



EAST AFRICAN SCHOOL OF AVIATION

DIPLOMA IN AERONAUTICAL ENGINEERING

AIRFIELD AND SAFETY II AND RESEARCH METHODS

Stream: MOD 2 TERM 1 (A&E)

DATE: 06/04/2017

TIME: 2.00 PM - 5.00 PM.

INSTRUCTIONS TO CANDIDATES

1. This paper consists TWO sections: A and B.

2. Answer ALL questions

SECTION A: AIRFIELD SAFETY AND PROCEDURES

Q. 1. a) Explain how flight safety can be enhanced under the following headings:

- i) Fire safety,
- ii) Safety around Aero planes,
- iii) Safety around Helicopters,
- iv) Foreign object damage. **(8marks)**

b) Define Aircraft accident according to Civil Aviation Act Chapter 394 of the laws of Kenya. **(3marks)**

c) Outline SIX ground tasks to be performed on passenger aircraft on each of the following:

- (i) Arrival,
- (ii) Departures. **(9marks)**

Q. 2. You have witnessed an Aircraft crash landing. Explain the procedure of reporting the occurrence. **(20marks)**

Q 3. a) Describe two methods of providing electrical power to the Aircraft while on ground. **(4marks)**

b) Explain how the following tasks enhance flight safety.

- i) Careful work,
- ii) Accurate documentation,
- iii) Observation. **(6marks)**

SECTION B: RESEARCH METHODS

Q.4. Define the term research design. **(6 marks)**

Q.5. Differentiate between action and experimental research. **(8 marks)**

Q.6. Explain the purpose of literature review. **(6 marks)**

Q.7. Explain three sources of secondary data. **(15 marks)**

Q.8. Explain the various elements of a research proposal. **(15 marks)**