Rulang Primary School

END OF YEAR EXAMINATION
SCIENCE
2024

Name: _____ ( )
Level: Primary 3
Class: Primary 3 ( )

Marks: _____ / 48
Total Time for Booklets A and B: 1 h 15 min
Date: 21 Oct 202[redacted]
Total Marks: 70

BOOKLET A

Instructions to pupils:

1. **Do not open this booklet until you are told to do so.**
2. You are required to answer **all** the questions in this booklet.
3. This question booklet consists of **15** printed pages, including the cover page.

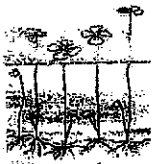
Section A (24 x 2 marks)

For each of the questions from 1 to 24, four options are given. One of them is the correct answer. Make your choice (1, 2, 3 or 4) and shade the answers on the Optical Answer Sheet (OAS) provided.

1. Which of the following shows a characteristic of living things?

   (1) A toy dog barking.
   (2) Water moving along a river.
   (3) A seed developing into an adult plant.
   (4) A rubber band stretching when pulled.

2. The diagram below shows two groups of living things, A and B.

Group A			Group B		
					
Soybean plant	Wild mushroom	Tomato plant	Water hyacinth	Water lily	Water clover

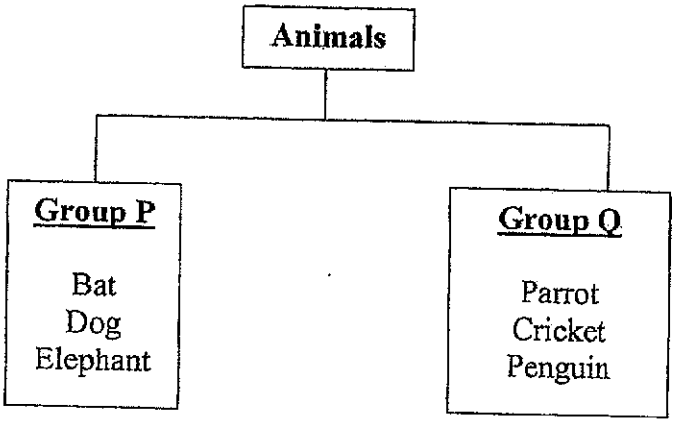
Which of the following is wrongly classified?

(1) Water clover
(2) Soybean plant
(3) Water hyacinth
(4) Wild mushroom

3. Which of the following statements about living things and non-living things are correct?

	Living things	Non-living things
(1)	Cannot move freely on their own	Can move freely on their own
(2)	Can reproduce	Cannot reproduce
(3)	Do not respond to changes	Respond to changes
(4)	Need only air to survive	Do not need air to survive

4. Study the classification chart below.

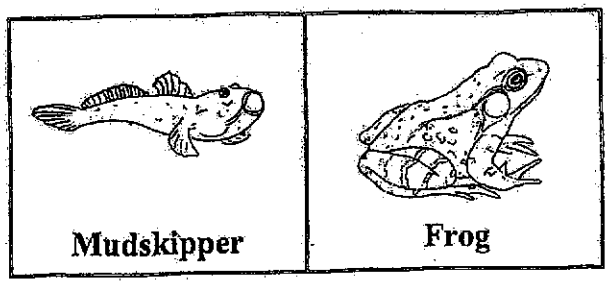


	Group P	Group Q
A:	Give birth to young alive	Lay eggs
B:	Four legs	Two legs
C:	Animals that cannot fly	Animals that can fly

Which of the following is / are the correct heading(s) for groups P and Q?

(1) A only
(2) B only
(3) A and B only
(4) B and C only

5. Study the two organisms shown below.

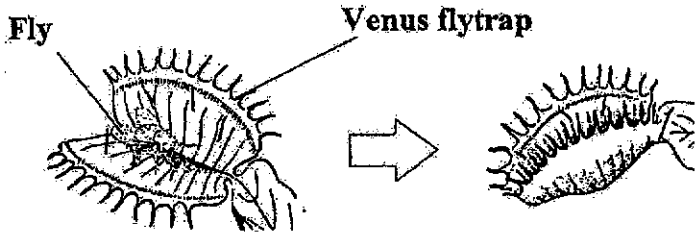


Which of the following statements is / are correct?

A: Both live on land and in water.
B: Both breathe through their lungs only.
C: The frog has moist skin while the mudskipper has scales.

(1) B only
(2) C only
(3) A and B only
(4) A and C only

6. The diagrams below show a fly being caught by a Venus flytrap. It closes its two leaves when the fly walks into it.

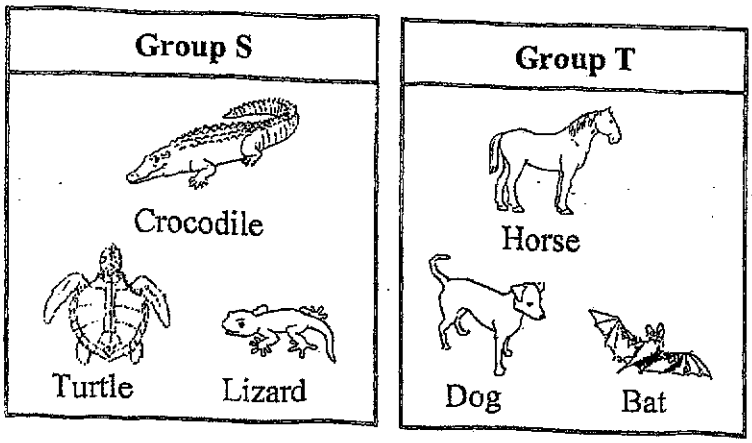


Which of the following characteristics of a living thing is shown in the Venus flytrap?

(1) A living thing dies.
(2) A living thing needs air.
(3) A living thing reproduces.
(4) A living thing responds to changes around it.

Study the following diagrams and answer questions 7 and 8.

7. The diagram below shows two groups of animals.



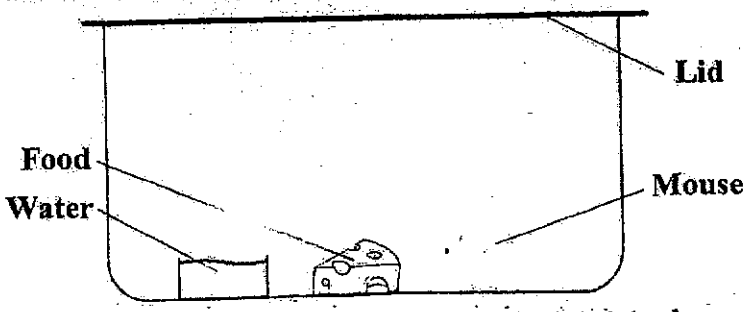
In what way are the animals in both groups S and T similar?

(1) They can fly.
(2) They can run and swim.
(3) They give birth to their young alive.
(4) They need food, water and air to stay alive.

8. Which of the following sets is the best headings for groups S and T?

	Group S	Group T
(1)	Have scales as body coverings	Have hair as body coverings
(2)	Give birth to young alive	Lay eggs
(3)	Live in water only	Live on land only
(4)	Breathe through lungs	Breathe through gills

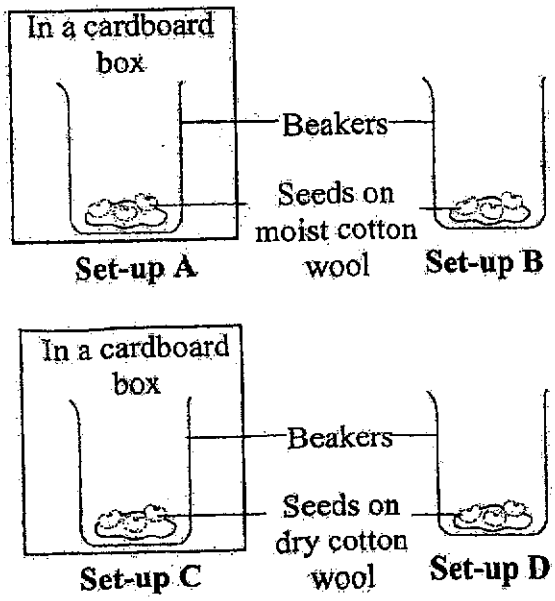
9. The diagram below shows a mouse which was kept in a container with food and water. The container was closed tightly with a lid.



Two days later, there was some water and food left in the container but the mouse had died. Why did the mouse die?

(1) It did not have enough air.
(2) It did not have enough light.
(3) It did not have enough water and food.
(4) It did not have enough space to move about.

10. Sharon has 4 set-ups, A, B, C and D, as shown in the diagram below.



Which two set-ups should Sharon use to find out if water is needed for the seeds to grow into seedlings?

(1) A and B
(2) B and C
(3) B and D
(4) C and D

11. The tables below show how Ruby and Kathy classified four living things into 2 groups.

Ruby's classification:

Group X	Group Y
Papaya tree Hibiscus	Bird's nest fern Mushroom

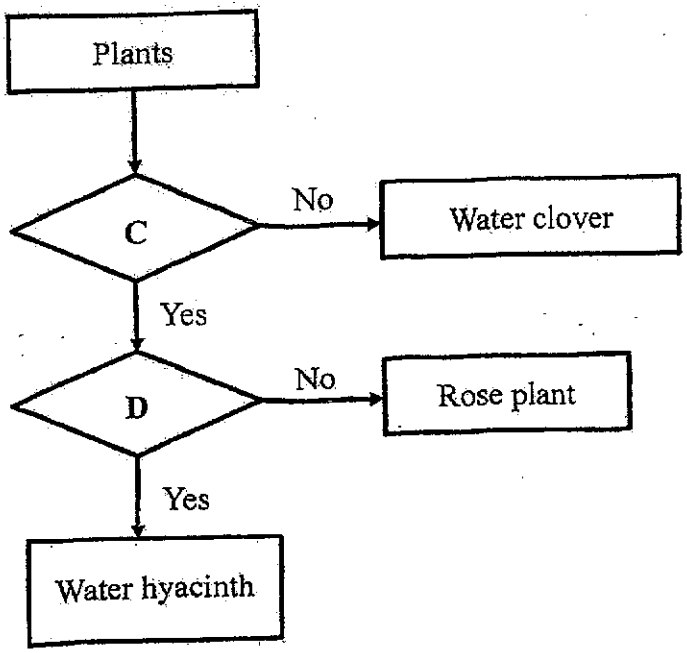
Kathy's classification:

Group X	Group Y
Mushroom	Papaya tree Hibiscus Bird's nest fern

How did the two girls group the living things?

	Ruby's classification		Kathy's classification	
	Group X	Group Y	Group X	Group Y
(1)	Reproduce from seeds	Reproduce from spores	Fungi	Plants
(2)	Fungi	Plants	Flowering plants	Non-flowering plants
(3)	Fungi	Plants	Reproduce from seeds	Reproduce from spores
(4)	Flowering plants	Non-flowering plants	Fungi	Plants

12. Study the flowchart below.



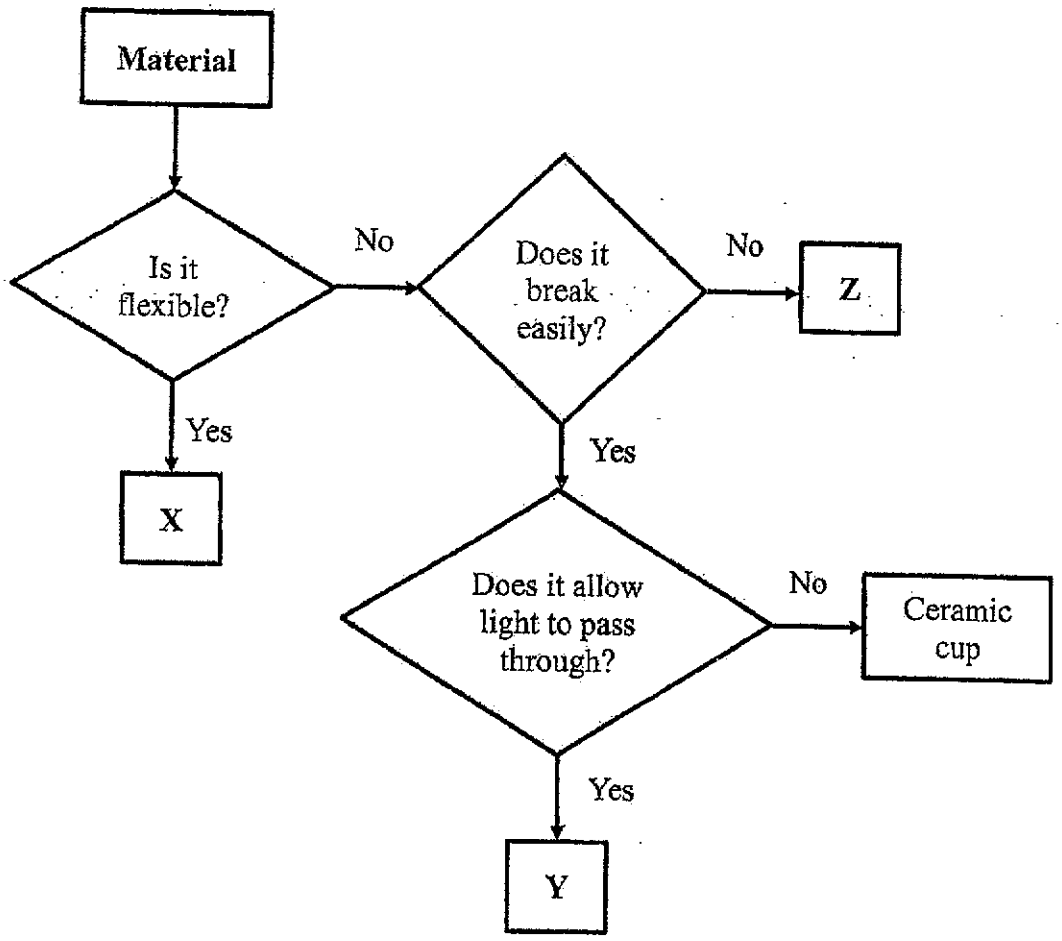
Which of the following sets best represents questions C and D?

	Question C	Question D
(1)	Is it a flowering plant?	Is it a water plant?
(2)	Is it a water plant?	Is it a flowering plant?
(3)	Is it a flowering plant?	Does the plant grow on land?
(4)	Does it reproduce from spores?	Is it a water plant?

13. Which of the following statements is true for both bacteria and fungi?

(1) Both are harmful organisms.
(2) Both reproduce from spores.
(3) Both cannot make their own food.
(4) Both can only be seen under a microscope.

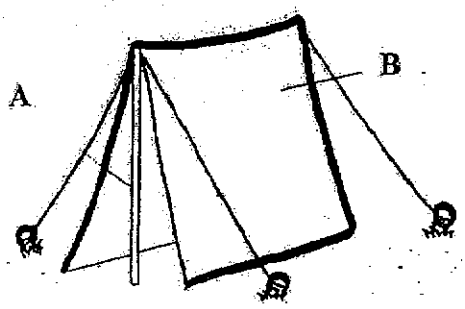
14. Study the flowchart below.



Which of the following represents X, Y and Z correctly?

	X	Y	Z
(1)	Hand towel	Metal ruler	Glass window
(2)	Hand towel	Glass window	Metal ruler
(3)	Metal ruler	Hand towel	Glass window
(4)	Glass window	Metal ruler	Hand towel

15. The picture below shows a tent for overnight camping. Part A must be strong enough to hold part B up to shelter the person in the tent from the rain.



What are the best materials that parts A and B can be made of?

	Material for part A	Material for part B
(1)	fabric	paper
(2)	paper	wood
(3)	fabric	ceramic
(4)	metal	plastic

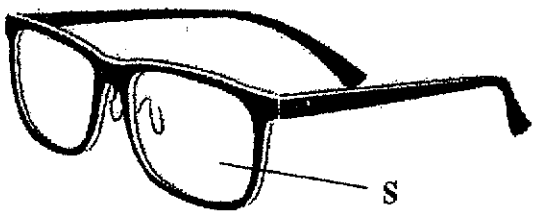
16. The table below shows the properties of materials A, B, C and D.

Property of material	Material A	Material B	Material C	Material D
Strong				
Transparent				
Flexible				
Waterproof				

Which material, A, B, C or D, is most suitable to be made into a raincoat?

(1) A
(2) B
(3) C
(4) D

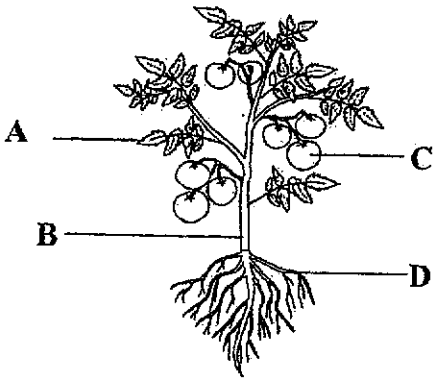
17. The diagram below shows a pair of spectacles.



Which is the most important property to consider in making part S?

(1) It is heavy.
(2) It breaks easily.
(3) It can be bent easily.
(4) It allows most light to pass through.

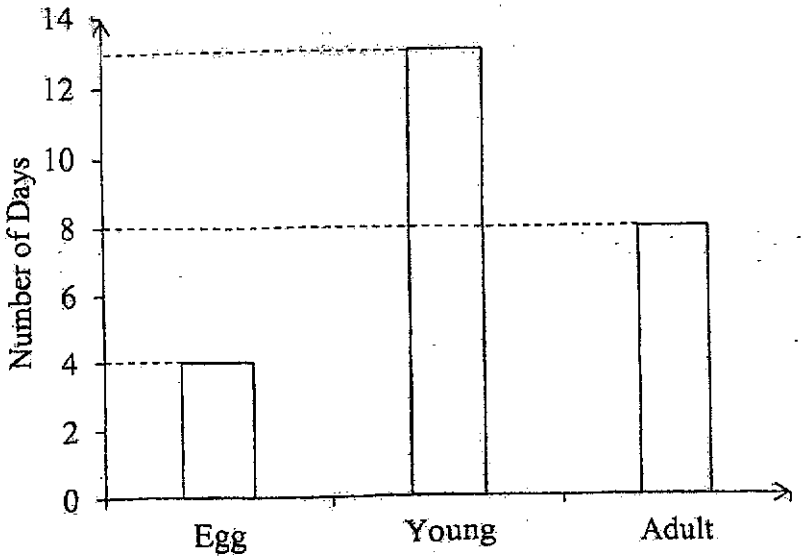
18. Study the parts of a plant below.



Identify the part of the plant that is only present in a flowering plant.

(1) A
(2) B
(3) C
(4) D

19. The graph below shows the number of days an animal remains in each stage of its life cycle.



Based on the graph, which of the following statements is true about the life cycle of the animal?

(1) There are four stages in its life cycle.
(2) The animal spends fewer days as an adult than as a young.
(3) The animal takes 25 days to become an adult after the egg is laid.
(4) After the egg is hatched, the animal takes another 21 days to become an adult.

20. Below are three statements about the cockroach and the grasshopper.

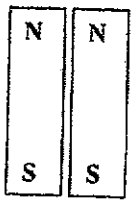
A: Both lay eggs.
B: Both their young look like the adults.
C: Both have three stages in their life cycles.

Which of the above statements is / are correct?

(1) A only
(2) C only
(3) B and C only
(4) A, B and C

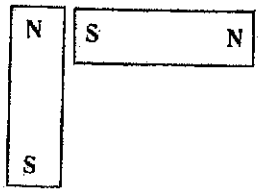
21. In which of the following will the two magnets repel each other?

(1)

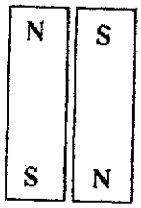


(2)

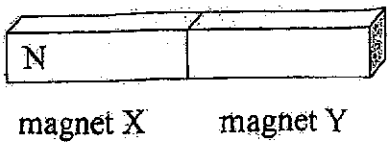
(3)



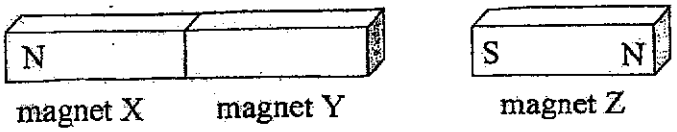
(4)



22. The diagram below shows how magnet X and magnet Y interact when they are brought close to each other.



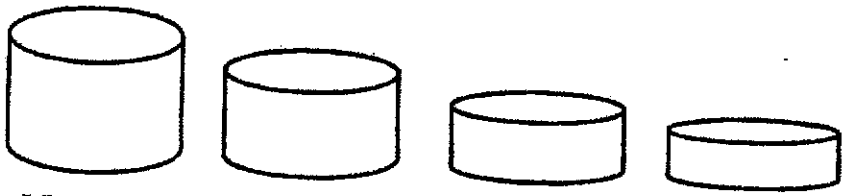
Study the diagram below.



What will happen if magnet Z is brought close to magnet Y?

(1) All the magnets will not move.
(2) Magnet Z will move towards magnet Y.
(3) Magnet X will move away from magnet Y.
(4) Magnet Z will move away from magnet Y.

23. Willy had four magnets as shown below. He brought them close to some paper clips.



Magnet A **Magnet B** **Magnet C** **Magnet D**

He observed the number of paper clips attracted by each magnet and recorded the results in the table below.

	Magnet A	**Magnet B**	**Magnet C**	**Magnet D**
Number of paper clips attracted	7	9	5	16

What could he conclude from the results above?

(1) Magnet A is stronger than Magnet B.
(2) The strength of a magnet depends on its shape.
(3) The strength of a magnet does not depend on its size.
(4) Larger magnets are stronger and attract more paper clips.

24. Julie conducted an experiment to test the strength of magnetism in iron nails M, N, O and P after stroking them with a strong magnet. The results are shown in the table below.

Iron nail	**Number of strokes using a strong magnet**	**Number of paper clips attracted**
M	5	1
N	15	3
O	25	5
P	35	8

What could Julie conclude from the experiment?

(1) The strength of the iron nail remains unchanged.
(2) The magnetism increases when the number of strokes increases.
(3) The magnetism decreases when the number of strokes increases.
(4) The number of strokes does not affect the strength of the iron nail.

Rulang Primary School

END OF YEAR EXAMINATION
SCIENCE
2024

Name: _____ ( ) **Marks:** _____ / 22

Level: Primary 3 **Date:** **21 Oct 2024**

Class: Primary 3 ( )

BOOKLET B

Instructions to pupils:

1. **Do not open this booklet until you are told to do so.**
2. You are required to answer **all** the questions in this paper using your own words / expressions as far as possible.
3. All drawings / diagrams must be clearly shown and labelled.
4. Marks will be deducted for wrongly spelt key words.
5. This question booklet consists of **11** printed pages, including the cover page.

For questions 25 to 32, write your answers in this booklet. The number of marks available is shown in brackets [ ] at the end of each question or part question.

(22 marks)

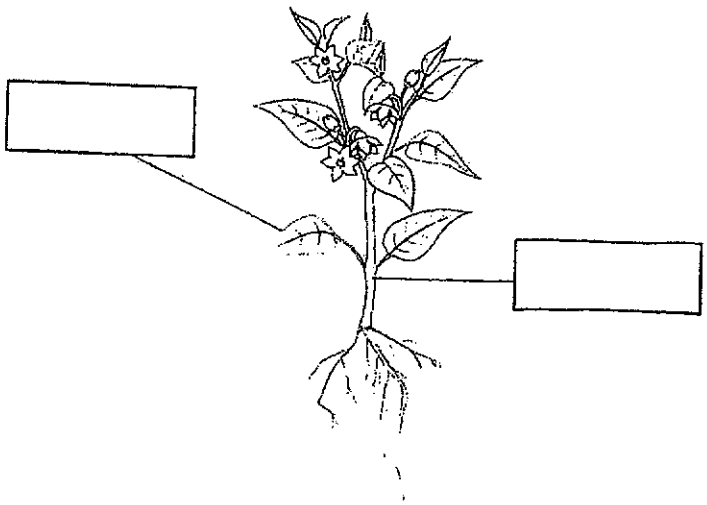
25. Sandy planted a seed in her garden and observed it over 6 weeks. She measured and recorded the height of the young plant below.

Number of weeks	Height (cm)
1	2
2	6
3	10
4	13
5	15
6	20

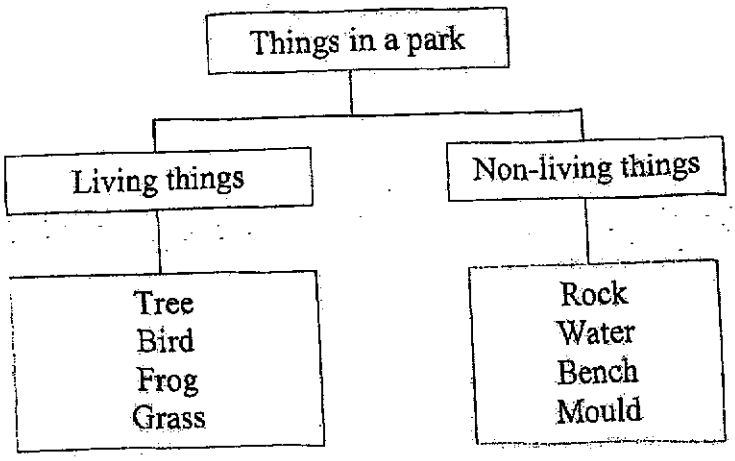
(a) What characteristics of living things does the plant show? [1]

(b) The diagram below shows a plant.

Name the plant parts by filling in the boxes provided in the diagram below. [1]



26. The chart below shows the classification of living and non-living things in a park.

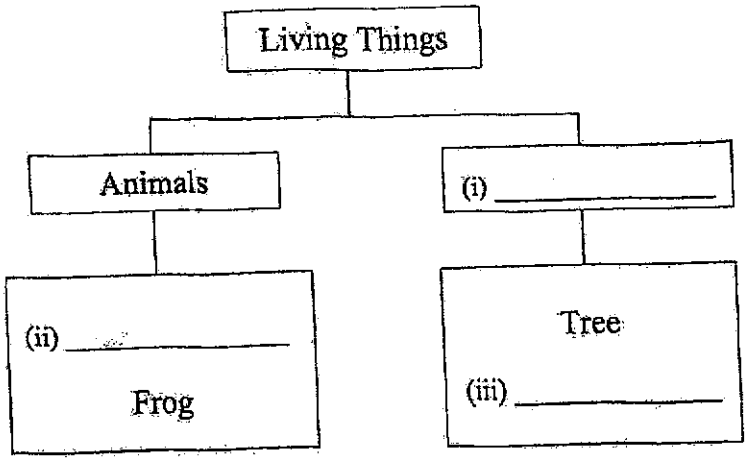


(a) Based on the classification chart above, which item is incorrectly classified? Explain your answer. [1]

_____

_____

(b) The living things stated above can be further classified in the chart below. Fill in the blanks with the most suitable answers. [1]



27. The diagrams below show a fern and a mushroom.

Fern

Mushroom

(a) State one similarity between a fern and a mushroom. (Do not compare their size or shape.) [1]

_____

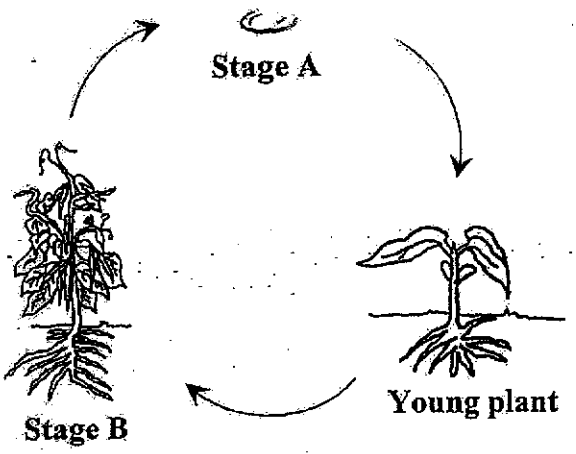
_____

(b) State one difference between a fern and a mushroom. (Do not compare their size or shape.) [1]

_____

_____

28. The diagram below shows the life cycle of a flowering plant, Z.



(a) Identify stage B and state one plant part that can only be found in stage B of the life cycle of plant Z. [1]

_____

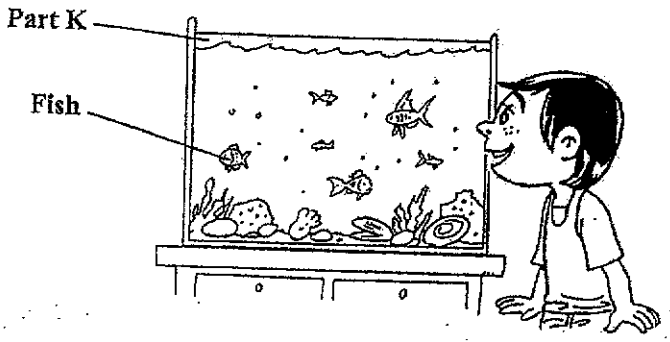
_____

(b) State one similarity between the young plant and the plant in stage B. [1]

_____

_____

29. The diagram below shows Tom observing some fish in an aquarium.



Part K is made of glass.

(a) Which property of glass allows Tom to look at the fish in the aquarium clearly? [1]

_____

_____

(b) State another property of glass which makes it a suitable material for making part K. [1]

_____

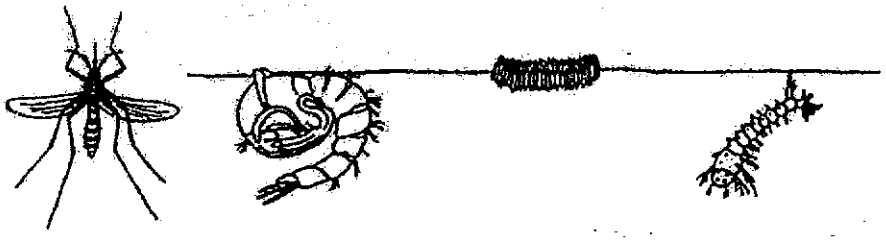
_____

(c) Name another material that can be used to make part K. [1]

_____

_____

30. The pictures below show the stages in the life cycle of the mosquito. They are not in the correct order.



A B C D

(a) Write down the correct sequence, A, B, C and D, of the life cycle of the mosquito shown above. [1]

_____

(b) What happens during the pupa stage of the life cycle of the mosquito? [1]

_____

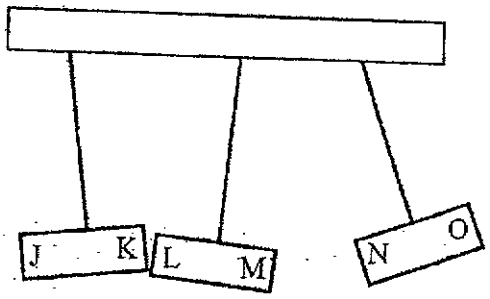
_____

(c) Based on the diagram above, state one difference between the adult mosquito and its young at stage D. [1]

_____

_____

31. Zhi Le conducted an experiment below. He observed that object A was attracted to the magnet while object B moved away from the magnet.



Object A **Magnet** **Object B**

(a) Zhi Le concluded that object A was definitely a magnet. Explain why he was wrong. [1]

_____

_____

(b) (i) What is object B? [1]

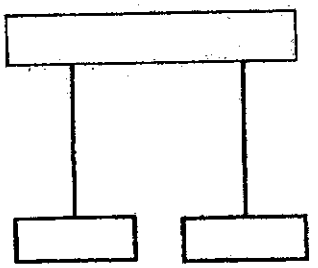
_____

(ii) Explain why object B moved away from the magnet. [1]

_____

_____

He then hung object C next to the magnet and observed that both objects did not move.



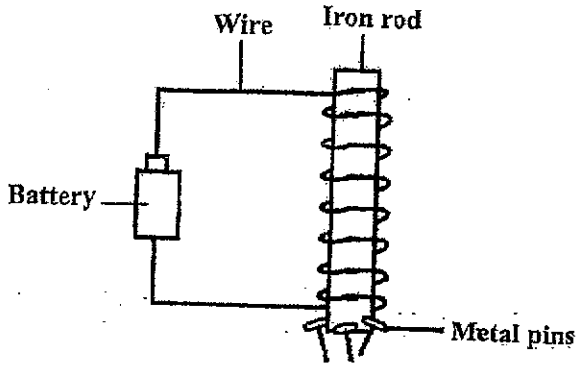
Magnet **Object C**

(c) Based on this observation, what can you conclude about the property of object C? [1]

_____

_____

32. Muthu set up an experiment as shown below.



He conducted the experiment using 4 identical iron rods, A, B, C and D, each with different number of turns of wire around them. He recorded the number of metal pins that each iron rod attracted in the table below.

Iron Rod	Number of turns of wire	Number of metal pins attracted
A	12	3
B	18	5
C	22	6
D	28	8

(a) Based on the table above, what happened to the number of metal pins attracted when the number of turns of wire decreased? [1]

(b) Identify the variables in the experiment. Put a tick (✓) in the correct boxes below. [2]

Variables	Variable that is kept the same	Variable that is measured	Variable that is changed
Size of rod			
Number of turns of wire			
Number of metal pins attracted			
Number of batteries			

(c) What will happen if the iron rod is replaced with a glass rod? Explain your answer. [1]

_____

_____

END OF PAPER

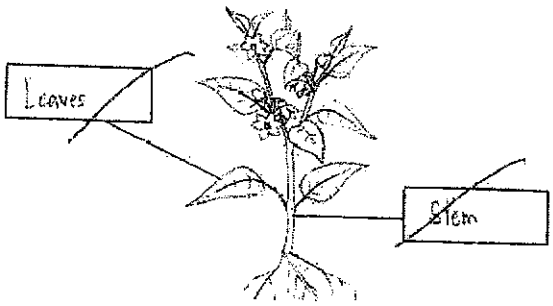
SCHOOL : RULANG PRIMARY SCHOOL

LEVEL : PRIMARY 3
SUBJECT : SCIENCE
TERM : 2024 SA2

Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10
3	4	2	1	4	4	4	1	1	3

Q11	Q12	Q13	Q14	Q15	Q16	Q17	Q18	Q19	Q20
1	1	3	2	4	2	4	3	2	4

Q21	Q22	Q23	Q24
1	4	3	2

Q25)	a) Living things can grow. b) 
Q26)	a) Mould is incorrectly classified as mould is a living thing, not a non-living thing. b) i)Plants ii)Bird iii)Grass
Q27)	a) Both the fern and the mushroom reproduce through spores. b) The fern is a non-flowering plant but the mushroom is a fungi.

Q28)

a) Stage B is the adult plant and the plant part that can only be found in stage B is the flowers.

b) The young plant and the plant in stage B both has leaves.

Q29)

a) Transparently.

b) Strength

c) Plastic

Q30)

a) C,D,B,A

b) The mosquito will stop eating.

c) The young at stage D has no wing but the adult mosquito has wings.

Q31)

a) Object A maybe a magnetic material as it attracted the magnet.

b) i)A magnet

ii)The like poles of the magnet and object are facing each other so they repelled.

c) Object C is a non-magnetic material.

Q32)

a) The number of metal pins decreased.

b)

Variables	Variable that is kept the same	Variable that is measured	Variable that is changed
Size of rod	✓		
Number of turns of wire			✓
Number of metal pins attracted		✓	
Number of batteries	✓		

c)The glass rod will not attract any metal pins ads glass a non-magnetic material.