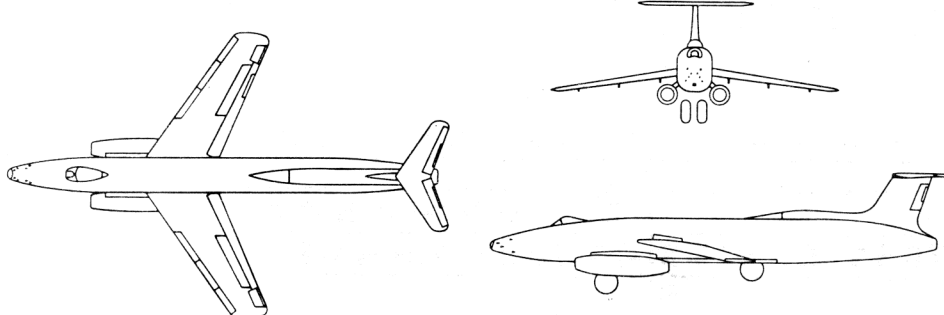


Unclassified.
~~SECRET~~

A-1
(X) B-51/char
EXPERIMENTAL

Characteristics Summary

BOMBER.....XB-51



MARTIN

Wing area 548.0 sq ft Length 85.1 ft
Span 53.1 ft Height 17.3 ft

AVAILABILITY

PROCUREMENT

Number available

Number to be delivered in fiscal years

ACTIVE	RESERVE	TOTAL				

STATUS

EXPERIMENTAL

1. Design initiated Feb. 1947
2. Two experimental models on contract
3. First experimental flight: October 1949 (estimated)
4. No production contemplated.

POWER PLANT

(3) Turbo-Jet J 47-GE-7
 General Electric

S.L. Static LB - RPM

T.O. *6000 - 7900
Max. 5200 - 7900
Nor: 4800 - 7330

*Fluid injection

FEATURES

Crew: 2

Cabin Pressurization and Cooling

Ejection Seats

Shoran

Variable Wing & Tail Incidence

Deceleration Parachute

JATO: (4) 1000 lb - 14 sec. duration

Max Fuel Cap: 3535 gal

ARMAMENT

Turrets: None

Guns: (8) 20mm

Ammunition: 1280 rds

Max Bomb Load:

 Internal: (4) 1600 lb

 External: (2) 2000 lb

Max Bomb Size: 4000 lb

Rocket Provisions:

 (8) 5" HVAR

Review Status, show changes in Martin, features - 19 May 58

*Classification cancelled or changed to Unclassified
AUTH: ASDC-ADD Sec Class Guide 17 Feb 64
By A. R. Tomblow tape 64
Signature and Grade 16 Dec 1966*

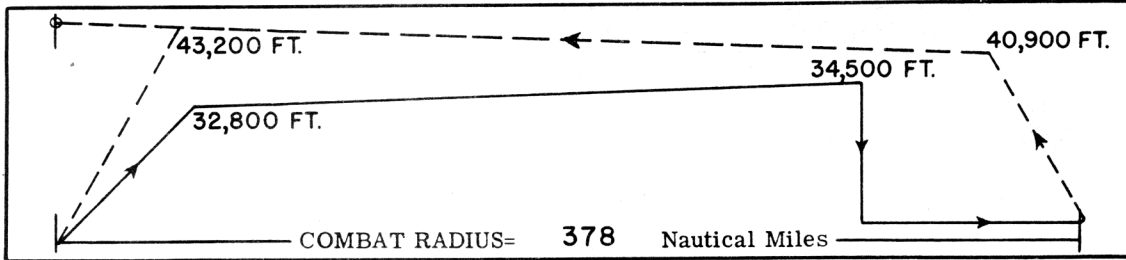
26 SEPT. 1949

~~SECRET~~

XB-51

1 Dec 1949 addn

Characteristics Summary Basic Mission.....XB-51



PERFORMANCE		
COMBAT RADIUS	COMBAT RANGE	COMBAT SPEED
378 naut. mi with 4000 lb payload at 463 knots avg. in 1.82 hours.	934 naut. mi with 4000 lb payload at 469 knots avg. in 2.07 hours.	500 knots at 35,000 ft alt, max power
		MAXIMUM SPEED
		560 knots at zero ft alt, max power
CLIMB	CEILING	TAKE-OFF
3720 fpm sea level, take-off weight normal power	32400 ft 100 fpm, take-off weight normal power	ground run 4340ft* 3650ft** no assist assisted
6980 fpm sea level, combat weight maximum power	38900 ft 500 fpm, combat weight maximum power	over 50 ft height 5590ft* 4540ft** no assist assisted
LOAD	WEIGHTS	STALLING SPEED
Bombs: 4000 lb Ammunition: 1280 rds/20mm	Empty..... 29,584 lb Combat... 41,457 lb Take - off 55,923* lb limited by mission	133 knots flaps down, take-off weight
Fuel: 2835 gal protected 100 % droppable 0 % external 0 %		TIME TO CLIMB —

N O T E S

1. PERFORMANCE BASIS:
 (a) Estimated data
 (b) In computing radius and range, specific fuel consumptions have been increased 5% to allow for variations of fuel flow in service aircraft.

2. Fuel density 6.42 lb/gal

3. REVISION BASIS: Revised T.O. weight to exclude weight of JATO fuel
 *Includes 1275 lb water/alcohol
 **Requires 800 lb JATO fuel increasing take-off gross weight to 56,723 lb