



IPMS Jack Lousma-West Michigan

Our next meeting is on **Tuesday, September 21 at 6:30 PM** at the Wyoming Public Library, 3350 Michael SW. Remember to bring a model, your name tag, and an interested friend.

This month is the Aircraft Nose Art Contest. Any scale, any type, it just needs nose art. Keeping in the theme of aircraft this month I have another article from Fatz.

Lockheed CL-1990 by Fatz

In the 1979-1980 time period Lockheed did a conceptual design study to configure an Ultra-STOL (Short Takeoff and Landing) derivative of the S-3A Viking, using a design application of the AIBF (Advanced Internally Blown Flap) propulsive-lift concept. The TDN of CL-1990 was assigned to this effort.

To achieve a minimum cost adaptation of the S-3A to the AIBF concept, the CL-1990 approach was to make maximum use of existing hardware and systems, including use of the same TF34-GE-400 turbofan engines. The engines would continue to provide the cruise and loiter fuel economy required for ASW type missions. However, to obtain Ultra-STOL performance (a reduction of unassisted takeoff distance from about 2400 feet to 400 feet and less), would require twice the power of the two S-3A engines. Thus, the CL-1990 was configured as a four engine aircraft.

Specific S-3A design constraints considered were:

- Retention of S-3A fuselage, landing gear, wing geometric characteristics, spar box structure, wing and vertical-tail folds and low horizontal tail position
- Mounting engines inboard of folding-wing hinge line
- All engine fan flows ducted to AIBF system for takeoff and landing
- No ducting across the fuselage
- No hybridizing of AIBF with other propulsive-lift concepts

Thus, structural changes would be confined to the wing leading and trailing edge flap areas, horizontal tail and nacelles. System changes would be limited to those required to support the added engines and AIBF control mechanism.

Design and performance of the aircraft for conventional flight would follow conventional methodology. During the cruise mode only two of the four engines would normally be operated. The shut-down engines would normally windmill and could be started in the event of failure of an operating engine. As previously noted, all four engines would be operated in the Ultra-STOL mode.

Three views of the CL-1990 and details of the AIBF system are provided. To date the CL-1990 or a "look-alike" isn't in the air, but hope springs eternal.

Modeling a CL-1990 will be an easy conversion, one suitable for a first time effort. Obtain an S-3A kit in the scale of your choice - there are several available. Except for the engine installations you

can just about build the kit right out of the box, or detail it to suit your fancy. You will need some wing rescribing and/or scratch building if you decide to do the flaps in the down position. You will have to scratch build new engine nacelles; perhaps with help from kit nacelles and/or others from your spares box will simplify this job. To finish your model use kit or specialty decals and a color scheme to suit contemporary U.S. Navy duty.

As a reminder here is the schedule of club activities for the remainder of the year.

<u>Month</u>	<u>Activity</u>	<u>Host</u>
September	Aircraft Nose Art Contest	Nathan Noah
October	Weathering Demo	Rob Gifford & Martin Schultz
November	Armor Contest	Bob Taylor
December	Christmas Contest	Roy Moff

Meeting Minutes:

There were 21 people at the August meeting including 2 visitors. Tom Conte reported that Rider's will be stocking the new Floquil paints that have gotten the thumbs up on accuracy. He also brought some new releases from MPM for members to look at. The kits were a P-63A, Me 262 V9/V12, and a Curtis XP-55 Ascender, all in 1:72 scale. Kay Pro will be releasing a kit of the Convair Pogo in 1:72. One of the members reported that the Air Force Museum in Dayton can be a source for research information. He was able to get diagrams of a B-52 cockpit by writing with a request. Mark Nebbeling mentioned that The Discovery Channel is showing Wings of the Luftwaffe on Saturdays.

There were a number of models on display including a German Armor Diorama by Ed Meekhof, a 1:25 Tiger tank by Joe Larsh, a 1:32 Maxwell House NASCAR and 1:200 PBV by Spud Ensing, a '59 Cadillac by new member Craig MacDonald, an in progress 1:72 Northrop XP-79b by Tom Conte, a Revell Neptune undergoing a ski gear conversion by Ed Kleibusch, a CA-311 by Don Pratt, a Heller P-39 and DML He 219 by new member Tex Schuette, a He 219 and He 217 J2 by Mark Nebbeling, a F4-UD by Pete Litwinchuk, a Ford Ranger and Z-28 by Dave Gardner and a WWI French Fighter by Bill Alexander.

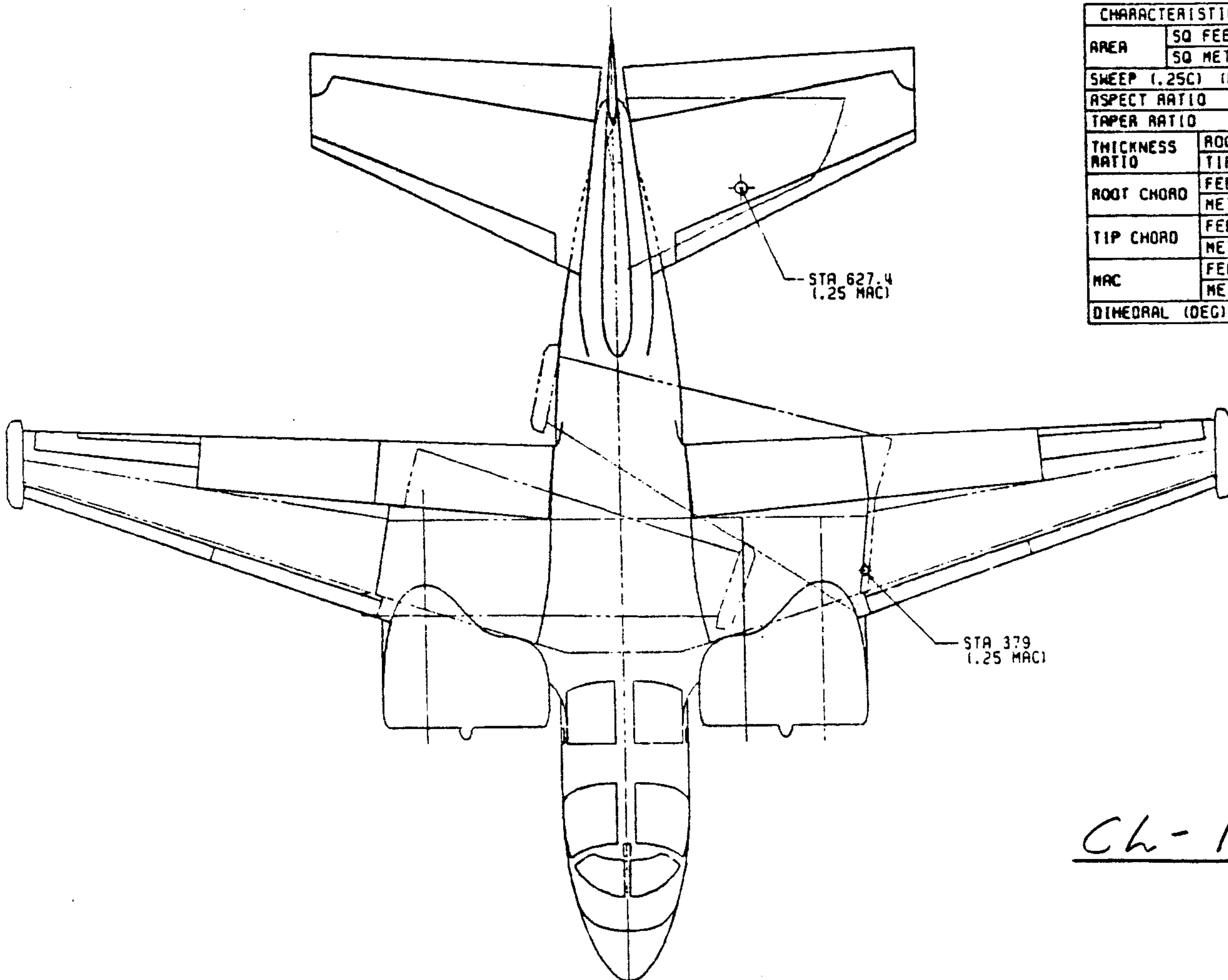
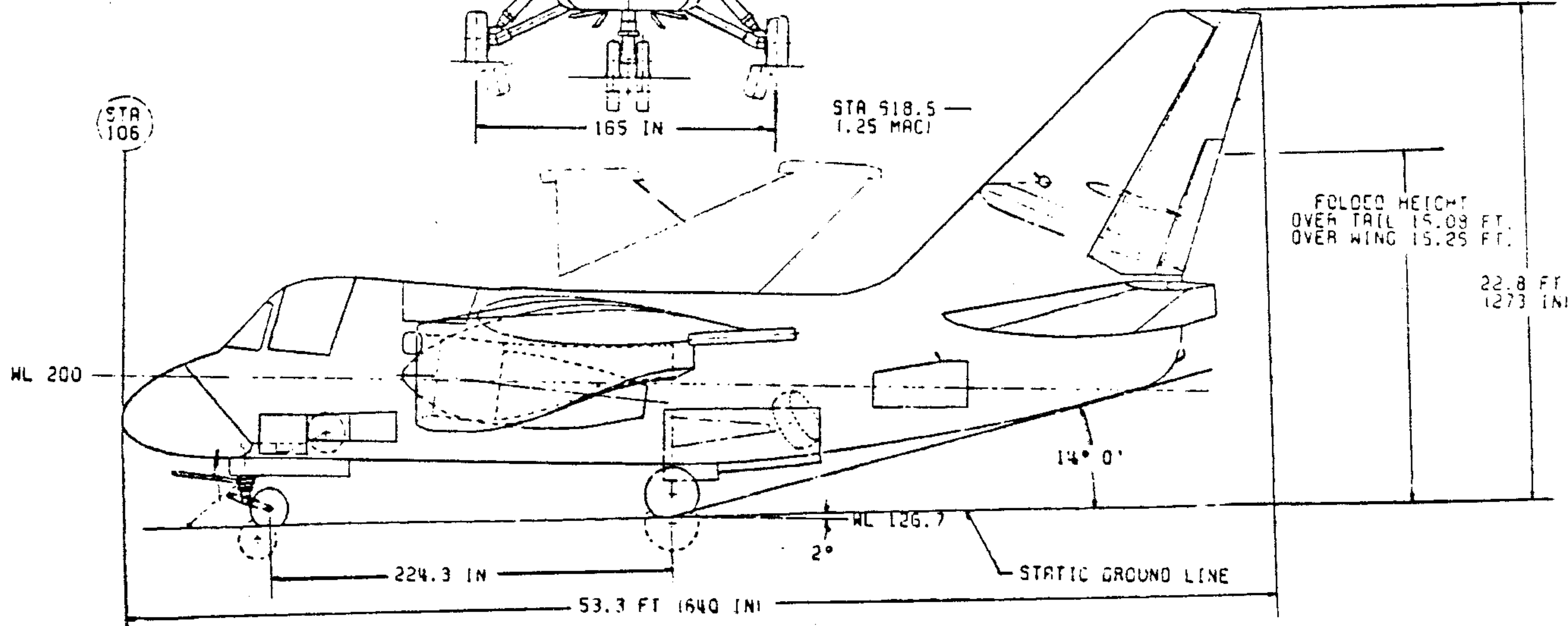
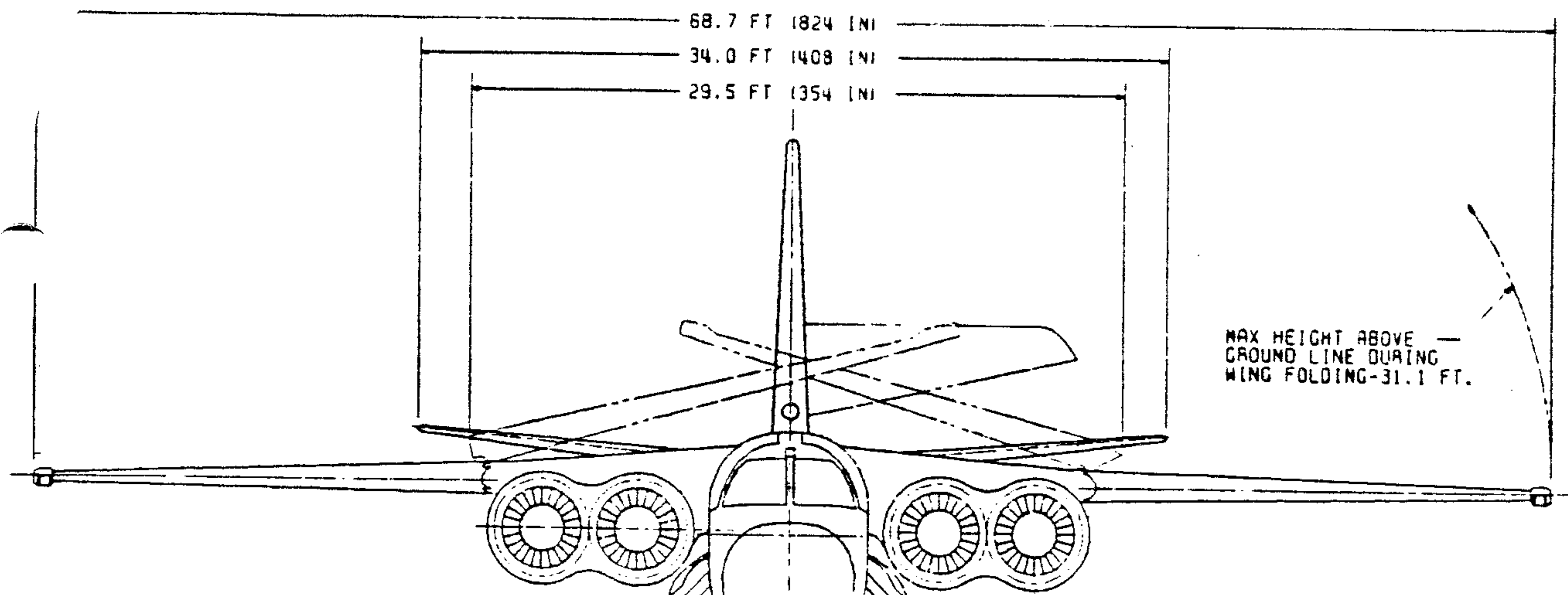
Coming Events:

Rider's Military Contest, Grand Rapids, MI, September 20-29.
 IPMS/Butch O'Hare, Model Expo and Swap Meet, Itasca, IL, Sept. 18
 IPMS/Dayton 1993 Invitational, Dayton, OH, September 24-25
 Automotive Modelers Society Regional Convention and Swap Meet, Wood Dale, IL, September. 25-26
 IPMS Region 5 Contest, Oshkosh, WI, October 8-9
 >NNL 14 Car Contest and Swap Meet, Toledo, OH, October 9-10
 IPMS/John Glenn Invitational, Elyria, OH, November 6
 Toy Show, Kalamazoo, MI, November 27
 IPMS Region 4 Regional, Ft. Wayne, IN, April 22-23, 1994

Spud Ensing provided me with a list of upcoming events at the Gerald Ford Museum. I will list them here under the title:

Gerald Ford Museum Activities:

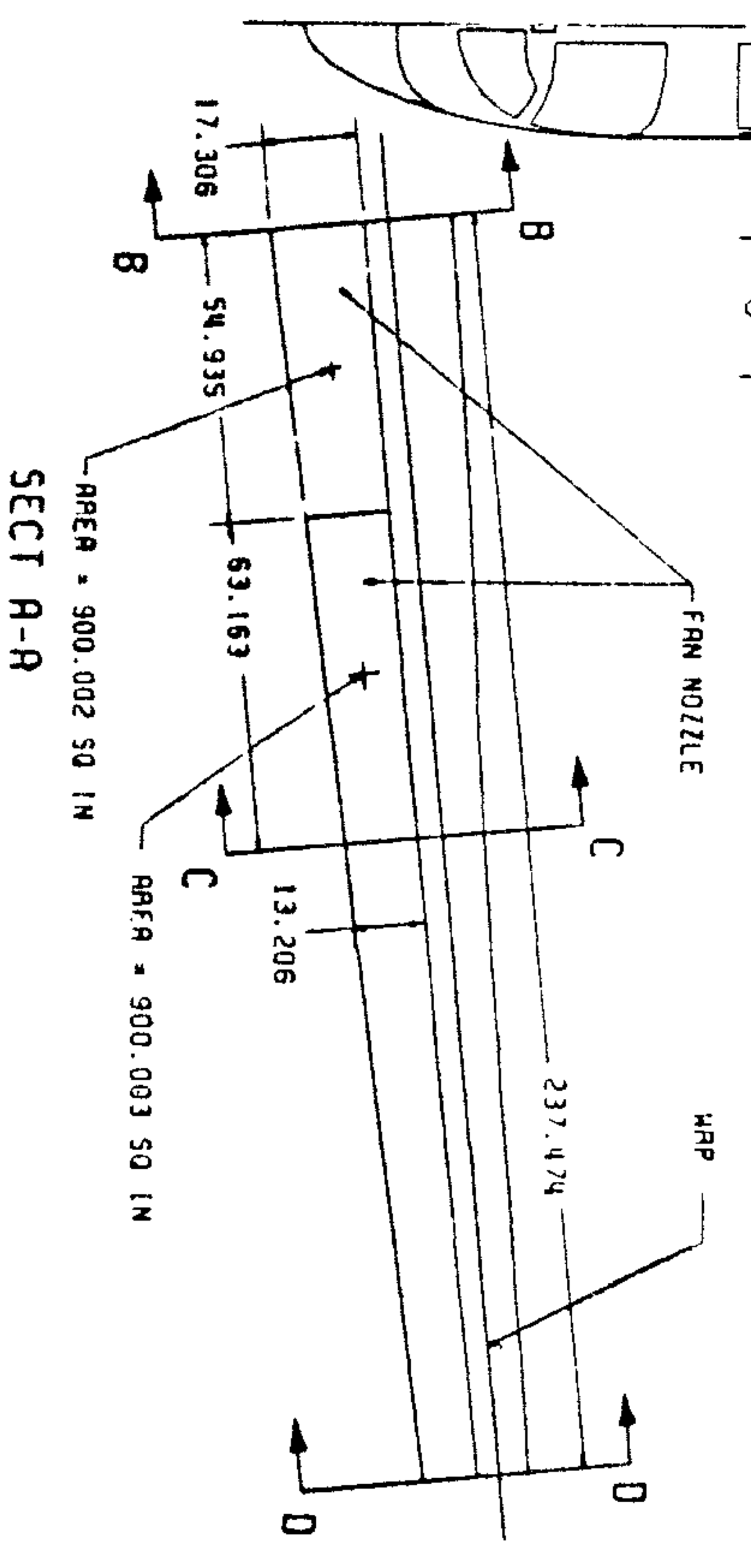
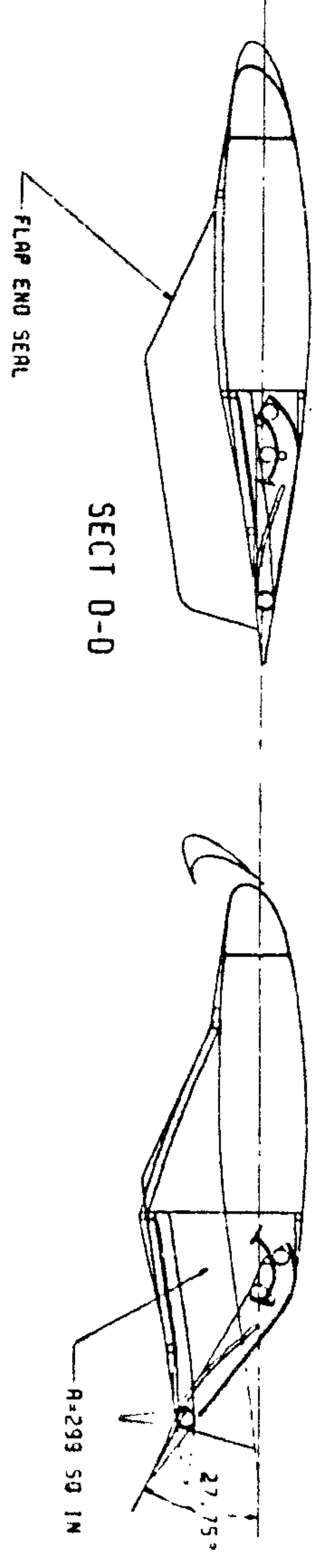
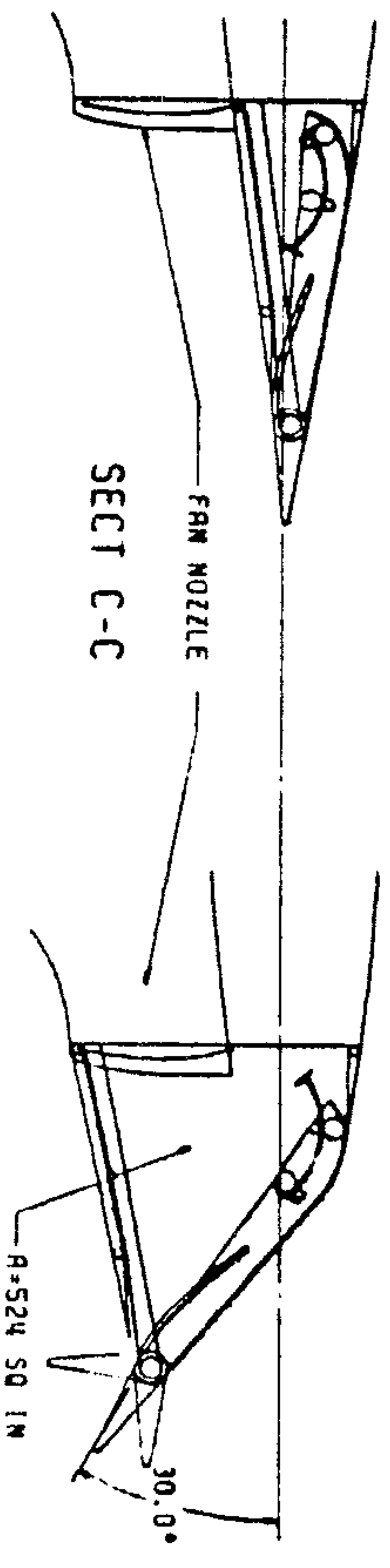
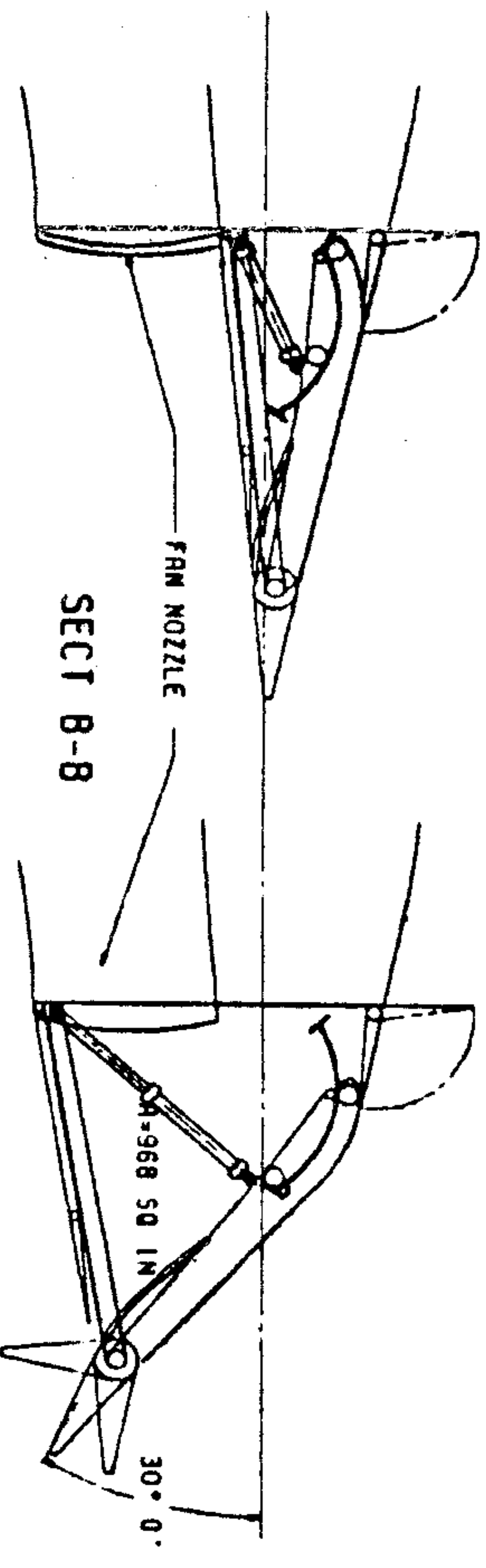
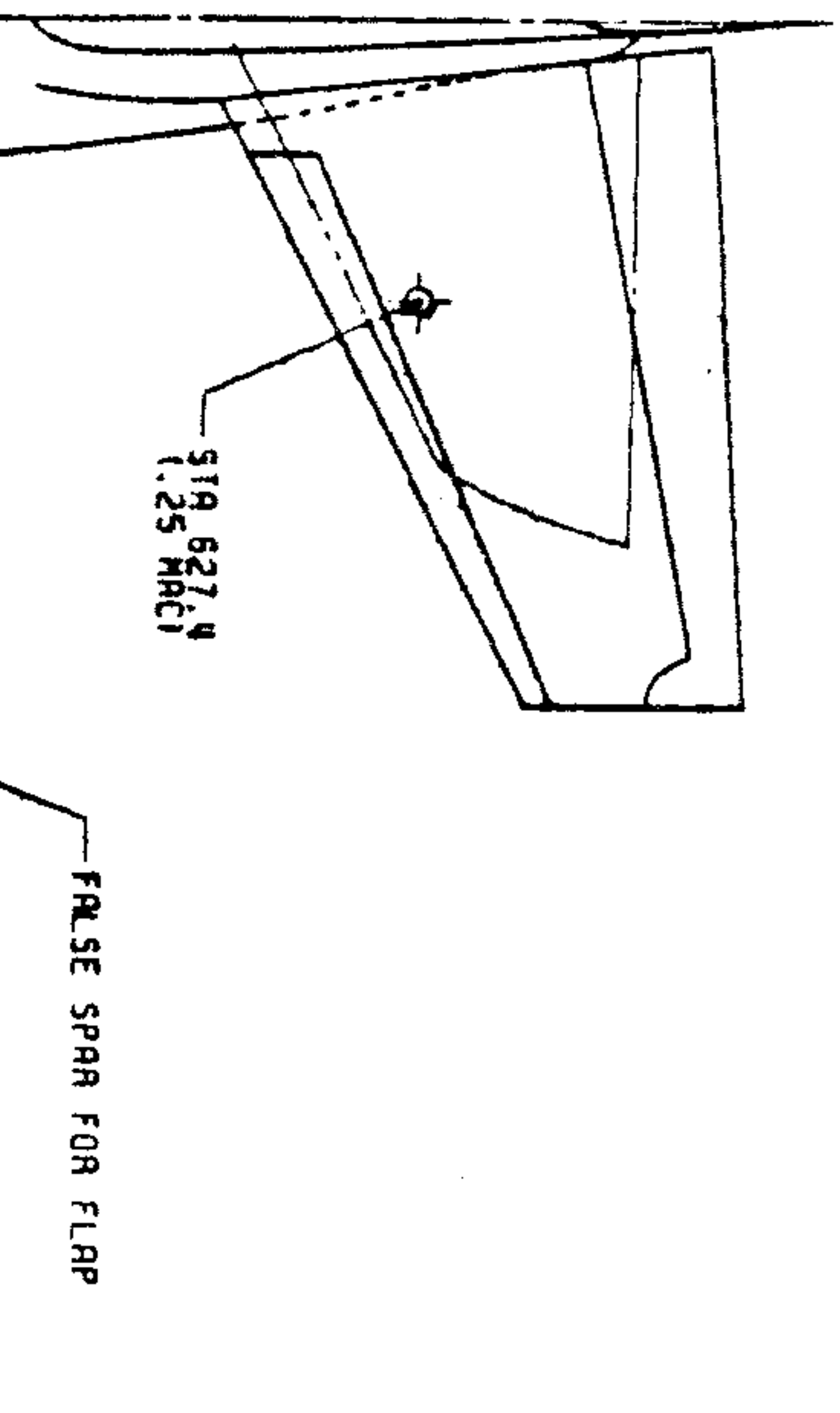
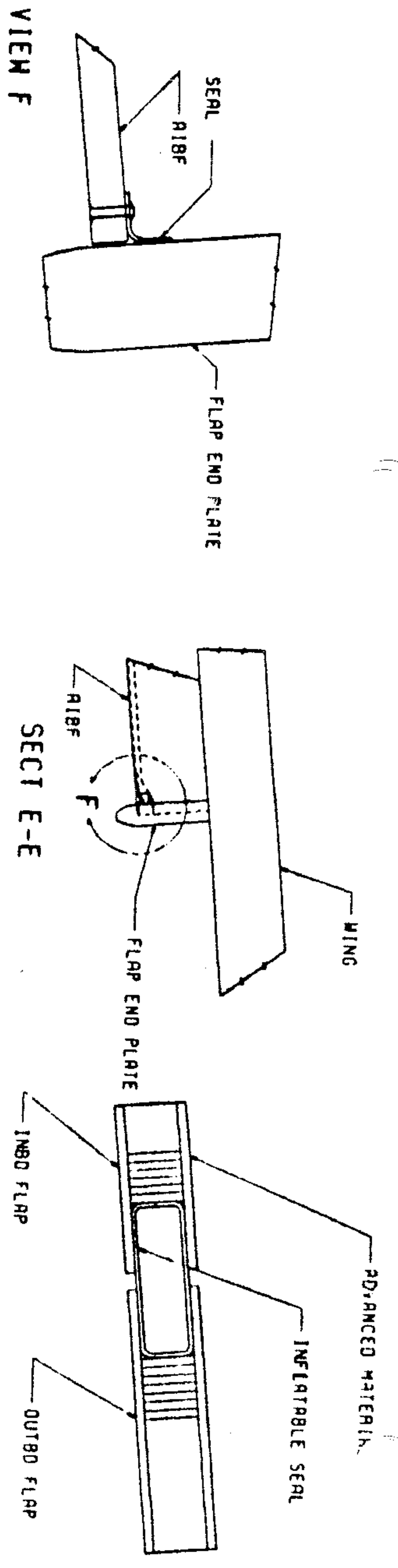
September 3 thru *WWII Personal Accounts: Pearl Harbor to V-J Day.*
 January 3 Exhibit containing letters, diaries, photos, etc.
 September 19 *The Home Front.* Lecture on Grand Rapids in the 1940's by Richard Harms. 2:00 p.m. Free



CHARACTERISTICS	WING	HORIZ	VERT
AREA	50 FEET	598	284.5
	50 METRES	55.6	26.4
SWEEP (1.25C) (DEG)	15	20	38.5
ASPECT RATIO	7.73	4.05	1.435
TAPER RATIO	0.25	0.33	0.35
THICKNESS RATIO	ROOT	0.17	0.10
	TIP	0.12	0.10
ROOT CHORD	FEET	14.08	12.59
	METRES	4.29	3.83
TIP CHORD	FEET	3.50	4.15
	METRES	1.07	1.27
MAC	FEET	9.85	9.07
	METRES	3.00	2.77
DIHEDRAL (DEG)	0	5	-

	FEET	METRES
SPAN	68.7	20.9
LENGTH	53.3	16.2
HEIGHT	22.8	6.9

CL-1990



CL-1990

AIBF CONCEPTUAL SYSTEM

September 22 An Evening with David Eisenhower. Grandson of President Dwight D. Eisenhower will present personal recollections and insights. Admission.

September 26 *The Combat Experience*. Experiences of local WWII veterans. Free

October 3 *The Roles of Women*. Experiences of local women and roles they played during the war. Free

October 7 Prelude to War. 1942 Frank Capra Film to be shown along with three other short films. Free

October 10 *The Tuskegee Airmen*. Panel presentation by veterans from this prestigious black air corps. Free

October 14 The Rainbow. 1944 Academy Award winning Soviet film on Nazi brutality in a Ukrainian village. Free

October 17 *The Holocaust*. Holocaust survivor will speak about his personal insights. Free

October 21 Resisting Enemy Interrogation. 1944 Army Air Corps film about captured American pilots.

October 27 An Evening with Harold Stassen. Thoughts and experiences of serving under Admiral William Halsey

October 28 The Purple Heart. 1944 American film based on Tokyo trial of Doolittle flyers

Kalamazoo Air Zoo Activities:

August 30 thru December 19 Cactus Remembered: The air war for Guadalcanal. Photo exhibit from the Admiral Nimitz Museum

October 3 Americans capture Solomon Islands. Guadalcanal Memorial Museum program and speakers

November 20 Tehran Conference and Battle for Berlin. Program by WW II Ace George Novotny

All dates and speakers are tentative. Please call the Museum at (616) 382-6555 shortly before the event for verification.

New Arrivals:

AMT 1:25 1962 Chevy Bel Air 409
 Monogram 1:25 1959 Chevy Impala convertible
 Revell 1:25 Chevy Caprice Police Car with working lights
 Monogram 1:48 Kingfisher

Miscellaneous:

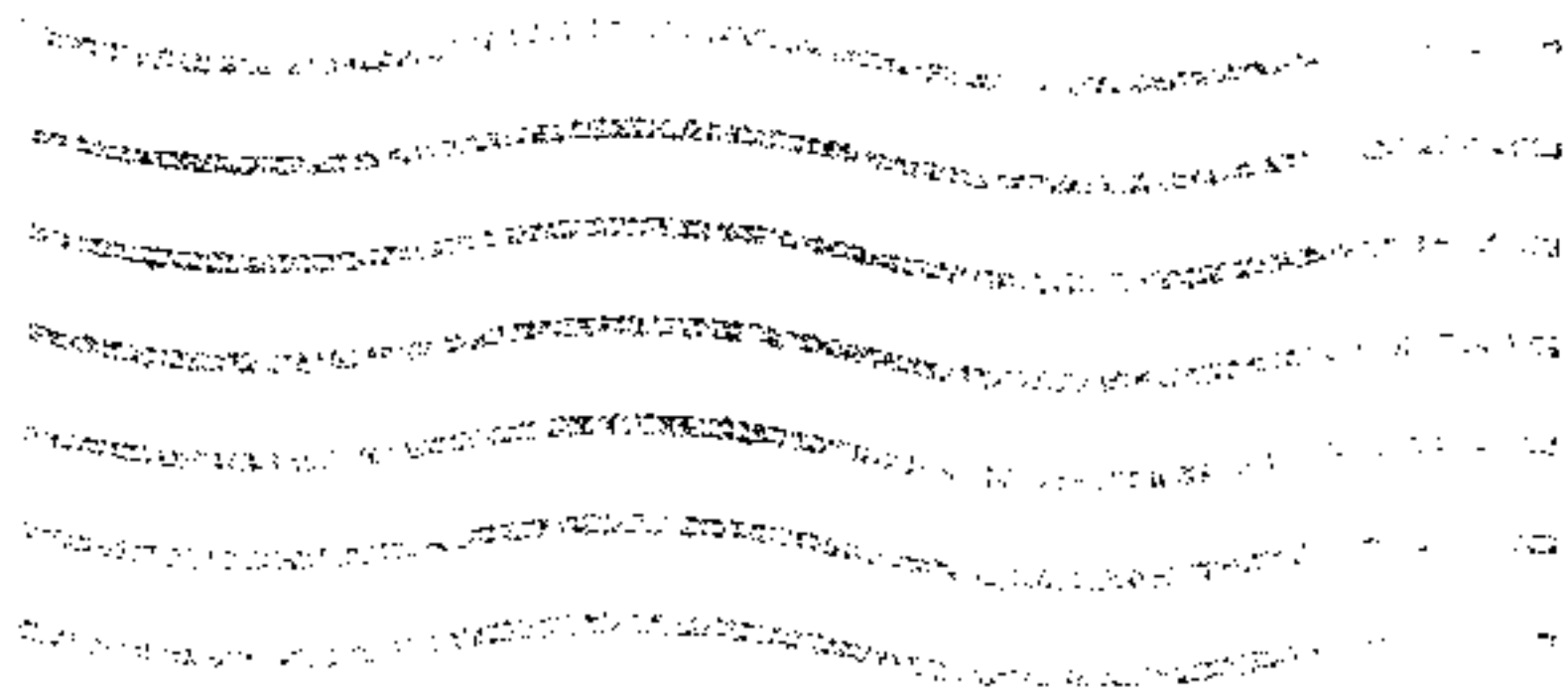
I will be distributing an updated phone list in October or November. If there are any corrections to be made, please contact Martin Schultz at 1-694-9839.

Tom Conte Provided me with a list of Superscale Decals which are currently unavailable.

32-x 1, 3, 12, 16, 21, 29, 31, 38, 61, 64, 101
 48-x 11, 13, 36, 66, 79, 87, 92, 98, 129, 137, 144, 148, 154, 194, 202, 212, 222, 225, 228, 231, 241, 244, 278, 295, 296, 299, 303, 338, 345, 361, 366, 375, 380, 398, 402, 406, 410
 72-x 72, 76, 112, 119, 135, 151, 157, 174, 197, 207, 211, 212, 244, 250, 255, 272, 286, 291, 295, 297, 301, 302, 303, 306, 313, 315, 319, 328, 332, 335, 337, 341, 351, 355, 358, 369, 366, 410, 431, 437, 459, 465, 466, 472, 487, 497, 502, 505, 508, 509, 513, 514, 536, 544, 547, 554, 571, 577, 620, 661

Spud Ensing is going to write up a short article about Jack Lousma but I still need some information about how the club logo came about. If you have any information please let me know.

This newsletter is a monthly publication of the Jack Lousma/West Michigan Chapter of the International Plastic Modelers' Society/U.S.A. Send submissions for publication to the Editor: Martin Schultz, 777 Wood Lea Drive, Otsego, MI, 49078-9755. Club meetings are at the Wyoming Public Library, 3350 Michael SW. Membership dues are \$10.00 for adults, \$7.00 for juniors and \$5.00 for juniors with a member adult. Direct questions concerning Membership and Activities to the Chapter Contact: John Tinay, 3636 Colonial Ave. NE, Grand Rapids, MI, 49505-2210. By Modelers, For Modelers is a Registered Trademark of The International Plastic Modelers' Society/USA.



IPMS/Jack Lousma
777 Wood Lea Drive
Otsego, MI 49078-9755

