

The limitations included in this section have been approved by the Federal Aviation Administration, and they must be observed in the operation of the C99 Airliner.

AIRSPD LIMITATIONS			
SPEED	KCAS	KIAS	REMARKS
Maneuvering Speed VA (11,300 pounds)	169	165	Do not make full or abrupt control movements above this speed.
Maximum Flap Extension/ Extended Speed VF/VFE Approach Position - 30% Full Down Position - 100%	182 144	178 140	Do not extend flaps or operate with flaps in prescribed position above these speeds.
Maximum Landing Gear Operating Speed VLO Extension Retraction	156 156	152 152	Do not extend or retract landing gear above the speeds given.
Maximum Landing Gear Extended Speed VLE	156	152	Do not exceed this speed with landing gear extended.
Air Minimum Control Speed VMCA	94	91	This is the lowest airspeed at which the airplane is directionally controllable when one engine suddenly becomes inoperative and the other engine is at take-off power. (See definition in Section I.)
Maximum Operating Speed VMO MMO	226 .46 Mach	224	Do not exceed this airspeed in any operation.

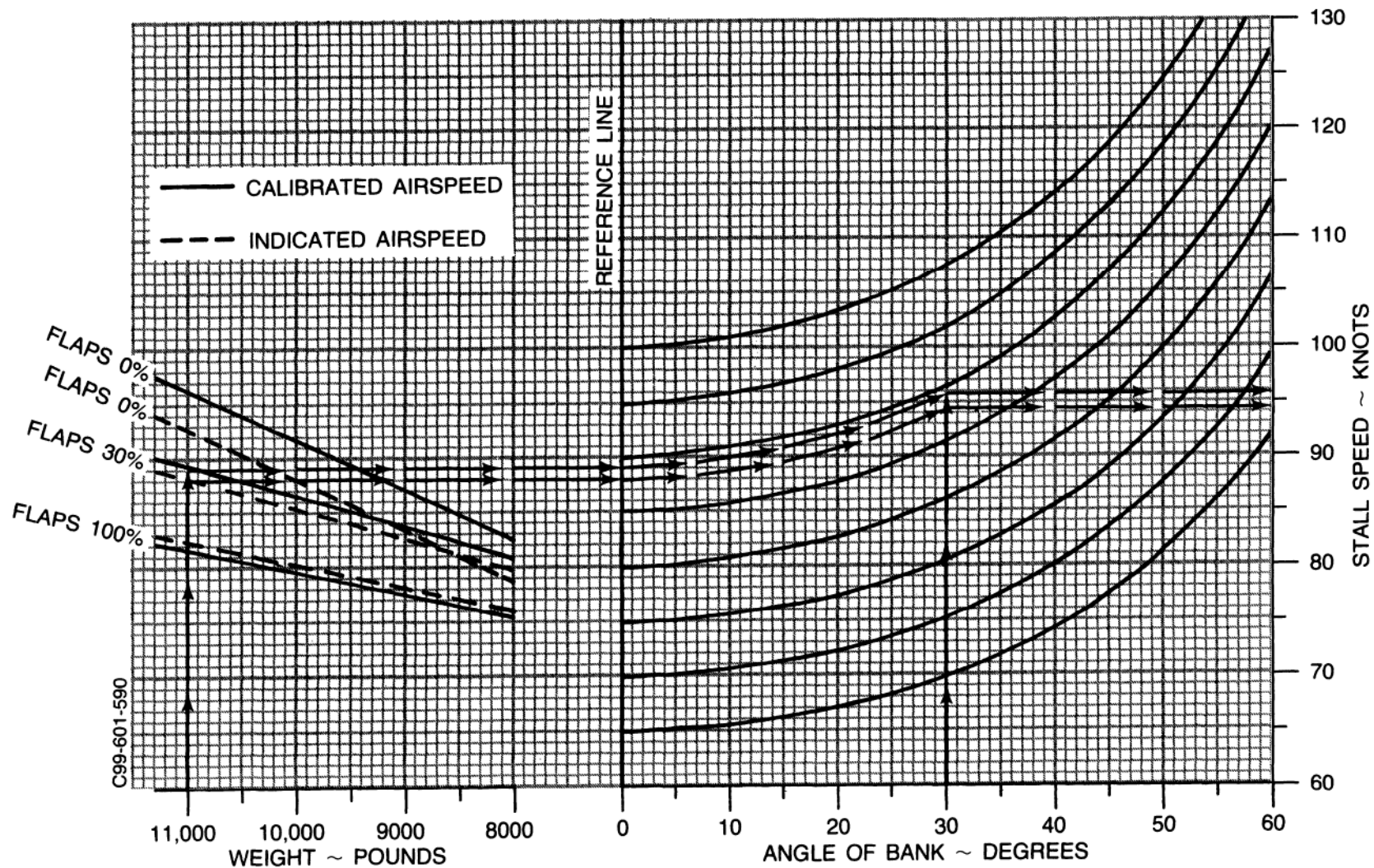
STALL SPEEDS – POWER IDLE

- NOTES: 1. MAXIMUM ALTITUDE LOSS EXPERIENCED WHILE CONDUCTING STALLS IN ACCORDANCE WITH FAR 23.201 WAS 800 FEET.
2. MAXIMUM NOSE DOWN PITCH ATTITUDE AND ALTITUDE LOSS DURING RECOVERY FROM ONE-ENGINE-INOPERATIVE STALLS PER FAR 23.205 ARE APPROXIMATELY 10° AND 150 FEET RESPECTIVELY.

EXAMPLE:

WEIGHT 11,000 LBS
 FLAPS 30%
 ANGLE OF BANK 30°

STALL SPEED 96 KCAS
 95 KIAS



TAKE-OFF WEIGHT – FLAPS 0%

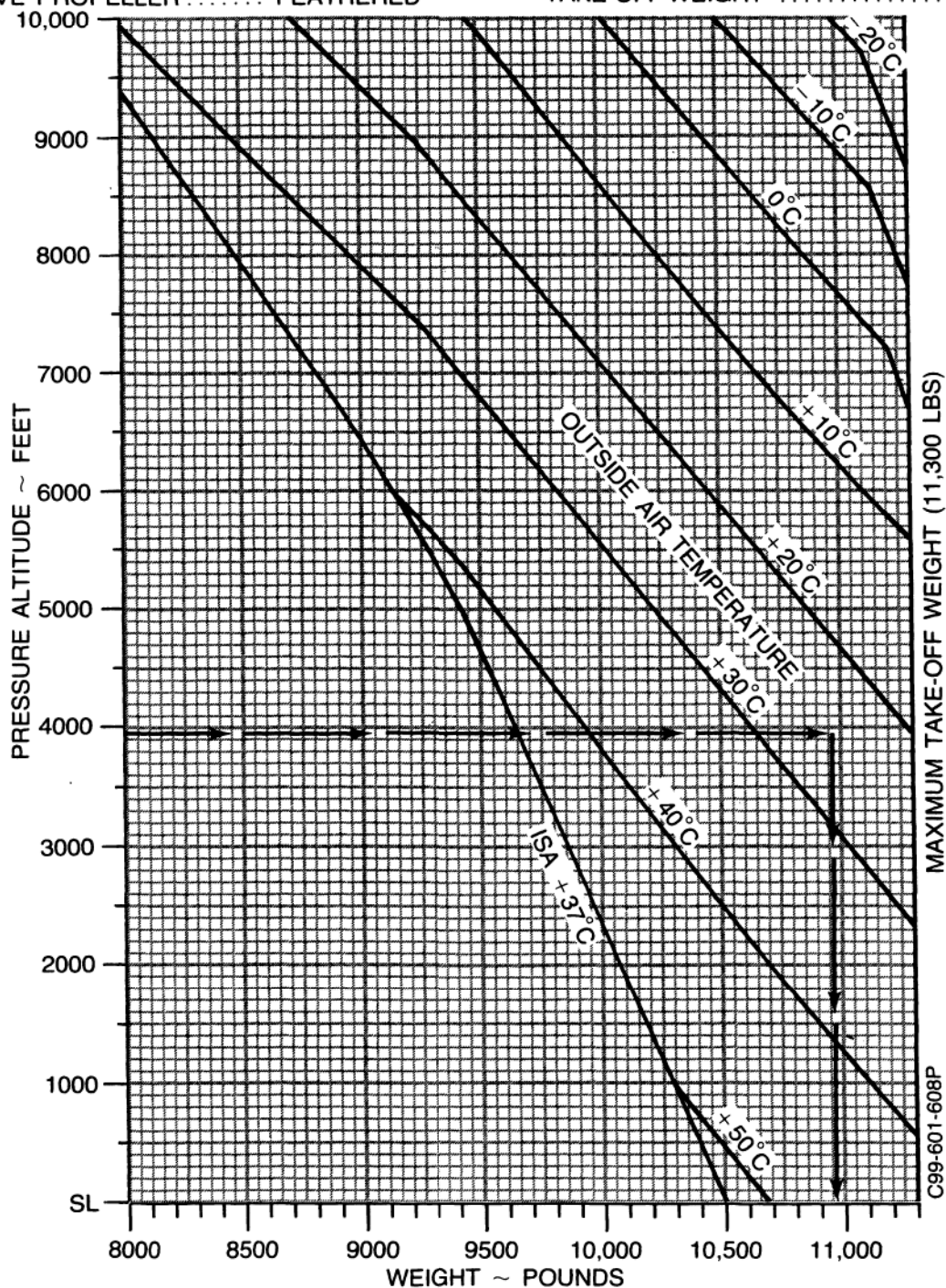
TO ACHIEVE POSITIVE ONE-ENGINE-INOPERATIVE CLIMB AT LIFT-OFF

ASSOCIATED CONDITIONS:

POWER TAKE-OFF
FLAPS 0%
LANDING GEAR DOWN
INOPERATIVE PROPELLER FEATHERED

EXAMPLE:

PRESSURE ALTITUDE 3965 FT
OAT 25°C
TAKE-OFF WEIGHT 10,960 LBS



TAKE-OFF DISTANCE – FLAPS 0%

ASSOCIATED CONDITIONS:

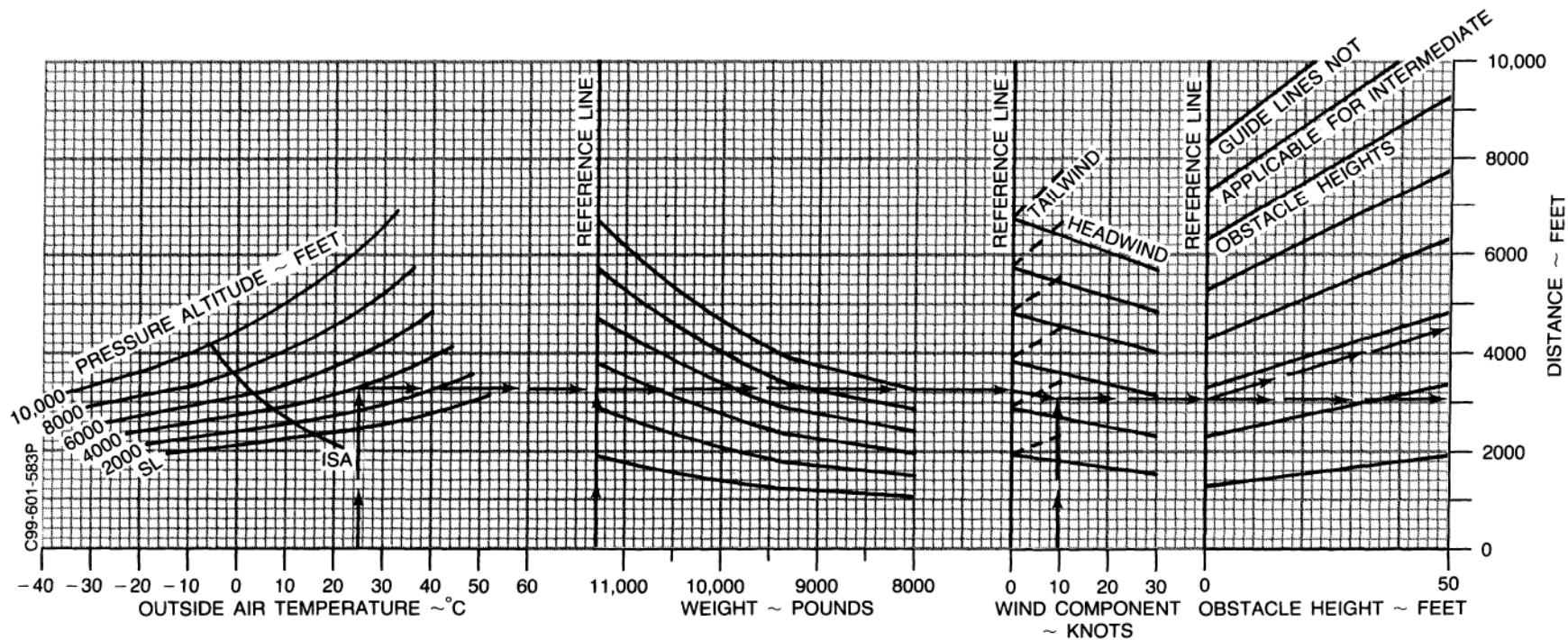
POWER TAKE-OFF POWER SET
BEFORE BRAKE RELEASE
FLAPS 0%
LANDING GEAR RETRACT AFTER LIFT-OFF
RUNWAY PAVED, LEVEL, DRY SURFACE

WEIGHT ~ POUNDS	TAKE-OFF SPEED ~ KNOTS	
	ROTATION	50 FT
11,300	107	115
11,000	106	114
10,000	102	111
9000	99	109
8000	99	108

EXAMPLE:

OAT 25°C
PRESSURE ALTITUDE 3965 FT
TAKE-OFF WEIGHT 11,300 LBS
HEADWIND COMPONENT 9.5 KTS

GROUND ROLL 3090 FT
TOTAL DISTANCE OVER
50-FT OBSTACLE 4500 FT
TAKE-OFF SPEED AT ROTATION 107 KTS
TAKE-OFF SPEED AT 50 FT 115 KTS



With Pod Installed

BEECHCRAFT
C99 Airliner

TAKE-OFF CLIMB GRADIENT – FLAPS 0%

ONE ENGINE INOPERATIVE

ASSOCIATED CONDITIONS:

POWER TAKE-OFF
FLAPS 0%
LANDING GEAR UP
INOPERATIVE PROPELLER ... FEATHERED

WEIGHT ~ POUNDS	CLIMB SPEED ~ KNOTS
11,300	115
11,000	114
10,000	111
9000	109
8000	108

EXAMPLE:

OAT 25°C
PRESSURE ALTITUDE ... 3965 FT
WEIGHT 10,000 LBS
CLIMB GRADIENT 4.1%
CLIMB SPEED 111 KTS

