



THE REPUBLIC OF UGANDA

LYANTONDE DISTRICT ACADEMIC BOARD

MOCK 2022

INTEGRATED SCIENCE

Time allowed: 2 hours 15 minutes

Index No. :

School EMIS						Personal No.		

Candidate's Name :

Candidate's Signature :

School Name :

District Name :

Read the following instructions carefully:

1. The paper has **two** sections: **A** and **B**
2. Section **A** has 40 questions (40 marks)
3. Section **B** has 15 questions (60 marks)
4. Answer **ALL** questions. All answers to both Sections A and B must be written in the spaces provided.
5. All answers must be written using a blue or black ball point pen or ink. Diagrams should be drawn in pencil.
6. Unnecessary crossing of work may lead to loss of marks.
7. Any handwriting that cannot be easily read may lead to loss of marks.
8. Do **not** fill anything in the boxes indicated;
For Examiner's use only.

FOR EXAMINER'S USE ONLY

Qn. No	MARK	SIGN
1 – 20		
21 – 40		
41 – 43		
44 – 46		
47 – 49		
50 – 52		
53 – 55		
TOTAL		

SECTION A:

Questions **1** to **40** carry one mark each

1. Name the percentage of the gas that supports burning.

.....

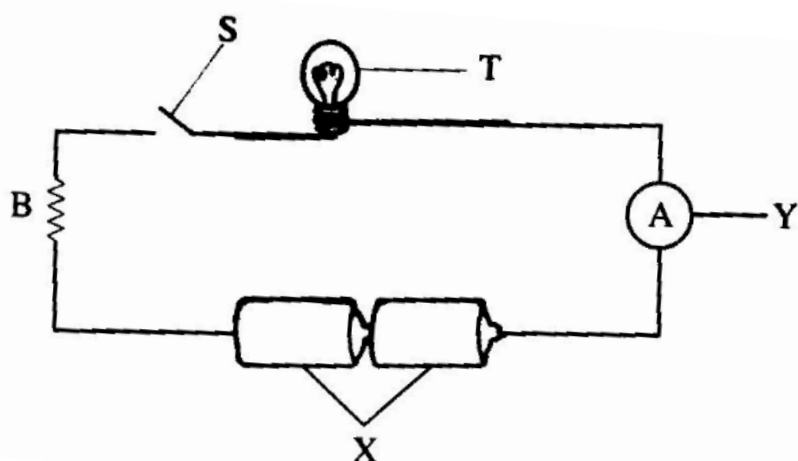
2. Name **one** device used to store sound.

.....

3. Which type of teeth is used to tear flesh?

.....

The diagram below is of a simple electric circuit. Use it to answer questions 4 and 5.



4. Name the part of the circuit labelled **Y**.

.....

5. State the function of part marked **S**.

.....

6. Apart from immunization, give **one** other way of preventing the spread of Polio.

.....

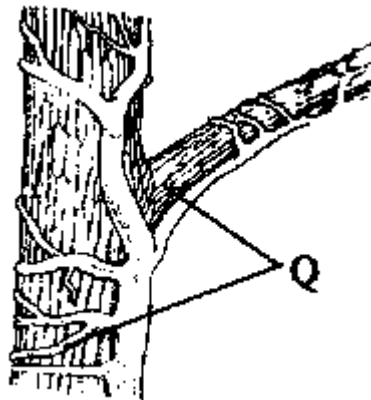
7. By what process does heat from the charcoal stove reach someone preparing a meal?

.....

8. In which way is a tapeworm different from a hookworm in terms of feeding?

-
9. State the function of the endosperm of a maize grain.
-
10. State any **one** way in which the spread of germs by fingers can be controlled.
-
11. How can a hutch be constructed to ensure that rabbits do not dig burrows to escape?
-
12. How much sugar is needed to prepare one litre of Oral Rehydration Solution?
-
13. State **one** advantage of using a VIP latrine over the usual ordinary pit latrine.
-

The diagram below shows a type of roots. Use it to answer questions **14** and **15**.



14. Name the roots marked **Q**.
-
15. State **one** function of the roots you have named above.
-
16. Give **one** way in which a person can acquire natural immunity.
-

17. Why are electric wires not tightly fixed on poles?

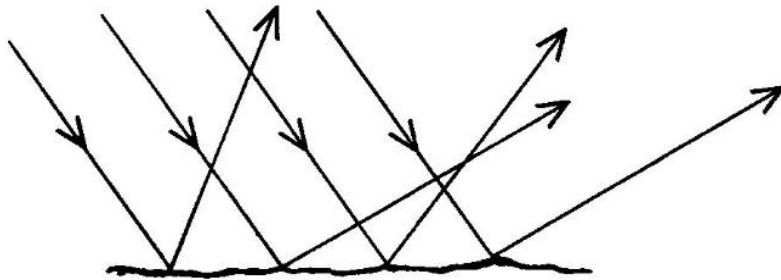
.....

18. What is frequency as used in sound?

.....

.....

The diagram below shows diffused reflection. Use it to answer question **19**.



19. What do such reflections tell you about the reflecting surfaces?

.....

20. Why is water obtained through decantation not good for drinking?

.....

21. In which way is a hand fork important to crop farmers?

.....

22. What term describes the process by which plants make their own food?

.....

23. Give the difference between a **burn** and a **scald**.

.....

.....

24. How does oil spread on stagnant water help to control malaria?

.....

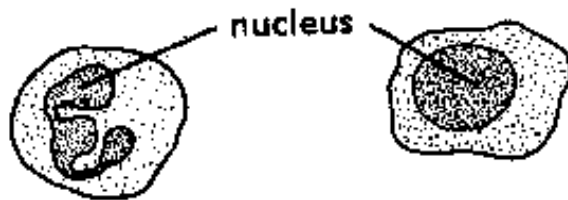
25. How important are the cilia found in the nose?

.....

26. Apart from cassava, give **one** other example of a root tuber.

.....

27. How is oxygen useful to a germinating seed?
.....
28. State **one** reason why worker bees are able to protect the hive.
.....
29. Suggest the best way of controlling cannibalism in poultry.
.....
30. State the function of the blood cell shown below.



-
31. How do latrines help in control of diarrhoeal diseases?
.....
32. Which structure in a modern beehive prevents the queen bee from crossing to the honey chamber?
.....
33. How are wading birds adapted to walking in shallow water?
.....
34. Why are minerals regarded as non-renewable resources?
.....
35. How is a lateral line important to a fish?
.....
36. State **one** way man can make good use of smoke.
.....
37. Why are vaccines kept under very cold conditions?
.....
38. Why are people's bodies able to form shadows?
.....

39. In which way is respiration similar to rusting?

.....

40. State the function of the cork on the vacuum flask.

.....

SECTION B: 60 MARKS

Questions **41** to **55** carry four marks each

41. Match the following body systems to their correct functions.

BODY SYSTEM	FUNCTION
(a) Circulatory system	(i) Removes carbon dioxide from the body.
(b) Respiratory system	(ii) Protects the delicate organs in the body.
(c) Digestive system	(iii) Absorbs the simple food substances so that they can be used by the body.
(d) Muscular Skeletal system	(iv) Carries food, water and oxygen to all parts of the body.

a) Circulatory system

.....

.....

b) Respiratory system

.....

.....

c) Digestive system

.....

.....

d) Muscular Skeletal system

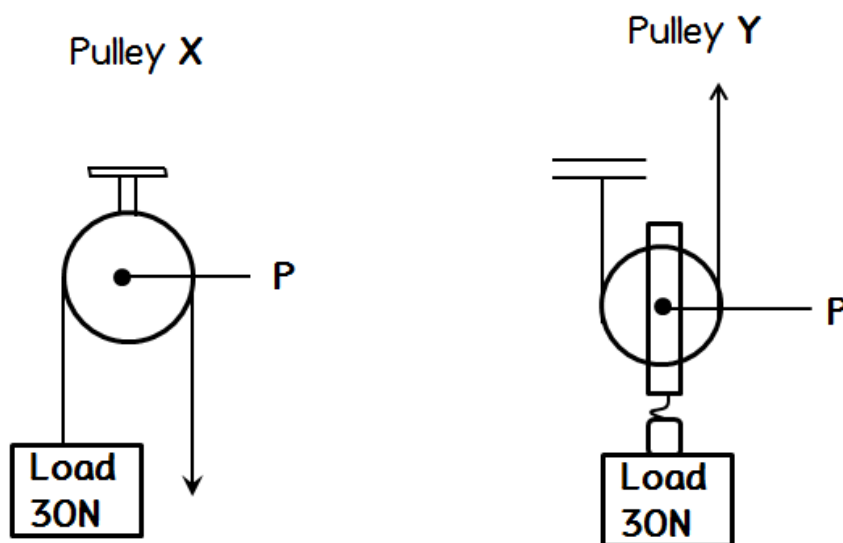
.....

.....

42. (a) How do people benefit from feeding on food rich in Vitamins?

 (b) Mention **two** vitamin deficiency diseases among people.
 (i)
 (ii)
 (c) State the best way of preventing food deficiency diseases among growing children.

43. Study the diagram below and answer the questions that follow.



- (a) Identify the pulley system marked **Y**.

 (b) State **one** reason why point **P** should be lubricated.

 (c) How much effort is needed on pulley **Y** to lift the load of 30 Newtons?

(d) State **one** way how pulley **X** is applied in schools.

.....

44. (a) Give **two** examples of vectors which spread diseases without biting.

(i)

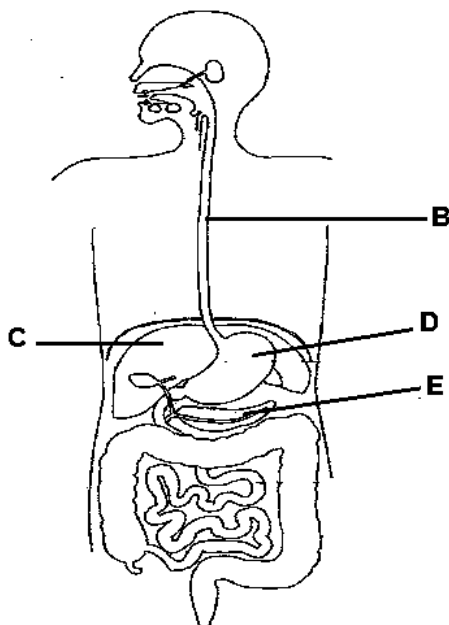
(ii)

(b) Give **two** ways of controlling mosquitoes at home.

(i)

(ii)

45. The diagram below shows part of the human digestive system.
Use it to answer questions that follow.



(a) Name part marked with letter **E**.

.....

(b) By what process does food move through part marked **B** to part marked **D**?

.....

(c) How is the juice produced by part labelled with letter **C** useful during digestion of food?

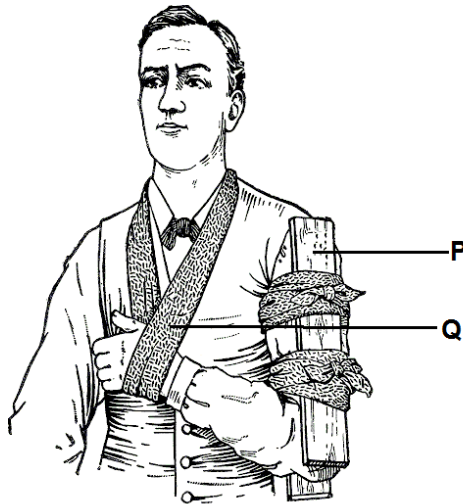
.....

(d) State any **one** way you can promote proper working of the digestive system.

.....

46. (a) Name **two** substances filtered from the blood in the cortex.
- (i)
- (ii)
- (b) Identify **two** substances that are selectively re-absorbed in the medulla.
- (i)
- (ii)

47. Study the diagram below and use it to answer the questions that follow.



- (a) Identify the structures marked **P** and **Q**.
- (i) **P**
- (ii) **Q**
- (b) Mention any **one** type of accident that requires the use of structure **Q**.
-
- (c) Suggest **one** reason why a good first aider should be knowledgeable.
-
48. (a) Give **two** ways in which poultry can be given exercises.
- (i)
- (ii)
- (b) Suggest **two** ways of preventing diseases in poultry.
- (i)
- (ii)

49. State the role played by each of the following in reproduction.

(a) Sperm

.....

(b) Oviduct

.....

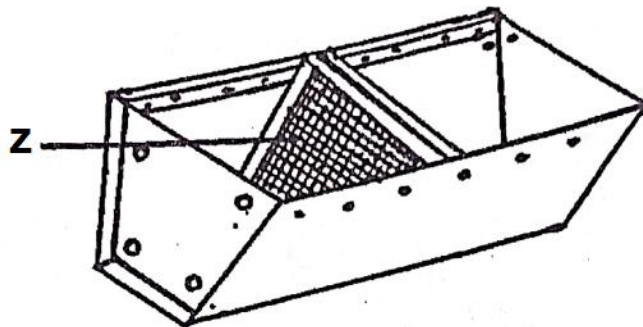
(c) Umbilical cord

.....

(d) Placenta

.....

50. The diagram below shows a structure used for keeping of bees. Study and use it to answer the questions that follow.



(a) Identify the type of modern beehive shown in the diagram above.

.....

(b) How is the part labelled **Z** useful to the beehive?

.....
.....

(c) State **one** reason for:

(i) Hanging the hive so that it does not touch the ground

.....
.....

(ii) Greasing the suspending wires of the beehive

.....
.....

51. In the table below, list A shows the different animals from those in list B. Use it to answer the questions that follow.

LIST A	LIST B
a) Frog	(i) Goat
b) Crocodile	(ii) Tiger
c) Dove	(iii) Mouse
d) Tilapia	(iv) Seal

(a) Give **one** similarity between animals in list **A** and **B**.

.....

(b) To which group of vertebrates do animals in list **B** belong?

.....

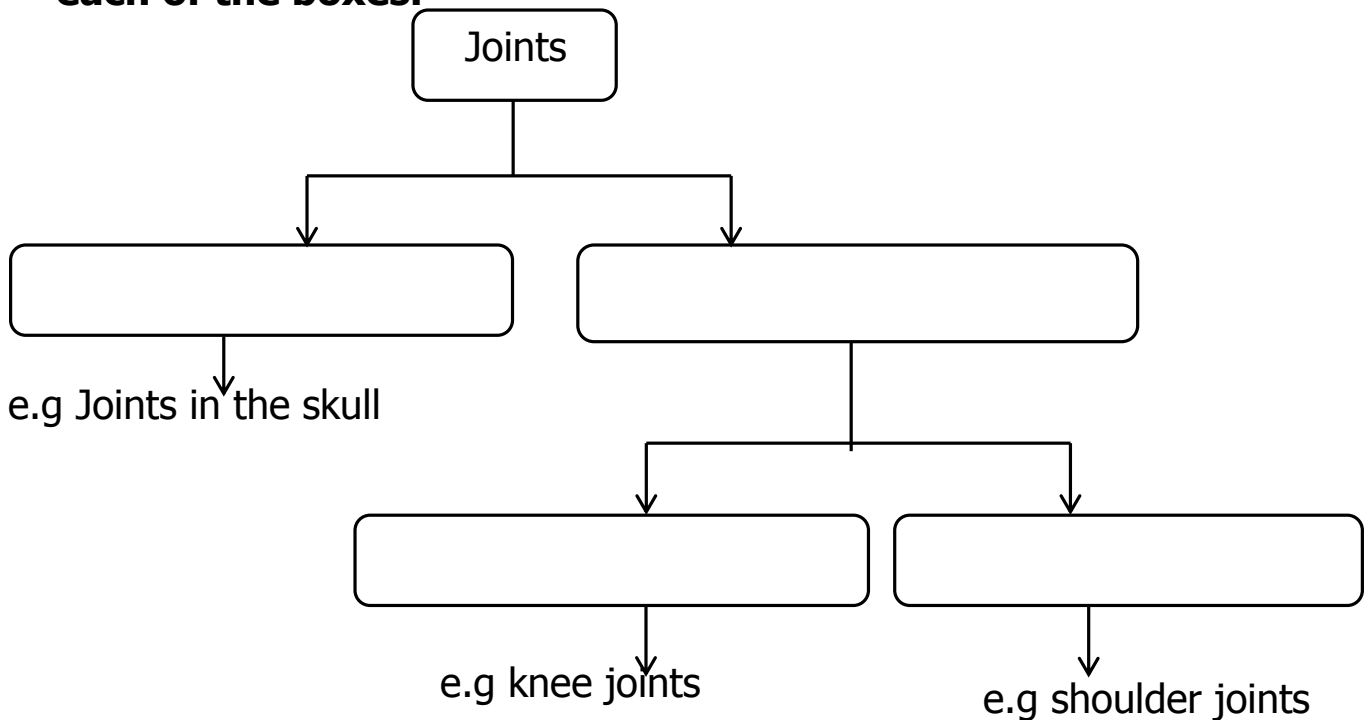
(c) How is a dove different from Tilapia in the way they move?

.....

(d) Why would you group a dog in group **B**?

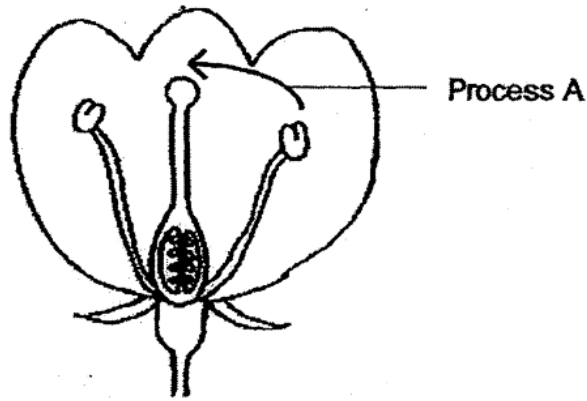
.....

52. In the classification table below, give a suitable sub-heading in each of the boxes.



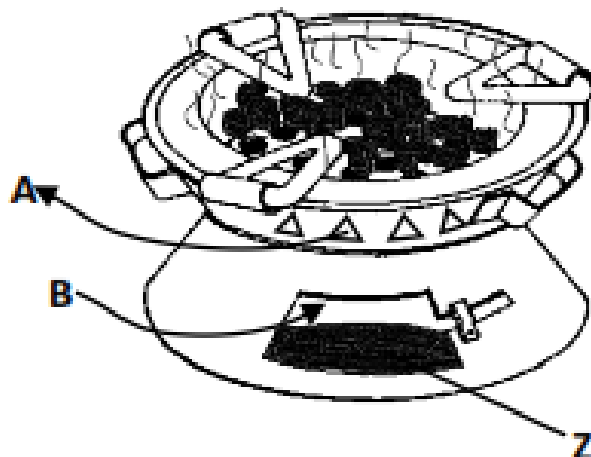
53. (a) Mention **two** methods of making water clean.
- i)
- ii)
- (b) State **two** advantages of soaking clothes before washing.
- i)
- ii)

54. Study the diagram below and use it to answer the questions that follow.



- (a) Name the processes **A**.
-
- (b) Mention the process that follows the one you have mentioned in (a) above.
-
- (c) State **two** observable changes that take place in flowers after processes in (a) and (b) above have taken place.
- (i)
- (ii)

55. The diagram below shows a clay-lined charcoal stove. Use it to answer the questions that follow.



(a) Why is the above charcoal stove regarded as an energy saving stove?

.....

(b) How does clay lining help to conserve the fuel used?

.....

(c) What would happen if part **Z** was kept closed for a long time.

.....

(d) Apart from using energy saving stoves, state any **one** way of conserving wood fuel.

.....

END