

✓ hinge for ease of installation.

✓ The transition of the lip to the small door must be smooth so no binding occurs as the gear comes down. Also, you may have to trim some of this lip away if it interferes with the tab that holds the big gear door on, in the down position. After you get this installed, move the gear through its full movement to be sure it works smoothly. A small foam block can be installed between the small gear door and the gear to make sure it doesn't move around in flight. You should be able to see it in the pictures.

Also, with the gear up, use some sandpaper with the sandy side facing the door, to sand a 1/8" gap all around the door for clearance.

Once the fuselage is turned back over, you can go ahead and install those sockets you fit a long time ago. Slide the sockets onto the gear legs and install the overcenter linkage. Put some micro-glass into the slots where the sockets will go. Lower the gear into the down position, but not all the way overcenter. You want all three bolts in that linkage to be in line so the linkage is as long as it can be. After cured, sand and round rough areas and micro-glass radius and glass the sockets in with two Bid inside and out. Make sure you stay off the inside surface of the socket where it comes in contact with the gear.

#### HYDRAULIC POWER PACK AND CYLINDER INSTALLATION

✓ The power pack is a self contained unit comprising motor, gear driven pump and reservoir. The unit can actually

be in any one of several locations; the recommended location is on the forward side of the canard bulkhead on the co-pilot side.

✓ 1. Position the power pack for minimum interference and accessibility, mark hole location and drill through the bulkhead and mount with appropriate bolts.

✓ 2. Position the nose gear door cylinder on the center line of the canard bulkhead per Figure 108. Assemble actuating linkage and attach aluminum angle to upper end of cylinder, drill and attach to bulkhead. Attach the aluminum guides to the lower portion of the cylinder arm just above the nose gear mounting straps.

✓ 3. Drill 3/16" holes in the nose gear swing arms 1-3/4" from the mounting hole and assemble necessary ball joints.

✓ 4. Remove all springs and spacers (if installed) from nose gear cylinder and with ball rod end installed, place in the full open position. Attach all arms and ball joints and with doors in their full open position, check linkage for proper fit.

✓ 5. Trim the linkage as necessary to achieve full open without excessive down pressure on the gear door swing arms.

NOTE: Up to 1/4" free play is O.K. as shims can be added between the swing arms and lower fuselage to remove any slop in the system.

✓ 6. Now move to full closed position and measure the distance between the bottom of the cylinder and the stop nut on the rod end. A spacer will need to be trimmed to fit this

✓ space. NOTE: It is important that the cylinder bottoms out on this spacer. If the gear doors bottom out first, damage will be done to the swing arms on the doors.

✓ 7. Once all is adjusted properly, hand check the up and down positions to insure proper action. Now re-assemble the spring onto the cylinder rod and Loctite all in place except the upper ball joint to rod. This can later be trimmed if needed for adjustment. NOTE: The ball joints are made to snap out of the mating part, making disassembly and re-assembly easier.

✓ 8. Proceed now to complete assembly of all cylinders and sequence valve if you haven't already done so.

#### PLUMBING

The plumbing of the hydraulic system includes proper AN fittings, high and low pressure switches, aluminum tubing, flex hose, and associated hardware. Aluminum tubing must be bent using spring bending tools or better. Rigid Tool Co. makes a fine 1/4" tube bender that works wonders. It is also important to buy or borrow a proper 1/4" tube flaring tool. Remember, we are using AN fittings and proper flare is important.

- ✓ 1. Mount the AN 832-4D and 804-4D firewall unions through the bulkhead in the positions as shown in Figure 108.
- ✓ 2. Mount the high and low pressure switches to the pump using AN 834-4D "T"s.
- ✓ 3. Route aluminum tubing and connect as per Figure 109.
- ✓ 4. Route aluminum tubing to sequence valve and dump

valve as per Figure 109.

✓ 5. Dump valve mounting requires removal of inner skin and foam on the co-pilot side of center tunnel just in front of the instrument panel.

✓ 6. Assemble the hose fittings to the hydraulic hose and attach to the cylinder as shown in Figure 109. NOTE: When assembling steel fittings onto the hose, lubricate with oil or red hydraulic fluid and turn counter clockwise.

7. Pressure Switch Adjustment. Both pressure switches will probably need to be adjusted. To do this will require a 0-2000 PSI gauge. If you do not intend to put a permanent gauge in the airplane, we can send one to you which you promise to return when your finished adjusting the switches. Plumb the gauge into the retract side first and once you have cycled the gear a few times to remove air from the system, remove the cap (two small nuts) from the pressure switch.

Note: Some can be adjusted without removing the cap... This will expose two springs held in place with two identical nuts. Increase pressure by turning clockwise (tightening) equally so the gear will complete its full cycle without the pump cycling and pressure will show about 1000 PSI when everything shuts off.

Repeat for the extension side. However, you will need to reduce pressure by turning the nuts counter clockwise until the pump shuts off when reading approximately 500 PSI on the gauge. (You will, of course, need to plumb the gauge into the gear down side of the system.)

If, when flying the airplane, the pump cycles rapidly

while retracting the gear, this is a sign the gear up pressure switch needs re-set to a higher pressure. This can be done without a gauge by making a one to two turn adjustment to the nuts or screws and trying again until the gear cycles without the pump turning off prematurely.

8. With the exception of bleeding the air from the system, this should complete the plumbing.

#### ELECTRICAL

The gear motor will pull about 30 amps, thus, it should be operated via relays so that the switch can be standard size and rating. Two relays are required since the motor must run in both directions.

- ✓ 1. Install the two relays on the canard bulkhead just above or beside the pump motor and wire per Figure 110.
2. Install the gear warning horn in a location to insure proper audio level. The glare shield is an ideal location.
3. Install the gear warning micro switch to the throttle linkage in such a way that the last 1" of throttle movement toward idle will activate the switch.
4. Install the nose gear overcenter safety strap and micro switch as shown in Figure 111.
5. Install the main gear micro switch on the overcenter linkage in such a way that when the linkage is straight it activates the switch. We use the front facing side in the middle. The little roller hits the plate that the bolt goes through.
6. Install the gear switch and lights on the instrument

panel in easy view of the pilot. NOTE: The gear switch has extra terminals to use as a hobbs meter switch if desired. ie; wheels up activates hobbs.

4. See Figure 110 for complete landing gear electrical detail.

#### FINAL ADJUSTMENTS OF CYLINDERS, GEARS, AND SEQUENCE VALVE

It is important to have cylinders properly adjusted. The requirement is to have the cylinders bottom out against themselves! With the gears in the retracted position, the hydraulic pressure must not be putting a load onto the gear overcenter linkage but rather be carried by the cylinder itself.

The gear down position must be determined first.

1. For the nose gear, you must adjust the linkage and shock to go overcenter about 1 to 2 degrees. The reason for this is in case of hydraulic failure, when loaded, the linkage will be pulling on the cylinder, not pushing which would cause a collapse. Use a level finder on both the shock and linkage as you adjust the rod end to allow this. After you have this adjusted right, fun the rod end all the way in and count the number of turns it takes. The reason for this is that you will have to remove this a few times until you get your gear up position adjustment done, and this way you won't have to keep adjusting it every time you put it on.

2. For the main gear, The rod ends must be adjusted so the cables are snug but not tight, to allow the overcenter linkage to go straight. After the initial retract, you'll need to re-adjust them because of cable stretch.

The gear up position can now be adjusted.

3. The adjustment for both gears are made using the two different sized aluminum spacers. You'll probably need to trim these spacers to create a physical "stop" by fitting tightly between the check nut and the face of the cylinder body when the gear is in the full retract position.

4. If, due to your particular installation, the aluminum spacer is not long enough to create a "bottomed out" condition, you may add washers as shims between the spacer and stop nut. NOTE: The main gear cylinder already has one wide area washer sandwiched at the end as a bearing surface for the aluminum spacer. WARNING: Do not add washers between the spacer and cylinder body as this could interfere with the downward travel and prevent the gear from locking in the down position.

5. When the gears are fully retracted, by hand, the aluminum spacer should be tightly compressed between the stop nut, or washer on the main gear cylinder, and the cylinder body. If you are able to rotate it with relative ease, then it is not doing its job and will require a washer as a shim.

6. After you have adjusted them by raising the gears by hand, you will probably need to adjust some more when you run them up hydraulically.

7. With the main gears up where you want them, gear doors flush, fashion some rubber spacers to fit at the junction of the horizontal and transverse bulkheads so the gears don't move side to side.

8. Adjust the sequence valve screw and nut so that it activates just as the gear is up in the hole. This might take a little while to get right. Make sure its not adjusted so far out as you could start bending your attach bracket.

#### SUMP TANK

*Page 476 Fuselage Section*

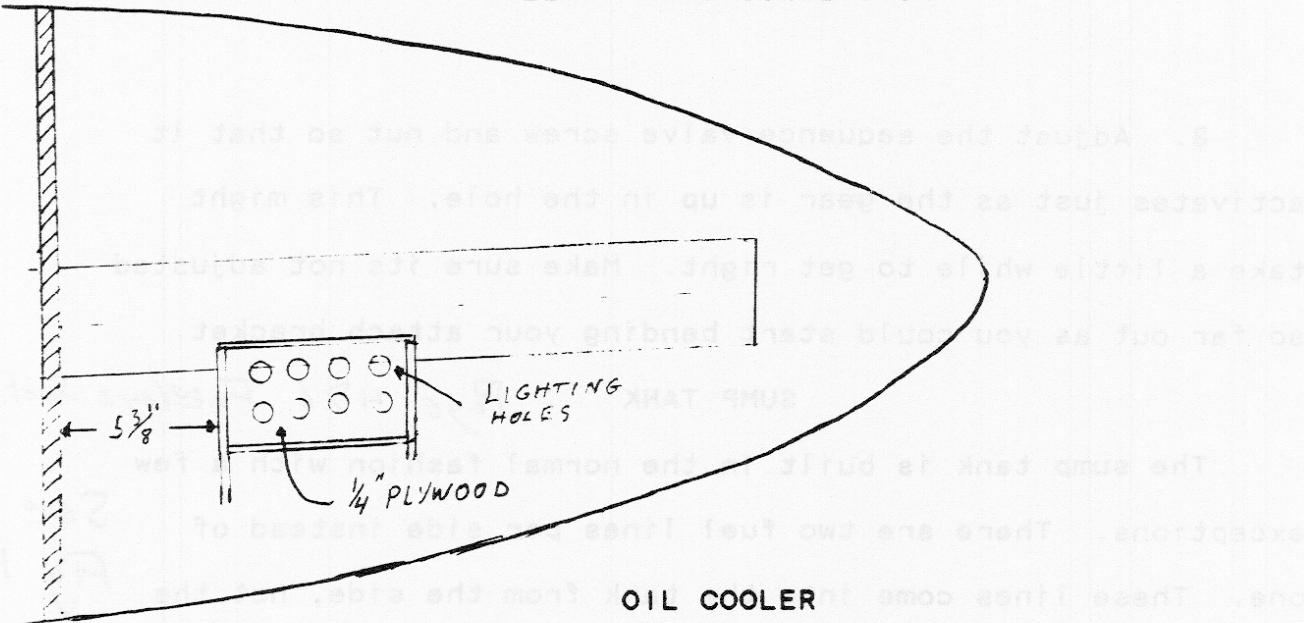
*See  
Fig 113*

The sump tank is built in the normal fashion with a few exceptions. There are two fuel lines per side instead of one. These lines come into the tank from the side, not the top. The aluminum plate for the drain is put on the outside bottom of the tank, not in it. The fuel drains off to the side at the bottom of the fuselage, not directly below. The Triax pads that hold the tank in are moved a little. Refer to Figure 113 for details.

It will be necessary to re-locate the battery and oil cooler to provide the proper room for the nose gear to retract.

#### BATTERY

The easiest location to place the battery is on the right (co-pilot) side about 5-3/8" in front of the canard bulkhead. The battery will extend into the nose gear "bay" area but does not interfere with the retracted gear. Templates are provided for the fore and aft battery supports. Glass the battery base and supports onto the inside skin with two BID lapping onto the fuselage at least 3".



The oil cooler should be mounted on the left (pilot) side in front of the canard bulkhead. Use the NACA duct provided along with the exit duct to fabricate a heater bypass for cabin heat. We are presently working on a pre-molded bypass which will make the installation a lot easier.

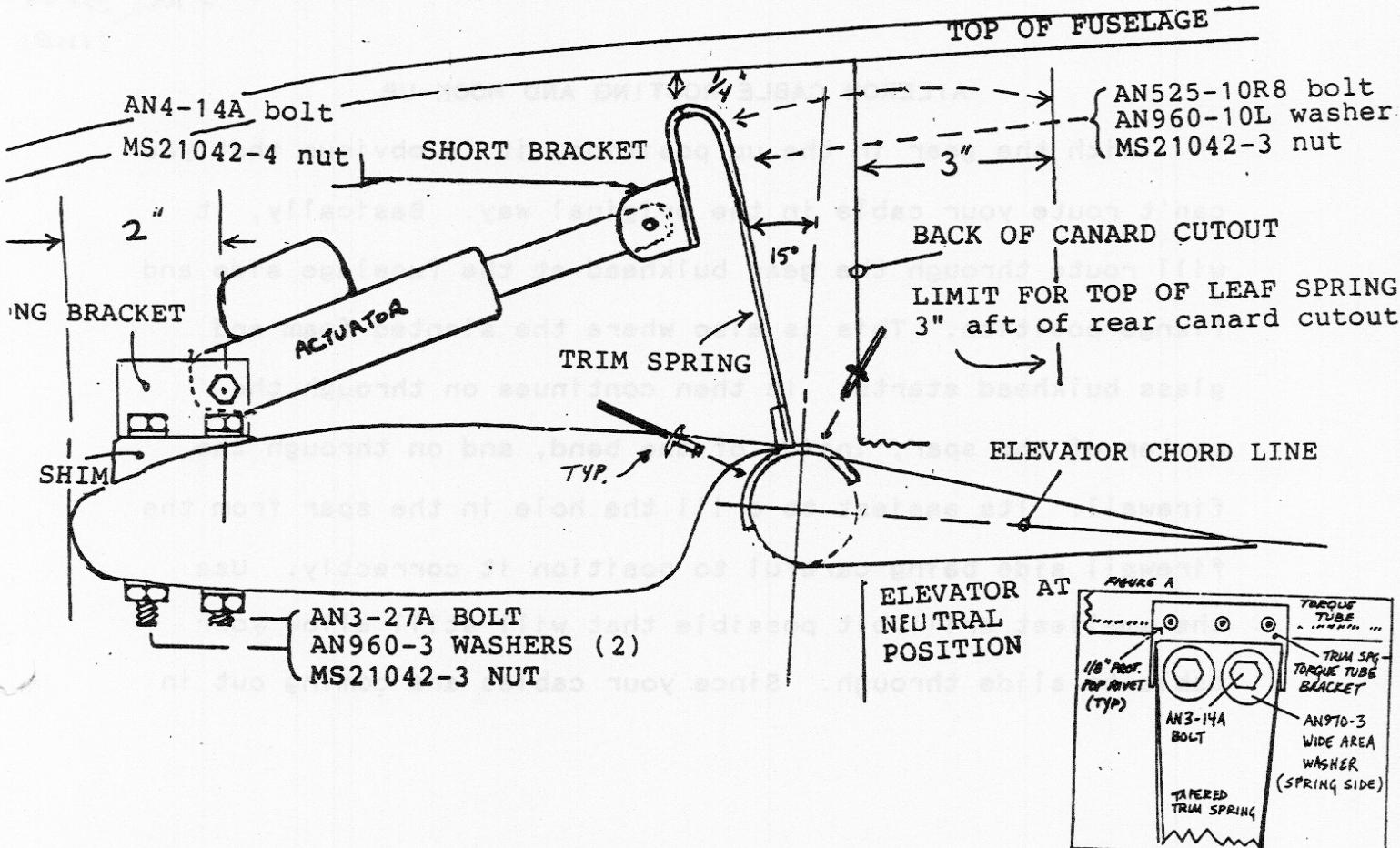
#### ELEVATOR TRIM

There are two types of elevator trim on the Velocity. The first is electromechanical and the second is aerodynamic (optional). To begin the installation of the electromechanical trim, you will have to position the fiberglass leaf spring on the elevator torque tube somewhat near the center of the fuselage in a position where it's operation won't interfere with your avionics. This spring straddles the torque tube in the 11 o'clock position with respect to the chord-line of the elevators. The spring is held into place with (6) 1/8" pop rivets (3 in each side). Some notching of the TE lip on the canard might be necessary to clear this spring. Cut the spring height to clear the

fuselage top inner skin by at least  $1/4"$ . Bolt the small piece of aluminum channel to the forward side of the glass spring even with the top. The small end of the linear actuator gets bolted to this bracket. The larger bracket gets bolted to the motor end of the linear actuator with an AN4-14A bolt centered 2" aft of the LE of the canard. This bracket is bolted to the canard with two AN-27A bolts.

Trim pressure can be modified by moving this bracket fore and aft on the canard. Once the trim system is all in place, put the canard on the plane and check it's operation with a battery (reverse the leads to reverse the direction of the actuator).

Note: To adjust the tension of the pitch spring, sand faces to loosen, lay-up extra glass to tighten.

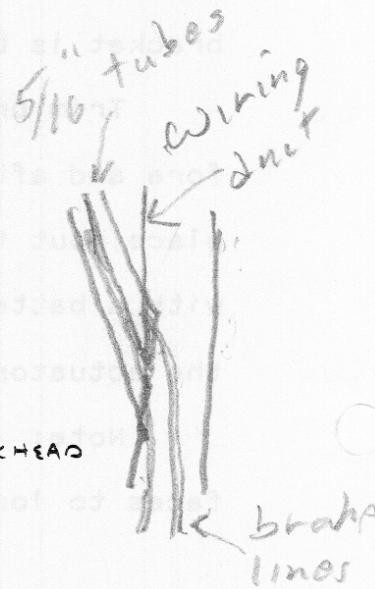
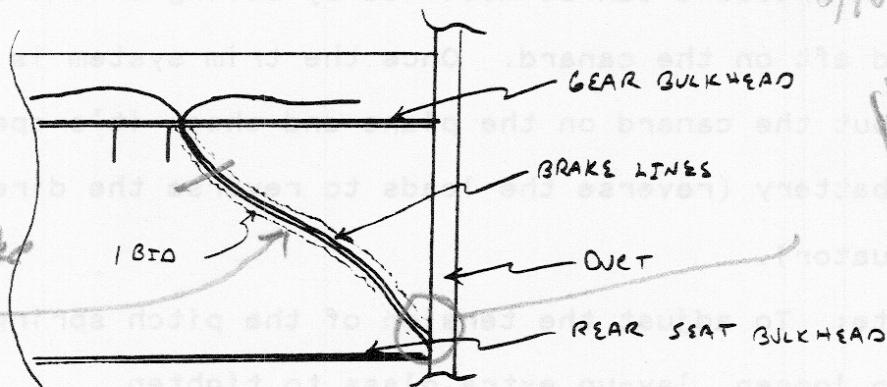


## BRAKE LINE HOOK UP

When you install your brake lines, bring them out of your ducts just past your rear seat bulkhead and run them together through a hole in the gear bulkhead beside the pulley stiffener. Glass to the bottom skin with one BID. Fit the lines so they lay nicely when the gears are up. During your final assembly, you will hook everything up as in the original plans:

see P. 484

Glassed in  
5/16" O.D. Nylon  
tube for brake  
line duct.



## AILERON CABLE ROUTING AND HOOK-UP

With the gear in the up position, it is obvious that you can't route your cable in the original way. Basically, it will route through the gear bulkhead at the fuselage side and flange position. This is also where the slanted foam and glass bulkhead starts. It then continues on through the center of the spar, inside of the bend, and on through the firewall. Its easiest to drill the hole in the spar from the firewall side being careful to position it correctly. Use the smallest drill bit possible that will still allow your cable to slide through. Since your cables are coming out in

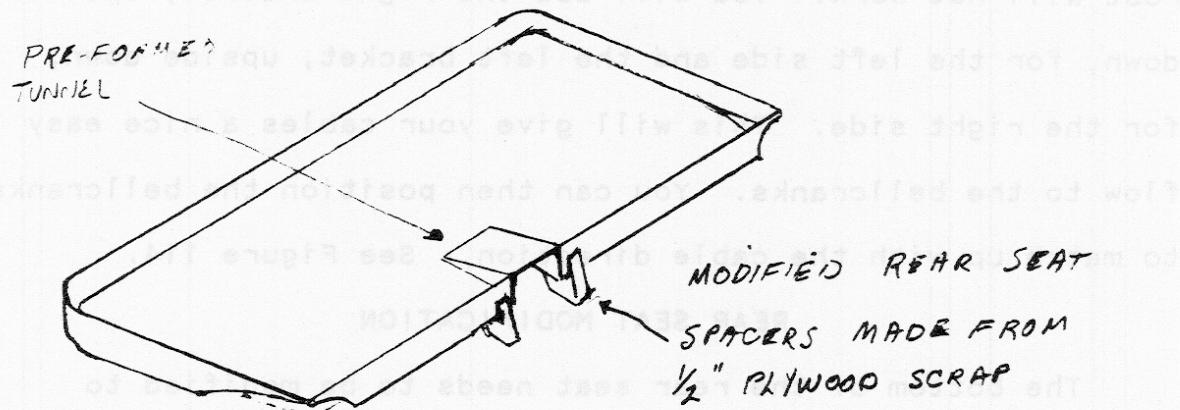
a different position, the standard bracketing at the wing root will not work. You will use the right bracket, upside down, for the left side and the left bracket, upside down, for the right side. This will give your cables a nice easy flow to the bellcranks. You can then position the bellcranks to match up with the cable direction. See Figure 114.

#### REAR SEAT MODIFICATION

The bottom of the rear seat needs to be modified to provide clearance between the rod ends and cables, and the rear seat. It is also necessary to provide center support to prevent the seat from sagging when loaded.

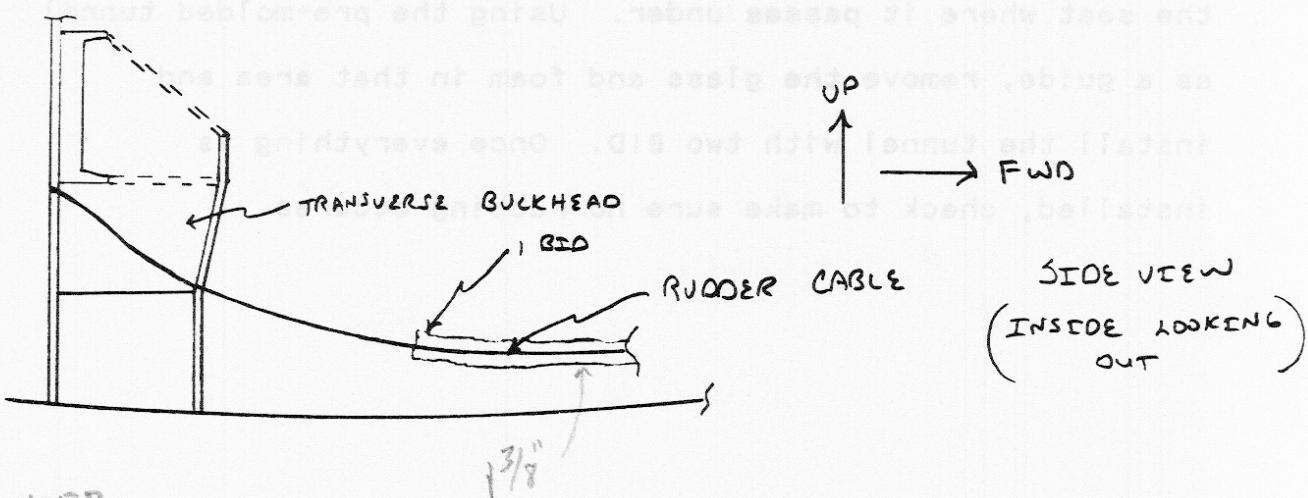
This is best done if left until last, after the rear seat bulkhead is in place and the retract cylinder connected. Place the seat into position until it rests on the ducts on both sides of the fuselage and on the seat bulkhead. Mark the under-seat area along the bulkhead for installation of the aluminum channels that will support the front of the seat and keep everything in alignment.

Now extend the rod from the main gear cylinder and mark the seat where it passes under. Using the pre-molded tunnel as a guide, remove the glass and foam in that area and install the tunnel with two BID. Once everything is installed, check to make sure no rubbing occurs.



#### RUDDER CABLE ROUTING

Because of the location of the main gear in the up position, the rudder cable routing must be changed. It is basically normal until just past the rear seat where it angles up and in <sup>ward</sup> somewhat to the gear bulkhead where it goes through. It follows right along the inside of the transverse bulkhead angling up through the firewall below the spar. From there it hooks up the same as before.



## CONCLUSION

Like any other set of plans, there is always something that is not understandable to some individuals. We understand that and welcome any questions and or comments that you can make about them so we can improve them. Whatever you do, please read the Velocity plans, go over the pictures, diagrams, tapes, etc., then go through our plans, pictures, diagrams, templates, etc., to get an overall understanding of what you are about to do, before you do it.

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## VELOCITY RG CONVERSION

64

## PARTS LIST

## NOSE GEAR

QTY	SHIPPED	B/O	DESCRIPTION
1			Modified nose gear assembly
1		✓	Shock absorber
1		✓	Overcenter linkage
1			Aluminum plate material
2			Oilite flanged bushings 5/16"ID
1			Spacer Material (steel) 5/16"ID
1		✓	Alum. angle- micro switch 1/16"
1		✗	Alum. angle- ns. door cyl. 1/8"
2		✓	Alum. angle- ns. gear cyl. 1/8"
1"			Alum. spacer mat.- ns. gear cyl
2		✓	Alum. slide guides
1		✗	Push rod assembly
1		✗	Hyd. cyl. assembly - gear doors
1		✓	Gas spring assembly
1		✓	Alum. strip - sequence valve
1		✓	3/8" fib. glass - swing arms
1		✓	1/4" Clark foam - 2' X 4'

## MAIN GEAR

2		✓ Main gear legs
2		Steel bushings - modified
4"		Alum. Spacer mat. 5/8" ID
2		✓ 3/32" cable assemblies w/ends
2		AN 111 cable bushing assemblies

4 Mar 93 Inventory stopped w/o completion. Scott  
 Swing said don't bother. Major components on  
 back order.

## VELOCITY RG CONVERSION

65

## PARTS LIST (page 2)

## MAIN GEAR

QTY	SHIPPED	B/O	DESCRIPTION
2			✓ MS 20219-4 pulleys
2			HF-3 Rod Ends - cables
1			✓ Overcenter linkage w/gas spring
2			✓ Steel collars - top gear legs
4			Oilite flg. bushings - collars
4			Oilite bushings -in alum. bush.
2			✓ Pulley holders
2"			Alum. angle - pulley holders
5"			✓ Alum. strip - pulley holders
4"			Alum. bushing mat. - cyl. end
2"			✓ Alum. spacer mat. - main cyl.
1			Alum. bracket - cyl. middle
1			Alum. plate - gear doors
7"			Hinge - small gear doors
2			✓ Gear doors
1			1/4" Clark foam - 2' x 4'
6			✓ Yards of UNI cloth

## HYDRAULICS AND ELECTRICAL

1		✓ High pressure switch
1		✓ Low pressure switch
1		✓ Sequence valve
1		✓ Nose gear hydraulic cylinder
1		Main gear hydraulic cylinder
1		✓ Hydraulic pump
1		✓ Bypass valve

## PARTS LIST (page 3)

## HYDRAULICS AND ELECTRICAL

QTY	SHIPPED	B/O	DESCRIPTION
12'	as above -		✓ Alum. tubing 1/4" 5052-0
11'	as above -		✓ Flex hose
8	as above -		✓ Flex hose fittings
5	as above -		✓ AN 822-4D elbows
2	as above -		✓ AN 822-4-4D elbows
3	as above -		✓ AN 825-4D tees
1	as above -		✓ AN 832-4D firewall union
2	as above -		✓ AN 804-4D firewall union
1	as above -		✓ AN 824-4D tee
22	as above -		✓ AN 818-4D nuts
22	as above -		✓ AN 819-4D sleeves
2	as above -		✓ AN 6227-7 O Rings
2	as above -		✓ AN 924-4D Nuts
2	as above -		✓ AN 834-4D Tees 4-8-93 extra shipment.
2	as above -		✓ Solenoids
1	as above -		✓ Gear switch with knob
2	as above -		✓ Green lights (gears)
1	as above -		✓ Red light (hyd. pump motor on)
3	as above -		✓ Micro switches

## PARTS LIST (HARDWARE)

## NOSE GEAR

QTY	LOCATION	AN	#
1	✓ Bottom of nose gear channel	7	55A
1	✓ Gear to shock	5	20A
1	✓ Shock to linkage	5	15A
1	✓ Linkage to side panels	5	53A
1	✓ Cylinder to linkage	5	11A
1	✓ Cylinder to fuselage	5	11A
4	✓ Gear doors to fuselage	4	11A
2	✓ Sequence valve to bracket	3	11A
1	✓ Top of gear door cylinder	3	14A
2	✓ Angles for top of gear door cylinder	3	13A
4	✓ Nose cylinder angles to fuselage	507	428R12
8	✓ Alum. plates to side panels	526	832-12
4	✓ Alum. channel for micro switch	526	832-8
4	Sequence valve holder to console	\$10 wheel pants	
8	✓ Door cyl. slide guides and solenoids to canard bulkhead	\$10 sheet metal	

## MAIN GEAR

2	✓ Overcenter linkage - Outer	6	26A
1	✓ Overcenter linkage - Middle	5	22A
1	✓ Cylinder end	5	47A
2	✓ Pulleys	4	10A
2	✓ Pulley holders	3	20A

## PARTS LIST (HARDWARE) page 2

## MAIN GEAR

QTY	KA	LOCATION	NO/ITEM	AN	#
✓2		Alum. plate for pulley holder	3	7A	
✓2		Cable bushings at linkage	3	5A	
✓2		Cyl. bracket to rear seat bulkhead	3	12A	
1		Main gear cylinder to cables	3	17A	
✓14		Gear doors	507	832R8	
✓4		Cylinder cover		#10 wheel pants	

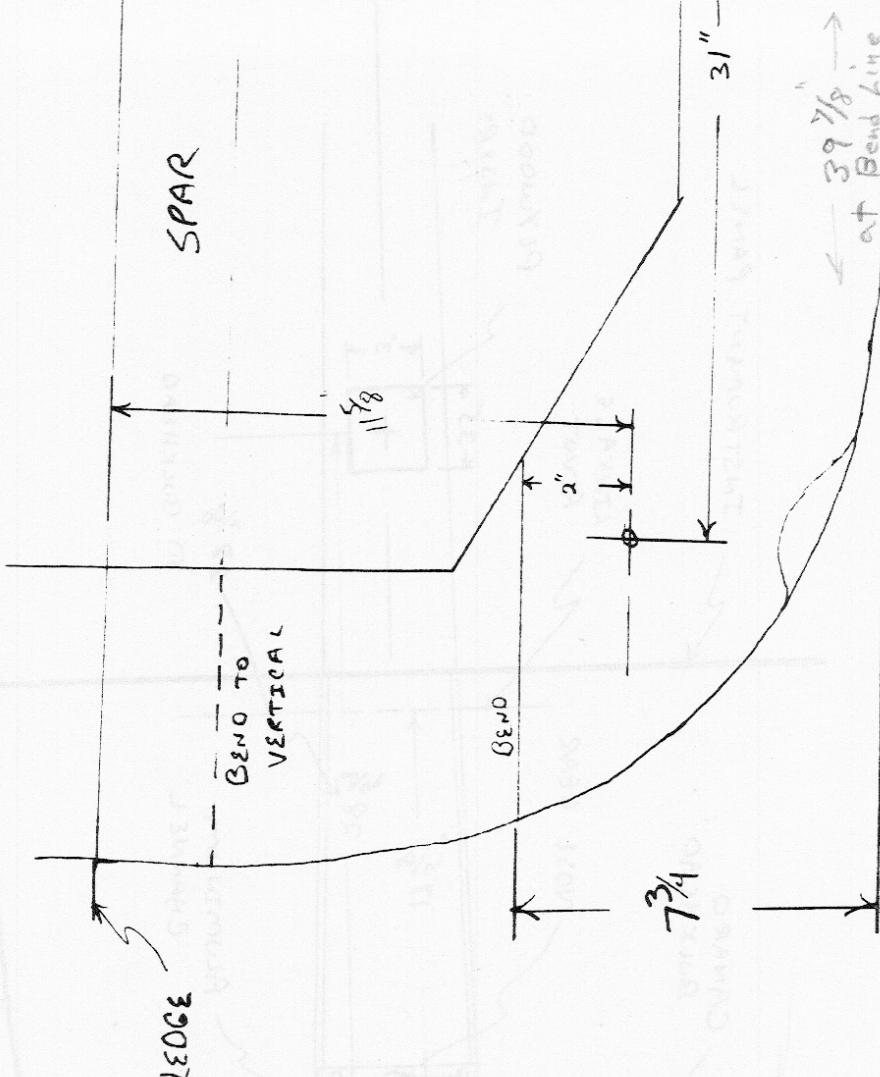
## WASHERS NUTS

QTY	AN#	QTY	AN#
✓2	960-7	1	365-7
✓12	960-6	✓2	364-6
✓17/16	960-5	7	364-5
✓14	960-4	✓8	364-4
✓14	960-3	✓13	364-3
✓2	970-5	14	K1000-08
✓8	970-3	8	364-832A

## RANGE KIAM

ABE		zeta - spacial zeta
ABE		omega - spacial omega
ABE		beta - spacial beta
ABE		gamma - spacial gamma
ABE		delta - spacial delta

FRONT VIEW



SIDE VIEW

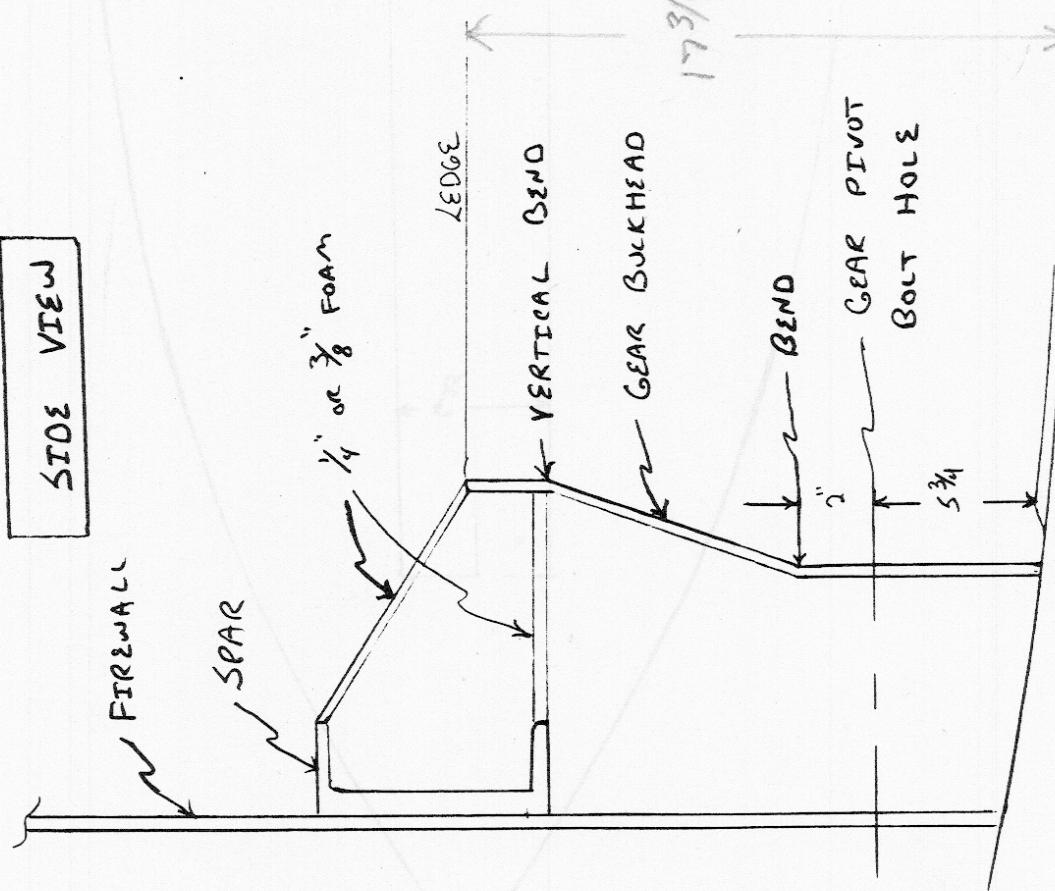
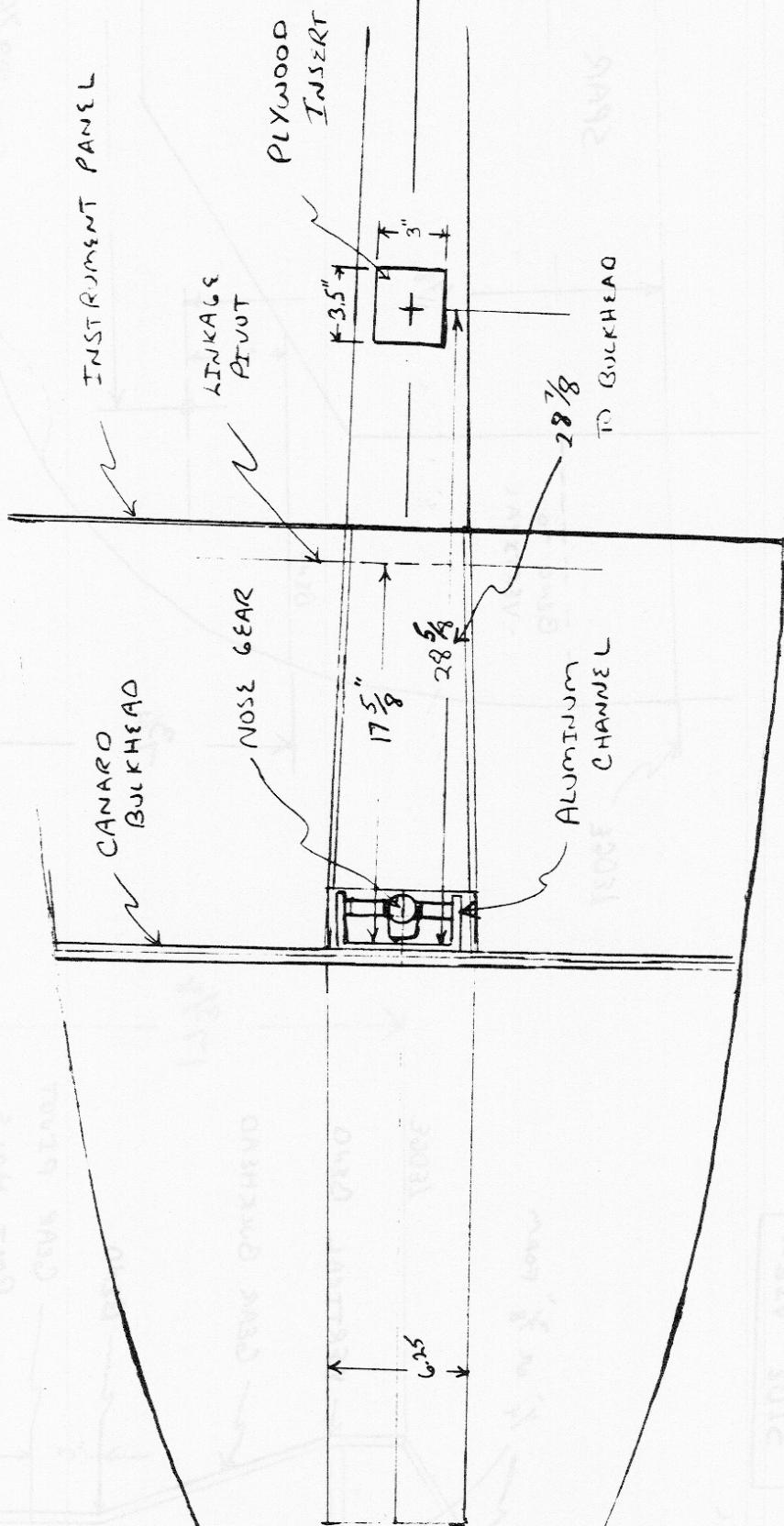


FIG 101

TOP VIEW



FT6 102

"Window" to see  
over center wing?

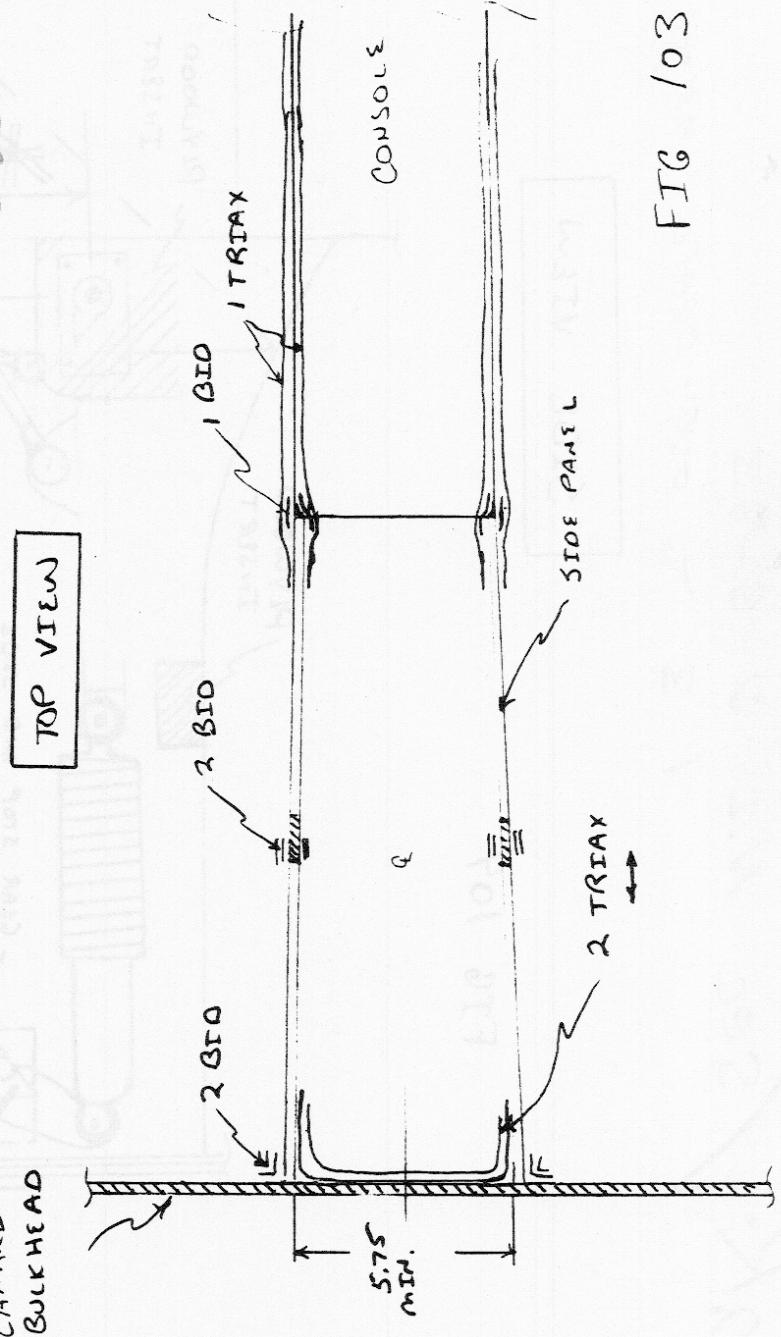


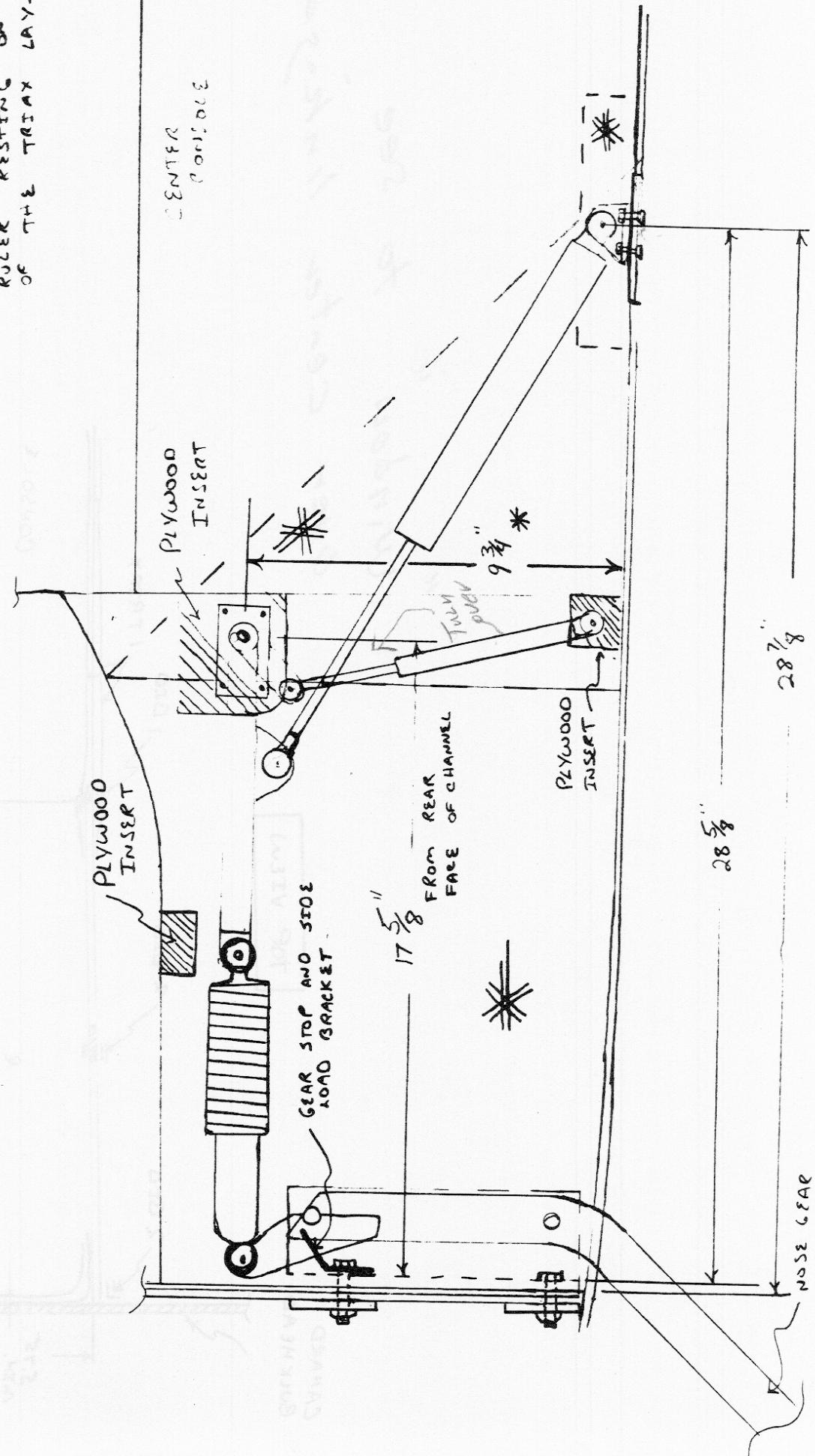
FIG 103

O.K. ✓ See N.L. P 3 - 93 "over center linkage"

STOKE VIEW

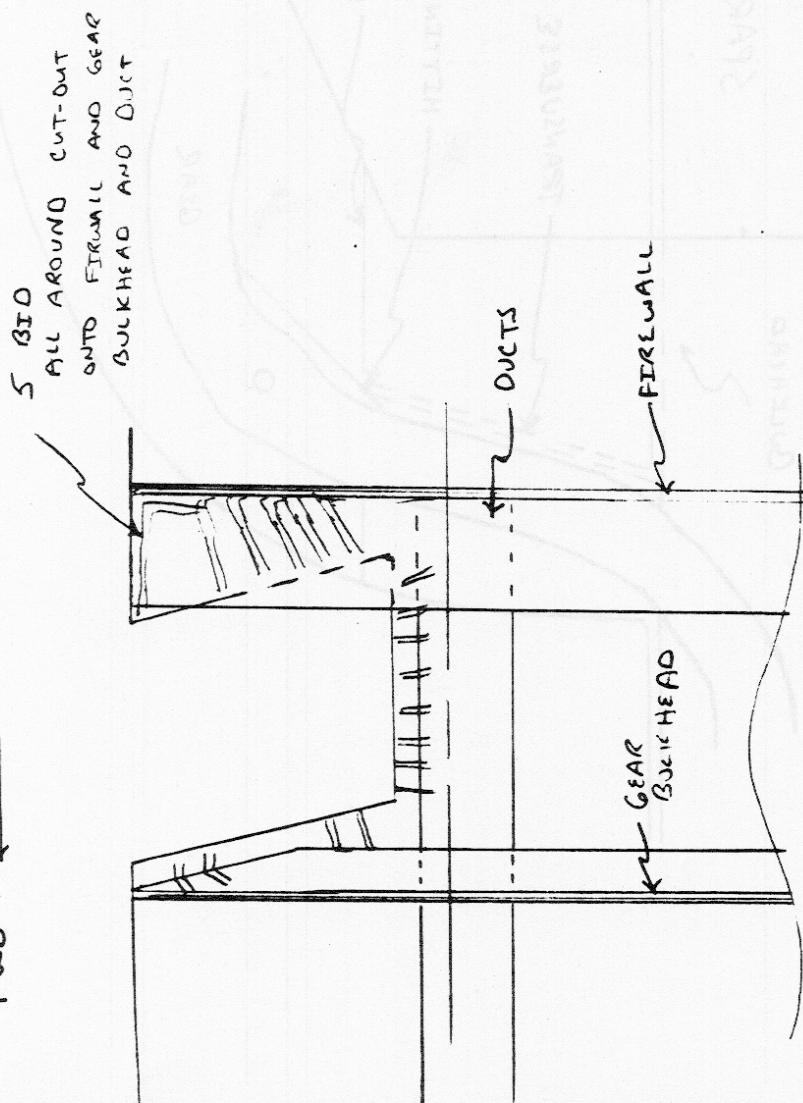
FIG 104

\* MEASUREMENT MADE ON  
OUTSIDE OF SIDE PANEL  
WITH TAPE MEASURE OR  
RULER RESTING ON TOP  
OF THE TRAX LAY-JO



TOP VIEW

FWD →



STOKE VIEW

↑

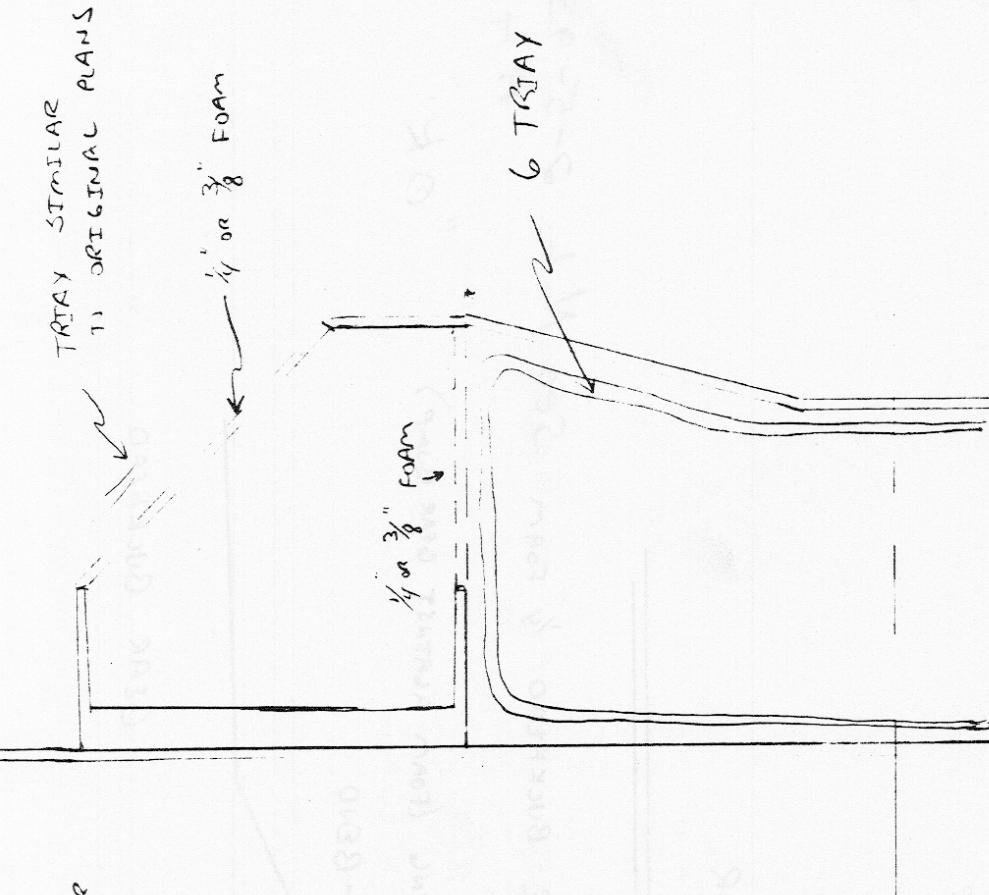


FIG 105

FIG 106

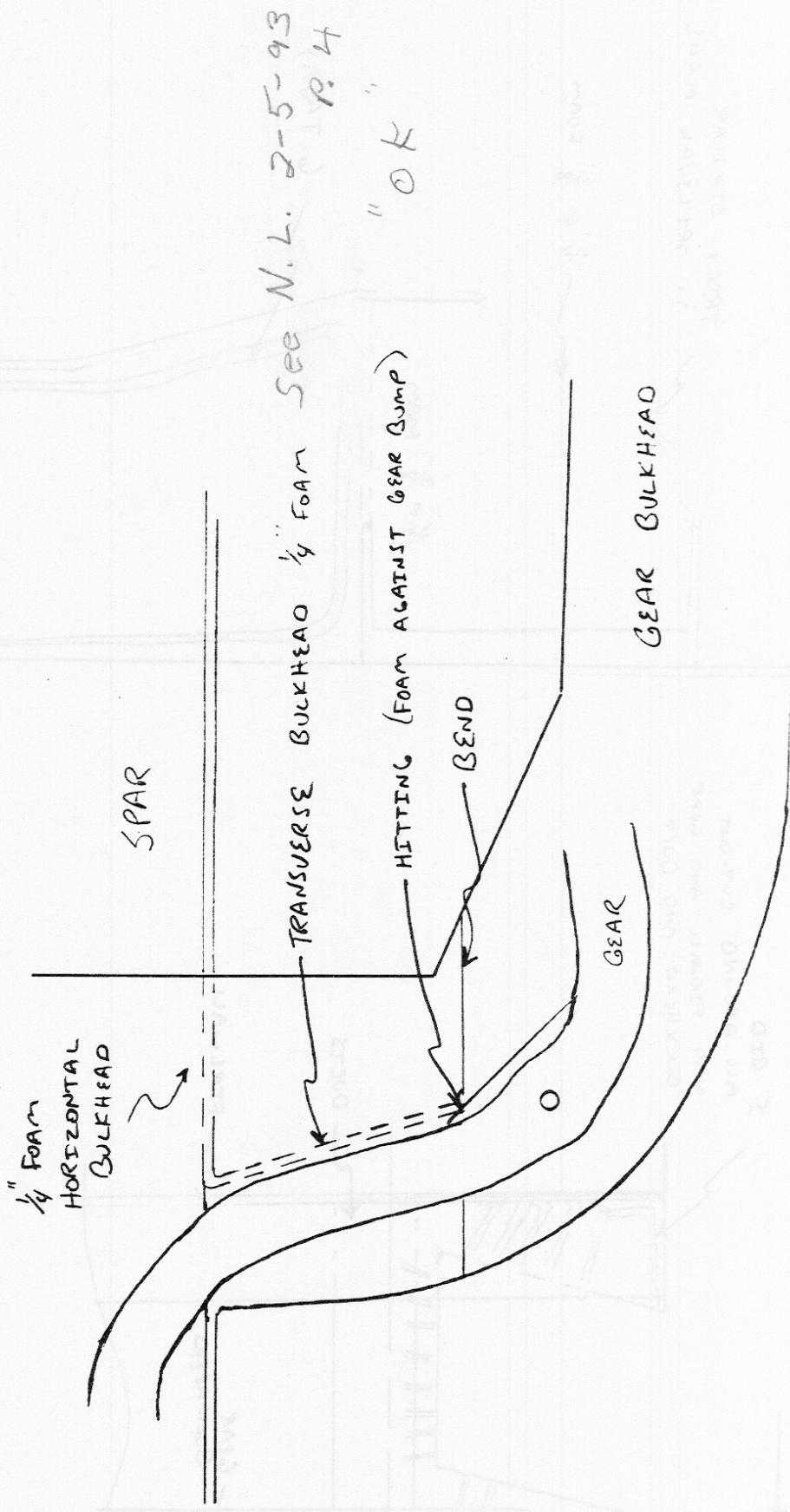
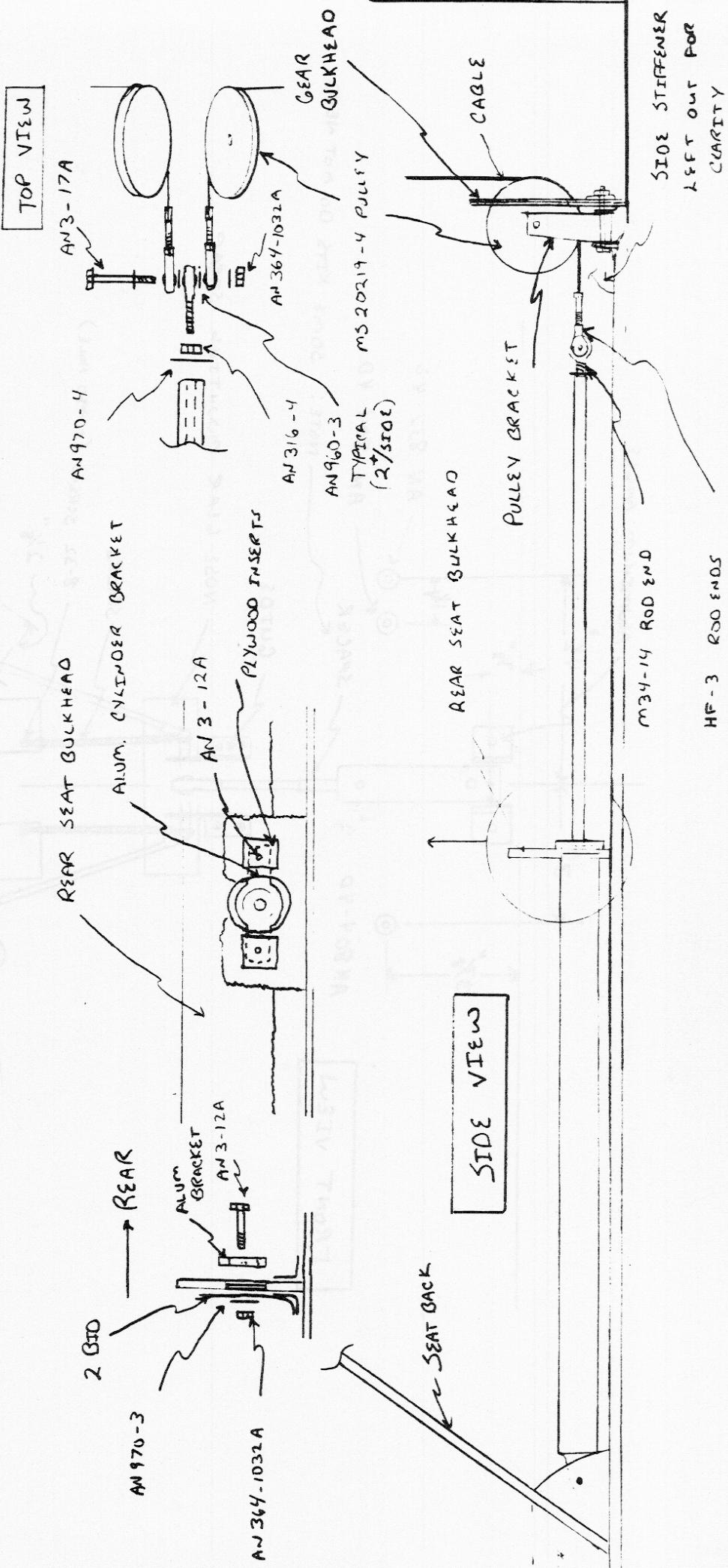
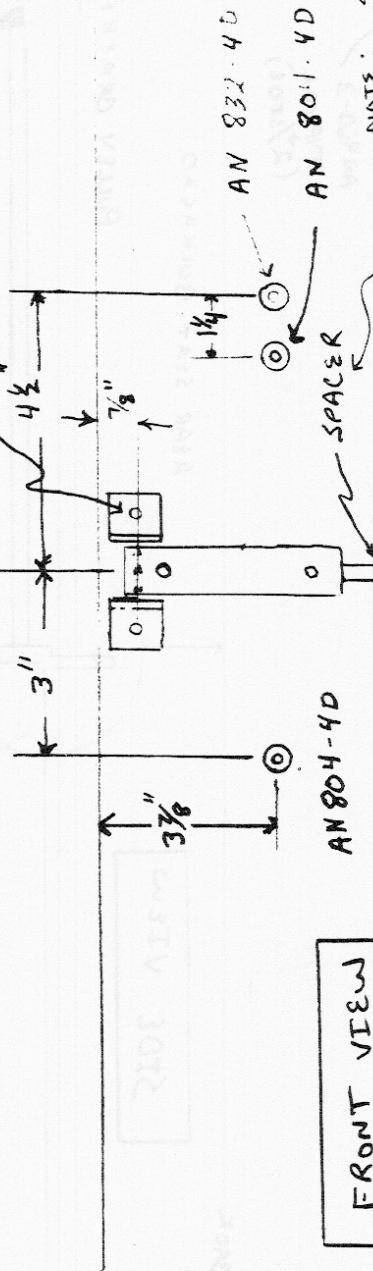


FIG 107



ALUMINUM ANGLE



FRONT VIEW

AN 804-4D

AN 832-4D

AN 801-4D

NOTE: SOME KITS DO NOT NEED  
A SPACER

CURVES

NOSE GEAR MOUNTING STRAP

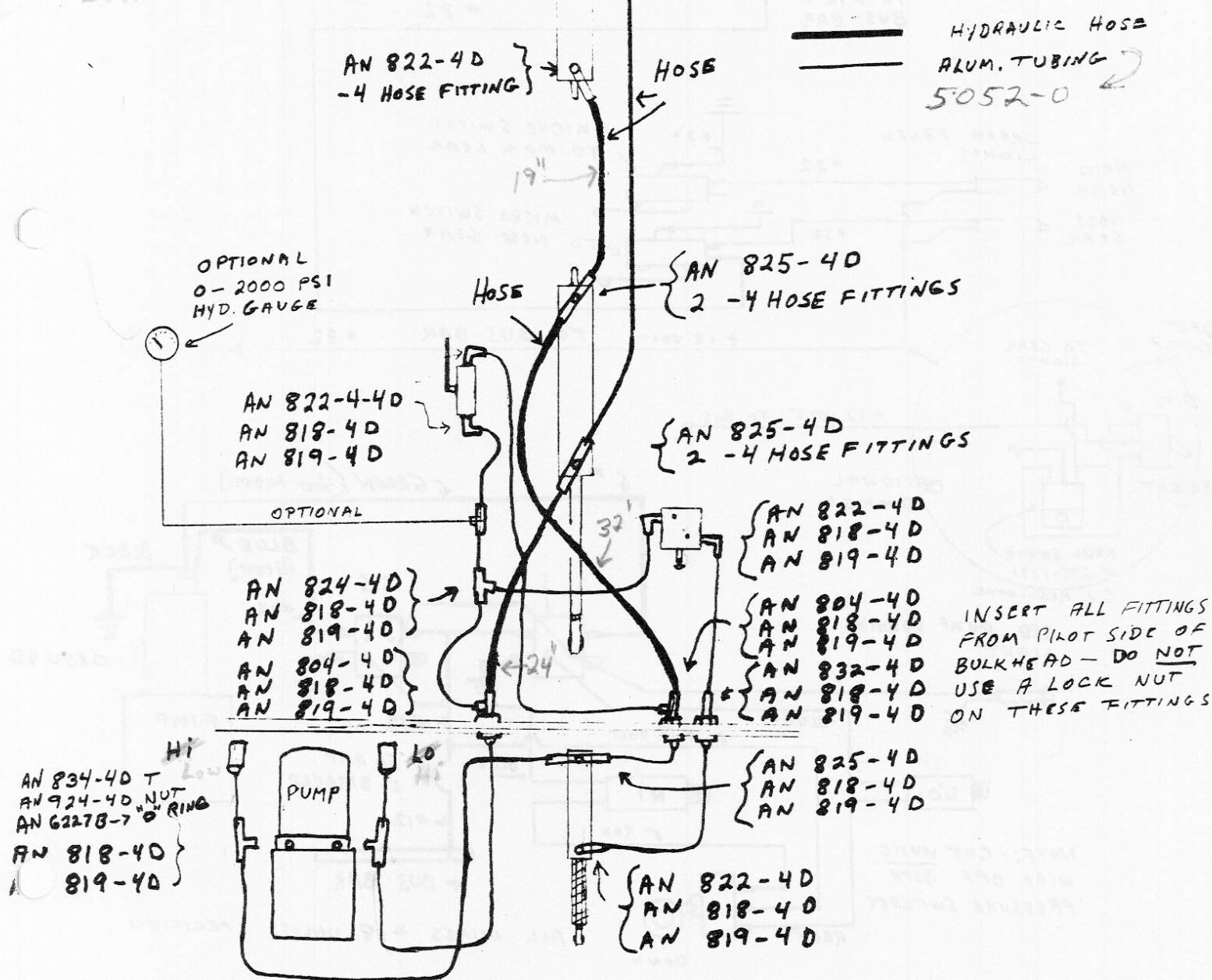
SPRINGS

8-32 SCREWS (TAPPED HOLES)

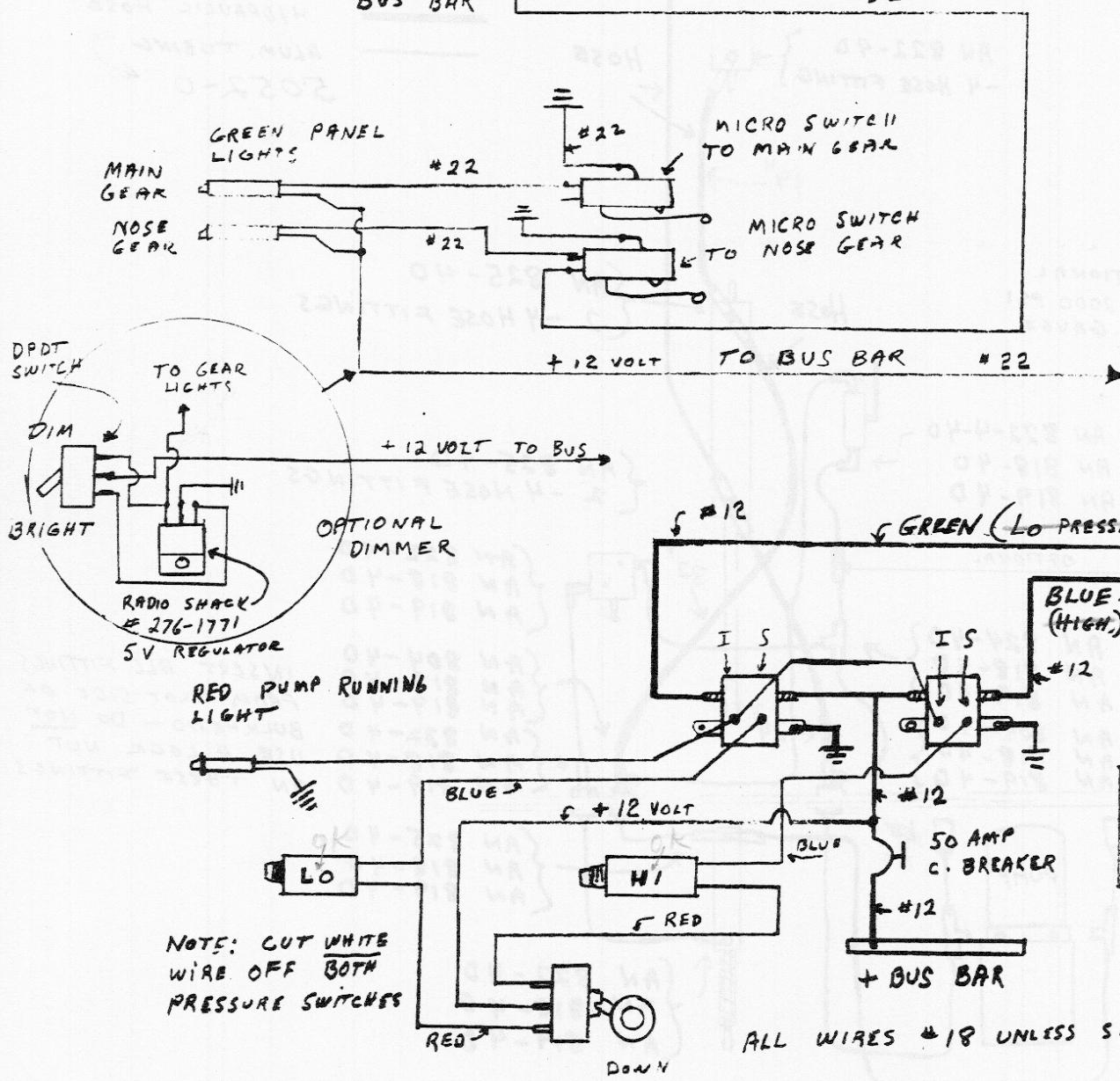
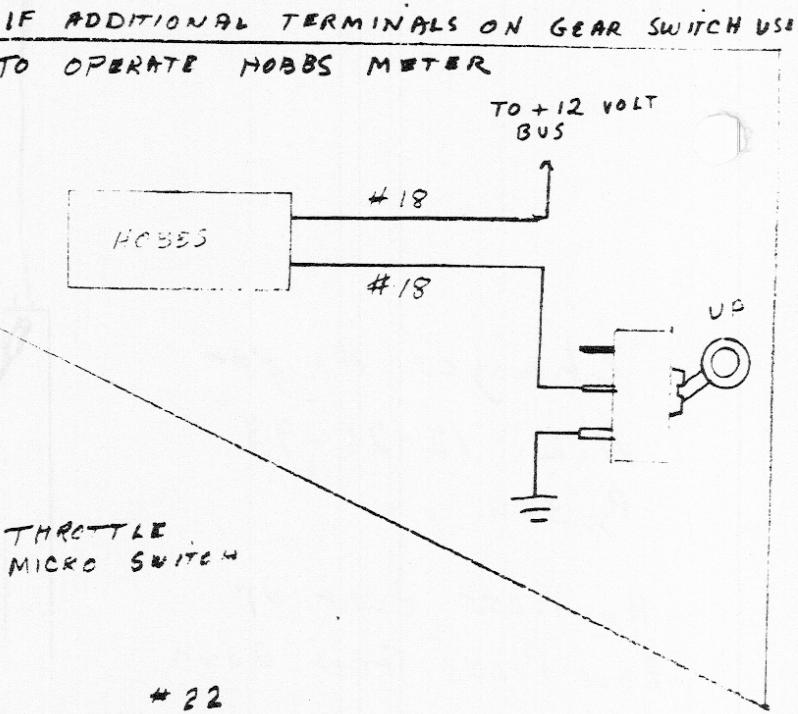
2 1/8"

FIG 108

Pg. 344



Changes As Per  
N.L. 12-26-73  
Pg 34



NOTE: CUT WHITE WIRE OFF BOTH PRESSURE SWITCHES

ALL WIRES #18 UNLESS SPECIFIED

- Notes:
- 1) The landing Gear & Micro switches are drawn with an internal contact diagram to illustrate the normally open & closed contacts.
  - 2) Unless noted, thin lines represent #20 (or #22) gauge wire.

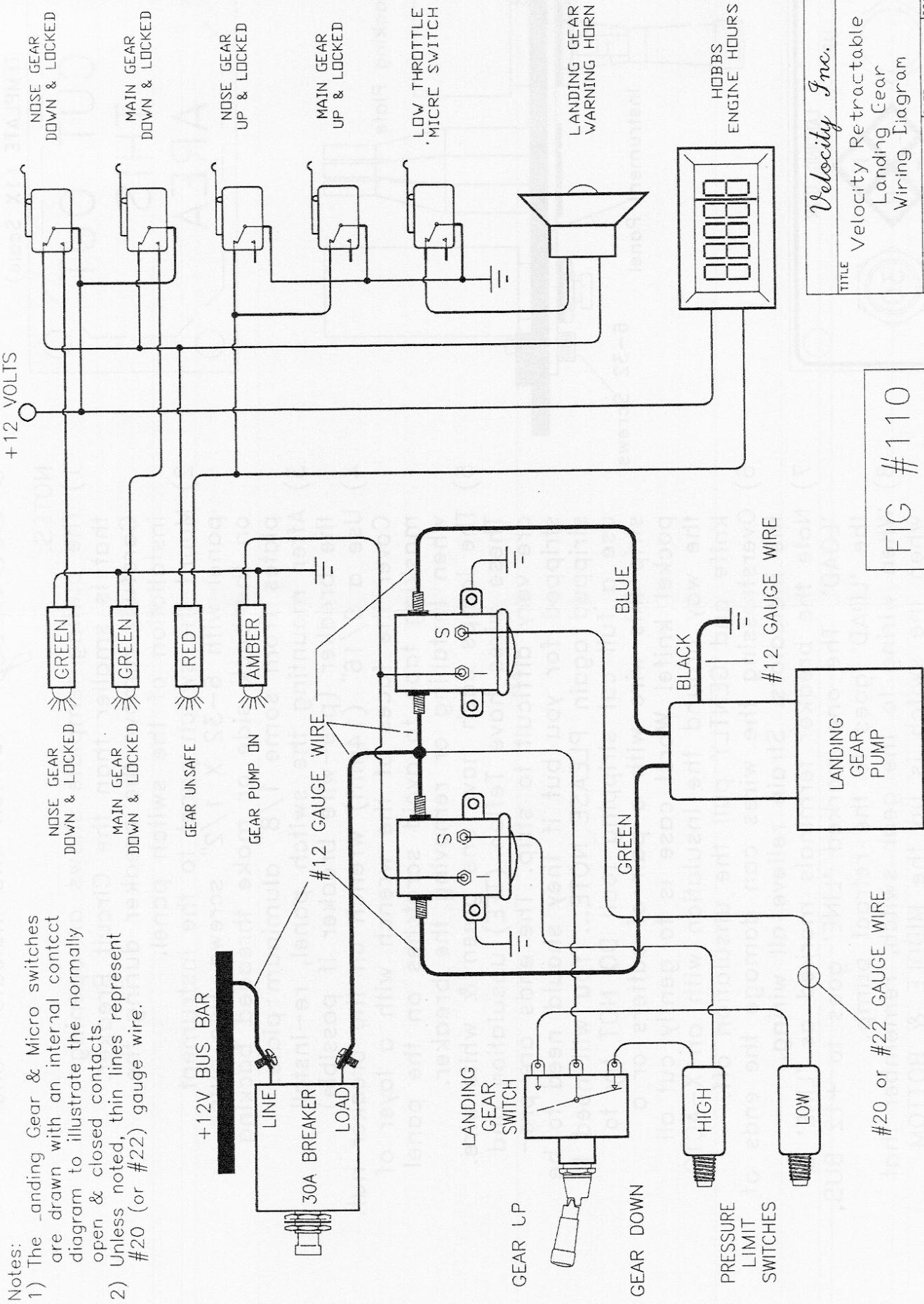


FIG #110

Velocity Inc.  
Landing Gear  
Wiring Diagram

DRAWN BY	Wayne Lanza	DATE	10/15/94
DWG #	V-110	SHEET	1 OF 1
SCALE	N/A	REV	E

**RETRACT SWITCH  
PANEL CUTTING  
TEMPLATE (1X Scale)**

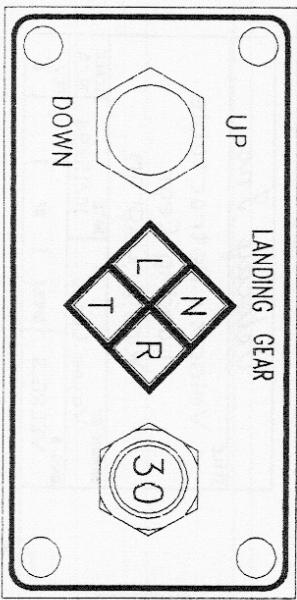


***Velocity***

Retractable Landing Gear  
Switch and Indicator Panel

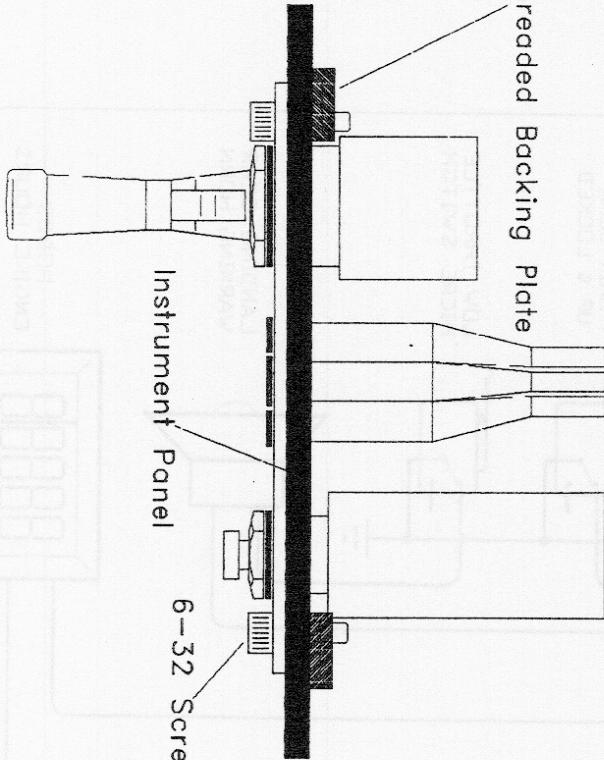
**NOTES:**

- 1) The cutting template shows an opening that is smaller than the Circuit Breaker. Carefully remove the breaker during the installation of the switch panel.
- 2) Mount the switch panel to the instrument panel with 6-32 X 1/2" screws. Use nuts on the back side or make threaded backing plates from some 1/8" aluminum plate.
- 3) After mounting the switch panel, re-install the breaker (pre-wire breaker if possible).
- 4) Use a 9/16" (14mm) wrench on the breaker nut.
- 5) Cover the faces of the wrench with a layer of masking tape to avoid scratches on the panel when installing or removing the breaker.
- 6) The lamps each have one green & white wire. These wires have Teflon (TFE) insulation and are very difficult to strip. The ends are pre-stripped for you but if they should need to be stripped again PLEASE NOTE... You will need to use a full cut stripping tool! DO NOT try to strip this wire with a pair of cutters or a pocket knife! Worst case is to gently cut all the way around the insulation with an X-ACTO knife and GENTLY pull the insulation off.
- 7) Note the breaker terminals marked as 'LINE' & 'LOAD'. The one marked 'LINE' goes to +12 BUS, the 'LOAD' goes to the retract pump.
- 8) When wiring to the gear switch, remember that when the switch is up the MIDDLE & BOTTOM contacts are closed. In the down position, the MIDDLE & TOP are closed.

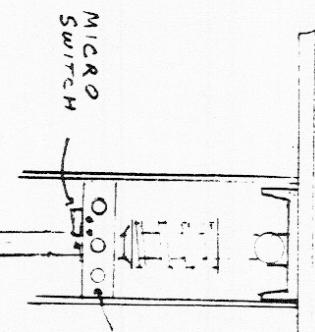


Instrument Panel

6-32 Screws

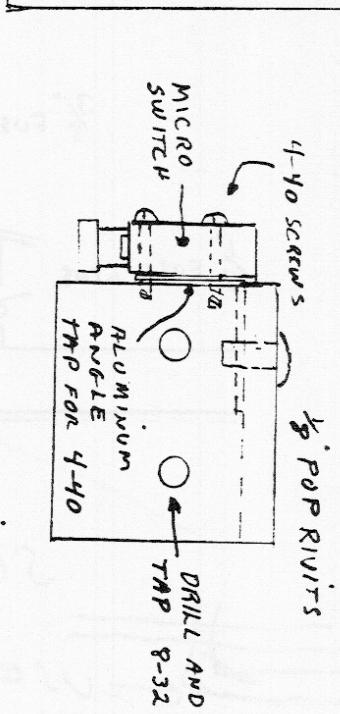


CANARD BULKHEAD



SAFETY STRAP  
PLYWOOD INSERT

MICRO SWITCH  
SAFETY STRAP



ALUM STRAP SUPPLIED BY  
VELOCITY FOR NOSE GEAR  
(TRIM TO FIT)

MICRO SWITCH  
1/8" POP RIVETS  
SAFETY STRAP

4-40 SCREWS

8-32 SCREWS

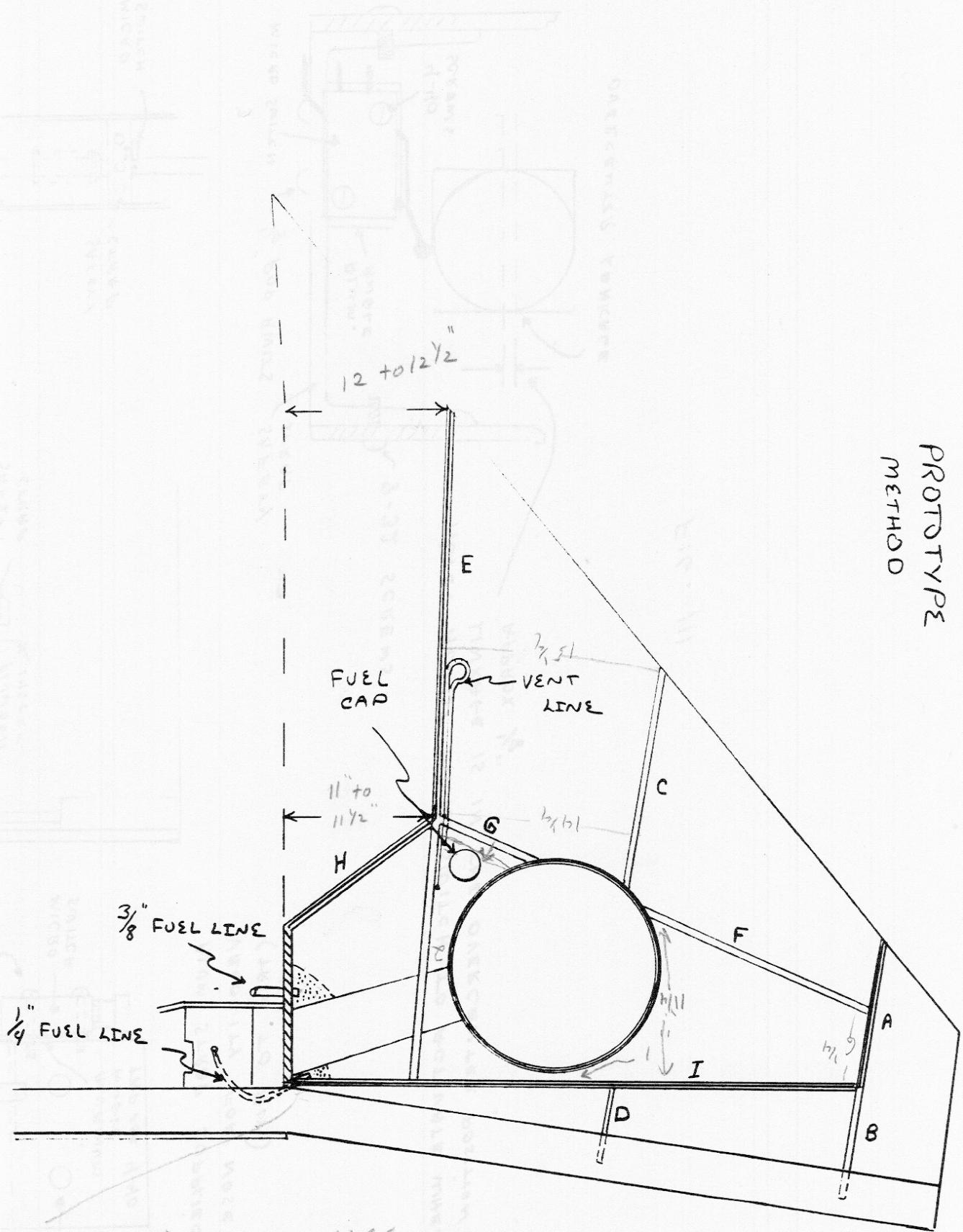
NOTE: ADJUST MICRO SWITCH TO ACTIVATE WHEN  
LINKAGE IS IN THE OVERCENTER POSITION  
APPROX. 1/8"

OVERCENTER LINKAGE

FIG. 111

FIG 112

PROTOTYPE  
METHOD



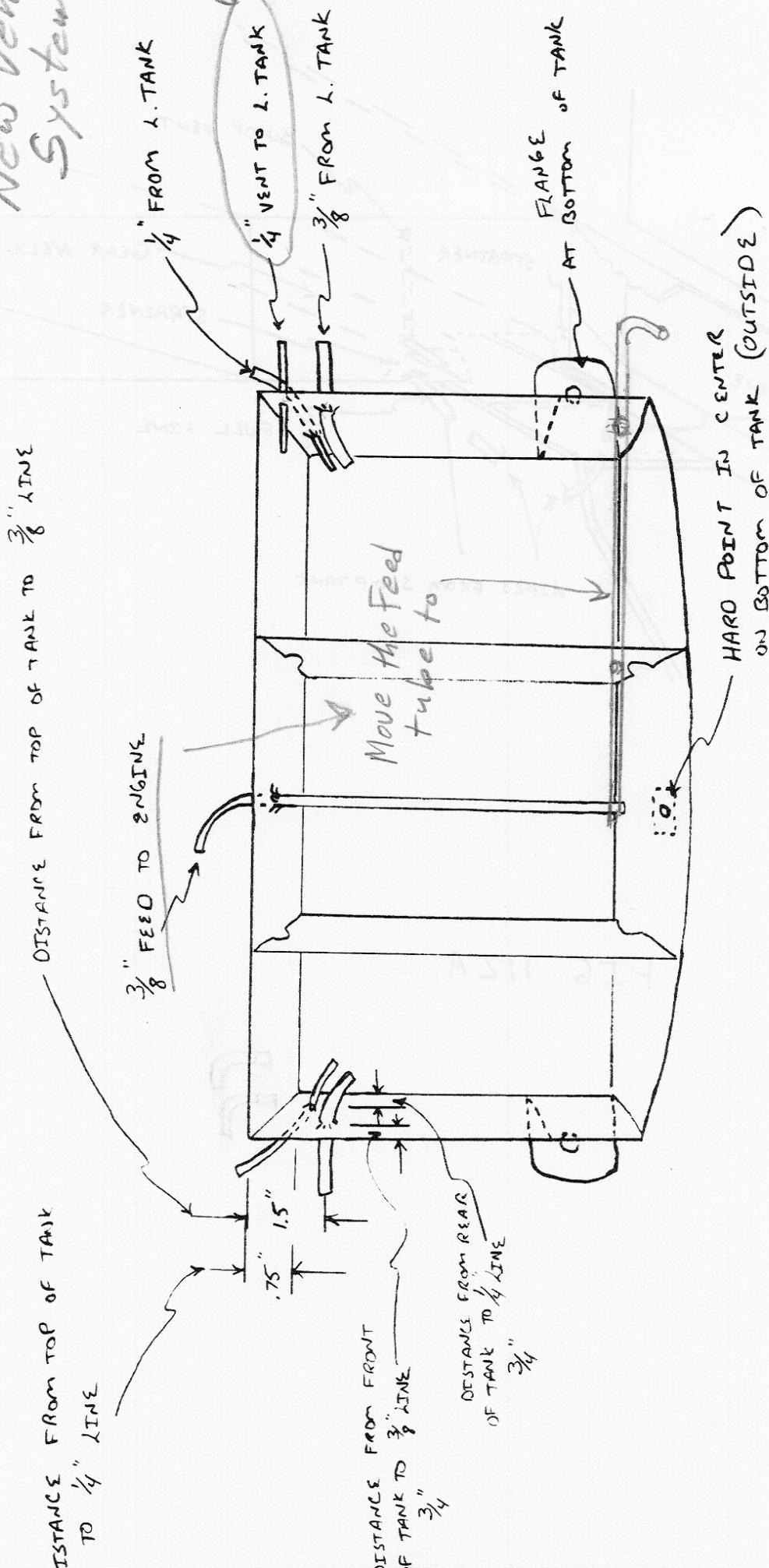
See p. 466 Fuselage Chapter

~~use 90°~~  
& come into tank straight

capacity checked  
6 Gal  
(no air on top)

FORT VINE

## New Vent System



OVER  
FOR 112A

For 112A

An upward-pointing arrow.

Set 55 R<sup>b</sup>  
P. &  
8476

A technical drawing of a trapezoidal section. The top horizontal line has two tick marks, each labeled  $3\frac{1}{4}$ . The bottom horizontal line has one tick mark labeled  $1\frac{5}{8}$ . The left vertical side has a tick mark labeled  $\frac{1}{4}$ . The right vertical side has a tick mark labeled  $9\frac{1}{4}$ . A diagonal line extends from the top-left corner to the bottom-right corner. A horizontal line segment connects the top-left corner to the intersection of the diagonal line and the right vertical side. A vertical line segment connects the top-left corner to the bottom-right corner. A horizontal dimension line with arrows at both ends spans the width of the trapezoid, with a tick mark in the center labeled  $3\frac{1}{4}$ .

FIT 6 113

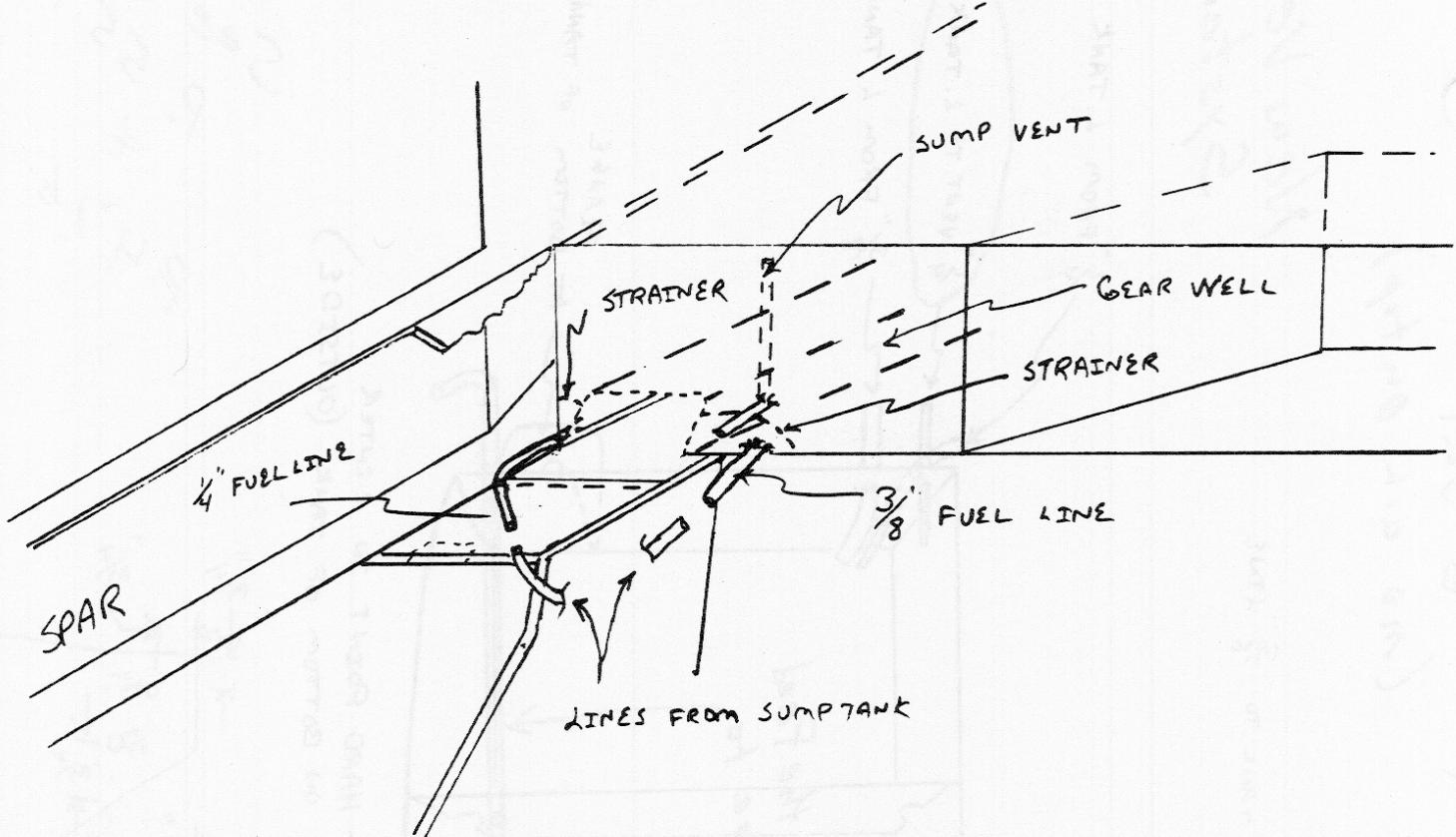
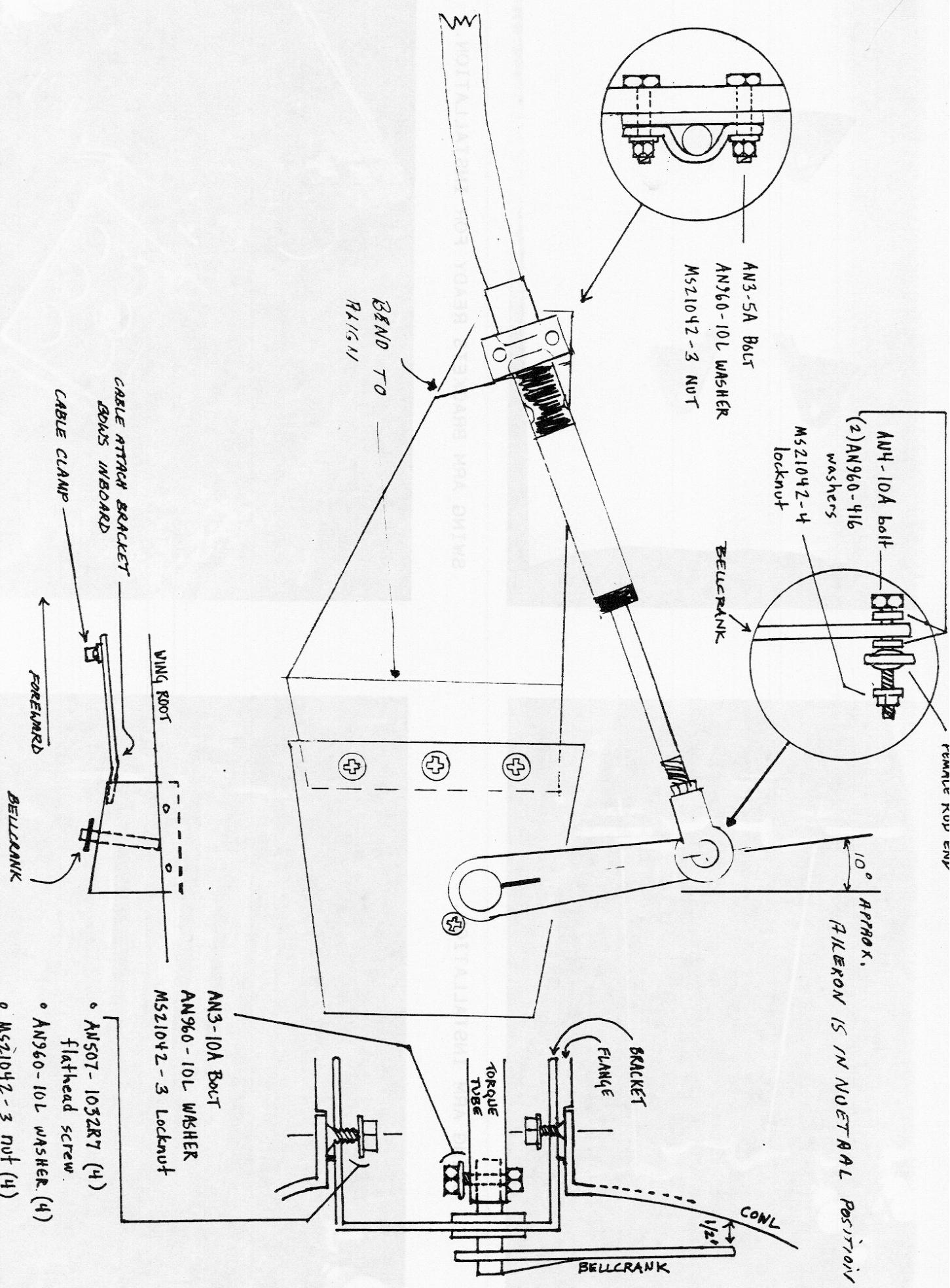
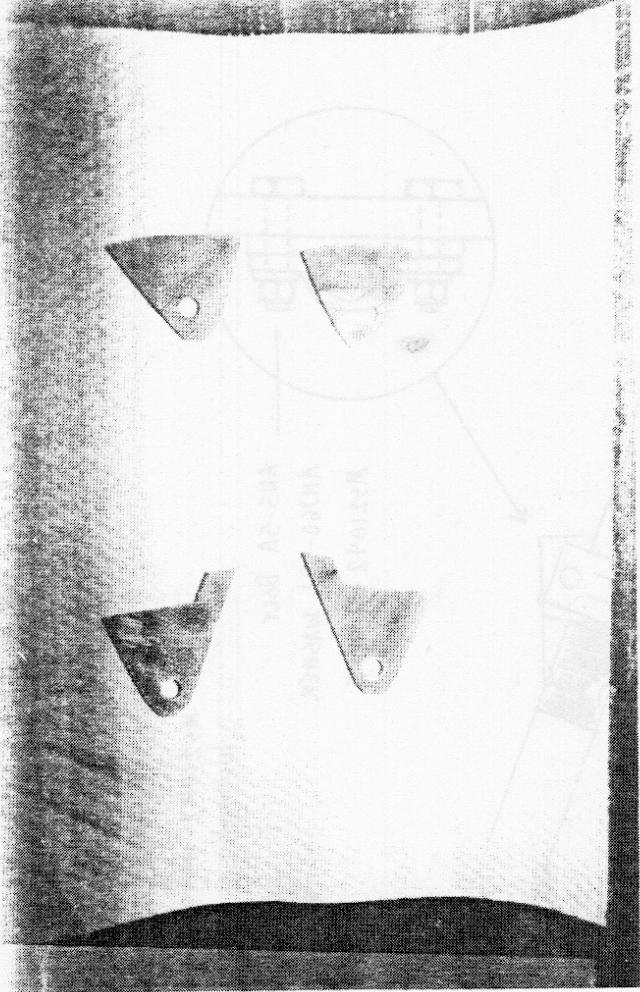
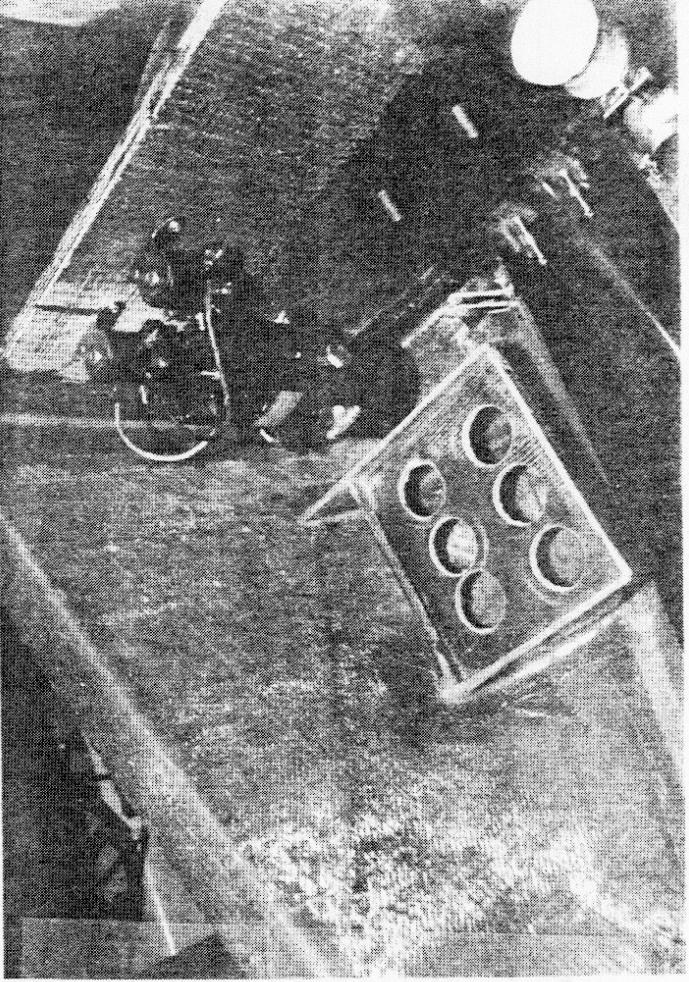


FIG 112A

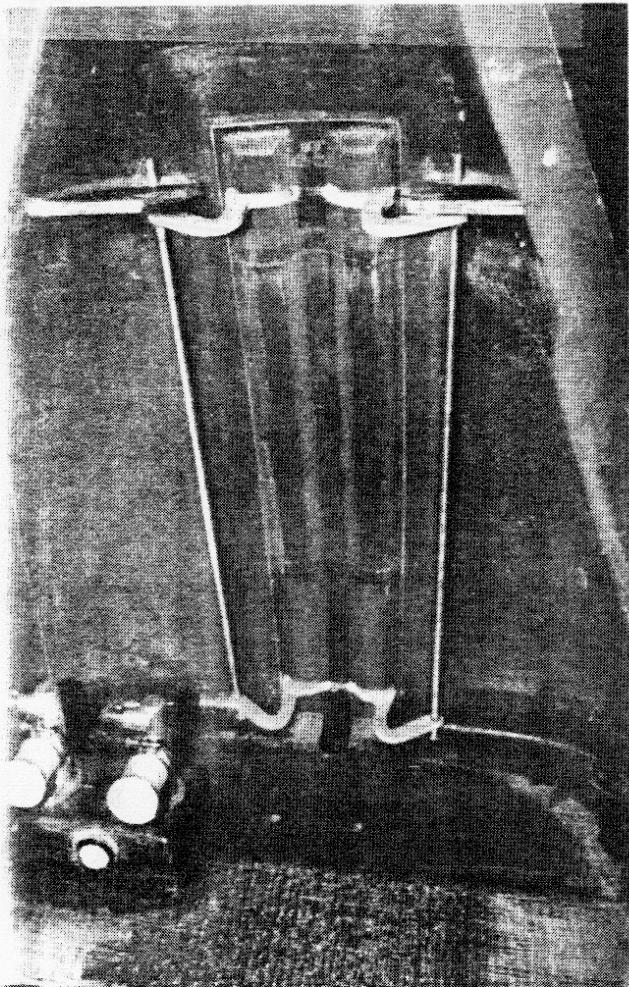




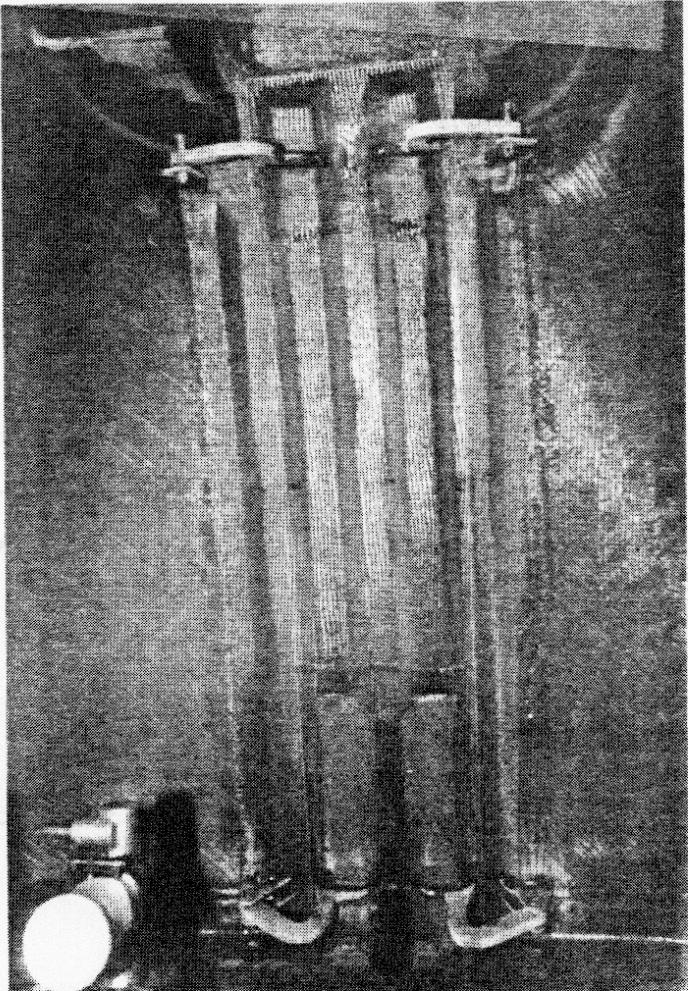
SWING ARM BRACKETS READY FOR INSTALLATION.



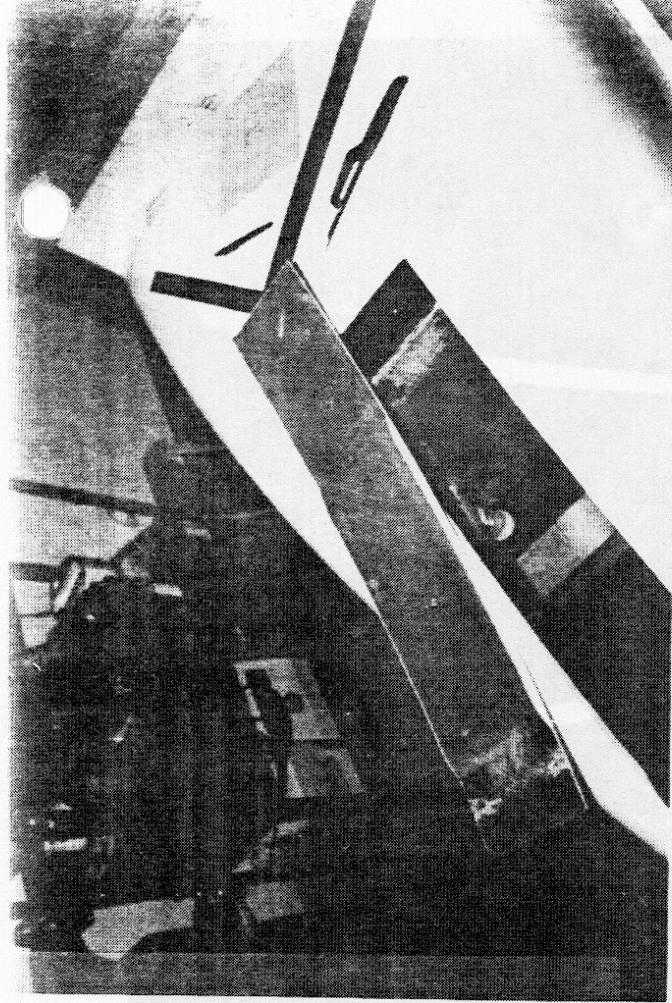
BATTERY HOLDER INSTALLATION, WOOD BOARD AND FOAM SIDES. NOTICE THE LIP AROUND THE TRAY TO HOLD THE BATTERIES.



SWING ARM INSTALLATION.

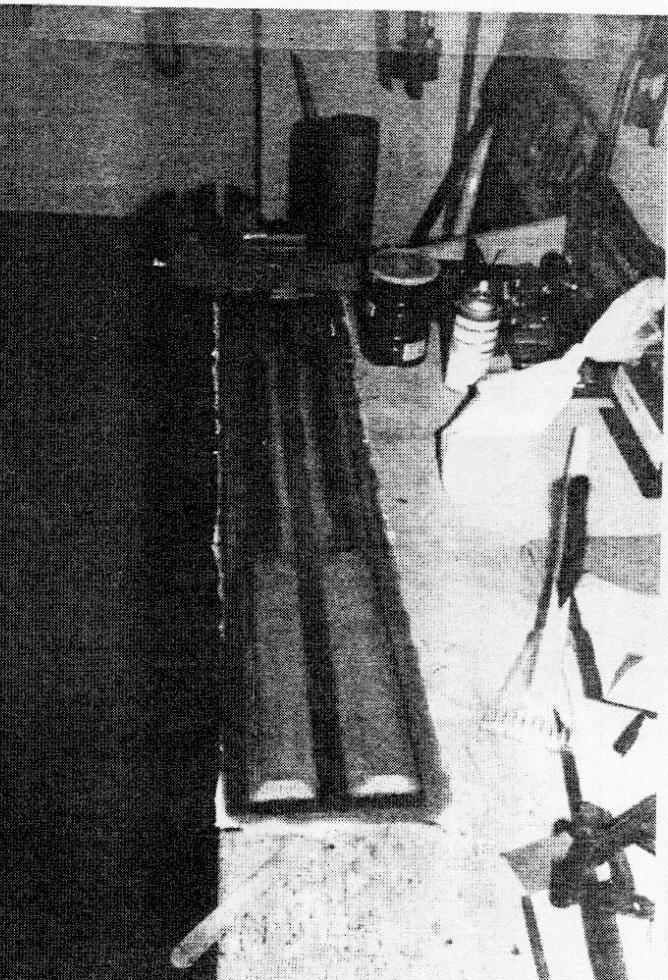


BRACKET INSTALLATION USING THE LEFTOVER RIB KIT AS ONE OF THE BRACKETS

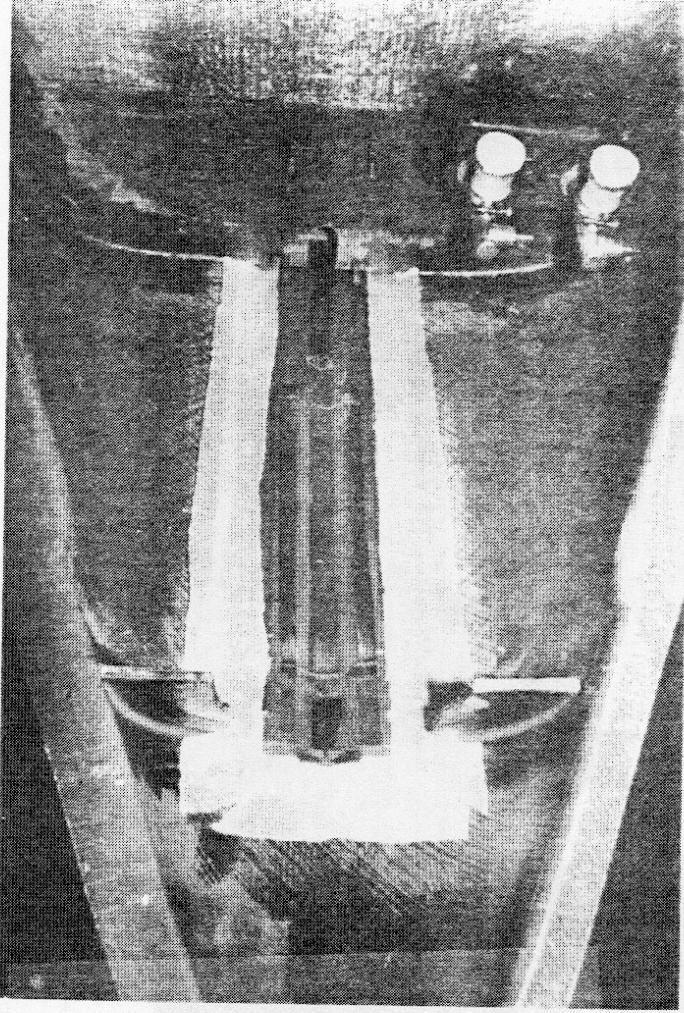


MARKING THE GEAR DOOR CUT-OUT LINES.

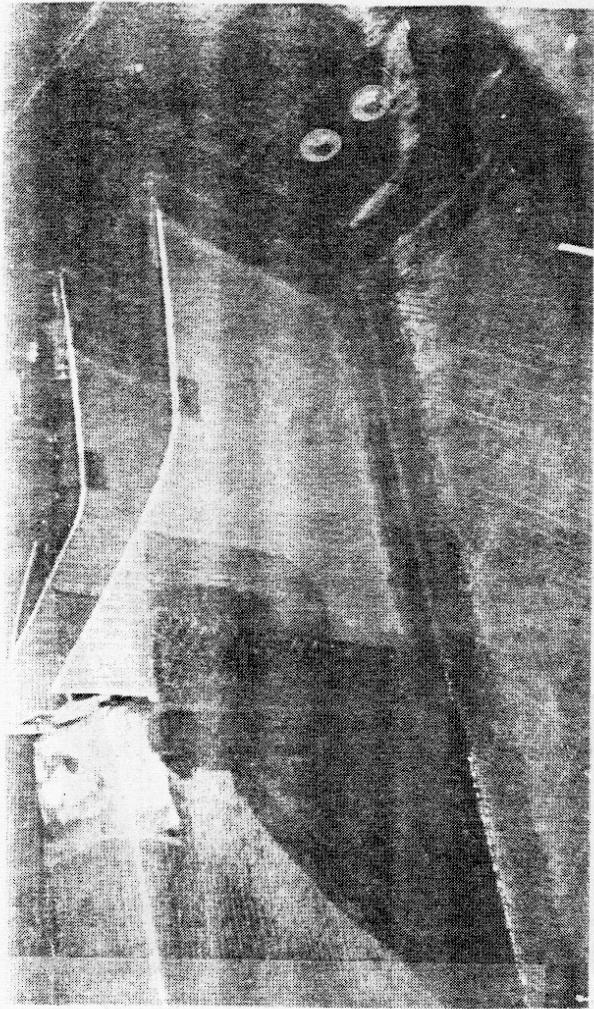
NOSE GEAR DOOR CUT OUT IN ONE PIECE.



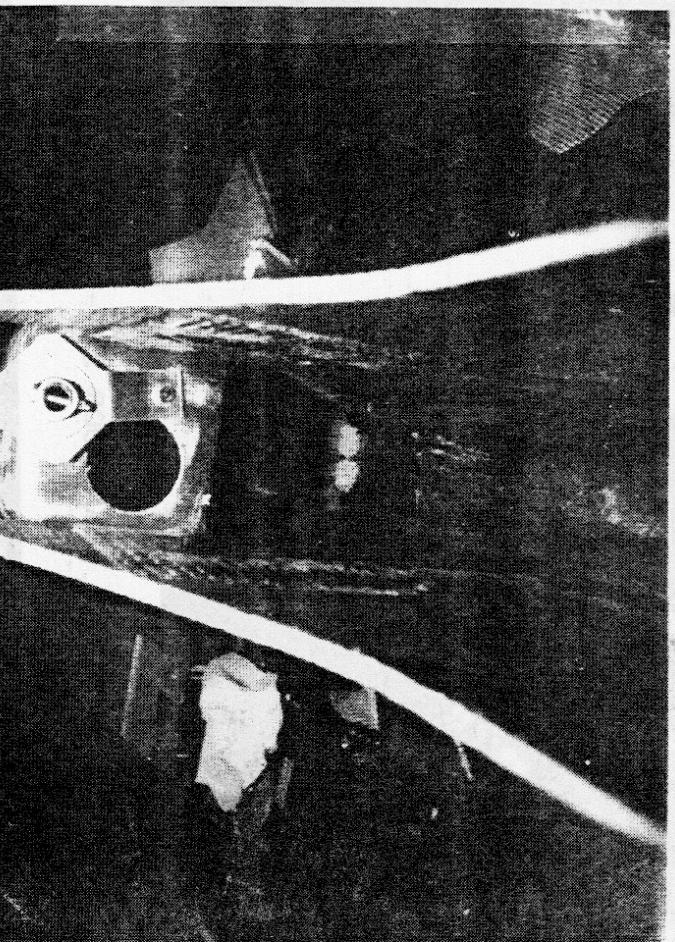
TRIMMED UP, BEVELED AND GLASSED.



MAKING THE LIP AROUND THE GEAR DOOR

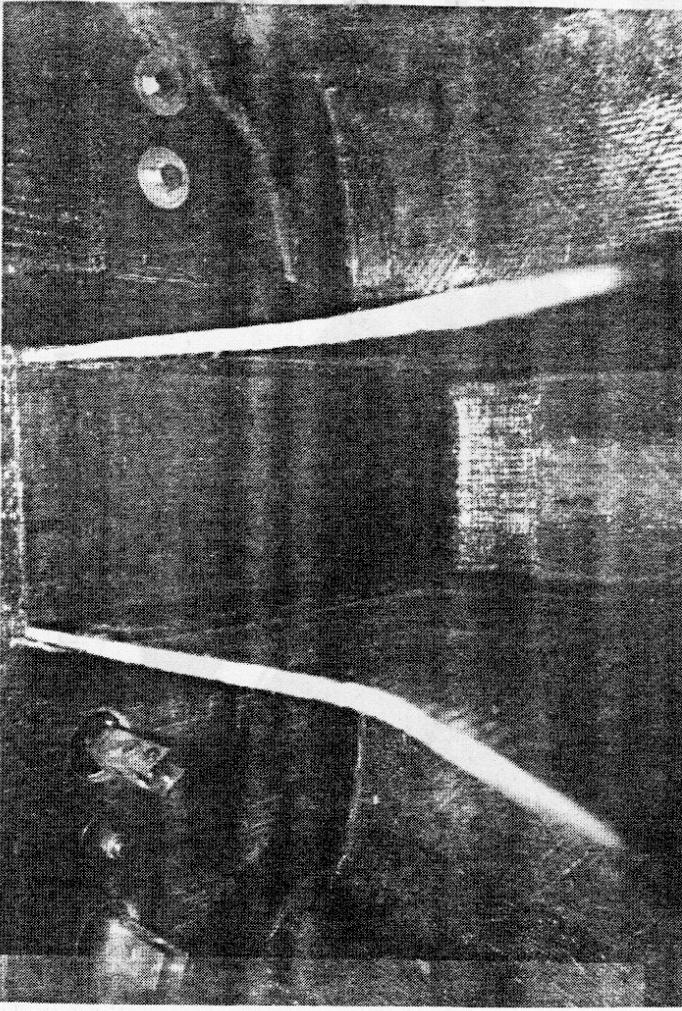


LOOKING THROUGH THE CONSOLE AT THE LAY-  
UPS OVER THE NOSE CYLINDER PAD.

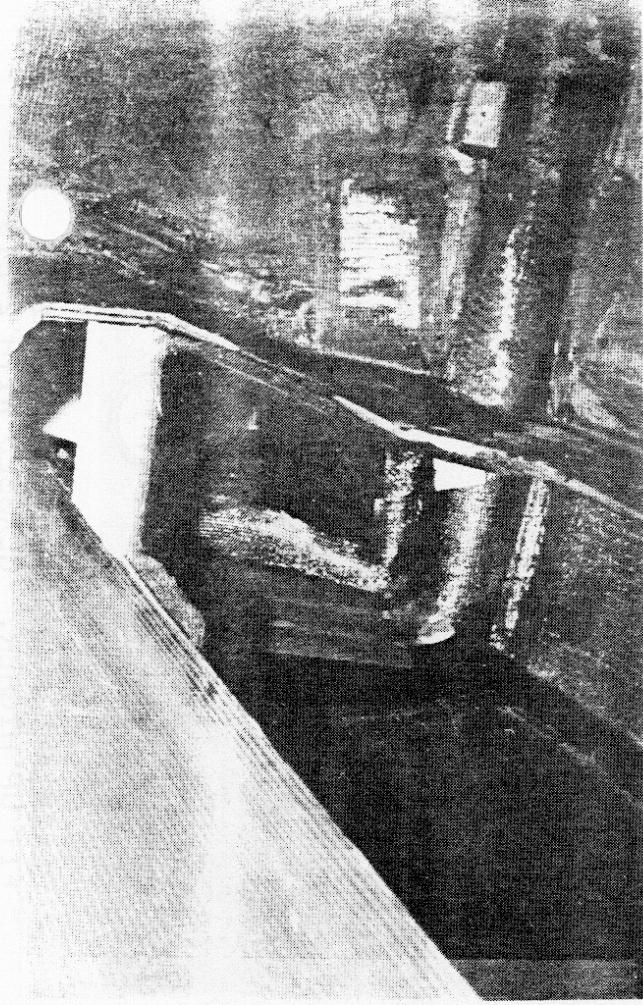


LOOKING REARWARD BETWEEN THE SIDE PANELS  
TOWARD THE NOSE CYLINDER PAD.

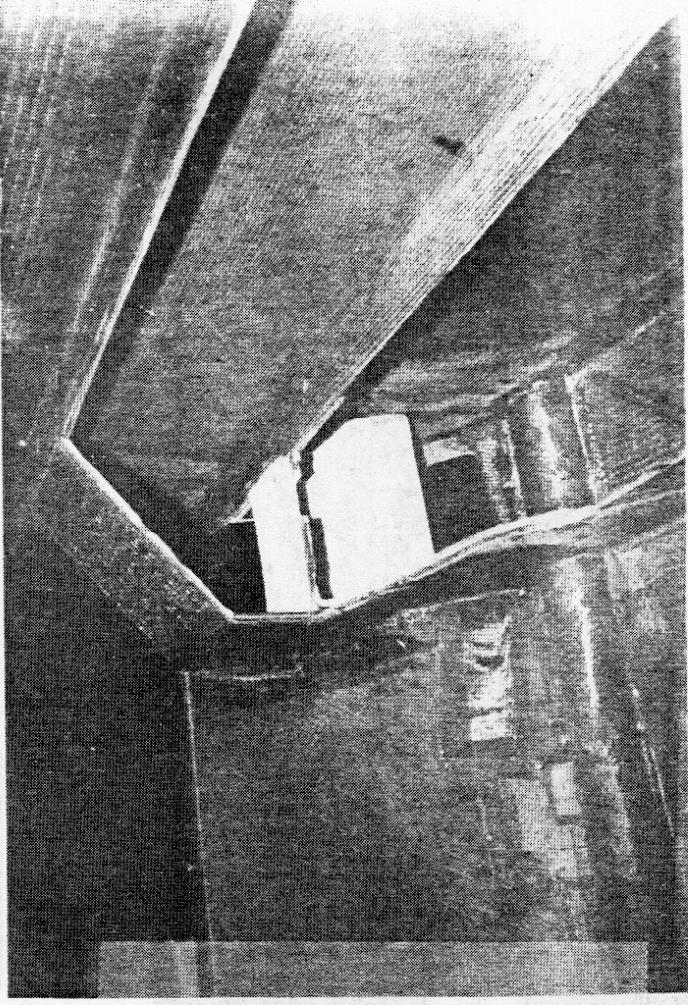
SIDE PANEL INSTALLATION AND GLASSING.



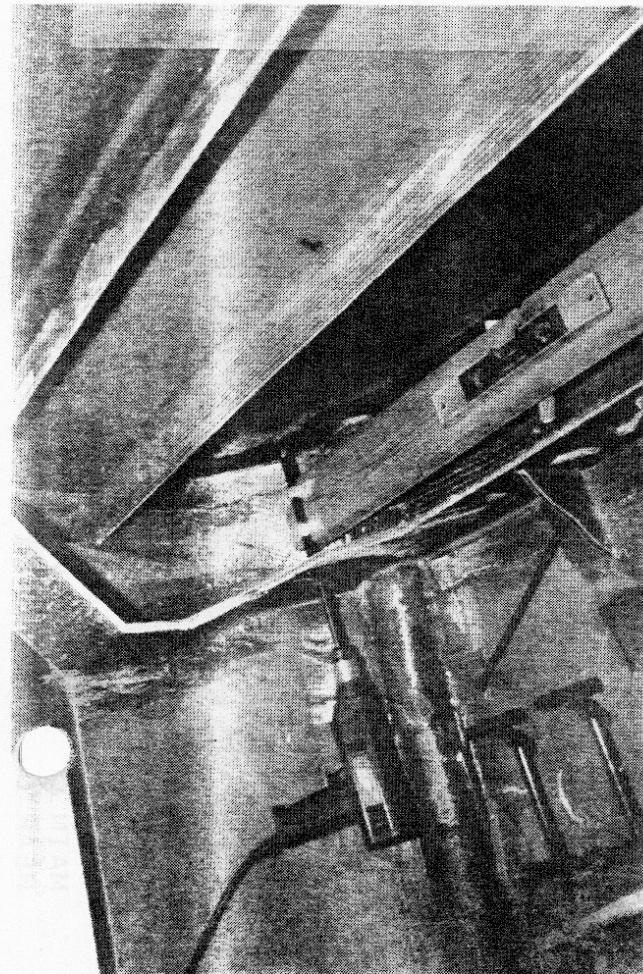
LOOKING FORWARD BETWEEN THE SIDE PANELS  
TOWARD THE CANARD BULKHEAD.



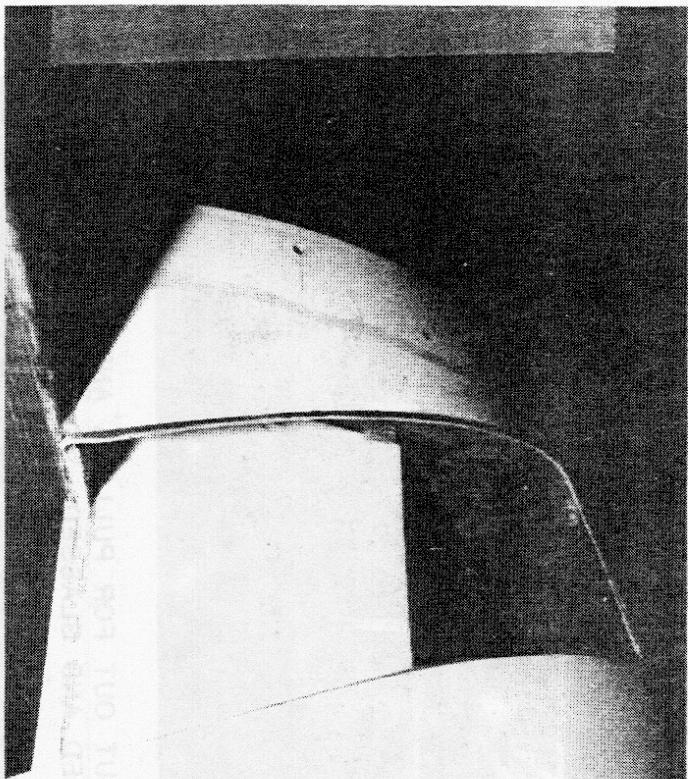
5 BID (COARSE) LAY-UP AND THE 6 TRIAX  
LAY-UP BETWEEN THE FIREWALL AND GEAR  
BULKHEAD.



ANOTHER VIEW OF THE HORIZONTAL AND  
TRANSVERSE BULKHEADS.



DRILLING THE HOLES FOR THE GEAR PIVOT.  
ALSO SHOWS THE GEAR BULKHEAD.



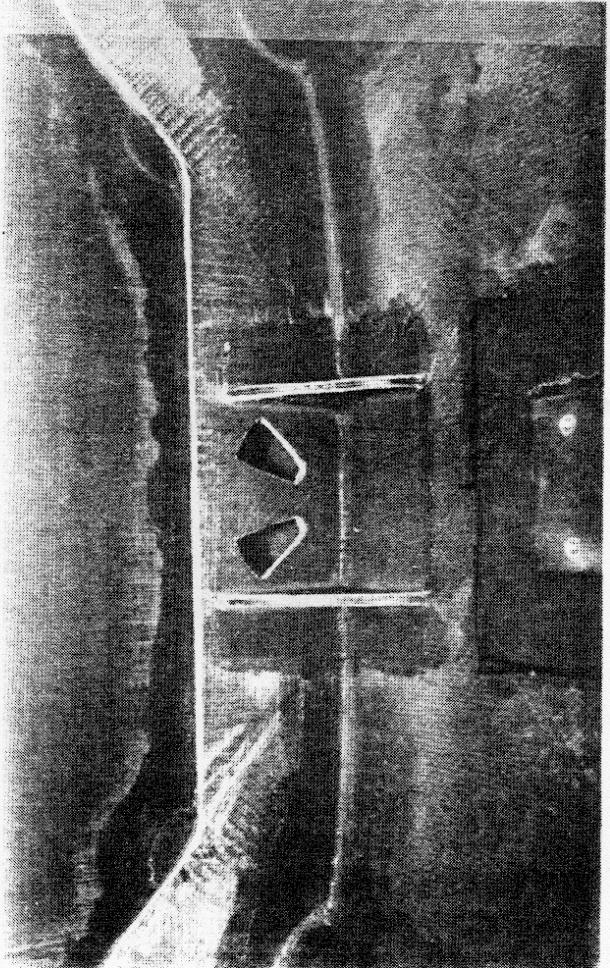
TRANSVERSE BULKHEAD LINED UP AND  
INSTALLED BEFORE GLASSING.



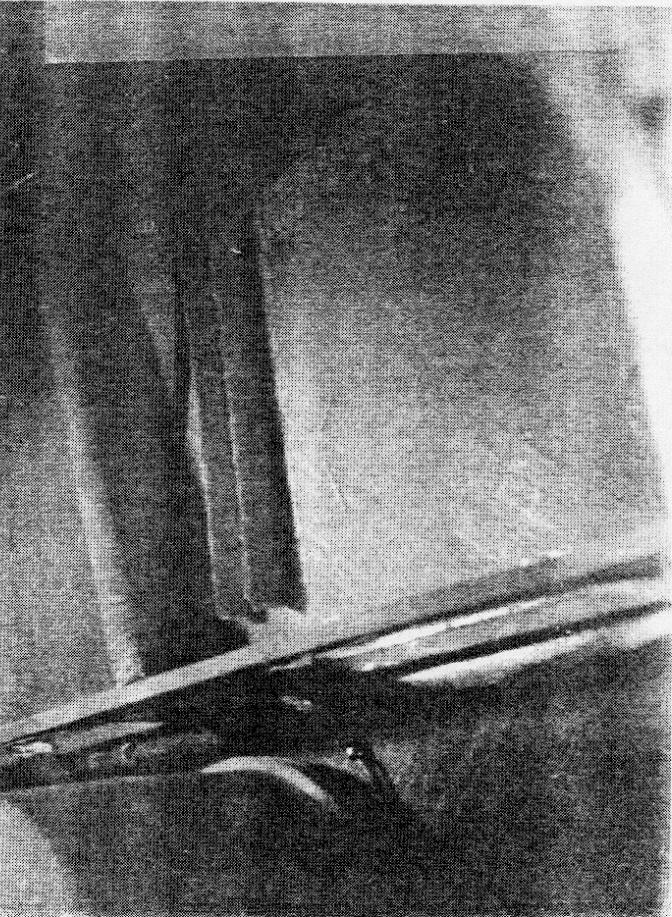
REAR MAIN CYLINDER ATTACH PLYWOOD  
INSTALLED AND GLASSED.



GLASS AND FOAM REMOVED FOR THE TIE TO  
FIT UP HIGHER. GLASSED WITH 2 BID.



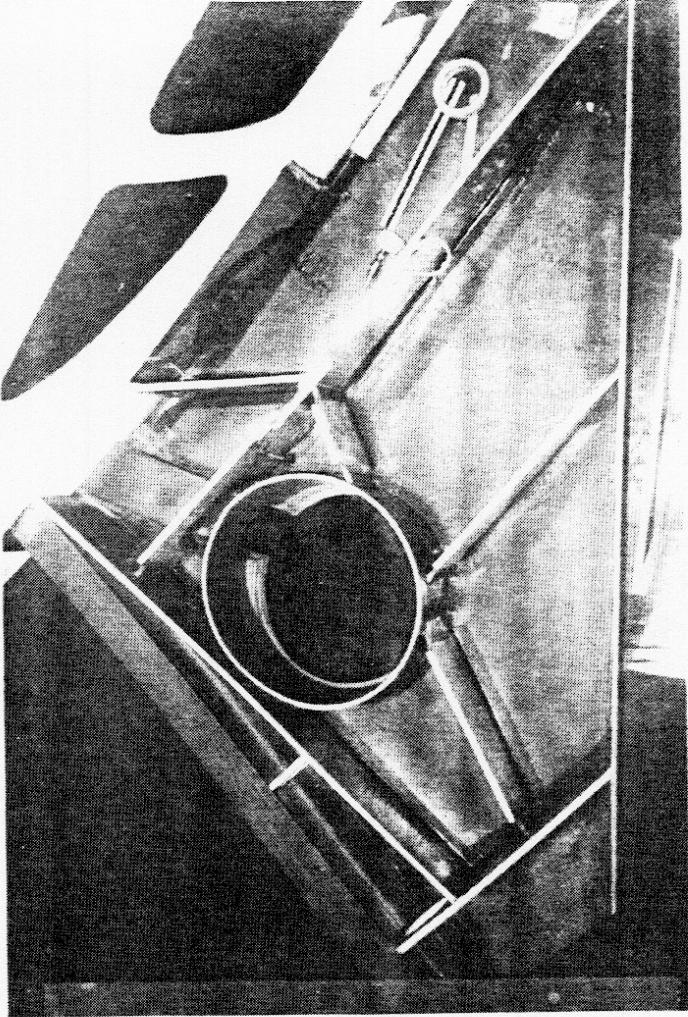
HOLLES CUT OUT FOR PULLEYS AND STIFFENERS  
INSTALLED AND GLASSED.



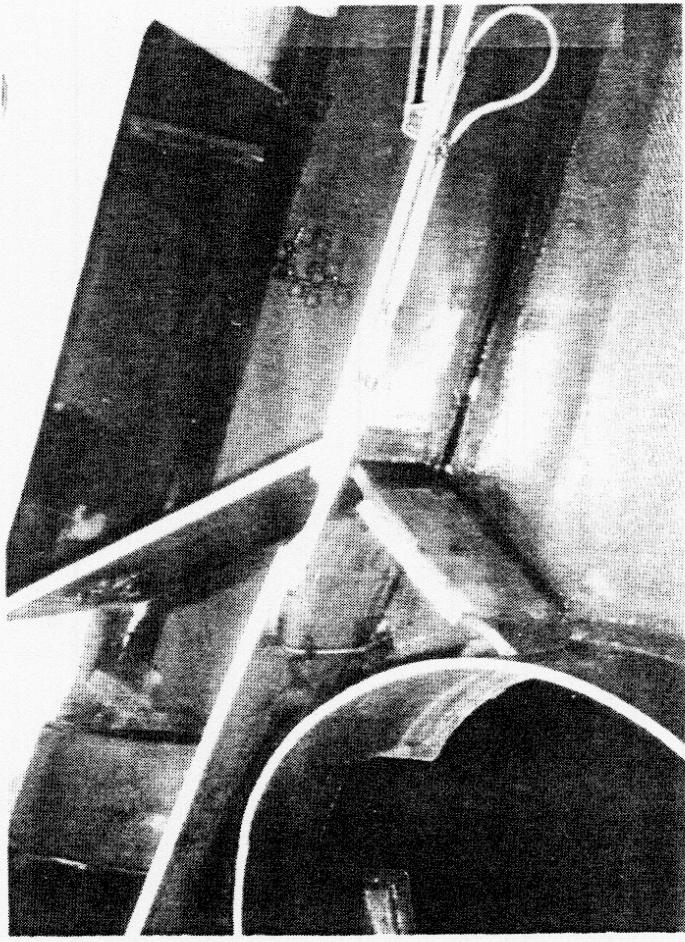
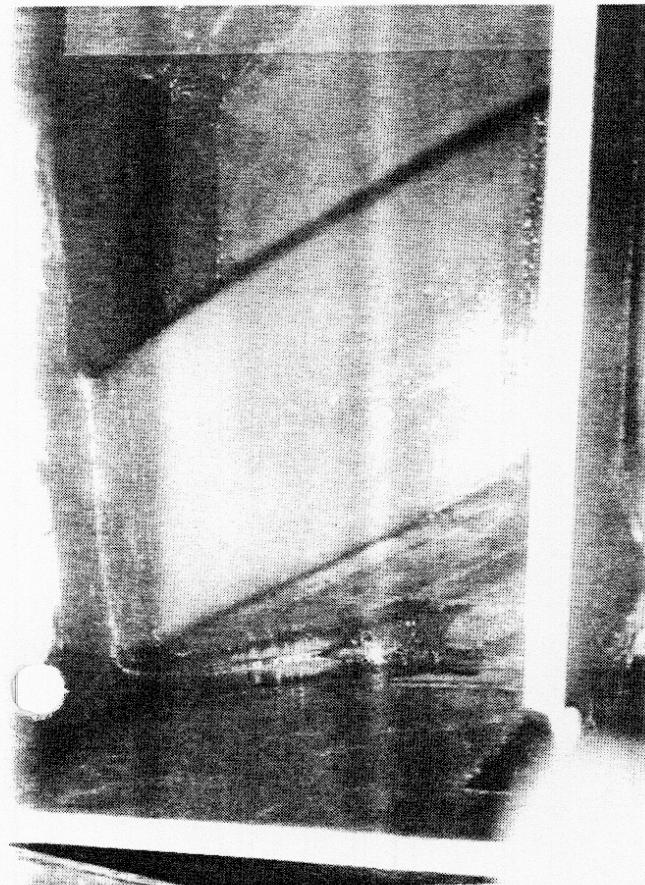
MAIN CYLINDER COVER AND ATTACH LIP.  
REAR SEAT BULKHEAD ALSO SHOWING.



THESE BULKHEADS BEHIND THE REAR LONG BULKHEAD DON'T GO IN UNTIL AFTER THE TOP STRAKE IS ON.

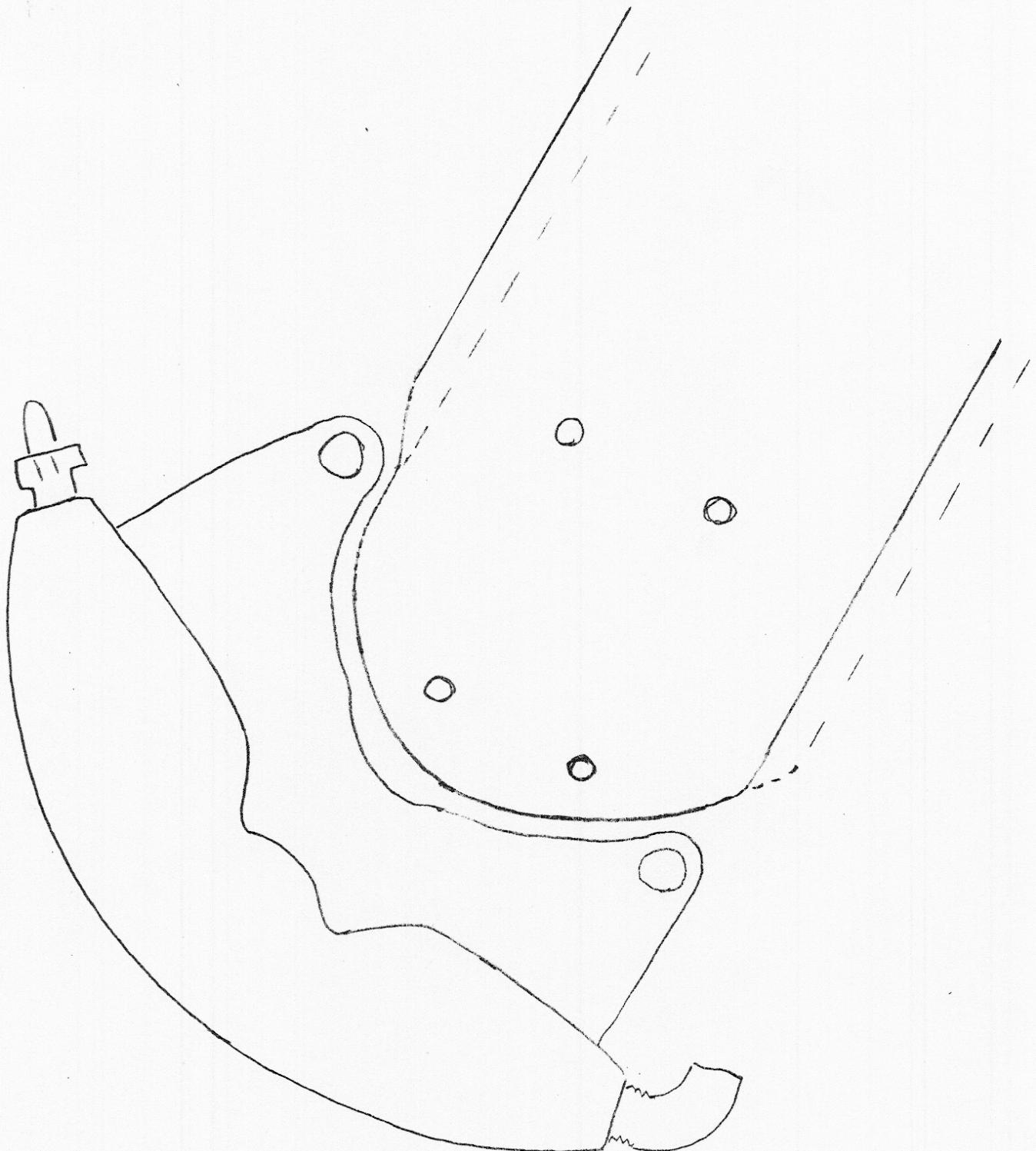


SHOWS THE ALUMINUM SCREEN, VENT LINES, AND BULKHEAD ALIGNMENT



SHOWS WHEEL WELL AND BULKHEAD BAFFLE LAY-OUT. OPTION (1) (PROTOTYPE)





— 173 R6  
--- STO RG -  $\frac{1}{4}$ " FORWARD OF CENTER  
MATEO CALIPER MOUNTING

