Chapter 1 – Information Publication

1. Where would you find information regarding Customs and Health facilities?

a. ATCC broadcasts.

b. NOTAMs.

c. NAV/RAD supplements.

<mark>d. AIPs.</mark>

2. Where would you find information regarding Search and Rescue procedures?

a. ATCC broadcasts.

b. NOTAMs.

c. . SIGMETs.

<mark>d. AIPs.</mark>

3. In which document would you find information on known short-term unserviceability of VOR, TACAN, and NDB? a. NOTAM.

b. Aeronautical Information Publication (AIP).

c. SIGMET.

d. ATCC.

4. Where may details of temporary Danger and Restricted Airspace be found?

a. SIGMETs.

b. Aeronautical Information Circulars (AIC).

c. NOTAM and Aeronautical Information Publication (AIP).

d. ATCC.

5. Details of temporary danger areas are published:

a. in AICs.

b. on the appropriate chart.

c. by VOLMET.

d. in NOTAMs.

6. What are the types of NOTAM?

a. Temporary, short-notice, permanent.

b. A, B, C.

c. NOTAMN, NOTAMR, NOTAMC.

d. A, E, L.

Chapter 2 – Topographical Chart

Complete the flight log on page 32 (opposite), then answer questions 1 to 12. NB. If you have not yet done Heading and Groundspeed on the navig-ation computer then you cannot completely finish the log and answer questions 1 & 7

An aircraft is due to depart Vilshofen at 10:30 then fly the following route: Vilshofen to Regensburg Regensburg to Nordlingen Nordlingen to Mengen Complete the VFR flight log then answer the questions below

1. What is your ETA at Mengen?

a. 01:38

<mark>b. 12:08</mark>

c. 11:28

d. 10:58

2. What type of airport is Vilshofen?

a. Military airport with a hard runway.

b. Civil airport with a grass runway.

c. Civil airport with a hard runway.

d. Military airport with grass runway.

3. What type of navaid is Roding? (N4902 E01232)

a. An VOR on 114.70 Khz.

b. An NDB on 114.70 Khz.

c. A DME on 114.70 Mhz.

d. A VORTAC on 114.70 Mhz.

4. What does the (V) indicate in the description of Straubing (Wallmuhle) airport? (N4854 E01231)

- a. VFR flights only permitted.
- b. Very High Frequency (VDF) direction finding available.

c. Open 24 hours.

- d. Very high landing fees charged for IFR flights.
- 5. While flying at FL45 between Regensburg and Nordlingen does ED(R)-140 affect your route?

a. No — its vertical limits are from FL60 to FL100.

- b. No its vertical limits are from 6000 ft AGL to FL100.
- c. Yes as the restricted area base can come down to the surface.
- d. Yes but a clearance through can be obtained from Neuburg airbase.

6. What is the airport elevation and runway length of Nordlingen?

a. 500 metres 1384 feet

b. 1385 metres 500 feet

c. 13307 feet 500 metres

d. 1384 feet 500 metres

7. When flying between Nordlingen and Mengen; what is your drift?

- a. 10º port.
- b. 7° port.
- c. 7° starboard.
- d. 10° starboard.

8. You select Gerstetten (N4837 E01003) airfield as an en-route alternate; what type of airfield is it?

- a. Civil with hard runway.
- b. Civil with grass runway.
- c. Glider side.
- d. Military with hard runway.

9. What is the Augsburg ATIS frequency?

- a. 126.95 Mhz.
- b. 124.97 Mhz.

c. 115.90 Mhz.

d. 124.57 Mhz.

10. While flying towards Mengen and established on track; what is your QTE?

a. 223°(M).

b. 043°(M).

c. 043°(T).

d. It is not possible to receive a QTE.

- 11. Name all the radio navigation aids you could use at Mengen?
- a. VDF and an NDB on 401 Khz.
- b. VDF and an NDB on 401 Mhz.
- c. Only an NDB on 401 Khz.
- d. There are no radio navigation aids serving Mengen.

12. With a surface wind of $300^{\circ}/30$ kts; which airfield would be a better destination alternate, assuming runway length is not restrictive.

a. Friedrichshafen.

b. Pfullendorf.

c. Saulgau.

d. Albstadt.

Chapter 5 – Single Engine Piston Aeroplane

1. Refer to CAP 697 SEP1, fig 2.1 Given: Aerodrome elevation 2,500 ft,

OAT	+10°C
Initial weight	3,500 lb
Climb to	FL140 OAT -5°C

What is the climb time, fuel, NAM?

a. 22 min	6.5 g	46 nam
b. 24 min	7.5 g	50 nam
c. 2 min	1.0 g	4 nam
d. 26 min	8.5 g	54 nam

2. Refer to CAP697 SEP1, fig 2.2.3 Given FL75 OAT +10°C

Lean mixture 2300 RPM

 Find fuel flow (GPH) gallons per hour and TAS.

 a. 68.5 GPH
 160 kts

 b. 11.6 GPH
 160 kts

 c. 71.1 GPH
 143 kts

 d. 11.6 GPH
 143 kts

3. Refer to CAP 697 SEP1 fig 2.4

Given:

Aeroplane mass at start up	3,663 lbs
Fuel load (density 6lbs/gal)	74 gal
Take-off altitude	sea level
Headwind	40 kt
Cruise altitude	8,000 ft
Power settings	full throttle
-	2300 RPM

20°C lean of peak

Calculate the range a. 548 nm b. 844 nm c. 730 nm d. 633 nm

4. Refer to CAP697, SEP1, fig 2.5

Given	FL75
	Lean mixture
	Full throttle / 2300 RPM
Take-off fuel	444 lbs
Take-off from	MSL

Find endurance in hours a. 5 hrs 20 mins b. 4 hrs 42 mins c. 5 hrs 12 mins d. 5 hrs 23 mins

Chapter 6 – Multi Engine Piston Aeroplane

Refer to CAP 697, MEP, Fig 3.1.

A flight is to be made from an airfield (elevation 3,000 ft) to another. The cruising level is FL 120, temp ISA. The OAT at the departure airfield is $\pm 10^{\circ}$ C, the wind component in the climb is ± 30 kts. Calculate the fuel used, time and distance flown in the climb.

a. 8 gals	13 mins	26 ngm
-----------	---------	--------

b 8 gals	14 mins	33 ngm
c. 7 gals	14 mins	19 ngm
d. 11 gals	19 mins	34 ngm

2. Refer to CAP697 MEP Fig 3.6.

A flight is to be made to an airfield, pressure altitude 3,000 ft, in a MEP aircraft. The forecast OAT for the airfield is $+1^{\circ}$ C and the cruising level will be FL 110, OAT -10° C. Calculate the still air distance in the descent and the n.g.m. covered with a 20 kt headwind.

a. 29 nm/26nm

b. 21nm/23nm c. 20nm/18nm

d. 20nm/20nm

a. 20nm/20nm

3. Refer to CAP697 MEP1 Fig 3.2.

Given:

Cruising level	11,000 ft	
OAT in the cruise	-15°C	
Usable fuel	123 US gallons	
The power is set to economy cruise		

Find the range in NM with 45 min reserve fuel at 45% power.

<mark>a. 752 NM</mark>

b. 852 NM c. 610 NM

d. 602 NM

Chapter 7 – Medium Range Jet Transport Simplified Planning

1. Refer CAP697 Figure 4.1

Given:

Brake release mass of 55,000 kg Cruising at M0.74

What is the optimum altitude?

2. Refer CAP697 Figure 4.1

Given:

Cruise mass of 50,000 kg Cruising at M0.78

What is the optimum altitude?

3. Refer CAP697 Figure 4.2

Given:

Brake release mass of 60,000 kg Distance 150 nam ISA +10°C

What is the short distance cruise altitude?

4. Refer CAP697 Figure 4.2

Given: Brake release mass of 40,000 kg Distance 100 nam ISA +20°C

What is the short distance cruise altitude?

5. Refer CAP697 Figure 4.3.1B Given:

Landing mass of 45,000 kg Distance 600 ngm ISA +20°C Cruise using LRC @ FL370 50 kt headwind What is the trip fuel and time?

6. Refer CAP697 Figure 4.3.1B Given:

Landing mass of 55,000 kg Distance 600 ngm ISA -10°C Cruise using LRC @ FL370 50 kt headwind

What is the trip fuel and time?

7. Refer CAP697 Figure 4.3.1B Given:

Landing mass of 35,000 kg Distance 600 ngm ISA Cruise using LRC @ FL250 50 kt tailwind

What is the trip fuel and time?

8. Refer CAP697 Figure 4.3.1B Given:

Landing mass of 37,000 kg Fuel available 4,500 kg ISA Cruise using LRC @ FL370 75 kt headwind

How far could you fly?

9. Refer CAP697 Figure 4.1 and 4.3.3

Given:

Landing mass of 47,500 kg Cruise mass of 58,000 kg Distance 1,750 ngm ISA +10°C Cruise using M0.78 Wind light & variable a. What is the optimum pressure altitude? b. When cruising at FL330 what is your trip fuel and time?

10. Refer CAP697 Figure 4.1 and 4.3.1

Given:

Landing mass of 50,000 kg Cruise mass of 54,000 kg Distance 800 ngm ISA +20°C Cruise using LRC 50 kt tailwind

a. What is the optimum pressure altitude?

b. When cruising at FL350 what is your trip fuel and time?

c. With FMS in ECON mode with a cost index of 100; what are the fuel and time correction factors?

11. Refer CAP697 Figure 4.1, 4.3.1 and Table 4.1

Given:

Landing mass of 45,000 kg Brake release mass of 60,000 kg Distance 2,000 ngm ISA -10°C Cruise using LRC 100 kt headwind

a. What is the optimum pressure altitude?

b. When cruising at FL350 what is your trip fuel and time?c. If ATC restrict you to FL280; what is the fuel/mileage penalty factor?

12. Refer CAP697 Figure 4.3.2

Given:

Landing mass of 35,000 kg Distance 2,000 ngm ISA Cruise using M0.74 @ FL290 Nil wind

What is the trip fuel and time?

13. Refer CAP697 300 KIAS cruise

Given:

Landing mass of 55,000 kg Distance 500 ngm ISA +10°C Cruise @ FL240 50 kt tailwind

What is the trip fuel and time?

14. Refer CAP697 Figure 4.3.3

Given:

Landing mass of 35,000 kg Fuel available 5,000 kg ISA Cruise using M0.78 @ FL350 50 kt tailwind

What is the estimated trip distance?

15. Refer CAP697 Figure 4.3.1

Given:

Landing mass of 45,000 kg Distance 300 ngm ISA -10°C Cruise using LRC @ FL330 120 kt tailwind TAS 423 kt

What is the trip fuel and time?

16. Refer CAP697 Figure 4.3.5 Stepped Climb Cruise Given:

Brake release mass of 62,500 kg Distance 3,000 ngm 50 kt tailwind ISA +20°C

What is the trip fuel and time?

17. Refer CAP697 Figure 4.3.6 Alternate Planning Given:

Landing mass at the alternate of 47,500 kg Distance 250 ngm 50 kt headwind

What is the alternate fuel and time?

18. Refer CAP697 Figure 4.3.3

Given: Landing mass of 50,000 kg Distance 700 ngm What is the trip fuel and time when engine anti-ice required for the whole flight?

được không	- Có thể đặt câu hỏi tự tạo theo hình thức a, b, c, d và chọn đúng dưới đây cho các câu hỏi g ?
1. 34,600 ft	
2. 35,400 ft	
3. 25,000 ft	
4. 21,500 ft	
5. 4,000 kg	
	1.85 hrs (1 hr 51 mm)
7. 3,100 kg	
8. 700 ngm	
9.	
a. 32,200 f	t i i i i i i i i i i i i i i i i i i i
b. 10,600 l	ag 3.95 hrs (3 hr 57 min)
10.	
a. 34,600 ft	
b. 4,400 kg	1.75 hrs (1 hr 45 mm)
c. Fuel $+7\%$	
11.	
a. 32,900 ft	
b. 15,400 kg	g 6.75 hrs (6 hr 45 mm)
c. Off optin	num by 5000 ft 5.5%
12. 10,900	kg 4.75 hrs (4 hr 45 mm)
	g 1.2 hrs (1 hr 12 mm)
14. 1,035 n	
	g 0.7 hrs (42 min)
16. 15,500	kg 6 hours
17. 2,000 k	g 0.82 hrs (49 mm)
	g plus 1.65 hr @ 70 kg/hr (116) = 52,66 kg

Chapter 9 - Point of Equal Time (PET)

1. Given:

Distance from A to B	1200 nm
GS On	230 kt
GS Home	170 kt

What is the distance and time to the PET from "A"?

a. 600 nm	2 hr 37 min
<mark>b. 510 nm</mark>	2 hr 13 min

c. 690 nm	3 hr
1 510	0.1

d.	510	nm (3	hr

2. Given:

Distance from A to B	
GS On	3200 nm
GS Home	480 kt 520 kt

What is the distance and time to the PET from "A"?

a. 1664 nm	3 hr 12 min
b. 1600 nm	3 hr 20 min
<mark>c. 1664 nm</mark>	3 hr 28 min
d. 1536 nm	3 hr 12 min

3. Given:

TAS 400 kt Distance from A to B 2000 nm A 40 kt headwind is forecast from A to B

What is the distance and time to the PET from "A"

a. 1100 nm	3 hr 03 min
b. 1100 nm	2 hr 30 min
c. 900 nm	2 hr 30 min
d. 1000 nm	2 hr 47 min

4. Given:

TAS 165 kt W/V 090°/35 A to B 1620 nm Course 035°

What is the distance and time to the PET from "A"

a. 903 nm6 hr 04 minb. 810 nm5 hr 42 minc. 708 nm5 hrd. 912 nm6 hr 26 min

5. Given:

TAS 500 kt W/V 3300/50 A to B 2600 nm Course 090°

What is the distance and time to the PET from "A"

a. 1365 nm	2 hr 36 mm
b. 1235 nm	2 hr 22 min
c. 1235 nm	2 hr 36 min
d. 2012 nm	3 hr 53 min

6. Given:

GS On	300 kt
GS Out	350 kt
GS Home	250 kt
Distance from A to B	1200 nm

What is the distance and time to the PET from "A"

a. 545 nm	I hr 34 min
b. 654 nm	1 hr 52 min
c. 500 nm	1 hr 40 min
d. 545 nm	1 hr 49 min

7. Given:2 Engine TAS450 kt1 Engine TAS350 ktDistance from A to B3000 nm with a 50 kt tailwind component.

What is the distance and time to the engine failure PET?

a. 1285 nm3 hr 12 minb. 1333 nm2 hr 40 minc. 1714 nm3 hr 43 mind. 1285 nm2 hr 34 min

8. Given:

2 Engine TAS 480 kt 1 Engine TAS 400 kt W/V 330°/80 A to B 3500 nm Course 200°

What is the distance and time to the engine failure PET from "A"

a. 1515 nm3 hr 23 minb. 1558 nm2 hr 56 minc. 1515 nm2 hr 51 mind. 1985 nm3 hr 44 min

Given the following data answer questions 9 &10

190 kt cruising
9,000 ft
ISA -10°C
320/40 kt
350 nm
350'
3 hours

9. What is the distance to the PET?

a. 220 rim

b. 311 nm

c. 146 nm

<mark>d. 2</mark>04 nm

10. Given an actual time of departure (ATD) of 11:05, what is the ETA for the PET?

a. 12:49

b. 12:13

c. 11:55

d. 12:26

Chapter 9 - Point of Equal Time- (PET)

1. Given:

Track 355°T W/V 340°/30kt TAS 140 kt Total distance A to B 350 nm

What are the time and distance to the point of equal time between A and B?

a. 75 mins211 nmb. 75 mins140 nmc. 50 mins140 nmd. 114 mins211 run

2. Given:

Course A to B 088°(T) Distance 1250 nm Mean TAS 330kt W/V A to B 340°/60kt

The time from A to the Point of Equal Time between A and B is:

a. 1 hr 54 mins b. 1 hr 44 mins c. 1 hr 39 mins

d. 2 hr 02 mins

3. Distance between airports = 340 nm True track = 320° W/V = 160°/40 TAS = 110 kt

Distance to PET is: a. 121 nm b. 219 nm c. 112 nm d. 228 nm

4. Flying from A to B, 270 nm True track 030° W/V 120°/35 TAS 125 kt

What are the distance and time to the Point of Equal Time? a. 141 nm 65 mins b. 141 nm 68 mins c. 135 nm 68 mins

d. 150 nm 65 mins

Chapter 11- Point of Sale Return – PSR QUESTIONS - SINGLE LEG SR

1. Given:	
Total endurance	7 hr 40 min
Safe endurance	6 hr
GS Out	230 kt
GS Home	170 kt

What is the time arid distance to the PSR from "A"?

a. 2 hr 33 min 587 nm

b. 3 hr 15 min 750 nm c. 3 hr 27 min 794 nm d. 2 hr 33 min 434 nm

2. Given:

Total endurance	5 hr
Reserves required	l 1 hr
GS On	250 kt
GS Out	280 kt
GS Home	320 kt

What is the time and distance to the PSR from "A"?

a. 2 hr 40 min 747 nm b. 2 hr 15 min 629 nm

c. 2 hr 08 min 597 nm

d. 1 hr 52 min 523 nm

3. Given:

Total er	ndurance	300 min
Require	ed reserves	45 min
TAS		140 kt
Course		050°
W/V	270°/30	

What is the time and distance to the PSR from "A" a 148 min 401 nm

a. 170 mm	4 01 mm
b. 125 min	338 nm
c. 90 min	242 nm

d. 106 min 287 nm

4. Given:

TAS	160 kt
W/V	100°/30
A to B	1620 nm
Course	0300
Depart A at	09:30 UTC
Total endurance	4 hrs
Safe endurance	3 hrs 20 min

What are the distance, time and estimate to the PSR from "A" a. 94min 231 nm 11:04 b. 106 min 261 nm 11:16 c. 128 min 315 nm 11:38 d. 106 min 296 nm 11:16 5. Given: TAS 500 kt W/V ' 330°/50 A to B 4600 nm Course 090° Total endurance 12 hrs Safe endurance 10 hrs What is the time and distance to the PSR from "A" a. 4 hr 45 mm 2480 nm b. 2 hr 22 min 1235 nm c. 5 hr 42 mm 2974 nm d. 4 hr 45 min 2242 nm 6. Given: GS Out 400 kt Fuel flow out 2,800 kg/hr 450 kt GS Home 2,500 kg/hr Fuel flow home Total Total endurance 15,000 kg Reserves required 3,000 kg What is the distance and time to the PSR from "A" a. 1194 nm 3 hr b. 872 nm 2 hr 11 min 2 hr 23 min c. 955 nm 3 hr 40 min d. 1468 nm 7. Given: Total fuel available 16,000 kg Landing reserves required 1,500 kg P to Q distance 2,050 nm fuel required 11,500 kg Q to P distance 2,050 nm fuel required 10,200 kg What is the distance to the PSR from "P"? a. 1369 nm b. 1514 nm c. 426 nm d. 1656 nm 8. Given: 480 TAS W/V 330°/80 A to B 3500 nm 200° Course Fuel flow out 2,850 kg/hr 2,680 kg/hr Fuel flow home Total fuel available 12,000 kg Landing reserves required 2,000 kg What is the distance and time to the PSR from "A" a. 1558 nm 2 hr 57 min b. 855 nm 2 hr

c. 1135 nm 2 hr 08 min d. 855 nm 1 hr 37 min

Chapter 11- Point of Sale Return – PSR – All Type 1. Given: kt

15,000 kg total fuel Reserve 1,500 kg TAS 440 kt Wind component 45 head outbound Average fuel flow 2,150 kg/hr

What is the distance to the point of safe return?

a. 1520 nm

<mark>b. 1368 nm</mark>

c. 1702 nm

d. 1250 nm

2. Given:

Fuel flow 2,150 kg/hr, Total fuel in tanks 15,000 kg, Fuel reserve required on arrival 3,500 kg, TAS outbound 420 kt, wind -30 kt, TAS home bound 430 kt, wind +20 kt.

Find the time to Point of Safe Return.

a. 2 hr 06 min

b. 1 hr 26 min c. 3 hr 33 min

d. 2 hr 52 min

3. Given: Safe endurance = 5 hours True track = 315W/V = 100/20TAS = 115

What is distance to PSR? a. 205 nm b. 100 nm c. 282 nm d. 141 nm

4. Given the following:

Departure to destination is 500 nm Safe endurance is 4 hours Groundspeed out is 150 kt Groundspeed home is 130 kt

What is the distance and time to the point of safe return from departure point?

a. 232 nm 107 min

b. 221 nm 89 min c. 139 nm 60 min

d. 279 nm 111 min

Chapter 13 – Miscellaneous Charts EXERCISE 1

1. The boundary surrounding the islands at N71 15 E/W180 is:

a. an FIR boundary.

b. a Time Zone boundary.

c. an International Boundary.

d. part of the International Date Line.

Answer questions 2 to 7 using the Jeppessen chart 5AT(HI) and the following route: A (N85 00.0 W160 00.0) to B (N80 00.0 W164 00.0) to C (N75 00.0 W164 50.0)

2. The total distance is:

a. 302nm.

b. 602km.

c. 605nm.

d. 602nm.

- 3. The highest Grid MORA for the route is:
- a. 1,000 ft.
- <mark>b. 1,600 ft.</mark>
- c. 160 ft.
- d. 1,600 m.
- 4. The constant track direction from A to B is:
- a. 168°(G).
- b. 148°(M).
- c. 348°(G).
- d. 186°(T).

5. Which of the following is correct?

a. The airspace below FL230 is uncontrolled.

- b. The airspace is uncontrolled inclusive of FL230 and below.
- c. The airspace is controlled from ground level up to FL230.
- d. The airspace is controlled from FL220 inclusive and above.
- 6. The boundary along latitude N75 indicates:
- a. an Upper Information Region.

b. an Air Defence Identification Zone.

- c. an international boundary.
- d. a QNH boundary.

7. An aircraft is overhead B at 11052OUTC. The Standard Time is:

a. 111620.

- <mark>b. 111720.</mark>
- c. 101920.
- d. 101820.

8. The grid track from N70 00.0 W166 30.0 to N74 56.8 W141 00.0 is:

- <mark>a. 212°</mark>
- b. 032°
- c. 056°
- d. 043°

9. The (R) at N69 W158 means that:

a. there is an en-route radar capability on 135.3MHz.

b. radar control is available on 135.3MHz.

- c. there is a VDF station at Barrow.
- d. there is a remote air/ground antenna at Barrow for direct communications with Anchorage Control Centre.

10. Given.Longitude W30Variation 30°WTrue bearing 337°The Grid Bearing is:

a. 307° b. 007° c. 037° d. 337°

EXERCISE 3

Given:

Chart	AT(H/L) 1 & 2.
Route	OMOKO (N48 50 W012 00), ATS route T16.
Destination	Porto Santo (LPPS) N33 04 W016 21.
Diversion	Santa Maria (LPAZ) N36 58 W025 10.

Answer questions 1 to 12.

1. The total distance from OMOKO to the intersection with the ATS route between N38 00 W020 00 to KOMUT is:

a. 600nm.

b.643nm.

<mark>c. 703nm.</mark>

d. 853nm.

2. For this route the correct h hest IFR ICAO level between FL280 and FL310 inclusive is:

a. FL280.

<mark>b. FL290.</mark>

c. FL310.

d. FL300.

3. With reference to Porto Santo's NAVAID the following is correct:

		U
a. VOR/DME	Ident SNT	frequency 114.9kHz

b. VOR/DME	Ident SNT	frequency 114.7MHz

c. VOR/DME	Ident SNT	frequency 114.9MHz
d. VOR/DME/TACAN	Ident SNT	frequency 114.9MHz

4. The mean Great Circle track Porto Santo to Santa Maria is:

a. 309°(M).

b. 295°(T).

c. 310°(T).

d. 298°(T).

5. The mean magnetic variation Porto santo to Santa Maria is:

a. 8°(W).

b. 12°(W).

c. 11°(W).

d. 10°W.

6. The distance Porto Santo to N35 00 W020 00 is:

a. 215nm.

b. 494nm.

c. 115nm.

d. 220nm.

7. The night-time Weather FORECAST for Santa Maria is obtained from:

a. Shannon VOLMET on HF frequencies of 3.413MHz, 5.505MHz and 8.957MHz at H +45 to 50min.

b. Shannon VOLMET on a VHF frequency of 341.3MHz at H + 45 to 50min.

c. Shannon VOLMET HF frequencies of 3.413kHz 5.505, kHz and 8.957kHz at H + 45 to 50min.

d. Shannon VOLMET on a long wave transmission, frequency of 3.413MHz at H + 45 to 50min.

8. The daytime MET Report for Santa Maria is obtained from:

a. Shannon VOLMET on a VHF frequency of 132.64MHz at H + 15 to 20min.

b. Shannon VOLMET on HF frequencies of 13.264MHz, 5.505MHz and 8.957MHz at H + 15 to 20min and H +45 to 50min.

c. Shannon VOLMET on an HF frequency of 13.264kHz, 5.505kHz and 8.957kHz at H + 15 to 20min and H + 45 to 50min.

d. Shannon VOLMET on a short wave transmission of 132.64MHz 550.5MHz and 895.7MHz at H + 15 to 20min.

9. The route, if flown at FL290, is:

a. Not within MNPS airspace.

b. Within MNPS airspace.

c. Within MNPS/RVSM airspace.

d. Within RVSM airspace only.

10.Given:

Suitable airfields: Santiago (N42 54 W008 25) Porto Santo (N33 04 W016 20) Santa Maria (N36 58 W025 10).

Twin turbo- jet passenger aircraft. Normal one-engine in-operative Cruise TAS of 400kt.

a. The aircraft requires ETOPS authorisation

b. ETOPS authorisation is not required south of N45.

c. The aircraft does not require ETOPS authorisation.

d. The aircraft does not require ETOPS authorisation during daylight hours.

11. If an aircraft's ETA at Porto Santo is 143OUTC its Standard Time of arrival:

<mark>a. 1530.</mark>

- b. 1330.
- c. 1630.
- d. 1230.

12. The North Atlantic Remote and Oceanic Areas Air to Air frequency is:

- a. 131.80kHz.
- b. 121.50Mhz.
- c. 131.80MHz.
- d. 127.90MHz SELCAL.

13. An aircraft in mid- Atlantic at 1400LMT on Midsummer's Day wishes to contact New York Area Control Centre. The frequencies are:

3016 133065598 174968906

The frequency(s) most likely to be in order to obtain eventual two ways communication are:

a. 3.016kHz, 5.598khz or 8.906kHz.

b. 13.306IVIHz or 17.496MHz.

c. 13.306kHz or 17.946kHz.

d. 3.016MHz or 5.598MHz.

14. The MACH NUMBER TECHNIQUE for the North Atlantic track System (NATOTS) is based upon:

- a. True Mach Number.
- b. Indicated Mach Number.
- c. MMO.

d. MNE.

15. Flights certificated as complying with MNPS and RVSM should insert, after "S" in item 10 of their ICAO Flight Plan, the letter(s):

a. W.

b. X.

c. XR.

<mark>d. XW</mark>.

Chapter14 –

EXERCISE 4

1. Under what circumstances may an Aircraft Operator (AO) submit Repetitive Flight Plans (RPL) rather than individual flight plans?

When flights are operated regularly on the same day(s) of consecutive weeks and on at least occasions or every day over a period of at least consecutive days. The elements of each flight shall have a high degree of

a. IFR, ten, ten, stability.

b. VFR, seven, seven, familiarity.

c. IFR, seven, seven, familiarity.

d. VFR, ten, ten, stability.

2. What are the reasons for the format of the ICAO Flight Plan?

a. The format is internationally agreed, is printed in two languages, usually English and the language of the State concerned, to help ensure correct completion which is essential for electronic data transfer.

b. It is designed to fit into a standard pilot's bag, and have plenty of room for flight data.

c. The format ensures that minimum writing is required, to reduce pilot workload in flight.

d. The format is agreed between EC member states, for use in Europe only.

3. Which sections of a CA48 are not normally transmitted to other ATSUs? i. Addressees ii. Items 3 to 18 - the main body of the message.

iii. Supplementary information.

a. i only.

b. i and ii.

c. iii only.

d. None, all are always transmitted.

4. Normally, flight plans should be filed on the ground at least before clearance to start up is requested. Exceptionally, when it is not possible to meet this requirement, operators should and never

a. 30 minutes, give as much notice as possible, less than 60 minutes.

b. 60 minutes, give as much notice as possible, less than 30 minutes.

c. 3 hours, cancel the flight, cause such trouble again.

d. 3 hours, give as much notice as possible, 30 minutes.

5. Flight plans for flights affected by Air Traffic Flow Management (ATFM) rules, and in areas such as the North Atlantic, must be filed at least before EOBT.

a. 3 hours.

b. 1 hour.

c. 30 minutes.

d. Never less than 10 minutes.

6. In the event of a delay in excess of of for a controlled flight, or a delay of for an uncontrolled flight for which a flight plan has been submitted, the flight plan should be amended or a new flight plan submitted and the old plan cancelled, whichever is appropriate.

a. 30 minutes, Estimated Off Blocks Time, 3 hours.

b. 30 minutes, planned take off time, 1 hour.

b. 60 minutes, planned take off time, 3 hours.

d. 30 minutes, EOBT, I hour.

7. If a pilot lands at an aerodrome other than the destination specified in the flight plan, he must:

a. Ensure that all ATSUs which were addressees on the flight plan are notified of his landing.

b. Ensure that the ATSU at the original destination is informed within 60 minutes.

c. Ensure that the ATSU at the original destination is informed within 30 minutes.

d. Report to ATC to apologise.

8. A current flight plan is:

a. The flight plan as filed with an ATS unit by the pilot or a designated representative, without any subsequent changes.

b. The flight plan, including changes, if any, brought about by subsequent clearances.

c. The flight plan, including changes, if any, cleared prior to take off.

d. The flight plan, including changes, if any, cleared prior to the aircraft's present position.

9. A filed flight plan is

a. The flight plan as filed with an ATS unit by the pilot or a designated representative, without any subsequent changes.

- b. The flight plan, including changes, if any, brought about by subsequent clearances.
- c. The flight plan, including changes, if any, cleared prior to take off.
- d. The flight plan, including changes, if any, cleared prior to the aircraft's present position.

10. ATC must be informed of changes which occur to the flight plan speed and ETA. Many nations

stipulate their own limits but PANS-RAC require changes of in TAS and of ETA be notified. Which answer fills the blanks correctly?

a. 3% 5 minutes.

b. 5 kts 30 minutes.

c. 50/0 3 minutes.

d. 3 kts 3 minutes.

11. A flight has filed a flight plan for a route starting on ATS routes and later leaving controlled airspace. It is "cleared via flight plan route". This means the flight is cleared to follow:

a. The flight planned route until leaving ATS routes and must then obtain further clearance.

b. The complete route without further ATC clearance.

c. The flight planned route only until the next FIR boundary.

d. The flight planned route only as far as the limit of control of the current ATS unit.

12. Who is responsible for processing a flight plan?

a. The ATS unit first receiving a flight plan.

b. The ATS unit in whose FIR the aircraft will fly first.

c. The ATS unit responsible for the aerodrome of departure.

d. The ATS unit responsible for takeoff clearance at the departure aerodrome.

A trip time of 150 minutes has been calculated for a flight with an EOBT of 1000 UTC and an expected take-off timeof 1020 UTC. The aircraft has a fuel reserve of 30%. Use this information to answer the following questions.

i. 1000.

ii 1020.

ii. 150.

iv 195

v. 0230

vi 0315

13. What should be filled in at Item 13 of the flight plan?

а. і.

b. ii.

c. v.

d. vi

14. What should be filled in at Item 16 of the flight plan?

a. i

b. ii

c. v

d. vi

15. What should be filled in at Item 19 of the flight plan?

a. i

b. ii

c. v

<mark>d. vi</mark>

16. With reference to changes to RPLs. In the event that the destination airfield is changed the following action is taken:

a. The change is notified as early as possible and not later than 30minutes before departure to the ATS reporting office responsible for the departure aerodrome.

b. The change is notified as early as possible before departure to the ATS reporting office responsible for the departure aerodrome.

c. The RPL shall be cancelled for the day concerned and an individual flight plan shall be submitted.

d. The change may be notified by radio telephony on initial contact with the ATS unit.

REVISION QUESTIONS nhoo

1. A turbine - engined aircraft burns fuel at 200 gals per hour (gph) with a Fuel Density of 0.8. What is the fuel flow if Fuel Density is 0.75?

a. 213 gph.

b. 208 gph.

c. 200 gph.

d. 188 gph.

2. AC flying at 7,500 ft, is cleared to descend to be level at 1,000 ft, 6nm before reaching a beacon. If ground speed is 156kt and Rate of Descent is 800fpm, how many miles before the beacon should descent begin?

a. 15.0 b. 30.2

0. 30.2 c. 27.1

0. 27.1 d 11 1

d. 11.1

3. After flying for 16 minutes at 100 kt TAS with a 20 kt tail wind, you have to return to the airfield of departure.

You will arrive after:

a. 10 min 40 sec.

b. 20 min.

c. 24 min.

d. 16 min.

4. An aircraft is in cruising flight at FL095, IAS 155 kt.

The pilot intends to descend at 500 ft/min to arrive overhead the MAN VOR at 2,000 ft (QNH 1030 hPa). The TAS remains

constant in the descent, wind is negligible, temperature standard. At which distance from MAN should the pilot commence the descent?

a. 42 nm. b. 40 nm. c. 45 nm. d. 48 nm.

5.At a fuel check you have 60 US gallons (USG) of useable fuel remaining. Alternative fuel required is 12 USG. The flight time remaining is 1 hour 35 mins. What is the highest consumption rate acceptable?

a. 33.0 USG/Hr.
b. 37.9 USG/Hr.
c. 30.3 USG/Hr.
d. 21.3 USG/Hr.

6. ATC require a descent from FL270 to FL160 to be level 6 nm before a VOR. If rate of descent is 800 feet per minute, mean groundspeed is 256 kt, how far out from the VOR must descent be started?

a. 59 nm.

<mark>b. 65 nm.</mark>

c. 144 nm.

d.150 nm.

7. Given:

Track 355 T, wind velocity 340/30kt, TAS 140kt, total distance A to B 350 nm. What are the time and distance to the point of equal time between A and B?

a. 75 mins,211 nm.

b. 75 mins, 140 nm.

c. 50 mins, 140 nm.

d. 114 mins, 211 nm.

8. The fuel burn - off is 200 kg/hr with a relative fuel density of 0.8. If the relative fuel density is 0.75, the fuel burn will be:

a. 267 kg/hr.

b. 213 kg/hr.

c. 200 kg/hr.

d. 188 kg/hr.

9. You are flying at FL330, M0.84, OAT -48C, headwind 52 kt. The time is 1338 UTC. ATC clear you to be at 30W (570 nm away) at 1500 UTC. To what Mno do you have to adhere?

a. 0.72. b. 0.76. c. 0.80. d. 0.84.

10. Where would you find information regarding Customs and Health facilities?

a. ATCC broadcasts.

b. NOTAMs.

c. NAV/RAD supplememnts.

<mark>d. AIPs.</mark>

11. Where would you find information regarding Search and Rescue procedures?

a. ATCC broadcasts.

b. NOTAMs.

c. SIGMETs.

<mark>d. AIPs.</mark>

12. An aircraft climbs from an airfield, elevation 1,500 ft, QNH 1023mb, to FL75. What height does the aircraft have to climb? (Assume lmb = 30 ft.)

a. 6,600 ft. b. 7,800 ft.



13. Given by a met station elevation at 4,000 ft where QNH is 1003hpa. The minimum obstruction clearance altitude (NOCA) is 8,500 ft. Assume 30 ft per HPa.

What is the minimum pressure altitude?

a. 1,280 ft.
b. 8,500 ft.
c. 8,200 ft.
d. 8,800 ft.

14. Given:

Magnet track 215; mountain elevation 11,600 ft; local airfield gives QNH as 1035 mb; Required terrain clearance 1,500 ft; temperature ISA - 15°C

Which of the following is the minimum flight level considering the temperature?

a. FL150. <mark>b. FL140.</mark> c. FL120.

d. FL110.

15. Multi-engined ac on IFR flight. Given:

trip fuel 65 US Gal; contingency 5% trip; Alternative fuel including final reserve 17 US Gal; Useable fuel at departure 93 US Gal. At a point halfway to destination, fuel consumed is 40 US Gal.

Assuming fuel consumption is unchanged, which of the following is correct?

a. At departure Reserve Fuel was 28 US Gal.

b. At destination required reserves remain intact.

c. Remaining fuel is insufficient to reach destination with reserves intact.

d. Remaining fuel is insufficient to reach the destination.

16. Refer to ED-6. You are at position N47 59 E 010 15. Which Flight Information Service should you contact?
a. MEMMINGEN 117.20 MHZ.
b. MEMMINGEM 135.60 MHZ.
c. MUNCHEN 126.95 MHZ.
d. MUNCHEN 131.22 MHZ.

17. Refer to Jeppesen Manual ED-6.

An aeroplane is flying VFR and approaching position TANGO (N4837 E00916) at FL 55 and a magnetic track of 090. The distance from TANGO is 20 nm. The navigation aid and frequency at TANGO is

a. VORTAC 112.50 kHz.
b. DME 112.50 Mhz.
c. VOR 112.50 with no DME.
d. VORTAC 112.50 Mhz.

18. Refer to Jeppesen Manual ED-6.

Flying from position ERBACH (N 4821 E00955) to POLTRINGEN airport (N 4833 E00857). Find the magnetic course and distance.

a. 108/60 nm.
b. 252/41 nm.
c. 287/41 nm.
d. 287/60 nm.

19. Refer to Jeppesen Manual ED-6. Flying from position SIGMARINGEN (N 4805 E00913) to BIBERACH airport (N 4807 E00946). Find the magnetic course and distance. a. 093/41 nm. b. 086/22 nm. c. 267/22 nm. d. 086/32 nm.

20. Refer to Jeppesen Manual ED-6.

Flying VFR from PEITING (47 48N 010 55.5E) to IMMENSTADT (47 33.5N 010 13.0 E) determine the magnetic course. a. 077

<mark>b. 243</mark>

c. 257

d. 063

21. Refer to Jeppesen Manual ED-6.

Flying VFR from VILLINGEN (N4758 E00831) to FREUDENSTADT (N4828 E00824), determine the distance.

a. 54 nm.

b. 29 km.

<mark>c. 29 nm.</mark>

d. 33 nm.

22. Refer to Jeppesen Manual ED-6. Give the frequency of the GRENCHEN VOR at N4711 E00725.

a. 108.65 MHz.

b. 326 kHz.

c. channel 23.

d. 120.1 MHz.

23. Refer to Jeppesen Manual ED-6.

Give the frequency of ZURICH Volmet.

a. 127.2 Mhz.

b. 127.2 kHhz.

c. 128.525 Mhz.

d. 118.1 Mhz.

24. Refer to Jeppesen Manual ED-6.

The GRENCHEN LSZG aerodrome (N 4711 E 00725) has a tower frequency of 120.10 Mhz. The "(V)" after the frequency indicates?

a. Available on request.

b. Only to be used during daylight.

c. Available for VFR flight only.

d. VDF available.

25. Refer to Jeppesen Manual ED-6.

The magnetic track from VILLINGEN (N4803.5 E00827.0) to FREUDENSTADT (N4828.0 E00824.0) is?

a. 176

b. 004

c. 185 d. 356

<mark>u. 550</mark>

26. Refer to Jeppesen Manual ED-6.
What is the frequency for Stuttgart ATIS?
a. 126.12 MHz.
b. 128.95 MHz.
c. 118.60 MHz.
d. 115.45 MHz.

27. Refer to Jeppesen Manual ED-6.

What is the navaid at 48 30N 007 34E?a. VORTAC/NDB.b. NDB.c. TACAN.d. VOR/DME.

28. Refer to Jeppesen Manual ED-6.

What navigation or communications facilities are at N 4855 E 00920?
a. NDB.
b. TACAN.
c. VOR/DME.
d. VORTAC.

29. Refer to Jeppesen Manual ED-6.

What navigation or communications facilities are at N 4822.9 E 00838.7?

a. NDB.

<mark>b. VOR.</mark>

c. VOR/DME.

d. VORTAC.

30. The quantity of fuel which is calculated to be necessary for a jet aeroplane to fly IFR from departure to destination aerodrome is 5,325 kg.

Fuel consumption in holding mode is 6,000 kg/hr. Alternate fuel is 4 380 kg. Contingency should be 5')/0 of trip fuel.

What is the minimum required quantity of fuel which should be on board at take-off?

a. 13,220 kg.

b. 14,500 kg.

<mark>c. 13,000 kg.</mark>

d. 13,370 kg.

31. Turbo-jet ac, flying to an isolated airfield, with no destination alternative. On top of: taxi, trip and contingency fuel, what fuel is required?

a. Greater of 45 mins + 15% of trip or 2 hours.

b. 30 mins holding @ 450m AMSL.

c. 30 mins holding @ 450m AAL.

d. 2 hours at normal cruise consumption.

32. CAP697 SEP1 fig 2.5.

For a flight departing from MSL at 36631b, cruising at FL80 @2300 RPM, 20C lean of peak EGT, in 40kt headwind, calculate endurance.

a. 4.75hr. b. 5.3hr.

6.1hr.

d. 6.55hr.

33. Minimum planned take-off fuel is 160 kg (30% total reserve is included). Assume the ground speed on this trip is constant. When half the distance has been flow, the remaining fuel is 70 kg.

Is it necessary to divert to a nearby alternate?

a. Diversion to a nearby alternate is necessary, because the remaining fuel is not sufficient.

b. Diversion to a nearby alternate is not necessary, because the reserve fuel has not been used completely.

c. Diversion to a nearby alternate is necessary, because it is allowed to calculate the fuel without the reserve

d. Diversion to a nearby alternate is necessary, unless the captain decides to continue on his own responsibility.

34. Refer to CAP 697 MRJT Fig 4.4

Given:

DOM - 35,000 kg Expected Load - 12,000 kg Contingency, approach and hold fuel - 2,500 kg Departure aerodrome elevation - 500 ft Alternate aerodrome elevation - 30 ft

Find (i) Final Reserve Fuel (Jet aircraft) and (ii) Relevant elevation

a. 2360 Alternate elevation

b. 1180 Destination elevation

c. 1180 Alternate elevation

d. 2360 Destination elevation

35. Refer to CAP 697 SEP1, fig 2.1. Aerodrome elevation 2,500 ft, OAT +10C. Initial weight 3500 lb. Climb to FL140, OAT -5C.

What are the climb time, fuel, NAM?

a. 22 min, 6.5 g, 46 nam. b. 24 min, 7.5g, 50 nam. c. 2 min, 1.0g, 4 nam. d. 26 min, 8.5g, 54 nam.

36. Refer to CAP 697 SEP1, fig 2.1.

Given:

FL75, OAT +5C, during climb, average headwind component 20kt, take-off from MSL with initial mass of 3,650 lbs.

Find time and fuel to climb. a. 11 min, 3.6 USG. b. 7 min, 2.6 USG. c. 9 mm, 2.7 USG. d. 9 min, 3.3 USG.

37. Refer to CAP 697 SEP1, fig 2.2.3. Given:

FL75, OAT +10C, Lean mixture, 2300 RPM.

Find fuel flow (GPH) gallons per hour and TAS. a. 11.6 GPH 160 kt. b. 68.5 GPH 160 kt. c. 71.1 GPH 143 kt. d. 11.6 GPH 143 kt.

38. Refer to CAP 697 SEP1 fig 2.4

Given:

Aeroplane mass at start up 3663 lbs fuel load (density 6lbs/gal) 74 gal Take-off altitude sea level Headwind 40 kt Cruise altitude 8,000 ft Power setting full throttle 2300 RPM 20°C lean of peak

Calculate the range

- <mark>a. 633 nm.</mark>
- b. 844 nm.
- c. 730 nm.
- d. 547.5 nm.

39. Refer to CAP697, SEP1, fig 2.5.

Given:

FL75; Lean mixture; Full throttle/2300 RPM; Take-off fuel 444 lbs; Take-off from MSL.

Find endurance in hours.

a. 5 hrs 12 mins.

b. 5 hrs 20 mins.

c. 4 hrs 42 mins.

d. 5 hrs 23 mins.

40.The still air distance in the climb is 189 Nautical Air Miles and time 30 minutes. What ground distance would be covered in a 30 kt headwind? a. 189 nm. b. 203 nm. c. 174 nm. d. 193 nm.

41. Turbo-jet ac; taxi fuel 600kg; fuel flow cruise 10,000kg/hr; fuel flow hold 8,000kg/hr; alternate fuel 10,200kg; flight time 6 hours; visibility at destination 2000m.

What is the minimum ramp fuel?

- a. 80,500 kg.
- b. 79,200 kg.
- <mark>c. 77,800 kg.</mark>
- d. 76,100 kg.
- 42. What is Decision Point Procedures?

It is a procedure to reduce the amount of fuel carried on a flight by:

a. reducing contingency fuel from 10% to 5% of trip fuel.

- b. reducing contingency fuel to only that required from Decision Point to Destination.
- c. reducing trip fuel to only that required from Decision Aerodrome to Destination.
- d. reducing trip distance.

43. What is the purpose of Decision Point Procedure?

- a. Carry minimum fuel to increase Traffic Load.
- b. Increase safety of the flight.
- c. Reduce landing mass to avoid stressing the aircraft.
- d. To assist in decision making at refuelling.

44. When calculating the fuel required to carry out a given flight, one must take into account:

- 1. the wind
- 2. foreseeable airborne delays
- 3. other weather forecasts
- 4. any foreseeable conditions which may delay landing

The combination which provides the correct statement is:

- a. 1-3
- b. 2-4
- c. 1-2-3-4
- d. 1-2-3
- 45. Refer to CAP697 MEP1 fig 3.2.

A flight is to be made in a multi-engine piston aeroplane. Given:

Cruising level	11,000 ft	
OAT in the cruise	-15C	
Usable fuel	123 US gallons	
The power is set to economy cruise.		

Find the range in NM with 45 min reserve fuel at 45`)/0 power.

- <mark>a. 752 nm.</mark>
- b. 852 nm.
- c. 610 nm.
- d. 602 nm.

46. CAP697 MRJT1 fig 4.5.2 & 4.5.3.2

For a flight from B to C at FL310. M0.74, ISA - 12C, 957ngm, 40kt tailwind; weight 50,100kg.

How much fuel is required to fly to C? **a.** 4,600kg. b. 4,500kg. c. 5,000kg. d. 4,100kg.

47. CAP697 MRJT1 fig 4.7.2.

ETOPS - ac can not travel more than 120 minutes from a suitable (sic, should read "Adequate") airfield. Assume LRC and diversion weight of 40,000kg.

What is the still air diversion distance?

a. 735

b. 794

c. 810

d. 875

48. Ref CAP697 MRJT1 Fig 4.2 & 4.5.3.2

Estimated take-off mass 57,000 kg. Ground distance 150nm. Temperature ISA-10C. Cruise at M0.74.

What is the optimum cruise altitude and TAS? a. 25,000ft & 445 kt. b. 33,000 ft & 420 kt. c. 25,000 ft & 435 kt. d. 33,000 ft & 430 kt.

49. Ref CAP697 MRJT1, fig 4.5.3.1.

Aircraft mass at top of climb 61,500kg. Distance 385 nm. FL350, OAT - 54.3.C. Tailwind of 40kt. Using Long Range Cruise, how much fuel is required? a. 2,150kg. b. 2,250kg. c. 2,350kg. d. 2,050kg.

50. Refer CAP697 MRJT Fig 4.3.5

Tail wind componet 10kt Temp ISA -10°C Break release 63,000kg Trip fuel overall 20,000kg

What is the maximum possible trip distance? a. 3640 b. 3740 c. 3500 d. 3250

51. Refer CAP697 MRJT Fig 4.4

Given: Mean gross mass 47,000kg The fuel required for a 45 min holding at race track pattern at 5,000 ft is: a. 1090 b. 1690 c. 1635 d. 1125

52. Refer to CAP 697 fig 4.1

Given: Cruise weight 53,000 kg; LRC/ M0.74; cruise at FL310. What is the fuel penalty: a. 0% b. 1%

<mark>c. 4%</mark> d. 10%

53. Refer to CAP 697 fig 4.5.1.

Given: aerodrome at MSL; cruise at FL280; ISA-10C; Brake release mass 57 500 kg.

What is the climb fuel required? a. 1,100 kg. b. 1,150 kg.



54. Refer to CAP 697 fig 4.5.1.

Given: Track 340T; W/V 280/40kt; aerodrome elevation 387 ft; ISA -10C; Brake release mass 52,000 kg; cruise at FL280.

What are the climb fuel and time? a. 15 min, 1,100 kg. b. 12 min, 1,100 kg. c. 10 min, 1,000 kg. d. 11 min, 1,000 kg.

55. Refer to CAP 697 MRJT fig 4.3.1.

Trip distance 1900 nm, fuel on board 15,000kg, landing weight 50,000kg.

What is the minimum pressure altitude for this flight?

a. 17,000 ft
b. 10,000 ft
c. FL370
d. FL250

56. Refer to CAP 697 MRJT1 fig 4.2 and 4.5.3.2.

Given:

Brake release weight 45,000 kg, trip distance 120 nm, temperature ISA-10C, cruise at M0.74.

Find optimum pressure altitude and TAS.

a. FL370 / 424 kt. b. FL250 / 435 kt. c. FL370 / 414 kt. d. FL250 / 445 kt.

57. Refer to CAP 697, MRJT1 fig 4.1.

Find the OPTIMUM ALTITUDE for the twin - jet aeroplane.
Given: Cruise mass = 54,000 kg, Long Range Cruise or 0.74 Mach.
a. 35,300 ft.
b. 34,500 ft.
c. maximum operating altitude.
d. 33,800 ft.

58. Refer to CAP 697 MRJT1, fig 4.2.

Find the SHORT DISTANCE CRUISE ALTITUDE for the twin – jet aeroplane . Given: Brake release mass = 45,000 kt, Temperature = ISA + 20C, Trip distance = 50 Nautical Air Miles (NAM).

a. 11,000 ft b. 12,500 ft c. 10,000 ft d. 7,500 ft

59. Refer to CAP 697 MRJT1 fig 4.3.1. Given: Tail wind component 45kt Temperature ISA -10C ; Cruise altitude 29,000 ft ; Landing mass 55,000 kg

For a flight of 2800 ground nautical miles, the (i) trip fuel and (ii) trip time respectively are:

a. (i) 16,000 kg	(ii) 6hr 25min.
b. (i) 18,000 kg	(ii) 5hr 50min.
c. (i) 20,000 kg	(ii) 6hr 40min.
d. (i) 17,100 kg	(ii) 6hr 07min.

60. Refer to CAP 697, MRJT1 fig 4.3.1C.

For a flight of 2400 ground nautical miles the following apply: Temperature ISA – 10C Cruise altitude 29,000 ft Landing mass 45,000 kg Trip fuel available 16,000 kg What is the maximum headwind component which may be accepted? a. 35 kt. b. 15 kt. c. 0 d. 70 kt.

61. Refer to CAP 697 MRJT1 fig 4.3.3A

Given: Cruise M0.78, FL 280, 50,000 kg, 200 nms, wind component 30 kt Head. Find the fuel required. a. 1,700 kg.

<mark>b. 1,740 kg.</mark>

c. 1,620 kg.

d. 1,970 kg.

62. Refer to CAP 697 MRJT1, fig 4.3.6.

In order to find ALTERNATIVE FUEL and TIME TO ALTERNATIVE, the AEROPLANE OPERATING MANUAL shall be entered with:

a. distance in nm, wind component, zero fuel mass.

b. distance in nm, wind component, dry operating mass plus holding fuel.

c. distance in nm, wind component, landing mass at alternate.

d. distance in nm (NAM), wind component, landing mass at alternate.

63. Refer to CAP 697, MRJT1, fig 4.5.1. Given: Brake release mass = 58,000 kg, Temperature = ISA + 15C.

The fuel required to climb from an airfield at elevation 4,000 ft to FL300 is:

a. 1,350 kg.b. 1,400 kg.c. 1,450 kg.

d. 1,250 kg.

64. Refer to CAP 697 MRJT1 fig 4.5.2 & 4.5.3.1.

Given:

Long range cruise at FL340 Distance C-D 3200 nm Temperature deviation from ISA +12C Tailwind component 50 kt Gross mass at C 55,000 kg

The fuel required C-D is: a. 17,500 kg. b. 14,200 kg. c. 17,800 kg. d. 14,400 kg.

65. Refer to CAP 697 MRJT1, fig 4.5.2 and 4.5.3.4.

Given:

Distance C - D 540 nm Low Level Cruise 300 KIAS at FL210, Temperature Deviation from ISA = +20CHeadwind component = 50 kt Gross mass at C = 60,000 kg

The fuel required from C to D is: a. 4,200 kg. b. 4,620 kg. c. 3,680 kg. d. 3,350 kg.

66. Refer to CAP 697 MRJT1, fig 4.5.3.1.

Given : flight time from top of climb to the en route point in FL280 is 48 min. Cruise procedure is long range cruise (LRC), Temperature is ISA - 5C. Take - off mass = 56,000 kg, Climb fuel = 1,100 kg.

Find distance in NAM for this leg and fuel consumption.
a. 437 nam, 2,100 kg.
b. 350 nam, 2,000 kg.
c. 345 nam, 2,000 kg.
d. 345 nam, 2,100 kg.

67. Refer to CAP697, MRJT1, fig 4.1.

Given: cruise mass 54,000 kg; LRC/0.74M. Find Optimum Altitude.

a. 33,800 ft.

b. 34,500 ft.

c. 35,300 ft.

d. maximum operating altitude.

68. Refer to CAP697 MRJT1, fig 4.3.1.

Given:

estimated zero fuel mass 50t; estimated landing mass at destination 52 t; final reserve fuel 2 t; alternate fuel it; flight to destination, distance 720 nm, true course 030, W/V 340/30; cruise: LRC, at FL330 outside air temperature -30C.

Find estimated trip fuel and time.

a. 4,800 kg / 01hr 45 min. b. 4,400 kg / 02 hr 05 min.

c. 4,750 kg / 02 hr 00 min.

d. 4,600 kg / 02 hr 05 min.

69. Refer to CAP697 MRJT1 fig 4.3.1c.

Within the limits of the data given, a mean temperature increase of 30C will affect the trip time by approximately:

<mark>a. -5%</mark>

b. +5%

c. +8%

d. -7%

70. Refer to CAP697 MRJT1 Fig 4.3.2 A.

Planning a flight from Paris (Charles de Gaulle) to London (Heathrow) for a twin-jet aeroplane. Power setting: M0.74; FL 280; Landing Mass 50,000 kg; Distance to use 200 nm; W/V from Paris to London is 280/40, Mean track 340T.

Find the estimated trip fuel

a. 1,530 kg.
b. 1,740 kg.
c. 1,900 kg.
d. 1,450 kg.

71. Refer to CAP697 MRJT1 Fig 4.3.3 C

Given:

Twin-jet aeroplane, ground distance to destination 1600 nm, headwind component 50 kt, FL330, cruise 0.78Mach, ISA Deviation +20C and landing mass 55,000 kg.

Find fuel required and trip time with simplified flight planning.

a. 12,250 kg, 04 hr 00 min. b. 11,400 kg, 04 hr 12 min.

c. 11,600 kg, 04 hr 15 min.

d. 12,000 kg, 03 hr 51 min.

72. Refer to CAP697 MRJT1 fig 4.3.5.

Given: Headwind 50kt; Temperature ISA+10C; Brake release mass 65,000kg; Trip fuel 18,000kg. What is the maximum possible trip distance? a. 3480 ngm. b. 2540 ngm. c. 3100 ngm.

1 2740 ment

<mark>d. 2740 ngm.</mark>

73. Refer to CAP697 MRJT1 fig 4.3.6.

Given:

Distance to alternate 400nm Landing mass at alternate 50,000kg Headwind component 25kt

The alternate fuel required is:

a. 2,550kg.

b. 2,800kg.

c. 2,900kg.

d. 2,650kg.

74. Refer to CAP697 MRJT1, fig 4.3.6.

Given:

DOM 35 500 kg, estimated load 14,500 kg, final reserve fuel 1.200 kg, distance to alternate 95 nm, average true track 219, head wind component 10 kt.

Find fuel and time to alternate. a. 800 kg / 24 min. b. 1,100 kg / 44 min. c. 1,100 kg / 25 min. d. 800 kg / 40 min.

75. Refer to CAP697 MRJT1 fig 4.4.

Given:

Mean gross mass 47,000kg The fuel required for 45 minutes holding in a racetrack pattern at 5,000 ft is: a. 1,690 kg. b. 1,090 kg.

<mark>c. 1,635 kg.</mark>

d. 1,125 kg.

76. Refer to CAP697 MRJT1, fig 4.4.

The final reserve fuel taken from the HOLDING PLANNING table for the twin-jet aeroplane is based on the following parameters:

a. pressure altitude, aeroplane mass and flaps up with minimum drag airspeed.

b. pressure altitude, aeroplane mass and flaps down with maximum range speed.

c. pressure altitude, aeroplane mass and flaps up with maximum range speed.

d. pressure altitude, aeroplane mass and flaps down with minimum drag airspeed.

77. Refer to CAP697 MRJT1, fig 4.5.1.

Given: Brake release mass 57,500 kg, temperature ISA - 10C, headwind component 16 kt initial FL280,

Find: still air distance (NAM) and ground distance for the climb.
a. 67 NAM /71 nm.
b. 59 NAM / 62 nm.
c. 62 NAM /59 nm.
d. 71 NAM / 67 nm.

78. Refer to CAP697 MRJT1, fig 4.5.1.

Planing an IFR flight from Paris (Charles de Gaulle) to London (Heathrow) for the twin-jet aeroplane. Given: Estimated take-off mass 52,000 kg, Airport elevation 387 ft, FL280, W/V 280 / 40 kt, ISA deviation -10C, average true course 340. Find the time to top of climb.a. 3 min.b. 11 min.c. 12 min.d. 15 min.

79. Refer to CAP697 MRJT1 fig 4.5.3.1.

Given: FL330; COAT -63C; Weight 50500kg, What is TAS? a. 411 kt. b. 433 kt. c. 421 kt. d. 423 kt.

80. Refer to CAP697 MRJT1 fig 4.5.3.1.

Given:

Long Range Cruise at FL350 OAT -45C Gross mass at the beginning of the leg 40,000kg Gross mass at the end of the leg 39,000kg

Find:True airspeed (TAS) and cruise distance (NAM) for a twin jet aeroplane

a. TAS 433 KT, 227 NAM. b. TAS 423 KT, 227 NAM. c. TAS 433 KT, 1163 NAM. d. TAS 423 KT, 936 NAM.

81. Refer to CAP697 MRJT1 fig 4.5.3.1.

a. 1,207 kg. b. 1,191 kg.

c. 1,100 kg.

d. 1,000 kg.

82. Refer to CAP697 MRJT1 fig 4.5.4. A descent is planned at 0.74M/250KIAS from 35,000 ft to 5,000 ft.

How much fuel will be consumed during this descent?

a. 278kg.

b. 290kg.

c. 150kg.

d. 140kg.

83. Refer to CAP697 MRJT1 fig 4.5.4 and Jeppesen Manual LONDON Heathrow 10-2 STAR Aircraft mass 49,700 kg, FL 280.

Plan a descent to Heathrow elevation. What is the descent time?

a. 8 mins.

b. 10 mins.

c. 17 mins.

d. 19 mins.

84. Refer to CAP697 MRJT1 simplified flight planning.

Planning a flight from Paris (CDG) to London Heathrow for a twin-jet aeroplane.

The wind from London to Manchester is 250/30 kt; mean track 350; distance 160 nm. Assume the landing mass at alternate is about 50,000 kg.

Find the alternate fuel and time. a. 1,200 kg, 20 mins. b. 1,300 kg, 28 mins. c. 1,600 kg, 36 mins. d. 1,450 kg, 32 mins.

85. DOM 2,800kg

 Trip
 300

 Payload
 400

 MTOM
 4200

 MLM
 3700

What is maximum fuel load? a. 700 kg. b. 1,000 kg. c. 800 kg. d. 500 kg.

86. Given:
DOM 33,510 kg; Traffic load 7,600 kg. Trip fuel 2,040 kg. Final reserve 983 kg.
Alternative fuel 1,100 kg. Contingency 5°/0 of trip fuel.

Which of the following is correct?
a. est landing mass at destination 43,193 kg.
b. est landing mass at destination 43,295 kg.
c. est take-off mass 43,295 kg.
d. est take-off mass 45,233 kg.

87. Given: Dry Op Mass = 33,510 kg Load = 7,600 kg Final reserve fuel = 983 kg Alternate fuel = 1,100 kg Contingency fuel = 102 kg.

The estimated landing mass at the alternate should be:

a. 42,312 kg.
b. 42,093 kg.
c. 42,210 kg.
d. 42,195 kg.

88. MTOM 64,400 kg MLM 56,200 kg MZFM 53,000 kg DOM 35,500 kg Load 14,500 kg Trip fuel 4,900 kg T/O fuel 7,400 kg

Maximum additional load is? a. 3,000 kg. b. 4,000 kg. c. 5,600 kg. d. 7,000 kg.

89. MTOM 64,400 kg; MLM 56,200 kg; MZFM 53,300 kg; DOM 35,500 kg Traffic load 14,500 kg; Trip fuel 49,00 kg; Minimum takeoff fuel 7,400 kg

What is the maximum allowable takeoff fuel? a. 11,400 kg. b. 14,400 kg. c. 8,600 kg. d. 11,100 kg.

90. Planning a flight from Paris (Charles-de-Gaulle) to London (Heathrow) for a twin-jet aeroplane. Preplanning:
Maximum take-off mass = 62,800 kg Maximum Zero Fuel Mass = 51,250 kg Maximum Landing Mass = 54,900 kg Maximum Taxi Mass = 63,050 kg
Assume the following preplanning results: Trip fuel = 1,800 kg
Alternate fuel = 1,400 kg
Holding fuel (final reserve) = 1,225 kg Dry Operating Mass = 34,000 kg
Traffic Load = 13,000 kg Catering = 750 kg Baggage = 3,500 kg

a. 55,765 kg. b. 51,425 kg. c. 52,265 kg. d. 51,515 kg. 91. Reference computer flight plans. Are they able to account for bad weather in calculating fuel required?

a. can automatically allow extra consumption for anti-icing use.

b. can automatically divert route around forecast thunderstorms.

c. no.

d. can automatically allow for poorly maintained engines.

92. Which statements are correct about computer flight plans?

- 1. They can file the flight plan for you.
- 2. In the event of an in-flight re-routing computer automatically generates a new flight plan.

a. 1 only.

- b. 2 only.
- c. Neither.
- d. Both.

93. A METAR reads:SA 1430 35002KT 7000 SKC 21/03 Q1024. Which of the following information is contained in this report?

a. Day, month.

b. Runway in use.

c. Temperature, dewpoint.

d. Period of validity.

94. BIRMINGHAM EGBB/BHX SA0850 280850 18014kt 9999 SCT024 BKN030 BKNO45 12/08 Q1011= FC0600 280600Z 280816 190015G27kt 9999 BKN025 TEMPO 0812 5000 - DZ BKN012 BECMG 1214 19022G37= FT0400 280434Z 281212 19022G37 9999 BKN025 TEMPO 1902 5000 RA BKN010 BECMG 2201 25007kt

Refer to weather information for Birmingham, above. What is the total time for which the weather is forecast?

a. 9 hours.

b. 18 hours.

c. 24 hours.

d. 28 hours.

95. BIRMINGHAM EGBB/BHX

SA0850 280850 18014kt 9999 SCT024 BKN030 BKNO45 12/08 Q1011= FC0600 280600Z 280816 190015G27kt 9999 BKN025 TEMPO 0812 5000 - DZ BKN012 BECMG 1214 19022G37= FT0400 280434Z 281212 19022G37 9999 BKN025 TEMPO 1902 5000 RA BKN010 BECMG 2201 25007kt

Refer to weather information for Birmingham, above. What is the lowest visibility forecast at 280800Z? a. 50 km.

a. 50 km. b. 5000m.

c. 10 km or more. d. 2500m.

96. Given the following TAF / METAR: Bordeaux / Merignac LFBD / BOD SA1330 121330Z 21005KT 9000 FEW030TCU FEW 033CB SCT040 BKN100 09/08 Q1005 TEMPO 25015G25KT 3000 TSRA SCT005 BKN015CB= FC1100r 121100Z 121221 28010KT 9999 -RA SCT020 FEW025CB SCT040 TEMPO 1218 25015G25KT 6000 SHRA SCT008 SCT020CB BKN033 PROB30 TEMPO 1218 28020G30KT 3000 TSRA SCT005 BKN015CB BECMG 1821 22004KT 8000 NSW FEW006 BKN030= FT1000 121000Z 121812 30010KT 9999 SCT020 FEW025CB BKN040 BECMG 1822 22004KT 8000 FEW006 BKN030 BECMG 0306 24005KT 6000 SCT007 SCT015 BKN090 BECMG 1012 -RA=

What maximum windspeed (kt) is forecast for BORDEAUX / MERIGNAC AT 1600 UTC? a. 10 b. 5



97. Given the following TAF / METAR: JOHANNESBURG/JAN SMUTS FAJS/JNB FT0900 120900Z 121212 36010KT 9999 FEW030CB FEW035 PROB40 TEMPO 1318 VRB15KT 3000 TSRA SCTO3OCB BKNO80 FM2000 03005KT CAVOK BECMG 0204 SCT008 SCT100 PROB30 0305 3000 BCFG BKNO04 FM0800 34012KT 9999 SCT025 T25/12Z T15/03Z T27/12Z=

What are the lowest cloud conditions (oktas/feet) forecast for JOHANNESBURG/JAN SMUTS at 0300 UTC? a. 5 to 7 at 800. b. 3 to 4 at 800.

c. 5 to 7 at 400.

d. 3 to 4 at 400.

98. Given the following TAF / METAR: LYONS/SATOLAS LFLL/LYS SA1330 121330Z 14007KT 9000 -TSRA FEW020CB SCT033TCU BKNO46 09/07 Q1003 NOSIG= FC1100r 121100Z 121221 VRBO3KT 9999 FEW010 SCT020 BKNO40 BECMG 1821 33006KT TEMPO 1221 VRB15G2OKT 4000 SHRA SCT008 BKNO15= FT1000 121000Z 121812 33004KT 9999 SCT025 BKNO60 BECMG 2224 VRBO2KT 8000 SCT010 SCT020 BECMG 0204 1500 BR BKNO03 TEMPO 0407 0800 FG OVC002 BECMG 0810 33006KT 9999 SCT015 BKNO30=

Which best describes the weather, if any, at Lyon / Satolas at 1330 UTC?

- a. Nil.
- b. Frequent rain showers.
- c. Fog.

d. Light rain associated with thunderstorms.

99. Refer to Appendix A.

At position 37.7N 15.0E what is the worst hazard which could be expected?

- a. Engine flame-out and windscreen damage.
- b. Turbulence.
- c. Reduced visibilty.

d. Nil.

100. Refer to Appendix A

In the vicinity of Paris (N49 E003), the tropopause is at about: a. FL340. b. FL400.

c. FL350.

d. FL380.

101. Refer to Appendix A.

In the vicinity of WARSAW (52N 020E) the tropopause is at about FL: a. 400. b. 370. c. 350.

d. 330.

102. Refer to Appendix A.

Over PRAGUE (50N 014E) the lowest FL listed which is unaffected by CAT is: a. 350. b. 300. c. 270. d. 400.

103. Refer to Appendix A

The surface system over London (51N 000E) is a/ an: a. cold front moving west. b. warm front moving north.

c. stationary occluded front.

d. occluded front moving east.

104. Refer to Appendix A.

What CAT is forecast overhead Benghazi (32N 020E)? a. Slight.

- b. Moderate.
- c. Light.
- d. Severe.

105. Refer to Appendix A

What is the maximum wind speed over Italy?a. 100 kt at FL380.b. 110 kts at FL380 but the maximum not shown on the chart.c. 110 kts at FL380.d. 130 kts at FL340.

106. Refer to Appendix A.

What is the most likely icing to be found at FL180 overhead Casablanca (33N 008W)?

a. Slight.

b. Moderate.

c. Light.

d. Severe.

107. Refer to Appendix A.

What is the wind associated with Munich? a. Maximum wind of 160 kt from 360T. b. Maximum wind of 120 kt from 360T. c. Maximum wind of 100 kt from 360T. d. Maximum wind of 140 kt from 290T.

108. Refer to Appendix A

Which describes the maximum intensity of icing, if any, at FL180 in the vicinity of Casablanca (N33 WOOS)?

a. Severe.

b. Moderate.

c. Light.

d. Nil.

109. Refer to Appendix A

Which of the following flight levels, if any, is forecast to be clear of significant cloud, icing and CAT along the marked route from SHANNON (53N 10W) to BERLIN (53N 13E)?

a. None.

b. FL290.

c. FL210.

d. FL250.

110. Refer to Appendix B

The approximate mean wind component at Mach 0.78 along the true course 270 at N50 from 000 to 010W is:

a. 25 kt tailwind component.

b. 55 kt headwind component.

c. 35 kt tailwind component.

d. 40 kt headwind component.

111. Refer to Appendix B.

The approximate mean wind component (kt) along the true course 180 from 50N to 40N at 020E is:

a. 55 kt tailwind.

b. 40 kt tailwind.

c. 70 kt tailwind.

d. 55 kt headwind.

112. Refer to Appendix B

The WN (degrees/ knots) at 60N 040E is: a. 085/60. b. 050/60. c. 230/60.

d. 265/60.

113. Refer to Appendix B

What is the temperature deviation (degrees C) from ISA over 60N 000E?

- <mark>a. -9</mark> b. -55
- c. +2

d. +9

u. •)

114. Refer to Appendix B

What mean temperature (C) is likely on a course360 (T) from N40 to N50 at E040 a. -47 b. -46

c. -49

d. -50

115. TAF EDDH ISSUED AT 042200 EDDH 0624 21010KT CAVOK BECMG 0810 9999 SCT025 SCT040 PROB30 TEMPO 1218 7000 -RADZ BKN012 BECMG 1620 7000 BKN020 TEMPO 1824 4000 RADZ BKN005

Refer to the TAF above. What are the lowest cloud conditions forecast for 1900 UTC at HAMBURG (EDDH)? a. 5 to 7 at 1,200 ft. b. 3 to 4 at 500 ft. c. 5 to 7 at 500 ft. d. 5 to 7 at 2,000 ft.

116. A flight is planned from L to M, distance 850 nm. Wind component out is 35 kt(TWC), TAS 450 kt. Mean fuel flow out is 2,500 kg/hr, mean fuel flow inbound is 1,900 kg/hr and the fuel available is 6,000 kg.

The time and distance to PSR is : a. 1 hr 30 min, 660 nm. b. lhr 30 min, 616 nm. c. 1 hr 16 min, 606 nm.

d. 1 hr 16 min, 616 nm.

117. Find the distance to the POINT OF SAFE RETURN (PSR). Given:

Maximum useable fuel = 15,000 kg minimum reserve fuel = 3,500 kg, Outbound: TAS 425 kt, head wind component = 30 kt, fuel flow = 2,120kg/hr. Return: TAS 430 kt, tailwind component = 20 kt, fuel flow = 2,150 kg/hr.

a. 1491 nm. b. 1125 nm.

c. 1143 nm. d. 1463 nmb.

118. Given:15,000 kg total fuel, reserve 1,500 kg, TAS 440 kt, wind component 45 head outbound, average fuel flow 2,150 kg/hr.

What is the distance to the point of safe return?

- a. 1520 nm.
- <mark>b. 1368 nm.</mark>
- c. 1702 nm.
- d. 1250 nm.

119. Given:
fuel flow 2,150 kg/hr,
total fuel in tanks 15,000 kg,
fuel reserve requires on arrival 3,500 kg, TAS outbound 420 kt, wind -30 kt,

TAS home bound 430 kt, wind +20kt

Find the time to Point of Safe Return.
a. 2 hr 06 min.
b. 1 hr 26 min.
c. 3 hr 33 min.
d. 2 hr 52 min.
120. Given:

WN= 100/20 TAS = 115 What is distance to PSR? a. 205 nm. b. 100 nm. c. 282 nm. d. 141 nm.

121. Distance between airports = 340 rim True track = 320 W/V = 160/40 TAS = 110

Distance to PET is: a. 121 nm. b. 219 rim. c. 112 rim. d. 228 rim.

122. Flying from A to B, 270 nm, true track 030, wind velocity 120/35, TAS 125 kt.

What are the distance and time to the Point of Equal Time? a. 141 rim, 65 mm. b. 141 rim, 68 min. c. 135 rim, 68 min.

d. 150 rim, 65 mm.

123. Given: Course A to B 088(T) Distance 1250 rim Mean TAS 330kt Mean W/V A to B 340/ 60kt

The time from A to the Point of Equal Time between A and B is:a. 1 hour 54 minutes.b. 1 hour 44 minutes.c. 1 hour 39 minutes.d. 2 hours 02 minutes.

124. Given: distance A to B = 2050 nm. Mean groundspeed "on" = 440 kt Mean groundspeed "back" = 540 kt

The distance to the point of equal time (PET) between A and B is: a. 1153 nm. b. 1025 rim. c. 920 rim. d. 1130 rim.

125. If CAS is 190 kt, altitude 9,000 ft, temperature ISA -10C True course 350, WN 320/40, distance from departure to destination is 350 nm endurance 3 hrs, actual time of departure is 1105 UTC.

The PET is reached at: a. 1233 UTC. b. 1221 UTC.



126. If CAS is 190 kt, altitude 9,000 ft, temperature ISA - 10C true course 350, W/V 320/40 distance from departure is 350 nm, endurance 3 hours.

The distance to PET is?

a. 203 nm.

b. 170 nm.

c. 211 nm.

d. 330 nm.

127. An appropriate flight level for IFR flight in accordance with semi-circular height rules on a course of 180 degrees magnetic is: a. FL105.

b. FL90.

c. FL95.

d. FL100.

128. For an IFR flight using ICAO semi-circular cruising levels on a magnetic track of 200, which is a suitable level? a. FL290.

b. FL300.

c. FL310.

d. F L320.

129. Refer to Appendix C and Jeppesen E(HI)4 SID Paris (Charles de Gaulle) 20-3.

Planning an IFR flight from Paris to London (Heathrow) for the MRJT. Departure SID ABB 8A. Assume variation 3W. Determine the magnetic course, ground speed and wind correction angle from TOC to ABB 116.6:

a. MC 349, GS 416 kt, WCA -5.

b. MC 169, GS 416 kt, WCA +5.

- c. MC 349, GS 416 kt, WCA +5.
- d. MC 169, GS 450 kt, WCA +4.

130. Refer to Jeppesen E(L0)1

What is the NBD serving Belfast City airport?

a. BEL	117.2 MHz.
b. OY	332 kHz.
c. HB	420 kHz.
d. BEL	117.2 kHz.

131. Refer to Jeppesen E(L0)6

Airways routing between CHEB (OKG - N5003.3 E01224.4) to RODING (RDG - N4902.4 E01231.6). Which is the lowest usable Flight Level?

a. FL 40. b. FL 70.

c. FL 80.

d. FL 50.

132. Refer to Jeppesen Manual AMSTERDAM SCHIPOL 11-6. ILS DME RWY 22.

Complete the blanks for the missed approach: "Turn on track.....climbing to (......)" a. left, 005, 2000' 2012' b. left, 266, 2000' 2102' c. right, 240, 2000' 2011' d. left, 160, 2000' 2014

133. Refer to Jeppesen Manual, any SID chart for London Heathrow.

Which of the following is the correct Minimum Safe Altitude (MSA) for the airport?

- a. East sector 2,300 ft within 50 nm.
- b. West sector 2,300 ft within 25 nm.
- c. East sector 2,100 ft within 50 nm.
- d. West sector 2,100 ft within 25 nm.

134. Refer to Jeppesen Manual chart E(HI) 4 FOR EXAMS. An aeroplane has to fly from about 10 nm south east of Salzburg (N4800 E01254) to Klagenfurt (N4636 E01434). Which statement is correct?

a. The minimum obstacle clearance altitude (MOCA) on this route is 10,800 ft AMSL

b. The minimum Enroute Altitude (MEA) is 13,400 ft.

c. The minimum sector altitude (MSA) is 13,400 ft.

d. The minimum grid safe altitude is 13,400 AMSL.

135. Refer to Jeppesen Manual chart E(HI)4 For exams.

An appropriate flight level for flight on airway UG1 from ERLANGEN ERL 114.9 (4939N 01109E) to FRANKFURT FFM 114.2 (5003N 00838E) is:

a. FL300.

b. FL290.

<mark>c. FL310.</mark>

d. FL320.

136. Refer to Jeppesen Manual chart E(HI)4 FOR EXAMS.

The magnetic course and distance from ST PREX SPR 113.9 (N4628 E00627) to FRIBOURG FRI 115.1 (N4647 E00714) on airway UG60.

a. 048 / 46 nm.

b. 061 / 37 nm.

c. 061 / 28 nm.

d. 041 / 78 nm.

137. Refer to Jeppesen Manual chart E(HI)4 FOR EXAMS.

The radio aid at STAD (N5145 E00415) is:

a. a NDB, frequency 386 kHz.

b. a VOR frequency 386 Mhz.c. a VOR/DME on channel 386.

d. a TACAN on channel 386.

138. Refer to Jeppesen Manual chart E(HI)4 FOR EXAMS.

The radio <u>aid.at</u> ZURICH (N4737 E00849) is: a. a NDB , frequency 115.0 kHz. b. a VOR , frequency 115.0 MHz. c. a VOR/DME, frequency 115.0 MHz. d. a TACAN on channel 11.

139. Refer to Jeppesen Manual chart E(HI)5 FOR EXAMS.

An appropriate FL for flight along airway UG5 from MENDE-NASBINALS MEN 115.3 (N4436 E00310) to GAILLAC GAI 115.8 (N4357 E00150) is:

a. FL280. b. FL290.

c. FL300.

d. FL310.

140. Refer to Jeppesen Manual chart E (HI) 5.

The magnetic course and distance from LIMOGES LMG 114.5 (N45.49 E001.02) to CLERMONT FERRAND CMF 117.5 (N45.47 E003.11) on airway UG22 are:

a. 046 / 70 nm. b. 067 / 122 nm. c. 113 / 142 nm. d. 094 / 90 nm.

141. Refer to Jeppesen Manual chart E(L0)1.

The magnetic course / distance from WALLASEY WAL 114.1 (N5324 W00308) to LIFFY (N5329 W00530) on airway B1 are: a. 279 / 114 nm.

<mark>b. 279 / 85 nm.</mark>

c. 311 / 114 nm. d. 311 / 85 nm.

142. Refer to Jeppesen Manual chart E(L0)5.The airway intersection at RONNEBY (N5618 E01516) is marked by:a. a fan marker callsign LP.b. a TACAN callsign RON.

143. Refer to Jeppesen Manual chart E (LO) 5.

The magnetic course/ distance from EELDE EEL 112.4 (N5310 E00640) to WELGO (N5418 E00725) on airway A7 are: a. 024 /023 /73 nm.

b. 024 /023 /47 nm. c. 024 /023 /67 nm. d. 037/038/50 nm.

144. Refer to Jeppesen Manual E(HI)3.

Are the VOR and TACAN navaids at OSNABRUCH (N52 12 E008 17) co-located? a. Yes. b. VOR/DME only. c. VOR/NDB only. d. No.

145. Refer to Jeppesen Manual E(HI)4 for exams.

An aeroplane has to fly from Abbeville (50 08.1N 001 51.3E) to Biggin (51 19.8 0000.2E). At Biggin you can find 141. This is: a. The average true course of the great circle from Biggin to Abbeville.

b. The magnetic course to fly inbound to Biggin.

c. The magnetic great circle course from Biggin to Abbeville.

d. The radial, referenced to true north, of Biggin to fly inbound.

146. Refer to Jeppesen Manual E(HI)4 for Exams.

Flying from ABBEVILLE (N5008.1 E00151.3) by UA20 to BIGGIN (N5119.8 E00002.2). What is the first suitable IFR FL above FL295?

a. 300.

<mark>b. 310.</mark>

c. 320.

d. 330.

147. Refer to Jeppesen Manual E(HI)4 for exams.

For a flight from Paris Charles de Gaulle to London Heathrow, what is the average true course?

<mark>a. 320.</mark>

b. 300.

c. 120.

d. 140.

148. Refer to Jeppesen Manual E(HI)4 for exams.

Of the following, the preferred airways routing from FRANKFURT FFM 114.2 (50 03N 00838E) to KOKSY (51 06N 002 39E) above FL245, on a Wednesday is :

a. UR10 NTM UB6 BUB ATS. b. UG108 SPI UG1. c. UB69 DINKI UB6 BUB ATS.

d. UG1.

149. Refer to Jeppesen Manual E(HI)4 for exams.

The magnetic course/ distance from DINKESBUHL DKB 117.8 (49 09N 010 14E) to ERLANGEN ERL 114.9 (49 39N 011 09E) on airway UR11 are:

a. 052/ 97 nm.

<mark>b. 050/47nm.</mark>

c. 133/85nm.

d. 230/97nm.

150. Refer to Jeppesen Manual E(HI)4 for exams.

The magnetic course and distance from SALZBURG SBG 113.8 (N48 00 E012 54) to STAUB (N48 44 E 012 38) on airway UB5 is:

a. 346/ 43 nm.

b. 166/ 64 nm.

c. 346/ 64 nm.

d. 346/ 45 nm.

151. Refer to Jeppesen Manual E(HI)4 for exams.

What is the best route from CLACTON CLN (N51 50.9 E001 09.0) to MIDHURST MID (N51 03.2 W000 37.4)?
a. UR12.
b. TRIPO UR1 LAM URI..
c. UR123.
d. UB29 LAM URI.

152. Refer to Jeppesen Manual E(HI)4 for exams.

What is the lowest continuous MEA from WALLASEY (N53 23.5 W003 08.0) to MIDHURST (N51 03.2 W000 37.4) on UA34? a. FL245.

<mark>b. FL290.</mark>

c. 5,300 ft.

d. 16,800 ft.

153. Refer to Jeppesen Manual E(HI)5 for exams.

Given Leg MOULINS (N46 42 E003 38.0)/ DIJON (N47 16.3 E005 05.9). Find route designator and distance.
a. UG12, 69nm.
b. D, 44 nm.
c. UG21, 26nm.
d. Direct route, 69 nm.

154. Refer to Jeppesen Manual E(HI)5 for Exams.

On a flight from AMBOISE (N4725.7 E00103.9) to AGEN (N4353.3 E00052.4) What is the best airway route above FL200? a. UB19 POI UB195. b. UH40 FOUCO UH20 PERIG UA34. c. UA34.

d. UB19 CGC UA25.

155. Refer to Jeppesen Manual E(HI)5 for Exams.

The minimum en route altitude available on airway UR160 from NICE NIZ 112.4 (43 46N 007 15E) to BASTIA BTA 116.2 (42 32N 009 29E) is:

a. FL250.

b. FL260.

c. FL210.

d. FL200.

156. Refer to Jeppesen Manual E(HI)5 for exams.
What radio navaids are shown at CHIOGGIA (45 04N E012 16)?
a. VOR/DME freq 114.1, NDB freq 408.
b. VOR freq 114.1, TACAN freq 408.
c. VOR freq 114.1, TACAN channel 408.

d. VOR/DME 114.1, DME freq 408.

157. Refer to Jeppesen Manual E(L0)1.

From SHANNON (N5243.3 W00853.1) by W13 to KORAK. What is meant by "5000" by the route centreline? a. MORA 5,000 ft. b. MAA 5,000 ft. c. MOCA 5,000 ft. d. MEA 5,000 ft.

158. Refer to Jeppesen Manual E(L0)1.

The minimum en-route altitude that can be maintained continuously on airway Cl from STUMBLE 113.1 (5200N 00502W) to BRECON 117.45 (5143N 00316W) is:

a. FL80.

<mark>b. FL110.</mark>

c. 4,100 ft AMSL. d. 2,900 ft AMSL.

159. Refer to Jeppesen Manual E(L0)1.
What navaids are shown at TOPCLIFFE (N5412.2 W00122.4)?
a. TACAN only, channel 84, TOP.
b. TACAN and VOR, channel 84, 113.7, TOP.

c. NDB 92 kHz, AB.

d. VOR, 113.7 MHz, TOP.

160. Refer to Jeppesen Manual E(L0)1. What radio navigation aid is at SHANNON (52 43N 008 53W)? a. VOR SHA 113.3 MHz only.

b. VOR DME SHA 113.3 MHz.

c. NDB frequency 353 kHz.

d. TACAN frequency 113.3 kHz.

161. Refer to Jeppesen Manual E(L0)2.

What is the lowest MEA that can be flown continuously between Jersey (N4913.3W00202.7) and LIZAD (N4935.4 W00420.3)? a. FL140.

b. 1,000 ft.

c. FL60.

d. 2,800 ft.

162. Refer to Jeppesen Manual E(L0)5.

a. FLO50.

b. FLO60.

<mark>c. FLO70.</mark>

d. FLO80.

163. Refer to Jeppesen Manual E(L0)5

OSNABRUCH VOR and TACAN (52 12N 008 17E). What can be said about the VOR and TACAN?

a. They are frequency paired.

b. They are not frequency paired.

c. They are frequency paired and have the same ident.

d. They are not frequency paired and have different idents.

164. Refer to Jeppesen Manual

a. 440 kHz plus ident.

b. 440 kHz plus ident only when BFO switched on.

c. 440 kHz plus ident only when BFO switched off.

d. 440 MHz plus ADF only when BFO off.

165. Refer to Jeppesen Manual E(L0)5.
a. FL100.
b. 1,000 ft.

c. FL60.

d. 2,500 ft.

166. Refer to Jeppesen Manual instrument approach chart:

LONDON HEATHROW ILS DME Rwy 09R (11-1).

The Minimum Descent Altitude (MDA) for an ILS approach, glide slope out, is:

a. 405 ft.

<mark>b. 480 ft.</mark>

c. 275 ft. d. 200 ft.

167. Refer to Jeppesen Manual instrument approach chart ZURICH ILS Rwy 16 (11-2).

a. 800m.

b. 600m.

<mark>c. 720m.</mark>

d. 1500m.

168. Refer to Jeppesen Manual LONDON HEATHROW ILS DME Rwy 09L (11-2).

The decision altitude for an ILS straight-in landing is:

- a. 480 ft.
- <mark>b. 280 ft.</mark>
- c. 200 ft.

d. 400 ft.

169. Refer to Jeppesen Manual, London page 10-2D, Ockham STARs. At Ockham what are the lowest holding level and maximum speed?a. 7,000 ft. IAS 250 kt.b. 7,000 ft, IAS 220 kt. c. FL140, IAS 220 kt. d. FL140, IAS 250 kt.

170. Refer to Jeppesen Manual MADRID BARAJAS 10-2B STAR.

Approaching the airfield from the South using UR10. What is the Initial Approach Fix for ILS RWY 33 ? a. VTB VOR.

b. CJN VOR.

c. CENTA. d. MOTIL.

171. Refer to Jeppesen Manual MADRID, BARAJAS page 11-1. ILS DME Rwy 33.

What is the minimum altitude for glideslope interception?

a. 3,500 ft.

<mark>b. 4,000 ft.</mark>

c. 2,067 ft.

d. 1,567 ft.

172. Refer to Jeppesen Manual MUNICH ILS Rwy 26R (11-4).

The ILS frequency and identifier are:

a. 108.7 IMNW.

b. 108.7 IMSW.

c. 108.3 IMNW.

d. 108.3 IMSW.

173. Refer to Jeppesen Manual MUNICH NDB DME Rwy 26L approach (16-3)

The frequency and identifier of the NDB for the published approaches are: a. 112.3 MUN.

b. 108.6 DMS.c. 338 MNW.

d. 400 MSW.

174. Refer to Jeppesen Manual Munich SID (10-3D).
Which is the correct departure via KEMPTEN from runway 26L?
a. KEMPTEN THREE ECHO.
b. KEMPTEN FIVE SIERRA.
c. KEMPTEN THREE QUEBEC.
d. KEMPTEN THREE NOVEMBER.

175. Refer to Jeppesen Manual Munich STAR plates.

With an easterly surface wind, approaching from the west, to Munich via the TANGO VOR. Which is the best STAR and its associated IAF (Initial Approach Fix)?

a. Kempten 2T / BETOS.
b. NDG 1T / ROKIL.
c. RODING 1R / MOOSBURG.
d. AALEN IT! ROKIL.

176. Refer to Jeppesen Manual Paris Charles-de- Gaulle, (21-7), ILS rwy 10.

What is the ILS course?

<mark>a. 088.</mark>

b. 100.

c. 118.

d. 268.

177. Refer to Jeppesen Manual SID chart for AMSTERDAM ARNEM (10-3B).

The route distance from DER 27 to ARNEM is:

<mark>a. 67 nm.</mark>

b. 35 nm.

c. 59 nm.

d. 52 nm.

178. Refer to Jeppesen Manual SID chart for AMSTERDAM SCHIPOL (10-3).

Which statement is correct for ANDIK departures from runway 19L? a. Maximum IAS 250 kt turning left at SPL 3.1 DME.

b. Cross ANDIK below FL6.0

c. Contact SCHIPOL DEPARTURE 119.05 passing 2,000 ft and report altitude.

d. The distance to ANDIK is 25 nm.

179. Refer to Jeppesen Manual, SID charts for Paris Charles-de- Gaulle.

What is the distance to Abbeville on SID ABB 8 A?

a. 72 nm.

b. 74 nm.

c. 72.5 nm.

<mark>d. 74.5 nm.</mark>

180. Refer to Jeppesen Manual STAR 10-2 and instrument approach chart 11-4 ILS/DME Rwy 27R for London Heathrow.

Planning an IFR flight from Paris to London (Heathrow).
Name the identifier and frequency of the initial approach fix (IAF) of the BIG2A arrival route.
a. EPM 316 kHz.
b. BIG 115.1 kHz.
c. BIG 115.1 MHz.
d. OCK 115.3 MHz.

181. Refer to Jeppesen Manual STAR charts PARIS (Charles-de-Gaulle) (20-2).

The route distance from CHIEVRES (CIV) to BOURSONNE (BSN) is:

a. 73nm.

b. 83 nm.

c. 88 nm.

<mark>d. 96nm.</mark>

182. Refer to Jeppesen SPM, Paris, France plate 21-8 (ILS Rwy 10) What is the localiser course?

a. 278.

<mark>b. 088.</mark>

c. 108.7.

d. 178.

183. Refer to the Zurich 10 - 2 STAR plate

On the BLM 2Z STAR, what is the routing to EKRON?

a. From Denel Int, proceed to Sopim Int, intercept BLM 111 radial to Golke Int, intercept TRA 247 radial inbound (HOC 067 radial) to Ekro.

b. Leave HOC VORDME on 067 radial (IRA 067 radial inbound) to Ekron.

c. Leave WIL VORDME on 018 radial to Ekron.

d. Leave BLM VORDME on 111 radial toGolke Int, intercept TRA 247 radial inbound (HOC 067 radial) to Ekron.

184. Unless otherwise stated on charts for standard instrument departures the routes shown are given with:

a. magnetic headings.

b. true course.

c. magnetic course.

d. true headings.

185. Refer to Jeppesen Manual 5AT(HI)

Flying from 80N 170E to 75N 11E. Initial track is 177 grid. What is the initial true track?

a. 177

b. 357

<mark>c. 347</mark>

d. 167

186. Refer to Jeppesen Manual chart 5 AT(HI).

The initial true course from A (65N 006E) to C (62N 020W) is:

a. 272

<mark>b. 266</mark>

c. 256

d. 246

187. Refer to Jeppesen Manual chart 5 AT(HI).

What is the initial grid track from Stornoway (N5812.4 W00611.0) to Keflavik (N6400 W02240)?

<mark>a. 320</mark>

b. 140

d. 133

188. Refer to Jeppesen Manual chart 5AT(HI)

Route PTS P from VIGRA (N6233.2 E00602.2) to ADOBI (N6830.0 E00300.0). What is the grid track? a. 353 b. 344

c. 173

d. 349

189. Refer to Jeppesen Manual chart NAP.

The initial magnetic course from A (64N 006E) to C (62N 020W) is:

a. 275

b. 267

c. 271

d. 262

190. Refer to Jeppesen Manual North Atlantic Plotting chart.

Flying from A (N58 E004) to B (N62 W020). What is the great circle distance?

a. 775 nm.

b. 755 nm.

c. 740 nm.

d. 720 nm.

191. A "current flight plan" is:

a. flight plan in the course of which radio communication should be practised between aeroplane and ATC

b. filed flight plan.

c. flight plan with the correct time of departure.

d. filed flight plan with amendments and clearances included.

192. A repetitive flight plan (RPL) is filed for a scheduled flight: Paris-Orly to Angouleme, Paris-Orly as alternate.

Following heavy snow falls, Angouleme airport will be closed at the expected time of arrival. The airline decides before departure to plan a re-routing of that flight to Limoges.

a. It is not possible to plan another destination and that flight has to be simply cancelled that day (scheduled flight and not chartered).

b. The airline's Operations department has to transmit a change to the RPL to the ATC office, at least half an hour before the planned time of departure.

c. The pilot-in-command must advise ATC of his intention to divert to Limoges at least 15 minutes before the planned time of arrival.

d. The RPL must be cancelled for that day and an individual flight plan must be filed.

193. An aircraft in the cruise has a calibrated airspeed of 150 kt, a true airspeed of 180 kt and an average ground speed of 210 kt. The speed box of the flight plan must be filled as follows:

a. K0210 b. NO150

c. NO180

d. K0180

194. For a flight plan filed before flight, the indicated time of departure is:

a. the time overhead the first reporting point after take-off.

b. the time at which the flight plan is filed.

c. the estimated off-block time.

d. the time of take-off.

195. For a radio equipped aircraft, the identifier in the ATS flight plan item 7 must always:

a. be the RTF callsign to be used.

b. include the aircraft registration.

- c. include the operating agency designator.
- d. include an indication of the aircraft type.

196. For which flights are Flight Plans required?

- i) IFR flights.
- ii) IFR and VFR flights.
- iii) Flights crossing national boundaries.

iv) Flights over water.
v) Public transport flights.
a. ii, iii and iv
b. i, iii and v
c. i and iii
d. ii, iii, i and v

197.Given:Maximum Certificated take-off mass Actual137,000 kg135,000 kg

For item 9 of the ATS flight plan the wake turbulence category is: a. medium plus "M+". b. heavy/medium "H/M". c. medium "M". d. heavy "H".

198. Given the following flight plan information:Trip fuel 136 kgFlight time2.75 hrsFuel in tanksReserve fuel 30% of tripMinimum Taxi fuel 3 kg

state how "endurance" should be completed on the ICAO flight plan:

a. 0338 b. 0334 c. 0245 d. 0249

199. How many hours of departure time should a flight plan be filed case of flight into areas subject to air traffic flow management (ATFM)?.

a. 3.00 hrs.

b. 0.30 hrs. c. 1.00 hr.

d. 0.10 hr.

200.If a pilot lands at an aerodrome other than the destination aerodrome specified in the ICAO flight plan, she must ensure that the ATS unit at the destination is informed within a specified time of her planned ETA at destination. The time is:

a. 45 mins.

b. 30 mins.

c. 15 mins.

d. 10 mins.

201. If equipment listed in item 19 is not carried:a. circle boxes of equipment not carried.b. tick the boxes of equipment carried.c. cross out the boxes for equipment not carried.d. list equipment carried in box 18 (other information).

202. If the destination airport has no ICAO indicator, in box 16 of your ATS flight plan, you write:

a. //// b. AAAA c. XXXX d. ZZZZ

203. In an ATS flight plan an aircraft will be classified as "L" if its MTOM is?

a. 27,000 kg.
b. 10,000 kg.
c. 57,000 kg.
d. 7,000 kg.

204. In an ATS flight plan item 15 where either a route for which standard departure (SID) and a standard arrival (STAR) are

provided:

a. SID should be entered but not STAR.

b. both should be entered.

c. STAR should be entered but not SID.

d. SID nor STAR should be entered.

205. In flight, it is possible to:
i) file an IFR flight plan.
ii) modify an active flight plan.
iii) cancel aVFR flight plan.
iv) close a VFR flight plan.
(rules of the air ann2 3.3.5)

a. i and iii

b. i , ii, iii and iv

c. ii, iii and iv d. i and iv

206. In order to comply with PANS-RAC, during an IFR flight, deviations from flight plan particulars should be reported to ATC. Concerning TAS and time, the minimum deviations which must be reported are:

a. TAS 3% and time 3 minutes.

b. TAS 5% and time 3 minutes.

c. TAS 5 kt and time 5 minutes.

d. TAS 10 kt and time 2 minutes.

207. In the ATS flight plan Item 15, for a flight along a designated route, where the departure aerodrome is not on or connected to that route:

a. it is not necessary to indicate the point of joining that route as it will be obvious to the ATS unit.

b. it is necessary only to give the first reporting point on that route.

c. the letters "DCT" should be entered, followed by the point of joining the ATS route.

d. the words "as cleared" should be entered.

208. In the ATS flight plan item 15, it is necessary to enter any point at which a change of cruising speed takes place. For this purpose a "change of speed" is defined as:

a. 10% TAS or 0.05 Mach or more.

b. 20 kts or 0.05 Mach or more.

c. 5% TAS or 0.01 Mach or more.

d. 20km per hour or 0.1 Mach or more.

209. In the event that SELCAL is prescribed by an appropriate authority, in which section of the ATS flight plan will the SELCAL code be entered ?

a. Equipment.

b. Route.

c. Aircraft identification.

d. Other information.

210. In term 7 of the flight plane in accordance with PANS – RAC (DOC 4444) should always include, for an aircraft equipped with a radio:

a. aircraft initialisation.

b. aircraft type.

c. aircraft callsign.

d. aircraft operator.

211. Prior to an IFR flight, when filling in the ICAO flight plan, the time information which should be entered in box 16 "total elapsed time" is the elapsed from:

a. take-off until reaching the IAF (initial approach fix) of the destination aerodrome.

b. taxi out prior to take-off until the IAF.

c. take-off until landing.

d. taxi-out prior to take-off until completion off taxi-ing after landing.

212. Reference ICAO Flightplan.

What is the maximum estimated elapsed time or distance between point on track mentioned in Item 15 of the flight plan, for flight outside designed ATS routed ?

<mark>a. 30 min / 200 nm.</mark>

b. 60 min / 370 nm.

c. 90 min / 370 km.

d. 120 min / 370 nm.

213. Reference item 19 of the ICAO flight plan, Endurance is?

a. Maximum flight time plus 45 minutes holding fuel.

b. Maximum flight time plus 30 minutes holding fuel.

c. Fuel endurance of the aircraft.

d. Total usable fuel required for the flight.

214. Reference the ICAO flight plan, in item 15 (speed) this speed refers to:

a. indicated airspeed.

b. equivalent airspeed.

c. initial cruising true airspeed.

d. calculated groundspeed.

215. Standard equipment in item 10 is considered to be:

a. VHF, RTF, ADF, VOR, ILS.

b. HF, RTF, VOR, DME.

c. VHF, VOR, ADF.

d. VHF, RTF, ILS, VOR .

216. The navigation plan reads:

Trip fuel100 kg. Flight time 1 hr 35 min. Taxi fuel 3 kg. Block fuel 181 kg. How should "endurance" be shown on the flight plan? a. 0204 b. 0240

0. 0240 <mark>c. 0249</mark>

d. 0252

217. The planned departure time from the packing area is 1815UTC. The estimated take- off time is 1825UTC. The IFR flight plan must be filed with ATC at the least at:

a. 1725 UTC.

<mark>b. 1715 UTC.</mark>

c. 1745 UTC.

d. 1755 UTC.

218. "Total Elapsed Time" for an IFR flight, when filling in the ICAO flight at box 16, is the time elapsed from:

a. take-off until landing.

b. take-off until reaching the IAF (Initial Approach Fix) of the destination aerodrome.

c. taxi-out prior to take-off until taxiing after landing.

d. taxiing until the IAF (Initial Approach Fix) of the destination aerodrome.

219. What is Total Elapsed Time on a VFR flight plan?

a. From take-off to overhead destination.

b. From take-off to overhead destination + 15 mins.

c. From take-off to landing.

d. From taxi to arrival on the gate.

220. When filling in a flight plan, wake turbulence category is a function of?

a. Max certificated landing mass.

b. Max certificated take-off mass

c. Estimated landing mass.

d. Estimated take-off mass.

221. When filling in item 9 of the flight plan and there is no aircraft designator listed, what should the entry be ? a. none.

b. ZZZZ followed by an entry at item 18.

c. XXXX followed by an entry at item 18.

d. a descriptive abbreviation of the aircraft type.

222. When submitting a flight plan before flight, departure time is? a. Overhead the first reporting point.

b. At which the aircraft leaves the parking area.

c. Of take-off.

d. At which flight plan is filed.

223. You have a flight plan, IFR, from Amsterdam to London.

In the flight plan it is noted that you will deviate from the ATS route on passing the FIR boundary Amsterdam/London. The airway clearance reads " Cleared to London via flight plan route".

Which of these statements is correct?

a. The filed deviation is not accepted.

b. The route according to the flight plan is accepted.

c. It is not allowed to file such a flight plan.

d. You will get a separate clearance for the deviation.

224. You have a mode A transponder (4 digits, 4096 codes) and mode c. Item 10 of the flight plan should show

a. C

b. A

c. P

d. S

225. You have filed a flight plan for an uncontrolled flight and suffer a delay prior to departure. After how long a delay must you restate your OBT?

a. 30 mins.

b. 40 mins.

c. 60 mins.

d. 90 mins.

226. You make a diversion from the route given in the flight plan and land at an uncontrolled airfield.

Within what time after landing should you inform ATC?

a. 10 mins.

b. 20 mins.

c. 30 mins.

d. 45 mins.

227. Refer to Jeppesen Manual - VFR Section Athinai Hellinikon 29-1

What is the variation?

a. 3° east. b. 3° west.

c. not shown on chart.

d. 60 east.

228. Refer to Jeppesen Manual - VFR Section De Kooy 19-1
What is the minimum altitude over the quiet sector?
a. 32,800 ft.
b. 1,500 ft.
c. 3,500 ft.

d. 6,500 ft.

229. Refer to Jeppesen Manual - VFR SectionDe Kooy 19-1What is the frequency and QDM of the ILS for runway 22?a. 109.70 MHz216° (M).b. 109.70 kHz220° (M).c. 119.10 MHz216° (T).d. 109.70 MHz216° (T).

230. Refer to Jeppesen Manual - VFR Section

Esbjerg 19-2

What are the dimensions of runway 08/26? a. 2,600 ft by 45 ft. b. 8,530 ft by 45 ft. c. 8,530 metres by 45 metres. d. 2,600 metres by 45 metres. 231. Refer to Jeppesen Manual - VFR Section Sabadell 19-1 What is the frequency of the Barcelona ATIS? a. 119.10 MHz. b. 120.80 MHz. c. 118.65 MHz. d. 738 kHz. 232. Refer to Jeppesen Manual - VFR Section Aberdeen 10-IV What frequency is the Aberdeen ATSU on? a. 114.30 MHz. b. 126.25 MHz. c. 119.87 MHz. d. 135.17 MHz. Aberdeen 10-IV 333. Refer to Jeppesen Manual - VFR Section What is the max ground elevation within the CTR? a. 1,733 ft. b. 1,733m. c. 2,105 ft. d. 1,245 ft. 234. Refer to Jeppesen Manual - VFR Section Aberdeen 19-1 What frequencies could you receive ATIS when on the ground? a. 114.30 MHz only. b. 121.85 MHz only. c. 114.30 MHz or 121.85 MHZ. d. 121.70 MHz. 235. Refer to Jeppesen Manual - VFR Section Aberdeen What is the maximum wing span of an aircraft using the eastern apron and taxiway? a. 20 ft. b. 20 m. c. 23 m. d. 10 m. Athinai 29-1 236. Refer to Jeppesen Manual - VFR Section

What call sign and frequency for start-up?
a. ATIS 123.40 MHz.
b. Approach 119.10 MHz.
c. Ground 121.70 MHz.
d. Tower 118.10 MHz.

Chapter 15- Revision Questions SPECIMEN EXAMINATION PAPER 56 Questions Time Allowed 3 hours Total Marks 61 All questions worth one mark unless stated.

1. Information on Search and Rescue (SAR) procedures may be obtained:

a. from NOTAMs.

b. from the latest AIC.

c. from the Aeronautical Information Publication.

d. by RI communication with the FIR within which the aircraft is operating.

2. Refer to ED- 6.

The track and distance between Friedrichschafen (EDNY) and Stuttgart (EDDS) are:

a. 350°(M)	62.5 km
b. 345°(M)	65 nm
c. 349°(M)	62.5 nm
d. 351°(M)	116 km

3. Refer to ED-6.

The radio navigation aid at N48 54.8 E009 20.4 is: a. a VOR/DME call sign LBU frequency 10

a. a VOR/DME call sign LBU frequency 109.20 kHz. b. a Tacan call sign LBU channel number 109.20.

c. a VOR/TAC	call sign LBU	frequency 109.20 MHz.
d. a VOR/DME	call sign LBU	frequency 109.20 MHz.

4. Refer to CAP697 SEP Figure 2.1.

Given : Airfield elevation 6,000 ftOAT 15°CInitial Weight 35251bCruise altitude 14,000 ft OAT -13°CWind component 60 kt tailThe time, fuel and ground nautical miles to TOC are:a. 16 min 5 gall31 ngm.b. 15 min 6 gall18 ngm.c. 17 min 7 gall46 ngm.d. 16 min 5 gall52 ngm.

5. Refer to CAP697 SEP Figure 2.2.

Given:

 Pressure Altitude 10,000 ft
 OAT -15°C
 Power 23IN HG 2300RPM

 The fuel flow and KIAS are:
 a. 67.3 PPH
 140 kt.

 b. 67.3 GPH
 157 kt.
 c. 11.4 GPH

 c. 11.4 GPH
 139 kt.
 d. 66.2 GPH

6. Refer to CAP697 MEP Figure 3.4.

An aircraft is flying at a High Speed Cruise at a pressure altitude of 12,000 ft, temperature ISA +15°C. The TAS is: a. 189 kt.

<mark>b. 186 kt.</mark>

- c. 183 kt.
- d. 182 kt.

7. Refer to CAP697 MEP Figure 3.5

The endurance "With 45 Min. Reserve at 45')/0 Power" for an Economy Cruise at 13,000 ft is:

a. 4 hr 25 min.

b. 4 hr 04 min.

c. 4 hr 57 min.

d. 6 hr 18 min.

8. The air distance and time to climb is 197 nam and 33 min respectively. What is the required ground distance with a 40 kt headwind component?

a. 222 ngm.

b. 184 ngm.

- c. 157 ngm.
- d. 175 ngm.

9. Given:

Trip time 3hr 06min Block fuel 118kg Taxi fuel 8kg If the aircraft is required at any time during its flight to have a minimum reserve fuel of 30°/0 of trip fuel remaining, the minimum fuel amount after 2hr is:

- a. 39 kg.
- b. 55 kg.
- c. 42 kg.
- d. 45 kg.

10. An aircraft is airborne from an airfield, elevation 1,560 ft amsl, on a QNH of 986mb/hPa.

On its track of $269^{\circ}(M)$ there is a mountain 12,090 ft amsl. To clear this obstacle by a minimum of 2,000 ft its correct ICAO VFR Flight level is: (1mb/hPa = 30 ft).

a. FL145.

b. FL155.

- c. FL160.
- <mark>d. FL165.</mark>

11. On a Jeppesen chart the figures "FL80 2700a" are displayed below an airway.

What does the "FL80" indicate?

a. The Route MORA (a Safety Altitude).

b. Minimum Enroute Altitude.

c. Maximum Authorized Altitude.

d. The base of the airway.

12. In the Jeppesen SID, STARs & IAP directions are given as:a. true course/track.b. magnetic course/track.c. true heading.d. magnetic heading.

13. Refer to CAP697 SIMPLIFIED LRC (use Figures 4.5.3.1 & 4.3.1B)

Given : Distance 997 ngmtail wind component 160 ktlanding weight 45,000 kgCruise weight 56,000 kgFL370 ISA 0°C

 The fuel required and trip time is:

 a. 11,200 kg
 4 hr 09 min.

 b. 5,300 kg
 1 hr 09 min.

 c. 4,200 kg
 1 hr 51 min.

 d. 5,000 kg
 2 hr 00 min.

14. Refer to CAP697 MRJT Figure 4.4

Given: Aircraft mass 43,000 kg Destination airfield elevation = 3,500 ft ISA conditions

Alternate airfield elevation = 10ft

What is the final reserve? a. 2,110 kg b. 1,025 kg c. 1,038 kg d. 1,055 kg

15. Refer to CAP697 MRJT Figure 4.5.4

An aircraft with an estimated landing weight of 55,000 kg plans a descent from FL310 through turbulence; the mean wind component in the descent is 45 kt headwind.

The fuel and ground distance are: a. 280 kg 82 ngm. b. 270 kg 107 ngm. c. 270 kg 79 ngm. d. 275 kg 117 ngm.

a. +10%

16. Refer to CAP697 MRJT Fig 4.3.2B

Given :					
5,000 kg fuel availab	le Cruise at FL2	210 50 kt headwind	Landing weight 45,000 kg		
How fare could you f					
<mark>a. 600 ngm.</mark>					
b. 750 ngm.					
c. 500 ngm.					
d. 670 ngm.					
17. Given :	o1 MTM	54,000,1			
MTOM 62,00	0	54,000 kg			
-	0 kg MZFM	51,300 kg			
Take Off Fuel 14,50					
The maximum traffic a. 15,000 kg.	toad for this hight i	18.			
b. 15,800 kg.					
c. 12,000 kg.					
d. 4,000 kg.					
u. 1,000 kg.					
18. Refer to CAP697 MRJT Figure 4.3.1B					
Given	C				
Trip Distance 1000 nm Nil wind FL 290					
For a temperature increase of 30°C the approximate change in Trip Time is:					

d. +7%
19. Refer to CAP697 MRJT Figure 4.2.1
If an aircraft's cruise weight is 50,000 kg the Optimum Altitude for a 0.78 Mach flight is:
a. 35,500 ft pressure altitude,
b. 36,200 ft pressure altitude.
c. 35,500 ft altitude.
d. F L360.

20. Reference CAP697 MRJT Figure 4.5.3.2
Given:
Brake Release Mass 62,800 kg Fuel to TOC 1,400 kg

0.74 Mach Cruise at FL310 ISA -10°C Wind component 50 kt head Mass at first reporting point after TOC 59,500 kg

The planned ground distance TOC to the first reporting point is:

a. 356 nm.

<mark>b. -5%</mark> c. -10%

b. 314 nm.

c. 277 nm.

d. 280 nm.

21. Given: Track 185°(T) Variation 9° east Heading 182°(M)
Which is the lowest suitable ICAO IFR cruising level?
a. FL280.
b. FL310.
c. FL290.
d. FL270.

22. Reference CAP697 MRJT Figure 4.5.1 Given: Climb to FL350 ISA+6°C MSL airfield

Brake Release Weight 57,500 kg

The time, fuel, TAS and distance covered are:

a. 22 ft	1,625 kg395 kt	114 nam.
b. 20 ft	1,625 kg395 kt	117 nam.
c. 20 ft	1,630 kg395 kt	100 nam.
d. 21 ft	1,675 kg398 kt	133 nam.

23. Reference CAP697 MRJT Figure 4.3.6

Give:

Time to alternate 54min Landing weight 55,000kg Wind component 50 kt tail

The alternate fuel and ground nautical mile distance are:

a. 2,500 kg 320 ngm. b. 1,500 kg 175 ngm. c. 2,350 kg 355 ngm. d. 2,200 kg 350 ngm.

24. Reference CAP697 MRJT Figure 4.5.3.1

Given: Pressure altitude 33,000 ft LRC OAT -61°C Cruise time 29min Zero wind Initial Gross weight 54,100 kg

The fuel required is:

a. 1100 kg. b. 1200 kg. c. 1207 kg. d. 900 kg.

25. Refer CAP697 MRJT Fig 4.3.1 Given:

FL370 @ LRCISA +20°CDistance 800 ngm50 kt headwindLanding weight 50,000 kg

What is the trip fuel and flight time?

a. 5,600 kg2 hr 15 min.b. 4,500 kg2 hr 00 min.c. 4,100 kg1 hr 48 min.d. 4,400 kg1 hr 48 min.

26. A flight is due to operate between London and Glasgow on a Repetitive Flight Plan (RPL). Prior to departure Glasgow is closed due to heavy snow.

The operator intends to operate this flight to Edinburgh instead.

The correct action regarding flight plans is?

a. This cannot be done, go back to airport hotel.

b. Operations should inform the London ATC Unit at least 10 minutes before departure.

c. Cancel the RPL and file a standard ICAO Flight Plan to Edinburgh.

d. Take-off for Glasgow and divert along route.

27. A normal commercial IFR flight has an estimated EOBT of 1540 UTC with the estimated take-off time as 1553 UTC. What is the latest time for filing the ICAO Flight Plan?

a. 1510 UTC.

b. 1455 UTC.

c. 1525 UTC.

d. 1440 UTC.

28. A flight from BIRMINGHAM (EGBB) to DUBLIN (EIDW) as an EOBT of 09:30 UTC Actual airborne time of 09:50, expected trip time of 1 hour, estimated flying time to SHANNON FIR (EISN) boundary of 55 minutes. How should you complete item 18 of the ICAO flight plan regarding your estimate for the FIR boundary?

a. EET/EIDW1045.

b. EET/EISN1025. c. EET/EISN0055.

d. EET/EISNO060.

29. Refer to Jeppesen MUNICH 10-2B

When approaching Munich via TANGO with a westerly surface wind, the route and track miles to the IAF are expected to be?

a. AALEN - WLD - KOKIL - MBG	90 nm.
b. AALEN - WLD - ROKIL	51 nm.
c. AALEN - WLD - ROKIL - MBG	124 nm.
d. WLD-ROKIL	10 nm.

30. Refer to Jeppesen E(L0)1

 The magnetic course and distance from LIFFY (N5329 W00530) and WAL (N5324 W00308) is:

 a. 279° (M)
 85 nm.

 b. 099° (M)
 114 nm.

 c. 099° (M)
 85 nm.

 d. 099° (M)
 59 nm.

31. Refer to Jeppesen Polar High Altitude Chart 5AT(HI). What is the Grid track from Stornoway (N58 W006) to Kulusuk (N6530 W03710)?

<mark>a. 318°.</mark> b. 298°.

c. 138°.

d. 118°.

32. Given : A to B Distance 2050 nm Safe Endurance 6 hrs GS OUT = 480 kt GS ON = 450 kt GS HOME = 380 kt

Calculate the distance and time to the Point of Equal Time from A.

a. 1272 nm2hr 39 min.b. 906 nm1 hr 53 min.c. 1111 nm2 hr 19 min.d. 939 nm1 hr 57 min.

33. Given: GS OUT = 178GS HOME = 249 Distance A to B = 450 nm Endurance 3 hours

What is the distance to the Point a. 204 nm. b. 311 nm. c. 415 nm. d. 262 urn.

34. You plan to fly from A to B at a TAS of 230 kt, a GS of 255 kt and an initial cruising pressure altitude of 15,000 ft.

What should you complete Item 15 of the ICAO Flight Plan?
a. K0230 F150.
b. NO230 F150.
c. NO255 S1500.
d. NO230 FL150.

35. Refer to Jeppesen E(L0)5.

What is the lowest continuous flight level you should maintain along B45 when flying from Czempin/CZE (N5207 E01643) to Chociwel/CHO (N5328 E01521)?

- a. FL60.
- b. FL70.
- c. FL180.
- <mark>d. FL80.</mark>

36. A current flight plan is:

a. the filed flight plan with amendments and clearances included.

b. the filed flight plan without any changes.

c. flight plan with correct time of departure.

d. one that is stored via repetitive flight plan procedures.

37. Refer CAP697 MRJT Figure 4.3.6

Flight from Paris to London with Manchester being the alternate. Given: London - Manchester 160 um Mean track 350°(T) W/V 250/30°(T) Estimated landing mass at alternate 50,000 kg

What is the fuel and time to the alternate?

 a. 1,200 kg
 20 min.

 b.1,600 kg
 36 min.

 c. 1,450 kg
 32 min.

 d. 1,300 kg
 28 min.

Refer to the Glasgow EGPF actual and TAFs and answer questions 38 & 39. GLASGOW EGPF SA 271420Z 19010KT 9999 RA FEW010 BKNO30 08/06 Q1012 FC 271322 20007KT 9999 SCT020 BKNO30 TEMPO 1322 6000 -RA BKNO12 PROB30 TEMPO 1318 24018G30KT BECMG 1922 32010KT FT 271812 25012KT 9999 BKNO20 TEMPO 1803 7000 -RA BKNO12 BECMG 1922 35008KT

38. What is the temperature and dewpoint at 1420Z on the 27th?

a. No data given.

- b. Temperature +8°C Dewpoint +6°C. Refer to SA for 1420z
- c. Temperature -8°C Dewpoint -6°C.
- d. Temperature +10°C Dewpoint +12°C.

39. What is the worst visibility you might experience when landing at 0200Z on the 28th?

- a. No data given covering this period.
- b. 10 kilometres or more.

c. 7 kilometres in light rain.

d. 7000 metres in moderate rain.

40. Refer CAP697 MRJT Fig 4.7.2

Given: ETOPS approval for 120 minutes Weight at diversion 50,000 kg Long Range Cruise

Your diversion airfield should be within:

<mark>a. 742 nm.</mark>

b. 379 nm.

c. 768 nm.

d. 110m m.

41. Refer to Jeppesen AMSTERDAM Schiphol SID 10-3Which of the following statements is true regarding an ANDIK departure from RWY 19L?a. Contact Schipol Departure on 119.05 Mhz when passing 2,000 ft and report altitude.

b. The distance to ANDIK is 25 nm.

c. Cross ANDIK below FL60.

d. Maximum IAS 250 kt till turning left at SPL 3.1DME.

42. You are cruising at FL250 and need to be at FL50 10 nm before a VOR/DME. Your rate of descent is 1,250 ft/min and your GS in the descent 250 kt.

How far before the VOR/DME should you start your descent ?

a. 66.7 nm.

b. 83.3 nm.

c. 98.5 nm.

<mark>d. 76.7 nm.</mark>

43. You required to uplift 40 US Gallons of AVGAS with Sp. G of 0.72 How many litres and kilograms is this ?

a. 109 ltr 151 kg.
b. 182 ltr 131 kg.
c. 182 ltr 289 kg.
d. 151 ltr 109 kg.

44. Refer CAP697 MRJT Figure 4.3.2C

Given: Mach 0.74 cruise Trip fuel available 17,000 kg FL280 Estimated landing mass 52,000 kg Trip distance 2500 ngm

What is the maximum wind component?

- a. Zero.
- b. 25 kt head.c. 25 kt tail.

d. 60 kt head.

45. Refer to Jeppesen E(L0)1

What type of radio navigation aid is located at Perth (N5626 W00322)?
a. VOR on 110.4 MHz and NDB on 394 kHz.
b. TACAN on 110.4 kHz.
c. VOR on 110.4 MHz.
d. VOR/DME on 110.4 MHz.

46. Given: DOM 33,510 kg Traffic load 7,600 kgTaxi fuel 250 kg What is the estimated landing mass at the destination?
a. 43,318 kg.
b. 45,818 kg.
c. 42,218 kg.
d. 43,193 kg.

47. When completing an IFR flight plan the "Total Elapsed Time" in item 16 is from:

a. take-off to overhead the destination airport.

b. from first taxiing under own power until the IAF for destination airport.

c. take-off to the IAF for the destination airport.

d. take-off until landing at the destination airport.

48. An aircraft has been planned to fly via a signification point based upon the TIR VORDME QDM120 at range of 95nm.

The correct entry for the ICAO Flight Plan is: a. TIR300095. b. TIR120095. c. 1IR30095. d. 300095TIR.

49. Reference E(HI) 4 (CAA FOR EXAMS)

GIBSO (N5045.1 W00230.3)
Aircraft intending to use UR-14 will be expected to cross GIBSO at or above FL?
a. FL200.
b. FL250.
c. FL280.
d. FL310.

50. Reference E(HI)5 CAA for examinations

From Mende-Nasimbals (N4436.4 E00309.7) to Gaillac (N4357.3 E00149.5) via UG5. Which of these levels is the lowest available?

a. 290.

b. 310.

c. 330.

d. 350.

51. Reference E(HI)4 (CAA FOR EXAMS)

What is the total distance and mean true course between Abbeville (N5008.1 E00151.3) and Biggin (N5119.8 E00002.2) on UA20? a. 100 nm 321°T.

b. 162 nm 313°T.

c. 162 nm 316°T.

d. 100 nm 316°T.

52. An aircraft is carrying Maritime Survival Equipment.

The correct entry at Item 19 is:

a. cross out indicators P, D and J; tick M.

b. circle indicator M.

c. tick indicator M.

d. cross out indicators P, D and J.

53. Refer to Training Manual, Amsterdam page 10-9X.

What is the minimum radar altitude for a Cat 2 ILS DME approach to runway 01L?

a. 88 ft.

<mark>b. 100 ft.</mark>

c. 300m.

d. 103 ft.

54. At a fuel Relative Density of 0.80 an aircraft turbine engine burns 220 litres per hour. If Relative Density is 0.75 what is the fuel burn?

a. 235 1/hr.

b. 206.

c. 220.

d. 176.

55. Refer to Annex "A"

The weather feature lying from Northern Ireland (N54 W007) into the Atlantic ocean at N38 W109 is a: a. cold front.

b. warm front.

c. occluded front.

d. 100 kt jetstream at FL310.

56. Refer to Annex "A"

a. None.

b. Severe turbulence and icing within CBs.

c. Moderate CAT at FL400.

d. Moderate turbulence and icing.