



Hang Gliding

B-LICENCE THEORY TEST

Pilot's Name (Capitals):

Club:

Examiner's Name:

Instructor's Licence No:

Date Written:

Date Marked:

MARKS

A	B	C	D			
-----	+ -----	+ -----	+ -----	= -----	= -----	%
80	21	16	12	129		

Pass Mark = 85%

NOTES:

- Give answers on own paper.
- Write legibly.
- Use sketches where necessary.
- Where sketches are provided, write your answers on them.

SECTION A

METEOROLOGY AND MICROMETEOROLOGY

1. Describe and illustrate the formation of a cold front. (3)
2. Describe the changing weather characteristics and cloud features, as a cold front approaches and passes a given point. (4)
3. What is meant by a "lapse rate"? (1)
4. What conditions would you expect in unstable air? State your reasons. (3)
5. Illustrate a wind blowing onto a hill in:
 - a) Stable air conditions
 - b) Unstable air conditions(1)
6. Would you expect a wind gradient to be stronger in stable or unstable air? (1)
7. Define a temperature inversion. (2)
8. What conditions accompany a temperature inversion? (4)
9. What factors contribute to cause cloud formation? (2)
10. What dangers do clouds present? (3)
11. Describe and illustrate the following types of cloud and state under what circumstances they will form:
 - a) Cumulus
 - b) Cumulo-Nimbus
 - c) Banner Cloud
 - d) Lenticular(8)
12. Describe and illustrate a wave formation (3)
13. What is the "convergence"? (2)
14. Where would you expect a convergence to occur? (3)
15. What is a wind shear? (2)
16. Illustrate and describe the following winds:
 - a) Diurnal (land and sea breeze) (5)
 - b) Anabatic and katabatic (Mountain and Valley breezes) (5)
17. Illustrate a thermal from formation to dissipation. (9)
18. What factors determine moderate thermal development, release, rate of ascent and decay? (6)
19. What is a cloud street and how is it formed? (3)
20. Explain and illustrate the formation and dissipation of a thunderstorm. (9)

Sub Total (80)

SECTION B**EQUIPMENT AND FLYING SKILLS**

21. What is aspect ratio? (1)
22. What is "sink rate"? (1)
23. What speed in relation to stall speed would normally produce:
a) Minimum sink
b) Best L/D (2)
24. What is the greatest danger associated with:
a) Wingovers
b) Whipstalls (2)
25. What do you check for when preparing to make an outlanding in an unfamiliar landing area? (5)
26. Whilst progressing with a cross country flight, what are the two most important things you should be studying on the ground at regular intervals? (2)
27. What are the four most important steps in parachute deployment? (4)
28. Under what circumstances would you deploy your parachute? (3)
29. How often should your parachute be repacked? (1)
- Sub Total (21)**
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SECTION C**AERO MEDICAL**

30. Describe the symptoms of fatigue? (4)
31. Why is it not safe to fly immediately after scuba diving and how long should a person wait? (2)
32. What is hypoxia and where is it likely to be encountered? (2)
33. What are the symptoms of Hypoxia? (4)
34. What other factors can increase the effect of hypoxia? (2)
35. What is hypothermia and what are its:
a) Symptoms
b) Remedies (2)
- Sub Total (16)**
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SECTION D

AIRSPACE AND AIRLAW

- 36. What is an airway? (2)
- 37. What is a restricted area? (1)
- 38. What is a prohibited area? Give two examples of the type of area which may be prohibited. (2)
- 39. Under what circumstances is a hang glider permitted to enter controlled airspace? (2)
- 40. Outline the approximate positions and extremities of principal controlled airspace on a map of your region, and mark your regularly flown flying sites. (5)

Sub Total (12)

GRAND TOTAL 129