

THE

# Starduster

OCTOBER 1975

MAGAZINE

DEDICATED TO THE ACTIVE HOMEBUILDER



PAGE ONE



Customer appreciation issue - This, the last issue of "STARDUSTER" magazine for 1975, is dedicated to you, our customer. We wish to say "THANK YOU", for the orders you have given us. We regret the time we could not fill your order promptly, and we sincerely appreciate your patience & forbearance, when, for some reason or other, filling your order was delayed.

In appreciation of your patronage, we have taken a number of steps so that in 1976 we may offer you better quality, faster service, and greater value.

Our biggest improvement has been in the area of highly qualified, motivated personnel. Eric Shilling and Glenn Beets are widely recognized experts on designing, building, and flying homebuilt aircraft. Helping them run our Company is an array of talented experts in the mechanical and shipping departments. We have raised our pay scale and improved our working conditions in order to attract & hold these men. We have installed an additional heliarc welding machine and hired an additional welder. For the first time we carry in stock all the standard gas tanks and engine mounts. For you, this means immediate delivery. No longer will you have to wait for lengthy periods before getting your tank or mount. We expect, in the near future to stock bell cranks, stick assys, landing gear, cabanes, I struts, and exhaust stacks.

In order to avoid running out of stock, we are installing an elaborate inventory control system, designed by Douglas King, one of our shipping dept. experts. This system will be run by Sumiko Hampson.

To improve quality control, we have built special racks and instituted special handling procedures of Aluminum sheet. We also have changed suppliers of Plywood, when it became obvious that this would give us better quality wood.

We now have a weekly meeting and review all outstanding orders, and decide how to expedite them. If, for some reason, your order cannot be filled promptly, you will be notified, and told when you can expect it.

Our aim, for '76 and the years after that, is to provide you with such values in time, material, and price, that you will automatically think of STARDUSTER when you think of airplanes. If you have suggestions, or criticisms, that will help us improve our service to you, please write to me personally, and let me know. Your help will be appreciated.

So now, from all of us, to all of you, have a Merry Christmas, and an enjoyable and rewarding new year.

With best wishes,

*Jim Osborne*

October 1975

THE STARDUSTER MAGAZINE - Dedicated to the proposition that the ultimate in sport aircraft was reached with the design & development of the biplane, open cockpit tail dragger-and that everything has been downhill ever since-

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Our cover picture this month features a beautiful picture of a beautiful Starduster Too. N600S was built by Gene White of Asheville, North Carolina. Gene built it as near like the original as possible, including the paint job. It appears to be a gorgeous machine. Gene is to be congratulated.

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Our back cover shot is a picture of Sopwith triplane in an incomplete stage. This tripe was built to order by Lou Stolp and Stolp Starduster Corp. in 1970-1971. After completion it was inspected by Ray Collishaw, WW 1 Triplane Ace. The owner flew it to some California flyins before installing it in the Orange County Air Museum, where you may see it today.

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In order to do our bit to fight inflation, we have instituted the following policies.

1-We give 3-5# of short lengths of 4130 tubing free, with each substantial tubing order. All you have to do is ask for it. This tubing is primarily suitable for welding practice, although an occasional short piece may be useful in construction. No size selections will be made.

2-A 10% discount will be given to customers who walk in \$ select their tubing themselves from our short lengths rack, provided no cutting is done. If cutting is provided, the regular price will prevail.

## HOLIDAY POTPOURRI

YEAR END SALE - From now until January 1, 1976, Starduster Too and Acroduster Too fuselages will be for sale at 10% off. This means that in place of \$850.00 for a basic welded fuselage, you may obtain one for only \$765.00. A very worthwhile saving. This offer is limited to basic welded fuselages only, and will positively expire with the passing of December 31, 1975.

SPINNER SALE - We have been fortunate in obtaining a limited quantity of fiber glass spinners from Grumman American Corporation. These spinners are 14" base Diameter, and 18" in length. They are the same shape as the popular Hartzell Spinner for the constant speed prop, but THESE SPINNERS ARE MADE FOR FIXED PITCH PROPS. Complete with metal backing and front plates. While the supply lasts, only \$57.50.

GLIDER TOW-HOOKS - If your bird is hand propped (all the time, or occasionally), you should consider putting on a glider tow hook. These hooks bolt on to the front attach point for the tail wheel spring. A 1/16 Dia. cable can be run to the cockpit. For handstarting, the tow hook can be used to tie the airplane down to a tie down chain or wire. Also, you can carry with you and use short lengths of nylon rope, to tie to whatever is handy. The engine may then be safely hand propped. After it is running you have plenty of time to get aboard, put on your parachute, and fasten your safety belts. You may then pull the release cable and taxi out for take off, as independent and self contained as if you had a starter. These little gems are available for only \$18.00.

NEW TAIL WHEEL SPRING - The pivot post of a tail wheel should lean forward, when reviewed from the side. In many cases that we have observed it doesn't. A straight up pivot post will cause the tail wheel to be neutrally stable. A backward leaning post will cause tail wheel instability. In order to insure the desirable forward lean, we have redesigned our tail wheel springs. Our new design has a "S" curve in it, so that the tail wheel post will lean forward under almost any conditions. Also, our new springs are 2" longer, so as to increase rudder clearance. These new, improved springs are only \$13.50

NEW ALUMINUM RUDDER/BRAKE PEDALS - Mentioned in our last magazine issue, but worth repeating. These pedals are cast aluminum, completely assembled, and even painted black. They are used in our Acroduster 1 kits, and may be used on any of our airplanes. Just insert them between the mounting brackets and insert pivot pin. Then install cotter pins as retainers. The work they save you is considerable. Price, completely assembled and painted is only \$25.00.

P-51 LANDING GEARS - We now offer complete P-51 landing gears, to fit the S.A.L. 2/3 or 3/4 scale P-51. This design was originally by Marcel Jurca. Our gears are complete with internal springs and cast aluminum scissors links. Price per set - \$950.00.

THOUGHT FOR THE DAY - If god had meant for us to stay on the ground, he would have given us roots.



# NEW SALES PLAN - ACRODUSTER I by Jim Osborne

In response to many requests from people who are interested in our Acroduster 1, we are instituting an alternate method of buying one. To supplement the two payment plan, which calls for \$1500.00 down, and \$4000.00 in three months, we now offer a ten payment plan which may be spread over a period of two years. The down payment under the new plan is only \$950.00.

Under our new purchase agreement, the customer will get delivery of the wing kit for only \$950.00. This is the largest single payment. The other nine kits range in price from \$300.00 to \$895.00. The kits must be purchased in sequence, but the sequence is so arranged that the cheaper and more expensive kits alternate.

The customer agrees to purchase kits at not greater than three months intervals, and to complete the purchase of the ten kits within a timespan of 24 calendar months from first order. "Starduster" agrees to sell all kits at the prices in effect at the time the contract is signed. The customer is protected against any price increases during the life of the contract. In these times of double digit inflation, this can be valuable protection for the buyer.

The kit prices also include packing charges. Customer pays freight charges only.

The prototype has just finished its first contest season. It was flown by Cindy Rucker, who moved in June into the Acroduster from a Decathlon, and from Sportsman to Intermediate classification. Cindy and "Acro" got two second place trophies out of four contests, and placed 6th out of 42 at Fondulac. Due to a bearing failure, the airplane was down for repairs, and so did not get to make the trip to the Nationals in Texas.

It has also been flown by Bob Herendeen, Internationally known Aerobatic Ace, and Bud Davisson, who wrote a flight test article for the October Issue of Air Progress. Both of these gentlemen have praise for the machine.

And so if you are interested in a machine of this type, call us up, and Eric Shilling and I will be glad to discuss the airplane with you. Or fill out the contract form on the back of this page, and mail it in. Your wing kit will be on its way to you within a very few days.

**NOW  
SOLD  
AS SEPARATE  
KITS**



### ACRODUSTER I

THE AIRCRAFT FEATURED IN AIR PROGRESS AT LAST A COMPETITION MACHINE YOU CAN AFFORD

FOR THE FIRST TIME SOLD AS 10 SEPARATE KITS

1 WING	\$950	6 FUEL SYS.	\$375
2 COVER	300	7 COWL & ENG MT	750
3 FUSELAGE	895	8 I, CABANE, WIRE	650
4 SEAT & INST	355	9 CONTROLS	300
5 LDG GEAR	850	10 TAIL SURFACE	875

WHEN BOUGHT AS A COMPLETE KIT - \$5,500  
\$1,500 DOWN \$4,000-3 MONTHS

THE ACRODUSTER I  
IN ROLL RATE-CLIMB-VERTICAL-DOWN LINES  
HAS NO EQUAL

Brochure \$5.00

### STOLP STARDUSTER CORP.

4301 TWINING FLABOB AIRPORT

RIVERSIDE, CALIF. 92509

714-886-7943

TO: STOLP STARDUSTER CORPORATION  
4301 Twining  
Flabob Airport  
Riverside, California 92509

SUBJECT: SALES AGREEMENT:

I hereby agree to buy from Stolp Starduster Corporation one complete Acroduster 1 building kit, under the following terms and conditions.

- 1 - Only one airplane will be built from each set of plans and materials. No unauthorized copies will be made by anyone, of any of the drawings.
- 2 - Proper inspection, assembly, and workmanship is the responsibility of the builder. The responsibility of Jim Osborne and Stolp Starduster Corporation is to supply Aircraft plans, parts, and materials, and to replace any items found to be defective or unsuitable.

3 - I enclose down payment of \$950.00. This will bring me speedy delivery of the Wing Kit and drawings. I agree to buy the other nine kits in the order, and at the prices, given below. Kits are to be bought at time intervals not exceeding three months. Purchase of all ten kits will be completed within 24 months from the date of the first order. "Starduster" Corp. agrees to hold kit prices in force at the time of initial order for 24 months.

Customer is protected against price increases for the life of the contract.

KIT ORDER OF PURCHASE	PRICE
1. Wing	\$950.00
2. Cover	\$300.00
3. Fuselage	\$895.00
4. Seat & Instrument	\$355.00
5. Landing Gear	\$850.00
6. Fuel System	\$375.00
7. Cowl & Engine Mount	\$750.00
8. I, Cabane & Wire	\$650.00
9. Controls	\$300.00
10. Tail Surface	\$875.00

Signed \_\_\_\_\_

Date \_\_\_\_\_

Address \_\_\_\_\_

\_\_\_\_\_

\_\_\_\_\_

## NEW LANDING GEAR DRAWING FOR STARDUSTER TOO

The landing gear for the Starduster Too has been redesigned and redrawn. Incorporated are the changes we have been advocating for several years. The wheels have been moved back 4". A diagonal top brace has been added. Other, detail changes and improvements have been made.

The new drawing will be sent out immediately in place of the old one, in all new sets of plans sold. The new drawing is also reproduced on the center pages of this magazine.

If you are building a "Too" from a registered set of plans, and wish a separate copy of this drawing, it is available. Please send \$1.00 with your request for the new sheet 14, to cover postage and handling.

It is very easy to tell the new sheet from the old one. The new sheet is only 11 x 17 inches. It is easier to handle, and to use. We think you will like the new size better. Let us know your opinion on this, one way or another.

## ON CHOOSING AN ENGINE by Jim Osborne

This article is intended to help you arrive at the most reasonable decision regarding putting a power plant in you STARDUSTER TOO or ACRODUSTER TOO. It does not apply to any of our other air planes.

Both the Starduster Too & Acroduster Too were designed to take 180 - 200 H.P. Lycoming engines. Some people, who intend to do little or no aerobatics will be satisfied with the cheaper, carbureted version of these engines. For the great majority of owners, however, we recommend fuel injection on both the 180 H.P. & 200 H.P. Lycomings.

A primary reason some owners use other engines is cost. There is no getting around it, a new Lycoming is expensive. Some other engines are available which cut this initial expense way down. However, careful consideration should be given to the other factors involved before making a decision. The factor most frequently overlooked is how the weight of the proposed engine will affect the aerobatic capability.

An aerobatic airplane is designed thruout to a 9g ultimate load, 6g limit load capability, at a given gross weight. When an airplane is built heavy, it can not regain its former "G" load capability by beefing up the longerons, or making thicker wing spar fittings. The whole airplane would have to be re-designed. Therefore, if you are heavy, you must cut your "G" load limitations down. Use the following formula: 
$$\frac{\text{aerobatic design weight}}{\text{actual gross weight}} \times 6 = \text{NEW LIMIT LOAD.}$$

You can see that with many engine installations, you will no longer have an airplane which meets the FAA aerobatic criteria. You can safely do mild maneuvers, but be careful and strictly observe your new LIMIT LOADS.

Other factors affecting the vital engine decision are resale value, visibility with the proposed engine, parts availability, time between overhauls, and availability of such accessories as mounts, baffles, exhaust stacks, ETC.

One of the most appealing engines, from the stand point of both cost and appearance is one of the Radials. The most popular is the continental 220 H.P. There is something about the burble of such an engine, and the appearance of it, which takes us back to the golden age of flying. But, before deciding, give careful consideration to all the factors involved. The engine is heavy, and will surely eliminate your airplane from the aerobatic category. It will also have a low time between overhaul, and the availability of parts, should you need them on a cross country trip, is problematical. In addition, visibility behind a radial is absolutely the worst it can be. And when it comes to installation, the expense of your engine mount, exhausts, and baffles will eat up some of your savings. And a great deal of your time. After it is installed and flying, you may be disappointed with the performance. They generate a lot of drag. And the weight may give you a lower climb rate than expected. This is not to say that a radial is not for you. Just be sure you consider all the factors, not just cost and appearance.

Another low cost engine is the Lycoming O-435 or GO-435. These two engines are rugged survivors from WW II, and have a lot going for them. Like the radials, they are heavy, and will probably downgrade your aerobatic capability. However, the parts situation is fair, visibility is about the same as for the more modern engine, and they give reasonably good performance. Their TBO is 800 - 1000 hours, with the shorter time going to the geared engine. Parts like exhausts, baffles, and mounts can be a problem. And the resale value is low. But, all in all, these are probably the best buys in cheap engines.

A third low cost engine that has been used by a few intrepid pioneers is the Ranger. These are comparable to the radials in weight, time between overhauls, parts availability, and the trouble you will have getting baffles, exhausts, & mounts. Visibility is poor. Resale value is poor.

To some owners, cost is no object. They want more performance than the 180 - 200 H.P. Lycoming offers, and they invest in bigger, more expensive engines to get it. A Lycoming IO-540, or a Continental O-470 can give sizzling performance. Jim Youngs trophy winning "Big Red" is probably the outstanding example of this class of Starduster. About the only drawback to this type airplane, other than the cost, is the weight, which again diminishes the aerobatic capability.

An interesting possibility, which no one has tried yet, to our knowledge, would be the installation of a Geschwander - type converted Ford V-8. These engines will put out from 250 to 400 H.P. Initial cost would be around \$3000.00. They would be heavy, making for non aerobatic airplanes, and the TBO would be in the neighborhood of 400 - 600 hours. However, cost of overhaul, with Ford parts, should be low. And with all that H.P., it should make a sizzler, comparable in performance to the IO-540 Lycoming jobs, but at less than half their initial cost.

The various factors involved in engine selection are summarized in the following chart. Perhaps you will find it useful. If you decide to install a new Lycoming, please get in touch with us. We would be happy to supply you with one, at a homebuilders discount of 10%.

ENGINE	POWER/WEIGHT RATIO		PERFORMANCE		VISIBILITY		INITIAL COST		RESALE VALUE		PARTS AVAILABILITY		AVAILABILITY-MOUNTS, EXHAUSTS, BAFFLES-TIME B/T OVERHAULS		REMARKS
LYCOMING 10-360 180 & 200 H.P.	GOOD	GOOD	GOOD	HIGH	HIGH	EXC.	STOCK FROM STAR- DUSTER	2000 / 180 H.P. 1600 / 200 H.P.	HIGH INITIAL COST - BEST ALL AROUND ENGINE						
LYCOMING 10-540	GOOD	EXC.	GOOD	HIGH	MOD.	EXC.	CUSTOM EXPEN- SIVE	1500	GREAT CLIMB & CRUISE- USUALLY TOO HEAVY FOR AEROBATICS						
CONT. O-470	GOOD	EXC.	GOOD	MOD.	MOD.	EXC.	CUSTOM EXPEN- SIVE	2000	GREAT CLIMB & CRUISE- USUALLY TOO HEAVY FOR AEROBATICS						
LYCOMING O-435 & GO-435	FAIR	FAIR	GOOD	LOW	LOW	FAIR	CUSTOM EXPEN- SIVE	1000 800	HEAVY FOR AEROBATICS BEST OF THE CHEAPER ENGINES						
ALL RADIALS	POOR	POOR	POOR	LOW	LOW	POOR	CUSTOM EXPEN- SIVE	600 400	TOO HEAVY- GOOD LOOKING & TRADITIONAL						
RANGER	POOR	POOR	POOR	LOW	LOW	POOR	CUSTOM EXPEN- SIVE	600 400	TOO HEAVY-						
GESCHWANDER-TYPE FORD V-8	FAIR TO GOOD - DEPEND ON H.P.	FAIR TO GOOD	FAIR	MOD.	UNKNOWN	GOOD	CUSTOM EXPEN- SIVE	600 400	HEAVY-NONAEROBATIC- CHEAP OVERHAUL						



## FIRST FLIGHT

BY ERIC SHILLING

This is in response to an article in the Sept. issue of "Sport Aviation" by L.D. Sunderland. Title, "First Flight Procedures". I find myself in complete agreement with Mr. Sunderland, except for those procedures concerning flying.

My objections start with Rule 6. He points out the necessity of an accurate Airspeed. I see no reason for an A/S, much less an accurate one. When I was in primary training none of the PT-3's or PT-11's were equipped with one. We were taught to fly by feel, which is necessary in becoming a good pilot. Secondly, what difference does it make if the airplane stalls at an indicated 60 MPH or 600? Your only concern should be whether it was consistent.

Rule 7 actually makes me shudder. He recommends a series of lift offs and low flights down the runway. This technique, low & slow, is recommended so frequently. I think it is time to challenge those advocating this method, due to its inherent dangers. Its about as practical, in my opinion, as the famous admonishment made by the little old lady, "be careful, fly low and slow and don't lean in the turns".

I include the following only to qualify myself on the subject. I trained in the Army Air Corps, was Assistant Base Engineering Officer at Langley Field, have been Experimental and Production Test Pilot, Fighter Pilot, and Airline Captain. Total a little over 22,000.00 hours.

I have had engine failure in both single & multi-engine airplanes in almost every conceivable phase of flight. The most memorable was engine failure during takeoff. This occurred at a height of 5 feet in a P-51. The engine became so rough I elected to abort takeoff.

Believe me, I had my hands full during the initial part of the landing roll, and I was familiar with the 51. I bring this up to point out, that landing from this attitude is most difficult, even when you know the plane well. How do you think you will fare in your new but unfamiliar homebuilt?

I believe most experienced pilots will agree, and they normally don't agree on very many things, that the approach is at least 50% of the landing. If proper glide, speed, and trim has been established, the landing has a better than an even chance of being good. A bad landing normally starts before the plane ever crosses the threshold.

I have witnessed some first flights using the low and slow method that almost ended in disaster. The reason was due to almost uncontrollable gyrations during the roll out. This same pilot, now convinced that his airplane would fly, took off as he should have done in the first place, climbed to a safe altitude, and became acquainted with his airplane. After he had done this, knowing now how it responded, he made a normal approach and a good landing. Don't misunderstand, I am not one who thinks that a pilot should be judged solely on his ability to make a good landing, like many laymen tend to do.

Anyone that can fly a strange airplane at minimum airspeed, watch his oil pressure, oil temperature, cylinder head temperature, and keep an eye on the airspeed while 5 feet off the ground with out cracking up is just plain lucky. To me this sort of testing, or flying, is ridiculous, I wouldn't try this after 100 hours, let alone on the first flight.

Eyen at Edwards, where there is more than 10 miles of runway available, this so called technique, low and slow is not used, and they, being professionals, know what they are doing. After taxi tests have been completed, the airplane is taken off conventionally and flown to a safe altitude. The pilot goes about familiarizing himself with the airplane in a routine way which gives him the most information in the least amount of flight time, In case something happened, he wants as much knowledge about the airplane as possible. When satisfied that he can cope with the airplanes responses, he will then proceed to land.

I can think of no valid reason for this low, slow, method. Granted you don't horse the airplane off the ground and climb at max angle of climb. After getting the tail up (assuming a tail dragger) you put slight back pressure on the stick and ease it off. It is at this point that you can tell whether it possibly may be uncontrollable. If this is the case you cut the power and set it back on the runway. I guess the fear that the airplane maybe uncontrollable, after becoming airborne, may influence some homebuilders to use the low and slow approach on their first flight. Almost like the guy that says, "I'll fly so long as I can keep one foot on the ground".

A word about what to prepare for may be of some help. Most important is check the direction of control movement. Cross check with a friend observing the movement and direction from behind the airplane, looking forward. To many this may seem unimportant, they know they aren't that stupid. Yet unfortunately, it's happened too frequently that control direction has inadvertently been reversed during building.

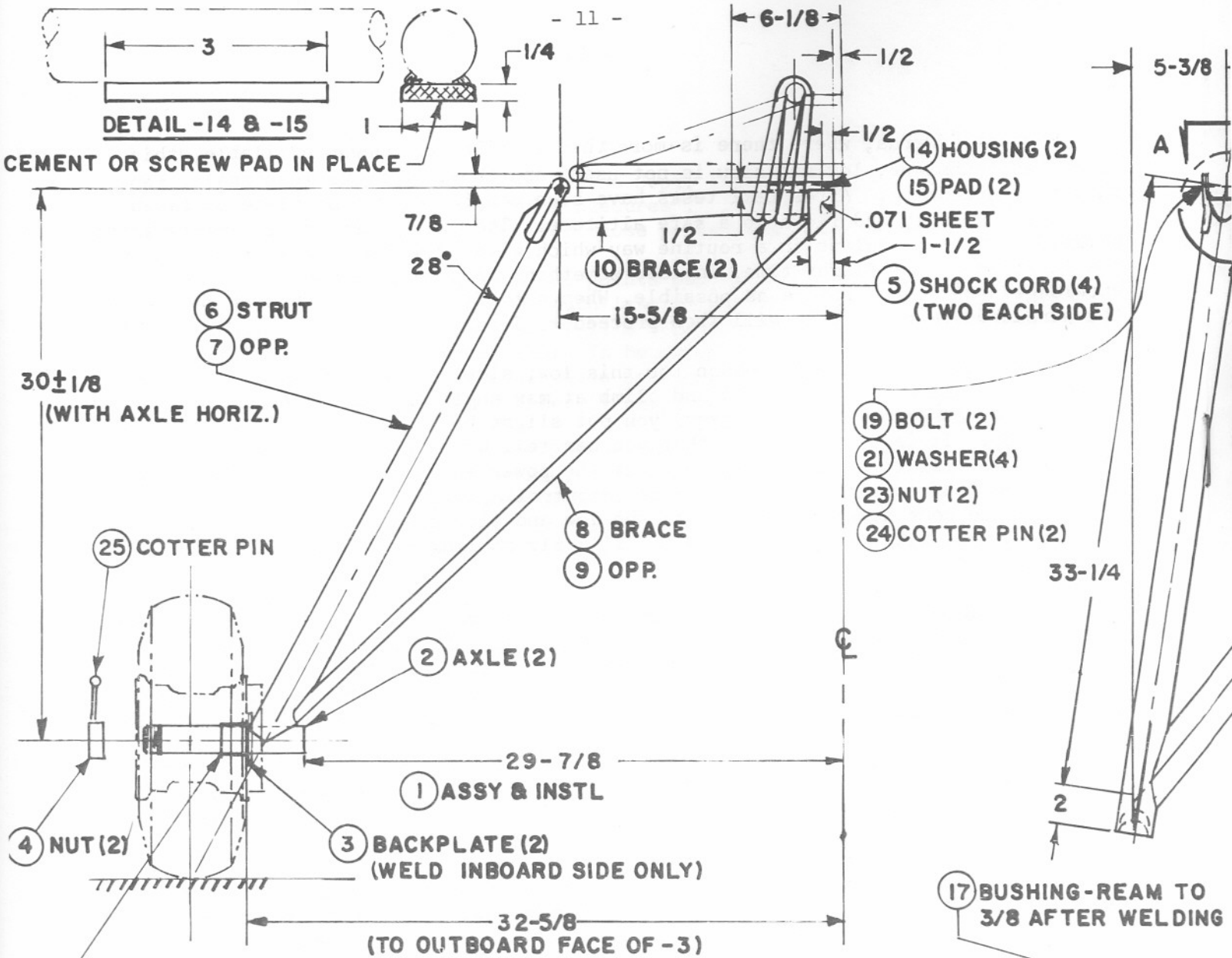
As you sit in the cockpit, pull the stick back. Have your friend call out the control movement. ELEVATOR UP - NOSE UP. Put the stick to the right. Observer should call out RIGHT AILERON UP LEFT AILERON DOWN - ROLL RIGHT. Run through the rest of the controls in like manner, including trim tab when applicable.

The other source of uncontrollability would be incorrect weight and balance computations. Here again, during the time of weighing, its good to have a knowledgeable friend around. Have him run the weight and balance figures separately, then compare answers. It goes with out saying, recheck, especially if your figures disagree.

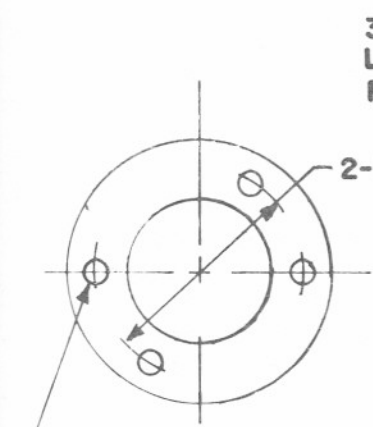
Do not panic, should a problem arise on your first flight. If you have rehearsed your flight in your mind, gone over emergency procedures before your first flight, you probably have already decided what should be done. The uppermost question in your mind may well be that of uncontrollability. During T.O. if it seems takes excessive forward stick pressure and movement to get the tail up during takeoff, its best to suspect something amiss. Don't wait until you are airborne and find, with full forward stick, you are still climbing. Should you allow yourself to get into such a position, reduce power and let the airplane settle back onto the runway.

If the opposite were true, nose heavy condition, where your tail comes up almost as soon as you apply power and requires excessive back pressure to get airborne. Again its best to cut power and land. Taxi back, find out what the problem is before any further attempts to fly are made. A final comment, disregard any misguided remarks made by well meaning friends that may try to encourage you to fly before the problem has been discovered much less fixed.

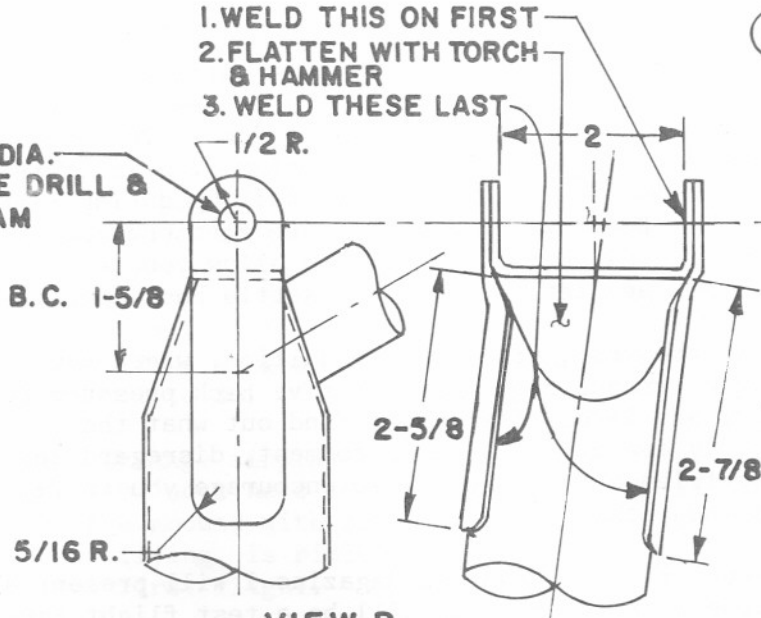
In the next issue of the Starduster Magazine I will present a complete test flight program. Along with the article will be a test flight form which can be filled out, giving a complete performance record for your airplane.



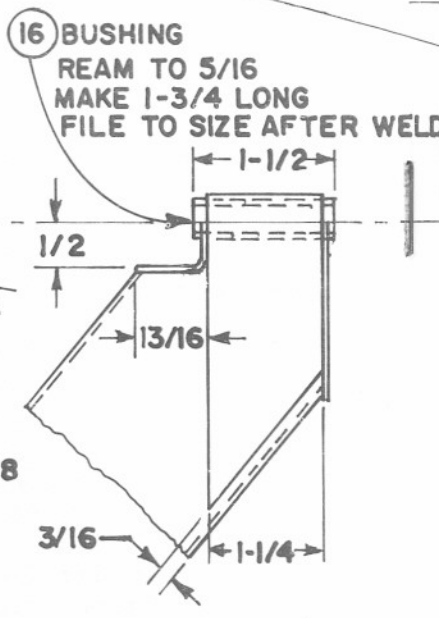
1. WELD THIS ON FIRST
2. FLATTEN WITH TORCH & HAMMER
3. WELD THESE LAST



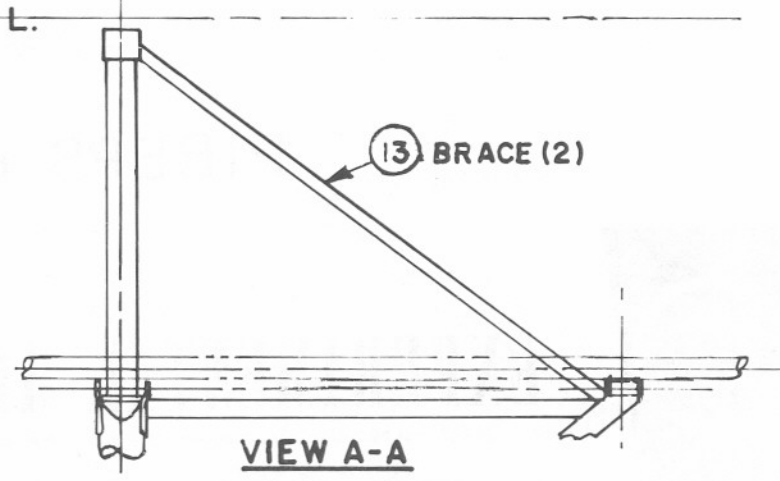
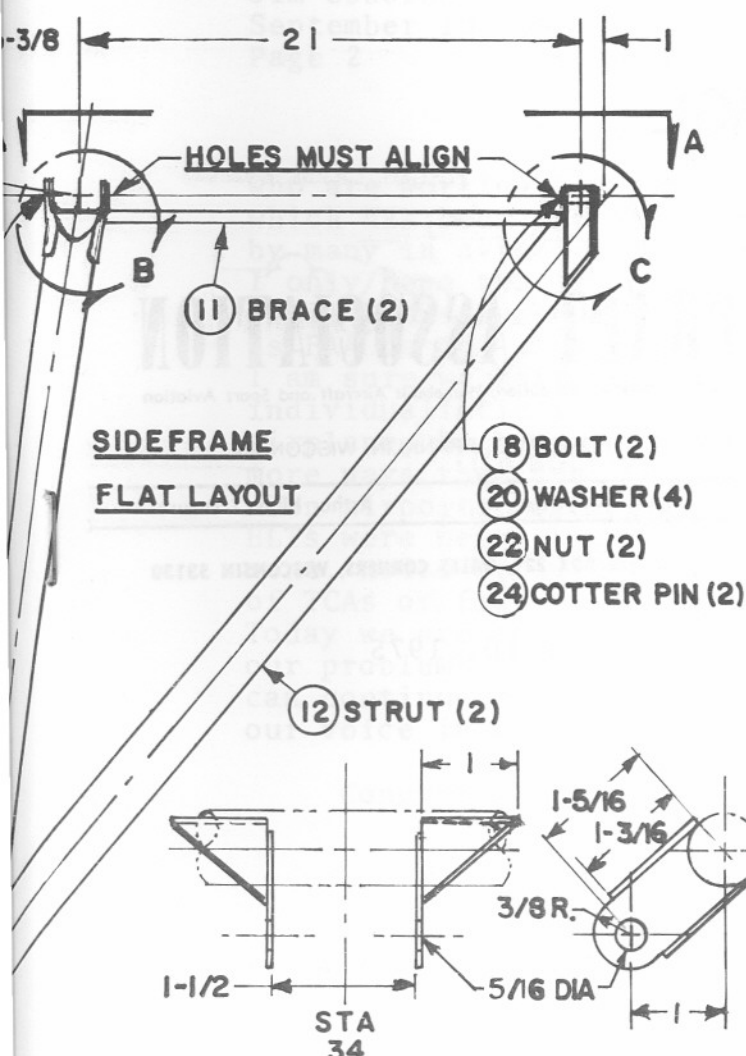
DETAIL -3 BACKPLATE  
1/4 DIA-4 HOLES  
DRILL & POSITION UPON  
BRAKE INSTALLATION



VIEW B  
FRONT STRUT WELDMENT  
ALL PLATES ARE .090



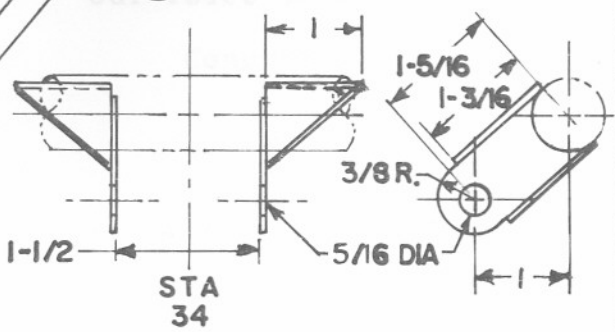
VIEW C  
REAR STRUT WELDMENT



**SIDEFRAME  
FLAT LAYOUT**

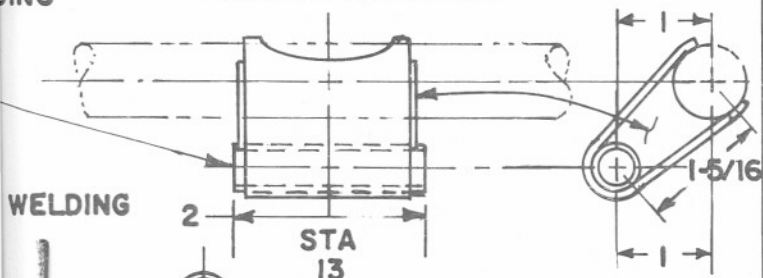
- (18) BOLT (2)
- (20) WASHER (4)
- (22) NUT (2)
- (24) COTTER PIN (2)

(12) STRUT (2)

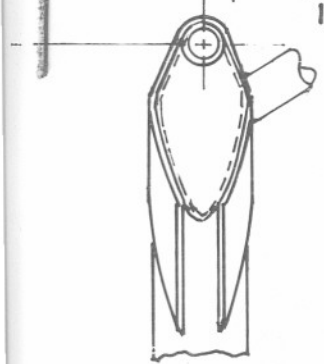


**REAR STRUT/FUS. FITTING  
PLATES ARE .090**

TO  
DING



**FRONT STRUT/FUS.  
FITTING. PLATES ARE  
.090.**



MENT-PLATES ARE .090

**2-USE AIRCRAFT CERTIFIED STEEL.  
1-ALL STEEL IS 4130, COND. N  
NOTE: COPYRIGHT 1975**

	1	PC	4130 SHEET	.090x3 x 36	
	1	PC	4130 SHEET	.071x9 x 9	
26	2		SPACER	1-5/8x.058x2	-26
25	2		COTTER PIN	AN380-4-8	-25
24	4		COTTER PIN	AN380-2-3	-24
23	2		NUT	AN310-6	-23
22	2		NUT	AN310-5	-22
21	4		WASHER	AN960-616	-21
20	4		WASHER	AN960-516	-20
19	2		BOLT	AN6-30	-19
18	2		BOLT	AN5-22	-18
17	2		BUSHING	1/2 x .065	-17
16	2		BUSHING	7/16 x .065	-16
15	2		PAD	BELTING, 1/4	-15
14	2		HOUSING	.071 SHT.	-14
13	2		BRACE, RD	1/2x.035 x 26	-13
12	2		STRUT, S. L.	2.360x.049x43	-12
11	2		BRACE, RD.	3/4 x .049x20	-11
10	2		BRACE, RD.	1-1/8x.065x16	-10
9	1		BRACE, S. L.	1.685x.049x48	-9
8	1		BRACE, S. L.	1.685x.049x48	-8
7	1		STRUT	2 x .065 x 36	-7
6	1		STRUT	2 x .065 x 36	-6
5	4		SHOCK CORD	1280 HD	-5
4	2		NUT	STARDUSTER	-4
3	2		BACKPLATE	STARDUSTER	-3
2	2		AXLE	STARDUSTER	-2
1	1		ASSY & INSTL		SA300-14-1

ITEM	REQ'D	NAME	MAT'L	NUMBER
<b>LIST OF MATERIALS</b>				
SCALE: 1/8		ASSEMBLY- LANDING GEAR MODEL SA300		STARDUSTER "TOO"
DATE: 11-5-75				
DRAWN: J. Osborne				
STRESS: J.O.				
CHECKED: J.O.		STOLP STARDUSTER CORPORATION		SHEET NO. 14



## PIREPS PAGE



# EXPERIMENTAL AIRCRAFT ASSOCIATION

An International Non-Profit Organization Dedicated to the Advancement of Aviation Education, Homebuilt Aircraft and Sport Aviation

**OFFICES & AIR EDUCATION MUSEUM:** 11311 W. FOREST HOME AVE., FRANKLIN, WISCONSIN

Paul Poberezny, President

Ray Scholler, Vice-President

S. H. Schmid, Secretary

Arthur Kilps, Treasurer

PHONE 414 / 425-4860

POST OFFICE BOX 229, HALES CORNERS, WISCONSIN 53130

September 10, 1975

Mr. Jim Osborne  
Editor, Starduster Magazine  
4301 Twining  
Riverside, CA92509

Dear Jim:

I just received the first copy of the Starduster magazine for July of 1975.

I must say congratulations! We need more publications such as yours to provide enthusiasm, direction and education to all of those fine men and women who desire to create or build their own airplane. It is this togetherness of designers, our organization and its people that have made all of this possible.

I am sure you recognize that many newcomers probably think that we have always had the privilege to design and build our own airplane. Not so, as many of us can attest to. In order for us to keep this privilege, we must produce high quality aircraft. We must insure that our safety record, both in flying and maintenance is acceptable - not only to government but to our neighbors. With this in mind, sport general aviation will continue to grow at a very healthy rate.

I am sure that many feel that all those who are designing, building or flying homebuilts belong to EAA; that they avail themselves of the EAA publications, the good fellowship of the many thousands of members and designers. Not so. At one time we were a fairly close fraternity, but today we are slowly growing farther and farther apart. At least 50% of those building aircraft today, are not affiliated with EAA or any other similar organization. A recent conversation with Jim Bede was a great indicator of some 6,000 people who either purchased plans or kits from him, 87% were not members of the fraternity of EAA. How does one encourage those



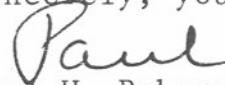
Jim Osborne  
September 10, 1975  
Page 2

- 14 -

who are working with hand and mind, to be a part of a group which has been recognized by government; who has been recognized by many in aviation as an organization that helps each other. I only hope that those who do not have this closeness or who avail themselves of the benefits of belonging to a group such as EAA do not cause our privileges in the future to be taken away. I am sure we both recognize that people in aviation are very individualistic at heart. It seems that once a man solos an airplane, he becomes a different person. We need each other in more ways than one. I can remember in the early days of EAA when airports were plenty; transponders were never invented; ELTs were never heard of. We were never concerned with government, noise or even too concerned about taxes. We never heard of TCAs or five to six foot chain link fences around airports. Today we are all in the same boat. Once we complete our project, our problems are the same. Who do we have to insure that we can continue to fly with ease and few restrictions? Where is our voice in aviation?

Congratulations on the fine publication.

Sincerely, your friend



Paul H. Poberezny  
President

We here at "Starduster" most certainly agree with, and endorse, everything President Poberezny has said. For many years it was illegal to build and fly homebuilt aircraft. It was not until Paul Poberezny and other pioneer EAA founders organized and started developing, and using, political influence that the laws were changed to allow the freedom we enjoy today.

In addition to the personal, individual, benefits to be obtained by joining EAA, our future self interest demands that we all join together and support the EAA, which supports us, and our rights to build and fly airplanes. There are, right now, proposal to, (1) change our registration category, (2) to prohibit unlicensed mechanics from working on home built aircraft, (3) to collect registration and "user" fees from airplane owners in rather large amounts, & (4) to require "billboard" registration numbers on the underside of wings.

To insure that your interests are represented in considering such NPRM, join the EAA.

Try it, you'll like it.



ENTRANCE  
10, 1975



Starduster Too

Bill Frick  
Boynton Beach,  
Fla.  
220 H.P. Franklin-  
135 MPH Cruise -  
@ 2500 RPM -  
1800 FPM Climb

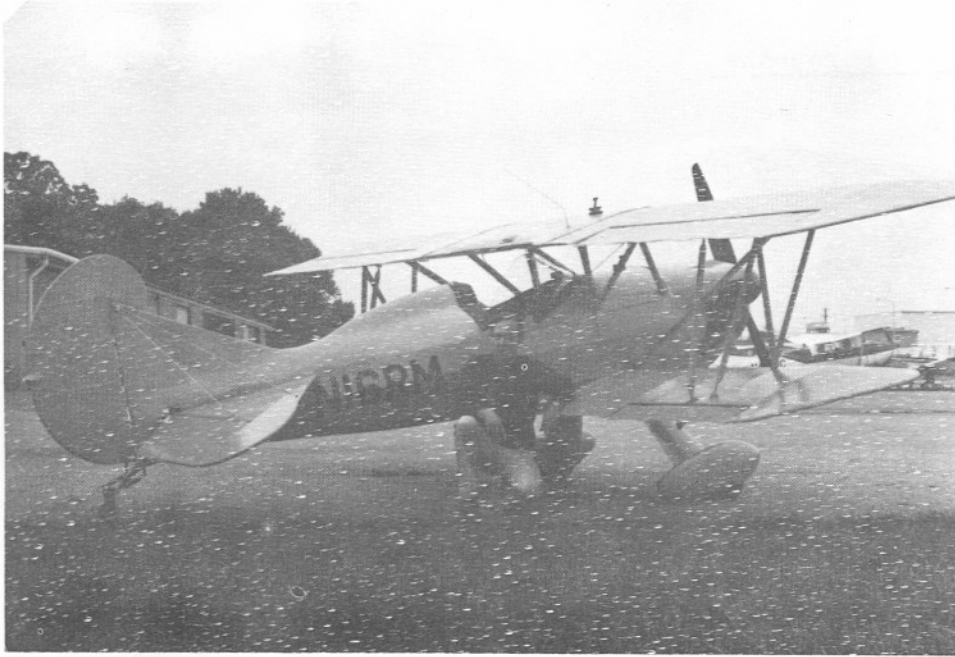
Starduster Too

Built by  
Justus Bailey  
Owned by  
T.F. Flanagan  
Lunenburg, Maine  
First Flight  
- 9-14-75



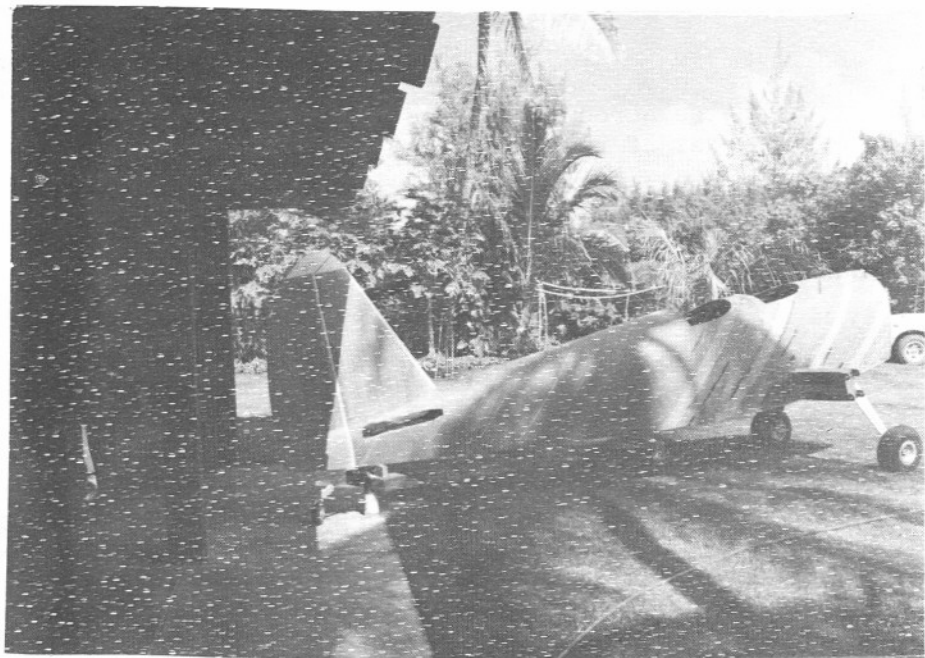
...ated with EA...  
... with Jim...  
...ther purchased...  
...fraternity of EA...

*Handwritten signature*



DER JAGER DIX  
by Roy McInroy  
7017 Lemert Lane  
Reynolds Burg,  
Ohio

115 H.P. Lycoming  
SENENICH 2 POSITION  
PROP. FULL ELECTRICAL  
First Flight, Sept. 1975



Dear Sir,

I need 2 single curve windshields for my plane which is about finished now. May be you could help me out. I could probably cut your Starduster wind screens to fit. If you could furnish them I will send you a check.

Regards

Gene Wells  
P. O. Box 101  
Anahola, Kauai, HI  
96703

The First of the Europeans.



The First of Europeans

- by Peter Leggo  
Cambridge  
England

R.R. #2  
Gaston, Ind. 47342  
May 31, 1975

Dear Mr. Osborne,

I wrote you about four months ago telling you that I want to be a stunt pilot when I get older an I am still serious an always will be. You sent me information on the Acroduster. And my partner an me would like to know if you have any model of the Acroduster an how much it would cost.

Please send me this information.

Thank you.

Sincerely yours,

Steve Burton

Octo. 9, 75

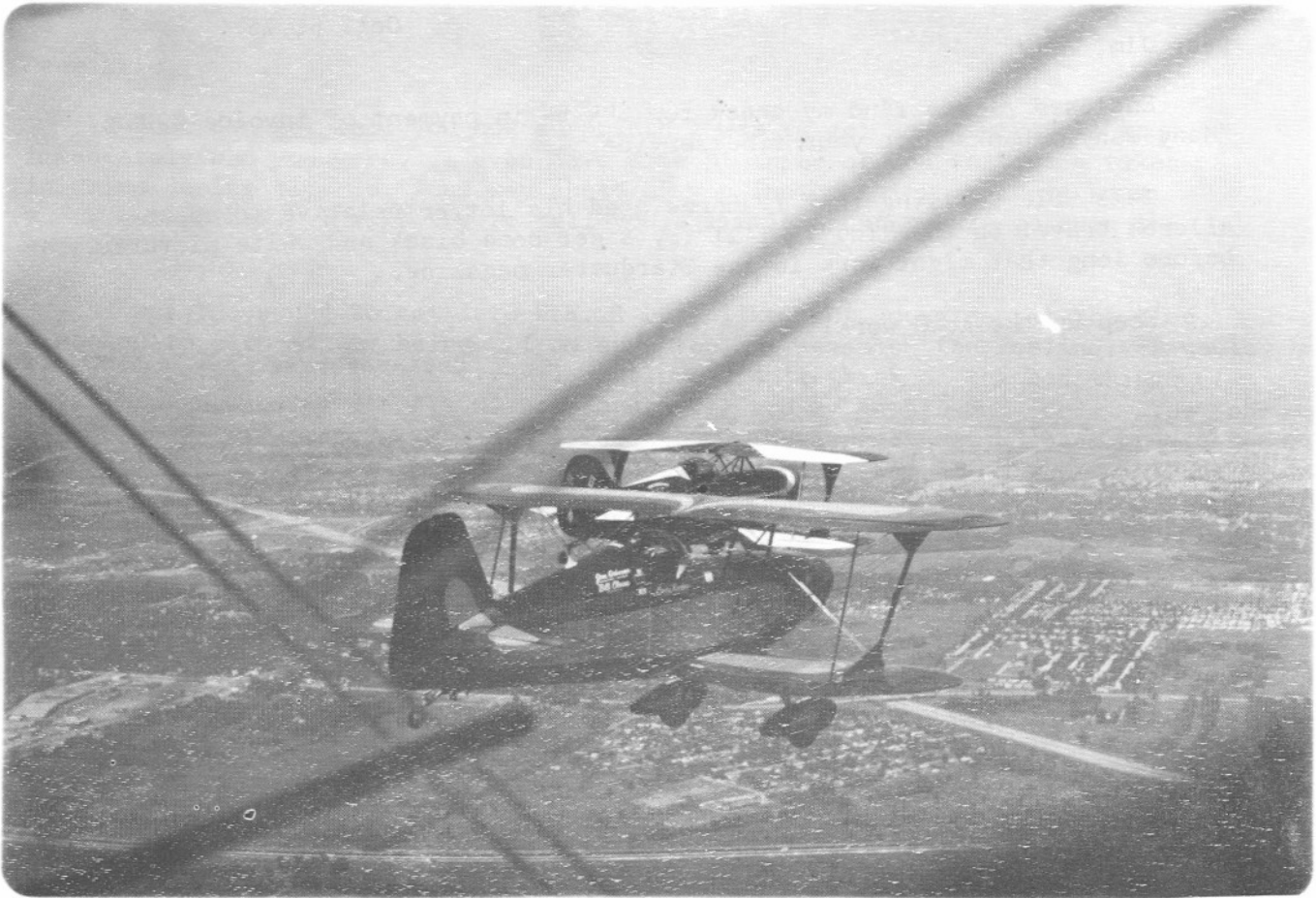
Dear Jim,

Just a line to let you know that Starduster N75RB made its maiden flight Oct. 3, 1975 at the municipal airport-Springfield MO.

After final inspection by F.A.A. I made the flight under their observance. I now have 3:00 hours flight time & have made no adjustments. Every thing seems perfect. It has a good float on landings. I am very pleased. And will send you some pictures soon. Thanks for sending the Starduster magazine.

Sincerely

Ray Btanson  
Box 3432  
Kimberling City, MO 65686



Dear Jim,

Here are the photos of the Acroduster I promised to send you. I have sent some others to Cindy also.

I was interested to read the article on the Acroduster in the latest Air Progress.

I hope my plane will be back in the air in early October which won't give me much time before the Nationals unfortunately. However a little is better than nothing. I'm sure Cindy will be doing well in the Acroduster. It takes a good few hours to get to know your aeroplane and lots of practice as I have learned only too well.

I look forward to meeting you again at the Nationals.

Regards

Pam Lock  
c/o J. Lacey  
Hickory Hollow  
Rte 1, Dundee, Ill 60118

Editor's Note: Ms. Pam Lock is the promising young aerobatic pilot from New Zealand.



Oct. 6, 75

Dear Jim,

Enclosed please find my check for \$44.54 in payment of invoice #2268. "Many many, thanks" for your fine service.

Tell Eric Shilling that I appreciated his letter relative to upper aileron travel on the "Too". I'll try & get some black and white pictures before long that might work in the Starduster magazine.

Keep up the good work!

Best regards,

Norm Petersen  
201 Armstrong Blvd. So.  
St. James, Minn 56081



Dear Eric,

My apology for being late - This is N9 Bakie Ruffin.

I am real proud

"Bakie"  
Box 168  
Thomaston, Ga 30286

Sept. 12, 1975

Dear Eric,

I just can not tell you how surprised I was to get your letter. I know immediately who you were. I even have some pictures of you that were taken in China during 41. So, I am way ahead of you in the things that we know about each other. I will try to tell you a little about myself to even the score.

I was too young to get into W.W. II but, like most young men at the time, I wanted to with all my being. I am sure you can remember the feeling. I would probably have got my tail shot off! But, we didn't think of the bad things did we? The members of the A.V.G. were and still are my heroes and idols. The job that you did was just fantastic. I feel that it stands as one of mans greatest accomplishments. Clair Chennault was an old Louisiana boy which was something I could relate to.

Over the years, I have collected as much information as I could on the A.V.G. and the P-40. I even have a picture of Duke Hedman's graduating class at Randolph. Curtiss Wright no longer has the construction plans for any of the P-40 models and neither does the Air Force museum at Wright Pat. I have found parts catalogs, maintenance manuals and flight manuals. My life dream is to fly a P-40. I have traced all of the existing p-40's down and I have determined that there are only twenty four complete airframes remaining. These are no B's or C's that I know of and only one K (retrieved from Alaska last year). There are four E's and the remainder are N models, including Tallmans TP. Anyway, it looks like if I want to fly a P-40, I must build one.

I am a Registered Professional Engineer and my degrees are in mechanical. Marcel Jurca of Paris, France, is designing my all wood 3/4 scale replica. I am checking his work and have found no major flaws in his thinking. He makes the normal error types and very few of them! His drawings are not U.S. standard engineering drawings but they are readable and the guy shows real genius. We decided to use the long fuselage (M. N models) because we initially thought we would be nose heavy. As things turned out, after I made weight and balance calculations, after we accumulated enough information, we were tail heavy. We should have used the short E type fuselage but, now we can use a longer engine. My fuselage major sub-assemblies and fin are complete and inspected and an alignment jig has been constructed for final assembly. I plan to use the Ranger 6-440-C5 and have two of them. I have flown the Ranger and know what to expect. I have not started the construction of the wing or stab.

Russel Maznagh in Fullerton, California, is also building the 3/4 P-40 and is far ahead of me.

We have formed a Replica Fighter group within the E.A.A. and I have more or less been appointed coordinator of the P-40 builders. I would like to ask if you would be one of our advisers? We only have three serious builders and about ten others that have the desire.

Please let me know what services are available from Stolp Starduster. I would very much appreciate any information that you could share with me on the A.V.G. and the P-40. I would like to compile a factual and historical record of the A.V.G. from the personal side. This has not been done and it should be or it will be lost. A lot has been written but, not by the participants. Important data on personalities, day-to-day activities and aircraft inventory and markings has been lost or not recorded. I would certainly appreciate any documents, photos

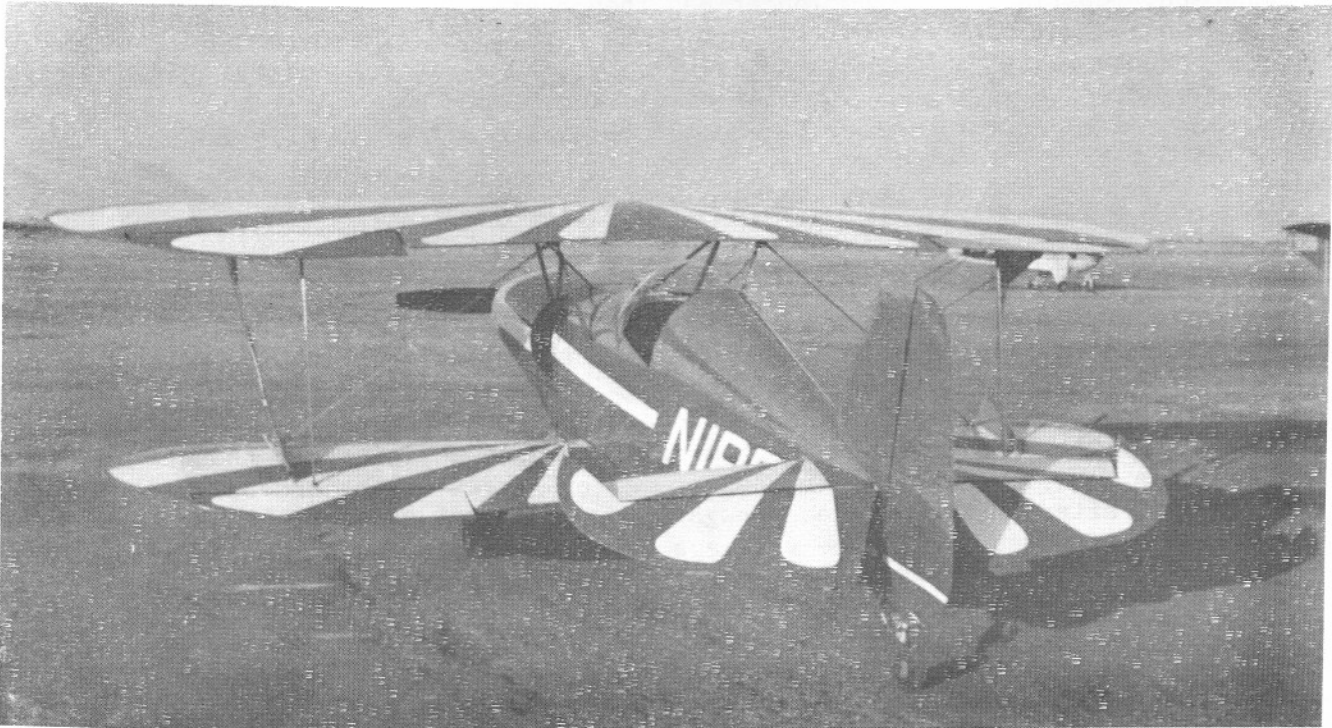
or artifacts that you would allow me to copy. I am particularly interested in P-40 E tail No. 24591. I believe this was Scott's E model and 24591 happens to be my E.A.A. number.

Well, I have rattled on-and-on and said nothing, I'm afraid. I am flattered that you took the time to write me. I hope that you will be interested in participating in our P-40 replica efforts and I hope that you will write again.

Sincerely

John Wells  
2309 Lawnmont  
Austin, Texas 78756

Sept. 15, 75



Third Acroduster One to fly.

Dear Jim,

Thanks for the pictures and to invite to go to Arizona. Am tempted to go, but should finish up plane first. Enclosed are some pictures of "painted" plane. Might give Glenn one of these. Yes, the wife got away to Europe all right, but haven't heard yet.

Regards

Fred Hauenstein  
P. O. Box 246  
Kingsburg, Calif 93631

P.S. Cliff back in Willows.

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Stolp Starduster Corp.  
Flabob Airport  
Riverside, Calif. 92509

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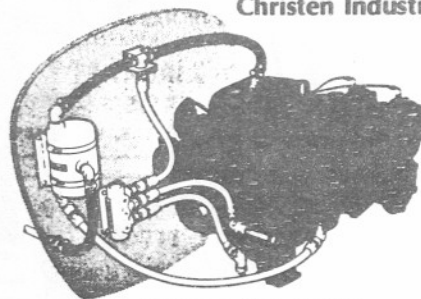
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pants & gear fairings  
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Van Nuys, California  
(213) 786-9928

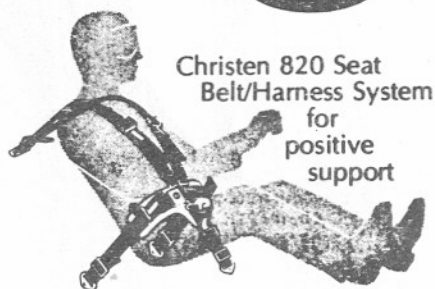
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