

# TARGETER KCPE THIRD MERIT STANDARD EIGHT - YEAR 2020

### SCIENCE

Time: 1 hour 40 mins

#### INSTRUCTIONS TO CANDIDATES (Read these instructions carefully.)

- 1. You have been given this question booklet and a separate answer sheet. The question booklet contains 50 questions.
- 2. Do any necessary rough work in this booklet.
- 3. When you have chosen your answer, mark it on the ANSWER SHEET, not in the question booklet.

#### HOW TO USE THE ANSWER SHEET.

- 4. Use an ordinary pencil only.
- 5. Make sure that you have written on the answer sheet:-

#### YOUR INDEX NUMBER

**YOUR NAME** 

#### NAME OF YOUR SCHOOL

- 6. By drawing a dark line inside the correct numbered boxes, mark your full Index Number (i.e. School Code Number and the three-figure Candidate's Number) in the grid near the top of the answer sheet.
- 7. Do not make any marks outside the boxes.
- 8. Keep your answer sheet as clean as possible and do not fold it.
- For each of the questions 1-50, four answers are given. The answers are lettered A, B, C, D. In each case, only ONE of the four answers is correct. Choose the correct answer.
- 10. On the answer sheet, show the correct answer by drawing a dark line inside the box in which the letter you have chosen is written.

#### Example:-

#### In the Question Booklet:

- 16. The following are carnivores except
  - A. leopard.
  - B. elephant.
  - C. hyena.
  - D. lion.

The correct answer is B.

#### On the Answer sheet:



[A] [B] [C] [D]



[A] [B] [C] [D]



[A] |B| [C] [D]



[A] [B] [C] [D]

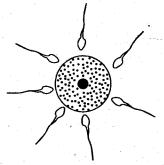
In the set of boxes number 16, the box with letter B printed in it is marked.

- 11. Your dark line MUST BE within the box.
- 12. For each question, ONLY ONE box is to be marked in each set of four boxes.

This question paper consists of 7 printed pages.



- 1. Internal livestock parasites cause the following on animals **except** 
  - A. poor health.
  - B. anaemia.
  - C. irritation.
  - D. swollen stomach.
- 2. Hookworms in livestock mainly affect
  - A. poultry and fish.
  - B. sheep and goats.
  - C. cattle and sheep.
  - D. goats and pigs.
- 3. The attachment of the foetus to the uterine walls is called
  - A. gestation.
  - B. conception.
  - C. fertilization.
  - D. implantation.
- 4. The correct units for measuring force is
  - A. newtons.
  - B. spring balance.
  - C. kilograms.
  - D. grams.
- 5. The diagram below shows sperms surrounding an ovum during fertilization



Which one of the following statements is true?

- A. All the sperms penetrate the own.
- B. The fertilized ovum becomes the embryo.
- C. Only one sperm enters the ovum and fertilizes it.
- D. The head and the tail of the sperm penetrate and fuse with the ovum.

- 6. Excretory system consists of the following except
  - A. lungs.
  - B. skin.
  - C. kidneys.
  - D. anus.
  - 7. Sound from a source travels
    - A. in all directions.
    - B. in one direction.
    - C. in waves.
    - D. upwards and downwards.
  - 8. The following are all physical changes that occur in girls during adolescence except one. Which one?
    - A. Enlargement of breasts.
    - B. Hips broaden.
    - C. Growth of pubic hair.
    - D. Chest and shoulders broaden.
  - 9. Among the following uses of water, which one is a use of water in recreation?
    - A. Irrigation.
    - B. Making fountains.
    - C. Sport fishing.
    - D. Watering animals.
  - 10. Std.6 pupils carried the following materials to class:

Basin

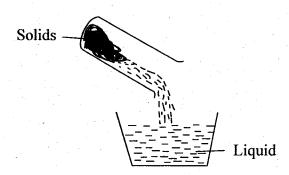
Water

Mirror

What were they likely to investigate?

- A. Refraction of light.
- B. Reflection of light.
- C. Bending of light.
- D. Making a rainbow.

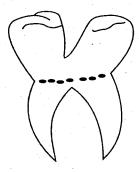
## 11. The diagram below shows a method of separating mixtures



The method is referred to as

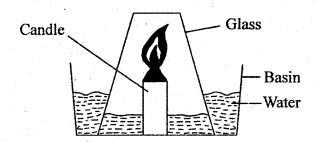
- A. pouring.
- B. sieving.
- C. decanting.
- D. filtering.
- 12. The weather instrument that is used to determine both the direction and strength of wind is
  - A. windvane.
  - B. thermometer.
  - C. windsock.
  - D. raingauge.
- 13. Which one of the following is the function of the amniotic fluid during pregnancy?
  - A. Facilitates exchange of waste materials from foetus to the mother.
  - B. Exchange of oxygen and carbon dioxide between the mother and the foetus.
  - C. Protects the foetus from shock and accidents.
  - D. Facilitates the transfer of food from the mother to foetus.

## **14.** The problem related to tooth shown below is called



- A. dental caries.
- B. cavity.
- C. gingivitis.
- D. bleeding gum.
- 15. The following are importance of water in the diet except
  - A. keeps our bodies cool.
  - B. helps to prevent constipation.
  - C. helps in blood formation.
  - D. helps in removal of wastes.
- **16.** A child with pale fingernails and feels tired easily is also likely to have
  - A. swollen abdomen.
  - B. wrinkled face.
  - C. shortness of breath.
  - D. brownish hair.
- 17. Which one of the following is an artificial way of lighting a house?
  - A. Using skylights.
  - B. Using glass windows.
  - C. Using gas lamps.
  - D. Using transparent roofs.

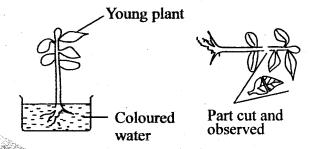
18. The set up below was used by std. 6 pupils.



After the experiment, pupils concluded that

- A. air occupies space.
- B. air is denser than water.
- C. air is a mixture of gases.
- D. air has weight.
- 19. Beans and peas have taproots with root nodules that help in
  - A. fixing oxygen into the soil.
  - B. absorption of carbon dioxide from the atmosphere.
  - C. fixing atmospheric nitrogen into the soil.
  - D. providing shelter to bacteria.
- 20. Which one of the following represents the correct steps on foetal development?
  - A. Zygote → foetus → embryo → baby.
  - B. Foetus → zygote → embryo → baby.
  - C. Embryo → foetus → zygote → baby.
  - D. Zygote → embryo → foetus → baby.
- 21. Which one of the following materials can be attracted by a magnet?
  - A. Copper coin.
  - B. Steel spoon.
  - C. Aluminium plate.
  - D. Silver coin.
- 22. Among the following materials, which will allow some light to pass but one cannot see through?
  - A. Mirror.
  - B. Frosted glass.
  - C. Clean water.
  - D. Wood.

- 23. Use of drip irrigation is a method of conserving water through
  - A. using it sparingly.
  - B. recycling.
  - C. re-using.
  - D. harvesting.
- **24.** Std. 5 pupils performed the experiment shown below.



The experiment was set up to investigate

- A, absorption in plants.
- B. breathing in plants.
- C. food storage in plants.
- D. transportation in plant.
- 25. The following are characteristics of fish except one. Which one?
  - A. Varying body temperature.
  - B. Body covered with sales.
  - C. Lay fertilized eggs.
  - D. Breathe by gills.
- **26.** Which plant below is a green and non-flowering plant?
  - A. Cactus.
  - B. Grass.
  - C. Sunflower.
  - D. Fern.

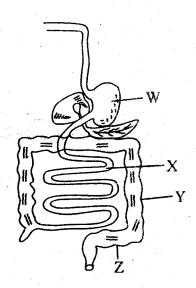
- 27. Solids which dissolve in liquids are called
  - A. solutes.
  - B. solvents.
  - C. suspensions.
  - D. solution.
- **28.** The transfer of heat in liquids is **mainly** through
  - A. radiation.
  - B. convection.
  - C. conduction.
  - D. convection and conduction.
- **29.** The soil that has the poorest drainage and floods easily is
  - A. loam.
  - B. clay.
  - C. sandy.
  - D. gravels.
- **30.** Which one of the following animal feeds provides energy to animals?
  - A. Sunflower seeds.
  - B. Lucerns.
  - C. Salt licks.
  - D. Banana stems.
- **31.** A certain drug when abused causes
  - vomiting
  - drowsiness
  - difficulty in breathing
  - poor thinking

The drug is most likely to be

- A. bhang.
- B. heroin.
- C. cocaine.
- D. alcohol.

- 32. Which one of the following sexually transmitted infections causes yellow pus oozing out of the genitals and swelling of knees?
  - A. Chancroid.
  - B. Syphilis.
  - C. Gonorrhoea.
  - D. Genital herpes.
- 33. Which one of the following levers when in use has the position of the effort between the fulcrum and the load?
  - A. Wheelbarrow.
  - B. Spade.
  - C. Clawhammer.
  - D. Crowbar.

Study the diagram below

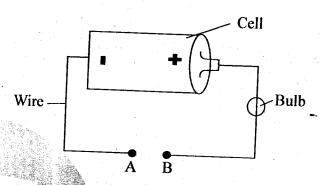


- 34. In which parts labelled above does absorption of foods take place?
  - A. W
  - B. X
  - C. Y
  - D.Z

- 35. All the following are excretory products except
  - A. excess water.
  - B. excess salts.
  - C. urea.
  - D. faeces.
- **36.** The surrounding of a living thing is its
  - A. habitat.
  - B. shade.
  - C. shelter.
  - D. environment.
- 37. Which food below when eaten will provide the body with energy and proteins?
  - A. Avocado.
  - B. Milk.
  - C. Ripe bananas.
  - D. Fish.
- 38. Th crop pest that causes damage to crops by sacking sap from leaves and stems is
  - A. cutworms.
  - B. aphids.
  - C. stalkborers.
  - D. weevils.
- 39. The following are special sounds except
  - A. screaming.
  - B. car hooting.
  - C. fire siren.
  - D. people shouting.

- **40.** Which pair of methods below can be used to separate a mixture of wheat flour, husks and wheat seeds?
  - A. Winnowing and picking.
  - B. Seiving and winnowing.
  - C. Sieving and filtering.
  - D. Sieving and picking.

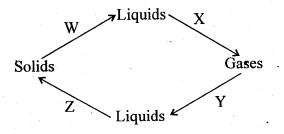
### Study the diagram below



- **41.** Which one of the following material when used to complete gap A, B will make the bulb light?
  - A. Plastic cable.
  - B. Plastic ruler.
  - C. Graphite.
  - D. Sellotape.
- 42. Which one of the following statement best describes fertilization in plants? When
  - A. pollen grains fall on the stigma and germinate.
  - B. pollen grains fall on the stigma.
  - C. pollen grains fuse with the ovules.
  - D. pollen grains are transferred from the anther.

- **43.** Plants used in making green manure should **not** be
  - A. very leafy.
  - B. fast in growth.
  - C. low in nitrogen content.
  - D. quick in rotting.
- **44.** The component of blood that helps in blood clotting is
  - A. platelets.
  - B. plasma.
  - C. white cells.
  - D. red cells.
- **45.** The **main** function of a diastema in herbivorous animals is to
  - A. help in proper turning of food when chewing.
  - B. tear grass materials.
  - C. grind vegetables matter.
  - D. prevent the herbivores from biting their tongue.
- **46.** The **best** method to prevent the spread of malaria and bilharzia is by
  - A. covering pit latrines.
  - B. wearing protective clothing.
  - C. boiling drinking water.
  - D. clearing stagnant water.

**47.** The flow chart below shows changes of states of matter



Which two processes occur due to increase in heat?

- A. W, Z
- B.Z, Y
- C. X, Y
- D. W, X
- **48.** Which one of the following is a characteristic of xerophytes?
  - A. They have flexible stems.
  - B. They have shallow root system.
  - C. They have thick cuticles.
  - D. They have many stomatas.
- **49.** Which one of the following animals moves by hopping and flying?
  - A. Flea.
  - B. Cockroach.
  - C. Kangaroo.
  - D. Cricket.
- **50.** The following are effects of drugs. Which one is a health effect?
  - A. Truancy.
  - B. Induced accident.
  - C. Lack of concentration.
  - D. Rape.