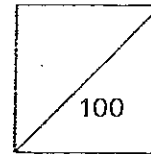




HENRY PARK PRIMARY SCHOOL
 2008 SEMESTRAL EXAMINATION II
 SCIENCE
 PRIMARY 3

Duration of Paper: 1 h 45 min



Name: _____ ()

Parent's Signature _____

Class: Pr 3 _____

PART 1 (60 marks)

For each question from 1 to 30, four options are given. One of them is the correct answer. Make your choice (1, 2, 3 or 4). Shade the correct oval (1, 2, 3 or 4) on the Optical Answer Sheet.

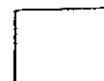
1. Sally placed two things, A and B, into two jars. She also placed the same type and same amount of food in each jar. She then made some observations of A and B as shown below.

A	B
Moves slowly	Does not move
Feeds on the food	The food is untouched
Grown bigger after 5 days	No change in size after 5 days

Which of the following could A and B be?

	A	B
(1)	Stone	Brick
(2)	Caterpillar	Rock
(3)	Beetle	Butterfly
(4)	Earthworm	Dragonfly

()



2. The table below shows the characteristics of Animals A, B and C.

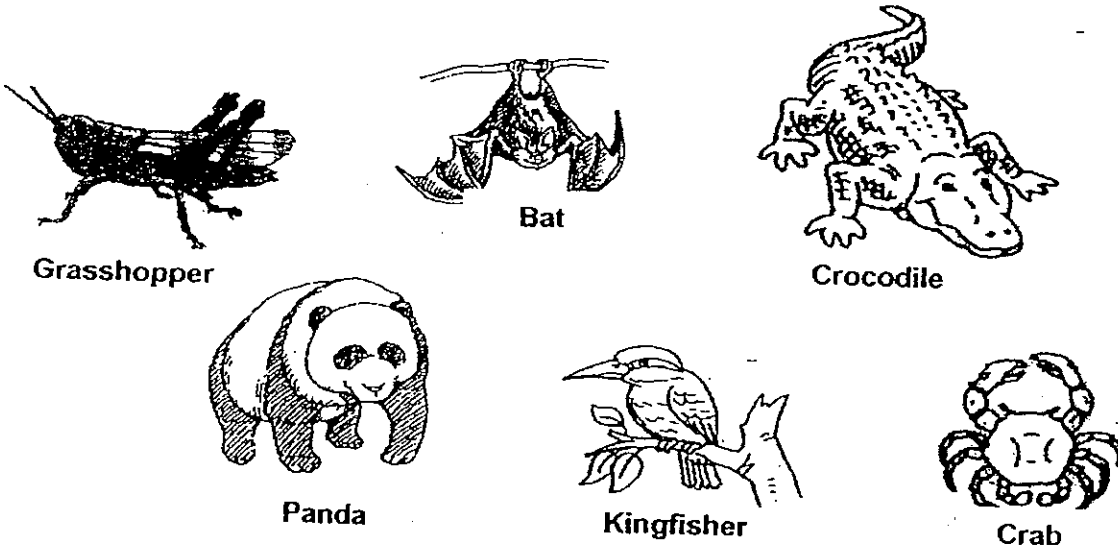
Characteristic	A	B	C
Has 6 legs	√	X	X
Lays eggs	√	√	X
Has a beak and 2 wings	X	√	X
Breathes through gills	X	X	√

√ – has the characteristic
 X – does not have the characteristic

Based on the table above, what could Animals A, B and C be?

	A	B	C
(1)	Spider	Penguin	Guppy
(2)	Grasshopper	Sparrow	Whale
(3)	Cockroach	Ostrich	Guppy
(4)	Beetle	Chicken	Whale

3. Xiaoming wants to classify the animals shown below into 2 groups.



Which of the following are the most appropriate headings for the 2 groups if there are 3 animals in each group?

	Group 1	Group 2
(1)	Birds	Mammals
(2)	Can fly	Cannot fly
(3)	Lay eggs	Give birth to young
(4)	Have beaks	Have no beak



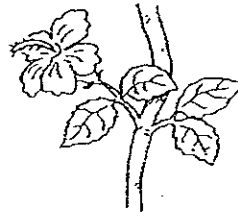
4. Study the living things below.



Mushroom



Coconut Palm



Hibiscus

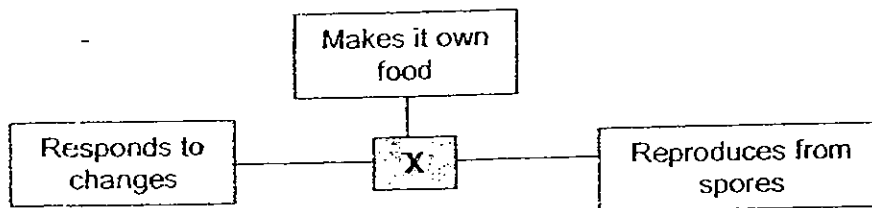
What are their common characteristics?

- A: They produce flowers.
- B: They respond to changes.
- C: They make their own food.
- D: They can move on their own.

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

()

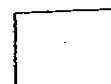
5. Study the diagram below.



Which of the following is X likely to be?

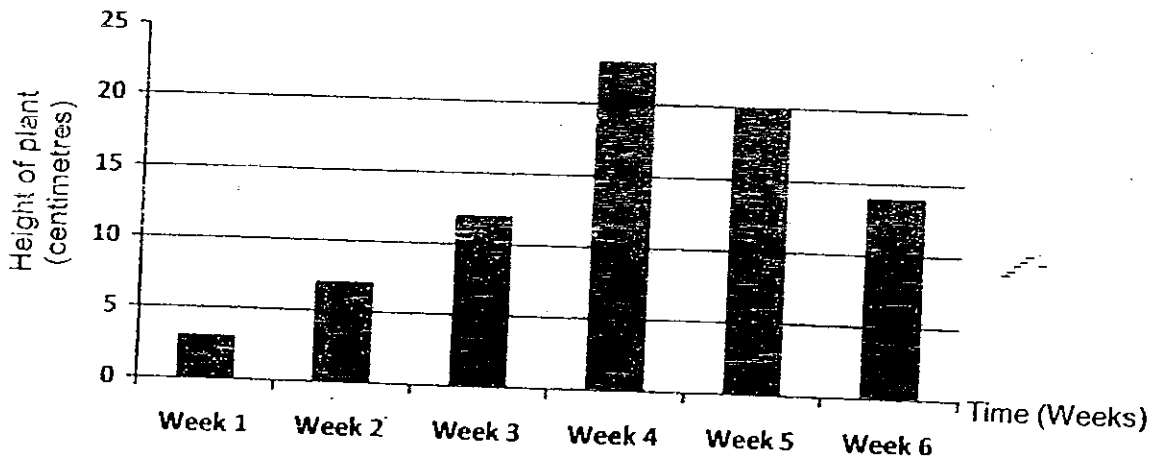
- (1) Yeast
- (2) Rose Plant
- (3) Bird's nest fern
- (4) Bracket Fungus

()



James planted a seed. He watered it everyday and placed the plant in the sunlight.

James measured the height of the plant for 6 weeks and represented his results in the form of a bar graph below.



6. Using **only** the information given in the graph, which of the following characteristic(s) of living things does the graph show from weeks 1 to 4?

- A: Living things die.
- B: Living things grow.
- C: Living things reproduce.
- D: Living things need water to survive.

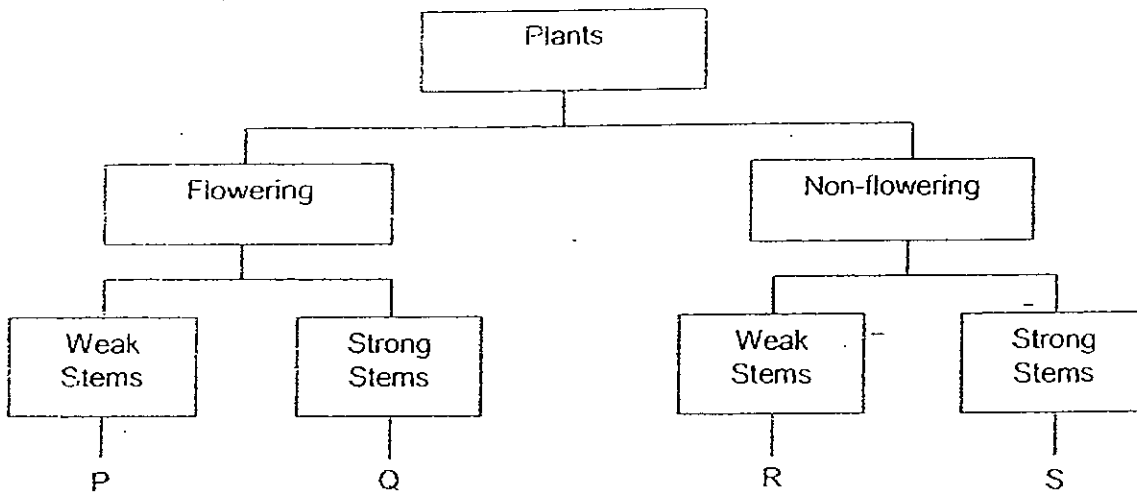
- (1) B only
- (2) D only
- (3) A and C only
- (4) B, C and D only

()



7. The following table shows some information on Plants A and B. A (✓) indicates that the plant has the characteristic.

	A	B
Bears fruit		✓
Needs a support to grow upright	✓	✓



Based on the information given in the table, which letters P, Q, R or S in the chart above best represent plants A and B?

	Plant A	Plant B
(1)	R	P
(2)	Q	S
(3)	S	P
(4)	R	Q

()

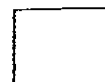
8. Siti made the following observations of an object.

- It is flexible.
- It does not break easily.
- It does not absorb water.

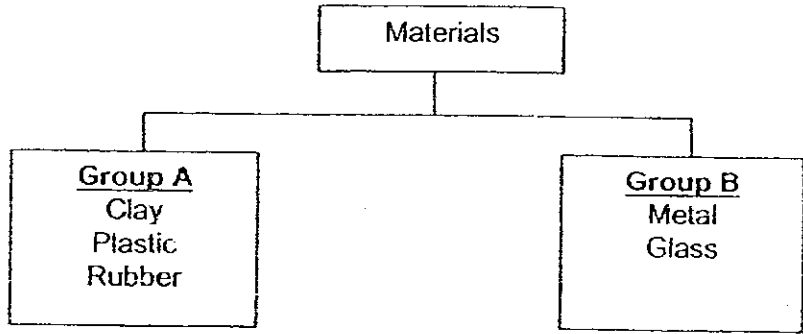
What material could the object be made of?

- (1) Clay
 (2) Metal
 (3) Glass
 (4) Rubber

()



9. The table below shows how some materials are classified into two groups.

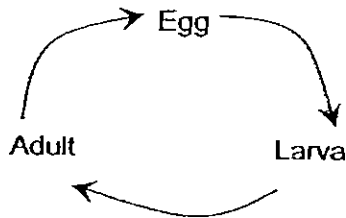


How are the materials classified?

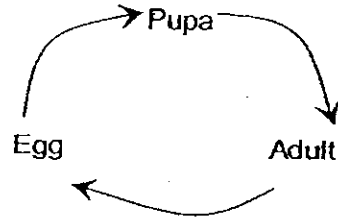
- (1) Strength
- (2) Flexibility
- (3) Hardness
- (4) If they are waterproof

()

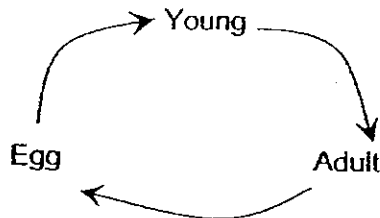
10. Amy was asked to draw and label a three-stage life cycle of an animal. She drew 3 different life cycles as shown below.



Life Cycle A



Life Cycle B



Life Cycle C

Which of the following life cycle(s) is/are correct?

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

()



11. John kept 4 mealworms A, B, C and D, each at a different stage of growth, in 4 containers. He placed 15 g of food next to each one of them and recorded the amount of food left in the containers after 2 days. He recorded his results in the table below.

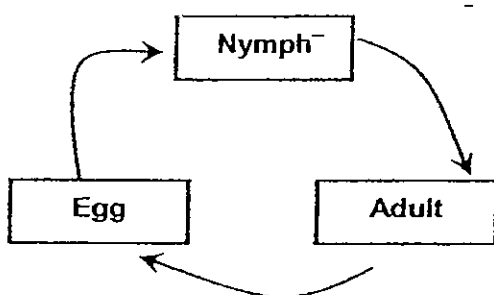
Mealworm	Amount of food left
A	15g
B	11g
C	8g
D	5g

Which mealworm is most likely to be in pupa stage?

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

()

12. The diagram below shows the life cycle of a dragonfly.



Which of the following animals **does not** go through the above life cycle?

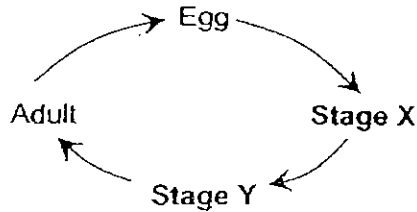
- A: Moth
- B: Butterfly
- C: Mosquito

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

()



Study the diagram below and answer questions 13 to 15.



13. Which of the following ~~insects~~ go through the life cycle above?

- A: Chicken
- B: Butterfly
- C: Mosquito
- D: Cockroach

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

()

14. Which of the following correctly shows the names of stages X and Y?

	X	Y
(1)	Nymph	Larva
(2)	Pupa	Larva
(3)	Larva	Pupa
(4)	Larva	Nymph

()

15. Which of the following is true about **ALL** the animals that go through the above life cycle?

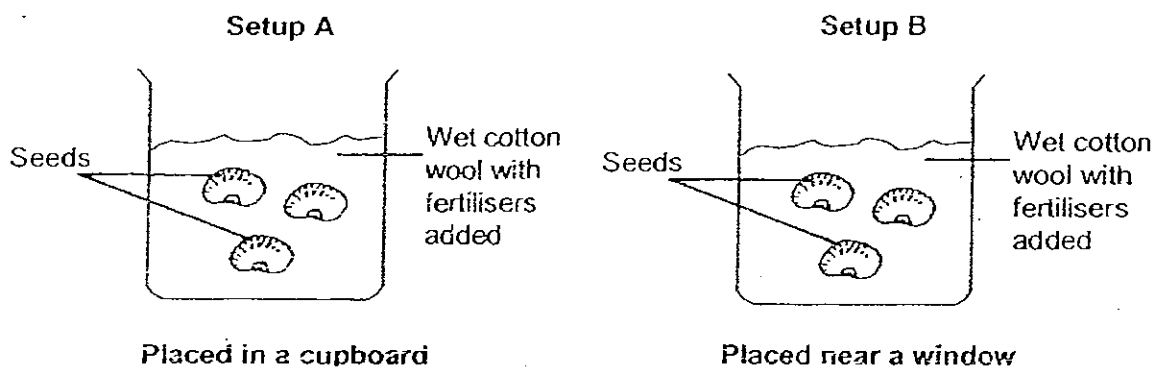
- A: The young lives under water.
- B: The young does not resemble the adult.
- C: The young moults before becoming the adult.
- D: The young does not need food at one stage of its life cycle.

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

()



16. Jane carried out an investigation on germination and her setups are shown below.



From this experiment, Jane is trying to find out if _____.

- (1) fertilisers help plants germinate better
- (2) a glass beaker helps plants germinate better
- (3) light is needed for germination to take place
- (4) water is needed for the germination to take place

()

17. Jane wishes to carry out an experiment to find out whether kidney bean seeds or green bean seeds germinate faster.

Which of the following variables must she keep the same for this experiment?

- A: The type of seeds
- B: The amount of water
- C: time taken for seeds to germinate
- D: The location where the seeds were placed

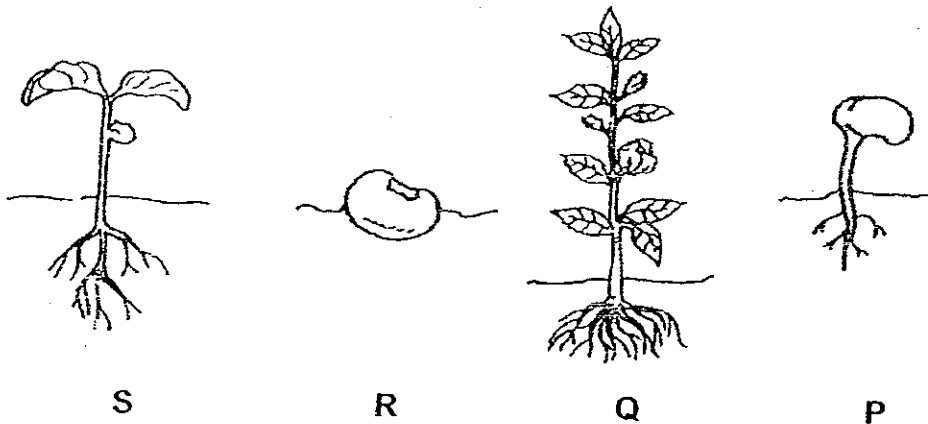
- (1) A and C only
- (2) B and D only
- (3) A, B and D only
- (4) B, C and D only

()



The following shows the stages in the life cycle of a plant.

Study the diagrams and answer questions ¹⁸ ~~17~~ and ¹⁴ ~~18~~.



18. Which of the following shows the growth of the bean in correct order?

- (1) R, Q, P, S
- (2) R, P, S, Q
- (3) R, S, P, Q
- (4) Q, P, R, S

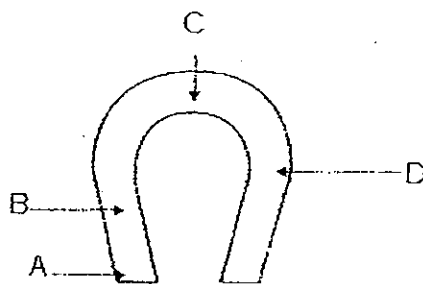
()

19. At which stage of the life cycle above is sunlight needed for the plant to make food?

- (1) Q only
- (2) Q and S only
- (3) P, Q and S only
- (4) P, Q, R and S

()

20. The diagram below shows a magnet.



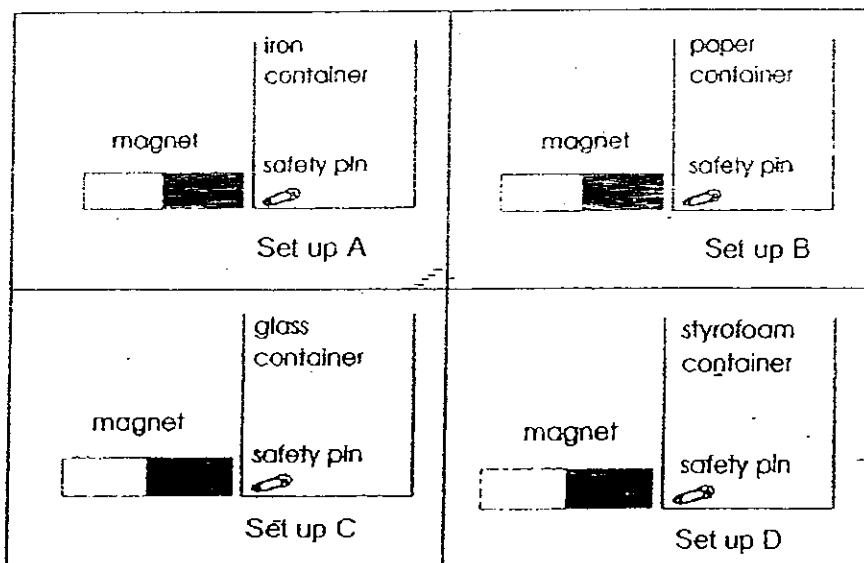
If the magnet is placed in a box of paper clips, which part of the magnet, A, B, C or D, will attract the most number of paper clips?

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

()



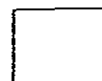
21. Ali placed a safety pin in 4 containers made of different materials. He wanted to find out if the same magnet would be able to attract the safety pin out of the containers when he moves the magnet to touch the containers.



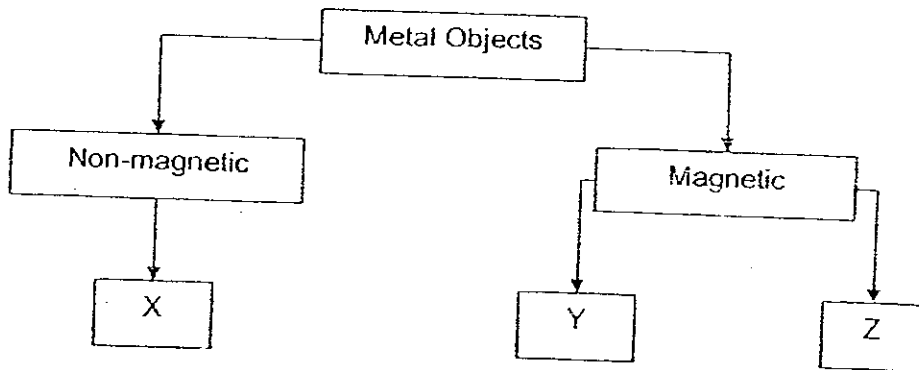
In which of the following set ups the magnet will not attract the safety pin?

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

()



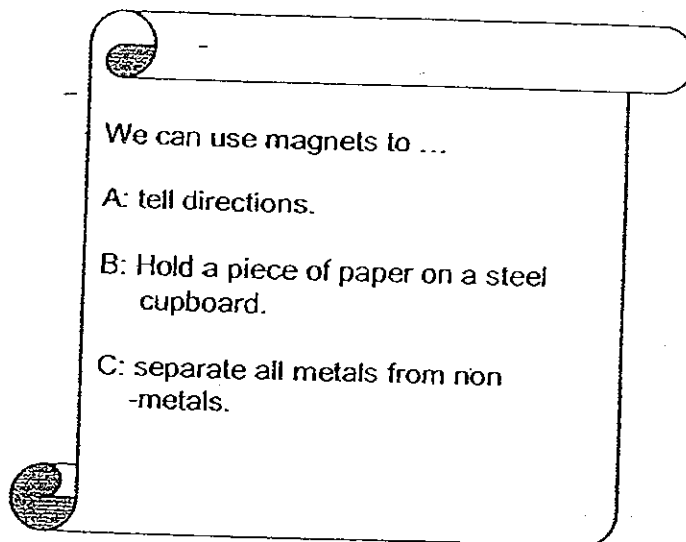
22. Xavier was given a few metal objects. He classified them into 2 groups, non-magnetic and magnetic.



What can objects X, Y and Z in the following be?

	X	Y	Z
(1)	Nickel coin	Iron pin	Aluminium pot
(2)	Gold ring	Iron pin	Nickel coin
(3)	Iron nail	Silver necklace	Aluminium pot
(4)	Silver necklace	Gold ring	Nickel coin

23. Megan recorded a list of items that can be done with a magnet and she showed it to her mother.



Megan's mother said not all statements in the list are correct. Which of the following statement(s) is/are correct?

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



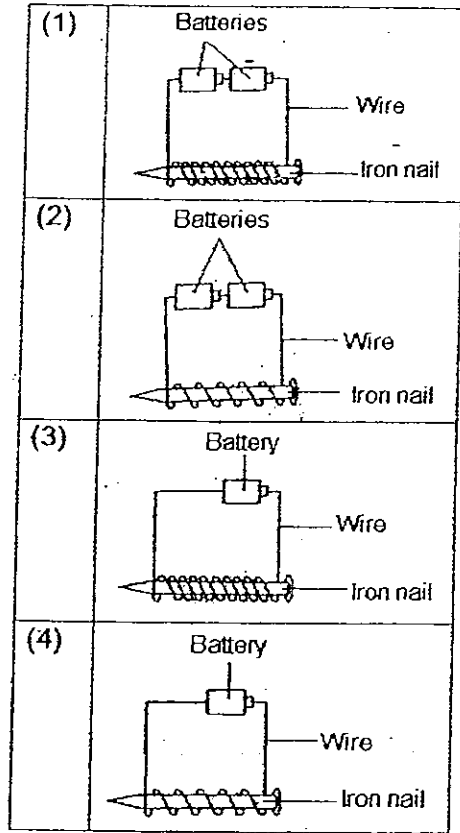
24. Which of the following methods will cause a magnet to lose its magnetism?

- A: Placing it near an iron nail
- B: Hammering it several times
- C: Heating it over a strong flame
- D: Placing it in the water for 60 minutes

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

()


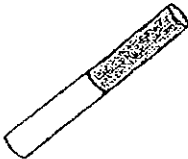
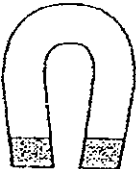
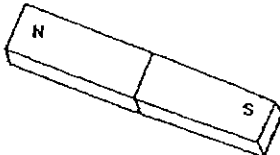
25. Which magnetised iron nail in the following set-ups will attract the most number of paper clips?




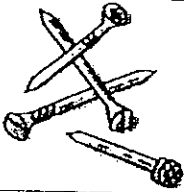


()



26. Which one of the following magnets is wrongly named?

	Magnet	Name
(1)		Ring magnet
(2)		Rod magnet
(3)		U-shaped magnet
(4)		Bar magnet

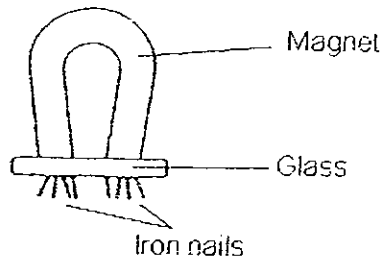
27. Which of these objects will be attracted by a magnet?

A		B	
	Brick		Iron Nails
C		D	
	Paper clips		Steel Fork

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



28. Look at the diagram shown below.

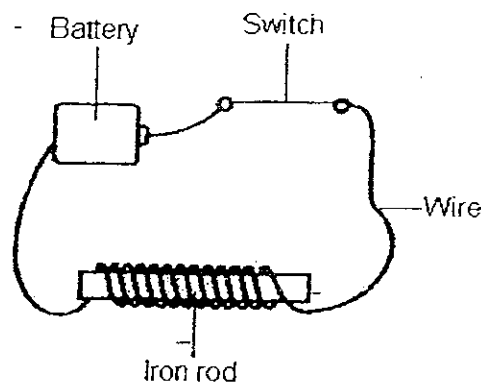


Which of the following statements about the diagram is true?

- (1) A magnet can attract glass.
- (2) The glass can be made into a magnet.
- (3) The magnetism of a magnet can pass through glass.
- (4) The magnetism of a magnet cannot pass through glass.

()

29. Wei Ming wanted to make a temporary magnet. He then arranged the set up as shown in the diagram below.



After 30 seconds, he decided to test his temporary magnet by using it to attract some iron nails. To his disappointment, only 2 iron nails were attracted.

What should Wei Ming do to ensure that his temporary magnet would attract more iron nails?




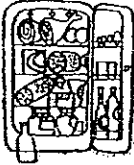
- A: Use a new battery with a higher voltage.
- B: Use a longer iron rod so that more electricity would be able to pass through it.
- C: Increase the time for the electricity to pass through the iron rod from 30 seconds to 5 minutes.

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

()



30. Which of the following objects shown below make use of magnets to work?

A	 Chair	B	 Compass
C	 Light Switch	D	 Refrigerator

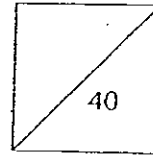
- (1) A and B only
- (2) A and C only
- (3) B and D only
- (4) C and D only

()

End of Part 1



HENRY PARK PRIMARY SCHOOL
2008 SEMESTRAL EXAMINATION II
SCIENCE
PRIMARY 3



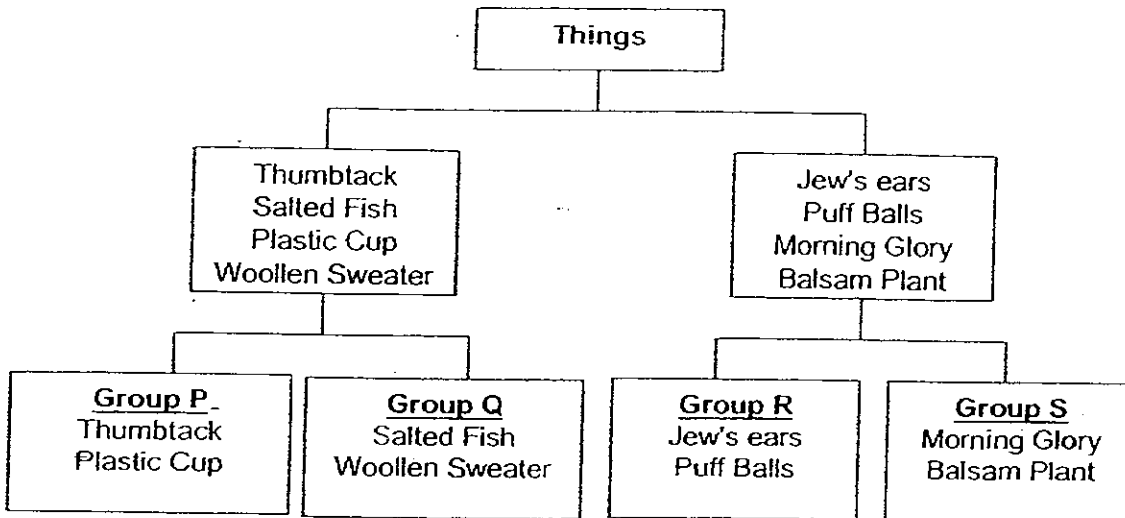
Name: _____ (. .)

Class: Pr 3 _____

PART 2 (40 marks)

Write your answers to questions 31 to 46 in the spaces given.

31. Study the classification table below.



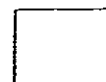
a) State a difference between the things in Group R and Group S. (1m)

b) State a similarity between the things in Group P and Group Q. (1m)

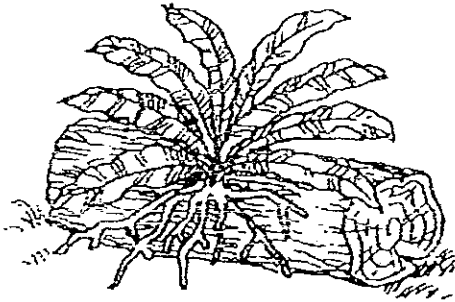
c) Write down suitable headings for Group P and Group Q. (2m)

Group P: _____

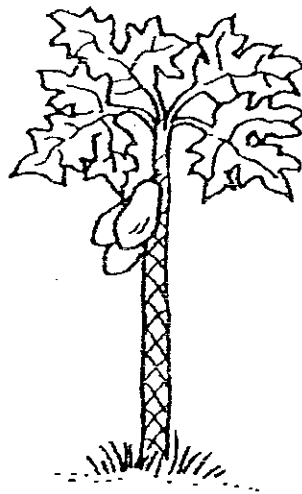
Group Q: _____



32. Esther was on a school fieldtrip when she saw two living things shown below.



Fern



Papaya Plant

Her teacher told her that both belong to the same group of living things.

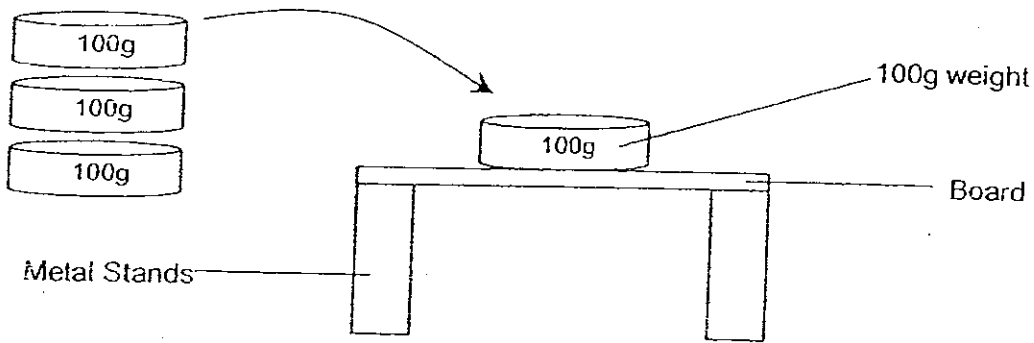
- a) Which group of living things does the fern and the papaya plant belong to? Explain your answer. (2m)

Her teacher added that even though they belong to the same group of living things, there are differences between them.

- b) State **ONE** difference between the fern and the papaya plant. (1m)



33. Bala carried out an experiment with two boards, A and B, of similar size and thickness as shown below.



He added 100g weights **one by one** on each board until it broke and recorded the greatest number of weights the boards can hold. Below are his results.

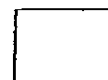
Board	Greatest number of 100g weights the board can hold
A	5
B	9

a) What was the aim of Bala's experiment?

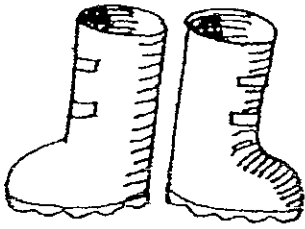
(1m)

b) Which board should he use to support an 800g object? Explain your answer **CLEARLY**.

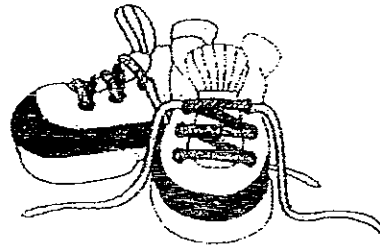
(2m)



34. Look at the 2 types of footwear below.



Rubber boots



Canvas shoes

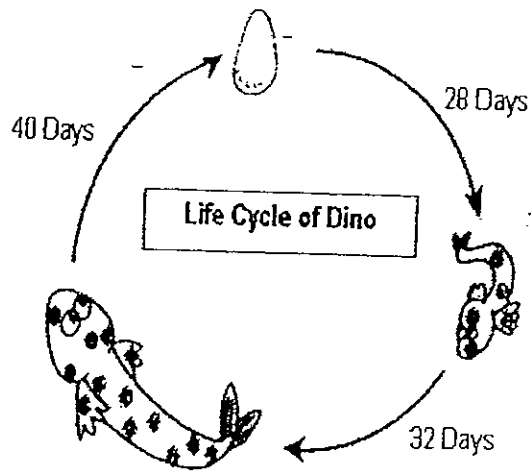
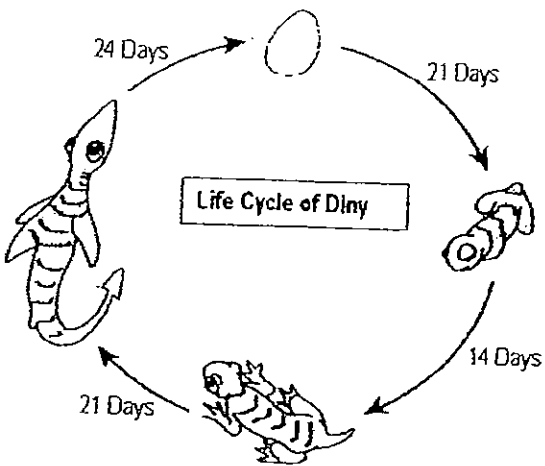
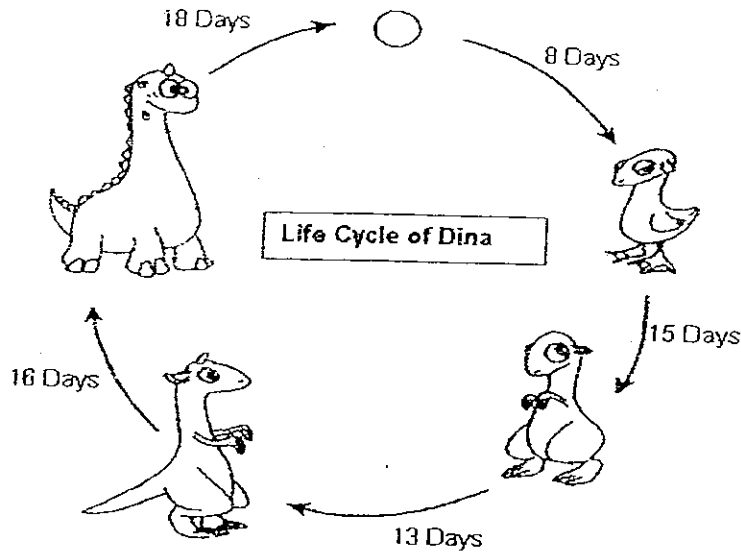
Mr Lim is a farmer who works long hours in wet and muddy fields.

- a) Which footwear is more suitable for Mr Lim if he wants to keep his feet dry? (1m)

- b) Explain your answer in (a). (1m)



35. On the Dynasty Planet, there lived three kinds of creatures. Dino, Dina and Diny with different life cycles.



a) Which life cycle, Dino, Dina or Diny, has the most number of stages? (1/2m)

b) Which life cycle, Dino, Dina or Diny, is the longest? (1/2m)

c) In which life cycle, Dino, Dina, or Diny does the young look most like the adult? (1m)



36. Brenda observed how the following animals developed into adults over a period of time. She classified them into 2 groups, X and Y.

Group X	Group Y
Butterfly	Chicken
Moth	Cockroach

a) Give suitable headings for Groups X and Y. (2m)

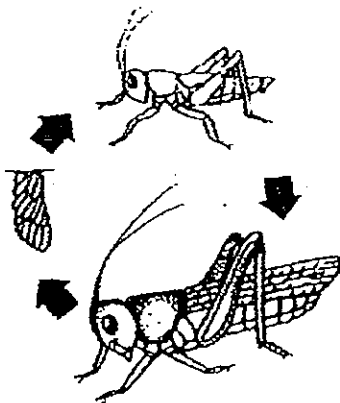
Group X: _____

Group Y: _____

b) Based on your answer in (a), in which group (X or Y) will you classify the mosquito? (1m)

37. The pictures below show the life cycles of 2 animals. Write 'T' for True or 'F' for False for the following statements shown below.

(2m)



Grasshopper



Housefly

- (a) The housefly has wings at the adult and pupa stages of its life. ()
- (b) The grasshopper nymph can move from place to place while the pupa cannot move from place to place. ()
- (c) The life cycle of a cockroach has similar number of stages as the life cycle of the grasshopper. ()
- (d) The young of the grasshopper resembles its parent while the young of the housefly does not resemble its parent. ()

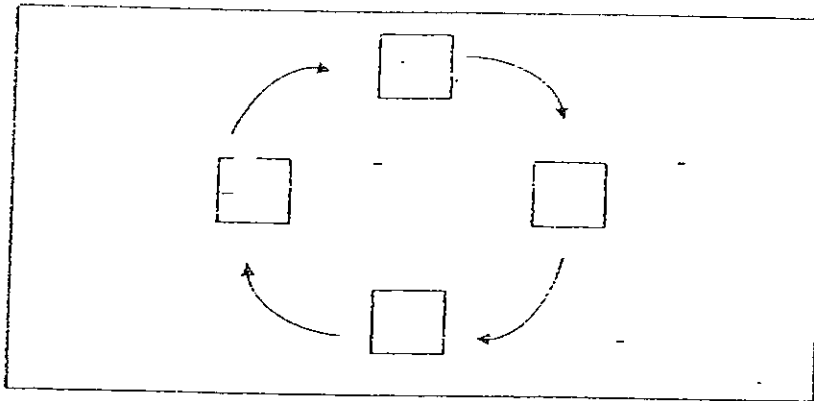


38. The pictures below show different stages of the life cycle of a beetle.



a) At which stage, (A, B, C or D), does moulting occur? (1m)

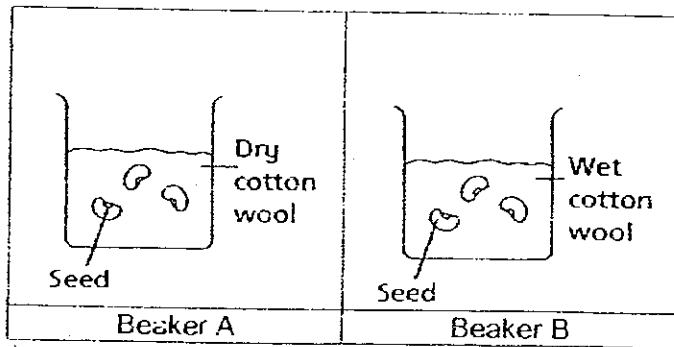
b) Using the letters, A, B, C and D, draw the life cycle of the beetle in the boxes below. (1m)



c) Give a reason why all living things have a life cycle. (1m)



39. Beakers A and B were placed indoors, near the windows.

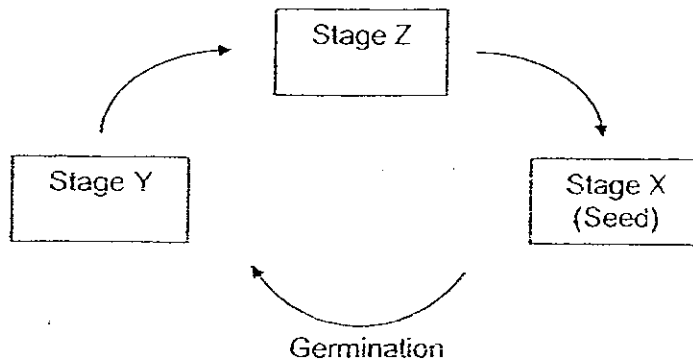


a) In which beaker will the seeds germinate? (1m)

b) Explain your answer in (a). (1m)



40. The diagram below shows the order of stages in the life cycle of a flowering plant.



a) Name the stages Y and Z.

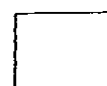
(1m)

Stage Y: _____

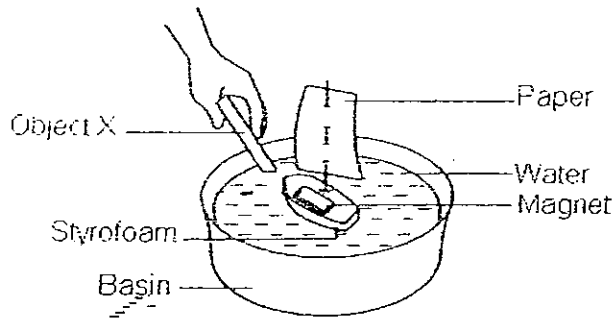
Stage Z: _____

b) At which stage, X, Y or Z, is the plant capable of flowering?

(1m)



42. The diagram below shows a styrofoam boat floating in a basin of water. Benjamin placed a magnet in the styrofoam boat.



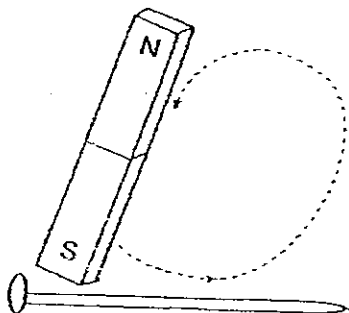
When Benjamin brought Object X near to the boat, he observed that the boat moved away from Object X.

- a) What can X be? (1m)

- b) Explain what caused the boat to move away from Object X. (2m)



43. Siti used the stroking method to make a temporary magnet. Her teacher told her that the strength of the temporary magnet depends on a number of factors.



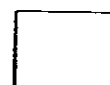
List down 2 factors that Siti's teacher could have said to her.

a)

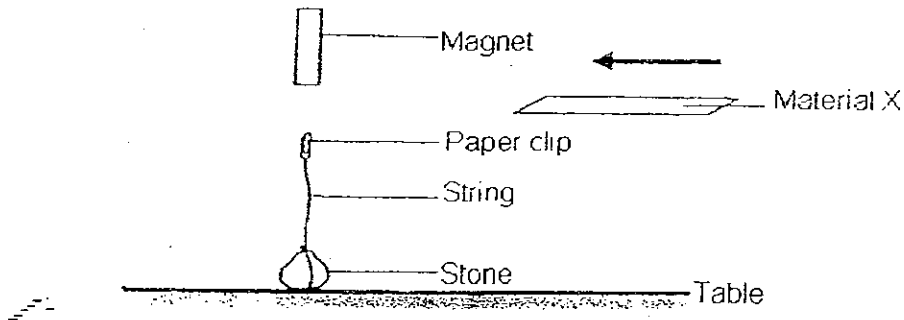
(1m)

b)

(1m)



44. Ravi set up an experiment as shown below. He was able to keep the paper clip suspended in the air when he held the magnet above it.



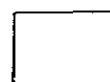
When Material X is placed between the magnet and the paper clip, the paper clip falls onto the table.

- a) What could material X be?

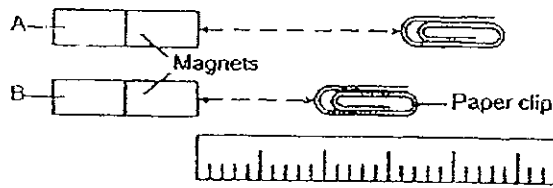
(1m)

- b) Explain why the paper clip drops.

(2m)



45. Mrs Lee set up an experiment as shown below. She pushes the paper clip towards the magnet along the ruler.



She then measured the distance at which the paper clips are attracted to the magnets A and B respectively.

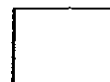
Magnet	Distance at which the paper clip is attracted to magnet
A	3 cm
B	2 cm

a) Which magnet, A or B, is weaker?

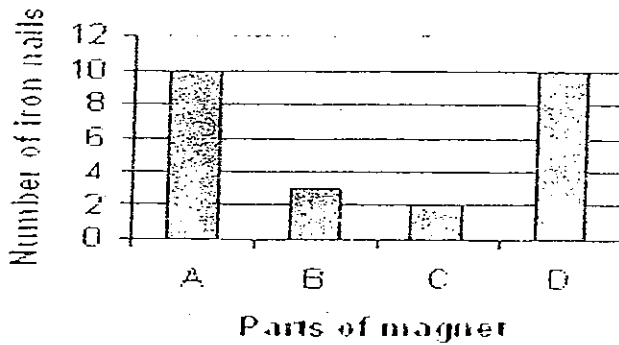
(1m)

b) Explain your answer for part (a).

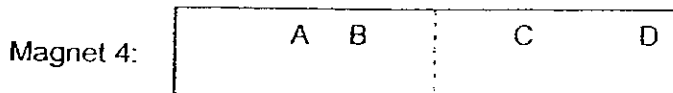
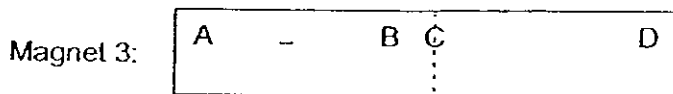
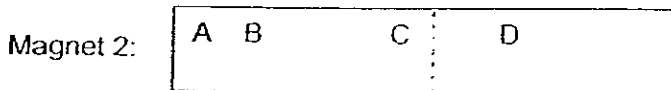
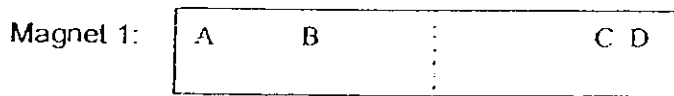
(1m)



46. Mr Ali carried out an experiment using a bar magnet and iron nails. He divided the magnet into 4 parts, A, B, C and D. He brought the magnet close to a tray of iron nails. He then recorded the number of iron nails that were attracted to each of the 4 parts of the magnet. The graph below shows the findings of his experiment.



- a) Based on the graph above, which magnet 1, 2, 3 or 4 has been labelled correctly? (1m)



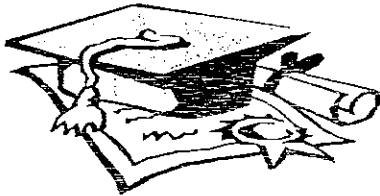
Magnet _____

- b) Explain your answer for part (a). (1m)

.End of Part 2

Setters: Mrs. Chloe Tay & Ms. Tan Y.H.





ANSWER SHEET

EXAM PAPER 2008

SCHOOL : HENRY PARK PRIMARY SCHOOL
SUBJECT : PRIMARY 3 SCIENCE

TERM : SA 2

Q1	Q2	Q3	Q4	Q5	Q6	Q7	Q8	Q9	Q10	Q11	Q12	Q13	Q14	Q15	Q16	Q17
2	3	2	3	3	1	1	4	3	2	1	4	3	3	4	3	2

Q18	Q19	Q20	Q21	Q22	Q23	Q24	Q25	Q26	Q27	Q28	Q29	Q30
2	2	1	1	2	3	4	1	3	4	3	1	3

31)a) Group S make their own food but Group R feed on decaying matters.

b) Group P and Group Q do not grow.

c) P: Never alive Q: once alive

32)a) They belong to plants, because they make their own food.

b) The fern is not a flowering plant but the papaya plant is.

33)a) Bala's aim of the experiment is to see which board can hold the most weigh.

b) Board B because it can carry 900g and it did not break.

34)a) Rubber boots.

b) The rubber boots does not absorb water but the canvas shoes does absorb water.

35)a) Dina. b) Dina. c) Dino.

36)a)X: four stages out life cycle.

Y: three stages of life cycle.

b)Group X.

37)a)F b)T c)T d)T

38)a)Stage A.

b) C

B

A

D

c)So that they will never extinct.

39)a)Beaker B.

b)The seed in beaker B has water.

40)a)Y: seedling. Z: adult plant.

b)Stage Z.

41)a)He should keep the same number of batteries.

b)Paul is trying find out if the number of coils of wire affects the electromagnet magnetism.

42)a)A magnet.

b)He brought the like poles of the magnet together and they repelled.

43)a)Siti can stroke the temporary magnet more.

b)Siti can use a stronger magnet to stroke the temporary magnet.

44)a)Material X could be an iron sheet.

b)Magnetism cannot pass through magnetic materials like iron.

45)a)Magnet B.

b)Magnet B managed to attract the paper clip when it is nearer therefore making it weaker.

46)a)3

b)The poles of a magnet are stronger while the middle is the weaker. Therefore A and D must be right at the end while C should be right in the middle.