APPROACH BRIEFING

- ILS CAT II APPROACH RUNWAY ____(airport), (page#),
 Effective Date_____
- LOCALIZER FREQ _____, APPROACH COURSE _____, CROSS
 FIX ____@ (altitude).
- FLAPS _____, AUTOBRAKE _____.
- DECISION HEIGHT IS _____FEET, SET ON THE RADIO ALTIMETER.
- AFTER APPROACH IS ARMED, I WILL ENGAGE THE 2nd AUTOPILOT.
- ON THE GLIDESLOPE AND PRIOR TO THE FAF, WE WILL BE FULLY CONFIGURED FOR LANDING.
- WE WILL BOTH MONITOR THE INSTRUMENTS WHILE ON APPROACH. YOU WILL REMAIN HEADS DOWN THROUGHOUT THE APPROACH, LANDING, ROLL OUT AND / OR GO-AROUND.
- AT THE 1000 FOOT CALL, IF APPROPRIATE, I WILL CALL "STABILIZED, MISSED APPROACH ALTITUDE _____ SET".
- AT THE 500 FOOT CALL, YOU WILL CALL "FLARE ARMED". I WILL GO HEADS UP AND SCAN FOR VISUAL CUES.
- AT "MINIMUMS" I WILL CALL EITHER "LANDING" OR "GO AROUND".
- IN THE EVENT OF A GO-AROUND: (<u>BRIEF MISSED</u> <u>APPROACH PROCEDURE</u>).
- CALL ANY DEVIATIONS FROM FLIGHT PATH, AFDS ANNUNCIATORS OR AN UNSTABILIZED CONDITION.

LIMITATIONS AND REQUIREMENTS

- CAT II approaches will be flown with 2 autopilots engaged to an autoland with Flap 30 or 40. Flap 40 should be used to improve cockpit visibility.
- Auto brakes must be used when serviceable.
- Maximum and minimum glideslope angles for autoland are 3.25 degrees and 2.5 degrees, respectively.
- Max allowable winds based on autoland operations:

AIRCRAFT	HEADWIND	CROSSWIND	TAILWIND
C-FFLC, C-FFLJ	25 kts	20 kts	15 kts
C-FFLA	25 kts	20 kts	10 kts

- Airport operations indicate that Reduced or Low Visibility Procedures are in use and that CAT II approaches available.
- PIC has at least 300 hours as PIC and 100 hours on the aircraft type.

APPROACH BAN (CANADA)

A CAT II approach will not be continued beyond the FAF inbound, or where there is no FAF, the point where the final approach course is intercepted, unless the RVR is equal to or greater than the minimum specified in the following table:

MINIMUM RVR	MEASURED RVR
RVR "A" and "B"	1200 / 600

EQUIPMENT R	EQUIREMENTS
Two autopilots	Required
Two sources of Electrical Power	Required - APU may be 1 of the sources.
Two independent Flight Directors	Required
Two ILS Receivers	Required
Two Air Data Computers	Required
Two IRSs	Required
Two Radar Altimeters	Required - To include independent displays
Two Flight Mode Annunciations	Required - To include independent displays
Duplicate Flight Instruments	Required - To include 2 PFDs/EHSIs
Avionics Failure Warning System	Required - To include ILS comparator and avionics warning system
Missed Approach Guidance	Required - To include 2 independent Flight Director Go- Around modes
Communication Equipment	One VHF Communication radio required
Duplicate equipment to annunciate DA(H)	Required - To include 2 displays of DA(H) annunciation
Windshield Wipers	Required for each pilot

USA OPERATIONS

- DA(H) 150 ft, or as published, whichever is higher.
- The required RVR for the runway of intended landing must be:

TDZ RVR	MID RVR	Rollout RVR
1600	Not Available	Not Available
1200	1200 - controlling if available	600 - required
The TDZ RVR report is required and controlling	Mid RVR reports, if available, are controlling. Mid field reports, substituted for unavailable Rollout reports, must be 600 RVR or greater.	Rollout RVR report is required and controlling for all CAT II operations below 1600 RVR, except a mid or far end RVR report, if available, may be substituted for a Rollout RVR, if the Rollout RVR report is not available. Far end reports, substituted for unavailable Rollout reports, must be 300 RVR or greater.

TRAINING USE ONLY

STARTING WITH GROUND AIR (AC ELEC AVAIL) (REFER TO SP SECTION 7)

ENGINE NO. 1 MUST BE STARTED FIRST. WHEN CLEARD FOR START

APU BLEED AIR SWITCH OFF
ENGINE NO. 1 START ACCOMPLISH
Use normal start procedures.

WARNING: To minimize the hazard to ground personnel, the external air should be disconnected, and engine no. 2 started using the Engine Crossbleed Start procedure.

WHEN ENGINE NO. 1 STABILIZED

GEN 1 SWITCH ON
GROUND AIR SOURCE REMOVED
GROUND POWER REMOVED Accomplish ENGINE CROSSBLEED START when
appropriate.

ENGINE CROSSBLEED START (REFER TO SP SECTION 7)

DO NOT ACCOMPLISH A CROSSBLEED START DURING PUSHBACK

BEFORE USING THIS PROCEDURE, ENSURE THAT THE AREA TO THE REAR IS CLEAR.

ENGINE BLEED AIR SWITCHES Of
APU BLEED AIR SWITCH OF
PACK SWITCHES OF
ISOLATION VALVE SWITCH AUTO

Ensures bleed air supply for engine start

ENGINE THRUST LEVER NO. 1 - - - - - - - ADVANCE

Advance thrust lever until bleed duct pressure indicates 30 psi

ENGINE NO. 2 - - - - - - - - - START

Use normal start procedure with crossbleed air.

After starter cutout, adjust thrust on both engines, as required.

Do the BEFORE TAXI checklist and continue with normal operations.

RUNWAY CHANGE AFTER PUSHBACK

WARNING: When a runway change is received after pushback the aircraft should be stopped before the necessary changes to the FMC are made.

FMC - - - ENTER NEW RUNWAY AND SID AS APPLICABLE TLR - - - - DETERMINE ASSUMED TEMP AND V SPEEDS

Enter new assumed temperature and V speeds in FMC as applicable. Review flap setting and set as required.

MCP---- SET NEW V2 AND RUNWAY HEADING BRIEFING---- BRIEF NEW DEPARTURE PROCEDURE Continue with normal operations.

NO ENGINE BLEED TAKEOFF (REFER TO SP SECTION 2)

WHEN MAKING A NO ENGINE BLEED TAKEOFF WITH THE APU OPERATING

TAKEOFF

- **Note:** If anti-ice is required for taxi, configure for a "No Engine Bleed Takeoff" just prior to takeoff.
- **Note:** If anti-ice is not required for taxi, configure for a "No Engine Bleed Takeoff" just after engine start.

RIGHT PACK SWITCH AUTO
ISOLATION VALVE SWITCH CLOSE
LEFT PACK SWITCH AUTO
ENGINE NO. 1 BLEED AIR SWITCH OFF
APU BLEED AIR SWITCH ON
ENGINE NO. 2 BLEED AIR SWITCH OFF
TRIM AIR SWITCHON
WING ANTI-ICE SWITCH OFF

The WING ANTI-ICE switch must remain OFF until the engine BLEED air switchers are repositioned ON and the ISOLATION VALVE switch is repositioned to AUTO.

AFTER TAKEOFF

Note:	If engine failure occurs, do not position engine	
	BLEED air switches ON until reaching 1500 feet or	
	until obstacle clearance height has been attained.	

ENGINE NO. 2 BLEED AIR SWITCH ON
APU BLEED AIR SWITCH OFF
When CABIN rate of CLIMB indicator stabilizes:
ENGINE NO. 1 BLEED AIR SWITCH ON
ISOLATION VALVE SWITCH AUTO

