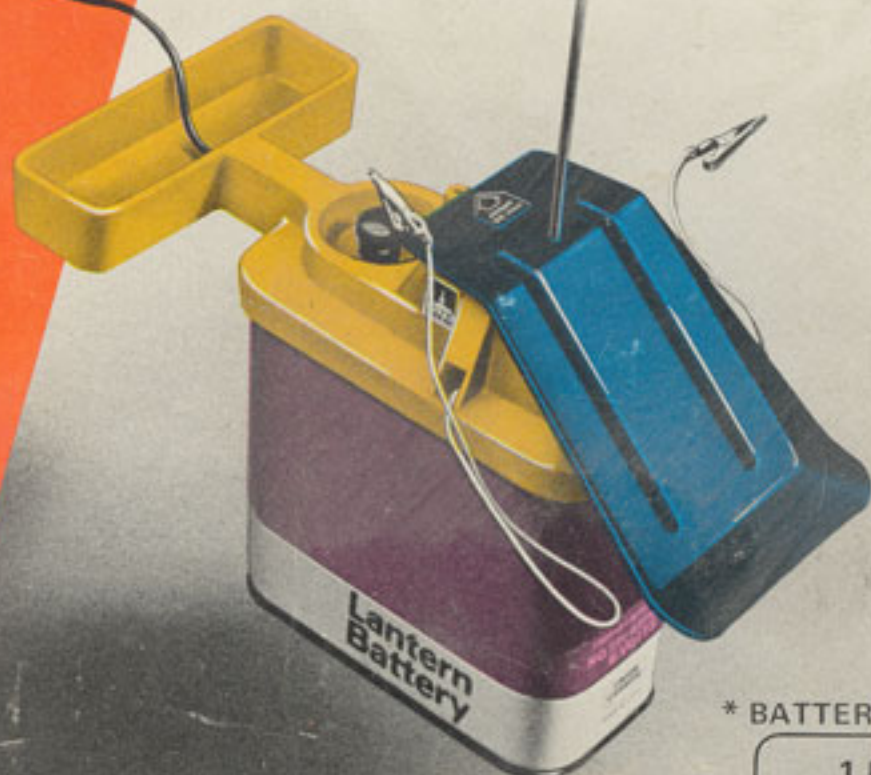
RECOMMENDED FOR AGES 10 TO ADULT
Adult participation suggested for ages 10 thru 12



Centuri

EAGLE^{T.M.} POWER

COMPLETE: "SCREAMING EAGLE" ROCKET, "POWR-PAD" LAUNCHER,
AND EVERYTHING YOU NEED TO ASSEMBLE AND FLY!



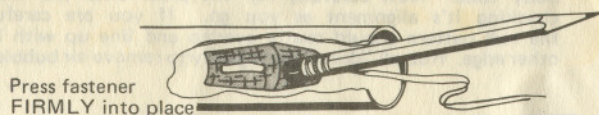
#5404

* BATTERY NOT INCLUDED.

1 MODEL KIT
1 MODÈLE RÉDUIT

ASSEMBLED ROCKET LENGTH 16.4" (41.7 cm).

- 13 Insert the fastener about 1" past the top of the body tube. Press firmly against the inside wall of the tube with a finger or eraser end of a pencil. NOTE: All edges of the fastener must be firmly contacted to the tube to insure a permanent bond.



Press fastener
FIRMLY into place

Rub with a pencil or finger

ENGINES:

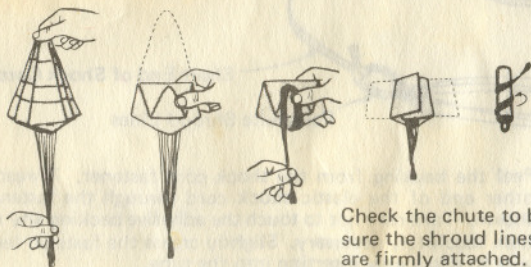
Igniter and complete engine installation instructions are included in "Engine Operating Instructions" which accompany all Centuri model rocket engines.

RECOMMENDED ENGINES		
TYPE	ALTITUDE	PURPOSE
A5-4 A8-3	200-500 Feet	For first flights and small launch areas
B4-6 B14-5	600-1000 Feet	For general flying and medium launch areas.
C6-7	1100-1800 Feet	Extremely high flights and large launch areas

Never use a booster engine (Ex: A8-0, B6-0, C6-0) in the Screaming Eagle.

FLIGHT PREPPING

1. Inspect shock cord fastener for firm bond.
2. Insert flameproof wadding according to its directions.
3. Tuck in shock cord.
4. Roll chute tightly as shown, and insert.
5. Socket nose cone in place.
6. Insert recommended engine, securing with engine lock.



Check the chute to be sure the shroud lines are firmly attached.

Cone Fit: Snug, but not too tight. Nose cone should not fall out by its own weight.



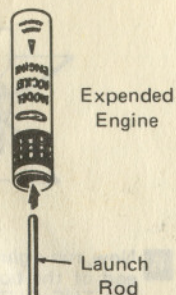
Tape: Optional

Carefully prepare and check all parts of your rocket before each flight.

Launch the SCREAMING EAGLE from any standard model rocket launcher having a 1/8" diameter x 36" long steel launch rod.

Do not leave the rocket sitting in the sun for long periods as this may soften the adhesives.

Referring to the specific instructions which accompany Centuri launchers and firing panels, mount the rocket on the launcher and prepare for ignition. Avoid eye injury by capping the exposed tip of the launch rod when not actually launching!



Here is some background information that may add to your enjoyment. However you don't need to understand it to fly the rocket.

1. The completed rocket's center of gravity, loaded with the heaviest engine (C6-7), is approximately 5/8" above the fin unit/body tube joint.
2. The plastic fin unit produces much less aerodynamic drag than traditional balsa fins would. This is because the plastic fins are thinner, smoother, more straight and consistent than balsa fins. These factors allow the Screaming Eagle to fly higher than it would with balsa fins.
3. The Screaming Eagle is a little heavier than most model rockets of its size, because of the fin unit. The extra weight is a positive feature. It brings the rocket closer to the "optimum weight" needed for a rocket to have the inertia to coast to maximum altitude. It is not necessarily true that "the lighter the rocket, the higher it will go . . ." Try throwing a feather as high as you can! Optimum weight altitude computation and other aerodynamic subjects may be found in various Centuri technical publications.
4. The Screaming Eagle is aerodynamically stable in flight. However, it is not designed to pass the "Swing-Test" which you may have read about in our publications.

Do you have our latest catalog of model rocket supplies and information? Ask for it at the nearest Centuri Dealer, or write to:

FREE CATALOG S.E.
CENTURI ENGINEERING CO., Inc.
P.O. Box 1988, Phoenix, Arizona 85001

Centuri

Screaming Eagle

Catalog No. KF-3

NOSE CONE
Ties into elastic shock cord

PARACHUTE
Ties on shock cord near nose cone.

SHOCK CORD
Attaches to body tube thru shock cord fastener.

SHOCK CORD FASTENER
Attaches shock cord into body tube.

BODY TUBE
Fits over centering tube and holds launch lug.

LAUNCH LUG
Attaches to body tube for guiding rocket on launcher.

CENTERING TUBE
Holds the body tube centered on thrust coupler.

THRUST COUPLER
Prevents engine from moving upwards in fin unit.

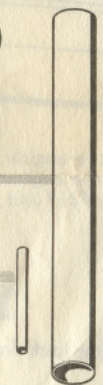
FIN UNIT
Guides rocket in flight and holds engine tube.

ENGINE TUBE
Centers and holds engine

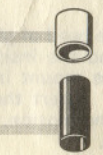
ENGINE LOCK
Prevents engine from accidentally kicking out backwards.



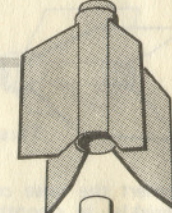
RECOVERY SYSTEM



MAIN AIRFRAME



FIN ASSEMBLY



ENGINE MOUNT



Centuri

Rocketeers under 10 years of age should have an older person help assemble and launch model rockets.

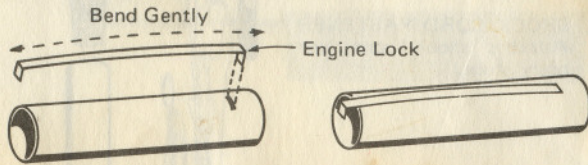
In addition to the parts supplied you will need glue. We recommend white glue.



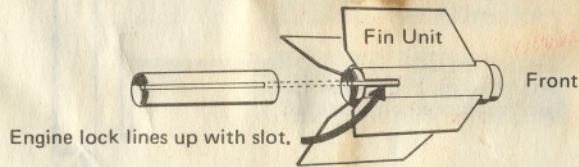
Choose a glue whose bottle has a small spout, as shown here. This will simplify applying glue.

The Screaming Eagle does not need to be painted because all parts are pre-colored. If you prefer to paint the plastic parts, we recommend using spray enamel. Never use dope or lacquer when painting plastic! You can shine the plastic parts by rubbing briskly with a soft cloth.

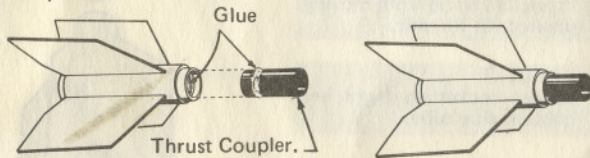
- 1 Bend the engine lock gently into a slightly curved shape. Now insert one end of the lock into the engine tube slot. This assembly is called an engine mount.



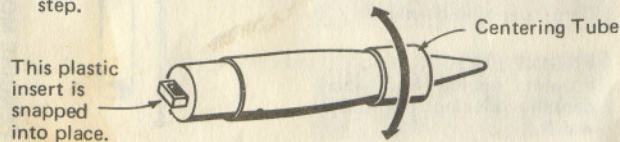
- 2 Line the engine lock up with the slotted part of the fin unit. Slide the engine mount into the fin unit until it touches the front of fin unit, and stops.



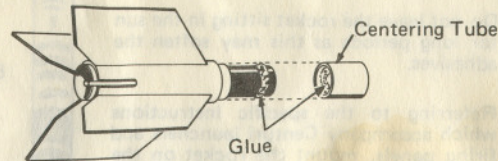
- 3 Run a bead of glue around one end of the thrust coupler, and around the inside front end of the engine tube. Hold the engine mount in place by inserting a finger into it from the rear. Insert the coupler into the engine tube with a firm, turning motion, until it butts up against the engine lock and stops.



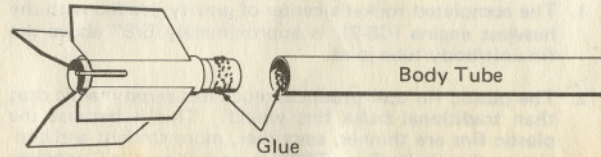
- 4 Insert the nose cone into the centering tube and twist it briskly, to smooth away any rough burrs. Repeat on other end. This simple technique will simplify the next assembly step.



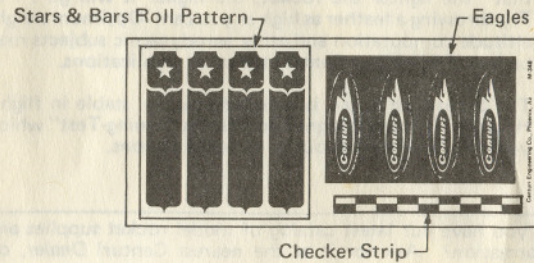
- 5 Run a glue bead around the outside of the thrust coupler and around the inside of the centering tube. Join the parts with a firm, turning motion until the centering tube lines up neatly against the fin unit.



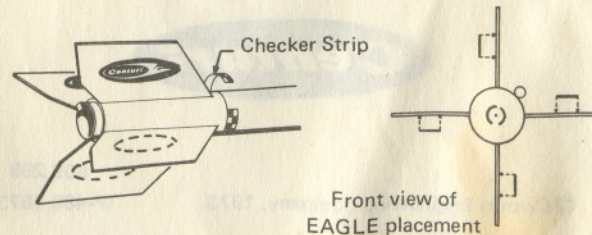
- 6 Now, run a glue bead around the centering tube and inside one end of the body tube. NOTE: AVOID GETTING GLUE ON THE OUTSIDE OF THE BODY TUBE! Join the parts with a firm, turning motion as before, until the tube passes over the front end of the fin unit. Check assembly from all angles to be sure fin unit is straight in line with the body tube. Wipe away excess glue, gently dabbing with a moist cloth if necessary.



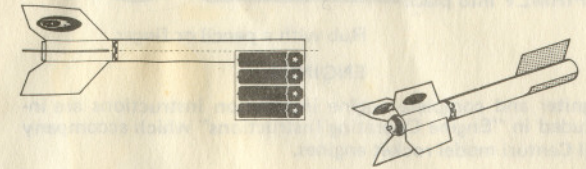
- 7 Now is the time to apply the decorative foil "decals." The Stars and Bars roll pattern is the trickiest to apply, so save it for last. Identify the pieces below and remove them from their pre-cut sheet only as you need them.



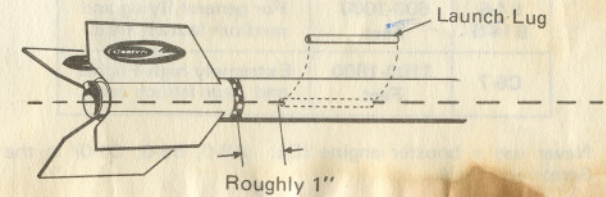
- 8 Apply one Eagle to each fin by centering the design and pointing the Eagle forward. Apply the checker strip just above the fin unit-body joint.



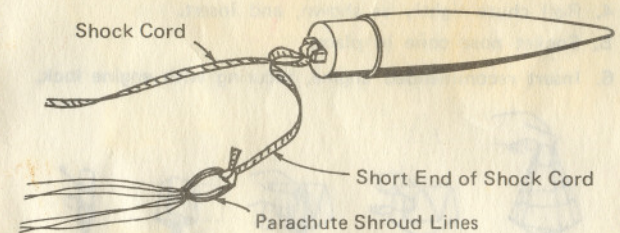
- 9 Do this step carefully, because it is difficult to remove and apply pressure-sensitive material. Position one edge of the roll pattern along the body tube at the top. Sight along the rocket to be sure the roll pattern is straight in line with the body tube. Now carefully roll the piece onto the tube, checking it's alignment as you go. If you are careful, the roll pattern should neatly overlap and line up with its other edge. Rub all "decal" parts gently to remove air bubbles.



- 10 Run a glue bead along one side of the launch lug and attach it to the body tube approximately one inch above the fin unit. Be sure the lug is straight in line with the body.



- 11 Pass one end of the shock cord through the nose cone eyelet. Tie with a firm knot. Tie the short loose end of shock cord thru the loop of the parachute lines.



- 12 Peel the backing from the shock cord fastener. Thread the other end of the elastic shock cord through the fastener as shown. Take care not to touch the adhesive backing any more than absolutely necessary. Slightly crease the fastener lengthwise to allow easy insertion into the tube.

