

ELEC EMER CONFIG

FL 240



ELEC EMER
LAND ASAP

ECAM ACTIONS

DECISION

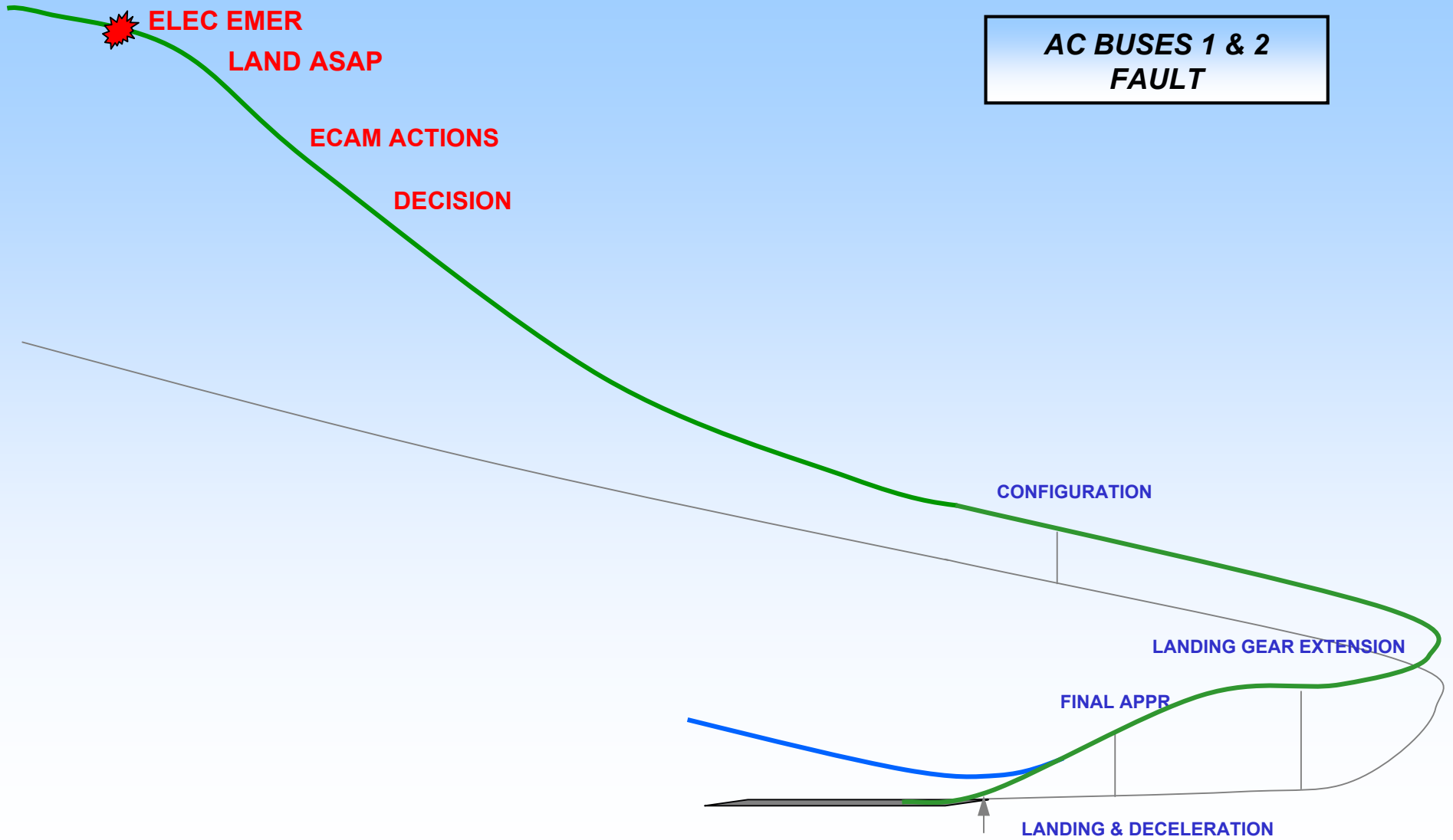
**AC BUSES 1 & 2
FAULT**

CONFIGURATION

LANDING GEAR EXTENSION

FINAL APPR

LANDING & DECELERATION



PF

PNF

1. ELEC EMER CONFIG



DETECTION

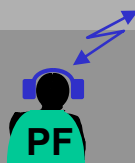
CM1 ⇒ PF

FLIES THE AIRCRAFT ⇒ **LOSS OF AP, A/THR**



NAVIGATES ⇒ **LAND ASAP**...Short term decision

CONSIDER AUTOMATION USE



COMMUNICATES
MAYDAY

ECAM ACTIONS

ECAM PROCEDURE

CFM :

IAE :

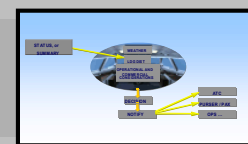
SYSTEM DISPLAY

STATUS

USE SUMMARY.....CRUISE part

RETURN TO NORMAL TASK SHARING

DECISION



FLIGHT IS FROZEN TO PERMIT THE PROCEDURE APPLICATION ON THE M/FTD

PF

PNF

2. APPROACH PREPARATION

ECAM STATUS.....REVIEW
 SUMMARY.....USE 
 FMGS.....PREPARE
 APPR BRIEFINGPERFORM

Done upon PF request



FMGS PREPARATION :

STANDARD

+

MANUAL INSERTION OF **VAPP** 

APP BRIEFING :

STANDARD

+

STATUS

+



ELEC EMER CONFIG summary :
APP, LDG & G/A parts

FLIGHT IS FROZEN TO PERMIT THE PROCEDURE APPLICATION ON THE M/FTD


PF

PNF

3. APPROACH

When landing gear down :

ECAM ACTIONS

Approach synthesis 

FLIGHT IS FROZEN TO PERMIT THE PROCEDURE APPLICATION ON THE M/FTD

ELEC EMER CONFIG

Electrical Emergency configuration = loss of all AC BUSES

It may be caused by :

➤ the loss of one engine and the failure of the opposite generator

OR

➤ the loss of all GEN

OR

➤ the loss of all engines

➤ simultaneous loss of all GEN



suspect a short-circuit



Probability of a successful
APU GEN coupling is low

➤ Be aware that each APU start attempt reduces the battery time availability by approx. 3.5 mn.

PF

PNF

1. ELEC EMER CONFIG



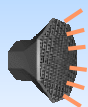
DETECTION

CM1 ⇒ PF

FLIES THE AIRCRAFT ⇒ LOSS OF AP, A/THR

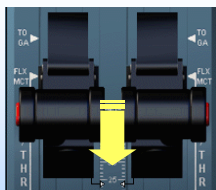


**ENG THRUST
LOCKED**



Single Chime
(every 5 sec)

Move the thrust levers to
the actual thrust position



n

ACTIONS

CLIMB PROCEDURE

CFM :

IAE :

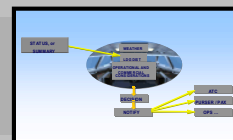
SYSTEM DISPLAY

STATUS

CRUISE SUMMARY.....CRUISE part

AL TASK SHARING

SION



PROCEDURE APPLICATION ON THE M/FTD

PF

PNF

1. ELEC EMER CONFIG



The electrical network is powered by batteries only during 3-5 sec while the RAT extends and the EMER GEN comes in line

FLIES THE
NAVIGATES
CONSIDER



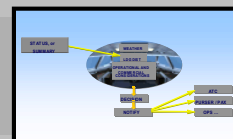
IAE :

STATUS

USE SUMMARY.....CRUISE part

RETURN TO NORMAL TASK SHARING

DECISION

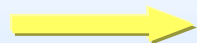
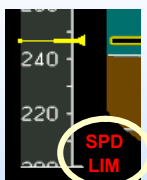


FLIGHT IS FROZEN TO PERMIT THE PROCEDURE APPLICATION ON THE M/FTD



GRAVITY FUEL FEEDING

- **ADIRS 2 & 3 remain supplied by batteries for 5 minutes after the loss of both engine generators. Therefore, switching them off will save battery charge**



Limit speeds & speed trend are recovered

FAC 1 reset

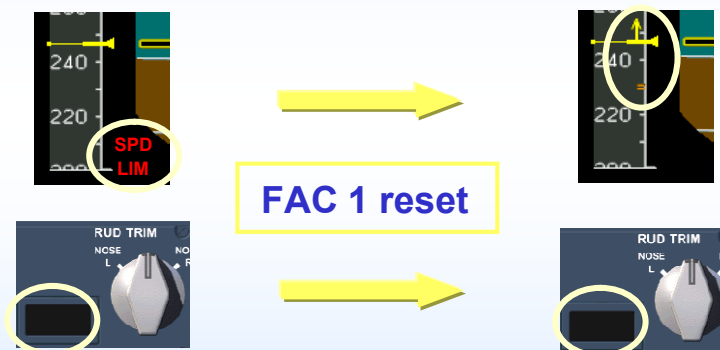


The rudder trim is recovered although no indication is available



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Setting N1 MODE to **ON** changes the thrust control from EPR mode to N1 rated mode.

Overhead panel



SYSTEM DISPLAY



Optional

Only EWD available :



If needed, analyse SYSTEM page displayed on the upper ECAM screen:

OTHER SYSTEM PAGES

ELEC

CONFIRM....."CLEAR PRESS"

ELEC key on ECP.....PRESS and HOLD
ELEC PAGE DISPLAYED.....ANALYSE
REQUEST....."CLEAR ELEC ?"

PRESS key on ECP.....RELEASE

STATUS

To display the status :

CONFIRM....."READ STATUS"

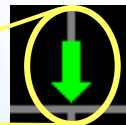
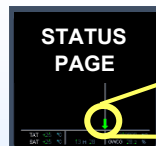
ANNOUNCE....."STATUS ?"
STATUS key on ECP.....PRESS and HOLD



**ELEC EMER CONFIG –
SYS REMAINING**

| | | | |
|-----------------------------------|---------------------|-----------|---------------|
| ELEC EMER CONFIG SYS REMAINING | EMER GEN RUNNING | BAT ONLY | |
| | | IN FLIGHT | ON THE GROUND |

➤ Status overflow :



... release the STATUS key on ECP and push it again within 2 sec to display the next STATUS page



Compute the LDG DIST with the SUMMARY, according to the estimated weight at DEST

Review *FCOM 3.02 procedure (If time permits)*



Important note regarding
• fuel consumption
• speed indication reliability



USE OF SUMMARY



EWD PROC

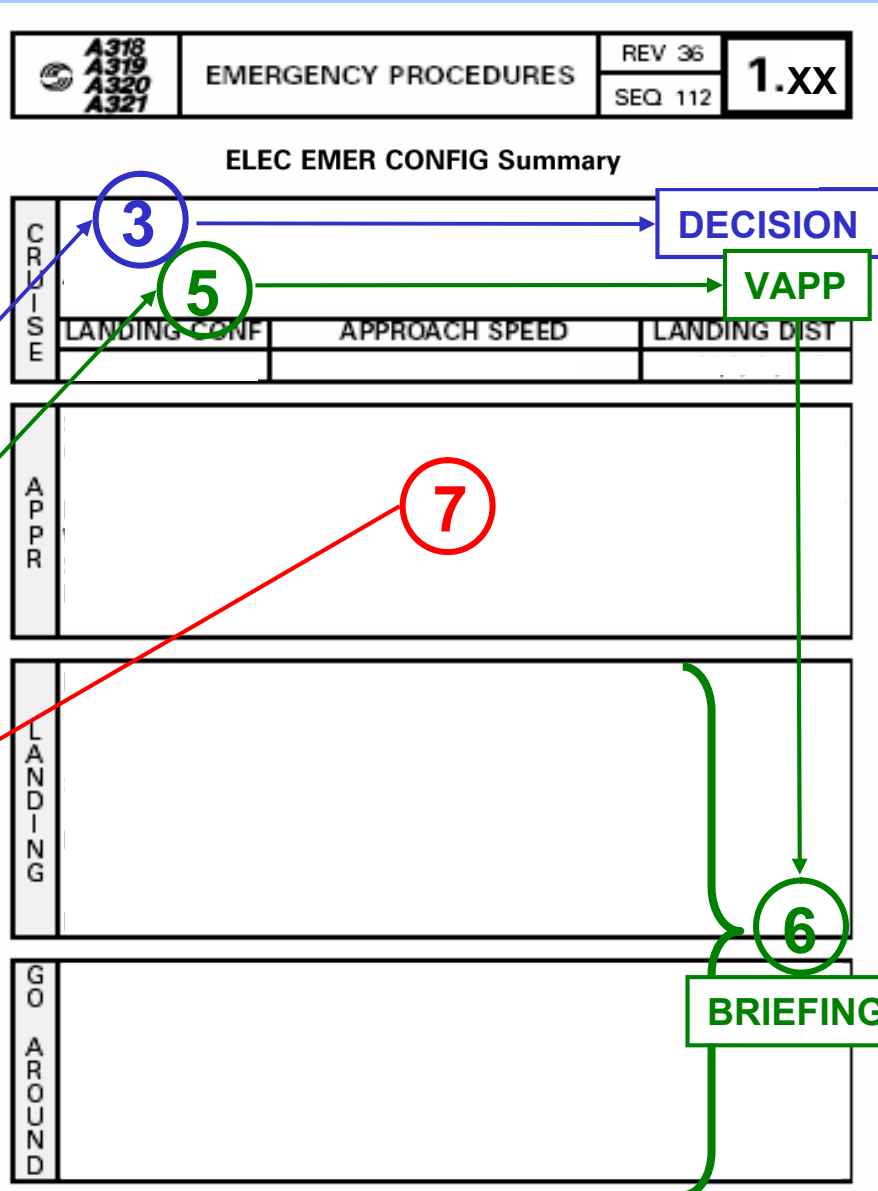
FF 11200 CLB 1.531
N3 % 95.5 N1 % 86.9
FOB: 70000

AUTO FLT AP OFF
HYD [G+B SYS LO PR] LAND ASAP
- RAT MAN ON *FACTL
- MIN RAT SPEED 140 KT
- GREEN ENG 1 PUMP OFF
- GREEN ENG 2 PUMP OFF
- BLUE ENG 21 PUMP OFF

STATUS

MAX SPEED 320/77 INOP SYS
MAX BRK PR 1000 PSI
MANUVELY [WITH] [ARE] PROT
- FOR LDG USE FLAPS 3 REVERSER 1+2
- GPWS FLAP MODE OFF SPLR 1+2+4+5
- WHEN CONF 3 AND VAPP FLAPS
- LG GRVITY EXTN YAW DAMPER
APPR SPD : VREF + 25 KT AP 1+2
LDG DIST PROC APPLY ANTI SKID
ALTN LAW : PROT LOST N/W STEER
WHEN LG DOWN : DIRECT LAW LG RETRACT
BRK Y ACQ PR ONLY CARGO DOOR
SLATS SLOW EMER GEN
CAT 1 ONLY G ENG 1 PUMP
B ELEC PUMP

TAT +12 °C GW 000000 000
SAT +4 °C 13 H 28



USE OF SUMMARY



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STS

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TAT +12 °C GW 000000 000
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A318 A319 A320 A321 | EMERGENCY PROCEDURES | REV 36 | 1.XX
SEQ 112

ELEC EMER CONFIG Summary

| | | |
|-----------|--------------|----------------|
| CRUISE | 3 | DECISION |
| | 5 | VAPP |
| | LANDING CONF | APPROACH SPEED |
| | | LANDING DIST |
| APPR | 7 | |
| LANDING | | 6 |
| | | BRIEFING |
| GO AROUND | | |

1

2

4

8

IN CRZ

APP PREP

APP

DECISION

VAPP

7

6

BRIEFING

APPROACH SPEED COMPUTATION

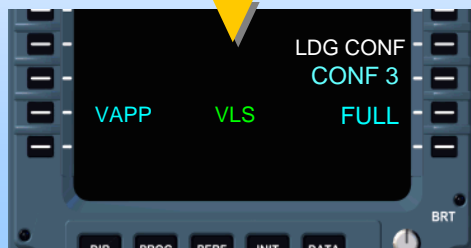
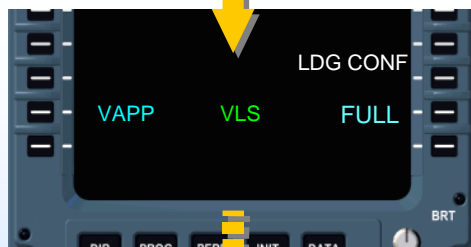
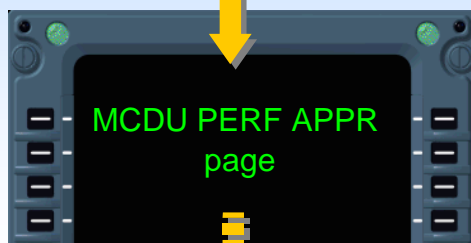
Check that **NEW DEST** has been entered



Ensure that VLS & VAPP are based on the proper weight at destination

$$VAPP = VREF + \Delta VREF (10 \text{ kt}) + \text{wind correction}$$

| WIND CORRECTION | |
|-------------------------|---------------------------------------------------------------------|
| $\Delta VREF \geq 20KT$ | $\Delta VREF < 20KT$ |
| NO WIND CORRECTION | 1/3 HEADWIND ($\Delta VREF + \text{WIND CORR}$ LIMITED TO 20KT) |



$\Delta VREF$ is given:

- On the ECAM, and
 - On the QRH
- Select CONF FULL
 - Read VREF = VLS CONF FULL
 - Add 10 kts ($\Delta VREF$) to VREF
 - Add the wind correction
 - Enter VAPP manually
(Check minimum RAT speed)

LDG in CONF 3 :

➔ Select CONF 3

APPROACH SYNTHESIS



Approach flown manually
with raw data : no

ALTN LAW

AP
FD
A/THR

GO AROUND

⇒ BACK TO ALTERNATE LAW

CONF 1

CONF 2

FINAL APPR

⇒ NO AUTO CALLOUTS

CONF 3

LANDING GEAR
EXTENSION

F/CTL DIRECT LAW

⇒ MANUAL PITCH TRIM USE

LANDING & DECELERATION

BE AWARE OF :

- ⇒ NO REVERSER
- ⇒ NO NWS
- ⇒ NO ANTISKID
(BRK PRESSURE MONITORED BY PNF)
- ⇒ PARTIAL LOSS OF GRND SPOILERS

