

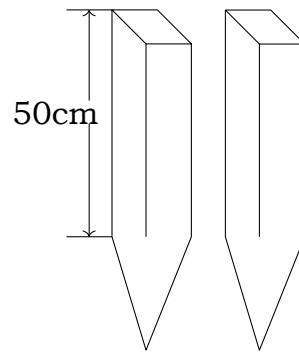
ADVANCED CERTIFICATE OF SECONDARY EDUCATION
SPECIAL EXAMINATION
GEOGRAPHY 1
MARKING SCHEME

SECTION A

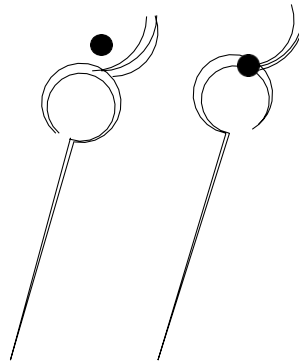
1. (a). The position of a chimney is 907158 **(03 marks)**
(b). The site and layout of Mwanza town **(Four points @ 01mark)**
The site of Mwanza town is in the Northern part of the map around grid reference 895215
- Layout of Mwanza town is as follows
- i. The area is connected with overland transport networks such as pipelines e.g from grid reference 897202 to 925178
 - ii. The area is also highly connected with overland transport networks such as dry weather roads e.g the road from grid reference 887221 to 968102
 - iii. The area is largely connected with drainage patterns mostly dendritic due to mountainous landscape
 - iv. The area appears in nucleated and linear settlement pattern. E.g linear settlement is well observed along the Tanzania central railway
- (c). The bearing of Saa Nane Island Game Reserve from Maliza Hill is 315° **(03 Marks)**
(d). Climate of the mapped area is Modified Equatorial climate **(02 mark)**
Any two evidences (i). The area is located in latitude $2^{\circ} 35' S$
(ii). Presence of large water bodies like Lake Victoria
(iii). Presence of plantations like coffee and sugar plantation
- (e) Importance of R.F scale given on the map **(Any four @ 01 mark)**
- i. It is useful in determining size of objects and other geographical features on the map
 - ii. It enables showing images clearly on the map
 - iii. It is easily convertible
 - iv. It is useful in estimating distance between centers/points on the map
- (f) Five functions of Mwanza town **(Five points @ 01mark)**
- i. It is useful for trading activities, this is due to presence of high populated centers and markets such as Mwanza town
 - ii. The town is useful for fishing activities. This is due to presence of a large water body of Lake Victoria
 - iii. Administration activities
 - iv. Transportation activities. This is due to presence of many roads and the Central Railway
 - v. Socio-cultural function. Example is religion
- (g) Two type of rock underlying the mapped area with evidence **(@ 02marks)**
- i. Igneous rock
This is due to presence of large water body of Lake Victoria
It is also due to presence of mountainous land scape
 - ii. Sedimentary rock
This is due to presence of several low land s where sediments have accumulated.
2. (a) Chain survey is the type of survey which deals with measurement o distances on the earths surface or the purpose of drawing maps, plans and fixing boundaries. **(01 marks)**

Equipments to be used in fixing position on the ground

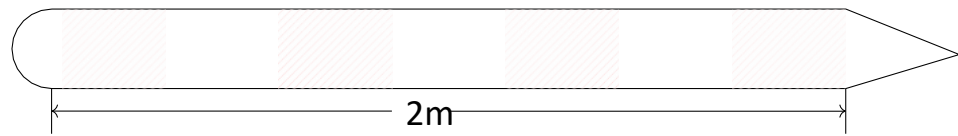
- (i) **Pegs (wooden pegs)**-these are tools made of wood. They are 50cm long, they are used to fix permanent positions on the ground. **(03 marks)**



- (ii) **Arrows**-equipments made of steel they are 50cm long. They are tied with colored rang (cloth) which simplifies their visibility from a distance. They are used to fix position off station or objects. **(03 mark)**



- (iii) **Ranging poles (Ringing rods)**-these are poles made of wood, they are painted in red and white to simplify their visibility used to fix position for stations or objects temporary(**03 marks**)



(b) Advantages of chain survey (Any five @ 01mark)

- i. Chain survey is simple to conduct-it does not require advanced skills and complex procedures.
- ii. Cheap in terms of cost- its equipments are not cost full and some of them can be obtained from local environment example the pegs.
- iii. The surveying method can be applied alongside other methods of surveying eg prismatic compass survey, levelling and plane table survey.(01 marks)
- iv. It is useful for mapping of small areas like school compounds, colleges etc.
- v. It is useful in adding details on existing maps and plans

3. (a). **FORCED MARRIAGES AND INHERITENCE OF WIDOW (02 marks)**

(b). i. primary source (personal experience/ observation) (@ ½ mark)

ii. Secondary source (through the radio)

(c). Two research hypothesis

(@ 01 mark)

i. lack of awareness

ii. socio-cultural poor believes

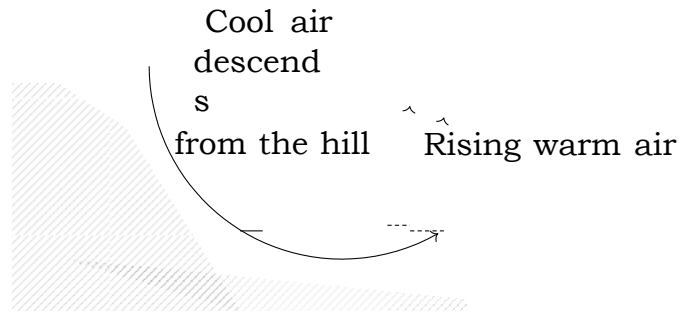
(d)

(10 Marks, @ 02 mark)

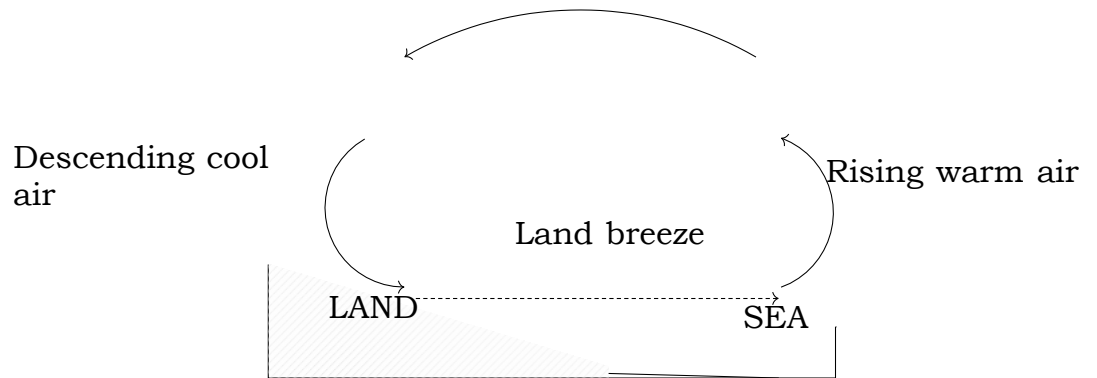
- i. Identification of research Topic. e.g Forced marriages and inheritance of widow
- ii. Literature review i.e Passing through various relevant materials written by other researchers
- iii. Hypothesis formulation. e.g Bad socio-cultural believes among people is the cause of forced marriages and inheritance of widows
- iv. Study design. A plan which direct a researcher on how he/she is going to conduct research. It includes selection of research site, estimation of cost, choice of tool of data collection and respondents
- v. Reconnaissance. Pre-visiting of the research site before actual data collection (Shinyanga region)
- vi. Data collection. Gathering of data through the chosen tool of data collection e.g interview, questionnaire, observation

SECTION B

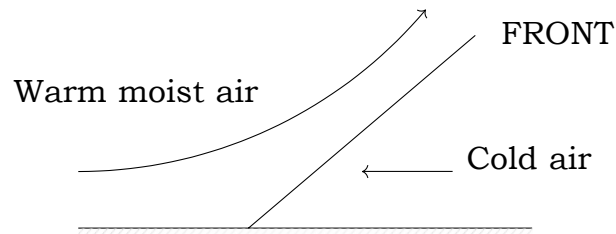
4. a. Introduction **01 mark**
➤ introduction on rock and weathering
- b. Main body **(six points @ 03 marks)**
➤ Factors which determine resistance of rock to weathering
- i. Mineralogical composition/ nature of the rock
 - ii. Relieve of an area
 - iii. The type of climate
 - iv. Plants and animals
 - v. Time factor. I.e. Time the rocks have taken to weather
 - vi. The role played by human activities
- b. Conclusion **(01 mark)**
➤ Any relevant conclusion
5. a). Introduction **01 mark**
b). Main body (causes of salinization) six points **@ 3 marks**
- i. Dry climate and low precipitation
 - ii. High evaporation rate
 - iii. Poor drainage
 - iv. Irrigation
 - v. Leakage from geological deposits and penetration to the ground/
weathering of rock materials.
 - vi. The use of fertilizers
 - vii. Sea water
- c). Any relevant conclusion **(01 mark)**
6. (a) Introduction **(01 marks)**
➤ Temperature inversion is atmospheric condition in which temperature increase with increase in altitude. This makes air temperature near the surface to be lower than temperature far above the earth's surface . (or any relevant introduction)
- (b) Main body **(Any 6 points @ 03=18 marks):**
Causes of temperature inversion.
- (i) **Presence of ozone layer in stratosphere**-this absorbs ultraviolet rays from the sun. Making the upper part of stratosphere to be warmer/hot than the lower part.
 - (ii) **Presence of atomic oxygen in the thermosphere**-this absorbs ultra violet rays from the sun. Making the upper part of thermosphere to be warmer/hot than the lower part.
 - (iii) **Katabatic winds**-theses are cold winds blowing from the hills to the valley during night, as they move downhill they pass under neath the warm valley air causing temperature inversion to occur.



- (iv) **Land breeze**-this is cool air moving from the land towards the sea during night. When the land is cool and the sea is warm, as this cool air moves towards the sea. It passes underneath the warm sea air causing temperature inversion to occur.



- (v) **Terrestrial radiation**-this occurs during night when land cools, the heat rises to the upper parts of troposphere, making the lower part of the troposphere to be cooler than the upper part of the troposphere.
- (vi) **Advection**-this occurs when warm air passes over cold surface (cold land or cold ocean current) its lower part is cooled. where by its upper parts remains warm causing temperature inversion to occur
- (vii) **Convergence of air masses**-when warm air mass converge with cold air mass in cyclones (depression) the warm air mass rises over cold air mass making the lower part to be warmer than the upper part.



- (vii) **Presence of water vapor in atmosphere**-water vapor in atmosphere absorbs and retains a lot of heat in atmosphere causing temperature inversion to occur.
- (viii) **Air subsidence in anticyclones**-this take place when cool air descends in anticyclones (30° and 90° north and south of the equator) it spreads towards sub-polar and the equator as it spreads towards the equator and sub-polar zones it passes underneath warm air causing temperature inversion to occur.

(c) Conclusion

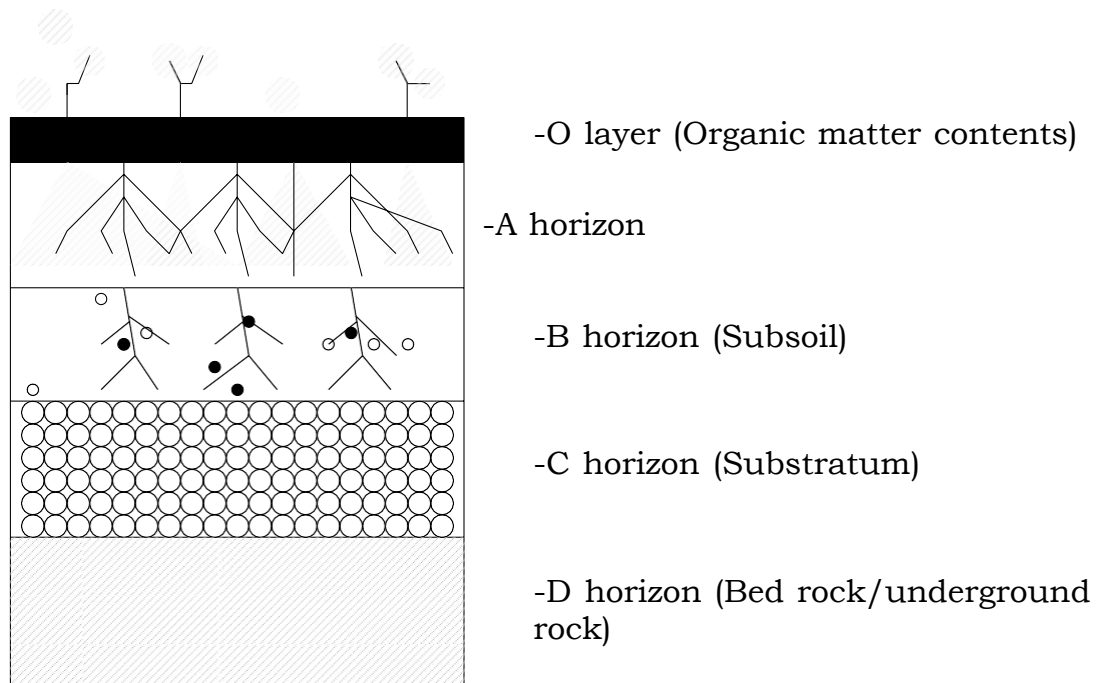
(01 marks)

- Any relevant conclusion. Better on the impacts of temperature inversion.

7. (a) Introduction

(01 marks)

Soil profile is a vertical cross section of the soil from the ground surface downwards to the bottom (underlying rock)



(03marks) for a good diagram

b). Main body **(6 points @ 02.5=15 marks)**.

- (i) It determine water holding capacity. Deep soil holds more water than shallow soil.
- (ii) It determine/influence soil fertility. Deep soil has a lot of nutrients than shallow soil
- (iii) It influence air circulation in the soil (aeration)
- (iv) It support plant growth and provides habitat for microorganisms.
- (v) It determine the penetration of plant roots

(c) Conclusion

(01 marks)