



UNIVERSITY OF CAMBRIDGE INTERNATIONAL EXAMINATIONS
Cambridge International Primary Achievement Test

CANDIDATE
NAME

CENTRE
NUMBER

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CANDIDATE
NUMBER

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* 6 5 1 3 1 9 0 3 7 1 *

SCIENCE

0843/02

Paper 2

May/June 2010

45 minutes

Candidates answer on the Question Paper.

Additional Materials:

Pen
Pencil
Ruler

Calculator

READ THESE INSTRUCTIONS FIRST

Write your Centre number, candidate number and name in the spaces at the top of this page.

Write in dark blue or black pen.

DO **NOT** WRITE IN ANY BARCODES.

Answer **all** questions.

The number of marks is given in brackets [] at the end of each question or part question.

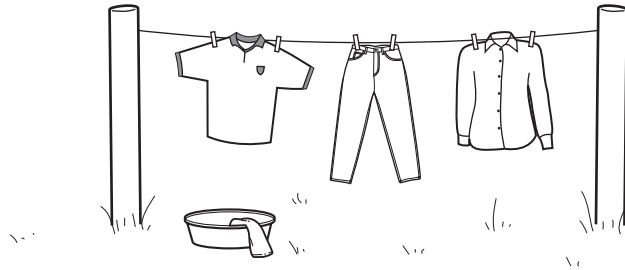
You should show all your working in the booklet.

For Examiner's Use	
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14	
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16	
Total	

This document consists of **16** printed pages.



1 The picture shows washing hanging on a line to dry.



Complete these sentences using some of these words.

condensed **cool** **evaporated** **gained**
hot **inside** **less** **lost**
more **still** **surface** **water** **windy**

The washing dries more quickly when it is a and
 day. The Sun heats up the water in the clothes and
 it is On a windy day the water is carried away from
 the of the clothes.

The clothes always weigh after drying because they
 have water.

[4]



Page Total



- 2 (a) Eating a varied diet is very important to keep our bodies healthy. Look at the diets of Sadiq and Fatima. Who has the healthier diet?
Tick (✓) the correct box.



Sadiq



Fatima

Sadiq	Fatima
eats sweets and chocolate drinks fizzy drinks enjoys eating meat	enjoys eating fruit enjoys eating meat drinks plenty of water

[1]

- (b) What we eat can be damaging to our teeth.
Tick (✓) **two** foods which can lead to tooth decay.

meat

sugary foods

salt

fizzy drinks

bread

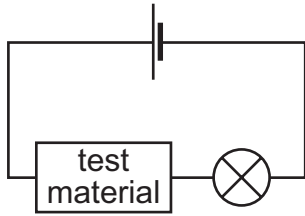
pasta

[1]

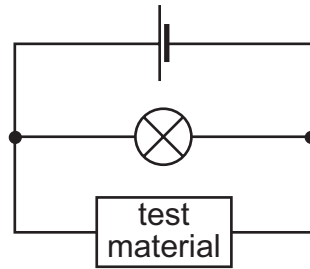
Page Total

3 Alec is going to test some different materials to see if they conduct electricity.

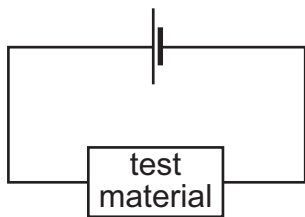
(a) Which of these circuits should he use?
Tick (✓) the correct box.



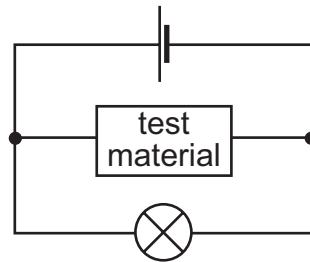
A



B



C



D

[1]

(b) Which **two** items, if put into the correct circuit above, would cause the bulb to light up?

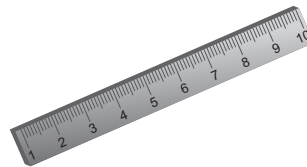
Tick (✓) the **two** correct answers.



plastic comb



steel scissors



wooden ruler



metal paperclip

[1]

Page Total

(c) What do we mean by the terms

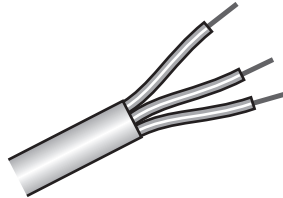
(i) electrical conductor

..... [1]

(ii) electrical insulator?

..... [1]

(d) The picture shows some electrical wiring from a house. Each individual wire is covered in plastic and then all the separate wires are covered in another layer of plastic.

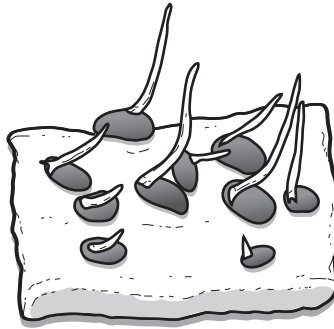


Why are the wires covered in plastic?

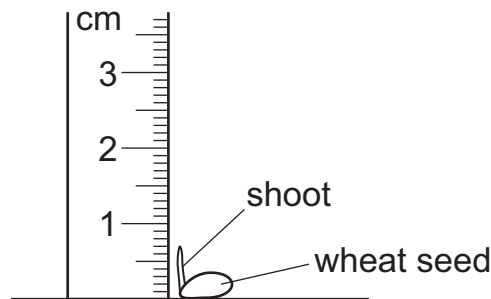
..... [1]

Page Total

- 4 When wheat seeds are grown on damp paper they germinate and grow an upright shoot as shown in the drawing.



Some students are using these seeds to investigate plant growth. They decide to measure the length of each shoot.



- (a) How long is the shoot shown in the diagram?

..... mm [1]

- (b) The students decide to germinate 8 seeds and measure the length every two days for six days. The table shows their results.

Shoot	Length in mm			
	Day 0	Day 2	Day 4	Day 6
1	0	2	6	9
2	0	3	7	9
3	0	2	7	10
4	0	3	7	9
5	0	2	7	9
6	0	2	6	10
7	0	3	7	11
8	0	3	8	10

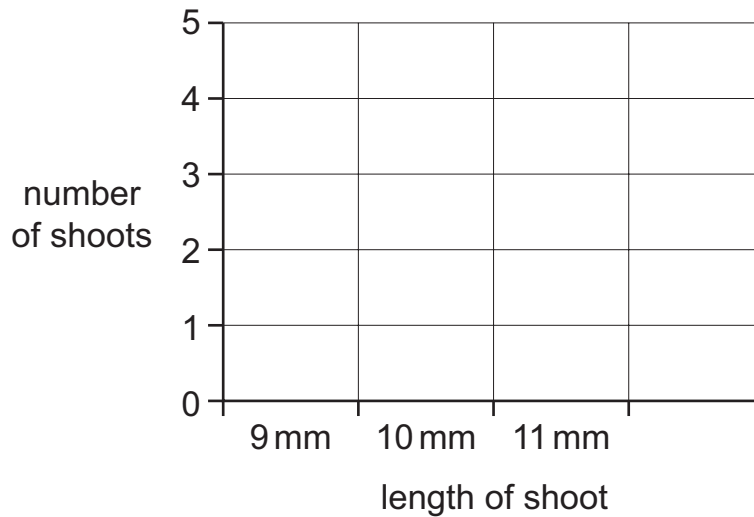
Page Total

Use their results to answer these questions.

(i) How much did **Shoot 2** increase in length between Day 2 and Day 6?

.....mm [1]

(ii) Draw a bar chart on the axes to show how many shoots there are at each height on Day 6.



[2]

(iii) Two of the students made these statements.

Tick (✓) the correct box to show if each statement is True or False.

True False

All the seeds grew at the same rate.

<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------

All the seeds increased in length as the days passed.

<input type="checkbox"/>	<input type="checkbox"/>
--------------------------	--------------------------

[1]

Page Total

5 Animals can be divided into groups using body features.

(a) Which group does each animal belong to?

Tick (✓) the correct box.

The first one has been done for you.

	body covered in hair/fur	body covered in feathers
bear	✓	
chicken		
duck		
eagle		
horse		
parrot		
penguin		
rat		
tiger		
wolf		

[2]

(b) What name is given to animals that have feathers?

[1]

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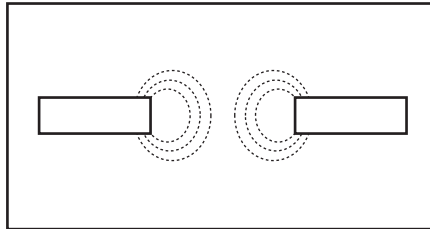
6 Some metals are attracted to magnets.

(a) In the list, tick (✓) the magnetic materials.

- | | | | |
|--------|--------------------------|-----------|--------------------------|
| lead | <input type="checkbox"/> | magnesium | <input type="checkbox"/> |
| copper | <input type="checkbox"/> | steel | <input type="checkbox"/> |
| iron | <input type="checkbox"/> | nickel | <input type="checkbox"/> |

[3]

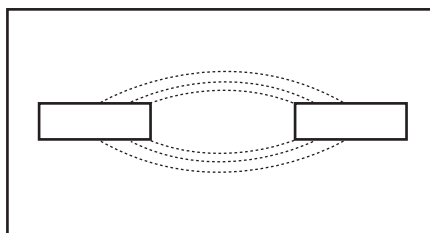
(b) Peter places a sheet of glass over two magnets. The diagram shows what happens when he shakes some iron filings over it.



What does this tell you about the poles of the magnets?

..... [1]

(c) Peter moves one of the magnets. The diagram shows his new results.

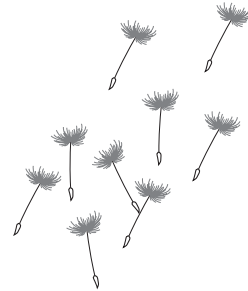


What does this tell you about the poles of the magnets?

..... [1]

Page Total

- 7 Flowering plants and animals have a life cycle.
Write under each picture the stage or name which the plant is in.



.....

.....

.....

[3]

- 8 Some materials can have a range of properties. Plastic can be transparent or opaque. Some plastic bags you can see through, others you cannot see through.

Look at the materials in the table and tick (✓) if the material sometimes has the stated property.

Property	Metal	Glass	Wool
flexible			
hard			
rigid			
shiny			
transparent			

[4]

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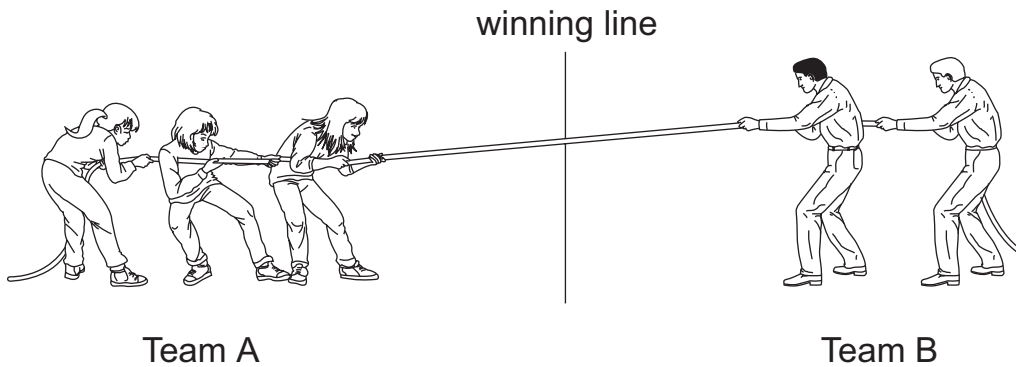
9 (a) Tick (✓) the correct box to complete the statement.

Pulling is an example of a

- mass
- force
- speed
- pressure

[1]

(b) The picture shows two teams having a tug-of-war.



To win, a team has to pull the other team over the winning line.
Which team is likely to win?
Tick (✓) the correct box.

- the team with three people in it
- the team with two people in it
- the team that applies the greatest force
- the team that applies a balanced force

[1]

(c) If Team A applies a total force of 100N and Team B applies a force of 850N explain what will happen.

..... [1]

Page Total

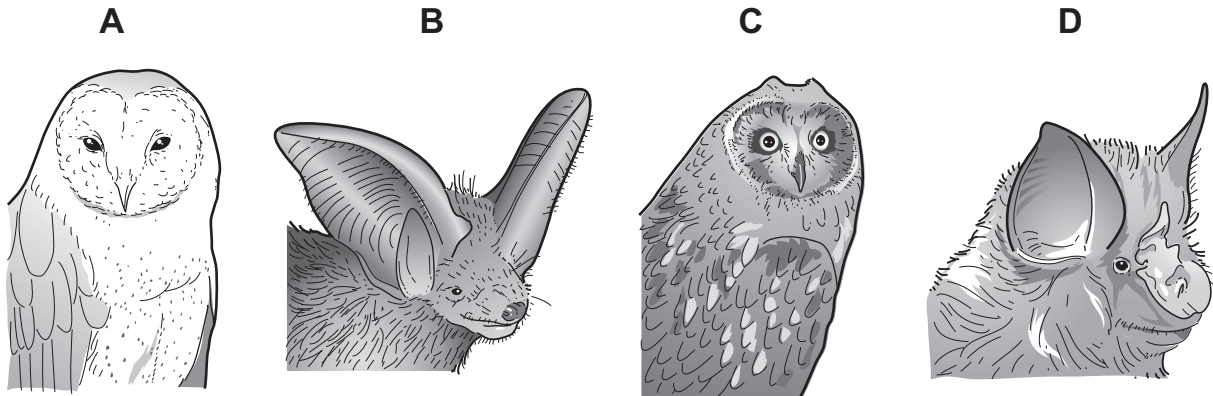
- 10 Some substances dissolve in water, some do not dissolve. Complete the table by ticking (✓) the correct column.

Substance	Dissolves	Does not dissolve
chalk		
flour		
salt		
wax		

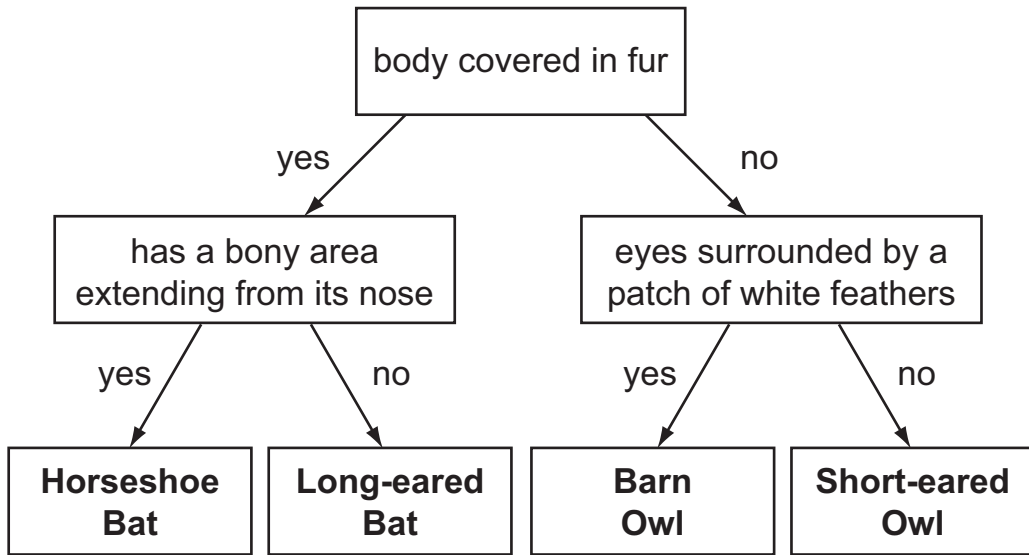
[3]

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11 The drawings show four animals that fly at night.



Use the key to identify the animals shown.



Animal **A** is

Animal **B** is

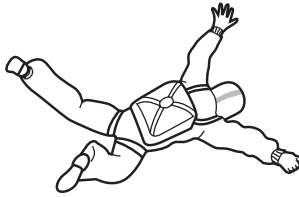
Animal **C** is

Animal **D** is

[3]

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12 (a) A skydiver has jumped out of an aircraft but has not yet opened her parachute.



Which of these statements best describes what is happening?
Tick (✓) the correct statement.

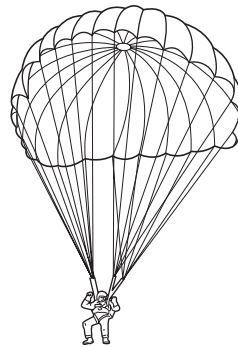
She is pushed towards the surface of the Earth by the force of gravity.

She is pushed towards the centre of the Earth by the force of gravity.

She is pulled towards the surface of the Earth by the force of gravity.

She is pulled towards the centre of the Earth by the force of gravity.

[1]



(b) Tick (✓) the correct statement.

When the skydiver has opened her parachute she will

slow down at first and then fall at a constant speed.

speed up at first and then fall at a constant speed.

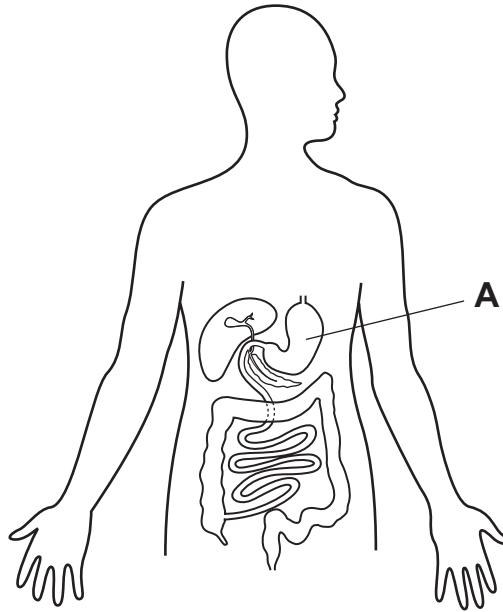
slow down at first then speed up.

speed up until she is stationary.

[1]

Page Total

13 The diagram shows a human body and part of one of its major organ systems.



(a) Which organ system is shown?
Circle the correct answer.

circulatory

digestive

nervous

reproductive

[1]

(b) Name the organ labelled **A**.

.....

[1]

(c) (i) Mark an **X** on the diagram to show the position of the heart.

[1]

(ii) What is the function of the heart?

.....

[1]

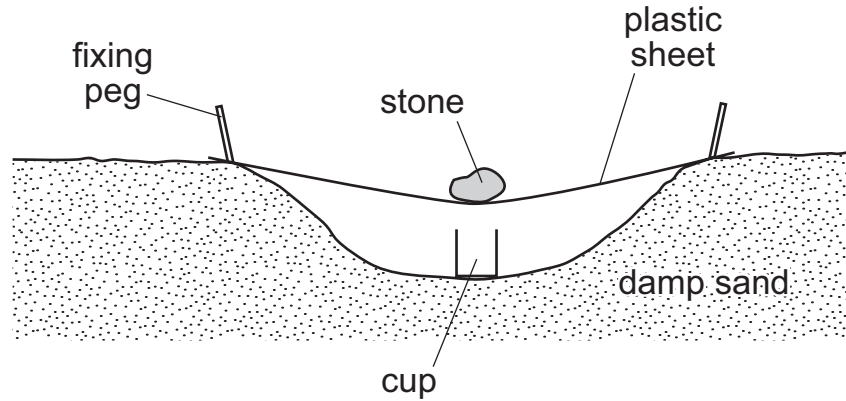
(d) What does the excretory system do?

.....

[1]

Page Total

- 14 Ahmed was trying to get some drinking water from damp sand in the desert. He digs a hole and fixes a plastic sheet over it. He puts a stone in the middle of the sheet. Underneath the stone in the centre of the hole is a cup. The diagram shows the equipment he set up.



Use these words to complete the sentences.

boils

condenses

cup

evaporates

freezes

hollow

topside

underside

The Sun heats up the damp sand. The water in the sand
 It on the of the plastic sheet, and runs
 down the sheet and collects in the

[3]

