FEDERAL AVIATION ADMINISTRATION

A11NM Revision 1 Boeing C97G

June 9, 1983

TYPE CERTIFICATE DATA SHEET NO. A11NM

This data sheet which is a part of Type Certificate No. A11NM prescribes the conditions and limitations under which the product for which the type certificate was issued meets the airworthiness requirements of the Federal Aviation Regulations.

Type Certificate Holder West Coast Fabrications

1524 Spruce Avenue Chico, CA 95926

I - Model C-97G (Restricted Category), approved June 01, 1983

Engines 4 - P & W R-4360-59B

Fuel Aviation gasoline 115/145 Grade

For Alternate Fuels see T.O. 1C-97G-1 Section V

Engine limits Maximum Wet Power, Sea Level

3,500 BHP @ 2700 RPM and 247 TPSI (Torque Pressure)

Maximum Dry Power, Sea Level

3,250 BHP @ 2700 RPM and 230 TPSI (Torque Pressure)

See Airplane Flight Manual T.O. 1C-97G-1 and Appendix T.O. 1C-97G-1-1 Part 2 for complete engine power and performance data.

Propellers 4 - Hamilton Standard 34G60, Blade No. R-C7021D-8

See T.O. 1C-97G-1 Section V for limitations

Airspeed limits Vne = 302 knots or Mach 0.62 whichever is less

Va = 206 knots IAS Maneuvering

Vf = 155 knots IAS for 55% to 100% flaps = 190 knots IAS with flaps to 55%

Vlo = 200 knots IAS Landing Gear Extension Speed Maximum Cargo Doors Open and Aerial Delivery Speed

V = 155 knots IAS

C.G. range Operating Range 18.5% to 30.5% MAC

Datum 50 in. fwd of nose (Distance from datum to nose jacking cone

228.6 in.)

Leveling means Indicator below floor in forward lower compartment (Sta. 356)

Maximum gross weight

Take Off 153,000 lbs.

Landing weight

(10 FPS Sink Speed) 130,000 lbs. (8.3 FPS Sink Speed) 153,000 lbs.

(Note: Chart for Contact Sinking Speed between 130,000 and 153,000 lbs.

provided in Flight Manual T.O. 1C-97G-1)

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Maximum Zero Fuel Weigh	t 128,000 lbs.

(See Flight Manual for Fuel Loading distribution and limitations)

Minimum crew Pilot, Copilot, and Flight Engineer

Fuel capacity 7,790 gals. total - 2 outboard tanks 1,770 gal. each

2 inboard tanks 1,520 gal. each1 Center Wing tank 1,210 gal.

Oil capacity 186 gals. total - 4 engine tanks 32.5 gal. each

- 2 transfer tanks 56 gal.

Cargo capacity See Flight Manual T.O. 1C-97G-1 Section V

Control surface movements

Control surface movements		MOVEMENT FROM	TRAILING EDGE
CONTROL SURFACE	<u>POSITION</u>	NEUTRAL POSITION IN DEGREES	MOVEMENT <u>IN INCHES</u>
AILERONS	UP DOWN	25 (± 1) 25 (± 1)	9.22 (± .38) 9.22 (± .38)
AILERONS TRIM TABS	UP	5.5 (<u>+</u> 1)	.75 (<u>+</u> .06)
ELEVATORS	DOWN UP	5 (<u>+</u> 1) 20 (+ 1)	.75 (<u>+</u> .06) 12.45 (+ .62)
ELEVATOR TRUIT TARG	DOWN	15 (<u>+</u> 1)	9.36 (± .62)
ELEVATOR TRIM TABS RIGHT	UP	12 (+ 2)	2.55 (+ .43)
	DOWN	12 (<u>+</u> 2)	2.55 (± .43)
LEFT - WING FLAPS UP, NEUTRA POSITION OF TRIM TAB WITH ELEVATOR IN	AL UP	1.5 (+ .5/25)	.32 (+ .11/05)
NEUTRAL POSITION			
WING FLAPS DOWN 45 DEGREES, ELEVATOR IN NEUTRAL POSITION MEASURED FROM POSIT GIVEN ABOVE	UP ION	3 (± 1/2)	64 (± .11)
RUDDER			
(BY PEDAL WITH RUDDER BOOST ON)	RIGHT LEFT	22 (<u>+</u> 1) 22 (<u>+</u> 1)	24.94 (± 1.12) 24.94 (± 1.12)
(BY TRIM KNOB WITH RUDDER BOOST ON)	RIGHT LEFT	15.5 (+ 1/-1.5) 15.5 (+ 1/-1.5)	17.62 (+ 1.11/-1.69) 17.62 (+ 1.11/-1.69)
RUDDER TAB	RIGHT LEFT	20 (± 1) 20 (± 1)	2.95 (± .15) 2.95 (± .15)
WING FLAPS	DOWN	45 (<u>+</u> 2)	

Serial Numbers eligible (See Note 2A and 2B) (See Note 5) Manufacturers Serial Numbers

For aircraft exported and returned to United States

AF51-7260 thru AF51-7271, AF52-526 thru AF52-938, AF52-2602 thru AF52-2692, AF52-2694 thru AF52-2716, AF52-2763 thru AF52-2806, AF53-106 thru AF53-365, AF53-3815 and AF53-3816

Data Pertinent To All Models

Certification basis FAR 21.25(a)(2) and (b)(7) dated February 6, 1982, Amendment 21-1 through 21-56

Restricted Type Certificate issued

Production basis None - Prior to original airworthiness certification of each aircraft, an FAA representative

 $must\ perform\ an\ inspection\ for\ workmanship,\ materials,\ and\ conformity\ with\ the\ approved$

technical data and assure that the applicant has conducted a satisfactory flight test.

Equipment (See NOTE 6)

The basic required equipment as prescribed in the applicable airworthiness regulations (see Certification Basis) must be installed in the aircraft for certification. In addition, an FAA approved Airplane Flight Manual Supplement is required in addition to Flight Manual T.O. 1C-97G-1.

NOTE 1. Current weight and balance report and loading instructions must agree with Section V of United States Air Force T.O. 1C-97G-1 Manual for the C-97G airplane.

- NOTE 2. A. This approval applies to basic United States Air Force Boeing C97G aircraft with no major modifications except as described in data per West Coast Fabrications FAA approved Drawing List WC971, Revision 3, dated June 07, 1983, or later FAA approved revision thereto.
 - B. Airplane certified for the special purpose of carriage of cargo.
 - (1) In addition to the operating limitations in this data sheet, area, economic, passenger and other appropriate operating limitations in accordance with FAR 21.25 shall be shown on placards or listing accessible to the pilot.
 - (2) Carriage of hazardous materials is prohibited unless compliance is shown with applicable regulations in Code of Federal Regulations 49, Part 175.
 - (3) The following placard must be displayed in front of and in clear view of the pilot:

"This airplane must be operated as a restricted category airplane in compliance with the operating limitations stated in the form of placards, markings, and manuals."

- NOTE 3. The aircraft must be serviced and maintained in accordance with USAF T.O. 1C-97(K)E(C)-2-1.
- NOTE 4. All cargo must be loaded and restrained in accordance with USAF T.O. 1C-97G-1, Section. V.
- NOTE 5. The following note must be placed under "exceptions" on all Export Certificates of Airworthiness for this aircraft. "This aircraft is type certificated in the restricted category and may not meet the applicable airworthiness code as provided by Annex 8 to the Convention on International Civil Aviation.
- NOTE 6. USAF T.O. 1C-97G-1 must be available in the C-97G aircraft for all flight operations.
- NOTE 7. Unless already accomplished, removal of inflight refueling systems, tanks and support cradles will be accomplished in accordance to USAF T.O. 1C-97(K)E(C)-2-6.