

FORM ASC-111A

MODEL (S)  
B-17F

## FLIGHT OPERATION INSTRUCTION CHART

SHEET 1 OF 7 SHEETS

GR. WT. 65,000 TO 60,000 POUNDS

EXTERNAL LOAD ITEMS  
NONE

CONDITION	R.P.M.	M.P. (IN HG.)	BLOWER POSITION	MIXTURE POSITION	DURATION IN MIN.	U.S. G.P.H.	IMP. G.P.H.
TAKE-OFF	2500	46	-	A.R.	5	608	-
MILITARY POWER	2500	46	-	A.R.	5	608	-
ENGINE ID	R-1820-97						

INSTRUCTIONS FOR USING CHART: Select figure in fuel column equal to or less than total amount of fuel in airplane. Move horizontally to the right or left and select a figure equal to or greater than the air miles to be flown. Vertically below and opposite desired cruising altitude read optimum cruising conditions. NOTES: (A) Avoid continuous cruising in Column I

except in emergency. (B) Columns (II, III, IV & V) toward the right progressively give increase in range at sacrifice in speed. (C) Manifold Pressure (M.P.), Gallons Per Hour (G.P.H.), are approximate maximum values for reference. (D) For quick reference, take-off and military power data are listed in the upper left corner of chart.

(NO WIND)

## ALTERNATE CRUISING CONDITIONS

(NO RESERVE FUEL ALLOWANCE)

I NORMAL RATED (MAX. CONT.)				FUEL	II				III				IV				FUEL	V (MAX. RANGE)			
RANGE IN AIR MILES				U. S. GALS.	RANGE IN AIR MILES				RANGE IN AIR MILES				RANGE IN AIR MILES				U. S. GALS.	RANGE IN AIR MILES			
STATUTE		NAUTICAL		①	STATUTE	NAUTICAL		STATUTE	NAUTICAL		STATUTE	NAUTICAL		STATUTE	NAUTICAL		①	STATUTE	NAUTICAL		
AT SL	AT 25,000	AT SL	AT 25,000		STATUTE	NAUTICAL		STATUTE	NAUTICAL		STATUTE	NAUTICAL		STATUTE	NAUTICAL			STATUTE	NAUTICAL		
				3612	212 U.S.	GALLONS NOT AVAILABLE IN FLIGHT								3612							
	1910		1660	3400	2240	1940		2480	2150		2750	2390		3400	3070	2660					
	1800		1560	3200	2110	1830		2330	2020		2590	2250		3200	2890	2500					
	1690		1470	3000	1980	1720		2190	1900		2430	2110		3000	2700	2350					
	1580		1370	2800	1840	1600		2040	1770		2270	1970		2800	2520	2190					
	1480		1270	2500	1710	1480		1900	1650		2100	1820		2600	2350	2040					
	1350		1170	2400	1580	1370		1750	1520		1940	1680		2400	2160	1880					
	1240		1080	2200	1450	1260		1600	1390		1780	1540		2200	1980	1720					
	1130		980	2000	1320	1150		1480	1270		1620	1410		2000	1810	1570					
	1010		880	1800	1190	1030		1310	1140		1480	1270		1800	1620	1410					
	900		780	1600	1050	910		1170	1010		1300	1130		1600	1440	1250					

CONTINUED ON SHEET 2

OPERATING DATA						①	OPERATING DATA						OPERATING DATA						①	OPERATING DATA												
R.P.M.	I.A.S. M.P.H.	MIX-TURE	M.P. IN HG.	U.S. G.P.H.	IMP. G.P.H.	DENSITY ALT. IN FEET	R.P.M.	I.A.S. M.P.H.	MIX-TURE	M.P. IN HG.	U.S. G.P.H.	IMP. G.P.H.	R.P.M.	I.A.S. M.P.H.	MIX-TURE	M.P. IN HG.	U.S. G.P.H.	IMP. G.P.H.	R.P.M.	I.A.S. M.P.H.	MIX-TURE	M.P. IN HG.	U.S. G.P.H.	IMP. G.P.H.	DENSITY ALT. IN FEET	R.P.M.	I.A.S. M.P.H.	MIX-TURE	M.P. IN HG.	U.S. G.P.H.	IMP. G.P.H.	
2300	158	A.R.	38	413		30000																			30000							
2300	172	A.R.	38	413		25000																			25000							
2300	183	A.R.	38	413		20000	2150	151	A.R.	31.5	284														20000							
2300	192	A.R.	38	413		15000	2150	158	A.R.	32	296		2100	160	A.L.	31	253		2050	149	A.L.	30	210		15000							
2300	197	A.R.	38	413		12000	2150	172	A.R.	32	290		2100	167	A.L.	31	252		2050	157	A.L.	30	212		12000							
2300	202	A.R.	38	413		9000	2150	175	A.R.	31.5	280		2100	173	A.L.	31	250		2050	164	A.L.	30	212		9000							
2300	207	A.R.	38	413		6000	2100	179	A.L.	31.5	273		2100	178	A.L.	31	245		2050	170	A.L.	30	211		6000							
2300	210	A.R.	38	413		3000	2100	183	A.L.	31.5	269		2100	182	A.L.	31	240		2050	175	A.L.	29.5	208		3000							
2300	214	A.R.	38	413		S.L.	2100	187	A.L.	31	282		2100	185	A.L.	30.5	235		2050	179	A.L.	29	203		S.L.							

- ① INDICATED ALTITUDE CORRECTED FOR FREE AIR TEMPERATURE.  
 ② ALLOW 212 U. S. GALS. - IMP. GALS. FOR WARM UP.  
 TAKE OFF AND CLIMB TO 5,000 FEET ALTITUDE  
 RETURN FUEL FLOWS TO TAKE  
 USE FUEL FROM TANKS IN THE FOLLOWING ORDER.

BOLD NUMBERS: Use Auto-Bld  
 LIGHT NUMBERS: Use Auto-Less  
 WITH TWO SPEED BLOWER Use high  
 Mixture above heavy line only

I.A.S. Indicated Air Speed  
 M.P. Manifold Pressure (in Hg)  
 U.S.G.P.H. U. S. Gallons Per Hour  
 IMP.G.P.H. Imperial Gallons Per Hour  
 S.L. Sea Level

REFER TO "SPECIFIC ENGINE FLIGHT CHART" FOR ADDITIONAL ENGINE OPERATION DATA.

RANGES SHOWN ARE 90% OF FLIGHT TEST VALUES.