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Wind-Tunnel Tests of the XV-15 Tilt Rotor Aircraft

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NOTATION

Symbol	Computer Notation	Description	
b	SPAN	wing span	32.17 ft
c	CBAR	wing chord	5.25 ft
C_D	CD	drag coefficient	D/qS
C_l	CROLL	rolling-moment coefficient	L/qSb
C_L	CL	lift coefficient	L/qS
C_m	CM	pitching-moment coefficient	M/qSc
C_n	CN	yawing-moment coefficient	N/qSc
C_p	CP	power coefficient	$550HP/\pi R^2 \rho (\Omega R)^3$
C_y	CY	side force coefficient	Y/qS
D	DRAG[1]	drag	lb
fe	FE	flat plate drag area	$C_D S$ ft^2
HP_{mast}	HP	rotor shaft power	hp
L	LIFT	lift	lb
L	ROLL	rolling moment	lb-ft
M	PITCH	pitching moment	lb-ft
N	RPM	rotor rpm	rpm
N	YAW	yawing moment	lb-ft
q	QPSF	dynamic pressure	$(1/2)\rho V^2$, psf
Q_M	R MAST Q L MAST Q	mast torque (R - right) (L - left)	in.-lb
R	R	rotor radius	ft
S	AREA	wing area	sq ft
V	VFPS	velocity	fps

[1]U denotes uncorrected values.

Symbol	Computer Notation	Description	
V_K	VKTS	velocity	knots
X	PED POS	pedal position	% (neutral = 50%)
	LONG STK	longitudinal stick	"
	LAT STK	lateral stick	"
	POW LEV	power lever position	"
	MTUN	tunnel mach. no.	
	TEMP	tunnel temperature	°F
	VSNDKTS	speed of sound	knots
Y	SIDE	side force	lb
α	ALFS,C	fuselage angle of attack	deg
i_N	INA	pylon angle[2]	deg
μ	V/OR	advance ratio	$V/\Omega R$
ΩR	OMEG*R	rotor tip speed	fps
ρ	RHO	air density	lb sec^2/ft^4
σ	SIGMA	rotor solidity ratio[3]	0.089
σ'	ROHR,6	density ratio	$\rho/\rho o$
ψ	PSI	yaw angle (positive nose right)	deg
δ_f		flap deflection	deg

[2]relative to fuselage (0° airplane, 90° helicopter)

[3]blade area/rotor disc area

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SUMMARY

The XV-15 Tilt Rotor Research Aircraft was tested in the Ames 40- by 80-Foot Wind Tunnel for preliminary evaluation of aerodynamic and aeroelastic characteristics prior to flight. The tests were undertaken to investigate the aircraft performance, stability, control and structural loads for flight modes from helicopter through transition and airplane mode up to the tunnel capability of 170 knots. Results from these tests are presented.

INTRODUCTION

The joint NASA/Army XV-15 Tilt Rotor Research Aircraft Project involves design, fabrication, and flight test of two essentially identical aircraft (fig. 1). The overall plan to implement this program is documented in references 1 and 2. A Test and Evaluation Plan, reference 3, outlines the tests to ensure that the XV-15 aircraft will meet the requirements of the Program Plan and the contract Model Specification and Statement of Work. As part of this plan, one of the aircraft was tested in the Ames 40- by 80-Foot Wind Tunnel (fig. 2).

Prior to the wind-tunnel tests, the operation of the aircraft systems was evaluated on a ground tiedown stand at the contractor's facility (fig. 3). After completing about 40 hr of test time, a brief flight evaluation of the aircraft hover characteristics was made (fig. 4). Three hours of flight time in helicopter mode were accumulated from May 3 to 31, 1977. Flight was limited to 40 knots forward and 100 foot altitude. The ground tiedown tests were then resumed for a total of 130 hr accumulated time. The last 5 hr were with systems installed for remote operation in the wind tunnel. This served not only to check the functional operation of the system but also to train personnel in its operation.

Following completion of the remote control checkout on March 11, 1978, the aircraft was prepared for shipment to Ames for the wind-tunnel tests. This involved removal of the wing from the fuselage and mounting it in a shipping cradle. The components were then airlifted on March 23, 1978 to

Ames, reassembled, and the aircraft installed in the wind tunnel on May 4, 1978 (figs. 5 to 8). Testing was conducted to June 23 and consisted of 51 runs in 54 hr of wind-on time. Of this, 19 hr were with rotors on.

The purpose of the wind-tunnel test was to provide an initial assessment of the aerodynamic and aeroelastic characteristics and structural loads within the aircraft and tunnel operating envelope. The tests also served to verify the functional operation of the aircraft systems and on-board instrumentation in a simulated flight environment.

A brief summary of the results of these tests along with a computer print-out of the wind-tunnel scale data is presented in this report. Additional data and analysis including structural loads and structural dynamics are presented in reference 4.

DESCRIPTION OF THE AIRCRAFT

The XV-15 configuration is based on the Bell Helicopter model 301 design. Two aircraft were built and one of these was tested in the wind tunnel. A detailed description of the aircraft and its systems is given in reference 5. Pertinent geometry is shown in figure 1 and table I.

In order that the aircraft could be mounted and operated in the wind tunnel, modifications were incorporated during construction of the ship's structure and hydraulic, fuel, electrical and control systems. For the wind-tunnel tests, the aircraft was provided with remote operation of engine and flight controls and an external supply of fuel, hydraulics, and electrical power. Actuators for remote operation of the flight controls were installed in the aircraft systems as shown in figure 9. The aircraft electrical and hydraulic systems are normally powered from engine driven generators and transmission driven pumps. To provide for operation in the wind tunnel when engines were not running, the D.C. electrical and one of the hydraulic systems (PC-2) were connected to a tunnel source (ref. 6 and fig. 10). For the tests with engines operating, the aircraft systems were used. Prior to tunnel entry, the ship's fuel tanks were purged and inerted with nitrogen and the fuel lines disconnected and capped (ref. 7 and fig. 11). In the tunnel, the fuel lines to the engines were connected directly to the tunnel supply, thus bypassing the aircraft's fuel tank systems.

For tests with rotors off, the blades with pitch links were removed from the rotor hub spindles (fig. 8). To prevent engine compressor windmilling with power off and tunnel wind on, the engine inlet ducts and exhaust were sealed (fig. 12).

During the test, various aircraft configuration changes were made for aerodynamic improvements or to correct problems (vibration, low C_L max and flap effectiveness). These configuration modifications are shown in figure 13 and table II and included pylon strakes, fences, vortex generators, flap tabs, and structural supports.

Because of an interference between the landing gear doors and the tunnel support struts, the entire test was run with the gear retracted and the gear doors closed.

TUNNEL INSTALLATION

The installation of the aircraft in the wind tunnel is shown in figure 14. The aircraft was supported on a system of 3 struts (ref. 8). To accept the loads imposed by attachment to the support struts, additional structure was added to the wing and fuselage in the attachment area during initial construction. In selecting the strut arrangement, consideration was given to dynamic characteristics and rotor/tunnel clearances (ref. 9). To verify predicted mode shapes, frequency and damping of the aircraft as mounted in the tunnel, a dynamic shake test of the combined aircraft, support system and tunnel balance was made after installation and prior to wind on testing. The shake tests were conducted with rotor blades off and with weights attached to the hub spindles to simulate the blade mass. Excitation was applied to one wing tip using an electrohydraulic actuator (fig. 15). Accelerometers and strain gages were used to measure the applied force and structural response. The shake tests were conducted using the procedures and data analysis system described in reference 10. No resonance problems at operating conditions were indicated. Details of the results are presented in reference 4.

Remote operation of the aircraft in the wind tunnel was controlled from a console in the control room (fig. 16). The console contained the controls for operation of the actuators in the aircraft for remote operation of engine and flight control systems. Instruments for monitoring the conditions of the various aircraft systems were removed from the cockpit and installed in the console.

Fuel and hydraulic lines from the tunnel systems were routed inside the right strut and connected to the aircraft systems inside the wing aft of the rear spar (fig. 17). Electrical and instrumentation leads were routed inside the left strut. Because of space requirements, these leads were routed externally on the wing lower surface from the top of the strut to connect with the ship's system inside the fuselage (fig. 18).

To assure safe operation of the tunnel test, an analysis was made to evaluate the safety provisions in the aircraft and for test operation procedures. The results are presented in reference 11. As part of this safety evaluation and prior to the tunnel tests, crew training was conducted during the latter part of the ground tiedown tests at the contractor's facility with the remote systems installed.

In addition, a simulation of the test operation to evaluate significant failure and recovery modes was conducted at Ames using the FSAA flight simulation program. This failure mode evaluation used the aircraft math model that was used for the flight simulation without the automatic flight control systems, FFS, and SCAS, and did not require the use of the FSAA cab. Inputs to the math model were adjusted to correspond to the aircraft as mounted in the tunnel. Remote operation in a simulated tunnel environment and emergency operating procedures were evaluated. The only significant failure identified that could cause a dangerous condition (high blade flapping and high loads) was a simultaneous dual engine failure at nacelle incidences above 85° (i.e., helicopter mode). Recovery from this failure was to reduce nacelle incidence within 5 sec of the failure. Complete conversion from 95° to 0° can be accomplished in 11 sec. If nacelle incidence is 85° or less at the time of the dual power failure, no corrective action was required.

DATA ACQUISITION AND REDUCTION

The wind-tunnel data acquisition system is a computer-based system that can be operated in either an on-line mode or stand alone with batch processing mode. The components of this system are described in reference 8. The components used for this test and the interface with the aircraft systems is shown in figure 19. The equipment is located in the wind-tunnel computer and control room (fig. 16(a)). Data acquired during the test included static aerodynamic forces, structural loads, and the status of the aircraft systems.

The static forces on the aircraft were measured by the wind-tunnel six-component balance system. Forces and moments were computed about the wind axes and the moment center shown in figure 20. No corrections were applied for support strut tares or tunnel-wall interference. Dimensional data used for reduction to coefficients are given in table I. Angle of attack and yaw are referenced to the fuselage reference line. Some of the data for setting and monitoring test conditions were displayed on a CRT (fig. 21).

Test operations involved monitoring loads in critical structural components and monitoring the condition of the various aircraft systems including the hydraulic, electrical, flight controls, and propulsion systems. Data acquisition, reduction, and display utilized the aircraft on-board instrumentation and the tunnel instrumentation data reduction and display systems.

The aircraft on-board instrumentation system is described in reference 12 and consists of sensors, signal conditioning, encoding (to Pulse-Code-Modulation (PCM) digital format) and recording. During the tunnel test, the aircraft's data system tape recorder was installed in the control room to provide access during test operations. The wind-tunnel data acquisition systems are described in reference 8 and have monitoring, reduction, analysis, display, and recording capabilities. The on-board research instrumentation and the interface with the tunnel systems are listed in table III and shown in figure 19.

Structural loads were displayed for monitoring on the wind-tunnel Peak Detector System (PDS), Cathode Ray Oscilloscope (CRO), brush recorders and a loads panel on the control console. The PDS computes peak-to-peak amplitude of selected dynamic signals in percent of full scale monitoring limit and displays the amplitude on a 50-channel bar graph display on a 20-in. CRT. Each channel was set to alarm when monitoring limits were exceeded. The CRO displayed, on an 8-in. CRT, the dynamic structural loads from one blade and hub spindle as X-Y pairs (beam vs. chord) and the corresponding pitch link load to allow an on-line assessment of loads with respect to allowables or critical limits. Some selected dynamic loads were displayed and monitored on brush recorders. The remote control console had a panel for display of loads in 12 structural elements for the information of the console operators (fig. 16(c)).

TESTS AND RESULTS

Testing followed the Test Plan of reference 13. A log of the runs completed is given in table IV. The conversion corridor area (the aircraft configuration between the helicopter and the airplane flight modes covered with rotors on) is shown in figure 22. A computer printout of the tunnel-scale data is given in table V. Some of this data is plotted and is shown in figures 23 to 31.

Some of the significant observations are discussed below.

Lift Coefficient

The measured lift characteristics of the XV-15 at all nacelle angles demonstrated an apparent premature flow separation resulting in a reduction of achievable lift at high angles of attack. Inspection of the wing airfoil contours indicate that leading edge out-of-contour and surface irregularities may have contributed to this problem. The addition of vortex generators at the upper-surface quarter-chord location along the full wing span (fig. 13) eliminated the premature stall and retained attached flow up to an angle of attack of 15°. This improvement is shown in figure 24(a) for the airplane mode configuration. The addition of vortex generators at the 60% chord ahead of the flaps had no significant effect on lift up to angles of attack of 10° (fig. 24(b)).

Flap Effectiveness

The lift increment due to flap deflection was improved by the addition of a flap tab. This 3/4-in. tab runs the full span of the wing trailing edge and it projects downward approximately normal to the wing chord (fig. 13). The measured lift, drag, and moment data presented in figure 25(a) illustrates the lift increase due to the tab and its impact on drag. At low levels of lift coefficient and flap angles of 0° and 20° there is no effect on drag. As illustrated in figure 25(b), the flap tab provides a significant increase of the incremental lift due to flap deflection at 0° aircraft angle of attack. At high lift coefficients and at a 40° flap angle, a drag increase is apparent, as shown on the C_D and L/D curves of figure 25(a).

Autorotation

Autorotational capability was demonstrated at an 80-knot airspeed with a 95° nacelle angle and 40° flap angle aircraft configuration. The rotor RPM governor was engaged and several rotor speeds were tested. At the zero mast-torque autorotational condition shown in figure 27(g), the minimum rate of descent is computed to be approximately 2450 ft/min at 76% RPM.

Yaw Characteristics

The effect of aircraft yaw on the force and moment coefficients is shown in figures 23(b) and 28. Of note is the yawing coefficient, C_n, which demonstrates a linear variation with yaw angle. A reduction of the slope of C_n around the zero yaw angle measured in model tests of the original single vertical fin configuration of the tilt rotor research aircraft caused concern about its directional stability characteristics. No problem in this area was detected with the full-scale H-tail XV-15.

Drag

A determination of the drag of the XV-15 in a free-air state was not obtained because of the difficulty in establishing the tares and interference corrections with precision and confidence. The measured drag, however, indicated levels greater than expected based on the results of prior small scale tests. A summary of the rotors-off airplane mode drag, as measured by the wind-tunnel balance, is shown in figure 30. The configurations of the XV-15 on the three strut support system, in order of decreasing drag, are: vortex generators on; vortex generators off; and a clean (gaps taped, remote control cables and lines removed) configuration.

An indication of the drag coefficient difference between the three strut and a single strut support system is also presented in figure 30 based on a 1/5 scale model test. It appears that the pretest prediction would underestimate the free-air XV-15 minimum drag by as much as 20%. Comparisons of the clean aircraft configuration data indicate that the anticipated drag reduction at full scale Reynolds numbers is not occurring.

Airflow

The placement of tufts on the aircraft during the wind-tunnel tests revealed several areas of disturbed boundary-layer flow. For all flight modes, the upper-aft portion of the landing gear pod and the fuselage surface aft of the pod showed turbulent flow. Without vortex generators, the upper surface of the wing aft of 60% chord indicated separation when the flaps were deflected. Some separation was also noted on the upper fuselage just aft of the wing above the trailing edge fillet. In helicopter and conversion flight, the upper, or aft surface of the nacelles, showed severely separated flow. (Note that the nacelle is roughly oval in shape and is canted outboard at helicopter and conversion nacelle angles.) During portions of the conversion envelope (particularly when high oscillatory empennage loads were present), the vertical fin tufts reflected turbulent flow conditions.

Systems Operation

Throughout the wind-tunnel test period, all aircraft components and systems operated well and within acceptable tolerances with the exception of the following items:

Pylon downstop— A failure of the right-hand pylon downstop bracket occurred. This component provides the hard-point that the pylon engages in the aircraft mode to increase the wing/pylon stiffness for aeroelastic stability. The failure was subsequently determined to have resulted from overstress cycle fatigue. The crack appeared to have started prior to the wind-tunnel test. The left-hand downstop also was cracked in the same location. As a result of this failure, only three runs had to be deleted from the planned run schedule. A limited amount of airplane mode testing was conducted by raising the pylons to just off the downstop. Following the wind-tunnel test, a redesign of the downstop bracket and a modification of its rigging/preloading procedure was initiated.

Nose boom vibration— During operation in airplane mode at speeds greater than 150 knots, the nose boom and the pitch and yaw vanes on the nose boom YAPS head vibrated excessively. Between runs 6 and 24, the nose boom YAPS head was removed. The nose boom was then stiffened by adding support wires for the remainder of the test.

Antenna vibrations— Excessive vibrations of the aft-fuselage mounted VOR-LOC antennas occurred during attitude sweeps in airplane mode flaps down. Inspection disclosed a structural failure at the attach point. The vibration was felt to be the result of wing flow separation. The antennas were removed for the remainder of the test.

Flap drive— During a run with flaps down, the flaps could not be extended beyond about 30° while operating at 160 knots. The failure was found to be due to a loose wire.

Engine oil venting— Seepage from the engine oil scavenge lines occurred during initial runs with rotors off while operating in airplane mode at airspeeds greater than 100 knots. The problem was corrected by scarfing the end of the tube. The modification was satisfactory for the remainder of the test up to the maximum test airspeeds.

Empennage loads— Oscillatory load limits were encountered on the empennage structure during helicopter and conversion mode operations. In the helicopter mode, at a nacelle incidence of 90°, the horizontal spar attach lug tension loads increased with increasing airspeed up to approximately 40 knots (as previously indicated by flight test of aircraft no. 1). Above 40 knots, the load amplitude decreased rapidly with airspeed (fig. 31(a)). The addition of a preload strap reduced the loads on the lugs to well below the design limits. The excitation for these loads is believed to be the tip vortices shed from the inboard edge of the rotor disk. These vortices, which are generated downward in the hover condition, are swept aft as forward flight is initiated, providing a strong oscillatory flow at the empennage at about 40 knots. At higher speeds, the rotor tip vortices pass clear of the empennage.

At the low speed end of the conversion envelope, for nacelle angles around 60°, high vibratory loads appeared on the empennage structure, with the horizontal spar experiencing loads above the infinite life design limits. The placement of struts (shown in figs. 13(a) and (d)) reduced the loads in the horizontal tail structure but resulted in the growth of vertical fin spar and attach fitting loads to beyond its design limits. A series of tests after run 23 examined the effect of various aerodynamic modifications such as wing fences, nacelle strakes, and vortex generators (fig. 13) on the tail loads. Some of these results are shown in figures 31(b) and 31(c). No aerodynamic modification solution was found to be sufficiently effective and suitable for all flight-mode (hover through airplane) conditions. Long streamers attached to the inboard side of the nacelle at the wing/nacelle junction showed that a strong vortex rolls over the forward portion of the wing tip and is swept inboard to the lower half of the vertical fins at 60° nacelle incidence. Subsequent flight tests showed this problem to be less severe than indicated by wind-tunnel tests.

REFERENCES

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11. Wind Tunnel Operation Safety Analysis for the XV-15 Tilt Rotor Aircraft in the NASA/Ames 40- by 80-Foot Wind Tunnel. Bell Helicopter Textron Rept. 301-959-005, Nov. 1977.

12. Instrumentation and Data Acquisition Manual. Bell Helicopter Textron Rept. 301-099-003B, June 1974.

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TABLE I. AIRCRAFT DIMENSIONS
(English Units)

(a) General

	Wing	Horizontal Tail	Vertical Tail
Area, sq ft	181.0[a]	50.25	50.5[b]
Span, ft	32.17[c]	12.83	7.68
Chord, ft	5.25	3.92	4.09/2.40[d]
$\bar{c}$, ft[e]	5.25	3.92	3.72
Aspect ratio	6.12	3.27	2.33
Incidence, deg	3.0	0	--
Dihedral, deg	2.0	0	--
Sweep $\frac{c}{4}$, deg	-6.5	0	31.6[f]
Section (NACA)	64A223 (Mod)	64A015	0009
Tail length, ft	--	22.4	23.2

(b) Movable Aerodynamic Surfaces

	Flap	Flaperon	Elevator	Rudder
Area aft hinge, sq ft	11.0[b]	20.2[b]	13.0	7.5
Span, ft	4.25[g]	7.86[g]	11.0	4.66
Chord aft hinge, %	25	25	30	25
Deflection, deg	75 max	-23.8[h] +13.8	±20	±20
Control travel for total surface deflection, in.	--	9.6	9.6	5.0

(c) Rotor

Number of blades per rotor	3
Diameter, ft	25.0
Disc area per rotor, sq ft	491
Blade chord, in	14.0
Blade area per rotor, sq ft	43.75
Solidity	0.089
Blade twist, deg	
Aerodynamic	45.
Geometric	40.9
Hub precone angle, deg	2.5
δ_3, deg	-15.0
Flapping design clearance, deg	±12
Blade Lock number	3.83
Rotor rpm/tip speed	
Helicopter	565 rpm/740 fps
Airplane	458 rpm/600 fps

a To BL 207

b Total both panels

c Between rotor centerlines at tilt axis

d Root/tip

e Mean aerodynamic chord

f Upper

g One side along hinge

h Measured from flap. Also flaperon droops .625°/deg. flap

TABLE I.- Concluded.
(Metric units)

(a) General

	Wing	Horizontal Tail	Vertical Tail
Area, sq m	16.81[a]	4.67	4.69[b]
Span, m	9.80[c]	3.91	2.34
Chord, m	1.60	1.19	1.25/.73[d]
$\bar{c}$, m[e]	1.60	1.19	1.13
Aspect ratio	6.12	3.27	2.33
Incidence, deg	3.0	0	--
Dihedral, deg	2.0	0	--
Sweep $\frac{c}{4}$, deg	-6.5	0	31.6[f]
Section (NACA)	64A223 (mod)	64A015	0009
Tail Length, m	--	6.83	7.07

(b) Movable Aerodynamic Surfaces

	Flap	Flaperon	Elevator	Rudder
Area aft hinge, sq m	1.02[b]	1.88[b]	1.21	.70[b]
Span, m	1.29[g]	2.40[g]	3.35	1.42
Chord aft hinge, %	25	25	30	25
Deflection, deg	75 (max)	-23.8[h] +13.8	±20	±20
Control travel for total surface deflection, cm	--	24.4	24.4	12.7

(c) Rotor

Number of blades per rotor	3
Diameter, m	7.62
Disk area per rotor, sq m	45.6
Blade chord, cm	35.6
Blade area per rotor, sq m	4.06
Solidity	.089
Blade Twist, deg	
Aerodynamic	45.
Geometric	40.9
Hub precone angle, deg	2.5
δ_3, deg	-15
Flapping design clearance, deg	±12
Blade Lock number	3.83
Rotor rpm/tip speed	
Helicopter	565 rpm/226 mps
Airplane	458 rpm/183 mps

TABLE II. AIRCRAFT CONFIGURATION LOG

Run No.	Rotors	Nose boom YAPS head	(1) Horizontal tail struts	(2) Vortex Generators 1"x2½" @20° ∠ on .25c	(3) Vortex Generators 1"x1¼" @20° ∠ on .6c	(4) Vortex Generators 3"x5" @20° ∠ on .6c	(5) Vortex Generators .6"x1½" @15° ∠ on .25c	(6) Flap tab full span T.E.	(7) 6" high full length 45° obd	(8) 18" high splitter top side	(9) Pylon Strakes 3"x34" lower obd	(10) Pylon Strakes 3"x16" outboard	(11) Pylon Strakes 3"x8" outboard	(12) 3"x18" outboard	(13) 15"x52" 45° obd	(14) Engine inlet fairing	(15) Fences 4"x15" 10" ibd	(16) Fences 12" high flap to 8" on bot.	Ref fig. 13(a) Remarks
1-5	OFF	ON																	
6		ON/OFF																	
7-8		OFF																	Removed during Run 6
9-10				ON															
11																			Heli. doors off S 3-5
12-13	OFF		ON																
14-19	ON																		
20-21					ON	ON													
22-23		OFF	ON																
24-25		ON	OFF						ON										
26	ON		ON																
27-29	OFF																		
30						ON		ON	ON										
31						OFF			OFF										Top cowl doors off
32																	ON		Top cowl doors on
33																	OFF		Sealed pylon/wing gap
34										ON	ON								Gap seals off
35										ON	ON	ON	ON						Pylon ibd opening closed Cowl fairing off
36-39										OFF	OFF	OFF	OFF						
40-41			ON											ON					Var. cowl fairings & gap seals
42			OFF																
43			ON		ON											ON			
44				ON	OFF														
45		ON		OFF			ON	ON						ON					
46		OFF						OFF						OFF					
47																			Taped gaps
48															ON				
49															extended 15			ON	
50							ON								ON			OFF	
51	OFF	OFF	ON	OFF	OFF	OFF	OFF	OFF	OFF	OFF	OFF	OFF	OFF	OFF	OFF	ON	OFF	OFF	

FOLDOUT FRAME 1

ORIGINAL PAGE IS OF POOR QUALITY

FOLDOUT FRAME 2

TABLE III.- INSTRUMENTED PARAMETERS

Measurement no.	Description	Input TSP	PCM word	CRO	HS	TCS	DAS	p-p	DPM	OBS	DAC	
B122	Right bld beam 52.5		B1-10	2	1		29	1			A6	Load panel
B132	Left bld beam 52.5		B1-8		2		30	2			A4	Load panel
B123	Right bld chord 52.5		B1-20	6	3			3			A10	
B133	Left bld chord 52.5		B1-9		4		31	4			A5	
F103	Right pitch link		B1-45	3	5		28	5			A24	Load panel
F060	Left pitch link		B1-21		6		32	6			A11	Load panel
B165	Right conv spindle beam		B1-57		7			7			A27	Load panel
B190	Left conv spindle beam		B2-54		8			8			A29	Load panel
B166	Right conv spindle chord		B2-57		9			9			A30	
B191	Left conv spindle chord		B1-55		10			10			A26	
F611	Right conv actuator load		B1-7		11			11			A3	
F638	Left conv actuator load		A1-5		12			12			C1	
B112	Right yoke beam 9.0		B1-48	1	13			13			A25	
B114	Left yoke beam 9.0		B1-15		14			14			A7	
B113	Right yoke chord 9.0		B1-34	5	15			15			A18	Load panel
B115	Left yoke chord 9.0		B1-16		16			16			A8	Load panel
B109	Right perp mast bending		A1-21		17			17			C4	Load panel

TABLE III.- Continued.

Measurement no.	Description	Input TSP	PCM word	CRO	HS	TCS	DAS	p-p	DPM	OBS	DAC	
B141	Left perp mast bending		B1-18		18			18			A9	Load panel
M107	Right mast torque		B1-6		19		14	19	3		A2	Load panel
M143	Left mast torque		B1-5		20		15	20	2		A1	Load panel
D156	Right F/A flapping	T104			21		22	21				AC cons.
D181	Left F/A flapping	T122			22		23	22				AC cons.
D157	Right lat. flapping	T101			23		24	23				AC cons.
D182	Left lat. flapping	T119			24		25	24				AC cons.
B656	Right wing beam 22	T107, 108, 109			25	1	4	25				
B626	Left wing beam 22	T125, 126, 127			26	2	5	26				
B655	Right wing chord 22	T110, 111, 112			27	3	6	27				
B625	Left wing chord 22	T128, 129, 130			28	4	7	28				
M657	Right wing torsion 22	T113, 114, 115			29	5	8	29				
M627	Left wing torsion 22	T131, 132, 133			30	6	9	30				
E747	Flaperon exciter	T137			31		2					
E746	Collective exciter	T140			32		3					
A150	Right pylon F/A accel.		B1-37		33		16				A19	

TABLE III.- Continued.

Measurement no.	Description	Input TSP	PCM word	CRO	HS	TCS	DAS	p-p	DPM	OBS	DAC
A175	Left pylon F/A accel.		B1-30		34		17				A15
A151	Right pylon lat. accel.		B1-38		35		18				A20
A176	Left pylon lat. accel.		B1-31		36		19				A16
A152	Right pylon vert. accel.		B1-39		37		20				A21
A177	Left pylon vert. accel.		B1-32		38		21				A17
RSFAA	Right strut F/A accel.	T004, 005, 006			39	7	10				
LSFAA	Left strut F/A accel.	T010, 011, 012			40	8	11				
RSLAA	Right strut lat. accel.	T001, 002, 003			41	9	12				
LSLAA	Left strut lat. accel.	T007, 008, 009			42	10	13				
B262	Right horiz. beam 8.0		B1-58		43		27	31			A28
B259	Left horiz. beam 8.0		B2-60		44		26	32			A32
B263	Right horiz. chord 8.0		B2-58		45						A31
F052	Right swash plate driver		B1-44		46			33			A23
F142	Left swash plate driver		B1-24		47			34			A12
F162	Right F/A cyc act load		B1-40		48			35			A22
F187	Left F/A cyc act load		B1-27		49			36			A13
F163	Right lat. cyc act load		A1-29		50			37			C5

TABLE III.- Continued.

Measurement no.	Description	Input TSP	PCM word	CRO	HS	TCS	DAS	p-p	DPM	OBS	DAC	
F188	Left lat. cyc act load		B1-28		51			38			A14	
F164	Right collective act load		B1-19		52			39			B1	
F189	Left collective act load		B1-29		53			40			B2	
B120	Right blade beam 22.8		A1-12		54			41			C2	
B130	Left blade beam 22.8		B1-43		55			42			B5	
D158	Right collective pitch		B4-82		56						B13	AC cons.
D183	Left collective pitch		B3-79		57						B10	
D159	Right F/A cyclic		B5-82		58						B15	
D184	Left F/A cyclic		B4-79		59						B12	
D160	Right lat. cyclic		A2-72		60						C6	AC cons.
M266	Right horiz. torsion 8.0		B1-59								B6	BNC 1
B124	Right blade beam 75		B1-35								B3	BNC 2
B125	Left blade chord 75		B1-36								B4	BNC 3
B126	Right blade beam 112		A1-16								C3	BNC 4
D185	Left lat. cyc		B5-79								B14	AC cons.
	Shaker excitation											AC cons.
	Az right											
	Az left											
	NPR right											CTR 1
	NPR left											CTR 2

TABLE III.- Concluded.

Measurement no.	Description	Input TSP	PCM word	CRO	HS	TCS	DAS	p-p	DPM	OBS	DAC	
D021	F/A stick pos		B1-78						1		B7	
D022	Lat. stick pos		B2-78						7		B8	
D023	Power lever pos		B3-78						5		B9	
D024	Pedal pos		B4-78						6		B11	

TABLE IV.- RUN LOG
(Rotors off)

Run no.	Pt no.	i_N	V_{knots}	δ_F	Cntr	Sweep	α trim	Run time	Remarks
3	2-12	90	80	40	1706-1708	α: -12 to +14	-	1:53	Clean A/C
	13-19	90	80	40	1709-1711	ψ: -4 to +16	-8		
	20-25	90	80	40	1712-1718	ΔX_{long}, ΔX_{lat}, ΔX_{ped}	-8		
5	2-12	90	60	75	1723-1727	α: -12 to +14	-	1:30	
	13-19	90	60	75	1728-1730	ψ: -4 to +16	-8		
	20-21	90	60	75	1731-1732	ΔX_{lat}	-8		
6	5-10	0_L	160	0	1742-1743	α: -4 to +8	-	2:25	Removed nose boom
	11-17	0_L	122	0	1744-1746	α: -4 to +12	-		
	18-23	0_u	160	40	1747-1749	α: -4 to +8	-		Removed VHF antennas
	24-30	0_u	110	40	1750-1751	α: -4 to +12	-		
7	4-7	0_L	-	0	1755-1757	V: 100 to 178	0	1:26	Dyn. stability
8	3-4,7	90	-	40	1761-1763	V: 80 to 118	0	1:40	Dyn. stability
	5-6,10	0_u	-	40	1767	V: 111 to 170	0		Dyn. stability
	8-9	30	-	40	1765-1766	V: 122 to 170	0		Dyn. stability
9	3-14	0_L	80	0	1772-1780	α: -4 to 16	-	2:15	VGs on
	15-25	0_L	80	40	1781-1788	α: -4 to +14	-		
	26-31	-	80	40	1789-1794	i_N: 0 to 90	0		
	32-41	0_L	110	40	1795-1801	α: -4 to +12	-		
	42	0_L	110	0	-	-	0		
10	4-11	0_L	160	0	1803-1807	α: -4 to +8	-	1:08	
	12-15	30	140	40	1808-1810	α: -4 to +2	-		
	16-19	75	100	40	1811-1814	α: -4 to +1	-		
	20-22	60	120	40	1815-1817	α: -4 to -1	-		
11	3-5	75	100	40	1818-1820	α: -4 to 0	-	1:32	Removed helicopter doors
	6-10	0_L	160	0		ψ: -4 to +8	+2		
	11-16	0_L	160	0		ΔX_{long}, ΔX_{lat}, ΔX_{ped}	+2		
	17-19	0_L	125	0		ΔX_{lat}	+8		
	20-22	0_L	125	0		ΔX_{lat}	+12		
	23-27	0_L	160	40		ψ: -4 to +8	0		
	28-33	0_L	160	40		ΔX_{long}, ΔX_{lat}, ΔX_{ped}	0		
	34-36	0_L	110	40		ΔX_{lat}	+8		
12	3-13	90	80	40	1856-1864	α: -12 to +14	-	1:00	Tail strut on
	14-18	75	100	40	1865-1867	α: -4 to +4	-		
13	3-7	75	100	20	1868-1872	α: -4 to +4	-	:45	
	8-10	75	100	0	1873-1875	α: +4 to +8	-		
	10-13	-	100	0	1876-1878	i_N: 75 to 0_L	+8		

TABLE IV.- Continued.
(Rotors on)

Run no.	Pt no.	i_N	V_{knots}	δ_F	Cntr	Sweep	α trim	Run time	Remarks
-	-	90	-	40		Track/balance	0	:10	94% N_R
14	3-4	90	-	40		Track/balance	0	:55	
	-	90	-	40		-	0	:02	Xms chip light
15	7	90	40	40	1901		0	1:45	
	8-9	80	-	40	1903-1904	V_{knots}: 40-80	0		
	10-18	-	80	40	1906-1914	i_N: 80-10	0		
	19-22	-	100	40	1915-1918	i_N: 10-0	0		
	23-24	0_L	100	0	1919-1923	Exciter	0		Dyn. stab. 76%
16	-	0_L	120	0		Exciter	0	:20	Oil drain leak
17	3-6	0_L	-	0	1932-1943	V_{knots}: 140-180	0	2:09	Dyn. stability
	7-8	0_L	180	0	1946-1948	Q_m: 60-80%	0		Dyn. stability
18	4-7	0_u	-	40	1952-1956	V_{knots}: 110-170	0	2.25	XMS chip
	8-9	30	-	40	1957-1969	V_{knots}: 150-170	-4		Dyn. stability
	10-16	60	-	40	1970-1977	V_{knots}: 130-151	-7		Dyn. stability
	17	90	80	40	1980	-	-7		Dyn. stability
20	8-15	90	-	40	1989-1997	V_{knots}: 80-100	-8	2:45	Dyn. stability
	16-20	90	80	40	1998-2002	α: -12 to -4	-		
	21-28	90	80	40	2003-2009	ψ: -4 to +16	-8		
	29-34	90	80	40	2010-2014	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	-8		
	35-40	90	-	40	2015-2020	V_{knots}: 95-123	-8 to -12		Dyn. stability
	41-44	75	140	40	2021-2024	Q_m: 45-70%	-8		
	45-46	45	160	40	2025-2026				
21	3-10	60	80	40	2027-2034	α: -8 to +7	-	1:00	
	11-16	60	120	40	2036-2041	α: -5 to +3	-		
22	3-5	90	-	40	2052-2057	V_{knots}: 40-80	0	2:08	
	6-10	60	120	40	2058-2062	ψ: -4 to +8	-1		
	11-16	60	120	40	2063-2068	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	-1		
	18-28	95	80	40	2070-2082	α: 0 to +12	-		76% N_R Autorotation
	29-38	95	80	40	2083-2094	α: 0 to +12	-		94% N_R Autorotation
	39	95	80	40	2095		12		102% N_R Autorotation
	-	90	60	40	2097-2098		0		Start/stop
23	3-9	0_u	110	40	2099-2104	α: 0 to +12	-	1:20	94% N_R
	10-14	0_u	110	40	2105-2109	ψ: -4 to +8	8		
	15-21	0_u	110	40	2110-2115	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	8		
	22-27	0_u	160	40	2116-2120	α: -1 to +3	-		Down stop broke
24	3-4	90	-	40	2127-2128	V_{knots}: 60-80	-5, -8	2:05	Struts off/ 6" strake
	5-9	-	80	40	2129-2133	i_N: 90-30	0		
	10-14	60	80	40	2134-2138	α: -4 to +3	-		
	15-16	60	100	40	2140-2141	α: -2 to 0	-		
	17-20	60	120	40	2142-2145	α: -4 to 0	-		
	21	60	120	0	2146	-	0		
	22-24	75	100	40	2147-2149	α: -5 to -2	-		
	25-30	75	100	40	2150-2155	ψ: -4 to +12	-2		
	31-36	75	100	40	2157-2162	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	-2		
	37-41	30	140	40	2163-2167	α: -5 to +3	-		
26	3-5	90	40	40	2173-2175	α: -2, -5, -8	-	1:57	Struts on
	6-10	30	140	40	2176-2180	ψ: -4 to +8	-1		
	11-16	30	140	40	2181-2186	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	-1		
	17-20	45	100	40	2187-2190	α: 4 to +9	-1		
	21-28	45	100	40	2191-2197	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	+8		
	-	-	80	40	-	i_N: 45-80	-1		
	29-33	80	80	40	2198-2203	α: -5 to +3	-		
	34-40	80	80	40	2204-2209	$\Delta X_{long}, \Delta X_{lat}, \Delta X_{ped}$	-1		
	41-46	80	80	40	2210-2215	ψ: -4 to +12	-1		

TABLE IV.- Continued.
(Rotors off)

Run no.	Pt no.	i_N	V_{knots}	δ_F	Cntr	Sweep	α trim	Run time	Remarks
29	3-9	60	120	40	2218-2224	α: -4 to +6	-	1:45	Strut, 6" strake
	10-16	45	120	40	2225-2231	α: -4 to +8	-		Nose boom on
	17-18	45	120	40	2232-2233	ΔX_{lat}	8		
	19-27	0_u	120	40	2237-2245	α: -4 to 11	-		
	28-29	0_u	120	40	2247-2248	ΔX_{lat}	8		
	30-37	0_u	120	20	2249-2256	α: -4 to +10	-		
	38-45	0_u	120	0	2257-2264	α: -4 to +10	-		
30	3-10	0_u	120	20	2265-2272	α: -4 to +10	-	1:00	Tab on flap (3/4)
	11-17	45	120	20	2273-2279	α: -4 to +8°	-		
	18-19	45	120	20	2280-2281	ΔX_{lat}	8		
	20-21	0_u	120	20	2282-2283	"	8		
	22-30	60	120	0	2284-2292	α: -4 to +9	-		
31	3-4	60	120	40	2296-2297	α: -4 to -2	-	:30	Cowl doors off
32	3-12	0_u	120	0	2298-2307	α: -4 to +12	-	1:00	Strut, strakes 3", 6", 18", wing fence--1/2 chord
	13-14	0_u	120	0	2308-2309	ΔX_{lat}	8		
	15-22	0_u	120	40	2310-2317	α: -4 to +10	-		
	23-24	0_u	120	40	2318-2319	ΔX_{lat}	8		
33	4-10	0_u	120	0	2320-2326	α: -4 to +8	-	:20	Wing fence removed
	11-12	0_u	120	0	2327-2332	ΔX_{lat}	8		Wing - pylon gaps taped
34	3-11	60	80	40	2335-2343	α: -4 to +11	-	1:15	
	12-20	60	100	40	2344-2353	α: -4 to +9	-		
	21-28	60	120	40	2354-2361	α: -4 to +8	-		
35	3-7	60	120	40	2362-2366	α: -4 to +6	-	:45	Inboard fairing nacelle cut-off, gap covered
	8-11	60	120	0	2367-2370	α: -4 to +6	-		
	-	-	120	40	2371-	i_N: 0 to 90	0		
36	3-6	60	120	40	2374-2377	α: -4 to +4	-	:35	All strakes on nacelle removed
	7-12	60	120	0	2378-2383	α: -4 to +6	-		
	-	-	120	40	-	i_N: 0 to 90	0		
37	3-6	60	120	40	2386-2388	α: -4 to +4	0		Removed inboard nacelle fairing cover
	7-10	75	100	40	2389-2392	α: -4 to +4	-		
	11-16	0_u	160	0	2393-2398	α: -4 to + 11	-	:50	(Left-hand horiz. strut cracked)

TABLE IV.- Continued.
(Rotors off)

Run no.	Pt no.	i_N	V_{knots}	δ_F	Cntr	Sweep	α Trim	Run time	Remarks
39	4-5	60	120	40	2401-2402	α: -4 to 0	-	1:45	Nacelle original conf.
	6-8	75	100	40	2403-2405	α: -4 to +4	-		
	9-12	60	120	0	2406-2409	α: -4 to +4	-		
	13-17	-	120	40	2410-2419	i_N: 0 to 90	0		
40	3-6	60	120	40	2421-2425	α: -4 to +4	-	1:10	3" spoiler 24" along blue stripe, outboard nacelle (angle of attack out)
	7-10	60	120	0	2426-2429	α: -4 to +4	-		
	11-15	-	120	40	2430-2440	i_N: 0 to 90	0		
	16-20	0_u	160	0	2441-2447	α: -4 to +10	-		
	21-24	0_u	160	20	2448-2451	α: -4 to +8	-		
41	3-6	0_u	160	40	2454-2457	α: -4 to +6	-	:15	
42	3-5	60	120	40	2460-2462	α: -4 to -1	-	1:50	Emp. strut on
	6-8	60	120	0	2463-2465	α: -4 to -1	-		
	9-13	-	120	40	2466-2475	i_N: 0 to 90	0		
	14-17	75	100	40	2476-2479	α: -4 to +1	-		
43	4-8	0	120	0	2480-2484	α: -4 to 10	-	:45	Inlet fairing and emp. strut on
	9-12	0	120	20	2485-2488	α: -4 to 8	-		
	13-14	0	120	20	2489-2490	ΔX_{lat}	8		
	15	0	120	40	2491	-	-4		
	16-19	60	120	40	2492-2495	α: -4 to 4	-		
44	5-9	0	120	0	2496-2500	α: -4 to 10	-	:50	Rear set VGs
	10-13	0	120	20	2501-2504	α: -4 to 8	-		
	14-15	0	120	20	2505-2506	ΔX_{lat}	-		
	16-21	0	120	40	2507-2511	α: -4 to 8	-		
45	3-8	0	120	0	2514-2519	α: -4 to 11	-	1:25	Low drag VGs
	9-14	0	120	40	2520-2525	α: -4 to 8	-		
	15-19	30	140	40	2526-2531	α: -4 to 8	-		
	20-25	90	80	40	2532-2539	α: -4 to 12	-		
46	5-9	0	120	0	2539-2543	α: -4 to 10	-	:25	Nose boom, pylon strake, tab flap, fuel line removed
	10-13	0	120	40	2544-2547	α: -4 to 8	-		
47	3-7	0	120	0	2548-2552	α: -4 to 10	-	:25	Gaps taped
	8-11	0	120	40	2553-2556	α: -4 to 8	-		
48	3-5	-	80	40	2560-2562	i_N = 0 to 90	-4	1:10	Large nacelle strake 15 x 52"
	6-16	60	120	40	2563-2573	α = -4 to 10	-		
	17-21	60	120	40	2574-2578	ψ = -6 to +8	+6		
	22-26	0	120	40	2579-2583	ψ = -4 to +12	+6		
49	3	0	120	40	2586	-	-4	:25	Large nacelle strake 15 x 67" wing fence 12"
	4-8	60	120	40	2587-2591	α = -4 to +8	-		

TABLE IV.- Concluded.
(Rotors off)

Run no.	Pt no.	i_N	V_{knots}	δ_F	Cntr	Sweep	α trim	Run time	Remarks
50	3-13	60	120	40	2592-2603	α = -4 to +8	-	:30	Removed wing fence
51	3-10	0	120	0	-	α = -4 to +10	-	:30	Removed strake, VGs, strut, gaps taped
52	-	-	-	-		tunnel tare	-	-	

TABLE V.– SCALE DATA

RUN 3 TEST 525

PT	VELO / QBSF / MACH / TEMP / KNOTS	ACFS / PSI / [illegible] / RHO / RPM	[illegible] / REF POS / LONG STR / LAT STR / POS CENT	LIFT / LIFT / LIFT/Q / / CL	DRAG / DRAG / DRAG/Q / FE / CD	SIDE / SIDE / SIDE/Q / / CY	PITCH / PITCH / PITCH/Q / / CM	YAW / YAW / YAW/Q / / CN	ROLL / ROLL / ROLL/Q / / CROLL
2	82.3	-32.0	90.0	-1025.	1462.	-12.	5573.	76.	344.
	21.0	0.0	50.0	-1025.	1462.	-12.	5573.	76.	344.
	0.121		50.0	-1076.	1535.	-13.	5174.	82.	360.
	90.	0.2220	50.0		64.25				
	681.1	0.9380	50.1	-0.2592	0.3771	-0.0031	0.4207	0.0058	0.0026
3	80.3	-6.0	90.0	195.	1262.	-32.	6645.	176.	432.
	20.5	0.0	50.0	195.	1262.	-32.	6645.	176.	432.
	0.118		50.0	150.	1152.	-34.	7151.	184.	464.
	93.	0.2229	50.0		52.25				
	683.0	0.9293	50.0	0.3395	0.3000	-0.0087	0.3447	0.0045	0.0037
4	80.1	-4.0	90.0	1310.	1269.	-26.	6425.	87.	425.
	25.2	0.0	50.0	1310.	1269.	-26.	6425.	87.	425.
	0.117		50.0	1411.	1387.	-28.	6905.	93.	457.
	93.	0.2209	50.0		53.46				
	683.0	0.9293	50.0	0.3588	0.3530	-0.0055	0.3349	0.0017	0.0036
5	80.0	-2.0	90.0	1905.	1230.	10.	5957.	-114.	405.
	20.1	0.0	50.0	1905.	1230.	10.	5957.	-114.	405.
	0.117		50.0	2050.	1324.	11.	6410.	-123.	544.
	93.	0.2209	50.0		51.66				
	683.0	0.9293	50.0	0.5221	0.3373	0.0027	0.3107	-0.0030	0.0040
6	80.3	0.0	90.0	2470.	1292.	23.	5561.	-175.	433.
	20.3	0.0	50.0	2470.	1292.	23.	5561.	-175.	433.
	0.118		49.9	2663.	1393.	25.	5760.	-189.	466.
	94.	0.2205	50.0		65.14				
	683.6	0.9276	50.0	0.6733	0.3522	0.0063	0.2781	-0.0015	0.0037
7	80.2	2.0	90.0	2985.	1302.	13.	4706.	144.	550.
	20.2	0.0	50.0	2985.	1302.	13.	4706.	144.	650.
	0.118		50.0	3215.	1404.	14.	5073.	155.	402.
	94.	0.2205	50.0		64.39				
	683.6	0.9276	50.1	0.8156	0.3557	0.0036	0.2407	0.0012	0.0071
8	80.2	4.0	90.0	3530.	1364.	-21.	3936.	376.	775.
	20.2	0.0	50.0	3530.	1364.	-21.	3936.	376.	775.
	0.118		50.0	3845.	1470.	-23.	4243.	405.	856.
	94.	0.2205	50.1		67.45				
	683.6	0.9276	50.0	0.9645	0.3727	-0.0057	0.2046	0.0032	0.0066
9	80.4	6.0	90.0	4415.	1522.	-17.	1408.	226.	486.
	20.3	0.0	50.0	4415.	1522.	-17.	1408.	226.	486.
	0.118		50.0	4766.	1644.	-18.	1521.	244.	527.
	95.	0.2201	50.0		75.69				
	684.2	0.9259	50.0	1.2034	0.4149	-0.0046	0.0750	0.0019	0.0041
10	80.3	12.0	90.0	4890.	1755.	47.	-1715.	-159.	408.
	20.2	0.0	50.0	4890.	1755.	47.	-1715.	-159.	405.
	0.117		49.7	5290.	1931.	51.	-1655.	-172.	442.
	96.	0.2197	50.0		86.48				
	684.6	0.9243	50.0	1.3342	0.4889	0.0124	-0.0894	-0.0014	0.0035
11	80.1	13.0	90.0	5006.	1864.	34.	-2980.	26.	225.
	20.1	0.0	50.0	5006.	1864.	34.	-2980.	26.	225.
	0.117		49.3	5404.	2036.	37.	-3230.	26.	244.
	96.	0.2197	50.0		93.75				
	684.6	0.9243	50.0	1.3743	0.5178	0.0093	-0.1562	0.0002	0.0019
12	80.2	14.0	90.0	5092.	2002.	64.	-3532.	116.	559.
	20.1	0.0	50.0	5092.	2002.	64.	-3532.	116.	559.
	0.117		49.0	5567.	2165.	69.	-4148.	126.	605.
	96.	0.2197	50.0		99.45				
	684.8	0.9243	50.0	1.3973	0.5495	0.0176	-0.2302	0.0010	0.0049
13	79.6	-8.0	90.0	165.	1260.	-434.	6689.	3954.	-1079.
	19.8	-4.0	50.0	165.	1260.	-434.	6689.	3954.	-1079.
	0.117		49.4	174.	1372.	-471.	7265.	4294.	-1172.
	98.	0.2149	50.0		63.42				
	686.0	0.9208	50.0	0.0460	0.3532	-0.1209	0.3545	0.0342	-0.0095
14	79.9	-6.0	90.0	135.	1254.	-230.	6525.	2030.	-455.
	19.9	-2.0	50.0	135.	1254.	-230.	6525.	2030.	-455.
	0.117		49.4	147.	1362.	-250.	7089.	2205.	-494.
	98.	0.2188	50.0		62.49				
	686.0	0.9204	50.0	0.0375	0.3480	-0.0638	0.3446	0.0175	-0.0039
15	80.0	-8.0	90.0	115.	1244.	191.	6959.	-1802.	1116.
	19.9	2.0	50.0	115.	1244.	191.	6959.	-1802.	1116.
	0.117		49.6	125.	1352.	208.	7561.	-1958.	1212.
	98.	0.2188	50.0		62.41				
	686.0	0.9204	50.0	0.0319	0.3498	0.0529	0.3671	-0.0155	0.0096
16	80.0	-8.0	90.0	120.	1261.	383.	6992.	-3710.	1964.
	19.9	4.0	50.1	120.	1261.	383.	6992.	-3710.	1964.
	0.117		49.6	130.	1370.	416.	7597.	-4030.	2134.
	98.	0.2188	50.0		63.28				
	686.0	0.9204	50.0	0.0333	0.3545	0.1062	0.3697	-0.0320	0.0169
17	79.9	-8.0	90.0	105.	1301.	774.	7322.	-7435.	2437.
	19.9	8.0	50.0	105.	1301.	774.	7322.	-7435.	2437.
	0.117		49.6	114.	1413.	841.	7955.	-8074.	3149.
	98.	0.2188	50.1		65.33				
	686.0	0.9204	50.0	0.0291	0.3610	0.2148	0.3867	-0.0641	0.0255
18	79.8	-8.0	90.0	85.	1374.	1157.	6700.	-10049.	4224.
	19.8	12.0	50.0	85.	1374.	1157.	6700.	-10049.	4224.
	0.116		49.8	93.	1495.	1259.	7308.	-10924.	4594.
	99.	0.2184	50.0		69.37				
	686.7	0.9189	50.0	0.0237	0.3831	0.3226	0.3603	-0.0910	0.0366
19	80.5	-8.0	90.0	-11.	1497.	1476.	6420.	-13517.	5500.
	20.1	16.0	50.0	-11.	1497.	1476.	6420.	-13517.	5500.
	0.117		49.8	-11.	1624.	1604.	6994.	-15040.	5995.
	99.	0.2184	50.1		74.56				
	686.7	0.9187	50.0	-0.0028	0.4139	0.4087	0.3565	-0.1142	0.0471

TABLE V.— Continued.

RUN 3 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALPHA,C PSI RHO*100 RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,C LIFT LIFT/Q CL	DRAG,C DRAG DRAG/Q FE CD	SIDE,C SIDE SIDE/Q CY	PITCH,C PITCH PITCH/Q CM	YAW,C YAW YAW/Q CN	ROLL,C ROLL ROLL/Q CROLL
20	80.2	-8.0	90.0	-80.	1274.	-22.	10754.	7.	533.
	20.0	0.0	50.0	-80.	1274.	-22.	10754.	77.	533.
	0.117		24.6	-67.	384.	-24.	11136.	64.	561.
	100.	0.2184	49.3		83.44				
	687.3	0.9171	50.0	-0.0221	0.3527	-0.0061	0.5670	0.0007	0.0046
21	80.2	-8.0	90.0	350.	1220.	-23.	2724.	242.	558.
	20.0	0.0	50.0	350.	1220.	-23.	2724.	242.	558.
	0.117		69.1	362.	1330.	-25.	2475.	254.	600.
	100.	0.2180	49.7		61.06				
	687.3	0.9171	50.0	0.0465	0.3373	-0.0054	0.1436	0.0061	0.0048
22	80.1	-8.0	90.0	130.	1249.	-52.	6251.	-138.	2345.
	19.9	0.0	50.0	130.	1249.	-52.	6251.	-138.	2345.
	0.117		49.9	142.	1362.	-57.	6815.	-151.	2557.
	100.	0.2180	60.		52.56				
	687.3	0.9172	50.0	0.0360	0.3462	-0.0144	0.3247	-0.0012	0.0202
23	81.2	-8.0	90.0	30.	1261.	-70.	6561.	20.	4330.
	20.3	0.0	50.0	30.	1261.	-70.	6561.	20.	4330.
	0.117		49.4	33.	1375.	-76.	7159.	22.	4721.
	100.	0.2180	65.0		63.11				
	687.3	0.9171	50.0	0.0083	0.3487	-0.0194	0.3456	0.0002	0.0372
24	80.2	-8.0	90.0	155.	1249.	-163.	6664.	3280.	-585.
	20.0	0.0	71.0	155.	1249.	-163.	6664.	3280.	-578.
	0.117		50.0	169.	1362.	-178.	7240.	3583.	-634.
	100.	0.2180	50.1		62.51				
	687.3	0.9171	50.0	0.0429	0.3454	-0.0451	0.3477	0.0282	-0.0050
25	80.2	-8.0	90.0	135.	1263.	-265.	7018.	5947.	-1782.
	20.0	0.0	91.0	135.	1263.	-265.	7018.	5947.	-1782.
	0.117		50.0	147.	1377.	-289.	7652.	6534.	-1943.
	100.	0.2180	50.1		63.29				
	687.3	0.9171	49.9	0.0374	0.3496	-0.0734	0.3597	0.0516	-0.0153

RUN 5 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALPHA,C PSI RHO*100 RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,C LIFT LIFT/Q CL	DRAG,C DRAG DRAG/Q FE CD	SIDE,C SIDE SIDE/Q CY	PITCH,C PITCH PITCH/Q CM	YAW,C YAW YAW/Q CN	ROLL,C ROLL ROLL/Q CROLL
2	60.7	-12.0	90.0	115.	943.	29.	4607.	-50.	-52.
	11.6	0.0	50.0	115.	943.	29.	4607.	-50.	-52.
	0.089		50.0	123.	1011.	31.	5065.	-53.	-56.
	93.	0.2216	50.0		81.17				
	683.0	0.9324	50.0	0.0547	0.4484	0.0138	0.4423	-0.3003	-0.0008
3	60.9	-8.0	90.0	750.	920.	12.	4237.	-204.	-89.
	11.7	0.0	50.0	750.	920.	12.	4237.	-204.	-89.
	0.089		50.0	804.	987.	13.	4544.	-219.	-95.
	93.	0.2216	50.0		75.76				
	683.0	0.9323	50.0	0.3544	0.4348	0.0057	0.3602	-0.0030	-0.0013
4	61.0	-4.0	90.0	1360.	918.	8.	3463.	-257.	-306.
	11.6	0.0	50.0	1360.	918.	8.	3463.	-257.	-306.
	0.090		50.0	1459.	985.	8.	[illegible]	-276.	-328.
	93.	0.2216	50.0		76.04				
	683.0	0.9323	50.0	0.6387	0.4312	0.0026	0.3542	-0.0036	-0.0045
5	60.5	-2.0	90.0	1660.	893.	21.	3737.	-114.	-130.
	11.5	0.0	50.0	1660.	893.	21.	3737.	-114.	-130.
	0.088		50.0	1784.	959.	23.	4015.	-122.	-149.
	94.	0.2212	50.0		77.64				
	683.0	0.9307	50.0	0.7945	0.4301	0.0101	0.3625	-0.0017	-0.0021
6	60.5	0.0	90.0	1970.	927.	14.	3291.	-147.	-29.
	11.4	0.0	50.0	1970.	927.	14.	3291.	-147.	-29.
	0.088		50.0	2117.	975.	15.	3538.	-158.	-31.
	94.	0.2212	50.0		74.23				
	683.0	0.9307	50.0	0.9502	0.4377	0.0068	0.3325	-0.0022	-0.0004
7	60.5	2.0	90.0	2230.	936.	5.	2828.	-355.	53.
	11.5	0.0	50.0	2230.	936.	5.	2828.	-355.	53.
	0.088		50.0	2396.	1006.	5.	3038.	-380.	57.
	94.	0.2212	50.0		[illegible]				
	683.0	0.9307	50.0	1.0740	0.4508	0.0024	0.2541	-0.0054	0.0008
8	60.4	4.0	90.0	2515.	973.	12.	2333.	-327.	-20.
	11.5	0.0	50.0	2515.	973.	12.	2333.	-327.	-20.
	0.088		50.0	2702.	1045.	13.	2507.	-351.	-21.
	94.	0.2212	50.0		84.64				
	683.0	0.9307	50.0	1.2087	0.4676	0.0056	0.2134	-0.0049	-0.0003
9	60.5	6.0	90.0	3035.	1051.	33.	1315.	-31.	-25.
	11.4	0.0	50.0	3035.	1051.	33.	1315.	-31.	-25.
	0.088		50.0	3267.	1131.	36.	1419.	-41.	-27.
	95.	0.2208	50.1		91.41				
	684.2	0.9291	50.0	1.4688	0.5072	0.0159	0.1204	-0.0020	-0.0004
10	60.4	8.0	90.0	3140.	1215.	38.	-745.	80.	85.
	11.5	0.0	50.0	3140.	1215.	38.	-745.	83.	85.
	0.088		50.0	3380.	1308.	41.	-802.	44.	91.
	95.	0.2208	50.1		105.47				
	684.2	0.9290	50.0	1.5122	0.5851	0.0183	-0.0362	0.0013	0.0013
11	60.5	10.0	90.0	3265.	1290.	33.	-1517.	294.	-404.
	11.5	0.0	50.0	3265.	1290.	33.	-1517.	294.	-404.
	0.088		49.9	3450.	1389.	36.	-1633.	[illegible]	-432.
	95.	0.2208	50.1		112.21				
	684.2	0.9290	50.0	1.5941	0.6199	0.0159	[illegible]	[illegible]	-0.0002

TABLE V.— Continued.

RUN 5 TEST 525

PT	VKTS QPSF RUN TEMP VSNDKTS	ALFS,C PSI RHO*100 RHOR	IxA REF POS LONG STA LAT STA POW LEV	LIFT,O LIFT LIFT/Q CL	DRAG,O DRAG DRAG/Q FE CD	SIDE,O SIDE SIDE/Q CY	PITCH,O PITCH PITCH/Q CM	YAW,O YAW YAW/Q CN	ROLL,O ROLL ROLL/Q CROLL
12	60.4	14.?	90.0	3,33?.	1382.	17.	-2562.	114.	-759.
	11.5	3.?	50.?	3,33?.	1382.	17.	-2562.	114.	-759.
	0.088		49.6	3364.	1488.	18.	-2765.	122.	-8??.
	95.	0.2204	50.?		120.47				
	684.2	0.9240	50.0	1.5078	0.5656	0.1042	-0.2371	0.0017	-0.0???
13	60.6	-?.?	90.?	735.	9??.	-235.	4824.	2315.	-1040.
	11.5	-4?.?	50.2	735.	9??.	-235.	4824.	2315.	-10??.
	0.089		49.?	741.	980.	-231.	4977.	2491.	-1119.
	95.	0.2208	5?.?		24.82				
	680.2	0.924?	50.0	0.3517	0.4355	-0.1115	0.0211	0.1344	-0.0??5
14	60.4	-5.0	90.0	740.	54?.	-127.	4625.	1164.	-541.
	11.5	-7.0	50.2	740.	54?.	-127.	4625.	1164.	-541.
	0.088		44.9	744.	464.	-137.	4987.	1261.	-422.
	96.	0.2204	50.1		22.43				
	684.8	0.9274	50.0	0.3562	0.2375	-0.0612	0.4215	0.0175	-0.0159
15	60.4	-5.0	90.0	735.	84?.	123.	4844.	-1326.	445.
	11.4	2.0	50.?	735.	85?.	123.	4844.	-1326.	445.
	0.088		50.0	741.	96?.	133.	5224.	-14?3.	48?.
	96.	0.2204	50.2		22.75				
	684.8	0.9274	50.0	0.3547	0.4295	0.0594	0.4454	-0.0???	[illegible]
16	60.4	-5.0	90.0	720.	90?.	247.	4764.	-252?.	826.
	11.5	4.0	50.2	720.	90?.	247.	4764.	-252?.	826.
	0.088		50.0	776.	970.	266.	5142.	-2719.	893.
	96.	0.2204	50.1		18.45				
	684.8	0.9274	50.0	0.3466	0.4338	0.1190	0.4376	-0.0377	0.0?24
17	60.4	-?.?	90.0	680.	917.	447.	4436.	-4556.	1327.
	11.4	8.0	50.1	680.	917.	447.	4436.	-4556.	1327.
	0.088		50.0	735.	984.	482.	5525.	-4915.	1415.
	96.	0.2204	50.?		88.1?				
	684.8	0.9274	50.0	0.3282	0.4426	0.2157	0.4555	-0.0???	[illegible]
18	60.0	-8.0	90.0	615.	950.	632.	4576.	-6241.	2180.
	11.3	12.0	50.2	615.	955.	632.	4576.	-6241.	2199.
	0.088		50.0	664.	1026.	685.	4943.	-6745.	2341.
	97.	0.2200	50.?		84.24				
	685.4	0.9258	50.0	0.3013	0.4654	0.3096	0.4260	-0.0456	-0.0??0
19	60.3	-8.0	90.0	545.	1038.	723.	4675.	-694?.	2238.
	11.4	16.0	50.?	545.	1038.	723.	4675.	-694?.	2238.
	0.088		50.0	585.	1121.	781.	5050.	-750?.	243?.
	97.	0.2200	50.2		41.06				
	685.4	0.9257	50.0	0.264?	0.5031	0.3504	0.4312	-0.1047	0.0???
20	60.7	-8.0	90.0	730.	898.	-15.	4431.	-21?.	-15.
	11.5	0.0	50.?	730.	898.	-15.	4431.	-21?.	-15.
	0.089		50.0	789.	965.	-16.	4787.	-227.	48?.
	97.	0.2200	65.2		22.81				
	685.4	0.9257	50.0	0.3495	0.4298	-0.0072	0.4035	-0.003?	0.00?2
21	60.7	-6.0	90.0	645.	866.	-42.	4357.	-411.	13??.
	11.5	0.0	50.?	645.	866.	-42.	4357.	-411.	1303.
	0.089		50.0	697.	957.	-45.	4707.	-444.	1404.
	97.	0.2200	65.?		26.76				
	685.4	0.9257	50.0	0.3067	0.4200	-0.0201	0.39??	-0.00??	0.0???

RUN 6 TEST 525

PT	VKTS QPSF RUN TEMP VSNDKTS	ALFS,C PSI RHO*100 RHOR	IxA REF POS LONG STA LAT STA POW LEV	LIFT,O LIFT LIFT/Q CL	DRAG,O DRAG DRAG/Q FE CD	SIDE,O SIDE SIDE/Q CY	PITCH,O PITCH PITCH/Q CM	YAW,O YAW YAW/Q CN	ROLL,O ROLL ROLL/Q CROLL
5	159.4	-?.?	0.0	1035.	1954.	55.	21962.	3584.	2915.
	79.9	0.0	50.?	1035.	1954.	55.	21962.	3584.	2915.
	0.237		44.4	1122.	2116.	60.	23724.	385?.	3150.
	87.	0.2193	49.?		24.47				
	679.2	0.9225	49.?	0.0716	0.1352	0.0044	0.2644	0.1077	0.0363
6	160.2	-2.?	0.0	3695.	1787.	-41.	17935.	3975.	5832.
	79.9	0.0	50.?	3695.	1787.	-41.	17935.	3975.	5832.
	0.237		49.?	402?.	1944.	-45.	195??.	4325.	6?51.
	88.	0.2165	49.?		22.3?				
	680.5	0.919?	49.?	0.255?	0.1237	-0.0028	0.2362	[illegible]	[illegible]
7	160.2	0.0	0.0	6135.	1740.	-64.	15139.	3608.	[illegible]
	79.7	0.0	50.?	6135.	1740.	-64.	15139.	3608.	[illegible]
	0.237		49.?	6667.	1890.	-?5.	1650?.	3933.	57??.
	9?.	0.21??	4?.?		21.63				
	681.?	0.9175	49.?	0.4253	0.12??	[illegible]	0.1???	[illegible]	[illegible]
8	160.6	0.0	0.0	8866.	17??.	-6?.	10???	[illegible]	
	79.9	0.0	50.?	8866.	17??.	-6?.	10???	[illegible]	
	0.237		49.?	9675.	[illegible]	[illegible]	[illegible]		
	91.	0.21??	[illegible]		21.??				
	681.7	0.9158	49.4	0.6125	0.12??	[illegible]	[illegible]		
9	160.8	0.0	0.0	11535.	1833.	[illegible]	[illegible]	[illegible]	[illegible]
	80.3	0.0	50.0	11535.	1833.	[illegible]	[illegible]	[illegible]	[illegible]
	0.237		49.?	12519.	2005.	[illegible]	[illegible]	[illegible]	[illegible]
	92.	0.2175	49.?		22.41				
	682.3	0.914?	49.?	0.7964	0.1268	[illegible]	[illegible]	[illegible]	[illegible]

TABLE V.— Continued

RUN 6 TEST 525

PT	KNTS / QPSF / MACH / TEMP / KSNOTS	ALPHA / PSI / [illegible] / MACHINE / RHO	[illegible] / PET POS / LONG STA / LAT STA / POP LEV	LIFT / LIFT / LIFT/ZB / CL	DRAG / DRAG / DRAG/ZB / FE / CD	SIDE / SIDE / SIDE/ZB / CY	PITCH / PITCH / PITCH/ZB / CM	YAW / YAW / YAW/ZB / CN	ROLL / ROLL / ROLL/ZB / CROLL
10	161.2	8.0	0.0	16025.	2225.	-32.	[illegible]	1963.	5534.
	80.3	0.0	50.1	16025.	2225.	-32.	-25[illegible]	1963.	5534.
	0.238		49.9	17565.	2459.	-35.	-3[illegible]	2066.	6066.
	95.	0.2164	50.0		27.78				
	683.0	0.9123	49.8	1.1030	0.1531	-0.0022	-0.0384	0.0064	0.0110
11	121.5	-4.0	0.0	585.	1096.	4.	[illegible]	1536.	2200.
	46.3	0.0	50.2	585.	1096.	4.	[illegible]	1536.	2200.
	0.179		49.1	632.	1187.	10.	12335.	1600.	2379.
	92.	0.2199	50.0		23.70				
	682.3	0.9251	49.7	0.0698	0.1309	0.0011	0.2589	0.0057	0.0082
12	121.4	-2.0	0.0	1970.	1024.	-8.	9795.	1679.	2402.
	46.5	0.0	50.1	1970.	1024.	-8.	9795.	1679.	2402.
	0.179		49.0	2133.	1107.	-9.	10588.	1815.	2597.
	92.	0.2199	50.0		22.03				
	682.3	0.9250	49.7	0.2391	0.1277	-0.0010	0.2235	0.0062	0.0089
13	122.0	0.0	0.0	3475.	976.	-45.	7007.	2027.	2656.
	46.7	0.0	50.2	3475.	976.	-45.	7007.	2027.	2656.
	0.180		49.1	3750.	1051.	-49.	6495.	2187.	2901.
	91.	0.2203	50.0		21.07				
	681.7	0.9266	49.7	0.4113	0.1153	-0.0053	0.1717	0.0075	0.0099
14	122.[illegible]	2.0	0.0	4935.	966.	-28.	4932.	1566.	4155.
	46.7	0.0	50.[illegible]	4935.	966.	-28.	4932.	1566.	4155.
	0.180		49.[illegible]	5326.	1045.	-3[illegible].	5323.	1690.	4484.
	91.	0.2203	50.0		20.72				
	681.7	0.9266	49.7	0.5836	0.1145	-0.0033	0.1110	0.0058	0.0153
15	121.9	4.0	0.0	6245.	1016.	-30.	37[illegible]	1486.	3651.
	46.6	0.0	50.1	6245.	1016.	-30.	37[illegible]	1486.	3651.
	0.179		49.1	6739.	1099.	-32.	[illegible]	1603.	3940.
	91.	0.2203	50.0		21.85				
	681.7	0.9267	49.6	0.7406	0.1207	-0.0036	0.0837	0.0055	0.0135
16	121.4	6.0	0.0	8750.	1226.	-24.	-2648.	1076.	3891.
	46.3	0.0	50.2	8750.	1226.	-24.	-2648.	1076.	3891.
	0.179		49.0	9441.	1323.	-26.	-2654.	1161.	4198.
	91.	0.2203	50.1		26.50				
	681.7	0.9268	49.7	1.0450	0.1464	-0.0029	-0.0632	0.0040	0.0144
17	120.8	12.0	0.0	10155.	1597.	-17.	-9194.	160.	2376.
	45.8	0.0	50.0	10155.	1597.	-17.	-9194.	160.	2376.
	0.176		48.9	10956.	1723.	-16.	-9919.	172.	2565.
	91.	0.2203	50.0		34.65				
	681.7	0.9269	49.7	1.2240	0.1925	-0.0020	-0.2110	0.0006	0.0089
18	161.2	-4.0	0.0	7950.	2461.	-171.	22970.	2443.	1901.
	80.0	0.0	50.1	7950.	2461.	-171.	22970.	2443.	1901.
	0.237		46.9	8745.	2707.	-188.	25266.	2686.	2157.
	95.	0.2161	50.1		30.75				
	684.2	0.9091	49.7	0.5089	0.1699	-0.0116	0.3015	0.0052	0.0042
19	161.2	-2.0	0.0	10795.	2460.	-163.	21285.	1510.	1237.
	80.0	0.0	50.1	10795.	2460.	-163.	21285.	1510.	1237.
	0.237		49.0	11874.	2706.	-179.	23412.	1661.	1358.
	95.	0.2161	50.1		30.76				
	684.2	0.9091	49.6	0.7457	0.1699	-0.0113	0.2798	0.0032	0.0026
20	161.1	0.0	0.0	13555.	2526.	-146.	18201.	2299.	3312.
	79.8	0.0	50.1	13555.	2526.	-146.	18201.	2299.	3312.
	0.237		49.0	14930.	2783.	-161.	20055.	2533.	3649.
	96.	0.2157	50.0		31.67				
	684.8	0.9075	49.6	0.9388	0.1750	-0.0101	0.2349	0.0049	0.0071
21	161.4	2.0	0.0	16445.	2736.	-183.	14232.	2215.	1640.
	79.9	0.0	50.1	16445.	2736.	-183.	14232.	2215.	1640.
	0.237		48.9	18153.	2487.	-202.	5710.	2446.	1800.
	97.	0.2153	50.[illegible]		33.86				
	685.4	0.9059	49.6	1.1369	0.1871	-0.0127	0.1872	0.0048	0.0036
22	161.6	4.0	0.0	19205.	2940.	-167.	10900.	1452.	2291.
	79.9	0.0	50.1	19205.	2940.	-167.	10900.	1452.	2291.
	0.237		49.0	21246.	3252.	-185.	12[illegible]	[illegible]	253[illegible]
	98.	0.2149	50.0		36.70				
	686.0	0.9039	49.6	1.3274	0.2032	-0.0115	[illegible]	0.0042	[illegible]
23	162.0	8.0	0.0	23845.	3730.	-258.	-2766.	150[illegible].	613.
	80.1	0.0	50.1	23845.	3730.	-258.	-2766.	150[illegible].	613.
	0.237		49.[illegible]	26420.	4141.	-285.	-3[illegible]	2[illegible]	[illegible]
	99.	0.2145	50.1		46.65				
	686.7	0.9023	49.5	1.6442	0.2576	-0.0183	-0.0363	0.0040	0.0017
24	104.4	-4.0	0.0	3625.	1074.	-52.	[illegible]	1213.	1165.
	37.9	0.0	50.1	3625.	1074.	-52.	[illegible]	1213.	1165.
	0.162		49.1	3963.	1156.	-55.	[illegible]	1306.	1256.
	91.	0.2202	50.1		28.36				
	681.7	0.9266	49.5	0.5277	0.1564	[illegible]	0.2829	0.0055	0.0054
25	104.4	-2.0	0.0	4920.	1073.	-71.	4535.	1057.	1140.
	37.9	0.0	50.1	4920.	1073.	-71.	4535.	1057.	1140.
	0.162		49.1	5297.	1155.	-76.	[illegible]	1136.	1255.
	91.	0.2204	50.0		28.27				
	681.7	0.9268	49.5	0.7161	0.1562	-0.0103	[illegible]	0.0048	0.0052
26	104.4	0.0	0.0	6135.	1146.	-87.	7451.	705.	1115.
	37.9	0.0	50.1	6135.	1146.	-87.	7451.	705.	1116.
	0.162		49.1	6695.	1234.	-72.	8021.	845.	1201.
	91.	0.2208	50.[illegible]		30.22				
	681.7	0.9269	49.5	0.8937	0.1669	[illegible]	0.2063	0.0030	0.0051
27	104.8	2.0	0.0	7470.	1209.	-105.	5043.	1552.	884.
	37.9	0.0	50.1	7476.	1209.	-105.	5043.	1552.	884.
	0.162		49.1	8042.	1302.	-113.	5545.	1450.	952.
	91.	0.2208	50.1		31.50				
	681.7	0.9269	49.5	1.0862	0.1761	[illegible]	[illegible]	0.0701	[illegible]

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TABLE V.— Continued.

RUN 6 TEST 525

PT	VAIS / QPSF / MACH / TEMP / VSNDKTS	ALPHA,C / PSI / — / RHO,LOC / RHOR	INA / PED POS / LONG STK / LAT STK / POW LEV	LIFT,O / LIFT / LIFT/B / — / CL	DRAG,O / DRAG / DRAG/B / FE / CD	SIDE,O / SIDE / SIDE/B / — / CY	PITCH,O / PITCH / PITCH/B / — / CM	YAW,O / YAW / YAW/B / — / CN	ROLL,O / ROLL / ROLL/B / — / CROLL
28	104.9	0.0	0.0	8680.	1391.	-76.	5825.	1020.	1144.
	38.0	0.0	50.1	8680.	1391.	-76.	5825.	1020.	1144.
	0.162		49.1	9302.	1444.	-42.	6116.	1094.	1176.
	91.	0.2204	50.1		35.31				
	681.7	0.9288	49.5	0.2571	0.1951	-0.0111	0.1659	0.0046	0.0049
29	110.1	0.0	0.0	10774.	1668.	-119.	-1925.	857.	874.
	38.1	0.0	50.1	10777.	1668.	-119.	-1925.	867.	874.
	0.162		49.1	11596.	1796.	-126.	-2474.	933.	944.
	91.	0.2204	50.1		45.74				
	681.7	0.9288	49.5	0.5622	0.2919	-0.0173	-0.0533	0.0234	[illegible]

RUN 7 TEST 525

PT	VAIS / QPSF / MACH / TEMP / VSNDKTS	ALPHA,C / PSI / — / RHO,LOC / RHOR	INA / PED POS / LONG STK / LAT STK / POW LEV	LIFT,O / LIFT / LIFT/B / — / CL	DRAG,O / DRAG / DRAG/B / FE / CD	SIDE,O / SIDE / SIDE/B / — / CY	PITCH,O / PITCH / PITCH/B / — / CM	YAW,O / YAW / YAW/B / — / CN	ROLL,O / ROLL / ROLL/B / — / CROLL
4	93.7	0.0	0.0	2245.	587.	-20.	4798.	1403.	1926.
	32.3	0.0	50.1	2245.	637.	-21.	4799.	1403.	1926.
	0.149		50.1	2376.	674.	-21.	4967.	1455.	1994.
	71.	0.2290	50.0		19.90				
	669.2	0.9680	49.8	0.3499	0.1099	-0.0034	0.1551	0.0074	0.0132
5	131.4	0.0	0.0	4090.	1139.	-32.	8671.	2183.	2855.
	55.5	0.0	50.1	4090.	1139.	-32.	8671.	2183.	2855.
	0.196		50.1	4306.	1200.	-34.	9134.	2299.	2985.
	76.	0.2256	50.1		20.54				
	672.6	0.9493	49.7	0.6075	0.1135	-0.0032	0.1646	0.0068	0.0088
6	158.7	0.0	0.0	6015.	1718.	-76.	13547.	4455.	5717.
	79.4	0.0	50.3	6015.	1718.	-76.	13547.	4455.	5717.
	0.236		50.3	6464.	1846.	-82.	14559.	4787.	6144.
	52.	0.2212	50.1		21.65				
	676.1	0.9305	49.4	0.4197	0.1196	-0.0053	0.1795	0.0046	0.0124
7	176.7	0.0	0.0	7570.	2154.	-21.	18086.	4579.	5716.
	95.6	0.0	51.0	7570.	2154.	-21.	18086.	4579.	5716.
	0.263		50.4	8365.	2380.	-23.	19985.	5060.	6317.
	94.	0.2151	50.2		22.52				
	683.5	0.9050	49.4	0.4379	0.1294	-0.0012	0.1988	0.0052	0.0103

RUN 5 TEST 525

PT	VAIS / QPSF / MACH / TEMP / VSNDKTS	ALPHA,C / PSI / — / RHO,LOC / RHOR	INA / PED POS / LONG STK / LAT STK / POW LEV	LIFT,O / LIFT / LIFT/B / — / CL	DRAG,O / DRAG / DRAG/B / FE / CD	SIDE,O / SIDE / SIDE/B / — / CY	PITCH,O / PITCH / PITCH/B / — / CM	YAW,O / YAW / YAW/B / — / CN	ROLL,O / ROLL / ROLL/B / — / CROLL
3	79.7	0.0	40.0	2375.	1284.	27.	5538.	443.	701.
	20.5	0.0	50.1	2375.	1284.	27.	5638.	443.	701.
	0.118		50.0	2491.	1347.	28.	5915.	442.	735.
	80.	0.2260	50.0		62.05				
	674.9	0.9535	50.1	0.6905	0.3463	0.0073	0.2443	[illegible]	[illegible]
4	117.2	0.0	40.0	4950.	2867.	24.	13240.	427.	1273.
	55.3	0.0	50.1	4950.	2867.	24.	13240.	427.	1273.
	0.175		50.0	5244.	3038.	25.	14028.	452.	1348.
	81.	0.2243	50.0		64.08				
	675.5	0.9439	50.1	0.6170	0.3574	0.0030	0.3141	0.0047	0.0049
5	111.2	0.0	0.0	6420.	1190.	-21.	8098.	721.	758.
	39.5	0.0	50.0	6420.	1190.	-21.	8098.	721.	758.
	0.165		50.0	6824.	1266.	-22.	8613.	766.	755.
	84.	0.2235	50.0		50.22				
	677.8	0.9403	51.1	0.9408	0.1670	-0.0029	0.2162	0.0031	0.0032
6	170.2	0.0	0.0	15355.	2887.	-110.	20591.	1778.	2013.
	89.8	0.0	50.0	15355.	2887.	-110.	20591.	1778.	2013.
	0.252		50.0	16778.	3158.	-120.	22224.	1944.	2200.
	89.	0.2175	50.1		32.16				
	680.5	0.9149	50.1	0.9327	0.1777	-0.0068	0.2356	[illegible]	[illegible]
7	172.2	0.0	0.0	7217.	2027.	14.	16745.	3149.	4260.
	90.3	0.0	50.1	7217.	2027.	14.	16745.	3149.	4261.
	0.253		50.0	7925.	2226.	15.	18400.	3402.	4620.
	92.	0.2162	50.1		22.45				
	682.3	0.9097	50.0	0.4413	0.1241	0.0009	0.1950	0.0065	[illegible]
8	141.8	0.0	0.0	7110.	2151.	-52.	13544.	1354.	1578.
	46.5	0.0	50.0	7110.	2151.	-52.	13544.	1354.	1578.
	0.194		50.0	7605.	2351.	-57.	14254.	1452.	1705.
	91.	0.2220	50.0		46.41				
	681.7	0.9254	50.0	0.8449	0.2562	-0.0074	0.2564	0.0043	0.0058
9	158.6	0.0	50.0	[illegible]	4380.	-115.	23076.	2418.	2106.
	80.6	0.0	50.0	[illegible]	4380.	-115.	23076.	2418.	2106.
	0.247		49.4	15552.	4662.	-120.	25016.	[illegible]	2335.
	94.	0.2161	50.0		53.55				
	686.0	0.9009	50.3	0.4913	0.2745	[illegible]	[illegible]	[illegible]	0.0042

TABLE V.— Continued.

RUN 9 TEST 525

PT	[illegible] QPSF [illegible] TEMP [illegible]	[illegible] PSI [illegible] RHOR	[illegible] PED POS LONG STK LAT STK POW LEV	LIFT LIFT LIFT CL	DRAG DRAG DRAG CD	SIDE SIDE SIDE CY	PITCH PITCH PITCH CM	YAW YAW YAW CN	ROLL ROLL ROLL CROLL
3	79.[illegible]	-4.0	0.0	200.	501.	[illegible]	[illegible]	[illegible]	1313.
	21.2	0.0	50.[illegible]	200.	501.	[illegible]	[illegible]	[illegible]	1313.
	0.120		50.2	202.	506.	6.	5010.	[illegible]	1326.
	61.	0.2355	49.3		23.66				
	662.9	0.9908	49.9	0.0522	0.1308	0.0[illegible]	[illegible]	0.0074	0.[illegible]
4	79.9	-2.0	0.0	885.	474.	3.	4561.	443.	1306.
	21.9	0.0	50.1	885.	474.	3.	4561.	443.	1306.
	0.121		50.1	895.	479.	3.	4613.	454.	1323.
	62.	0.2356	49.6		22.18				
	663.5	0.9888	50.0	0.2289	0.1225	0.0008	0.2243	0.0[illegible]	0.0[illegible]
5	80.0	0.0	0.0	1545.	455.	3.	3705.	10[illegible]	1934.
	21.24	0.0	49.3	1545.	455.	3.	3705.	10[illegible]	1934.
	0.121		50.1	1563.	460.	3.	[illegible]	1052.	1956.
	62.	0.2350	49.7		21.22				
	663.5	0.9888	49.9	0.3980	0.1172	0.0008	0.[illegible]	0.0045	0.0155
6	80.1	2.0	0.0	2255.	459.	-4.	2556.	[illegible]	[illegible]
	21.4	0.0	50.5	2255.	459.	-4.	2556.	[illegible]	[illegible]
	0.121		50.2	2285.	465.	-4.	2590.	[illegible]	[illegible]
	63.	0.2346	49.6		21.43				
	664.2	0.9869	50.0	0.5876	0.1189	-0.0010	0.1255	0.0[illegible]	0.0143
7	80.0	4.0	0.0	2920.	484.	-4.	1186.	[illegible]	1905.
	21.4	0.0	49.1	2920.	484.	-4.	1186.	[illegible]	1905.
	0.121		50.0	2958.	490.	-4.	1200.	[illegible]	1929.
	63.	0.2347	49.6		22.62				
	664.2	0.9872	49.9	0.7539	0.1250	-0.0010	0.0534	0.0060	0.0153
8	80.0	6.0	0.0	3630.	524.	-15.	625.	[illegible]	220[illegible]
	21.4	0.0	49.9	3630.	524.	-15.	625.	[illegible]	220[illegible]
	0.121		50.2	3677.	531.	-16.	631.	[illegible]	2229.
	63.	0.2347	49.6		24.49				
	664.2	0.9872	49.9	0.9372	0.1353	-0.0066	0.0106	0.0059	0.0177
9	80.0	8.0	0.0	4270.	583.	-4.	-172.	719.	2444.
	21.3	0.0	49.6	4270.	583.	-4.	-172.	719.	2444.
	0.121		50.1	4333.	592.	-4.	-183.	729.	2480.
	64.	0.2342	49.5		27.34				
	664.8	0.9854	50.2	1.1062	0.1510	-0.0010	-0.0[illegible]	0.0058	0.0197
10	80.0	10.0	0.0	4890.	653.	7.	-1376.	327.	1755.
	21.4	0.0	49.8	4890.	653.	7.	-1376.	327.	1755.
	0.121		5[illegible]	4963.	663.	7.	-1396.	332.	1781.
	64.	0.2342	49.7		30.54				
	664.8	0.9853	50.0	1.2654	0.1690	0.0018	-0.0677	0.0026	0.0[illegible]
11	80.0	12.0	0.0	5480.	733.	12.	-2[illegible].	227.	1527.
	21.3	0.0	50.0	5480.	733.	12.	-2[illegible].	227.	1527.
	0.121		50.1	5561.	744.	12.	-2[illegible].	231.	1550.
	64.	0.2342	49.7		34.37				
	664.8	0.9854	50.0	1.4197	0.1899	0.0031	-0.1082	0.00[illegible]	0.0123
12	80.0	14.0	0.0	6145.	846.	2.	-3861.	210.	1799.
	21.3	0.0	51.1	6145.	846.	2.	-3861.	210.	1799.
	0.121		50.1	6236.	859.	2.	-3939.	213.	1825.
	64.	0.2342	49.7		39.67				
	664.8	0.9856	49.9	1.5919	0.2192	0.0005	-0.19[illegible]	0.0017	0.0145
13	80.0	15.0	0.0	6455.	903.	-2.	-4518.	169.	1231.
	21.3	0.0	50.2	6455.	903.	-2.	-4518.	169.	1231.
	0.121		50.2	6551.	916.	-2.	-4588.	172.	1249.
	64.	0.2342	49.6		42.34				
	664.8	0.9854	49.9	1.6723	0.2339	-0.0005	-0.2228	0.0014	0.0099
14	80.1	16.0	0.0	6370.	1079.	-54.	-5168.	-462.	-1933.
	21.3	0.0	53.7	6370.	1079.	-54.	-5168.	-462.	-1933.
	0.121		50.6	6477.	1092.	-55.	-5250.	-469.	-1965.
	65.	0.2338	49.7		50.30				
	665.4	0.9835	49.9	1.6484	0.2779	-0.0140	-0.2545	-0.0037	-0.0156
15	79.9	-4.0	0.0	2265.	664.	-37.	6324.	594.	656.
	21.3	0.0	50.9	2265.	664.	-37.	6328.	594.	658.
	0.120		50.1	2303.	675.	-39.	6434.	604.	669.
	65.	0.2338	50.0		31.24				
	665.4	0.9835	50.2	0.5888	0.1726	-0.0096	0.3130	0.0048	0.0053
16	80.0	-2.0	0.0	3025.	675.	-33.	5534.	40[illegible]	799.
	21.3	0.0	50.1	3025.	675.	-30.	5534.	40[illegible]	799.
	0.121		50.1	3076.	686.	-31.	56[illegible]	[illegible]	813.
	65.	0.2338	49.6		31.65				
	665.4	0.9835	50.0	0.7837	0.1749	-0.0078	0.2731	0.0033	0.00[illegible]
17	80.1	0.0	0.0	3680.	706.	-24.	4526.	4[illegible]	504.
	21.4	0.0	48.8	3680.	706.	-24.	4526.	4[illegible]	504.
	0.121		50.3	3742.	718.	-24.	4602.	41[illegible]	512.
	65.	0.2338	49.8		32.94				
	665.4	0.9835	49.9	0.9512	0.1820	-0.0062	0.2226	0.0033	0.0040
18	80.1	2.0	0.0	4380.	742.	-41.	3755.	606.	486.
	21.4	0.0	50.3	4380.	742.	-41.	3755.	606.	486.
	0.121		50.2	4435.	754.	-42.	3[illegible]	616.	495.
	65.	0.2335	49.7		34.75				
	665.8	0.9835	49.9	1.1282	0.1920	-0.0106	0.1603	0.0049	0.0039
19	80.2	4.0	0.0	5080.	822.	-43.	1[illegible]	5[illegible]	544.
	21.4	0.0	49.9	5080.	822.	-43.	1[illegible]	5[illegible]	544.
	0.121		50.2	5155.	837.	-44.	1[illegible]	5[illegible]	550.
	66.	0.2333	49.6		38.46				
	666.1	0.9818	49.9	1.3079	0.2125	-0.0111	0.0534	0.0040	0.0044
20	80.1	6.0	0.0	5675.	891.	-27.	[illegible]	37[illegible]	70[illegible]
	21.3	0.0	51.7	5675.	891.	-27.	[illegible]	37[illegible]	70[illegible]
	0.121		5[illegible]	5761.	90[illegible]	-2[illegible]	[illegible]	3[illegible]	713.
	66.	0.2333	49.6		4[illegible].75				
	666.1	0.9818	49.8	1.4702	0.2308	-0.0070	[illegible]	0.0030	0.0056

ORIGINAL PAGE IS OF POOR QUALITY

TABLE V.— Continued.

RUN [illegible] TEST 525

PT	[illegible]	[illegible] PSI	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	[illegible]	[illegible]	[illegible]	[illegible]	CD	[illegible]	CM	CN	[illegible]
21	80.2	[illegible]	[illegible]	6450.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	21.4	0.0	50.5	8750.	97[illegible].	[illegible]	79.	[illegible]	325.
	0.12.		50.2	6571.	[illegible]	[illegible]	81.	553.	[illegible]
	66.	0.2333	49.8		45.76				
	666.1	0.9815	49.6	[illegible]	0.2528	[illegible]	[illegible]	[illegible]	[illegible]
22	80.2	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	335.
	21.[illegible]	0.0	50.[illegible]	7073.	[illegible]	[illegible]	[illegible]	[illegible]	335.
	0.121		50.[illegible]	7203.	[illegible]	[illegible]	[illegible]	321.	[illegible]
	80.	0.2333	49.9		[illegible]				
	666.1	0.9815	49.9	1.8295	0.2975	[illegible]	[illegible]	[illegible]	[illegible]
23	80.2	[illegible]	[illegible]	7940.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	21.[illegible]	0.0	50.[illegible]	7607.	1203.	[illegible]	[illegible]	[illegible]	[illegible]
	0.121		50.[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	31.
	67.	0.2329	49.8		56.55				
	666.7	0.9797	49.9	1.9770	0.3[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
24	80.2	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	21.3	0.0	50.2	7535.	127[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	0.12.		50.1	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	67.	0.2329	50.2		[illegible]				
	666.7	0.9797	49.9	2.0557	0.3293	[illegible]	[illegible]	[illegible]	[illegible]
25	80.1	[illegible]	[illegible]	5075.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	21.3	0.0	50.2	5075.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	0.120		50.[illegible]	5242.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	67.	0.2324	49.7		43.5[illegible]				
	666.7	0.9797	49.9	2.0905	0.3501	[illegible]	[illegible]	[illegible]	[illegible]
26	80.2	0.0	0.0	3705.	693.	[illegible]	[illegible]	[illegible]	[illegible]
	21.[illegible]	0.0	51.3	3705.	693.	[illegible]	[illegible]	488.	[illegible]
	0.121		49.2	3762.	707.	[illegible]	[illegible]	[illegible]	572.
	67.	0.2329	49.7		32.40				
	666.7	0.9797	49.8	0.9587	0.1793	[illegible]	[illegible]	[illegible]	[illegible]
27	80.2	0.0	30.0	3445.	1030.	[illegible]	[illegible]	[illegible]	[illegible]
	21.8	0.0	51.3	3495.	1030.	[illegible]	[illegible]	[illegible]	[illegible]
	0.12.		49.3	3567.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	67.	0.2329	49.9		48.24				
	666.7	0.9797	49.9	0.9000	0.2665	[illegible]	[illegible]	[illegible]	[illegible]
28	80.2	0.0	45.0	[illegible]	1130.	13.	[illegible]	578.	[illegible]
	21.3	0.0	52.3	3410.	1134.	13.	[illegible]	578.	[illegible]
	0.120		49.2	3447.	[illegible]	13.	[illegible]	[illegible]	[illegible]
	88.	0.2324	49.5		33.48				
	667.5	0.9779	49.8	0.8854	0.2955	[illegible]	[illegible]	[illegible]	[illegible]
29	80.3	0.0	55.0	3245.	1344.	39.	[illegible]	[illegible]	[illegible]
	21.[illegible]	0.0	51.3	3295.	1399.	39.	8065.	330.	[illegible]
	0.121		49.3	3316.	1374.	[illegible]	[illegible]	336.	[illegible]
	68.	0.2324	49.7		62.95				
	667.3	0.9779	49.9	0.8397	0.3479	[illegible]	0.3281	[illegible]	[illegible]
30	80.3	0.0	[illegible]	3100.	1399.	29.	[illegible]	[illegible]	559.
	21.4	0.0	51.2	3150.	1399.	29.	[illegible]	[illegible]	559.
	0.12.		49.3	[illegible]	[illegible]	30.	[illegible]	[illegible]	572.
	68.	0.2324	49.8		65.53				
	667.5	0.9779	49.9	0.8177	0.3620	[illegible]	[illegible]	[illegible]	[illegible]
31	80.3	0.0	75.0	2920.	1445.	15.	[illegible]	445.	[illegible]
	21.3	0.0	50.[illegible]	2920.	1445.	15.	[illegible]	445.	[illegible]
	0.121		49.5	2950.	[illegible]	15.	[illegible]	455.	[illegible]
	68.	0.2324	49.8		67.70				
	667.3	0.9779	49.9	0.7565	0.3743	[illegible]	[illegible]	[illegible]	[illegible]
32	108.5	[illegible]	0.0	4225.	1196.	[illegible]	[illegible]	[illegible]	261.
	38.3	0.0	50.0	4225.	1196.	[illegible]	10852.	[illegible]	261.
	0.162		49.6	4387.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	73.	0.2269	49.9		[illegible]				
	670.5	0.9630	50.0	0.6087	0.1723	[illegible]	[illegible]	[illegible]	[illegible]
33	108.3	[illegible]	0.0	5450.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	38.3	0.0	50.2	5950.	1224.	[illegible]	[illegible]	[illegible]	[illegible]
	0.162		49.4	5659.	1271.	[illegible]	[illegible]	[illegible]	[illegible]
	73.	0.2269	49.8		32.[illegible]				
	670.5	0.9631	49.7	[illegible]	0.1768	[illegible]	[illegible]	[illegible]	[illegible]
34	108.5	0.0	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	38.3	0.0	50.[illegible]	[illegible]	1270.	[illegible]	8733.	[illegible]	[illegible]
	0.162		49.6	7630.	1319.	[illegible]	[illegible]	[illegible]	[illegible]
	73.	0.2269	[illegible]		33.[illegible]				
	670.5	0.9630	49.[illegible]	[illegible]	0.1830	[illegible]	[illegible]	[illegible]	0.0033
35	108.5	[illegible]	0.0	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	38.3	0.0	50.[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	983.	[illegible]
	0.162		49.5	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	74.	0.2268	49.[illegible]		[illegible]				
	671.1	0.9616	49.7	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
36	108.4	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	38.2	0.0	50.3	9210.	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	0.162		49.5	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	74.	0.2268	49.8		34.83				
	671.[illegible]	0.9616	49.7	[illegible]	0.2135	[illegible]	[illegible]	[illegible]	[illegible]
37	108.6	[illegible]	[illegible]	10555.	1625.	[illegible]	[illegible]	[illegible]	[illegible]
	38.4	[illegible]	52.[illegible]	10555.	1625.	[illegible]	[illegible]	[illegible]	[illegible]
	0.162		49.4	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	74.	0.2265	49.4		42.35				
	671.1	0.96[illegible]	49.[illegible]	[illegible]	0.23[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
38	108.[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	38.4	0.0	51.[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	0.162		49.4	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
	74.	0.2265	[illegible]		[illegible]				
	671.[illegible]	0.9615	49.5	[illegible]	0.2578	[illegible]	[illegible]	[illegible]	[illegible]

TABLE V.— Continued.

RUN 9 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALFS,C PSI RHOFIXC RHOR	JNA RED POS LONG STA LAT STA POW LEV	LIFT,C LIFT LIFT/S CL	DRAG,C DRAG DRAG/S FE CD	SIDE,C SIDE SIDE/S CY	PITCH,C PITCH PITCH/S CM	YAW,C YAW YAW/S CN	ROLL,C ROLL ROLL/S CROLL
39	108.5	[illegible]	[illegible]	12770.	1981.	-34.	[illegible]	542.	74.
	38.1	0.0	50.4	12770.	1981.	-34.	-2232.	[illegible]	74.
	0.162		49.5	13354.	2472.	-36.	-2124.	529.	92.
	77.	0.2273	49.6		51.48				
	673.0	0.9563	49.8	1.8511	0.2872	-0.0049	-0.056	0.0027	[illegible]
40	109.6	12.0	0.0	13855.	2233.	-52.	-2495.	574.	-858.
	38.5	0.0	50.5	13855.	2233.	-52.	-2495.	574.	-858.
	0.162		49.5	14542.	2355.	-54.	-3331.	745.	-906.
	77.	0.2273	49.6		50.35				
	673.0	0.9561	50.0	1.9915	0.3217	-0.0075	-0.0814	0.0030	-0.0039
41	108.6	13.0	0.0	14531.	2321.	-32.	-4166.	931.	-1172.
	38.2	0.0	52.3	14531.	2321.	-32.	-4166.	931.	-1172.
	0.162		49.5	14455.	2427.	-35.	-4356.	974.	-1224.
	77.	0.2273	49.6		60.75				
	673.0	0.9562	49.5	2.0679	0.3356	-0.0046	-0.1146	0.0042	-0.0053
42	108.6	0.0	0.0	2825.	338.	-20.	6749.	1649.	3063.
	38.6	0.0	50.4	2825.	338.	-20.	6749.	1649.	3063.
	0.162		49.5	2944.	475.	-21.	7044.	1721.	3196.
	76.	0.2277	49.6		21.61				
	672.2	0.9579	49.8	0.4053	0.1205	-0.0029	0.1861	0.0074	0.0137

RUN 10 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALFS,C PSI RHOFIXC RHOR	JNA RED POS LONG STA LAT STA POW LEV	LIFT,C LIFT LIFT/S CL	DRAG,C DRAG DRAG/S FE CD	SIDE,C SIDE SIDE/S CY	PITCH,C PITCH PITCH/S CM	YAW,C YAW YAW/S CN	ROLL,C ROLL ROLL/S CROLL
4	162.6	-4.0	0.0	1300.	2125.	79.	22200.	4540.	3869.
	81.9	0.0	51.5	1300.	2125.	79.	22200.	4540.	3869.
	0.240		50.4	1451.	2265.	84.	23660.	4840.	4124.
	79.	0.2230	49.9		25.44				
	674.2	0.9321	49.9	0.0977	0.1633	0.0055	0.2865	0.0095	0.0081
5	161.6	-2.0	0.0	3410.	1984.	21.	19583.	4034.	4686.
	82.0	0.0	51.8	3910.	1989.	21.	19583.	4034.	4686.
	0.240		50.4	4184.	2125.	22.	19941.	4316.	5230.
	81.	0.2221	50.2		24.27				
	675.5	0.9336	49.9	0.2636	0.1391	0.0019	0.2346	0.0095	0.0107
6	161.2	0.0	0.0	6675.	1892.	-32.	16348.	3527.	5158.
	82.2	0.0	50.7	6675.	1892.	-32.	16348.	3527.	5158.
	0.240		50.	7156.	2028.	-34.	17204.	3688.	5508.
	82.	0.2217	49.6		23.06				
	676.1	0.9322	49.9	0.5095	0.1278	-0.0022	[illegible]	0.0026	0.0108
7	161.2	2.0	0.0	9445.	1908.	-54.	10968.	3483.	7835.
	81.9	0.0	51.1	9445.	1908.	-54.	10968.	3483.	7835.
	0.240		50.3	10145.	2044.	-56.	11774.	[illegible]	8415.
	83.	0.2213	49.7		23.29				
	676.7	0.9311	49.8	0.6370	0.1287	-0.0036	0.1408	0.0073	0.0164
8	161.4	4.0	0.0	12275.	2023.	-105.	7602.	3458.	8035.
	82.0	0.0	52.8	12275.	2023.	-105.	7602.	3458.	8035.
	0.240		50.4	13164.	2173.	-113.	8165.	3714.	8630.
	83.	0.2213	49.9		24.64				
	676.7	0.9311	49.8	0.8262	0.1362	-0.0071	0.0974	0.0072	0.0168
9	161.5	6.0	0.0	15100.	2167.	-17.	2744.	3453.	10119.
	81.9	0.0	55.2	15100.	2167.	-17.	2744.	3453.	10119.
	0.240		50.5	16276.	2336.	-18.	2957.	3722.	10902.
	85.	0.2205	49.5		26.45				
	678.3	0.9277	49.9	1.0189	0.1461	-0.0011	0.0352	0.0072	0.0212
10	161.7	7.0	0.0	16390.	2338.	-38.	-44.	2482.	7598.
	81.9	0.0	50.7	16390.	2338.	-38.	-44.	2482.	7598.
	0.240		50.5	17644.	2525.	-41.	-45.	2686.	8205.
	86.	0.2201	49.6		24.54				
	678.6	0.9260	49.7	1.1058	0.1577	-0.0026	-0.0005	0.0052	0.0159
11	161.7	8.0	0.0	17565.	2462.	-20.	-491.	2226.	7364.
	82.0	0.0	52.1	17565.	2462.	-20.	-491.	2226.	7364.
	0.240		50.4	18966.	2659.	-22.	-1070.	2316.	7880.
	86.	0.2201	49.8		30.04				
	678.6	0.9260	49.8	1.1840	0.1662	-0.0013	-0.0127	0.0046	[illegible]
12	141.7	-4.0	50.0	[illegible]	2924.	-112.	22654.	1525.	3606.
	63.3	0.0	49.8	6761.	2924.	-112.	22654.	1525.	3606.
	0.210		50.3	7252.	3137.	-120.	24302.	1636.	4182.
	86.	0.2216	49.6		48.10				
	678.6	0.9322	49.8	0.5898	0.2551	-0.0098	0.3708	[illegible]	[illegible]
13	141.5	-2.0	50.0	8865.	3069.	-113.	20341.	1793.	2342.
	63.1	0.0	51.2	8865.	3069.	-113.	20341.	1793.	2342.
	0.209		50.3	9512.	3296.	-121.	21554.	1921.	2517.
	87.	0.2212	49.7		47.64				
	679.2	0.9306	49.7	0.7587	0.2667	-0.0099	[illegible]	[illegible]	[illegible]
14	141.7	0.0	50.0	10740.	3227.	-136.	16777.	2048.	[illegible]
	63.1	0.0	53.3	10740.	3227.	-136.	16777.	2048.	[illegible]
	0.209		50.5	11502.	3474.	[illegible]	18062.	2245.	[illegible]
	88.	0.2208	49.8		51.14				
	679.9	0.9289	49.8	0.9303	0.2825	-0.0119	0.2795	0.0057	0.0082
15	141.6	2.0	50.0	12594.	3487.	-152.	13495.	2071.	3647.
	63.1	0.0	51.6	12594.	3487.	-152.	13495.	2071.	3647.
	0.209		50.4	13554.	3754.	-164.	14744.	[illegible]	[illegible]
	88.	0.2208	49.6		55.34				
	679.9	0.9289	49.9	1.0951	0.3055	-0.0133	[illegible]	0.0056	[illegible]

TABLE V.— Continued.

RUN 10 TEST 525

PT	VAIS / UPSF / MACH / TEMP / VSMOKTS	ALFS,C / PSI / RHO	INA / PED POS / LONG STK / LAT STK / RUD DEV	LIFT / LIFT / LIFT/B / CL	DRAG / DRAG / DRAG/B / FE / CD	SIDE / SIDE / SIDE/B / CY	PITCH / PITCH / PITCH/B / CM	YAW / YAW / YAW/B / CN	ROLL / ROLL / ROLL/B / CROLL
16	101.8	-4.0	75.0	2565.	2187.	-41.	11814.	330.	415.
	32.8	0.0	52.0	2585.	2187.	-41.	11814.	332.	415.
	0.150		50.5	2754.	2330.	-42.	12594.	354.	442.
	98.	0.2231	49.4		66.72				
	679.9	0.9388	49.8	0.4357	0.3686	-0.0014	0.3791	0.0017	0.0022
17	101.5	-2.0	75.0	3505.	2184.	-60.	10946.	414.	641.
	32.9	0.0	51.1	3505.	2184.	-60.	10944.	474.	640.
	0.150		50.6	3726.	2317.	-64.	11614.	503.	680.
	88.	0.2239	49.5		66.44				
	678.6	0.9422	49.8	0.5897	0.3671	-0.0101	0.3501	0.0025	0.0033
18	101.3	0.0	75.0	4480.	2224.	-99.	10715.	224.	237.
	32.8	0.0	52.0	4480.	2224.	-99.	10715.	224.	237.
	0.150		51.7	4733.	2350.	-105.	11371.	237.	250.
	88.	0.2240	49.8		67.40				
	678.6	0.9422	49.8	0.7523	0.3751	-0.0167	0.3644	0.0012	0.0013
19	101.6	1.0	75.0	4900.	2275.	-72.	9673.	177.	737.
	32.9	0.0	52.0	4900.	2275.	-72.	9673.	177.	737.
	0.150		50.5	5201.	2415.	-76.	10267.	188.	804.
	88.	0.2239	49.6		64.10				
	678.6	0.9422	50.3	0.8222	0.3821	-0.0121	0.3092	0.0009	0.0040
20	119.1	-4.0	60.0	4200.	2854.	-37.	17564.	285.	444.
	45.0	0.0	49.8	4200.	2854.	-39.	17564.	285.	444.
	0.176		50.5	4477.	3042.	-42.	18703.	304.	400.
	88.	0.2235	49.5		65.40				
	679.6	0.9382	49.9	0.5155	0.3503	-0.0045	0.4048	0.0011	0.0032
21	119.0	-2.0	60.0	5420.	2914.	-46.	16962.	572.	495.
	45.0	0.0	50.0	5420.	2914.	-46.	16962.	572.	495.
	0.176		50.6	5766.	3100.	-49.	18046.	608.	482.
	85.	0.2234	49.9		64.70				
	678.7	0.9199	49.9	0.6649	0.3579	-0.0056	0.3959	0.0022	0.0016
22	118.8	-1.0	60.0	6105.	2931.	-66.	16474.	995.	340.
	45.0	0.0	50.0	6105.	2931.	-66.	16474.	995.	340.
	0.176		50.7	6495.	3118.	-70.	17526.	1058.	388.
	85.	0.2234	49.9		65.27				
	679.0	0.9400	49.9	0.7500	0.3623	-0.0081	0.3851	0.0038	0.0028

RUN 11 TEST 525

PT	VAIS / UPSF / MACH / TEMP / VSMOKTS	ALFS,C / PSI / RHO / RHOR	INA / PED POS / LONG STK / LAT STK / RUD DEV	LIFT,U / LIFT / LIFT/B / CL	DRAG,U / DRAG / DRAG/B / FE / CD	SIDE,U / SIDE / SIDE/B / CY	PITCH,U / PITCH / PITCH/B / CM	YAW,U / YAW / YAW/B / CN	ROLL,U / ROLL / ROLL/B / CROLL
3	100.3	-4.0	75.0	2525.	2104.	-27.	11276.	595.	568.
	31.5	0.0	52.1	2525.	2100.	-27.	11276.	595.	568.
	0.149		49.8	2727.	2273.	-29.	12180.	642.	613.
	83.	0.2201	49.4		66.70				
	676.7	0.9258	50.1	0.4425	0.3687	-0.0047	0.3766	0.0053	0.0051
4	100.4	-2.0	75.0	3395.	2100.	-60.	10573.	741.	645.
	31.6	0.0	51.1	3395.	2100.	-60.	10573.	741.	645.
	0.149		49.8	3667.	2275.	-65.	11421.	801.	697.
	83.	0.2200	50.1		66.64				
	676.7	0.9258	50.1	0.5941	0.3692	-0.0105	0.3521	0.0066	0.0044
5	100.3	0.0	75.0	4255.	2148.	-62.	9972.	240.	270.
	31.5	0.0	50.0	4255.	2148.	-62.	9972.	240.	270.
	0.149		49.9	4595.	2320.	-67.	10772.	260.	291.
	83.	0.2201	50.0		64.13				
	676.7	0.9258	50.0	0.7457	0.3768	-0.0109	0.3327	0.0013	0.0015
6	163.4	0.0	0.0	8550.	2111.	-1374.	10972.	17751.	4624.
	82.0	-2.0	50.2	8550.	2111.	-1374.	10972.	17751.	4624.
	0.243		49.8	9423.	2320.	-1514.	12092.	19562.	5096.
	84.	0.2157	50.0		25.14				
	677.4	0.9074	50.0	0.5750	0.1422	-0.0926	0.1467	0.0359	0.0093
7	163.5	2.0	0.0	8667.	2046.	-672.	11708.	11384.	8172.
	81.7	-2.0	50.0	8667.	2046.	-672.	11708.	11384.	8172.
	0.242		49.5	9545.	2207.	-745.	12973.	12613.	9054.
	87.	0.2145	50.2		25.05				
	679.2	0.9025	50.0	0.5858	0.1380	-0.0455	0.1507	0.0234	0.0130
8	163.2	2.0	0.0	8225.	2027.	610.	13230.	-3821.	7232.
	81.3	2.0	50.7	8225.	2027.	610.	13230.	-3821.	7232.
	0.242		49.8	9124.	2250.	677.	14684.	-4241.	8027.
	88.	0.2142	50.0		24.94				
	679.9	0.9015	50.1	0.5591	0.1378	0.0415	0.1711	-0.0050	0.0175
9	163.4	2.0	0.0	7950.	2035.	1284.	14032.	-7528.	8379.
	81.3	0.0	50.0	7950.	2035.	1284.	14032.	-7528.	8379.
	0.242		49.8	8817.	2263.	1424.	15647.	-8371.	9317.
	89.	0.2138	50.0		25.03				
	680.5	0.8993	50.0	0.5388	0.1383	0.0872	0.1814	-0.0159	0.0177
10	163.3	2.0	0.0	7700.	2087.	-18654.	15113.	-112051.	544633.
	81.1	0.0	51.0	7700.	2087.	-18654.	16113.	-112051.	544633.
	0.241		49.8	8577.	2325.	-20735.	17947.	-124963.	662326.
	90.	0.2134	49.4		25.74				
	681.1	0.8978	49.6	0.5249	0.1422	-1.2694	[illegible]	[illegible]	[illegible]
11	163.6	2.0	0.0	7370.	2063.	30.	33444.	3305.	7571.
	81.2	0.0	49.9	7370.	2063.	30.	33444.	3305.	7571.
	0.241		24.3	8224.	2302.	33.	37374.	3755.	8444.
	91.	0.2130	49.7		25.42				
	681.7	0.8961	50.0	0.5016	0.1404	[illegible]	[illegible]	[illegible]	[illegible]

TABLE V.— Continued.

RUN 11 TEST 525

PT	VELS QBSF MION TEMP VISCK13	ALPHA,C PSI RHO RHOW	INA ELC PTS LONG STR LAT STR PTR LEV	LIFT,L LIFT LIFT/Q CL	DRAG,D DRAG DRAG/Q F CD	SIDE,Y SIDE SIDE/Q CY	PITCH,M PITCH PITCH/Q CM	YAW,N YAW YAW/Q CN	ROLL,R ROLL ROLL/Q CROLL
12	163.5	2.0	0.0	9765.	2068.	-37.	-12274.	4509.	6430.
	81.1	0.0	49.6	9765.	2068.	-37.	-12274.	4509.	6430.
	0.241		49.0	10847.	2300.	-41.	-13742.	5032.	7142.
	91.	0.2130	50.9		25.44				
	691.7	0.8951	50.0	0.6650	0.1409	-0.0025	-0.1591	0.0095	0.0130
13	163.6	2.0	0.0	8340.	2083.	-69.	11358.	6860.	18759.
	91.0	0.0	50.2	8387.	2083.	-69.	11358.	6860.	18759.
	0.241		49.6	9306.	2324.	-77.	12674.	7432.	20939.
	91.	0.2130	54.6		25.71				
	691.7	0.8962	50.0	0.5888	0.1421	-0.0047	0.0474	0.0141	0.0397
14	163.3	2.0	0.0	8135.	2195.	-7.	11361.	8371.	26625.
	90.8	0.0	51.0	8135.	2195.	-7.	11361.	8371.	26625.
	0.241		49.6	9093.	2454.	-8.	12700.	9357.	31320.
	92.	0.2128	55.7		27.17				
	682.3	0.8946	49.9	0.5565	0.1501	-0.0005	0.1424	0.0170	0.0540
15	163.5	2.0	0.0	8445.	2055.	-420.	11966.	14556.	2925.
	81.0	0.0	-1769.0	8445.	2055.	-420.	11966.	14556.	2925.
	0.241		49.8	9440.	2297.	-474.	13376.	16274.	3270.
	92.	0.2126	49.7		25.38				
	682.3	0.8956	49.9	0.5755	0.1402	-0.0289	0.1554	0.0309	0.0062
16	163.5	2.0	0.0	8380.	2092.	-754.	12535.	23590.	2615.
	81.0	0.0	-1769.0	8380.	2092.	-754.	12535.	23590.	2615.
	0.241		49.9	9366.	2339.	-843.	14012.	26370.	2923.
	92.	0.2126	49.6		25.85				
	682.3	0.8946	50.0	0.5717	0.1427	-0.0514	0.1627	0.0500	0.0055
17	122.3	8.0	0.0	8790.	1327.	-7.	-8615.	1321.	3168.
	86.0	0.0	48.2	8790.	1327.	-7.	-8615.	1321.	3168.
	0.180		44.8	9667.	1459.	-8.	-9492.	1453.	3484.
	90.	0.2161	49.5		28.84				
	681.7	0.9093	50.0	1.0555	0.1593	-0.0008	-0.0165	0.0049	0.0118
18	122.2	8.0	0.0	8710.	1352.	23.	-9685.	1206.	10625.
	86.0	0.0	48.7	8710.	1352.	23.	-9685.	1206.	10625.
	0.180		44.8	9579.	1487.	25.	-10663.	1327.	11685.
	90.	0.2161	54.5		29.42				
	681.1	0.9093	50.0	1.0470	0.1625	0.0026	-0.0225	0.0045	0.0397
19	122.1	0.0	0.0	8605.	1409.	44.	-14260.	1465.	16545.
	85.9	0.0	49.6	8605.	1409.	49.	-14260.	1465.	16545.
	0.180		49.6	9461.	1549.	54.	-15684.	1611.	18194.
	90.	0.2161	58.5		30.69				
	681.1	0.9093	50.0	1.0354	0.1695	0.0059	-0.0324	0.0655	0.0619
20	121.7	12.0	0.0	11210.	1673.	-13.	-4679.	1104.	3104.
	85.6	0.0	49.0	11210.	1673.	-13.	-4679.	1104.	3104.
	0.179		49.8	12320.	1840.	-14.	-4485.	1215.	3415.
	90.	0.2162	49.4		36.68				
	681.1	0.9094	49.9	1.3577	0.2026	-0.0016	-0.1960	0.0042	0.0117
21	121.7	12.0	0.0	11120.	1695.	66.	-3758.	-667.	4838.
	85.8	0.0	49.5	11120.	1695.	66.	-3758.	-667.	4838.
	0.179		50.0	12227.	1864.	73.	-4132.	-733.	10617.
	90.	0.2162	64.3		37.16				
	681.1	0.9094	50.0	1.3466	0.2053	0.0080	-0.1066	-0.0018	0.0570
22	121.9	12.0	0.0	11035.	1744.	135.	-6507.	-1563.	15538.
	85.7	0.0	49.5	11035.	1744.	135.	-6507.	-1563.	15538.
	0.180		49.5	12156.	1921.	149.	-7244.	-1744.	17117.
	91.	0.2158	80.6		38.17				
	681.7	0.9078	50.0	1.3385	0.2109	0.0163	-0.0991	-0.0061	0.0584
23	161.5	0.0	0.0	13140.	2906.	-1455.	20021.	15479.	960.
	79.2	-4.0	49.5	13140.	2906.	-1455.	20021.	15479.	960.
	0.238		49.9	14652.	3240.	-1622.	22437.	17261.	1070.
	91.	0.2132	49.4		36.70				
	681.7	0.8968	50.0	0.9169	0.2028	-0.1015	0.2672	0.0356	0.0021
24	161.5	0.0	0.0	13180.	2807.	-834.	19768.	8372.	-80.
	79.2	-2.0	49.2	13180.	2807.	-834.	19768.	8372.	-80.
	0.238		49.5	14697.	3175.	-930.	22045.	9336.	-89.
	91.	0.2132	49.4		35.43				
	681.7	0.8968	49.9	0.9199	0.1987	-0.0585	0.2626	0.0142	-0.0002
25	161.3	0.0	0.0	13095.	2790.	377.	19328.	-3143.	2595.
	78.9	2.0	49.8	13095.	2790.	377.	19328.	-3143.	2595.
	0.238		49.4	14571.	3110.	421.	21588.	-3508.	2898.
	92.	0.2128	49.3		35.40				
	682.3	0.8953	50.0	0.9148	0.1958	0.0264	0.2578	-0.0076	0.0057
26	161.2	0.0	0.0	13085.	2813.	1077.	19632.	-4456.	4331.
	78.7	4.0	48.0	13085.	2813.	1077.	19632.	-4456.	4331.
	0.238		50.1	14593.	3142.	1203.	22151.	-10561.	4834.
	92.	0.2128	49.5		35.[illegible]				
	682.3	0.8953	49.9	0.9170	0.1974	0.0756	0.2644	-0.0706	0.0096
27	161.1	0.0	0.0	12790.	2900.	2338.	19945.	-21605.	7985.
	78.5	8.0	48.9	12790.	2900.	2333.	19945.	-21605.	7985.
	0.237		49.2	14254.	3245.	2610.	22262.	-24113.	8932.
	93.	0.2124	49.4		30.43				
	683.0	0.8938	50.0	0.8963	0.2009	0.1645	0.2657	-0.0473	0.0175
28	161.4	0.0	0.0	12395.	2810.	-104.	35507.	2465.	2542.
	78.8	0.0	49.5	12395.	2810.	-104.	35507.	2465.	2547.
	0.238		32.0	13870.	3155.	-104.	39749.	2754.	2852.
	93.	0.2124	49.8		35.75				
	683.0	0.8937	50.1	0.8688	0.1975	-0.0115	0.2744	0.0054	0.0055
29	161.4	0.0	0.0	14215.	2833.	-191.	[illegible]	[illegible]	2436.
	78.8	0.0	44.7	14215.	2833.	-191.	[illegible]	[illegible]	2436.
	0.238		69.8	15906.	3170.	-214.	[illegible]	[illegible]	3285.
	93.	0.2124	49.1		35.45				
	683.0	0.8937	49.9	0.9969	0.1987	-0.0136	-0.0522	0.0049	0.0054

TABLE V.— Continued.

RUN 11 TEST 525

PT	VKTS DPSF MTUN TEMP ASNDKTS	ALFS,L PSI MACH/IDE MACH	INA PED POS LONG STK LAT STK ROT DEV	LIFT,L LIFT LIFT/Q CL	DRAG,D DRAG DRAG/Q FE CD	SIDE,Y SIDE SIDE/Q CY	PITCH,M PITCH PITCH/Q CM	YAW,N YAW YAW/Q CN	ROLL,L ROLL ROLL/Q CROLL
30	161.5	0.0	[illegible]	12765.	2776.	-344.	20018.	1644.	12255.
	78.7	0.0	49.7	12739.	2776.	-348.	20018.	1699.	12288.
	0.238		49..	14360.	3106.	-399.	26944.	1402.	13750.
	93.	0.2124	49.2		35.27				
	683.0	0.8937	49.8	0.8977	0.1988	-0.0244	0.2614	0.0057	0.3208
31	161.4	0.0	[illegible]	12500.	2776.	-842.	21422.	2544.	21594.
	78.7	0.0	49.0	12370.	2777.	-842.	21422.	2544.	21514.
	0.236		48.4	13708.	3105.	-445.	24572.	2413.	24216.
	94.	0.2127	48.5		35.26				
	683.6	0.8921	49.0	0.8635	0.1928	-0.0510	0.2422	0.0057	[illegible]
32	161.6	0.0	[illegible]	13215.	2823.	-853.	19773.	13975.	-812.
	78.8	0.0	[illegible]	13215.	2823.	-853.	19773.	13975.	-812.
	0.238		49.4	14814.	3165.	-732.	22164.	15660.	-910.
	94.	0.2124	49.4		35.42				
	683.6	0.8920	50.0	0.9263	0.1979	-0.0458	0.2057	0.1366	-0.0210
33	161.5	0.0	[illegible]	13210.	2844.	-447.	19174.	22558.	-2353.
	78.7	0.0	[illegible]	13210.	2844.	-447.	19174.	22558.	-2353.
	0.238		49.0	14808.	3144.	-1116.	21498.	25249.	-2643.
	94.	0.2120	49.0		36.18				
	683.6	0.8921	49.0	0.9264	0.1994	-0.0700	0.2561	0.0092	-0.0053
34	112.7	0.0	[illegible]	11165.	1616.	-52.	469.	814.	840.
	38.9	0.0	50.5	11145.	1616.	-52.	469.	814.	840.
	0.165		49.7	12354.	2002.	-57.	518.	900.	926.
	94.	0.2151	49.7		46.70				
	683.6	0.9050	49.9	1.5592	0.2256	-0.0074	0.0127	0.0056	0.0037
35	112.5	0.0	0.0	10975.	1856.	-169.	900.	-426.	4577.
	38.9	0.0	51.6	10975.	1856.	-169.	900.	-426.	4577.
	0.165		49.6	12083.	2021.	-186.	992.	-460.	5034.
	92.	0.2159	49.2		47.19				
	692.3	0.9023	50.0	1.5364	0.2607	-0.0240	0.0243	-0.0103	0.0292
36	112.7	0.0	[illegible]	10665.	1771.	-216.	2548.	-744.	10568.
	39.0	0.0	50.5	10665.	1771.	-216.	2548.	-744.	10568.
	0.166		49.5	11764.	1952.	-238.	2800.	-814.	11635.
	92.	0.2154	50.5		45.55				
	682.3	0.9043	50.0	1.5118	0.2505	-0.0306	0.0649	-0.0113	0.0465

RUN 12 TEST 525

PT	VKTS DPSF MTUN TEMP ASNDKTS	ALFS,L PSI MACH/IDE MACH	INA PED POS LONG STK LAT STK ROT DEV	LIFT,L LIFT LIFT/Q CL	DRAG,D DRAG DRAG/Q FE CD	SIDE,Y SIDE SIDE/Q CY	PITCH,M PITCH PITCH/Q CM	YAW,N YAW YAW/Q CN	ROLL,L ROLL ROLL/Q CROLL
3	80.1	-12.0	90.0	-825.	1522.	-14.	7005.	-33.	-151.
	21.9	0.0	47.0	-825.	1522.	-14.	7005.	-33.	-151.
	0.121		50.0	-837.	1545.	-14.	7802.	-34.	-153.
	65.	0.2341	49.9		71.13				
	685.9	0.9851	50.0	-0.2190	0.1930	-0.0036	0.3776	0.0035	-0.0012
4	80.3	-8.0	90.0	265.	1427.	-74.	6844.	-466.	-243.
	21.5	0.0	45.3	265.	1427.	-74.	6844.	-466.	-243.
	0.121		50.1	269.	1449.	-75.	6745.	-473.	-246.
	65.	0.2341	50.2		80.32				
	685.4	0.9851	50.1	0.0688	0.3689	-0.0190	0.3240	0.0037	-0.0023
5	80.4	-4.0	90.0	1445.	1395.	-49.	5956.	-425.	-175.
	21.5	0.0	47.8	1445.	1395.	-49.	5956.	-428.	-175.
	0.121		50.1	1467.	1416.	-49.	6046.	-435.	-178.
	65.	0.2341	49.9		84.70				
	685.4	0.9851	50.1	0.3766	0.3578	-0.0251	0.2967	0.0034	-0.0014
6	80.5	-2.0	90.0	2045.	1426.	-74.	6361.	176.	204.
	21.5	0.0	47.0	2045.	1426.	-74.	6361.	176.	204.
	0.121		50.0	2076.	1442.	-75.	6456.	179.	208.
	65.	0.2341	49.9		65.77				
	685.0	0.9850	50.0	0.5233	0.3654	-0.0189	0.3048	0.0016	0.0018
7	80.4	0.0	90.0	2665.	1441.	-50.	5587.	216.	118.
	21.5	0.0	47.7	2665.	1441.	-50.	5587.	216.	118.
	0.121		50.1	2705.	1463.	-51.	5671.	220.	120.
	65.	0.2341	49.7		80.49				
	685.9	0.9851	50.0	0.6833	0.3698	-0.0128	0.2720	0.0017	0.0009
8	80.5	2.0	90.0	3285.	1492.	-40.	4918.	95.	-125.
	21.5	0.0	48.0	3285.	1492.	-40.	4918.	95.	-125.
	0.121		50.1	3341.	1514.	-41.	5002.	95.	-127.
	65.	0.2337	50.0		84.15				
	666.1	0.9832	50.1	0.8418	0.3822	-0.0102	0.2349	0.0007	-0.0011
9	80.4	4.0	90.0	3530.	1544.	-13.	4150.	317.	-171.
	21.5	0.0	48.1	3530.	1544.	-13.	4150.	317.	-171.
	0.121		50.0	3595.	1574.	-13.	4221.	323.	-174.
	65.	0.2337	49.9		71.96				
	666.1	0.9832	50.0	0.9058	0.3925	-0.0031	0.2028	0.0025	-0.0014
10	80.4	8.0	90.0	5005.	1715.	-13.	2189.	294.	201.
	21.5	0.0	48.6	5005.	1715.	-13.	2189.	294.	201.
	0.121		50.0	5091.	1744.	-13.	2227.	299.	204.
	65.	0.2337	49.4		[illegible]				
	666.1	0.9832	50.0	1.2850	0.4403	-0.0033	0.1073	0.0023	0.0015
11	80.4	12.0	90.0	6155.	1925.	-5.	73.	474.	-70.
	21.5	0.0	48.9	6155.	1925.	-5.	73.	474.	-70.
	0.121		50.5	6256.	1958.	-5.	74.	486.	-71.
	65.	0.2337	49.9		84.56				
	666.1	0.9832	50.0	1.5827	0.4948	-0.0013	0.0056	0.0058	-0.0006

TABLE V.— Continued.

RUN 12 TEST 525

PT	VKTS / QPSF / MACH / TEMP / VSQDRTS	ALFS,L / PSI / — / RHO/100 / RHOW	INA / PED POS / LONG STK / LAT STK / PCM CEY	LIFT,U / LIFT / LIFT/A / — / CL	DRAG,U / DRAG / DRAG/A / FE / CD	SIDE,U / SIDE / SIDE/A / — / CY	PITCH,U / PITCH / PITCH/A / — / CM	YAW,U / YAW / YAW/A / — / CN	ROLL,U / ROLL / ROLL/A / — / CROLL
12	80.4	[illegible]	40.0	6410.	1973.	-4.	-667.	532.	204.
	21.5	0.0	47.6	6010.	1973.	-4.	-667.	532.	204.
	0.120		50.0	6532.	2011.	-4.	-565	444.	208.
	67.	0.2333	49.9		91.99				
	666.7	0.9813	50.0	1.6995	0.5077	+0.0023	-0.0424	0.0051	0.0016
13	80.2	14.0	40.0	6945.	2256.	-109.	-3866.	-403.	-2712.
	21.6	0.0	47.2	6985.	2256.	-109.	-3866.	-403.	-2712.
	0.120		50.0	6160.	2295.	-111.	-3940.	-417.	-2765.
	67.	0.2333	49.9		105.61				
	666.7	0.9818	50.0	1.5693	0.5834	-0.0266	-0.0946	-0.0072	-0.0618
14	99.6	-4.0	75.0	2645.	2215.	-53.	10723.	4.0	69.
	32.8	0.0	48.5	2645.	2215.	-53.	10723.	4.0	69.
	0.150		50.1	2711.	2270.	-54.	10949.	3.8	71.
	68.	0.2319	49.8		67.57				
	667.3	0.9757	50.0	0.3058	0.3733	-0.0089	0.3453	0.0001	0.0004
15	99.6	-2.0	75.0	3590.	2183.	-47.	9875.	475.	1045.
	32.7	0.0	47.6	3590.	2183.	-47.	9875.	475.	1045.
	0.150		50.0	3666.	2242.	-40.	10141.	488.	1072.
	69.	0.2315	50.2		66.74				
	668.0	0.9739	50.0	0.6066	0.3682	+0.0108	0.3175	0.0025	0.0055
16	99.4	0.0	75.0	4500.	2257.	-49.	9142.	465.	376.
	32.9	0.0	47.0	4500.	2257.	-49.	9142.	465.	376.
	0.150		50.1	4621.	2318.	-52.	9386.	480.	386.
	69.	0.2315	49.9		68.61				
	668.0	0.9738	49.9	0.7598	0.3791	-0.0086	0.2477	0.0024	0.0020
17	99.4	2.0	75.0	5390.	2337.	-86.	8063.	349.	-360.
	32.8	0.0	47.0	5390.	2337.	-84.	8063.	349.	-360.
	0.150		50.1	5545.	2404.	-91.	8295.	359.	-370.
	70.	0.2310	49.9		71.19				
	668.6	0.9727	50.0	0.9072	0.3933	-0.0146	0.2582	0.0016	-0.0019
18	99.6	4.0	75.0	6245.	2441.	-74.	6497.	195.	-124.
	32.8	0.0	47.2	6245.	2441.	-74.	6497.	195.	-124.
	0.150		49.9	6425.	2511.	-76.	6684.	201.	-128.
	70.	0.2310	50.0		74.42				
	668.8	0.9720	50.0	1.0518	0.4111	-0.0125	0.2082	0.0016	-0.0006

RUN 13 TEST 525

PT	VKTS / QPSF / MACH / TEMP / VSQDRTS	ALFS,L / PSI / — / RHO/100 / RHOW	INA / PED POS / LONG STK / LAT STK / PCM CEY	LIFT,U / LIFT / LIFT/A / — / CL	DRAG,U / DRAG / DRAG/A / FE / CD	SIDE,U / SIDE / SIDE/A / — / CY	PITCH,U / PITCH / PITCH/A / — / CM	YAW,U / YAW / YAW/A / — / CN	ROLL,U / ROLL / ROLL/A / — / CROLL
3	100.3	-4.0	75.0	1715.	1992.	-20.	11296.	951.	1050.
	32.9	0.0	49.3	1715.	1992.	-20.	11296.	951.	1050.
	0.150		50.0	1776.	2062.	-21.	11696.	850.	1091.
	73.	0.2296	49.8		60.60				
	670.9	0.9659	50.3	0.2092	0.3398	-0.0034	0.3613	0.0042	0.0055
4	100.3	-2.0	75.0	2470.	1978.	-4.	10265.	772.	559.
	32.9	0.0	49.7	2470.	1978.	-4.	10265.	772.	559.
	0.150		49.9	2557.	2048.	-4.	10628.	805.	584.
	73.	0.2296	49.6		60.17				
	670.9	0.9658	50.0	0.4151	0.3324	-0.0007	0.1281	0.0041	0.0045
5	100.3	0.0	75.0	3385.	1908.	-41.	9843.	1014.	541.
	32.9	0.0	49.3	3385.	1908.	-41.	9843.	1019.	541.
	0.150		50.0	3505.	2056.	-42.	10192.	1050.	560.
	73.	0.2296	49.7		60.37				
	670.9	0.9658	50.0	0.5685	0.3335	-0.0153	0.3146	0.0053	0.0028
6	100.3	2.0	75.0	4215.	2054.	-69.	7697.	555.	637.
	32.8	0.0	51.1	4215.	2054.	-69.	7697.	555.	637.
	0.150		49.9	4372.	2131.	-72.	7984.	576.	661.
	74.	0.2291	49.6		62.53				
	671.1	0.9640	50.0	0.7059	0.3455	-0.0116	0.2463	0.0029	0.0033
7	100.4	4.0	75.0	4235.	2065.	-15.	5147.	143.	438.
	32.9	0.0	49.8	4235.	2065.	-15.	5147.	143.	438.
	0.150		50.0	4393.	2086.	-16.	5462.	148.	473.
	74.	0.2291	49.8		60.95				
	671.1	0.9640	50.0	[illegible]	0.3367	-0.0025	0.1837	0.0007	0.0044
8	100.5	4.0	75.0	3305.	1925.	-58.	4633.	446.	759.
	35.0	0.0	48.9	3305.	1925.	-57.	4633.	446.	759.
	0.150		50.1	3425.	1997.	-60.	4806.	462.	788.
	74.	0.2291	50.4		56.35				
	671.1	0.9640	50.0	0.5355	0.3229	-0.0097	0.1477	0.0049	0.0040
9	100.5	6.0	75.0	4165.	1955.	-22.	3457.	696.	1178.
	35.0	0.0	50.0	4165.	1955.	-22.	3457.	696.	1178.
	0.150		50.0	4321.	2028.	-23.	3586.	722.	1222.
	74.	0.2291	49.3		59.36				
	671.1	0.9640	49.9	0.6990	0.3276	-0.0037	0.1103	0.0036	0.0061
10	100.4	8.0	75.0	4865.	2054.	12.	2127.	606.	977.
	32.9	0.0	50.7	4865.	2054.	12.	2127.	606.	977.
	0.150		51.0	5047.	2131.	12.	2207.	629.	1013.
	74.	0.2291	49.8		62.48				
	671.1	0.9640	50.0	0.8176	0.3452	0.0020	0.0684	0.0032	0.0051
11	99.4	8.0	45.0	5710.	1940.	23.	1665.	139.	1341.
	32.5	0.0	49.5	5710.	1940.	23.	1665.	139.	1341.
	0.149		50.3	5933.	2016.	24.	1750.	145.	1393.
	75.	0.2287	50.0		54.61				
	671.7	0.9623	50.0	0.9690	0.3294	0.0039	0.0544	0.0060	0.0071
12	100.1	8.0	30.0	5575.	1669.	23.	1252.	645.	1448.
	32.7	0.0	55.5	5575.	1669.	23.	1252.	645.	1448.
	0.149		51.0	5782.	1729.	24.	1300.	673.	1421.
	75.	0.2287	49.5		54.45				
	671.7	0.9621	50.0	1.0226	0.2615	0.0039	0.0405	0.0034	0.0097
13	100.5	8.0	0.0	6700.	945.	-4.	-1449.	622.	2605.
	33.0	0.0	49.8	6700.	945.	-4.	-1449.	622.	2605.
	0.150		49.5	6963.	982.	-4.	-1506.	654.	2704.
	75.	0.2287	49.5		29.04				
	671.7	0.9622	49.5	1.1225	0.1583	-0.0015	-0.0472	0.0043	0.0156

TABLE V.— Continued.

PT											
7	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
8	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
9	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
10	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
11	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
12	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
13	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
14	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
15	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
16	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
17	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
18	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
19	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
20	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
21	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
22	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
23	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
24	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]

TABLE V.— Continued.

RUN 13 TEST 525

P	VATS GPSF MIUN TEMP VSNDKTS	ALFS,C PSI AMJ RHO	INA REG POS LONG STA LAT STA POR LEV	LIFT LIFT/0 CL	DRAG DRAG/0 FE CD	SIDE SIDE/0 CY	PITCH PITCH/0 CM	YAW YAW/0 CN	ROLL ROLL/0 CROLL	RPM ORCUMM V/OR	HHASI CHASI HP HP/0 CP/SIGMA
[illegible]	134.0	0.0	0.0	4435.	654.	-7.	4654.	5532.	5810.	458.2	25720.
	65.1	0.0	50.3	4455.	654.	-7.	4654.	5532.	5810.	547.	36830.
	0.204		44.8	4440.	686.	-7.	4453.	5754.	5830.	0.394	454.2
	7?.	0.2277	50.0		10.36						475.7
	659.2	0.9569	10.4	0.3899	0.0572	-0.0056	.1515	0.0150	0.0153		0.005284
[illegible]	159.0	0.0	0.0	5695.	934.	-29.	12472.	7513.	3542.	459.7	55237.
	79.7	0.0	50.4	5695.	934.	-29.	12472.	7513.	3542	606.	45166.
	0.235		50.0	6163.	1011.	-31.	13499.	7915.	3613	0.434	599.7
	93.	0.2198	44.6		11.72						649.1
	679.9	0.9207	14.5	0.3950	0.0648	-0.0020	0.1546	0.0159	0.0076		0.007626
5	159.5	0.0	0.0	5810.	791.	-20.	12156.	6741.	2955.	459.2	37471.
	79.5	0.0	50.0	5810.	791.	-20.	12156.	6741.	2955.	537.	52172.
	0.216		50.0	6294.	856.	-22.	13179.	7363.	3204.	0.449	655.3
	89.	0.2192	44.6		9.95						710.5
	680.5	0.9224	14.8	0.4039	0.0550	-0.0014	0.1606	0.0147	0.0064		0.004780
6	177.4	0.0	0.0	7510.	1010.	8.	14313.	2944.	5893.	458.1	56524.
	95.6	0.0	50.7	7510.	1010.	8.	14313.	2944.	5893.	600.	57715.
	0.260		50.0	8394.	1126.	9.	15955.	3242.	6500.	0.444	645.3
	101.	0.2132	45.2		10.57						942.3
	687.4	0.8971	19.7	0.4352	0.0586	0.0005	0.1574	0.0053	0.0106		0.011586
7	178.5	0.0	0.0	7600.	504.	-55.	14163.	4571.	4347.	459.4	76261.
	95.6	0.0	50.8	7600.	504.	-55.	14163.	4571.	4347.	601.	76892.
	0.266		50.0	8577.	567.	-60.	16007.	5159.	4903.	0.511	1131.1
	106.	0.2106	45.4		5.27						1276.6
	692.2	0.8860	26.0	0.4392	0.0291	-0.0031	0.1560	0.0282	0.0279		0.015522
8	179.3	0.0	0.0	7655.	-202.	-16.	12710.	4291.	5171.	458.9	102141.
	96.0	0.0	50.7	7655.	-202.	-16.	12710.	4291.	5171.	600.	100939.
	0.266		50.0	8671.	-229.	-18.	14397.	4860.	5745.	0.509	1522.3
	110.	0.2096	45.5		-2.10						1724.5
	693.4	0.8828	39.4	0.4403	-0.0116	-0.0009	0.1391	0.0277	0.0093		0.021082

RUN 18 TEST 525

P	VATS GPSF MIUN TEMP VSNDKTS	ALFS,C PSI AHMJUU RHO	INA REG POS LONG STA LAT STA POR LEV	LIFT,U LIFT LIFT/0 CL	DRAG,U DRAG DRAG/0 FE CD	SIDE,U SIDE SIDE/0 CY	PITCH,U PITCH PITCH/0 CM	YAW,U YAW YAW/0 CN	ROLL,U ROLL ROLL/0 CROLL	RPM ORCUMM V/OR	HHASI CHASI HP HP/0 CP/SIGMA
4	169.5	0.0	0.0	6635.	395.	-81.	5959.	1963.	1158.	564.4	24266.
	38.3	0.0	50.8	6635.	395.	-81.	5959.	1963.	1158.	739.	27540.
	0.162		50.2	7077.	416.	-86.	6322.	2083.	1227.	0.250	404.0
	84.	0.2244	44.0		10.30						441.4
	677.4	0.9442	13.9	0.9559	0.0569	-0.0117	0.1036	0.0085	0.0052		0.003222
5	150.3	0.0	0.0	9480.	375.	-163.	7597.	1865.	840.	564.2	43360.
	54.0	0.0	50.1	9480.	375.	-163.	7597.	1865.	840.	734.	42374.
	0.193		50.1	10096.	399.	-170.	8091.	1923.	854.	0.246	767.0
	84.	0.2232	49.0		6.94						810.8
	677.4	0.9390	16.2	0.9698	0.0384	-0.0164	0.1479	0.0057	0.0026		0.005361
6	149.0	0.0	0.0	12100.	602.	-192.	11446.	543.	2430.	563.5	59503.
	69.2	0.0	50.2	12100.	602.	-192.	11446.	543.	2430.	738.	53362.
	0.220		50.0	13148.	654.	-209.	12431.	644.	2641.	0.301	1009.6
	92.	0.2167	44.2		5.76						1096.8
	682.3	0.9203	22.2	0.9663	0.0481	-0.0153	0.1739	0.0045	0.0200		0.007265
7	168.6	0.0	0.0	15245.	1019.	-254.	17186.	2564.	1614.	563.7	72705.
	87.1	0.0	50.3	15245.	1019.	-254.	17186.	2564.	1614.	736.	72447.
	0.243		49.4	16409.	1127.	-281.	18444.	2635.	1765.	0.366	1303.1
	94.	0.2154	49.1		11.70						1440.8
	685.0	0.9045	32.5	0.9705	0.0647	-0.0161	0.2075	0.0051	0.0032		0.009482
8	150.5	-4.0	30.0	11680.	472.	-252.	3440.	176.	-1060.	566.7	82193.
	69.1	0.0	49.8	11680.	472.	-252.	3440.	176.	-1060.	742.	79751.
	0.219		74.0	12469.	524.	-280.	4410.	195.	-1180.	0.343	1456.2
	100.	0.2147	50.0		6.43						1618.9
	689.7	0.9066	36.9	0.9339	0.0377	-0.0201	0.0607	0.0004	-0.0027		0.010474
9	168.9	-4.0	30.0	14785.	1302.	-307.	1085.	150.	-121.	565.2	93259.
	85.8	0.0	50.0	14785.	1302.	-307.	1085.	150.	-121.	740.	93148.
	0.248		74.0	16633.	1465.	-345.	1221.	1088.	-136.	0.365	1672.1
	104.	0.2115	50.0		15.17						1881.2
	692.2	0.8854	43.7	0.9515	0.0838	-0.0198	0.0035	0.0030	-0.0002		0.012284
10	150.1	-4.0	30.0	12550.	807.	-325.	-226.	247.	-1676.	564.6	82433.
	73.3	0.0	50.0	12550.	807.	-325.	-226.	247.	-1676.	734.	79730.
	0.226		74.0	14114.	907.	-365.	-254.	278.	-1665.	0.356	1444.5
	110.	0.2114	50.0		11.66						1624.1
	693.4	0.8894	35.7	0.9057	0.0602	-0.0245	-0.0032	0.0006	-0.0359		0.010627
11	150.5	-6.0	[illegible]	[illegible]	1014.	-276.	6223.	-563.	-1064.	565.2	92180.
	73.6	0.0	50.2	11370.	1014.	-276.	6223.	-563.	-1064.	740.	86840.
	0.227		74.0	12465.	1142.	-310.	7010.	-567.	-1226.	0.357	1603.7
	111.	0.2110	50.0		13.70						1806.3
	694.0	0.8878	42.9	0.8511	0.0761	-0.0209	0.0489	-0.0012	-0.0025		0.011745
12	150.0	-6.0	30.0	11925.	1770.	-104.	6517.	-1332.	-3511.	565.4	43459.
	73.2	0.0	50.2	11925.	1770.	-104.	6517.	-1332.	-3511.	740.	65725.
	0.226		74.1	13430.	1993.	-105.	7475.	-1500.	-3124.	0.356	[illegible]
	111.	0.2110	50.0		24.16						1815.3
	694.0	0.8879	42.9	0.8445	0.1335	-0.0124	0.0443	[illegible]	[illegible]		[illegible]
13	152.0	-6.0	50.0	9110.	570.	-143.	2428.	-1456.	-2476.	564.9	74642.
	52.5	0.0	50.0	9110.	570.	-143.	2406.	-1456.	-2476.	739.	60439.
	0.191		74.0	10266.	637.	-160.	2774.	-2165.	-2771.	0.301	1207.1
	111.	0.2126	50.0		10.79						1410.2
	694.0	0.8844	33.7	0.9532	0.0546	-0.0157	0.0445	-0.1064	-0.0081		[illegible]
14	152.1	-6.0	[illegible]	10555.	544.	-155.	1172.	-1206.	-1444.	555.3	89044.
	52.8	0.0	50.3	10555.	544.	-165.	1172.	-1206.	-1449.	744.	83810.
	0.191		74.0	11902.	607.	-184.	1311.	-1344.	-1615.	0.301	1550.6
	111.	0.2126	50.0		11.30						1733.5
	694.0	0.8944	41.6	1.1030	0.0569	-0.0173	0.0235	-0.0039	-0.0005		0.011136
15	152.1	-7.0	50.0	9520.	502.	-102.	2551.	-1024.	-2557.	565.3	88804.
	57.0	0.0	50.3	9520.	502.	-102.	2551.	-1024.	-2557.	740.	84005.
	0.191		74.0	10676.	560.	-114.	2642.	-1415.	-2855.	0.301	1550.0
	110.	0.2224	50.0		5.46						1750.1
	693.4	0.2959	41.5	0.9935	0.0524	[illegible]	0.0551	[illegible]	-0.0065		0.011242

TABLE V.— Continued.

RUN 19 TEST 525

PT	VELS / QPSF / MACH / TEMP / VSNOTS	ALPHA,C / PSI / RHO/RHOO / RHOR	INA / PED POS / LONG STK / LAT STK / POW LEV	LIFT,C / LIFT / LIFT/Q / CL	DRAG,D / DRAG / DRAG/Q / FE / CD	SIDE,D / SIDE / SIDE/Q / CY	PITCH,D / PITCH / PITCH/Q / CM	YAW / YAW / YAW/Q / CN	ROLL / ROLL / ROLL/Q / CROLL	RPM / OMEGAR / V/OR	THRUST / CHASI / HP / HP/Q / CP/SIGMA
16	153.3	-7.0	80.0	13775.	2008.	+200.	6781.	+644.	+2464.	564.9	46082.
	68.20	0.0	50.1	13775.	2008.	+200.	6781.	+648.	+2464.	734.	48279.
	0.210		74.1	12113.	2257.	+227.	7685.	+725.	+3332.	0.345	1560.3
	111.	0.2114	50.0		29.5						1765.0
	694.0	0.8865	71.3	0.2745	0.1630	+0.0162	0.1048	+0.0610	+0.0075		0.00152
17	79.4	-7.0	80.0	3610.	201.	+38.	5044.	+731.	+1140.	565.5	28442.
	19.3	0.0	50.0	3610.	201.	-38.	5044.	+73.	+1140.	740.	27449.
	0.115		56.2	3485.	222.	+42.	6227.	+807.	+1148.	0.161	504.9
	110.	0.2159	50.0		10.46						502.5
	693.4	0.9064	17.2	1.0317	0.0574	+0.0104	1.3670	+0.0065	+0.0042		0.003000

RUN 20 TEST 525

PT	VELS / QPSF / MACH / TEMP / VSNOTS	ALPHA,C / PSI / RHO/RHOO / RHOR	INA / PED POS / LONG STK / LAT STK / POW LEV	LIFT,C / LIFT / LIFT/Q / CL	DRAG,D / DRAG / DRAG/Q / FE / CD	SIDE,D / SIDE / SIDE/Q / CY	PITCH,D / PITCH / PITCH/Q / CM	YAW / YAW / YAW/Q / CN	ROLL / ROLL / ROLL/Q / CROLL	RPM / OMEGAR / V/OR	THRUST / CHASI / HP / HP/Q / CP/SIGMA
8	78.5	-8.0	90.0	6700.	1140.	-83.	7053.	+115.	-387.	565.0	20610.
	20.1	0.0	49.8	6700.	1140.	-83.	7053.	+115.	-387.	734.	[illegible]
	0.117		55.0	6933.	1183.	-86.	7320.	+119.	-402.	0.174	454.9
	75.	0.2240	50.0		55.78						477.3
	671.7	0.9635	11.7	1.9437	0.3137	-0.0228	0.3695	+0.0010	-0.0035		[illegible]
9	76.8	-8.0	90.0	13570.	134.	-119.	-1244.	-756.	-2441.	565.4	67542.
	20.2	0.0	49.7	13570.	134.	-119.	-1244.	-756.	-2441.	734.	65501.
	0.117		68.5	14022.	139.	-124.	-1350.	-786.	-2534.	0.164	1191.3
	76.	0.2250	49.7		6.63						1238.7
	672.4	0.9617	23.4	3.7546	0.0366	-0.0325	-0.0675	-0.0604	-0.0250		[illegible]
10	78.9	-8.0	90.0	14420.	-35.	-109.	+3846.	-515.	-3311.	565.4	75482.
	20.2	0.0	49.7	14420.	-35.	-109.	+3846.	-515.	-3311.	738.	72529.
	0.117		72.2	15032.	-38.	-114.	+4016.	-534.	-3455.	0.180	1324.4
	78.	0.2277	50.2		-1.75						1382.2
	673.6	0.9581	24.1	3.9992	-0.0099	-0.0299	+0.2805	-0.0004	-0.0282		[illegible]
11	78.8	-6.0	90.0	13420.	360.	-98.	1913.	-314.	-2604.	564.6	60142.
	20.1	0.0	50.5	13420.	360.	-96.	1913.	-314.	-2603.	734.	59120.
	0.117		64.0	14084.	378.	-103.	2008.	-329.	-2737.	0.166	1067.2
	81.	0.2265	50.1		17.95						1120.0
	675.5	0.9529	20.2	3.6972	0.0992	-0.0270	0.1003	-0.0027	-0.0241		0.037162
12	91.1	-8.0	90.0	15580.	477.	-84.	+4556.	+491.	+2035.	564.0	92360.
	26.6	0.0	51.1	15580.	477.	-84.	+4556.	+491.	+2035.	738.	93569.
	0.135		73.4	16416.	503.	-89.	+4801.	+517.	+2144.	0.208	1664.0
	82.	0.2256	50.3		17.91						1733.8
	676.1	0.9490	37.3	3.2316	0.0989	-0.0174	-0.1798	+0.0032	+0.0131		0.001527
13	74.7	-6.0	90.0	15510.	-396.	-8.	-9111.	-5184.	-658.	564.0	94152.
	20.6	0.0	40.7	15510.	-396.	-8.	-9111.	-5184.	-658.	738.	[illegible]
	0.118		78.0	16464.	-419.	-8.	-9670.	-5406.	-694.	0.162	1754.7
	84.	0.2254	50.7		-14.40						1857.6
	677.4	0.9481	41.2	4.2248	-0.1072	-0.0022	-0.4692	-0.0438	-0.0055		[illegible]
14	90.0	-8.0	90.0	14885.	266.	-52.	-7990.	-4387.	-1574.	564.2	84533.
	26.1	0.0	40.7	14885.	265.	-52.	-7990.	-4387.	-1574.	734.	85004.
	0.134		78.9	15798.	282.	-55.	-8475.	-4651.	-1670.	0.207	1523.7
	86.	0.2241	50.6		10.20						[illegible]
	678.6	0.9628	34.4	3.1524	0.0563	-0.0111	-0.3220	-0.0249	-0.0104		[illegible]
15	96.2	-8.1	90.0	15655.	429.	2.	+10135.	-4448.	-2249.	555.9	98471.
	29.5	0.0	40.7	15655.	429.	2.	+10135.	-4448.	-2249.	738.	[illegible]
	0.142		81.6	16624.	456.	2.	+10762.	-4723.	-2384.	0.229	1781.7
	86.	0.2216	50.6		14.55						1842.0
	678.6	0.9617	41.9	2.9330	[illegible]	0.0003	-0.3613	-0.0259	-0.0131		0.012441
16	79.6	-12.0	90.0	10945.	-420.	-4.	816.	-3649.	235.	564.1	63597.
	20.2	0.0	40.6	10945.	-420.	-4.	816.	-3649.	235.	738.	62185.
	0.117		69.9	11607.	-445.	-4.	865.	-4082.	252.	0.202	1125.6
	87.	0.2241	50.6		-20.73						1193.8
	679.2	0.9430	23.0	2.9909	-0.1145	-0.0012	0.0424	-0.0327	0.0022		0.007641
17	79.6	-12.0	90.0	12010.	-149.	-50.	-733.	-4641.	1350.	564.7	62790.
	20.3	0.0	40.6	12010.	-149.	-50.	-733.	-4641.	1350.	738.	61051.
	0.118		70.3	12700.	-158.	-53.	-774.	-4903.	1434.	0.162	1115.6
	88.	0.2237	50.5		-7.35						1165.2
	679.9	0.9412	23.1	3.2736	-0.0406	-0.0136	-0.0380	-0.0342	0.0114		0.007787
18	79.6	+8.0	90.0	13225.	131.	-41.	-2490.	-4410.	266.	564.0	65574.
	20.2	0.0	40.6	13225.	131.	-41.	-2490.	-4410.	266.	738.	62057.
	0.117		69.4	14051.	139.	-44.	-2646.	-4685.	[illegible]	0.162	1115.2
	88.	0.2237	50.6		6.49						[illegible]
	679.9	0.9413	23.1	3.6219	0.0359	-0.0112	-0.1246	-0.0375	0.0024		[illegible]
19	79.6	-8.0	90.0	14335.	473.	-27.	-5947.	-4516.	561.	564.4	[illegible]
	20.3	0.0	40.7	14335.	473.	-27.	-5947.	-4516.	561.	734.	[illegible]
	0.118		70.0	15230.	503.	-29.	-6076.	-4585.	596.	0.162	[illegible]
	88.	0.2237	50.6		23.31						[illegible]
	679.9	0.9412	23.0	3.9027	0.1286	[illegible]	-0.1609	-0.0365	0.0044		[illegible]
20	79.6	-8.0	90.0	15460.	845.	+64.	-5176.	-4098.	-254.	563.4	60441.
	20.3	0.0	40.6	15460.	845.	+64.	-5176.	-4098.	-254.	734.	60414.
	0.118		70.1	16425.	895.	+73.	-5499.	-4355.	-269.	[illegible]	1069.5
	88.	0.2237	50.6		41.54						1130.4
	679.4	0.9412	23.0	4.2190	0.2295	+0.0160	-0.1404	-0.0347	-0.0021		[illegible]
21	79.9	-8.0	90.0	[illegible]	172.	+613.	-582.	-1616.	+1574.	564.4	[illegible]
	20.3	+4.0	[illegible]	[illegible]	172.	+613.	-582.	-1616.	+1574.	734.	[illegible]
	0.118		72.0	13675.	183.	+653.	-614.	-1720.	+1645.	[illegible]	[illegible]
	89.	0.2237	50.6		4.68						1165.6
	680.5	0.9342	23.1	3.5474	0.0468	+0.1594	-0.0301	-0.0135	[illegible]		[illegible]
22	79.2	-8.0	90.0	12985.	157.	+553.	+1416.	-2731.	-1505.	[illegible]	[illegible]
	20.2	-2.0	[illegible]	12985.	157.	+553.	+1416.	-2731.	-1505.	734.	[illegible]
	0.117		[illegible]	[illegible]	167.	+573.	+1504.	-2915.	-1603.	0.162	1084.0
	[illegible]	0.2227	50.0		7.76						1150.4
	681.1	0.9375	[illegible]	3.5975	0.0429	+0.0956	+0.0735	-0.0232	[illegible]		[illegible]
23	79.4	-8.0	90.0	[illegible]	142.	225.	+1850.	+5234.	1594.	564.5	[illegible]
	20.2	+2.0	[illegible]	[illegible]	142.	225.	+1850.	+5234.	1594.	734.	[illegible]
	0.117		[illegible]	13909.	151.	240.	+1962.	+5534.	1690.	0.162	[illegible]
	[illegible]	0.2227	50.5		[illegible]						1150.2
	[illegible]	0.9375	[illegible]	3.5566	0.0388	+0.0614	+0.0951	+0.0444	0.0143		[illegible]

TABLE V.— Continued.

RUN 20 TEST 525

PT	VELS / QPSF / MTUN / TEMP / VSNDRTS	ALFA / PSI / HORIZ / HHOP	[illegible] / FEDTRCS / LONG STA / LAT STA / POW LEV	LIFT / LIFT / LIFT/Q / CL	DRAG / DRAG / DRAG/Q / FE / CD	SIDE / SIDE / SIDE/Q / CY	PITCH / PITCH / PITCH/Q / CM	YAW / YAW / YAW/Q / CN	ROLL / ROLL / ROLL/Q / CROLL	RPM / OMEGA / R/UN	MAST / MAST / HP / HP/Q / C/SIGMA
24	74.9	-8.0	90.0	13056.	152.	536.	-656.	-6390.	3314.	564.2	61041.
	20.2	0.0	40.8	13056.	152.	536.	-656.	-6390.	3314.	739.	60311.
	0.117		70.0	13445.	162.	573.	-594.	-6624.	3542.	0.163	1066.5
	91.	0.2224	50.6		7.52						1160.8
	681.7	0.9358	23.0	3.5655	0.0415	0.1404	-0.0338	-0.6543	0.0241		0.007621
25	74.8	-5.0	90.0	12440.	167.	511.	-625.	-6248.	3490.	564.4	60421.
	20.2	0.0	40.6	12440.	167.	511.	-625.	-6248.	3490.	739.	60176.
	0.117		70.0	14027.	176.	546.	-662.	-6730.	3724.	0.162	1063.6
	91.	0.2224	50.6		8.22						1157.9
	681.7	0.9358	23.1	3.5439	0.0457	0.1399	-0.0436	-0.6536	0.0297		0.007592
26	79.8	-8.0	90.0	12745.	262.	1105.	3665.	-9245.	5091.	564.2	60561.
	25.1	8.0	40.5	12745.	262.	1105.	3665.	-9245.	5091.	739.	59491.
	0.117		70.1	13645.	264.	1163.	3925.	-9450.	5449.	0.162	1074.9
	92.	0.2220	50.6		13.03						1156.7
	682.3	0.9341	23.1	3.4926	0.0718	0.3032	0.1912	-0.0792	0.0434		0.007553
27	79.5	-8.0	90.0	12390.	363.	1556.	6437.	-11372.	7295.	564.6	60341.
	25.0	12.0	40.6	12390.	363.	1556.	6437.	-11372.	7295.	739.	58964.
	0.117		70.0	13263.	416.	1566.	6431.	-12173.	7604.	0.162	1066.7
	92.	0.2220	50.6		19.15						1146.0
	682.3	0.9342	23.0	3.4218	0.1058	0.0297	0.4434	-0.0976	0.0626		0.007495
28	79.6	-8.0	90.0	12260.	533.	3127.	13126.	-9522.	-18449.	564.2	59041.
	25.0	16.0	40.7	12260.	533.	3127.	13126.	-9522.	-18449.	739.	59315.
	0.117		70.0	13054.	571.	3347.	14055.	-10193.	-20337.	0.162	1073.4
	92.	0.2220	50.6		26.61						1149.5
	682.3	0.9342	23.1	3.3653	0.1470	0.7626	0.6691	-0.0416	-0.1624		0.007546
29	79.7	-8.0	90.0	13675.	606.	-3.	6094.	-4086.	356.	564.	60841.
	20.1	0.0	40.8	13675.	606.	-3.	6094.	-4086.	356.	736.	59042.
	0.117		54.2	14665.	652.	-3.	6541.	-4375.	354.	0.162	1072.4
	93.	0.2215	49.8		30.29						1150.6
	683.5	0.9325	23.0	3.7031	0.1673	-0.0008	0.3144	-0.0349	0.0031		0.007559
30	80.0	-8.0	90.0	12310.	-156.	-70.	-7662.	-4037.	-1007.	564.5	59601.
	20.2	0.0	40.6	12310.	-156.	-70.	-7662.	-4037.	-1007.	739.	58868.
	0.117		74.2	13262.	-164.	-75.	-8453.	-4324.	-1080.	0.163	1069.8
	93.	0.2216	49.9		-7.81						1147.3
	683.0	0.9324	23.1	3.3633	-0.0432	-0.0191	-0.4648	-0.0343	-0.0066		0.007524
31	79.5	-8.0	90.0	12475.	163.	-96.	-2617.	-5303.	17431.	564.1	59295.
	20.1	0.0	40.7	12475.	163.	-96.	-2617.	-5303.	17431.	736.	57962.
	0.117		70.1	13378.	175.	-103.	-2806.	-5687.	18694.	0.163	1058.4
	93.	0.2216	64.8		8.10						1135.
	683.0	0.9325	23.1	3.4247	0.0447	-0.0264	-0.1367	-0.0453	0.1488		0.007456
32	79.7	-8.0	90.0	11760.	286.	-71.	-2776.	-5135.	37765.	564.3	40240.
	20.1	0.0	40.8	11760.	286.	-71.	-2776.	-5135.	37765.	739.	75671.
	0.117		70.2	12611.	307.	-76.	-2974.	-5507.	40521.	0.162	1037.9
	93.	0.2216	89.3		14.25						1113.1
	683.0	0.9325	23.1	3.2361	0.0787	-0.0195	-0.1455	-0.0439	0.3232		0.007303
33	79.9	-8.0	90.0	12730.	157.	-170.	-1706.	3293.	-7124.	564.6	60002.
	20.2	0.0	60.3	12730.	157.	-170.	-1706.	3293.	-7124.	739.	57539.
	0.117		70.2	13652.	168.	-182.	-1830.	3532.	-7640.	0.163	1052.9
	93.	0.2216	50.2		7.78						1124.2
	683.0	0.9325	23.1	3.4664	0.0430	-0.0466	-0.0869	0.0280	-0.0606		0.007396
34	79.7	-8.0	90.0	12690.	199.	-275.	-1356.	10695.	-14767.	564.6	59742.
	20.1	0.0	80.1	12690.	199.	-275.	-1356.	10695.	-14767.	739.	57695.
	0.117		70.2	13555.	213.	-295.	-1456.	11464.	-15837.	0.162	1052.0
	93.	0.2216	50.1		9.42						1128.1
	683.0	0.9325	23.0	3.4825	0.0548	-0.0758	-0.0712	0.0946	-0.1266		0.007392
35	94.5	-8.0	90.0	12015.	334.	-48.	-12622.	-3393.	-1706.	564.5	64117.
	28.7	0.0	40.7	12015.	334.	-48.	-12022.	-3393.	-1706.	734.	60838.
	0.139		69.2	12444.	360.	-52.	-12951.	-3655.	-1838.	0.216	1116.9
	94.	0.2206	50.3		11.64						1205.3
	683.6	0.9282	25.9	2.3639	0.0657	-0.0094	-0.4500	-0.0207	-0.0104		0.007907
36	100.9	-10.0	90.0	12040.	317.	-82.	-9677.	-3555.	-3290.	564.6	75741.
	31.9	0.0	40.5	12040.	317.	-82.	-9377.	-3555.	-3290.	734.	72119.
	0.146		69.4	13035.	343.	-84.	-10063.	-3646.	-3562.	0.230	1324.5
	96.	0.2196	50.6		9.95						1434.0
	684.8	0.9237	30.6	2.0880	0.0550	-0.0142	-0.3265	-0.0192	-0.0177		0.009344
37	109.9	-12.0	90.0	11925.	416.	156.	-7335.	-7436.	-942.	564.3	95590.
	37.6	0.0	31.7	11925.	416.	156.	-7335.	-7436.	-942.	739.	91617.
	0.161		41.7	12454.	454.	172.	-7977.	-8061.	-915.	0.251	1616.3
	97.	0.2187	50.6		11.12						1621.7
	685.3	0.9207	42.7	1.7523	0.0614	0.0232	-0.2051	-0.0340	-0.0038		0.011195
38	122.2	-12.0	90.0	9610.	1654.	147.	-5346.	-7455.	-1149.	564.7	75022.
	46.2	0.0	31.6	9610.	1654.	147.	-5346.	-7455.	-1149.	739.	69796.
	0.179		41.7	10513.	1669.	161.	-5844.	-8034.	-1257.	0.279	1297.7
	99.	0.2173	50.4		35.77						1419.5
	686.7	0.9181	30.8	1.1482	0.1976	0.0176	-0.1216	-0.0293	-0.0043		0.009292
39	122.4	-12.0	90.0	11065.	1450.	170.	-3869.	-6736.	166022.	564.6	88947.
	46.3	0.0	31.7	11065.	1450.	170.	-3859.	-6736.	166022.	739.	83205.
	0.179		41.7	12135.	1586.	186.	-4254.	-9556.	177542.	0.279	1524.3
	99.	0.2173	50.5		31.36						1667.5
	686.7	0.9181	39.5	1.3195	0.1729	0.0203	-0.0842	-0.0324	0.5645		0.010925
40	122.5	-12.0	90.0	11685.	1350.	199.	-5432.	-4237.	-734.	564.2	95430.
	46.3	0.0	31.7	11685.	1350.	199.	-5432.	-4237.	-734.	734.	91222.
	0.179		41.7	12546.	1525.	217.	-5955.	-10125.	-805.	0.280	1671.0
	100.	0.2169	50.5		30.66						183[illegible].3
	687.3	0.9125	44.1	1.3934	0.1658	[illegible]	-0.0233	-0.0342	-0.0027		0.012022
41	134.5	-8.0	75.1	11035.	1634.	55.	-6429.	-6401.	-3437.	564.4	98415.
	59.6	0.0	40.6	11035.	1634.	55.	-6424.	-6467.	-3437.	734.	90017.
	0.203		91.2	12677.	1814.	59.	-7069.	-7712.	-3604.	0.318	1669.4
	103.	0.2167	50.6		27.80						1647.0
	689.1	0.9034	44.5	1.0425	0.1525	0.0033	-0.1226	-0.0621	-0.0344		0.012126
42	139.3	-8.0	75.0	10303.	2124.	31.	-5791.	-6567.	-3750.	564.7	62957.
	54.3	0.0	40.5	10365.	2124.	31.	-5797.	-6567.	-3760.	734.	73444.
	0.201		91.5	11443.	2355.	34.	-6427.	-7262.	-4191.	0.338	1366.3
	104.	0.2144	50.5		35.53						1537.3
	689.7	0.9014	35.2	0.9601	0.1946	0.0024	-0.1026	-0.0114	-0.0110		0.010688

TABLE V.— Continued.

RUN 20 TEST 525

PT	VKTS / QPSF / MIUN / TEMP / VSNDKTS	ALFS,C / PSI / RHOFIXD / RMOR	INA / PED POS / LONG STK / LAT STK / PWR LEV	LIFT,C / LIFT / LIFT/R / CL	DRAG,C / DRAG / DRAG/R / FE / CD	SIDE,C / SIDE / SIDE/R / CY	PITCH,C / PITCH / PITCH/R / CM	YAW,C / YAW / YAW/R / CN	ROLL,C / ROLL / ROLL/R / CROLL	RPM / OMEGA R / V/OR	THRST,C / THRST / HP / HP/R / CP/SIGMA
43	139.7	-8.0	75.0	4595.	2458.	31.	-4306.	-6833.	-5126.	504.5	12300.
	59.5	0.0	40.0	4595.	2458.	31.	-4306.	-6833.	-5126.	739.	6452.
	0.203		41.8	10859.	2730.	34.	-4850.	-7590.	-5694.	0.316	220.5
	105.	0.2146	50.5		41.33						362.2
	690.3	0.9002	30.5	0.6913	0.2245	0.0024	-0.0772	-0.0147	-0.0148		0.000492
44	139.5	-8.0	75.0	8845.	2619.	25.	-3534.	-6540.	-3811.	504.7	61760.
	59.5	0.0	40.6	8845.	2619.	25.	-3534.	-6540.	-3811.	739.	54962.
	0.203		51.9	9825.	3132.	20.	-3920.	-7050.	-4214.	0.315	1045.7
	105.	0.2140	50.4		43.54						1501.7
	693.3	0.9022	25.6	0.8207	0.2615	0.0023	-0.0824	-0.0163	-0.0110		0.00370
45	160.6	-8.0	45.0	10910.	756.	83.	4563.	-8054.	-1900.	504.6	115045.
	77.7	0.0	40.5	10910.	756.	83.	4563.	-8054.	-1950.	739.	110441.
	0.233		65.4	12263.	850.	93.	5129.	-9053.	-2113.	0.367	2054.6
	105.	0.2115	50.5		9.73						2307.5
	692.2	0.8597	50.6	0.7759	0.0538	0.0059	0.0018	-0.0110	-0.0042		0.00532
46	145.0	-8.0	45.0	6395.	8406.	-17.	-24384.	-7327.	-3592.	502.7	83.0
	63.5	0.0	40.6	6095.	8406.	-17.	-24384.	-7327.	-3592.	737.	-3125.
	0.210		84.1	6817.	9420.	-19.	-27271.	-8194.	-4017.	0.332	40.3
	105.	0.2325	50.3		76.09						51.9
	692.2	0.8951	7.4	0.5293	0.6209	-0.0015	-0.4036	-0.0194	-0.0097		0.000543

RUN 21 TEST 525

PT	VKTS / QPSF / MIUN / TEMP / VSNDKTS	ALFS,C / PSI / RHOFIXD / RMOR	INA / PED POS / LONG STK / LAT STK / PWR LEV	LIFT,C / LIFT / LIFT/R / CL	DRAG,C / DRAG / DRAG/R / FE / CD	SIDE,C / SIDE / SIDE/R / CY	PITCH,C / PITCH / PITCH/R / CM	YAW,C / YAW / YAW/R / CN	ROLL,C / ROLL / ROLL/R / CROLL	RPM / OMEGA R / V/OR	THRST,C / THRST / HP / HP/R / CP/SIGMA
3	81.0	-8.0	60.0	5360.	-1154.	-5.	3717.	-1251.	393.	504.5	49376.
	20.6	0.0	43.8	5360.	-1154.	-5.	3717.	-1251.	393.	734.	50025.
	0.118		65.0	5797.	-1445.	-5.	4014.	-1352.	425.	0.105	840.4
	97.	0.2196	50.1		-50.13						962.9
	685.4	0.9227	20.3	1.4405	-0.3101	-0.0013	0.1901	-0.0014	0.0033		0.00531
4	81.1	-4.0	60.0	7005.	-991.	-3.	1962.	-1752.	-267.	504.5	49615.
	20.5	0.0	43.6	7005.	-991.	-3.	1962.	-1752.	-267.	734.	48775.
	0.116		63.0	7584.	-1074.	-3.	2120.	-1899.	-289.	0.105	800.4
	98.	0.2194	50.1		-48.26						934.9
	655.0	0.9230	20.3	1.8848	-0.2666	-0.0008	0.1005	-0.0147	-0.0022		0.000202
5	80.9	-2.0	60.0	7805.	-877.	-4.	-32.	-2110.	-80.	504.7	49649.
	20.4	0.0	43.8	7805.	-877.	-4.	-32.	-2110.	-80.	734.	46510.
	0.118		63.0	8471.	-952.	4.	-34.	-2289.	-90.	0.105	800.7
	99.	0.2196	50.2		-42.91						955.0
	686.7	0.9214	20.3	2.1099	-0.2371	0.0011	-0.0016	-0.0177	-0.0007		0.00259
6	80.9	0.0	60.0	8460.	-729.	-14.	-1232.	-1750.	410.	504.4	48557.
	20.4	0.0	43.7	8460.	-729.	-14.	-1232.	-1750.	410.	734.	46507.
	0.119		63.1	9180.	-793.	-15.	-1339.	-1903.	440.	0.105	867.5
	100.	0.2186	50.0		-35.75						943.1
	687.3	0.9148	20.3	2.2924	-0.1975	-0.0038	-0.0635	-0.0147	0.0035		0.000189
7	81.1	2.0	60.0	9245.	-614.	2.	-1324.	-1897.	85.	504.1	48557.
	20.5	0.0	43.6	9245.	-614.	2.	-1324.	-1897.	85.	734.	48264.
	0.116		63.0	10051.	-668.	2.	-1445.	-2063.	94.	0.105	906.7
	100.	0.2186	50.1		-30.01						942.4
	687.3	0.9198	20.3	2.4962	-0.1658	0.0005	-0.0663	-0.0159	0.0007		0.000191
8	81.4	4.0	60.0	9960.	-457.	-8.	-2675.	-1745.	780.	504.5	48457.
	20.7	0.0	43.8	9960.	-457.	-8.	-2575.	-1745.	780.	734.	47619.
	0.119		63.1	10550.	-497.	-9.	-2808.	-1899.	849.	0.106	862.2
	100.	0.2196	50.2		-22.13						937.5
	687.3	0.9197	20.3	2.6845	-0.1222	-0.0021	-0.1362	-0.0145	0.0065		0.000147
9	80.8	6.0	60.0	10630.	-301.	8.	-3309.	-2084.	264.	504.5	48577.
	20.3	0.0	43.9	10630.	-301.	8.	-3309.	-2084.	264.	734.	47024.
	0.118		63.0	11577.	-345.	9.	-3604.	-2240.	310.	0.105	859.6
	101.	0.2182	50.2		-14.01						950.2
	687.9	0.9182	20.3	2.8974	-0.0846	0.0022	-0.1716	-0.0175	0.0024		0.000142
10	81.2	7.0	60.0	11665.	-250.	1.	-3915.	-1777.	-72.	504.5	47446.
	20.4	0.0	43.9	11665.	-250.	1.	-3915.	-1777.	-72.	734.	47242.
	0.118		63.1	12675.	-273.	1.	-4271.	-1939.	-74.	0.105	851.5
	102.	0.2170	50.2		-12.25						931.5
	688.5	0.9165	20.3	2.9972	-0.0676	0.0003	-0.2014	-0.0149	-0.0006		0.000104
11	120.2	-5.0	60.0	9275.	787.	62.	7514.	-3082.	1241.	504.7	89760.
	44.2	0.0	39.4	9275.	787.	62.	7514.	-3082.	1241.	734.	88014.
	0.175		64.0	10276.	872.	69.	8321.	-3401.	1375.	0.274	1392.2
	106.	0.2145	50.1		17.92						1544.1
	690.9	0.9026	24.5	1.1004	0.0945	0.0072	0.1788	-0.0151	0.0048		0.00754
12	119.7	-5.0	60.0	10670.	427.	25.	4047.	-4365.	144.	504.7	58841.
	43.8	0.0	42.0	10670.	427.	25.	4047.	-4365.	144.	734.	57424.
	0.174		64.0	11820.	473.	28.	5144.	-4810.	160.	0.275	1062.4
	105.	0.2146	50.3		2.18						1172.4
	690.9	0.9027	24.5	1.3484	0.1127	0.0032	0.1116	-0.0171	0.0015		0.00762
13	119.8	-1.0	60.0	12095.	1120.	21.	2404.	-4875.	-661.	504.5	60222.
	43.8	0.0	40.0	12095.	1120.	21.	2404.	-4875.	-661.	734.	57595.
	0.174		64.0	13423.	1243.	23.	2674.	-5106.	-734.	0.274	1096.1
	107.	0.2142	50.4		25.59						1172.0
	691.5	0.9011	24.5	1.5251	0.1412	0.0026	0.0578	-0.0183	-0.0062		0.00703
14	120.2	1.0	60.0	13570.	1304.	22.	443.	-4707.	-130.	504.2	60482.
	44.2	0.0	40.0	13570.	1304.	22.	443.	-4707.	-130.	734.	59073.
	0.174		64.0	15051.	1441.	24.	491.	-5290.	-144.	0.275	1136.0
	107.	0.2142	50.0		24.57						1175.1
	691.5	0.9010	24.5	1.7015	0.1655	0.0026	0.0108	-0.0185	-0.0015		0.000715

TABLE V.— Continued.

RUN 21 TEST 525

PT	VKTS / QPSF / MTUN / TEMP / VSNDKTS	ALFS,C / PSI / — / RHORTDC / RHOR	INB PED POS / LONG STK / LAT STK / — / POS LEV	LIFT,U / LIFT / LIFT/6 / — / CL	DRAG,U / DRAG / DRAG/6 / FE / CD	SIDE,U / SIDE / SIDE/6 / — / CY	PITCH,U / PITCH / PITCH/6 / — / CM	YAW,U / YAW / YAW/6 / — / CN	ROLL,U / ROLL / ROLL/6 / — / CROLL	RPM / OMEGAR / V/OR	HMAST G / CMAST G / HP / HP/6 / CP/SIGMA
15	120.2	2.0	60.0	14195.	1406.	+7.	-335.	-3823.	+567.	564.1	59822.
	44.0	0.0	40.1	14195.	1406.	+7.	-335.	-3823.	-567.	736.	58398.
	0.174		64.7	15771.	1563.	+6.	+373.	+4250.	+563.	0.275	1058.2
	108.	0.2138	50.2		31.44						1176.5
	692.2	0.8993	20.0	1.7822	0.1765	+0.0009	+0.0084	+0.0149	+0.0627		0.007720
16	120.1	3.2	60.0	14925.	1475.	-26.	-1644.	-3664.	-144.	564.1	59363.
	43.9	0.0	40.0	14925.	1475.	-26.	-1644.	-3669.	-149.	736.	58417.
	0.174		64.7	16594.	1640.	-29.	-1824.	-4236.	-166.	0.274	1054.2
	108.	0.2117	50.0		33.49						1172.5
	692.2	0.8992	21.5	1.8747	0.1856	-0.0033	-0.0393	-0.0149	-0.0066		0.007703

RUN 22 TEST 525

PT	VKTS / QPSF / MTUN / TEMP / VSNDKTS	ALFS,C / PSI / — / RHORTDC / RHOR	INB PED POS / LONG STK / LAT STK / — / POS LEV	LIFT,U / LIFT / LIFT/6 / — / CL	DRAG,U / DRAG / DRAG/6 / FE / CD	SIDE,U / SIDE / SIDE/6 / — / CY	PITCH,U / PITCH / PITCH/6 / — / CM	YAW,U / YAW / YAW/6 / — / CN	ROLL,U / ROLL / ROLL/6 / — / CROLL	RPM / OMEGAR / V/OR	HMAST G / CMAST G / HP / HP/6 / CP/SIGMA
3	46.9	0.0	40.0	12875.	443.	+24.	-5703.	-3375.	1547.	565.0	67019.
	7.2	0.0	40.1	12875.	443.	+24.	-5703.	-3375.	1547.	744.	65321.
	0.070		64.1	13659.	456.	+25.	-5673.	-3476.	1593.	0.107	827.7
	75.	0.2308	50.0		61.23						852.4
	671.7	0.9710	15.8	4.8322	0.3363	+0.0183	-0.8287	-0.0801	0.1367		0.005574
4	60.8	0.0	40.0	12770.	716.	-16.	-7970.	-3530.	3267.	564.7	37811.
	12.1	0.0	40.0	12770.	716.	-16.	-7970.	-3530.	3267.	739.	35991.
	0.091		58.9	13143.	740.	-17.	-8234.	-3647.	3375.	0.139	661.5
	76.	0.2301	50.0		59.16						653.2
	672.0	0.9679	12.4	5.3292	0.3266	-0.0073	-0.6923	-0.0501	0.0464		0.004473
5	79.2	0.0	40.0	12965.	1426.	-20.	-7106.	-3275.	4096.	564.9	32678.
	20.5	0.0	39.9	12955.	1426.	-20.	-7106.	-3275.	4096.	739.	30604.
	0.118		75.9	13479.	1482.	-21.	-7376.	-3400.	4252.	0.181	567.6
	77.	0.2290	50.0		64.79						563.2
	673.0	0.9634	12.5	3.5061	0.3856	-0.0054	-0.3651	-0.0275	0.0344		0.003814
6	117.4	+1.0	60.0	12495.	1044.	-1237.	-7004.	2647.	-7875.	564.1	63017.
	43.3	-4.0	40.1	12495.	1044.	-1237.	-7004.	2647.	-7875.	738.	57871.
	0.175		74.1	13150.	1095.	-1302.	-7415.	2785.	-8288.	0.265	1067.3
	90.	0.2258	50.7		23.45						1144.3
	678.4	0.9502	19.8	1.5567	0.1256	-0.1541	-0.1570	0.0703	-0.0365		0.007518
7	117.7	+1.0	60.0	12370.	1034.	+649.	+6806.	760.	-2603.	563.8	61540.
	44.3	+2.0	40.1	12370.	1034.	-639.	-6806.	760.	-2603.	738.	58730.
	0.175		74.1	13041.	1094.	+687.	-7263.	804.	-2755.	0.264	1074.1
	83.	0.2246	50.0		23.34						1136.7
	676.7	0.9449	19.8	1.5427	0.1290	+0.0809	-0.1615	0.0024	+0.0101		0.007474
8	117.7	+1.0	50.0	12365.	1052.	675.	-6381.	+7462.	5184.	563.9	58324.
	44.3	2.0	33.5	12365.	1052.	675.	-6381.	+7462.	5184.	738.	60252.
	0.175		74.1	13086.	1113.	714.	-6755.	-7916.	5487.	0.269	1063.9
	83.	0.2240	50.7		23.75						1122.6
	676.7	0.9449	19.8	1.5421	0.1312	0.0842	+0.1519	-0.0295	0.0201		0.007362
9	118.1	+1.0	60.0	12405.	1161.	1252.	+5568.	+9946.	8690.	563.6	50587.
	44.6	4.0	40.1	12405.	1161.	1252.	+5568.	+9946.	8690.	738.	60416.
	0.175		74.0	13153.	1210.	1323.	+5925.	+10544.	9231.	0.270	1649.3
	84.	0.2242	56.7		25.61						1112.6
	677.0	0.9431	19.7	1.5362	0.1415	0.1550	+0.1319	+0.1363	0.0315		0.007320
10	118.0	+1.0	60.0	12265.	1249.	+20464.	+5168.	+118004.	664595.	564.0	53391.
	44.4	0.0	40.2	12265.	1249.	+20464.	-5168.	-118004.	664595.	736.	62360.
	0.175		74.5	13028.	1327.	+22208.	+5490.	+125350.	705434.	0.270	1030.6
	85.	0.2236	51.0		28.15						1100.4
	678.0	0.9412	19.5	1.5272	0.1555	+2.6104	+0.1225	+0.4566	2.5724		0.007233
11	118.5	+1.0	60.0	12100.	1196.	21.	1263.	+4162.	624.	563.5	58124.
	44.7	0.0	40.1	12100.	1196.	21.	1263.	-4162.	624.	736.	56456.
	0.175		64.3	12878.	1273.	22.	1366.	+4430.	669.	0.271	1024.6
	86.	0.2233	50.5		26.77						1090.5
	678.6	0.9394	19.7	1.5065	0.1479	0.0026	0.0362	+0.0150	0.0024		0.007164
12	118.3	+1.0	60.0	12075.	1214.	72.	-13332.	+4275.	725.	564.1	57565.
	44.5	0.0	40.0	12075.	1214.	72.	-13332.	+4275.	725.	736.	55460.
	0.175		64.2	12650.	1242.	77.	-14180.	+4544.	772.	0.270	1015.7
	86.	0.2233	51.7		27.25						1081.0
	679.6	0.9349	19.7	1.4981	0.1516	0.0089	+0.3145	+0.0155	0.0020		0.007106
13	119.3	+1.0	60.0	12673.	1210.	10.	+7619.	2247.	19323.	563.7	41623.
	44.4	0.0	40.0	12673.	1210.	10.	-7619.	2247.	19323.	738.	60568.
	0.175		79.1	12466.	1290.	11.	+7485.	2444.	20861.	0.271	1001.0
	87.	0.2229	70.0		27.23						1067.3
	679.2	0.9360	19.7	1.5006	0.1504	0.0012	+0.1660	0.0049	0.0747		0.007027
14	119.4	+1.0	60.0	11595.	1371.	11.	+6851.	680.	43766.	563.6	27263.
	44.5	0.0	40.0	11595.	1371.	11.	+6851.	680.	43766.	736.	62405.
	0.175		74.3	12362.	1462.	10.	+7304.	917.	46641.	0.271	961.0
	87.	0.2229	64.0		30.82						1045.4
	679.2	0.9360	19.7	1.4400	0.1703	0.0013	+0.1614	0.0382	0.1694		0.006892
15	118.6	+1.0	60.0	12665.	1251.	+245.	+6603.	1657.	+7444.	563.4	60302.
	44.6	0.0	60.0	12665.	1251.	+245.	+6603.	1657.	+7444.	734.	51157.
	0.175		74.1	12457.	1336.	+315.	+7055.	1965.	+7433.	0.271	997.1
	88.	0.2225	50.0		26.08						1065.0
	679.4	0.9362	19.7	1.4901	0.1551	+0.0366	+0.1556	0.0072	+0.0287		0.007036

ORIGINAL PAGE IS OF POOR QUALITY

TABLE V.— Continued.

RUN 22 TEST 525

PT	VKTS	ALPHA,C	TSA	LIFT,U	DRAG,U	SIDE,U	PITCH,U	YAW,U	ROLL,U	RPM	THRUST
	QPSF	PSI	PFD POS	LIFT	DRAG	SIDE	PITCH	YAW	ROLL	OMEGA	THRUST
	M'UN		LONG STK	LIFT/Q	DRAG/Q	SIDE/Q	PITCH/Q	YAW/Q	ROLL/Q	V/OR	HP
	TEMP	RHO/RHOO	LAT STK		FE						HP/Q
	VSNDRTS	RHOR	POW LEV	CL	CD	CY	CM	CN	CROLL		CP/SIGMA
16	116.7	-1.0	80.0	12020.	1267.	-587.	-5875.	7983.	-11034.	584.1	[illegible]
	44.2	0.0	79.5	12020.	1267.	-587.	-5875.	7983.	-11034.	739.	44466.
	0.175		79.1	12554.	1375.	-627.	-6276.	8527.	-11786.	0.271	1021.5
	66.	0.2225	50.0		26.43						1064.[illegible]
	679.9	0.9362	19.7	1.4873	0.1543	-0.0726	-0.1380	0.0307	-0.0424		0.007025
17	79.9	0.0	95.0	8200.	2090.	-3.	1724.	-2630.	1244.	457.5	8509.
	20.5	0.0	40.2	8200.	2090.	-3.	1724.	-2630.	1244.	599.	8812.
	0.118		54.9	8606.	2214.	-3.	1850.	-2766.	1275.	0.225	111.7
	86.	0.2244	50.0		102.38						116.5
	679.9	0.9331	3.5	2.2193	0.5656	-0.0006	0.0840	-0.0221	0.0111		0.001456
18	79.9	0.0	95.0	10340.	2554.	6.	6102.	-3267.	2244.	457.8	[illegible]
	20.5	0.0	40.5	10340.	2554.	6.	6102.	-3267.	2244.	599.	10735.
	0.118		54.8	10913.	2696.	6.	6441.	-3448.	2369.	0.225	141.1
	86.	0.2252	50.8		124.67						140.9
	679.6	0.9275	5.2	2.7886	0.6888	0.0016	[illegible]	-0.0274	0.0188		0.001836
19	80.0	2.0	95.0	10650.	2764.	12.	5546.	-3481.	2207.	457.8	5355.
	20.5	0.0	40.4	10650.	2764.	12.	5546.	-3481.	2207.	599.	6751.
	0.118		54.7	11261.	2923.	13.	5864.	-3680.	2082.	0.226	89.4
	87.	0.2246	51.6		134.77						94.5
	679.2	0.9457	3.5	2.8689	0.7446	0.0032	0.2843	-0.0201	0.0227		0.001162
20	79.8	4.0	95.0	11670.	3169.	-3.	5745.	-3597.	1895.	457.4	4954.
	20.4	0.0	40.3	11670.	3169.	-3.	5745.	-3597.	1895.	599.	7163.
	0.118		54.6	12339.	3351.	-3.	6074.	-3803.	2004.	0.225	95.8
	87.	0.2246	50.9		155.24						90.7
	679.2	0.9458	3.5	3.1584	0.8577	-0.0008	0.2959	-0.0303	0.0159		0.001117
21	79.9	6.0	95.0	12610.	3651.	7.	5542.	-3912.	2325.	457.9	5695.
	20.4	0.0	40.3	12610.	3651.	7.	5542.	-3912.	2325.	599.	7690.
	0.118		54.6	13333.	3860.	7.	6171.	-4136.	2456.	0.225	82.7
	87.	0.2249	50.8		176.64						87.5
	679.2	0.9456	3.4	3.4096	0.9870	0.0019	0.3035	-0.0324	0.0195		0.001474
22	79.9	6.0	95.0	11605.	3334.	12.	4924.	-2453.	-937.	457.9	1576.
	20.5	6.0	40.4	11605.	3334.	12.	4924.	-2453.	-937.	599.	351.
	0.118		54.6	12334.	3525.	13.	5206.	-2593.	-991.	0.225	14.0
	87.	0.2248	50.7		162.44						14.8
	679.2	0.9458	3.5	3.1447	0.9062	0.0032	0.2530	-0.0206	-0.0079		0.000182
23	80.0	8.0	95.0	12890.	3916.	0.	5061.	-2285.	-1284.	457.4	519.
	20.5	0.0	40.4	12890.	3916.	0.	5061.	-2285.	-1284.	599.	519.
	0.118		54.5	13654.	4148.	0.	5362.	-2420.	-1360.	0.226	12.0
	88.	0.2244	56.8		191.39						12.7
	679.9	0.9440	3.5	3.4834	1.0579	0.0000	0.2611	-0.0142	-0.0108		0.000157
24	83.3	8.0	95.0	10800.	3218.	15.	3163.	-2074.	-677.	452.2	-1119.
	23.6	0.0	40.4	10800.	3218.	15.	3163.	-2074.	-677.	592.	-3064.
	0.118		54.5	11441.	3409.	16.	3372.	-2197.	-717.	0.229	-30.0
	88.	0.2244	50.9		156.17						-31.8
	679.9	0.9440	3.6	2.6957	0.8026	0.0040	0.1624	-0.0175	-0.0056		-0.000405
25	80.0	10.0	95.0	13280.	4221.	16.	4536.	-1915.	-1612.	458.1	-2317.
	20.4	0.0	40.3	13280.	4221.	16.	4536.	-1915.	-1612.	600.	-2596.
	0.118		54.4	14067.	4471.	17.	4805.	-2029.	-1708.	0.225	-35.7
	88.	0.2244	50.9		236.53						-37.8
	679.9	0.9440	3.5	3.5899	1.1411	0.0045	0.2335	-0.0161	-0.0135		-0.000464
26	79.4	10.0	95.0	13150.	4164.	20.	4074.	-1775.	-1155.	457.4	-2517.
	20.4	0.0	40.2	13150.	4164.	20.	4074.	-1775.	-1155.	599.	-3201.
	0.118		54.4	13924.	4432.	21.	4321.	-1880.	-1200.	0.225	-41.5
	88.	0.2244	50.8		205.20						-44.0
	679.5	0.9441	3.5	3.5032	1.1337	0.0054	0.2163	-0.0150	-0.0045		-0.000541
27	79.8	11.0	95.0	13615.	4445.	20.	4949.	-1914.	-794.	457.2	-2856.
	20.3	0.0	40.4	13615.	4445.	20.	4949.	-1914.	-746.	598.	-2426.
	0.118		54.3	14440.	4717.	21.	5251.	-2037.	-847.	0.225	-42.0
	89.	0.2240	50.9		218.78						-44.5
	680.5	0.9420	3.4	3.7023	1.2087	0.0054	0.2561	-0.0182	-0.0067		-0.000549
28	79.5	12.0	95.0	13575.	4894.	-63.	3284.	-3163.	-2431.	457.5	-2798.
	20.1	0.0	40.4	13575.	4894.	-63.	3284.	-3163.	-2431.	599.	-2906.
	0.117		54.2	14404.	5192.	-66.	3445.	-3293.	[illegible]	0.224	-41.4
	89.	0.2240	50.4		243.69						-43.9
	680.5	0.9424	3.5	3.7222	1.3432	-0.0228	0.1710	-0.0265	[illegible]		-0.000541
29	79.9	0.0	95.0	13555.	2806.	-24.	3369.	-2285.	-1586.	563.2	17557.
	20.4	0.0	40.7	13555.	2806.	-24.	3369.	-2285.	-1586.	737.	14267.
	0.118		54.2	14364.	2971.	-25.	3575.	-2423.	-1683.	0.183	264.4
	89.	0.2240	50.8		137.49						301.7
	680.5	0.9323	11.2	3.6773	0.7596	-0.0065	0.1734	-0.0193	-0.0134		0.001942
30	80.0	2.0	95.0	14190.	3175.	-14.	3259.	-2430.	-1492.	563.3	[illegible]
	20.4	0.0	40.1	14190.	3175.	-14.	3259.	-2430.	-1492.	737.	11744.
	0.118		54.2	15015.	3362.	-15.	3471.	-2584.	-1599.	0.183	256.5
	91.	0.2232	50.6		155.90						251.9
	681.7	0.9359	10.4	3.8495	0.8613	-0.0038	0.1643	-0.0205	-0.0126		0.001652
31	81.7	4.0	95.0	11105.	2689.	0.	2773.	-2190.	-1312.	563.6	8944.
	21.2	0.0	40.2	11105.	2689.	0.	2773.	-2190.	-1312.	737.	5797.
	0.120		54.1	11831.	3076.	0.	2954.	-2334.	-1398.	0.188	131.4
	91.	0.2231	50.6		136.00						140.[illegible]
	681.7	0.9386	9.2	2.8849	0.7519	0.0000	0.1373	-0.0178	-0.0106		0.000932
32	81.1	6.0	95.0	12230.	3298.	-13.	[illegible]	-2010.	-955.	563.0	6172.
	20.9	0.0	40.2	12230.	3298.	-13.	[illegible]	-2010.	-955.	737.	6104.
	0.119		54.0	13026.	3513.	-14.	2557.	-2141.	-1017.	0.185	94.5
	91.	0.2231	50.4		157.86						89.6
	681.7	0.9387	8.5	3.2572	0.8780	-0.0034	0.1266	-0.0165	-0.0078		0.000543

TABLE V.— Continued.

RUN 22 TEST 525

PT	VKTS QPSF RHOx TEMP VSNDKTS	ALFS,C PSI RHOPIVC RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U LIFT LIFT/Q CL	DRAG,U DRAG DRAG/Q FE CD	SIDE,U SIDE SIDE/Q CY	PITCH,U PITCH PITCH/Q CM	YAW,U YAW YAW/Q CN	ROLL,U ROLL ROLL/Q CROLL	RPM OMEGAR V/OR	HHAST Q CHAST Q HP HP/Q CP/SIGMA
33	80.1	0.0	95.0	13070.	3701.	3.	2336.	-2125.	-1455.	563.1	4175.
	20.0	0.0	50.2	13070.	3701.	1.	2336.	-2125.	-1455.	737.	456.
	0.114		54.3	13920.	3942.	3.	2482.	-2317.	-1544.	0.183	43.8
	91.	0.2232	50.9		181.30						48.8
	683.3	0.4389	0.0	3.5373	1.0017	0.0008	0.1200	-0.1093	-0.0122		0.000322
34	79.2	10.0	95.0	13675.	4110.	20.	2147.	-4667.	478.	556.3	2017.
	20.0	0.0	40.4	13675.	4110.	20.	2147.	-4667.	478.	731.	-2064.
	0.116		54.1	14562.	4377.	21.	2286.	-4332.	509.	0.183	-0.5
	91.	0.2232	50.9		205.44						-0.5
	681.7	0.9391	6.0	3.7656	1.1376	0.0055	0.1131	-0.0356	0.0411		-0.000003
35	78.7	1[illegible]	95.0	14060.	4324.	-19.	2121.	-635.	2457.	559.8	-564.
	19.6	0.0	50.4	14060.	4324.	-19.	2121.	-635.	2457.	733.	-1971.
	0.116		54.0	14934.	4612.	-20.	2263.	-691.	2620.	0.181	-20.7
	92.	0.2226	50.8		220.12						-22.[illegible]
	682.3	0.9375	6.2	3.9375	1.2161	-0.0053	0.1135	-0.0073	0.0215		-0.000148
36	79.9	12.0	95.0	14230.	4846.	-146.	-674.	-1622.	404.	567.2	-2037.
	20.3	0.0	50.6	14230.	4846.	-146.	-674.	-1622.	404.	733.	-3845.
	0.117		54.0	15103.	5228.	-156.	-719.	-1944.	464.	0.184	-52.3
	92.	0.2225	50.4		241.84						-55.6
	682.3	0.9373	4.2	3.6727	1.3351	-0.0403	-0.0356	-0.0154	0.0077		-0.000374
37	79.9	12.0	95.0	14200.	4673.	-132.	-644.	-1967.	1031.	559.5	-2157.
	20.5	0.0	51.4	14200.	4673.	-132.	-644.	-1967.	1031.	732.	-3186.
	0.117		54.0	15151.	5199.	-141.	-400.	-2099.	1088.	0.184	-52.8
	92.	0.2228	50.4		240.41						-56.5
	682.3	0.9373	4.0	3.6765	1.3262	-0.0360	-0.0430	-0.0167	0.0385		-0.000379
38	80.4	12.0	95.0	16585.	6254.	-122.	7206.	-1956.	277.	562.2	-3635.
	20.5	0.0	50.6	16585.	6254.	-122.	7206.	-1956.	277.	736.	-2166.
	0.116		44.0	17647.	6673.	-130.	7684.	-2090.	295.	0.184	-53.5
	92.	0.2225	50.5		305.29						-57.1
	682.3	0.9372	3.4	4.4729	1.6867	-0.0329	0.3648	-0.0164	0.0023		-0.000379
39	80.3	12.0	95.0	16875.	6241.	-108.	5377.	-2941.	2795.	[illegible]	-2616.
	20.5	0.0	53.5	16875.	6241.	-108.	5377.	-2941.	2795.	635.	-3240.
	0.116		44.0	18006.	6659.	-115.	5737.	-3139.	2982.	0.166	-59.1
	92.	0.2224	50.8		364.01						-63.4
	682.3	0.9372	3.5	4.5544	1.6851	-0.0292	0.2763	-0.0247	0.0235		-0.000320
40	60.4	0.0	40.0	5120.	1069.	-24.	1322.	-323.	2495.	557.2	18056.
	11.7	0.0	49.5	5120.	1069.	-24.	1322.	-323.	2495.	729.	16454.
	0.069		55.1	5457.	1139.	-26.	1409.	-344.	2659.	0.143	305.1
	93.	0.2230	50.9		91.06						325.2
	683.0	0.9383	13.9	2.4997	0.5033	-0.0113	0.1164	-0.0047	0.0365		0.002216

RUN 23 TEST 525

PT	VKTS QPSF RHOx TEMP VSNDKTS	ALFS,C PSI RHOPIVC RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U LIFT LIFT/Q CL	DRAG,U DRAG DRAG/Q FE CD	SIDE,U SIDE SIDE/Q CY	PITCH,U PITCH PITCH/Q CM	YAW,U YAW YAW/Q CN	ROLL,U ROLL ROLL/Q CROLL	RPM OMEGAR V/OR	HHAST Q CHAST Q HP HP/Q CP/SIGMA
3	109.7	0.0	0.0	7130.	-3665.	-31.	-683.	-556.	-7.	565.7	102027.
	38.2	0.0	47.3	7130.	-3665.	-31.	-683.	-556.	-7.	740.	102411.
	0.162		49.9	7602.	-3907.	-33.	-729.	-593.	-8.	0.250	1635.0
	88.	0.2224	50.3		-95.43						1956.3
	675.9	0.9387	44.7	1.0310	-0.5300	-0.0045	-0.0168	-0.0025	0.0000		0.012742
4	109.7	0.0	0.0	7150.	-3681.	-118.	-1531.	960.	-366.	566.0	101728.
	38.2	0.0	50.8	7150.	-3681.	-118.	-1531.	960.	-366.	741.	102040.
	0.162		49.8	7623.	-3924.	-126.	-1633.	1024.	-390.	0.250	1630.0
	88.	0.2224	50.2		-96.29						1951.1
	679.9	0.9390	44.7	1.0333	-0.5320	-0.0171	-0.0421	0.0043	-0.0016		0.012665
5	110.4	4.0	0.0	4975.	-3360.	-96.	-3427.	647.	-86.	565.3	100489.
	38.3	0.0	51.2	4975.	-3360.	-96.	-3427.	647.	-86.	740.	99854.
	0.162		49.8	10732.	-3615.	-105.	-3667.	454.	-92.	0.252	1747.1
	93.	0.2229	50.2		-67.67						1933.5
	683.0	0.9290	44.8	1.0340	-0.0644	-0.0101	-0.0960	0.0040	-0.0000		0.012617
6	110.6	6.0	0.0	11630.	-3253.	-105.	-4960.	593.	-367.	565.3	100404.
	38.4	0.0	51.3	11630.	-3253.	-105.	-4960.	593.	-367.	740.	100205.
	0.162		49.7	12536.	-3506.	-113.	-5346.	639.	-396.	0.252	1604.0
	94.	0.2205	50.2		-84.68						1944.6
	683.6	0.9277	40.6	1.6725	-0.4676	-0.0151	-0.1357	0.0126	-0.0016		0.012608
7	110.8	8.0	0.0	13050.	-3089.	-107.	-6720.	150.	-1123.	565.5	101947.
	38.3	0.0	51.1	13050.	-3089.	-107.	-6720.	150.	-1123.	740.	99676.
	0.162		49.8	14092.	-3330.	-116.	-7256.	162.	-1213.	0.252	1609.3
	95.	0.2201	50.1		-82.55						1953.7
	684.2	0.9261	44.7	1.8802	-0.4451	-0.0154	-0.1842	0.0037	-0.0050		0.012734
8	110.6	10.0	0.0	14505.	-2850.	-143.	-6446.	318.	-1869.	565.2	100209.
	38.2	0.0	51.2	14505.	-2850.	-143.	-6446.	318.	-1869.	740.	98372.
	0.162		49.7	15662.	-3077.	-154.	[illegible]	343.	-2018.	0.252	1795.0
	95.	0.2201	50.1		-74.55						1920.2
	684.2	0.9261	44.6	2.0962	-0.4119	-0.0207	-0.2321	0.0014	-0.0080		0.012596
9	110.6	12.0	0.0	15795.	-2625.	-134.	-8011.	143.	-1742.	565.5	101266.
	38.3	0.0	51.3	15795.	-2625.	-134.	[illegible]	143.	-1742.	740.	98332.
	0.162		44.[illegible]	17066.	-2844.	-145.	-10612.	154.	-1885.	0.252	1741.0
	96.	0.2197	50.0		-68.56						1917.4
	684.8	0.9244	44.6	2.2794	-0.3788	-0.0193	-0.2645	0.0046	-0.0028		0.012633
10	110.4	8.0	0.0	12945.	-2455.	-1204.	-6178.	5459.	-4468.	565.5	100529.
	38.3	[illegible]	51.1	12945.	-2455.	-1204.	-6178.	5459.	-4468.	740.	98332.
	0.162		44.3	14024.	-3200.	-1303.	-6695.	5916.	-4842.	0.253	1764.2
	97.	0.2195	50.1		-77.[illegible]						1933.5
	685.4	0.9223	44.7	1.8651	-0.4255	-0.1735	-0.1693	0.0244	-0.0200		0.012[illegible]9

TABLE V.— Continued.

RUN 23 TEST 525

PT	VKTS QPSF MACH TEMP VSOUNDS	ALPHA,C PSI RHO*1000 RHOR	INA PED POS LONG STK LAT STK [illegible]	LIFT,C LIFT LIFT/Q CL	DRAG,C DRAG DRAG/Q FE CD	SIDE,C SIDE SIDE/Q CY	PITCH,C PITCH PITCH/Q CM	YAW,C YAW YAW/Q CN	ROLL,C ROLL ROLL/Q CROLL	RPM OMEGA R V/OR	THRUST THRUST HP HP/Q CP/SIGMA
11	110.7	8.0	0.0	13050.	-2988.	-680.	-6652.	4087.	-3116.	565.2	49790.
	38.3	-2.0	51.3	13050.	-2988.	-680.	-6652.	4087.	-3116.	740.	49809.
	0.162		49.4	14142.	-3238.	-737.	-7208.	4429.	-3376.	0.252	1717.9
	97.	0.2193	50.0		-78.08						1926.7
	685.9	0.9228	44.6	1.6806	-0.4313	-0.0982	-0.1028	0.0184	-0.0149		0.012582
12	111.0	8.0	0.0	13015.	-2944.	485.	-4904.	-2425.	1062.	565.5	49271.
	38.4	2.0	51.3	13015.	-2944.	485.	-4904.	-2425.	1062.	740.	49507.
	0.162		49.5	14135.	-3205.	527.	[illegible]	-2633.	1152.	0.253	1774.4
	96.	0.2189	50.1		-76.81						1927.1
	686.3	0.9208	44.6	1.8724	-0.4244	0.0098	-0.1492	-0.0128	0.0275		0.012567
13	110.9	8.0	0.0	13640.	-2869.	968.	-6846.	-4624.	2448.	565.6	47734.
	38.3	4.0	51.2	13640.	-2869.	968.	-6846.	-4624.	2448.	740.	48055.
	0.162		49.4	14832.	-3118.	1051.	-7438.	-5022.	2660.	0.254	1740.1
	98.	0.2164	50.1		-74.86						1943.5
	686.0	0.9208	44.6	1.8799	-0.4136	0.1396	-0.1823	-0.0267	0.0132		0.012467
14	111.1	8.0	0.0	12930.	-2624.	2011.	-5500.	-7640.	6172.	565.6	47841.
	38.4	6.0	51.1	12930.	-2624.	2011.	-5500.	-7640.	6172.	740.	49672.
	0.162		49.5	14068.	-2855.	2188.	-5984.	-8312.	6715.	0.254	1771.2
	99.	0.2185	50.2		-73.54						1927.0
	686.7	0.9191	44.6	1.7595	-0.4058	0.2842	-0.1456	-0.0342	0.0276		0.012545
15	110.3	8.0	0.0	12545.	-2966.	-114.	-2384.	511.	-165.	565.3	49112.
	37.8	0.0	51.2	12545.	-2966.	-114.	-2384.	511.	-165.	740.	47043.
	0.161		34.5	13675.	-3233.	-124.	-2599.	557.	-180.	0.252	1752.4
	100.	0.2181	44.9		-75.50						1912.2
	687.3	0.9174	44.6	1.8343	-0.4337	-0.0167	-0.0663	0.0023	-0.0007		0.012466
16	110.2	8.0	0.0	12980.	-2910.	-60.	-12504.	-37.	-1743.	565.4	48232.
	37.7	0.0	51.1	12980.	-2910.	-60.	-12504.	-37.	-1743.	741.	47276.
	0.161		59.8	14149.	-3172.	-65.	-13630.	-40.	-1900.	0.251	1755.6
	100.	0.2191	49.8		-77.11						1913.7
	687.3	0.9174	44.6	1.9003	-0.4260	-0.0088	-0.3484	-0.0002	-0.0079		0.012497
17	110.5	8.0	0.0	12730.	-2967.	-221.	-6406.	3585.	5010.	565.4	91179.
	37.9	0.0	50.4	12730.	-2967.	-221.	-6406.	3585.	5010.	740.	102620.
	0.161		50.0	13877.	-3234.	-241.	-6983.	3908.	[illegible]	0.252	1756.7
	100.	0.2183	69.9		-76.23						1915.0
	687.3	0.9173	44.6	1.8545	-0.4322	-0.0322	-0.1776	0.0162	0.0254		0.012484
18	110.6	8.0	0.0	12270.	-2959.	-254.	-4961.	6393.	12745.	565.6	68345.
	37.9	0.0	50.4	12270.	-2959.	-254.	-4961.	6393.	12745.	740.	50602.
	0.161		50.2	13400.	-3231.	-277.	-5418.	6981.	13918.	0.252	1745.9
	101.	0.2177	64.5		-76.42						1908.7
	687.9	0.9157	44.6	1.7874	-0.4311	-0.0370	-0.1375	0.0289	0.0577		0.012424
19	110.6	8.0	0.0	12800.	-2858.	-358.	-7770.	6312.	-705.	565.3	49054.
	37.9	0.0	69.9	12800.	-2858.	-358.	-7770.	6312.	-705.	740.	45794.
	0.161		50.0	13979.	-3121.	-391.	-8485.	6894.	-770.	0.252	1726.1
	101.	0.2176	49.8		-75.31						1885.0
	687.9	0.9157	44.6	1.8635	-0.4161	-0.0521	-0.2153	0.0288	-0.0032		0.012304
20	110.5	8.0	0.0	12735.	-2859.	-517.	-6150.	11089.	-2440.	565.4	49654.
	37.8	0.0	49.5	12735.	-2859.	-517.	-6150.	11089.	-2440.	741.	47003.
	0.161		50.1	13932.	-3126.	-566.	-6728.	12131.	-2670.	0.252	1751.5
	102.	0.2173	49.8		-75.06						1906.6
	688.5	0.9141	44.5	1.8627	-0.4160	-0.0756	-0.1711	0.0504	-0.0111		0.012576
21	110.4	8.0	0.0	12750.	-2820.	-495.	-6634.	10537.	-1872.	565.4	45475.
	37.7	0.0	89.6	12750.	-2820.	-495.	-6634.	10537.	-1872.	740.	45521.
	0.161		50.0	13944.	-3085.	-545.	-7257.	11527.	-2048.	0.252	1717.5
	102.	0.2173	49.7		-74.72						1879.3
	688.5	0.9141	44.6	1.8666	-0.4128	-0.0729	-0.1844	0.0450	-0.0085		0.012259
22	158.0	-1.0	0.0	12010.	753.	-94.	15782.	3049.	-884.	566.5	86021.
	75.7	0.0	50.2	12010.	753.	-94.	15782.	3049.	-884.	742.	83475.
	0.230		50.0	13410.	841.	-105.	17622.	3405.	-784.	0.360	1115.4
	106.	0.2129	49.4		9.45						1245.4
	690.9	0.8950	30.2	0.6765	0.0553	-0.0064	0.2192	0.0094	-0.0016		0.006077
23	158.3	-5.0	0.0	6680.	515.	-114.	14915.	3600.	1404.	565.3	50287.
	75.7	0.0	50.2	6683.	515.	-114.	14916.	3600.	1404.	740.	63235.
	0.230		50.0	7455.	413.	-127.	16714.	4101.	1640.	0.361	1072.5
	106.	0.2121	49.7		10.77						1201.2
	692.2	0.8924	30.2	0.4975	0.0595	-0.0083	0.2071	0.0063	0.0033		0.007841
24	158.7	-3.0	0.0	9422.	764.	-116.	15545.	2614.	2007.	566.	58244.
	75.8	0.0	50.4	9422.	764.	-116.	15545.	2614.	2007.	741.	63160.
	0.230		50.1	10575.	861.	-133.	17451.	2935.	2253.	0.36	1091.9
	109.	0.2117	49.8		10.13						1223.8
	692.8	0.8928	30.1	0.6855	0.0559	-0.0094	0.2152	0.0059	0.0045		0.007903
25	158.7	-1.0	0.0	12020.	802.	-118.	14434.	2903.	990.	565.7	57904.
	75.4	0.0	50.3	12020.	802.	-138.	14434.	2903.	990.	741.	63492.
	0.230		50.1	13517.	902.	-155.	16081.	3265.	1112.	0.362	1041.
	110.	0.2114	49.7		10.57						1227.
	693.4	0.8893	30.2	0.8755	0.0594	-0.0101	0.2156	0.0066	0.0022		0.007440
26	158.8	0.0	0.0	14700.	414.	-122.	13055.	3052.	1124.	566.3	55104.
	75.8	0.0	50.5	14700.	414.	-122.	13055.	3052.	1124.	741.	62867.
	0.230		50.1	16554.	1035.	-137.	14706.	3434.	1265.	0.362	1037.
	111.	0.2110	49.8		12.12						1226.
	694.0	0.8877	30.1	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]		[illegible]
27	158.6	3.0	0.0	17390.	1112.	-134.	9731.	2631.	2307.	565.8	58425.
	75.7	0.0	50.5	17390.	1112.	-134.	9731.	2810.	2307.	740.	63062.
	0.230		50.1	19621.	1255.	-151.	10980.	3171.	2671.	0.362	1092.
	112.	0.2100	49.8		14.70						1226.
	694.6	0.8842	30.2	1.2678	0.0812	-0.0092	0.1352	[illegible]	[illegible]		[illegible]

TABLE V.— Continued.

RUN 26 TEST 525

PT											
PT	VELS	ALPHA.C	JNA	LIFT.C	DRAG.C	SIDE.C	PITCH.C	YAW.C	ROLL.C	RPM	THRUST.C
	QPSF	PSI	PED POS	LIFT	DRAG	SIDE	PITCH	YAW	ROLL	OMEGAR	THRUST.C
	MTUN		LONG STR	LIFT/Q	DRAG/Q	SIDE/Q	PITCH/Q	YAW/Q	ROLL/Q	V/OR	HP
	TEMP	RHO.FJDU	LAT STR		FE						HP/Q
	VSNDRTS	RHOR	POA LEV	CL	CD	CY	CM	CN	CROLL		CP/SIGMA
1	80.0	-5.0	40.0	12595.	216.	-77.	-996.	-92.	-1401.	500.1	44492.
	21.5	0.0	49.9	12595.	216.	-77.	-996.	-92.	-1401.	741.	43271.
	0.089		59.2	13082.	224.	-91.	-1051.	-97.	-1478.	0.137	787.5
	86.	0.2252	49.3		18.71						851.1
	678.6	0.9475	16.1	5.9317	0.1037	-0.0368	-0.0497	-0.0014	-0.0208		0.005402
4	80.2	-8.0	40.0	12560.	253.	-115.	-1093.	-677.	-1647.	500.2	54784.
	20.5	0.0	49.9	12560.	253.	-115.	-1093.	-677.	-1647.	741.	54162.
	0.118		60.8	13133.	269.	-125.	-1162.	-724.	-1750.	0.183	976.5
	88.	0.2237	49.2		12.34						1039.7
	679.9	0.9472	21.2	3.3295	0.0682	-0.0318	-0.0561	-0.0057	-0.0138		0.006755
5	80.2	0.0	40.0	15950.	1685.	-114.	-5767.	-154.	-1162.	500.0	41905.
	20.5	0.0	49.9	15950.	1685.	-114.	-5767.	-154.	-1162.	741.	41827.
	0.118		69.2	16958.	1794.	-121.	-6139.	-164.	-1173.	0.183	752.5
	89.	0.2233	49.4		82.35						801.0
	680.5	0.9395	17.1	4.3399	0.4550	-0.0306	-0.2963	-0.0013	-0.0092		0.005236
6	80.5	0.0	75.0	10525.	134.	-67.	-2126.	-451.	-103.	500.0	42744.
	20.6	0.0	49.9	10525.	134.	-67.	-2126.	-451.	-103.	741.	42256.
	0.119		64.5	10991.	143.	-71.	-2265.	-480.	-104.	0.183	703.3
	89.	0.2233	49.2		6.50						812.5
	680.5	0.9394	17.1	2.7651	0.0359	-0.0179	-0.1084	-0.0036	-0.0029		0.005285
7	79.8	0.0	60.0	7965.	-372.	-46.	-457.	-160.	337.	500.2	41500.
	20.2	0.0	49.9	7965.	-372.	-46.	-457.	-160.	337.	741.	42510.
	0.117		64.1	8491.	-391.	-49.	-487.	-170.	359.	0.182	754.7
	90.	0.2224	49.2		-18.40						864.8
	681.0	0.9376	17.2	2.1762	-0.1016	-0.0126	-0.0238	-0.0014	0.0029		0.005228
8	80.0	0.0	45.0	7115.	-712.	-85.	-932.	-15.	-225.	500.2	40907.
	20.3	0.0	49.8	7115.	-712.	-85.	-932.	-15.	-225.	741.	40734.
	0.118		64.3	7567.	-754.	-91.	-996.	-16.	-239.	0.182	733.5
	90.	0.2224	49.4		-35.30						782.1
	681.1	0.9378	17.1	1.9304	-0.1936	-0.0231	-0.0482	-0.0001	-0.0019		0.005080
9	80.2	0.0	30.0	6055.	-1184.	-55.	2776.	-348.	-256.	500.7	41200.
	20.4	0.0	49.9	6055.	-1184.	-55.	2776.	-348.	-256.	740.	41281.
	0.118		55.0	6451.	-1260.	-59.	2963.	-371.	-273.	0.183	741.1
	90.	0.2224	49.1		-58.25						790.3
	681.1	0.9378	17.3	1.6374	-0.3216	-0.0149	0.1431	-0.0029	-0.0022		0.005147
10	79.9	-4.0	60.0	7250.	-1257.	-67.	1220.	-1675.	-2794.	505.8	50794.
	20.2	0.0	49.9	7250.	-1257.	-67.	1220.	-1675.	-2794.	740.	46717.
	0.117		64.7	7725.	-1324.	-72.	1304.	-1796.	-2984.	0.182	845.6
	91.	0.2225	49.3		-52.21						955.9
	681.7	0.9361	18.5	1.9730	-0.2864	-0.0183	0.0634	-0.0142	-0.0237		0.006217
11	80.2	-2.0	60.0	8005.	-895.	-80.	-544.	-1060.	-1801.	500.0	53195.
	20.3	0.0	50.0	8005.	-895.	-80.	-544.	-1060.	-1801.	741.	47475.
	0.118		64.7	8567.	-956.	-85.	-580.	-1130.	-1927.	0.183	861.7
	92.	0.2221	49.2		-44.00						943.8
	682.3	0.9344	16.6	2.1742	-0.2431	-0.0217	-0.0284	-0.0084	-0.0152		0.006134
12	80.1	2.0	60.0	9480.	-674.	-56.	-2968.	-1361.	-2352.	500.0	49815.
	20.3	0.0	49.8	9480.	-674.	-56.	-2968.	-1361.	-2352.	741.	48055.
	0.118		64.7	10145.	-721.	-54.	-3176.	-1392.	-2517.	0.182	877.1
	92.	0.2221	49.3		-33.21						932.7
	682.3	0.9344	18.5	2.5809	-0.1835	-0.0156	-0.1538	-0.0110	-0.0199		0.006104
13	80.1	2.0	60.0	9575.	-662.	-56.	-176.	-1215.	-2537.	500.1	49835.
	20.3	0.0	49.7	9575.	-662.	-56.	-176.	-1215.	-2537.	741.	48229.
	0.118		59.6	10247.	-706.	-60.	-188.	-1290.	-2740.	0.182	880.8
	92.	0.2221	49.2		-32.02						942.7
	682.3	0.9344	16.5	2.6066	-0.1802	-0.0152	-0.0091	-0.0102	-0.0221		0.006126
14	80.0	5.0	60.0	9885.	-589.	-65.	-978.	-1171.	-2491.	500.2	49496.
	20.2	0.0	50.0	9885.	-589.	-65.	-978.	-1171.	-2491.	741.	47583.
	0.117		59.7	10598.	-631.	-70.	-1044.	-1250.	-3202.	0.182	872.6
	93.	0.2217	49.2		-29.13						935.5
	683.0	0.9326	18.5	2.7008	-0.1609	-0.0178	-0.0509	-0.0099	-0.0254		0.006078
15	100.8	-2.0	60.0	9725.	84.	-141.	-894.	440.	-860.	500.5	54369.
	31.9	0.0	49.8	9725.	84.	-141.	-894.	440.	-860.	741.	54904.
	0.148		49.4	10407.	91.	-152.	-965.	475.	-711.	0.224	982.5
	94.	0.2204	49.3		2.63						1059.3
	683.6	0.9273	23.3	1.6849	0.0145	-0.0244	-0.0296	0.0024	-0.0036		0.006871
16	100.7	0.0	60.0	13755.	205.	-127.	-2864.	-516.	-1266.	500.1	55098.
	31.8	0.0	50.0	13755.	205.	-127.	-2864.	-516.	-1266.	741.	54221.
	0.148		44.8	14547.	241.	-137.	-2595.	-558.	-1366.	0.224	966.6
	94.	0.2204	49.3		6.44						1063.6
	683.6	0.9274	23.3	1.8652	0.0355	-0.0221	-0.0867	-0.0024	-0.0068		0.006912
17	120.1	-4.0	60.0	9905.	1460.	-176.	3264.	31.	-731.	500.5	50808.
	44.9	0.0	49.9	9505.	1468.	-176.	3284.	31.	-731.	742.	54607.
	0.176		73.7	10169.	1270.	-194.	3570.	32.	-745.	0.273	1005.3
	96.	0.2186	44.4		25.49						1090.0
	684.8	0.9198	23.3	1.2175	0.1436	-0.0219	0.0766	0.0000	-0.0028		0.007072
18	120.4	-2.0	60.0	11535.	1340.	-209.	-198.	-704.	-1956.	505.6	56427.
	45.0	0.0	50.0	11535.	1342.	-209.	-198.	-705.	-1956.	742.	53499.
	0.176		73.7	12564.	1449.	-220.	-215.	-762.	-2103.	0.274	980.2
	97.	0.2162	49.2		24.43						1076.3
	685.4	0.9161	23.3	1.4352	0.1654	-0.0256	-0.0044	-0.0027	-0.0076		0.006978
19	120.7	-1.0	60.0	12220.	1449.	-216.	-2270.	45.	-2171.	500.9	50327.
	44.6	0.0	49.4	12120.	1449.	-216.	-2270.	45.	-2171.	741.	52972.
	0.176		73.7	13223.	1561.	-229.	-2481.	49.	-2359.	0.273	962.2
	98.	0.2179	49.4		32.35						1071.7
	686.0	0.9166	23.6	1.4952	0.1788	-0.0249	-0.0534	0.0002	-0.0061		0.006954
20	120.1	0.0	60.0	12995.	1545.	-190.	-3421.	-494.	-2984.	500.3	56548.
	44.9	0.0	49.6	12995.	1545.	-196.	-3421.	-494.	-2954.	742.	52952.
	0.176		73.6	14224.	1664.	-214.	-3752.	-534.	-3263.	0.273	965.9
	98.	0.2179	49.5		34.56						1075.4
	686.0	0.9166	23.6	1.5959	0.1910	-0.0242	-0.0563	-0.0019	-0.0115		0.006942

TABLE V.— Continued.

RUN 24 TEST 525

PT	AXIS / TORST / MTUN / TEMP / VSNDKTS	PSI / AHOR	PEK PCS / LONG STK / LAT STK / PDAL EE	LIFT / LIFT/σ / CL	DRAG / DRAG/σ / FE / CD	SIDE / SIDE/σ / CY	PITCH / PITCH/σ / CM	YAW / YAW/σ / CN	ROLL / ROLL/σ / CROLL	RPM / V/ΩR	SHAFT HP / HP/σ / CP/SIGMA
21	120.6	0.0	50.0	8800.	434.	-167.	-6747.	135.	-1400.	500.4	50765.
	35.1	0.0	44.9	6600.	439.	-167.	-6747.	136.	+1400.	741.	52500.
	0.176		73.9	5471.	1025.	-182.	-5180.	151.	+1327.	0.275	962.8
	98.	0.2176	49.6		26.51						1072.4
	688.3	0.9164	23.3	1.0060	0.1149	-0.0264	-0.1106	0.0005	-0.0055		0.00694
22	99.6	-5.0	75.0	10175.	284.	-194.	5094.	-597.	-2865.	500.	58400.
	30.9	0.0	50.0	10175.	284.	-194.	5094.	-597.	-2865.	741.	56303.
	0.145		64.6	11066.	309.	-211.	5553.	-652.	-3051.	0.227	1032.7
	94.	0.2163	49.5		9.19						1125.3
	686.7	0.9195	25.1	1.8203	0.0508	-0.0347	0.1731	-0.0033	-0.0156		0.007510
23	99.7	-3.0	75.0	11735.	43.	-167.	2441.	-957.	-3612.	500.5	58595.
	30.9	0.0	49.5	11735.	43.	-167.	2441.	-957.	-3612.	741.	55944.
	0.145		64.5	12787.	470.	-182.	2664.	-1045.	-3935.	0.227	1046.8
	100.	0.2161	49.3		13.46						1134.3
	687.3	0.9177	25.1	2.1007	0.0772	-0.0299	0.0832	-0.0053	-0.0201		0.007536
24	99.6	-2.0	75.0	12725.	477.	-173.	2071.	-569.	-5444.	500.5	59462.
	30.8	0.0	50.0	12725.	477.	-173.	2071.	-569.	-5444.	742.	57090.
	0.145		64.5	13866.	520.	-159.	2257.	-620.	-5758.	0.227	1058.3
	100.	0.2181	49.6		15.40						1153.2
	687.3	0.9177	25.1	2.2614	0.0855	-0.0310	0.0707	-0.0032	-0.0142		0.007477
25	99.7	+2.0	75.0	12730.	535.	-1054.	2844.	3651.	-7477.	500.2	59422.
	30.9	+4.0	50.0	12730.	535.	-1054.	2844.	3451.	-7477.	741.	57149.
	0.145		64.4	13872.	583.	-1149.	3099.	4196.	-8085.	0.227	1051.8
	100.	0.2181	49.5		17.32						1140.4
	687.3	0.9177	25.1	2.2770	0.0957	-0.1885	0.0960	0.0214	-0.0443		0.007744
26	99.8	-2.0	75.0	12690.	514.	-600.	2384.	1059.	-5414.	500.2	59502.
	31.0	+2.0	49.6	12690.	514.	-600.	2389.	1059.	-5414.	741.	57520.
	0.146		64.3	13826.	560.	-654.	2604.	1154.	-5900.	0.227	1054.5
	100.	0.2181	49.3		16.60						1149.2
	687.3	0.9177	25.1	2.2667	0.0917	-0.1071	0.0811	0.0059	-0.0300		0.007483
27	99.7	+2.0	75.0	12670.	506.	295.	2144.	-3153.	-700.	500.4	59702.
	30.9	2.0	50.0	12670.	506.	295.	2144.	-3153.	-700.	741.	56104.
	0.146		64.2	13806.	551.	321.	2337.	-3436.	-763.	0.227	1054.2
	100.	0.2181	49.5		16.37						1154.2
	687.3	0.9177	25.1	2.2646	0.0904	0.0527	0.0729	-0.0175	-0.0039		0.007444
28	99.8	+2.0	75.0	12785.	511.	779.	2638.	-5269.	2218.	500.4	59105.
	30.9	4.0	50.0	12785.	511.	779.	2638.	-5269.	2218.	741.	57890.
	0.146		64.3	13932.	557.	849.	3043.	-5765.	2417.	0.227	1052.1
	100.	0.2181	49.4		16.52						1140.5
	687.3	0.9177	25.1	2.2838	0.0913	0.1391	0.0965	-0.0294	0.0123		0.007439
29	99.8	-2.0	75.0	12745.	604.	1645.	2886.	-9238.	5059.	500.5	58744.
	30.8	8.0	49.8	12745.	604.	1645.	2886.	-9238.	5059.	742.	57734.
	0.145		64.4	13887.	658.	1792.	3123.	-10066.	5513.	0.227	1046.9
	100.	0.2181	49.5		19.82						1140.7
	687.3	0.9177	25.1	2.2807	0.1364	0.2951	0.0979	-0.0515	0.0282		0.007394
30	99.7	-2.0	75.0	12610.	731.	2445.	4798.	-12064.	9791.	500.5	59165.
	30.9	12.0	49.9	12610.	731.	2445.	4798.	-12064.	9791.	741.	54555.
	0.145		64.2	13741.	797.	2664.	5229.	-13151.	10669.	0.227	1057.4
	100.	0.2181	49.4		23.67						1152.2
	687.3	0.9177	25.1	2.2556	0.1306	0.4373	0.1633	-0.0671	0.0544		0.007424
31	99.8	-2.0	75.0	13380.	667.	-179.	9683.	+517.	-3010.	500.5	59002.
	30.9	0.0	49.9	13380.	667.	-176.	9683.	+517.	-3010.	742.	57734.
	0.145		54.8	14606.	725.	-194.	10572.	+564.	-3940.	0.227	1055.4
	101.	0.2177	49.5		21.59						1156.1
	687.9	0.9161	25.1	2.3913	0.1193	-0.0316	0.3296	-0.0029	[illegible]		0.007471
32	99.8	-2.0	75.0	12020.	378.	+159.	-5281.	-571.	-2493.	500.6	59495.
	30.9	0.0	50.0	12020.	378.	+159.	-5281.	-571.	-2493.	742.	57715.
	0.145		73.7	13121.	413.	+174.	-5765.	[illegible]	-2723.	0.227	1053.7
	101.	0.2177	49.6		12.79						1154.2
	687.9	0.9161	25.1	2.1500	0.0676	-0.0284	-0.1790	-0.0044	[illegible]		0.007454
33	99.7	-2.0	75.0	12505.	528.	[illegible]	2025.	49.	20110.	500.8	59594.
	30.8	0.0	49.8	12505.	528.	[illegible]	2025.	49.	20110.	742.	60517.
	0.145		63.6	13650.	574.	-129.	2211.	54.	21980.	0.227	1053.2
	101.	0.2177	64.4		17.07						[illegible]
	687.9	0.9161	25.1	2.2419	0.0943	-0.0212	[illegible]	0.0003	0.1121		0.007444
34	99.7	-2.0	75.0	12020.	608.	-65.	3367.	1027.	41542.	500.3	[illegible]
	30.6	0.0	49.9	12020.	608.	-65.	3367.	1027.	41542.	741.	75104.
	0.145		63.5	13121.	662.	-71.	3675.	1107.	45347.	0.227	1051.4
	101.	0.2177	49.4		19.65						1147.7
	687.9	0.9161	25.1	2.1533	0.1066	[illegible]	0.1145	[illegible]	[illegible]		0.007450
35	99.9	-2.0	75.0	12680.	493.	-420.	2232.	8225.	-5400.	555.1	60242.
	31.0	0.0	70.4	12680.	493.	-420.	2232.	8225.	-5400.	741.	58769.
	0.146		63.9	13842.	538.	-455.	2437.	8793.	-5895.	0.226	1068.9
	101.	0.2177	50.0		15.92						1160.9
	687.9	0.9163	25.1	2.2629	0.0880	-0.0750	0.0758	[illegible]	[illegible]		0.007585
36	99.0	+2.0	75.0	12740.	521.	+593.	2574.	10990.	-10271.	500.5	60102.
	31.0	0.0	84.0	12740.	521.	+593.	2574.	10990.	-10271.	742.	58457.
	0.145		63.9	13906.	569.	+647.	3138.	11993.	-11213.	0.227	1060.6
	101.	0.2177	50.0		16.75						1165.4
	687.9	0.9166	25.1	2.2736	0.0930	[illegible]	0.0970	[illegible]	[illegible]		0.007547
37	134.6	-5.0	30.0	9485.	390.	-224.	6015.	-927.	-2495.	500.4	61131.
	59.5	0.0	44.9	9485.	390.	-224.	6015.	-927.	-2495.	742.	61316.
	0.203		76.5	10495.	432.	-243.	6657.	-1026.	-3209.	0.317	1192.1
	103.	0.2148	56.0		6.50						1307.2
	689.1	0.9437	26.7	[illegible]	0.0362	-0.0204	[illegible]	[illegible]	[illegible]		[illegible]
38	134.3	+3.0	30.0	11515.	324.	-171.	5510.	-1410.	-1741.	500.5	60776.
	59.3	0.0	44.4	11515.	324.	-171.	5510.	-1410.	-1741.	742.	63106.
	0.203		74.5	12574.	360.	-190.	3075.	-1565.	-1930.	0.317	1109.3
	104.	0.2144	49.4		8.43						1314.4
	689.7	0.9422	26.5	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]		[illegible]

TABLE V.— Continued.

RUN 24 TEST 525

PT	VKTS / QPSF / MTUN / TEMP / VSNDKTS	ALPS,C / PSI / RHO / RHOR	INA / RED POS / LONG STN / LAT STN / POS LEV	LIFT,U / LIFT / LIFT/6 / CL	DRAG,U / DRAG / DRAG/6 / FE / CD	SIDE,U / SIDE / SIDE/6 / CY	PITCH,U / PITCH / PITCH/6 / CM	YAW,U / YAW / YAW/6 / CN	ROLL,U / ROLL / ROLL/6 / CROLL	RPM / OMEGA R / V/OR	HMAST Q / CMAST Q / HP / HP/6 / CP/SIGMA
39	139.3	-1.0	30.0	13859.	754.	-186.	-437.	-1153.	-2644.	566.5	64430.
	59.3	0.0	50.0	13859.	754.	-186.	-437.	-1153.	-2644.	742.	62067.
	0.203		74.5	15352.	816.	-206.	-485.	-1276.	-2935.	0.317	1162.5
	104.	0.2144	44.9		12.72						1310.7
	689.7	0.9022	26.6	1.2905	0.0723	-0.0173	-0.0074	-0.0133	-0.0077		0.006464
40	139.5	1.0	30.0	15625.	1082.	-282.	-2684.	-1053.	-4137.	566.5	64436.
	59.3	0.0	50.0	15625.	1082.	-282.	-2684.	-1053.	-4137.	742.	62653.
	0.203		74.5	17572.	1201.	-313.	-3265.	-1164.	-4594.	0.317	1167.2
	105.	0.2141	50.0		15.24						1316.3
	690.3	0.9006	26.5	1.4739	0.1008	-0.0263	-0.0252	-0.0030	-0.0126		0.006556
41	139.5	3.0	30.0	17980.	1395.	-269.	-6864.	-1353.	-4686.	566.1	64669.
	59.2	0.0	50.0	17980.	1395.	-269.	-6864.	-1353.	-4686.	741.	61599.
	0.203		74.5	20000.	1552.	-299.	-7635.	-1505.	-5035.	0.318	1179.1
	106.	0.2137	50.0		23.55						1311.5
	690.9	0.8990	26.5	1.6772	0.1301	-0.0251	-0.1264	-0.0039	-0.0142		0.006524

RUN 26 TEST 525

PT	VKTS / QPSF / MTUN / TEMP / VSNDKTS	ALPS,C / PSI / RHO / RHOR	INA / RED POS / LONG STN / LAT STN / POS LEV	LIFT,U / LIFT / LIFT/6 / CL	DRAG,U / DRAG / DRAG/6 / FE / CD	SIDE,U / SIDE / SIDE/6 / CY	PITCH,U / PITCH / PITCH/6 / CM	YAW,U / YAW / YAW/6 / CN	ROLL,U / ROLL / ROLL/6 / CROLL	RPM / OMEGA R / V/OR	HMAST Q / CMAST Q / HP / HP/6 / CP/SIGMA
3	39.6	-2.0	90.0	12995.	66.	-5.	-639.	123.	-1776.	565.3	56027.
	5.2	0.0	49.5	12995.	66.	-5.	-639.	123.	-1776.	740.	55605.
	0.059		59.9	13362.	70.	-5.	-657.	127.	-1829.	0.041	1001.8
	74.	0.2312	50.0		13.00						1030.
	671.1	0.9725	20.5	13.7890	0.0722	-0.0053	-0.1292	0.0041	-0.0567		0.006723
4	60.1	-5.0	90.0	13050.	124.	-96.	-3131.	52.	-2042.	565.1	48757.
	11.6	0.0	89.5	13050.	124.	-96.	-3131.	52.	-2042.	740.	48678.
	0.049		61.0	13444.	133.	-101.	-3234.	54.	-2112.	0.137	873.6
	76.	0.2298	50.0		10.92						905.6
	672.0	0.9667	18.5	6.1039	0.0663	-0.0458	-0.2787	0.0008	-0.0297		0.005905
5	79.6	-8.0	90.0	12730.	225.	-98.	-2653.	-949.	-1451.	565.3	57525.
	20.6	0.0	69.0	12730.	225.	-98.	-2653.	-949.	-1451.	740.	57520.
	0.118		64.0	13257.	234.	-102.	-2763.	-988.	-1511.	0.182	1031.8
	76.	0.2282	50.0		10.92						1074.5
	673.6	0.9673	21.0	3.4132	0.0603	-0.0263	-0.1354	-0.0079	-0.0121		0.007014
6	139.6	-1.0	30.0	14345.	1295.	-2004.	1133.	7330.	-11665.	565.6	64150.
	61.3	-4.0	49.5	14345.	1295.	-2004.	1133.	7330.	-11665.	740.	50942.
	0.207		74.6	15906.	1391.	-2152.	1216.	7854.	-12544.	0.318	1077.5
	67.	0.2213	50.0		21.00						1157.3
	679.2	0.9311	23.3	1.2900	0.1165	-0.1802	0.0194	0.0199	-0.0327		0.007541
7	139.5	-1.0	30.0	14400.	1237.	-3354.	1.	9118.	-7002.	565.3	63477.
	61.3	-2.0	49.6	14400.	1237.	-3354.	1.	9118.	-7002.	740.	55529.
	0.205		74.5	15443.	1331.	-3282.	1.	9431.	-7533.	0.318	1071.4
	98.	0.2229	50.0		20.17						1153.2
	679.9	0.9295	23.2	1.2973	0.1114	-0.1040	0.0000	0.0115	-0.0146		0.007527
8	140.0	-1.0	30.0	14420.	1224.	645.	1159.	-2777.	5238.	564.9	55268.
	61.5	2.0	49.2	14420.	1220.	645.	1159.	-2777.	5238.	739.	63820.
	0.207		74.4	15544.	1319.	695.	1249.	-2995.	5647.	0.320	1067.4
	64.	0.2205	50.8		19.64						1150.6
	680.5	0.9277	23.3	1.2944	0.1099	0.0579	0.0196	-0.0077	0.0146		0.007526
9	140.6	-1.0	30.0	14375.	1295.	3387.	2066.	3262.	-47620.	565.3	56594.
	61.6	0.0	49.6	14375.	1295.	3387.	2066.	3262.	-47620.	740.	66391.
	0.207		74.4	15523.	1402.	3654.	2255.	3544.	-50775.	0.319	1044.3
	90.	0.2201	50.8		21.13						1133.1
	681.1	0.9260	23.3	1.2927	0.1167	0.3046	0.0357	0.0092	-0.1314		0.007344
10	139.9	-1.0	30.0	14145.	1464.	6524.	1647.	10142.	-81433.	565.5	43264.
	61.3	5.0	49.4	14145.	1464.	6524.	1647.	10142.	-81433.	740.	73524.
	0.206		74.6	15342.	1584.	7056.	1782.	10941.	-86042.	0.319	1048.2
	91.	0.2197	50.4		23.59						1133.9
	681.7	0.9244	23.3	1.2752	0.1320	0.5862	0.0243	0.0284	-0.2242		0.007341
11	140.2	-1.0	30.0	13875.	1260.	-226.	16375.	362.	-34.	565.8	56664.
	61.4	0.0	49.5	13875.	1260.	-226.	16375.	362.	-34.	741.	56944.
	0.206		64.6	15034.	1356.	-245.	17245.	414.	-36.	0.319	1056.0
	92.	0.2193	50.7		20.52						1144.5
	682.3	0.9227	23.3	1.2486	0.1134	-0.0203	0.1777	0.0011	0.0011		0.007444
12	140.2	-1.0	30.0	14580.	1263.	-225.	-19702.	614.	611.	565.4	58324.
	61.4	0.0	49.5	14580.	1263.	-225.	-19702.	614.	611.	740.	58730.
	0.206		64.1	15801.	1390.	-242.	-16515.	677.	653.	0.320	1053.1
	92.	0.2193	51.5		20.91						1135.0
	682.3	0.9227	23.3	1.3126	0.1155	-0.0203	-0.1002	0.0025	0.0027		0.007424
13	140.4	-1.0	30.0	14160.	1291.	-270.	-317.	10546.	17088.	565.5	59184.
	61.4	0.0	44.2	14160.	1291.	-270.	-317.	10546.	17088.	740.	75242.
	0.207		73.5	15374.	1402.	-300.	-344.	11447.	18555.	0.320	1026.7
	93.	0.2189	70.1		22.01						1114.7
	683.0	0.9210	23.4	1.2734	0.1161	-0.0244	-0.0034	0.0145	0.0178		0.007269
14	140.5	-1.0	30.0	13570.	1350.	-354.	1394.	22104.	31244.	565.5	19215.
	61.5	0.0	49.6	13570.	1350.	-354.	1397.	22104.	31244.	740.	95092.
	0.207		73.7	14734.	1472.	-422.	1517.	24000.	34500.	0.320	1025.4
	93.	0.2189	44.9		22.65						1119.5
	683.0	0.9210	23.3	1.2141	0.1207	[illegible]	0.0234	[illegible]	0.1041		0.007264

TABLE V.— Continued.

RUN 26 TEST 525

PT	VKTS / QPSF / MACH / TEMP / VSNDKTS	ALFS / PSI / [illegible] / RHO / RHOR	[illegible] / PED POS / LONG STK / LAT STK / PWR LEV	LIFT / LIFT / LIFT / CL	DRAG / DRAG / DRAG / CD	SIDE / SIDE / SIDE / CY	PITCH / PITCH / PITCH / CM	YAW / YAW / YAW / CN	ROLL / ROLL / ROLL / CROLL	RPM / [illegible]	THRUST / THRUST / HP / HP / CT/SIGMA
15	100.2	-1.0	50.0	14245.	1328.	+554.	1200.	7643.	-4503.	555.4	51520.
	61.3	0.0	65.6	14245.	1328.	+554.	1200.	7643.	-4503.	740.	54143.
	0.200		73.9	15406.	1440.	+601.	1340.	8290.	-4889.	0.320	1035.9
	93.	0.2189	50.0		21.67						1124.7
	683.0	0.9210	23.0	1.2833	0.1195	+0.0499	0.0219	0.0214	-0.0126		0.007535
16	100.3	-1.0	50.0	14305.	1339.	+644.	735.	14512.	-7276.	565.0	62710.
	61.3	0.0	89.0	14305.	1339.	+644.	735.	14512.	-7276.	740.	52525.
	0.200		73.9	15554.	1456.	+425.	800.	15784.	-7910.	0.320	1054.1
	94.	0.2165	50.0		21.64						1124.0
	683.6	0.9194	23.5	1.2892	0.1207	+0.0705	0.0126	0.0462	-0.0204		0.007311
17	100.7	0.0	45.0	15795.	-2425.	-80.	-15733.	-3464.	-4611.	565.5	104944.
	31.8	0.0	44.2	15795.	-2425.	-80.	-15733.	-3464.	-4611.	740.	102708.
	0.148		76.9	17034.	-2615.	-86.	-16967.	-3735.	-4973.	0.230	1950.1
	95.	0.2204	49.9		-76.10						2034.1
	684.2	0.9272	46.9	2.7413	-0.4209	-0.0139	-0.5196	-0.0157	-0.0244		0.013520
18	100.4	0.0	45.0	17110.	-2194.	-64.	-17409.	-3511.	-5264.	565.7	104937.
	31.6	0.0	44.3	17110.	-2194.	-69.	-17409.	-3511.	-5264.	740.	102116.
	0.147		74.5	18451.	-2366.	-74.	-18774.	-3786.	-5677.	0.224	1902.4
	95.	0.2204	50.1		-64.33						2051.5
	684.2	0.9273	47.0	2.9473	-0.3631	-0.0125	-0.5764	-0.0191	-0.0296		0.013363
19	100.5	0.0	45.0	18236.	-1913.	-87.	-18153.	-3030.	-5739.	565.0	110616.
	31.7	0.0	44.5	18236.	-1913.	-87.	-18153.	-3030.	-5739.	740.	102372.
	0.147		76.5	19660.	-2063.	-94.	-19576.	-3849.	-6189.	0.229	1913.3
	95.	0.2204	49.4		-66.32						2163.5
	684.2	0.9273	47.0	3.1757	-0.3332	-0.0152	-0.6018	-0.0195	-0.0411		0.013443
20	100.8	0.0	45.0	18350.	-1907.	-93.	-18215.	-3441.	-5488.	565.5	110645.
	31.9	0.0	44.2	18350.	-1907.	-93.	-18215.	-3441.	-5488.	740.	103254.
	0.148		76.9	19790.	-2057.	-100.	-19645.	-3711.	-5919.	0.230	1921.6
	95.	0.2204	50.0		-59.82						2072.6
	684.2	0.9272	47.0	3.1500	-0.3305	-0.0161	-0.6007	-0.0185	-0.0296		0.013515
21	100.7	9.0	45.0	18865.	-1771.	-74.	-18502.	-3308.	-5557.	565.7	111573.
	31.8	0.0	44.4	18865.	-1771.	-74.	-18502.	-3308.	-5557.	741.	103367.
	0.147		76.8	20443.	-1915.	-80.	-19984.	-3574.	-6004.	0.230	1924.3
	96.	0.2200	50.0		-55.72						2084.4
	684.8	0.9256	47.0	3.2829	-0.3078	-0.0129	-0.6120	-0.0179	-0.0300		0.013574
22	100.7	8.0	45.0	18330.	-1922.	-67.	-18106.	-1890.	2323.	565.7	105302.
	31.8	0.0	44.6	18330.	-1922.	-67.	-18106.	-1890.	2323.	740.	104942.
	0.147		77.8	19804.	-2077.	-72.	-19562.	-2042.	2510.	0.224	1932.8
	96.	0.2230	59.5		-60.51						2088.2
	684.8	0.9256	47.0	3.1884	-0.3343	-0.0117	-0.5943	-0.0102	0.0126		0.013603
23	100.7	8.0	45.0	18260.	-1935.	14.	-17791.	562.	14682.	565.7	98432.
	31.7	0.0	44.5	18260.	-1935.	14.	-17791.	562.	14682.	740.	110306.
	0.147		77.6	19765.	-2094.	15.	-19255.	630.	15890.	0.224	1927.9
	97.	0.2196	70.0		-61.06						2080.5
	685.4	0.9240	47.0	3.1833	-0.3373	0.0024	-0.5902	0.0032	0.0796		0.013591
24	100.7	8.0	45.0	18100.	-1896.	32.	-18009.	2050.	21619.	565.3	92540.
	31.7	0.0	44.6	18100.	-1896.	32.	-18009.	2050.	21619.	740.	121104.
	0.147		77.7	19590.	-2052.	35.	-19492.	2218.	23399.	0.230	1916.3
	97.	0.2196	74.3		-54.70						2074.0
	685.4	0.9239	46.4	3.1567	-0.3300	0.0056	-0.5965	0.0111	0.1170		0.013537
25	100.7	8.0	45.0	18510.	-1875.	-68.	-12783.	-2601.	-3483.	565.5	110256.
	31.7	0.0	44.6	18510.	-1875.	-68.	-12783.	-2601.	-3483.	740.	104631.
	0.147		68.8	20034.	-2024.	-74.	-13830.	-2815.	-3770.	0.230	1929.4
	97.	0.2196	50.1		-59.12						2080.7
	685.4	0.9239	46.9	3.2245	-0.3266	-0.0116	-0.4238	-0.0141	-0.0189		0.013614
26	100.8	8.0	45.0	18080.	-1950.	-111.	-23044.	-2690.	-3756.	566.0	109757.
	31.8	0.0	44.6	18080.	-1950.	-111.	-23044.	-2690.	-3756.	741.	104424.
	0.147		69.3	19569.	-2111.	-120.	-24943.	-2912.	-4066.	0.230	1927.4
	97.	0.2196	51.7		-61.35						2080.7
	685.4	0.9239	47.0	3.1025	-0.3389	-0.0193	-0.7624	-0.0145	-0.0203		0.013572
27	101.1	8.0	45.0	18310.	-1868.	-326.	-18486.	2350.	-6408.	565.6	110530.
	32.0	0.0	63.1	18310.	-1868.	-326.	-18486.	2350.	-6408.	740.	103504.
	0.148		79.1	19819.	-2022.	-353.	-20012.	2544.	-6936.	0.210	1920.9
	97.	0.2196	50.0		-56.46						2079.2
	685.4	0.9239	47.0	3.1668	-0.3230	-0.0564	-0.6083	0.0120	-0.0344		0.013547
28	100.9	8.0	45.0	18295.	-1846.	-575.	-18201.	8412.	-7008.	565.7	110576.
	31.8	0.0	53.9	18295.	-1846.	-575.	-18201.	8412.	-7008.	741.	103523.
	0.147		76.9	19837.	-2001.	-623.	-19735.	9121.	-7599.	0.230	1921.8
	98.	0.2192	50.7		-58.19						2083.8
	686.0	0.9221	46.4	3.1799	-0.3212	-0.3999	-0.6020	0.0455	-0.0379		0.013564
29	80.8	+5.0	80.0	9323.	+99.	-55.	+782.	-2035.	-1448.	566.0	47318.
	20.5	0.0	44.2	9323.	+99.	-55.	+782.	-2035.	-1448.	741.	45262.
	0.118		65.6	10046.	+107.	-59.	+843.	-2194.	-1561.	0.184	831.4
	97.	0.2205	50.7		+4.53						846.4
	685.4	0.9275	19.1	2.5335	+0.0267	-0.0148	+0.0461	-0.0171	-0.0121		0.005824
30	80.5	-3.0	80.0	10545.	61.	+76.	-2504.	-1667.	-1554.	565.9	46599.
	20.4	0.0	44.6	10545.	61.	+76.	-2504.	-1667.	-1554.	741.	44599.
	0.118		65.5	11364.	66.	+82.	-2700.	-1797.	-1963.	0.184	821.5
	97.	0.2205	50.7		3.00						865.6
	685.4	0.9276	19.2	2.4867	0.0165	+0.0206	-0.1293	-0.0141	-0.0135		0.005763
31	80.6	-1.0	80.0	11680.	224.	+45.	-3317.	-1687.	-1573.	565.9	47250.
	20.4	0.0	44.7	11680.	224.	+45.	-3317.	-1687.	-1573.	741.	44550.
	0.118		65.5	12588.	241.	+49.	-3576.	-2035.	-2014.	0.184	827.8
	97.	0.2205	50.1		10.47						842.5
	685.4	0.9275	19.2	3.2193	0.0606	+0.0122	-0.1706	-0.0159	-0.0156		0.005815
32	80.4	0.0	80.0	13130.	455.	-22.	-3064.	-1953.	-3357.	565.8	46814.
	20.3	0.0	44.7	13130.	455.	-22.	-3064.	-1953.	-3357.	741.	44372.
	0.118		65.6	14155.	491.	-24.	-3477.	-2162.	-3902.	0.183	820.5
	97.	0.2205	50.7		22.39						864.8
	685.4	0.9276	19.2	3.5734	0.1237	-0.0060	-0.1929	-0.0165	-0.0277		0.005755

TABLE V.— Continued.

RUN 26 TEST 525

PT	VKTS QPSF MTON TEMP VSNDKTS	ALPHA,C PSI RHO-SLUG RHOF	INA PERCRPS LONG STA LAT STA PORTCET	LIFT,LB LIFT LIFT/Q CL	DRAG,LB DRAG DRAG/Q CD	SIDE,LB SIDE SIDE/Q CY	PITCH PITCH PITCH/Q CM	YAW YAW YAW/Q CN	ROLL ROLL ROLL/Q CROLL	RPM OMEGAR V/ΩR	HMAS CMAS HP HP/Q CP/SIGMA
33	80.4	3.0	80.0	14590.	757.	+50.	+3707.	-1469.	+652.	565.8	46079.
	20.3	0.0	44.5	14590.	757.	-50.	+3707.	-1469.	-652.	741.	44833.
	0.118		65.6	15632.	815.	+6[illegible].	-3448.	-1564.	-702.	0.163	823.3
	97.	0.2205	56.7		37.30						867.5
	685.4	0.9276	19.2	3.9478	0.1260	+0.0152	+0.1421	+0.0124	+0.0055		0.005779
34	80.7	-1.0	80.0	12790.	463.	-65.	2081.	-1413.	-1341.	565.9	42478.
	20.5	0.0	44.5	12790.	463.	-65.	2081.	+1413.	-1341.	741.	45516.
	0.118		55.9	13764.	499.	-70.	229[illegible].	+1520.	-1284.	0.164	835.0
	97.	0.2205	50.2		22.65						900.2
	685.4	0.9275	19.2	3.0538	0.1250	-0.0176	0.1375	-0.0114	-0.0100		0.005857
35	80.5	-1.0	80.0	11230.	43.	-55.	-8913.	-1837.	-1037.	566.0	47776.
	20.4	0.0	44.7	11230.	63.	-55.	-8913.	-1837.	-1037.	741.	45555.
	0.118		75.1	12167.	46.	-59.	-9609.	-1981.	-1118.	0.163	839.1
	97.	0.2205	50.0		2.11						903.6
	685.4	0.9276	19.2	3.0065	0.0117	-0.0149	-0.4601	-0.0155	-0.0087		0.005876
36	80.6	-1.0	80.0	11740.	284.	8.	-3008.	+1867.	23058.	565.8	39004.
	20.4	0.0	44.6	11740.	266.	8.	-3008.	+1867.	23058.	741.	52616.
	0.118		64.6	12657.	3[illegible].	9.	-3242.	-2034.	24857.	0.164	824.4
	97.	0.2235	70.0		14.11						888.8
	685.4	0.9275	19.2	3.1774	0.0779	0.0022	-0.1549	+0.0159	0.1440		0.005784
37	80.6	-1.0	80.0	11675.	306.	-15.	-3062.	-1749.	23662.	566.3	38624.
	20.4	0.0	44.7	11675.	306.	-15.	-3062.	-1749.	23662.	741.	52581.
	0.118		64.5	12587.	330.	-16.	-3300.	-1885.	25510.	0.164	820.0
	97.	0.2205	70.0		14.49						885.0
	685.4	0.9275	19.2	3.1598	0.0825	-0.0041	-0.1576	-0.0147	0.1991		0.005756
38	80.4	-1.0	80.0	11020.	403.	30.	-2101.	-907.	45226.	566.	33279.
	20.3	0.0	44.7	11020.	403.	30.	-2101.	-907.	45226.	741.	50444.
	0.118		64.7	11880.	434.	32.	-2265.	-978.	48759.	0.165	810.4
	97.	0.2205	84.6		19.84						873.6
	685.4	0.9276	19.2	2.9966	0.1096	0.0082	-0.1047	-0.0077	0.3821		0.005674
39	80.8	-1.0	80.0	11865.	271.	-237.	-2514.	4200.	-7006.	566.1	40360.
	20.6	0.0	64.3	11865.	271.	-237.	-2514.	4200.	-7006.	741.	45399.
	0.118		64.8	12784.	292.	-255.	-2709.	4521.	-7541.	0.164	824.2
	96.	0.2209	50.0		13.18						887.0
	684.8	0.9292	19.2	3.1887	0.0728	-0.0637	-0.1286	0.0351	-0.0585		0.005765
40	80.5	-1.0	80.0	11860.	280.	-342.	-2390.	9982.	-13991.	566.	46100.
	20.4	0.0	33.2	11860.	280.	-342.	-2390.	9982.	-13991.	741.	45905.
	0.118		64.8	12763.	310.	-368.	-2572.	10742.	-15057.	0.163	827.4
	96.	0.2209	50.1		14.19						890.4
	684.8	0.9292	19.2	3.2175	0.0781	-0.0928	-0.1239	0.0842	-0.1186		0.005768
41	80.5	-1.0	80.0	11830.	275.	-580.	-2797.	-85.	-3309.	566.0	40849.
	20.4	-4.0	43.6	11830.	275.	-580.	-2797.	-85.	-3309.	741.	44969.
	0.118		64.9	12731.	296.	-624.	-3010.	-92.	-3561.	0.163	825.1
	96.	0.2209	50.1		13.49						887.9
	684.8	0.9292	19.2	3.2055	0.0745	-0.1572	-0.1442	-0.0007	-0.0279		0.005772
42	80.6	-1.0	80.0	11825.	259.	-287.	-2466.	-1466.	-646.	566.3	40754.
	20.4	-2.0	43.7	11825.	259.	-287.	-2466.	-1466.	-646.	741.	44716.
	0.118		64.9	12726.	279.	-309.	-2653.	-1578.	-752.	0.164	82[illegible].9
	96.	0.2209	50.0		12.67						884.5
	684.8	0.9292	19.2	3.1966	0.0703	-0.0776	-0.1268	-0.0123	-0.0059		0.005743
43	80.6	-1.0	80.0	11825.	250.	211.	-2526.	-2607.	-571.	566.	40634.
	20.4	2.0	43.5	11825.	250.	211.	-2526.	-2607.	-571.	741.	44716.
	0.118		64.9	12726.	269.	227.	-27[illegible].	-2806.	-614.	0.163	820.6
	96.	0.2209	50.2		12.25						883.1
	684.8	0.9292	19.2	3.2004	0.0677	0.0571	-0.1301	-0.0219	-0.0048		0.005738
44	80.6	-1.0	80.0	11910.	255.	498.	-2340.	-3495.	1714.	566.0	47199.
	20.7	4.0	43.6	11910.	255.	498.	-2340.	-3495.	1714.	741.	45282.
	0.118		64.8	12846.	275.	526.	-2523.	-3766.	1848.	0.164	830.5
	97.	0.2205	44.4		12.39						895.4
	685.4	0.9275	19.2	3.2234	0.0685	0.1321	-0.1205	-0.0294	0.0144		0.005823
45	80.7	-1.0	80.0	11925.	307.	1082.	-999.	-7120.	3106.	566.0	47616.
	20.5	8.0	43.6	11925.	307.	1082.	-999.	-7120.	3106.	741.	45535.
	0.118		64.5	12857.	331.	1167.	-1077.	-7684.	3350.	0.164	836.6
	97.	0.2205	50.2		15.[illegible]						902.0
	685.4	0.9275	19.2	3.2199	0.0829	0.2922	-0.0513	-0.0596	0.0261		0.005864
46	80.6	-1.0	80.0	11665.	410.	1628.	360.	-9218.	6206.	566.0	47074.
	20.4	12.0	43.7	11665.	410.	1628.	360.	-9218.	6206.	741.	44969.
	0.118		64.9	12576.	442.	1755.	385.	-9938.	6685.	0.164	826.7
	97.	0.2205	50.1		22.[illegible]						891.2
	685.4	0.9275	19.2	3.1577	0.1110	0.4406	0.0165	-0.0776	0.0522		0.005795

TABLE V.— Continued.

RUN 29 TEST 525

PT	VELS / DPSF / MION / TEMP / VSOUND	ALPHA C / PSI / MACH	[illegible]	LIFT / LIFT / LIFT/Q / CL	DRAG / DRAG / DRAG/Q / FF / CD	SIDE / SIDE / SIDE/Q / CY	PITCH / PITCH / PITCH/Q / CM	YAW / YAW / YAW/Q / CN	ROLL / ROLL / ROLL/Q / CROLL
3	119.1	-4.0	60.0	4755.	2990.	-155.	10037.	-91.	598.
	49.8	0.0	49.9	4755.	2990.	-155.	10037.	-91.	598.
	0.177		50.7	4939.	3027.	-162.	10795.	-95.	724.
	78.	0.2270	49.9		65.07				
	673.6	0.9588	50.0	0.5865	0.3888	-0.0127	0.3679	-0.0003	0.0025
4	119.1	-2.0	60.0	5890.	2433.	-155.	15744.	-540.	-506.
	49.7	0.0	49.9	5890.	2433.	-155.	15744.	-540.	-506.
	0.177		50.7	6105.	3077.	-155.	17574.	-567.	-584.
	79.	0.2265	49.9		64.13				
	678.2	0.9537	49.9	0.7110	0.3593	-0.0191	0.3878	-0.0020	-0.0024
5	118.4	0.0	60.0	7090.	3043.	-140.	14182.	-303.	-1339.
	49.2	0.0	49.8	7098.	3043.	-140.	14182.	-303.	-1339.
	0.176		50.7	7438.	3192.	-147.	14875.	-432.	-1405.
	79.	0.2266	49.9		67.29				
	678.2	0.9537	50.0	0.8682	0.3717	-0.0171	0.3297	-0.0015	-0.0051
6	119.3	2.0	60.0	8340.	3186.	-121.	13520.	-441.	-440.
	49.1	0.0	49.9	8340.	3186.	-121.	13520.	-441.	-440.
	0.176		50.7	8765.	3354.	-127.	14107.	-460.	-462.
	80.	0.2262	50.0		70.67				
	679.4	0.9515	50.1	1.0214	0.3909	-0.0148	0.2684	-0.0017	-0.0017
7	119.0	4.0	60.0	9440.	3354.	-118.	9162.	-105.	105.
	49.4	0.0	49.7	9440.	3354.	-118.	9162.	-105.	105.
	0.176		50.7	9920.	3525.	-124.	9628.	-113.	111.
	80.	0.2262	50.0		74.74				
	679.4	0.9510	50.0	1.1621	0.4129	-0.0145	0.2146	-0.0004	0.0004
8	118.3	5.0	60.0	10150.	3460.	-120.	7588.	373.	31.
	49.0	0.0	49.9	10150.	3460.	-120.	7588.	373.	31.
	0.176		50.7	10667.	3643.	-126.	7969.	392.	32.
	81.	0.2256	50.0		76.90				
	675.5	0.9498	50.0	1.2481	0.4264	-0.0147	0.1771	0.0014	0.0001
9	116.4	6.0	60.0	10735.	3555.	-97.	6325.	378.	-68.
	49.1	0.0	49.9	10735.	3555.	-97.	6325.	378.	-68.
	0.176		50.7	11282.	3743.	-102.	6660.	398.	-71.
	81.	0.2258	49.9		78.54				
	675.5	0.9498	49.9	1.3137	0.4359	-0.0119	0.1476	0.0014	-0.0003
10	119.7	-4.0	45.0	5105.	2563.	-189.	15594.	153.	351.
	48.0	0.0	49.8	5105.	2563.	-189.	15594.	153.	351.
	0.176		50.7	5387.	2704.	-199.	16454.	161.	371.
	82.	0.2253	50.0		55.73				
	676.1	0.9477	50.0	0.6133	0.3079	-0.0227	0.3565	0.0006	0.0013
11	119.6	-4.0	45.0	6545.	2641.	-117.	15821.	-135.	744.
	45.9	0.0	49.9	6545.	2641.	-117.	15821.	-135.	744.
	0.176		50.7	6906.	2787.	-123.	16693.	-142.	785.
	82.	0.2253	50.0		57.52				
	676.1	0.9477	50.0	0.7875	0.3178	-0.0141	0.3622	-0.0005	0.0028
12	119.5	0.0	45.0	7770.	2755.	-160.	15656.	-124.	337.
	45.8	0.0	50.0	7770.	2755.	-160.	15656.	-124.	337.
	0.177		50.7	8194.	2907.	-169.	16460.	-130.	356.
	82.	0.2253	49.9		60.15				
	675.1	0.9478	50.0	0.9373	0.3323	-0.0193	0.3135	-0.0005	0.0013
13	119.4	2.0	45.0	9000.	2916.	-143.	11294.	199.	-310.
	45.6	0.0	50.0	9000.	2916.	-143.	11294.	199.	-310.
	0.177		50.7	9511.	3082.	-151.	11937.	211.	-328.
	83.	0.2249	50.0		63.69				
	675.7	0.9481	50.0	1.0895	0.3530	-0.0173	0.2602	0.0007	-0.0012
14	119.4	4.0	45.0	10225.	3111.	-141.	8855.	261.	-202.
	45.7	0.0	49.8	10225.	3111.	-141.	8855.	261.	-202.
	0.177		50.7	10808.	3288.	-149.	9361.	276.	-214.
	83.	0.2249	50.0		66.13				
	676.7	0.9461	50.0	1.2371	0.3764	-0.0171	0.2039	0.0010	-0.0008
15	119.1	6.0	45.0	11470.	3290.	-131.	6327.	845.	105.
	45.8	0.0	50.0	11470.	3290.	-131.	6327.	845.	105.
	0.177		50.7	12123.	3477.	-138.	6687.	893.	111.
	83.	0.2244	50.0		72.45				
	676.7	0.9462	50.0	1.3855	0.4009	-0.0159	0.1465	0.0032	0.0004
16	119.0	8.0	45.0	12620.	3554.	-137.	3380.	847.	226.
	45.8	0.0	50.1	12620.	3554.	-137.	3380.	847.	226.
	0.177		50.6	13338.	3756.	-145.	3573.	896.	239.
	83.	0.2249	50.0		76.31				
	675.7	0.9462	50.0	1.5362	0.4326	-0.0167	0.0783	0.0032	0.0009
17	119.0	9.0	45.0	13180.	3539.	-182.	4230.	262.	5122.
	45.8	0.0	50.0	13180.	3539.	-182.	4230.	262.	5122.
	0.176		50.6	13904.	3740.	-192.	4471.	277.	5413.
	83.	0.2249	70.0		78.52				
	676.7	0.9462	50.0	1.5974	0.4310	-0.0222	0.0980	0.0010	0.0194
18	119.0	6.0	45.0	11955.	3446.	-155.	6346.	-462.	10329.
	45.3	0.0	49.9	11955.	3446.	-155.	6346.	-462.	10329.
	0.176		50.7	12635.	3642.	-164.	6707.	-1617.	10917.
	83.	0.2249	49.5		76.50				
	675.7	0.9462	49.9	1.4580	0.4199	-0.0189	0.1472	-0.0036	0.0390
19	121.6	-4.0	[illegible]	5405.	1590.	-90.	12188.	424.	1494.
	47.9	0.0	49.9	5405.	1590.	-90.	12188.	424.	1494.
	0.180		50.7	5727.	1685.	-95.	12913.	449.	1583.
	84.	0.2243	49.9		33.05				
	677.8	0.9435	50.0	0.6517	0.1958	-0.0105	0.2731	0.0054	0.0054
20	122.1	-2.0	[illegible]	7500.	1615.	-103.	12460.	674.	573.
	47.8	0.0	50.0	7500.	1615.	-103.	12460.	674.	573.
	0.181		50.7	7951.	1714.	-109.	13256.	710.	606.
	85.	0.2239	50.0		33.45				
	678.0	0.9425	50.0	0.8129	0.1875	-0.0120	0.2508	0.0024	0.0022

TABLE V.— Continued.

RUN 29 TEST 525

PT	KNTS QPSF MTUN TEMP VSNDKTS	ALFS,C PSI HUMIDITY RHUP	INA PED POS LONG STK LAT STK POS CTR	LIFT,LB LIFT LIFT/Q CL	DRAG,LB DRAG DRAG/Q Q CD	SIDE,LB SIDE SIDE/Q CY	PITCH,IN-LB PITCH PITCH/Q CM	YAW YAW YAW/Q CN	ROLL ROLL ROLL/Q CROLL
21	122.0	6.0	0.0	8542.	1646.	-75.	10500.	1105.	1232.
	47.4	0.0	50.2	8542.	1644.	-75.	10500.	1105.	1232.
	0.161		50.7	9066.	1744.	-80.	11237.	1240.	1306.
	85.	0.2234	50.0		34.76				
	678.0	0.9820	50.0	0.9907	0.1918	-0.0087	0.2345	0.0142	0.0045
22	121.7	2.0	0.0	10220.	1771.	-114.	8364.	366.	911.
	47.3	0.0	50.0	10220.	1771.	-114.	8364.	366.	911.
	0.160		50.7	10658.	1885.	-120.	8930.	1452.	967.
	85.	0.2239	50.0		37.48				
	678.0	0.9821	49.9	1.1716	0.2071	-0.0139	0.1665	0.0050	0.0033
23	121.5	4.0	0.0	11480.	1910.	-130.	5496.	1520.	952.
	47.1	0.0	50.0	11480.	1910.	-130.	5496.	1520.	952.
	0.160		50.7	12185.	2027.	-138.	5834.	1613.	1011.
	85.	0.2234	50.0		40.56				
	678.0	0.9821	50.0	1.3989	0.2291	-0.0153	0.1227	0.0055	0.0035
24	121.5	6.0	0.0	13053.	2086.	-97.	2967.	1278.	754.
	47.1	0.0	50.0	13053.	2086.	-97.	2967.	1278.	754.
	0.160		50.7	13852.	2214.	-103.	3150.	1357.	800.
	85.	0.2234	50.0		44.30				
	678.0	0.9821	50.0	1.5311	0.2097	-0.0114	0.0662	0.0047	0.0027
25	121.3	8.0	0.0	14485.	2280.	-117.	-51.	1536.	1340.
	46.9	0.0	50.0	14485.	2280.	-117.	-51.	1536.	1340.
	0.160		50.7	15374.	2425.	-124.	-55.	1631.	1422.
	85.	0.2234	50.0		48.71				
	678.0	0.9822	49.9	1.7053	0.2691	-0.0138	-0.0012	0.0056	0.0049
26	121.5	10.0	0.0	15895.	2528.	-126.	-3380.	1456.	652.
	47.0	0.0	50.0	15895.	2528.	-126.	-3380.	1456.	652.
	0.160		50.6	16902.	2689.	-134.	-3594.	1549.	693.
	86.	0.2235	50.0		53.74				
	678.6	0.9806	49.9	1.8685	0.2972	-0.0148	-0.0756	0.0053	0.0024
27	121.2	11.0	0.0	16530.	2644.	-118.	-3699.	1201.	639.
	46.7	0.0	50.0	16530.	2644.	-118.	-3699.	1201.	639.
	0.179		50.7	17575.	2811.	-125.	-3933.	1277.	679.
	86.	0.2236	50.0		56.56				
	679.0	0.9805	49.9	1.9537	0.3125	-0.0139	-0.0832	0.0044	0.0023
28	121.3	8.0	0.0	14120.	2245.	-206.	420.	522.	5954.
	46.7	0.0	50.0	14120.	2245.	-206.	420.	522.	5954.
	0.179		50.5	15041.	2391.	-219.	448.	556.	6342.
	87.	0.2231	49.2		48.03				
	679.2	0.9384	49.6	1.6696	0.2655	-0.0245	0.0095	0.0019	0.0219
29	121.2	8.0	0.0	13515.	2188.	-252.	2788.	12.	13210.
	46.7	0.0	50.5	13515.	2188.	-252.	2788.	12.	13210.
	0.179		50.5	14394.	2328.	-274.	2964.	13.	14071.
	87.	0.2231	49.6		46.79				
	679.2	0.9384	49.7	1.5981	0.2585	-0.0310	0.0627	0.0000	0.0486
30	122.5	-8.0	0.0	3335.	1254.	-60.	13765.	1771.	3999.
	47.7	0.0	50.5	3335.	1254.	-60.	13765.	1771.	3999.
	0.161		50.7	3554.	1336.	-65.	14667.	1887.	4255.
	87.	0.2231	50.0		26.31				
	679.2	0.9385	49.8	0.3866	0.1458	-0.0093	0.3038	0.0064	0.0140
31	122.5	-2.0	0.0	5020.	1234.	-72.	12064.	1858.	2526.
	47.7	0.0	50.0	5020.	1234.	-72.	12064.	1858.	2526.
	0.161		50.7	5349.	1324.	-77.	13733.	1980.	2693.
	87.	0.2231	50.0		25.97				
	679.2	0.9385	49.8	0.5813	0.1435	-0.0083	0.2691	0.0067	0.0091
32	122.5	0.0	0.0	6525.	1276.	-84.	11763.	1754.	2129.
	47.7	0.0	50.0	6525.	1276.	-84.	11763.	1754.	2129.
	0.161		50.6	6955.	1362.	-90.	12534.	1874.	2269.
	87.	0.2231	50.0		26.81				
	679.2	0.9385	49.8	0.7555	0.1481	-0.0097	0.2595	0.0063	0.0077
33	122.3	2.0	0.0	8050.	1357.	-63.	8633.	1562.	2303.
	47.5	0.0	50.6	8050.	1357.	-63.	8633.	1562.	2303.
	0.161		50.6	8577.	1446.	-67.	9190.	1664.	2454.
	87.	0.2231	50.0		28.55				
	679.2	0.9385	49.8	0.9358	0.1577	-0.0073	0.1910	0.0056	0.0083
34	122.1	4.0	0.0	9500.	1488.	-104.	6027.	2020.	1901.
	47.4	0.0	50.5	9500.	1488.	-104.	6027.	2020.	1901.
	0.161		50.6	10122.	1585.	-111.	7039.	2152.	2025.
	87.	0.2231	50.0		31.4.				
	679.2	0.9386	49.8	1.1057	0.1719	-0.0121	0.1467	0.0075	0.0064
35	122.0	6.0	0.0	11025.	1634.	-114.	3643.	1957.	3055.
	47.3	0.0	50.5	11025.	1634.	-114.	3643.	1957.	3055.
	0.160		50.7	11746.	1741.	-121.	4054.	2085.	3255.
	87.	0.2231	50.0		34.33				
	679.2	0.9386	49.7	1.2872	0.1908	-0.0133	0.0854	0.0071	0.0111
36	122.0	8.0	0.0	12395.	1843.	-105.	1285.	1790.	2378.
	47.2	0.0	50.0	12395.	1843.	-105.	1285.	1790.	2378.
	0.160		50.6	13224.	1967.	-112.	1372.	1523.	2535.
	86.	0.2227	50.0		39.04				
	679.9	0.9369	49.7	1.4507	0.2157	-0.0123	0.0246	0.0062	0.0086
37	121.7	10.0	0.0	13950.	2040.	-93.	-1080.	1228.	1826.
	47.0	0.0	50.7	13950.	2040.	-93.	-1080.	1228.	1826.
	0.160		50.7	14863.	2176.	-99.	-1152.	1310.	1946.
	85.	0.2226	50.0		43.43				
	679.9	0.9375	49.8	1.6387	0.2399	-0.0109	-0.0242	0.0045	0.0067
38	122.3	-8.0	0.0	405.	1213.	5.	11573.	2055.	4046.
	47.5	0.0	50.6	405.	1213.	5.	11573.	2055.	4046.
	0.161		50.7	432.	1294.	5.	12265.	2193.	4315.
	85.	0.2226	50.0		25.50				
	679.9	0.9372	49.7	0.0471	0.1412	0.0006	0.2550	0.0074	0.0146

ORIGINAL PAGE IS OF POOR QUALITY

TABLE V.— Continued.

RUN 29 TEST 525

PT	VATS / DPSF / MACH / TEMP / VSNDKTS	ALFS,0 / PSI / / RHO*1000 / RHOR	INA / PET POS / LONG STK / LAT STK / POW LEV	LIFT,0 / LIFT / LIFT/A / / CL	DRAG,0 / DRAG / DRAG/A / FE / CD	SIDE,0 / SIDE / SIDE/A / / CY	PITCH,0 / PITCH / PITCH/A / / CM	YAW,0 / YAW / YAW/A / / CN	ROLL,0 / ROLL / ROLL/A / / CROLL
39	122.5	-2.0	0.0	2605.	1157.	-3.	5097.	2500.	3415.
	47.0	0.0	50.7	2505.	1157.	-3.	9997.	2500.	3415.
	0.181		50.7	2134.	1235.	-3.	10561.	2674.	4176.
	88.	0.2227	50.0		24.30				
	679.9	0.9371	49.7	0.2320	0.1382	-0.0003	0.2105	0.0040	0.0141
40	122.6	0.0	0.0	3603.	1125.	-29.	6264.	2285.	3057.
	47.0	0.0	50.5	3603.	1125.	-29.	6264.	2285.	3057.
	0.181		50.6	3881.	1203.	-21.	6834.	2442.	3268.
	89.	0.2223	50.1		25.62				
	680.5	0.9356	49.7	0.4212	0.1305	-0.0023	0.1824	0.0082	0.0116
41	122.6	2.0	0.0	5105.	1139.	-37.	5683.	2528.	3725.
	47.0	0.0	50.3	5105.	1139.	-37.	5683.	2528.	3725.
	0.181		50.6	5457.	1216.	-40.	6076.	2702.	3982.
	89.	0.2223	50.1		25.44				
	680.5	0.9358	49.7	0.5924	0.1323	-0.0049	0.1255	0.0041	0.0134
42	122.4	4.0	0.0	6670.	1190.	-20.	3153.	1970.	3373.
	47.5	0.0	50.5	6670.	1190.	-20.	3153.	1970.	3373.
	0.181		50.6	7130.	1272.	-21.	3371.	2105.	3605.
	89.	0.2223	50.0		25.60				
	680.5	0.9355	49.9	0.7701	0.1385	-0.0023	0.0648	0.0071	0.0122
43	122.3	6.0	0.0	8110.	1296.	-25.	950.	2189.	3858.
	47.3	0.0	50.0	8110.	1296.	-25.	950.	2189.	3858.
	0.180		50.7	8665.	1385.	-27.	1015.	2338.	4103.
	89.	0.2224	50.0		27.37				
	680.5	0.9355	49.9	0.9409	0.1512	-0.0029	0.0211	0.0074	0.0134
44	122.0	8.0	0.0	9405.	1431.	2.	-4424.	1702.	4163.
	47.1	0.0	50.5	9405.	1431.	2.	-4424.	1702.	4163.
	0.180		50.7	10055.	1530.	2.	-4665.	1819.	4421.
	89.	0.2224	50.0		30.30				
	680.5	0.9358	49.7	1.1024	0.1677	0.0002	-0.0175	0.0062	0.0152
45	121.8	10.0	0.0	10885.	1616.	-1.	-2200.	1422.	3197.
	47.0	0.0	50.8	10885.	1616.	-1.	-2200.	1422.	3197.
	0.180		50.6	11634.	1727.	-1.	-2352.	1520.	3417.
	89.	0.2224	50.0		34.37				
	680.5	0.9358	49.7	1.2789	0.1899	-0.0001	-0.0092	0.0052	0.0117

RUN 30 TEST 525

PT	VATS / DPSF / MACH / TEMP / VSNDKTS	ALFS,0 / PSI / / RHO*1000 / RHOR	INA / PET POS / LONG STK / LAT STK / POW LEV	LIFT,0 / LIFT / LIFT/A / / CL	DRAG,0 / DRAG / DRAG/A / FE / CD	SIDE,0 / SIDE / SIDE/A / / CY	PITCH,0 / PITCH / PITCH/A / / CM	YAW,0 / YAW / YAW/A / / CN	ROLL,0 / ROLL / ROLL/A / / CROLL
3	118.7	-4.0	0.0	4595.	1268.	-117.	11955.	1604.	1648.
	45.2	0.0	50.1	4595.	1268.	-117.	11955.	1604.	1648.
	0.176		50.0	4902.	1338.	-123.	12616.	1693.	1739.
	82.	0.2252	50.0		26.05				
	676.1	0.9477	50.2	0.5877	0.1550	-0.0143	0.2761	0.0061	0.0063
4	118.3	-2.0	0.0	6245.	1252.	-121.	11344.	1126.	1580.
	44.9	0.0	50.1	6245.	1252.	-121.	11344.	1126.	1580.
	0.176		50.0	6591.	1333.	-128.	11975.	1190.	1667.
	82.	0.2252	50.0		28.54				
	676.1	0.9474	50.1	0.7692	0.1579	-0.0149	0.2659	0.0045	0.0061
5	118.2	0.0	0.0	7865.	1333.	-134.	10075.	1294.	1716.
	44.8	0.0	50.2	7865.	1333.	-134.	10075.	1294.	1716.
	0.175		50.0	8322.	1407.	-141.	10634.	1366.	1811.
	82.	0.2252	50.0		29.76				
	675.1	0.9475	50.1	0.9727	0.1644	-0.0165	0.2365	0.0050	0.0066
6	118.4	2.0	0.0	9475.	1457.	-115.	8074.	1213.	1698.
	44.9	0.0	50.1	9475.	1457.	-115.	8074.	1213.	1698.
	0.176		50.0	10019.	1541.	-122.	8538.	1282.	1796.
	83.	0.2248	49.9		32.48				
	676.7	0.9457	50.0	1.1671	0.1795	-0.0142	0.1893	0.0046	0.0062
7	118.7	4.0	0.0	11095.	1610.	-124.	5879.	1641.	2497.
	45.0	0.0	50.0	11095.	1610.	-124.	5879.	1641.	2497.
	0.176		50.0	11734.	1706.	-131.	6224.	1734.	2576.
	84.	0.2244	50.0		35.78				
	677.4	0.9439	50.0	1.3624	0.1977	-0.0152	0.1378	0.0063	0.0091
8	118.6	6.0	0.0	12765.	1773.	-126.	3555.	1419.	1555.
	44.9	0.0	50.2	12765.	1773.	-126.	3555.	1419.	1555.
	0.176		50.0	13466.	1872.	-131.	3764.	1503.	1646.
	84.	0.2244	50.0		39.45				
	677.4	0.9439	50.2	1.5617	0.2179	-0.0155	0.0831	0.0054	0.0059
9	118.4	8.0	0.0	13985.	2008.	-141.	986.	1140.	442.
	44.8	0.0	50.1	13985.	2008.	-141.	986.	1140.	442.
	0.175		50.0	14815.	2127.	-149.	1045.	1208.	468.
	84.	0.2244	50.0		44.74				
	677.4	0.9444	50.1	[illegible]	0.2475	-0.0174	0.0231	0.0044	0.0017
10	118.6	10.0	0.0	15175.	2237.	-116.	-1504.	865.	[illegible]
	44.9	0.0	50.2	15175.	2237.	-116.	-1504.	865.	[illegible]
	0.176		50.0	[illegible]	2370.	-123.	-1590.	916.	44.
	84.	0.2244	50.0		[illegible]				
	677.4	0.9439	50.1	[illegible]	0.2751	-0.0143	-0.0300	0.0033	0.0002
11	118.7	-4.0	45.0	4535.	2214.	-116.	15964.	895.	1370.
	45.0	0.0	50.1	4535.	2214.	-116.	15964.	895.	1370.
	0.178		50.0	[illegible]	2350.	-123.	16943.	[illegible]	1455.
	85.	0.2237	49.9		[illegible]				
	678.0	0.9422	50.1	0.5555	0.2717	-0.0142	0.3724	0.0067	0.0052

TABLE V.— Continued.

RUN [illegible] TEST [illegible]

PT	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
12	118.5	-2.0	45.0	5930.	2293.	-165.	15357.	612.	599.
	44.8	0.0	50.7	5930.	2293.	-165.	15357.	612.	599.
	0.175		50.0	6245.	2434.	-173.	16298.	644.	636.
	85.	0.2240	50.0		51.23				
	678.0	0.9423	50.1	0.7519	0.2832	-0.0201	0.3607	0.0123	0.0023
13	119.1	0.0	45.0	7340.	2444.	-149.	13441.	1044.	711.
	65.2	0.0	50.1	7340.	2444.	-149.	13441.	1044.	711.
	0.176		50.1	7595.	2504.	-158.	14425.	1110.	736.
	88.	0.2235	50.0		54.21				
	678.6	0.9408	50.0	0.8976	0.2995	-0.0182	0.3244	0.0042	0.0027
14	118.8	2.0	45.0	8755.	2601.	-155.	11854.	768.	482.
	66.9	0.0	50.0	8755.	2601.	-155.	11854.	768.	482.
	0.176		50.0	9304.	2766.	-147.	12191.	817.	513.
	86.	0.2235	49.5		57.90				
	678.6	0.9405	50.1	1.0767	0.3199	-0.0228	0.2727	0.0029	0.0018
15	118.7	4.0	45.0	9850.	2808.	-165.	10150.	748.	203.
	66.8	0.0	50.1	9850.	2808.	-165.	10150.	748.	203.
	0.175		50.0	10492.	2991.	-174.	10811.	796.	217.
	87.	0.2231	49.4		62.73				
	679.2	0.9369	50.1	1.2157	0.3466	-0.0201	0.2384	0.0029	0.0008
16	118.9	6.0	45.0	11090.	2985.	-141.	8297.	311.	1655.
	66.9	0.0	50.2	11090.	2985.	-141.	8297.	311.	1655.
	0.176		50.0	11614.	3104.	-154.	8838.	332.	1763.
	87.	0.2231	50.1		65.41				
	679.2	0.9399	50.1	1.3832	0.3669	-0.0173	0.1941	0.0012	0.0063
17	119.0	8.0	45.0	12240.	3209.	-104.	8465.	704.	911.
	65.0	0.0	49.9	12240.	3209.	-104.	8465.	704.	911.
	0.176		50.0	13092.	3482.	-111.	9102.	819.	971.
	87.	0.2231	50.0		72.69				
	679.2	0.9387	50.0	1.5099	0.4016	-0.0128	0.1137	0.0024	0.0035
18	118.9	8.0	45.0	11975.	3284.	-113.	5508.	369.	8182.
	66.9	0.0	50.0	11975.	3284.	-113.	5508.	369.	8182.
	0.176		49.9	12756.	3477.	-120.	5867.	388.	8716.
	87.	0.2231	69.4		72.69				
	679.2	0.9388	90.1	1.4735	0.4016	-0.0139	0.1240	0.0014	0.0513
19	118.8	8.0	45.0	11275.	3233.	-113.	7515.	-562.	16683.
	66.9	0.0	49.8	11275.	3233.	-113.	7515.	-562.	16683.
	0.176		49.9	12010.	3444.	-120.	8324.	-599.	17771.
	87.	0.2231	69.7		72.68				
	679.2	0.9388	50.0	1.3888	0.3982	-0.0139	0.1832	-0.0122	0.0634
20	119.0	8.0	0.0	13645.	2020.	-177.	1443.	640.	10694.
	65.2	0.0	49.9	13645.	2020.	-177.	1443.	640.	10694.
	0.176		49.9	14503.	2150.	-194.	2474.	698.	11414.
	86.	0.2227	70.0		44.69				
	679.9	0.9370	50.0	1.6870	0.2469	-0.0216	0.0452	0.0032	0.0406
21	118.9	4.0	0.0	12000.	1978.	-224.	4024.	345.	19142.
	[illegible]	0.0	50.0	12000.	1978.	-224.	4024.	345.	19142.
	0.175		50.0	13510.	2111.	-239.	4300.	368.	20427.
	88.	0.2227	69.5		44.12				
	679.9	0.9371	50.1	1.5002	0.2438	-0.0276	0.0495	0.0013	0.0733
22	117.1	4.0	60.0	900.	2359.	-76.	14677.	1333.	1987.
	43.8	0.0	50.2	900.	2359.	-76.	14677.	1333.	1987.
	0.173		49.9	1047.	2521.	-81.	15683.	1425.	2123.
	89.	0.2224	50.9		54.33				
	680.5	0.9359	50.0	0.1287	0.3022	-0.0097	0.3554	0.0633	0.0079
23	119.0	-2.0	60.0	2245.	2482.	-85.	13304.	734.	1765.
	44.8	0.0	50.1	2245.	2482.	-85.	13304.	734.	1765.
	0.175		49.9	2400.	2632.	-91.	14229.	785.	1887.
	89.	0.2223	50.4		58.92				
	680.9	0.9354	50.1	0.2787	0.3030	-0.0105	0.3121	0.0028	0.0064
24	119.5	0.0	60.0	3610.	2508.	-87.	11216.	752.	1644.
	45.2	0.0	49.9	3610.	2508.	-87.	11216.	752.	1644.
	0.176		50.0	3860.	2682.	-93.	11992.	804.	1758.
	89.	0.2223	50.4		55.43				
	680.5	0.9357	50.1	0.4480	0.3002	-0.0108	0.2808	0.0029	0.0082
25	119.3	2.0	60.0	4885.	2580.	-104.	8983.	1043.	1509.
	44.8	0.0	50.0	4885.	2580.	-104.	8983.	1043.	1509.
	0.175		50.1	5211.	2750.	-111.	9600.	1118.	1602.
	90.	0.2219	50.3		57.31				
	681.1	0.9337	49.9	0.5989	0.3160	-0.0126	[illegible]	0.0040	0.0050
26	119.1	4.0	60.0	8190.	2654.	-59.	7119.	933.	1124.
	64.9	0.0	50.0	8190.	2654.	-59.	7119.	933.	1124.
	0.176		50.0	8658.	2843.	-70.	7625.	999.	1204.
	90.	0.2219	50.6		59.17				
	681.1	0.9337	50.1	0.7629	0.3265	-0.0065	0.1569	0.0035	0.0043
27	119.2	6.0	60.0	7400.	2839.	-74.	4465.	664.	621.
	44.9	0.0	49.9	7400.	2839.	-74.	4465.	664.	621.
	0.176		50.0	7926.	3039.	-79.	5134.	717.	658.
	90.	0.2219	50.5		62.56				
	681.1	0.9336	50.0	0.9105	0.3456	-0.0091	0.1167	0.0026	0.0024
28	119.2	7.0	60.0	8120.	2870.	-40.	4125.	1271.	623.
	44.9	0.0	49.9	8120.	2870.	-40.	4125.	1271.	623.
	0.175		50.0	8751.	3070.	-43.	4412.	1361.	660.
	90.	0.2219	50.4		65.95				
	681.1	0.9337	50.0	1.0358	0.3553	-0.0101	[illegible]	0.0144	0.0023
29	119.0	9.0	60.0	8125.	2961.	-44.	3357.	438.	1177.
	44.9	0.0	49.9	8125.	2961.	-44.	3357.	438.	1177.
	0.175		50.0	9345.	3150.	-47.	3275.	[illegible]	1261.
	90.	0.2219	50.4		65.10				
	681.1	0.9337	50.1	1.0769	0.3650	[illegible]	0.0719	0.0036	0.0045
30	119.4	9.0	60.0	9350.	3033.	-52.	3654.	465.	740.
	65.1	0.0	55.0	9350.	3033.	-52.	3654.	465.	740.
	0.176		49.4	10097.	3244.	-55.	3271.	533.	855.
	90.	0.2219	50.0		67.27				
	681.1	0.9336	50.	1.1498	0.3717	-0.0064	[illegible]	0.0057	0.0036

TABLE V.– Continued.

RUN 32 TEST 528

PT	[illegible]	ALFBDC / PSI / RHDN	[illegible] / POS / STR / STR	LIFT / LIFT / LIFT/C / [illegible]	DRAG / DRAG / DRAG/C / CD	SIDE / SIDE / SIDE/C / CY	PITCH / PITCH / PITCH/C / CM	YAW / YAW / YAW/C / CN	ROLL / ROLL / ROLL/C / CROLL
3	117.6	-4.0	0.0	1010.	1125.	-23.	10106.	2099.	4425.
	44.9	0.0	49.9	1070.	1125.	-23.	10106.	2099.	4425.
	0.175		50.0	1059.	1174.	-24.	10593.	2216.	4640.
	79.	0.2265	50.0		25.28				
	674.2	0.9540	50.0	0.1288	0.1376	-0.0028	0.2359	0.0340	0.0169
4	117.6	-2.0	0.0	2505.	1078.	-54.	8704.	2056.	3581.
	44.9	0.0	49.9	2505.	1078.	-54.	8704.	2056.	3581.
	0.175		50.0	2751.	1130.	-62.	9323.	2155.	4052.
	79.	0.2264	49.9		24.13				
	674.2	0.9540	50.0	0.3209	0.1328	-0.0073	0.2040	0.0078	0.0149
5	115.2	0.0	0.0	4280.	1064.	-32.	8428.	2182.	3175.
	45.3	0.0	50.0	4280.	1064.	-32.	8428.	2182.	3175.
	0.176		50.0	4474.	1117.	-34.	8752.	2292.	3329.
	80.	0.2263	50.0		23.82				
	674.9	0.9522	50.0	0.5226	0.1375	-0.0039	0.1561	0.0053	0.0121
6	116.2	2.0	0.0	5960.	1081.	-65.	4656.	2226.	2753.
	45.0	0.0	50.0	5960.	1081.	-65.	4656.	2226.	2753.
	0.176		50.0	6259.	1135.	-71.	4850.	2332.	2891.
	80.	0.2263	50.1		24.06				
	674.9	0.9522	50.0	0.7311	0.1326	-0.0083	0.1047	0.0045	0.0105
7	116.3	4.0	0.0	7395.	1191.	-74.	2456.	2270.	2909.
	45.0	0.0	50.1	7395.	1191.	-74.	2456.	2270.	2909.
	0.176		50.0	7770.	1253.	-78.	2584.	2389.	3061.
	81.	0.2259	50.1		26.44				
	675.5	0.9504	50.1	0.9059	0.1461	-0.0091	0.0571	0.0047	0.0111
8	116.3	6.0	0.0	8975.	1300.	-40.	-1162.	1909.	3357.
	45.0	0.0	50.0	8975.	1300.	-40.	-1162.	1909.	3357.
	0.176		49.9	9443.	1368.	-42.	-1173.	2008.	3532.
	81.	0.2259	50.0		28.84				
	675.5	0.9504	50.0	1.1021	0.1595	-0.0049	-0.0236	0.0045	0.0125
9	116.5	8.0	0.0	10590.	1469.	-42.	-2324.	1562.	3064.
	45.1	0.0	49.9	10590.	1469.	-42.	-2324.	1562.	3064.
	0.176		49.9	10952.	1544.	-44.	-2450.	1644.	3230.
	82.	0.2255	50.0		32.40				
	675.1	0.9487	50.0	1.2739	0.1801	-0.0051	-0.0542	0.0060	0.0117
10	116.2	10.0	0.0	11890.	1659.	-49.	-3715.	1358.	3859.
	44.9	0.0	50.1	11890.	1659.	-49.	-3715.	1358.	3859.
	0.176		50.0	12533.	1744.	-52.	-3910.	1463.	4047.
	82.	0.2255	50.0		36.45				
	676.1	0.9487	50.0	1.4830	0.2067	-0.0060	-0.0870	0.0055	0.0147
11	116.1	12.0	0.0	12545.	1788.	-67.	-3691.	1094.	2430.
	44.8	0.0	50.1	12545.	1788.	-67.	-3691.	1094.	2430.
	0.175		50.0	13223.	1885.	-71.	-3891.	1153.	2562.
	82.	0.2255	49.9		34.44				
	676.1	0.9487	50.0	1.5488	0.2207	-0.0083	-0.0867	0.0042	0.0093
12	116.3	12.0	0.0	13380.	1900.	-87.	-4905.	1250.	2066.
	44.9	0.0	50.1	13380.	1900.	-87.	-4905.	1250.	2066.
	0.176		50.0	14082.	2003.	-92.	-5171.	1297.	2175.
	82.	0.2255	50.0		42.27				
	676.1	0.9487	50.0	1.6522	0.2315	-0.0107	-0.1167	0.0047	0.0077
13	116.5	8.0	0.0	10175.	1495.	-43.	-1615.	1660.	15376.
	45.0	0.0	50.0	10175.	1495.	-43.	-1615.	1660.	15376.
	0.176		50.0	10769.	1574.	-46.	-1706.	1755.	16245.
	83.	0.2250	70.3		33.24				
	676.7	0.9466	50.0	1.2501	0.1837	-0.0053	-0.0378	0.0063	0.0567
14	116.4	8.0	0.0	9915.	1565.	-4.	-858.	1485.	24221.
	44.9	0.0	49.9	9915.	1565.	-4.	-858.	1485.	24221.
	0.176		50.0	10474.	1653.	-10.	-906.	1569.	25587.
	83.	0.2250	49.9		34.62				
	676.7	0.9466	50.1	1.2197	0.1926	-0.0011	-0.0201	0.0057	0.0925
15	116.2	4.0	0.0	6905.	1700.	-91.	12192.	652.	445.
	44.7	0.0	49.9	6905.	1700.	-91.	12192.	652.	445.
	0.175		50.0	7294.	1804.	-96.	12876.	689.	523.
	83.	0.2250	50.4		38.15				
	676.7	0.9467	50.0	0.8527	0.2109	-0.0112	0.2865	0.0025	0.0019
16	116.4	-2.0	0.0	8440.	1750.	-58.	12190.	559.	807.
	44.8	0.0	50.0	8587.	1750.	-58.	12190.	559.	807.
	0.175		50.0	8932.	1852.	-61.	12865.	592.	854.
	84.	0.2246	50.5		39.03				
	677.0	0.9449	50.0	1.0401	0.2157	-0.0071	0.2867	0.0021	0.0031
17	115.5	0.0	0.0	9940.	1845.	-115.	10181.	846.	1136.
	44.9	0.0	50.1	9940.	1845.	-115.	10181.	846.	1136.
	0.176		49.9	10456.	1950.	-122.	10775.	895.	1203.
	84.	0.2246	50.5		41.00				
	677.0	0.9449	50.0	1.2184	0.2265	-0.0141	0.2341	0.0032	0.0043
18	116.5	2.0	0.0	11295.	1982.	-115.	7154.	875.	-181.
	44.9	0.0	50.0	11295.	1982.	-115.	7154.	875.	-181.
	0.176		49.9	11954.	2092.	-122.	7571.	926.	-192.
	84.	0.2246	50.5		44.10				
	677.0	0.9449	50.0	1.3866	0.2436	-0.0141	0.1625	0.0033	-0.0007
19	116.5	4.0	0.0	12715.	2137.	-157.	4594.	1403.	532.
	44.9	0.0	50.0	12715.	2137.	-157.	4594.	1403.	532.
	0.176		50.0	13457.	2262.	-166.	4862.	1485.	562.
	84.	0.2246	50.5		47.56				
	677.0	0.9449	50.0	1.5629	0.2627	-0.0192	0.1075	0.0054	0.0019
20	116.5	6.0	0.0	14155.	2314.	-145.	1412.	1560.	-173.
	44.9	0.0	49.9	14155.	2314.	-145.	1412.	1560.	-173.
	0.176		50.0	14981.	2449.	-153.	1494.	1651.	-183.
	84.	0.2246	50.5		51.51				
	677.0	0.9449	50.0	1.7399	0.2846	-0.0178	0.0424	0.0060	-0.0007

TABLE V.— Continued.

RUN 32 TEST 525

PT	VKTS / QPSF / MACH / TEMP / VSNDRTS	ALFSTC / PSI / — / RHUMID / RHUM	INA / PEDPOS / LONG STK / LAT STK / POWLEV	LIFT,0 / LIFT / LIFT/0 / — / CL	DRAG,0 / DRAG / DRAG/0 / FE / CD	SIDE,0 / SIDE / SIDE/0 / — / CY	PITCH,0 / PITCH / PIT M/0 / — / CM	YAW,0 / YAW / YAW/0 / — / CN	ROLL,0 / ROLL / ROLL/0 / — / CROLL
21	118.4	4.0	0.0	15435.	2533.	+128.	-1446.	1152.	30.
	44.9	0.0	50.0	15435.	2533.	+128.	-1446.	1152.	30.
	0.176		49.9	16315.	2601.	+135.	-1505.	1219.	31.
	84.	0.2246	50.5		36.44				
	677.4	0.9949	50.0	1.9062	0.3118	+0.0158	-0.0351	0.0044	0.0001
22	118.4	10.0	0.0	16535.	2775.	+140.	+3339.	1062.	-453.
	44.9	0.0	49.5	16535.	2775.	+140.	+3339.	1062.	-453.
	0.176		50.0	17449.	2437.	+149.	+3534.	1145.	-1004.
	84.	0.2246	50.6		61.65				
	677.9	0.9949	50.0	2.0350	0.3416	+0.0172	+0.0782	0.0041	+0.0036
23	118.6	8.0	0.0	15280.	2607.	+211.	+519.	-132.	2915.
	44.9	0.0	49.7	15280.	2607.	+211.	+519.	-132.	2915.
	0.176		49.9	16001.	2515.	+224.	+550.	-140.	3068.
	85.	0.2242	70.1		54.84				
	678.0	0.9932	50.0	1.8782	0.3092	+0.0259	+0.0121	+0.0005	[illegible]
24	118.6	8.0	0.0	14500.	2366.	+276.	1465.	+1021.	7712.
	44.9	0.0	49.7	14500.	2366.	+276.	1465.	+1021.	7712.
	0.176		50.0	1544[illegible].	2545.	+293.	1574.	+1053.	8177.
	85.	0.2242	69.4		52.64				
	678.0	0.9932	50.0	1.7846	0.2905	+0.0339	0.1347	+0.0034	0.0295

RUN 33 TEST 525

PT	VKTS / QPSF / MACH / TEMP / VSNDRTS	ALFSTC / PSI / — / RHUMID / RHUM	INA / PEDPOS / LONG STK / LAT STK / POWLEV	LIFT,0 / LIFT / LIFT/0 / — / CL	DRAG,0 / DRAG / DRAG/0 / FE / CD	SIDE,0 / SIDE / SIDE/0 / — / CY	PITCH,0 / PITCH / PIT M/0 / — / CM	YAW,0 / YAW / YAW/0 / — / CN	ROLL,0 / ROLL / ROLL/0 / — / CROLL
4	118.1	4.0	0.0	450.	1067.	-56.	10346.	2267.	5162.
	44.9	0.0	50.0	450.	1067.	-56.	10346.	2267.	5162.
	0.176		50.0	499.	1122.	-59.	10674.	2385.	5427.
	80.	0.2261	49.9		23.76				
	674.9	0.9513	50.0	0.1164	0.1315	-0.0069	0.2423	0.0047	0.0197
5	117.9	2.0	0.0	2725.	1014.	-58.	4055.	2162.	3610.
	44.8	0.0	49.9	2725.	1014.	-58.	4055.	2162.	3610.
	0.175		50.0	2866.	1066.	-61.	4519.	2273.	4005.
	80.	0.2261	50.0		22.04				
	674.9	0.9513	50.0	0.3362	0.1251	-0.0072	0.2170	0.0083	0.0146
6	118.0	0.0	0.0	4430.	442.	-76.	6739.	2191.	3435.
	44.8	0.0	50.0	4430.	442.	-76.	6739.	2191.	3435.
	0.175		50.0	4657.	1043.	-78.	7654.	2305.	3610.
	80.	0.2261	50.0		22.14				
	674.9	0.9513	50.0	0.5462	0.1725	+0.0091	0.1581	0.0044	0.0132
7	118.0	2.0	0.0	6105.	1044.	-95.	4241.	2443.	4126.
	44.9	0.0	50.0	6105.	1044.	-95.	4241.	2443.	4126.
	0.176		50.0	6416.	1095.	-100.	4458.	2566.	4339.
	80.	0.2261	50.0		23.17				
	674.9	0.9513	50.0	0.7518	0.1280	+0.0117	0.2993	0.0043	0.0156
8	118.2	4.0	0.0	7640.	1123.	-95.	2173.	2154.	3654.
	44.9	0.0	50.1	7640.	1123.	-95.	2173.	2154.	3654.
	0.176		50.0	8044.	1183.	-100.	2289.	2269.	3848.
	81.	0.2257	50.0		25.01				
	675.5	0.9495	50.0	0.9401	0.1382	+0.0117	0.0509	0.0052	0.0140
9	118.3	6.0	0.0	9270.	1257.	-49.	-145.	1960.	4056.
	44.9	0.0	50.0	9270.	1257.	-49.	-145.	1960.	4056.
	0.175		50.0	9763.	1324.	-45.	-264.	2064.	4272.
	81.	0.2257	50.1		28.06				
	675.5	0.9496	50.0	1.1442	0.1551	+0.0111	-0.0047	0.0075	0.0156
10	118.2	8.0	0.0	10985.	1403.	-53.	-2682.	1392.	4166.
	44.8	0.0	49.9	10985.	1403.	-53.	-2682.	1392.	4166.
	0.175		50.0	11594.	1466.	-56.	-2830.	1469.	4396.
	82.	0.2253	50.1		31.24				
	676.1	0.9478	50.0	1.3537	0.1729	+0.0065	-0.0629	0.0053	0.0163
11	118.5	8.0	0.0	10585.	1431.	-102.	-2137.	1626.	16215.
	44.9	0.0	50.0	10585.	1431.	-102.	-2137.	1626.	16215.
	0.176		50.0	11164.	1515.	-108.	-2259.	1713.	17140.
	83.	0.2249	69.5		31.96				
	676.7	0.9460	49.9	1.3038	0.1763	-0.0126	-0.0501	0.0062	0.0621
12	118.3	8.0	0.0	10145.	1500.	+95.	+786.	1112.	27241.
	44.8	0.0	49.9	10145.	1500.	+95.	+786.	1112.	27241.
	0.175		50.0	10724.	1582.	+96.	+835.	1174.	28745.
	83.	0.2249	85.5		33.03				
	676.7	0.9460	50.0	1.2515	0.1858	+0.0056	+0.0185	0.0043	0.1045
13	118.1	8.0	0.0	15685.	2482.	-111.	-177.	1444.	150.
	44.9	0.0	49.8	15685.	2482.	-111.	-177.	1444.	150.
	0.175		50.0	16574.	2625.	-117.	-244.	1526.	159.
	83.	0.2244	50.5		55.56				
	676.7	0.9461	50.0	1.9399	0.3070	-0.0137	-0.0277	0.0056	0.0006
14	119.0	8.0	0.0	14445.	2017.	-112.	338.	1054.	1452.
	45.2	0.0	49.6	14445.	2017.	-112.	338.	1054.	1452.
	0.176		49.4	15434.	2137.	-119.	354.	1156.	1538.
	84.	0.2243	50.7		44.58				
	677.3	0.9438	50.0	1.7820	0.2465	-0.0137	0.0079	0.0052	0.0055
15	119.0	8.0	0.0	14365.	1986.	+219.	1741.	708.	4596.
	45.2	0.0	49.7	14365.	1986.	+219.	1741.	708.	4596.
	0.176		49.9	15241.	2104.	+232.	1847.	750.	4455.
	84.	0.2243	70.2		41.5[illegible]				
	677.4	0.9434	50.0	1.7575	0.2426	+0.0264	0.0416	0.0027	0.0557
16	119.[illegible]	8.0	0.0	13220.	1925.	+247.	401.	-340.	16030.
	45.0	0.0	49.8	13220.	1925.	+247.	401.	-340.	16030.
	0.175		50.0	14005.	2039.	+262.	424.	-360.	16917.
	84.	0.2244	89.[illegible]		42.76				
	677.4	0.9434	50.0	1.6233	0.2364	+0.0303	0.0097	-0.0033	0.0716

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TABLE V.— Continued.

RUN 38 TEST 525

PT	VKTS / QPSF / RN / TEMP / VISCOS	ALPHA / [illegible] / RHO	[illegible]	LIFT	DRAG / DRAG/Q / CD	SIDE / SIDE/Q / CY	PITCH / PITCH/Q / CM	YAW / YAW/Q / CN	ROLL / ROLL/Q / CROLL
3	78.0	-4.0	60.0	2445.	1628.	-1.	[illegible]	174.	174.
	20.3	0.0	50.0	2445.	1628.	-1.	7640.	174.	174.
	0.117		49.9	2444.	1650.	-1.	7645.	16.	176.
	65.	0.2345	50.0		85.05				
	655.4	0.9889	50.1	0.7444	0.4822	-0.0003	[illegible]	[illegible]	0.0015
4	78.0	-2.0	60.0	3445.	1672.	-4.	7176.	286.	634.
	20.3	0.0	50.0	3445.	1672.	-4.	7176.	286.	634.
	0.117		49.9	3449.	1694.	-4.	7242.	29.	643.
	65.	0.2345	49.9		82.24				
	655.4	0.9866	50.1	0.9388	0.4547	-0.0011	0.3715	0.0026	0.0054
5	78.0	4.0	60.0	3950.	1742.	-6.	5804.	61.	221.
	20.3	0.0	50.0	3950.	1742.	-6.	5804.	61.	221.
	0.117		49.8	4005.	1765.	-6.	5900.	61.	224.
	65.	0.2345	50.0		85.04				
	655.4	0.9889	49.9	1.0725	0.4731	-0.0016	[illegible]	[illegible]	0.0019
6	78.1	2.0	60.0	4465.	1812.	-2.	4601.	103.	21.
	20.4	0.0	50.0	4465.	1812.	-2.	4601.	103.	21.
	0.118		49.9	4525.	1835.	-2.	4725.	105.	21.
	65.	0.2345	49.9		85.47				
	665.4	0.9868	50.1	1.2099	0.4910	-0.0005	0.2473	0.0054	0.0032
7	78.0	4.0	60.0	4920.	1912.	-13.	3474.	128.	-191.
	20.3	0.0	49.9	4920.	1912.	-13.	3474.	125.	-191.
	0.117		49.9	4980.	1938.	-13.	3525.	130.	-194.
	65.	0.2345	50.0		94.11				
	665.4	0.9869	50.1	1.3374	0.5199	-0.0035	0.1900	0.0011	-0.0015
8	78.3	6.0	60.0	5445.	2014.	-15.	2183.	384.	-172.
	20.4	0.0	50.0	5445.	2019.	-15.	2183.	384.	-172.
	0.118		50.1	5540.	2044.	-15.	2221.	395.	-175.
	67.	0.2337	49.8		94.78				
	666.7	0.9830	50.0	1.4840	0.5457	-0.0041	0.1126	0.0051	-0.0014
9	78.2	8.0	60.0	5935.	2124.	-24.	736.	471.	-91.
	20.3	0.0	50.0	5935.	2124.	-24.	736.	471.	-91.
	0.117		50.1	6037.	2161.	-24.	751.	479.	-92.
	67.	0.2337	50.0		104.42				
	666.7	0.9830	50.0	1.6120	0.5769	-0.0065	0.0382	0.0040	[illegible]
10	78.2	10.0	60.0	6345.	2222.	-39.	191.	431.	75.
	20.3	0.0	50.0	6345.	2222.	-39.	191.	431.	75.
	0.117		50.0	6455.	2260.	-40.	195.	438.	76.
	67.	0.2337	50.0		107.23				
	666.7	0.9830	50.0	1.7233	0.6035	-0.0106	0.0099	0.0036	0.0006
11	78.3	12.0	60.0	6545.	2268.	1.	-39.	217.	-460.
	20.4	0.0	50.0	6545.	2268.	1.	-39.	217.	-460.
	0.119		50.1	6671.	2312.	1.	-40.	221.	-468.
	68.	0.2332	50.0		111.36				
	667.3	0.9812	49.9	1.7756	0.6153	0.0003	-0.0020	0.0018	-0.0039
12	99.3	-4.0	60.0	4690.	2623.	-12.	12415.	482.	467.
	32.6	0.0	49.9	4690.	2623.	-12.	12415.	482.	467.
	0.149		50.0	4800.	2685.	-12.	12767.	484.	475.
	68.	0.2322	50.0		80.37				
	667.3	0.9770	50.0	0.7839	0.4460	-0.0020	0.3944	-0.0004	0.0025
13	99.6	-2.0	60.0	5515.	2703.	-10.	11744.	171.	-60.
	32.8	0.0	49.9	5515.	2703.	-10.	11744.	171.	-60.
	0.150		50.1	5666.	2777.	-10.	12070.	176.	-61.
	70.	0.2313	50.0		82.44				
	668.6	0.9733	50.0	0.9289	0.4553	-0.0017	0.3745	0.0009	-0.0003
14	99.8	0.0	60.0	6305.	2811.	-3.	9841.	106.	-134.
	32.7	0.0	49.9	6305.	2811.	-3.	9841.	106.	-134.
	0.149		50.1	6490.	2894.	-3.	10134.	109.	-138.
	71.	0.2309	49.9		85.89				
	669.2	0.9715	50.0	1.0682	0.4765	-0.0005	0.316[illegible]	0.0006	-0.0007
15	99.9	2.0	60.0	7130.	2933.	-23.	8088.	505.	-49.
	32.7	0.0	50.0	7130.	2933.	-23.	8088.	505.	-49.
	0.149		50.0	7405.	3025.	-24.	8355.	521.	-51.
	72.	0.2305	50.0		89.61				
	669.9	0.9697	49.9	1.2119	0.4951	-0.0039	0.2726	0.0027	-0.0005
16	100.1	4.0	50.0	8095.	3099.	-20.	5160.	569.	-894.
	32.8	0.0	49.9	8095.	3099.	-20.	5160.	569.	-894.
	0.150		50.2	8364.	3197.	-21.	5385.	588.	-922.
	73.	0.2300	50.1		94.15				
	670.5	0.9678	50.0	1.3833	[illegible]	-0.0034	0.1972	0.0030	-0.0047
17	99.9	6.0	60.0	8895.	3235.	-31.	3695.	740.	-541.
	32.7	0.0	49.9	8895.	3235.	-31.	3695.	740.	-541.
	0.149		50.1	9141.	3347.	-32.	3810.	810.	-552.
	73.	0.2300	50.0		96.03				
	670.5	0.9678	49.9	1.5025	0.5371	-0.0052	0.1165	0.0041	-0.0012
18	99.8	8.0	60.0	9250.	3335.	-10.	2601.	519.	-1018.
	32.7	0.0	50.0	9250.	3335.	-10.	2601.	519.	-1018.
	0.149		50.1	9595.	3460.	-10.	2694.	535.	-1051.
	73.	0.2301	50.0		102.11				
	670.5	0.9679	49.9	1.5599	0.5642	-0.0017	0.0902	0.0027	-0.0054
19	99.9	8.0	60.0	9675.	3407.	-2.	1541.	522.	-359.
	32.8	0.0	50.0	9675.	3407.	-2.	1541.	522.	-359.
	0.149		50.1	10025.	3527.	-2.	1597.	551.	-370.
	74.	0.2296	49.9		104.54				
	671.1	0.9662	50.0	1.6375	0.5767	-0.0003	[illegible]	0.0044	-0.0060
20	100.3	9.0	60.0	10495.	3526.	1.	726.	607.	-1374.
	32.9	0.0	50.0	10495.	3526.	1.	726.	607.	-1374.
	0.150		50.1	10851.	3646.	1.	747.	626.	-1425.
	74.	0.2295	49.9		[illegible]				
	671.1	0.9660	49.7	1.7442	[illegible]	0.0001	[illegible]	0.0010	-0.0072

TABLE V.– Continued.

RUN 34 TEST 525

PT	VATS QPSF MTUN TEMP VSNDFTS	ALPHA,C PSI RHOFIUD RHOR	INA REG POS LONG STA LAT STA PCR CEV	LIFT,U LIFT LIFT/E CL	DRAG,U DRAG DRAG/E FE CD	SIDE,U SIDE SIDE/E CY	PITCH,U PITCH PITCH/E CM	YAW,U YAW YAW/E CN	ROLL,U ROLL ROLL/E CROLL
21	115.7	44.0	60.0	6355.	3576.	-26.	17355.	131.	164.
	46.5	0.0	50.0	6355.	3576.	-26.	17355.	131.	164.
	0.174		50.2	6617.	3724.	-27.	18105.	135.	176.
	75.	0.2283	50.0		60.21				
	673.7	0.9600	49.9	0.7958	0.4464	-0.0052	0.4156	0.0005	0.0007
22	116.5	-2.0	60.0	7410.	3661.	-42.	16652.	206.	-322.
	48.0	0.0	50.0	7410.	3661.	-42.	16652.	206.	-322.
	0.174		50.0	7750.	3814.	-44.	17444.	215.	-336.
	76.	0.2279	50.0		63.18				
	672.9	0.9587	50.0	0.9300	0.4595	-0.0053	0.3634	0.0066	-0.0013
23	116.4	0.0	60.0	6570.	3775.	-12.	15679.	130.	25.
	44.0	0.0	50.0	6570.	3775.	-12.	15679.	130.	25.
	0.174		50.0	6434.	3936.	-13.	16476.	136.	26.
	76.	0.2279	50.0		65.64				
	672.9	0.9587	49.9	1.0767	0.4703	-0.0040	0.3316	0.0005	0.0001
24	116.3	2.0	60.0	9592.	3950.	-19.	11352.	320.	-336.
	43.8	0.0	50.0	9592.	3950.	-19.	11352.	320.	-336.
	0.173		50.2	10074.	4126.	-21.	11863.	335.	-351.
	77.	0.2275	50.0		66.25				
	673.0	0.9569	50.0	1.2156	0.4981	-0.0024	0.2724	0.0013	-0.0013
25	116.0	4.0	60.0	10690.	4191.	-22.	7669.	561.	177.
	43.6	0.0	50.0	10690.	4191.	-22.	7669.	561.	177.
	0.173		50.3	11170.	4367.	-23.	8022.	570.	185.
	77.	0.2275	50.0		44.45				
	673.0	0.9570	50.0	1.3544	0.5297	-0.0026	0.1547	0.0025	0.0007
26	115.6	6.0	60.0	11880.	4335.	-33.	5635.	572.	-139.
	43.4	0.0	50.0	11880.	4335.	-33.	5635.	572.	-139.
	0.173		50.2	12344.	4538.	-35.	5866.	597.	-145.
	78.	0.2271	50.0		44.89				
	673.6	0.9553	49.9	1.5073	0.5519	-0.0042	0.1214	0.0023	-0.0005
27	115.7	7.0	60.0	12310.	4461.	-57.	3740.	729.	-1256.
	43.3	0.0	50.0	12310.	4461.	-57.	3740.	729.	-1256.
	0.172		50.0	12866.	4670.	-60.	3421.	742.	-1346.
	78.	0.2271	50.0		103.01				
	673.6	0.9553	49.9	1.5705	0.5691	-0.0073	0.0916	0.0026	-0.0051
28	115.4	8.0	60.0	12740.	4547.	-57.	2335.	850.	-570.
	43.1	0.0	50.1	12740.	4547.	-57.	2335.	850.	-570.
	0.172		50.1	13334.	4759.	-60.	2423.	846.	-596.
	78.	0.2271	50.0		105.62				
	673.6	0.9554	49.9	1.6350	0.5835	-0.0073	0.0565	0.0034	-0.0023

RUN 35 TEST 525

PT	VATS QPSF MTUN TEMP VSNDFTS	ALPHA,C PSI RHOFIUD RHOR	INA REG POS LONG STA LAT STA PCR CEV	LIFT,U LIFT LIFT/E CL	DRAG,U DRAG DRAG/E FE CD	SIDE,U SIDE SIDE/E CY	PITCH,U PITCH PITCH/E CM	YAW,U YAW YAW/E CN	ROLL,U ROLL ROLL/E CROLL
3	116.9	-4.0	60.0	6710.	3536.	-32.	17165.	541.	1590.
	43.8	0.0	49.9	6710.	3536.	-32.	17165.	541.	1590.
	0.176		50.0	7062.	3737.	-34.	18156.	572.	1666.
	82.	0.2251	49.9		60.71				
	676.1	0.9468	49.9	0.8457	0.4459	-0.0040	0.4122	0.0021	0.0058
4	116.8	-2.0	60.0	7800.	3659.	-36.	16210.	769.	1072.
	43.7	0.0	50.0	7800.	3659.	-36.	16210.	769.	1072.
	0.175		50.0	8238.	3859.	-39.	17114.	812.	1132.
	82.	0.2251	50.0		63.62				
	676.1	0.9469	50.0	0.9882	0.4620	-0.0046	0.3900	0.0030	0.0042
5	116.6	0.0	60.0	8775.	3789.	-12.	14422.	707.	986.
	43.6	0.0	49.9	8775.	3789.	-12.	14422.	707.	986.
	0.173		50.0	9267.	4001.	-13.	15231.	747.	1041.
	82.	0.2251	50.0		66.48				
	676.1	0.9469	49.9	1.1131	0.4806	-0.0015	0.3441	0.0028	0.0039
6	116.4	4.0	60.0	11090.	4141.	-52.	8306.	921.	695.
	43.3	0.0	50.0	11090.	4141.	-52.	8306.	921.	695.
	0.173		50.0	11701.	4369.	-55.	8763.	972.	736.
	84.	0.2243	50.0		75.62				
	677.4	0.9435	49.9	1.4085	0.5283	-0.0066	0.2016	0.0037	0.0028
7	116.3	6.0	60.0	12055.	4359.	-30.	5041.	852.	621.
	43.1	0.0	49.9	12055.	4359.	-30.	5041.	852.	621.
	0.172		50.0	12799.	4626.	-32.	5352.	904.	659.
	85.	0.2239	50.0		101.15				
	678.0	0.9419	49.9	1.5350	0.5558	-0.0038	0.1230	0.0034	0.0025
8	117.4	-6.0	60.0	1865.	2907.	8.	15811.	1439.	3362.
	44.3	0.0	49.8	1865.	2907.	8.	15811.	1439.	3362.
	0.175		50.0	1981.	3088.	8.	16795.	1529.	3570.
	85.	0.2236	50.1		65.59				
	678.0	0.9414	50.0	0.2325	0.3624	0.0037	0.3750	0.0056	0.0131
9	117.2	0.0	60.0	4370.	2998.	15.	11406.	3577.	3012.
	44.3	0.0	49.8	4370.	2998.	15.	11406.	3577.	3012.
	0.174		50.0	4642.	3182.	16.	12115.	675.	3200.
	85.	0.2234	50.0		67.76				
	678.0	0.9415	49.9	0.5496	0.3740	0.0019	0.2710	0.0061	0.0117
10	118.1	4.0	60.0	6485.	3133.	-35.	6493.	1063.	1506.
	44.3	0.0	50.0	6485.	3133.	-35.	6493.	1063.	1506.
	0.174		50.0	5913.	3340.	-37.	7455.	1134.	1715.
	87.	0.2230	49.9		70.56				
	679.2	0.9380	50.0	0.8096	0.3911	-0.0044	0.1661	0.0041	0.0362
11	117.8	6.0	60.0	7625.	3290.	30.	4542.	840.	2355.
	44.1	0.0	49.9	7625.	3290.	30.	4542.	840.	2355.
	0.174		50.0	7915.	3567.	32.	4842.	906.	2544.
	87.	0.2230	49.9		74.62				
	679.2	0.9381	50.0	0.9506	0.4122	0.0039	0.1107	0.0035	0.0292

TABLE V.— Continued.

RUN 36 TEST 525

PT	VAIS DPSF MTUN TEMP VSNDKTS	ALPHA,C PSI [illegible] RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U CLF LIFT/Q CL	DRAG,U DRAG DRAG/Q FE CD	SIDE,U SIDE SIDE/Q CY	PITCH,U PITCH PITCH/Q CM	YAW,U YAW YAW/Q CN	ROLL,U ROLL ROLL/Q CROLL
3	116.7 [illegible] 0.176 65. 667.3	4.0 0.0 0.2310 0.9719	60.0 50.0 50.2 49.9 49.9	8200. 8200. 8444. 0.7715	3031. 3031. 3119. 47.6 0.3735	-82. -82. -84. -0.0101	16723. 16723. 17306. 0.3945	1064. 1064. 1099. 0.0041	403. 403. 425. 0.0035
4	116.9 [illegible] 0.176 70. 668.6	0.0 0.0 0.2331 0.9683	60.0 50.3 50.1 49.9 50.1	8540. 8540. 8820. 1.0530	3294. 3294. 3402. 45.31 0.4061	-64. -64. -66. -0.0029	14784. 14784. 15204. 0.3465	47. 47. 49. 0.0019	-340. -340. -443. -0.0015
5	117.0 [illegible] 0.176 71. 669.2	2.0 0.0 0.2297 0.9654	60. 50.1 50.1 50.0 50.0	9760. 9760. 10074. 1.2009	3468. 3468. 3565. 77.40 0.4276	-5. -5. -5. -0.0004	12011. 12011. 12426. 0.2824	1204. 1208. 1250. 0.0046	390. 390. 402. 0.0015
6	117.2 [illegible] 0.176 71. 669.2	4.0 0.0 0.2297 0.9654	60.0 50.0 50.1 49.9 50.0	10655. 10655. 11026. 1.3090	3674. 3674. 3807. 51.61 0.4520	-91. -91. -94. -0.0050	7748. 7748. 8017. 0.1811	1602. 1602. 1657. 0.0061	854. 854. 884. 0.0033
7	117.2 [illegible] 0.176 75. 670.5	4.0 0.0 0.2284 0.9628	60.0 50.1 50.1 50.1 50.0	1355. 1355. 1407. 0.1871	2435. 2435. 2524. 34.34 0.3002	-6. -6. -5. -0.0007	15444. 15449. 16045. 0.3625	1771. 1771. 1844. 0.0066	2566. 2566. 2503. 0.0098
8	117.3 [illegible] 0.176 75. 670.5	6.0 0.0 0.2284 0.9628	60. 50.2 50.1 50.0 49.9	3870. 3870. 4014. 0.2784	2517. 2517. 2614. 36.14 0.3102	27. 27. 25. 0.0035	12161. 12161. 12631. 0.2852	1748. 1748. 1667. 0.0064	2427. 2427. 2521. 0.0093
9	117.6 [illegible] 0.176 74. 671.1	2.0 0.0 0.2284 0.9610	60.0 50.0 50.1 50.0 50.0	5080. 5080. 5266. 0.6241	2638. 2638. 2745. 55.65 0.3264	15. 15. 16. 0.0016	10251. 10251. 10668. 0.2397	1696. 1696. 1765. 0.0065	2246. 2246. 2337. 0.0086
10	117.6 [illegible] 0.176 75. 671.7	4.0 0.0 0.2284 0.9592	60.0 50.2 50.1 49.9 49.9	6155. 6155. 6417. 0.7570	2780. 2780. 2890. 61.48 0.3419	62. 62. 65. 0.0076	8601. 8601. 8957. 0.2013	1223. 1223. 1275. 0.0047	2145. 2145. 2237. 0.0082
11	117.3 [illegible] 0.175 75. 671.7	5.0 0.0 0.2284 0.9593	60.0 50.0 50.1 50.0 50.0	6790. 6790. 7026. 0.8332	2830. 2830. 2950. 65.32 0.3498	55. 55. 57. 0.0068	7515. 7515. 7834. 0.1760	1722. 1722. 1802. 0.0066	2401. 2401. 2424. 0.0108
12	117.4 [illegible] 0.175 75. 671.7	6.0 0.0 0.2240 0.9592	60.0 50.0 50.0 50.0 49.9	7145. 7145. 7457. 0.9961	2898. 2898. 3021. 64.71 0.3575	41. 41. 43. 0.0051	7028. 7028. 7327. 0.1650	1667. 1667. 1737. 0.0064	2700. 2700. 2443. 0.0116

RUN 37 TEST 525

PT	VAIS DPSF MTUN TEMP VSNDKTS	ALPHA,C PSI [illegible] RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U CLF LIFT/Q CL	DRAG,U DRAG DRAG/Q FE CD	SIDE,U SIDE SIDE/Q CY	PITCH,U PITCH PITCH/Q CM	YAW,U YAW YAW/Q CN	ROLL,U ROLL ROLL/Q CROLL
3	118.1 [illegible] 0.175 81. 675.5	4.0 0.0 0.2254 0.9683	60.0 50.0 50.0 50.0 49.9	8070. 8070. 8401. [illegible]	3041. 3041. 3207. 67.40 0.3751	32. 32. 34. 0.0039	15878. 15878. 16744. 0.3727	363. 363. 383. 0.0014	855. 855. 894. 0.0032
4	117.8 [illegible] 0.175 81. 675.5	0.0 0.0 0.2254 0.9683	60.0 50.0 50.0 49.9 49.9	8385. 8385. 8842. [illegible]	3276. 3276. 3454. 73.53 0.4062	24. 24. 25. 0.0030	14093. 14093. 14862. 0.3325	669. 669. 706. 0.0026	703. 700. 734. 0.0027
5	117.8 [illegible] 0.175 82. 676.1	2.0 0.0 0.2250 0.9666	60.0 50.0 50.0 50.0 49.9	9520. 9520. 10057. 1.1823	3436. 3436. 3625. 77.15 0.4265	42. 42. 44. 0.0052	11917. 11917. 12569. 0.2815	994. 994. 1050. 0.0039	-151. -151. -150. -0.0006
6	117.6 [illegible] 0.174 83. 676.7	4.0 0.0 0.2246 0.9645	60.0 49.9 51.0 50.0 49.9	10560. 10560. 11175. 1.3197	3641. 3641. 3855. 82.36 0.4557	-13. -13. -14. -0.0016	9306. 9306. [illegible] 0.2227	1163. 1163. 1233. 0.0045	-437. -437. -462. -0.0017
7	99.5 31.8 0.147 83. 676.7	4.0 0.0 0.2256 0.9645	75.0 49.9 50.0 50.0 49.9	3905. 3905. 4115. 0.6777	2352. 2342. 2510. 74.03 0.4130	7. 7. 7. 0.0012	11051. 11051. 11695. 0.1951	-447. -447. -494. -0.0045	-522. -522. -551. -0.0026
8	99.6 33.9 0.148 83. 676.7	0.0 0.0 0.2255 0.9645	75.0 50.2 50.0 49.9 49.9	5550. 5550. 5848. 0.9675	2495. 2493. 2627. 78.20 0.4325	5. 5. 5. 0.0009	10634. 10636. 10675. 0.3313	432. 432. 455. 0.0025	-813. -814. -862. -0.0044

TABLE V.— Continued.

RUN [illegible] TEST 525

PT	VKTS / QPSF / RPM / TEMP / VSNDKTS	ALFS,U / PSI / RHO / RHORAT	INA / PED POS / LONG STK / LAT STK / PWR LEV	LIFT,U / LIFT / LIFT/6 / CL	DRAG,U / DRAG / DRAG/6 / FE / CD	SIDE,U / SIDE / SIDE/6 / CY	PITCH,U / PITCH / PITCH/6 / CM	YAW,U / YAW / YAW/6 / CN	ROLL,U / ROLL / ROLL/6 / CROLL
4	49.5	2.0	75.0	6355.	2594.	+7.	8602.	86.	+740.
	31.8	0.0	49.9	6355.	2598.	+7.	8462.	80.	+740.
	0.147		50.0	6675.	2736.	+7.	9538.	91.	+780.
	83.	0.2256	50.0		[illegible]				
	676.7	0.9490	49.8	1.1011	0.4516	+0.0012	0.2951	0.0025	+0.0[illegible]
10	99.5	4.0	75.0	7170.	2720.	+25.	7193.	220.	+593.
	31.5	0.0	49.9	7170.	2728.	+25.	7193.	220.	+593.
	0.147		50.0	7555.	2875.	+27.	7579.	232.	+625.
	85.	0.2256	50.0		85.76				
	676.7	0.9490	49.8	1.2453	0.4738	+0.0045	0.2377	0.0012	+0.0032
11	156.0	+4.0	0.0	1455.	2209.	+46.	18230.	4003.	7716.
	76.9	0.0	49.9	1455.	2209.	+46.	18230.	4003.	7716.
	0.232		50.1	1569.	2362.	+50.	19461.	4317.	8321.
	87.	0.2204	49.9		26.71				
	679.2	0.9273	49.9	0.1035	0.1566	+0.0033	0.2491	0.0064	0.0172
12	156.5	0.0	0.0	6905.	2132.	+30.	12173.	3766.	7654.
	76.8	0.0	50.0	6905.	2132.	+30.	12173.	3766.	7654.
	0.232		50.0	7460.	2303.	+37.	13152.	4069.	8495.
	88.	0.2200	50.1		27.76				
	679.9	0.9256	49.9	0.4968	0.1534	+0.0024	0.1567	0.0084	0.0176
13	156.9	4.0	0.0	12380.	2338.	+55.	5017.	2934.	7713.
	76.9	0.0	50.0	12380.	2338.	+55.	5017.	2934.	7713.
	0.232		50.0	13426.	2535.	+63.	5424.	3182.	8364.
	90.	0.2192	50.1		30.41				
	681.1	0.9222	49.8	0.8897	0.1680	+0.0042	0.0065	0.0066	0.0172
14	157.0	6.0	0.0	15275.	2594.	+85.	719.	2197.	7423.
	76.8	0.0	50.0	15275.	2590.	+85.	719.	2197.	7423.
	0.232		50.1	16576.	2810.	+92.	779.	3036.	[illegible]
	91.	0.2198	50.0		33.77				
	681.7	0.9226	49.8	1.0843	0.1866	+0.0061	0.0197	0.0065	0.0166
15	157.2	8.0	0.0	17720.	2924.	+121.	+3614.	2087.	5652.
	77.0	0.0	50.0	17720.	2924.	+121.	+3614.	2087.	5652.
	0.232		50.0	19250.	3176.	+131.	+3926.	2267.	6140.
	91.	0.2188	49.9		37.94				
	681.7	0.9225	49.8	1.2721	0.2099	+0.0087	+0.0294	0.0047	0.0126
16	157.0	10.0	0.0	20030.	3277.	+113.	+6228.	1274.	5755.
	76.7	0.0	49.9	20030.	3277.	+113.	+6228.	1274.	5755.
	0.231		50.0	21790.	3565.	+123.	+6830.	1386.	6261.
	92.	0.2185	49.9		42.71				
	682.3	0.9192	49.7	1.4425	0.2360	+0.0081	+0.0460	0.0029	0.0124

RUN 39 TEST 525

PT	VKTS / QPSF / RPM / TEMP / VSNDKTS	ALFS,U / PSI / RHO / RHORAT	INA / PED POS / LONG STK / LAT STK / PWR LEV	LIFT,U / LIFT / LIFT/6 / CL	DRAG,U / DRAG / DRAG/6 / FE / CD	SIDE,U / SIDE / SIDE/6 / CY	PITCH,U / PITCH / PITCH/6 / CM	YAW,U / YAW / YAW/6 / CN	ROLL,U / ROLL / ROLL/S / CROLL
4	114.0	+4.0	60.0	5725.	3033.	+136.	16479.	776.	+222.
	43.4	0.0	50.0	5725.	3033.	+136.	16479.	776.	+222.
	0.172		50.0	5804.	3167.	+139.	16850.	794.	+226.
	61.	0.2322	50.2		69.49				
	666.7	0.9752	49.9	0.7284	0.3861	+0.0173	0.3492	0.0031	+0.0009
5	114.0	0.0	60.0	7925.	3261.	+122.	14539.	309.	+561.
	43.3	0.0	50.0	7925.	3261.	+122.	14539.	309.	+561.
	0.172		50.0	8144.	3353.	+125.	14743.	317.	+592.
	69.	0.2312	50.3		75.30				
	668.0	0.9728	49.9	1.0122	0.4165	+0.0156	0.3465	0.0012	+0.0025
6	48.3	+4.0	75.0	3675.	2467.	+66.	11277.	404.	+367.
	31.9	0.0	50.0	3675.	2467.	+66.	11277.	404.	+367.
	0.147		50.1	3771.	2470.	+58.	11571.	415.	+377.
	70.	0.2316	50.2		75.52				
	658.6	0.9708	49.9	0.6369	0.4171	+0.0149	0.3719	0.0022	+0.0020
7	48.2	0.0	75.0	5375.	2520.	+90.	10181.	369.	+656.
	31.8	0.0	50.1	5375.	2520.	+90.	10181.	369.	+656.
	0.147		50.0	5525.	2591.	+93.	10445.	400.	+674.
	71.	0.2312	50.1		74.26				
	669.2	0.9728	49.9	0.9362	0.4380	+0.0156	0.3161	0.0021	+0.0046
8	98.2	4.0	75.0	6980.	2697.	+10.	7553.	683.	+512.
	31.7	0.0	50.2	6980.	2697.	+10.	7553.	683.	+512.
	0.147		50.0	7176.	2773.	+10.	7766.	702.	+515.
	71.	0.2311	50.2		65.04				
	669.2	0.9725	50.0	1.2159	0.4698	+0.0017	0.2564	0.0037	+0.0046
9	116.7	+4.0	60.0	3105.	2469.	+22.	15233.	1334.	859.
	40.5	0.0	50.0	3105.	2469.	+22.	15233.	1334.	859.
	0.175		50.1	3140.	2506.	+23.	15772.	1363.	891.
	73.	0.2293	50.3		55.92				
	670.5	0.9646	50.0	0.3373	0.3093	+0.0027	0.3557	0.0052	0.0033
10	116.5	0.0	60.0	3525.	2535.	+56.	11406.	1305.	1981.
	44.3	0.0	50.2	3525.	2535.	+56.	11406.	1305.	1981.
	0.174		50.1	3654.	2624.	+58.	11820.	1353.	2053.
	73.	0.2243	50.2		57.22				
	670.5	0.9646	50.0	0.4356	0.3161	+0.0070	0.2767	0.0065	0.0076
11	116.5	2.0	60.0	4650.	2624.	+47.	9724.	1030.	1744.
	44.1	0.0	50.0	4650.	2624.	+47.	9724.	1030.	1744.
	0.174		50.1	4836.	2750.	+49.	10143.	1072.	1815.
	75.	0.2284	50.3		59.45				
	671.7	0.9613	50.7	0.5820	0.3284	+0.0059	0.2382	0.0040	0.0066

TABLE V.— Continued.

RUN 39 TEST 525

PT	VATS / QPSF / MION / TEMP / VSNDRTS	ALFS,C / PSI / RNU*1E0 / RNOR	LNA / PED POS / LONG STA / LAT STA / POR LEV	LIFT,G / LIFT / LIFT/Q / CL	DRAG,G / DRAG / DRAG/Q / FE / CD	SIDE,G / SIDE / SIDE/Q / CY	PITCH,G / PITCH / PITCH/Q / CM	YAW,G / YAW / YAW/Q / CN	ROLL,G / ROLL / ROLL/Q / CROLL
12	110.5	0.0	60.0	5805.	2742.	-33.	8269.	1386.	1767.
	88.0	0.0	50.2	5805.	2742.	-33.	8269.	1386.	1767.
	0.174		50.0	6053.	2852.	-34.	8822.	1445.	1842.
	78.	0.2281	50.3		62.25				
	672.6	0.9593	50.0	0.7281	0.3439	-0.0041	0.1974	0.0054	0.0069
13	115.9	0.0	[illegible]	8965.	1963.	-152.	10300.	1195.	1061.
	83.5	0.0	51.2	8965.	1963.	-152.	10300.	1195.	1061.
	0.173		50.0	9375.	2053.	-159.	10772.	1250.	1109.
	78.	0.2273	50.3		45.10				
	673.6	0.9567	50.0	1.1389	0.2494	-0.0193	0.2490	0.0047	0.0042
14	115.8	0.0	50.0	8790.	2090.	-184.	10726.	1044.	544.
	83.8	0.0	50.0	8790.	2090.	-184.	10726.	1044.	544.
	0.172		50.1	9204.	2609.	-193.	11237.	1094.	622.
	79.	0.2259	50.4		57.44				
	679.2	0.9595	50.1	1.1282	0.3173	-0.0234	0.2603	0.0041	0.0024
15	115.9	0.0	50.0	8570.	2933.	-171.	12367.	-417.	-211.
	83.4	0.0	50.0	8570.	2933.	-171.	12367.	-417.	-211.
	0.173		50.1	8974.	3073.	-179.	12957.	-437.	-211.
	79.	0.2269	50.4		67.55				
	679.2	0.9545	50.1	1.0900	0.3732	-0.0218	0.2994	-0.0017	-0.0008
16	115.9	0.0	60.0	8070.	3209.	-136.	13707.	-71.	-1247.
	43.3	0.0	50.2	8070.	3209.	-136.	13707.	-71.	-1247.
	0.172		50.2	8470.	3368.	-143.	14387.	-75.	-1309.
	80.	0.2265	50.4		74.66				
	678.9	0.9527	50.1	1.0240	0.4092	-0.0173	0.3320	-0.0003	-0.0049
17	116.0	0.0	96.0	6755.	3395.	-163.	14174.	457.	182.
	43.3	0.0	50.1	6755.	3395.	-163.	14174.	457.	182.
	0.173		50.1	7090.	3555.	-166.	14878.	476.	191.
	80.	0.2265	50.3		77.46				
	678.9	0.9527	50.2	0.8595	0.4317	-0.0131	0.3432	0.0033	0.0007

RUN 40 TEST 525

PT	VATS / QPSF / MION / TEMP / VSNDRTS	ALFS,C / PSI / RNU*1E0 / RNOR	LNA / PED POS / LONG STA / LAT STA / POR LEV	LIFT,G / LIFT / LIFT/Q / CL	DRAG,G / DRAG / DRAG/Q / FE / CD	SIDE,G / SIDE / SIDE/Q / CY	PITCH,G / PITCH / PITCH/Q / CM	YAW,G / YAW / YAW/Q / CN	ROLL,G / ROLL / ROLL/Q / CROLL
3	117.2	-0.0	60.0	5870.	2972.	-103.	15620.	193.	-595.
	44.1	0.0	50.0	5870.	2972.	-103.	15620.	193.	-595.
	0.174		50.0	6194.	3139.	-109.	16496.	203.	-625.
	83.	0.2251	50.1		67.44				
	676.1	0.9469	49.9	0.7339	0.3726	-0.0129	0.3726	0.0008	-0.0023
4	117.5	0.0	60.0	6295.	3182.	-58.	13566.	467.	-520.
	44.1	0.0	50.0	6295.	3182.	-58.	13566.	467.	-520.
	0.174		50.1	6739.	3371.	-63.	14374.	490.	-551.
	85.	0.2242	50.1		72.20				
	678.0	0.9436	49.9	1.0337	0.3989	-0.0110	0.3236	0.0018	-0.0020
5	117.6	2.0	60.0	9455.	3368.	-65.	11565.	614.	-452.
	44.1	0.0	50.0	9455.	3368.	-65.	11565.	614.	-452.
	0.174		50.1	10040.	3576.	-69.	12249.	652.	-480.
	86.	0.2236	50.0		75.39				
	678.6	0.9417	49.8	1.1847	0.4220	-0.0081	0.2744	0.0024	-0.0018
6	117.6	0.0	61.0	10595.	3561.	-83.	8685.	660.	259.
	44.0	0.0	49.8	10595.	3561.	-83.	8685.	660.	259.
	0.174		50.1	11264.	3784.	-88.	9242.	702.	276.
	87.	0.2234	50.0		80.40				
	679.2	0.9397	49.8	1.3298	0.4470	-0.0104	0.2076	0.0026	0.0010
7	118.0	0.0	60.0	10207.	2392.	21.	14704.	650.	2235.
	44.1	0.0	49.8	10207.	2392.	21.	14704.	650.	2235.
	0.174		50.1	10859.	2555.	22.	15706.	694.	2340.
	84.	0.2225	49.9		54.22				
	680.5	0.9362	49.9	1.2777	0.2996	0.0026	0.3504	0.0025	0.0087
8	118.0	0.0	60.0	3515.	2458.	-62.	11244.	888.	1875.
	44.1	0.0	49.9	3515.	2458.	-62.	11244.	888.	1875.
	0.174		50.0	3754.	2625.	-66.	12010.	948.	2003.
	89.	0.2225	50.0		55.64				
	680.9	0.9362	49.8	0.4400	0.3077	-0.0078	0.2678	0.0035	0.0073
9	117.7	2.0	60.0	7720.	2521.	-17.	9647.	1197.	2003.
	43.9	0.0	49.8	7720.	2521.	-17.	9647.	1197.	2003.
	0.175		50.1	5050.	2697.	-18.	10322.	1270.	2145.
	90.	0.2221	50.1		57.46				
	681.1	0.9346	49.8	0.5995	0.3176	-0.0021	0.2313	0.0044	0.0076
10	118.0	0.0	60.0	5915.	2647.	-3.	7452.	1086.	2194.
	44.0	0.0	49.9	5915.	2647.	-3.	7452.	1086.	2194.
	0.174		50.1	6324.	2852.	-3.	8450.	1155.	2347.
	90.	0.2221	49.9		60.10				
	681.1	0.9346	49.8	0.7415	0.3320	-0.0004	0.1695	0.0042	0.0080
11	118.3	0.0	50.0	9255.	1969.	-99.	10306.	1017.	1294.
	44.2	0.0	50.0	9255.	1969.	-99.	10306.	1017.	1294.
	0.174		50.0	9922.	2111.	-105.	11043.	1090.	1391.
	91.	0.2217	50.0		44.55				
	681.7	0.9328	49.8	1.1572	0.2462	-0.0124	0.2451	0.0040	0.0050
12	117.8	0.0	50.0	8950.	2497.	-114.	10085.	470.	1780.
	43.9	0.0	50.1	8950.	2497.	-114.	10085.	470.	1780.
	0.173		50.1	9594.	2677.	-122.	11562.	504.	1914.
	91.	0.2217	50.2		56.45				
	681.7	0.9328	49.9	1.1274	0.3145	-0.0144	0.2585	0.0018	0.0070

TABLE V.— Continued.

RUN 40 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALPHA,D PSI RHO*1000 RHOR	IHA REQ POS LONG STK LAT STK PDL DEF	LIFT,LB LIFT LIFT/6 CL	DRAG,LB DRAG DRAG/6 FE CD	SIDE,LB SIDE SIDE/6 CY	PITCH,LB PITCH PITCH/6 CM	YAW,LB YAW YAW/6 CN	ROLL,LB ROLL ROLL/6 CROLL
13	110.0	0.0	50.0	5530.	2471.	-155.	14522.	190.	-569.
	93.9	0.0	50.0	5530.	2971.	-155.	14522.	190.	-569.
	0.174		50.0	4160.	3192.	-165.	15595.	204.	-740.
	92.	0.2213	50.0		47.63				
	682.3	0.9312	49.9	1.0728	0.3736	-0.0195	0.3475	0.0007	-0.0027
14	110.1	0.0	60.0	8265.	3191.	-64.	13468.	917.	-463.
	44.0	0.0	49.8	8265.	3191.	-64.	13468.	917.	-463.
	0.174		50.0	6676.	3427.	-90.	14463.	960.	-497.
	92.	0.2213	50.1		72.56				
	682.3	0.9312	49.8	1.0384	0.4009	-0.0106	0.3220	0.0036	-0.0018
15	110.0	0.0	40.0	7135.	3247.	-94.	13865.	415.	-329.
	93.8	0.0	49.9	7135.	3247.	-94.	13865.	415.	-329.
	0.173		50.1	7676.	3547.	-101.	14632.	447.	-353.
	93.	0.2209	50.0		75.25				
	683.9	0.9296	49.9	0.8997	0.4157	-0.0119	0.3332	0.0016	-0.0013
16	157.5	4.0	0.0	2135.	2048.	-85.	18422.	4163.	7934.
	76.9	0.0	50.0	2135.	2048.	-85.	18422.	4163.	7934.
	0.232		50.0	2332.	2237.	-93.	20664.	4528.	8667.
	95.	0.2176	49.9		26.65				
	688.2	0.9155	49.9	0.1555	0.1472	-0.0061	0.2548	0.0093	0.0177
17	157.7	0.0	0.0	7630.	1944.	-109.	13591.	4709.	8651.
	76.8	0.0	50.0	7630.	1944.	-109.	13591.	4709.	8651.
	0.231		50.1	8364.	2131.	-119.	14899.	5205.	9705.
	97.	0.2166	50.0		25.30				
	685.9	0.9122	49.9	0.5986	0.1398	-0.0078	0.1860	0.0106	0.0196
18	155.2	4.0	0.0	13345.	2155.	-97.	5026.	3445.	7511.
	77.1	0.0	50.0	13345.	2155.	-97.	5026.	3445.	7511.
	0.232		50.1	14657.	2367.	-107.	5520.	3784.	8249.
	98.	0.2164	50.0		27.45				
	686.0	0.9105	49.8	0.9582	0.1549	-0.0070	0.0685	0.0077	0.0167
19	158.2	8.0	0.0	18487.	2732.	-83.	-2895.	1932.	8063.
	77.0	0.0	49.9	18487.	2732.	-83.	-2895.	1932.	8063.
	0.232		50.1	20311.	3002.	-91.	-3126.	2125.	8872.
	99.	0.2160	50.0		35.47				
	686.7	0.9089	49.8	1.3291	0.1960	-0.0060	-0.0388	0.0043	0.0180
20	158.4	10.0	0.0	20745.	3155.	-171.	-5243.	782.	3209.
	77.0	0.0	50.1	20745.	3155.	-171.	-5243.	782.	3209.
	0.232		50.1	22866.	3476.	-188.	-5774.	862.	3538.
	100.	0.2156	50.0		40.46				
	687.3	0.9072	49.7	1.4890	0.2263	-0.0123	-0.0716	0.0017	0.0072
21	158.6	4.0	0.0	8310.	2239.	-130.	21907.	1895.	5907.
	76.9	0.0	50.0	8310.	2239.	-130.	21907.	1895.	5907.
	0.232		50.1	9146.	2476.	-144.	24244.	2097.	6536.
	102.	0.2147	50.0		24.10				
	688.5	0.9034	49.8	0.5967	0.1608	-0.0093	0.2999	0.0042	0.0132
22	158.5	0.0	0.0	13680.	2407.	-152.	18596.	2344.	3898.
	76.8	0.0	50.0	13680.	2407.	-152.	18596.	2344.	3898.
	0.232		50.1	15098.	2664.	-168.	20565.	2593.	4315.
	102.	0.2147	50.1		31.35				
	688.5	0.9035	49.8	0.9808	0.1731	-0.0109	0.2545	0.0052	0.0087
23	158.7	4.0	0.0	19195.	2880.	-225.	11733.	2620.	3423.
	76.9	0.0	49.9	19195.	2880.	-225.	11733.	2620.	3423.
	0.232		50.1	21229.	3196.	-249.	13011.	2665.	3795.
	103.	0.2144	50.0		37.53				
	689.1	0.9016	49.7	1.3755	0.2072	-0.0162	0.1604	0.0058	0.0076
24	158.8	6.0	0.0	23705.	3639.	-218.	936.	1407.	3378.
	76.9	0.0	49.9	23705.	3639.	-218.	936.	1407.	3378.
	0.232		50.1	26332.	4042.	-242.	1042.	1563.	3752.
	104.	0.2140	50.2		47.32				
	689.7	0.9002	49.7	1.7031	0.2615	-0.0157	0.0128	0.0031	0.0075

RUN [illegible] TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALPHA,D PSI RHO*1000 RHOR	IHA REQ POS LONG STK LAT STK PDL DEF	LIFT,LB LIFT LIFT/6 CL	DRAG,LB DRAG DRAG/6 FE CD	SIDE,LB SIDE SIDE/6 CY	PITCH,LB PITCH PITCH/6 CM	YAW,LB YAW YAW/6 CN	ROLL,LB ROLL ROLL/6 CROLL
3	157.9	4.0	0.0	17415.	3024.	-56.	22081.	273.	-1267.
	76.9	0.0	50.1	17415.	3024.	-56.	22081.	273.	-1267.
	0.232		50.0	12527.	3314.	-61.	25104.	299.	-1390.
	97.	0.2160	49.9		39.34				
	685.4	0.9112	50.0	0.8200	0.2173	-0.0112	0.3129	0.0006	-0.0028
4	156.3	0.0	0.0	16495.	3233.	-187.	16511.	514.	-2586.
	76.9	0.0	50.0	16495.	3233.	-187.	16511.	514.	-2586.
	0.232		50.0	18144.	3567.	-206.	20424.	567.	-2864.
	101.	0.2154	50.0		42.05				
	687.3	0.9068	50.0	1.1858	0.2323	-0.0134	0.2532	[illegible]	[illegible]
5	156.7	4.0	0.0	21970.	3792.	-241.	8266.	1630.	-2245.
	77.1	0.0	50.2	21970.	3792.	-241.	8266.	1630.	-2245.
	0.232		50.0	24175.	4130.	-266.	9131.	2023.	-2481.
	[illegible]	0.2151	49.9		44.52				
	687.9	0.9047	50.0	1.5065	0.2666	-0.0173	0.1124	0.0041	-0.0056
6	156.6	8.0	0.0	26195.	4107.	-244.	3402.	1451.	-1029.
	76.9	0.0	50.3	26195.	4107.	-244.	3403.	1451.	-1029.
	0.232		50.0	28791.	4548.	-267.	4321.	1607.	-1140.
	102.	0.2147	50.1		55.59				
	688.5	0.9031	50.1	1.7374	0.2456	-0.0173	0.0533	0.0032	-0.0023

TABLE V.— Continued.

RUN 42 TEST 525

PT	VELS	ALPHA	[illegible]	LIFT	DRAG	SIDE	PITCH	YAW	ROLL
	QPSF	PSI	PER POS	LIFT	DRAG	SIDE	PITCH	YAW	ROLL
	MION		LONG STA	LIFT/Q	DRAG/Q	SIDE/Q	PITCH/Q	YAW/Q	ROLL/Q
	TEMP	RHORATIO	LAT STA		FE				
	VSNDKTS	RHOR	POW CEF	CL	CD	CY	CM	CN	CROLL
3	114.2	+4.0	50.0	5586.	2892.	-105.	15775.	544.	-450.
	42.7	0.0	50.0	5580.	2897.	-105.	15775.	544.	-450.
	0.171		50.0	5777.	2444.	-104.	16331.	509.	-443.
	72.	0.2246	50.0		67.76				
	669.2	0.9659	50.1	0.7223	0.3744	-0.0136	0.3544	0.0072	-0.0054
4	114.5	-2.0	50.0	6875.	2932.	-89.	15167.	596.	-1456.
	42.7	0.0	50.0	6875.	2932.	-89.	15167.	596.	-1456.
	0.171		44.9	7145.	3052.	-92.	16744.	622.	-1513.
	73.	0.2287	50.0		64.76				
	670.5	0.9622	50.1	0.8895	0.3870	-0.0115	0.3979	0.0024	-0.0059
5	114.3	-1.0	60.0	7230.	3057.	-77.	14242.	239.	-465.
	42.6	0.0	50.0	7230.	3057.	-77.	14242.	239.	-465.
	0.171		50.0	7514.	3177.	-90.	14801.	249.	-497.
	73.	0.2287	44.9		71.78				
	670.5	0.9623	50.2	0.9380	0.3966	-0.0100	0.3516	[illegible]	-0.0035
6	115.7	+4.0	60.0	8557.	2382.	+41.	14567.	1662.	1264.
	43.5	0.0	50.0	8557.	2382.	+41.	14567.	1662.	1264.
	0.173		50.0	8911.	2451.	+43.	15143.	1731.	1317.
	74.	0.2262	49.9		54.73				
	671.3	0.9601	50.1	1.1098	0.3023	+0.0052	0.3523	0.0386	0.0050
7	115.9	+2.0	60.0	2725.	2396.	+18.	13264.	1595.	2304.
	43.6	0.0	50.0	2725.	2396.	+18.	13264.	1595.	2304.
	0.173		50.0	2817.	2503.	+19.	13640.	1665.	2404.
	75.	0.2276	49.9		55.00				
	671.7	0.9583	50.1	0.2595	0.3039	+0.0023	0.3203	0.0063	0.0091
8	116.0	+1.0	60.0	2800.	2411.	+63.	12638.	1638.	1908.
	43.7	0.0	49.9	2800.	2411.	+63.	12638.	1638.	1908.
	0.173		50.0	2922.	2516.	+66.	13166.	1704.	1991.
	75.	0.2276	50.0		55.20				
	671.7	0.9583	50.1	0.3542	0.3050	+0.0080	0.3042	0.0064	0.0075
9	116.0	+2.0	50.0	7720.	1640.	+96.	12214.	612.	759.
	43.5	0.0	50.1	7720.	1640.	+96.	12214.	612.	759.
	0.173		50.0	8066.	1727.	+101.	12742.	641.	795.
	77.	0.2269	50.0		42.31				
	673.0	0.9588	50.1	0.9807	0.2337	+0.0122	0.2953	0.0029	0.0030
10	116.0	-2.0	50.0	7640.	2329.	-139.	12864.	746.	571.
	43.5	0.0	50.0	7640.	2329.	-139.	12864.	746.	571.
	0.173		50.0	8002.	2434.	-146.	13473.	781.	594.
	77.	0.2264	49.8		53.50				
	673.0	0.9508	50.1	0.9711	0.2960	-0.0177	0.3111	0.0024	0.0023
11	116.2	-2.0	50.0	7715.	2792.	-103.	14594.	1075.	149.
	43.6	0.0	50.1	7715.	2792.	-103.	14594.	1075.	149.
	0.173		50.0	7761.	2430.	-108.	15262.	1126.	156.
	76.	0.2265	50.0		64.10				
	673.6	0.9530	50.1	0.9675	0.3541	-0.0131	0.3510	0.0042	0.0006
12	115.9	+2.0	60.0	6960.	3026.	+56.	15122.	849.	-851.
	43.3	0.0	50.0	6960.	3026.	+56.	15122.	849.	-851.
	0.173		50.0	7324.	3175.	+59.	15806.	890.	-872.
	76.	0.2265	50.0		64.88				
	673.6	0.9531	50.1	0.8905	0.3861	+0.0064	0.3671	0.0054	-0.0033
13	116.2	-2.0	40.0	5005.	3176.	-106.	14476.	357.	-744.
	43.5	0.0	50.0	5005.	3176.	-106.	14476.	357.	-744.
	0.173		50.0	5315.	3339.	-111.	15743.	375.	-783.
	74.	0.2261	50.0		72.44				
	674.2	0.9512	50.2	0.7629	0.4033	-0.0135	0.3618	0.0014	-0.0024
14	98.9	-4.0	75.0	3770.	2305.	-55.	11195.	399.	+95.
	31.6	0.0	50.0	3770.	2305.	-55.	11195.	399.	+95.
	0.147		50.0	3954.	2418.	-58.	11742.	419.	+100.
	80.	0.2268	50.0		72.45				
	675.9	0.9538	50.2	0.6592	0.4030	-0.0096	0.3725	0.0022	+0.0005
15	99.1	+2.0	75.0	4650.	2360.	+71.	10925.	181.	+540.
	31.7	0.0	50.0	4650.	2360.	+71.	10925.	181.	+540.
	0.147		50.1	4877.	2475.	+74.	11459.	190.	+566.
	80.	0.2268	50.0		74.52				
	674.9	0.9534	50.3	0.8112	0.4117	+0.0124	0.3627	0.0010	+0.0029
16	99.1	0.0	75.0	5440.	2446.	+57.	10423.	612.	+91.
	31.7	0.0	50.0	5440.	2446.	+57.	10423.	612.	+91.
	0.147		50.2	5706.	2566.	+60.	10915.	642.	+96.
	80.	0.2268	50.0		77.24				
	674.9	0.9538	50.2	0.9491	0.4257	+0.0099	0.3127	0.0033	+0.0005
17	99.2	0.0	75.0	5900.	2473.	+78.	8998.	868.	15.
	31.8	0.0	50.0	5900.	2473.	+78.	8998.	868.	15.
	0.147		50.0	6189.	2594.	+82.	9436.	721.	127.
	80.	0.2268	50.0		[illegible]				
	674.9	0.9534	50.3	1.0263	0.4302	+0.0136	0.2979	0.0037	[illegible]

TABLE V.— Continued.

RUN 43 TEST 525

PT	VAIS / QPSF / MACH / TEMP / VSNDFTS	ALPHA,C / PSI / / REYNOLDS / RHOF	CHA / RED POS / LONG STA / LA STA / POS LEV	LIFT,C / LIFT / LIFT/Q / / CL	DRAG,C / DRAG / DRAG/Q / FE / CD	SIDE,C / SIDE / SIDE/Q / / CY	PITCH,C / PITCH / PITCH/Q / / CM	YAW,C / YAW / YAW/Q / / CN	ROLL,C / ROLL / ROLL/Q / / CROLL
4	115.5	-4.0	0.0	1115.	1093.	-56.	10352.	2365.	4023.
	43.8	0.0	50.1	1115.	1093.	-56.	10352.	2365.	4023.
	0.174		50.1	1169.	1146.	-59.	10850.	2479.	4215.
	77.	0.2266	50.0		24.43				
	673.0	0.9503	50.0	0.1405	0.1376	-0.0071	0.2483	0.0093	0.0157
5	116.8	0.0	0.0	4240.	1033.	-48.	6967.	2306.	4244.
	44.1	0.0	50.1	4240.	1033.	-48.	6967.	2306.	4244.
	0.174		50.0	4445.	1083.	-50.	7303.	2416.	4449.
	77.	0.2267	49.9		23.44				
	673.0	0.9500	50.0	0.5376	0.1295	-0.0060	0.1662	0.0090	0.0165
6	117.0	4.0	0.0	7255.	1135.	-42.	2854.	1602.	3786.
	44.0	0.0	50.1	7255.	1135.	-42.	2854.	1602.	3786.
	0.174		50.0	7644.	1196.	-47.	3008.	1844.	3991.
	80.	0.2255	50.1		25.86				
	674.9	0.9467	50.0	0.9110	0.1425	[illegible]	0.0662	0.0070	0.0146
7	117.1	8.0	0.0	10070.	1440.	-103.	-1446.	1104.	3820.
	44.0	0.0	50.0	10070.	1440.	-103.	-1446.	1104.	3820.
	0.174		50.0	10615.	1518.	-109.	-1946.	1164.	4027.
	80.	0.2255	49.9		32.72				
	674.9	0.9487	50.0	1.2638	0.1807	-0.0129	-0.0441	0.0043	0.0149
8	117.5	10.0	0.0	11575.	1639.	-116.	-2957.	931.	3072.
	44.0	0.0	50.2	11575.	1639.	-116.	-2957.	931.	3072.
	0.175		50.0	12203.	1728.	-122.	-3118.	982.	3239.
	80.	0.2255	50.1		36.44				
	674.9	0.9485	50.0	1.4413	0.2041	-0.0144	[illegible]	0.0036	0.0119
9	117.4	-4.0	0.0	4700.	1250.	-92.	11912.	1010.	2019.
	44.2	0.0	50.0	4700.	1250.	-92.	11912.	1010.	2019.
	0.174		50.0	4964.	1320.	-97.	12581.	1066.	2133.
	81.	0.2251	50.0		28.20				
	675.5	0.9464	49.9	0.5874	0.1552	-0.0115	0.2833	0.0039	0.0078
10	117.2	0.0	0.0	7800.	1337.	-104.	10277.	1403.	1992.
	44.0	0.0	50.0	7800.	1337.	-104.	10277.	1403.	1992.
	0.174		50.0	8237.	1412.	-110.	10855.	1491.	2104.
	81.	0.2251	49.9		30.35				
	675.5	0.9469	49.9	0.9749	0.1677	-0.0130	0.2853	0.0055	0.0078
11	117.5	4.0	0.0	10750.	1600.	-151.	6104.	1182.	1325.
	44.1	0.0	50.2	10750.	1600.	-151.	6104.	1182.	1325.
	0.174		50.0	11374.	1693.	-160.	6458.	1251.	1402.
	82.	0.2248	50.1		35.25				
	676.1	0.9457	50.0	1.3456	0.2003	-0.0189	0.1454	0.0045	0.0052
12	117.4	8.0	0.0	13425.	1987.	-146.	363.	777.	1556.
	44.1	0.0	50.1	13425.	1987.	-146.	363.	777.	1556.
	0.174		50.1	14204.	2102.	-154.	426.	823.	1647.
	82.	0.2247	50.0		45.09				
	676.1	0.9451	49.9	1.6831	0.2491	-0.0183	0.0096	0.0030	0.0061
13	117.5	8.0	0.0	13180.	1970.	-240.	1593.	373.	8505.
	44.1	0.0	50.1	13180.	1970.	-240.	1593.	373.	8505.
	0.174		49.9	13971.	2088.	-254.	1688.	396.	9016.
	83.	0.2242	49.1		44.06				
	676.7	0.9438	49.9	1.6506	0.2467	-0.0301	0.0380	0.0015	0.0331
14	117.5	5.0	0.0	12270.	1920.	-292.	3502.	-874.	18654.
	44.1	0.0	50.3	12270.	1920.	-292.	3502.	-874.	18654.
	0.174		49.9	13006.	2035.	-310.	3715.	-927.	19773.
	83.	0.2242	49.6		43.55				
	676.7	0.9439	49.9	1.5375	0.2406	-0.0366	0.0835	-0.0034	0.0727
15	117.4	-4.0	0.0	6635.	1708.	-85.	12192.	679.	1305.
	44.0	0.0	50.1	6635.	1708.	-85.	12192.	679.	1305.
	0.174		50.0	7033.	1810.	-90.	12923.	720.	1384.
	83.	0.2242	50.1		38.78				
	676.7	0.9438	49.9	0.8323	0.2142	-0.0107	0.2910	0.0026	0.0051
16	117.5	-4.0	60.0	5760.	2932.	-104.	14126.	-178.	-482.
	44.0	0.0	50.1	5760.	2932.	-104.	14126.	-178.	-482.
	0.174		50.0	6117.	3114.	-110.	15003.	-189.	-511.
	84.	0.2236	50.0		66.57				
	677.0	0.9417	49.5	0.7225	0.3678	-0.0130	0.3372	-0.0007	-0.0019
17	117.6	0.0	60.0	8380.	3151.	-75.	12410.	274.	-546.
	44.0	0.0	50.1	8380.	3151.	-75.	12410.	274.	-546.
	0.174		50.1	8915.	3352.	-80.	13735.	292.	-581.
	85.	0.2234	49.9		71.57				
	678.0	0.9403	49.9	1.0522	0.3957	-0.0094	0.3065	0.0011	-0.0021
18	117.7	2.0	60.0	9665.	3314.	-123.	10314.	697.	-1324.
	44.1	0.0	50.1	9665.	3314.	-123.	10314.	697.	-1324.
	0.174		50.1	10281.	3531.	-131.	11565.	741.	-1408.
	85.	0.2234	49.9		75.31				
	678.0	0.9398	49.9	1.2092	0.4161	-0.0154	0.2580	0.0027	-0.0052
19	117.6	4.0	60.	10715.	3537.	-36.	8655.	605.	139.
	44.0	0.0	50.1	10715.	3537.	-36.	8655.	605.	139.
	0.174		50.0	11399.	3763.	-38.	9219.	644.	148.
	85.	0.2234	49.6		80.39				
	678.0	0.9400	49.6	1.3454	0.4441	-0.0045	0.2071	0.0024	0.0005

TABLE V.— Continued.

RUN 44 TEST 525

PT	VEL S QBAR MACH TEMP VSNTATS	ALPHA,C PSI RNUMBER RHO	INA PEG POS LONG STA LAT STA POR	LIFT,C LIFT LIFT/B CL	DRAG,C DRAG DRAG/B FE CD	SIDE/C SIDE SIDE/B CY	PITCH/C PITCH PITCH/B CM	YAW,C YAW YAW/B CN	ROLL/C ROLL ROLL/B CROLL
5	[illegible]	[illegible]	0.0	[illegible]	1071.	-22.	[illegible]	2274.	3171.
	43.1	0.0	50.0	11300.	1071.	-22.	[illegible]	2274.	3171.
	0.174		50.0	1465.	1131.	-23.	11033.	2462.	3350.
	80.	0.2250	50.1		24.26				
	675.5	0.9456	50.1	0.7605	0.1341	-0.0025	.2023	0.0045	0.0123
6	117.5	0.0	0.0	8230.	1034.	-24.	7185.	1627.	3923.
	44.2	0.0	49.9	8231.	1034.	-24.	7185.	1627.	3923.
	0.174		50.0	8477.	1094.	-25.	7603.	1934.	4152.
	82.	0.2246	50.0		23.44				
	676.1	0.9448	50.1	0.5249	0.1293	+0.0030	0.1709	0.0071	0.0152
7	117.5	4.0	0.0	7333.	1152.	-93.	2634.	2017.	3772.
	44.1	0.0	50.0	7333.	1152.	-93.	2634.	2017.	3772.
	0.174		49.8	7772.	1222.	-99.	2792.	2135.	3992.
	83.	0.2242	50.0		26.11				
	676.7	0.9431	50.1	0.9180	0.1443	-0.0116	0.0328	0.0074	0.0147
8	117.5	8.0	0.0	10325.	1434.	-127.	-1517.	1087.	2576.
	44.0	0.0	49.9	10325.	1434.	-127.	-1517.	1087.	2576.
	0.174		49.9	10427.	1521.	-133.	-1605.	1153.	2731.
	83.	0.2242	50.1		32.55				
	676.7	0.9431	50.0	1.2576	0.1799	-0.0114	-0.0302	0.0042	0.0100
9	117.6	10.0	0.0	11660.	1630.	-49.	-2713.	863.	2505.
	44.0	0.0	50.0	11660.	1630.	-49.	-2713.	863.	2505.
	0.174		50.0	12366.	1732.	-45.	-2882.	853.	2424.
	84.	0.2238	50.0		37.01				
	677.4	0.9412	50.1	1.4626	0.2045	-0.0112	-0.0648	0.0031	0.0104
10	117.7	-4.0	0.0	4790.	1214.	-78.	12152.	1046.	1720.
	44.0	0.0	50.0	4790.	1214.	-78.	12152.	1046.	1720.
	0.174		50.0	5098.	1292.	-83.	12933.	1115.	1830.
	84.	0.2233	50.0		27.56				
	678.0	0.9396	50.0	0.6008	0.1523	-0.0098	0.2921	0.0041	0.0067
11	117.8	0.0	0.0	7850.	1315.	-103.	9983.	1285.	1879.
	44.1	0.0	50.0	7850.	1315.	-103.	9983.	1285.	1879.
	0.174		50.0	8355.	1400.	-110.	10624.	1368.	2000.
	85.	0.2233	50.0		29.01				
	678.0	0.9396	50.0	0.9851	0.1687	-0.0129	0.2379	0.0050	0.0073
12	117.8	4.0	0.0	10725.	1600.	-106.	5435.	1208.	1592.
	44.0	0.0	50.0	10725.	1600.	-106.	5435.	1208.	1592.
	0.174		50.0	11435.	1706.	-113.	5795.	1288.	1665.
	86.	0.2229	51.1		36.33				
	678.6	0.9379	50.0	1.3453	0.2007	-0.0133	0.1297	0.0047	0.0066
13	117.9	8.0	0.0	13595.	1972.	-145.	652.	538.	1274.
	44.1	0.0	50.0	13595.	1972.	-145.	652.	538.	1274.
	0.174		51.0	14495.	2103.	-155.	696.	574.	1358.
	86.	0.2229	50.0		44.58				
	678.6	0.9379	50.0	1.7017	0.2458	-0.0181	0.0155	0.0021	0.0050
14	117.8	8.0	0.0	13235.	1986.	-244.	1586.	259.	8931.
	44.1	0.0	50.0	13235.	1986.	-244.	1586.	259.	8931.
	0.174		49.7	14111.	2075.	-260.	1650.	276.	9521.
	86.	0.2229	49.2		44.13				
	678.6	0.9379	50.0	1.6584	0.2838	-0.0306	0.0364	0.0010	0.0347
15	117.9	8.0	0.0	12345.	1890.	-289.	3773.	-593.	18317.
	44.1	0.0	49.9	12345.	1890.	-289.	3773.	-593.	18317.
	0.174		49.7	13163.	2015.	-308.	4023.	-633.	19531.
	86.	0.2229	49.3		42.82				
	678.6	0.9379	50.1	1.5852	0.2366	-0.0362	0.0899	-0.0023	0.0715
16	117.7	-4.0	0.0	5390.	1635.	-88.	12309.	836.	331.
	43.9	0.0	50.0	5390.	1635.	-88.	12309.	836.	331.
	0.174		50.0	5825.	1760.	-94.	13142.	893.	353.
	87.	0.2225	49.8		37.24				
	679.2	0.9362	50.0	0.6041	0.2051	-0.0111	0.2946	0.0033	0.0013
17	116.2	0.0	0.0	9315.	1795.	-132.	9709.	941.	-2113.
	43.2	0.0	50.0	9315.	1795.	-132.	9709.	941.	-2113.
	0.174		49.9	10078.	1921.	-141.	10390.	1007.	-2261.
	88.	0.2221	49.9		40.82				
	679.9	0.9345	50.0	1.1773	0.2244	-0.0165	0.2510	0.0037	-0.0082
18	117.7	4.0	0.0	12090.	2097.	-124.	3085.	1230.	740.
	43.8	0.0	50.0	12090.	2097.	-124.	3085.	1230.	740.
	0.174		49.9	12937.	2244.	-133.	3343.	1291.	792.
	88.	0.2221	49.8		47.84				
	679.9	0.9345	50.0	1.5237	0.2643	-0.0156	0.0684	0.0047	0.0024
19	118.1	8.0	0.0	13560.	2265.	-125.	1167.	1267.	169.
	44.1	0.0	50.0	13560.	2265.	-125.	1167.	1267.	169.
	0.174		50.0	14511.	2465.	-134.	1249.	1292.	180.
	88.	0.2221	49.8		51.60				
	679.9	0.9345	50.0	1.5982	0.2862	-0.0157	0.0276	0.0047	0.0007
20	117.8	8.0	0.0	14565.	2511.	-162.	-2020.	81.	90.
	43.9	0.0	50.0	14565.	2511.	-162.	-2020.	81.	90.
	0.174		49.9	15593.	2687.	-173.	-2170.	87.	92.
	88.	0.2221	49.7		57.16				
	679.0	0.9345	50.0	1.8441	0.3158	-0.0204	-0.0485	0.0032	0.0003

TABLE V.— Continued.

RUN 45 TEST 525

PT	[illegible] DPSF [illegible] TEMP VSNDATS	[illegible] PSI [illegible] RHOF	[illegible] RED POS LONG STA LAT STA PGR DEV	LIFT LIFT LIFT/Q CL	DRAG DRAG DRAG/Q FE CD	SIDE SIDE SIDE/Q CY	PITCH PITCH PITCH/Q CM	YAW YAW YAW/Q CN	ROLL ROLL ROLL/Q CROLL
3	119.7	-4.0	0.0	1320.	1130.	-29.	10917.	2606.	3363.
	47.4	0.0	50.3	1320.	1130.	-29.	10917.	2606.	3363.
	0.181		50.1	1352.	1157.	-30.	11[illegible].	2672.	3444.
	65.	0.2321	50.0		23.65				
	665.9	0.9763	50.0	0.1590	0.1358	-0.0034	0.2423	0.0095	0.0122
4	120.1	0.0	0.0	4640.	1066.	-30.	7519.	1674.	2985.
	47.6	0.0	50.3	4640.	1066.	-30.	7519.	1474.	2985.
	0.181		50.1	4762.	1066.	-31.	7717.	1524.	3064.
	66.	0.2316	50.1		22.29				
	666.1	0.9722	50.0	0.5391	0.1232	-0.0035	0.1662	0.0066	0.0108
5	120.0	4.0	0.0	7725.	1197.	-98.	2304.	2020.	4032.
	47.6	0.0	50.0	7725.	1197.	-98.	2304.	2020.	4032.
	0.181		50.1	7943.	1231.	-101.	2369.	2077.	4145.
	67.	0.2312	50.0		25.26				
	666.7	0.9726	50.0	0.9036	0.1396	-0.0114	0.0511	0.0073	0.0146
6	119.9	8.0	0.0	11015.	1455.	-107.	-2407.	1550.	3711.
	47.3	0.0	50.2	11015.	1455.	-107.	-2407.	1550.	3711.
	0.180		50.1	11347.	1499.	-110.	-2435.	1597.	3823.
	66.	0.2307	50.0		30.76				
	667.3	0.9708	50.0	1.2873	0.1700	-0.0125	-0.0633	0.0056	0.0135
7	119.9	10.0	0.0	12325.	1670.	-149.	-5247.	1035.	2965.
	47.1	0.0	50.1	12325.	1670.	-149.	-5247.	1055.	2965.
	0.180		50.1	12719.	1723.	-154.	-5415.	1064.	3058.
	69.	0.2303	50.0		35.43				
	668.0	0.9693	50.0	1.4446	0.1957	-0.0175	-0.1170	0.0038	0.0108
8	119.8	11.0	0.0	12880.	1820.	-186.	-6562.	3.	1364.
	47.1	0.0	50.2	12880.	1820.	-186.	-6562.	3.	1364.
	0.180		50.2	13292.	1884.	-192.	-6772.	3.	1407.
	69.	0.2303	50.0		38.76				
	668.0	0.9690	50.1	1.5134	0.2141	-0.0218	-0.1464	0.0000	0.0050
9	119.5	-4.0	0.0	6770.	1700.	-126.	12491.	1250.	-193.
	46.7	0.0	50.0	6770.	1700.	-126.	12491.	1250.	-193.
	0.179		50.1	6999.	1757.	-130.	12913.	1293.	-199.
	70.	0.2244	50.0		36.37				
	668.6	0.9673	50.0	0.8007	0.2009	-0.0149	0.2809	0.0046	-0.0007
10	119.6	0.0	0.0	9950.	1841.	-153.	8690.	1263.	-2005.
	46.7	0.0	50.1	9950.	1841.	-153.	8690.	1263.	-2005.
	0.179		50.2	10306.	1907.	-156.	9002.	1308.	-2077.
	71.	0.2245	50.0		39.40				
	669.2	0.9655	50.0	1.1766	0.2177	-0.0181	0.1955	0.0046	-0.0074
11	119.7	4.0	0.0	12965.	2135.	-146.	3601.	1306.	-1366.
	46.7	0.0	50.1	12965.	2135.	-146.	3601.	1306.	-1366.
	0.179		50.1	13454.	2216.	-152.	3799.	1355.	-1418.
	72.	0.2241	50.1		45.67				
	669.9	0.9637	50.0	1.5323	0.2523	-0.0173	0.0823	0.0048	-0.0050
12	119.7	6.0	0.0	14375.	2336.	-119.	143.	966.	-1609.
	46.7	0.0	50.1	14375.	2336.	-119.	143.	966.	-1609.
	0.179		50.0	14917.	2424.	-123.	149.	1002.	-1670.
	72.	0.2241	50.0		50.00				
	669.9	0.9637	50.0	1.6998	0.2762	-0.0141	0.0032	0.0035	-0.0059
13	119.5	7.0	0.0	14950.	2458.	-97.	-1538.	576.	-908.
	46.5	0.0	50.2	14950.	2458.	-97.	-1538.	576.	-908.
	0.179		50.2	15542.	2555.	-101.	-1599.	599.	-944.
	73.	0.2286	50.1		52.62				
	673.5	0.9615	50.0	1.7788	0.2918	-0.0115	-0.0348	0.0021	-0.0034
14	119.7	8.0	0.0	15500.	2600.	-166.	-2967.	781.	-1116.
	46.7	0.0	50.1	15500.	2600.	-166.	-2967.	781.	-1116.
	0.179		50.1	16114.	2701.	-193.	-3065.	812.	-1162.
	73.	0.2286	50.1		55.62				
	670.5	0.9619	50.0	1.6356	0.3084	-0.0220	-0.0669	0.0029	-0.0041
15	134.8	-4.0	30.0	9005.	3062.	-167.	19955.	746.	-1242.
	62.6	0.0	50.2	9005.	3062.	-167.	19955.	746.	-1242.
	0.208		50.1	9455.	3225.	-176.	21062.	786.	-1309.
	77.	0.2257	50.0		48.49				
	673.0	0.9690	50.0	0.7903	0.2701	-0.0147	0.3556	0.0020	-0.0038
16	134.3	0.0	30.0	12810.	3395.	-163.	12951.	1025.	-353.
	62.2	0.0	50.1	12810.	3395.	-163.	12951.	1025.	-353.
	0.238		50.1	13517.	3582.	-171.	13665.	1085.	-373.
	78.	0.2253	50.0		54.55				
	673.6	0.9077	50.0	1.1372	0.3010	-0.0162	0.2166	0.0028	-0.0010
17	134.3	2.0	30.0	14730.	3669.	-216.	5659.	1394.	-1402.
	62.1	0.0	50.2	14730.	3669.	-216.	5659.	1394.	-1402.
	0.208		50.0	15571.	3875.	-228.	6163.	1474.	-1540.
	79.	0.2249	50.0		59.06				
	674.2	0.9460	49.9	1.3164	0.3266	-0.0194	0.1031	0.0039	-0.0040
18	140.0	4.0	30.0	16590.	4032.	-131.	5535.	488.	-759.
	62.7	0.0	50.2	16590.	4032.	-131.	5535.	488.	-759.
	0.209		50.2	17573.	4271.	-139.	5863.	516.	-804.
	80.	0.2244	50.0		64.33				
	674.9	0.9441	50.0	1.4823	0.3595	-0.0115	0.0926	0.0015	-0.0021
19	134.5	6.0	30.0	19615.	4717.	-168.	-1406.	-316.	-2446.
	62.1	0.0	50.3	19615.	4717.	-168.	-1406.	-316.	-2446.
	0.208		50.2	20817.	5005.	-178.	-1492.	-324.	-2597.
	81.	0.2240	49.9		75.45				
	675.5	0.9425	50.0	1.7456	0.4196	-0.0149	-0.0235	-0.0009	-0.0089
20	74.9	-4.0	90.0	2160.	1451.	-3.	6393.	-173.	-643.
	22.7	0.0	50.1	2160.	1451.	-3.	6393.	-173.	-643.
	0.134		50.1	2255.	1514.	-3.	6654.	-180.	-624.
	80.	0.2277	50.0		70.12				
	674.9	0.9561	50.0	0.5771	0.3874	-0.0008	0.3246	-0.0030	-0.0059

TABLE V.— Continued.

RUN 45 TEST 525

PT	KNTS / QPSF / MTUN / TEMP / VSNDKTS	ALFS,C / PSI / / RHO*10G / RHOR	INA / PED POS / LONG STA / LAT STA / POW LEV	LIFT,U / LIFT / LIFT/Q / / CL	DRAG,U / DRAG / DRAG/Q / FE / CD	SIDE,U / SIDE / SIDE/Q / / CY	PITCH,U / PITCH / PITCH/Q / / CM	YAW,U / YAW / YAW/Q / / CN	ROLL,U / ROLL / ROLL/Q / / CROLL
21	80.0	0.0	90.0	3390.	1522.	-4.	5502.	334.	-125.
	20.8	0.0	50.2	3390.	1522.	-4.	5502.	334.	-125.
	0.119		50.2	3539.	1589.	-4.	5744.	349.	-131.
	80.	0.2277	50.1		73.26				
	676.9	0.9579	49.9	0.7016	0.3038	-0.0011	0.2785	0.0028	-0.0010
22	79.8	4.0	90.0	4485.	1536.	0.	3723.	525.	-331.
	20.7	0.0	50.3	4485.	1536.	0.	3723.	525.	-331.
	0.119		50.1	4673.	1600.	0.	3880.	547.	-345.
	79.	0.2281	50.0		74.12				
	676.2	0.9597	50.0	1.1969	0.3371	0.0000	0.1893	0.0044	-0.0027
23	79.9	8.0	90.0	5575.	1816.	4.	1570.	569.	-72.
	20.5	0.0	50.1	5575.	1816.	4.	1570.	569.	-72.
	0.119		50.2	5809.	1892.	4.	1636.	593.	-75.
	79.	0.2281	50.0		87.52				
	676.2	0.9597	50.0	1.3880	0.4535	0.0001	0.0796	0.0047	-0.0006
24	79.9	10.0	90.0	5940.	1934.	-6.	495.	450.	-384.
	20.7	0.0	50.0	5940.	1934.	-6.	495.	450.	-384.
	0.119		50.1	6189.	2015.	-6.	516.	469.	-400.
	79.	0.2281	50.0		93.31				
	676.2	0.9597	50.0	1.5834	0.5155	-0.0016	0.0251	0.0037	-0.0032
25	79.9	12.0	90.0	6325.	2062.	-22.	-389.	61.	-991.
	20.8	0.0	50.3	6325.	2062.	-22.	-389.	61.	-991.
	0.119		50.1	6591.	2149.	-23.	-405.	63.	-1033.
	79.	0.2281	50.0		99.37				
	676.2	0.9597	50.0	1.6881	0.5490	-0.0059	-0.0197	0.0005	-0.0082

RUN 46 TEST 525

PT	KNTS / QPSF / MTUN / TEMP / VSNDKTS	ALFS,C / PSI / / RHO*10G / RHOR	INA / PED POS / LONG STA / LAT STA / POW LEV	LIFT,U / LIFT / LIFT/Q / / CL	DRAG,U / DRAG / DRAG/Q / FE / CD	SIDE,U / SIDE / SIDE/Q / / CY	PITCH,U / PITCH / PITCH/Q / / CM	YAW,U / YAW / YAW/Q / / CN	ROLL,U / ROLL / ROLL/Q / / CROLL
5	116.9	-4.0	0.0	730.	1066.	-21.	10685.	1937.	2433.
	44.1	0.0	50.0	730.	1066.	-21.	10685.	1937.	2433.
	0.174		50.0	765.	1116.	-22.	11203.	2031.	2547.
	78.	0.2267	49.9		24.16				
	673.6	0.9538	50.0	0.0915	0.1336	-0.0026	0.2548	0.0075	0.0095
6	117.1	0.0	0.0	3440.	973.	-21.	6987.	1987.	2959.
	44.2	0.0	50.0	3440.	973.	-21.	6987.	1987.	2959.
	0.174		50.0	3614.	1022.	-22.	7340.	2087.	3108.
	79.	0.2263	49.7		22.02				
	674.2	0.9520	50.0	0.4301	0.1217	-0.0026	0.1663	0.0077	0.0115
7	117.1	4.0	0.0	6185.	1035.	-40.	3429.	1662.	2828.
	44.1	0.0	49.9	6185.	1035.	-40.	3429.	1662.	2828.
	0.174		50.0	6504.	1084.	-42.	3604.	1744.	2970.
	80.	0.2259	49.6		23.45				
	674.9	0.9502	50.0	0.7742	0.1296	-0.0050	0.0817	0.0065	0.0110
8	117.2	8.0	0.0	8695.	1274.	-57.	-1026.	959.	2477.
	44.1	0.0	50.0	8695.	1274.	-57.	-1026.	959.	2477.
	0.174		50.0	9167.	1343.	-60.	-1081.	1011.	2611.
	81.	0.2254	49.8		28.89				
	675.5	0.9485	49.9	1.0895	0.1596	-0.0071	-0.0245	0.0037	0.0096
9	117.0	10.0	0.0	9890.	1434.	-61.	-3331.	506.	3045.
	44.0	0.0	49.9	9890.	1434.	-61.	-3331.	506.	3045.
	0.174		49.9	10427.	1512.	-64.	-3512.	534.	3210.
	81.	0.2255	49.9		32.61				
	675.5	0.9485	50.0	1.2425	0.1802	-0.0077	-0.0796	0.0020	0.0119
10	117.3	-4.0	0.0	4835.	1375.	-95.	11287.	1144.	832.
	44.0	0.0	50.0	4835.	1375.	-95.	11287.	1144.	832.
	0.174		50.0	5116.	1455.	-100.	11944.	1210.	881.
	83.	0.2246	50.0		31.22				
	676.7	0.9450	49.9	0.6065	0.1725	-0.0119	0.2694	0.0045	0.0032
11	117.6	0.0	0.0	7635.	1443.	-102.	8593.	1071.	-177.
	44.1	0.0	50.0	7635.	1443.	-102.	8593.	1071.	-177.
	0.174		50.0	8044.	1522.	-108.	9060.	1134.	-187.
	83.	0.2245	49.9		32.74				
	676.7	0.9447	50.0	0.9823	0.1579	-0.0122	0.2059	0.0042	-0.0007
12	117.2	4.0	0.0	10550.	1707.	-134.	3725.	1038.	-494.
	44.0	0.0	49.9	10550.	1707.	-134.	3725.	1038.	-494.
	0.174		50.0	11107.	1797.	-142.	3943.	1099.	-521.
	83.	0.2246	49.4		38.84				
	676.7	0.9447	50.0	1.3267	0.2146	-0.0168	0.0891	0.0044	-0.0019
13	117.5	8.0	0.0	13235.	2085.	-134.	-2005.	732.	-83.
	44.1	0.0	49.9	13235.	2085.	-134.	-2005.	732.	-83.
	0.174		50.1	14031.	2211.	-142.	-2126.	777.	-88.
	84.	0.2241	49.9		47.31				
	677.4	0.9429	50.0	1.6586	0.2614	-0.0168	-0.0478	0.0029	-0.0003

TABLE V.— Continued.

RUN 67 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALPHA,C PSI RHORIOB RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U LIFT LIFT/B CL	DRAG,U DRAG DRAG/B FE CD	SIDE,U SIDE SIDE/B CY	PITCH,U PITCH PITCH/B CM	YAW,U YAW YAW/B CN	ROLL,U ROLL ROLL/B CROLL
3	119.2	-4.0	0.0	5357.	1018.	-36.	10574.	2113.	4028.
	45.5	0.0	49.9	5357.	1018.	-36.	10574.	2113.	4028.
	0.177		49.9	5444.	1075.	-36.	11167.	2233.	4244.
	81.	0.2252	50.0		22.35				
	675.5	0.9474	49.9	0.0625	0.1235	-0.0044	0.2442	0.0080	0.0152
4	119.5	0.0	0.0	3595.	965.	-71.	7943.	2657.	2471.
	45.7	0.0	50.1	3595.	965.	-71.	7943.	2657.	2471.
	0.177		50.0	3749.	944.	-75.	8453.	2776.	2614.
	82.	0.2247	50.0		20.66				
	676.1	0.9456	49.9	0.4283	0.1142	-0.0086	0.1838	0.0077	0.0043
5	119.8	4.0	0.0	6660.	1005.	-63.	2476.	1634.	3161.
	45.9	0.0	50.0	6660.	1005.	-63.	2476.	1634.	3161.
	0.178		50.0	7084.	1065.	-67.	2625.	1732.	3351.
	81.	0.2242	50.1		21.93				
	676.7	0.9436	49.9	0.8076	0.1210	-0.0076	0.0566	0.0061	0.0116
6	119.7	8.0	0.0	9585.	1225.	-55.	-2138.	846.	2711.
	45.8	0.0	50.0	9585.	1225.	-55.	-2138.	846.	2711.
	0.176		50.0	10154.	1298.	-56.	-2100.	898.	2875.
	83.	0.2243	50.0		26.75				
	675.7	0.9435	50.0	1.1568	0.1478	-0.0066	-0.0468	0.0032	0.0102
7	119.9	10.0	0.0	11905.	1381.	-76.	-3995.	409.	2027.
	45.8	0.0	50.0	11905.	1381.	-76.	-3995.	409.	2027.
	0.176		50.0	11641.	1466.	-83.	-4242.	434.	2152.
	84.	0.2235	50.0		30.14				
	677.9	0.9417	50.0	1.4220	0.1665	-0.0094	-0.0477	0.0015	0.0076
8	119.5	-4.0	0.0	4915.	1378.	-113.	12537.	1136.	818.
	45.4	0.0	50.0	4915.	1378.	-113.	12537.	1136.	818.
	0.177		50.0	5224.	1466.	-120.	13336.	1209.	870.
	85.	0.2235	49.9		30.33				
	678.0	0.9401	50.0	0.5977	0.1676	-0.0137	0.2451	0.0043	0.0031
9	119.6	0.0	0.0	8090.	1468.	-129.	9125.	1220.	-621.
	45.5	0.0	49.9	8090.	1468.	-129.	9125.	1220.	-621.
	0.177		50.0	8621.	1564.	-137.	9726.	1300.	-662.
	86.	0.2230	50.0		32.50				
	678.6	0.9384	49.9	0.9833	0.1784	-0.0157	0.2111	0.0036	-0.0023
10	119.6	4.0	0.0	11160.	1702.	-123.	4094.	744.	-125.
	45.5	0.0	50.0	11160.	1702.	-123.	4094.	744.	-125.
	0.177		49.9	11893.	1856.	-131.	4363.	846.	-134.
	86.	0.2230	50.0		35.32				
	678.6	0.9384	50.0	1.3569	0.2117	-0.0150	0.0937	0.0030	-0.0005
11	119.6	8.0	0.0	13925.	2097.	-146.	-1844.	811.	1326.
	45.5	0.0	50.0	13925.	2097.	-146.	-1844.	811.	1326.
	0.177		50.0	14839.	2235.	-153.	-1965.	865.	1415.
	86.	0.2251	50.0		46.10				
	679.6	0.9384	49.9	1.6992	0.2551	-0.0175	-0.0427	0.0031	0.0050

RUN 68 TEST 525

PT	VKTS QPSF MACH TEMP VSNDKTS	ALPHA,C PSI RHORIOB RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U LIFT LIFT/B CL	DRAG,U DRAG DRAG/B FE CD	SIDE,U SIDE SIDE/B CY	PITCH,U PITCH PITCH/B CM	YAW,U YAW YAW/B CN	ROLL,U ROLL ROLL/B CROLL
3	78.0	-4.0	0.0	2655.	634.	-14.	5652.	234.	417.
	22.5	0.0	50.0	2655.	634.	-14.	5652.	234.	417.
	0.118		49.9	2671.	634.	-14.	5497.	230.	424.
	62.	0.2359	50.2		30.44				
	663.5	0.9920	50.0	0.5599	0.1712	-0.0038	0.3207	0.0020	0.0077
4	78.1	-4.0	60.0	1990.	1345.	-39.	7463.	152.	59.
	22.5	0.0	50.0	1990.	1345.	-39.	7463.	152.	59.
	0.118		49.9	1955.	1355.	-39.	8044.	153.	54.
	62.	0.2359	50.3		65.66				
	663.5	0.9920	50.0	0.5232	0.3627	-0.0105	0.4097	0.0013	0.0005
5	79.1	-4.0	90.0	1455.	1439.	-27.	7199.	541.	155.
	23.5	0.0	49.9	1455.	1439.	-27.	7199.	541.	155.
	0.116		50.0	1466.	1450.	-27.	7254.	545.	157.
	62.	0.2359	50.1		70.24				
	663.5	0.9920	50.0	0.3924	0.3871	-0.0073	0.3695	0.0050	0.0015
6	115.6	-4.0	60.0	4565.	2983.	-88.	17440.	7.	55.
	40.9	0.0	50.0	4565.	2983.	-88.	17440.	7.	55.
	0.176		44.8	4670.	3055.	-90.	16370.	11.	56.
	56.	0.2321	50.2		66.44				
	666.1	0.9766	49.9	0.5358	0.3664	-0.0108	0.4194	0.0001	0.0002
7	115.7	-2.0	60.0	5635.	3059.	-85.	15794.	458.	175.
	40.9	0.0	50.0	5635.	3059.	-85.	15794.	458.	175.
	0.176		44.4	5781.	3134.	-87.	16269.	463.	174.
	57.	0.2317	50.2		[illegible]				
	666.7	0.9767	50.0	0.6430	0.3751	-0.0105	0.3697	0.0037	0.0007
8	116.6	0.0	60.0	6815.	3137.	-106.	14244.	1055.	262.
	40.9	0.0	50.0	6815.	3137.	-106.	14244.	1055.	262.
	0.176		44.4	6992.	3218.	-111.	[illegible]	1103.	269.
	57.	0.2317	50.1		[illegible]				
	666.7	0.9764	49.9	0.8398	0.3862	-0.0133	[illegible]	[illegible]	[illegible]

TABLE V.— Continued.

RUN 48 TEST 525

RT	[illegible] QPSF [illegible] TEMP TVSHORTS	[illegible] PSI [illegible]	[illegible] FT POST [illegible] POWTGEN	[illegible] LIFT [illegible] CL	[illegible] DRAG [illegible] CD	[illegible] SIDE [illegible] CY	[illegible] PITCH [illegible] CM	[illegible] YAW [illegible] CN	[illegible] ROLL [illegible] CROLL
9	116.5	2.0	60.0	8170.	3255.	+119.	11038.	1031.	-574.
	4479	0.0	50.0	8170.	3255.	-119.	11038.	1031.	-574.
	0.176		50.0	8346.	3346.	-122.	11462.	1057.	-595.
	60.	0.2316	50.2		72.40				
	667.3	0.9729	50.0	0.9986	0.4003	+0.0140	0.2724	0.0039	+0.0022
10	116.8	4.0	60.0	9275.	3416.	+61.	9506.	1548.	384.
	44.8	0.0	49.9	9275.	3416.	+61.	9336.	1548.	384.
	0.175		50.0	9351.	3520.	+65.	9505.	1590.	390.
	64.	0.2308	50.2		76.24				
	668.0	0.9711	50.0	1.1930	0.2212	+0.0075	0.2182	0.0051	0.0014
11	116.7	5.0	60.0	9895.	3510.	+67.	7598.	1363.	491.
	44.8	0.0	50.0	9895.	3510.	+67.	7598.	1363.	491.
	0.175		50.0	10190.	3605.	+69.	7824.	1404.	505.
	65.	0.2306	50.2		79.33				
	668.3	0.9711	49.9	1.2700	0.2328	+0.0043	0.1743	0.0052	0.0019
12	116.8	6.0	60.0	10465.	3579.	+55.	6144.	1320.	15.
	44.7	0.0	50.0	10465.	3579.	+55.	6144.	1320.	15.
	0.175		50.0	10792.	3692.	+57.	6336.	1362.	15.
	70.	0.2304	50.2		84.06				
	668.6	0.9693	50.0	1.2921	0.2420	+0.0038	0.1944	0.0051	0.0004
13	116.6	7.0	60.0	11085.	3700.	+71.	4419.	1421.	215.
	44.6	0.0	49.9	11085.	3700.	+71.	4419.	1421.	215.
	0.175		49.9	11395.	3811.	+73.	4554.	1466.	223.
	70.	0.2304	50.2		82.96				
	668.6	0.9693	50.0	1.3652	0.2585	+0.0088	0.1042	0.0055	0.0008
14	116.6	8.0	60.0	11510.	3778.	+62.	3017.	1340.	648.
	44.5	0.0	50.0	11510.	3778.	+62.	3017.	1340.	648.
	0.175		49.9	11896.	3905.	+64.	3118.	1385.	677.
	71.	0.2300	50.2		84.08				
	669.2	0.9675	50.0	1.4287	0.2693	+0.0077	0.0713	0.0052	0.0033
15	116.4	9.0	60.0	12075.	3871.	-91.	1629.	1262.	-454.
	44.4	0.0	49.9	12075.	3871.	-91.	1629.	1262.	-454.
	0.175		49.9	12480.	4001.	-94.	1684.	1305.	-469.
	71.	0.2300	50.2		87.15				
	669.2	0.9676	50.0	1.5020	0.2815	-0.0113	0.0386	0.0049	-0.0018
16	116.4	10.0	60.0	12375.	4001.	-125.	539.	982.	-548.
	44.2	0.0	49.9	12375.	4001.	-125.	539.	982.	-548.
	0.174		50.0	12837.	4150.	-130.	559.	1024.	-620.
	73.	0.2291	50.2		90.55				
	670.5	0.9640	50.0	1.5074	0.3003	-0.0156	0.0128	0.0039	-0.0023
17	117.3	6.0	60.0	10370.	3591.	-1006.	7103.	7960.	-2443.
	44.6	-6.0	50.0	10370.	3591.	-1006.	7103.	7960.	-2443.
	0.175		49.9	10779.	3733.	-1046.	7384.	8274.	-2551.
	74.	0.2287	50.2		80.51				
	671.1	0.9627	49.9	1.2806	0.4404	-0.1296	0.2674	0.0307	-0.0096
18	117.3	6.0	60.0	10530.	3585.	+125.	7111.	1000.	-506.
	44.7	0.0	50.0	10530.	3585.	+125.	7111.	1000.	-506.
	0.175		50.0	10966.	3734.	+130.	7406.	1738.	-527.
	75.	0.2282	50.0		80.15				
	671.7	0.9602	50.0	1.3003	0.4027	-0.0159	0.1671	0.0064	-0.0019
19	117.6	6.0	60.0	10450.	3634.	772.	6731.	-5010.	1513.
	44.9	6.0	50.0	10450.	3634.	772.	6731.	-5010.	1513.
	0.175		50.0	10863.	3784.	804.	7011.	-5218.	1576.
	75.	0.2282	50.1		80.41				
	671.7	0.9601	50.0	1.2820	0.4462	0.0949	0.1574	-0.0391	0.0058
20	117.4	6.0	60.0	10179.	3603.	1529.	7808.	-8486.	2370.
	44.6	6.0	50.0	10179.	3603.	1529.	7808.	-8486.	2370.
	0.175		50.0	10635.	3808.	1598.	8248.	-8870.	2477.
	77.	0.2274	50.1		81.60				
	673.0	0.9567	50.0	1.2591	0.4508	0.1892	0.1858	-0.0326	0.0041
21	117.6	6.0	60.0	10345.	3653.	-1324.	8250.	10073.	-2660.
	44.7	-6.0	50.0	10345.	3553.	-1324.	8250.	10073.	-2660.
	0.175		50.0	10834.	3626.	-1387.	8640.	10549.	-2792.
	78.	0.2270	50.2		81.78				
	673.6	0.9579	50.0	1.2795	0.4518	-0.1636	0.1942	0.0387	-0.0103
22	120.3	6.0	0.0	12485.	2154.	-906.	4180.	5587.	-6486.
	46.7	-6.0	50.0	12485.	2156.	-906.	4180.	5587.	-6408.
	0.179		50.0	13104.	2262.	-951.	4395.	5866.	-6741.
	79.	0.2204	50.1		46.12				
	674.2	0.9524	50.1	1.4771	0.2548	+0.1072	0.0942	0.0205	-0.0238
23	120.4	6.0	0.0	12575.	2112.	-163.	2404.	335.	-2449.
	46.6	0.0	49.9	12575.	2112.	-163.	2404.	335.	-2446.
	0.179		50.0	13.54[illegible]	2222.	-171.	2592.	352.	-2625.
	80.	0.2200	50.2		45.29				
	674.9	0.9507	49.9	1.4816	0.2502	-0.0193	0.0555	0.0012	-0.0047
24	120.5	6.0	0.0	12565.	2113.	690.	3011.	-2302.	6724.
	46.7	-6.0	49.9	12565.	2113.	690.	3011.	-2302.	6724.
	0.179		50.0	13217.	2223.	726.	3167.	-2421.	7073.
	80.	0.2200	50.1		45.25				
	674.9	0.9507	50.0	1.4865	0.2500	0.0816	0.0676	-0.0005	0.0247
25	120.2	6.0	0.0	12230.	2168.	1412.	5743.	-7695.	9755.
	46.5	6.0	50.1	12230.	2168.	1412.	5743.	-7695.	9755.
	0.179		50.0	12864.	2280.	1485.	6041.	-8095.	10260.
	80.	0.2259	50.2		45.59				
	674.9	0.9507	50.0	1.4519	0.2574	0.1676	0.1247	-0.0264	0.0350
26	120.2	8.0	0.0	11765.	2253.	+18146.	5221.+[illegible]	[illegible]	[illegible]
	46.5	12.0	5[illegible]	11765.	2255.	+18146.	5221.+[illegible]	[illegible]	[illegible]
	0.179		5[illegible]	12354.	2370.	+[illegible]	[illegible]	[illegible]	[illegible]
	81.	0.2250	50.2		45.55				
	675.5	0.9490	50.0	1.3925	0.2622	+[illegible]	[illegible]	[illegible]	[illegible]

TABLE V.— Continued.

RUN [illegible]   TEST 525

PT	VKTS	ALFS.C	INA	LIFT,U	DRAG,U	SIDE,U	PITCH,U	YAW,U	ROLL,U
	QPSF	PSI	PED POS	LIFT	DRAG	SIDE	PITCH	YAW	ROLL
	MTUN		LONG STK	LIFT/6	DRAG/6	SIDE/6	PITCH/6	YAW/6	ROLL/6
	TEMP	MHC*10C	LAT STK		FE				
	VSNDKTS	AMDA	PUM LEV	CL	CD	CY	CM	CN	CROLL
3	116.5	-4.0	60.0	4465.	1435.	-135.	12479.	720.	490.
	45.0	0.0	50.0	4465.	1435.	-135.	12479.	720.	490.
	0.176		50.1	5088.	1465.	-139.	13144.	735.	500.
	53.	0.2324	50.0		51.69				
	654.2	0.9749	50.1	0.5121	0.1762	-0.0166	0.3019	0.0027	0.0014
4	116.7	-4.0	60.0	4920.	3104.	-155.	17666.	739.	-489.
	45.0	0.0	50.0	4920.	3104.	-155.	17666.	739.	-489.
	0.176		50.0	5640.	3162.	-159.	18325.	757.	-504.
	65.	0.2320	50.1		69.62				
	665.8	0.9761	50.1	0.6044	0.3813	-0.0190	0.4741	0.0028	-0.0019
5	116.9	0.0	60.0	7615.	3278.	-74.	13240.	967.	-484.
	45.0	0.0	50.0	7615.	3278.	-74.	13240.	967.	-484.
	0.176		50.1	[illegible]	3305.	-76.	13595.	[illegible]	-497.
	66.	0.2316	50.1		72.70				
	666.1	0.9792	50.1	0.9391	0.4021	-0.0041	0.3591	0.0036	-0.0014
6	116.9	4.0	60.0	10205.	3614.	-65.	7087.	1031.	-287.
	45.0	0.0	50.0	10205.	3614.	-65.	7087.	1031.	-287.
	0.176		50.1	10445.	3711.	-67.	7244.	1061.	-295.
	67.	0.2311	50.1		68.32				
	666.7	0.9720	50.1	1.2531	0.4438	-0.0080	0.1656	0.0039	-0.0011
7	117.1	6.0	60.0	11595.	3624.	-124.	3496.	1224.	-740.
	45.0	0.0	50.2	11595.	3624.	-124.	3496.	1224.	-740.
	0.176		50.0	11895.	3940.	-115.	4117.	1251.	-765.
	65.	0.2307	49.9		84.94				
	667.1	0.9705	50.1	1.4182	0.4491	-0.0158	0.0933	0.0046	-0.0026
8	117.0	8.0	60.0	12700.	4045.	-169.	880.	1090.	-575.
	44.9	0.0	50.1	12700.	3945.	-167.	880.	1090.	-575.
	0.176		50.1	[illegible]	4177.	-174.	908.	1125.	-1006.
	64.	0.2303	50.1		90.06				
	668.0	0.9688	50.0	1.5619	0.4976	-0.0208	0.0206	0.0042	-0.0037

RUN 50   TEST 525

PT	VKTS	ALFS.C	INA	LIFT,U	DRAG,U	SIDE,U	PITCH,U	YAW,U	ROLL,U
	QPSF	PSI	PED POS	LIFT	DRAG	SIDE	PITCH	YAW	ROLL
	MTUN		LONG STK	LIFT/6	DRAG/6	SIDE/6	PITCH/6	YAW/6	ROLL/6
	TEMP	MHC*10C	LAT STK		FE				
	VSNDKTS	AMDA	PUM LEV	CL	CD	CY	CM	CN	CROLL
3	117.3	-4.0	60.0	4665.	3077.	-136.	18112.	557.	-510.
	45.0	0.0	50.0	4665.	3077.	-136.	18112.	557.	-510.
	0.176		49.9	4834.	3128	-141.	18767.	577.	-528.
	71.	0.2294	50.1		68.42				
	669.2	0.9651	50.0	0.5731	0.3780	-0.0167	0.4234	0.0023	-0.0019
4	117.2	0.0	60.0	7130.	3255.	-138.	13521.	966.	-381.
	44.8	0.0	50.0	7130.	3255.	-138.	13521.	966.	-381.
	0.176		50.0	7401.	3379	-143.	14036.	1005.	-396.
	72.	0.2290	50.2		72.64				
	669.9	0.9633	50.1	0.8191	0.4013	-0.0170	0.3172	0.0037	-0.0015
5	117.5	4.0	60.0	9725.	3544.	-101.	7777.	871.	-838.
	44.9	0.0	49.9	9725.	3544.	-101.	7777.	871.	-838.
	0.176		50.1	10115.	3686	-105.	8089.	906.	-872.
	73.	0.2285	50.1		78.93				
	670.5	0.9615	49.9	1.1966	0.4361	-0.0124	0.1821	0.0033	-0.0032
6	117.7	6.0	60.0	10900.	3732.	-97.	5172.	1379.	-238.
	45.0	0.0	50.0	10900.	3732.	-97.	5172.	1379.	-238.
	0.176		49.9	11358.	3889	-101.	5390.	1437.	-248.
	74.	0.2281	50.0		82.99				
	671.1	0.9597	50.0	1.3391	0.4585	-0.0119	0.1209	0.0053	-0.0009
7	117.8	8.0	60.0	11960.	3941.	-99.	2161.	1593.	-652.
	45.0	0.0	50.0	11960.	3941.	-99.	2161.	1593.	-652.
	0.176		50.0	12507.	4114	-103.	2277	1663.	-681.
	75.	0.2277	50.2		87.59				
	671.7	0.9579	50.0	1.4711	0.4839	-0.0122	0.0510	0.0061	-0.0025
8	117.9	6.0	60.0	10585.	3859.	-1761.	7767.	11890.	-4531.
	45.0	-8.0	50.1	10585.	3859.	-1761.	7767.	11890.	-4531.
	0.176		49.9	11071.	4036	-1842.	8123.	12436.	-4739.
	76.	0.2273	50.5		85.81				
	672.4	0.9561	50.0	1.3004	0.4741	-0.2163	0.1816	0.0456	-0.0173
9	118.0	6.0	60.0	10760.	3762.	-972.	6692.	7622.	-2780.
	45.0	-4.0	50.0	10760.	3762.	-972.	6692.	7622.	-2780.
	0.176		50.0	11275.	3942	-1019.	7222.	7987.	-2913.
	77.	0.2268	50.0		83.65				
	673.0	0.9543	50.0	1.3219	0.4622	-0.1194	0.1461	0.0299	-0.0106
10	117.9	6.0	60.0	10965.	3712.	-87.	5910.	1375.	-266.
	44.9	0.0	50.0	10965.	3712.	-87.	5910.	1375.	-266.
	0.176		50.0	11490.	3890	-91.	6193.	1440.	-278.
	77.	0.2266	50.2		82.53				
	673.0	0.9543	50.0	1.3485	0.4565	-0.0107	0.1363	0.0053	-0.0010
11	117.9	6.0	60.0	10750.	3703.	746.	6664.	-4022.	1145.
	44.9	4.0	50.0	10750.	3703.	746.	6664.	-4022.	1145.
	0.176		50.0	11264.	3880	764.	7504	-4215.	1200.
	77.	0.2268	50.1		82.51				
	673.0	0.9543	50.0	1.3234	0.4559	0.0921	0.1566	-0.0154	0.0044
12	117.9	6.0	60.0	10555.	3803.	1526.	8336.	-6355.	1781.
	44.8	8.0	50.0	10555.	3803.	1526.	8336.	-6355.	1781.
	0.176		50.1	11084.	3991	1605.	8754.	-6674.	1870.
	78.	0.2263	50.2		84.76				
	673.8	0.9522	50.0	1.3307	0.4683	0.1883	0.1955	-0.0324	0.0066
13	118.2	6.0	90.0	9905.	3853.	-33.	7305.	1412.	980.
	44.9	0.0	49.6	9905.	3853.	-33.	7305.	1412.	980.
	0.176		50.0	10421.	4031	-35.	7686.	1486.	1031.
	79.	0.2259	50.1		85.70				
	674.2	0.9504	50.0	1.2161	0.4735	-0.0041	0.1710	0.0054	0.0037

TABLE V.– Concluded.

RUN 51 TEST 525

PT	VRIS QPSF MTUN TEMP VSNOKTS	ALFS,C PSI RHO*100 RHOR	INA PED POS LONG STK LAT STK POW LEV	LIFT,U LIFT LIFT/6 CL	DRAG,U DRAG DRAG/6 FE CD	SIDE,U SIDE SIDE/6 CY	PITCH,U PITCH PITCH/6 CM	YAW,U YAW YAW/6 CN	ROLL,U ROLL ROLL/6 CROLL
3	118.2	-4.0	0.0	-113.	803.	-65.	9575.	1883.	-500.
	44.9	0.0	50.0	-113.	803.	-65.	9575.	1883.	-500.
	0.176		50.0	-116.	844	-68.	14069.	1981.	-526.
	78.	0.2260	50.0		17.87				
	673.6	0.9509	50.0	-0.0135	0.0987	-0.0080	0.2240	0.0072	-0.0019
4	118.4	-2.0	0.0	1480.	762.	-45.	7380.	1877.	-45.
	45.0	0.0	50.0	1480.	762.	-45.	7380.	1877.	-45.
	0.176		50.0	1562.	804	-47.	7793.	1981.	-48.
	80.	0.2252	50.0		16.94				
	674.9	0.9474	50.0	0.1818	0.0936	-0.0055	0.1725	0.0072	-0.0002
5	118.6	0.0	0.0	3050.	734.	-59.	5848.	1865.	-390.
	44.9	0.0	50.0	3050.	734.	-59.	5848.	1865.	-390.
	0.176		50.0	3231.	778	-63.	6196.	1976.	-413.
	82.	0.2244	50.0		16.33				
	676.1	0.9439	50.0	0.3749	0.0902	-0.0073	0.1369	0.0071	-0.0015
6	118.6	2.0	0.0	4570.	754.	-91.	3317.	1800.	-577.
	45.0	0.0	50.0	4570.	754.	-91.	3317.	1800.	-577.
	0.176		50.0	4842.	799	-96.	3514.	1907.	-612.
	82.	0.2244	50.0		16.77				
	676.1	0.9439	50.0	0.5614	0.0926	-0.0112	0.0775	0.0069	-0.0022
7	118.5	4.0	0.0	5990.	816.	-78.	1656.	1543.	-1366.
	44.9	0.0	50.0	5990.	816.	-78.	1656.	1543.	-1366.
	0.176		50.0	6346.	864	-83.	1755.	1635.	-1447.
	82.	0.2244	50.0		18.18				
	676.1	0.9439	50.0	0.7378	0.1005	-0.0096	0.0388	0.0059	-0.0052
8	119.0	6.0	0.0	7400.	917.	-86.	-1401.	1707.	-309.
	45.1	0.0	50.0	7400.	917.	-86.	-1401.	1707.	-309.
	0.176		50.0	7855.	973	-91.	-1487.	1812.	-328.
	83.	0.2234	50.0		20.32				
	676.7	0.9421	50.0	0.9059	0.1123	-0.0105	-0.0326	0.0065	-0.0012
9	118.8	8.0	0.0	8490.	1048.	-100.	-3293.	1553.	410.
	44.9	0.0	50.0	8490.	1048.	-100.	-3293.	1553.	410.
	0.176		50.0	9028.	1114	-106.	-3502.	1651.	435.
	84.	0.2235	50.0		23.33				
	677.4	0.9404	50.0	1.0441	0.1289	-0.0123	-0.0771	0.0059	0.0016
10	118.8	10.0	0.0	9365.	1219.	-98.	-6201.	1688.	-1339.
	44.9	0.0	50.0	9365.	1219.	-98.	-6201.	1688.	-1339.
	0.176		50.0	9958.	1296	-104.	-6594.	1794.	-1424.
	84.	0.2235	50.0		27.12				
	677.4	0.9404	50.0	1.1511	0.1498	-0.0121	-0.1450	0.0068	-0.0051

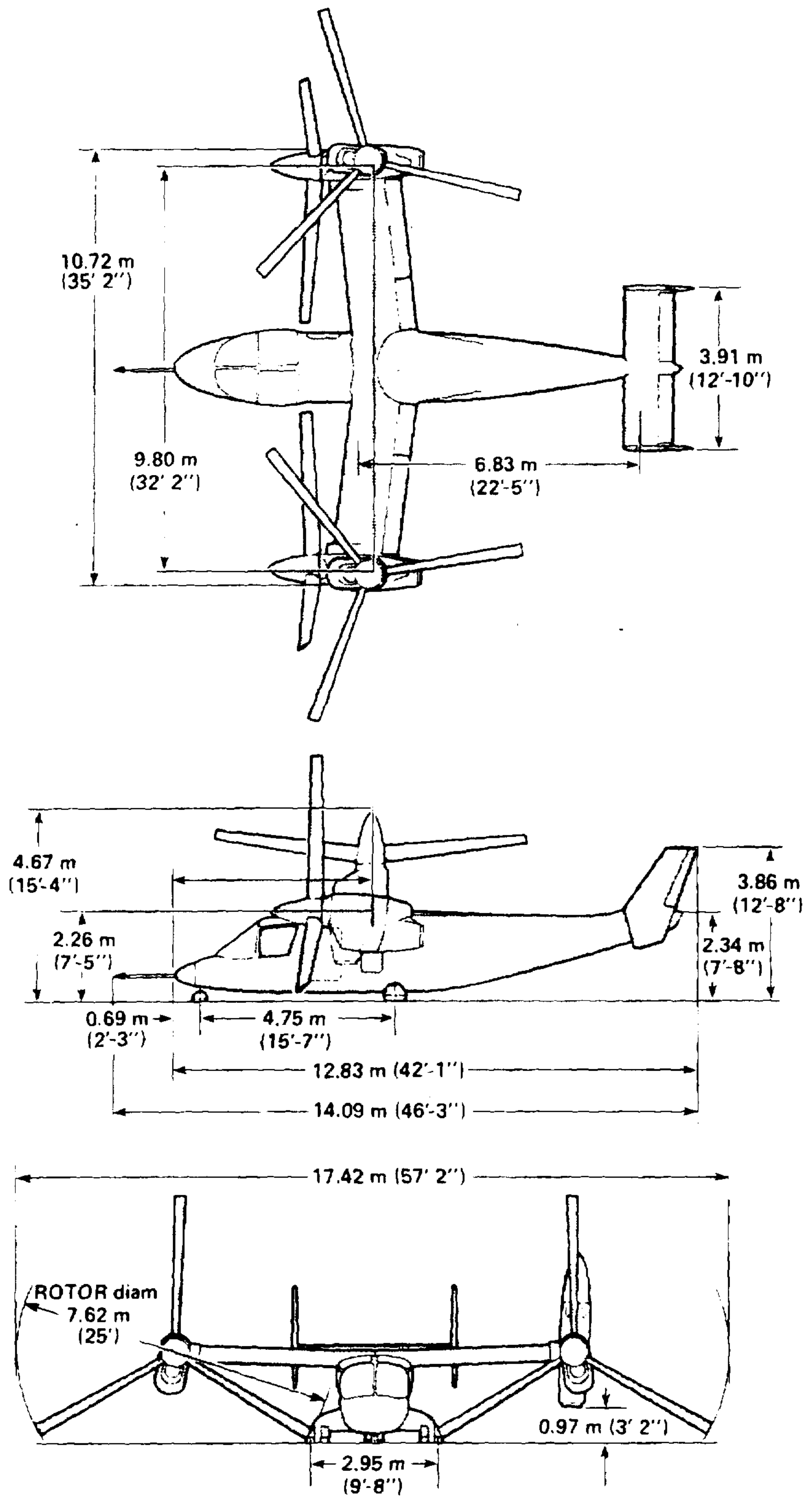
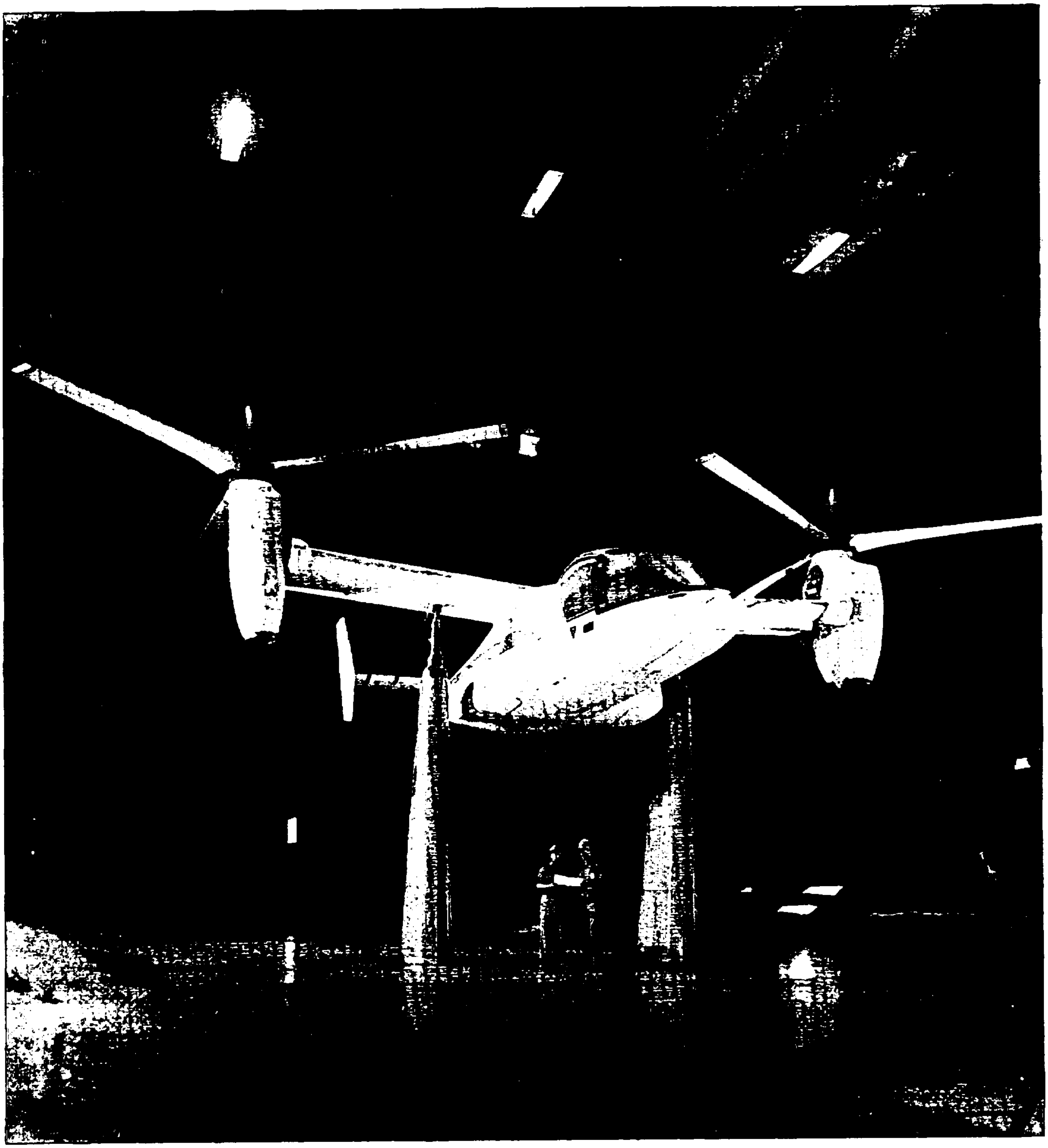
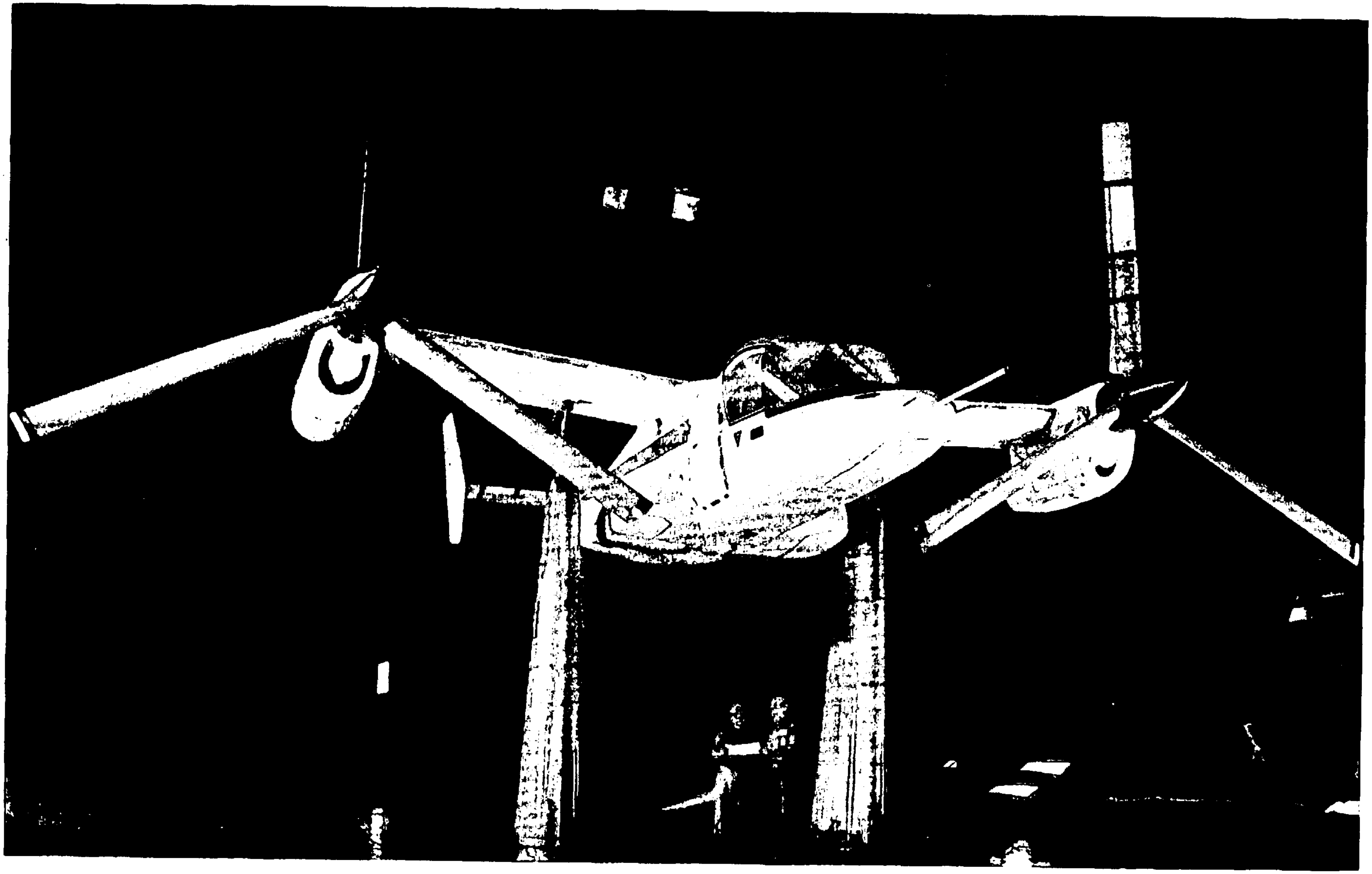


Figure 1.- Aircraft geometry.



(a) Helicopter mode.

Figure 2.— Aircraft mounted in the tunnel.



(b) Airplane mode.

Figure 2.- Concluded.

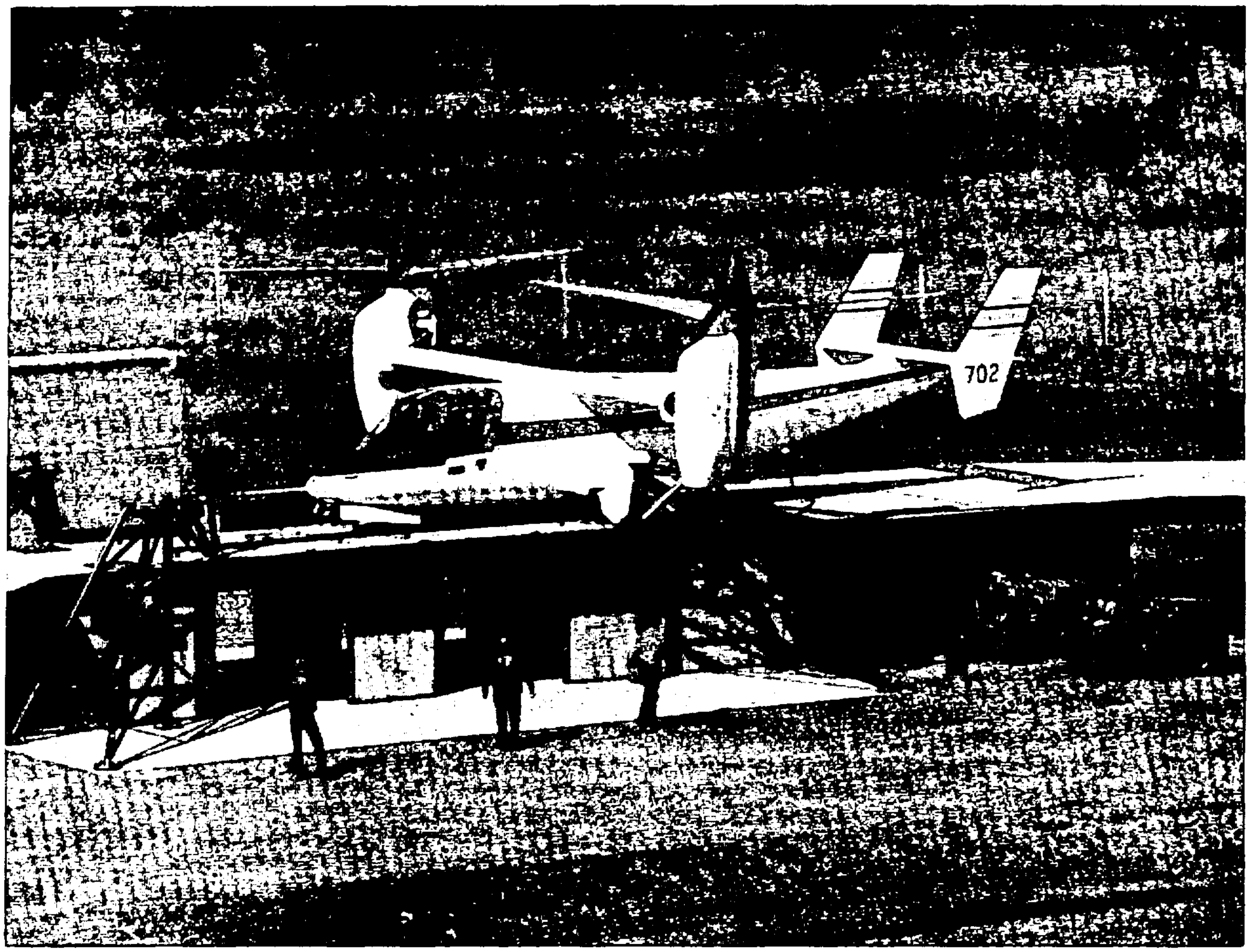


Figure 3.- Aircraft on the ground tie-down stand.

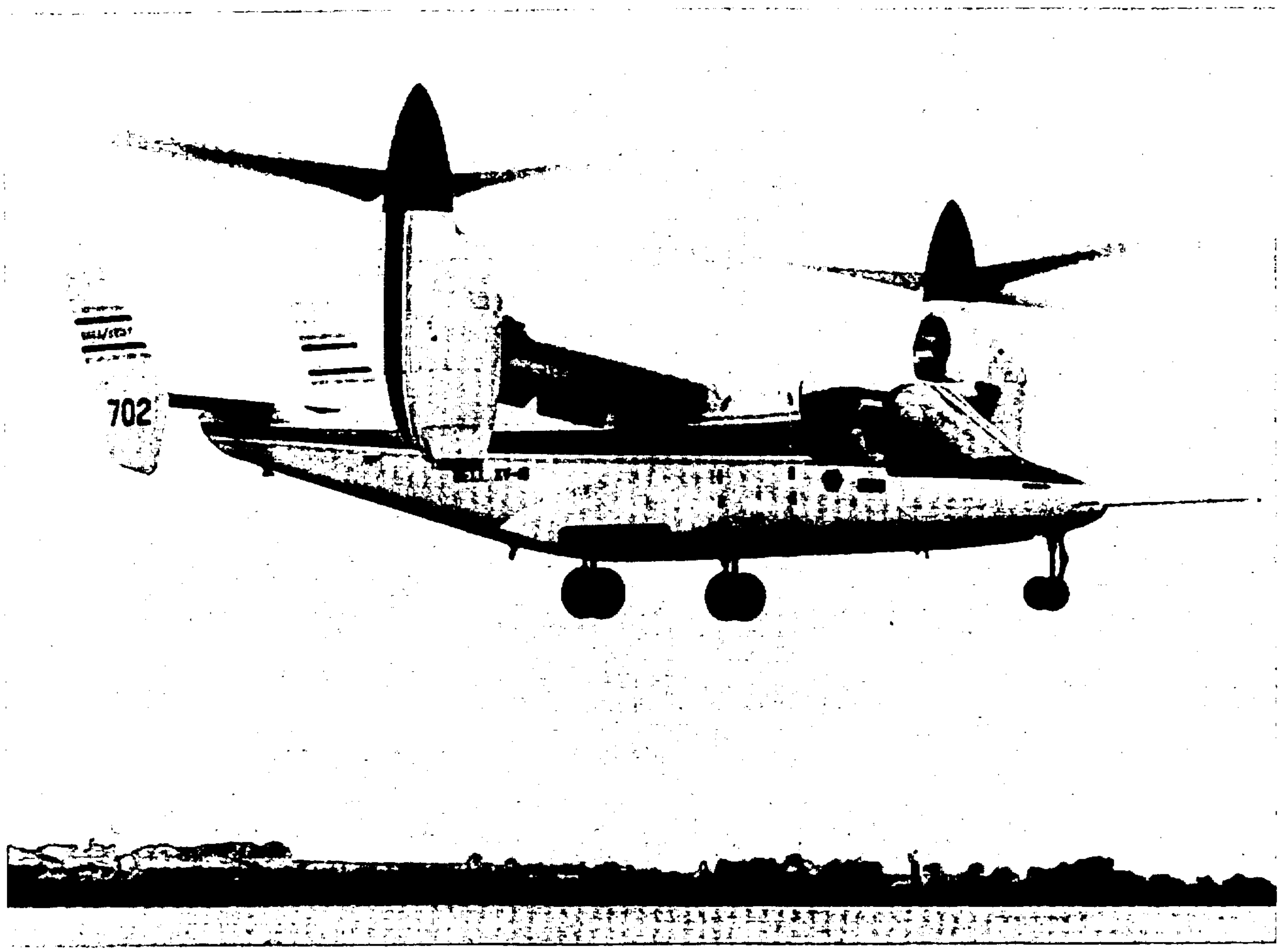
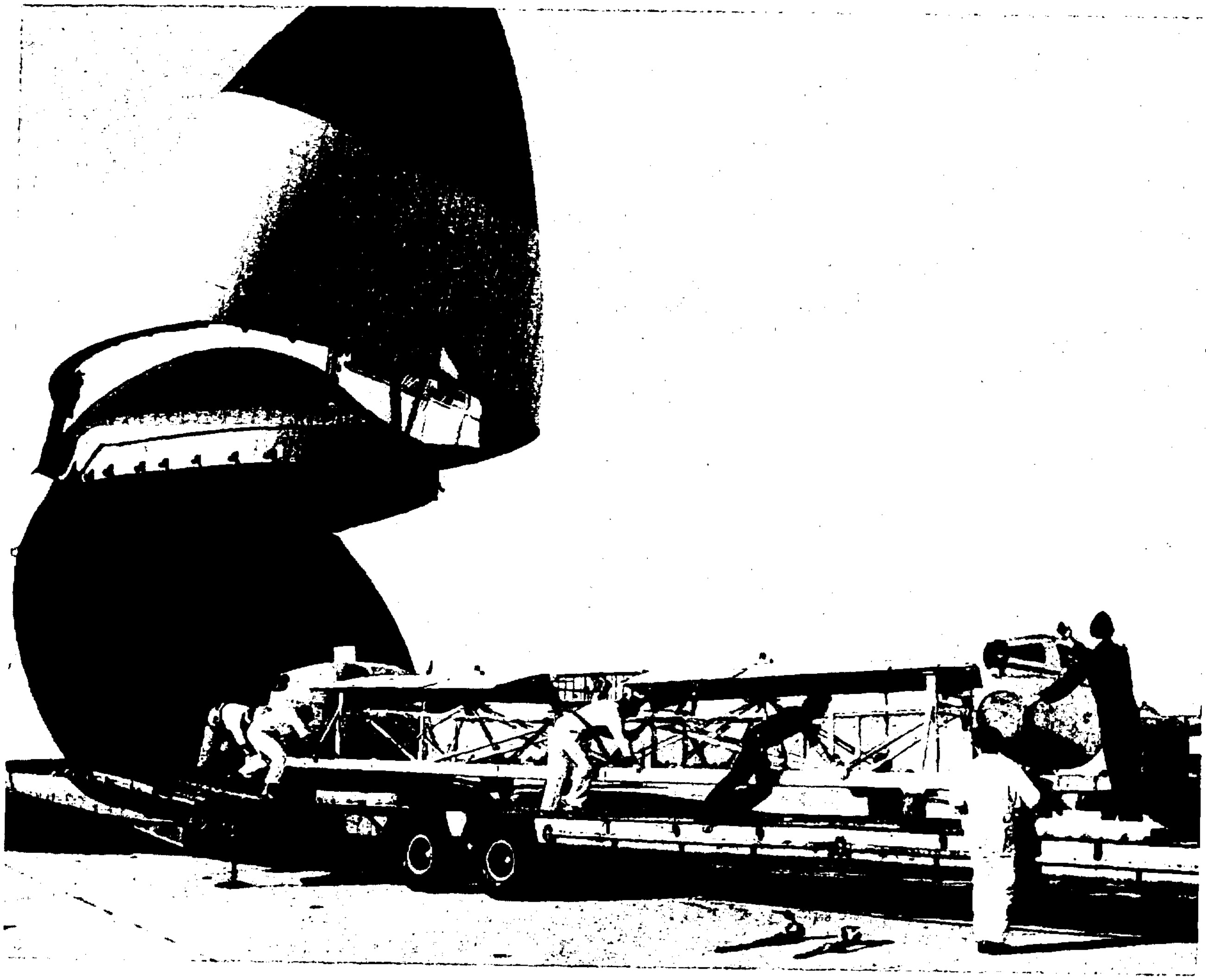
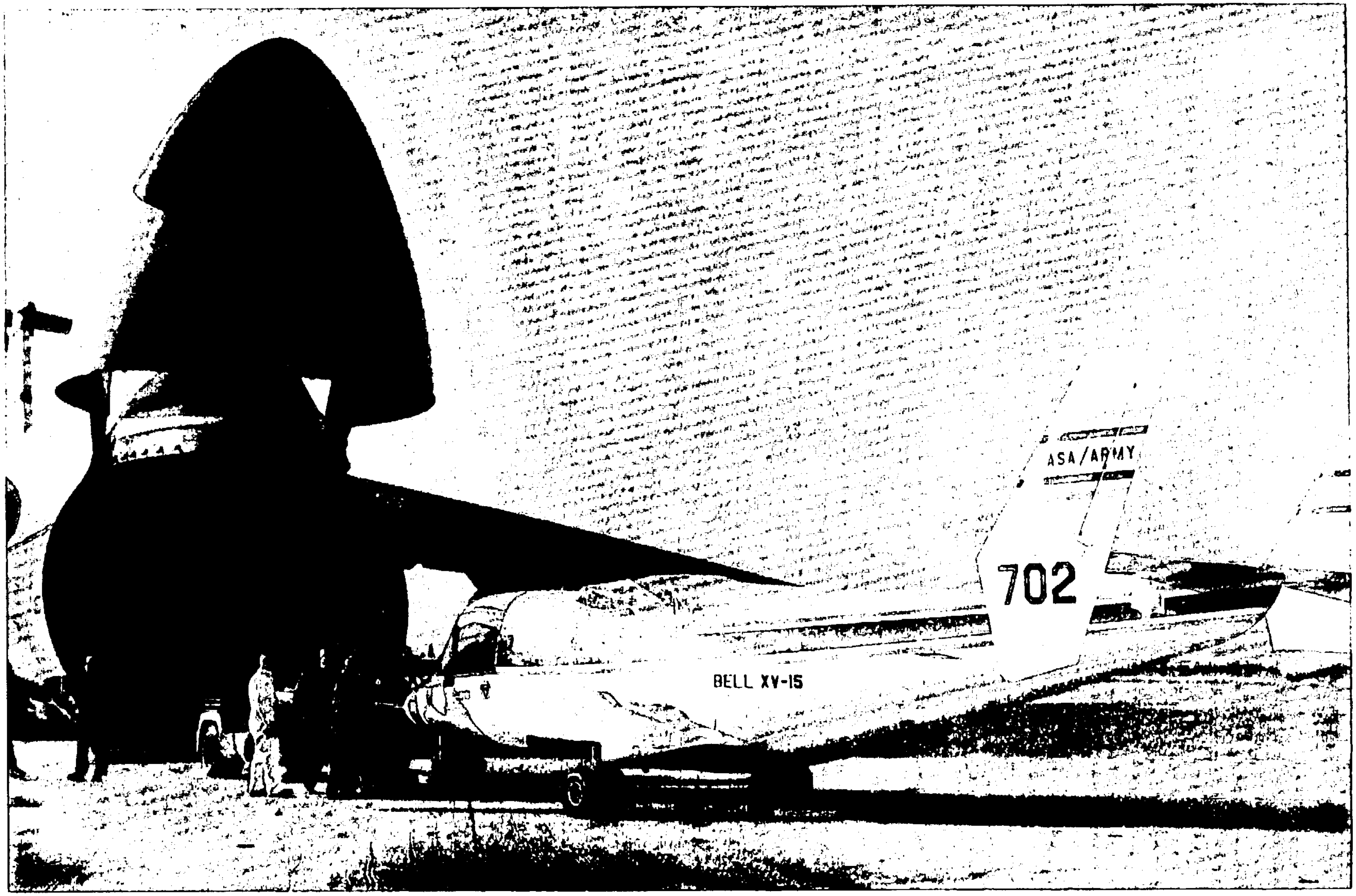


Figure 4.- Aircraft in hover flight.



(a) Wing on shipping cradle.

Figure 5.- Arrival of the aircraft at Ames.



(b) Fuselage.

Figure 5.— Concluded.

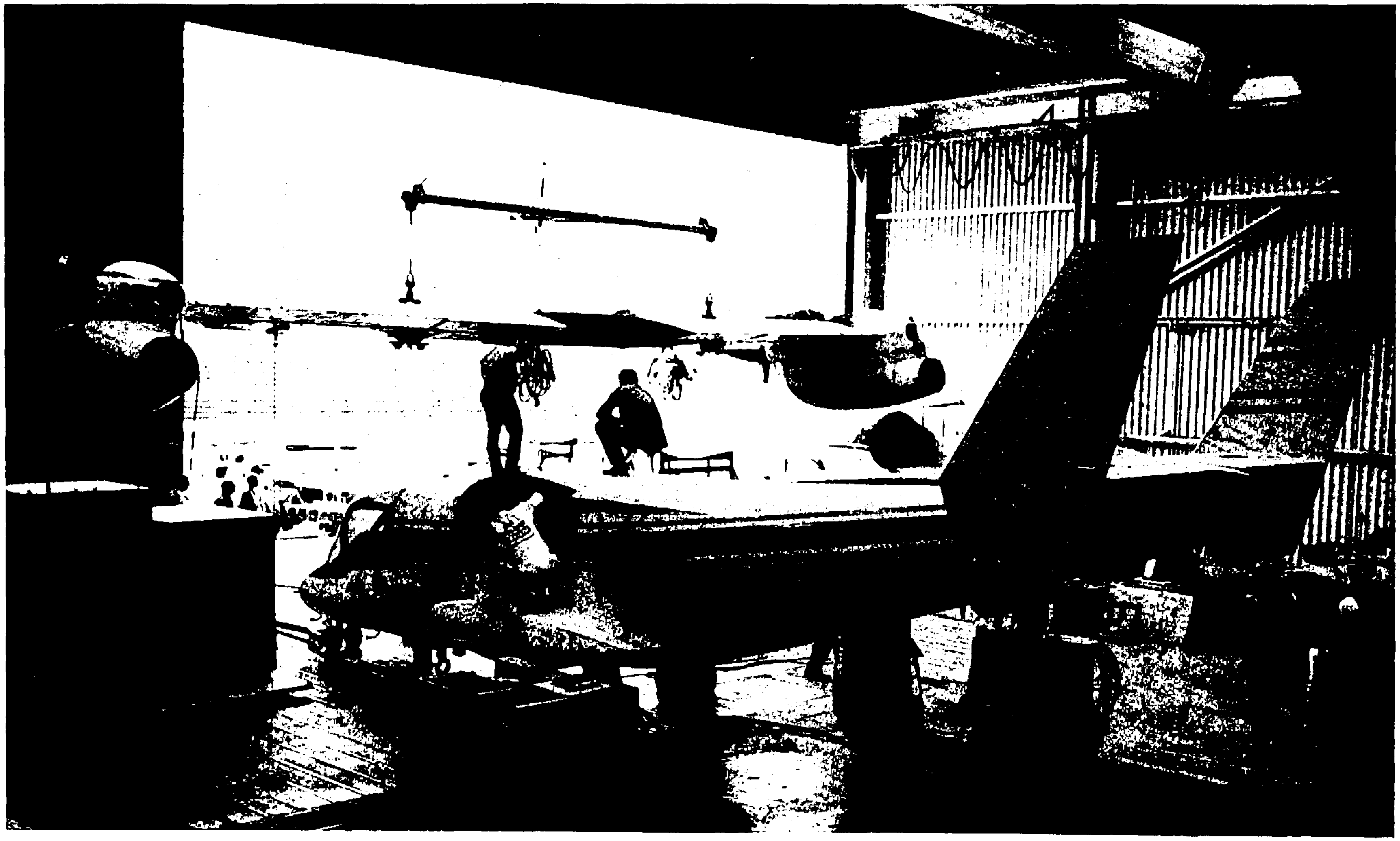


Figure 6.— Assembly of aircraft.

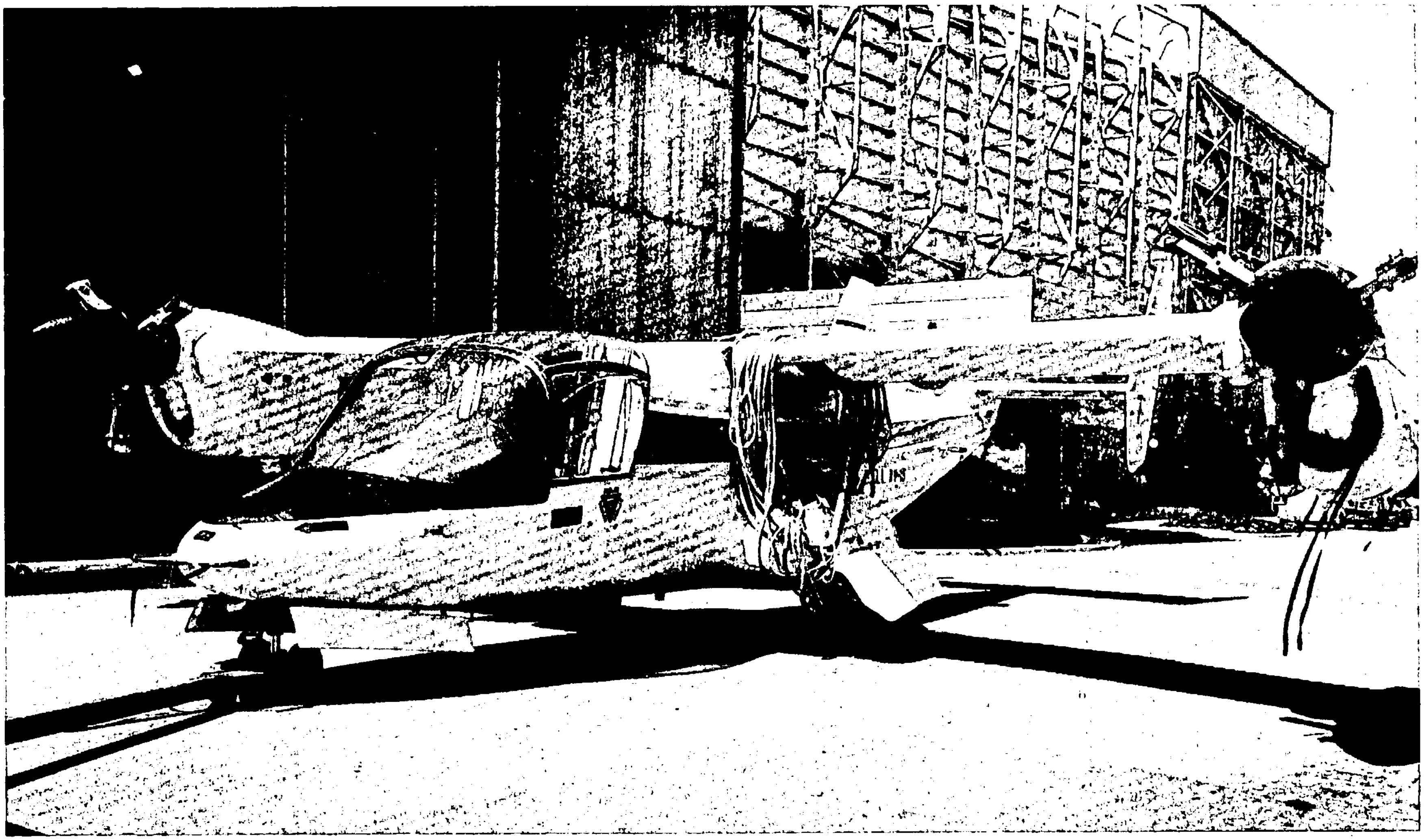


Figure 7.— Moving the aircraft to the tunnel.

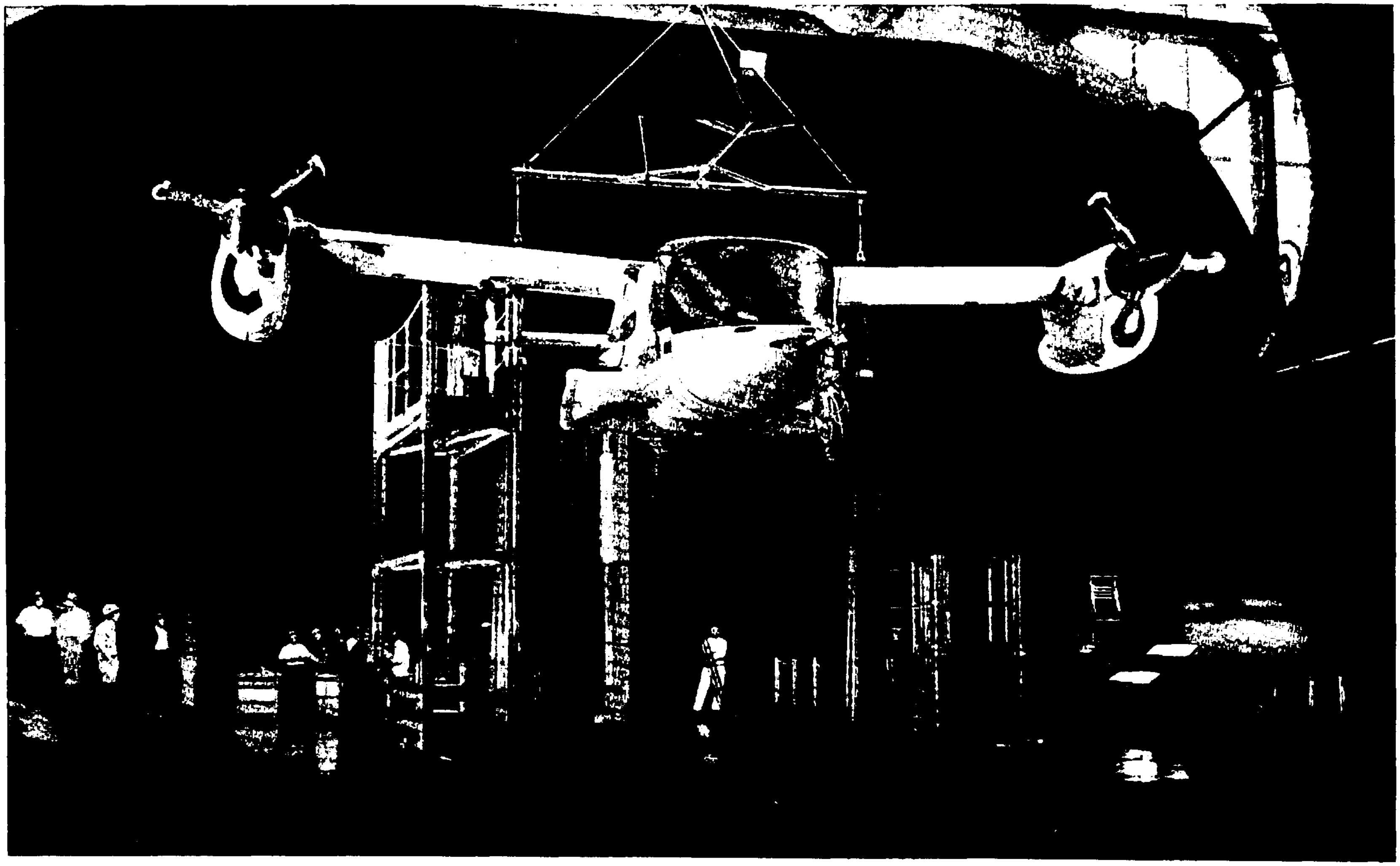


Figure 8.— Installing aircraft on the support struts.

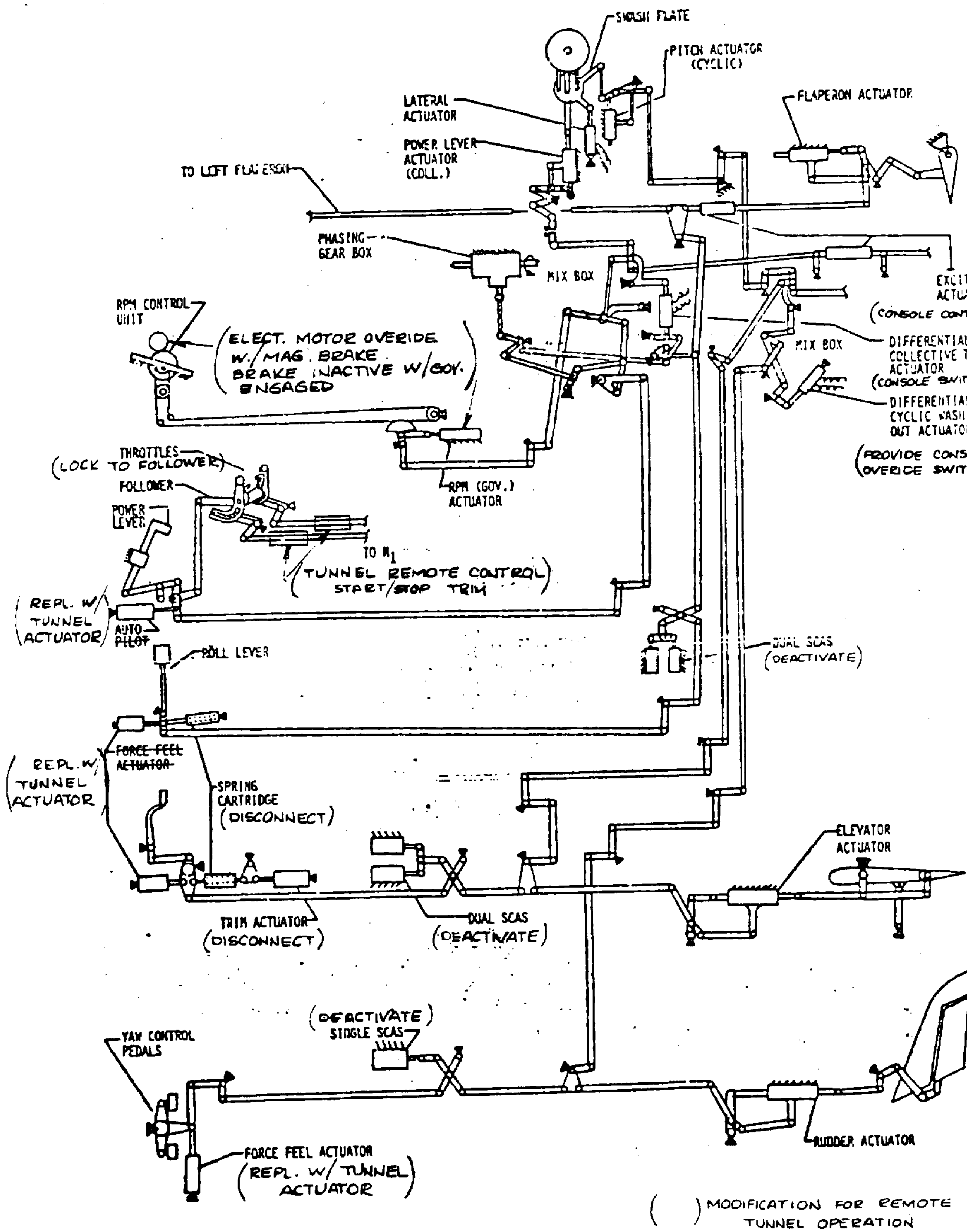


Figure 9.— Control system for remote operation.

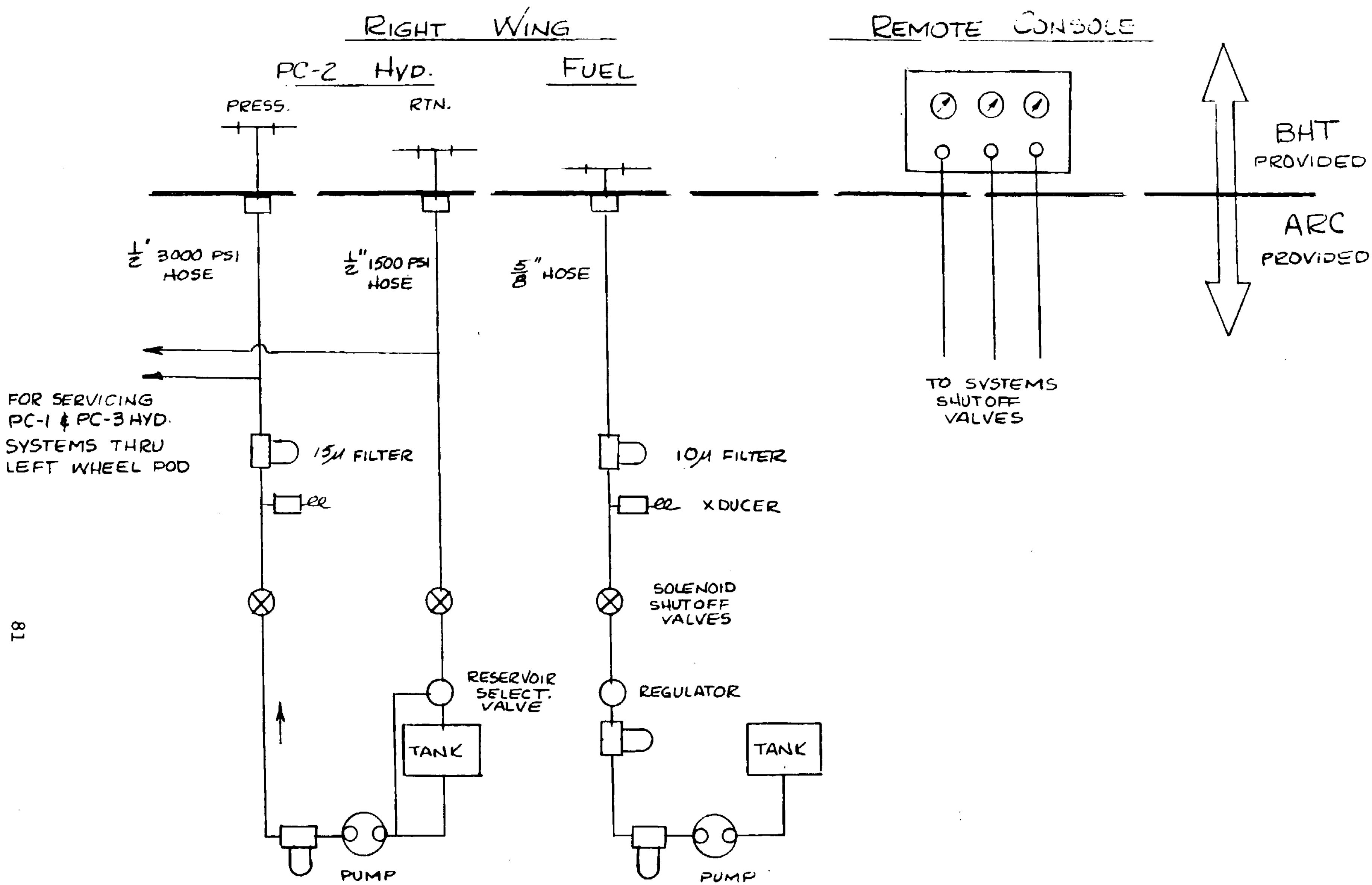


Figure 10.- Aircraft/wind-tunnel interface, hydraulic & fuel systems.

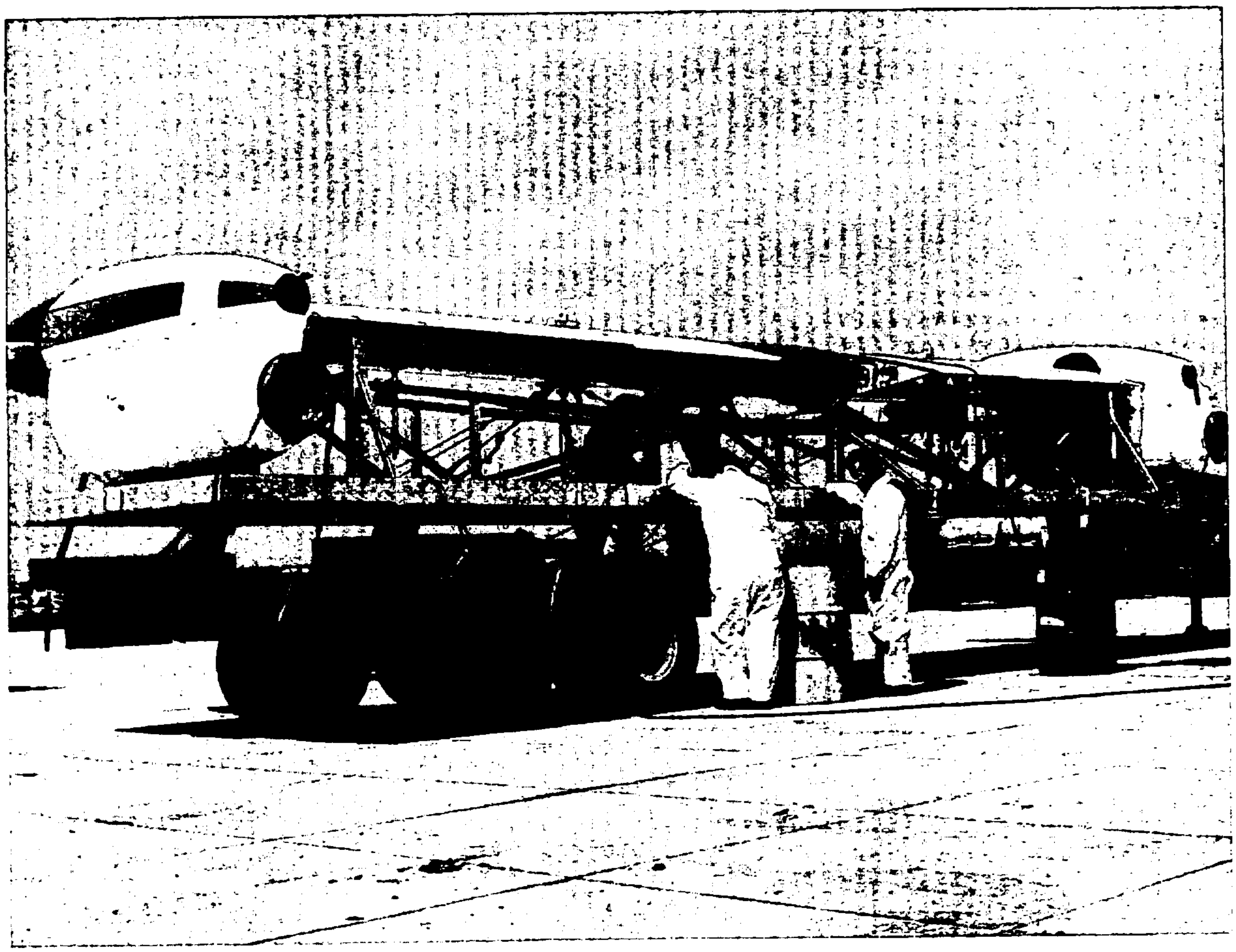
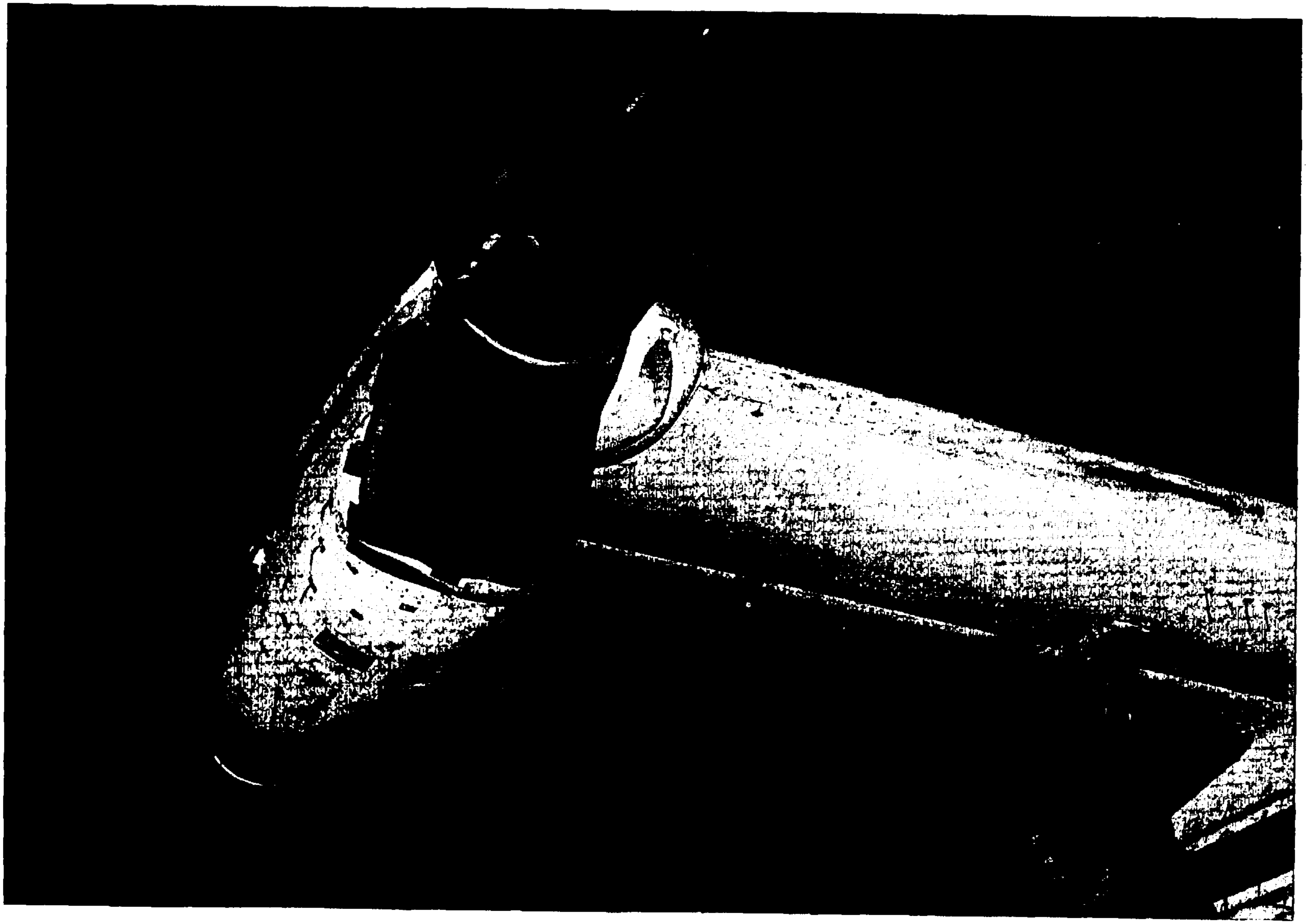
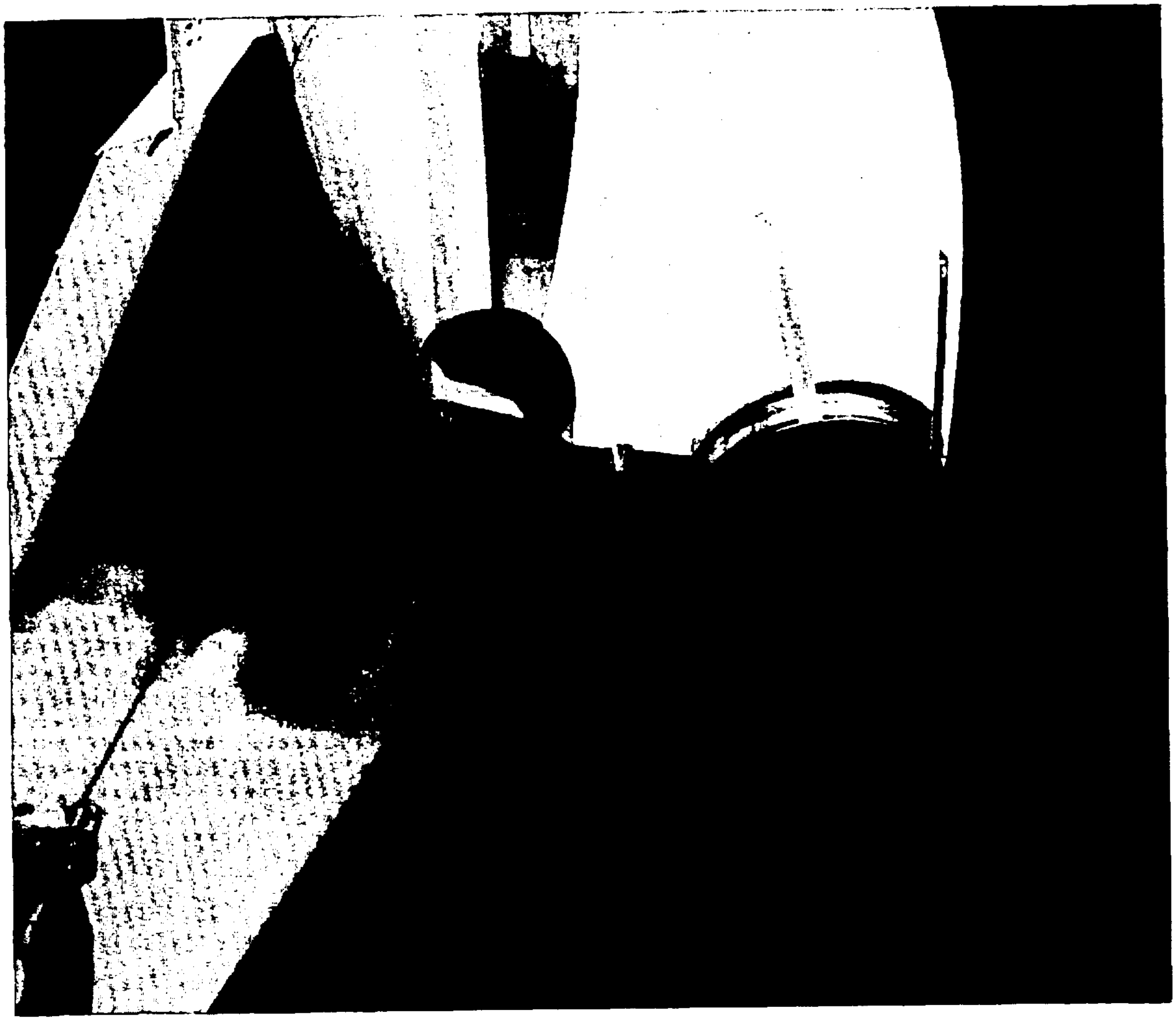


Figure 11.- Purging fuel from tanks.



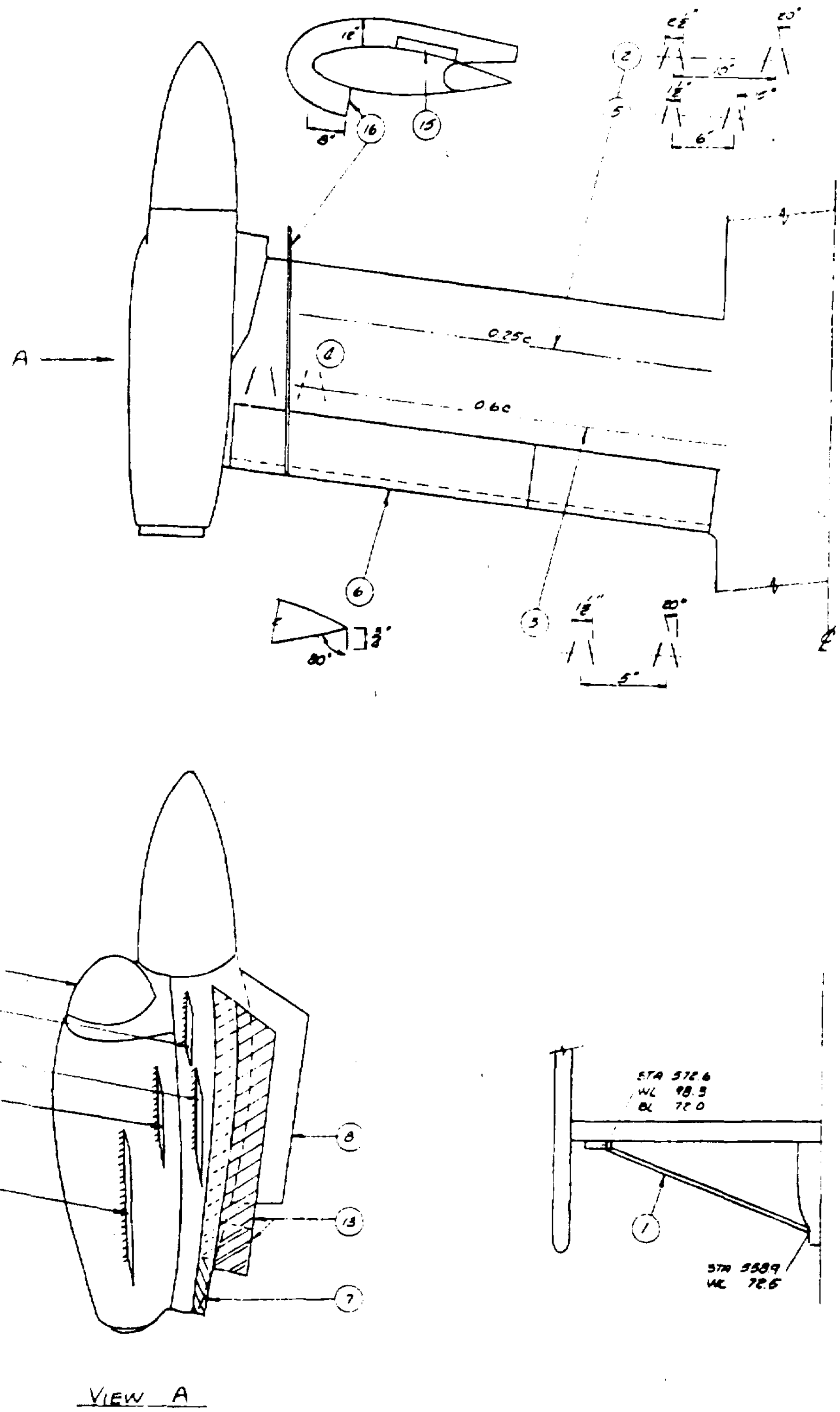
(a) Inlet.

Figure 12.— Engine airflow seals for power-off operation.



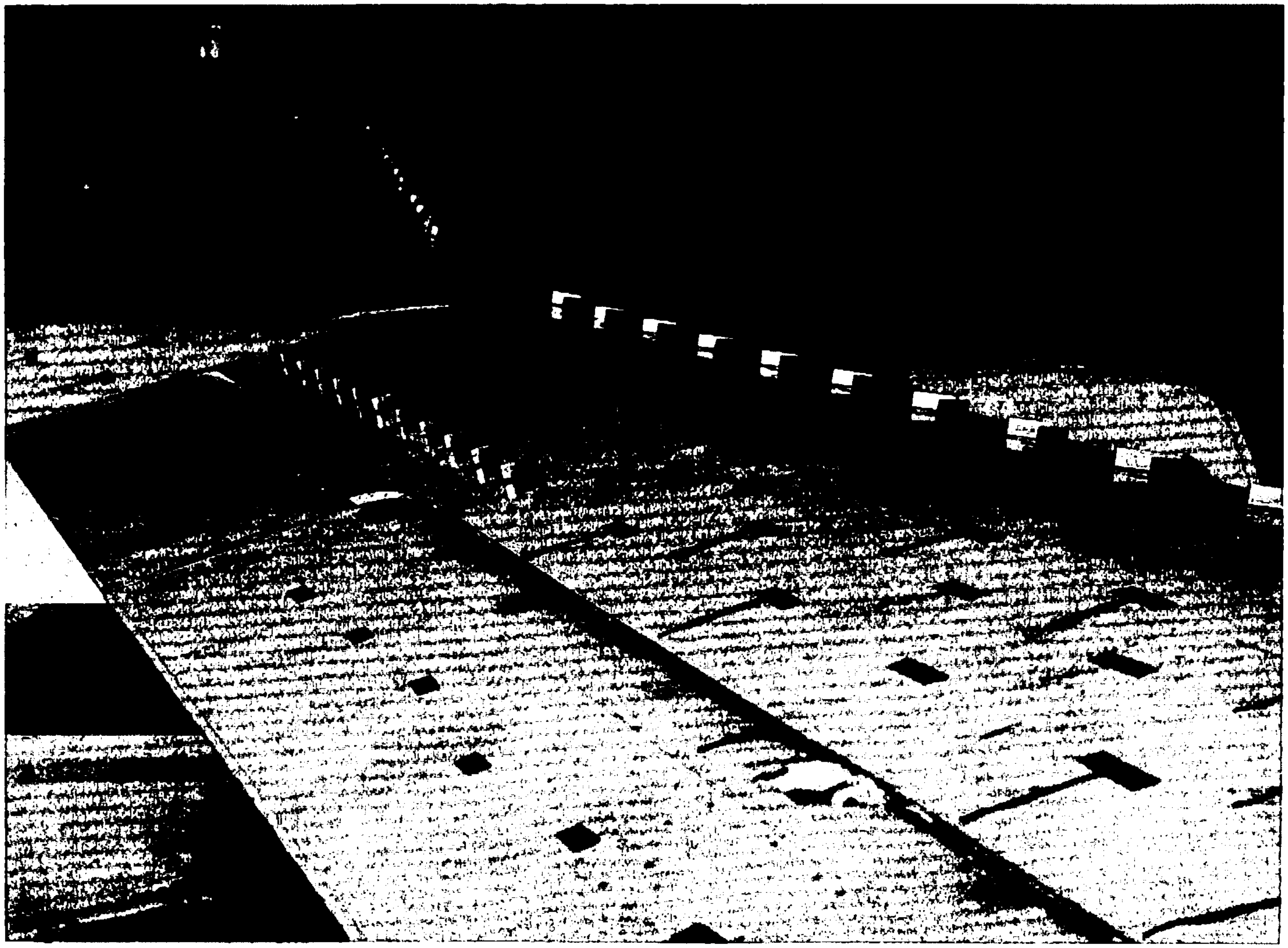
(b) Tail pipe.

Figure 12.- Concluded



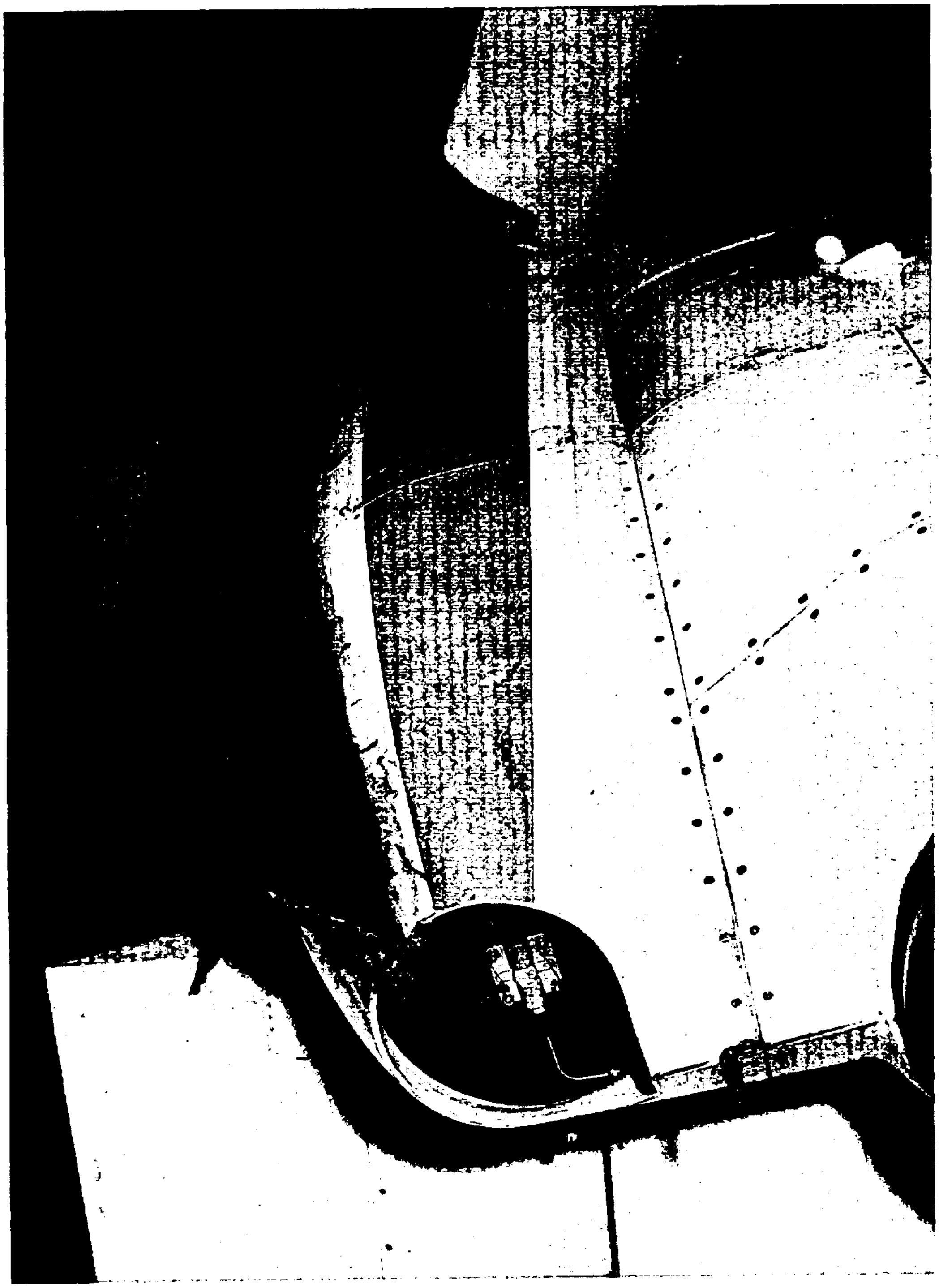
(a) Geometry (ref. Table II).

Figure 13.- Aircraft configuration modifications.



(b) Vortex generators.

Figure 13.- Continued

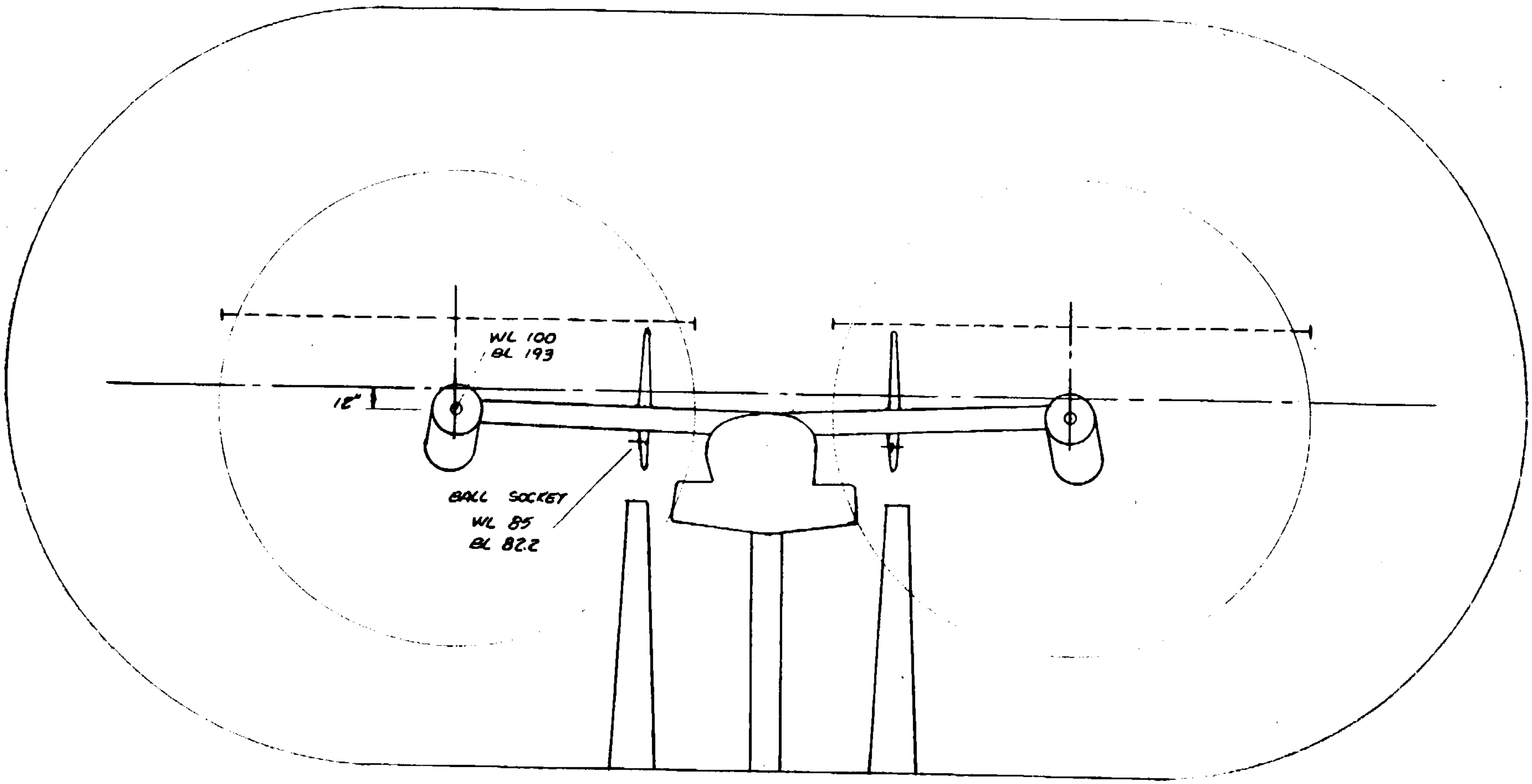


(c) Fence 7.

Figure 13.— Continued.

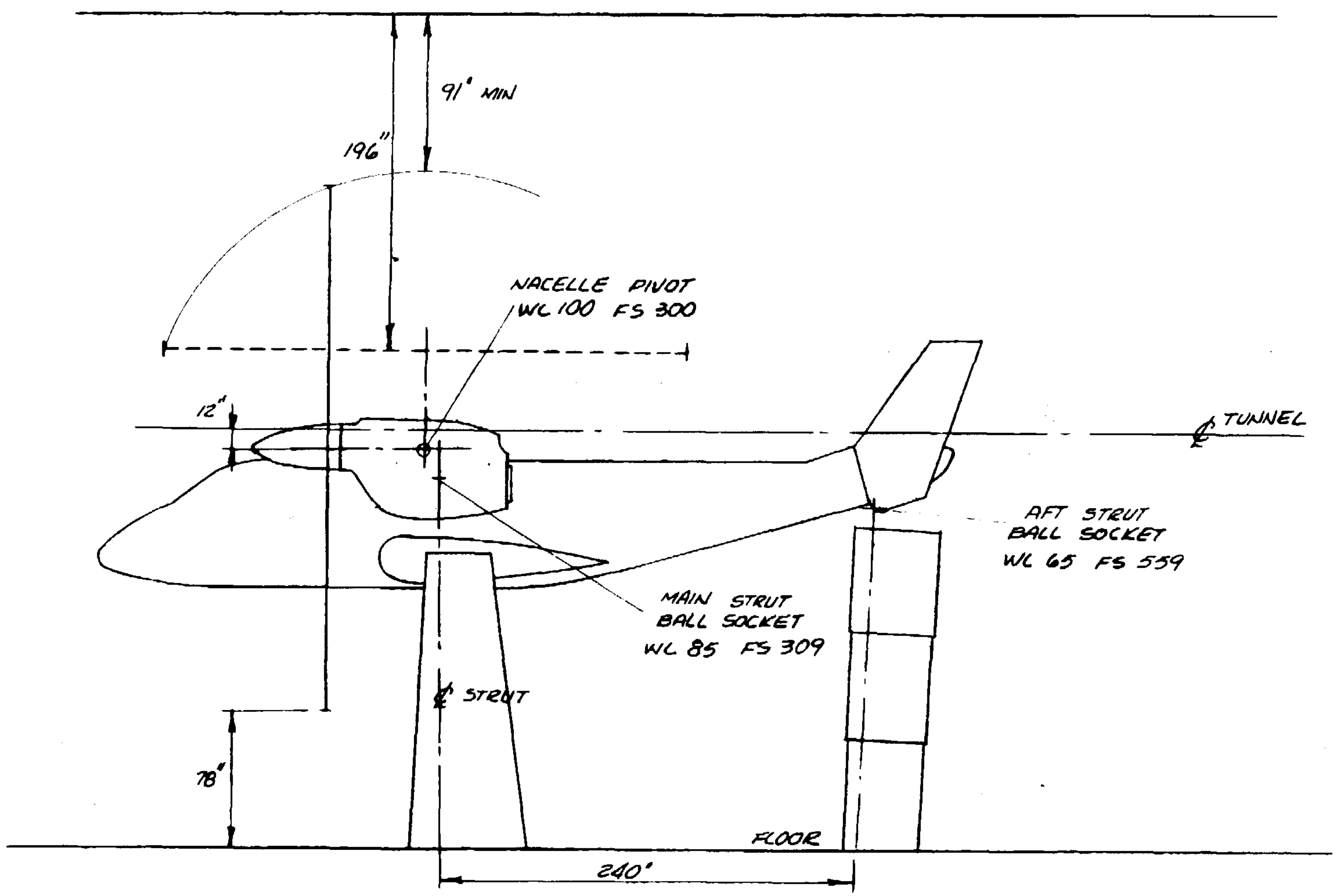
(d) Horizontal tail struts.

Figure 13.- Concluded.



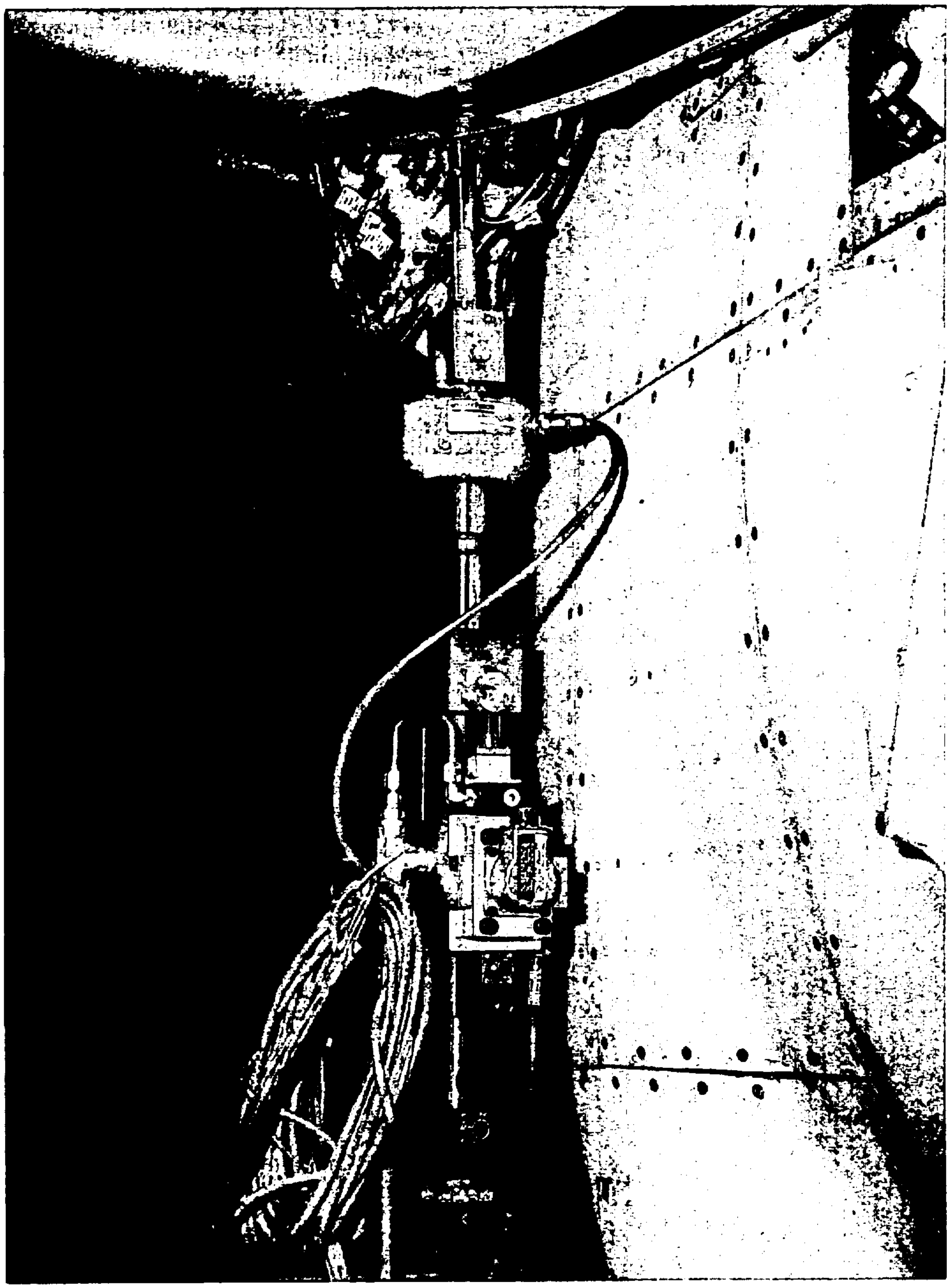
(a) Front view.

Figure 14.— The XV-15 in the 40- by 80-foot wind tunnel.



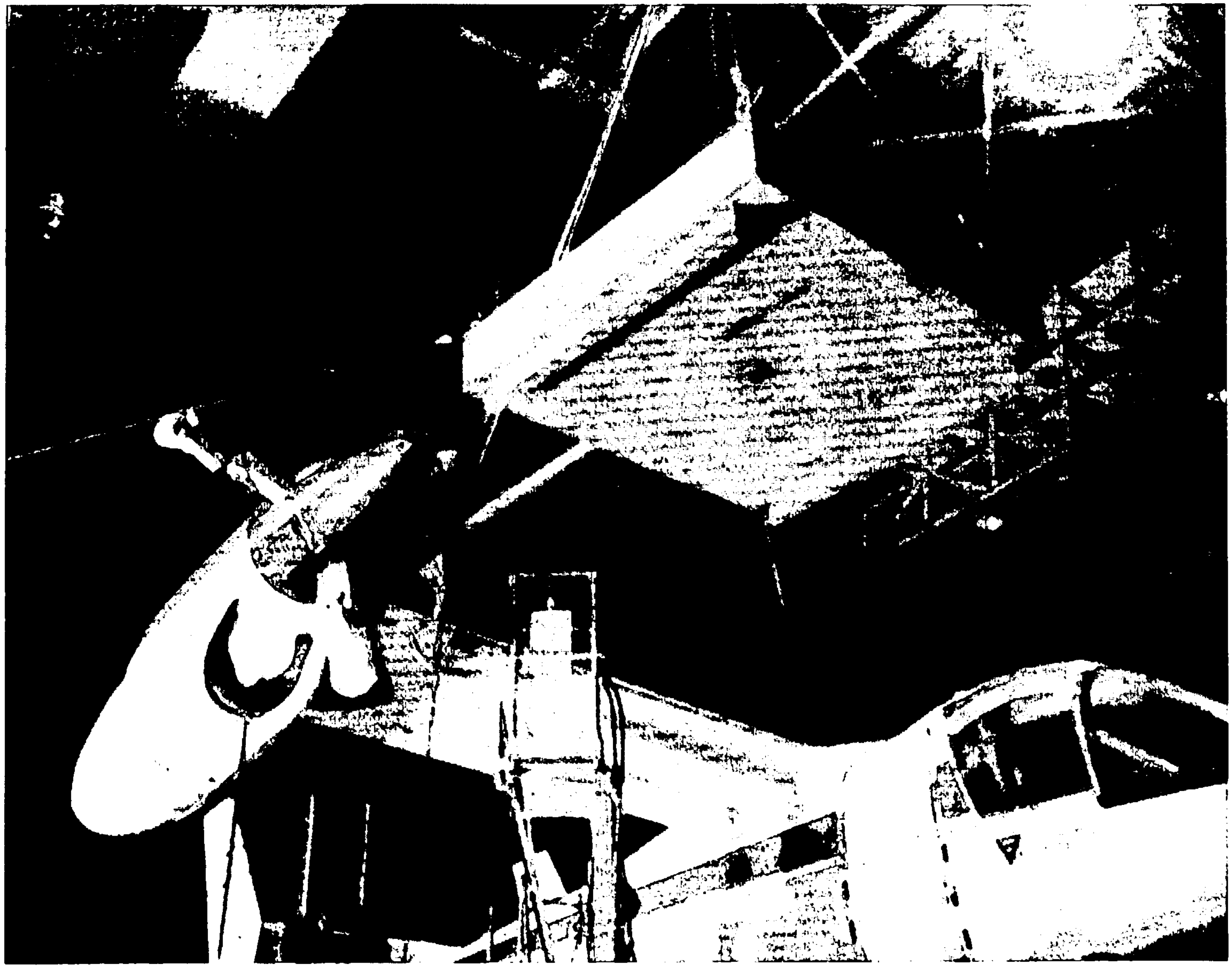
(b) Side view.

Figure 14.– Concluded.



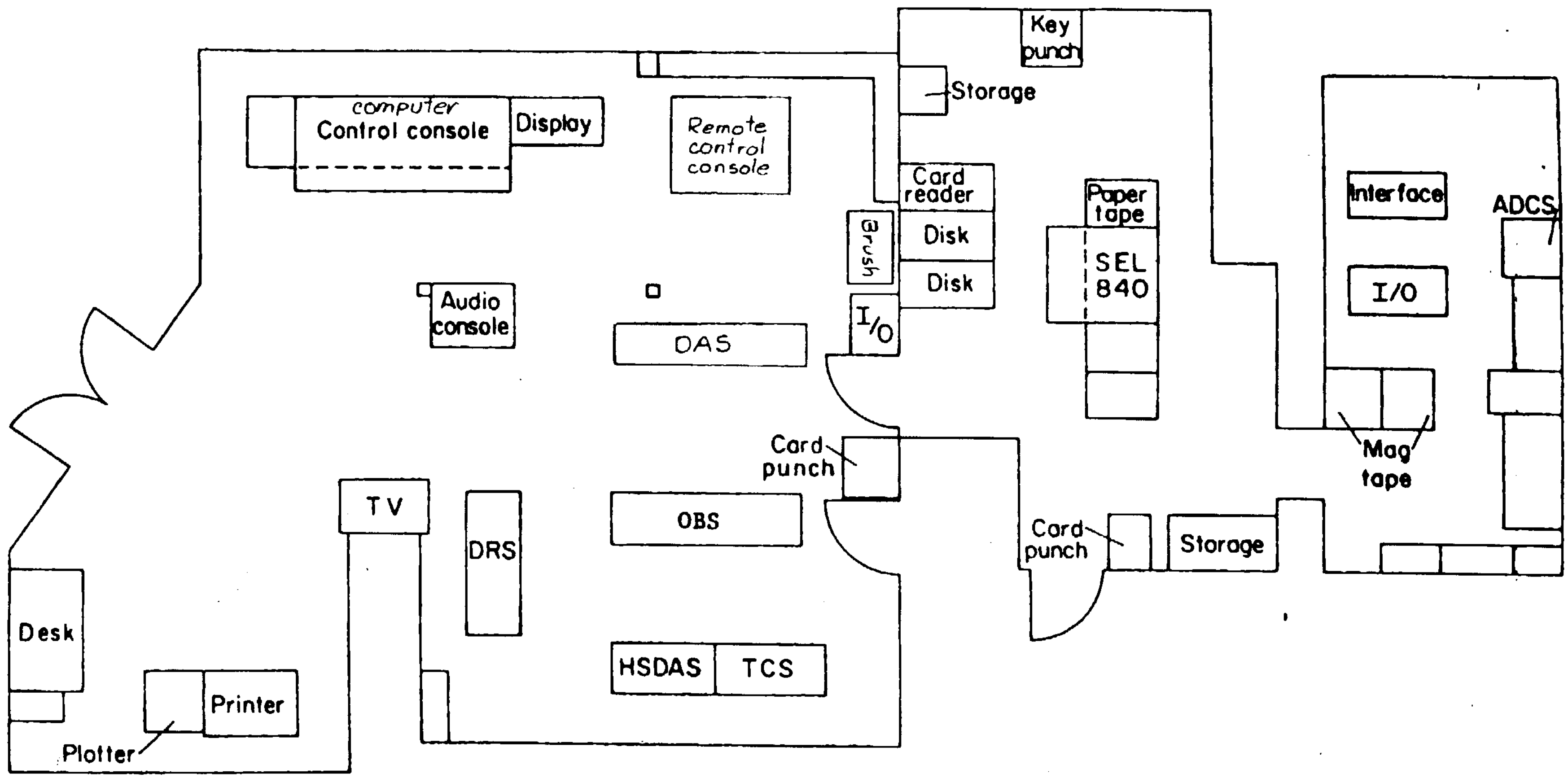
(a) Vertical.

Figure 15.— Shaker installation.



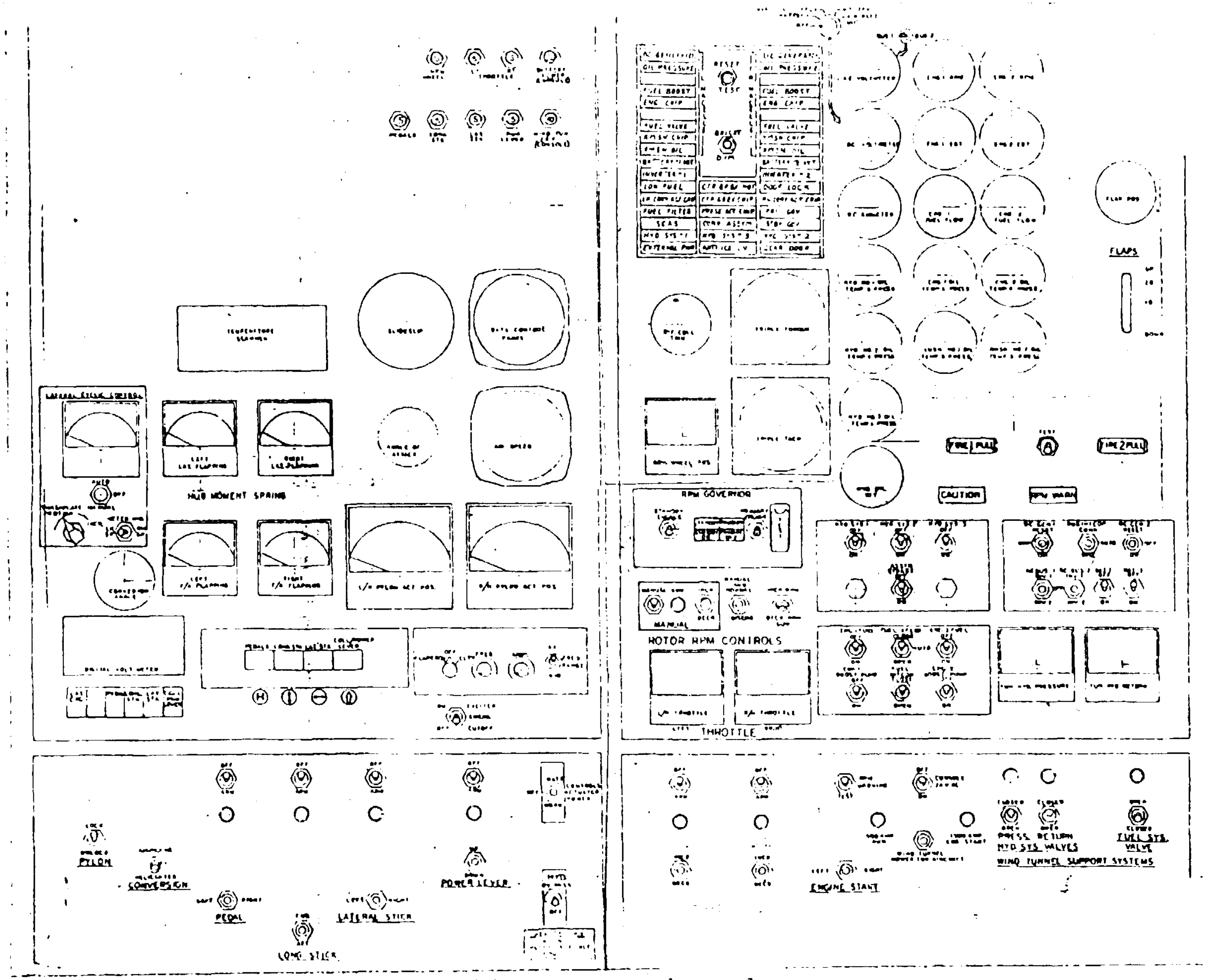
(b) Horizontal.

Figure 15.- Concluded.



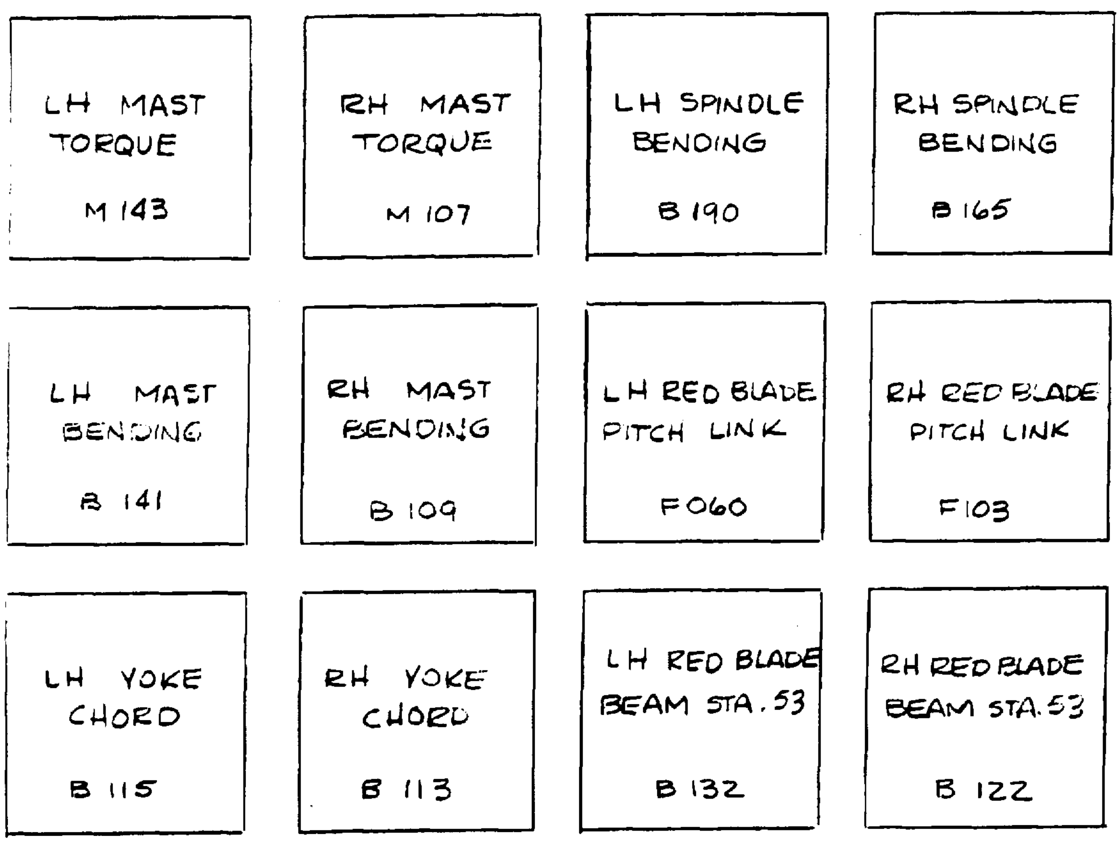
(a) Layout of control room.

Figure 16.— Remote operation of aircraft in the tunnel.



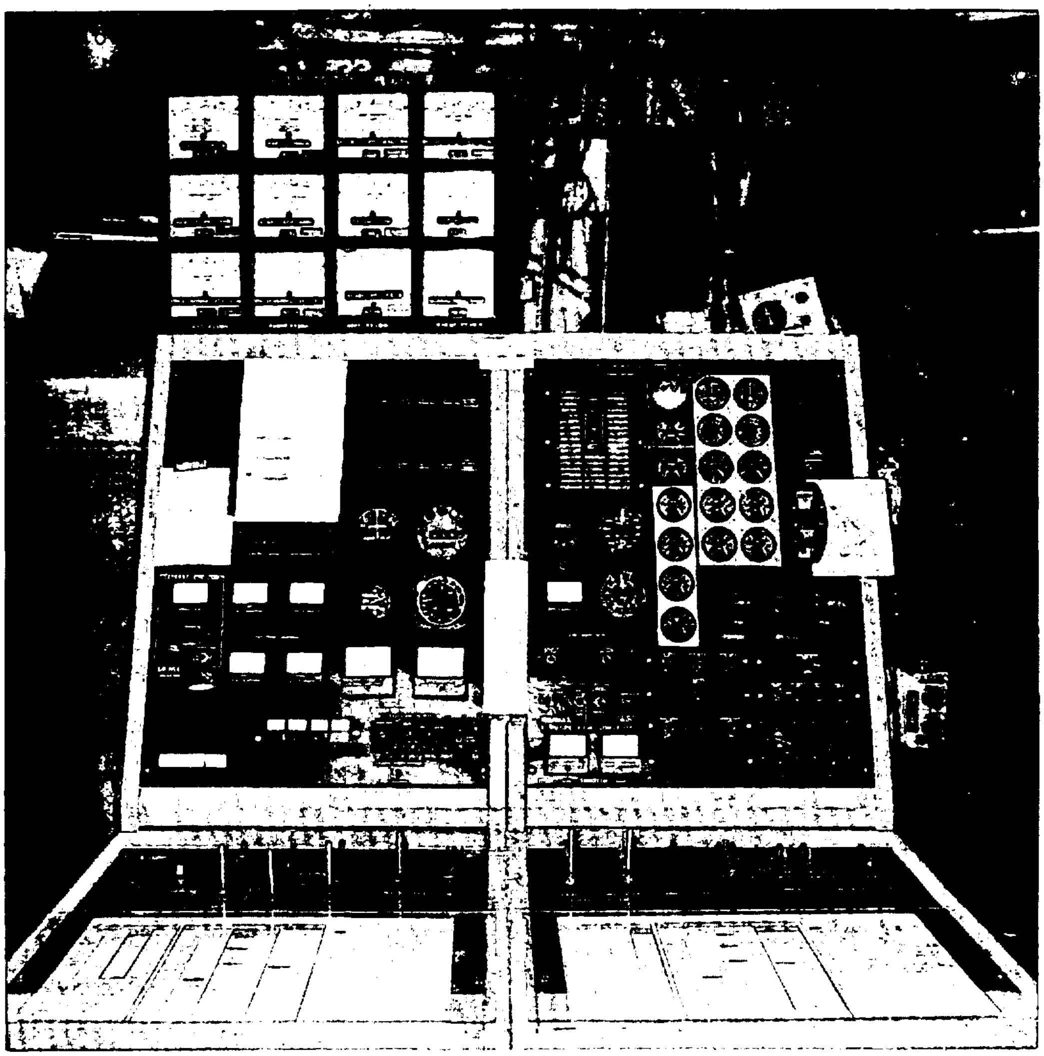
(b) Remote control console.

Figure 16.– Continued.



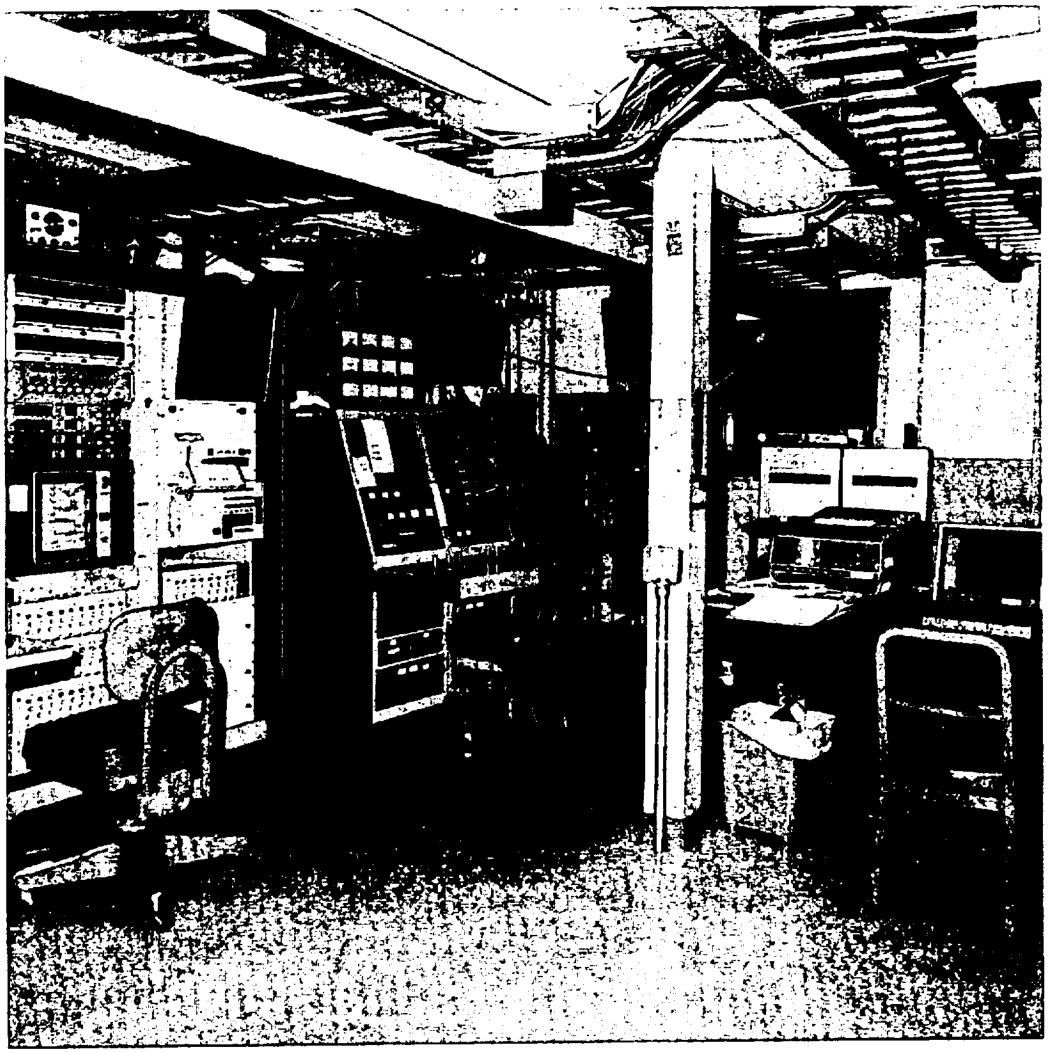
(c) Loads panel on console.

Figure 16.— Continued.



(d) Remote control console.

Figure 16.- Continued.



(e) Control room.

Figure 16.- Continued.

(f) Control room during test operations.

Figure 16.— Concluded.

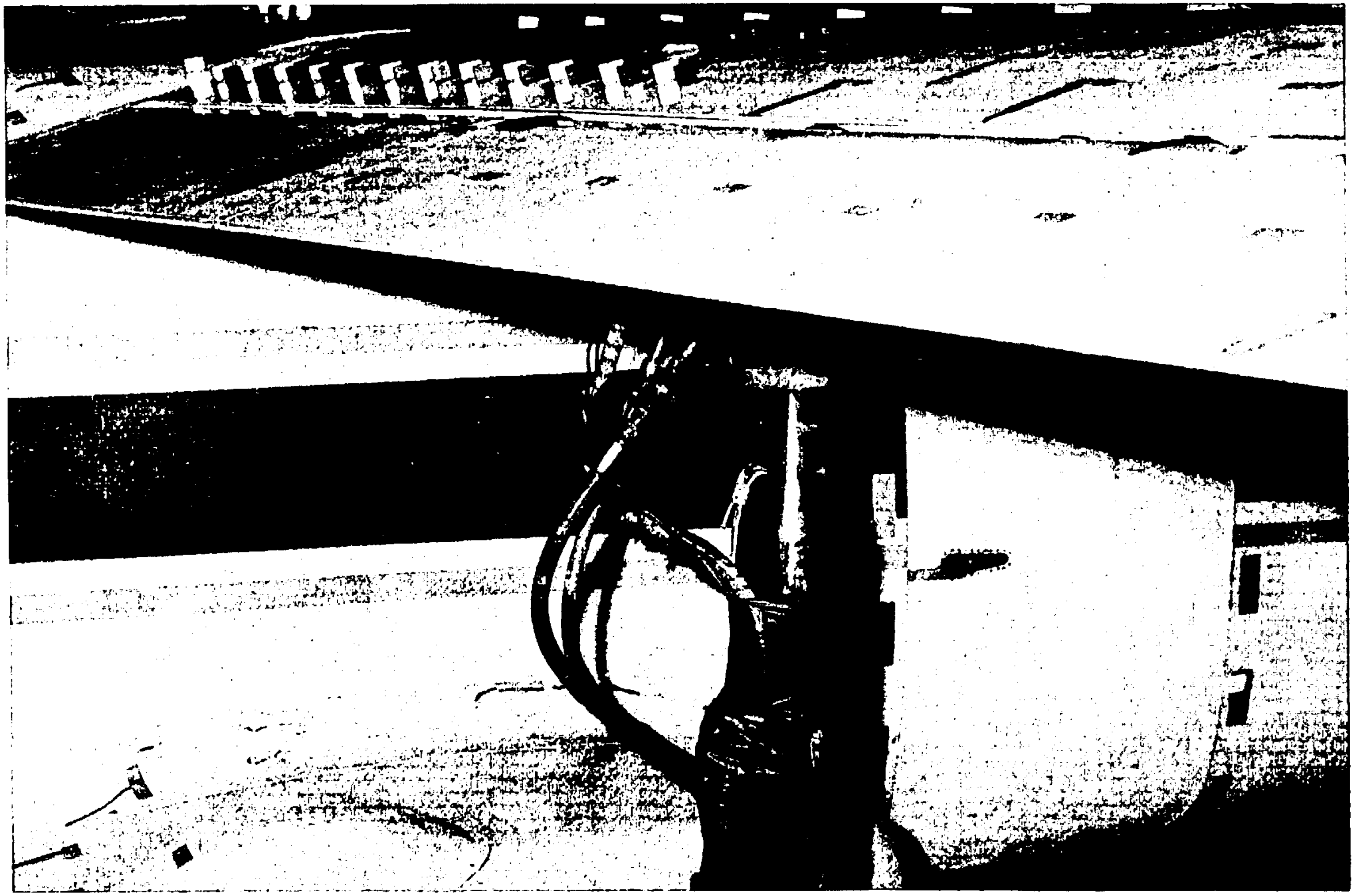


Figure 17.— Right-hand support strut.

Figure 18.— Left-hand support strut.

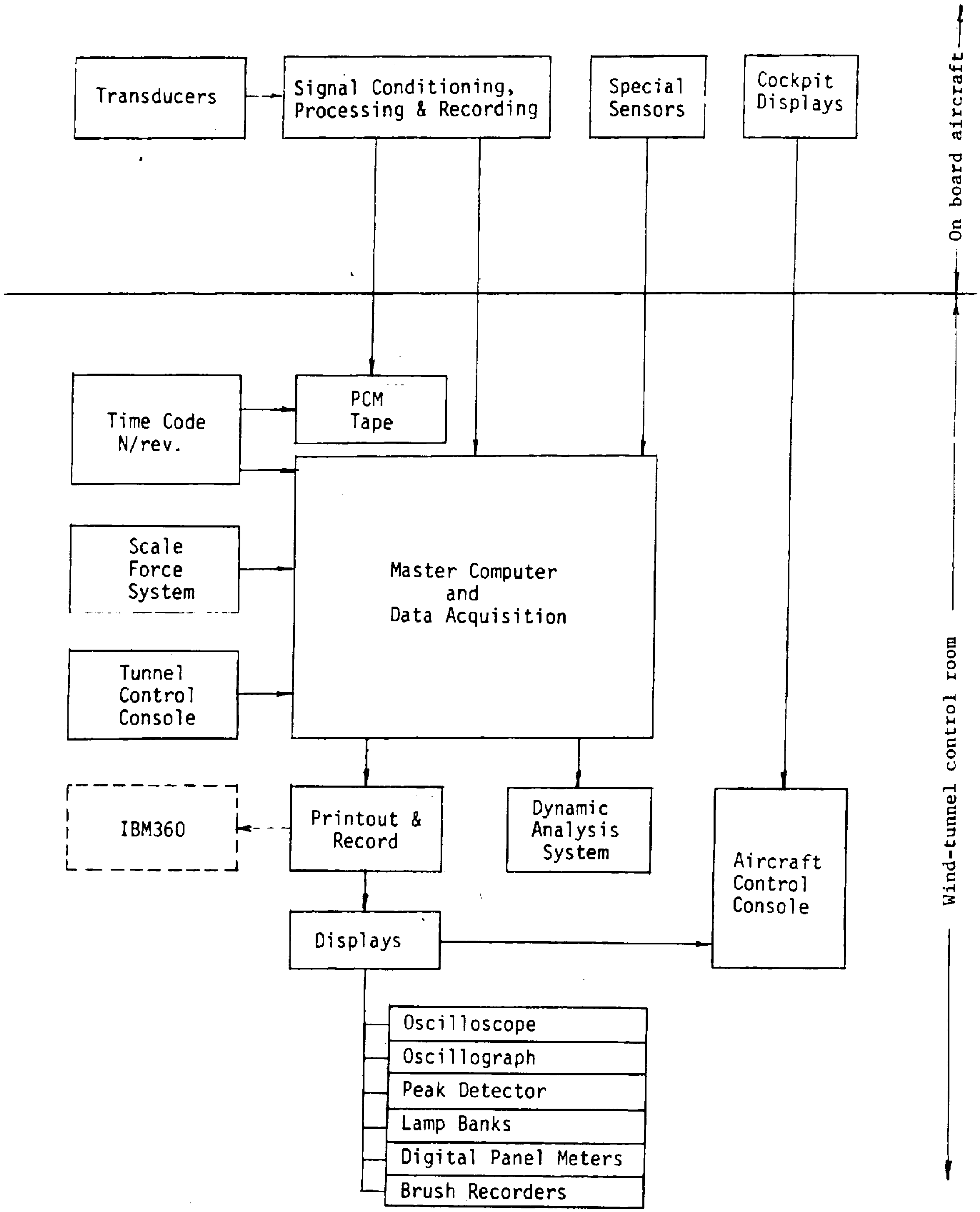


Figure 19.— Data system block diagram.

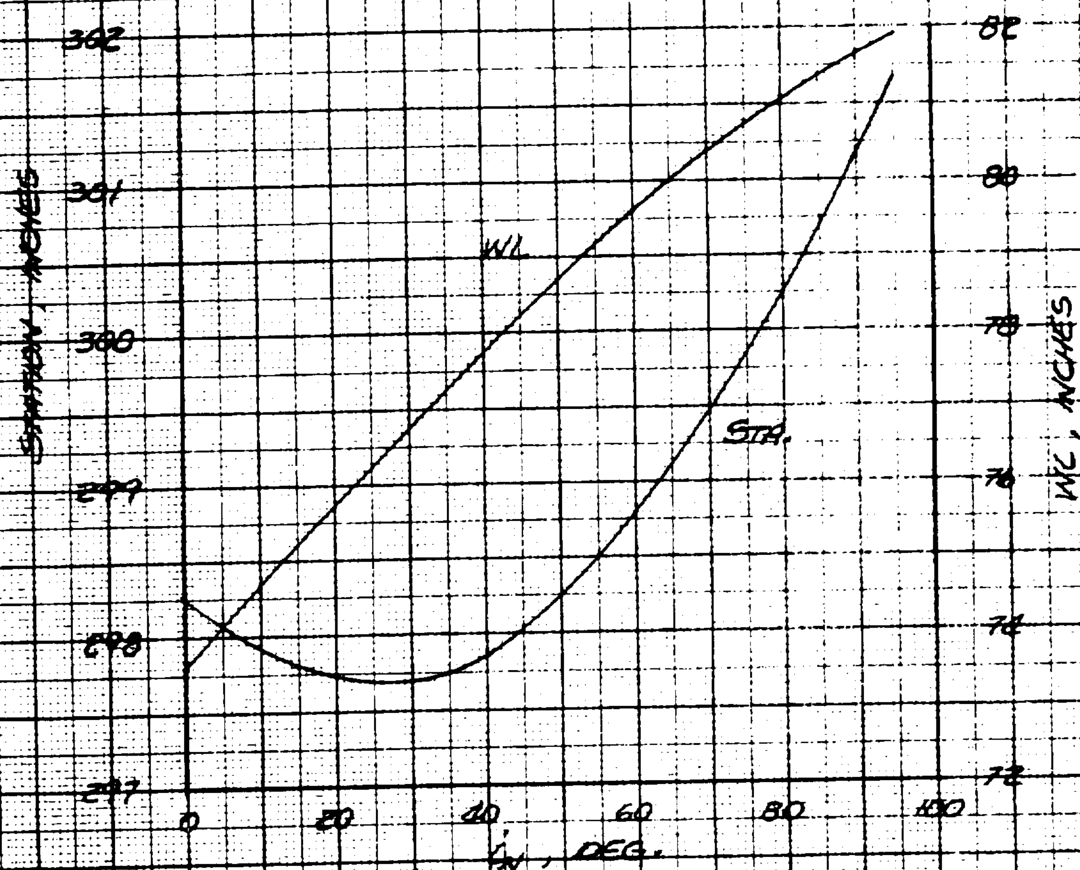


FIGURE 20. - MOMENT CENTER VARIATION WITH NACELLE TILT.

RUN 20 SEQ 19 06-JUN 09:46:20

ALPH	-8.00	MTL	6.209E+04
PSI	0.000	MTR	6.258E+04
I N	90.0		
		HPL	556.
VKTS	79.7	HPR	560.
RPM	564.		
VOR	0.182	N/6	-4.696E+03
TEMP	88.0	R/6	304
		Y/6	-43.7
COLL	23.1		
LAT	50.6	L/6	1.408E+04
LONG	69.6	D/Q	6.49
PED	40.6	M/6	-4.028E+03

XV-15 TEST 525

Figure 21. Data display on CRT in control room.

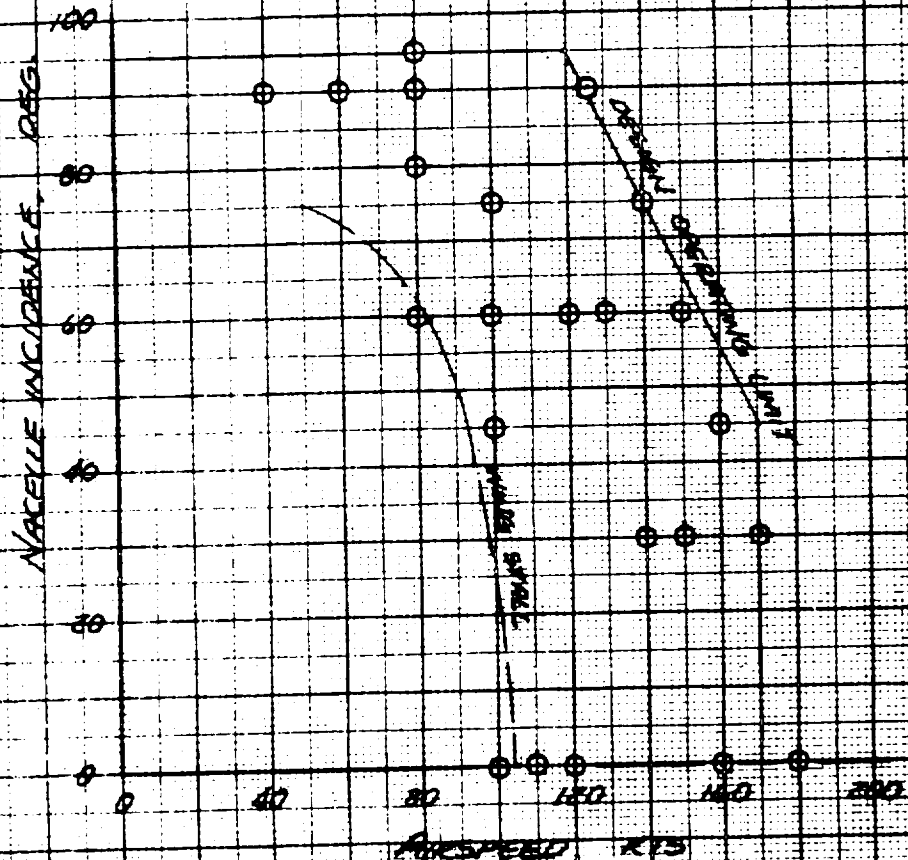
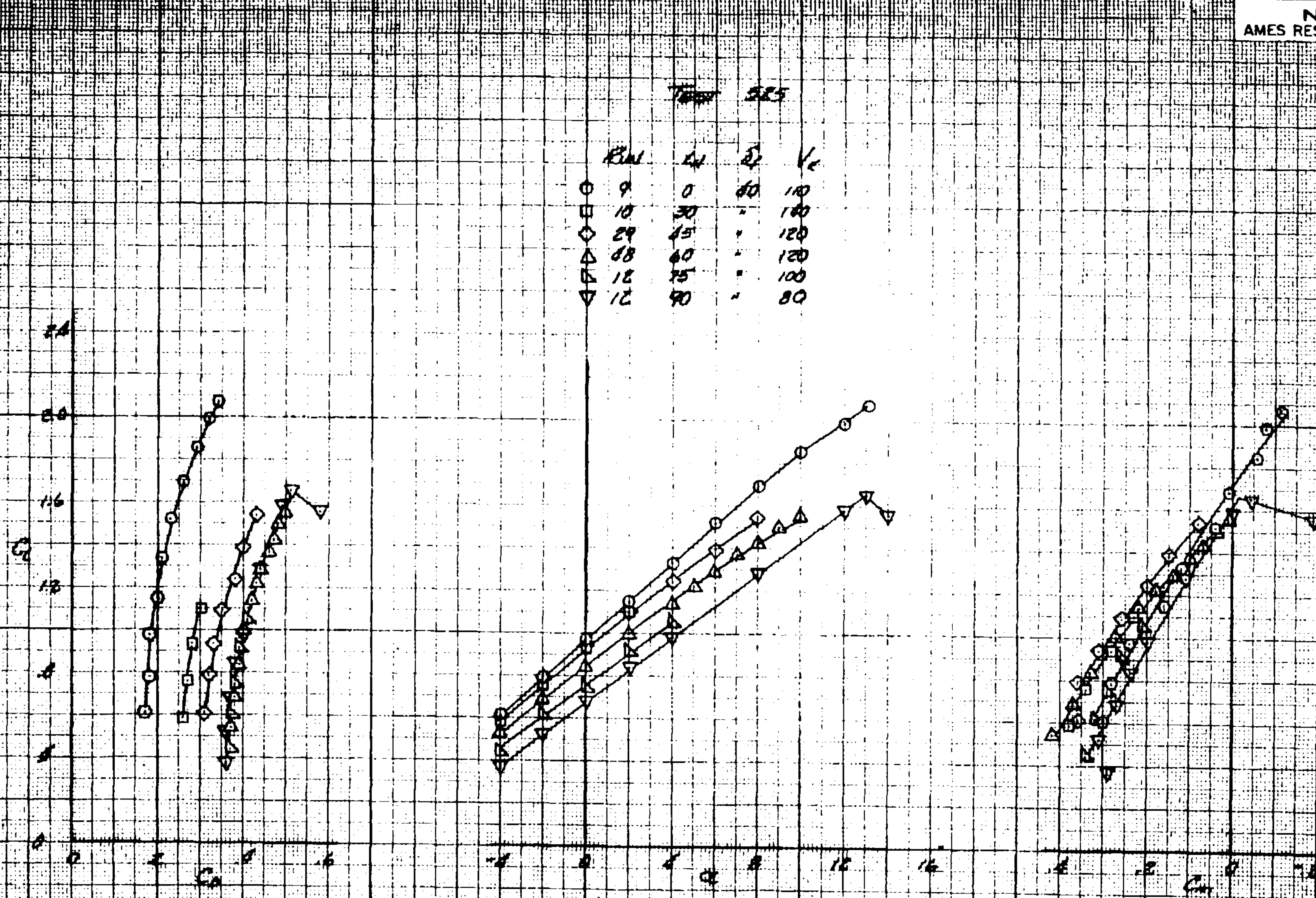
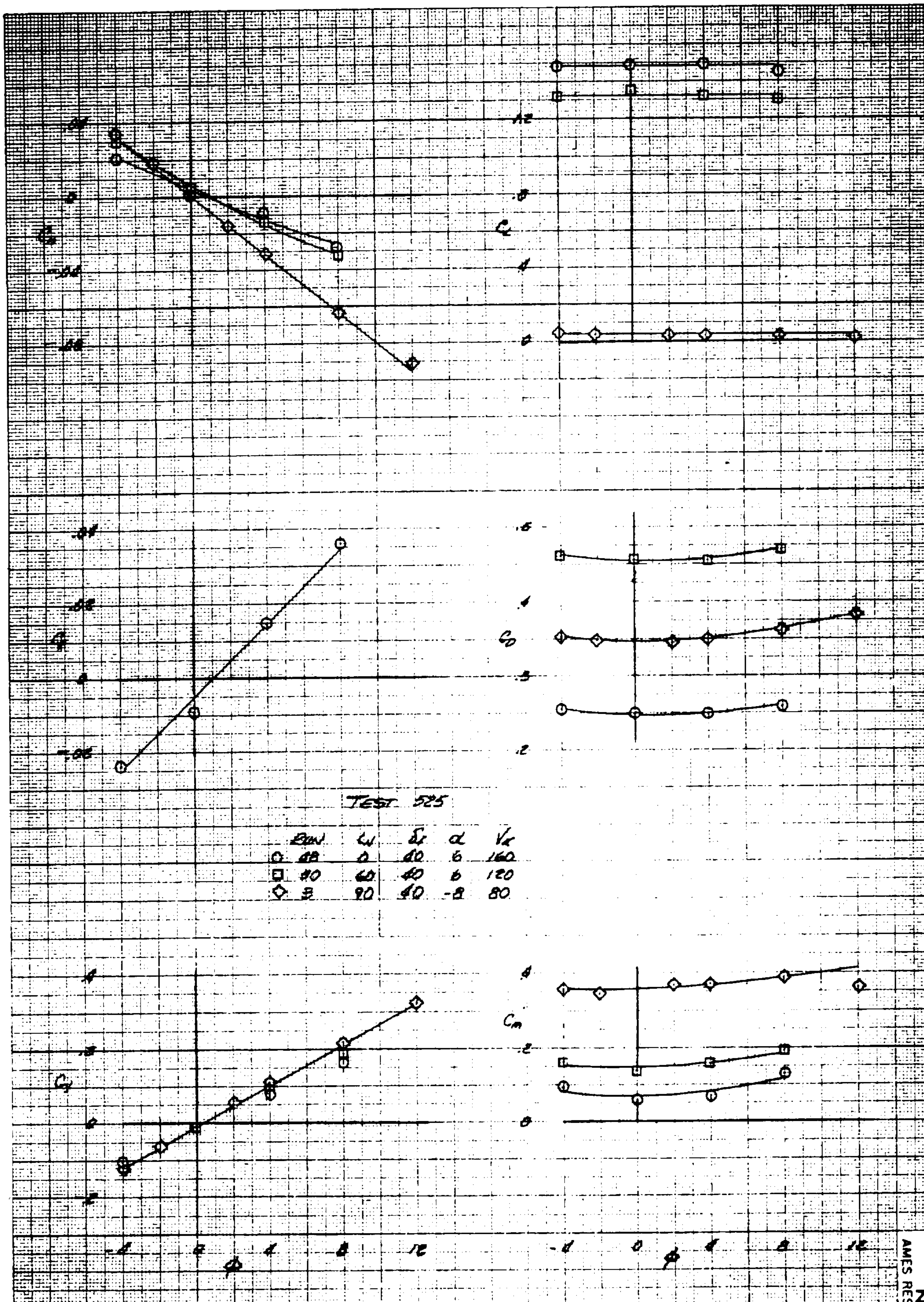


FIGURE 22. - CONVERSION CORRIDOR TEST POINTS.



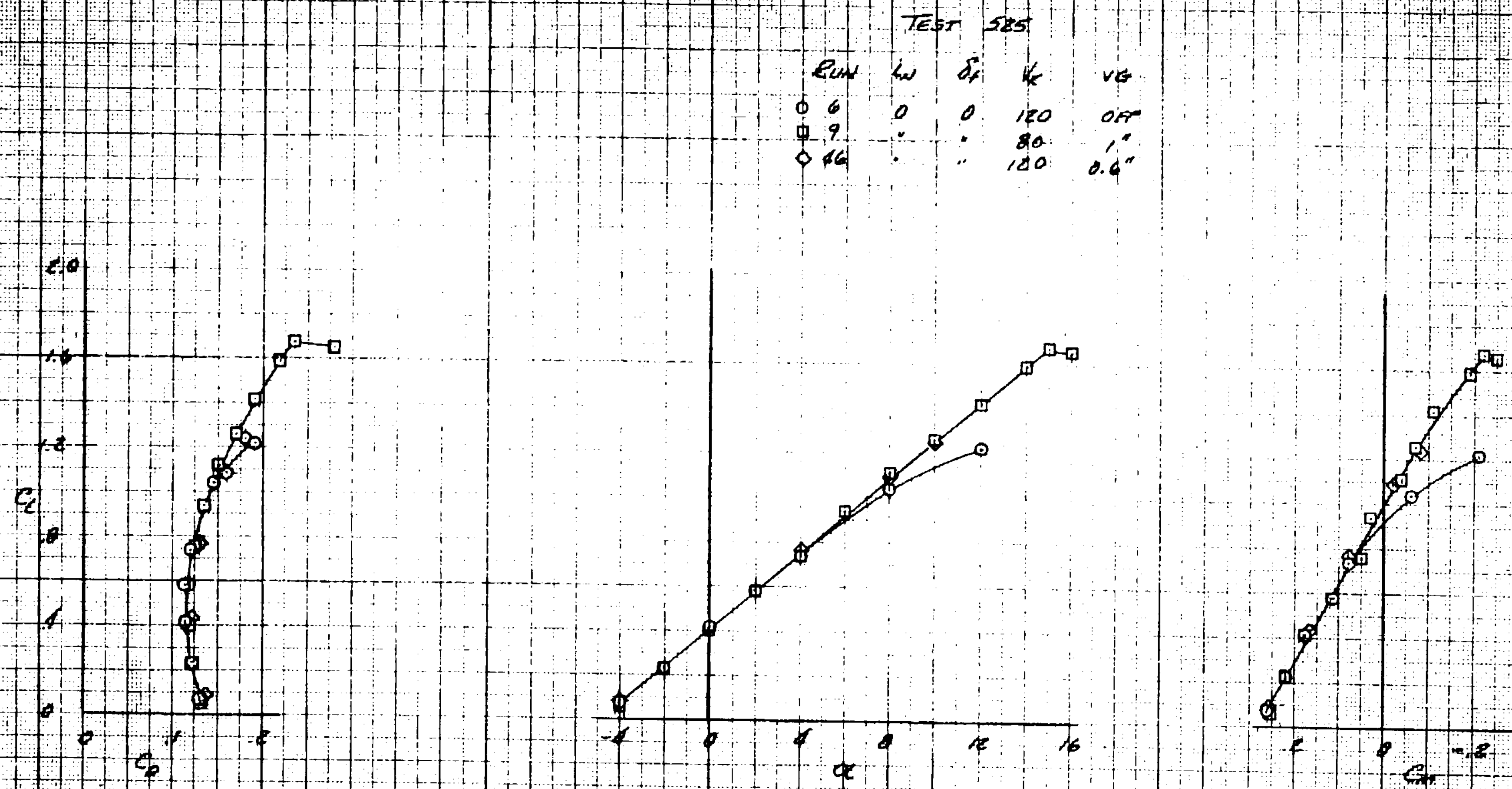
(a) Longitudinal characteristics.

Figure 23.- Effect of nacelle incidence, rotors off.



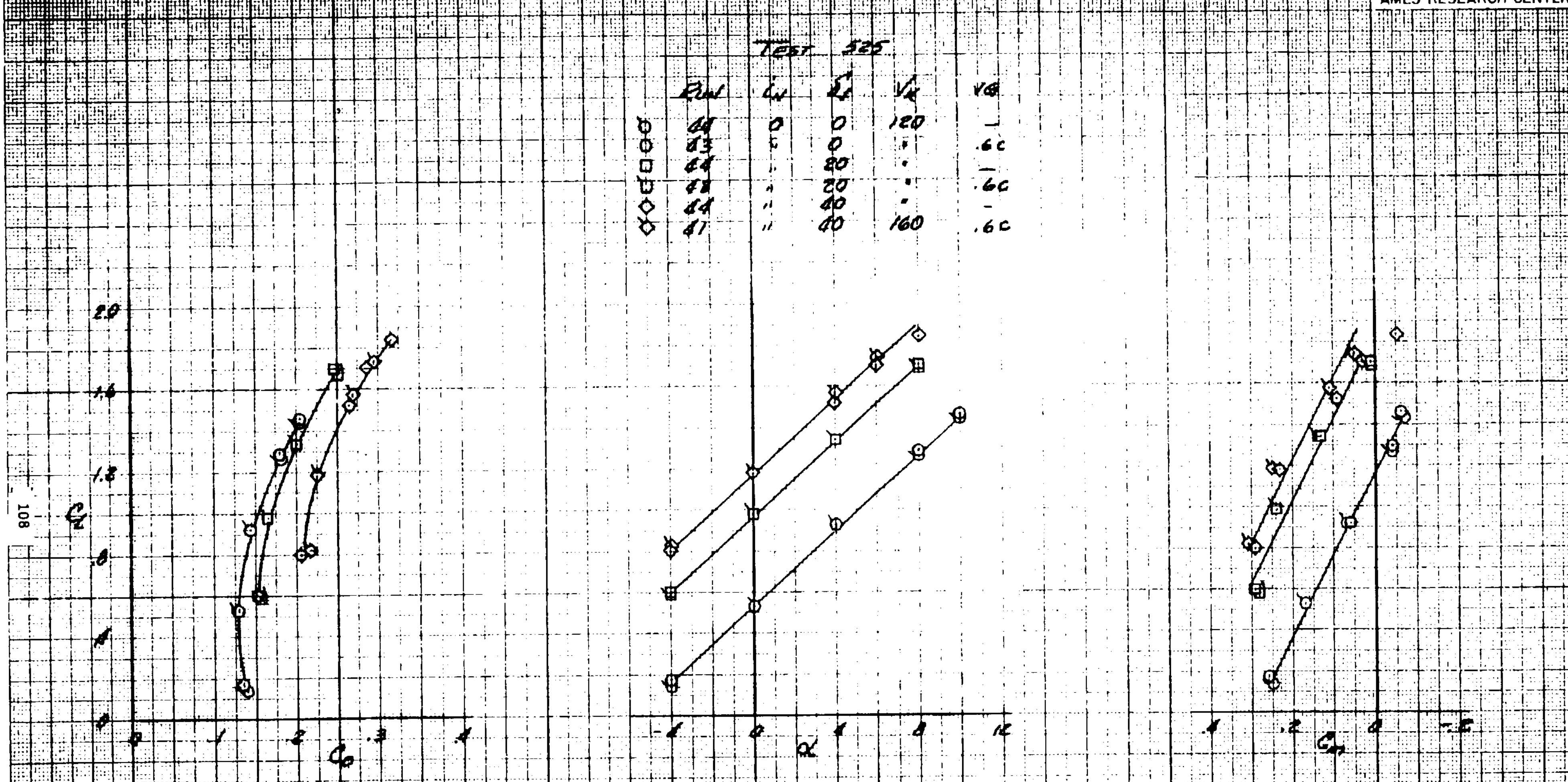
(a) CHARACTERISTICS IN YAW.

FIGURE 23 – CONCLUDED.



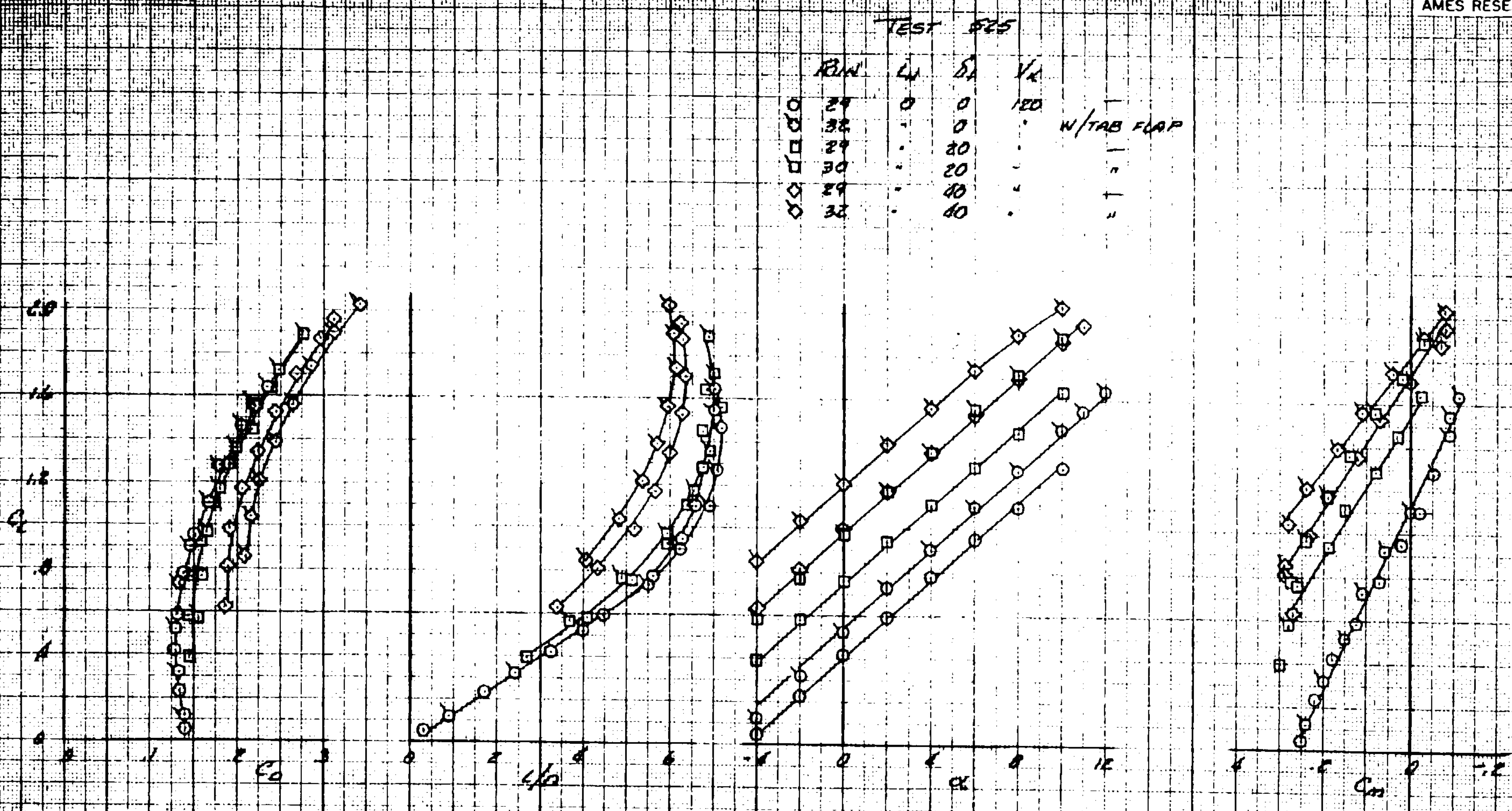
(a) At 0.25c

FIGURE 24.- EFFECT OF VORTEX GENERATORS



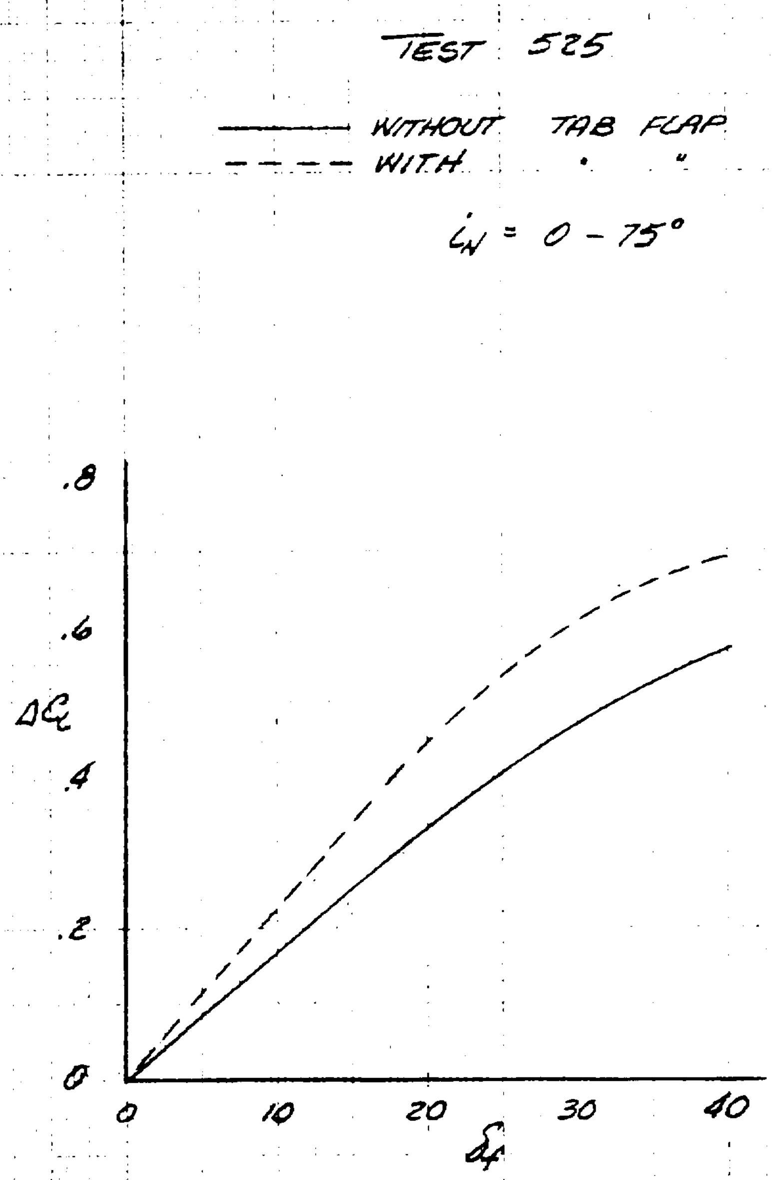
(b) At 0.6c

Figure 24 - Concluded



(a) Longitudinal

Figure 25.- Flap effectiveness rotors off.



(b) FLAP LIFT INCREMENT

FIGURE 25.- CONCLUDED.

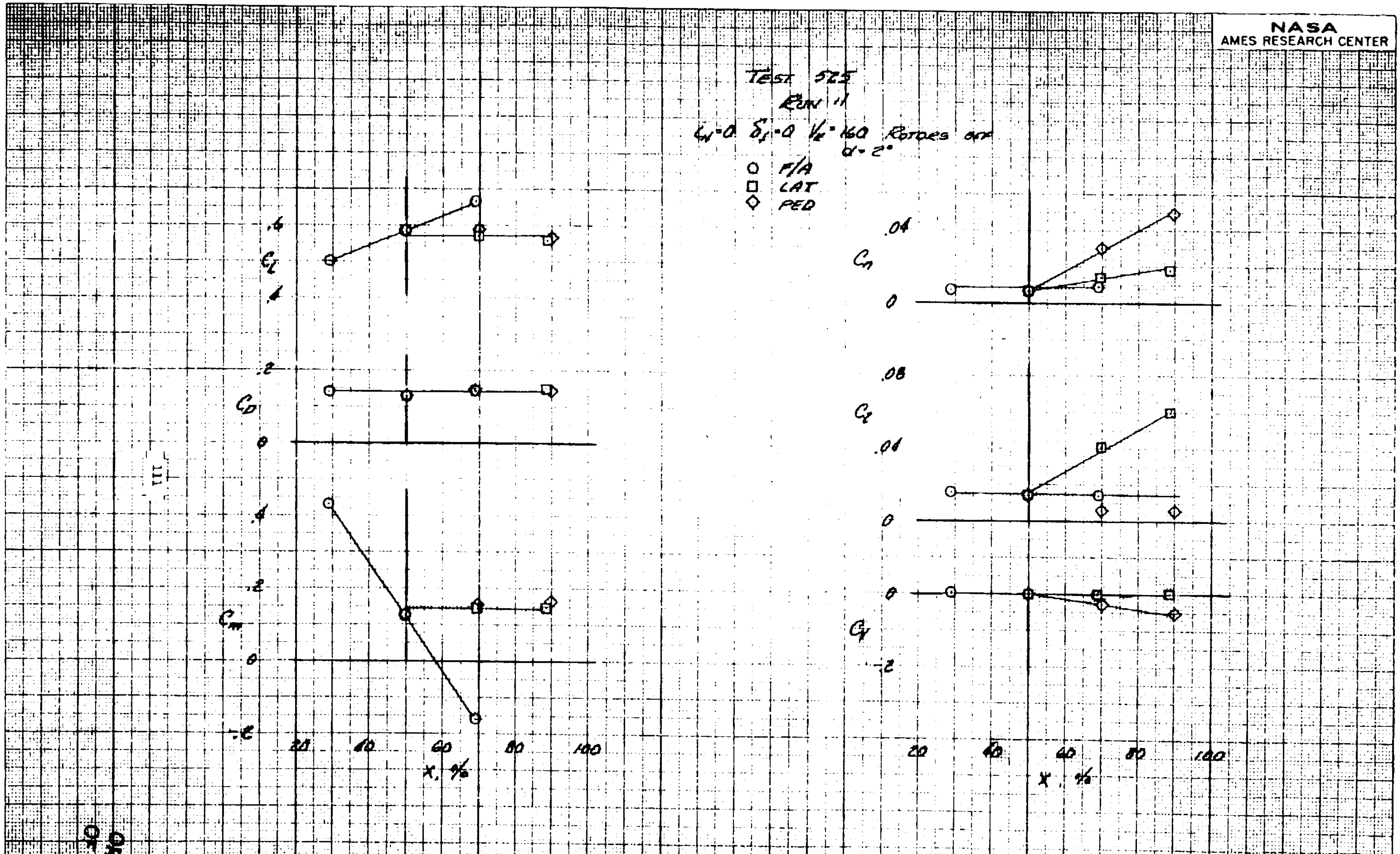
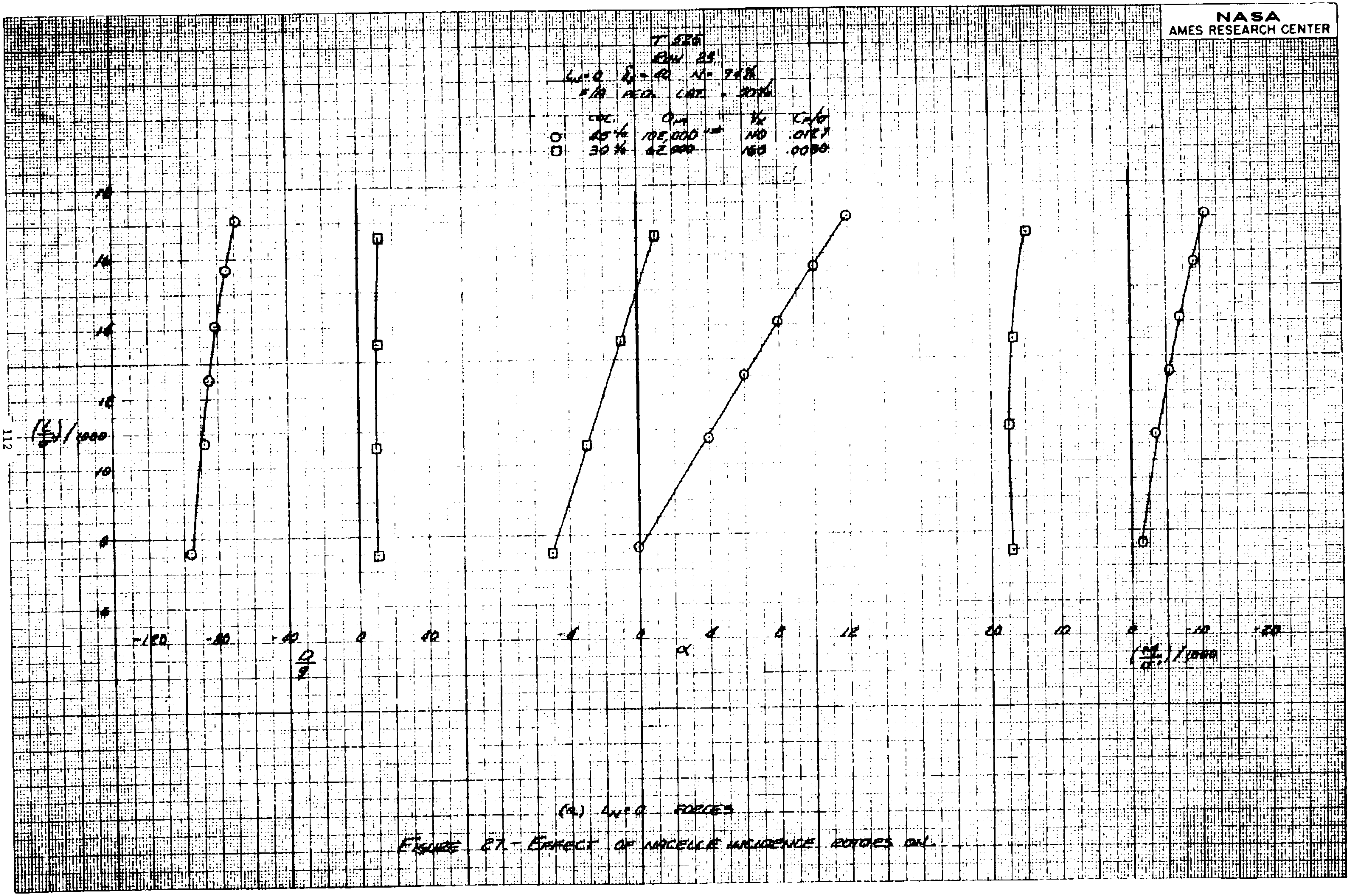
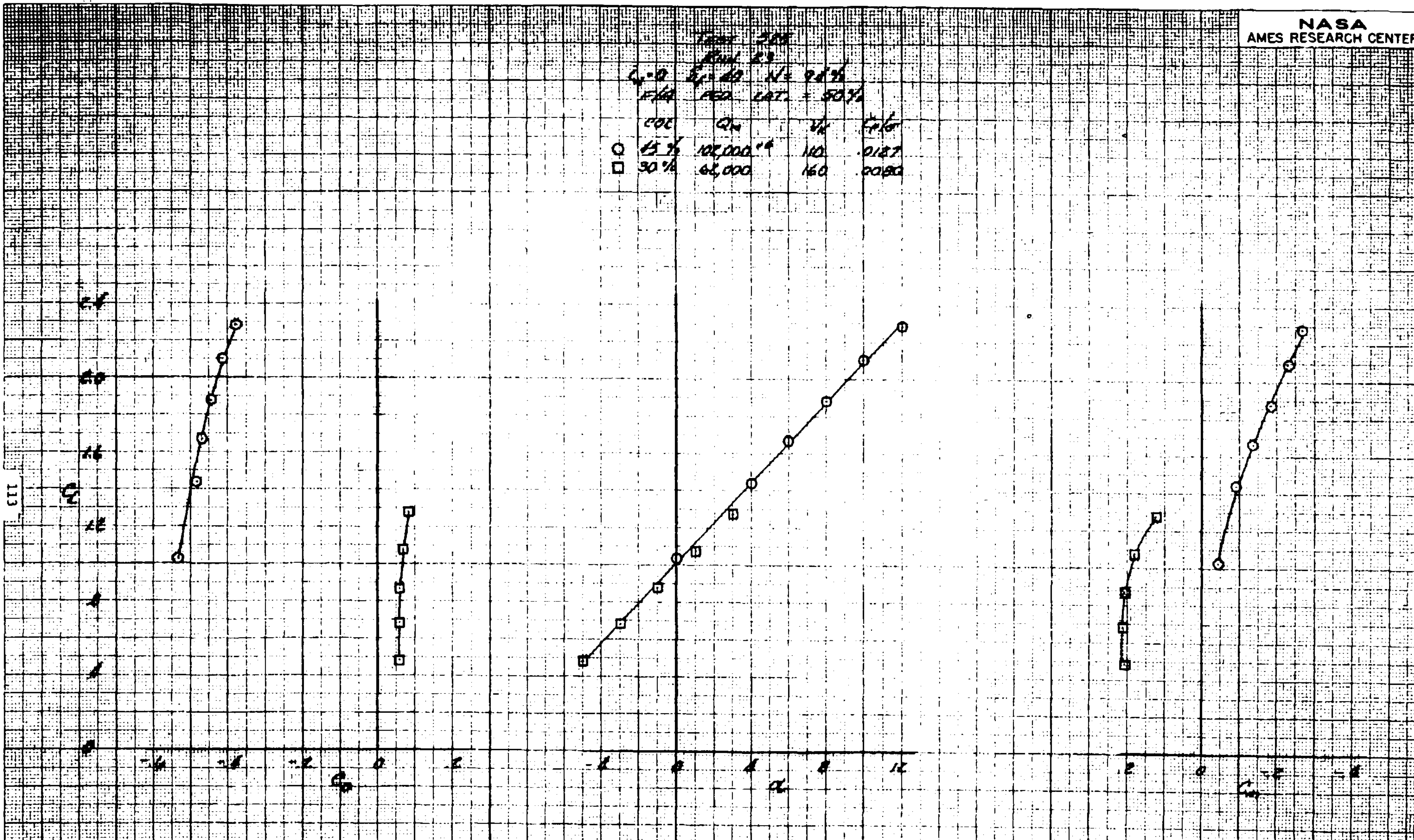


FIGURE 86. – CONTROL EFFECTIVENESS ROTORS OFF.



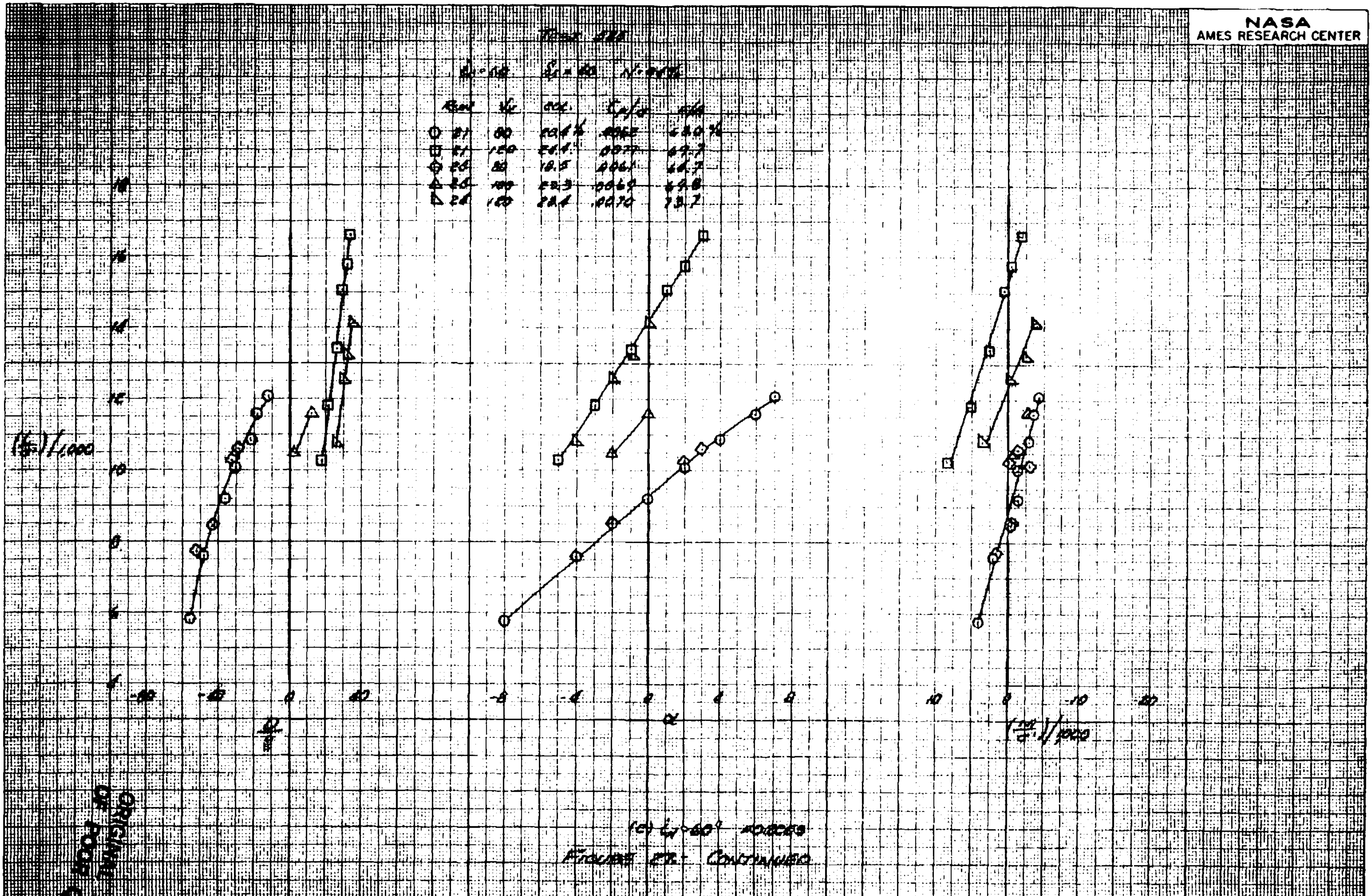
(a) Forces

Figure 27. - Effect of nacelle incidence rotor on.



(c) $i_w = 0$ coefficients

Figure 27.- Continued.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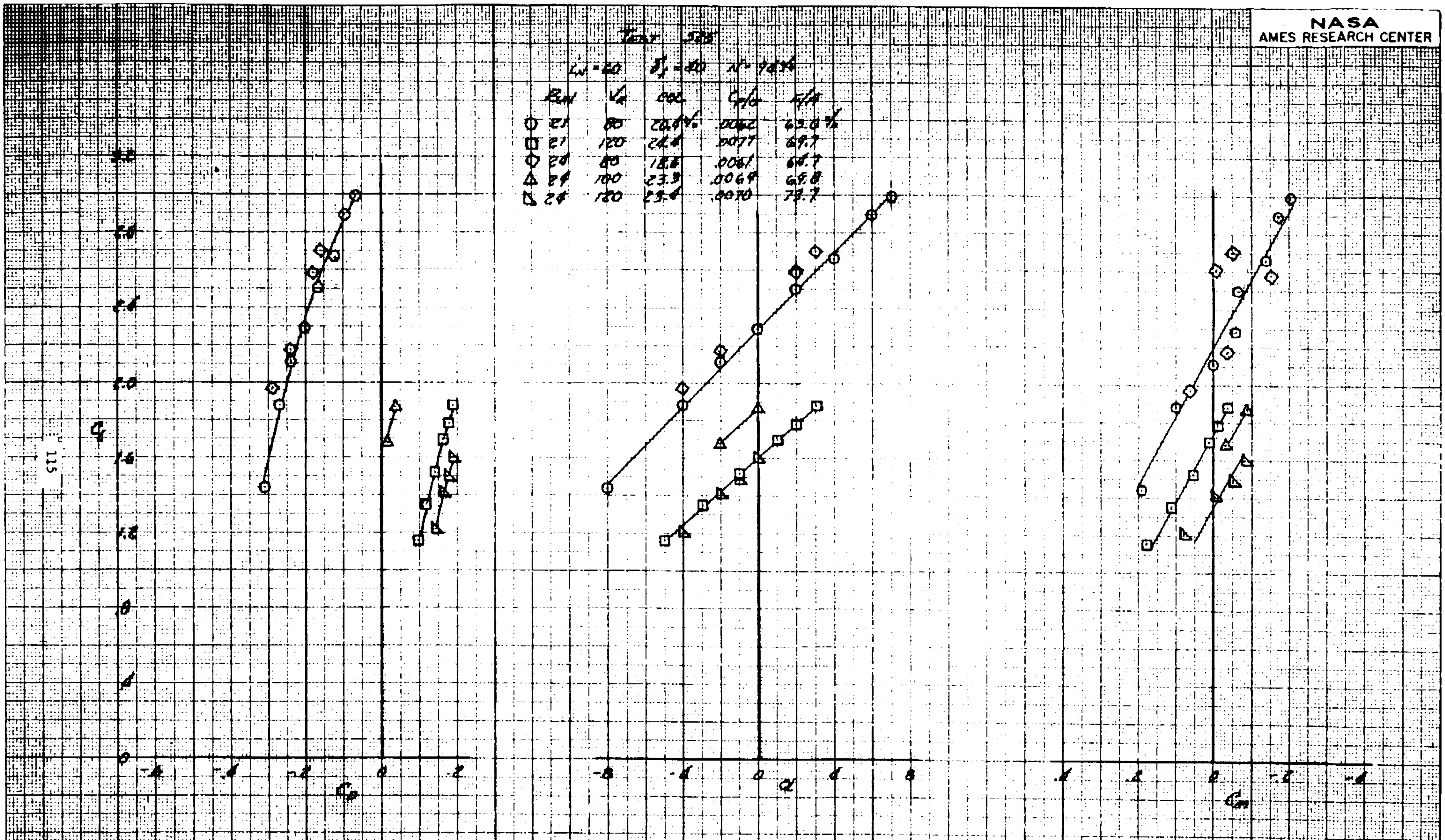
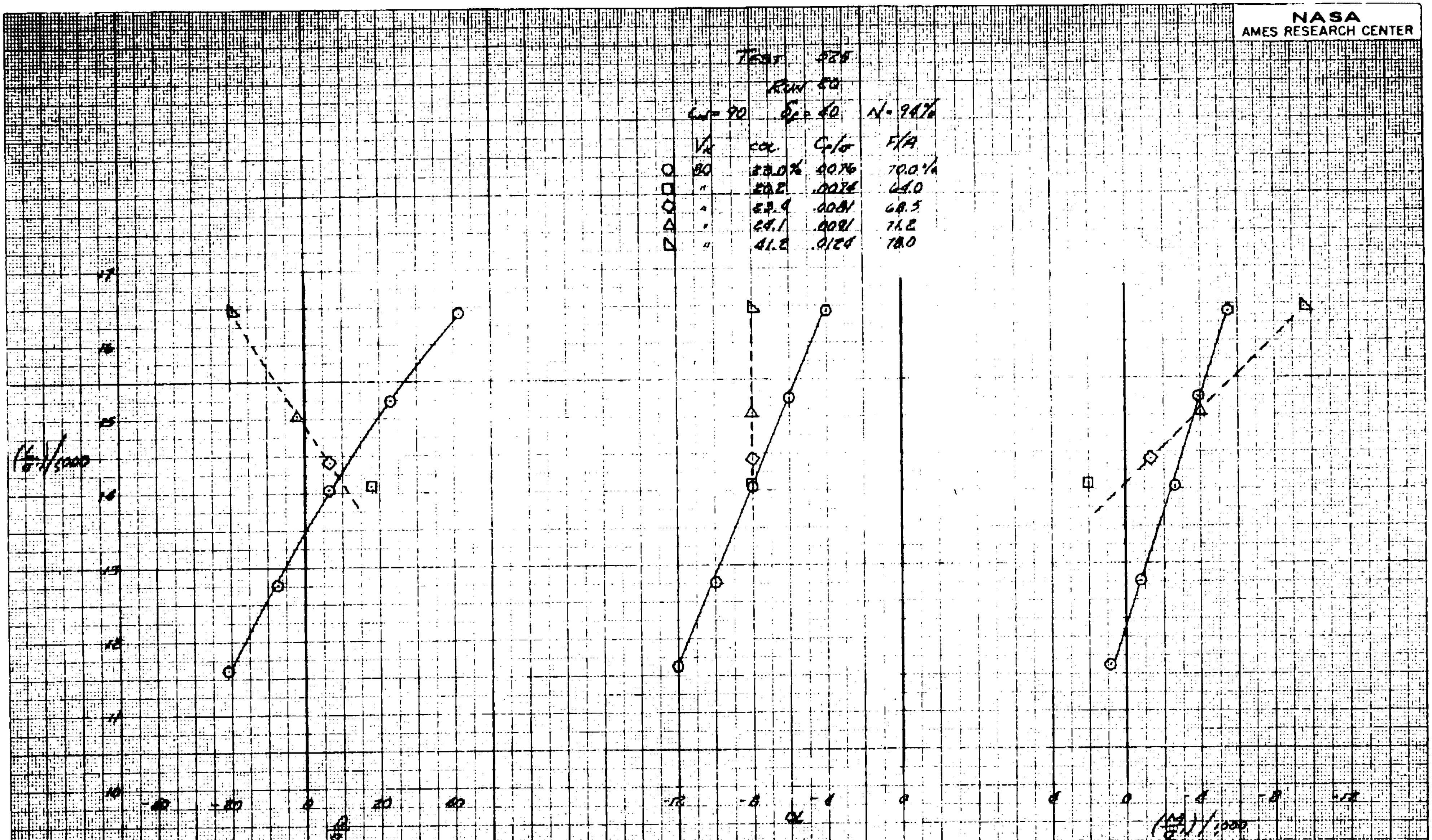


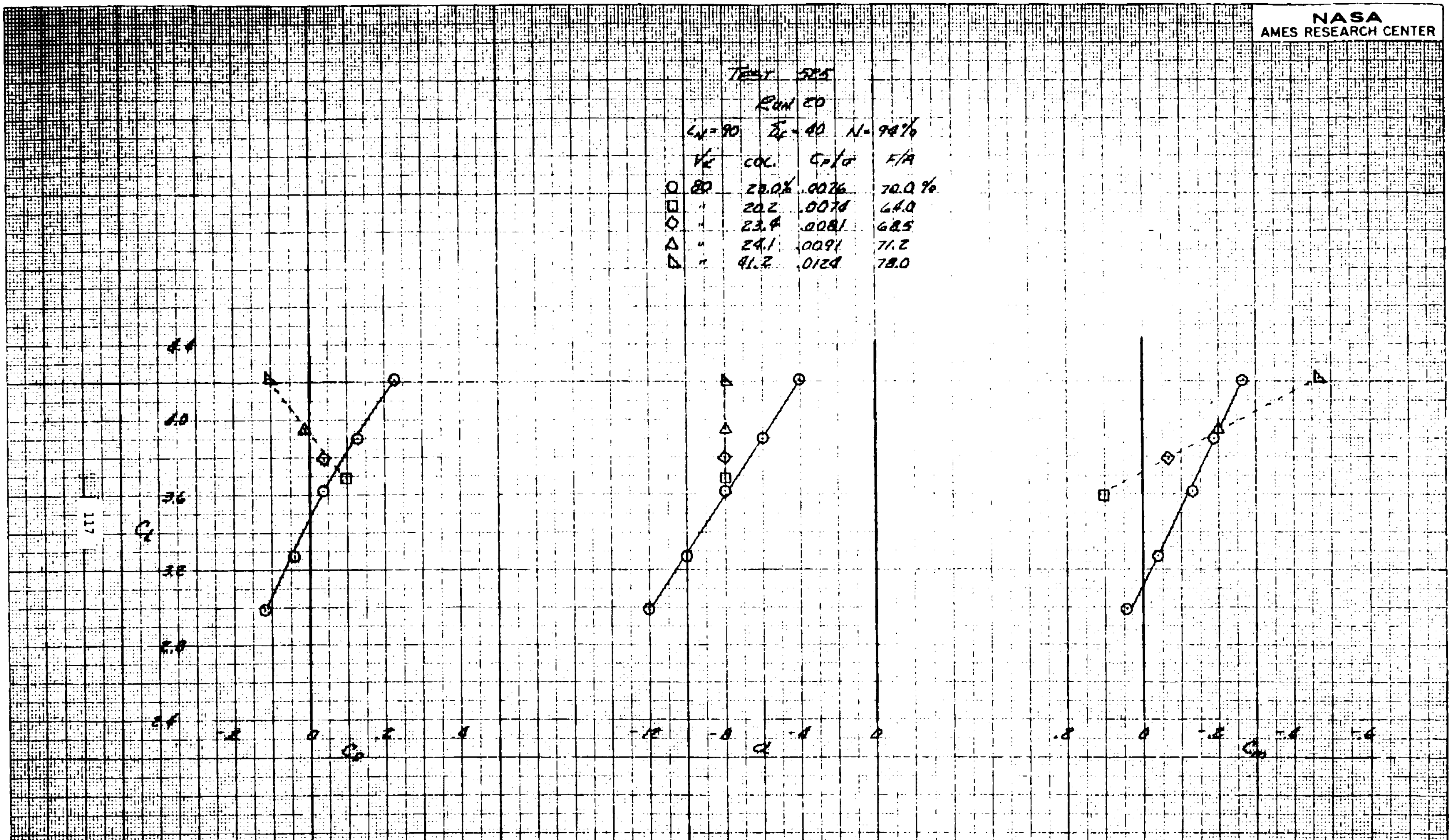
(d) $i_N = 60$ COEFFICIENTS

FIGURE 27.- CONTINUED



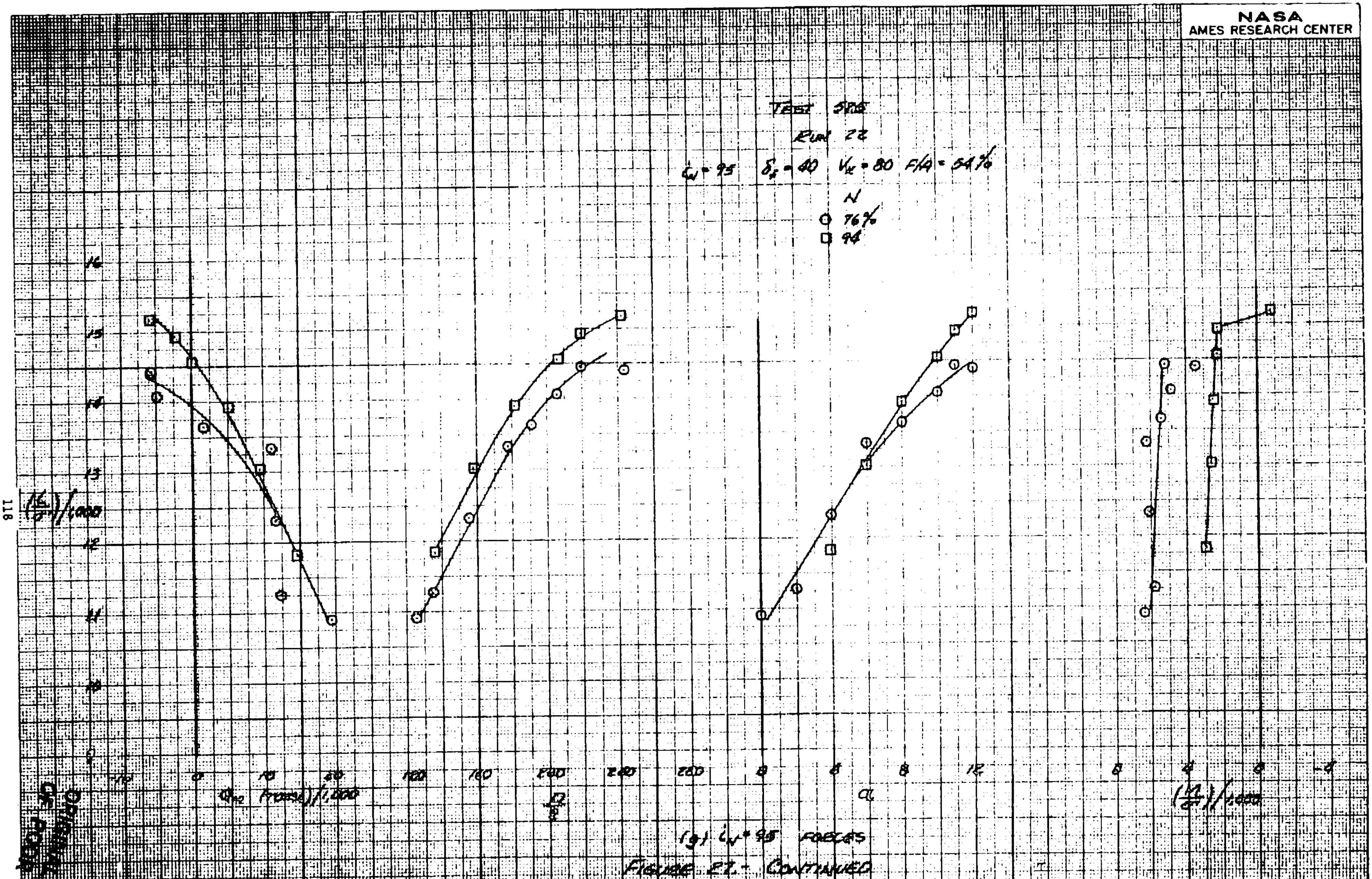
(e) i_N = 90° FORCES

FIGURE 27.- CONTINUED

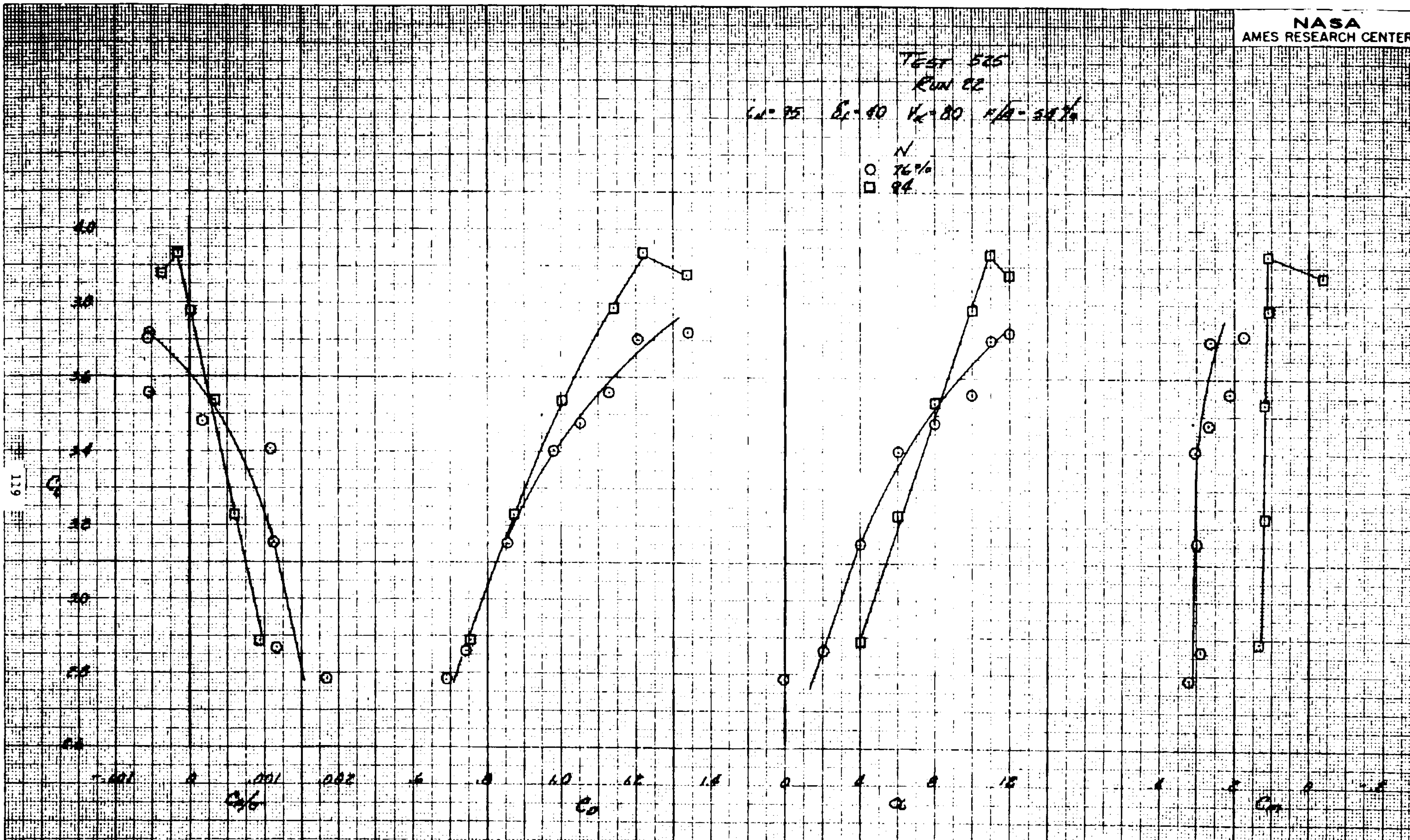


(f) i_N = 90° COEFFICIENTS

FIGURE 27 - CONTINUED



(g) i_N = 95 FORCES
FIGURE 27.- CONTINUED



(h) C_N = 95 COEFFICIENTS

FIGURE 27 - CONTINUED.

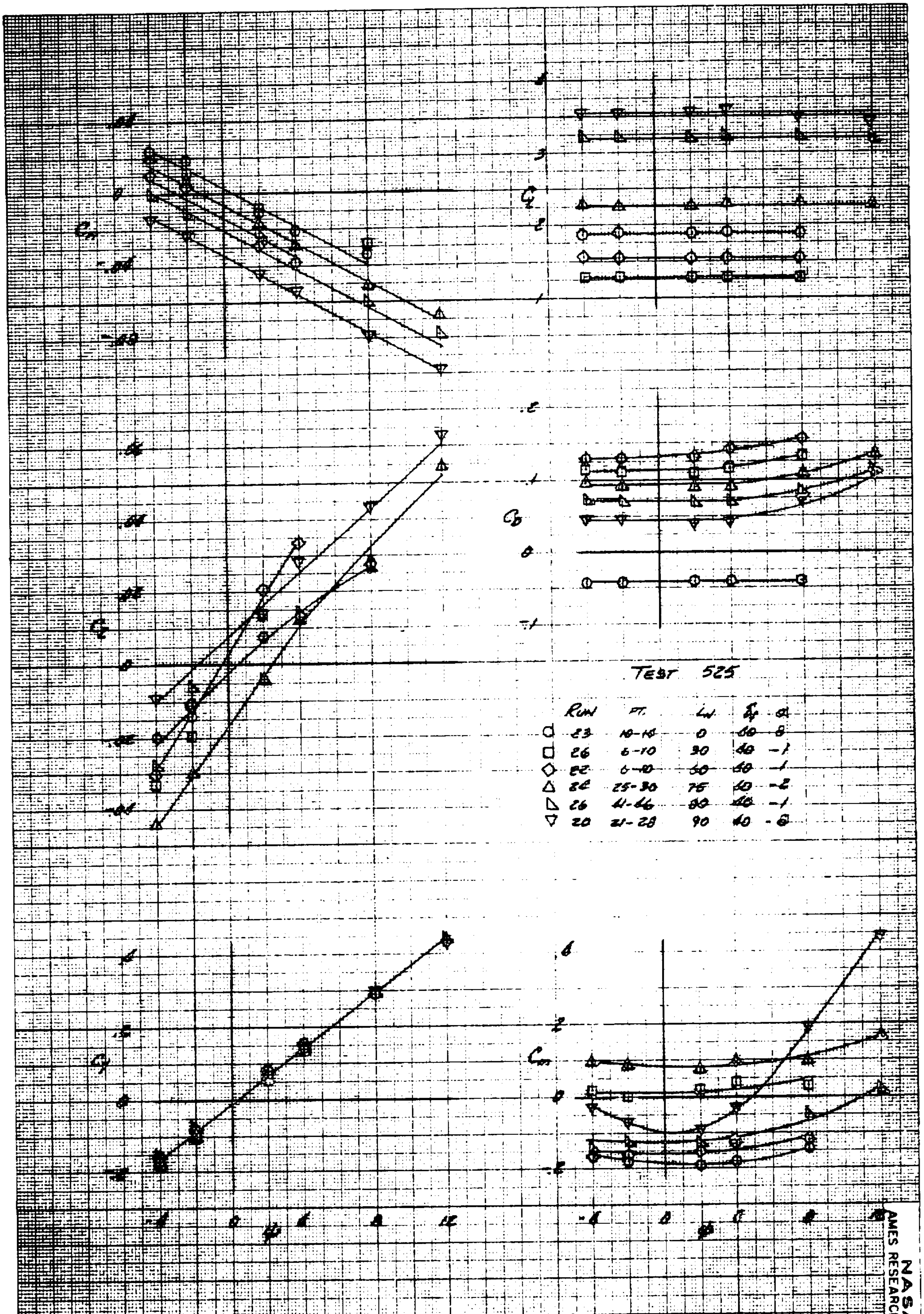
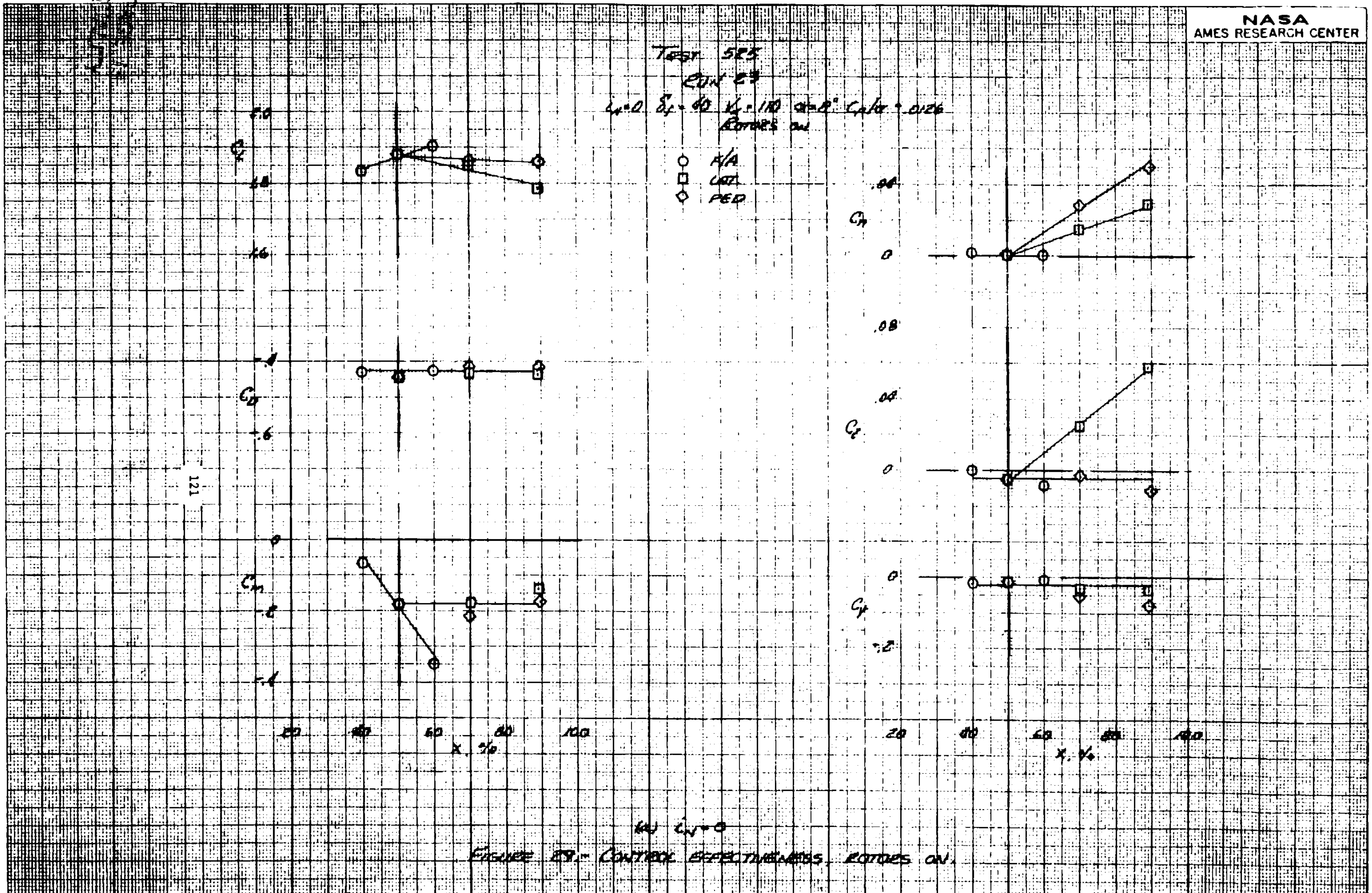
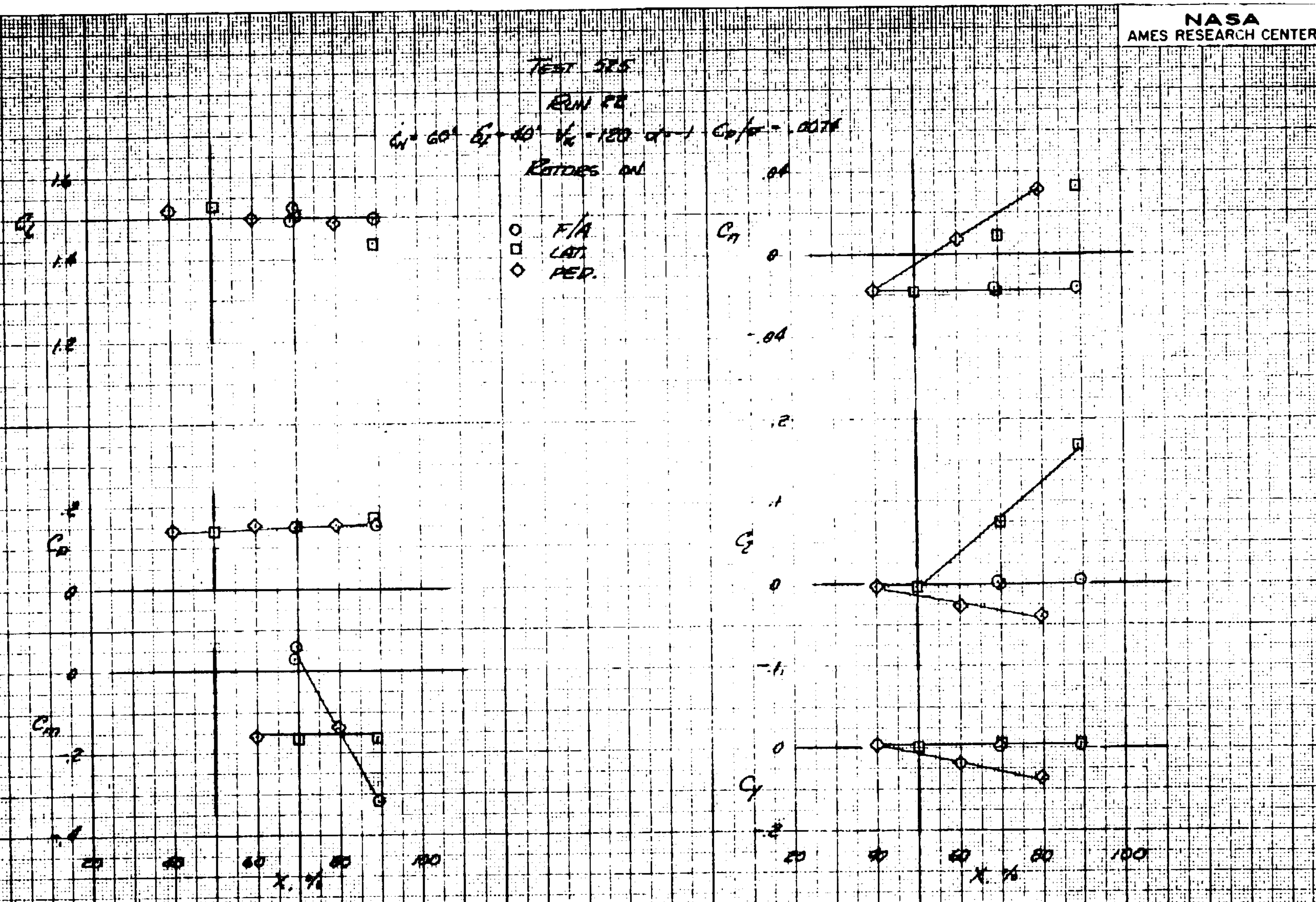


FIGURE 28.- CHARACTERISTICS IN YAW, ROTORS ON.



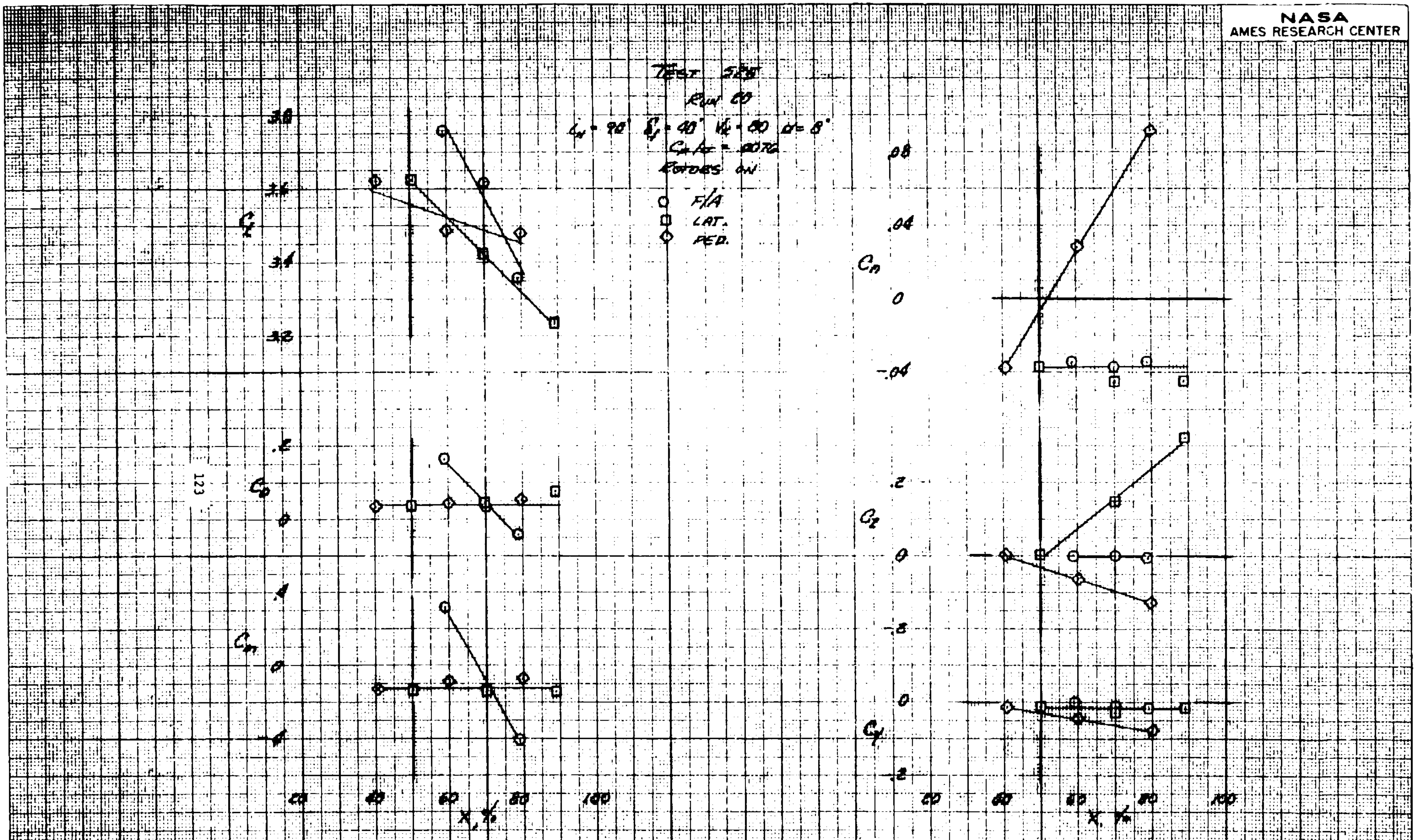
(a) C_{μ} = 0

Figure 29.- Control effectiveness, rotors on.



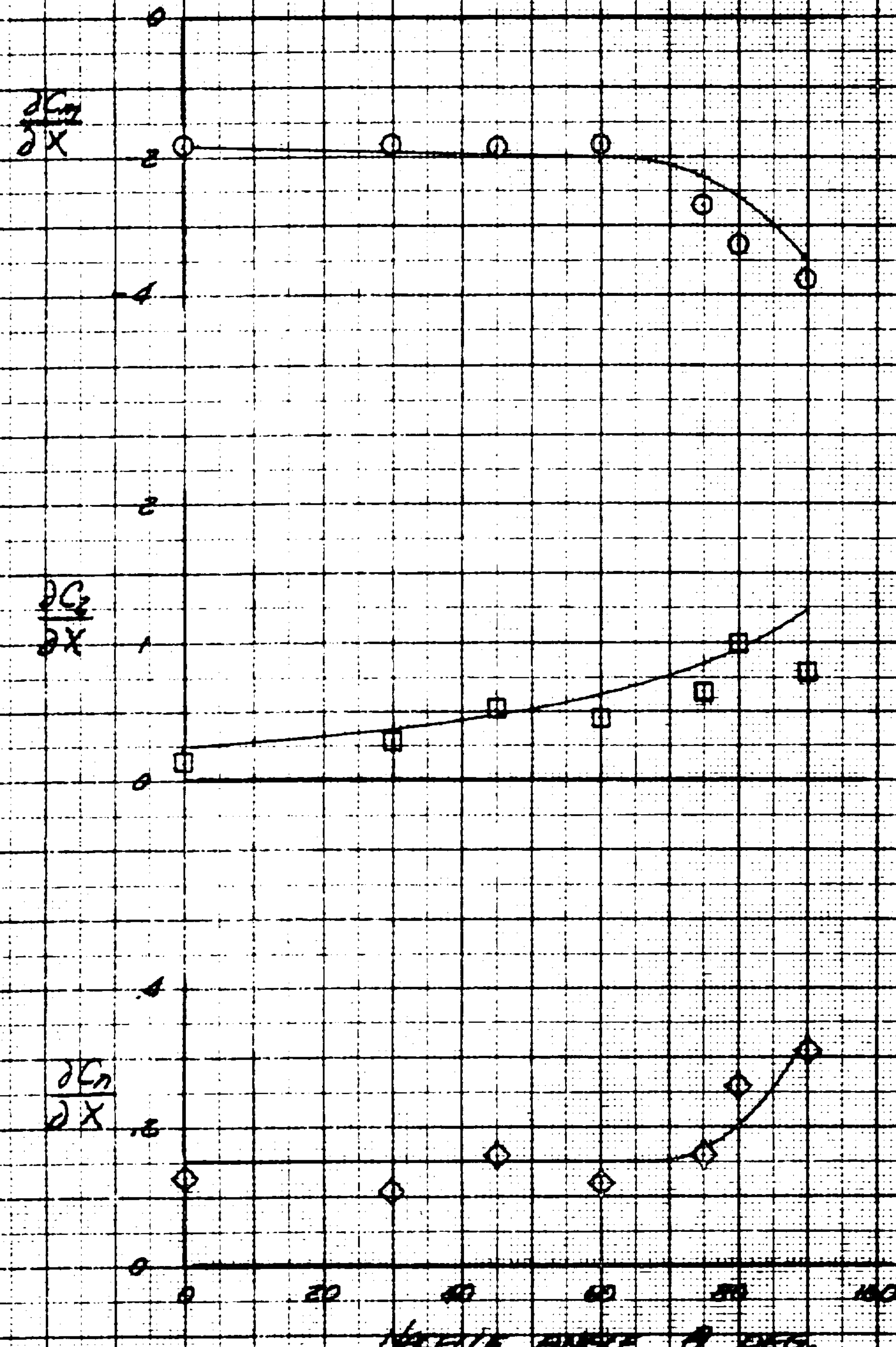
(a) $C_N = 60$

Figure 29.- Continued.



(d) i_w = 90

Figure 57.- Continued.



(d) VARIATION WITH i_N

FIGURE 29 CONCLUDED.

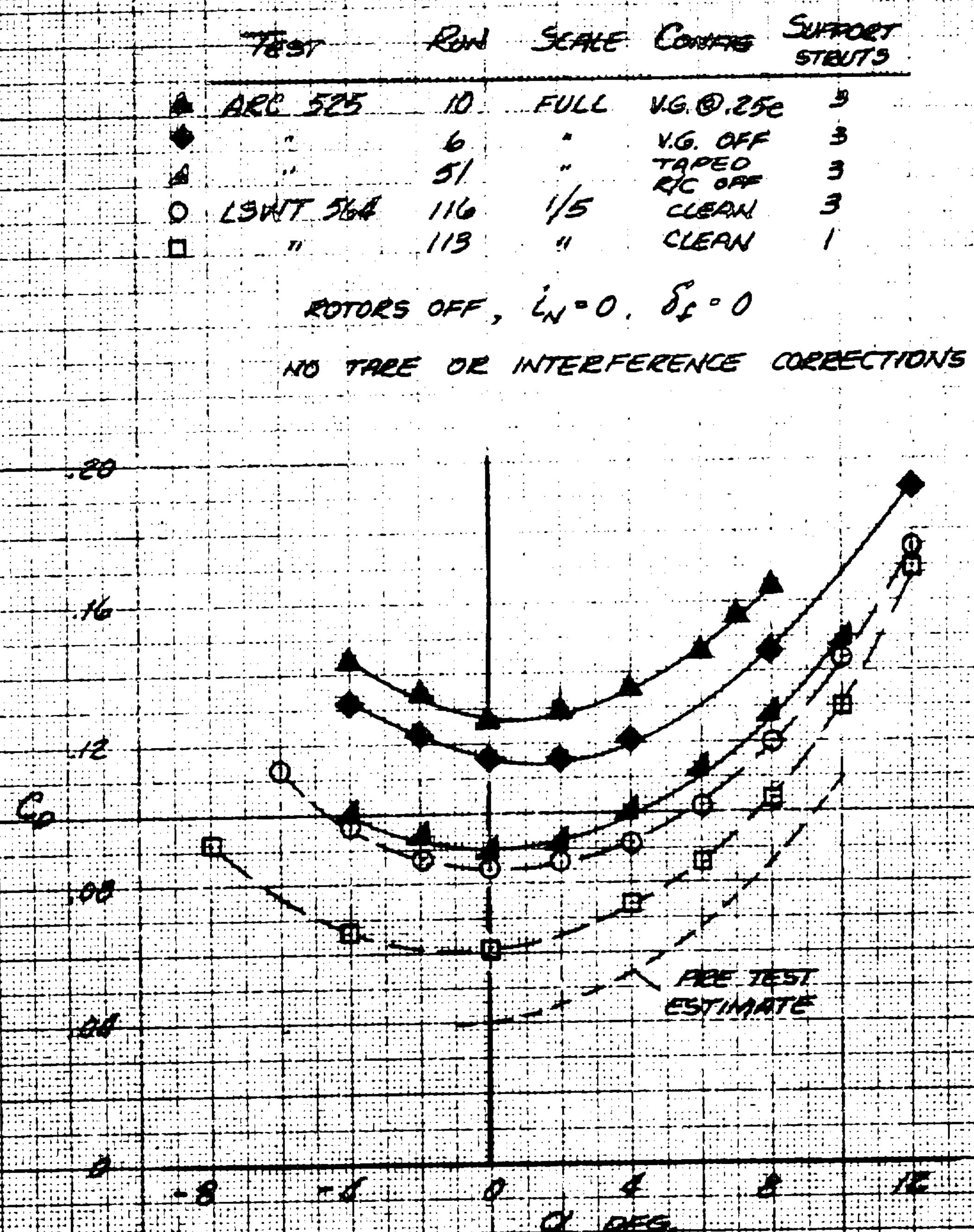
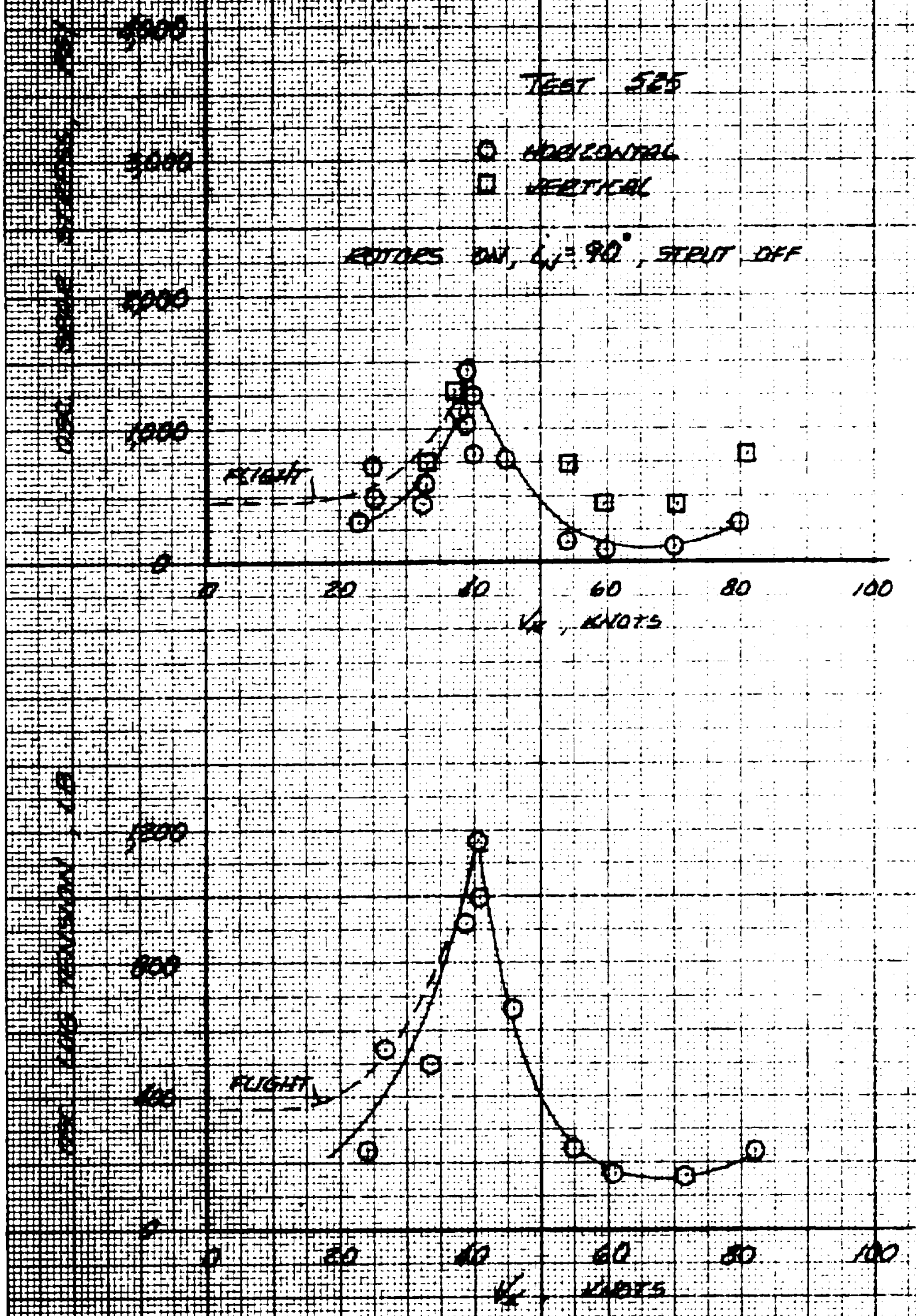


FIGURE 30 - DRAG SUMMARY.



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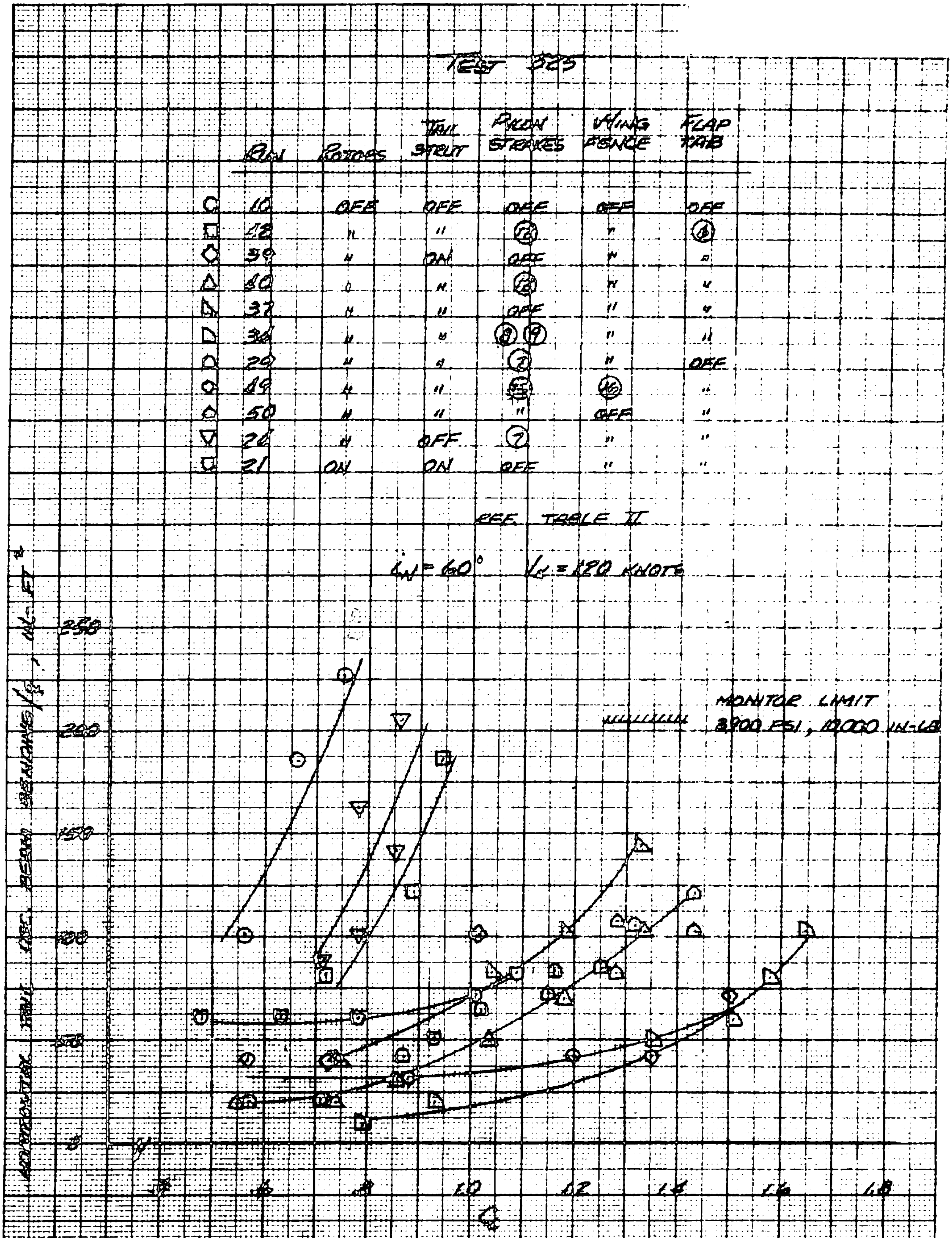
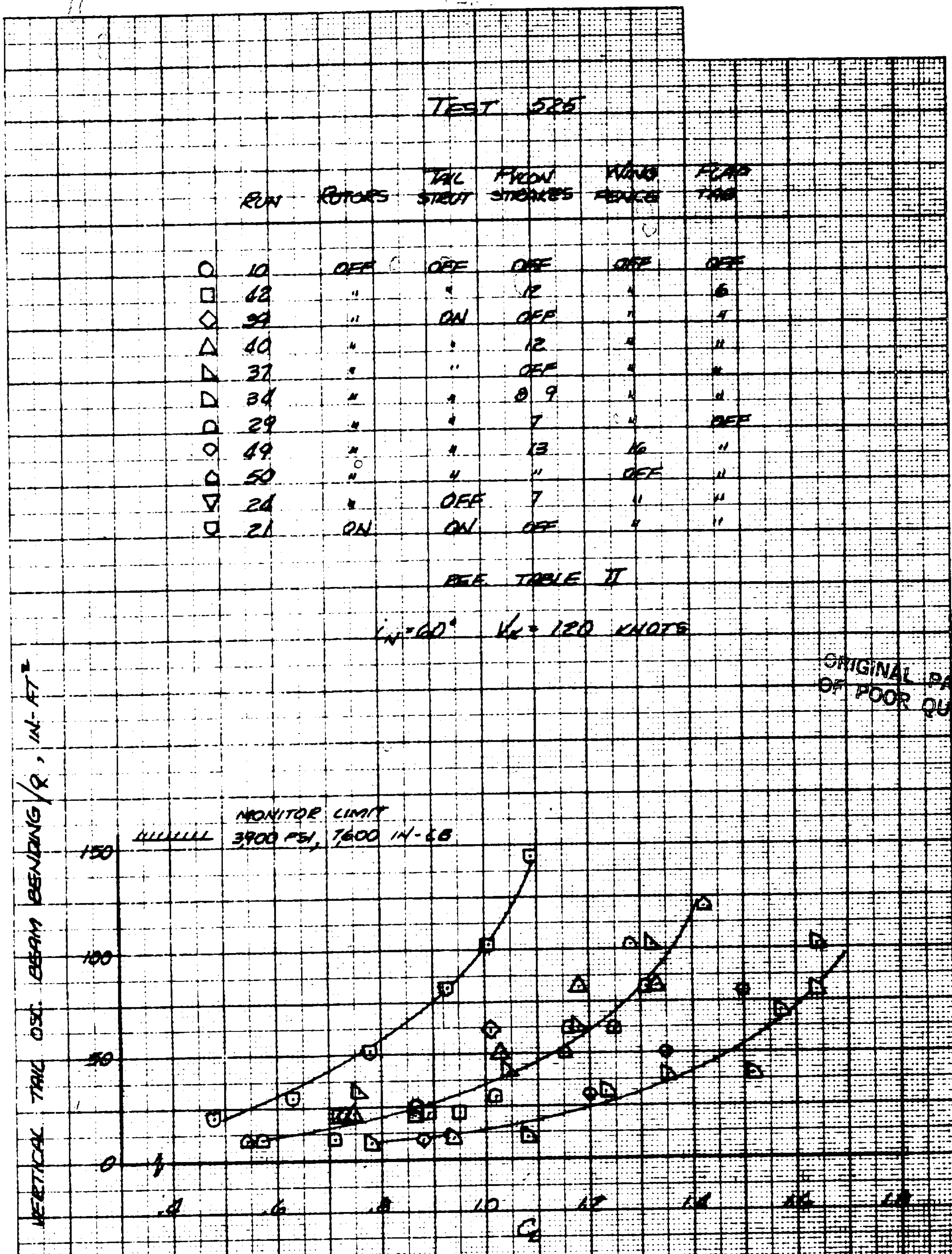
(a) HELICOPTER MODE.

FIGURE 81 - EMPENNAGE LOADS



(c) TRANSITION MODE, HORIZONTAL TAIL.

FIGURE 31.- CONTINUED.



(c) TRANSITION MODE, VERTICAL TAIL

FIGURE 31 - CONCLUDED.

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16. Abstract

The XV-15 Tilt Rotor Research Aircraft was tested in the Ames 40- by 80-Foot Wind Tunnel for preliminary evaluation of aerodynamic and aeroelastic characteristics prior to flight. The tests were undertaken to investigate the aircraft performance, stability, control and structural loads for flight modes from helicopter through transition and airplane mode up to the tunnel capability of 170 knots. Results from these tests are presented.

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