

MVOMERO DISTRICT COUNCIL
FORM TWO MOCK EXAMINATION MAY 2023
CHEMISTRY MARKING SCHEME

SECTION A (15MARKS)

1. **(10MARKS)**

i	ii	iii	iv	v	vi	vii	viii	ix	x
C	D	D	B	D	C	A	C	E	B

(1MARK@)

2. **(5 MARKS)**

LIST A	i	ii	iii	iv	v
LIST B	F	H	D	A	G

SECTION B (70 MARKS)

3. (a) Instruments

- (i) A pair of scissors and razor blades -used for cutting dressing materials
- (ii) safety pins-used for securing bandage
- (iii) Plaster- used for covering small cuts or wounds.
- (iv) cotton wool -used for cleaning and drying wounds
- (v) bandage -used for keeping dressing in place and immobilizing injured limbs

(ONLY TWO POINTS)1MARK@{INSTRUMENT 0.5, USES 0.5}

(b) Chemicals

- (i) Soap- Used for washing hands, wounds and equipments
- (ii) Painkillers - Used for relieving or reducing pain
- (iii) Antiseptic- Used for cleaning wounds to kill germs
- (iv) Petroleum jelly - Used for soothing chapped skin

(ONLY TWO POINTS)1MARK@{CHEMICAL 0.5, USE 0.5}

(b) Because water is plenty and accessible than any other component in first aid kit.
(2MARKS)

(C)(i) Porcelain -evaporating dish,crucible,motor and pestle

(ii) Plastic -beaker, measuring cylinder,test tube racks,wash bottle

(iii) Glass -beakers,test tube,watch Glass, burette,pipette

(iv) Iron-retort stand,tripod stand, Bunsen burner,test tube holder

(ONLY TWO EXAMPLES ...0.5MARK@EXAMPLE. =4MARKS)

4.(a) (i) Salt in sea water catalyses the rusting process. (1MARK)

(ii) The splint will relight. (1MARK)

(iii)Itwill formoxides of non-metal/acidic oxides. (1MARK)

(iv) It will form water. (1MARK)

(b)

(i) The iron rod will form a reddish brown colour (rust). (1MARK)

(ii) -Iron or steel

-Moisture/water

-Oxygen/air

(1MARK@=3MARKS)

(iii) - Painting

-Galvanization

-Tin plating

- Oiling and greasing

(ONLY TWO POINTS (1MARK@=2MARKS)

5.(a) (i) It's the First aid. (1MARK)

(ii) The help given by Vister to Anisha is important.Its important because;

-Reduce pain

-It saves life of a victim

-It brings hope and encouragement to a victim

-It removes fear of death

- Shorten recovery time

-It prevent chances of permanent disability (FOUR POINTS 1MARK@=4MARKS)

(b) (i) Melting-is the change of state of matter from solid to liquid. (1 MARK)

(ii) Freezing - is the change of state of matter from liquid to solid. (1 MARK)

(c) (i) It help in drying of materials eg crops, clothes

(ii) It help in the formation of rain

(iii) It help in purification of metals

(iv) It help in refrigeration/air conditioner

(v) It help in making alloys. (ONLY THREE POINTS 1MARK@=3)

6.(a) (i) Physical change

(ii) Chemical change

(iii) Chemical change

(iv) Physical change

(v) Chemical change.

(vi) Physical change.

(vii) Physical change. (1MARK@=7)

(b) Because of the following points;

(i) There is no new substance formed

(ii) The change is reversible

(iii) There is no change in mass. (Any3 points)

(iv) Involves the physical properties. (1MARK@=3)

7.(a)Fire is the state or process of combustion in which ignited material combines with oxygen and gives off light,heat and flame. (1MARK)

(b) (i) The type of reaction is combustion. (1MARK)

(ii) The name of the piece of wood is combustible material/fuel (2MARKS)

(c)It's applied in many areas including

(i) Industries example

- Welding and smelting

- In large boilers

(ii) Domestic example

- Cooking

- Burning wastes

(iii) laboratory example

- Sterilization

- During experiments (ONE EXAMPLE, ONE APPLICATION; 1 MARK @ = 6 MARK)

8.(a) Gas M is Oxygen (1 MARK)

(b) (i) Thistle funnel

(ii) Delivery tube

(iii) Flat-bottomed flask

(iv) Inverted gas jar

(v) Trough

(vi) Beehive shelf. (1 MARK @ = 6 MARKS)

(c) $\text{Hydrogen peroxide} \xrightarrow{\text{Catalyst}} \text{Oxygen} + \text{Water}$

$\text{Hydrogen peroxide} \xrightarrow{\text{Catalyst}} \text{Oxygen} + \text{Water}$ (1 MARK)

(d) uses of Oxygen;

(i) Used in respiration

(ii) Used in welding and metal cutting

(iii) Used by mountain climbers.

(iv) Used in manufacturing of chemicals. (ONLY TWO POINTS; 1 MARK @ = 2 MARKS)

9.(a) (i) All matter is made up of tiny indivisible particles called atoms

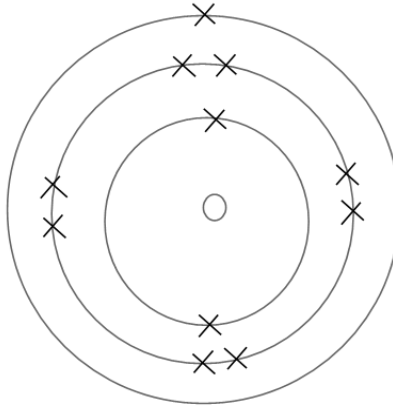
(ii) Atoms can neither be created nor destroyed. (1.5 MARKS @ = 3 MARKS)

(b)(i)-It is cheap (affordable)

-It is available

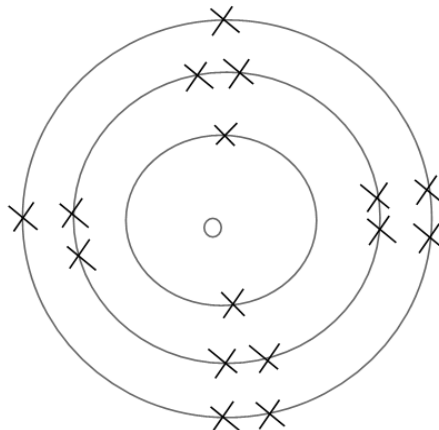
-Easy in transportation (1MARK@=3Marks)

(i) Sodium



2:8:1

(ii) Sulphur



2:8:6

(1MARK @: DIAGRAM 1MARK,ELECTRONIC CONFIGURATION 1MARK=4MARKS)

SECTION C (15 MARKS)

10.(a) (i) Problem identification

(ii) Asking questions

(iii) Hypothesis formulation

(iv) Experimentation

(v) Drawing conclusions.

(2MARKS@=10MARKS)

(b)Because;

(i) It help us to solve scientific problems

(ii) It help to gain new knowledge

(iii) It help us to conduct project work

(iv) It help us to solve problem or answer scientific questions

(ONLY TWO POINTS:1MARK@=2MARK)

(c) (i) When carrying out experiments

(ii) In project work

(iii)In a field study.

(1MARK@=3MARKS)