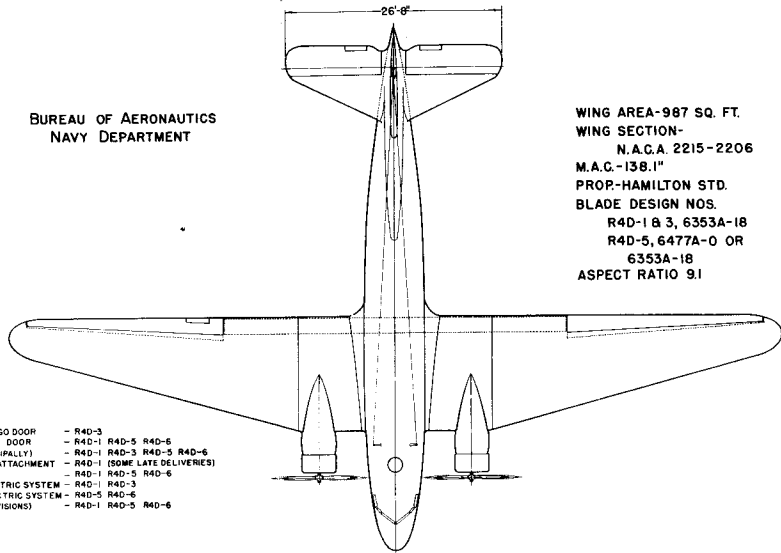


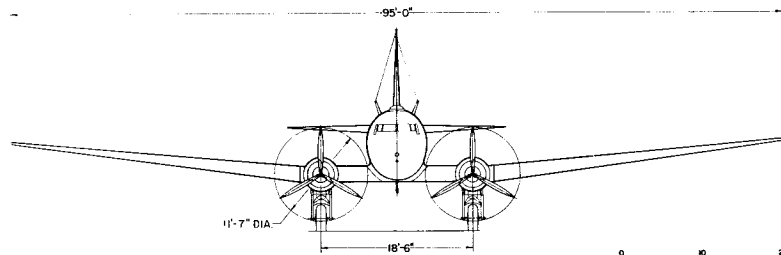
STANDARD AIRCRAFT CHARACTERISTICS
R4D-5 "SKYTRAIN"

BUREAU OF AERONAUTICS
NAVY DEPARTMENT

WING AREA-987 SQ. FT.
WING SECTION-
N.A.C.A. 2215-2206
M.A.C.-138.1"
PROP.-HAMILTON STD.
BLADE DESIGN NOS.
R4D-1 & 3, 6353A-18
R4D-5, 6477A-0 OR
6353A-18
ASPECT RATIO 9.1



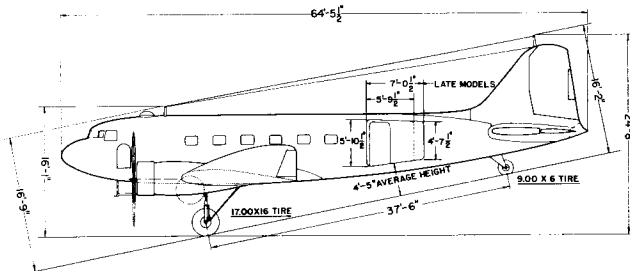
NARROW CARGO DOOR - R4D-3
WIDE CARGO DOOR - R4D-1 R4D-5 R4D-6
TRDOP (PRINCIPALLY) - R4D-1 R4D-3 R4D-5 R4D-6
GLIDER TOW ATTACHMENT - R4D-1 (SOME LATE DELIVERIES)
ASTRODOME - R4D-1 R4D-5 R4D-6
12 VOLT ELECTRIC SYSTEM - R4D-1 R4D-3
24 VOLT ELECTRIC SYSTEM - R4D-5 R4D-6
LITTER (PROVISIONS) - R4D-1 R4D-5 R4D-6



11'-7" DIA.

18'-6"

0 10 20 FT
SCALE



DESCRIPTIVE ARRANGEMENT

MISSION AND DESCRIPTION

The Douglas Skytrain R4D-5 troop-cargo transport same as Air Force C-47. It is a conventional transport and stems from the commercial DC-3 design. Main wheels are retractable. Has been put to a great variety of uses. The Marine Corps organization, SCAT, of South Pacific fame, used this plane in their combat transport operations.

WEIGHTS

Loadings	Lbs.	L.F.
EMPTY.....	17057.....	
BASIC.....	17300.....	
DESIGN.....	29600.....	2.67
MAX. T.O.....	29000.....	2.50
MAX. LAND....	26000.....	

All weights are actual.

POWER PLANT

NO. & MODEL.....(2) R-1830-92
MFR.....P. & W.
SUPERCH.....1 Stage, 1 Speed
PROP.GEAR RATIO.....16:9
PROP MFR.....Ham. St.
PROP DES. NO.....6477A-C
NO.BL./DIA.....3/11'-7"

RATINGS

	Bhp. @ Rpm.	@ Alt.
T.O.	1200	2700 SL
NORMAL	1050	2550 7500'

SPEC. N-5098-1

FUEL AND OIL

Gals. - No. Tanks - Location
804.....4.....Wing
800.....8.....Cabin
FUEL GRADE.....100/130
FUEL SPEC.....AN-F-48

OIL

CAPACITY (Gals.).....58
SPEC.....AN-O-8
GRADE.....1100-1120

ACCOMMODATIONS

CREW.....4
TROOPS.....26
LITERS.....24

DIMENSIONS

SPAN.....95'-0"
LENGTH.....64'-6"
HEIGHT.....16'-9"
WING AREA.....987 sq. ft.
M.A.C.....138.1"
TREAD.....18'-6"

ELECTRONICS

COMMAND.....SCR-()-183
LIAISON.....SCR-187-A
COMPASS.....SCR-280-A
or SCR-269-G
MARKER BEACON.....RC-39-()
IFF.....SCR-595-()
or SCR-695-()



PERFORMANCE SUMMARY

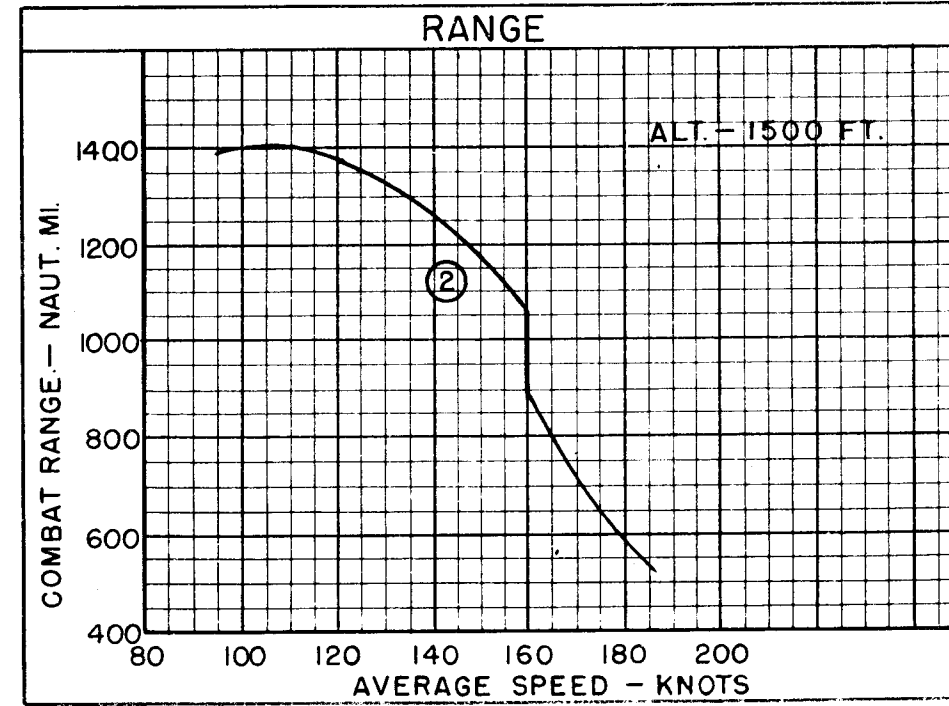
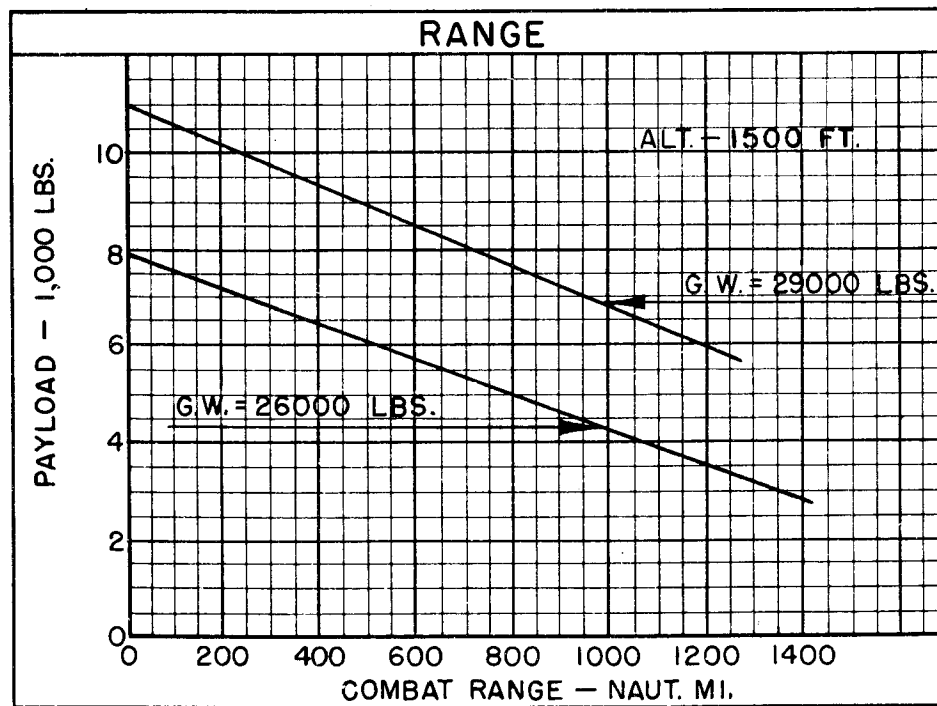
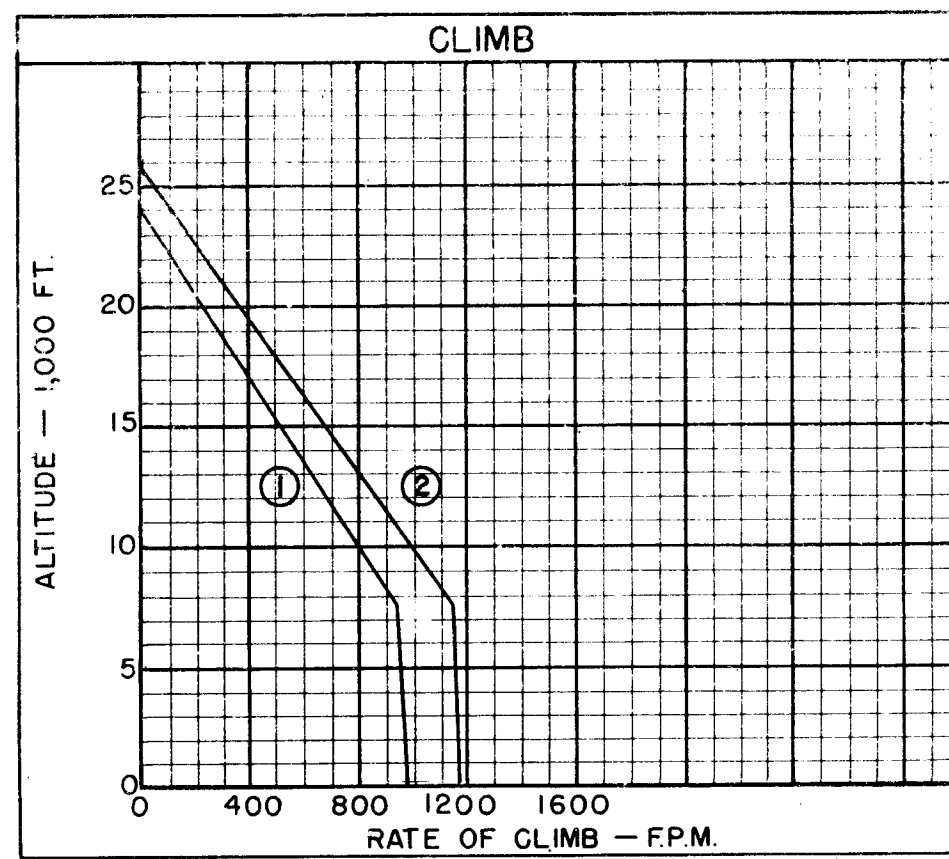
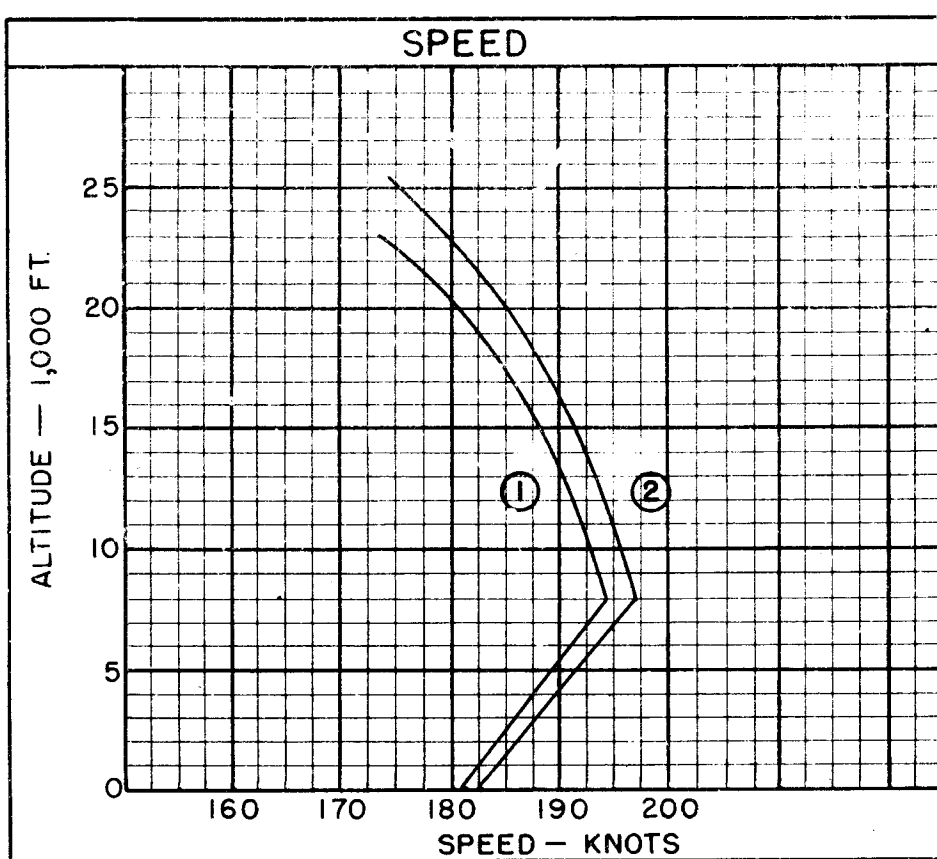
LOADING CONDITION		(1) Cargo-Troop Transport	(2) Cargo-Troop Transport	
TAKE-OFF WEIGHT		29000	26000	
Fuel	lbs	4824	4824	
Bombs	lbs			
PAYLOAD	lbs	5738	2738	
Wing/Power Loading (A)	lbs/sq. ft. lbs/ bhp	29.4/13.8	26.3/12.4	
Stall Speed--Power off	kn	69.1	65.4	
Stall Speed--Power off - No Fuel	kn	63.0	59.0	
Stall Speed--Power on	kn	58.6	55.4	
Maximum Speed/Alt (B)	kn/ft	194/8000	197/8000	
Take-off Distance, deck -- calm	ft	1241	935	
Take-off Distance, deck	kn. ft			
Take-off Distance, Airport	ft	2380	1900	
Rate of climb -- sea level (B)	ft/min	980	1170	
Service Ceiling (B)	ft	22200	24200	
Time-to-climb 10000 ft. (B)	min	11.4	9.3	
Time-to-climb 20000 ft. (B)	min	35.3	26.4	
Combat Range/V av 1500	ft. n.mi/kn	1295/111	1405/107	
Combat Radius/V av	ft. n.mi/kn			
LOADING CONDITION				
GROSS WEIGHT	lbs			
Engine power				
Fuel	lbs			
Bombs/Tanks				
Max. speed at sea level	kn			
Max. speed	ft. kn			
Combat speed/Alt.	kn/ft			
Rate of climb SL	ft/min			
Ceiling for 500 fpm R/C	ft			
Time-to-climb/Alt.	min/ft			

NOTES

- (A) BHP at Maximum Critical Altitude
- (B) Normal BHP

Performance is based on flight test of the R4D-3 airplane. Range is based on A.E.L. fuel consumption data increased by 5%.

Provisions for 26 troop seats or 24 litter patients are incorporated.



NOTES

Performance includes the effect of de-icer boots. Removal of de-icer boots increased Vmax at ACA by 3.0 knots and maximum combat range at 1500 ft. by 2%.

Performance with one engine inoperative, propeller feathered, flaps and landing gear retracted is estimated to be:

Gross Weight.....	26000#
Rate of Climb - S.L. - T.O. Power.....	335 ft./min.
Service Ceiling - Normal Power.....	12600 ft.