mainair sports

MAINAIR SPORTS LIMITED Alma Industrial Estate
Rochdale, Lancashire, England. OL12 0HQ.
Tel.(0706) 55134 Telex 635091 ALBION G ATTEN.MAIN

Date: 20th October, 1981 Our Ref: Your Ref:

TRI-FLYER SERVICE BULLETIN No. 1.

Note: THIS INFORMATION MUST BE ACTED UPON IMMEDIATELY

1) Control Confusion. A pilot offered another Tri-Flyer pilot a flight on his machine. It has two separate choke/hand throttle controls, unlike his own machine which had a standard dual unit. Immediately after launch he changed to full hand throttle, but inadvertently moved the choke lever by mistake. This stopped the engine 30 ft up and the resultant steep drive crumpled the fork assembly. He was lucky not to write off the whole combination or injure himself.

For safety, always connect the hand throttle on the OUTSIDE of the seat frame. Fully brief and check test anyone before allowing them to fly your machine.

2) A problem has been noticed on the main drive shaft on two engine assemblies. It is caused by the position of the drive shaft in location to the end bearing. The large hexagon nut tightens the whole assembly of sleeves and bearings. On the problem engines this nut is tightening against the shoulder on the shaft and not against the bearing. Enclosed is a spacing ring. Remove the hexagon nut; if the shaft end is below the bearing face you have no problem; re-assemble.

If the shaft end is level or protruding past the bearing, you have the problem. Cure it by placing the spacing ring between the bearing and the washer. Line up the outside diameter of the ring and washer and tighten up the nut; re-drill and pin. If the aluminium tube spacer between the large V pulley and bearing face is loose, or has worn, it may need to be renewed, or tightening the nut will pull the main pulley out of line. Use a straight ruler to line up the main pulley and the smaller engine pulley, and measure the spacer length. Cut a new spacer from $1\frac{1}{8}$" diameter aluminium tube, file the ends square. Re-assemble.

3) Exhaust. The Tri-Flyer uses the Huntair exhaust system. The original Huntair exhaust had a flat baffle plate assembly inside the exhaust which is somewhat prone to baffle damage. We have also had a tail pipe break clean off an exhaust and go through the propeller. Huntair have recently developed a new system with tubular baffles which is fitted to later Tri-Flyers. The outer case is exactly the same. You can tell the older flat baffle type by the spot welds which run up each side of the baffle at 90° to the vertical seam weld. We recommend that on all flat baffle plate exhausts you swage a wire retainer around the tail pipe stub so that if it does break it does not fly through the prop. Also, if your exhaust sounds 'Tinny' you should have it opened and repaired. Huntair will service exchange the exhaust for the newer type, and if you require this service you should send your exhaust, along with a cheque for £45.00 to:
Huntair Ltd., 175 Mackie Ave., Brighton BN1 8SE.
Two-stoke exhausts are prone to failure. The Huntair system produces the most brake horse power of any system available, but along with all other two-stroke exhausts, it is not the most reliable piece of a trike. You should be constantly vigilant and check all parts of the exhaust system prior to and after every flight.

J.A.Hudson.