Name : ……………………….   **Form** : ……………

1. Which of the following statements are true about the application of Science?
   I. Enables humans to see very tiny object.
   II. Enables humans to land onthe moon.
   III. Enables humans to travel to farway places in a short period.

   A. I and II only   C.II and III only
   B. I and III only   D. I, II and III

2. Which of the following is not a natural phenomenon?

   A. The occurrence of day and night
   B. The growth of plants.
   C. The recycling process of newspaper
   D. The water evaporation

3. The following information describes a career in science.
   What is the career?

   > *To study how to prevent plants from being attacked by insects*

   A. Geologist   C. Archite
   B. Botanist   D. Astronomy

4. Diagram 1 shows an apparatus.
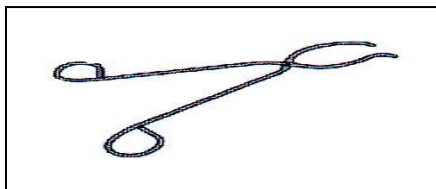
   What is the use of the apparatus?
   A. To stir liquids
   B. To hold a hot object
   C. To separate solids from a liquid
   D. To hold a test tube

5. Which of the following is used as a container for heating a substance to a very high temperature?
   A. Conical flask
   B. Round-bottomedflask
   C. Gas jar
   D. Crucible

6. The following shows two examples of chemicals in the Science laboratory.

   - Hydrogen
   - Potassium

   Which of the following symbols should be on the bottles of the chemicals above?

   A.

   B.

   C.

   D.

7. Ahmad makes a prediction that the rougher the surface, the slower the object moves on it. What is the step of scientific method involved?
   A. Collecting data
   B. Suggesting a hypothesis
   C. Identifying the variables
   D. Analysing data

8. Which of the following must be done when acquiring scientific knowledge?
   I   Analyse and interpret the data.
   II   Modify the hypothesis to fit the analysis.
   III Report only the data that supports the hypothesis.
   A. I only
   B. I and II only
   C. II and III only
   D. I, II and III only

9. Which of the following statements is not true?
   A. Read the label first before using a substance
   B. Scientists conduct experiments to test out hypothesis
   C. Taste chemicals before using them.
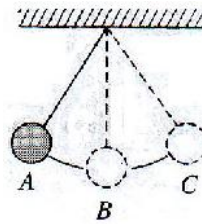   D. Light the match first before turning on the gas.

10. The information below shows some steps in scientific investigation.

   P: Collecting data
   Q: Making a conclusion
   R: Planning the experiment
   S: Analysing and interpreting data
   T: Writing a report

   Which of the following is the correct order?
   A. R, P, Q, S, T
   B. R, Q, P, S, T
   C. R, S, P, Q, T
   D. R, P, S, Q, T

11. Diagram 2 shows a pendulum.

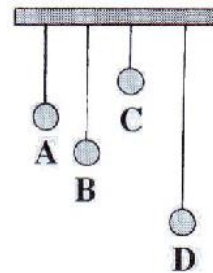   Which of the following shows a complete oscillation?
   I   A→C→A
   II   A→C→B
   III B→A→C→B

   A. I and II only   C. II and III only
   B. I and III only   D. I, II and III

12. A pendulum takes 45 seconds to complete 15 oscillations. Find the periodic time for one oscillation.
   A. 1.5s   C. 2.5s
   B. 2.0s   D. 3.0s

13. Diagram 3 shows four pendulums

   Which of the above pendulums swings the fastest?

14. Table 1 shows the prefixes of *SI* units used in measurement.

   | milli | kilo | micro | centi | Mega |

   Table 1

   Arrange the prefix values in ascending order.
   A. Micro, milli, centi, kilo, Mega
   B. Mega, centi, micro, kilo, milli
   C. Milli, kilo, micro, centi, Mega
   D. Mega, kilo, centi, milli, micro

15. Which physical quantity is matched correctly to its *SI* unit?

	Physical quantity	*SI* unit
I	Mass	Gram
II	Length	Metre
III	Time	Second
IV	Electric current	Ampere

   A. I and II only   C. III and IV only
   B. II and III only   D. II, III and IV only

16. Which of the following is converted correctly?
   A. 105km = 1050m
   B. 10.5cm = 0.105m
   C. 1.05mm = 0.0105km
   D. 0.105m = 1.05km

17. Which of the following is equivalent to 3570m?
   A. 35 700mm   C. 3 570 000cm
   B. 357 000dm   D. 3.57Km

18. What is the difference between mass and weight?
  I   they are measured using different instruments
  II They are measured in different units
  III They are measured in different places.
   A. I and II only   C. II and III only
   B. I and III only   D. I, II and III

19. Diagram 5 shows a measuring tool.

What is the function of the tool shown above?
   A. To measure the mass of an object
   B. To measure the weight of an object.
   C. To measure the density of an object
   D. To hold an object

20. Which of the following can be used to measure mass?
  I   Spring balance
  II Beam balance
  III Electronic balance
   A. I and II only   C. II and III only
   B. I and III only   D. I, II and III

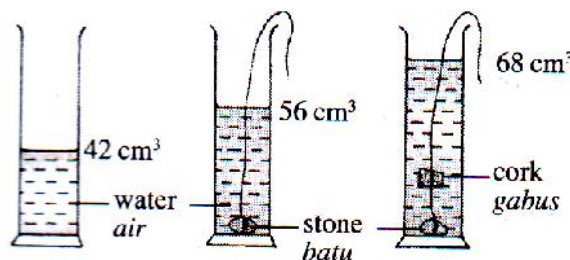21. Diagram 6 shows the weight of a fish, a crab and a prawn
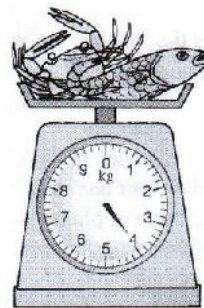
What is the weight of the fish if the total mass of the crab and prawn is 2.5kg?
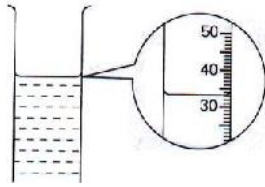   A. 0.7kg   C. 1.5kg
   B. 0.9kg   D. 1.8kg

22. Diagram 7 shows how the volume of a stone and a cork is measured.

Which of the following shows the correct volume of the stone and the cork?

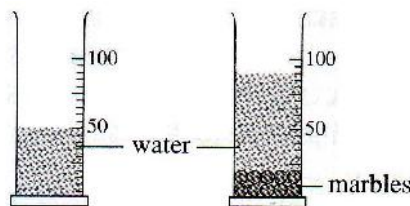|	Stone (cm³)	Cork (cm³)
A	10	5
B	12	6
C	11	8
D	14	12

23. Diagram 8 shows a measuring cylinder which is used to measure the volume of liquid.`

What is the volume of liquid in *ml*?
A. 31*ml*   C. 35*ml*
B. 33*m*   D. 40*ml*

24. A student filled a measuring cylinder with 50ml of water. She put in 10 marbles of equal size into the water. The water level rose to 90ml.


What is the volume of each marble?
A. 2cm³   C. 10cm³
B. 4cm³   D. 40cm³

25. Which of the following show the importance of using a standard unit?
 I It enables data to be analysed and compared by scientists throughout the world
 II It enables measurement of quantities to be done more accurately
 III It can facilitate international communication.
 A. I and II only   C. II and III only
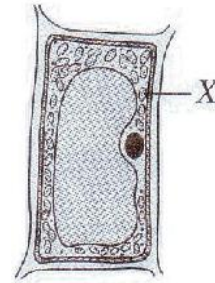 B. I and III only D. I, II and III

26. Figure 7
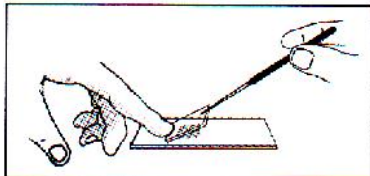
When a specimen is placed on a slide, the cover slip must be placed slowly so that
A. the slides does not crack
B. the specimen is not spoilt

C. the specimen is always dry
D. air bubbles are not formed

27. Figure 8 shows a plant cell.

What is the function of the part labelled X?
A. To carry out photosynthesis
B. To maintain the shape of the cell
C. To store mineral salts and sugar.
D. To control all the activities of the cell.

28. Which of the cell structures is not found in an animal cell?
A. Nucleus   C. Cytoplasm
B. Cell wall   D. Cell membrane

29. The information below shows the function of a cell structure
Controls all the activities in the cell

Which of the following cell structures has the above function?
A. Chloroplast   C. Vacuole
B. Nucleus   D. Cytoplasm

30. Which structure of the plants cell is correctly matched with its function?

	Structure	Function)
A	Vacuole	Controls the activities of the cell
B	Chloroplast	Absorbs water and minerals
C	Cell membrane	Controls the movements of substances in and out of the cell
D	Nucleus	Supports and maintains the shape of the cell

4

Section B

1. Diagram 1 shows cells M and N.

M   N
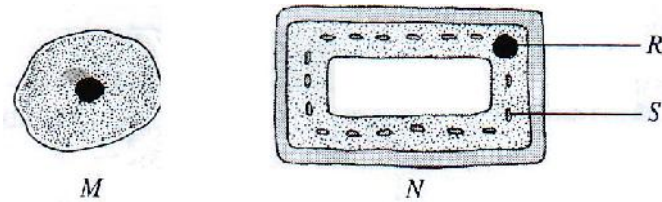
(a) State the name of cell M and N.

i. Cell M:_____ 1(m)
ii. Cell N: _____ 1(m)

(b) Structure Q controls the movement of substances in and out of the cell

   Label structure Q on cell M and cell N.   1(m)

(c) Complete Table 1 by naming and stating the function of structure R and S.

Structure	Name of structure	Function of structure
R		
S		

4(m)

2. Diagram 2 shows an experiment is carried out to study how to measure the thickness of the measuring tube by using two measuring tools.
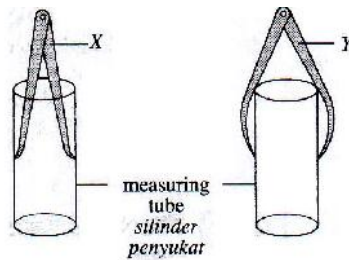

measuring
tube
silinder
penyukat

Table 2 shows the results of the experiment

Measurement	1	2	Average
Measuring tool X	2.1	2.2	2.15
Measuring tool Y	2.3	2.3	2.30

Table 2

(a) Name the measuring tools X and Y.

   X :_____1(m)
   Y :_____1(m)

(b) What is the thickness of the measuring tube shown in the diagram?

   _____
   _____ 2 (m)

5

(c) State two other things that can be measured by using the measuring tools as shown in the diagram.

1. _____ 1(m)

2. _____ 1(m)

3. Table 3 shows some common hazards symbols that can be found in a science   laboratory.

(a) Complete the table

Hazard Symbols	Meaning	An Example
		Concentrated acids
		Uranium
	Poisonous	
	Flammable	

Table 3   4(m)

(b) Complete the table with the correct answers

Physical quantity	S.I Unit	Symbol of Unit
length		
	Kelvin	
		kg

3(m)

Answer Scheme
Science Test 1 Form 1
Section A

1	D
2	C
3	B
4	B
5	D
6	A
7	B
8	A
9	C
10	D
11	B
12	D
13	C
14	A
15	D
16	B
17	D
18	A
19	B
20	C
21	C
22	D
23	B
24	B
25	D
26	D
27	A
28	B
29	B
30	C

Section B
Diagram 1 shows cells *M* and *N*.

State the name of cell *M* and *N*.
i Cell *M*: animal cell   1(m)
ii Cell *N:* plant cell   1(m)
Structure *Q* controls the movement of substances in and out of the cell
Cell membrane 1 (m)

Complete Table 1 by naming and stating the function of structure *R* and *S*.

Structure	Name of structure	Function of structure
R	Nucleus	Control all the activities of the cells
S	Chloroplast	Carries out photosynthesis to produce food

4(m)

Table 2 shows the results of the experiment

Measurement	1	2	Average
Measuring tool X	2.1	2.2	2.15
Measuring tool Y	2.3	2.3	2.30

Table 2
Name the measuring tools X and Y.
X   : Internal Callipers 1(m)
Y   : External Callipers 1(m)

2(b) What is the thickness of the measuring tube shown in the diagram?

$$= \frac{d^2 - d^1}{2} \text{ cm}$$

$$= \frac{2.30 - 2.15}{2}$$

$$= 0.075 \text{cm}$$

2(c) Beaker 1(m)

    glass bottle 1(m)

Hazard Symbols	Meaning	An Example
	corrosive	Concentrated acids
	Radioactive	Uranium
	Poisonous	Mercury/ lead/ hydrogen sulphide
	Flammable	Alcohol/ phosphorus/ petrol

Table 3

(b)   Complete the table with the correct answers

Physical quantity	S.I Unit	Symbol of Unit
length	Metre	m
Temperature	Kelvin	K
Mass	Kilogram	kg